

The Prehistory of Language from the Perspective of the Y-Chromosome

Supplementary tables for the research guide.

The Genetic-Linguistic Interface Project.



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Supplementary Tables for Chapter 2 and Haplogroup A

Supplementary Table 2.1. Nilo-Saharan and the A-M13 Mutation.

Source	Population	Location	Language	Language Family	Frequency of A-M13
Hassan et al. 2008	Dinka	Sudan	Dinka (5)	Nilo-Saharan	62%
Haber et al. 2016	Gumuz	Ethiopia	Gumuz	Nilo-Saharan	59%
Hassan et al. 2008	Shilluk	Sudan	Shilluk	Nilo-Saharan	53%
Hassan et al. 2008	Nubians	Sudan	Nubian (13)	Nilo-Saharan	46%
Gomes et al. 2010	Ng'arkarimojong	Uganda	Ng'arkarimojong	Nilo-Saharan	33%
Wood et al. 2005	Maasai	Kenya	Maasai	Nilo-Saharan	27%
Wood et al. 2005	Alur	DR Congo	Alur	Nilo-Saharan	22%
Hassan et al. 2008	Masalit	Sudan	Masalit	Nilo-Saharan	19%
Batini et al. 2011	Turkana	Kenya	Turkana	Nilo-Saharan	13%
Wood et al. 2005	Luo	Kenya	Dholuo	Nilo-Saharan	11%
Tishkoff et al. 2007	Datooga	Tanzania	Datooga	Nilo-Saharan	9%
Batini et al. 2011	Maasai	Kenya	Maasai	Nilo-Saharan	6%
Haber et al. 2016	Maasai	Kenya	Maasai	Nilo-Saharan	6%
Batini et al. 2011	Samburu	Kenya	Samburu	Nilo-Saharan	3%
Haber et al. 2016	Sara	Chad	Sara-Bagirmia (28)	Nilo-Saharan	2%

Supplementary Table 2.2. Afro-Asiatic and the A-M13 Mutation.

Source	Population	Location	Language	Language Family	Frequency of A-M13
Haber et al. 2016	Welayta	Ethiopia	Wolaytta	Afro-Asiatic	43%
Haber et al. 2016	Amhara	Ethiopia	Amharic	Afro-Asiatic	30%
Batini et al. 2011	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	19%
Haber et al. 2016	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	17%
Wood et al. 2005	Amhara	Ethiopia	Amharic	Afro-Asiatic	17%
Hassan et al. 2008	Amhara	Ethiopia	Amharic	Afro-Asiatic	15%
Wood et al. 2005	Mandara	Cameroon	Wandala	Afro-Asiatic	14%
Batini et al. 2011	El Molo	Kenya	El Molo	Afro-Asiatic	13%
Hassan et al. 2008	Hausa	Sudan	Hausa	Afro-Asiatic	13%
Wood et al. 2005	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	11%
Batini et al. 2011	Mandara	Cameroon	Wandala	Afro-Asiatic	10%
Batini et al. 2011	Amhara	Ethiopia	Amharic	Afro-Asiatic	10%
Hassan et al. 2008	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	10%
Batini et al. 2011	Dawro	Ethiopia	Dawro	Afro-Asiatic	8%
Hassan et al. 2008	Beja	Sudan	Bedawiyet	Afro-Asiatic	5%

Supplementary Table 2.3. Niger-Congo and the A-M13 Mutation.

Source	Population	Location	Language	Language Famil	Branch	Frequency of A-M13
Wood et al. 2005	Tupuri	Cameroon	Tupuri	Niger-Congo	Non-Bantoid	22%
Batini et al. 2011	Tupuri	Cameroon	Tupuri	Niger-Congo	Non-Bantoid	11%
Wood et al. 2005	Baganda (Ganda)	Uganda	Ganda	Niger-Congo	Bantoid	8%
Wood et al. 2005	Hema	DR Congo	Hema	Niger-Congo	Bantoid	6%
Batini et al. 2011	Igala	Nigeria	Igala	Niger-Congo	Non-Bantoid	5%
Wood et al. 2005	Kikuyu	Kenya	Gikuyu	Niger-Congo	Bantoid	2%
Wood et al. 2005	Kamba	Kenya	Kamba	Niger-Congo	Bantoid	2%

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Supplementary Tables for Chapter 3 and Haplogroup B-M60

Supplementary Table 3.1. B-M112 and Bantoid Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Cruciani et al. 2002	Lissongo	Central African Republic	Mbati	Niger-Congo	Atlantic-Congo	25%
Luis et al. 2004	Tutsi	Rwanda	Rwanda-Rundi (6)	Niger-Congo	Atlantic-Congo	14%
Coelho et al. 2009	Kuvale	Angola	Herero	Niger-Congo	Atlantic-Congo	12%
Barbieri et al. 2013	Subiya	Zambia	Kuhane	Niger-Congo	Atlantic-Congo	9%
Barbieri et al. 2013	Totela	Zambia	Totela	Niger-Congo	Atlantic-Congo	8%
Knight et al. 2003	Sukuma	Tanzania	Sukuma	Niger-Congo	Atlantic-Congo	6%
Montano et al. 2011	Kota	Gabon	Kota	Niger-Congo	Atlantic-Congo	5%
Tishkoff et al. 2007	Turu	Tanzania	Nyaturu	Niger-Congo	Atlantic-Congo	5%
Coelho et al. 2009	Nyaneka-Nkhumbi	Angola	Nkumbi	Niger-Congo	Atlantic-Congo	4%
Barbieri et al. 2013	Tonga	Zambia	Tonga	Niger-Congo	Atlantic-Congo	3%
Wood et al. 2005	Zulu	South Africa	Zulu	Niger-Congo	Atlantic-Congo	3%
Berniell-Lee et al. 2009	Kota	Gabon	Kota	Niger-Congo	Atlantic-Congo	2%
Berniell-Lee et al. 2009	Shira (Eshira)	Gabon	Sira	Niger-Congo	Atlantic-Congo	2%
Berniell-Lee et al. 2009	Duma	Gabon	Duma	Niger-Congo	Atlantic-Congo	2%
Berniell-Lee et al. 2009	Shake	Gabon	Sake	Niger-Congo	Atlantic-Congo	2%
Luis et al. 2004	Hutu	Rwanda	Rwanda-Rundi (6)	Niger-Congo	Atlantic-Congo	1%
Batini et al. 2011	Tiv	Nigeria	Tiv	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Bakwele	Gabon	Bekwel	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Benga	Gabon	Benga	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Fang	Gabon	Fang	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Obamba	Gabon	Ombamba	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Makaa (Makina)	Gabon	Makaa	Niger-Congo	Atlantic-Congo	0%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Berniell-Lee et al. 2009	Mitsogo (Tsogo)	Gabon	Tsogo	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Ndumu	Gabon	Ndumu	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Ngumba (Ngoumba)	Cameroon	Kwasio	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Nzebi	Gabon	Njebi	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Kele (Akele)	Gabon	Kélé	Niger-Congo	Atlantic-Congo	0%
Cruciani et al. 2002	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	0%
Barbieri et al. 2013	Kwamashi	Zambia	Mashi	Niger-Congo	Atlantic-Congo	0%
Barbieri et al. 2013	Mbukushu	Zambia	Mbukushu	Niger-Congo	Atlantic-Congo	0%
Barbieri et al. 2013	Shanjo	Zambia	Tonga	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Xhosa	South Africa	Xhosa	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Tswana	South Africa	Tswana	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Fante	Ghana	Akan	Niger-Congo	Atlantic-Congo	0%
Batini et al. 2011	Teke (Bateke, Ateke)	Congo	Teke (9)	Niger-Congo	Atlantic-Congo	0%
Cruciani et al. 2002	Ewondo	Cameroon	Ewondo	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Mbaouin	Gabon	Mbangwe	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Shona	Zimbabwe	Shona	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Fang	Gabon	Fang	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Eviya	Gabon	Eviya	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Fang	Cameroon	Fang	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Galwa (Galoa)	Gabon	Myene	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Punu	Gabon	Punu	Niger-Congo	Atlantic-Congo	0%
Cruciani et al. 2002	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Nzebi	Gabon	Njebi	Niger-Congo	Atlantic-Congo	0%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Berniell-Lee et al. 2009	Okande	Gabon	Kande	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Duma	Gabon	Duma	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Ewondo	Cameroon	Ewondo	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Fang	Cameroon	Fang	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Kamba	Kenya	Kamba	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Makaa (Makina)	Gabon	Makaa	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Bassa	Cameroon	Basaa	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Ngumba (Ngoumba)	Cameroon	Kwasio	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Teke (Bateke, Ateke)	Congo	Teke (9)	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Tiv	Nigeria	Tiv	Niger-Congo	Atlantic-Congo	0%
Tishkoff et al. 2007	Mbugwe	Tanzania	Mbugwe	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Herero	Namibia	Herero	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Fante	Ghana	Akan	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Ndumu	Gabon	Ndumu	Niger-Congo	Atlantic-Congo	0%
Luis et al. 2004	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Orungu	Gabon	Myene	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Hema	Congo	Hema	Niger-Congo	Atlantic-Congo	0%
Berniell-Lee et al. 2009	Teke (Bateke, Ateke)	Gabon	Teke (9)	Niger-Congo	Atlantic-Congo	0%
Barbieri et al. 2013	Fwe	Zambia	Fwe	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Ovambo	Namibia	Oshiwambo	Niger-Congo	Atlantic-Congo	0%
Filippo et al. 2010	Kunda	Zambia	Chichewa	Niger-Congo	Atlantic-Congo	0%
Montano et al. 2011	Benga	Gabon	Benga	Niger-Congo	Atlantic-Congo	0%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Wood et al. 2005	Nande	Congo	Nande	Niger-Congo	Atlantic-Congo	0%
Coelho et al. 2009	Ovimbundu	Angola	Umbundu	Niger-Congo	Atlantic-Congo	0%
Wood et al. 2005	Kikuyu	Kenya	Gikuyu	Niger-Congo	Atlantic-Congo	0%
Marks et al. 2015	Ndebele	Lesotho	Ndebele (2)	Niger-Congo	Atlantic-Congo	0%
Marks et al. 2015	Sotho	Lesotho	Sotho (2)	Niger-Congo	Atlantic-Congo	0%
Marks et al. 2015	Thembu	Lesotho	Xhosa	Niger-Congo	Atlantic-Congo	0%
Marks et al. 2015	Xhosa	Lesotho	Xhosa	Niger-Congo	Atlantic-Congo	0%
Marks et al. 2015	Zulu	Lesotho	Zulu	Niger-Congo	Atlantic-Congo	0%
Haber et al. 2016	Luhya	Kenya	Masaba-Luhya (14)	Niger-Congo	Atlantic-Congo	0%

Supplementary Table 3.2. B-M112 and Non-Bantoid Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Filippo et al. 2010	Bissa	Zambia	Bisa	Niger-Congo	Mande	3.00%
rbieri et al. 2012	Pana	Burkina Faso	Pana	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Fula (Fulbe, Fulani)	Cameroon	Fulfulde (7)	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Fula (Fulbe, Fulani)	Burkina Faso	Fulfulde (7)	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Mossi	Burkina Faso	Mòoré	Niger-Congo	Atlantic-Congo	0.00%
Batini et al. 2011	Beti	Congo	Beti	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Yoruba	Burkina Faso	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Bissa	Burkina Faso	Bisa	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Samo	Burkina Faso	Samo (3)	Niger-Congo	Mande	0.00%
Batini et al. 2011	Igala	Nigeria	Igala	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Nuna	Burkina Faso	Nuni (2)	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Mossi	Burkina Faso	Mòoré	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Marka	Burkina Faso	Marka	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Mandinka	Burkina Faso	Mandinka	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Lyéla	Burkina Faso	Lyélé	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Kassena	Burkina Faso	Kasem	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Samoya	Burkina Faso	Kalamsé	Niger-Congo	Atlantic-Congo	0.00%
Haber et al. 2016	Yoruba	Nigeria	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Mandinka	Gambia/Senegal	Mandinka	Niger-Congo	Mande	0.00%
Wood et al. 2005	Ga	Ghana	Ga	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Ewe	Ghana	Éwé	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Dogon	Mali	Dogon (19)	Niger-Congo	Atlantic-Congo	0.00%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Tishkoff et al. 2007	Yoruba	Nigeria	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Montano et al. 2011	Igala	Nigeria	Igala	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Fali	Cameroon	Fali (2)	Niger-Congo	Atlantic-Congo	0.00%
Luis et al. 2004	Fon	Benin	Fon	Niger-Congo	Atlantic-Congo	0.00%
Batini et al. 2011	Idoma	Nigeria	Idoma	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Yoruba	Benin	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Fon	Benin	Fon	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Dan (Yacouba)	Ivory Coast	Dan	Niger-Congo	Mande	0.00%
Fortes-Lima et al. 2015	Bariba	Benin	Baatonum	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Aizi	Ivory Coast	Aizi (3)	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Wolof	Gambia/Senegal	Wolof	Niger-Congo	Atlantic-Congo	0.00%
Montano et al. 2011	Idoma	Nigeria	Idoma	Niger-Congo	Atlantic-Congo	0.00%

Supplementary Table 3.3. B-M112 and Pygmy Populations.

Source	Population	Location	Language	Language Family	Branch One	Branch Two	Frequency of B-M112
Berniell-Lee 2009a	Baka	Gabon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	64.00%
Batini 2011a	Mbuti	Congo	N/A	N/A			64.00%
Berniell-Lee 2009a	Baka	Cameroon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	60.00%
Wood 2005a	Mbuti	Congo	N/A	N/A			43.00%
Batini 2011a	Baka	Cameroon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	37.00%
Cruciani 2002a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	30.00%
Cruciani 2002a	Mbuti	Congo	N/A	N/A			25.00%
Coia 2004a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	24.00%
Batini 2011a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	19.00%
Berniell-Lee 2009a	Gyele (Bakola)	Cameroon	Gyele	Niger-Congo	Atlantic-Congo	Bantoid	18.00%
Batini 2011a	Gyele (Bakola)	Cameroon	Gyele	Niger-Congo	Atlantic-Congo	Bantoid	10.00%
Wood 2005a	Baganda (Ganda)	Uganda	Ganda	Niger-Congo	Atlantic-Congo	Bantoid	0.00%
Batini 2011a	Babinga	Congo	Baka	Niger-Congo	Atlantic-Congo	Bantoid	0.00%

Supplementary Table 3.4. B-M112 and Khoisan Populations.

Source	Population	Location	Language	Language Family	Frequency of B-M112
Marks et al. 2015	Ju 'hoan	Lesotho	Ju 'hoan	Kx'a	47.00%
Wood et al. 2005	!Kung	Namibia	!Kung (3)	Khoe-Kwadi	9.00%
Cruciani et al. 2002	!Kung	South Africa	!Kung (3)	Khoe-Kwadi	8.00%
Henn et al. 2011	≠Khomani Bushmen	South Africa	N u	Tuu	5.00%
Wood et al. 2005	Nama	Namibia	Nama (3)	Khoe-Kwadi	0.00%
Cruciani et al. 2002	Khwe	South Africa	Khwe	Khoe-Kwadi	0.00%
Wood et al. 2005	Damara	Namibia	Nama (3)	Khoe-Kwadi	0.00%

Supplementary Table 3.5. B-M112 and Isolate Populations .

Source	Population	Location	Language	Language Family	Frequency of B-M112
Knight et al. 2003	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	52.00%
Tishkoff et al. 2007	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	51.00%
Henn et al. 2011	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	50.00%
Henn et al. 2011	Sandawe	Tanzania	Sandawe	Isolate	29.00%
Tishkoff et al. 2007	Sandawe	Tanzania	Sandawe	Isolate	13.00%
Haber et al. 2016	Laal	Chad	Laal	Isolate	0.00%

Supplementary Table 3.6. B-M112 and Afro-Asiatic Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M112
Tishkoff et al. 2007	Burunge	Tanzania	Burunge	Afro-Asiatic	Cushitic	25.00%
Wood et al. 2005	Iraqw	Tanzania	Iraqw	Afro-Asiatic	Cushitic	11.00%
Haber et al. 2016	Welayta	Ethiopia	Wolaytta	Afro-Asiatic	Omotic	0.00%
Cruciani et al. 2002	Berber	Morocco	Berber (26)	Afro-Asiatic	Berber	0.00%
Batini et al. 2011	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Batini et al. 2011	El Molo	Kenya	El Molo	Afro-Asiatic	Cushitic	0.00%
Batini et al. 2011	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%
Haber et al. 2016	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Haber et al. 2016	Somali	Ethiopia	Somali	Afro-Asiatic	Cushitic	0.00%
Cruciani et al. 2002	Daba	Cameroon	Daba	Afro-Asiatic	Chadic	0.00%
Knight et al. 2003	Iraqw	Tanzania	Iraqw	Afro-Asiatic	Cushitic	0.00%
Wood et al. 2005	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Wood et al. 2005	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%
Wood et al. 2005	Podoko	Cameroon	Parkwa	Afro-Asiatic	Chadic	0.00%
Cruciani et al. 2002	Uldeme	Cameroon	Wuzlam	Afro-Asiatic	Chadic	0.00%
Haber et al. 2016	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%

Supplementary Table 3.7. B-M112 and Nilo-Saharan Populations.

Source	Population	Location	Language	Language Family	Frequency of B-M11
Batini et al. 2011	Maasai	Kenya	Maasai	Nilo-Saharan	6.00%
Gomes et al. 2010	Ng'arkarimojong	Uganda	Ng'arkarimojong	Nilo-Saharan	4.00%
Tishkoff et al. 2007	Datooga	Tanzania	Datooga	Nilo-Saharan	3.00%
Haber et al. 2016	Sara	Chad	Sara-Bagirmia (28)	Nilo-Saharan	2.00%
Wood et al. 2005	Maasai	Kenya	Maasai	Nilo-Saharan	0.00%
Wood et al. 2005	Luo	Kenya	Dholuo	Nilo-Saharan	0.00%
Wood et al. 2005	Alur	Congo	Alur	Nilo-Saharan	0.00%
Knight et al. 2003	Datooga	Tanzania	Datooga	Nilo-Saharan	0.00%
Haber et al. 2016	Toubou	Chad	Tebu (2)	Nilo-Saharan	0.00%
Haber et al. 2016	Maasai	Kenya	Maasai	Nilo-Saharan	0.00%
Haber et al. 2016	Gumuz	Ethiopia	Gumuz	Nilo-Saharan	0.00%
Batini et al. 2011	Samburu	Kenya	Samburu	Nilo-Saharan	0.00%
Batini et al. 2011	Kanuri	Cameroon	Kanuri (4)	Nilo-Saharan	0.00%

Supplementary Table 3.8. B-M150 and Bantoid Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Montano et al. 2011	Ngumba (Ngoumba)	Cameroon	Kwasio	Niger-Congo	Atlantic-Congo	40.00%
Barbieri et al. 2016	Kgalagadi	Botswana	Kgalagadi	Niger-Congo	Atlantic-Congo	38.00%
Berniell-Lee et al. 2009	Ngumba (Ngoumba)	Cameroon	Kwasio	Niger-Congo	Atlantic-Congo	33.00%
Barbieri et al. 2016	Tswana	Botswana	Tswana	Niger-Congo	Atlantic-Congo	28.00%
Berniell-Lee et al. 2009	Eviya	Gabon	Eviya	Niger-Congo	Atlantic-Congo	21.00%
Montano et al. 2011	Makaa (Makina)	Gabon	Makaa	Niger-Congo	Atlantic-Congo	19.00%
Wood et al. 2005	Tswana	South Africa	Tswana	Niger-Congo	Atlantic-Congo	18.00%
Barbieri et al. 2013	Totela	Zambia	Totela	Niger-Congo	Atlantic-Congo	15.00%
Berniell-Lee et al. 2009	Makaa (Makina)	Gabon	Makaa	Niger-Congo	Atlantic-Congo	14.00%
Berniell-Lee et al. 2009	Shake	Gabon	Sake	Niger-Congo	Atlantic-Congo	14.00%
Berniell-Lee et al. 2009	Shira (Eshira)	Gabon	Sira	Niger-Congo	Atlantic-Congo	14.00%
Wood et al. 2005	Zulu	South Africa	Zulu	Niger-Congo	Atlantic-Congo	14.00%
Marks et al. 2015	Sotho	Lesotho	Sotho (2)	Niger-Congo	Atlantic-Congo	12.00%
Barbieri et al. 2016	Kalanga	Botswana	Kalanga	Niger-Congo	Atlantic-Congo	11.00%
Barbieri et al. 2016	Himba	Namibia	Herero	Niger-Congo	Atlantic-Congo	10.00%
Wood et al. 2005	Shona	Zimbabwe	Shona	Niger-Congo	Atlantic-Congo	10.00%
Marks et al. 2015	Ndebele	Lesotho	Ndebele (2)	Niger-Congo	Atlantic-Congo	10.00%
Cruciani et al. 2002	Ewondo	Cameroon	Ewondo	Niger-Congo	Atlantic-Congo	10.00%
Berniell-Lee et al. 2009	Punu	Gabon	Punu	Niger-Congo	Atlantic-Congo	9.00%
Knight et al. 2003	Sukuma	Tanzania	Sukuma	Niger-Congo	Atlantic-Congo	9.00%
Montano et al. 2011	Benga	Gabon	Benga	Niger-Congo	Atlantic-Congo	9.00%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Berniell-Lee et al. 2009	Mitsogo (Tsogo)	Gabon	Tsogo	Niger-Congo	Atlantic-Congo	8.00%
Montano et al. 2011	Nzebi	Gabon	Njebi	Niger-Congo	Atlantic-Congo	8.00%
Marks et al. 2015	Xhosa	Lesotho	Xhosa	Niger-Congo	Atlantic-Congo	7.00%
Berniell-Lee et al. 2009	Nzebi	Gabon	Njebi	Niger-Congo	Atlantic-Congo	7.00%
Coelho et al. 2009	Ovimbundu	Angola	Umbundu	Niger-Congo	Atlantic-Congo	7.00%
Tishkoff et al. 2007	Mbugwe	Tanzania	Mbugwe	Niger-Congo	Atlantic-Congo	7.00%
Marks et al. 2015	Zulu	Lesotho	Zulu	Niger-Congo	Atlantic-Congo	6.00%
Montano et al. 2011	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	6.00%
Wood et al. 2005	Xhosa	South Africa	Xhosa	Niger-Congo	Atlantic-Congo	5.00%
Montano et al. 2011	Teke (Bateke, Ateke)	Congo	Teke (9)	Niger-Congo	Atlantic-Congo	5.00%
Barbieri et al. 2016	Ovambo	Namibia	Oshiwambo	Niger-Congo	Atlantic-Congo	5.00%
Montano et al. 2011	Fang	Gabon	Fang	Niger-Congo	Atlantic-Congo	5.00%
Haber et al. 2016	Luhya	Kenya	Masaba-Luhya (14)	Niger-Congo	Atlantic-Congo	4.00%
Berniell-Lee et al. 2009	Duma	Gabon	Duma	Niger-Congo	Atlantic-Congo	4.00%
Coelho et al. 2009	Nyaneka-Nkhumbi	Angola	Nkumbi	Niger-Congo	Atlantic-Congo	4.00%
Berniell-Lee et al. 2009	Obamba	Gabon	Ombamba	Niger-Congo	Atlantic-Congo	4.00%
Montano et al. 2011	Ewondo	Cameroon	Ewondo	Niger-Congo	Atlantic-Congo	4.00%
Marks et al. 2015	Thembu	Lesotho	Xhosa	Niger-Congo	Atlantic-Congo	4.00%
Berniell-Lee et al. 2009	Kota	Gabon	Kota	Niger-Congo	Atlantic-Congo	4.00%
Batini et al. 2011	Teke (Bateke, Ateke)	Congo	Teke (9)	Niger-Congo	Atlantic-Congo	3.00%
Barbieri et al. 2013	Tonga	Zambia	Tonga	Niger-Congo	Atlantic-Congo	3.00%
Berniell-Lee et al. 2009	Ndumu	Gabon	Ndumu	Niger-Congo	Atlantic-Congo	3.00%
Montano et al. 2011	Duma	Gabon	Duma	Niger-Congo	Atlantic-Congo	3.00%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Wood et al. 2005	Kamba	Kenya	Kamba	Niger-Congo	Atlantic-Congo	3.00%
Montano et al. 2011	Ndumu	Gabon	Ndumu	Niger-Congo	Atlantic-Congo	3.00%
Barbieri et al. 2016	Herero	Namibia	Herero	Niger-Congo	Atlantic-Congo	3.00%
Wood et al. 2005	Kikuyu	Kenya	Gikuyu	Niger-Congo	Atlantic-Congo	3.00%
Luis et al. 2004	Hutu	Rwanda	Rwanda-Rundi (6)	Niger-Congo	Atlantic-Congo	3.00%
Berniell-Lee et al. 2009	Galwa (Galoa)	Gabon	Myene	Niger-Congo	Atlantic-Congo	2.00%
Berniell-Lee et al. 2009	Fang	Gabon	Fang	Niger-Congo	Atlantic-Congo	2.00%
Berniell-Lee et al. 2009	Kele (Akele)	Gabon	Kélé	Niger-Congo	Atlantic-Congo	2.00%
Batini et al. 2011	Tiv	Nigeria	Tiv	Niger-Congo	Atlantic-Congo	2.00%
Montano et al. 2011	Tiv	Nigeria	Tiv	Niger-Congo	Atlantic-Congo	2.00%
Montano et al. 2011	Bassa	Cameroon	Basaa	Niger-Congo	Atlantic-Congo	2.00%
Luis et al. 2004	Tutsi	Rwanda	Rwanda-Rundi (6)	Niger-Congo	Atlantic-Congo	1.00%
Montano et al. 2011	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0.00%
Luis et al. 2004	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Nande	Congo	Nande	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Bakaka	Cameroon	Bakaka	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Ovambo	Namibia	Oshiwambo	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Lissongo	Central African Republic	Mbati	Niger-Congo	Atlantic-Congo	0.00%
Montano et al. 2011	Fang	Cameroon	Fang	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2013	Subiya	Zambia	Kuhane	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2013	Shanjo	Zambia	Tonga	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2013	Mbukushu	Zambia	Mbukushu	Niger-Congo	Atlantic-Congo	0.00%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Barbieri et al. 2013	Kwamashi	Zambia	Mashi	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Fante	Ghana	Akan	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Mbaouin	Gabon	Mbangwe	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Teke (Bateke, Ateke)	Gabon	Teke (9)	Niger-Congo	Atlantic-Congo	0.00%
Tishkoff et al. 2007	Turu	Tanzania	Nyaturu	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Okande	Gabon	Kande	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Benga	Gabon	Benga	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Bakwele	Gabon	Bekwel	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Orungu	Gabon	Myene	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Herero	Namibia	Herero	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Fante	Ghana	Akan	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Bamileke	Cameroon	Bamileke (10)	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2016	Mbukushu	Zambia	Mbukushu	Niger-Congo	Atlantic-Congo	0.00%
Berniell-Lee et al. 2009	Fang	Cameroon	Fang	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Hema	Congo	Hema	Niger-Congo	Atlantic-Congo	0.00%
Coelho et al. 2009	Kuvale	Angola	Herero	Niger-Congo	Atlantic-Congo	0.00%
Filippo et al. 2010	Kunda	Zambia	Chichewa	Niger-Congo	Atlantic-Congo	0.00%
Montano et al. 2011	Kota	Gabon	Kota	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2013	Fwe	Zambia	Fwe	Niger-Congo	Atlantic-Congo	0.00%

Supplementary Table 3.9. B-M150 and Non-Bantoid Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Barbieri et al. 2012	Samoya	Burkina Faso	Kalamsé	Niger-Congo	Atlantic-Congo	19.00%
Cruciani et al. 2002	Fali	Cameroon	Fali (2)	Niger-Congo	Atlantic-Congo	18.00%
Barbieri et al. 2012	Nuna	Burkina Faso	Nuni (2)	Niger-Congo	Atlantic-Congo	10.00%
Fortes-Lima et al. 2015	Yoruba	Benin	Yoruba	Niger-Congo	Atlantic-Congo	9.00%
Wood et al. 2005	Dogon	Mali	Dogon (19)	Niger-Congo	Atlantic-Congo	7.00%
Batini et al. 2011	Igala	Nigeria	Igala	Niger-Congo	Atlantic-Congo	5.00%
Montano et al. 2011	Igala	Nigeria	Igala	Niger-Congo	Atlantic-Congo	5.00%
Barbieri et al. 2012	Samo	Burkina Faso	Samo (3)	Niger-Congo	Mande	3.00%
Batini et al. 2011	Beti	Congo	Beti	Niger-Congo	Atlantic-Congo	3.00%
Cruciani et al. 2002	Fula (Fulbe, Fulani)	Cameroon	Fulfulde (7)	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Kassena	Burkina Faso	Kasem	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Lyéla	Burkina Faso	Lyélé	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Mandinka	Burkina Faso	Mandinka	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Marka	Burkina Faso	Marka	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Mossi	Burkina Faso	Mòoré	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Mandinka	Gambia/Senegal	Mandinka	Niger-Congo	Mande	0.00%
Barbieri et al. 2012	Pana	Burkina Faso	Pana	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Ga	Ghana	Ga	Niger-Congo	Atlantic-Congo	0.00%
Barbieri et al. 2012	Yoruba	Burkina Faso	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Batini et al. 2011	Idoma	Nigeria	Idoma	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Fula (Fulbe, Fulani)	Burkina Faso	Fulfulde (7)	Niger-Congo	Atlantic-Congo	0.00%

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Barbieri et al. 2012	Bissa	Burkina Faso	Bisa	Niger-Congo	Mande	0.00%
Wood et al. 2005	Ewe	Ghana	Éwé	Niger-Congo	Atlantic-Congo	0.00%
Wood et al. 2005	Wolof	Gambia/Senegal	Wolof	Niger-Congo	Atlantic-Congo	0.00%
Filippo et al. 2010	Bissa	Zambia	Bisa	Niger-Congo	Mande	0.00%
Fortes-Lima et al. 2015	Aizi	Ivory Coast	Aizi (3)	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Bariba	Benin	Baatonum	Niger-Congo	Atlantic-Congo	0.00%
Fortes-Lima et al. 2015	Dan (Yacouba)	Ivory Coast	Dan	Niger-Congo	Mande	0.00%
Fortes-Lima et al. 2015	Fon	Benin	Fon	Niger-Congo	Atlantic-Congo	0.00%
Tishkoff et al. 2007	Yoruba	Nigeria	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Haber et al. 2016	Yoruba	Nigeria	Yoruba	Niger-Congo	Atlantic-Congo	0.00%
Luis et al. 2004	Fon	Benin	Fon	Niger-Congo	Atlantic-Congo	0.00%
Montano et al. 2011	Idoma	Nigeria	Idoma	Niger-Congo	Atlantic-Congo	0.00%
Cruciani et al. 2002	Mossi	Burkina Faso	Mòoré	Niger-Congo	Atlantic-Congo	0.00%

Supplementary Table 3.10. B-M150 and Pygmy Populations.

Source	Population	Location	Language	Language Family	Branch One	Branch Two	Frequency of B-M150
Berniell-Lee 2009a	Gyele (Bakola)	Cameroon	Gyele	Niger-Congo	Atlantic-Congo	Bantoid	18.00%
Wood 2005a	Mbuti	Congo	N/A	N/A			11.00%
Cruciani 2002a	Mbuti	Congo	N/A	N/A			8.00%
Batini 2011a	Gyele (Bakola)	Cameroon	Gyele	Niger-Congo	Atlantic-Congo	Bantoid	7.00%
Batini 2011a	Baka	Cameroon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	5.00%
Cruciani 2002a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	5.00%
Batini 2011a	Mbuti	Congo	N/A	N/A			5.00%
Batini 2011a	Babinga	Congo	Baka	Niger-Congo	Atlantic-Congo	Bantoid	5.00%
Batini 2011a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	5.00%
Wood 2005a	Baganda (Ganda)	Uganda	Ganda	Niger-Congo	Atlantic-Congo	Bantoid	0.00%
Coia 2004a	Aka (Biaka)	Central African Republic	Yaka	Niger-Congo	Atlantic-Congo	Bantoid	0.00%
Berniell-Lee 2009a	Baka	Gabon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	0.00%
Berniell-Lee 2009a	Baka	Cameroon	Baka	Niger-Congo	Atlantic-Congo	Non-Bantoid	0.00%

Supplementary Table 3.11. B-M150 and Khoisan Populations.

Source	Population	Location	Language	Language Family	Frequency of B-M150
Barbieri et al. 2016	Gana	Botswana	Gana	Khoe-Kwadi	79.00%
Barbieri et al. 2016	Gwi	Botswana	Gwi	Khoe-Kwadi	17.00%
Barbieri et al. 2016	!Xóõ (Taa)	Botswana	!Xóõ	Tuu	16.00%
Barbieri et al. 2016	Ani	Botswana	Ani	Khoe-Kwadi	8.00%
Barbieri et al. 2016	Shua	Botswana	Shua	Khoe-Kwadi	8.00%
Wood et al. 2005	!Kung	Namibia	!Kung (3)	Khoe-Kwadi	0.00%
Wood et al. 2005	Damara	Namibia	Nama (3)	Khoe-Kwadi	0.00%
Cruciani et al. 2002	Khwe	South Africa	Khwe	Khoe-Kwadi	0.00%
Cruciani et al. 2002	!Kung	South Africa	!Kung (3)	Khoe-Kwadi	0.00%
Marks et al. 2015	Ju 'hoan	Lesotho	Ju 'hoan	Kx'a	0.00%
Barbieri et al. 2016	Nama	Namibia	KhoeKhoe	Khoe-Kwadi	0.00%
Wood et al. 2005	Nama	Namibia	Nama (3)	Khoe-Kwadi	0.00%
Barbieri et al. 2016	Ju 'hoan	Botswana	Ju 'hoan	Kx'a	0.00%
Barbieri et al. 2016	Naro	Botswana	Naro	Khoe-Kwadi	0.00%
Barbieri et al. 2016	Tshwa	Botswana	Tsoa	Khoe-Kwadi	0.00%
Barbieri et al. 2016	!Kung (!Xuun)	Namibia	!Kung (3)	Khoe-Kwadi	0.00%
Barbieri et al. 2016	Damara	Namibia	KhoeKhoe	Khoe-Kwadi	0.00%
Barbieri et al. 2016	Hai om	Namibia	Hai om	Khoe-Kwadi	0.00%
Henn et al. 2011	≠Khomani Bushmen	South Africa	N u	Tuu	0.00%

Supplementary Table 3.12. B-M150 and Isolate Populations.

Source	Population	Location	Language	Language Family	Frequency of B-M150
Henn et al. 2011	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	10.00%
Tishkoff et al. 2007	Sandawe	Tanzania	Sandawe	Isolate	1.00%
Tishkoff et al. 2007	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	0.00%
Knight et al. 2003	Hadza (Hadzabe)	Tanzania	Hadza	Isolate	0.00%
Henn et al. 2011	Sandawe	Tanzania	Sandawe	Isolate	0.00%
Haber et al. 2016	Laal	Chad	Laal	Isolate	0.00%

Supplementary Table 3.13. B-M150 and Afro-Asiatic Populations.

Source	Population	Location	Language	Language Family	Branch	Frequency of B-M150
Cruciani et al. 2002	Uldeme	Cameroon	Wuzlam	Afro-Asiatic	Chadic	5.00%
Haber et al. 2016	Welayta	Ethiopia	Wolaytta	Afro-Asiatic	Omotiic	0.00%
Cruciani et al. 2002	Berber	Morocco	Berber (26)	Afro-Asiatic	Berber	0.00%
Batini et al. 2011	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Batini et al. 2011	El Molo	Kenya	El Molo	Afro-Asiatic	Cushitic	0.00%
Batini et al. 2011	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%
Haber et al. 2016	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Wood et al. 2005	Iraqw	Tanzania	Iraqw	Afro-Asiatic	Cushitic	0.00%
Haber et al. 2016	Somali	Ethiopia	Somali	Afro-Asiatic	Cushitic	0.00%
Cruciani et al. 2002	Daba	Cameroon	Daba	Afro-Asiatic	Chadic	0.00%
Knight et al. 2003	Iraqw	Tanzania	Iraqw	Afro-Asiatic	Cushitic	0.00%
Tishkoff et al. 2007	Burunge	Tanzania	Burunge	Afro-Asiatic	Cushitic	0.00%
Wood et al. 2005	Amhara	Ethiopia	Amharic	Afro-Asiatic	Semitic	0.00%
Wood et al. 2005	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%
Wood et al. 2005	Podoko	Cameroon	Parkwa	Afro-Asiatic	Chadic	0.00%
Haber et al. 2016	Oromo	Ethiopia	Oromo (3)	Afro-Asiatic	Cushitic	0.00%

Supplementary Table 3.14. B-M150 and Nilo-Saharan Populations.

Source	Population	Location	Language	Language Family	Frequency of B-M150
Wood et al. 2005	Alur	Congo	Alur	Nilo-Saharan	56.00%
Wood et al. 2005	Luo	Kenya	Dholuo	Nilo-Saharan	22.00%
Gomes et al. 2010	Ng'arkarimojong	Uganda	Ng'arkarimojong	Nilo-Saharan	17.00%
Wood et al. 2005	Maasai	Kenya	Maasai	Nilo-Saharan	8.00%
Batini et al. 2011	Kanuri	Cameroon	Kanuri (4)	Nilo-Saharan	8.00%
Haber et al. 2016	Sara	Chad	Sara-Bagirmia (28)	Nilo-Saharan	5.00%
Batini et al. 2011	Samburu	Kenya	Samburu	Nilo-Saharan	3.00%
Tishkoff et al. 2007	Datooga	Tanzania	Datooga	Nilo-Saharan	0.00%
Knight et al. 2003	Datooga	Tanzania	Datooga	Nilo-Saharan	0.00%
Haber et al. 2016	Toubou	Chad	Tebu (2)	Nilo-Saharan	0.00%
Haber et al. 2016	Maasai	Kenya	Maasai	Nilo-Saharan	0.00%
Haber et al. 2016	Gumuz	Ethiopia	Gumuz	Nilo-Saharan	0.00%
Batini et al. 2011	Maasai	Kenya	Maasai	Nilo-Saharan	0.00%

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Supplementary Tables for Chapter 4 and Haplogroup D-M174

Supplementary Table 4.1. Overview of Time Standards that Carry a Discussion of the Prehistoric Data.

Date	Earth Science	Geological	Technological	Comments
130 thousand years ago.	Marine Isotope Stage 5 begins.	Pleistocene continues from 2.6 million years ago.	Paleolithic continues from 2.6 million years ago.	The start of Marine Isotope Stage 5 coincides with the start of the Last Ice Age. People move out of Africa into the Levant.
71 thousand years ago.	Marine Isotope Stage 4 begins.	Pleistocene continues.	Paleolithic continues.	The start of Marine Isotope Stage 4 coincides with the Toba eruption in Indonesia and a potential bottleneck among human populations.
57 thousand years ago.	Marine Isotope Stage 3 begins.	Pleistocene continues.	Paleolithic continues.	Favorable weather conditions drive human expansions across Eurasia.
29 thousand years ago.	Marine Isotope Stage 2 begins.	Pleistocene continues.	Paleolithic continues.	The start of Marine Isotope Stage 2 coincides with the Last Glacial Maximum. Late Pleistocene climate change drives human expansion into the Americas.
12 thousand years ago.	Marine Isotope Stage 1 begins.	Holocene begins.	Mesolithic starts. Neolithic starts with the adoption of agriculture.	The start of Marine Isotope Stage 1, the Holocene and the Mesolithic coincide with the end of the Last Ice Age. The Mesolithic is the time between the Paleolithic and Neolithic. The Neolithic marks the adoption of agriculture, the start of which varies from region of the world to the next.

Supplementary Table 4.2. Selected Split Time Estimates Using the Pedigree-Based Mutation Rate Estimate from Poznik et al. 2016 and Supplementary Table 10.

Mutation	Pedigree time from Poznik et al. 2016.	Marine Isotope Stage	Origin*
DR-M168	90.5	5	Middle East
DE-M145	65.0	4	Middle East
CR-P143	65.0	4	Middle East
D-M174	62.2	4	Middle East
E-M96	62.2	4	Middle East
C-M130	64.6	4	Middle East
FR-M89	64.6	4	Middle East
G-M201	46.4	3	Middle East
IJ-M429	45.4	3	Middle East
LR-M9	45.4	3	Middle East
J-M304	40.7	3	Middle East
LT-L298	43.6	3	Middle East
L-M20	41.2	3	Middle East
T-M184	41.2	3	Middle East
H-M2713	46.2	3	Middle East
KR-M526	43.6	3	Middle East
P-M45	43.5	3	?
Q-M242	30.0	3	Northern Eurasia
R-M207	30.0	3	Northern Eurasia
M-P256	43.5	3	East Asia
S-B254	43.5	3	East Asia
NO-M214	43.5	3	East Asia
N-M231	38.3	3	East Asia
O-M175	38.3	3	East Asia
I-M170	40.7	3	Europe

* Place of origin is my opinion.

Data Source: Poznik, G. David et al. 2016. “Punctuated bursts in human male demography inferred from 1,244 worldwide Y-chromosome sequences.” *Nature Genetics* 48(6): 593-600.

Supplementary Tables for Chapter 5 and Haplogroup E-M96

Supplementary Table 5.1. Survey of E-M81 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-M81 (%)
Trombetta et al. 2015	Mozabite Berbers	67	Algeria	Afro-Asiatic	86.6
Trombetta et al. 2015	Asni Berbers	54	Morocco	Afro-Asiatic	79.6
Trombetta et al. 2015	Marrakech Berbers	27	Morocco	Afro-Asiatic	77.8
Trombetta et al. 2015	Bouhria Berbers	67	Morocco	Afro-Asiatic	77.6
Trombetta et al. 2015	Souss Berbers	34	Morocco	Afro-Asiatic	76.5
Trombetta et al. 2015	Moyen Atlas Berbers	69	Morocco	Afro-Asiatic	71.0
Trombetta et al. 2015	Ouarzazate Berbers	31	Morocco	Afro-Asiatic	54.8
Trombetta et al. 2015	Pasangos from Cantabria	56	Spain	Indo-European	41.1
Trombetta et al. 2015	Moroccan Arabs	55	Morocco	Afro-Asiatic	30.9
Trombetta et al. 2015	Libian Arabs	10	Libya	Afro-Asiatic	30.0
Trombetta et al. 2015	Southern Portuguese	49	Portugal	Indo-European	12.2
Trombetta et al. 2015	Tunisian Jews	10	Tunisia	Afro-Asiatic	10.0
Trombetta et al. 2015	Tuareg	22	Niger	Afro-Asiatic	9.1
Trombetta et al. 2015	Turkish Cypriots	46	Turkey	Turkic	8.7
Trombetta et al. 2015	Istanbul Turkish	35	Turkey	Turkic	5.7
Trombetta et al. 2015	Sephardic Turkish	19	Turkey	Turkic	5.3
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	4.9
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	4.1
Trombetta et al. 2015	Northern Portuguese	50	Portugal	Indo-European	4.0
Trombetta et al. 2015	Spanish Basques	55	Spain	Basque	3.6
Trombetta et al. 2015	Bedouins	28	Israel	Afro-Asiatic	3.6
Trombetta et al. 2015	French	85	France	Indo-European	3.5

Study	Population	Size	Country	Lang Fam	Frequency of E-M81 (%)
Trombetta et al. 2015	Southwestern Turkish	40	Turkey	Turkic	2.5
Trombetta et al. 2015	Northeastern Turkish	41	Turkey	Turkic	2.4
Trombetta et al. 2015	Asturians	90	Spain	Indo-European	2.2
Trombetta et al. 2015	Southern Spaniards	62	Spain	Indo-European	1.6
Trombetta et al. 2015	Southern Italians	141	Italy	Indo-European	1.4
Trombetta et al. 2015	Northern Italians	80	Italy	Indo-European	1.3
Trombetta et al. 2015	Egyptian Berbers from Siwa	93	Egypt	Afro-Asiatic	1.1
Trombetta et al. 2015	Yemenites	94	Yemen	Afro-Asiatic	1.1
Trombetta et al. 2015	Hungarians	106	Hungary	Uralic	0.9
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	0.8
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	0.7
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	0.3

Supplementary Table 5.2. Survey of E-M34 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-M34 (%)
Flores et al. 2005	Dead Sea Jordanians	45	Jordan	Afro-Asiatic	31.1
Trombetta et al. 2015	Libian Jews	23	Libya	Afro-Asiatic	17.4
Trombetta et al. 2015	Ethiopian Jews	22	Ethiopia	Afro-Asiatic	13.6
Trombetta et al. 2015	Amhara	82	Ethiopia	Afro-Asiatic	13.4
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	10.2
Trombetta et al. 2015	Wolayta	12	Ethiopia	Afro-Asiatic	8.3
Trombetta et al. 2015	Erzurum Turkish	25	Turkey	Turkic	8.0
Trombetta et al. 2015	Omanite	13	Oman	Afro-Asiatic	7.7
Trombetta et al. 2015	Yemenites	94	Yemen	Afro-Asiatic	7.4
Trombetta et al. 2015	Bedouins	28	Israel	Afro-Asiatic	7.1
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	6.5
Trombetta et al. 2015	Sephardic Turkish	19	Turkey	Turkic	5.3
Trombetta et al. 2015	Sephardic Bulgarians	20	Bulgaria	Indo-European	5.0
Flores et al. 2005	Jordanians	101	Jordan	Afro-Asiatic	5.0
Trombetta et al. 2015	Cunama	20	Eritrea	Nilo-Saharan	5.0
Trombetta et al. 2015	Arabs	41	United Arab Emirate	Afro-Asiatic	4.9
Trombetta et al. 2015	Oromo	62	Ethiopia	Afro-Asiatic	4.8
Trombetta et al. 2015	Southeastern Turkish	24	Turkey	Turkic	4.2
Trombetta et al. 2015	Afar	25	Djibouti	Afro-Asiatic	4.0
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	3.9
Trombetta et al. 2015	Marrakech Berbers	27	Morocco	Afro-Asiatic	3.7
Trombetta et al. 2015	Druze Arabs	28	Israel	Afro-Asiatic	3.6
Grugni et al. 2012	Iranians	938	Indo-European	Indo-Iranian	3.5

Study	Population	Size	Country	Lang Fam	Frequency of E-M34 (%)
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	3.5
Trombetta et al. 2015	Palestinians	29	Irael	Afro-Asiatic	3.4
Trombetta et al. 2015	Central Anatolian	61	Turkey	Turkic	3.3
Trombetta et al. 2015	Continental Greeks	32	Greece	Indo-European	3.1
Trombetta et al. 2015	Istanbul Turkish	35	Turkey	Turkic	2.9
Trombetta et al. 2015	Southern Italians	141	Italy	Indo-European	2.8
Trombetta et al. 2015	Southwestern Turkish	40	Turkey	Turkic	2.5
Trombetta et al. 2015	Turkish Cypriots	46	Turkey	Turkic	2.2
Trombetta et al. 2015	Egyptian Berbers from Siwa	93	Egypt	Afro-Asiatic	2.2
Trombetta et al. 2015	Southern Egyptians	47	Egypt	Afro-Asiatic	2.1
Karachanak et al. 2013	Bulgarians	808	Indo-European	Slavic	1.9
Trombetta et al. 2015	Mozabite Berbers	67	Algeria	Afro-Asiatic	1.5
Trombetta et al. 2015	Corsicans	140	France	Indo-European	1.4
Trombetta et al. 2015	Northern Italians	80	Italy	Indo-European	1.3
Trombetta et al. 2015	Saho	94	Eritrea	Afro-Asiatic	1.1

Supplementary Table 5.3. Survey of E-M293 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-M293* (%)
Henn et al. 2008	Datooga	40	Tanzania	Nilo-Saharan	43.0
Henn et al. 2008	Khwe	26	South Africa	Khoe-Kwadi	31.0
Trombetta et al. 2015	Khwe	26	Namibia	Khoe-Kwadi	30.8
Henn et al. 2008	Burunge	25	Tanzania	Afro-Asiatic	28.0
Trombetta et al. 2015	Maasai	45	Kenya	Nilo-Saharan	24.4
Henn et al. 2008	Sandawe	70	Tanzania	Isolate	24.0
Trombetta et al. 2015	Tutsi	9	Burundi	Niger-Congo	22.2
Henn et al. 2008	Mbugwe	14	Tanzania	Niger-Congo	21.0
Trombetta et al. 2015	Nilotic Western Kenya	11	Kenya	Nilo-Saharan	18.2
Henn et al. 2008	Kenyan Bantu	11	Kenya	Niger-Congo	18.0
Trombetta et al. 2015	Turkana	6	Kenya	Nilo-Saharan	16.7
Henn et al. 2008	Turu	22	Tanzania	Niger-Congo	14.0
Henn et al. 2008	South African Bantu	8	South Africa	Niger-Congo	13.0
Trombetta et al. 2015	Bantu	8	South Africa	Niger-Congo	12.5
Trombetta et al. 2015	Other Bantu	17	Kenya	Niger-Congo	11.8
Trombetta et al. 2015	Kikuyu	9	Kenya	Niger-Congo	11.1
Henn et al. 2008	!Kung	64	South Africa	Khoe-Kwadi	11.0
Henn et al. 2008	Hazda	54	Tanzania	Isolate	11.0
Trombetta et al. 2015	!Kung	64	Angola	Khoe-Kwadi	9.4
Trombetta et al. 2015	Wolayta	12	Ethiopia	Afro-Asiatic	8.3
Trombetta et al. 2015	Luhya	51	Kenya	Niger-Congo	3.9
Henn et al. 2008	Sukuma	30	Tanzania	Niger-Congo	3.0
Trombetta et al. 2015	Oromo	62	Ethiopia	Afro-Asiatic	1.6

Supplementary Table 5.4. Survey of E-V13 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-V13 (%)
Trombetta et al. 2015	Albanians	21	Albania	Indo-European	33.3
Trombetta et al. 2015	Rumanians	30	Romania	Indo-European	26.7
Trombetta et al. 2015	Continental Greeks	32	Greece	Indo-European	25.0
Trombetta et al. 2015	Bulgarians	112	Bulgaria	Indo-European	21.4
Trombetta et al. 2015	Macedonians	99	Macedonia	Indo-European	18.2
Trombetta et al. 2015	Turkish Cypriots	46	Turkey	Turkic	10.9
Trombetta et al. 2015	Druze Arabs	28	Israel	Afro-Asiatic	10.7
Trombetta et al. 2015	Hungarians	106	Hungary	Uralic	9.4
Trombetta et al. 2015	Southern Italians	141	Italy	Indo-European	8.5
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	7.2
Trombetta et al. 2015	Northern Italians	80	Italy	Indo-European	6.3
Trombetta et al. 2015	Asturians	90	Spain	Indo-European	5.6
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	5.3
Trombetta et al. 2015	Central Anatolian	61	Turkey	Turkic	4.9
Trombetta et al. 2015	Libian Jews	23	Libya	Afro-Asiatic	4.3
Trombetta et al. 2015	Corsicans	140	France	Indo-European	4.3
Trombetta et al. 2015	Southeastern Turkish	24	Turkey	Turkic	4.2
Trombetta et al. 2015	Southern Portuguese	49	Portugal	Indo-European	4.1
Trombetta et al. 2015	Estonians	74	Estonia	Uralic	4.1
Trombetta et al. 2015	Northern Portuguese	50	Portugal	Indo-European	4.0
Trombetta et al. 2015	Germans	77	Germany	Indo-European	3.9
Trombetta et al. 2015	French	85	France	Indo-European	3.5

Study	Population	Size	Country	Lang Fam	Frequency of E-V13 (%)
Trombetta et al. 2015	Palestinians	29	Israel	Afro-Asiatic	3.4
Trombetta et al. 2015	Slovenians	104	Slovenia	Indo-European	2.9
Trombetta et al. 2015	Istanbul Turkish	35	Turkey	Turkic	2.9
Trombetta et al. 2015	Danish	35	Denmark	Indo-European	2.9
Trombetta et al. 2015	Polish	40	Poland	Indo-European	2.5
Trombetta et al. 2015	Southwestern Turkish	40	Turkey	Turkic	2.5
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	2.4
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	2.0
Trombetta et al. 2015	Bouhria Berbers	67	Morocco	Afro-Asiatic	1.5
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	1.1

Supplementary Table 5.5. Survey of E-V22 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-V22 (%)
Trombetta et al. 2015	Saho	94	Eritrea	Afro-Asiatic	88.3
Trombetta et al. 2015	Turkana	6	Kenya	Nilo-Saharan	33.3
Hassan et al. 2008	Fula (Fulbe, Fulani)	26	Sudan	Niger-Congo	30.8
Trombetta et al. 2015	Gurage	7	Ethiopia	Afro-Asiatic	28.6
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	22.0
Hassan et al. 2008	Fur	32	Sudan	Nilo-Saharan	18.8
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	16.3
Hassan et al. 2008	Masalit	32	Sudan	Nilo-Saharan	15.6
Hassan et al. 2008	Shilluk	15	Sudan	Nilo-Saharan	13.3
Hassan et al. 2008	Dinka	26	Sudan	Nilo-Saharan	11.5
Trombetta et al. 2015	Nilotic Western Kenya	11	Kenya	Nilo-Saharan	9.1
Trombetta et al. 2015	Somali	12	Ethiopia	Afro-Asiatic	8.3
Trombetta et al. 2015	Wolayta	12	Ethiopia	Afro-Asiatic	8.3
Trombetta et al. 2015	Omanite	13	Oman	Afro-Asiatic	7.7
Trombetta et al. 2015	Moroccan Arabs	55	Morocco	Afro-Asiatic	7.3
Trombetta et al. 2015	Palestinians	29	Israel	Afro-Asiatic	6.9
Trombetta et al. 2015	Maasai	45	Kenya	Nilo-Saharan	6.7
Trombetta et al. 2015	Nara	15	Eritrea	Nilo-Saharan	6.7
Trombetta et al. 2015	Istanbul Turkish	35	Turkey	Turkic	5.7
Trombetta et al. 2015	Cunama	20	Eritrea	Nilo-Saharan	5.0
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	4.6
Trombetta et al. 2015	Austrians	90	Spain	Indo-European	4.4

Study	Population	Size	Country	Lang Fam	Frequency of E-V22 (%)
Trombetta et al. 2015	Marrakech Berbers	27	Morocco	Afro-Asiatic	3.7
Trombetta et al. 2015	Asni Berbers	54	Morocco	Afro-Asiatic	3.7
Trombetta et al. 2015	Bedouins	28	Israel	Afro-Asiatic	3.6
Trombetta et al. 2015	Southern Spaniards	62	Spain	Indo-European	3.2
Trombetta et al. 2015	Tigrai	32	Eritrea/Ethiopia	Afro-Asiatic	3.1
Trombetta et al. 2015	Northern Italians	80	Italy	Indo-European	2.5
Trombetta et al. 2015	Amhara	82	Ethiopia	Afro-Asiatic	2.4
Trombetta et al. 2015	Arabs	41	United Arab Emirate	Afro-Asiatic	2.4
Trombetta et al. 2015	Turkish Cypriots	46	Turkey	Turkic	2.2
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	2.0
Trombetta et al. 2015	Southern Italians	141	Italy	Indo-European	1.4
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	0.8

Supplementary Table 5.6. Survey of E-V12 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-V12* (%)
Trombetta et al. 2015	Southern Egyptians	47	Egypt	Afro-Asiatic	74.5
Hassan et al. 2008	Nuer	12	Sudan	Nilo-Saharan	16.7
Hassan et al. 2008	Copts	33	Sudan	Afro-Asiatic	15.2
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	14.6
Hassan et al. 2008	Nubians	39	Sudan	Nilo-Saharan	12.8
Trombetta et al. 2015	Nilotic Western Kenya	11	Kenya	Nilo-Saharan	9.1
Trombetta et al. 2015	Egyptians from Gurna Oasis	34	Egypt	Afro-Asiatic	8.8
Trombetta et al. 2015	Mandenka	16	Senegal	Niger-Congo	6.3
Trombetta et al. 2015	French Basques	16	France	Basque	6.3
Hassan et al. 2008	Beja	42	Sudan	Afro-Asiatic	4.8
Trombetta et al. 2015	Tuareg	22	Niger	Afro-Asiatic	4.5
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	4.1
Trombetta et al. 2015	Erzurum Turkish	25	Turkey	Turkic	4.0
Hassan et al. 2008	Dinka	26	Sudan	Nilo-Saharan	3.8
Trombetta et al. 2015	Marrakech Berbers	27	Morocco	Afro-Asiatic	3.7
Trombetta et al. 2015	Tigrai	32	Eritrea/Ethiopia	Afro-Asiatic	3.1
Trombetta et al. 2015	Egyptian Berbers from Siwa	93	Egypt	Afro-Asiatic	2.2
Trombetta et al. 2015	Yemenites	94	Yemen	Afro-Asiatic	2.1
Trombetta et al. 2015	Central Anatolian	61	Turkey	Turkic	1.6
Trombetta et al. 2015	Mandara	82	Cameroon (North)	Afro-Asiatic	1.2
Trombetta et al. 2015	French	85	France	Indo-European	1.2
Trombetta et al. 2015	Southern Italians	141	Italy	Indo-European	0.7

Study	Population	Size	Country	Lang Fam	Frequency of E-V12* (%)
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	0.7
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	0.3
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	0.3

Supplementary Table 5.7. Survey of V65 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-V65 (%)
Trombetta et al. 2015	Moroccan Arabs	55	Morocco	Afro-Asiatic	32.7
Trombetta et al. 2015	Libian Arabs	10	Libya	Afro-Asiatic	20.0
Trombetta et al. 2015	Moyen Atlas Berbers	69	Morocco	Afro-Asiatic	10.1
Trombetta et al. 2015	Libian Jews	23	Libya	Afro-Asiatic	4.3
Trombetta et al. 2015	Egyptian Berbers from Siwa	93	Egypt	Afro-Asiatic	4.3
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	2.4
Trombetta et al. 2015	Mozabite Berbers	67	Algeria	Afro-Asiatic	1.5
Trombetta et al. 2015	Sardinians	374	Italy	Indo-European	1.1
Trombetta et al. 2015	Sicilians	153	Italy	Indo-European	0.7
Trombetta et al. 2015	Central Italians	356	Italy	Indo-European	0.3

Supplementary Table 5.8. Survey of E-V32 Populations.

Study	Population	Size	Country	Lang Fam	Frequency E-V32 (%)
Trombetta et al. 2015	Somali	5	Somalia	Afro-Asiatic	80.0
Trombetta et al. 2015	Borana	9	Kenya	Afro-Asiatic	66.7
Trombetta et al. 2015	Somali	6	Kenya	Afro-Asiatic	66.7
Trombetta et al. 2015	Tigre	5	Eritrea	Afro-Asiatic	60.0
Hassan et al. 2008	Masalit	32	Sudan	Nilo-Saharan	53.1
Hassan et al. 2008	Fur	32	Sudan	Nilo-Saharan	40.6
Hassan et al. 2008	Beja	42	Sudan	Afro-Asiatic	31.0
Trombetta et al. 2015	Somali	12	Ethiopia	Afro-Asiatic	25.0
Trombetta et al. 2015	Somali	40	Djibouti	Afro-Asiatic	25.0
Trombetta et al. 2015	Oromo	62	Ethiopia	Afro-Asiatic	22.6
Trombetta et al. 2015	Tigrai	32	Eritrea/Ethiopia	Afro-Asiatic	21.9
Trombetta et al. 2015	Cunama	20	Eritrea	Nilo-Saharan	20.0
Trombetta et al. 2015	Nara	15	Eritrea	Nilo-Saharan	13.3
Trombetta et al. 2015	Amhara	82	Ethiopia	Afro-Asiatic	11.0
Trombetta et al. 2015	Ethiopian Jews	22	Ethiopia	Afro-Asiatic	9.1
Trombetta et al. 2015	Wolayta	12	Ethiopia	Afro-Asiatic	8.3
Trombetta et al. 2015	Maasai	45	Kenya	Nilo-Saharan	6.7
Trombetta et al. 2015	Luhya	51	Kenya	Niger-Congo	5.9
Trombetta et al. 2015	Moundang	21	Cameroon (North)	Niger-Congo	4.8
Hassan et al. 2008	Fula (Fulbe, Fulani)	26	Sudan	Niger-Congo	3.8
Trombetta et al. 2015	Yemenites	94	Yemen	Afro-Asiatic	3.2
Hassan et al. 2008	Hausa	32	Sudan	Afro-Asiatic	3.1

Study	Population	Size	Country	Lang Fam	Frequency E-V32 (%)
Trombetta et al. 2015	Egyptians from Gurna Oasis	34	Egypt	Afro-Asiatic	2.9
Hassan et al. 2008	Nubians	39	Sudan	Nilo-Saharan	2.6
Trombetta et al. 2015	Northern Egyptians	49	Egypt	Afro-Asiatic	2.0

Supplementary Table 5.9. Survey of E-V6 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-V6 (%)
Trombetta et al. 2015	Afar	25	Djibouti	Afro-Asiatic	56.0
Trombetta et al. 2015	Tigre	5	Eritrea	Afro-Asiatic	20.0
Trombetta et al. 2015	Wolayta	12	Ethiopia	Afro-Asiatic	16.7
Trombetta et al. 2015	Somali	6	Kenya	Afro-Asiatic	16.7
Trombetta et al. 2015	Gurage	7	Ethiopia	Afro-Asiatic	14.3
Trombetta et al. 2015	Nilotic Western Kenya	11	Kenya	Nilo-Saharan	9.1
Trombetta et al. 2015	Amhara	82	Ethiopia	Afro-Asiatic	8.5
Trombetta et al. 2015	Saho	94	Eritrea	Afro-Asiatic	8.5
Trombetta et al. 2015	Nara	15	Eritrea	Nilo-Saharan	6.7
Trombetta et al. 2015	Egyptian Berbers from Siwa	93	Egypt	Afro-Asiatic	6.5
Trombetta et al. 2015	Tigrai	32	Eritrea/Ethiopia	Afro-Asiatic	6.3
Trombetta et al. 2015	Cunama	20	Eritrea	Nilo-Saharan	5.0
Trombetta et al. 2015	Egyptians from Baharia	41	Egypt	Afro-Asiatic	2.4
Trombetta et al. 2015	Oromo	62	Ethiopia	Afro-Asiatic	1.6

Supplementary Table 5.10. Survey of E-M33 Populations.

Study	Population	Size	Country	Lang Fam	Frequency of E-M33 (%)
Bučková et al 2013	Fula Linia	11	Chad	Niger-Congo	45.5
Bučková et al 2013	Kotoko	15	Cameroon	Afro-Asiatic	40.0
Bučková et al 2013	Masa	16	Cameroon	Afro-Asiatic	31.3
Bučková et al 2013	Songhai	23	Mali	Nilo-Saharan	30.4
Barbieri et al. 2012	South Samo	41	Burkina Faso	Niger-Congo	29.0
Bučková et al 2013	Kanuri	28	Nigeria	Nilo-Saharan	25.0
Bučková et al 2013	Fula Tcheboua	22	Cameroon	Niger-Congo	22.7
Rosa et al. 2007	Papel	64	Guinea-Bissau	Niger-Congo	20.3
Bučková et al 2013	Kanembu	11	Chad	Nilo-Saharan	18.2
Barbieri et al. 2012	Marka	33	Burkina Faso	Niger-Congo	18.0
Bučková et al 2013	Fula Tindangou	12	Burkina Faso	Niger-Congo	16.7
Hassan et al. 2008	Hausa	32	Sudan	Afro-Asiatic	15.6
Bučková et al 2013	Fula Banfora	26	Burkina Faso	Niger-Congo	15.4
Filippo et al. 2011	Burkina Faso Mande	152	Burkina Faso	Niger-Congo	14.4
Barbieri et al. 2012	Mandinka	15	Burkina Faso	Niger-Congo	13.0
Bučková et al 2013	Fula Zinder	16	Niger	Niger-Congo	12.5
Rosa et al. 2007	Nalu	17	Guinea-Bissau	Niger-Congo	11.8
Hassan et al. 2008	Fula (Fulbe, Fulani)	26	Sudan	Niger-Congo	11.5
Rosa et al. 2007	Balanta	26	Guinea-Bissau	Niger-Congo	11.5
Bučková et al 2013	Fula Diafarabe	23	Mali	Niger-Congo	8.7
Barbieri et al. 2012	Lyéla	40	Burkina Faso	Niger-Congo	8.0
Barbieri et al. 2012	North Samo	38	Burkina Faso	Niger-Congo	8.0

Study	Population	Size	Country	Lang Fam	Frequency of E-M33 (%)
Bučková et al 2013	Fula Bongor	25	Chad	Niger-Congo	8.0
Bučková et al 2013	Fula Diffa	13	Niger	Niger-Congo	7.7
Bučková et al 2013	Fula Balatungur	13	Niger	Niger-Congo	7.7
Rosa et al. 2007	Fula (Fulbe, Fulani)	59	Guinea-Bissau	Niger-Congo	6.8
Barbieri et al. 2012	Mossi	36	Burkina Faso	Niger-Congo	6.0
Bučková et al 2013	Fula Abalak	21	Niger	Niger-Congo	4.8
Rosa et al. 2007	Bidyogo (Bijago)	21	Guinea-Bissau	Niger-Congo	4.8
Barbieri et al. 2012	Bisa	40	Burkina Faso	Niger-Congo	3.0
Filippo et al. 2011	Burkina Faso Gur	183	Burkina Faso	Niger-Congo	2.7

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Supplementary Tables for Chapter 6 and Haplogroup C-M130

Supplementary Table 6.1. Survey of C2-M217 in Eurasia.

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Kazakhs	Kazakhstan	Turkic		28	92.9	[1]
Kazakhs	China, Gansu, Akesai	Turkic		94	84.0	[43]
Kazakhs	China, Xinjiang, Hami, Barkol	Turkic		104	76.9	[43]
Kazakhs	Xingjiang, China	Turkic		53	75.5	[27]
Kazakhs	China, Xinjiang ,Changji, Mori	Turkic		63	74.6	[43]
Kazakhs	China, Xinjiang, Changji, Hutubi	Turkic		22	72.7	[43]
Evenki	Russia, Krasnoyarskiy	Tungusic		40	70.0	[28]
Buryats	Russia, Buryatia	Mongolic		217	68.7	[2,3]
Buryats	Russia, China	Mongolic		86	68.6	[37]
Mongols	China, Inner Mongolian	Mongolic		22	68.2	[27]
Kazakh (Kazaly)	Kazakhstan	Turkic		81	67.9	[45]
Kazakh (Arys)	Kazakhstan	Turkic		119	67.2	[45]
Mongols	Mongolia	Mongolic		46	65.2	[2,3]
Kazakhs	Kazakhstan	Turkic		20	65.0	[1]
Mongols	China, Inner Mongolia, Hailar	Mongolic		61	63.9	[43]
Kalmyks	Russia, Buryatia	Mongolic		91	62.6	[2,3]
Buryats	China, Inner Mongolia, Hailar	Mongolic		26	61.5	[43]
Oroqen	China, Inner Mongolia	Tungusic		31	61.3	[18,19]
Kazakhs	Russia, Altai	Turkic		36	58.3	[2,3]
Khamnigans	Russia, Chitinskaya?	Tungusic		51	54.9	[2,3]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Mongols	Inner Mongolia	Mongolic		22	54.5	[44]
Even	Russia, Sakha	Tungusic		24	54.2	[29]
Koryaks	Russia, Koryanskiy	Chukotko-Kamchatkan		39	54.0	[3]
Kazakhs	Russia, Altai Republic	Turkic		89	54.0	[8]
Mongols	Mongolia, Ulaanbaatar	Mongolic		65	53.8	[18,19]
Evenki	China, Inner Mongolia	Tungusic		26	53.8	[18,19]
Sojots	Russia, Buryatia	Turkic		28	53.6	[2,3]
Mongols	Central Asia	Mongolic		97	52.6	[40]
Evenki	Russia, Krasnoyarskiy	Tungusic		41	48.8	[2]
Mongols	Central Asia	Mongolic		23	47.8	[40]
Mongols	Mongolia	Mongolic		45	46.7	[23]
Mongols	China, Inner Mongolia	Mongolic		45	46.7	[18,19]
Manchu (Man)	Heilongjiang	Tungusic		24	45.8	[44]
Mongols	Central Asia	Mongolic		20	45.0	[40]
Buryats	China, Inner Mongolia	Mongolic		36	44.4	[23]
Kazakh (Shymkent)	Kazakhstan	Turkic		55	43.6	[45]
Manchu (Man)	China, Jilin, Jiutai	Tungusic		146	41.7	[43]
Hazara	Central Asia	Indo-European	Indo-Iranian	25	40.0	[40]
Buryats	Russia, China	Mongolic		58	39.7	[37]
Kazakhs	China, Xinjiang, Yili, Zhaosu	Turkic		29	37.9	[43]
Xibe	Xinjiang	Tungusic		61	36.1	[44]
Even	Russia	Tungusic		63	34.0	[3]
Hazara-Bamiyan	Central Asia	Indo-European	Indo-Iranian	69	33.3	[40]
Hazara	Afghanistan	Indo-European	Indo-Iranian	60	33.3	[30]
Manchu (Man)	China, Liaoning	Tungusic		109	33.0	[27]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Mongols	China, Inner Mongolia	Mongolic		46	32.6	[43]
Han	China, Shangdong, Zoucheng	Sino-Tibetan	Chinese	32	31.3	[43]
Daur	China, Heilongjiang	Mongolic		39	30.8	[18,19]
Tujia	Hubei	Sino-Tibetan	Tibeto-Burman	26	30.8	[44]
Kyrgyz-SouthWest	Central Asia	Turkic		20	30.0	[40]
Han	Jilin	Sino-Tibetan	Chinese	27	29.6	[44]
Dong	Hunan	Tai-Kadai	Kam-Tai	27	29.6	[44]
Karakalpak	Uzbekistan	Turkic		100	28.0	[45]
Kazakh (Zhanakorgan)	Kazakhstan	Turkic		94	27.7	[45]
Kyrgyz-Central	Central Asia	Turkic		40	27.5	[40]
Mongols	China, Qinghai, Delingha	Mongolic		129	27.1	[43]
Tuvans	China, Xinjiang, Altay	Turkic		148	27.0	[43]
Xibe	China, Yili, Xinjiang	Mongolic		41	26.8	[18,19]
Manchu (Man)	China	Tungusic		30	26.7	[23]
Hazara	Pakistan, Southern Baluchistan	Indo-European	Indo-Iranian	27	25.9	[18,22]
Buryats	China, Inner Mongolia, Hailar	Mongolic		54	25.9	[43]
Manchu (Man)	China, Dalian	Tungusic		35	25.7	[18,19]
Manchu (Man)	Liaoning	Tungusic		43	25.6	[44]
Han	China, Shangdong, Rizhao	Sino-Tibetan	Chinese	33	24.2	[43]
Han	Henan	Sino-Tibetan	Chinese	21	23.8	[44]
Han	China, Shaanxi, Xi'an	Sino-Tibetan	Chinese	34	23.8	[23]
Han	China, Shangdong, Qingzhou	Sino-Tibetan	Chinese	22	22.7	[43]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Han	Liaoning	Sino-Tibetan	Chinese	40	22.5	[44]
Dong	Hunan	Tai-Kadai	Kam-Tai	45	22.2	[44]
Nanai (Hezhe)	China, Heilongjiang	Tungusic		45	22.2	[18,19]
Hani	Yunnan	Sino-Tibetan	Tibeto-Burman	60	21.7	[44]
Yugurs	China, Gansu, Sunan	Turkic		141	21.3	[43]
Tujia	Guizhou	Sino-Tibetan	Tibeto-Burman	33	21.2	[44]
Manchu (Man)	Liaoning	Tungusic		66	21.2	[44]
Han	Gansu	Sino-Tibetan	Chinese	29	20.7	[44]
Han	Gansu	Sino-Tibetan	Chinese	34	20.6	[44]
Han	Gansu	Sino-Tibetan	Chinese	34	20.6	[44]
Manchu (Man)	China, Inner Mongolia, Chifeng	Tungusic		39	20.5	[43]
Han	China, Shangdong, Zhanhua	Sino-Tibetan	Chinese	30	20.0	[43]
Altai (Altaians, Altay)	Russia, Altai Republic	Turkic		120	20.0	[16]
Han	China, Ganshu, LanZhou	Sino-Tibetan	Chinese	30	20.0	[18,19]
Han	China, Shangdong, Ningjing	Sino-Tibetan	Chinese	45	20.0	[43]
Han	Shanxi	Sino-Tibetan	Chinese	56	19.6	[44]
Tajik-Badakhshan	Central Asia	Indo-European	Indo-Iranian	37	18.9	[40]
Buryats	Russia, China	Mongolic		138	18.8	[37]
Uyghurs	Kazakhstan, Almaty, Lavar	Turkic		33	18.2	[18,20]
Yao	Guangxi	Hmong-Mien	Mienic	55	18.2	[44]
Uzbek (Fergana)	Uzbekistan	Turkic		67	17.9	[45]
Hui	Ningxia	Sino-Tibetan	Chinese	62	17.7	[44]
Hani	China, Yunnan	Sino-Tibetan	Tibeto-Burman	34	17.6	[18,19]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Han	China, Shangdong, Guangrao	Sino-Tibetan	Chinese	23	17.4	[43]
Han	China, Northeast	Sino-Tibetan	Chinese	98	17.3	[43]
Kazakhs	Russia, Altai Republic	Turkic		30	17.0	[8]
Korean	China, Jilin, Dunhua, Jiutai	Koreanic		191	16.8	[43]
Han	China, Shangdong, Yanzhou	Sino-Tibetan	Chinese	24	16.7	[43]
Han	China, Shangdong, Zhangqiu	Sino-Tibetan	Chinese	48	16.7	[43]
Han	Heilongjiang	Sino-Tibetan	Chinese	67	16.4	[44]
Korean	Korea	Koreanic		43	16.3	[19]
Korean	Korea	Koreanic		545	16.3	[51]
Altai (Altaians, Altay)	Russia, Altai	Turkic		89	15.7	[2,3]
Han	China, Gansu, Wuwei	Sino-Tibetan	Chinese	64	15.6	[43]
Han	Shandong	Sino-Tibetan	Chinese	52	15.4	[44]
Han	Jiangsu	Sino-Tibetan	Chinese	39	15.4	[44]
Evenki	Russia, Sakha	Tungusic		33	15.2	[28]
Han	Gansu	Sino-Tibetan	Chinese	20	15.0	[44]
Mongols	China, Inner Mongolia, Chifeng	Mongolic		67	14.9	[43]
Han	China, Heilongjiang, Wuchang	Sino-Tibetan	Chinese	27	14.8	[43]
Tuvans	Russia, Tuva	Turkic		55	14.5	[28]
Han	China, HeiLongJiang	Sino-Tibetan	Chinese	35	14.3	[18,19]
Uzbeks-Sar-e-Pol	Central Asia	Turkic		28	14.3	[40]
Kyrgyz-East	Central Asia	Turkic		35	14.3	[40]
Han	Heilongjiang	Sino-Tibetan	Chinese	57	14.0	[44]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Kyrgyz	China, Xinjiang	Turkic		50	14.0	[43]
Kazakhs	China, Xinjiang, Yili, Xinyuan	Turkic		43	14.0	[43]
Han	China, Gansu, Pingliang	Sino-Tibetan	Chinese	203	13.8	[43]
Sui	Guizhou	Tai-Kadai	Kam-Tai	29	13.8	[44]
Han	China, Shangdong, Dezhou	Sino-Tibetan	Chinese	51	13.7	[43]
Han	Anhui	Sino-Tibetan	Chinese	52	13.5	[44]
Han	China, Gansu, Lanzhou	Sino-Tibetan	Chinese	83	13.3	[43]
Monguor (Tu)	China, Qinghai, Huzhu	Mongolic		121	13.2	[43]
Han	China, Gansu, Qingyang	Sino-Tibetan	Chinese	61	13.1	[43]
Hui	China, Tianjin	Turkic		46	13.0	[43]
Evenki	Inner Mongolia	Tungusic		31	12.9	[44]
Han	Guangdong	Sino-Tibetan	Chinese	31	12.9	[44]
Han	China, Gansu, Dingxi	Sino-Tibetan	Chinese	166	12.7	[43]
Vietnamese	Vietnam	Austro-Asiatic	Mon-Khmer	48	12.5	[23]
Yi (Yizu)	Sichuan	Sino-Tibetan	Tibeto-Burman	24	12.5	[44]
Han	Jilin	Sino-Tibetan	Chinese	24	12.5	[44]
Korean	Korea	Koreanic		506	12.3	[23]
Han	China, Shangdong, Qihe	Sino-Tibetan	Chinese	25	12.0	[43]
Korean	China, Jinlin	Koreanic		25	12.0	[19]
Han	China, Shangdong, Iijing	Sino-Tibetan	Chinese	59	11.9	[43]
Han	China, SiChuan, ChengDu	Sino-Tibetan	Chinese	34	11.8	[18,19]
Han	China, North	Sino-Tibetan	Chinese	223	11.7	[43]
Hui	China, Haiyuan, Ningxia	Turkic		35	11.4	[18,19]
Teleuts	Russia, Altayskiy, Biysk	Turkic		44	11.4	[2,3]

Population	Location	Language Family	Branch	Sample Size	Percent C-M217	Reference
Han	China, Shangdong, linshu	Sino-Tibetan	Chinese	53	11.3	[43]
Tuvans	Russia, Tuva	Turkic		108	11.1	[2,3]
Kyrgyz-NorthWest	Central Asia	Turkic		37	10.8	[40]
Han	Shannxi	Sino-Tibetan	Chinese	56	10.7	[44]
Han	China, Shangdong, Shanghe	Sino-Tibetan	Chinese	48	10.4	[43]
Han	Gansu	Sino-Tibetan	Chinese	39	10.3	[44]
Uzbek (Xorezm)	Uzbekistan	Turkic		98	10.2	[45]
Han	Shandong	Sino-Tibetan	Chinese	40	10.0	[44]

Supplementary Table 6.2. Survey of C2-M407 Populations.

Population	Location	Language Family	Sample Size	Percent C-M407	Reference
Buryats	Russia, China	Mongolic	86	61.6	[37]
Buryats	Russia, Buryatia	Mongolic	217	53.9	[2,3]
Sojots	Russia, Buryatia	Turkic	28	53.6	[2,3]
Khamnigans	Russia, Chitinskaya?	Tungusic	51	52.9	[2,3]
Buryats	Russia, China	Mongolic	58	19.0	[37]
Mongols	Mongolia	Mongolic	46	15.2	[2,3]
Buryats	Russia, China	Mongolic	138	13.8	[37]
Kalmyks	Russia, Buryatia	Mongolic	91	12.1	[2,3]
Mongols	Central Asia	Mongolic	20	10.0	[40]

Supplementary Table 6.3. Survey of C2-M48 Populations.

Population	Location	Language Family	Sample Size	Percent C-M48	Reference
Evenki	Russia, Krasnoyarskiy	Tungusic	40	70.0	[28]
Kazakhs	Kazakhstan, Almaty, Katon-Karagay	Turkic	38	63.2	[18,20]
Even	Russia, Sakha	Tungusic	24	50.0	[29]
Kalmyks	Russia, Buryatia	Mongolic	91	45.1	[2,3]
Evenki	Russia, Krasnoyarskiy	Tungusic	41	43.9	[2]
Oroqen	China, Inner Mongolia	Tungusic	31	41.9	[18,19]
Kazakhs	Russia, Altai	Turkic	36	41.7	[2,3]
Manchu	China, Jilin, Jiutai	Tungusic	146	41.1	[43]
Kazakhs	Russia, Altai Republic	Turkic	89	40.0	[8]
Kalmyks	Elista, Russia	Mongolic	99	37.4	[5,6]
Even	Russia	Tungusic	63	33.0	[3]
Mongols	Central Asia	Mongolic	97	29.9	[40]
Evenki	China, Inner Mongolia	Tungusic	26	26.9	[18,19]
Tuvans	China, Xinjiang, Altay	Turkic	148	22.3	[43]
Mongols	Mongolia, Ulaanbaatar	Mongolic	65	20.0	[18,19]
Mongols	China, Inner Mongolian	Mongolic	22	18.2	[27]
Evenki	Russia, Sakha	Tungusic	33	15.2	[28]
Mongols	Central Asia	Mongolic	20	15.0	[40]
Mongols	China, Qinghai, Delingha	Mongolic	129	13.2	[43]
Nanai (Hezhe)	China, Heilongjiang	Tungusic	45	11.1	[18,19]
Mongols	Mongolia	Mongolic	46	10.9	[2,3]

Supplementary Table 6.4. Survey of C2-F1918 Populations.

Population	Location	Language Family	Branch	Sample Size	Percent C-F1918	Reference
Kazakhs	Kazakhstan	Turkic		28	89.3	[1]
Kazakhs	China, Gansu, Akesai	Turkic		94	78.7	[43]
Kazakhs	Xingjiang, China	Turkic		53	75.5	[27]
Kazakhs	China, Xinjiang ,Changji, Mori	Turkic		63	58.7	[43]
Kazakhs	China, Xinjiang, Hami, Barkol	Turkic		104	58.7	[43]
Kazakhs	Kazakhstan	Turkic		20	55.0	[1]
Buryats	China, Inner Mongolia, Hailar	Mongolic		26	46.2	[43]
Kazakhs	China, Xinjiang, Changji, Hutubi	Turkic		22	45.5	[43]
Kazakhs	China, Xinjiang, Yili, Zhaosu	Turkic		29	37.9	[43]
Kazakhs	Kazakhstan, Taraz	Turkic		181	36.5	[11]
Hazara	Central Asia	Indo-European	Indo-Iranian	25	36.0	[40]
Mongols	Mongolia	Mongolic		46	34.8	[2,3]
Mongols	China, Inner Mongolia	Mongolic		45	31.1	[18,19]
Kazakhs	China, Xinjiang, Altay	Turkic		97	30.9	[36]
Mongols	Central Asia	Mongolic		23	30.4	[40]
Hazara-Bamiyan	Central Asia	Indo-European	Indo-Iranian	69	26.1	[40]
Hazara	Pakistan, Southern Baluchistan	Indo-European	Indo-Iranian	27	25.9	[18,22]
Kyrgyz-SouthWest	Central Asia	Turkic		20	25.0	[40]
Mongols	Mongolia	Mongolic		45	24.4	[23]
Kazakhs	Kazakhstan	Turkic		99	24.2	[10]
Han	China, Inner Mongolia	Sino-Tibetan	Chinese	21	23.8	[18,21]
Karakalpaks	Uzbekistan	Turkic		51	23.5	[7]
Hazara	Afghanistan	Indo-European	Indo-Iranian	60	23.3	[30]

Population	Location	Language Family	Branch	Sample Size	Percent C-F1918	Reference
Daur	China, Heilongjiang	Mongolic		39	23.1	[18,19]
Buryats	China, Inner Mongolia	Mongolic		36	19.4	[23]
Evenki	China, Inner Mongolia	Tungusic		26	19.2	[18,19]
Mongols	China, Inner Mongolian	Mongolic		22	18.2	[27]
Mongols	Mongolia, Ulaanbaatar	Mongolic		65	16.9	[18,19]
Mongols	Northern China	Mongolic		50	16.0	[38]
Uyghurs	Kazakhstan, Almaty, Lavar	Turkic		33	15.2	[18,20]
Mongols	Central Asia	Mongolic		20	15.0	[40]
Mongols	China, Inner Mongolia, Hailar	Mongolic		61	14.8	[43]
Nogais	Russia	Turkic		29	13.8	[4]
Daur	Northern China	Mongolic		30	13.3	[38]
Buryats	Russia, China	Mongolic		58	12.1	[37]
Kazakhs	Kazakhstan	Turkic		100	12.0	[9]
Mongols	Central Asia	Mongolic		97	11.3	[40]
Kazakhs	Russia, Altai Republic	Turkic		89	11.0	[8]
Xibe	Northern China	Tungusic		28	10.7	[38]
Uzbeks-Sar-e-Pol	Central Asia	Turkic		28	10.7	[40]
Kyrgyz-Central	Central Asia	Turkic		40	10.0	[40]
Kazakhs	Russia, Altai Republic	Turkic		30	10.0	[8]

Supplementary Table 6.5. Survey of Turkic-Speaking Populations in the Integrated Linguistics Database.

Population	Language Family	Language	Region
Ainu	Turkic	Ainu	East Asia
Altai (Altaians, Altay)	Turkic	Altai (2)	Northern Eurasia
Azerbaijani	Turkic	Azerbaijani (2)	Caucasus
Azerbaijani	Turkic	Azerbaijani (2)	Middle East
Balkars	Turkic	Karachay-Balkar	Caucasus
Bashkir	Turkic	Bashkort	Eastern Europe
Chuvash	Turkic	Chuvash	Eastern Europe
Dolgan	Turkic	Dolgan	Northern Eurasia
Gagauz	Turkic	Gagauz	Eastern Europe
Karachays	Turkic	Karachay-Balkar	Caucasus
Karakalpaks	Turkic	Karakalpak	Central Asia
Kazakhs	Turkic	Kazakh	Central Asia
Kazakhs	Turkic	Kazakh	East Asia
Kazakhs	Turkic	Kazakh	Northern Eurasia
Khakas	Turkic	Khakas	Northern Eurasia
Kumyks	Turkic	Kumyk	Caucasus
Kyrgyz	Turkic	Kyrgyz	Central Asia
Kyrgyz	Turkic	Kyrgyz	East Asia
Nogais	Turkic	Nogai	Caucasus
Salar	Turkic	Salar	East Asia
Shors	Turkic	Shor	Northern Eurasia
Tatars	Turkic	Tatar	Central Asia
Tatars	Turkic	Tatar	East Asia
Tatars	Turkic	Tatar	Eastern Europe
Teleuts	Turkic	Altai (2)	Northern Eurasia
Todjins	Turkic	Tuva	Northern Eurasia
Tofalars	Turkic	Karagas	Northern Eurasia
Tubalar	Turkic	Altai (2)	Northern Eurasia
Turkmen	Turkic	Turkmen	Central Asia
Turkmen	Turkic	Turkmen	Middle East
Turks	Turkic	Turkish	Middle East
Tuvans	Turkic	Tuva	Northern Eurasia
Uyghurs	Turkic	Uyghur	Central Asia
Uyghurs	Turkic	Uyghur	East Asia

Population	Language Family	Language	Region
Uzbeks	Turkic	Uzbek (2)	Central Asia
Uzbeks	Turkic	Uzbek (2)	East Asia
Yakut	Turkic	Yakut	Northern Eurasia

Supplementary Table 6.6. C2-M217 and Turkic Languages.

Population	Location	Sample Size	Percent C-M217	Reference
Kazakhs	Kazakhstan	28	92.9	[1]
Kazakhs	China, Gansu, Akesai	94	84.0	[43]
Kazakhs	China, Xinjiang, Hami, Barkol	104	76.9	[43]
Kazakhs	Xingjiang, China	53	75.5	[27]
Kazakhs	China, Xinjiang ,Changji, Mori	63	74.6	[43]
Kazakhs	China, Xinjiang, Changji, Hutubi	22	72.7	[43]
Kazakh (Kazaly)	Kazakhstan	81	67.9	[45]
Kazakh (Arys)	Kazakhstan	119	67.2	[45]
Kazakhs	Kazakhstan	20	65.0	[1]
Kazakhs	Russia, Altai	36	58.3	[2,3]
Kazakhs	Russia, Altai Republic	89	54.0	[8]
Sojots	Russia, Buryatia	28	53.6	[2,3]
Kazakh (Shymkent)	Kazakhstan	55	43.6	[45]
Kazakhs	China, Xinjiang, Yili, Zhaosu	29	37.9	[43]
Kyrgyz-SouthWest	Central Asia	20	30.0	[40]
Karakalpak	Uzbekistan	100	28.0	[45]
Kazakh (Zhanakorgan)	Kazakhstan	94	27.7	[45]
Kyrgyz-Central	Central Asia	40	27.5	[40]
Tuvans	China, Xinjiang, Altay	148	27.0	[43]
Yugurs	China, Gansu, Sunan	141	21.3	[43]
Altai (Altaians, Altay)	Russia, Altai Republic	120	20.0	[16]
Uyghurs	Kazakhstan, Almaty, Lavar	33	18.2	[18,20]
Uzbek (Fergana)	Uzbekistan	67	17.9	[45]
Kazakhs	Russia, Altai Republic	30	17.0	[8]
Altai (Altaians, Altay)	Russia, Altai	89	15.7	[2,3]
Tuvans	Russia, Tuva	55	14.5	[28]
Kyrgyz-East	Central Asia	35	14.3	[40]
Uzbeks-Sar-e-Pol	Central Asia	28	14.3	[40]
Kyrgyz	China, Xinjiang	50	14.0	[43]
Kazakhs	China, Xinjiang, Yili, Xinyuan	43	14.0	[43]
Hui	China, Tianjin	46	13.0	[43]
Teleuts	Russia, Altayskiy, Biysk	44	11.4	[2,3]
Hui	China, Haiyuan, Ningxia	35	11.4	[18,19]
Tuvans	Russia, Tuva	108	11.1	[2,3]
Kyrgyz-Northwest	Central Asia	37	10.8	[40]

Population	Location	Sample Size Percent C-M217		Reference
Uzbek (Xorezm)	Uzbekistan	98	10.2	[45]

Supplementary Table 6.7. C2-M217 and Mongolic Languages.

Population	Location	Sample Size	Percent C-M217	Reference
Buryats	Russia, Buryatia	217	68.7	[2,3]
Buryats	Russia, China	86	68.6	[37]
Mongols	China, Inner Mongolian	22	68.2	[27]
Mongols	Mongolia	46	65.2	[2,3]
Mongols	China, Inner Mongolia, Hailar	61	63.9	[43]
Kalmyks	Russia, Buryatia	91	62.6	[2,3]
Buryats	China, Inner Mongolia, Hailar	26	61.5	[43]
Mongols	Inner Mongolia	22	54.5	[44]
Mongols	Mongolia, Ulaanbaatar	65	53.8	[18,19]
Mongols	Central Asia	97	52.6	[40]
Mongols	Central Asia	23	47.8	[40]
Mongols	China, Inner Mongolia	45	46.7	[18,19]
Mongols	Mongolia	45	46.7	[23]
Mongols	Central Asia	20	45.0	[40]
Buryats	China, Inner Mongolia	36	44.4	[23]
Buryats	Russia, China	58	39.7	[37]
Mongols	China, Inner Mongolia	46	32.6	[43]
Daur	China, Heilongjiang	39	30.8	[18,19]
Mongols	China, Qinghai, Delingha	129	27.1	[43]
Xibe	China, Yili,Xinjiang	41	26.8	[18,19]
Buryats	China, Inner Mongolia, Hailar	54	25.9	[43]
Buryats	Russia, China	138	18.8	[37]
Mongols	China, Inner Mongolia, Chifeng	67	14.9	[43]
Monguor (Tu)	China, Qinghai, Huzhu	121	13.2	[43]

Supplementary Table 6.8. C2-M217 and Tungusic Languages.

Population	Location	Sample Size	Percent C-M217	Reference
Evenki	Russia, Krasnoyarskiy	40	70.0	[28]
Oroqen	China, Inner Mongolia	31	61.3	[18,19]
Khamnigans	Russia, Chitinskaya?	51	54.9	[2,3]
Even	Russia, Sakha	24	54.2	[29]
Evenki	China, Inner Mongolia	26	53.8	[18,19]
Evenki	Russia, Krasnoyarskiy	41	48.8	[2]
Manchu (Man)	Heilongjiang	24	45.8	[44]
Manchu (Man)	China, Jilin, Jiutai	146	41.7	[43]
Xibe	Xinjiang	61	36.1	[44]
Even	Russia	63	34.0	[3]
Manchu (Man)	China, Liaoning	109	33.0	[27]
Manchu (Man)	China	30	26.7	[23]
Manchu (Man)	China, Dalian	35	25.7	[18,19]
Manchu (Man)	Liaoning	43	25.6	[44]
Nanai (Hezhe)	China, Heilongjiang	45	22.2	[18,19]
Manchu (Man)	Liaoning	66	21.2	[44]
Manchu (Man)	China, Inner Mongolia, Chifeng	39	20.5	[43]
Evenki	Russia, Sakha	33	15.2	[28]
Evenki	Inner Mongolia	31	12.9	[44]

Supplementary Table 6.9. C2-M217 and Koreanic.

Population	Location	Sample Size	Percent C-M217	Reference
Korean	China, Jilin, Dunhua, Jiutai	191	16.8	[43]
Korean	Korea	545	16.3	[51]
Korean	Korea	43	16.3	[19]
Korean	Korea	506	12.3	[23]
Korean	China, Jinlin	25	12.0	[19]
Korean	Korea	52	9.6	[3]
Korean	Jilin	34	5.9	[44]

Supplementary Table 6.10. C2-M217 and Japonic.

Population	Location	Sample Size	Percent C-M217	Reference
Japanese	Japan	157	7.0	[23]
Japanese	Japan	2390	6.1	[53]
Japanese	Japan	263	3.0	[52]
Japanese	Japan	47	2.1	[19]

Supplementary Table 6.11. C2-M217 and Han.

Population	Location	Sample Size	Percent C-M217	Reference
Han	China, Shangdong, Zoucheng	32	31.3	[43]
Han	Jilin	27	29.6	[44]
Han	China, Shangdong, Rizhao	33	24.2	[43]
Han	Henan	21	23.8	[44]
Han	China, Shaanxi, Xi'an	34	23.8	[23]
Han	China, Shangdong, Qingzhou	22	22.7	[43]
Han	Liaoning	40	22.5	[44]
Han	Gansu	29	20.7	[44]
Han	Gansu	34	20.6	[44]
Han	Gansu	34	20.6	[44]
Han	China, Shangdong, Zhanhua	30	20.0	[43]
Han	China, Gansu, Lanzhou	30	20.0	[18,19]
Han	China, Shangdong, Ningjing	45	20.0	[43]
Han	Shanxi	56	19.6	[44]
Han	China, Shangdong, Guangrao	23	17.4	[43]
Han	China, Northeast	98	17.3	[43]
Han	China, Shangdong, Zhangqiu	48	16.7	[43]
Han	China, Shangdong, Yanzhou	24	16.7	[43]
Han	Heilongjiang	67	16.4	[44]
Han	China, Gansu, Wuwei	64	15.6	[43]
Han	Shandong	52	15.4	[44]
Han	Jiangsu	39	15.4	[44]
Han	Gansu	20	15.0	[44]
Han	China, Heilongjiang, Wuchang	27	14.8	[43]
Han	China, HeiLongJiang	35	14.3	[18,19]
Han	Heilongjiang	57	14.0	[44]
Han	China, Gansu, Pingliang	203	13.8	[43]
Han	China, Shangdong, Dezhou	51	13.7	[43]
Han	Anhui	52	13.5	[44]
Han	China, Gansu, Lanzhou	83	13.3	[43]
Han	China, Gansu, Qingyang	61	13.1	[43]
Han	Guangdong	31	12.9	[44]
Han	China, Gansu, Dingxi	166	12.7	[43]
Han	Jilin	24	12.5	[44]
Han	China, Shangdong, Qihe	25	12.0	[43]

Population	Location	Sample Size	Percent C-M217	Reference
Han	China, Shangdong, Iijing	59	11.9	[43]
Han	China, Sichuan, ChengDu	34	11.8	[18,19]
Han	China, North	223	11.7	[43]
Han	China, Shangdong, Linshu	53	11.3	[43]
Han	Shannxi	56	10.7	[44]
Han	China, Shangdong, Shanghe	48	10.4	[43]
Han	Gansu	39	10.3	[44]
Han	Shandong	40	10.0	[44]

Supplementary Table 6.12. Native Americans.

Population	Language Family	Sample Size	Percent C2-P39	Reference
Apache	Eyak-Athabaskan	94	14.0	[47]
Dogrib	Eyak-Athabaskan	37	13.0	[51]
Gwich'in	Eyak-Athabaskan	33	8.0	[51]
SWS Sioux	Siouan-Catawban	26	8.0	[50]
Cheyenne/Arapahoe	Algic	50	8.0	[50]
Dogrib	Eyak-Athabaskan	15	5.0	[46]
Tanana	Eyak-Athabaskan	11	5.0	[47]
Chipewyan	Eyak-Athabaskan	48	3.0	[48]
SC Apache	Eyak-Athabaskan	23	2.0	[46]
Creek	Muskogean	12	1.0	[50]
Eskimos	Eskimo-Aleut	56	1.0	[51]
Navajo	Eyak-Athabaskan	75	1.0	[47]
Papago	Uto-Aztecan	13	0.0	[46]
Zapotec	Otomanguean	16	0.0	[47]
Pima	Uto-Aztecan	62	0.0	[46] [47]
Nahua Atocpan	Uto-Aztecan	7	0.0	[46]
Jemez	Kiowa-Tanoan	13	0.0	[46]
Tarahumara	Uto-Aztecan	20	0.0	[46]
Seri	Isolate	15	0.0	[46]
Nahua Cuetzalan	Uto-Aztecan	10	0.0	[46]
Cora	Uto-Aztecan	37	0.0	[46]
Huichol	Uto-Aztecan	18	0.0	[46]
Mixe	Mixe-Zoquean	12	0.0	[47]
Seminole	Muskogean	20	0.0	[49]
TM Chippewa	Eyak-Athabaskan	34	0.0	[50]
W Chippewa	Eyak-Athabaskan	29	0.0	[50]
Stillwell Cherokee	Iroquoian	30	0.0	[50]
Choctaw	Muskogean	12	0.0	[50]
Mixtec	Otomanguean	22	0.0	[46]

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Supplementary Tables for Chapter 7 and Haplogroup G-M201

Supplementary Table 7.1. Overview of G-M201.

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Central Asia	Kazakhs Madjar	Turkic		86.7	Balanovski et al. 2015
Caucasus	North Ossetians	Indo-European	Indo-Iranian	69.7	Yunubayev et al. 2012
Caucasus	North Ossetians	Indo-European	Indo-Iranian	69.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Central Asia	Kazakhs (Akzharsky)	Turkic		55.6	Balanovski et al. 2015
Central Asia	Kazakhs (Karkaralinsky)	Turkic		52.8	Balanovski et al. 2015
Caucasus	Georgians	Kartvelian		50.8	Yunubayev et al. 2012
Caucasus	Georgians	Kartvelian		50.0	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	South Ossetians	Indo-European	Indo-Iranian	47.6	Yunubayev et al. 2012
Caucasus	Abkhaz	North Caucasian		47.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abkhaz	North Caucasian		47.5	Yunubayev et al. 2012
Caucasus	Adyghe	North Caucasian		47.4	Yunubayev et al. 2012
Caucasus	Cherkessians	North Caucasian		45.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Cherkessians	North Caucasian		45.2	Yunubayev et al. 2012
Caucasus	Adyghe	North Caucasian		44.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Armenians Hemsheni	Indo-European	Armenian	44.4	Balanovski et al. 2017
Caucasus	Kabardians	North Caucasian		43.6	Yunubayev et al. 2012
Caucasus	Imereti	Kartvelian		43.6	Balanovski et al. 2017
Caucasus	South Ossetians	Indo-European	Indo-Iranian	43.5	Rootsi et al. 2012, Yunusbaev et al. 2001

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Caucasus	Kabardians	North Caucasian		43.3	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Armenians Hamshenis	Indo-European	Armenian	42.2	Balanovski et al. 2015
Caucasus	Abazins	North Caucasian		41.0	Yunubayev et al. 2012
Caucasus	Abazins	North Caucasian		40.0	Rootsi et al. 2012, Yunusbaev et al. 2001
Central Asia	Kazakhs Magzhan Zhumabaev)	Turkic		34.5	Balanovski et al. 2015
Caucasus	Balkars	Turkic		32.6	Yunubayev et al. 2012
Caucasus	Balkars	Turkic		32.4	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Karachays	Turkic		31.9	Yunubayev et al. 2012
Caucasus	Karachays	Turkic		31.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Central Asia	Kazakhs (Amangeldinsky)	Turkic		25.5	Balanovski et al. 2015
Caucasus	Armenians Adygei	Indo-European	Armenian	22.4	Balanovski et al. 2017
Middle East	Palestinians	Afro-Asiatic	Semitic	22.2	Rootsi et al. 2012, Behar et al. 2010
Mediterranean	Corsicans	Indo-European	Italic	21.5	Rootsi et al. 2012
Caucasus	Armenians Krasnodar	Indo-European	Armenian	21.4	Balanovski et al. 2017
Middle East	Mazandarani	Indo-European	Indo-Iranian	20.8	Grugni et al. 2012
Middle East	Armenians	Indo-European	Armenian	20.6	Grugni et al. 2012
South Asia	Kalash	Indo-European	Indo-Iranian	20.0	Di Cristofaro et al. 2013
Middle East	Laz	Kartvelian		19.4	Balanovski et al. 2017
Caucasus	Chamalals	North Caucasian		18.5	Rootsi et al. 2012, Yunusbaev et al. 2001

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Caucasus	Chamalals	North Caucasian		18.5	Yunubayev et al. 2012
Central Asia	Pashtun-Baghlan	Indo-European	Indo-Iranian	17.6	Di Cristofaro et al. 2013
Caucasus	Armenians Erzurum	Indo-European	Armenian	16.2	Balanovski et al. 2017
Middle East	Armenians Central	Indo-European	Armenian	16.0	Hovhannisyan et al. 2014
South Asia	Brahui	Dravidian		16.0	Di Cristofaro et al. 2013
Middle East	Gilaki	Indo-European	Indo-Iranian	15.6	Grugni et al. 2012
Caucasus	Nogais, Kuban	Turkic		13.8	Yunubayev et al. 2012
Caucasus	Nogais	Turkic		13.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kumyks	Turkic		13.7	Yunubayev et al. 2012
Middle East	Armenians, Western	Indo-European	Armenian	13.5	Hovhannisyan et al. 2014
Caucasus	Kumyks	Turkic		13.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Mediterranean	Sardinians	Indo-European	Italic	13.1	Rootsi et al. 2012
Middle East	Azerbaijani	Turkic		12.8	Rootsi et al. 2012
Mediterranean	Greek Cypriots	Indo-European	Greek	12.7	Voskarides et al. 2017
Middle East	Armenians Sasun	Indo-European	Armenian	12.5	Hovhannisyan et al. 2014
Middle East	Turks	Turkic		12.5	Rootsi et al. 2012, Cinnioglu et al. 2004
Caucasus	Armenians	Indo-European	Armenian	12.3	Balanovski et al. 2015
Middle East	Turks	Turkic		12.2	Rootsi et al. 2012, Cinnioglu et al. 2004, Myres et al. 2010
Eastern Europe	Bashkirs (Kipchak tribes)	Turkic		12.0	Balanovski et al. 2015
Caucasus	Armenians	Indo-European	Armenian	12.0	Rootsi et al. 2012, Yunusbaev et al. 2011
Middle East	Kurds	Indo-European	Indo-Iranian	11.9	Grugni et al. 2012

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Middle East	Israel	Afro-Asiatic	Semitic	11.7	Rootsi et al. 2012, Behar et al. 2010
Western Europe	Tyroloeoans	Indo-European	Germanic	11.3	Berger et al. 2013
Central Asia	Pashtun-Kunduz	Indo-European	Indo-Iranian	11.3	Di Cristofaro et al. 2013
Middle East	Iranians, set2	Indo-European	Indo-Iranian	11.1	Rootsi et al. 2012
Central Asia	Tajik-Badakhshan	Indo-European	Indo-Iranian	10.8	Di Cristofaro et al. 2013
Mediterranean	Sicilians	Indo-European	Italic	10.5	Rootsi et al. 2012
Caucasus	Armenians	Indo-European	Armenian	10.5	Yunubayev et al. 2012
South Asia	Pashtuns (Pathans)	Indo-European	Indo-Iranian	10.0	Di Cristofaro et al. 2013
Middle East	Iranians, set1	Indo-European	Indo-Iranian	9.9	Rootsi et al. 2012, Reguero et al. 2006
Caucasus	Armenians Don	Indo-European	Armenian	9.8	Balanovski et al. 2017
Mediterranean	Italians	Indo-European	Italic	9.7	Rootsi et al. 2012
Caucasus	Lezgians	North Caucasian		9.7	Yunubayev et al. 2012
Caucasus	Lezgians	North Caucasian		9.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kumyks	Turkic		9.5	Karafet et al. 2016
Middle East	Azerbaijani East	Turkic		9.5	Di Cristofaro et al. 2013
Middle East	Turks	Turkic		9.2	Rootsi et al. 2012, Cinnioglu et al. 2004
South Asia	Nadar Cape	Dravidian		9.2	Arunkumar et al. 2012
Mediterranean	Cretans	Indo-European	Greek	9.1	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Caucasus	Nogais	Turkic		9.1	Karafet et al. 2016
Central Asia	Laks	North Caucasian		9.1	Karafet et al. 2016
North Africa	Egyptians	Afro-Asiatic	Semitic	8.8	Rootsi et al. 2012, Luis et al. 2004
South Asia	Maravar	Dravidian		8.8	Arunkumar et al. 2012

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Caucasus	Armenians, Eastern	Indo-European	Armenian	8.7	Hovhannisyan et al. 2014
Mediterranean	Greeks	Indo-European	Greek	8.6	Rootsi et al. 2012, King et al. 2011
Central Asia	Tajik-Takhar	Indo-European	Indo-Iranian	8.6	Di Cristofaro et al. 2013
Western Europe	Swiss	Indo-European	Multiple	8.5	Rootsi et al. 2012
South Asia	Nadar TNV	Dravidian		8.5	Arunkumar et al. 2012
South Asia	Parayar	Dravidian		8.3	Arunkumar et al. 2012
Central Asia	Pashtuns (Pathans)	Indo-European	Indo-Iranian	7.9	Lacau et al. 2012
Middle East	Azerbaijani	Turkic		7.9	Grugni et al. 2012
South Asia	Pallar	Dravidian		7.8	Arunkumar et al. 2012
Middle East	Armenians, Van	Indo-European	Armenian	7.8	Hovhannisyan et al. 2014
Middle East	Assyrians	Afro-Asiatic	Semitic	7.7	Grugni et al. 2012
Middle East	Armenians, Salmast	Indo-European	Armenian	7.5	Hovhannisyan et al. 2014
Caucasus	Georgians, Eastern	Kartvelian		7.4	Balanovski et al. 2017
Central Asia	Uzbeks-Sar-e-Pol	Turkic		7.1	Di Cristofaro et al. 2013
Middle East	Assyrians	Afro-Asiatic	Semitic	6.8	Rootsi et al. 2012, Chiaroni et al. 2010
Central Asia	Kazakhs (Arysky)	Turkic		6.8	Balanovski et al. 2015
Central Asia	Kazakhs	Turkic		6.7	Zhabagin et al. 2017
Mediterranean	Greeks	Indo-European	Greek	6.5	Rootsi et al. 2012, King et al. 2011
Middle East	Turks	Turkic		6.3	Balanovski et al. 2015
South Asia	Pakistani	Indo-European	Indo-Iranian	6.3	Rootsi et al. 2012, Sengupta et al. 2006
Caucasus	Andis	North Caucasian		6.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Andis	North Caucasian		6.1	Yunubayev et al. 2012

Region	Population	Lang Family	Branch	G-M201 (%)	Reference
Western Europe	Iberians	Indo-European	Italic	6.0	Rootsi et al. 2012, Flores et al. 2004
Middle East	Turkmen	Turkic		5.9	Grugni et al. 2012
Central Asia	Hazara-Bamiyan	Indo-European	Indo-Iranian	5.8	Di Cristofaro et al. 2013
Central Asia	Kyrgyz-East	Turkic		5.7	Di Cristofaro et al. 2013
East Asia	Mongols Dariganga	Mongolic		5.5	Balanovski et al. 2015
Central Asia	Arabs (Kasashtan)	Afro-Asiatic	Semitic	5.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Iranians (south-east)	Indo-European	Indo-Iranian	5.1	Balanovski et al. 2015
South Asia	Burusho	Isolate		5.0	Di Cristofaro et al. 2013
Indo-European	Azerbaijani	Turkic		5.0	Balanovski et al. 2015

Supplementary Table 7.2. Survey of G1-M285 Diversity.

Region	Population	Lang Family	G1-M285 (%)	Reference
Central Asia	Kazakhs Madjar	Turkic	86.7	Balanovski et al. 2015
Central Asia	Kazakhs (Akzharsky)	Turkic	55.6	Balanovski et al. 2015
Central Asia	Kazakhs (Karkaralinsky)	Turkic	52.8	Balanovski et al. 2015
Caucasus	Armenians Hemsheni	Indo-European	42.2	Balanovski et al. 2017
Middle East	Armenians Hamshenis	Indo-European	42.2	Balanovski et al. 2015
Central Asia	Kazakhs Magzhan Zhumabaev)	Turkic	34.5	Balanovski et al. 2015
Central Asia	Kazakhs (Amangeldinsky)	Turkic	25.5	Balanovski et al. 2015
Caucasus	Armenians Krasnodar	Indo-European	13.7	Balanovski et al. 2017
Caucasus	Armenians	Indo-European	12.3	Balanovski et al. 2015
Eastern Europe	Bashkirs (Kipchak tribes)	Turkic	12.0	Balanovski et al. 2015
Central Asia	Kazakhs (Arysky)	Turkic	6.8	Balanovski et al. 2015
Central Asia	Kazakhs	Turkic	6.7	Zhabagin et al. 2017
Middle East	Turks	Turkic	6.3	Balanovski et al. 2015
Caucasus	Armenians Adygei	Indo-European	6.1	Balanovski et al. 2017
East Asia	Mongols Dariganga	Mongolic	5.5	Balanovski et al. 2015
Middle East	Assyrians	Afro-Asiatic	5.1	Grugni et al. 2012
Middle East	Iranians (south-east)	Indo-European	5.1	Balanovski et al. 2015
Indo-European	Azerbaijani	Turkic	5.0	Balanovski et al. 2015

Supplementary Table 7.3. Survey of G2-P287 Diversity.

Region	Population	Lang Family	G2-M287 (%)	Reference
Caucasus	North Ossetians	Indo-European	69.7	Yunubayev et al. 2012
Caucasus	North Ossetians	Indo-European	69.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Georgians	Kartvelian	50.8	Yunubayev et al. 2012
Caucasus	Georgians	Kartvelian	50.0	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	South Ossetians	Indo-European	47.6	Yunubayev et al. 2012
Caucasus	Abkhaz	North Caucasian	47.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abkhaz	North Caucasian	47.5	Yunubayev et al. 2012
Caucasus	Adyghe	North Caucasian	46.8	Yunubayev et al. 2012
Caucasus	Cherkessians	North Caucasian	45.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Cherkessians	North Caucasian	45.2	Yunubayev et al. 2012
Caucasus	Adyghe	North Caucasian	44.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	South Ossetians	Indo-European	43.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kabardians	North Caucasian	42.9	Yunubayev et al. 2012
Caucasus	Kabardians	North Caucasian	42.6	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abazins	North Caucasian	41.0	Yunubayev et al. 2012
Caucasus	Imereti	Kartvelian	40.4	Balanovski et al. 2017
Caucasus	Abazins	North Caucasian	40.0	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Balkars	Turkic	32.6	Yunubayev et al. 2012
Caucasus	Balkars	Turkic	32.4	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Karachays	Turkic	31.9	Yunubayev et al. 2012
Caucasus	Karachays	Turkic	31.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Palestinians	Afro-Asiatic	22.2	Rootsi et al. 2012, Behar et al. 2010
Mediterranean	Corsicans	Indo-European	21.5	Rootsi et al. 2012

Region	Population	Lang Family	G2-M287 (%)	Reference
South Asia	Kalash	Indo-European	20.0	Di Cristofaro et al. 2013
Caucasus	Chamalals	North Caucasian	18.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Chamalals	North Caucasian	18.5	Yunubayev et al. 2012
Middle East	Armenians	Indo-European	17.7	Grugni et al. 2012
Middle East	Mazandarani	Indo-European	16.6	Grugni et al. 2012
Middle East	Laz	Kartvelian	16.6	Balanovski et al. 2017
Caucasus	Armenians Adygei	Indo-European	16.3	Balanovski et al. 2017
Middle East	Armenians Central	Indo-European	16.0	Hovhannisyan et al. 2014
Central Asia	Pashtun-Baghlan	Indo-European	14.7	Di Cristofaro et al. 2013
Middle East	Gilaki	Indo-European	14.0	Grugni et al. 2012
Caucasus	Nogais, Kuban	Turkic	13.8	Yunubayev et al. 2012
Caucasus	Nogais	Turkic	13.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kumyks	Turkic	13.7	Yunubayev et al. 2012
Middle East	Armenians, Western	Indo-European	13.5	Hovhannisyan et al. 2014
Caucasus	Armenians Erzurum	Indo-European	13.2	Balanovski et al. 2017
Caucasus	Kumyks	Turkic	13.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Mediterranean	Sardinians	Indo-European	13.1	Rootsi et al. 2012
Mediterranean	Greek Cypriots	Indo-European	12.7	Voskarides et al. 2017
Middle East	Armenians Sasun	Indo-European	12.5	Hovhannisyan et al. 2014
Middle East	Azerbaijani	Turkic	12.5	Rootsi et al. 2012
Middle East	Turks	Turkic	12.2	Rootsi et al. 2012, Cinnioglu et al. 2004, Myres et al. 2010

Region	Population	Lang Family	G2-M287 (%)	Reference
Middle East	Turks	Turkic	12.0	Rootsi et al. 2012, Cinnioglu et al. 2004
South Asia	Brahui	Dravidian	12.0	Di Cristofaro et al. 2013
Middle East	Israel	Afro-Asiatic	11.4	Rootsi et al. 2012, Behar et al. 2010
Central Asia	Pashtun-Kunduz	Indo-European	11.3	Di Cristofaro et al. 2013
Western Europe	Tyrololeans	Indo-European	11.3	Berger et al. 2013
Mediterranean	Sicilians	Indo-European	10.5	Rootsi et al. 2012
Caucasus	Armenians	Indo-European	10.5	Yunubayev et al. 2012
Caucasus	Armenians	Indo-European	10.3	Rootsi et al. 2012, Yunusbaev et al. 2011
South Asia	Pashtuns (Pathans)	Indo-European	10.0	Di Cristofaro et al. 2013
Caucasus	Armenians Don	Indo-European	9.8	Balanovski et al. 2017
Mediterranean	Italians	Indo-European	9.7	Rootsi et al. 2012
Caucasus	Lezgians	North Caucasian	9.7	Yunubayev et al. 2012
Caucasus	Lezgians	North Caucasian	9.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kumyks	Turkic	9.5	Karafet et al. 2016
Middle East	Iranians, set2	Indo-European	9.3	Rootsi et al. 2012
Middle East	Turks	Turkic	9.2	Rootsi et al. 2012, Cinnioglu et al. 2004
Mediterranean	Cretans	Indo-European	9.1	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Central Asia	Laks	North Caucasian	9.1	Karafet et al. 2016
Caucasus	Nogais	Turkic	9.1	Karafet et al. 2016
North Africa	Egyptians	Afro-Asiatic	8.8	Rootsi et al. 2012, Luis et al. 2004
Caucasus	Armenians, Eastern	Indo-European	8.7	Hovhannisyan et al. 2014
Mediterranean	Greeks	Indo-European	8.6	Rootsi et al. 2012, King et al. 2011
Western Europe	Swiss	Indo-European	8.5	Rootsi et al. 2012

Region	Population	Lang Family	G2-M287 (%)	Reference
Middle East	Kurds	Indo-European	8.5	Grugni et al. 2012
Central Asia	Tajik-Badakhshan	Indo-European	8.1	Di Cristofaro et al. 2013
Middle East	Azerbaijani	Turkic	7.9	Grugni et al. 2012
Central Asia	Pashtuns (Pathans)	Indo-European	7.9	Lacau et al. 2012
Middle East	Armenians, Van	Indo-European	7.8	Hovhannisyan et al. 2014
Caucasus	Armenians Krasnodar	Indo-European	7.7	Balanovski et al. 2017
Middle East	Armenians, Salmast	Indo-European	7.5	Hovhannisyan et al. 2014
Caucasus	Georgians, Eastern	Kartvelian	7.4	Balanovski et al. 2017
Central Asia	Uzbeks-Sar-e-Pol	Turkic	7.1	Di Cristofaro et al. 2013
Mediterranean	Greeks	Indo-European	6.5	Rootsi et al. 2012, King et al. 2011
Caucasus	Andis	North Caucasian	6.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Andis	North Caucasian	6.1	Yunubayev et al. 2012
Western Europe	Iberians	Indo-European	6.0	Rootsi et al. 2012, Flores et al. 2004
Middle East	Iranians, set1	Indo-European	6.0	Rootsi et al. 2012, Reguero et al. 2006
Middle East	Turkmen	Turkic	5.9	Grugni et al. 2012
Central Asia	Hazara-Bamiyan	Indo-European	5.8	Di Cristofaro et al. 2013
Central Asia	Kyrgyz-East	Turkic	5.7	Di Cristofaro et al. 2013
Central Asia	Tajik-Takhar	Indo-European	5.7	Di Cristofaro et al. 2013
South Asia	Pakistani	Indo-European	5.7	Rootsi et al. 2012, Sengupta et al. 2006
Central Asia	Arabs (Kashtan)	Afro-Asiatic	5.1	Rootsi et al. 2012, Yunusbaev et al. 2001

Region	Population	Lang Family	G2-M287 (%)	Reference
South Asia	Burusho	Isolate	5.0	Di Cristofaro et al. 2013
Middle East	Azerbaijani East	Turkic	4.7	Di Cristofaro et al. 2013
Middle East	Assyrians	Afro-Asiatic	4.5	Rootsi et al. 2012, Chiaroni et al. 2010
Middle East	Assyrians	Afro-Asiatic	2.6	Grugni et al. 2012
Caucasus	Armenians Hemsheni	Indo-European	2.2	Balanovski et al. 2017

Supplementary Table 7.4. Survey of G2-L497 Diversity.

Region	Population	Lang Family	G2-L497 (%)	Reference
Western Europe	Tyroleans	Indo-European	8.6	Berger et al. 2013
Mediterranean	Corsicans	Indo-European	5.2	Rootsi et al. 2012
Western Europe	Swiss	Indo-European	5.1	Rootsi et al. 2012
Caucasus	Kumyks	Turkic	4.8	Karafet et al. 2016
Western Europe	Germans	Indo-European	3.4	Rootsi et al. 2012
Eastern Europe	Moldovans	Indo-European	3.4	Rootsi et al. 2012
Mediterranean	Italians	Indo-European	2.8	Rootsi et al. 2012
Western Europe	French	Indo-European	2.2	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	2.0	Rootsi et al. 2012, Flores et al. 2004
Western Europe	Iberians	Indo-European	1.9	Rootsi et al. 2012, Flores et al. 2004
Eastern Europe	Bulgarians	Indo-European	1.9	Rootsi et al. 2012
Scandinavia	Danes	Indo-European	1.8	Rootsi et al. 2012
Eastern Europe	Romanians	Indo-European	1.8	Rootsi et al. 2012
Western Europe	French	Indo-European	1.6	Rootsi et al. 2012
Eastern Europe	Croatians	Indo-European	1.6	Rootsi et al. 2012, Barac et al. 2003
Mediterranean	Sicilians	Indo-European	1.3	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	1.2	Rootsi et al. 2012, Flores et al. 2004
Western Europe	Iberians	Indo-European	1.0	Rootsi et al. 2012, Flores et al. 2004
Eastern Europe	Hungarians	Uralic	0.9	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.8	Rootsi et al. 2012, Flores et al. 2004
Middle East	Turks	Turkic	0.6	Rootsi et al. 2012, Cinnioglu et al. 2004
Eastern Europe	Chuvashes	Turkic	0.5	Rootsi et al. 2012
Eastern Europe	Ukrainians	Indo-European	0.5	Rootsi et al. 2012

Region	Population	Lang Family	G2-L497 (%)	Reference
Mediterranean	Sardinians	Indo-European	0.4	Rootsi et al. 2012
Eastern Europe	Slovaks	Indo-European	0.4	Rootsi et al. 2012
Mediterranean	Greek Cypriots	Indo-European	0.3	Voskarides et al. 2017
Mediterranean	Cretans	Indo-European	0.3	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Eastern Europe	Russians	Indo-European	0.3	Rootsi et al. 2012
Eastern Europe	Russians	Indo-European	0.2	Rootsi et al. 2012, Balanovsky et al. 2008

Supplementary Table 7.5. Survey of G2-U1 Diversity.

Region	Population	Lang Family	G2-U1 (%)	Reference
Caucasus	Adyghe	North Caucasian	39.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Cherkessians	North Caucasian	36.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kabardians	North Caucasian	29.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abazins	North Caucasian	23.3	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abkhaz	North Caucasian	22.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Palestinians	Afro-Asiatic	16.7	Rootsi et al. 2012, Behar et al. 2010
Central Asia	Laks	North Caucasian	9.1	Karafet et al. 2016
Caucasus	Kumyks	Turkic	7.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Karachays	Turkic	7.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Nogais	Turkic	6.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Balkars	Turkic	6.6	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Georgians	Kartvelian	6.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Nogais	Turkic	4.5	Karafet et al. 2016
Mediterranean	Greeks	Indo-European	3.4	Rootsi et al. 2012, King et al. 2011
Middle East	Armenians	Indo-European	2.9	Grugni et al. 2012
Middle East	Turks	Turkic	2.4	Rootsi et al. 2012, Cinnioglu et al. 2004, Myres et al. 2010
Caucasus	North Ossetians	Indo-European	2.3	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Armenians	Indo-European	1.4	Rootsi et al. 2012, Yunusbaev et al. 2011
Middle East	Mazandarani	Indo-European	1.4	Grugni et al. 2012
Eastern Europe	Bashkirs	Turkic	1.1	Rootsi et al. 2012
Central Asia	Kazakhs	Turkic	1.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Mediterranean	Italians	Indo-European	1.0	Rootsi et al. 2012
Eastern Europe	Slovenes	Indo-European	1.0	Rootsi et al. 2012

Region	Population	Lang Family	G2-U1 (%)	Reference
Middle East	Turks	Turkic	1.0	Rootsi et al. 2012, Cinnioglu et al. 2004
Baltic	Estonians	Uralic	0.8	Rootsi et al. 2012
Middle East	Azerbaijani	Turkic	0.7	Rootsi et al. 2012
Central Asia	Kyrgyz	Turkic	0.7	Rootsi et al. 2012
Middle East	Turks	Turkic	0.6	Rootsi et al. 2012, Cinnioglu et al. 2004
Eastern Europe	Ukrainians	Indo-European	0.5	Rootsi et al. 2012
Eastern Europe	Bulgarians	Indo-European	0.5	Rootsi et al. 2012
Middle East	Iranians, set1	Indo-European	0.4	Rootsi et al. 2012, Reguero et al. 2006
Middle East	Iranians, set2	Indo-European	0.4	Rootsi et al. 2012
Eastern Europe	Belarusians	Indo-European	0.3	Rootsi et al. 2012
Mediterranean	Cretans	Indo-European	0.3	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Mediterranean	Greek Cypriots	Indo-European	0.2	Voskarides et al. 2017
Mediterranean	Sardinians	Indo-European	0.2	Rootsi et al. 2012

Supplementary Table 7.6. Survey of G2-M527 Diversity.

Region	Population	Lang Family	G2-M527 (%)	Reference
Mediterranean	Greeks	Indo-European	3.2	Rootsi et al. 2012, King et al. 2011
Caucasus	Abazins	North Caucasian	2.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Azerbaijani	Turkic	2.0	Rootsi et al. 2012
Mediterranean	Greeks	Indo-European	1.6	Rootsi et al. 2012, King et al. 2008
Caucasus	Georgians	Kartvelian	1.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abkhaz	North Caucasian	1.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Nogais	Turkic	1.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Palestinians	Afro-Asiatic	1.1	Rootsi et al. 2012, Behar et al. 2010
Western Europe	French	Indo-European	1.1	Rootsi et al. 2012
Mediterranean	Italians	Indo-European	1.0	Rootsi et al. 2012
Middle East	Israel	Afro-Asiatic	1.0	Rootsi et al. 2012, Behar et al. 2010
Eastern Europe	Ukrainians	Indo-European	0.7	Rootsi et al. 2012
Middle East	Tatars	Turkic	0.6	Rootsi et al. 2012
Western Europe	Swiss	Indo-European	0.6	Rootsi et al. 2012
Mediterranean	Cretans	Indo-European	0.6	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Western Europe	French	Indo-European	0.5	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.5	Rootsi et al. 2012, Flores et al. 2004
Baltic	Estonians	Uralic	0.4	Rootsi et al. 2012
Western Europe	Germans	Indo-European	0.3	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.3	Rootsi et al. 2012, Flores et al. 2004
Mediterranean	Greek Cypriots	Indo-European	0.3	Voskarides et al. 2017
Mediterranean	Corsicans	Indo-European	0.3	Rootsi et al. 2012

Region	Population	Lang Family	G2-M527 (%)	Reference
Caucasus	Armenians	Indo-European	0.2	Rootsi et al. 2012, Yunusbaev et al. 2011
Eastern Europe	Russians	Indo-European	0.2	Rootsi et al. 2012, Balanovsky et al. 2008
Mediterranean	Sardinians	Indo-European	0.2	Rootsi et al. 2012
Middle East	Iranians, set2	Indo-European	0.2	Rootsi et al. 2012
Eastern Europe	Belarusians	Indo-European	0.2	Rootsi et al. 2012
Eastern Europe	Bulgarians	Indo-European	0.1	Rootsi et al. 2012

Supplementary Table 7.7. Survey of G2-M406 Diversity.

Region	Population	Lang Family	G2-M406 (%)	Reference
Caucasus	Chamalals	North Caucasian	18.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Middle East	Israel	Afro-Asiatic	8.1	Rootsi et al. 2012, Behar et al. 2010
Caucasus	Armenians Adygei	Indo-European	6.1	Balanovski et al. 2017
South Asia	Pashtuns (Pathans)	Indo-European	5.0	Di Cristofaro et al. 2013
Caucasus	Armenians Erzurum	Indo-European	4.0	Balanovski et al. 2017
Mediterranean	Greeks	Indo-European	3.4	Rootsi et al. 2012, King et al. 2011
Caucasus	Armenians Krasnodar	Indo-European	3.4	Balanovski et al. 2017
Mediterranean	Greeks	Indo-European	3.2	Rootsi et al. 2012, King et al. 2011
Central Asia	Tajik-Badakhshan	Indo-European	2.7	Di Cristofaro et al. 2013
Mediterranean	Sicilians	Indo-European	2.6	Rootsi et al. 2012
Middle East	Turks	Turkic	2.5	Rootsi et al. 2012, Cinnioglu et al. 2004
Middle East	Turks	Turkic	2.4	Rootsi et al. 2012, Cinnioglu et al. 2004, Myres et al. 2010
Mediterranean	Italians	Indo-European	2.4	Rootsi et al. 2012
Middle East	Turks	Turkic	2.4	Rootsi et al. 2012, Cinnioglu et al. 2004
Mediterranean	Greek Cypriots	Indo-European	2.4	Voskarides et al. 2017
Caucasus	Armenians Don	Indo-European	2.2	Balanovski et al. 2017
Caucasus	Armenians	Indo-European	2.1	Rootsi et al. 2012, Yunusbaev et al. 2011
Middle East	Azerbaijani	Turkic	2.0	Rootsi et al. 2012
Eastern Europe	Slovenes	Indo-European	2.0	Rootsi et al. 2012
Mediterranean	Cretans	Indo-European	1.9	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Mediterranean	Greeks	Indo-European	1.6	Rootsi et al. 2012, King et al. 2008

Region	Population	Lang Family	G2-M406 (%)	Reference
Middle East	Yemeni	Afro-Asiatic	1.6	Rootsi et al. 2012, Luis et al. 2004
Caucasus	Imereti	Kartvelian	1.6	Balanovski et al. 2017
Middle East	Turkmen	Turkic	1.4	Grugni et al. 2012
North Africa	Egyptians	Afro-Asiatic	1.4	Rootsi et al. 2012, Luis et al. 2004
Western Europe	Iberians	Indo-European	1.3	Rootsi et al. 2012, Flores et al. 2004
Middle East	Jordanians	Afro-Asiatic	1.3	Rootsi et al. 2012
Caucasus	Kumyks	Turkic	1.3	Rootsi et al. 2012, Yunusbaev et al. 2001
Western Europe	French	Indo-European	1.1	Rootsi et al. 2012
Central Asia	Uzbeks	Turkic	1.0	Zhabagin et al. 2017
Eastern Europe	Hungarians	Uralic	0.9	Rootsi et al. 2012
Middle East	Iranians, set1	Indo-European	0.9	Rootsi et al. 2012, Reguero et al. 2006
Mediterranean	Sardinians	Indo-European	0.8	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.8	Rootsi et al. 2012, Flores et al. 2004
Caucasus	Kabardians	North Caucasian	0.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Western Europe	Iberians	Indo-European	0.7	Rootsi et al. 2012, Flores et al. 2004
Middle East	Emirati	Afro-Asiatic	0.6	Rootsi et al. 2012, Cadenas et al. 2008
Western Europe	Swiss	Indo-European	0.6	Rootsi et al. 2012
South Asia	Pakistani	Indo-European	0.6	Rootsi et al. 2012, Sengupta et al. 2006
Middle East	Iranians, set2	Indo-European	0.5	Rootsi et al. 2012
Eastern Europe	Poles	Indo-European	0.5	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.5	Rootsi et al. 2012, Flores et al. 2004
Western Europe	Germans	Indo-European	0.3	Rootsi et al. 2012
Mediterranean	Corsicans	Indo-European	0.3	Rootsi et al. 2012
Eastern Europe	Ukrainians	Indo-European	0.2	Rootsi et al. 2012
Eastern Europe	Bulgarians	Indo-European	0.1	Rootsi et al. 2012

Supplementary Table 7.8. Survey of G2-L91 Diversity.

Region	Population	Lang Family	G2-L91 (%)	Reference
Mediterranean	Corsicans	Indo-European	11.2	Rootsi et al. 2012
Mediterranean	Sardinians	Indo-European	6.0	Rootsi et al. 2012
North Africa	Egyptians	Afro-Asiatic	4.1	Rootsi et al. 2012, Luis et al. 2004
Eastern Europe	Czechs	Indo-European	2.9	Rootsi et al. 2012
Mediterranean	Greek Cypriots	Indo-European	1.3	Voskarides et al. 2017
Western Europe	Iberians	Indo-European	1.0	Rootsi et al. 2012, Flores et al. 2004
Middle East	Azerbaijani	Turkic	1.0	Rootsi et al. 2012
Caucasus	Armenians	Indo-European	0.9	Rootsi et al. 2012, Yunusbaev et al. 2011
Eastern Europe	Bulgarians	Indo-European	0.9	Rootsi et al. 2012
Mediterranean	Cretans	Indo-European	0.8	Rootsi et al. 2012, King et al. 2008, Martinez et al. 2007
Western Europe	French	Indo-European	0.8	Rootsi et al. 2012
North Africa	Berbers	Afro-Asiatic	0.8	Rootsi et al. 2012, Flores et al. 2004
Western Europe	Iberians	Indo-European	0.7	Rootsi et al. 2012, Flores et al. 2004
Mediterranean	Italians	Indo-European	0.3	Rootsi et al. 2012
Middle East	Israel	Afro-Asiatic	0.3	Rootsi et al. 2012, Behar et al. 2010
Western Europe	Germans	Indo-European	0.3	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.3	Rootsi et al. 2012, Flores et al. 2004
Middle East	Iranians, set2	Indo-European	0.1	Rootsi et al. 2012

Supplementary Table 7.9. Survey of G2-M377 Diversity.

Region	Population	Lang Family	G2-M377 (%)	Reference
Central Asia	Pashtun-Baghlan	Indo-European	14.7	Di Cristofaro et al. 2013
Central Asia	Pashtun-Kunduz	Indo-European	11.3	Di Cristofaro et al. 2013
Central Asia	Pashtuns (Pathans	Indo-European	5.3	Lacau et al. 2012
South Asia	Pashtuns (Pathans)	Indo-European	5.0	Di Cristofaro et al. 2013
South Asia	Burusho	Isolate	5.0	Di Cristofaro et al. 2013
Central Asia	Tajik-Balkh	Indo-European	3.7	Di Cristofaro et al. 2013
Central Asia	Tajik-Badakhshan	Indo-European	2.7	Di Cristofaro et al. 2013
Middle East	Azerbaijani	Turkic	1.6	Grugni et al. 2012
South Asia	Pakistani	Indo-European	1.1	Rootsi et al. 2012, Sengupta et al. 2006
Eastern Europe	Poles	Indo-European	1.0	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.8	Rootsi et al. 2012, Flores et al. 2004
Central Asia	Kyrgyz	Turkic	0.7	Rootsi et al. 2012
Middle East	Turks	Turkic	0.5	Rootsi et al. 2012, Cinnioglu et al. 2004
Eastern Europe	Russians	Indo-European	0.5	Rootsi et al. 2012, Balanovsky et al. 2008
Eastern Europe	Belarusians	Indo-European	0.2	Rootsi et al. 2012
Middle East	Iranians, set2	Indo-European	0.1	Rootsi et al. 2012

Supplementary Table 7.10. Survey of G2-P16 Diversity.

Region	Population	Lang Family	G2a-P16 (%)	Reference
Caucasus	North Ossetians	Indo-European	63.6	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	South Ossetians	Indo-European	43.5	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Georgians	Kartvelian	34.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Karachays	Turkic	23.2	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Balkars	Turkic	20.6	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Abkhaz	North Caucasian	19.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Imereti	Kartvelian	11.3	Balanovski et al. 2017
Middle East	Laz	Kartvelian	11.1	Balanovski et al. 2017
Caucasus	Abazins	North Caucasian	10.0	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kabardians	North Caucasian	9.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Lezgians	North Caucasian	9.7	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Cherkessians	North Caucasian	7.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Andis	North Caucasian	6.1	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Georgians, Eastern	Kartvelian	5.6	Balanovski et al. 2017
Caucasus	Ingush	North Caucasian	4.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Kumyks	Turkic	3.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Adyghe	North Caucasian	3.8	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Nogais	Turkic	3.4	Rootsi et al. 2012, Yunusbaev et al. 2001
Caucasus	Dargins (Dargwa)	North Caucasian	2.9	Rootsi et al. 2012, Yunusbaev et al. 2001
Central Asia	Kyrgyz-East	Turkic	2.9	Di Cristofaro et al. 2013
Middle East	Turks	Turkic	2.5	Rootsi et al. 2012, Cinnioglu et al. 2004
Middle East	Gilaki	Indo-European	1.6	Grugni et al. 2012

Region	Population	Lang Family	G2a-P16 (%)	Reference
Mediterranean	Sicilians	Indo-European	1.3	Rootsi et al. 2012
Eastern Europe	Kalmyks	Mongolic	1.3	Rootsi et al. 2012
Middle East	Tatars	Turkic	1.2	Rootsi et al. 2012
Middle East	Turks	Turkic	1.2	Rootsi et al. 2012, Cinnioglu et al. 2004, Myres et al. 2010
Caucasus	Armenians	Indo-European	1.2	Rootsi et al. 2012, Yunusbaev et al. 2011
Middle East	Turks	Turkic	1.0	Rootsi et al. 2012, Cinnioglu et al. 2004
Central Asia	Kyrgyz	Turkic	0.7	Rootsi et al. 2012
Mediterranean	Corsicans	Indo-European	0.6	Rootsi et al. 2012
Caucasus	Chechens	North Caucasian	0.6	Rootsi et al. 2012, Yunusbaev et al. 2001
Eastern Europe	Romanians	Indo-European	0.6	Rootsi et al. 2012
Central Asia	Pashtuns (Pathans)	Indo-European	0.5	Lacau et al. 2012
Eastern Europe	Russians	Indo-European	0.5	Rootsi et al. 2012, Balanovsky et al. 2008
Eastern Europe	Russians	Indo-European	0.5	Rootsi et al. 2012, Balanovsky et al. 2008
Middle East	Azerbaijani	Turkic	0.3	Rootsi et al. 2012
Western Europe	Iberians	Indo-European	0.3	Rootsi et al. 2012, Flores et al. 2004
Middle East	Iranians, set2	Indo-European	0.2	Rootsi et al. 2012
Eastern Europe	Ukrainians	Indo-European	0.2	Rootsi et al. 2012
Eastern Europe	Bulgarians	Indo-European	0.1	Rootsi et al. 2012

Supplementary Table 7.11. Survey of Dravidian-Speaking Populations.

Region	Population	Lang Family	Sample Size	G-M201 (%)	Reference
South Asia	Brahui	Dravidian	25	16.0	Di Cristofaro et al. 2013
South Asia	Nadar Cape	Dravidian	98	9.2	Arunkumar et al. 2012
South Asia	Maravar	Dravidian	80	8.8	Arunkumar et al. 2012
South Asia	Nadar TNV	Dravidian	59	8.5	Arunkumar et al. 2012
South Asia	Parayar	Dravidian	24	8.3	Arunkumar et al. 2012
South Asia	Pallar	Dravidian	51	7.8	Arunkumar et al. 2012
South Asia	Kanikaran	Dravidian	17	5.9	Arunkumar et al. 2012
South Asia	Vanniyar	Dravidian	21	4.8	Arunkumar et al. 2012
South Asia	Piramalai Kallar	Dravidian	53	3.8	Arunkumar et al. 2012
South Asia	Ezhava	Dravidian	95	3.2	Arunkumar et al. 2012
South Asia	Valayar	Dravidian	95	2.1	Arunkumar et al. 2012
South Asia	Paliyan	Dravidian	95	2.1	Arunkumar et al. 2012
South Asia	Tamil Jains	Dravidian	100	2.0	Arunkumar et al. 2012
South Asia	Yadhava	Dravidian	107	1.9	Arunkumar et al. 2012

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Supplementary Tables for Chapter 8 and Haplogroup H-M2713

Supplementary Table 8.1. Survey of H-M69 Populations.

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Uttar Pradesh	Kurmi	Indo-European	Indo-Aryan	6	1.00	Sahoo et al. 2006
South Asia	Tamil Nadu	Chakkliar	Dravidian		9	0.89	Sahoo et al. 2006
South Asia	Karnataka	Koraga	Dravidian		33	0.88	Cordaux et al. 2004a
South Asia	Tamil Nadu	Irular	Dravidian		10	0.80	Sahoo et al. 2006
South Asia	Central India	Muria	Dravidian		20	0.80	Sengupta et al. 2006
South Asia	South India	Kurumba	Dravidian		19	0.74	Sengupta et al. 2006
South Asia	East India	Bagdi	Indo-European	Indo-Aryan	11	0.73	Sengupta et al. 2006
South Asia	West Bengal	Oraon	Dravidian		31	0.71	Debnath et al. 2011
South Asia	Andhra Pradesh	Koya	Dravidian		41	0.71	Kivisild et al. 2003
South Asia	Karnataka	Bhovi	Dravidian		13	0.69	Sahoo et al. 2006
South Asia	West Bengal	Maheli	Indo-European	Indo-Aryan	13	0.69	Sahoo et al. 2006
South Asia	Tamil Nadu	Kurumba	Dravidian		35	0.69	Arunkumar et al. 2012
South Asia	Maharastra	Pawara	Indo-European	Indo-Aryan	16	0.69	Sahoo et al. 2006
South Asia	Andra Pradesh	Naikpod Gond	Dravidian		18	0.67	Sahoo et al. 2006
South Asia	Gujarat	Mota Chaudhari	Indo-European	Indo-Aryan	27	0.67	Khurana et al. 2014
South Asia	West Bengal	Kora	Andamanese		17	0.65	Sahoo et al. 2006
South Asia	Jharkhand; West Bengal	Paharia	Dravidian		11	0.64	Kumar et al. 2007
South Asia	Maharastra	Katkari	Indo-European	Indo-Aryan	19	0.63	Sahoo et al. 2006
South Asia	Gujarat	Vasava	Indo-European	Indo-Aryan	24	0.63	Khurana et al. 2014
South Asia	Madhya Pradesh	Gonds	Dravidian		31	0.62	Sharma et al. 2009
South Asia	Gujarat	Gamit	Indo-European	Indo-Aryan	18	0.61	Khurana et al. 2014
Eastern Europe	Macedonia	Roma	Indo-European	Indo-Aryan	57	0.60	Peričić et al. 2005

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Gujarat	Nana Chaudhari	Indo-European	Indo-Aryan	25	0.60	Khurana et al. 2014
South Asia	East India	Gaud	Indo-European	Indo-Aryan	5	0.60	Sengupta et al. 2006
South Asia	Tamil Nadu	Pallar	Dravidian		15	0.60	Sahoo et al. 2006
South Asia	Uttar Pradesh	Gonds	Dravidian		38	0.59	Sharma et al. 2009
Eastern Europe	Tiszavasvari, Hungary	Roma	Indo-European	Indo-Aryan	29	0.59	Pamjav et al. 2011
South Asia	Tamil Nadu	Kattunaickan	Dravidian		46	0.58	Arunkumar et al. 2012
South Asia	Maharastra	Madia Gond	Dravidian		14	0.57	Sahoo et al. 2006
South Asia	Tamil Nadu	Gounder	Dravidian		14	0.57	Sahoo et al. 2006
South Asia	Jharkhand; Chattisgarh	Oraon	Dravidian		91	0.57	Kumar et al. 2007
South Asia	South India	Kota	Dravidian		16	0.56	Sengupta et al. 2006
South Asia	Maharastra	Mahadeo Koli	Indo-European	Indo-Aryan	11	0.55	Sahoo et al. 2006
South Asia	East India	Mahishya	Indo-European	Indo-Aryan	13	0.54	Sengupta et al. 2006
South Asia	Northern India	Chamar	Indo-European	Indo-Aryan	18	0.50	Sengupta et al. 2006
South Asia	Tamil Nadu	Vanniyar	Dravidian		10	0.50	Sahoo et al. 2006
South Asia	Bihar	Kayastha	Indo-European	Indo-Aryan	14	0.50	Sahoo et al. 2006
South Asia	South India	Ambalakarar	Dravidian		29	0.48	Sengupta et al. 2006
South Asia	Gujarat	Dubla	Indo-European	Indo-Aryan	42	0.48	Khurana et al. 2014
South Asia	Karnataka	Iyengar	Dravidian		17	0.47	Sahoo et al. 2006
South Asia	Jharkhand	Oraon	Dravidian		110	0.45	Borkar et al. 2011
South Asia	Gujarat	Patel	Indo-European	Indo-Aryan	9	0.44	Sahoo et al. 2006
South Asia	Tamil Nadu	Kallar	Dravidian		9	0.44	Sahoo et al. 2006
South Asia	Central India	Kamar	Dravidian		30	0.43	Sengupta et al. 2006
South Asia	West Bengal	Santhal	Austro-Asiatic		51	0.43	Debnath et al. 2011

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Jharkhand; West Bengal	Mudi	Austro-Asiatic		37	0.43	Kumar et al. 2007
South Asia	West India	Nav Buddha	Indo-European	Indo-Aryan	14	0.43	Sengupta et al. 2006
South Asia	West Bengal	Kol	Austro-Asiatic		62	0.42	Debnath et al. 2011
Eastern Europe	Slovakia	Roma	Indo-European	Indo-Aryan	200	0.40	Petrejčiková et al. 2009
South Asia	Orissa	Paroja	Dravidian		15	0.40	Sahoo and Kashyap 2006
South Asia	Tamil Nadu	Bettakurumba	Dravidian		5	0.40	Cordaux et al. 2004a
South Asia	Jharkhand; West Bengal	Mahali	Austro-Asiatic		25	0.40	Kumar et al. 2007
South Asia	South India	Irula	Dravidian		30	0.40	Sengupta et al. 2006
South Asia	Karnataka	Lingayat	Dravidian		10	0.40	Sahoo et al. 2006
South Asia	Orissa	Bathudi	Indo-European	Indo-Aryan	36	0.39	Kumar et al. 2007
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	77	0.39	Fornarino et al. 2009
South Asia	Jharkhand; West Bengal	Santhal	Austro-Asiatic		109	0.39	Kumar et al. 2007
South Asia	Tamil Nadu	Parayar NTN	Dravidian		52	0.39	Arunkumar et al. 2012
South Asia	Orissa	Paroja	Dravidian		13	0.38	Sahoo et al. 2006
South Asia	Bihar	Kurmi	Indo-European	Indo-Aryan	13	0.38	Sahoo et al. 2006
South Asia	Maharastra	Maratha	Indo-European	Indo-Aryan	16	0.38	Sahoo et al. 2006
South Asia	Andhra Pradesh	Chenchu	Dravidian		41	0.37	Kivisild et al. 2003
South Asia	Bihar	Baniya	Indo-European	Indo-Aryan	11	0.36	Sahoo et al. 2006
South Asia	Chattisgarh	Nagesia	Dravidian		14	0.36	Kumar et al. 2007
South Asia	Tamil Nadu	Irula	Dravidian		80	0.36	Arunkumar et al. 2012
South Asia	Jharkhand	Pahariya	Indo-European	Indo-Aryan	100	0.35	Borkar et al. 2011
South Asia	Jharkhand	Munda	Austro-Asiatic		94	0.34	Borkar et al. 2011

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Tamil Nadu	Mullukurumba	Dravidian		29	0.34	Arunkumar et al. 2012
South Asia	Maharastra	Chitpavan Brahmin	Indo-European	Indo-Aryan	15	0.33	Sahoo et al. 2006
South Asia	Jharkhand	Oroan	Dravidian		9	0.33	Sahoo et al. 2006
South Asia	Himachal Pradesh	Rajput	Indo-European	Indo-Aryan	15	0.33	Sahoo et al. 2006
South Asia	Central India	Halba	Indo-European	Indo-Aryan	21	0.33	Sengupta et al. 2006
South Asia	Gujarat	Dhodia	Indo-European	Indo-Aryan	63	0.33	Khurana et al. 2014
South Asia	Madhya Pradesh	Saharia	Indo-European	Indo-Aryan	57	0.33	Sharma et al. 2009
South Asia	Tamil Nadu	Kota	Dravidian		62	0.33	Arunkumar et al. 2012
South Asia	Jharkhand; Chattisgarh	Korwa	Austro-Asiatic		42	0.33	Kumar et al. 2007
South Asia	Jharkhand; West Bengal; Orissa	Kharia	Austro-Asiatic		36	0.33	Kumar et al. 2007
South Asia	Andra Pradesh	Naikpod	Dravidian		68	0.32	Thanseem et al. 2006
South Asia	Jharkhand; West Bengal; Orissa	Savar	Austro-Asiatic		47	0.32	Kumar et al. 2007
South Asia	Tamil Nadu	Kadar	Dravidian		28	0.32	Arunkumar et al. 2012
Eastern Europe	Hungary	Roma	Indo-European	Indo-Aryan	107	0.32	Pamjav et al. 2011
South Asia	Maharastra	Dhangar	Indo-European	Indo-Aryan	16	0.31	Sahoo et al. 2006
South Asia	West Bengal	Namasudra	Indo-European	Indo-Aryan	13	0.31	Sahoo et al. 2006
Eastern Europe	Slovakia	Roma	Indo-European	Indo-Aryan	62	0.31	Pamjav et al. 2011
South Asia	East India	Lodha	Austro-Asiatic		20	0.30	Sengupta et al. 2006
South Asia	Tamil Nadu	Mukkuvar	Dravidian		17	0.30	Arunkumar et al. 2012
South Asia	Tamil Nadu	Ezhava	Dravidian		95	0.30	Arunkumar et al. 2012
South Asia	Gujarat	Konkana	Indo-European	Indo-Aryan	24	0.29	Khurana et al. 2014
South Asia	South India	Vellalar	Dravidian		31	0.29	Sengupta et al. 2006

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Tamil Nadu	Nadar TNV	Dravidian		59	0.29	Arunkumar et al. 2012
South Asia	Chattisgarh	Kanwar	Indo-European	Indo-Aryan	41	0.29	Kumar et al. 2007
South Asia	Tamil Nadu	Kanikaran	Dravidian		17	0.29	Arunkumar et al. 2012
South Asia	East India	Santhal	Austro-Asiatic		14	0.29	Sengupta et al. 2006
South Asia	Tamil Nadu	Tamil Jains	Dravidian		100	0.28	Arunkumar et al. 2012
South Asia	Jharkhand	Birhor	Austro-Asiatic		100	0.28	Borkar et al. 2011
South Asia	Jharkhand; West Bengal	Bhumij	Austro-Asiatic		89	0.27	Kumar et al. 2007
South Asia	Gujarat	Bhils	Indo-European	Indo-Aryan	22	0.27	Sharma et al. 2009
South Asia	Southern India	Mullukurunan	Dravidian		15	0.27	Cordaux et al. 2004a
South Asia	Andra Pradesh	Pardhan	Dravidian		128	0.26	Thanseem et al. 2006
South Asia	Orissa	Yadav (Gope)	Indo-European	Indo-Aryan	16	0.25	Sahoo et al. 2006
South Asia	Karnataka	Gowda	Dravidian		4	0.25	Sahoo et al. 2006
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	0.25	Sengupta et al. 2006
South Asia	West Bengal	Lodha	Austro-Asiatic		4	0.25	Sahoo et al. 2006
South Asia	Orissa	Ho	Austro-Asiatic		79	0.25	Kumar et al. 2007
South Asia	Jharkhand; West Bengal; Orissa	Munda	Austro-Asiatic		53	0.25	Kumar et al. 2007
South Asia	Orissa	Gope	Indo-European	Indo-Aryan	16	0.25	Sahoo and Kashyap 2006
South Asia	Tamil Nadu	Sourashtra	Indo-European	Indo-Aryan	40	0.25	Arunkumar et al. 2012
South Asia	Karnataka India	Lingayat	Dravidian		101	0.25	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu	Yadhava	Dravidian		107	0.24	Arunkumar et al. 2012
South Asia	Jharkhand; West Bengal; Orissa	Birhor	Austro-Asiatic		38	0.24	Kumar et al. 2007
South Asia	South India	Vanniyar	Dravidian		25	0.24	Sengupta et al. 2006
South Asia	Karnataka India	Vokkaliga	Dravidian		102	0.24	Chennakrishnaiah et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Orissa	Khandayat	Indo-European	Indo-Aryan	13	0.23	Sahoo and Kashyap 2006
South Asia	Orissa	Khandayat	Indo-European	Indo-Aryan	13	0.23	Sahoo et al. 2006
South Asia	Tamil Nadu	Piramalai Kallar	Dravidian		53	0.23	Arunkumar et al. 2012
South Asia	Tamil Nadu	Mullukurumba	Dravidian		9	0.22	Cordaux et al. 2004a
South Asia	Chattisgarh	Pando	Indo-European	Indo-Aryan	23	0.22	Kumar et al. 2007
South Asia	Jharkhand	Asur	Austro-Asiatic		55	0.22	Kumar et al. 2007
South Asia	Tamil Nadu	Parayar	Dravidian		24	0.21	Arunkumar et al. 2012
Eastern Europe	Tokaj, Hungary	Roma	Indo-European	Indo-Aryan	39	0.21	Pamjav et al. 2011
South Asia	Karnataka	Kuruva	Dravidian		10	0.20	Sahoo et al. 2006
South Asia	Tamil Nadu	Brahacharanam	Indo-European	Indo-Aryan	21	0.20	Arunkumar et al. 2012
South Asia	Tamil Nadu	Vanniyar NTN	Dravidian		96	0.20	Arunkumar et al. 2012
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	0.20	Di Cristofaro et al. 2013
South Asia	Uttar Pradesh	Bhoksha	Indo-European	Indo-Aryan	10	0.20	Sahoo et al. 2006
South Asia	Uttar Pradesh	Kanyakubj Brahmins	Indo-European	Indo-Aryan	10	0.20	Sahoo et al. 2006
South Asia	North Pakistan	Pathans	Indo-European	Iranian	20	0.20	Sengupta et al. 2006
South Asia	Tamil Nadu	Valayar	Dravidian		95	0.20	Arunkumar et al. 2012
South Asia	Andra Pradesh	Brahmin	Dravidian		15	0.20	Sahoo et al. 2006
South Asia	Tamil Nadu	Pallar	Dravidian		51	0.20	Arunkumar et al. 2012
South Asia	Andra Pradesh	Vizag Brahmins	Dravidian		41	0.20	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Southern India	Yerava	Dravidian		41	0.20	Cordaux et al. 2004a
South Asia	Orissa	Saora	Austro-Asiatic		21	0.19	Sahoo and Kashyap 2006
South Asia	Maharastra	Desasth Brahmin	Indo-European	Indo-Aryan	16	0.19	Sahoo et al. 2006
South Asia	Tamil Nadu	Yadhava	Dravidian		129	0.19	Cordaux et al. 2004a; Wells et al. 2001

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	Maharashtra	Mahadeo Koli	Indo-European	Indo-Aryan	50	0.18	Thangaraj et al. 2010
South Asia	West Bengal	Kharia	Austro-Asiatic		34	0.18	Debnath et al. 2011
South Asia	South India	Pallan	Dravidian		29	0.17	Sengupta et al. 2006
South Asia	Northern India	Rajput	Indo-European	Indo-Aryan	29	0.17	Sengupta et al. 2006
South Asia	Tamil Nadu	Maravar	Dravidian		80	0.17	Arunkumar et al. 2012
South Asia	Tamil Nadu	Pulayar	Dravidian		63	0.17	Arunkumar et al. 2012
South Asia	East India	Ho	Austro-Asiatic		30	0.17	Sengupta et al. 2006
South Asia	Uttar Pradesh	Bhargavas	Indo-European	Indo-Aryan	96	0.17	Zhao et al. 2009
South Asia	Orissa	Karan	Indo-European	Indo-Aryan	18	0.17	Sahoo and Kashyap 2006
South Asia	Andra Pradesh	Andh	Indo-European	Indo-Aryan	54	0.17	Thanseem et al. 2006
South Asia	Uttar Pradesh	Bhargavas	Indo-European	Indo-Aryan	96	0.17	Zhao et al. 2009
South Asia	West Bengal	Bengali	Indo-European	Indo-Aryan	54	0.17	Debnath et al. 2011
Western Europe	Portugal	Roma	Indo-European	Indo-Aryan	126	0.17	Gusmao et al. 2008
South Asia	Orissa	Karan	Indo-European	Indo-Aryan	18	0.17	Sahoo et al. 2006
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	45	0.16	Borkar et al. 2011
South Asia	Uttar Pradesh	Brahmin	Indo-European	Indo-Aryan	31	0.16	Sharma et al. 2009
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	57	0.16	Fornarino et al. 2009
South Asia	Gujarat	Valvi Chaudhari	Indo-European	Indo-Aryan	32	0.16	Khurana et al. 2014
South Asia	Tamil Nadu	Kallar	Dravidian		84	0.15	Cordaux et al. 2004a; Wells et al. 2001
South Asia	Orissa	Saora	Austro-Asiatic		13	0.15	Sahoo et al. 2006
South Asia	West Bengal	Rabha	Sino-Tibetan	Tibeto-Burman	26	0.15	Debnath et al. 2011
South Asia	Tamil Nadu	Sourashtran	Indo-European	Indo-Aryan	46	0.15	Cordaux et al. 2004a; Wells et al. 2001
South Asia	Tamil Nadu	Nadar Cape	Dravidian		98	0.15	Arunkumar et al. 2012
South Asia	Pakistan	Burusho	Isolate		20	0.15	Di Cristofaro et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	West Bengal	Lodha	Austro-Asiatic		47	0.15	Kumar et al. 2007
South Asia	North Pakistan	Burusho	Isolate		20	0.15	Sengupta et al. 2006
South Asia	Bihar	Bhumihar	Indo-European	Indo-Aryan	20	0.15	Sahoo et al. 2006
South Asia	Bihar	Paswan	Indo-European	Indo-Aryan	27	0.15	Sharma et al. 2009
South Asia	Tamil Nadu	Paravar	Dravidian		27	0.15	Arunkumar et al. 2012
South Asia	Kerala	Kurichiya	Dravidian		14	0.14	Cordaux et al. 2004a
South Asia	Kerala	Panyia	Dravidian		7	0.14	Cordaux et al. 2004a
South Asia	Tamil Nadu	Paliyan	Dravidian		95	0.14	Arunkumar et al. 2012
South Asia	Gujarat	Gujarati	Indo-European	Indo-Aryan	29	0.14	Kivisild et al. 2003
Central Asia	Afghanistan	Hazara-Bamiyan	Indo-European	Iranian	69	0.13	Di Cristofaro et al. 2013
South Asia	Morang, Nepal	Tharu	Indo-European	Indo-Aryan	37	0.13	Fornarino et al. 2009
South Asia	Bihar	Yadav	Indo-European	Indo-Aryan	8	0.13	Sahoo et al. 2006
South Asia	Andra Pradesh	Valmiki	Dravidian		24	0.13	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Tamil Nadu	Thoda	Dravidian		26	0.12	Arunkumar et al. 2012
South Asia	Tamil Nadu	Betta Kurumba	Dravidian		17	0.12	Arunkumar et al. 2012
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	0.12	Sengupta et al. 2006
South Asia	Uttar Pradesh	Brahmins	Indo-European	Indo-Aryan	118	0.12	Zhao et al. 2009
South Asia	Uttar Pradesh	Brahmins	Indo-European	Indo-Aryan	118	0.12	Zhao et al. 2009
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	51	0.12	Debnath et al. 2011
South Asia	West Bengal	Mahishiya	Indo-European	Indo-Aryan	17	0.12	Sahoo et al. 2006
South Asia	Himachal	Brahmin	Indo-European	Indo-Aryan	30	0.11	Sharma et al. 2009
South Asia	Tamil Nadu	Vadama	Indo-European	Indo-Aryan	63	0.11	Arunkumar et al. 2012
South Asia	Uttar Pradesh	Kols	Austro-Asiatic		30	0.11	Sharma et al. 2009
South Asia	Orissa	Bhuiyan	Indo-European	Indo-Aryan	81	0.11	Kumar et al. 2007

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
Central Asia	Afghanistan	Tajik-Badakhshan	Indo-European	Iranian	37	0.11	Di Cristofaro et al. 2013
Eastern Europe	Taktakoz, Hungary	Roma	Indo-European	Indo-Aryan	19	0.11	Pamjav et al. 2011
South Asia	Sri Lanka	Sinhalese	Indo-European	Indo-Aryan	39	0.10	Kivisild et al. 2003
South Asia	Andra Pradesh	Komati	Dravidian		20	0.10	Sahoo et al. 2006
South Asia	Kashmir	Pandits	Indo-European	Indo-Aryan	51	0.10	Sharma et al. 2009
South Asia	East India	Agharia	Austro-Asiatic		10	0.10	Sengupta et al. 2006
South Asia	Jharkhand	Kharia	Austro-Asiatic		10	0.10	Sahoo et al. 2006
South Asia	Maharashtra	Brahmin	Indo-European	Indo-Aryan	32	0.10	Sharma et al. 2009
South Asia	Kashmir	Gujars	Indo-European	Indo-Aryan	49	0.10	Sharma et al. 2009
South Asia	South India	Iyengar	Dravidian		30	0.10	Sengupta et al. 2006
South Asia	Andra Pradesh	Poroja	Dravidian		20	0.10	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Pakistan	Pathans	Indo-European	Iranian	20	0.10	Di Cristofaro et al. 2013
South Asia	Bombay	Konkani Brahmins	Indo-European	Indo-Aryan	43	0.09	Kivisild et al. 2003
South Asia	Sikkim	Lachungpa	Sino-Tibetan	Tibeto-Burman	11	0.09	Debnath et al. 2011
South Asia	Northeast India	Apatani	Sino-Tibetan	Tibeto-Burman	33	0.09	Cordaux et al. 2004b
South Asia	Meghalaya	Garo	Sino-Tibetan	Tibeto-Burman	33	0.09	Kumar et al. 2007
South Asia	Tamil Nadu	Iyengar	Indo-European	Indo-Aryan	11	0.09	Arunkumar et al. 2012
Central Asia	Afghanistan	Pashtun-Baghlan	Indo-European	Iranian	34	0.09	Di Cristofaro et al. 2013
South Asia	Andra Pradesh	Bagata	Dravidian		23	0.09	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Orissa	Brahmin	Indo-European	Indo-Aryan	23	0.09	Sahoo and Kashyap 2006
South Asia	Andhra Pradesh	Banjara (Lambadi)	Indo-European	Iranian	35	0.09	Kivisild et al. 2003

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
Central Asia	Afghanistan	Tajik-Takhar	Indo-European	Iranian	35	0.09	Di Cristofaro et al. 2013
South Asia	West Bengal	Dhimal	Sino-Tibetan	Tibeto-Burman	36	0.08	Debnath et al. 2011
South Asia	Bihar	Rajput	Indo-European	Indo-Aryan	12	0.08	Sahoo et al. 2006
East Asia	Xingjiang	Uyгур	Turkic		48	0.08	Zhong et al. 2011
South Asia	Orissa	Oriya Brahmin	Indo-European	Indo-Aryan	24	0.08	Sahoo et al. 2006
South Asia	Maharashtra	Thakur	Indo-European	Indo-Aryan	48	0.08	Thangaraj et al. 2010
South Asia	Maharashtra	Korku	Austro-Asiatic		59	0.08	Kumar et al. 2007
Central Asia	Afghanistan	Pashtun-Kunduz	Indo-European	Iranian	53	0.08	Di Cristofaro et al. 2013
South Asia	Northern India	Uttar Pradesh Brahmin	Indo-European	Indo-Aryan	14	0.07	Sengupta et al. 2006
Central Asia	Uzbekistan-Karakalpakstan	Turkmen	Turkic		83	0.07	Zhabagin et al. 2017
South Asia	Madhya Pradesh	Brahmin	Indo-European	Indo-Aryan	42	0.07	Sharma et al. 2009
South Asia	Khasi Hills; Jaintia Hills; Meghalaya	Khasi	Austro-Asiatic		92	0.07	Kumar et al. 2007
South Asia	South India	Iyer	Dravidian		29	0.07	Sengupta et al. 2006
South Asia	Gujarat	Pavagadhi Chaudhari	Indo-European	Indo-Aryan	29	0.07	Khurana et al. 2014
South Asia	Uttar Pradesh	Chaturvedis	Indo-European	Indo-Aryan	88	0.07	Zhao et al. 2009
South Asia	Uttar Pradesh	Chaturvedis	Indo-European	Indo-Aryan	88	0.07	Zhao et al. 2009
South Asia	Andra Pradesh	Kamma Chaudhary	Dravidian		15	0.07	Sahoo et al. 2006
Central Asia	Afghanistan	Tajik-Samangan	Indo-European	Iranian	16	0.06	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtun	Indo-European	Iranian	49	0.06	Haber et al. 2012
Middle East	Iran-Mazandaran	Mazandarani	Indo-European	Iranian	72	0.06	Grugni et al. 2012
South Asia	West Bengal	Brahmin	Indo-European	Indo-Aryan	30	0.06	Sharma et al. 2009
South Asia	Andra Pradesh	Lambadi	Indo-European	Iranian	18	0.06	Sahoo et al. 2006

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
South Asia	East India	West Bengal Brahmin	Indo-European	Indo-Aryan	18	0.06	Sengupta et al. 2006
Central Asia	Afghanistan	Pashtun	Indo-European	Iranian	56	0.05	Haber et al. 2012
South Asia	Sikkim	Lachung	Sino-Tibetan	Tibeto-Burman	20	0.05	Borkar et al. 2011
South Asia	Tamil Nadu	Vanniyar	Dravidian		21	0.05	Arunkumar et al. 2012
East Asia	Guangxi	Hui	Sino-Tibetan	Chinese	62	0.05	Zhong et al. 2011
South Asia	Punjab	Punjabi	Indo-European	Indo-Aryan	66	0.05	Kivisild et al. 2003
Central Asia	Afghanistan	Uzbek-Jawzjan	Turkic		94	0.04	Di Cristofaro et al. 2013
East Asia	Xingjiang	Uygur	Turkic		71	0.04	Zhong et al. 2011
South Asia	Pakistan	Burusho	Isolate		97	0.04	Firasat et al. 2007
Central Asia	Uzbekistan-Tashkent	Uzbeks	Turkic		52	0.04	Zhabagin et al. 2017
South Asia	Pakistan	Balochi	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
South Asia	Pakistan	Brahui	Dravidian		25	0.04	Di Cristofaro et al. 2013
South Asia	Jharkhand	Ho	Austro-Asiatic		28	0.04	Borkar et al. 2011
South Asia	South Pakistan	Brahui	Dravidian		25	0.04	Sengupta et al. 2006
South Asia	South Pakistan	Balochi	Indo-European	Iranian	25	0.04	Sengupta et al. 2006
South Asia	Northeast India	Mizo	Sino-Tibetan	Tibeto-Burman	27	0.04	Sengupta et al. 2006
South Asia	South India	Koya Dora	Dravidian		27	0.04	Sengupta et al. 2006
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.03	Haber et al. 2012
South Asia	South India	Konda Reddy	Dravidian		30	0.03	Sengupta et al. 2006
South Asia	Northeast India	Jamatia	Sino-Tibetan	Tibeto-Burman	30	0.03	Sengupta et al. 2006
South Asia	Pakistan	Pathan	Indo-European	Iranian	96	0.03	Firasat et al. 2007
South Asia	Jharkhand	Santhal	Austro-Asiatic		90	0.03	Borkar et al. 2011

Region	Location	Population	Lang Fam	Branch	Sample Size	Frequency Hg H	Reference
Middle East	Iran-Khorasan	Persians	Indo-European	Iranian	59	0.03	Grugni et al. 2012
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	44	0.03	Firasat et al. 2007
Central Asia	Kyrgyzstan	Kyrgyz-NorthWest	Turkic		37	0.03	Di Cristofaro et al. 2013
South Asia	Andra Pradesh	Kammas	Dravidian		40	0.03	Cordaux et al. 2004a; Ramana et al. 2001
Central Asia	Tajikistan	Tajiks	Indo-European	Iranian	40	0.03	Malyarchuck et al. 2013
East Asia	Ningxia	Jing	Austro-Asiatic		45	0.02	Zhong et al. 2011
Central Asia	Kazakhstan-Shymkent	Kazakhs	Turkic		55	0.02	Zhabagin et al. 2017
Middle East	Iran-Fars+Isfahan	Persians	Indo-European	Iranian	55	0.02	Grugni et al. 2012
Middle East	Iran-Gilan	Gilaki	Indo-European	Iranian	64	0.02	Grugni et al. 2012
South Asia	Gujarat	Brahmin	Indo-European	Indo-Aryan	64	0.02	Sharma et al. 2009
South Asia	Northeast India	Nishi	Sino-Tibetan	Tibeto-Burman	51	0.02	Cordaux et al. 2004b
East Asia	Xingjiang	Hazak	Turkic		53	0.02	Zhong et al. 2011
South Asia	Northeast India	Adi	Sino-Tibetan	Tibeto-Burman	55	0.02	Cordaux et al. 2004b
Middle East	Iran-Golestan	Turkmen	Turkic		68	0.01	Grugni et al. 2012

Supplementary Table 8.2. Survey of H-M69 in Pakistan.

Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
North Pakistan	Pathans	Indo-European	Iranian	20	0.20	Sengupta et al. 2006
Pakistan	Kalash	Indo-European	Indo-Aryan	20	0.20	Di Cristofaro et al. 2013
North Pakistan	Burusho	Isolate		20	0.15	Sengupta et al. 2006
Pakistan	Burusho	Isolate		20	0.15	Di Cristofaro et al. 2013
Pakistan	Pathans	Indo-European	Iranian	20	0.10	Di Cristofaro et al. 2013
Pakistan	Burusho	Isolate		97	0.04	Firasat et al. 2007
South Pakistan	Brahui	Dravidian		25	0.04	Sengupta et al. 2006
South Pakistan	Balochi	Indo-European	Iranian	25	0.04	Sengupta et al. 2006
Pakistan	Brahui	Dravidian		25	0.04	Di Cristofaro et al. 2013
Pakistan	Balochi	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
Pakistan	Pathan	Indo-European	Iranian	96	0.03	Firasat et al. 2007
Pakistan	Kalash	Indo-European	Indo-Aryan	44	0.03	Firasat et al. 2007

Supplementary Table 8.3. H-M69 and India.

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Karnataka	Koraga	Dravidian		33	0.88	Cordaux et al. 2004a
South Asia	Central India	Muria	Dravidian		20	0.80	Sengupta et al. 2006
South Asia	West Bengal	Oraon	Dravidian		31	0.71	Debnath et al. 2011
South Asia	Andhra Pradesh	Koya	Dravidian		41	0.71	Kivisild et al. 2003
South Asia	Tamil Nadu	Kurumba	Dravidian		35	0.69	Arunkumar et al. 2012
South Asia	Gujarat	Mota Chaudhari	Indo-European	Indo-Aryan	27	0.67	Khurana et al. 2014
South Asia	Gujarat	Vasava	Indo-European	Indo-Aryan	24	0.63	Khurana et al. 2014
South Asia	Madhya Pradesh	Gonds	Dravidian		31	0.62	Sharma et al. 2009
South Asia	Gujarat	Nana Chaudhari	Indo-European	Indo-Aryan	25	0.60	Khurana et al. 2014
South Asia	Uttar Pradesh	Gonds	Dravidian		38	0.59	Sharma et al. 2009
South Asia	Tamil Nadu	Kattunaickan	Dravidian		46	0.58	Arunkumar et al. 2012
South Asia	Jharkhand; Chattisgarh	Oraon	Dravidian		91	0.57	Kumar et al. 2007
South Asia	South India	Ambalakarar	Dravidian		29	0.48	Sengupta et al. 2006
South Asia	Gujarat	Dubla	Indo-European	Indo-Aryan	42	0.48	Khurana et al. 2014
South Asia	Jharkhand	Oraon	Dravidian		110	0.45	Borkar et al. 2011
South Asia	Central India	Kamar	Dravidian		30	0.43	Sengupta et al. 2006
South Asia	West Bengal	Santhal	Austro-Asiatic		51	0.43	Debnath et al. 2011
South Asia	Jharkhand; West Bengal	Mudi	Austro-Asiatic		37	0.43	Kumar et al. 2007
South Asia	West Bengal	Kol	Austro-Asiatic		62	0.42	Debnath et al. 2011
South Asia	South India	Irula	Dravidian		30	0.40	Sengupta et al. 2006

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Jharkhand; West Bengal	Mahali	Austro-Asiatic		25	0.40	Kumar et al. 2007
South Asia	Jharkhand; West Bengal	Santhal	Austro-Asiatic		109	0.39	Kumar et al. 2007
South Asia	Orissa	Bathudi	Indo-European	Indo-Aryan	36	0.39	Kumar et al. 2007
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	77	0.39	Fornarino et al. 2009
South Asia	Tamil Nadu	Parayar NTN	Dravidian		52	0.39	Arunkumar et al. 2012
South Asia	Andhra Pradesh	Chenchu	Dravidian		41	0.37	Kivisild et al. 2003
South Asia	Tamil Nadu	Irula	Dravidian		80	0.36	Arunkumar et al. 2012
South Asia	Jharkhand	Pahariya	Indo-European	Indo-Aryan	100	0.35	Borkar et al. 2011
South Asia	Jharkhand	Munda	Austro-Asiatic		94	0.34	Borkar et al. 2011
South Asia	Tamil Nadu	Mullukurumba	Dravidian		29	0.34	Arunkumar et al. 2012
South Asia	Gujarat	Dhodia	Indo-European	Indo-Aryan	63	0.33	Khurana et al. 2014
South Asia	Central India	Halba	Indo-European	Indo-Aryan	21	0.33	Sengupta et al. 2006
South Asia	Tamil Nadu	Kota	Dravidian		62	0.33	Arunkumar et al. 2012
South Asia	Jharkhand; West Bengal; Orissa	Kharia	Austro-Asiatic		36	0.33	Kumar et al. 2007
South Asia	Madhya Pradesh	Saharia	Indo-European	Indo-Aryan	57	0.33	Sharma et al. 2009
South Asia	Jharkhand; Chattisgarh	Korwa	Austro-Asiatic		42	0.33	Kumar et al. 2007
South Asia	Andra Pradesh	Naikpod	Dravidian		68	0.32	Thanseem et al. 2006
South Asia	Tamil Nadu	Kadar	Dravidian		28	0.32	Arunkumar et al. 2012

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Jharkhand; West Bengal; Orissa	Savar	Austro-Asiatic		47	0.32	Kumar et al. 2007
South Asia	East India	Lodha	Austro-Asiatic		20	0.30	Sengupta et al. 2006
South Asia	Tamil Nadu	Ezhava	Dravidian		95	0.30	Arunkumar et al. 2012
South Asia	Gujarat	Konkana	Indo-European	Indo-Aryan	24	0.29	Khurana et al. 2014
South Asia	South India	Vellalar	Dravidian		31	0.29	Sengupta et al. 2006
South Asia	Tamil Nadu	Nadar TNV	Dravidian		59	0.29	Arunkumar et al. 2012
South Asia	Chattisgarh	Kanwar	Indo-European	Indo-Aryan	41	0.29	Kumar et al. 2007
South Asia	Jharkhand	Birhor	Austro-Asiatic		100	0.28	Borkar et al. 2011
South Asia	Tamil Nadu	Tamil Jains	Dravidian		100	0.28	Arunkumar et al. 2012
South Asia	Jharkhand; West Bengal	Bhumij	Austro-Asiatic		89	0.27	Kumar et al. 2007
South Asia	Gujarat	Bhils	Indo-European	Indo-Aryan	22	0.27	Sharma et al. 2009
South Asia	Andra Pradesh	Pardhan	Dravidian		128	0.26	Thanseem et al. 2006
South Asia	Orissa	Ho	Austro-Asiatic		79	0.25	Kumar et al. 2007
South Asia	Tamil Nadu	Sourashtra	Indo-European	Indo-Aryan	40	0.25	Arunkumar et al. 2012
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	0.25	Sengupta et al. 2006
South Asia	Jharkhand; West Bengal; Orissa	Munda	Austro-Asiatic		53	0.25	Kumar et al. 2007
South Asia	Karnataka India	Lingayat	Dravidian		101	0.25	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu	Yadhava	Dravidian		107	0.24	Arunkumar et al. 2012
South Asia	South India	Vanniyar	Dravidian		25	0.24	Sengupta et al. 2006

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Jharkhand; West Bengal; Orissa	Birhor	Austro-Asiatic		38	0.24	Kumar et al. 2007
South Asia	Karnataka India	Vokkaliga	Dravidian		102	0.24	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu	Piramalai Kallar	Dravidian		53	0.23	Arunkumar et al. 2012
South Asia	Jharkhand	Asur	Austro-Asiatic		55	0.22	Kumar et al. 2007
South Asia	Chattisgarh	Pando	Indo-European	Indo-Aryan	23	0.22	Kumar et al. 2007
South Asia	Tamil Nadu	Parayar	Dravidian		24	0.21	Arunkumar et al. 2012
South Asia	Tamil Nadu	Brahacharanam	Indo-European	Indo-Aryan	21	0.20	Arunkumar et al. 2012
South Asia	Tamil Nadu	Vanniyar NTN	Dravidian		96	0.20	Arunkumar et al. 2012
South Asia	Tamil Nadu	Valayar	Dravidian		95	0.20	Arunkumar et al. 2012
South Asia	Tamil Nadu	Pallar	Dravidian		51	0.20	Arunkumar et al. 2012
South Asia	Southern India	Yerava	Dravidian		41	0.20	Cordaux et al. 2004a
South Asia	Andra Pradesh	Vizag Brahmins	Dravidian		41	0.20	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Orissa	Saora	Austro-Asiatic		21	0.19	Sahoo and Kashyap 2006
South Asia	Tamil Nadu	Yadhava	Dravidian		129	0.19	Cordaux et al. 2004a; Wells et al. 2001
South Asia	Maharashtra	Mahadeo Koli	Indo-European	Indo-Aryan	50	0.18	Thangaraj et al. 2010
South Asia	West Bengal	Kharia	Austro-Asiatic		34	0.18	Debnath et al. 2011
South Asia	Northern India	Rajput	Indo-European	Indo-Aryan	29	0.17	Sengupta et al. 2006
South Asia	South India	Pallan	Dravidian		29	0.17	Sengupta et al. 2006
South Asia	Tamil Nadu	Maravar	Dravidian		80	0.17	Arunkumar et al. 2012
South Asia	Tamil Nadu	Pulayar	Dravidian		63	0.17	Arunkumar et al. 2012
South Asia	Uttar Pradesh	Bhargavas	Indo-European	Indo-Aryan	96	0.17	Zhao et al. 2009
South Asia	East India	Ho	Austro-Asiatic		30	0.17	Sengupta et al. 2006

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Andra Pradesh	Andh	Indo-European	Indo-Aryan	54	0.17	Thanseem et al. 2006
South Asia	Uttar Pradesh	Bhargavas	Indo-European	Indo-Aryan	96	0.17	Zhao et al. 2009
South Asia	West Bengal	Bengali	Indo-European	Indo-Aryan	54	0.17	Debnath et al. 2011
South Asia	Uttar Pradesh	Brahmin	Indo-European	Indo-Aryan	31	0.16	Sharma et al. 2009
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	57	0.16	Fornarino et al. 2009
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	45	0.16	Borkar et al. 2011
South Asia	Gujarat	Valvi Chaudhari	Indo-European	Indo-Aryan	32	0.16	Khurana et al. 2014
South Asia	Tamil Nadu	Kallar	Dravidian		84	0.15	Cordaux et al. 2004a; Wells et al. 2001
South Asia	West Bengal	Rabha	Sino-Tibetan	Tibeto-Burman	26	0.15	Debnath et al. 2011
South Asia	Tamil Nadu	Sourashtran	Indo-European	Indo-Aryan	46	0.15	Cordaux et al. 2004a; Wells et al. 2001
South Asia	Tamil Nadu	Nadar Cape	Dravidian		98	0.15	Arunkumar et al. 2012
South Asia	Bihar	Paswan	Indo-European	Indo-Aryan	27	0.15	Sharma et al. 2009
South Asia	Tamil Nadu	Paravar	Dravidian		27	0.15	Arunkumar et al. 2012
South Asia	West Bengal	Lodha	Austro-Asiatic		47	0.15	Kumar et al. 2007
South Asia	Bihar	Bhumihar	Indo-European	Indo-Aryan	20	0.15	Sahoo et al. 2006
South Asia	Tamil Nadu	Paliyan	Dravidian		95	0.14	Arunkumar et al. 2012
South Asia	Gujarat	Gujarati	Indo-European	Indo-Aryan	29	0.14	Kivisild et al. 2003
South Asia	Andra Pradesh	Valmiki	Dravidian		24	0.13	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	0.12	Sengupta et al. 2006
South Asia	Tamil Nadu	Thoda	Dravidian		26	0.12	Arunkumar et al. 2012
South Asia	Uttar Pradesh	Brahmins	Indo-European	Indo-Aryan	118	0.12	Zhao et al. 2009
South Asia	Uttar Pradesh	Brahmins	Indo-European	Indo-Aryan	118	0.12	Zhao et al. 2009

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	51	0.12	Debnath et al. 2011
South Asia	Orissa	Bhuiyan	Indo-European	Indo-Aryan	81	0.11	Kumar et al. 2007
South Asia	Tamil Nadu	Vadama	Indo-European	Indo-Aryan	63	0.11	Arunkumar et al. 2012
South Asia	Uttar Pradesh	Kols	Austro-Asiatic		30	0.11	Sharma et al. 2009
South Asia	Himachal	Brahmin	Indo-European	Indo-Aryan	30	0.11	Sharma et al. 2009
South Asia	Andra Pradesh	Komati	Dravidian		20	0.10	Sahoo et al. 2006
South Asia	Kashmir	Pandits	Indo-European	Indo-Aryan	51	0.10	Sharma et al. 2009
South Asia	Kashmir	Gujars	Indo-European	Indo-Aryan	49	0.10	Sharma et al. 2009
South Asia	Andra Pradesh	Poroja	Dravidian		20	0.10	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Maharashtra	Brahmin	Indo-European	Indo-Aryan	32	0.10	Sharma et al. 2009
South Asia	South India	Iyengar	Dravidian		30	0.10	Sengupta et al. 2006
South Asia	Bombay	Konkani Brahmins	Indo-European	Indo-Aryan	43	0.09	Kivisild et al. 2003
South Asia	Northeast India	Apatani	Sino-Tibetan	Tibeto-Burman	33	0.09	Cordaux et al. 2004b
South Asia	Meghalaya	Garo	Sino-Tibetan	Tibeto-Burman	33	0.09	Kumar et al. 2007
South Asia	Orissa	Brahmin	Indo-European	Indo-Aryan	23	0.09	Sahoo and Kashyap 2006
South Asia	Andra Pradesh	Bagata	Dravidian		23	0.09	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Andhra Pradesh	Banjara (Lambadi)	Indo-European	Iranian	35	0.09	Kivisild et al. 2003
South Asia	West Bengal	Dhimal	Sino-Tibetan	Tibeto-Burman	36	0.08	Debnath et al. 2011
South Asia	Orissa	Oriya Brahmin	Indo-European	Indo-Aryan	24	0.08	Sahoo et al. 2006
South Asia	Maharashtra	Korku	Austro-Asiatic		59	0.08	Kumar et al. 2007

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Maharashtra	Thakur	Indo-European	Indo-Aryan	48	0.08	Thangaraj et al. 2010
South Asia	Khasi Hills; Jaintia Hills; Meghalaya	Khasi	Austro-Asiatic		92	0.07	Kumar et al. 2007
South Asia	Madhya Pradesh	Brahmin	Indo-European	Indo-Aryan	42	0.07	Sharma et al. 2009
South Asia	Gujarat	Pavagadhi Chaudhari	Indo-European	Indo-Aryan	29	0.07	Khurana et al. 2014
South Asia	South India	Iyer	Dravidian		29	0.07	Sengupta et al. 2006
South Asia	Uttar Pradesh	Chaturvedis	Indo-European	Indo-Aryan	88	0.07	Zhao et al. 2009
South Asia	Uttar Pradesh	Chaturvedis	Indo-European	Indo-Aryan	88	0.07	Zhao et al. 2009
South Asia	West Bengal	Brahmin	Indo-European	Indo-Aryan	30	0.06	Sharma et al. 2009
South Asia	Tamil Nadu	Vanniyar	Dravidian		21	0.05	Arunkumar et al. 2012
South Asia	Sikkim	Lachung	Sino-Tibetan	Tibeto-Burman	20	0.05	Borkar et al. 2011
South Asia	Punjab	Punjabi	Indo-European	Indo-Aryan	66	0.05	Kivisild et al. 2003
South Asia	Jharkhand	Ho	Austro-Asiatic		28	0.04	Borkar et al. 2011
South Asia	South India	Koya Dora	Dravidian		27	0.04	Sengupta et al. 2006
South Asia	Northeast India	Mizo	Sino-Tibetan	Tibeto-Burman	27	0.04	Sengupta et al. 2006
South Asia	South India	Konda Reddy	Dravidian		30	0.03	Sengupta et al. 2006
South Asia	Northeast India	Jamatia	Sino-Tibetan	Tibeto-Burman	30	0.03	Sengupta et al. 2006
South Asia	Jharkhand	Santhal	Austro-Asiatic		90	0.03	Borkar et al. 2011
South Asia	Andra Pradesh	Kammas	Dravidian		40	0.03	Cordaux et al. 2004a; Ramana et al. 2001
South Asia	Gujarat	Brahmin	Indo-European	Indo-Aryan	64	0.02	Sharma et al. 2009

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
South Asia	Northeast India	Nishi	Sino-Tibetan	Tibeto-Burman	51	0.02	Cordaux et al. 2004b
South Asia	Northeast India	Adi	Sino-Tibetan	Tibeto-Burman	55	0.02	Cordaux et al. 2004b

Supplementary Table 8.4. Indo-European Populations of South Asia and H-M69.

Population	Location	Branch	Sample Size	No. H-M69	Freq. H-M69	Reference
Mota Chaudhari	Gujarat	Indo-Aryan	27	18	0.67	Khurana et al. 2014
Vasava	Gujarat	Indo-Aryan	24	15	0.63	Khurana et al. 2014
Nana Chaudhari	Gujarat	Indo-Aryan	25	15	0.60	Khurana et al. 2014
Dubla	Gujarat	Indo-Aryan	42	20	0.48	Khurana et al. 2014
Tharu	Chitwan, Nepal	Indo-Aryan	77	30	0.39	Fornarino et al. 2009
Bathudi	Orissa	Indo-Aryan	36	14	0.39	Kumar et al. 2007
Pahariya	Jharkhand	Indo-Aryan	100	35	0.35	Borkar et al. 2011
Dhodia	Gujarat	Indo-Aryan	63	21	0.33	Khurana et al. 2014
Halba	Central India	Indo-Aryan	21	7	0.33	Sengupta et al. 2006
Saharia	Madhya Pradesh	Indo-Aryan	57	19	0.33	Sharma et al. 2009
Konkana	Gujarat	Indo-Aryan	24	7	0.29	Khurana et al. 2014
Kanwar	Chattisgarh	Indo-Aryan	41	12	0.29	Kumar et al. 2007
Bhils	Gujarat	Indo-Aryan	22	6	0.27	Sharma et al. 2009
Sourashtra	Tamil Nadu	Indo-Aryan	40	10	0.25	Arunkumar et al. 2012
Maratha	West India	Indo-Aryan	20	5	0.25	Sengupta et al. 2006
Pando	Chattisgarh	Indo-Aryan	23	5	0.22	Kumar et al. 2007
Brahacharanam	Tamil Nadu	Indo-Aryan	21	4	0.20	Arunkumar et al. 2012
Pathans	North Pakistan	Iranian	20	4	0.20	Sengupta et al. 2006
Kalash	Pakistan	Indo-Aryan	20	4	0.20	Di Cristofaro et al. 2013
Mahadeo Koli	Maharashtra	Indo-Aryan	50	9	0.18	Thangaraj et al. 2010
Rajput	Northern India	Indo-Aryan	29	5	0.17	Sengupta et al. 2006
Bengali	West Bengal	Indo-Aryan	54	9	0.17	Debnath et al. 2011
Bhargavas	Uttar Pradesh	Indo-Aryan	96	16	0.17	Zhao et al. 2009

Population	Location	Branch	Sample Size	No. H-M69	Freq. H-M69	Reference
Bhargavas	Uttar Pradesh	Indo-Aryan	96	16	0.17	Zhao et al. 2009
Andh	Andra Pradesh	Indo-Aryan	54	9	0.17	Thanseem et al. 2006
Rajbanshi	West Bengal	Indo-Aryan	45	7	0.16	Borkar et al. 2011
Tharu	Chitwan, Nepal	Indo-Aryan	57	9	0.16	Fornarino et al. 2009
Brahmin	Uttar Pradesh	Indo-Aryan	31	5	0.16	Sharma et al. 2009
Valvi Chaudhari	Gujarat	Indo-Aryan	32	5	0.16	Khurana et al. 2014
Sourashtran	Tamil Nadu	Indo-Aryan	46	7	0.15	Cordaux et al. 2004a; Wells et al. 2001
Bhumihar	Bihar	Indo-Aryan	20	3	0.15	Sahoo et al. 2006
Paswan	Bihar	Indo-Aryan	27	4	0.15	Sharma et al. 2009
Gujarati	Gujarat	Indo-Aryan	29	4	0.14	Kivisild et al. 2003
Tharu	Morang, Nepal	Indo-Aryan	37	5	0.13	Fornarino et al. 2009
Koknasth Brahmin	West India	Indo-Aryan	25	3	0.12	Sengupta et al. 2006
Brahmins	Uttar Pradesh	Indo-Aryan	118	14	0.12	Zhao et al. 2009
Brahmins	Uttar Pradesh	Indo-Aryan	118	14	0.12	Zhao et al. 2009
Rajbanshi	West Bengal	Indo-Aryan	51	6	0.12	Debnath et al. 2011
Bhuiyan	Orissa	Indo-Aryan	81	9	0.11	Kumar et al. 2007
Brahmin	Himachal	Indo-Aryan	30	3	0.11	Sharma et al. 2009
Vadama	Tamil Nadu	Indo-Aryan	63	7	0.11	Arunkumar et al. 2012
Sinhalese	Sri Lanka	Indo-Aryan	39	4	0.10	Kivisild et al. 2003
Brahmin	Maharashtra	Indo-Aryan	32	3	0.10	Sharma et al. 2009
Pathans	Pakistan	Iranian	20	2	0.10	Di Cristofaro et al. 2013
Pandits	Kashmir	Indo-Aryan	51	5	0.10	Sharma et al. 2009
Gujars	Kashmir	Indo-Aryan	49	5	0.10	Sharma et al. 2009
Konkani Brahmins	Bombay	Indo-Aryan	43	4	0.09	Kivisild et al. 2003
Brahmin	Orissa	Indo-Aryan	23	2	0.09	Sahoo and Kashyap 2006

Population	Location	Branch	Sample Size	No. H-M69	Freq. H-M69	Reference
Banjara (Lambadi)	Andhra Pradesh	Iranian	35	3	0.09	Kivisild et al. 2003
Oriya Brahmin	Orissa	Indo-Aryan	24	2	0.08	Sahoo et al. 2006
Thakur	Maharashtra	Indo-Aryan	48	4	0.08	Thangaraj et al. 2010
Brahmin	Madhya Pradesh	Indo-Aryan	42	3	0.07	Sharma et al. 2009
Pavagadhi Chaudhari	Gujarat	Indo-Aryan	29	2	0.07	Khurana et al. 2014
Chaturvedis	Uttar Pradesh	Indo-Aryan	88	6	0.07	Zhao et al. 2009
Chaturvedis	Uttar Pradesh	Indo-Aryan	88	6	0.07	Zhao et al. 2009
Brahmin	West Bengal	Indo-Aryan	30	2	0.06	Sharma et al. 2009
Punjabi	Punjab	Indo-Aryan	66	3	0.05	Kivisild et al. 2003
Balochi	South Pakistan	Iranian	25	1	0.04	Sengupta et al. 2006
Balochi	Pakistan	Iranian	25	1	0.04	Di Cristofaro et al. 2013
Pathan	Pakistan	Iranian	96	3	0.03	Firasat et al. 2007
Kalash	Pakistan	Indo-Aryan	44	1	0.03	Firasat et al. 2007
Brahmin	Gujarat	Indo-Aryan	64	1	0.02	Sharma et al. 2009
Total Samples		2853	Total Hg. H-M69	483	Lang FamFreq.	0.17

Supplementary Table 8.5. Dravidian Populations of South Asia and H-M69.

Population	Location	Sample Size	No. H-M69	Freq. H-M69	Reference
Koraga	Karnataka	33	29	0.88	Cordaux et al. 2004a
Muria	Central India	20	16	0.80	Sengupta et al. 2006
Oraon	West Bengal	31	22	0.71	Debnath et al. 2011
Koya	Andhra Pradesh	41	29	0.71	Kivisild et al. 2003
Kurumba	Tamil Nadu	35	24	0.69	Arunkumar et al. 2012
Gonds	Madhya Pradesh	31	19	0.62	Sharma et al. 2009
Gonds	Uttar Pradesh	38	22	0.59	Sharma et al. 2009
Kattunaickan	Tamil Nadu	46	27	0.58	Arunkumar et al. 2012
Oraon	Jharkhand; Chattisgarh	91	52	0.57	Kumar et al. 2007
Ambalakarar	South India	29	14	0.48	Sengupta et al. 2006
Oraon	Jharkhand	110	50	0.45	Borkar et al. 2011
Kamar	Central India	30	13	0.43	Sengupta et al. 2006
Irula	South India	30	12	0.40	Sengupta et al. 2006
Parayar NTN	Tamil Nadu	52	20	0.39	Arunkumar et al. 2012
Chenchu	Andhra Pradesh	41	15	0.37	Kivisild et al. 2003
Irula	Tamil Nadu	80	29	0.36	Arunkumar et al. 2012
Mullukurumba	Tamil Nadu	29	10	0.34	Arunkumar et al. 2012
Kota	Tamil Nadu	62	20	0.33	Arunkumar et al. 2012
Naikpod	Andhra Pradesh	68	22	0.32	Thanseem et al. 2006
Kadar	Tamil Nadu	28	9	0.32	Arunkumar et al. 2012
Ezhava	Tamil Nadu	95	29	0.30	Arunkumar et al. 2012
Vellalar	South India	31	9	0.29	Sengupta et al. 2006

Population	Location	Sample Size	No. H-M69	Freq. H-M69	Reference
Nadar TNV	Tamil Nadu	59	17	0.29	Arunkumar et al. 2012
Tamil Jains	Tamil Nadu	100	28	0.28	Arunkumar et al. 2012
Pardhan	Andra Pradesh	128	33	0.26	Thanseem et al. 2006
Lingayat	Karnataka India	101	25	0.25	Chennakrishnaiah et al. 2013
Yadhava	Tamil Nadu	107	26	0.24	Arunkumar et al. 2012
Vanniyar	South India	25	6	0.24	Sengupta et al. 2006
Vokkaliga	Karnataka India	102	24	0.24	Chennakrishnaiah et al. 2013
Piramalai Kallar	Tamil Nadu	53	12	0.23	Arunkumar et al. 2012
Parayar	Tamil Nadu	24	5	0.21	Arunkumar et al. 2012
Vanniyar NTN	Tamil Nadu	96	19	0.20	Arunkumar et al. 2012
Valayar	Tamil Nadu	95	19	0.20	Arunkumar et al. 2012
Pallar	Tamil Nadu	51	10	0.20	Arunkumar et al. 2012
Yerava	Southern India	41	8	0.20	Cordaux et al. 2004a
Vizag Brahmins	Andra Pradesh	41	8	0.20	Cordaux et al. 2004a; Ramana et al. 2001
Yadhava	Tamil Nadu	129	24	0.19	Cordaux et al. 2004a; Wells et al. 2001
Pallan	South India	29	5	0.17	Sengupta et al. 2006
Maravar	Tamil Nadu	80	14	0.17	Arunkumar et al. 2012
Pulayar	Tamil Nadu	63	11	0.17	Arunkumar et al. 2012
Kallar	Tamil Nadu	84	13	0.15	Cordaux et al. 2004a; Wells et al. 2001
Nadar Cape	Tamil Nadu	98	15	0.15	Arunkumar et al. 2012
Paravar	Tamil Nadu	27	4	0.15	Arunkumar et al. 2012
Paliyan	Tamil Nadu	95	13	0.14	Arunkumar et al. 2012
Valmiki	Andra Pradesh	24	3	0.13	Cordaux et al. 2004a; Ramana et al. 2001
Thoda	Tamil Nadu	26	3	0.12	Arunkumar et al. 2012
Komati	Andra Pradesh	20	2	0.10	Sahoo et al. 2006

Population	Location	Sample Size	No. H-M69	Freq. H-M69	Reference	
Iyengar	South India	30	3	0.10	Sengupta et al. 2006	
Poroja	Andra Pradesh	20	2	0.10	Cordaux et al. 2004a; Ramana et al. 2001	
Bagata	Andra Pradesh	23	2	0.09	Cordaux et al. 2004a; Ramana et al. 2001	
Iyer	South India	29	2	0.07	Sengupta et al. 2006	
Vanniyar	Tamil Nadu	21	1	0.05	Arunkumar et al. 2012	
Brahui	South Pakistan	25	1	0.04	Sengupta et al. 2006	
Brahui	Pakistan	25	1	0.04	Di Cristofaro et al. 2013	
Koya Dora	South India	27	1	0.04	Sengupta et al. 2006	
Konda Reddy	South India	30	1	0.03	Sengupta et al. 2006	
Kammas	Andra Pradesh	40	1	0.03	Cordaux et al. 2004a; Ramana et al. 2001	
	Total Sample	3019	Total Hg. H-M69	854	Lang Fam Freq.	0.28

Supplementary Table 8.6. Austro-Asiatic Populations of South Asia and H-M69.

Population	Location	Sample Size	No. H-M69	Freq. H-M69	Reference
Kol	West Bengal	62	26	0.42	Debnath et al. 2011
Santhal	West Bengal	51	22	0.43	Debnath et al. 2011
Kharia	West Bengal	34	6	0.18	Debnath et al. 2011
Saora	Orissa	21	4	0.19	Sahoo and Kashyap 2006
Ho	East India	30	5	0.17	Sengupta et al. 2006
Lodha	East India	20	6	0.30	Sengupta et al. 2006
Munda	Jharkhand	94	32	0.34	Borkar et al. 2011
Birhor	Jharkhand	100	28	0.28	Borkar et al. 2011
Santhal	Jharkhand	90	3	0.03	Borkar et al. 2011
Ho	Jharkhand	28	1	0.04	Borkar et al. 2011
Kols	Uttar Pradesh	30	3	0.11	Sharma et al. 2009
Santhal	Jharkhand; West Bengal	109	43	0.39	Kumar et al. 2007
Bhumij	Jharkhand; West Bengal	89	24	0.27	Kumar et al. 2007
Mudi	Jharkhand; West Bengal	37	16	0.43	Kumar et al. 2007
Mahali	Jharkhand; West Bengal	25	10	0.40	Kumar et al. 2007
Asur	Jharkhand	55	12	0.22	Kumar et al. 2007
Birhor	Jharkhand; West Bengal; Orissa	38	9	0.24	Kumar et al. 2007
Munda	Jharkhand; West Bengal; Orissa	53	13	0.25	Kumar et al. 2007
Ho	Orissa	79	20	0.25	Kumar et al. 2007

Population	Location	Sample Size	No. H-M69	Freq. H-M69	Reference	
Korwa	Jharkhand; Chattisgarh	42	14	0.33	Kumar et al. 2007	
Korku	Maharashtra	59	5	0.08	Kumar et al. 2007	
Kharia	Jharkhand; West Bengal; Orissa	36	12	0.33	Kumar et al. 2007	
Savar	Jharkhand; West Bengal; Orissa	47	15	0.32	Kumar et al. 2007	
Lodha	West Bengal	47	7	0.15	Kumar et al. 2007	
Khasi	Khasi Hills; Jaintia Hills; Meghalaya	92	6	0.07	Kumar et al. 2007	
	Total Sample	1368	Total Hg. H-M69	342	Lang Fam Freq.	0.25

Supplementary Table 8.7. Tibeto-Burman Populations of South Asia and H-M69.

Population	Location	Branch	Sample Size	No. H-M69	Freq. H-M69	Reference
Rabha	West Bengal	Tibeto-Burman	26	4	0.15	Debnath et al. 2011
Apatani	Northeast India	Tibeto-Burman	33	3	0.09	Cordaux et al. 2004b
Garo	Meghalaya	Tibeto-Burman	33	3	0.09	Kumar et al. 2007
Dhimal	West Bengal	Tibeto-Burman	36	3	0.08	Debnath et al. 2011
Lachung	Sikkim	Tibeto-Burman	20	1	0.05	Borkar et al. 2011
Mizo	Northeast India	Tibeto-Burman	27	1	0.04	Sengupta et al. 2006
Jamatia	Northeast India	Tibeto-Burman	30	1	0.03	Sengupta et al. 2006
Nishi	Northeast India	Tibeto-Burman	51	1	0.02	Cordaux et al. 2004b
Adi	Northeast India	Tibeto-Burman	55	1	0.02	Cordaux et al. 2004b
	Total Sample	311	Total Hg. H-M69	18	Lang Branch Freq.	0.06

Supplementary Table 8.8. South Asian Languages and H-M69: Comparison of Previously Published Frequency Data with Present Report.

	Sengupta et al. 2006 n = 709	Trivedi et al. 2007 n = 1,152	Present Report n = 7,551
Frequency of H-M69 for Indo-European populations.	.28	.26	.17
Frequency of H-M69 for Dravidian populations.	.33	.30	.28
Frequency of H-M69 for Austro-Asiatic populations.	.23	.06	.25
Frequency of H-M69 for Tibeto-Burman populations.	.02	.10	.06

Supplementary Table 8.9. Survey of H-M69 Populations in South Asia, East Asia and the Middle East.

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
Central Asia	Afghanistan	Hazara-Bamiyan	Indo-European	Iranian	69	0.13	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajik-Badakhshan	Indo-European	Iranian	37	0.11	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtun-Baghlan	Indo-European	Iranian	34	0.09	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajik-Takhar	Indo-European	Iranian	35	0.09	Di Cristofaro et al. 2013
East Asia	Xingjiang	Uygur	Turkic		48	0.08	Zhong et al. 2011
Central Asia	Afghanistan	Pashtun-Kunduz	Indo-European	Iranian	53	0.08	Di Cristofaro et al. 2013
Central Asia	Uzbekistan-Karakalpakstan	Turkmen	Turkic		83	0.07	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajik-Samangan	Indo-European	Iranian	16	0.06	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtun	Indo-European	Iranian	49	0.06	Haber et al. 2012
Middle East	Iran-Mazandaran	Mazandarani	Indo-European	Iranian	72	0.06	Grugni et al. 2012
Central Asia	Afghanistan	Pashtun	Indo-European	Iranian	56	0.05	Haber et al. 2012
East Asia	Guangxi	Hui	Sino-Tibetan	Chinese	62	0.05	Zhong et al. 2011
Central Asia	Afghanistan	Uzbek-Jawzjan	Turkic		94	0.04	Di Cristofaro et al. 2013
East Asia	Xingjiang	Uygur	Turkic		71	0.04	Zhong et al. 2011
Central Asia	Uzbekistan-Tashkent	Uzbeks	Turkic		52	0.04	Zhabagin et al. 2017
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.03	Haber et al. 2012
Middle East	Iran-Khorasan	Persians	Indo-European	Iranian	59	0.03	Grugni et al. 2012
Central Asia	Kyrgyzstan	Kyrgyz-NorthWest	Turkic		37	0.03	Di Cristofaro et al. 2013
Central Asia	Tajikistan	Tajiks	Indo-European	Iranian	40	0.03	Malyarchuck et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Hg H	Reference
East Asia	Ningxia	Jing	Austro-Asiatic		45	0.02	Zhong et al. 2011
Central Asia	Kazakhstan-Shymkent	Kazakhs	Turkic		55	0.02	Zhabagin et al. 2017
Middle East	Iran-Fars+Isfahan	Persians	Indo-European	Iranian	55	0.02	Grugni et al. 2012
Middle East	Iran-Gilan	Gilaki	Indo-European	Iranian	64	0.02	Grugni et al. 2012
East Asia	Xingjiang	Hazak	Turkic		53	0.02	Zhong et al. 2011
Middle East	Iran-Golestan	Turkmen	Turkic		68	0.01	Grugni et al. 2012

Supplementary Table 8.10. H-M69 and European Romani.

Location	Sample Size	Hg H	Reference
Macedonia	57	0.60	Peričić et al. 2005
Tiszavasvari, Hungary	29	0.59	Pamjav et al. 2011
Slovakia	200	0.40	Petrejčíková et al. 2009
Hungary	107	0.32	Pamjav et al. 2011
Slovakia	62	0.31	Pamjav et al. 2011
Tokaj, Hungary	39	0.21	Pamjav et al. 2011
Portugal	126	0.17	Gusmao et al. 2008
Taktakoz, Hungary	19	0.11	Pamjav et al. 2011

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Supplementary Tables for Chapter 9 and Haplogroup I-M170

Supplementary Table 9.1. Frequency and Distribution of Haplogroup I.

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Eastern Europe	Bosnia-Herzegovina	Croats	Indo-European	90	0.73	Battaglia et al. 2009
Eastern Europe	Northwestern Russia	Arkangelsk	Indo-European	28	0.50	Mirabal et al. 2009
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	84	0.50	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	89	0.44	Battaglia et al. 2009
Scandinavia	Sweden	Swedes	Indo-European	305	0.42	Karlsson et al. 2006
Eastern Europe	Bosnia	Bosniacs	Indo-European	100	0.42	Underhill et al. 2007
Mediterranean	Sardinia	Sardinians	Indo-European	1194	0.41	Francalacci et al. 2015
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	81	0.41	Battaglia et al. 2009
Scandinavia	Finland	Western Finland	Uralic	230	0.41	Lappalainen et al. 2008
Scandinavia	Finland	Sami	Uralic	69	0.41	Tambets et al. 2004
Scandinavia	Norway	Norwegians	Indo-European	72	0.40	Rootsi et al. 2004
Eastern Europe	Croatia	Croats	Indo-European	720	0.39	Sarac et al. 2016
Scandinavia	Denmark	Danes	Indo-European	122	0.39	Underhill et al. 2007
Scandinavia	Sweden	Swedes	Indo-European	160	0.38	Lappalainen et al. 2008
Eastern Europe	Serbia	Serbs	Indo-European	102	0.38	Regueiro et al. 2012.
Scandinavia	Denmark	Danes	Indo-European	241	0.38	Olofsson et al. 2015
Mediterranean	Sardinia	Cagliari, Sorgono, Tempio	Indo-European	930	0.37	Contu et al. 2008
Scandinavia	Sweden	Sami	Uralic	38	0.32	Karlsson et al. 2006
Eastern Europe	Czech Republic	Czechs	Indo-European	47	0.32	Underhill et al. 2007
Eastern Europe	Slovenia	Slovenes	Indo-European	75	0.31	Battaglia et al. 2009
Scandinavia	Sweden	Sami	Uralic	35	0.31	Tambets et al. 2004
Mediterranean	Italy	Arbereshe	Indo-European	150	0.30	Sarno et al. 2016

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Eastern Europe	Macedonia	Greeks	Indo-European	57	0.30	Battaglia et al. 2009
Eastern Europe	Moldova	Moldavians	Indo-European	125	0.29	Varzari et al. 2013
Eastern Europe	Hungary	Hungarians	Uralic	215	0.28	Völgyi et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	75	0.28	Battaglia et al. 2009
Eastern Europe	Croatia	Croats, Osijek	Indo-European	29	0.28	Battaglia et al. 2009
Caucasus	Caucasus Russia	Lezgians	North Caucasian	31	0.27	Yunusbayev et al. 2012
Caucasus	Caucasus Russia	Andis	North Caucasian	49	0.27	Yunusbayev et al. 2012
Eastern Europe	Kostroma, Russia	Russians	Indo-European	53	0.26	Underhill et al. 2007
Eastern Europe	Hungary	Hungarians	Uralic	113	0.26	Underhill et al. 2007
Eastern Europe	Slovenia	Slovenes	Indo-European	95	0.26	Underhill et al. 2007
Eastern Europe	Ukraine	Ukrainians	Indo-European	506	0.26	Underhill et al. 2007
Eastern Europe	Bulgaria	Bulgarians	Indo-European	808	0.26	Karachanak et al. 2013
Eastern Europe	Slovenia	Slovenes	Indo-European	399	0.25	Zupan et al. 2013
Eastern Europe	Russia	Cossac	Indo-European	89	0.25	Underhill et al. 2007
Eastern Europe	Hungary	Hungarians	Uralic	100	0.24	Csányi et al 2008
Western Europe	Germany	Germans	Indo-European	125	0.24	Underhill et al. 2007
Eastern Europe	Belarus	Belarusians	Indo-European	565	0.23	Kushniarevich et al. 2012
Eastern Europe	Slovakia	Slovaks	Indo-European	156	0.23	Novackova et al. 2015
Mediterranean	Albania	Albanians	Indo-European	55	0.22	Battaglia et al. 2009
Eastern Europe	Corund, Romania	Szeklers	Uralic	97	0.22	Csányi et al 2008
Western Europe	France	Normandy	Indo-European	42	0.21	Underhill et al. 2007
Mediterranean	Greece	Lerna/Franchthi Cave	Indo-European	57	0.21	King et al. 2011
Scandinavia	Osterbotten	Swedes	Indo-European	40	0.20	Karlsson et al. 2006
Eastern Europe	Voronez, Russia	Russians	Indo-European	96	0.20	Underhill et al. 2007

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Scandinavia	Finland	Eastern Finland	Uralic	306	0.20	Lappalainen et al. 2008
Western Europe	Netherlands	Dutch	Indo-European	93	0.20	Underhill et al. 2007
Western Europe	Flanders Region, Netherlands and Belgium	Flemish	Indo-European	773	0.20	Larmuseau et al 2014.
Mediterranean	Northeastern Italy	Italians	Indo-European	67	0.20	Battaglia et al. 2009
Eastern Europe	Southern Russia	Russians	Indo-European	484	0.20	Balanovsky et al. 2008
Eastern Europe	Eastern Europe	Mordvin	Uralic	83	0.19	Rootsi et al. 2004
Baltic	Estonia	Estonians	Uralic	210	0.19	Underhill et al. 2007
Western Europe	United Kingdom	English	Indo-European	104	0.19	Underhill et al. 2007
Caucasus	Daghestan	Laks	North Caucasian	22	0.18	Karafet et al. 2016
Eastern Europe	Central Russia	Russians	Indo-European	364	0.18	Balanovsky et al. 2008
Eastern Europe	Hungary	Hungarians	Uralic	53	0.18	Battaglia et al. 2009
Eastern Europe	Northwestern Russia	Tver	Indo-European	38	0.18	Mirabal et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	257	0.18	Luca et al. 2007
Baltic	Russia	Karelians	Uralic	132	0.17	Lappalainen et al. 2008
Western Europe	France	French	Indo-European	58	0.17	Underhill et al. 2007
Baltic	Kola Peninsula	Sami	Uralic	23	0.17	Tambets et al. 2004
Baltic	Estonia	Estonians	Uralic	118	0.17	Lappalainen et al. 2008
Northern Eurasia	Pskov, Russia	Russians	Indo-European	130	0.17	Underhill et al. 2007
Eastern Europe	Czech Republic	Czechs	Indo-European	53	0.17	Underhill et al. 2007
Eastern Europe	Macedonia	Albanians	Indo-European	64	0.17	Battaglia et al. 2009
Mediterranean	Greece	Greeks	Indo-European	171	0.16	Underhill et al. 2007
Western Europe	Southern France	French	Indo-European	38	0.16	Rootsi et al. 2004
Northern Eurasia	Arkhangelsk, Russia	Russians	Indo-European	145	0.16	Underhill et al. 2007

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Western Europe	Pyrenees Mountains, Spain and France	Jacetania	Indo-European	31	0.16	López-Parra et al. 2009
Mediterranean	Greece	Phokaia	Indo-European	31	0.16	King et al. 2011
Eastern Europe	Slovakia	Romani	Indo-European	200	0.15	Petřejčiková et al. 2009
Western Europe	Pyrenees Mountains, Spain and France	Cinco Villas	Indo-European	42	0.14	López-Parra et al. 2009
Mediterranean	Greece	Seskio/Dimini	Indo-European	57	0.14	King et al. 2011
Mediterranean	Albania	Albanians	Indo-European	223	0.14	Sarno et al. 2016
Eastern Europe	Slovakia	Slovaks	Indo-European	70	0.14	Underhill et al. 2007
Eastern Europe	Volga-Ural Region, Russia	Kazan Tatars	Turkic	53	0.13	Trofimova et al. 2015
Eastern Europe	Smolensk, Russia	Russians	Indo-European	103	0.13	Underhill et al. 2007
Caucasus	Caucasus Russia	Nogais, Kara	Turkic	76	0.13	Yunusbayev et al. 2012
Eastern Europe	Northwestern Russia	Kursk	Indo-European	40	0.13	Mirabal et al. 2009
Northern Eurasia	Northern Russia	Russians	Indo-European	380	0.13	Balanovsky et al. 2008
Mediterranean	Greece	Nea Nikomedeia	Indo-European	57	0.12	King et al. 2011
Middle East	Turkey	Northwest Anatolia	Turkic	52	0.12	King et al. 2011
Western Europe	Pyrenees Mountains, Spain and France	Valle de Aran	Indo-European	25	0.12	López-Parra et al. 2009
Caucasus	Russia. Adygea. Maikop district	Armenians Adigei	Indo-European	49	0.12	Balanovsky et al. 2017
Baltic	Lithuania	Lithuanians	Indo-European	164	0.12	Lappalainen et al. 2008
Eastern Europe	Volga-Ural Region, Russia	Tuymazinsky Tatars	Turkic	50	0.12	Trofimova et al. 2015
Mediterranean	Greece	Smyrna	Indo-European	58	0.12	King et al. 2011
Eastern Europe	Volga-Ural Region, Russia	Chuvash	Turkic	44	0.11	Trofimova et al. 2015
Western Europe	Ireland	Irish	Indo-European	100	0.11	Underhill et al. 2007
Western Europe	Scotland	Scots	Indo-European	178	0.11	Rootsi et al. 2004
Eastern Europe	Eastern Europe	Chuvash	Turkic	80	0.11	Rootsi et al. 2004

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Western Europe	Portugal	Romani	Indo-European	126	0.10	Gusmão et al. 2008
Mediterranean	Crete	Cretans	Indo-European	168	0.10	Martinez et al. 2007
Western Europe	Galicia	Galicians	Indo-European	44	0.10	Santos et al. 2014a
Baltic	Russia	Karelians	Uralic	140	0.10	Underhill et al. 2007
Mediterranean	Greece	Greeks	Indo-European	92	0.10	Battaglia et al. 2009
Caucasus	Russia. Krasnodar region	Armenians Hemshin	Indo-European	89	0.09	Balanovsky et al. 2017
Western Europe	Austria	Austrians	Indo-European	43	0.09	Underhill et al. 2007
Caucasus	Caucasus Russia	Karachays	Turkic	69	0.09	Yunusbayev et al. 2012
Caucasus	Russia. Krasnodar region	Armenians Krasnodar	Indo-European	117	0.09	Balanovsky et al. 2017
Western Europe	Valencia	Valencians	Indo-European	59	0.09	Santos et al. 2014a
Western Europe	Catalan	Catalonians	Indo-European	111	0.09	Santos et al. 2014a
Western Europe	Zamora Province	Spanish	Indo-European	235	0.08	Alvarez et al. 2014.
Western Europe	Bernais	French	Indo-European	26	0.08	Rootsi et al. 2004
Western Europe	Switzerland	Swiss	Indo-European	144	0.08	Underhill et al. 2007
Northern Eurasia	Volga-Ural Region, Russia	Komi	Uralic	40	0.08	Trofimova et al. 2015
Western Europe	Pyrenees Mountains, Spain and France	Cerdana	Indo-European	37	0.08	López-Parra et al. 2009
Mediterranean	Sicily	Sicilians	Indo-European	236	0.08	Di Gaetano et al. 2009
Caucasus	Armenia	Armenians Gardman	Indo-European	96	0.08	Herrera et al. 2012
Baltic	Latvia	Latvians	Indo-European	113	0.07	Lappalainen et al. 2008
Mediterranean	Central Italy	Italians	Indo-European	196	0.07	Rootsi et al. 2004
Baltic	Latvia	Latvians	Indo-European	86	0.07	Rootsi et al. 2004
Middle East	Turkey	Western Anatolia	Turkic	30	0.07	King et al. 2011
Caucasus	Daghestan	Avar	North Caucasian	33	0.06	Karafet et al. 2016
Eastern Europe	Volga-Ural Region, Russia	Besermyan	Uralic	53	0.06	Trofimova et al. 2015

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Western Europe	France	Provence	Indo-European	51	0.06	King et al. 2011
Western Europe	France and Spain	Basques	Isolate	100	0.06	Rootsi et al. 2004
Central Asia	Kazakhstan-Zhanakorgan District	Kazakh	Turkic	94	0.06	Zhabagin et al. 2017
Middle East	Turkey	Turks	Turkic	523	0.05	Underhill et al. 2007
Eastern Europe	Volga-Ural Region, Russia	Mordvins	Uralic	59	0.05	Trofimova et al. 2015
Mediterranean	Northern Italy	Italians	Indo-European	194	0.05	Rootsi et al. 2004
Northern Eurasia	Northern Eurasia	Komi	Uralic	110	0.05	Rootsi et al. 2004
Caucasus	Russia. Rostov region. Myasnikovsky district	Armenians Don	Indo-European	92	0.05	Balanovsky et al. 2017
Central Asia	Uzbekistan-Xorezm Region	Uzbek	Turkic	98	0.05	Zhabagin et al. 2017
Western Europe	Portugal	Portuguese	Indo-European	303	0.05	Rootsi et al. 2004
Central Asia	Uzbekistan-Karakalpakstan	Karakalpak	Turkic	100	0.05	Zhabagin et al. 2017
Caucasus	Georgia	South Ossetians	Indo-European	21	0.05	Yunusbayev et al. 2012
Baltic	Baltic	Veps	Uralic	39	0.05	Underhill et al. 2007
Middle East	Turkey	Turks	Turkic	523	0.05	Cinnioglu et al. 2004
Caucasus	Caucasus Russia	Adyghe	North Caucasian	154	0.05	Yunusbayev et al. 2012
Caucasus	Caucasus Russia	Kabardians	North Caucasian	140	0.04	Yunusbayev et al. 2012
Middle East	Iran	Kurds	Indo-European	25	0.04	Malyarchuk et al. 2013
South Asia	Pakistan	Hazara	Indo-European	25	0.04	Di Cristofaro et al. 2013
Middle East	Lebanon	Armenians Western Historical	Indo-European	148	0.04	Hovhannisyan et. al 2014
Caucasus	Georgia. Samtskhe-Javakheti	Aremenians Erzurum	Indo-European	99	0.04	Balanovsky et al. 2017
Middle East	Turkey	Central Anatolia	Turkic	90	0.04	King et al. 2011
Western Europe	Lyon and Portier, France	French	Indo-European	99	0.04	Rootsi et al. 2004

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Central Asia	Afghanistan	Tajiks Balkh	Indo-European	54	0.04	Di Cristofaro et al. 2013
Western Europe	Andalusia	Andalusians	Indo-European	103	0.04	Rootsi et al. 2004
Caucasus	Armenia	Armenians Alashkert and Bayazet	Indo-European	200	0.04	Hovhannisyan et. al 2014
Eastern Europe	Poland	Poles	Indo-European	99	0.04	Battaglia et al. 2009
Caucasus	Armenia. Ararat Valley, v. Oshakan	Armenians Ararat	Indo-European	110	0.03	Herrera et al. 2012
Mediterranean	Cyprus	Greek Cypriots	Indo-European	629	0.03	Voskarides et al. 2016.
Caucasus	Caucasus	Abazins	North Caucasian	88	0.03	Yunusbayev et al. 2012
Middle East	Iran	Persians	Indo-European	77	0.03	Malyarchuk et al. 2013
Middle East	Turkey	Mediterranean Anatolia	Turkic	33	0.03	King et al. 2011
Central Asia	Afghanistan	Hazara	Indo-European	60	0.03	Haber et al. 2012
Caucasus	Caucasus	Balkars	Turkic	38	0.03	Battaglia et al. 2009
Western Europe	Pyrenees Mountains, Spain and France	Alto Urgel	Indo-European	34	0.03	López-Parra et al. 2009
Central Asia	Afghanistan	Tajiks Takhar	Indo-European	35	0.03	Di Cristofaro et al. 2013
Middle East	Iran	Hazara	Indo-European	69	0.03	Di Cristofaro et al. 2013
Central Asia	Tajikistan	Tajiks	Indo-European	40	0.03	Malyarchuk et al. 2013
Caucasus	Georgia	Abkhaz	North Caucasian	162	0.03	Yunusbayev et al. 2012
Caucasus	Georgia	Georgians	Kartvelian	65	0.03	Yunusbayev et al. 2012
Central Asia	Afghanistan	Tajiks	Indo-European	56	0.02	Haber et al. 2012
Middle East	Iran	Gilaki	Indo-European	64	0.02	Grugni et al. 2012
Eastern Europe	Eastern Europe	Udmurt	Uralic	132	0.02	Rootsi et al. 2004
Caucasus	Armenia	Armenians Van	Indo-European	103	0.02	Herrera et al. 2012
Caucasus	Karabakh, Armenia and Azerbaijan	Armenians Karabakh	Indo-European	105	0.02	Hovhannisyan et. al 2014

Region	Location	Population	Lang Fam	Sample Size	Freq Hg I	Reference
Caucasus	Armenia	Armenians Salmast	Indo-European	199	0.02	Hovhannisyan et. al 2014
Eastern Europe	Northwestern Russia	Komi	Uralic	54	0.02	Mirabal et al. 2009
Caucasus	Georgia	Georgians	Kartvelian	66	0.02	Battaglia et al. 2009
Eastern Europe	Ukraine	Ukrainians	Indo-European	92	0.02	Battaglia et al. 2009
East Asia	Mongolia	Mongols	Mongolic	97	0.01	Di Cristofaro et al. 2013
Caucasus	Armenia	Armenians Syunik	Indo-European	105	0.01	Hovhannisyan et. al 2014

Supplementary Table 9.2. Survey of Ancient DNA Results from Europe.

Reference Sample No.	Description of Remains	Y-SNP	Death	Earth Sciences Period	Geological Period	Technological Period	Reference
1	Oase1. Peștera cu Oase cave in Romania	NO-M214	37-42 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Trinkaus et al. 2003; Fu et al. 2014; Fu et al. 2015; Poznik et al. 2016.
2	Kostenki14. Found at Markina Gora, Voronezh Oblast, Southwest Russia	C1b-F1370	36-39 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
3	GoyetQ116-1. Found at Troisième Caverne in Belgium.	C1a-CTS11043	34-35 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
4	Paglicci133. Found at the Paglicci Cave, Apulia region, Southeast Italy.	I-M170	About 33 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
5	Pavlov1. Found in the Pavlovské Hills in the Czech Republic.	I-M170	29-30 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
6	Vestonice16. Found in the Pavlovské Hills in the Czech Republic	C1a2-V20	29-30 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
7	HohleFels49 Found in the Ach Valley, Schelklingen, southwestern Germany	I-M170	14-16 thousand years ago,	Marine Isotope Stage Two.	Pleistocene	Paleolithic	Fu et al. 2016.
8	Burkhardtshöhle remains. Found near Westerheim in southwestern Germany.	I-M170	14-15 thousand years ago.	Marine Isotope Stage Two.	Pleistocene	Paleolithic	Fu et al. 2016.

Reference Sample No.	Description of Remains	Y-SNP	Death	Earth Sciences Period	Geological Period	Technological Period	Reference
9	Villabruna remains. Found in the Dolomite Mountains, northern Italy.	R1b1-L278	About 14 thousand years ago.	Marine Isotope Stage Two.	Pleistocene	Paleolithic	Fu et al. 2016.
10	Rochedane remains. Found near Villars-sous-Dampjoux in eastern France.	I-M170	About 14 thousand years ago.	Marine Isotope Stage Two.	Pleistocene	Paleolithic	Fu et al. 2016.
11	Cuiry les Chaudardes 1 remains. Located 25 km northwest of Reims, France	I-M170	About eight thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Fu et al. 2016.
12	Latvia_Hg2. Found at Zvejnieki in Latvia.	R1b1b-M335	About eight thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Jones et al. 2017.
13	Motala 2 remains. Found at the Kanaljorden site, Motala, Östergötland, Sweden.	I-M170	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Lazaridis et al. 2014.
14	Motala 3 remains. Found at the Kanaljorden site, Motala, Östergötland, Sweden.	I2a1b-M423	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Lazaridis et al. 2014.
15	Motala 9 remains. Found at the Kanaljorden site, Motala, Östergötland, Sweden.	I-M170 (not I1a-M253)	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Lazaridis et al. 2014.

Reference Sample No.	Description of Remains	Y-SNP	Death	Earth Sciences Period	Geological Period	Technological Period	Reference
16	Motala 12 remains. Found at the Kanaljorden site, Motala, Östergötland, Sweden.	I2a1b-M423	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Lazaridis et al. 2014.
17	Latvia_HG3. Found at Zvejnieki, Latvia.	R1b1b-M335.	About seven thousand years ago	Marine Isotope Stage One	Holocene	Neolithic	Jones et al. 2017.
18	Berry au Bac remains. Found in northern France.	I-M170	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Neolithic	Fu et al. 2016.
19	Loschbour rock shelter remains found near Heffingen in Luxembourg.	I2a1b-M423	About seven thousand years ago.	Marine Isotope Stage One	Holocene	Mesolithic	Lazaridis et al. 2014.
20	VINJ 4. Remains found at the Vinkovci Jugobanka site at Croatia.	I2a1-P37.2	Between six and seven thousand years ago.	Marine Isotope Stage One	Holocene	Neolithic	Szecsényi-Nagy et al. 2015.
21	10174 Starcevo_EN. Remains found in Hungary.	H2-P56	About six thousand years ago.	Marine Isotope Stage One	Holocene	Neolithic	Haak et al. 2015.

Reference Sample No.	Description of Remains	Y-SNP	Death	Earth Sciences Period	Geological Period	Technological Period	Reference
22	ATP2. Remains at the El Portalón cave at Atapuerca in Northern Spain	H2-P56	About five thousand years	Marine Isotope Stage One	Holocene	Neolithic	Günther et al. 2015.
23	ATP12-1420. Remains at the El Portalón cave at Atapuerca in Northern Spain	I2a2a-M223	About five thousand years	Marine Isotope Stage One	Holocene	Neolithic	Günther et al. 2015.
24	Ajvide58 remains. Burial found in Gotland, Sweden.	I2a1-P37.2	About five thousand years	Marine Isotope Stage One	Holocene	Neolithic	Skoglund et al. 2014.
25	BAB 5 remains. Balatonszemes-Bagódomb, Hungary	I1-M253	About five thousand years	Marine Isotope Stage One	Holocene	Neolithic	Szecsényi-Nagy et al. 2015.
26	Sample 577. Cave I of Treilles, Grands Causses region, at Saint-Jean-et-Saint-Paul, Aveyron, France.	I2a1-P37.2	About five thousand years	Marine Isotope Stage One	Holocene	Neolithic	Lacan et al. 2011.
27	Sample 596. Sample 577. Cave I of Treilles, Grands Causses region, at Saint-Jean-et-Saint-Paul, Aveyron, France.	I2a1-P37.2	About five thousand years ago.	Marine Isotope Stage One	Holocene	Neolithic	Lacan et al. 2011.

Supplementary Table 9.3. Distribution of I-M423.

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M423	Reference
Eastern Europe	Bosnia-Herzegovina	Croats	Indo-European	South Slavic	90	0.73	Battaglia et al. 2009
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	South Slavic	84	0.43	Battaglia et al. 2009
Eastern Europe	Bosnia	Bosniacs	Indo-European	South Slavic	100	0.40	Underhill et al. 2007
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	South Slavic	81	0.35	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	720	0.33	Sarac et al. 2016
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	89	0.33	Battaglia et al. 2009
Eastern Europe	Serbia	Serbs	Indo-European	South Slavic	102	0.29	Regueiro et al. 2012.
Eastern Europe	Croatia	Croats, Osijek	Indo-European	South Slavic	29	0.28	Battaglia et al. 2009
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.21	Varzari et al. 2013
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	506	0.20	Underhill et al. 2007
Eastern Europe	Bulgaria	Bulgarians	Indo-European	South Slavic	808	0.20	Karachanak et al. 2013
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	75	0.20	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	95	0.19	Underhill et al. 2007
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.18	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	75	0.17	Battaglia et al. 2009
Eastern Europe	Russia	Cossac	Indo-European	East Slavic	89	0.17	Underhill et al. 2007
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	47	0.17	Underhill et al. 2007
Eastern Europe	Voronez, Russia	Russians	Indo-European	East Slavic	96	0.16	Underhill et al. 2007
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.15	Battaglia et al. 2009
Eastern Europe	Hungary	Hungarians	Uralic		53	0.14	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	399	0.13	Zupan et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M423	Reference
Mediterranean	Greece	Lerna/Franchthi Cave	Indo-European	Greek	57	0.12	King et al. 2011
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	53	0.11	Underhill et al. 2007
Eastern Europe	Hungary	Hungarians	Uralic		113	0.11	Underhill et al. 2007
Eastern Europe	Kostroma, Russia	Russians	Indo-European	East Slavic	53	0.11	Underhill et al. 2007
Eastern Europe	Smolensk, Russia	Russians	Indo-European	East Slavic	103	0.11	Underhill et al. 2007
Northern Eurasia	Pskov, Russia	Russians	Indo-European	East Slavic	130	0.10	Underhill et al. 2007
Eastern Europe	Slovakia	Slovaks	Indo-European	West Slavic	70	0.10	Underhill et al. 2007
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.09	Battaglia et al. 2009
Mediterranean	Greece	Nea Nikomedeia	Indo-European	Greek	57	0.09	King et al. 2011
Mediterranean	Northeastern Italy	Italians	Indo-European	Italic	67	0.09	Battaglia et al. 2009
Eastern Europe	Eastern Europe	Chuvash	Turkic		80	0.08	Rootsi et al. 2004
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.07	Battaglia et al. 2009
Middle East	Turkey	Western Anatolia	Turkic		30	0.07	King et al. 2011
Mediterranean	Greece	Seskio/Dimini	Indo-European	Greek	57	0.07	King et al. 2011
Northern Eurasia	Arkhangelsk, Russia	Russians	Indo-European	East Slavic	145	0.06	Underhill et al. 2007
Western Europe	Austria	Austrians	Indo-European	West Germanic	43	0.05	Underhill et al. 2007
Mediterranean	Greece	Smyrna	Indo-European	Greek	58	0.05	King et al. 2011
Mediterranean	Greece	Greeks	Indo-European	Greek	171	0.03	Underhill et al. 2007
Baltic	Estonia	Estonians	Uralic		210	0.03	Underhill et al. 2007
Baltic	Baltic	Veps	Uralic		39	0.03	Underhill et al. 2007
Mediterranean	Greece	Phokaia	Indo-European	Greek	31	0.03	King et al. 2011
Western Europe	Ireland	Irish	Indo-European	Italic	100	0.02	Underhill et al. 2007
Middle East	Turkey	Turks	Turkic		523	0.02	Underhill et al. 2007
Middle East	Turkey	Northwest Anatolia	Turkic		52	0.02	King et al. 2011

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M423	Reference
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.02	Voskarides et al. 2016.
Western Europe	United Kingdom	English	Indo-European	West Germanic	104	0.01	Underhill et al. 2007
Middle East	Turkey	Central Anatolia	Turkic		90	0.01	King et al. 2011
Baltic	Russia	Karelians	Uralic		140	0.01	Underhill et al. 2007

Supplementary Table 9.4. Distribution of I-M253.

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M253	Reference
Scandinavia	Finland	Western Finland	Uralic		230	0.40	Lappalainen et al. 2008
Scandinavia	Norway	Norwegians	Indo-European	North Germanic	72	0.39	Rootsi et al. 2004
Scandinavia	Sweden	Swedes	Indo-European	North Germanic	305	0.37	Karlsson et al. 2006
Scandinavia	Sweden	Swedes	Indo-European	North Germanic	160	0.36	Lappalainen et al. 2008
Scandinavia	Denmark	Danes	Indo-European	North Germanic	122	0.33	Underhill et al. 2007
Scandinavia	Denmark	Danes	Indo-European	North Germanic	241	0.33	Olofsson et al. 2015
Scandinavia	Sweden	Sami	Uralic		38	0.32	Karlsson et al. 2006
Scandinavia	Osterbotten	Swedes	Indo-European	North Germanic	40	0.20	Karlsson et al. 2006
Scandinavia	Finland	Eastern Finland	Uralic		306	0.19	Lappalainen et al. 2008
Western Europe	France	French	Indo-European	Italic	58	0.17	Underhill et al. 2007
Eastern Europe	Corund, Romania	Szeklers	Uralic		97	0.17	Csányi et al 2008
Western Europe	Netherlands	Dutch	Indo-European	West Germanic	93	0.15	Underhill et al. 2007
Western Europe	United Kingdom	English	Indo-European	West Germanic	104	0.15	Underhill et al. 2007
Western Europe	Germany	Germans	Indo-European	West Germanic	125	0.15	Underhill et al. 2007
Baltic	Russia	Karelians	Uralic		132	0.15	Lappalainen et al. 2008
Baltic	Estonia	Estonians	Uralic		210	0.15	Underhill et al. 2007
Eastern Europe	Slovakia	Romani	Indo-European	Indo-Aryan	200	0.14	Petřejčíková et al. 2009
Eastern Europe	Northwestern Russia	Arkangelsk	Indo-European	East Slavic	28	0.14	Mirabal et al. 2009
Eastern Europe	Hungary	Hungarians	Uralic		113	0.13	Underhill et al. 2007
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	399	0.12	Zupan et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M253	Reference
Western Europe	France	Normandy	Indo-European	Italic	42	0.12	Underhill et al. 2007
Baltic	Estonia	Estonians	Uralic		118	0.12	Lappalainen et al. 2008
Western Europe	Flanders Region, Netherlands and Belgium	Flemish	Indo-European	West Germanic	773	0.12	Larmuseau et al 2014.
Eastern Europe	Eastern Europe	Mordvin	Uralic		83	0.12	Rootsi et al. 2004
Eastern Europe	Kostroma, Russia	Russians	Indo-European	East Slavic	53	0.11	Underhill et al. 2007
Mediterranean	Northeastern Italy	Italians	Indo-European	Italic	67	0.09	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	47	0.09	Underhill et al. 2007
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	75	0.09	Battaglia et al. 2009
Baltic	Russia	Karelians	Uralic		140	0.09	Underhill et al. 2007
Western Europe	Galicia	Galicians	Indo-European	Italic	44	0.09	Santos et al. 2014a
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	89	0.08	Battaglia et al. 2009
Eastern Europe	Serbia	Serbs	Indo-European	South Slavic	102	0.08	Regueiro et al. 2012.
Eastern Europe	Hungary	Hungarians	Uralic		100	0.08	Csányi et al 2008
Eastern Europe	Northwestern Russia	Tver	Indo-European	East Slavic	38	0.08	Mirabal et al. 2009
Eastern Europe	Hungary	Hungarians	Uralic		215	0.08	Völgyi et al. 2009
Northern Eurasia	Arkhangelsk, Russia	Russians	Indo-European	East Slavic	145	0.08	Underhill et al. 2007
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	75	0.07	Battaglia et al. 2009
Western Europe	Valencia	Valencians	Indo-European	Italic	59	0.07	Santos et al. 2014a
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.07	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	95	0.07	Underhill et al. 2007
Northern Eurasia	Northern Russia	Russians	Indo-European	East Slavic	380	0.06	Balanovsky et al. 2008

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M253	Reference
Mediterranean	Greece	Phokaia	Indo-European	Greek	31	0.06	King et al. 2011
Western Europe	Switzerland	Swiss	Indo-European		144	0.06	Underhill et al. 2007
Middle East	Turkey	Northwest Anatolia	Turkic		52	0.06	King et al. 2011
Western Europe	Ireland	Irish	Indo-European	Italic	100	0.06	Underhill et al. 2007
Eastern Europe	Russia	Cossac	Indo-European	East Slavic	89	0.05	Underhill et al. 2007
Mediterranean	Sicily	Sicilians	Indo-European	Italic	236	0.05	Di Gaetano et al. 2009
Mediterranean	Italy	Arbereshe	Indo-European	Albanian	150	0.05	Sarno et al. 2016
Eastern Europe	Northwestern Russia	Kursk	Indo-European	East Slavic	40	0.05	Mirabal et al. 2009
Baltic	Latvia	Latvians	Indo-European	Baltic	86	0.05	Rootsi et al. 2004
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.05	Varzari et al. 2013
Western Europe	Southern France	French	Indo-European	Italic	38	0.05	Rootsi et al. 2004
Mediterranean	Greece	Smyrna	Indo-European	Greek	58	0.05	King et al. 2011
Western Europe	Catalan	Catalonians	Indo-European	Italic	111	0.05	Santos et al. 2014a
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.05	Battaglia et al. 2009
Eastern Europe	Belarus	Belarusians	Indo-European	East Slavic	565	0.05	Kushniarevich et al. 2013
Northern Eurasia	Pskov, Russia	Russians	Indo-European	East Slavic	130	0.05	Underhill et al. 2007
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	506	0.05	Underhill et al. 2007
Eastern Europe	Central Russia	Russians	Indo-European	East Slavic	364	0.05	Balanovsky et al. 2008
Baltic	Lithuania	Lithuanians	Indo-European	Baltic	164	0.05	Lappalainen et al. 2008
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	257	0.05	Luca et al. 2007
Eastern Europe	Bulgaria	Bulgarians	Indo-European	South Slavic	808	0.04	Karachanak et al. 2013

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M253	Reference
Eastern Europe	Hungary	Hungarians	Uralic		53	0.04	Battaglia et al. 2009
Western Europe	Zamora Province	Spanish	Indo-European	Italic	235	0.04	Alvarez et al. 2014.
Eastern Europe	Poland	Poles	Indo-European	West Slavic	99	0.04	Battaglia et al. 2009
Mediterranean	Greece	Seskio/Dimini	Indo-European	Greek	57	0.04	King et al. 2011
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	South Slavic	84	0.04	Battaglia et al. 2009
Mediterranean	Albania	Albanians	Indo-European	Albanian	223	0.04	Sarno et al. 2016
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.04	Battaglia et al. 2009
Northern Eurasia	Northern Eurasia	Komi	Uralic		110	0.04	Rootsi et al. 2004
Baltic	Latvia	Latvians	Indo-European	Baltic	113	0.04	Lappalainen et al. 2008
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	720	0.04	Sarac et al. 2016
Eastern Europe	Slovakia	Slovaks	Indo-European	West Slavic	70	0.04	Underhill et al. 2007
Eastern Europe	Southern Russia	Russians	Indo-European	East Slavic	484	0.04	Balanovsky et al. 2008
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.03	Martinez et al. 2007
Eastern Europe	Voronez, Russia	Russians	Indo-European	East Slavic	96	0.03	Underhill et al. 2007
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	South Slavic	81	0.03	Battaglia et al. 2009
Middle East	Turkey	Mediterranean Anatolia	Turkic		33	0.03	King et al. 2011
Baltic	Baltic	Veps	Uralic		39	0.03	Underhill et al. 2007
Caucasus	Caucasus Russia	Lezgians	North Caucasian		31	0.03	Yunusbayev et al. 2012
Mediterranean	Northern Italy	Italians	Indo-European	Italic	194	0.03	Rootsi et al. 2004
Eastern Europe	Bosnia	Bosniacs	Indo-European	South Slavic	100	0.02	Underhill et al. 2007
Mediterranean	Central Italy	Italians	Indo-European	Italic	196	0.02	Rootsi et al. 2004
Western Europe	Lyon and Portier, France	French	Indo-European	Italic	99	0.02	Rootsi et al. 2004

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M253	Reference
Mediterranean	Greece	Nea Nikomedeia	Indo-European	Greek	57	0.02	King et al. 2011
Mediterranean	Greece	Lerna/Franchthi Cave	Indo-European	Greek	57	0.02	King et al. 2011
Eastern Europe	Smolensk, Russia	Russians	Indo-European	East Slavic	103	0.02	Underhill et al. 2007
Middle East	Iran	Gilaki	Indo-European	Iranian	64	0.02	Grugni et al. 2012
Western Europe	France	Provence	Indo-European	Italic	51	0.02	King et al. 2011
Eastern Europe	Northwestern Russia	Komi	Uralic		54	0.02	Mirabal et al. 2009
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.02	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	53	0.02	Underhill et al. 2007
Mediterranean	Greece	Greeks	Indo-European	Greek	171	0.02	Underhill et al. 2007
Western Europe	Austria	Austrians	Indo-European	West Germanic	43	0.02	Underhill et al. 2007
Caucasus	Caucasus Russia	Andis	North Caucasian		49	0.02	Yunusbayev et al. 2012
Caucasus	Georgia	Georgians	Kartvelian		66	0.02	Battaglia et al. 2009
Middle East	Turkey	Turks	Turkic		523	0.01	Underhill et al. 2007
Western Europe	Portugal	Portuguese	Indo-European	Italic	303	0.01	Rootsi et al. 2004
Caucasus	Caucasus Russia	Kabardians	North Caucasian		140	0.01	Yunusbayev et al. 2012
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	92	0.01	Battaglia et al. 2009
Middle East	Turkey	Turks	Turkic		523	0.01	Cinnioğlu et al. 2004
Middle East	Turkey	Central Anatolia	Turkic		90	0.01	King et al. 2011

Supplementary Table 9.5. Distribution of I-M26.

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M26	Reference
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	0.40	Francalacci et al. 2015
Mediterranean	Sardinia	Cagliari, Sorgono, Tempio	Indo-European	Italic	930	0.37	Contu et al. 2008
Western Europe	Pyrenees Mountains, Spain and France	Cerdana	Indo-European	Italic	37	0.16	López-Parra et al. 2009
Western Europe	Pyrenees Mountains, Spain and France	Jacetania	Indo-European	Italic	31	0.10	López-Parra et al. 2009
Western Europe	Pyrenees Mountains, Spain and France	Cinco Villas	Indo-European	Italic	42	0.10	López-Parra et al. 2009
Western Europe	Bernais	French	Indo-European	Italic	26	0.08	Rootsi et al. 2004
Western Europe	Pyrenees Mountains, Spain and France	Valle de Aran	Indo-European	Italic	25	0.08	López-Parra et al. 2009
Western Europe	France and Spain	Basques	Isolate		100	0.06	Rootsi et al. 2004
Western Europe	Catalan	Catalonians	Indo-European	Italic	111	0.04	Santos et al. 2014a
Western Europe	France	Normandy	Indo-European	Italic	42	0.03	Underhill et al. 2007
Western Europe	Pyrenees Mountains, Spain and France	Alto Urgel	Indo-European	Italic	34	0.03	López-Parra et al. 2009
Western Europe	Ireland	Irish	Indo-European	Italic	100	0.02	Underhill et al. 2007
Mediterranean	Italy	Arbereshe	Indo-European	Albanian	150	0.02	Sarno et al. 2016
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.02	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	257	0.01	Luca et al. 2007

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M26	Reference
Western Europe	Portugal	Romani	Indo-European	Indo-Aryan	126	0.01	Gusmão et al. 2008
Mediterranean	Central Italy	Italians	Indo-European	Italic	196	0.01	Rootsi et al. 2004
Western Europe	Lyon and Portier, France	French	Indo-European	Italic	99	0.01	Rootsi et al. 2004
Western Europe	Valencia	Valencians	Indo-European	Italic	59	0.01	Santos et al. 2014a
Western Europe	Galicia	Galicians	Indo-European	Italic	44	0.01	Santos et al. 2014a

Supplementary Table 9.6. Distribution of I-M223.

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M223	Reference
Mediterranean	Italy	Arbereshe	Indo-European	Albanian	150	0.10	Sarno et al. 2016
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	47	0.06	Underhill et al. 2007
Mediterranean	Greece	Phokaia	Indo-European	Greek	31	0.06	King et al. 2011
Western Europe	Germany	Germans	Indo-European	West Germanic	125	0.06	Underhill et al. 2007
Scandinavia	Denmark	Danes	Indo-European	North Germanic	122	0.05	Underhill et al. 2007
Western Europe	Netherlands	Dutch	Indo-European	West Germanic	93	0.05	Underhill et al. 2007
Western Europe	France	Normandy	Indo-European	Italic	42	0.05	Underhill et al. 2007
Scandinavia	Sweden	Swedes	Indo-European	North Germanic	305	0.05	Karlsson et al. 2006
Western Europe	Southern France	French	Indo-European	Italic	38	0.05	Rootsi et al. 2004
Eastern Europe	Eastern Europe	Mordvin	Uralic		83	0.05	Rootsi et al. 2004
Mediterranean	Greece	Seskio/Dimini	Indo-European	Greek	57	0.04	King et al. 2011
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.04	Battaglia et al. 2009
Eastern Europe	Kostroma, Russia	Russians	Indo-European	East Slavic	53	0.04	Underhill et al. 2007
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
Western Europe	Flanders Region, Netherlands and Belgium	Flemish	Indo-European	West Germanic	773	0.03	Larmuseau et al 2014.
Eastern Europe	Eastern Europe	Chuvash	Turkic		80	0.03	Rootsi et al. 2004
Eastern Europe	Hungary	Hungarians	Uralic		215	0.03	Völgyi et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	257	0.03	Luca et al. 2007
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	75	0.03	Battaglia et al. 2009
Western Europe	Zamora Province	Spanish	Indo-European	Italic	235	0.03	Alvarez et al. 2014.
Mediterranean	Central Italy	Italians	Indo-European	Italic	196	0.03	Rootsi et al. 2004
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.03	Haber et al. 2012

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M223	Reference
Baltic	Lithuania	Lithuanians	Indo-European	Baltic	164	0.02	Lappalainen et al. 2008
Mediterranean	Northeastern Italy	Italians	Indo-European	Italic	67	0.02	Battaglia et al. 2009
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.02	Haber et al. 2012
Middle East	Turkey	Northwest Anatolia	Turkic		52	0.02	King et al. 2011
Mediterranean	Greece	Lerna/Franchthi Cave	Indo-European	Greek	57	0.02	King et al. 2011
Eastern Europe	Central Russia	Russians	Indo-European	East Slavic	364	0.02	Balanovsky et al. 2008
Mediterranean	Greece	Nea Nikomedeia	Indo-European	Greek	57	0.02	King et al. 2011
Eastern Europe	Bulgaria	Bulgarians	Indo-European	South Slavic	808	0.02	Karachanak et al. 2013
Scandinavia	Sweden	Swedes	Indo-European	North Germanic	160	0.02	Lappalainen et al. 2008
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	53	0.02	Underhill et al. 2007
Eastern Europe	Hungary	Hungarians	Uralic		113	0.02	Underhill et al. 2007
Eastern Europe	Russia	Cossac	Indo-European	East Slavic	89	0.02	Underhill et al. 2007
Western Europe	Portugal	Portuguese	Indo-European	Italic	303	0.02	Rootsi et al. 2004
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	0.02	Francalacci et al. 2015
Mediterranean	Albania	Albanians	Indo-European	Albanian	223	0.02	Sarno et al. 2016
Mediterranean	Greece	Greeks	Indo-European	Greek	171	0.02	Underhill et al. 2007
Middle East	Turkey	Central Anatolia	Turkic		90	0.01	King et al. 2011
Eastern Europe	Belarus	Belarusians	Indo-European	East Slavic	565	0.01	Kushniarevich et al. 2013
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	South Slavic	81	0.01	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	89	0.01	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	75	0.01	Battaglia et al. 2009
Middle East	Iran	Hazara	Indo-European	Iranian	69	0.01	Di Cristofaro et al. 2013
Scandinavia	Norway	Norwegians	Indo-European	North Germanic	72	0.01	Rootsi et al. 2004
Western Europe	Lyon and Portier, France	French	Indo-European	Italic	99	0.01	Rootsi et al. 2004

Region	Location	Population	Lang Fam	Branch	Sample Size	Freq I-M223	Reference
Western Europe	Andalusia	Andalusians	Indo-European	Italic	103	0.01	Rootsi et al. 2004
Mediterranean	Northern Italy	Italians	Indo-European	Italic	194	0.01	Rootsi et al. 2004
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.01	Martinez et al. 2007
Baltic	Estonia	Estonians	Uralic		210	0.01	Underhill et al. 2007
Western Europe	Switzerland	Swiss	Indo-European		144	0.01	Underhill et al. 2007
Middle East	Turkey	Turks	Turkic		523	0.01	Underhill et al. 2007
Scandinavia	Finland	Eastern Finland	Uralic		306	0.01	Lappalainen et al. 2008
Western Europe	Ireland	Irish	Indo-European	Italic	100	0.01	Underhill et al. 2007
Eastern Europe	Serbia	Serbs	Indo-European	South Slavic	102	0.01	Regueiro et al. 2012.
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	399	0.01	Zupan et al. 2013
Eastern Europe	Croatia	Croats	Indo-European	South Slavic	720	0.01	Sarac et al. 2016
Eastern Europe	Southern Russia	Russians	Indo-European	East Slavic	484	0.01	Balanovsky et al. 2008
Baltic	Latvia	Latvians	Indo-European	Baltic	86	0.01	Rootsi et al. 2004
Scandinavia	Finland	Western Finland	Uralic		230	0.01	Lappalainen et al. 2008
Western Europe	United Kingdom	English	Indo-European	West Germanic	104	0.01	Underhill et al. 2007
Baltic	Latvia	Latvians	Indo-European	Baltic	113	0.01	Lappalainen et al. 2008
Baltic	Estonia	Estonians	Uralic		118	0.01	Lappalainen et al. 2008
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.01	Varzari et al. 2013
Middle East	Turkey	Turks	Turkic		523	0.01	Cinniöglu et al. 2004

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Supplementary Tables for Chapter 10 and Haplogroup J-M304

Supplementary Table 10.1. Distribution and Frequency of J-M304 (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Caucasus	Daghestan	Tsez	North Caucasian		24	1.00	Karafet et al. 2016
Caucasus	Daghestan	Kubachians	North Caucasian		65	0.99	Balanovsky et al. 2011
Caucasus	Russia	Ingush	North Caucasian		143	0.92	Balanovsky et al. 2011
Caucasus	Daghestan	Akhvakhs	North Caucasian		23	0.91	Karafet et al. 2016
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		118	0.83	Balanovsky et al. 2011
Caucasus	Daghestan	Avar	North Caucasian		33	0.82	Karafet et al. 2016
Caucasus	Daghestan	Dargins	North Caucasian		101	0.71	Balanovsky et al. 2011
Caucasus	Daghestan	Nogais	Turkic		22	0.70	Karafet et al. 2016
Caucasus	Daghestan	Avar	North Caucasian		115	0.65	Balanovsky et al. 2011
Caucasus	Daghestan	Lezgians	North Caucasian		81	0.47	Balanovsky et al. 2011
Caucasus	Daghestan	Laks	North Caucasian		22	0.45	Karafet et al. 2016
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	0.41	Balanovsky et al. 2017
Caucasus	Russia	Armenians Krasnodar	Indo-European	Armenian	117	0.40	Balanovsky et al. 2017
Caucasus	Daghestan	Kumyks	Turkic		21	0.39	Karafet et al. 2016
Caucasus	Armenia	Ararat Valley-Armenian	Indo-European	Armenian	110	0.38	Herrera et al. 2012
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	0.38	Hovhannisyan et al. 2014
Caucasus	Azerbaijan	Armenians (Gardman)	Indo-European	Armenian	96	0.36	Herrera et al. 2012
Caucasus	Georgia	Georgians	Kartvelian		66	0.36	Battaglia et al. 2009
Caucasus	Russia	Armenians Hemshin	Indo-European	Armenian	89	0.34	Balanovsky et al. 2017
Caucasus	Russia	Armenians Adigei	Indo-European	Armenian	49	0.31	Balanovsky et al. 2017
Caucasus	Russia	Armenians Don	Indo-European	Armenian	92	0.31	Balanovsky et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Caucasus	Caucasus	Balkarian	Turkic		38	0.24	Battaglia et al. 2009
Caucasus	Azerbaijan	Talysh	Indo-European	Iranian	40	0.23	Nasidze et al. 2009
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	0.21	Karafet et al. 2016
Caucasus	Russia	Abkhaz	North Caucasian		58	0.14	Balanovsky et al. 2011
Caucasus	Russia	Shapsugs	North Caucasian		100	0.06	Balanovsky et al. 2011
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.27	Haber et al. 2012
Central Asia	Uzbekistan	Uzbek	Turkic		52	0.20	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek	Turkic		67	0.19	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek	Turkic		98	0.18	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.18	Haber et al. 2012
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.18	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.17	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Turkmen	Turkic		74	0.16	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	77	0.13	Di Cristofaro et al. 2013
Central Asia	Kazakhstan	Kazakh	Turkic		94	0.09	Zhabagin et al. 2017
Central Asia	Uzbekistan	Karakalpaks	Turkic		100	0.08	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		81	0.07	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	0.07	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Dungan	Sino-Tibetan	Chinese	31	0.07	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	190	0.06	Lacau et al. 2012
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		132	0.05	Di Cristofaro et al. 2013
Central Asia	Kazakhstan	Kazakh	Turkic		55	0.05	Zhabagin et al. 2017
Central Asia	Uzbekistan	Turkmen	Turkic		83	0.02	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	49	0.02	Haber et al. 2012
Central Asia	Kazakhstan	Kazakh	Turkic		119	0.02	Zhabagin et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
East Asia	Northwestern China	Uzbek	Turkic		23	0.35	Shou et al. 2010
East Asia	Northwestern China	Uygurs	Turkic		50	0.34	Shou et al. 2010
East Asia	Xinjiang, China	Keriyans	Turkic		70	0.18	Chen et al. 2014
East Asia	Northwestern China	Tajiks	Indo-European	Iranian	31	0.16	Shou et al. 2010
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.16	Battaglia et al. 2009
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.14	Karachanak et al. 2013
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	Slavic	84	0.12	Battaglia et al. 2009
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.10	Battaglia et al. 2009
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	Slavic	81	0.10	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	Slavic	720	0.09	Sarac et al. 2016
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.08	Varzari et al. 2013.
Eastern Europe	Serbia	Serb	Indo-European	Slavic	103	0.08	Regueiro et al. 2012
Eastern Europe	Croatia	Croats (Osijek)	Indo-European	Slavic	29	0.08	Battaglia et al. 2009
Eastern Europe	Ukraine	Ukrainians	Indo-European	Slavic	92	0.07	Battaglia et al. 2009
Eastern Europe	Bosnia-Herzegovina	Croats	Indo-European	Slavic	90	0.06	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czech	Indo-European	Slavic	75	0.05	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenians	Indo-European	Slavic	75	0.04	Battaglia et al. 2009
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.04	Rebala et al. 2013
Eastern Europe	Croatia	Croats	Indo-European	Slavic	89	0.03	Battaglia et al. 2009
Eastern Europe	Poland	Kurpie	Indo-European	Slavic	158	0.03	Rebala et al. 2013
Eastern Europe	Poland	Poles	Indo-European	Slavic	913	0.03	Kayser et al. 2005
Eastern Europe	Poland	Kashubians	Indo-European	Slavic	204	0.02	Rebala et al. 2013
Eastern Europe	Poland	Poles	Indo-European	Slavic	99	0.02	Battaglia et al. 2009
Eastern Europe	Poland	Kociewie	Indo-European	Slavic	158	0.02	Rebala et al. 2013
Eastern Europe	Hungary	Hungarians	Uralic		53	0.02	Battaglia et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.40	Voskarides et al. 2016
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.38	Martinez et al. 2007
Mediterranean	Crete	Cretans	Indo-European	Greek	193	0.36	King et al. 2008
Mediterranean	Albania	Gheg	Indo-European	Albanian	119	0.31	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Italy	Sardianians	Indo-European	Italic	236	0.30	Di Gaetano et al. 2009
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	0.27	King et al. 2011
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.24	Battaglia et al. 2009
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	0.23	King et al. 2011
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.23	Battaglia et al. 2009
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	0.22	King et al. 2011
Mediterranean	Phokaia, Greece	Greeks	Indo-European	Greeks	31	0.22	King et al. 2011
Mediterranean	Albania	Albanians (Tosk)	Indo-European	Albanian	104	0.21	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	0.18	King et al. 2011
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.17	Boattini et al. 2013
Mediterranean	North Eastern Italy	Italians	Indo-European	Italic	67	0.14	Battaglia et al. 2009
North Africa	Sudan	Copts	Afro-Asiatic	Egyptian	33	0.45	Hassan et al. 2008
North Africa	Sudan	Nubians	Nilo-Saharan		39	0.44	Hassan et al. 2008
North Africa	Sudan	Beja	Afro-Asiatic	Cushitic	42	0.38	Hassan et al. 2008
North Africa	Libya	Libyans	Afro-Asiatic	Semitic	215	0.34	Fadhlaoui-Zid et al. 2013
North Africa	Tunisia	Sousse	Afro-Asiatic	Semitic	220	0.34	Fadhlaoui-Zid et al. 2015
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	147	0.33	Luis et al. 2004; Chiaroni et al. 2008

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
North Africa	Sudan	Amhara	Afro-Asiatic	Semitic	48	0.31	Hassan et al. 2008; Chiaroni et al. 2010
North Africa	Morocco	Moroccans	Afro-Asiatic	Semitic	87	0.28	Fadhlaoui-Zid et al. 2013
North Africa	Algeria	Arabs	Afro-Asiatic	Semitic	102	0.25	Robino et al. 2008
North Africa	Morocco	Berber	Afro-Asiatic	Berber	103	0.11	Semino et al. 2004
North Africa	Morocco	Berber	Afro-Asiatic	Berber	64	0.06	Semino et al. 2004
North Africa	Sudan	Masalit	Nilo-Saharan		32	0.06	Hassan et al. 2008
North Africa	Sudan	Fur	Nilo-Saharan		32	0.06	Hassan et al. 2008
North Africa	Sudan	Oromo	Afro-Asiatic	Cushitic	78	0.04	Hassan et al. 2008
Northern Eurasia	Siberia, Russia	Tatars	Turkic		776	0.12	Agdzhoyan et al. 2016
South Asia	India	Asur	Austro-Asiatic	Munda	40	0.78	Singh et al. 2017
South Asia	India	Pichakuntla	Dravidian		39	0.59	Singh et al. 2017
South Asia	India	Narikuravar	Dravidian		95	0.58	Singh et al. 2017
South Asia	India	Toda	Dravidian		29	0.55	Singh et al. 2017
South Asia	India	Chenchu	Dravidian		38	0.43	Singh et al. 2017
South Asia	India	Shikari	Indo-European	Indo-Aryan	46	0.41	Singh et al. 2017
South Asia	Southern India	Andh	Indo-European	Indo-Aryan	54	0.35	Thanseem et al. 2006
South Asia	India	Bahelia	Indo-European	Indo-Aryan	52	0.31	Singh et al. 2017
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	21	0.29	Di Cristofaro et al. 2013
South Asia	India	Lohana	Indo-European	Indo-Aryan	39	0.28	Singh et al. 2017
South Asia	Pakistan	Brahui	Dravidian		25	0.28	Di Cristofaro et al. 2013
South Asia	West Bengal, India	Dhimal	Sino-Tibetan	Tibeto-Burman	36	0.28	Debnath et al. 2011
South Asia	India	Kashmiri Pandit	Indo-European	Indo-Aryan	23	0.26	Singh et al. 2017
South Asia	India	Mondi	Dravidian		44	0.24	Singh et al. 2017
South Asia	India	Badagas	Dravidian		56	0.21	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
South Asia	India	Havik	Dravidian		15	0.20	Singh et al. 2017
South Asia	India	Kathodi	Indo-European	Indo-Aryan	11	0.18	Singh et al. 2017
South Asia	India	Banjara (Lambadi)	Indo-European	Iranian	33	0.18	Singh et al. 2017
South Asia	India	Kamboj	Indo-European	Indo-Aryan	41	0.17	Singh et al. 2017
South Asia	West Bengal, India	Bengali	Indo-European	Indo-Aryan	54	0.17	Debnath et al. 2011
South Asia	India	Korku	Austro-Asiatic	Munda	36	0.17	Singh et al. 2017
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	0.16	Di Cristofaro et al. 2013
South Asia	Uttar Pradesh, India	Tharu	Indo-European	Indo-Aryan	164	0.16	Chaubey et al. 2014
South Asia	India	Thapa	Sino-Tibetan	Tibeto-Burman	39	0.15	Singh et al. 2017
South Asia	India	Buxas	Indo-European	Indo-Aryan	40	0.15	Singh et al. 2017
South Asia	Nepal	Tharu	Indo-European	Indo-Aryan	202	0.13	Chaubey et al. 2014; Fornarino et al. 2009
South Asia	Gujarat, India	Chaudhari	Indo-European	Indo-Aryan	113	0.13	Khurana et al. 2014
South Asia	India	Meena	Indo-European	Indo-Aryan	40	0.13	Singh et al. 2017
South Asia	India	Mahadev Koli	Indo-European	Indo-Aryan	41	0.12	Singh et al. 2017
South Asia	Gujarat, India	Dubla	Indo-European	Indo-Aryan	42	0.12	Khurana et al. 2014
South Asia	India	Bhil	Indo-European	Indo-Aryan	17	0.12	Singh et al. 2017
South Asia	India	Sonakar	Indo-European	Indo-Aryan	39	0.10	Singh et al. 2017
South Asia	Southern India	Pardhan	Dravidian		128	0.10	Thanseem et al. 2006
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	0.10	Di Cristofaro et al. 2013
South Asia	India	Palliyar	Dravidian		21	0.10	Singh et al. 2017
South Asia	West Bengal, India	Rajbanshi	Indo-European	Indo-Aryan	51	0.10	Debnath et al. 2011
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	270	0.10	Lee et al. 2014
South Asia	India	Yanadi	Dravidian		53	0.10	Singh et al. 2017
South Asia	India	Tadvi	Indo-European	Indo-Aryan	42	0.10	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	44	0.09	Firasat et al. 2007
South Asia	India	Lingayat	Dravidian		45	0.09	Singh et al. 2017
South Asia	India	Uttar Pradesh	Indo-European	Indo-Aryan	91	0.09	Singh et al. 2017
South Asia	India	Gond	Dravidian		60	0.08	Singh et al. 2017
South Asia	India	Malayan	Dravidian		24	0.08	Singh et al. 2017
South Asia	Pakistan	Burusho	Isolate		97	0.08	Firasat et al. 2007
South Asia	Southwest India	Lingayat	Dravidian		101	0.08	Chennakrishnaiah et al. 2013
South Asia	Southwest India	Vokkaliga	Dravidian		102	0.08	Chennakrishnaiah et al. 2013
South Asia	Gujarat, India	Dhodia	Indo-European	Indo-Aryan	63	0.08	Khurana et al. 2014
South Asia	India	Chattisgarh	Indo-European	Indo-Aryan	126	0.08	Singh et al. 2017
South Asia	India	Vysya	Dravidian		40	0.08	Singh et al. 2017
South Asia	Southern India	Naikpod	Dravidian		68	0.07	Thanseem et al. 2006
South Asia	India	Khatri	Indo-European	Indo-Aryan	71	0.07	Singh et al. 2017
South Asia	India	Halakki	Dravidian		31	0.06	Singh et al. 2017
South Asia	India	Kotiya	Indo-European	Indo-Aryan	74	0.05	Singh et al. 2017
South Asia	India	Sugali	Indo-European	Iranian	76	0.05	Singh et al. 2017
South Asia	India	Bisht	Indo-European	Indo-Aryan	39	0.05	Singh et al. 2017
South Asia	India	Parayar	Dravidian		20	0.05	Singh et al. 2017
South Asia	India	Naidu	Dravidian		20	0.05	Singh et al. 2017
South Asia	Pakistan	Burusho	Isolate		20	0.05	Di Cristofaro et al. 2013
South Asia	India	Yadava	Dravidian		41	0.05	Singh et al. 2017
South Asia	Gujarat, India	Vasava	Indo-European	Indo-Aryan	24	0.04	Khurana et al. 2014
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
South Asia	India	Baiga	Indo-European	Indo-Aryan	28	0.04	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
South Asia	India	Baghel	Indo-European	Indo-Aryan	36	0.03	Singh et al. 2017
South Asia	India	Hill Korwa	Austro-Asiatic	Munda	35	0.03	Singh et al. 2017
South Asia	India	Saharia	Indo-European	Indo-Aryan	37	0.03	Singh et al. 2017
South Asia	India	Tharu	Indo-European	Indo-Aryan	41	0.02	Singh et al. 2017
South Asia	India	Reddy	Dravidian		49	0.02	Singh et al. 2017
Southwest Asia	Iraq	Marsh Arabs	Afro-Asiatic	Semitic	143	0.85	Al-Zahery et al. 2011
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.82	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Kuwait	Bedouin	Afro-Asiatic	Semitic	148	0.80	Mohammad et al. 2009
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.73	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Negev	Bedouin	Afro-Asiatic	Semitic	28	0.68	Cann et al. 2002; Chiaroni et al. 2010
Southwest Asia	Qatar	Qatari	Afro-Asiatic	Semitic	72	0.67	Cadenas et al. 2008
Southwest Asia	Qatar	Qatarians	Afro-Asiatic	Semitic	72	0.58	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	0.58	Abu-Amro et al. 2009
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.55	Al-Zahery et al. 2011
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	76	0.49	Chiaroni et al. 2010
Southwest Asia	Omani	Omani	Afro-Asiatic	Semitic	121	0.48	Luis et al. 2004; Chiaroni et al. 2008
Southwest Asia	Syria	Sunni Hama	Afro-Asiatic	Semitic	36	0.47	Chiaroni et al. 2010
Southwest Asia	Turkey	Turks (Northwest Anatolia)	Turkic		52	0.47	King et al. 2011
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	916	0.46	Zalloua et al. 2008
Southwest Asia	United Arab Emirates	Emirati	Afro-Asiatic	Semitic	164	0.45	Cadenas et al. 2008; Chiaroni et al. 2010

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Southwest Asia	Jordan	Jordanian	Afro-Asiatic	Semitic	146	0.44	Flores et al. 2005
Southwest Asia	Turkey	Armenians (Lake Van)	Indo-European	Armenian	103	0.43	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	0.43	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	0.43	Hovhannisyan et al. 2014
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	0.42	Hovhannisyan et al. 2014
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.42	Grugni et al. 2012
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.40	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	0.40	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Turks	Turkic		33	0.39	King et al. 2011
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.36	Grugni et al. 2012
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.36	Grugni et al. 2012
Southwest Asia	Turkey	Central Anatolia population**	Turkic		90	0.36	King et al. 2011
Southwest Asia	UAE	Emirati	Afro-Asiatic	Semitic	164	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Turkey	Turks	Turkic		523	0.33	Cinnioglu et al. 2004
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	12	0.33	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Palestine	Palestinians	Afro-Asiatic	Semitic	49	0.33	Chiaroni et al. 2010
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.32	Grugni et al. 2012
Southwest Asia	Iran	Talysh	Indo-European	Iranian	50	0.32	Nasidze et al. 2009
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.31	Grugni et al. 2012
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	39	0.31	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.29	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Southwest Asia	Iraq	Assyrians	Afro-Asiatic	Semitic	28	0.29	Chiaroni et al. 2010
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.27	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.27	Hovhannisyan et al. 2014
Southwest Asia	Nassiriya, Iraq	Iraqi	Afro-Asiatic	Semitic	56	0.27	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Syria	Alawites	Afro-Asiatic	Semitic	45	0.27	Chiaroni et al. 2010
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.24	Grugni et al. 2012
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.22	Grugni et al. 2012
Southwest Asia	Turkey	Assyrians	Afro-Asiatic	Semitic	25	0.20	Chiaroni et al. 2010
Southwest Asia	Iran	Ossetians (Iron)	Indo-European	Iranian	230	0.20	Balanovsky et al. 2011
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	31	0.16	Chiaroni et al. 2010
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	0.16	King et al. 2011
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.16	Balanovsky et al. 2011
Southwest Asia	Syria	Druze	Afro-Asiatic	Semitic	34	0.15	Chiaroni et al. 2010
Southwest Asia	Galilee	Druze	Afro-Asiatic	Semitic	172	0.13	Shlush et al. 2008; Chiaroni et al. 2008
Southwest Asia	Iran	Azerbaijani	Turkic		63	0.13	Grugni et al. 2012
Southwest Asia	Iran	Turkmen	Turkic		68	0.13	Grugni et al. 2012
Southwest Asia	Iraq	Kurds	Indo-European	Iranian	93	0.12	Chiaroni et al. 2010
Southwest Asia	Northeastern Syria	Assyrians	Afro-Asiatic	Semitic	30	0.03	Chiaroni et al. 2010
Sub-Saharan Africa	Ethiopia	Oromo	Afro-Asiatic	Cushitic	18	0.33	Haber et al. 2016
Sub-Saharan Africa	Ethiopia	Amhara	Afro-Asiatic	Semitic	27	0.22	Haber et al. 2016
Sub-Saharan Africa	Ethiopia	Somali	Afro-Asiatic	Cushitic	16	0.06	Haber et al. 2016

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J-M304	Reference
Western Europe	France	French (Provence)	Indo-European	Italic	51	0.12	King et al. 2011
Western Europe	Iberia	Iberians	Indo-European	Italic	1140	0.08	Adams et al. 2008
Western Europe	Bavaria, Germany	Germans	Indo-European	Germanic	218	0.07	Rebala et al. 2013
Western Europe	France	French	Indo-European	Italic	558	0.06	Ramos-Luis et al. 2014
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.06	Larmuseau et al. 2014
Western Europe	Germany	Germans	Indo-European	Germanic	1215	0.04	Kayser et al. 2005
Western Europe	Germany	Sorbs	Indo-European	Slavic	123	0.03	Rebala et al. 2013
Western Europe	Mecklenburg, Germany	Germans	Indo-European	Germanic	131	0.03	Rebala et al. 2013
Western Europe	England	English	Indo-European	Germanic	1165	0.03	Capelli et al. 2003

Supplementary Table 10.2. Distribution and Frequency of J1-M267 (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Caucasus	Daghestan	Tsez	North Caucasian		24	1.00	Karafet et al. 2016
Caucasus	Daghestan	Kubachians	North Caucasian		65	0.99	Balanovsky et al. 2011
Caucasus	Daghestan	Akhvakhs	North Caucasian		23	0.91	Karafet et al. 2016
Caucasus	Daghestan	Avar	North Caucasian		33	0.73	Karafet et al. 2016
Caucasus	Daghestan	Dargins	North Caucasian		101	0.70	Balanovsky et al. 2011
Caucasus	Daghestan	Avar	North Caucasian		115	0.59	Balanovsky et al. 2011
Caucasus	Daghestan	Laks	North Caucasian		22	0.45	Karafet et al. 2016
Caucasus	Daghestan	Lezgians	North Caucasian		81	0.44	Balanovsky et al. 2011
Caucasus	Daghestan	Nogais	Turkic		22	0.41	Karafet et al. 2016
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		118	0.25	Balanovsky et al. 2011
Caucasus	Daghestan	Kумыks	Turkic		21	0.24	Karafet et al. 2016
Caucasus	Russia	Armenians Don	Indo-European	Armenian	92	0.15	Balanovsky et al. 2017
Caucasus	Armenia	Ararat Valley- Armenian	Indo-European	Armenian	110	0.15	Herrera et al. 2012
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	0.13	Hovhannisyan et al. 2014
Caucasus	Russia	Armenians Krasnodar	Indo-European	Armenian	117	0.10	Balanovsky et al. 2017
Caucasus	Russia	Armenians Adigei	Indo-European	Armenian	49	0.07	Balanovsky et al. 2017
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	0.05	Balanovsky et al. 2017
Caucasus	Georgia	Georgians	Kartvelian		66	0.05	Battaglia et al. 2009
Caucasus	Azerbaijan	Armenians (Gardman)	Indo-European	Armenian	96	0.04	Herrera et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	0.04	Karafet et al. 2016
Caucasus	Russia	Ingush	North Caucasian		143	0.03	Balanovsky et al. 2011
Caucasus	Russia	Armenians Hemshin	Indo-European	Armenian	89	0.02	Balanovsky et al. 2017
Central Asia	Afghanistan	Turkmen	Turkic		74	0.08	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Uzbek	Turkic		67	0.08	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek	Turkic		98	0.05	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek	Turkic		52	0.04	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		55	0.03	Zhabagin et al. 2017
Central Asia	Uzbekistan	Karakalpaks	Turkic		100	0.03	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.03	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.02	Haber et al. 2012
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.02	Di Cristofaro et al. 2013
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		132	0.02	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Turkmen	Turkic		83	0.01	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		81	0.01	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	0.01	Di Cristofaro et al. 2013
East Asia	Xinjiang, China	Keriyans	Turkic		70	0.04	Chen et al. 2014
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.06	Battaglia et al. 2009
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.04	Varzari et al. 2013.
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.03	Karachanak et al. 2013
Eastern Europe	Bosnia- Herzegovina	Bosniacs	Indo-European	Slavic	84	0.02	Battaglia et al. 2009
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.02	Rebala et al. 2013
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.02	Battaglia et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Eastern Europe	Slovenia	Slovenians	Indo-European	Slavic	75	0.01	Battaglia et al. 2009
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	Slavic	81	0.01	Battaglia et al. 2009
Eastern Europe	Serbia	Serb	Indo-European	Slavic	103	0.01	Regueiro et al. 2012
Eastern Europe	Poland	Poles	Indo-European	Slavic	99	0.01	Battaglia et al. 2009
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	0.11	King et al. 2011
Mediterranean	Phokaia, Greece	Greeks	Indo-European	Greeks	31	0.10	King et al. 2011
Mediterranean	Crete	Cretans	Indo-European	Greek	193	0.08	King et al. 2008
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.07	Voskarides et al. 2016
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	0.05	King et al. 2011
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	0.04	King et al. 2011
Mediterranean	Italy	Sardianians	Indo-European	Italic	236	0.04	Di Gaetano et al. 2009
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.04	Boattini et al. 2013
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.04	Battaglia et al. 2009
Mediterranean	Albania	Gheg	Indo-European	Albanian	119	0.03	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.02	Battaglia et al. 2009
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	0.02	King et al. 2011
Mediterranean	Albania	Albanians (Tosk)	Indo-European	Albanian	104	0.02	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.02	Martinez et al. 2007
North Africa	Sudan	Nubians	Nilo-Saharan		39	0.41	Hassan et al. 2008
North Africa	Sudan	Copts	Afro-Asiatic	Egyptian	33	0.39	Hassan et al. 2008
North Africa	Sudan	Beja	Afro-Asiatic	Cushitic	42	0.36	Hassan et al. 2008

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
North Africa	Libya	Libyans	Afro-Asiatic	Semitic	215	0.31	Fadhlaoui-Zid et al. 2013
North Africa	Sudan	Amhara	Afro-Asiatic	Semitic	48	0.29	Hassan et al. 2008; Chiaroni et al. 2010
North Africa	Tunisia	Sousse	Afro-Asiatic	Semitic	220	0.25	Fadhlaoui-Zid et al. 2015
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	147	0.21	Luis et al. 2004; Chiaroni et al. 2008
North Africa	Algeria	Arabs	Afro-Asiatic	Semitic	102	0.20	Robino et al. 2008
North Africa	Morocco	Moroccans	Afro-Asiatic	Semitic	87	0.20	Fadhlaoui-Zid et al. 2013
North Africa	Morocco	Berber	Afro-Asiatic	Berber	103	0.08	Semino et al. 2004
North Africa	Morocco	Berber	Afro-Asiatic	Berber	64	0.06	Semino et al. 2004
North Africa	Sudan	Fur	Nilo-Saharan		32	0.06	Hassan et al. 2008
North Africa	Sudan	Masalit	Nilo-Saharan		32	0.06	Hassan et al. 2008
North Africa	Sudan	Oromo	Afro-Asiatic	Cushitic	78	0.04	Hassan et al. 2008
Northern Eurasia	Siberia, Russia	Tatars	Turkic		776	0.02	Agdzhoyan et al. 2016
South Asia	Pakistan	Brahui	Dravidian		25	0.12	Di Cristofaro et al. 2013
South Asia	India	Kashmiri Pandit	Indo-European	Indo-Aryan	23	0.09	Singh et al. 2017
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	0.08	Di Cristofaro et al. 2013
South Asia	India	Sonakar	Indo-European	Indo-Aryan	39	0.08	Singh et al. 2017
South Asia	India	Chenchu	Dravidian		38	0.03	Singh et al. 2017
South Asia	India	Mahadev Koli	Indo-European	Indo-Aryan	41	0.02	Singh et al. 2017
South Asia	India	Sugali	Indo-European	Iranian	76	0.01	Singh et al. 2017
Southwest Asia	Iraq	Marsh Arabs	Afro-Asiatic	Semitic	143	0.81	Al-Zahery et al. 2011
Southwest Asia	Kuwait	Bedouin	Afro-Asiatic	Semitic	148	0.80	Mohammad et al. 2009
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.73	Cadenas et al. 2008; Chiaroni et al. 2010

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.73	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Negev	Bedouin	Afro-Asiatic	Semitic	28	0.68	Cann et al. 2002; Chiaroni et al. 2010
Southwest Asia	Qatar	Qatarian	Afro-Asiatic	Semitic	72	0.58	Cadenas et al. 2008
Southwest Asia	Qatar	Qatarians	Afro-Asiatic	Semitic	72	0.58	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	76	0.49	Chiaroni et al. 2010
Southwest Asia	Syria	Sunni Hama	Afro-Asiatic	Semitic	36	0.47	Chiaroni et al. 2010
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	0.40	Abu-Amero et al. 2009
Southwest Asia	Omani	Omani	Afro-Asiatic	Semitic	121	0.38	Luis et al. 2004; Chiaroni et al. 2008
Southwest Asia	United Arab Emirates	Emirati	Afro-Asiatic	Semitic	164	0.35	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	UAE	Emirati	Afro-Asiatic	Semitic	164	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	12	0.33	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Palestine	Palestinians	Afro-Asiatic	Semitic	49	0.33	Chiaroni et al. 2010
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.31	Al-Zahery et al. 2011
Southwest Asia	Jordan	Jordanian	Afro-Asiatic	Semitic	146	0.31	Flores et al. 2005
Southwest Asia	Iraq	Assyrians	Afro-Asiatic	Semitic	28	0.29	Chiaroni et al. 2010
Southwest Asia	Nassiriya, Iraq	Iraqi	Afro-Asiatic	Semitic	56	0.27	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Syria	Alawites	Afro-Asiatic	Semitic	45	0.27	Chiaroni et al. 2010
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	916	0.20	Zalloua et al. 2008
Southwest Asia	Turkey	Assyrians	Afro-Asiatic	Semitic	25	0.20	Chiaroni et al. 2010

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	0.20	Hovhannisyan et al. 2014
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	39	0.18	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	0.17	Hovhannisyan et al. 2014
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	31	0.16	Chiaroni et al. 2010
Southwest Asia	Turkey	Turks	Turkic		33	0.15	King et al. 2011
Southwest Asia	Turkey	Turks (Northwest Anatolia)	Turkic		52	0.15	King et al. 2011
Southwest Asia	Syria	Druze	Afro-Asiatic	Semitic	34	0.15	Chiaroni et al. 2010
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	0.14	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Lake Van)	Indo-European	Armenian	103	0.14	Herrera et al. 2012
Southwest Asia	Galilee	Druze	Afro-Asiatic	Semitic	172	0.13	Shlush et al. 2008; Chiaroni et al. 2008
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.13	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	0.12	Hovhannisyan et al. 2014
Southwest Asia	Iraq	Kurds	Indo-European	Iranian	93	0.12	Chiaroni et al. 2010
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.11	Grugni et al. 2012
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.11	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.10	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.10	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.10	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Turks	Turkic		523	0.09	Cinnioglu et al. 2004
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.08	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1-M267	Reference
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.07	Grugni et al. 2012
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.06	Grugni et al. 2012
Southwest Asia	Turkey	Central Anatolia population**	Turkic		90	0.06	King et al. 2011
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.06	Grugni et al. 2012
Southwest Asia	Iran	Turkmen	Turkic		68	0.06	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.05	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.04	Balanovsky et al. 2011
Southwest Asia	Northeastern Syria	Assyrians	Afro-Asiatic	Semitic	30	0.03	Chiaroni et al. 2010
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	0.03	King et al. 2011
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.03	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Iron)	Indo-European	Iranian	230	0.01	Balanovsky et al. 2011
Sub-Saharan Africa	Ethiopia	Oromo	Afro-Asiatic	Cushitic	18	0.33	Haber et al. 2016
Sub-Saharan Africa	Ethiopia	Amhara	Afro-Asiatic	Semitic	27	0.11	Haber et al. 2016
Western Europe	France	French (Provence)	Indo-European	Italic	51	0.02	King et al. 2011
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.01	Larmuseau et al. 2014

Supplementary Table 10.3. Distribution and Frequency of J2-M172 (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Caucasus	Russia	Ingush	North Caucasian		143	0.89	Balanovsky et al. 2011
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		118	0.58	Balanovsky et al. 2011
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	0.36	Balanovsky et al. 2017
Caucasus	Azerbaijan	Armenians (Gardman)	Indo-European	Armenian	96	0.32	Herrera et al. 2012
Caucasus	Russia	Armenians Hemshin	Indo-European	Armenian	89	0.32	Balanovsky et al. 2017
Caucasus	Georgia	Georgians	Kartvelian		66	0.32	Battaglia et al. 2009
Caucasus	Russia	Armenians Krasnodar	Indo-European	Armenian	117	0.30	Balanovsky et al. 2017
Caucasus	Daghestan	Nogais	Turkic		22	0.29	Karafet et al. 2016
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	0.25	Hovhannisyan et al. 2014
Caucasus	Russia	Armenians Adigei	Indo-European	Armenian	49	0.24	Balanovsky et al. 2017
Caucasus	Caucasus	Balkarian	Turkic		38	0.24	Battaglia et al. 2009
Caucasus	Armenia	Ararat Valley- Armenian	Indo-European	Armenian	110	0.24	Herrera et al. 2012
Caucasus	Azerbaijan	Talysh	Indo-European	Iranian	40	0.23	Nasidze et al. 2009
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	0.17	Karafet et al. 2016
Caucasus	Russia	Armenians Don	Indo-European	Armenian	92	0.16	Balanovsky et al. 2017
Caucasus	Daghestan	Kumyks	Turkic		21	0.15	Karafet et al. 2016

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Caucasus	Russia	Abkhaz	North Caucasian		58	0.14	Balanovsky et al. 2011
Caucasus	Daghestan	Avar	North Caucasian		33	0.09	Karafet et al. 2016
Caucasus	Russia	Shapsugs	North Caucasian		100	0.06	Balanovsky et al. 2011
Caucasus	Daghestan	Avar	North Caucasian		115	0.06	Balanovsky et al. 2011
Caucasus	Daghestan	Lezgians	North Caucasian		81	0.03	Balanovsky et al. 2011
Caucasus	Daghestan	Dargins	North Caucasian		101	0.01	Balanovsky et al. 2011
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.27	Haber et al. 2012
Central Asia	Uzbekistan	Uzbek	Turkic		52	0.16	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.16	Haber et al. 2012
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.16	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.15	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Uzbek	Turkic		98	0.13	Zhabagin et al. 2017
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	77	0.13	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Uzbek	Turkic		67	0.12	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		94	0.09	Zhabagin et al. 2017
Central Asia	Afghanistan	Turkmen	Turkic		74	0.08	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Dungan	Sino-Tibetan	Chinese	31	0.07	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		81	0.06	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	0.06	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	190	0.06	Lacau et al. 2012
Central Asia	Uzbekistan	Karakalpaks	Turkic		100	0.05	Zhabagin et al. 2017
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		132	0.04	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	49	0.02	Haber et al. 2012
Central Asia	Kazakhstan	Kazakh	Turkic		55	0.02	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		119	0.02	Zhabagin et al. 2017
Central Asia	Uzbekistan	Turkmen	Turkic		83	0.01	Zhabagin et al. 2017
East Asia	Northwestern China	Uygurs	Turkic		50	0.34	Shou et al. 2010
East Asia	Northwestern China	Uzbek	Turkic		23	0.30	Shou et al. 2010
East Asia	Northwestern China	Tajiks	Indo-European	Iranian	31	0.16	Shou et al. 2010
East Asia	Xinjiang, China	Keriyans	Turkic		70	0.14	Chen et al. 2014
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.14	Battaglia et al. 2009
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.11	Karachanak et al. 2013
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	Slavic	84	0.10	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	Slavic	720	0.09	Sarac et al. 2016
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	Slavic	81	0.09	Battaglia et al. 2009
Eastern Europe	Croatia	Croats (Osijek)	Indo-European	Slavic	29	0.08	Battaglia et al. 2009
Eastern Europe	Serbia	Serb	Indo-European	Slavic	103	0.07	Regueiro et al. 2012
Eastern Europe	Ukraine	Ukrainians	Indo-European	Slavic	92	0.07	Battaglia et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Eastern Europe	Bosnia-Herzegovina	Croats	Indo-European	Slavic	90	0.06	Battaglia et al. 2009
Eastern Europe	Czech Republic	Czech	Indo-European	Slavic	75	0.05	Battaglia et al. 2009
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.04	Battaglia et al. 2009
Eastern Europe	Moldova	Moldavians	Indo-European	Italic	125	0.04	Varzari et al. 2013.
Eastern Europe	Croatia	Croats	Indo-European	Slavic	89	0.03	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenians	Indo-European	Slavic	75	0.03	Battaglia et al. 2009
Eastern Europe	Poland	Kurpie	Indo-European	Slavic	158	0.03	Rebala et al. 2013
Eastern Europe	Poland	Poles	Indo-European	Slavic	913	0.03	Kayser et al. 2005
Eastern Europe	Poland	Kashubians	Indo-European	Slavic	204	0.02	Rebala et al. 2013
Eastern Europe	Poland	Kociewie	Indo-European	Slavic	158	0.02	Rebala et al. 2013
Eastern Europe	Hungary	Hungarians	Uralic		53	0.02	Battaglia et al. 2009
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.02	Rebala et al. 2013
Eastern Europe	Poland	Poles	Indo-European	Slavic	99	0.01	Battaglia et al. 2009
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.36	Martinez et al. 2007

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.33	Voskarides et al. 2016
Mediterranean	Albania	Gheg	Indo-European	Albanian	119	0.28	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Crete	Cretans	Indo-European	Greek	193	0.28	King et al. 2008
Mediterranean	Italy	Sardianians	Indo-European	Italic	236	0.26	Di Gaetano et al. 2009
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	0.22	King et al. 2011
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.21	Battaglia et al. 2009
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.20	Battaglia et al. 2009
Mediterranean	Albania	Albanians (Tosk)	Indo-European	Albanian	104	0.19	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	0.19	King et al. 2011
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	0.16	King et al. 2011
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.14	Boattini et al. 2013
Mediterranean	North Eastern Italy	Italians	Indo-European	Italic	67	0.14	Battaglia et al. 2009
Mediterranean	Phokaia, Greece	Greeks	Indo-European	Greeks	31	0.12	King et al. 2011
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	0.11	King et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	147	0.12	Luis et al. 2004; Chiaroni et al. 2008
North Africa	Morocco	Moroccans	Afro-Asiatic	Semitic	87	0.09	Fadhlaoui-Zid et al. 2013
North Africa	Tunisia	Sousse	Afro-Asiatic	Semitic	220	0.08	Fadhlaoui-Zid et al. 2015
North Africa	Sudan	Copts	Afro-Asiatic	Egyptian	33	0.06	Hassan et al. 2008
North Africa	Algeria	Arabs	Afro-Asiatic	Semitic	102	0.05	Robino et al. 2008
North Africa	Libya	Libyans	Afro-Asiatic	Semitic	215	0.03	Fadhlaoui-Zid et al. 2013
North Africa	Morocco	Berber	Afro-Asiatic	Berber	103	0.03	Semino et al. 2004
North Africa	Sudan	Nubians	Nilo-Saharan		39	0.03	Hassan et al. 2008
North Africa	Sudan	Beja	Afro-Asiatic	Cushitic	42	0.02	Hassan et al. 2008
North Africa	Sudan	Amhara	Afro-Asiatic	Semitic	48	0.02	Hassan et al. 2008; Chiaroni et al. 2010
Northern Eurasia	Siberia, Russia	Tatars	Turkic		776	0.10	Agdzhoyan et al. 2016
South Asia	India	Asur	Austro-Asiatic	Munda	40	0.78	Singh et al. 2017
South Asia	India	Pichakuntla	Dravidian		39	0.59	Singh et al. 2017
South Asia	India	Narikuravar	Dravidian		95	0.58	Singh et al. 2017
South Asia	India	Toda	Dravidian		29	0.55	Singh et al. 2017
South Asia	India	Shikari	Indo-European	Indo-Aryan	46	0.41	Singh et al. 2017
South Asia	India	Chenchu	Dravidian		38	0.40	Singh et al. 2017
South Asia	Southern India	Andh	Indo-European	Indo-Aryan	54	0.35	Thanseem et al. 2006
South Asia	India	Bahelia	Indo-European	Indo-Aryan	52	0.31	Singh et al. 2017
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	21	0.29	Di Cristofaro et al. 2013
South Asia	India	Lohana	Indo-European	Indo-Aryan	39	0.28	Singh et al. 2017
South Asia	West Bengal, India	Dhimal	Sino-Tibetan	Tibeto-Burman	36	0.28	Debnath et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
South Asia	India	Mondi	Dravidian		44	0.24	Singh et al. 2017
South Asia	India	Badagas	Dravidian		56	0.21	Singh et al. 2017
South Asia	India	Havik	Dravidian		15	0.20	Singh et al. 2017
South Asia	India	Banjara (Lambadi)	Indo-European	Iranian	33	0.18	Singh et al. 2017
South Asia	India	Kathodi	Indo-European	Indo-Aryan	11	0.18	Singh et al. 2017
South Asia	India	Kashmiri Pandit	Indo-European	Indo-Aryan	23	0.17	Singh et al. 2017
South Asia	India	Kamboj	Indo-European	Indo-Aryan	41	0.17	Singh et al. 2017
South Asia	West Bengal, India	Bengali	Indo-European	Indo-Aryan	54	0.17	Debnath et al. 2011
South Asia	India	Korku	Austro-Asiatic	Munda	36	0.17	Singh et al. 2017
South Asia	Pakistan	Brahui	Dravidian		25	0.16	Di Cristofaro et al. 2013
South Asia	Uttar Pradesh, India	Tharu	Indo-European	Indo-Aryan	164	0.16	Chaubey et al. 2014
South Asia	India	Thapa	Sino-Tibetan	Tibeto-Burman	39	0.15	Singh et al. 2017
South Asia	India	Buxas	Indo-European	Indo-Aryan	40	0.15	Singh et al. 2017
South Asia	Nepal	Tharu	Indo-European	Indo-Aryan	202	0.13	Chaubey et al. 2014; Fornarino et al. 2009
South Asia	Gujarat, India	Chaudhari	Indo-European	Indo-Aryan	113	0.13	Khurana et al. 2014
South Asia	India	Meena	Indo-European	Indo-Aryan	40	0.13	Singh et al. 2017
South Asia	Gujarat, India	Dubla	Indo-European	Indo-Aryan	42	0.12	Khurana et al. 2014
South Asia	India	Bhil	Indo-European	Indo-Aryan	17	0.12	Singh et al. 2017
South Asia	Southern India	Pardhan	Dravidian		128	0.10	Thanseem et al. 2006
South Asia	India	Palliyar	Dravidian		21	0.10	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	0.10	Di Cristofaro et al. 2013
South Asia	India	Mahadev Koli	Indo-European	Indo-Aryan	41	0.10	Singh et al. 2017
South Asia	West Bengal, India	Rajbanshi	Indo-European	Indo-Aryan	51	0.10	Debnath et al. 2011
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	270	0.10	Lee et al. 2014
South Asia	India	Yanadi	Dravidian		53	0.10	Singh et al. 2017
South Asia	India	Tadvi	Indo-European	Indo-Aryan	42	0.10	Singh et al. 2017
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	44	0.09	Firasat et al. 2007
South Asia	India	Lingayat	Dravidian		45	0.09	Singh et al. 2017
South Asia	India	Uttar Pradesh	Indo-European	Indo-Aryan	91	0.09	Singh et al. 2017
South Asia	India	Gond	Dravidian		60	0.08	Singh et al. 2017
South Asia	India	Malayan	Dravidian		24	0.08	Singh et al. 2017
South Asia	Southwest India	Vokkaliga	Dravidian		102	0.08	Chennakrishnaiah et al. 2013
South Asia	Southwest India	Lingayat	Dravidian		101	0.08	Chennakrishnaiah et al. 2013
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	0.08	Di Cristofaro et al. 2013
South Asia	India	Chattisgarh	Indo-European	Indo-Aryan	126	0.08	Singh et al. 2017
South Asia	Gujarat, India	Dhodia	Indo-European	Indo-Aryan	63	0.08	Khurana et al. 2014
South Asia	India	Vysya	Dravidian		40	0.08	Singh et al. 2017
South Asia	Southern India	Naikpod	Dravidian		68	0.07	Thanseem et al. 2006
South Asia	Pakistan	Burusho	Isolate		97	0.07	Firasat et al. 2007
South Asia	India	Khatri	Indo-European	Indo-Aryan	71	0.07	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
South Asia	India	Halakki	Dravidian		31	0.06	Singh et al. 2017
South Asia	India	Kotiya	Indo-European	Indo-Aryan	74	0.05	Singh et al. 2017
South Asia	India	Bisht	Indo-European	Indo-Aryan	39	0.05	Singh et al. 2017
South Asia	India	Naidu	Dravidian		20	0.05	Singh et al. 2017
South Asia	Pakistan	Burusho	Isolate		20	0.05	Di Cristofaro et al. 2013
South Asia	India	Parayar	Dravidian		20	0.05	Singh et al. 2017
South Asia	India	Yadava	Dravidian		41	0.05	Singh et al. 2017
South Asia	Gujarat, India	Vasava	Indo-European	Indo-Aryan	24	0.04	Khurana et al. 2014
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
South Asia	India	Sugali	Indo-European	Iranian	76	0.04	Singh et al. 2017
South Asia	India	Baiga	Indo-European	Indo-Aryan	28	0.04	Singh et al. 2017
South Asia	India	Baghel	Indo-European	Indo-Aryan	36	0.03	Singh et al. 2017
South Asia	India	Hill Korwa	Austro-Asiatic	Munda	35	0.03	Singh et al. 2017
South Asia	India	Saharia	Indo-European	Indo-Aryan	37	0.03	Singh et al. 2017
South Asia	India	Sonakar	Indo-European	Indo-Aryan	39	0.03	Singh et al. 2017
South Asia	India	Tharu	Indo-European	Indo-Aryan	41	0.02	Singh et al. 2017
South Asia	India	Reddy	Dravidian		49	0.02	Singh et al. 2017
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.33	Grugni et al. 2012
Southwest Asia	Turkey	Turks (Northwest Anatolia)	Turkic		52	0.32	King et al. 2011
Southwest Asia	Iran	Talysh	Indo-European	Iranian	50	0.32	Nasidze et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.31	Grugni et al. 2012
Southwest Asia	Turkey	Central Anatolia population**	Turkic		90	0.30	King et al. 2011
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.30	Grugni et al. 2012
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.29	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Lake Van)	Indo-European	Armenian	103	0.29	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	0.29	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	0.28	Hovhannisyan et al. 2014
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	916	0.26	Zalloua et al. 2008
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	0.26	Hovhannisyan et al. 2014
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.25	Grugni et al. 2012
Southwest Asia	Turkey	Turks	Turkic		523	0.24	Cinnioglu et al. 2004
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.24	Al-Zahery et al. 2011
Southwest Asia	Turkey	Turks	Turkic		33	0.24	King et al. 2011
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.24	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.23	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	0.21	Hovhannisyan et al. 2014
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.19	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Iron)	Indo-European	Iranian	230	0.18	Balanovsky et al. 2011
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.18	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.17	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.17	Hovhannisyan et al. 2014
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	0.16	Abu-Amero et al. 2009
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.15	Grugni et al. 2012
Southwest Asia	Jordan	Jordanian	Afro-Asiatic	Semitic	146	0.13	Flores et al. 2005
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	0.13	King et al. 2011
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	39	0.13	Grugni et al. 2012
Southwest Asia	Iran	Azerbaijani	Turkic		63	0.13	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.12	Balanovsky et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Southwest Asia	United Arab Emirates	Emirati	Afro-Asiatic	Semitic	164	0.10	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Omani	Omani	Afro-Asiatic	Semitic	121	0.10	Luis et al. 2004; Chiaroni et al. 2008
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.10	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Qatar	Qatari	Afro-Asiatic	Semitic	72	0.08	Cadenas et al. 2008
Southwest Asia	Iran	Turkmen	Turkic		68	0.07	Grugni et al. 2012
Southwest Asia	Iraq	Marsh Arabs	Afro-Asiatic	Semitic	143	0.04	Al-Zahery et al. 2011
Sub-Saharan Africa	Ethiopia	Amhara	Afro-Asiatic	Semitic	27	0.11	Haber et al. 2016
Sub-Saharan Africa	Ethiopia	Somali	Afro-Asiatic	Cushitic	16	0.06	Haber et al. 2016
Western Europe	France	French (Provence)	Indo-European	Italic	51	0.10	King et al. 2011
Western Europe	Iberia	Iberians	Indo-European	Italic	1140	0.08	Adams et al. 2008
Western Europe	Bavaria, Germany	Germans	Indo-European	Germanic	218	0.07	Rebala et al. 2013
Western Europe	France	French	Indo-European	Italic	558	0.06	Ramos-Luis et al. 2014
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.05	Larmuseau et al. 2014
Western Europe	Germany	Germans	Indo-European	Germanic	1215	0.04	Kayser et al. 2005

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2-M172	Reference
Western Europe	England	English	Indo-European	Germanic	1165	0.03	Capelli et al. 2003
Western Europe	Germany	Sorbs	Indo-European	Slavic	123	0.02	Rebala et al. 2013
Western Europe	Mecklenburg, Germany	Germans	Indo-European	Germanic	131	0.02	Rebala et al. 2013

Supplementary Table 10.4. Distribution and Frequency of J1-M267 (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Afro-Asiatic	Berber	North Africa	Morocco	Berber	103	0.08	Semino et al. 2004
Afro-Asiatic	Berber	North Africa	Morocco	Berber	64	0.06	Semino et al. 2004
Afro-Asiatic	Cushitic	North Africa	Sudan	Beja	42	0.36	Hassan et al. 2008
Afro-Asiatic	Cushitic	Sub-Saharan Africa	Ethiopia	Oromo	18	0.33	Haber et al. 2016
Afro-Asiatic	Cushitic	North Africa	Sudan	Oromo	78	0.04	Hassan et al. 2008
Afro-Asiatic	Egyptian	North Africa	Sudan	Copts	33	0.39	Hassan et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Marsh Arabs	143	0.81	Al-Zahery et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Kuwait	Bedouin	148	0.80	Mohammad et al. 2009
Afro-Asiatic	Semitic	Southwest Asia	Yemen	Yemenite	62	0.73	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Yemen	Yemenite	62	0.73	Cadenas et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Negev	Bedouin	28	0.68	Cann et al. 2002; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Qatar	Qatarians	72	0.58	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Qatar	Qatari	72	0.58	Cadenas et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Jordan	Jordanians	76	0.49	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Syria	Sunni Hama	36	0.47	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	157	0.40	Abu-Amero et al. 2009
Afro-Asiatic	Semitic	Southwest Asia	Omani	Omani	121	0.38	Luis et al. 2004; Chiaroni et al. 2008

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Afro-Asiatic	Semitic	Southwest Asia	United Arab Emirates	Emirati	164	0.35	Cadenas et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	UAE	Emirati	164	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	12	0.33	Tofanelli et al. 2009; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Palestine	Palestinians	49	0.33	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Iraqis	154	0.31	Al-Zahery et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Jordan	Jordanian	146	0.31	Flores et al. 2005
Afro-Asiatic	Semitic	North Africa	Libya	Libyans	215	0.31	Fadhlaoui-Zid et al. 2013
Afro-Asiatic	Semitic	North Africa	Sudan	Amhara	48	0.29	Hassan et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Assyrians	28	0.29	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Nassiriya, Iraq	Iraqi	56	0.27	Tofanelli et al. 2009; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Syria	Alawites	45	0.27	Chiaroni et al. 2010
Afro-Asiatic	Semitic	North Africa	Tunisia	Sousse	220	0.25	Fadhlaoui-Zid et al. 2015
Afro-Asiatic	Semitic	North Africa	Egypt	Egyptians	147	0.21	Luis et al. 2004; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese	916	0.20	Zalloua et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Turkey	Assyrians	25	0.20	Chiaroni et al. 2010
Afro-Asiatic	Semitic	North Africa	Algeria	Arabs	102	0.20	Robino et al. 2008
Afro-Asiatic	Semitic	North Africa	Morocco	Moroccans	87	0.20	Fadhlaoui-Zid et al. 2013
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	39	0.18	Grugni et al. 2012
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	31	0.16	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Syria	Druze	34	0.15	Chiaroni et al. 2010

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Afro-Asiatic	Semitic	Southwest Asia	Galilee	Druze	172	0.13	Shlush et al. 2008; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Sub-Saharan Africa	Ethiopia	Amhara	27	0.11	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Northeastern Syria	Assyrians	30	0.03	Chiaroni et al. 2010
Dravidian		South Asia	Pakistan	Brahui	25	0.12	Di Cristofaro et al. 2013
Dravidian		South Asia	India	Chenchu	38	0.03	Singh et al. 2017
Indo-European	Albanian	Eastern Europe	Macedonia	Albanians	64	0.06	Battaglia et al. 2009
Indo-European	Albanian	Mediterranean	Albania	Albanians	55	0.04	Battaglia et al. 2009
Indo-European	Albanian	Mediterranean	Albania	Gheg	119	0.03	Sarno et al. 2016, Ferri et al. 2010
Indo-European	Albanian	Mediterranean	Albania	Albanians (Tosk)	104	0.02	Sarno et al. 2016, Ferri et al. 2010
Indo-European	Armenian	Southwest Asia	Iran	Armenians (Salmast)	199	0.20	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Central)	200	0.17	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia	Armenians Don	92	0.15	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Armenia	Ararat Valley-Armenian	110	0.15	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Van)	103	0.14	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Lake Van)	103	0.14	Herrera et al. 2012
Indo-European	Armenian	Caucasus	Armenia	Armenians (Eastern)	416	0.13	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Western)	148	0.12	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia	Armenians Krasnodar	117	0.10	Balanovsky et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	0.10	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	0.10	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia	Armenians Adigei	49	0.07	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Georgia	Armenians Erzurum	99	0.05	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Azerbaijan	Armenians (Gardman)	96	0.04	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Iran	Armenians	34	0.03	Grugni et al. 2012
Indo-European	Armenian	Caucasus	Russia	Armenians Hemshin	89	0.02	Balanovsky et al. 2017
Indo-European	Germanic	Western Europe	Flanders	Flemish	773	0.01	Larmuseau et al. 2014
Indo-European	Greek	Mediterranean	Greece	Greeks (Nea Nikomedeia)	57	0.11	King et al. 2011
Indo-European	Greek	Mediterranean	Crete	Cretans	193	0.08	King et al. 2008
Indo-European	Greek	Mediterranean	Cyprus	Greek Cypriots	629	0.07	Voskarides et al. 2016
Indo-European	Greek	Mediterranean	Smyrna, Greece	Greeks	58	0.05	King et al. 2011
Indo-European	Greek	Mediterranean	Greece	Greeks (Sesklo/Dimini)	57	0.04	King et al. 2011
Indo-European	Greek	Mediterranean	Greece	Greeks	92	0.02	Battaglia et al. 2009
Indo-European	Greek	Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	57	0.02	King et al. 2011
Indo-European	Greek	Eastern Europe	Macedonia	Greeks	57	0.02	Battaglia et al. 2009
Indo-European	Greek	Mediterranean	Crete	Cretans	168	0.02	Martinez et al. 2007
Indo-European	Greeks	Mediterranean	Phokaia, Greece	Greeks	31	0.10	King et al. 2011
Indo-European	Indo-Aryan	South Asia	India	Kashmiri Pandit	23	0.09	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Sonakar	39	0.08	Singh et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Indo-European	Indo-Aryan	South Asia	India	Mahadev Koli	41	0.02	Singh et al. 2017
Indo-European	Iranian	Southwest Asia	Iran	Gilaki	64	0.13	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iraq	Kurds	93	0.12	Chiaroni et al. 2010
Indo-European	Iranian	Southwest Asia	Iran	Persians (Fars)	44	0.11	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Iranians	150	0.11	Regueiro et al. 2006; Chiaroni et al. 2010
Indo-European	Iranian	Southwest Asia	Iran	Mazanderani	72	0.10	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Baloch	24	0.08	Grugni et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Baloch	25	0.08	Di Cristofaro et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Persians (Khorasan)	59	0.07	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Yazd)	46	0.06	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Lurs	50	0.06	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Kurds	59	0.05	Grugni et al. 2012
Indo-European	Iranian	Caucasus	Daghestan	Tats	24	0.04	Karafet et al. 2016
Indo-European	Iranian	Southwest Asia	Iran	Ossetians (Digor)	127	0.04	Balanovsky et al. 2011
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	142	0.03	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	56	0.02	Haber et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Ossetians (Iron)	230	0.01	Balanovsky et al. 2011
Indo-European	Iranian	South Asia	India	Sugali	76	0.01	Singh et al. 2017
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	87	0.01	Di Cristofaro et al. 2013
Indo-European	Italic	Eastern Europe	Moldova	Moldavians	125	0.04	Varzari et al. 2013.
Indo-European	Italic	Mediterranean	Italy	Sardianians	236	0.04	Di Gaetano et al. 2009
Indo-European	Italic	Mediterranean	Italy	Italians	884	0.04	Boattini et al. 2013

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
Indo-European	Italic	Western Europe	France	French (Provence)	51	0.02	King et al. 2011
Indo-European	Slavic	Eastern Europe	Bulgaria	Bulgarians	808	0.03	Karachanak et al. 2013
Indo-European	Slavic	Eastern Europe	Bosnia-Herzegovina	Bosniacs	84	0.02	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Slovakia	Slovaks	164	0.02	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Slovenia	Slovenians	75	0.01	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Bosnia-Herzegovina	Serbs	81	0.01	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Poland	Poles	99	0.01	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Serbia	Serb	103	0.01	Regueiro et al. 2012
Kartvelian		Caucasus	Georgia	Georgians	66	0.05	Battaglia et al. 2009
Nilo-Saharan		North Africa	Sudan	Nubians	39	0.41	Hassan et al. 2008
Nilo-Saharan		North Africa	Sudan	Fur	32	0.06	Hassan et al. 2008
Nilo-Saharan		North Africa	Sudan	Masalit	32	0.06	Hassan et al. 2008
North Caucasian		Caucasus	Daghestan	Tsez	24	1.00	Karafet et al. 2016
North Caucasian		Caucasus	Daghestan	Kubachians	65	0.99	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Akhvakhs	23	0.91	Karafet et al. 2016
North Caucasian		Caucasus	Daghestan	Avar	33	0.73	Karafet et al. 2016
North Caucasian		Caucasus	Daghestan	Dargins	101	0.70	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Avar	115	0.59	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Laks	22	0.45	Karafet et al. 2016
North Caucasian		Caucasus	Daghestan	Lezgians	81	0.44	Balanovsky et al. 2011
North Caucasian		Caucasus	Russia	Chechens (Chechnya)	118	0.25	Balanovsky et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1-M267	Reference
North Caucasian		Caucasus	Russia	Ingush	143	0.03	Balanovsky et al. 2011
Turkic		Caucasus	Daghestan	Nogais	22	0.41	Karafet et al. 2016
Turkic		Caucasus	Daghestan	Kumyks	21	0.24	Karafet et al. 2016
Turkic		Southwest Asia	Turkey	Turks	33	0.15	King et al. 2011
Turkic		Southwest Asia	Turkey	Turks (Northwest Anatolia)	52	0.15	King et al. 2011
Turkic		Southwest Asia	Turkey	Turks	523	0.09	Cinnioglu et al. 2004
Turkic		Central Asia	Afghanistan	Turkmen	74	0.08	Di Cristofaro et al. 2013
Turkic		Central Asia	Uzbekistan	Uzbek	67	0.08	Zhabagin et al. 2017
Turkic		Southwest Asia	Turkey	Central Anatolia population**	90	0.06	King et al. 2011
Turkic		Southwest Asia	Iran	Turkmen	68	0.06	Grugni et al. 2012
Turkic		Central Asia	Uzbekistan	Uzbek	98	0.05	Zhabagin et al. 2017
Turkic		East Asia	Xinjiang, China	Keriyans	70	0.04	Chen et al. 2014
Turkic		Central Asia	Uzbekistan	Uzbek	52	0.04	Zhabagin et al. 2017
Turkic		Central Asia	Kazakhstan	Kazakh	55	0.03	Zhabagin et al. 2017
Turkic		Southwest Asia	Turkey	Turks (Western Anatolia)	30	0.03	King et al. 2011
Turkic		Central Asia	Uzbekistan	Karakalpaks	100	0.03	Zhabagin et al. 2017
Turkic		Northern Eurasia	Siberia, Russia	Tatars	776	0.02	Agdzhoyan et al. 2016
Turkic		Central Asia	Afghanistan	Uzbeks	127	0.02	Di Cristofaro et al. 2013
Turkic		Central Asia	Kyrgyzstan	Kyrgyz	132	0.02	Di Cristofaro et al. 2013
Turkic		Central Asia	Kazakhstan	Kazakh	81	0.01	Zhabagin et al. 2017
Turkic		Central Asia	Uzbekistan	Turkmen	83	0.01	Zhabagin et al. 2017

Supplementary Table 10.5. Distribution and Frequency of J2-M172 (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Afro-Asiatic	Berber	North Africa	Morocco	Berber	103	0.03	Semino et al. 2004
Afro-Asiatic	Cushitic	Sub-Saharan Africa	Ethiopia	Somali	16	0.06	Haber et al. 2016
Afro-Asiatic	Cushitic	North Africa	Sudan	Beja	42	0.02	Hassan et al. 2008
Afro-Asiatic	Egyptian	North Africa	Sudan	Copts	33	0.06	Hassan et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese	916	0.26	Zalloua et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Iraqis	154	0.24	Al-Zahery et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	157	0.16	Abu-Amero et al. 2009
Afro-Asiatic	Semitic	Southwest Asia	Jordan	Jordanian	146	0.13	Flores et al. 2005
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	39	0.13	Grugni et al. 2012
Afro-Asiatic	Semitic	North Africa	Egypt	Egyptians	147	0.12	Luis et al. 2004; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Sub-Saharan Africa	Ethiopia	Amhara	27	0.11	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	United Arab Emirates	Emirati	164	0.10	Cadenas et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Omani	Omani	121	0.10	Luis et al. 2004; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Yemen	Yemenite	62	0.10	Cadenas et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	North Africa	Morocco	Moroccans	87	0.09	Fadhlaoui-Zid et al. 2013
Afro-Asiatic	Semitic	Southwest Asia	Qatar	Qatari	72	0.08	Cadenas et al. 2008
Afro-Asiatic	Semitic	North Africa	Tunisia	Sousse	220	0.08	Fadhlaoui-Zid et al. 2015
Afro-Asiatic	Semitic	North Africa	Algeria	Arabs	102	0.05	Robino et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Marsh Arabs	143	0.04	Al-Zahery et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Afro-Asiatic	Semitic	North Africa	Libya	Libyans	215	0.03	Fadhlaoui-Zid et al. 2013
Afro-Asiatic	Semitic	North Africa	Sudan	Amhara	48	0.02	Hassan et al. 2008; Chiaroni et al. 2010
Austro-Asiatic	Munda	South Asia	India	Asur	40	0.78	Singh et al. 2017
Austro-Asiatic	Munda	South Asia	India	Korku	36	0.17	Singh et al. 2017
Austro-Asiatic	Munda	South Asia	India	Hill Korwa	35	0.03	Singh et al. 2017
Dravidian		South Asia	India	Pichakuntla	39	0.59	Singh et al. 2017
Dravidian		South Asia	India	Narikuravar	95	0.58	Singh et al. 2017
Dravidian		South Asia	India	Toda	29	0.55	Singh et al. 2017
Dravidian		South Asia	India	Chenchu	38	0.40	Singh et al. 2017
Dravidian		South Asia	India	Mondi	44	0.24	Singh et al. 2017
Dravidian		South Asia	India	Badagas	56	0.21	Singh et al. 2017
Dravidian		South Asia	India	Havik	15	0.20	Singh et al. 2017
Dravidian		South Asia	Pakistan	Brahui	25	0.16	Di Cristofaro et al. 2013
Dravidian		South Asia	Southern India	Pardhan	128	0.10	Thanseem et al. 2006
Dravidian		South Asia	India	Palliyar	21	0.10	Singh et al. 2017
Dravidian		South Asia	India	Yanadi	53	0.10	Singh et al. 2017
Dravidian		South Asia	India	Lingayat	45	0.09	Singh et al. 2017
Dravidian		South Asia	India	Gond	60	0.08	Singh et al. 2017
Dravidian		South Asia	India	Malayan	24	0.08	Singh et al. 2017
Dravidian		South Asia	Southwest India	Vokkaliga	102	0.08	Chennakrishnaiah et al. 2013
Dravidian		South Asia	Southwest India	Lingayat	101	0.08	Chennakrishnaiah et al. 2013
Dravidian		South Asia	India	Vysya	40	0.08	Singh et al. 2017
Dravidian		South Asia	Southern India	Naikpod	68	0.07	Thanseem et al. 2006
Dravidian		South Asia	India	Halakki	31	0.06	Singh et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Dravidian		South Asia	India	Naidu	20	0.05	Singh et al. 2017
Dravidian		South Asia	India	Parayar	20	0.05	Singh et al. 2017
Dravidian		South Asia	India	Yadava	41	0.05	Singh et al. 2017
Dravidian		South Asia	India	Reddy	49	0.02	Singh et al. 2017
Indo-European	Albanian	Mediterranean	Albania	Gheg	119	0.28	Sarno et al. 2016, Ferri et al. 2010
Indo-European	Albanian	Mediterranean	Albania	Albanians	55	0.20	Battaglia et al. 2009
Indo-European	Albanian	Mediterranean	Albania	Albanians (Tosk)	104	0.19	Sarno et al. 2016, Ferri et al. 2010
Indo-European	Albanian	Eastern Europe	Macedonia	Albanians	64	0.04	Battaglia et al. 2009
Indo-European	Armenian	Caucasus	Georgia	Armenians Erzurum	99	0.36	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Azerbaijan	Armenians (Gardman)	96	0.32	Herrera et al. 2012
Indo-European	Armenian	Caucasus	Russia	Armenians Hemshin	89	0.32	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Russia	Armenians Krasnodar	117	0.30	Balanovsky et al. 2017
Indo-European	Armenian	Southwest Asia	Iran	Armenians	34	0.29	Grugni et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Lake Van)	103	0.29	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Van)	103	0.29	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Western)	148	0.28	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Central)	200	0.26	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Armenia	Armenians (Eastern)	416	0.25	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia	Armenians Adigei	49	0.24	Balanovsky et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Indo-European	Armenian	Caucasus	Armenia	Ararat Valley-Armenian	110	0.24	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Iran	Armenians (Salmast)	199	0.21	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	0.17	Herrera et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	0.17	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia	Armenians Don	92	0.16	Balanovsky et al. 2017
Indo-European	Germanic	Western Europe	Bavaria, Germany	Germans	218	0.07	Rebala et al. 2013
Indo-European	Germanic	Western Europe	Flanders	Flemish	773	0.05	Larmuseau et al. 2014
Indo-European	Germanic	Western Europe	Germany	Germans	1215	0.04	Kayser et al. 2005
Indo-European	Germanic	Western Europe	England	English	1165	0.03	Capelli et al. 2003
Indo-European	Germanic	Western Europe	Mecklenburg, Germany	Germans	131	0.02	Rebala et al. 2013
Indo-European	Greek	Mediterranean	Crete	Cretans	168	0.36	Martinez et al. 2007
Indo-European	Greek	Mediterranean	Cyprus	Greek Cypriots	629	0.33	Voskarides et al. 2016
Indo-European	Greek	Mediterranean	Crete	Cretans	193	0.28	King et al. 2008
Indo-European	Greek	Mediterranean	Smyrna, Greece	Greeks	58	0.22	King et al. 2011
Indo-European	Greek	Mediterranean	Greece	Greeks	92	0.21	Battaglia et al. 2009
Indo-European	Greek	Mediterranean	Greece	Greeks (Sesklo/Dimini)	57	0.19	King et al. 2011
Indo-European	Greek	Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	57	0.16	King et al. 2011
Indo-European	Greek	Eastern Europe	Macedonia	Greeks	57	0.14	Battaglia et al. 2009
Indo-European	Greek	Mediterranean	Greece	Greeks (Nea Nikomedeia)	57	0.11	King et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Indo-European	Greeks	Mediterranean	Phokaia, Greece	Greeks	31	0.12	King et al. 2011
Indo-European	Indo-Aryan	South Asia	India	Shikari	46	0.41	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Southern India	Andh	54	0.35	Thanseem et al. 2006
Indo-European	Indo-Aryan	South Asia	India	Bahelia	52	0.31	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Pakistan	Sindhi	21	0.29	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	India	Lohana	39	0.28	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Kathodi	11	0.18	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Kashmiri Pandit	23	0.17	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Kamboj	41	0.17	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	West Bengal, India	Bengali	54	0.17	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	Uttar Pradesh, India	Tharu	164	0.16	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	India	Buxas	40	0.15	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Nepal	Tharu	202	0.13	Chaubey et al. 2014; Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Gujarat, India	Chaudhari	113	0.13	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	India	Meena	40	0.13	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Gujarat, India	Dubla	42	0.12	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	India	Bhil	17	0.12	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	20	0.10	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	India	Mahadev Koli	41	0.10	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	West Bengal, India	Rajbanshi	51	0.10	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	India	Tadvi	42	0.10	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	44	0.09	Firasat et al. 2007

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Indo-European	Indo-Aryan	South Asia	India	Uttar Pradesh	91	0.09	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Gujarat, India	Dhodia	63	0.08	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	India	Chattisgarh	126	0.08	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Khatri	71	0.07	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Kotiya	74	0.05	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Bisht	39	0.05	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	Gujarat, India	Vasava	24	0.04	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	India	Baiga	28	0.04	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Baghel	36	0.03	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Saharia	37	0.03	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Sonakar	39	0.03	Singh et al. 2017
Indo-European	Indo-Aryan	South Asia	India	Tharu	41	0.02	Singh et al. 2017
Indo-European	Iranian	Southwest Asia	Iran	Baloch	24	0.33	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Talysh	50	0.32	Nasidze et al. 2009
Indo-European	Iranian	Southwest Asia	Iran	Mazanderani	72	0.31	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Yazd)	46	0.30	Grugni et al. 2012
Indo-European	Iranian	Central Asia	Afghanistan	Hazara	60	0.27	Haber et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Fars)	44	0.25	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Kurds	59	0.24	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Iranians	150	0.23	Regueiro et al. 2006; Chiaroni et al. 2010
Indo-European	Iranian	Caucasus	Azerbaijan	Talysh	40	0.23	Nasidze et al. 2009
Indo-European	Iranian	Southwest Asia	Iran	Gilaki	64	0.19	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Ossetians (Iron)	230	0.18	Balanovsky et al. 2011
Indo-European	Iranian	South Asia	India	Banjara (Lambadi)	33	0.18	Singh et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Indo-European	Iranian	Southwest Asia	Iran	Lurs	50	0.18	Grugni et al. 2012
Indo-European	Iranian	Caucasus	Dagestan	Tats	24	0.17	Karafet et al. 2016
Indo-European	Iranian	East Asia	Northwestern China	Tajiks	31	0.16	Shou et al. 2010
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	56	0.16	Haber et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Khorasan)	59	0.15	Grugni et al. 2012
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	142	0.15	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Hazara	77	0.13	Di Cristofaro et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Ossetians (Digor)	127	0.12	Balanovsky et al. 2011
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	270	0.10	Lee et al. 2014
Indo-European	Iranian	South Asia	Pakistan	Baloch	25	0.08	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	87	0.06	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	190	0.06	Lacau et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Hazara	25	0.04	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	India	Sugali	76	0.04	Singh et al. 2017
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	49	0.02	Haber et al. 2012
Indo-European	Italic	Mediterranean	Italy	Sardianians	236	0.26	Di Gaetano et al. 2009
Indo-European	Italic	Mediterranean	Italy	Italians	884	0.14	Boattini et al. 2013
Indo-European	Italic	Mediterranean	North Eastern Italy	Italians	67	0.14	Battaglia et al. 2009
Indo-European	Italic	Western Europe	France	French (Provence)	51	0.10	King et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Indo-European	Italic	Western Europe	Iberia	Iberians	1140	0.08	Adams et al. 2008
Indo-European	Italic	Western Europe	France	French	558	0.06	Ramos-Luis et al. 2014
Indo-European	Italic	Eastern Europe	Moldova	Moldavians	125	0.04	Varzari et al. 2013.
Indo-European	Slavic	Eastern Europe	Bulgaria	Bulgarians	808	0.11	Karachanak et al. 2013
Indo-European	Slavic	Eastern Europe	Bosnia-Herzegovina	Bosniacs	84	0.10	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Croatia	Croats	720	0.09	Sarac et al. 2016
Indo-European	Slavic	Eastern Europe	Bosnia-Herzegovina	Serbs	81	0.09	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Croatia	Croats (Osijek)	29	0.08	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Serbia	Serb	103	0.07	Regueiro et al. 2012
Indo-European	Slavic	Eastern Europe	Ukraine	Ukrainians	92	0.07	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Bosnia-Herzegovina	Croats	90	0.06	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Czech Republic	Czech	75	0.05	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Croatia	Croats	89	0.03	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Slovenia	Slovenians	75	0.03	Battaglia et al. 2009
Indo-European	Slavic	Eastern Europe	Poland	Kurpie	158	0.03	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Poland	Poles	913	0.03	Kayser et al. 2005
Indo-European	Slavic	Western Europe	Germany	Sorbs	123	0.02	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Poland	Kashubians	204	0.02	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Poland	Kociewie	158	0.02	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Slovakia	Slovaks	164	0.02	Rebala et al. 2013
Indo-European	Slavic	Eastern Europe	Poland	Poles	99	0.01	Battaglia et al. 2009
Isolate		South Asia	Pakistan	Burusho	97	0.07	Firasat et al. 2007
Isolate		South Asia	Pakistan	Burusho	20	0.05	Di Cristofaro et al. 2013

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Kartvelian		Caucasus	Georgia	Georgians	66	0.32	Battaglia et al. 2009
Nilo-Saharan		North Africa	Sudan	Nubians	39	0.03	Hassan et al. 2008
North Caucasian		Caucasus	Russia	Ingush	143	0.89	Balanovsky et al. 2011
North Caucasian		Caucasus	Russia	Chechens (Chechnya)	118	0.58	Balanovsky et al. 2011
North Caucasian		Caucasus	Russia	Abkhaz	58	0.14	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Avar	33	0.09	Karafet et al. 2016
North Caucasian		Caucasus	Russia	Shapsugs	100	0.06	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Avar	115	0.06	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Lezgians	81	0.03	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Dargins	101	0.01	Balanovsky et al. 2011
Sino-Tibetan	Chinese	Central Asia	Uzbekistan	Dungan	31	0.07	Zhabagin et al. 2017
Sino-Tibetan	Tibeto-Burman	South Asia	West Bengal, India	Dhimal	36	0.28	Debnath et al. 2011
Sino-Tibetan	Tibeto-Burman	South Asia	India	Thapa	39	0.15	Singh et al. 2017
Turkic		East Asia	Northwestern China	Uygurs	50	0.34	Shou et al. 2010
Turkic		Southwest Asia	Turkey	Turks (Northwest Anatolia)	52	0.32	King et al. 2011
Turkic		East Asia	Northwestern China	Uzbek	23	0.30	Shou et al. 2010
Turkic		Southwest Asia	Turkey	Central Anatolia population**	90	0.30	King et al. 2011
Turkic		Caucasus	Dagestan	Nogais	22	0.29	Karafet et al. 2016
Turkic		Southwest Asia	Turkey	Turks	523	0.24	Cinnioglu et al. 2004
Turkic		Southwest Asia	Turkey	Turks	33	0.24	King et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J2-M172	Reference
Turkic		Caucasus	Caucasus	Balkarian	38	0.24	Battaglia et al. 2009
Turkic		Central Asia	Uzbekistan	Uzbek	52	0.16	Zhabagin et al. 2017
Turkic		Central Asia	Afghanistan	Uzbeks	127	0.16	Di Cristofaro et al. 2013
Turkic		Caucasus	Dagestan	Kumyks	21	0.15	Karafet et al. 2016
Turkic		East Asia	Xinjiang, China	Keriyans	70	0.14	Chen et al. 2014
Turkic		Central Asia	Uzbekistan	Uzbek	98	0.13	Zhabagin et al. 2017
Turkic		Southwest Asia	Turkey	Turks (Western Anatolia)	30	0.13	King et al. 2011
Turkic		Southwest Asia	Iran	Azerbaijani	63	0.13	Grugni et al. 2012
Turkic		Central Asia	Uzbekistan	Uzbek	67	0.12	Zhabagin et al. 2017
Turkic		Northern Eurasia	Siberia, Russia	Tatars	776	0.10	Agdzhoyan et al. 2016
Turkic		Central Asia	Kazakhstan	Kazakh	94	0.09	Zhabagin et al. 2017
Turkic		Central Asia	Afghanistan	Turkmen	74	0.08	Di Cristofaro et al. 2013
Turkic		Southwest Asia	Iran	Turkmen	68	0.07	Grugni et al. 2012
Turkic		Central Asia	Kazakhstan	Kazakh	81	0.06	Zhabagin et al. 2017
Turkic		Central Asia	Uzbekistan	Karakalpaks	100	0.05	Zhabagin et al. 2017
Turkic		Central Asia	Kyrgyzstan	Kyrgyz	132	0.04	Di Cristofaro et al. 2013
Turkic		Central Asia	Kazakhstan	Kazakh	55	0.02	Zhabagin et al. 2017
Turkic		Central Asia	Kazakhstan	Kazakh	119	0.02	Zhabagin et al. 2017
Turkic		Central Asia	Uzbekistan	Turkmen	83	0.01	Zhabagin et al. 2017
Uralic		Eastern Europe	Hungary	Hungarians	53	0.02	Battaglia et al. 2009

Supplementary Table 10.6. Distribution and Frequency of J2a1h-L24.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-L24	Reference
Caucasus	Daghestan	Nogais	Turkic		22	0.14	Karafet et al. 2016
Caucasus	Daghestan	Avar	North Caucasian		33	0.03	Karafet et al. 2016
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	0.10	Haber et al. 2012
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	77	0.05	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.04	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.03	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Turkmen	Turkic		74	0.01	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	0.01	Di Cristofaro et al. 2013
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.02	Karachanak et al. 2013
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.07	Voskarides et al. 2016
Mediterranean	Italy	Sardinians	Indo-European	Italic	236	0.05	Di Gaetano et al. 2009
Mediterranean	Crete	Cretans	Indo-European	Greek	193	0.03	King et al. 2008
North Africa	Tunisia	Sousse	Afro-Asiatic	Semitic	220	0.06	Fadhlaoui-Zid et al. 2015
South Asia	Pakistan	Brahui	Dravidian		25	0.04	Di Cristofaro et al. 2013
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.17	Grugni et al. 2012
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.10	Grugni et al. 2012
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.08	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.07	Grugni et al. 2012
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.06	Grugni et al. 2012
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.05	Grugni et al. 2012
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.04	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-L24	Reference
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.03	Grugni et al. 2012
Southwest Asia	Iran	Turkmen	Turkic		68	0.01	Grugni et al. 2012

Supplementary Table 10.7. Distribution and Frequency of J2a1b-M67.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M67	Reference
Caucasus	Russia	Ingush	North Caucasian		143	0.87	Balanovsky et al. 2011
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		118	0.57	Balanovsky et al. 2011
Caucasus	Russia	Armenians Hemshin	Indo-European	Armenian	89	0.28	Balanovsky et al. 2017
Caucasus	Russia	Armenians Krasnodar	Indo-European	Armenian	117	0.21	Balanovsky et al. 2017
Caucasus	Georgia	Georgians	Kartvelian		66	0.18	Battaglia et al. 2009
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	0.17	Karafet et al. 2016
Caucasus	Azerbaijan	Armenians (Gardman)	Indo-European	Armenian	96	0.15	Herrera et al. 2012
Caucasus	Armenia	Ararat Valley- Armenian	Indo-European	Armenian	110	0.13	Herrera et al. 2012
Caucasus	Russia	Armenians Adigei	Indo-European	Armenian	49	0.12	Balanovsky et al. 2017
Caucasus	Russia	Armenians Don	Indo-European	Armenian	92	0.12	Balanovsky et al. 2017
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	0.10	Hovhannisyan et al. 2014
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	0.10	Balanovsky et al. 2017
Caucasus	Daghestan	Kumyks	Turkic		21	0.10	Karafet et al. 2016
Caucasus	Russia	Abkhaz	North Caucasian		58	0.09	Balanovsky et al. 2011
Caucasus	Caucasus	Balkarian	Turkic		38	0.05	Battaglia et al. 2009
Caucasus	Daghestan	Nogais	Turkic		22	0.05	Karafet et al. 2016
Caucasus	Daghestan	Avar	North Caucasian		33	0.03	Karafet et al. 2016

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M67	Reference
Caucasus	Daghestan	Avar	North Caucasian		115	0.01	Balanovsky et al. 2011
Caucasus	Daghestan	Dargins	North Caucasian		101	0.01	Balanovsky et al. 2011
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.03	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Uzbek	Turkic		98	0.03	Zhabagin et al. 2017
Central Asia	Uzbekistan	Karakalpaks	Turkic		100	0.02	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.02	Haber et al. 2012
Central Asia	Uzbekistan	Uzbek	Turkic		67	0.02	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.01	Di Cristofaro et al. 2013
Central Asia	Kazakhstan	Kazakh	Turkic		94	0.01	Zhabagin et al. 2017
East Asia	Xinjiang, China	Keriyans	Turkic		70	0.14	Chen et al. 2014
Eastern Europe	Bosnia-Herzegovina	Bosniacs	Indo-European	Slavic	84	0.06	Battaglia et al. 2009
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.04	Battaglia et al. 2009
Eastern Europe	Croatia	Croats (Osijek)	Indo-European	Slavic	29	0.03	Battaglia et al. 2009
Eastern Europe	Ukraine	Ukrainians	Indo-European	Slavic	92	0.02	Battaglia et al. 2009
Eastern Europe	Serbia	Serb	Indo-European	Slavic	103	0.02	Regueiro et al. 2012
Eastern Europe	Hungary	Hungarians	Uralic		53	0.02	Battaglia et al. 2009
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.02	Karachanak et al. 2013
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.02	Battaglia et al. 2009
Eastern Europe	Slovenia	Slovenians	Indo-European	Slavic	75	0.01	Battaglia et al. 2009
Eastern Europe	Croatia	Croats	Indo-European	Slavic	720	0.01	Sarac et al. 2016
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.10	Voskarides et al. 2016
Mediterranean	Crete	Cretans	Indo-European	Greek	193	0.08	King et al. 2008
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.08	Martinez et al. 2007
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.08	Battaglia et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M67	Reference
Mediterranean	North Eastern Italy	Italians	Indo-European	Italic	67	0.08	Battaglia et al. 2009
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	0.07	King et al. 2011
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	0.06	King et al. 2011
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.05	Battaglia et al. 2009
Mediterranean	Italy	Sardianians	Indo-European	Italic	236	0.05	Di Gaetano et al. 2009
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	0.05	King et al. 2011
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.04	Boattini et al. 2013
Mediterranean	Phokaia, Greece	Greeks	Indo-European	Greeks	31	0.03	King et al. 2011
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	0.02	King et al. 2011
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	147	0.03	Luis et al. 2004; Chiaroni et al. 2008
South Asia	Pakistan	Brahui	Dravidian		25	0.08	Di Cristofaro et al. 2013
Southwest Asia	Turkey	Turks (Northwest Anatolia)	Turkic		52	0.14	King et al. 2011
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.13	Grugni et al. 2012
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.11	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Iron)	Indo-European	Iranian	230	0.11	Balanovsky et al. 2011
Southwest Asia	Turkey	Central Anatolia population**	Turkic		90	0.09	King et al. 2011
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.09	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.09	Grugni et al. 2012
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	916	0.08	Zalloua et al. 2008

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M67	Reference
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	0.08	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Lake Van)	Indo-European	Armenian	103	0.08	Herrera et al. 2012
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.08	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	0.08	Herrera et al. 2012
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	0.08	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	0.07	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	0.07	Hovhannisyan et al. 2014
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.07	Al-Zahery et al. 2011
Southwest Asia	Turkey	Turks	Turkic		523	0.06	Cinnioglu et al. 2004
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.06	Balanovsky et al. 2011
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.05	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Jordan	Jordanian	Afro-Asiatic	Semitic	146	0.05	Flores et al. 2005
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.05	Grugni et al. 2012
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.04	Grugni et al. 2012
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.03	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Turkey	Turks	Turkic		33	0.03	King et al. 2011
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	0.03	King et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M67	Reference
Southwest Asia	Iran	Azerbaijani	Turkic		63	0.03	Grugni et al. 2012
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	39	0.03	Grugni et al. 2012
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.02	Grugni et al. 2012
Southwest Asia	United Arab Emirates	Emirati	Afro-Asiatic	Semitic	164	0.02	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Iran	Turkmen	Turkic		68	0.01	Grugni et al. 2012
Southwest Asia	Qatar	Qatari	Afro-Asiatic	Semitic	72	0.01	Cadenas et al. 2008
Southwest Asia	Omani	Omani	Afro-Asiatic	Semitic	121	0.01	Luis et al. 2004; Chiaroni et al. 2008
Western Europe	Bavaria, Germany	Germans	Indo-European	Germanic	218	0.03	Rebala et al. 2013
Western Europe	Mecklenburg, Germany	Germans	Indo-European	Germanic	131	0.02	Rebala et al. 2013
Western Europe	France	French (Provence)	Indo-European	Italic	51	0.02	King et al. 2011
Western Europe	Germany	Sorbs	Indo-European	Slavic	123	0.02	Rebala et al. 2013

Supplementary Table 10.8. Distribution and Frequency of J2b2a-M241.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2b-M241	Reference
Caucasus	Azerbaijan	Armenians (Gardman)	Indo-European	Armenian	96	0.021	Herrera et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	190	0.021	Lacau et al. 2012
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	0.018	Haber et al. 2012
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		132	0.008	Di Cristofaro et al. 2013
Eastern Europe	Czech Republic	Czech	Indo-European	Slavic	75	0.040	Battaglia et al. 2009
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.038	Karachanak et al. 2013
Eastern Europe	Bosnia-Herzegovina	Croats	Indo-European	Slavic	90	0.034	Battaglia et al. 2009
Eastern Europe	Macedonia	Albanians	Indo-European	Albanian	64	0.025	Battaglia et al. 2009
Eastern Europe	Bosnia-Herzegovina	Serbs	Indo-European	Slavic	81	0.024	Battaglia et al. 2009
Eastern Europe	Ukraine	Ukrainians	Indo-European	Slavic	92	0.022	Battaglia et al. 2009
Eastern Europe	Poland	Kurpie	Indo-European	Slavic	158	0.019	Rebala et al. 2013
Eastern Europe	Macedonia	Greeks	Indo-European	Greek	57	0.018	Battaglia et al. 2009
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.012	Rebala et al. 2013
Eastern Europe	Croatia	Croats (Osijek)	Indo-European	Slavic	29	0.011	Battaglia et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2b-M241	Reference
Eastern Europe	Poland	Poles	Indo-European	Slavic	99	0.010	Battaglia et al. 2009
Eastern Europe	Poland	Kashubians	Indo-European	Slavic	204	0.010	Rebala et al. 2013
Eastern Europe	Poland	Kociewie	Indo-European	Slavic	158	0.006	Rebala et al. 2013
Mediterranean	Albania	Albanians	Indo-European	Albanian	55	0.145	Battaglia et al. 2009
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	0.070	King et al. 2011
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	0.070	King et al. 2011
Mediterranean	Greece	Greeks	Indo-European	Greek	92	0.065	Battaglia et al. 2009
Mediterranean	Italy	Sardianians	Indo-European	Italic	236	0.047	Di Gaetano et al. 2009
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	0.020	King et al. 2011
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	0.020	King et al. 2011
Mediterranean	Albania	Gheg	Indo-European	Albanian	119	0.015	Sarno et al. 2016, Ferri et al. 2010
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.015	Boattini et al. 2013
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.006	Voskarides et al. 2016
Mediterranean	Crete	Cretans	Indo-European	Greek	168	0.006	Martinez et al. 2007
South Asia	India	Asur	Austro-Asiatic	Munda	40	0.775	Singh et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2b-M241	Reference
South Asia	India	Narikuravar	Dravidian		95	0.579	Singh et al. 2017
South Asia	India	Pichakuntla	Dravidian		39	0.487	Singh et al. 2017
South Asia	India	Shikari	Indo-European	Indo-Aryan	46	0.364	Singh et al. 2017
South Asia	India	Chenchu	Dravidian		38	0.171	Singh et al. 2017
South Asia	India	Korku	Austro-Asiatic	Munda	36	0.167	Singh et al. 2017
South Asia	India	Mondi	Dravidian		44	0.152	Singh et al. 2017
South Asia	India	Buxas	Indo-European	Indo-Aryan	40	0.150	Singh et al. 2017
South Asia	India	Bahelia	Indo-European	Indo-Aryan	52	0.135	Singh et al. 2017
South Asia	Gujarat, India	Chaudhari	Indo-European	Indo-Aryan	113	0.115	Khurana et al. 2014
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	21	0.095	Di Cristofaro et al. 2013
South Asia	India	Tadvi	Indo-European	Indo-Aryan	42	0.095	Singh et al. 2017
South Asia	India	Kashmiri Pandit	Indo-European	Indo-Aryan	23	0.087	Singh et al. 2017
South Asia	India	Thapa	Sino-Tibetan	Tibeto-Burman	39	0.077	Singh et al. 2017
South Asia	India	Meena	Indo-European	Indo-Aryan	40	0.075	Singh et al. 2017
South Asia	West Bengal, India	Bengali	Indo-European	Indo-Aryan	54	0.074	Debnath et al. 2011
South Asia	India	Toda	Dravidian		29	0.069	Singh et al. 2017
South Asia	India	Lingayat	Dravidian		45	0.067	Singh et al. 2017
South Asia	India	Bhil	Indo-European	Indo-Aryan	17	0.058	Singh et al. 2017
South Asia	India	Lohana	Indo-European	Indo-Aryan	39	0.051	Singh et al. 2017
South Asia	Pakistan	Burusho	Isolate		20	0.050	Di Cristofaro et al. 2013
South Asia	India	Vysya	Dravidian		40	0.050	Singh et al. 2017
South Asia	India	Naidu	Dravidian		20	0.050	Singh et al. 2017
South Asia	India	Palliyar	Dravidian		21	0.050	Singh et al. 2017
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	0.050	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2b-M241	Reference
South Asia	Gujarat, India	Dhodia	Indo-European	Indo-Aryan	63	0.048	Khurana et al. 2014
South Asia	Gujarat, India	Dubla	Indo-European	Indo-Aryan	42	0.048	Khurana et al. 2014
South Asia	Gujarat, India	Vasava	Indo-European	Indo-Aryan	24	0.042	Khurana et al. 2014
South Asia	Nepal	Tharu	Indo-European	Indo-Aryan	202	0.040	Chaubey et al. 2014; Fornarino et al. 2009
South Asia	West Bengal, India	Rajbanshi	Indo-European	Indo-Aryan	51	0.039	Debnath et al. 2011
South Asia	Uttar Pradesh, India	Tharu	Indo-European	Indo-Aryan	164	0.037	Chaubey et al. 2014
South Asia	India	Baiga	Indo-European	Indo-Aryan	28	0.036	Singh et al. 2017
South Asia	India	Chattisgarh	Indo-European	Indo-Aryan	126	0.032	Singh et al. 2017
South Asia	Southwest India	Vokkaliga	Dravidian		102	0.030	Chennakrishnaiah et al. 2013
South Asia	India	Hill Korwa	Austro-Asiatic	Munda	35	0.028	Singh et al. 2017
South Asia	India	Kotiya	Indo-European	Indo-Aryan	74	0.027	Singh et al. 2017
South Asia	India	Khatri	Indo-European	Indo-Aryan	71	0.026	Singh et al. 2017
South Asia	India	Sugali	Indo-European	Iranian	76	0.026	Singh et al. 2017
South Asia	India	Tharu	Indo-European	Indo-Aryan	41	0.024	Singh et al. 2017
South Asia	India	Reddy	Dravidian		49	0.020	Singh et al. 2017
South Asia	India	Yanadi	Dravidian		53	0.019	Singh et al. 2017
South Asia	India	Uttar Pradesh	Indo-European	Indo-Aryan	91	0.011	Singh et al. 2017
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.043	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2b-M241	Reference
Southwest Asia	Turkey	Turks	Turkic		33	0.030	King et al. 2011
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.014	Grugni et al. 2012
Southwest Asia	Qatar	Qatari	Afro-Asiatic	Semitic	72	0.014	Cadenas et al. 2008
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.013	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.013	Al-Zahery et al. 2011
Southwest Asia	Turkey	Turks	Turkic		523	0.010	Cinnioglu et al. 2004
Western Europe	Bavaria, Germany	Germans	Indo-European	Germanic	218	0.014	Rebala et al. 2013
Western Europe	Germany	Sorbs	Indo-European	Slavic	123	0.008	Rebala et al. 2013
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.008	Larmuseau et al. 2014

Supplementary Table 10.9. Distribution and Frequency of J1a2a1a2-P58 (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1a-P58	Reference
Afro-Asiatic	Cushitic	North Africa	Sudan	Oromo	78	0.01	Hassan et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Marsh Arabs	143	0.74	Al-Zahery et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Yemen	Yemenite	62	0.68	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Negev	Bedouin	28	0.64	Cann et al. 2002; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Qatar	Qatarians	72	0.57	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Jordan	Jordanians	76	0.49	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Syria	Sunni Hama	36	0.44	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Omani	Omani	121	0.37	Luis et al. 2004; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	UAE	Emirati	164	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	12	0.33	Tofanelli et al. 2009; Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Palestine	Palestinians	49	0.33	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Syria	Alawites	45	0.27	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Iraqis	154	0.27	Al-Zahery et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Nassiriya, Iraq	Iraqi	56	0.25	Tofanelli et al. 2009; Chiaroni et al. 2010
Afro-Asiatic	Semitic	North Africa	Tunisia	Sousse	220	0.25	Fadhlaoui-Zid et al. 2015
Afro-Asiatic	Semitic	North Africa	Sudan	Amhara	48	0.21	Hassan et al. 2008; Chiaroni et al. 2010
Afro-Asiatic	Semitic	North Africa	Egypt	Egyptians	147	0.20	Luis et al. 2004; Chiaroni et al. 2008

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1a-P58	Reference
Afro-Asiatic	Semitic	Southwest Asia	Galilee	Druze	172	0.12	Shlush et al. 2008; Chiaroni et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Syria	Druze	34	0.12	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Assyrians	28	0.11	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	31	0.06	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Turkey	Assyrians	25	0.04	Chiaroni et al. 2010
Afro-Asiatic	Semitic	Southwest Asia	Northeastern Syria	Assyrians	30	0.03	Chiaroni et al. 2010
Dravidian		South Asia	Pakistan	Brahui	25	0.12	Di Cristofaro et al. 2013
Indo-European	Armenian	Caucasus	Russia	Armenians Don	92	0.12	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Russia	Armenians Krasnodar	117	0.03	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Georgia	Armenians Erzurum	99	0.02	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Russia	Armenians Hemshin	89	0.01	Balanovsky et al. 2017
Indo-European	Greek	Mediterranean	Cyprus	Greek Cypriots	629	0.05	Voskarides et al. 2016
Indo-European	Iranian	Southwest Asia	Iran	Persians (Fars)	44	0.09	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Iranians	150	0.09	Regueiro et al. 2006; Chiaroni et al. 2010
Indo-European	Iranian	Southwest Asia	Iran	Baloch	24	0.08	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iraq	Kurds	93	0.08	Chiaroni et al. 2010
Indo-European	Iranian	Southwest Asia	Iran	Mazanderani	72	0.06	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Yazd)	46	0.04	Grugni et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Baloch	25	0.04	Di Cristofaro et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Lurs	50	0.04	Grugni et al. 2012

Language Family	Branch	Region	Location	Population	Sample Size	Frequency J1a-P58	Reference
Indo-European	Iranian	Southwest Asia	Iran	Kurds	59	0.03	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians (Khorasan)	59	0.02	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Gilaki	64	0.02	Grugni et al. 2012
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	142	0.01	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	87	0.01	Di Cristofaro et al. 2013
Indo-European	Italic	Mediterranean	Italy	Italians	884	0.02	Boattini et al. 2013
Indo-European	Slavic	Eastern Europe	Bulgaria	Bulgarians	808	0.02	Karachanak et al. 2013
Indo-European	Slavic	Eastern Europe	Slovakia	Slovaks	164	0.02	Rebala et al. 2013
North Caucasian		Caucasus	Daghestan	Dargins	101	0.01	Balanovsky et al. 2011
North Caucasian		Caucasus	Daghestan	Avar	115	0.01	Balanovsky et al. 2011
Turkic		Central Asia	Afghanistan	Turkmen	74	0.08	Di Cristofaro et al. 2013
Turkic		Southwest Asia	Iran	Turkmen	68	0.06	Grugni et al. 2012
Turkic		Central Asia	Afghanistan	Uzbeks	127	0.02	Di Cristofaro et al. 2013

Supplementary Table 10.10. Distribution and Frequency of J1a2a1a2-P58 (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1a-P58	Reference
Caucasus	Russia	Armenians Don	Indo-European	Armenian	92	0.12	Balanovsky et al. 2017
Caucasus	Russia	Armenians Krasnodar	Indo-European	Armenian	117	0.03	Balanovsky et al. 2017
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	0.02	Balanovsky et al. 2017
Caucasus	Daghestan	Dargins	North Caucasian		101	0.01	Balanovsky et al. 2011
Caucasus	Daghestan	Avar	North Caucasian		115	0.01	Balanovsky et al. 2011
Caucasus	Russia	Armenians Hemshin	Indo-European	Armenian	89	0.01	Balanovsky et al. 2017
Central Asia	Afghanistan	Turkmen	Turkic		74	0.08	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Uzbeks	Turkic		127	0.02	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	0.01	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	0.01	Di Cristofaro et al. 2013
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.02	Karachanak et al. 2013
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.02	Rebala et al. 2013
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	0.05	Voskarides et al. 2016
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.02	Boattini et al. 2013
North Africa	Tunisia	Sousse	Afro-Asiatic	Semitic	220	0.25	Fadhlaoui-Zid et al. 2015
North Africa	Sudan	Amhara	Afro-Asiatic	Semitic	48	0.21	Hassan et al. 2008; Chiaroni et al. 2010
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	147	0.20	Luis et al. 2004; Chiaroni et al. 2008
North Africa	Sudan	Oromo	Afro-Asiatic	Cushitic	78	0.01	Hassan et al. 2008
South Asia	Pakistan	Brahui	Dravidian		25	0.12	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1a-P58	Reference
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	0.04	Di Cristofaro et al. 2013
Southwest Asia	Iraq	Marsh Arabs	Afro-Asiatic	Semitic	143	0.74	Al-Zahery et al. 2011
Southwest Asia	Yemen	Yemenite	Afro-Asiatic	Semitic	62	0.68	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Negev	Bedouin	Afro-Asiatic	Semitic	28	0.64	Cann et al. 2002; Chiaroni et al. 2010
Southwest Asia	Qatar	Qatarians	Afro-Asiatic	Semitic	72	0.57	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	76	0.49	Chiaroni et al. 2010
Southwest Asia	Syria	Sunni Hama	Afro-Asiatic	Semitic	36	0.44	Chiaroni et al. 2010
Southwest Asia	Omani	Omani	Afro-Asiatic	Semitic	121	0.37	Luis et al. 2004; Chiaroni et al. 2008
Southwest Asia	UAE	Emirati	Afro-Asiatic	Semitic	164	0.35	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	12	0.33	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Palestine	Palestinians	Afro-Asiatic	Semitic	49	0.33	Chiaroni et al. 2010
Southwest Asia	Syria	Alawites	Afro-Asiatic	Semitic	45	0.27	Chiaroni et al. 2010
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.27	Al-Zahery et al. 2011
Southwest Asia	Nassiriya, Iraq	Iraqi	Afro-Asiatic	Semitic	56	0.25	Tofanelli et al. 2009; Chiaroni et al. 2010
Southwest Asia	Galilee	Druze	Afro-Asiatic	Semitic	172	0.12	Shlush et al. 2008; Chiaroni et al. 2008
Southwest Asia	Syria	Druze	Afro-Asiatic	Semitic	34	0.12	Chiaroni et al. 2010
Southwest Asia	Iraq	Assyrians	Afro-Asiatic	Semitic	28	0.11	Chiaroni et al. 2010
Southwest Asia	Iran	Persians (Fars)	Indo-European	Iranian	44	0.09	Grugni et al. 2012
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.09	Regueiro et al. 2006; Chiaroni et al. 2010

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J1a-P58	Reference
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	0.08	Grugni et al. 2012
Southwest Asia	Iraq	Kurds	Indo-European	Iranian	93	0.08	Chiaroni et al. 2010
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	31	0.06	Chiaroni et al. 2010
Southwest Asia	Iran	Turkmen	Turkic		68	0.06	Grugni et al. 2012
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.06	Grugni et al. 2012
Southwest Asia	Iran	Persians (Yazd)	Indo-European	Iranian	46	0.04	Grugni et al. 2012
Southwest Asia	Turkey	Assyrians	Afro-Asiatic	Semitic	25	0.04	Chiaroni et al. 2010
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.04	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.03	Grugni et al. 2012
Southwest Asia	Northeastern Syria	Assyrians	Afro-Asiatic	Semitic	30	0.03	Chiaroni et al. 2010
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.02	Grugni et al. 2012
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.02	Grugni et al. 2012

Supplementary Table 10.11. Distribution and Frequency of J2a1d-M319.

Region	Population	Language Family	Branch	Sample Size	Frequency J2a-M319	Reference
Mediterranean	Cretans	Indo-European	Greek	193	0.09	King et al. 2008
Mediterranean	Cretans	Indo-European	Greek	168	0.05	Martinez et al. 2007
Mediterranean	Greek Cypriots	Indo-European	Greek	629	0.01	Voskarides et al. 2016

Supplementary Table 10.12. Distribution and Frequency of J2a1a-M47.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M47	Reference
Caucasus	Georgia	Georgians	Kartvelian		66	0.02	Battaglia et al. 2009
Central Asia	Uzbekistan	Uzbek	Turkic		52	0.02	Zhabagin et al. 2017
Central Asia	Kazakhstan	Kazakh	Turkic		94	0.01	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek	Turkic		98	0.01	Zhabagin et al. 2017
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	916	0.15	Zalloua et al. 2008
Southwest Asia	Iran	Mazanderani	Indo-European	Iranian	72	0.08	Grugni et al. 2012
Southwest Asia	Iran	Armenians	Indo-European	Armenian	34	0.06	Grugni et al. 2012
Southwest Asia	Iran	Lurs	Indo-European	Iranian	50	0.06	Grugni et al. 2012
Southwest Asia	Iran	Persians (Khorasan)	Indo-European	Iranian	59	0.03	Grugni et al. 2012
Southwest Asia	Iran	Iranians	Indo-European	Iranian	150	0.03	Regueiro et al. 2006; Chiaroni et al. 2010
Southwest Asia	Iran	Gilaki	Indo-European	Iranian	64	0.03	Grugni et al. 2012
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.03	Al-Zahery et al. 2011
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	0.03	Abu-Amero et al. 2009
Southwest Asia	United Arab Emirates	Emirati	Afro-Asiatic	Semitic	164	0.02	Cadenas et al. 2008; Chiaroni et al. 2010
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	0.02	Grugni et al. 2012
Southwest Asia	Qatar	Qatarian	Afro-Asiatic	Semitic	72	0.01	Cadenas et al. 2008
Southwest Asia	Turkey	Turks	Turkic		523	0.01	Cinnioglu et al. 2004

Supplementary Table 10.13. Distribution and Frequency of J2a1c-M68.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency J2a-M68	Reference
South Asia	India	Toda	Dravidian		29	0.48	Singh et al. 2017
South Asia	India	Mahadev Koli	Indo-European	Indo-Aryan	41	0.10	Singh et al. 2017
South Asia	India	Badagas	Dravidian		56	0.09	Singh et al. 2017
South Asia	India	Yadava	Dravidian		41	0.05	Singh et al. 2017
South Asia	Southwest India	Lingayat	Dravidian		101	0.02	Chennakrishnaiah et al. 2013
South Asia	Southwest India	Vokkaliga	Dravidian		102	0.01	Chennakrishnaiah et al. 2013
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	154	0.01	Al-Zahery et al. 2011

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Supplementary Tables for Chapter 11 and LT-L298

Supplementary Table 11.1. Survey of L-M20 Variation (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
Caucasus	Russia	Chechens	North Caucasian		165	17.58%	Yunusbayev et al. 2012
Caucasus	Daghestan	Chechens	North Caucasian		100	14.00%	Balanovsky et al. 2011
Caucasus	Dagestan	Chechens	North Caucasian		20	10.00%	Caciagli et al. 2009
Caucasus	Russia	Avars	North Caucasian		42	9.52%	Yunusbayev et al. 2012
Caucasus	Russia	Ingush	North Caucasian		105	8.57%	Yunusbayev et al. 2012
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	8.33%	Karafet et al. 2016
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		118	7.00%	Balanovsky et al. 2011
Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	Indo-European	Armenian	92	6.52%	Balanovsky et al. 2017
Caucasus	Georgia	Abkhaz	North Caucasian		162	4.94%	Yunusbayev et al. 2012
Caucasus	Russia	Chamalal	North Caucasian		27	3.70%	Yunusbayev et al. 2012
Caucasus	Russia	Abkhaz	North Caucasian		58	3.40%	Balanovsky et al. 2011
Caucasus	Georgia	Imereti	Kartvelian		62	3.23%	Balanovsky et al. 2017
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	3.03%	Balanovsky et al. 2017
Caucasus	Daghestan	Avars	North Caucasian		115	3.00%	Balanovsky et al. 2011
Caucasus	Russia	Ingush	North Caucasian		143	2.80%	Balanovsky et al. 2011
Caucasus	Caucasus	Adyghe	North Caucasian		154	2.60%	Yunusbayev et al. 2012
Caucasus	Russia: Krasnodar	Armenians Krasnodar	Indo-European	Armenian	117	2.56%	Balanovsky et al. 2017
Caucasus	Caucasus	Abazins	North Caucasian		88	2.27%	Yunusbayev et al. 2012
Caucasus	Russia: Krasnodar	Armenians Hemsheni	Indo-European	Armenian	89	2.25%	Balanovsky et al. 2017

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
Caucasus	Russia: Adygea	Armenians Adygei	Indo-European	Armenian	49	2.07%	Balanovsky et al. 2017
Caucasus	Russia	Shapsugs	North Caucasian		100	2.00%	Balanovsky et al. 2011
Caucasus	Armenia	Armenians	Indo-European	Armenian	57	1.75%	Yunusbayev et al. 2012
Caucasus	Russia	Chechens (Ingushetia)	North Caucasian		112	1.70%	Balanovsky et al. 2011
Caucasus	Daghestan	Lezgians	North Caucasian		81	1.20%	Balanovsky et al. 2011
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	0.96%	Hovhannisyan et al. 2014
Caucasus	Russia	North Ossetians	Indo-European	Iranian	132	0.76%	Yunusbayev et al. 2012
Caucasus	Russia	Kabardin	North Caucasian		140	0.71%	Yunusbayev et al. 2012
Caucasus	Russia	Cherkessians	North Caucasian		142	0.70%	Balanovsky et al. 2011
Central Asia	Tajikistan	Tajiks	Indo-European	Iranian	40	22.50%	Malyarchuk et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	49	12.24%	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	190	9.47%	Lacau et al. 2012
Central Asia	Afghanistan	Uzbeks	Turkic		127	9.45%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	8.91%	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	6.90%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	6.34%	Di Cristofaro et al. 2013
Central Asia	Uzbekistan (Fergana)	Uzbek	Turkic		67	5.97%	Zhabagin et al. 2017
Central Asia	Uzbekistan (Xorezm)	Uzbek	Turkic		98	5.10%	Zhabagin et al. 2017
Central Asia	Kazakhstan (Zhanakorgan)	Kazakh	Turkic		94	4.26%	Zhabagin et al. 2017
Central Asia	Afghanistan	Turkmen	Turkic		74	4.05%	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	77	3.90%	Di Cristofaro et al. 2013
Central Asia	Uzbekistan (Tashkent)	Uzbek	Turkic		52	3.85%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Dungan	Sino-Tibetan	Chinese	31	3.00%	Zhabagin et al. 2017
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	60	1.66%	Haber et al. 2012
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		132	1.52%	Di Cristofaro et al. 2013
Central Asia	Uzbekistan	Karakalpak	Turkic		100	1.00%	Zhabagin et al. 2017
East Asia	Xingjiang, China	Uyghurs	Turkic		48	8.33%	Zhong et al. 2011
East Asia	Xingjiang, China	Uyghurs	Turkic		50	4.00%	Zhong et al. 2011
East Asia	Xingjiang, China	Uyghurs	Turkic		71	2.82%	Zhong et al. 2011
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	0.20%	Karachanak et al. 2013
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	1.90%	Voskarides et al. 2017
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	1.75%	King et al. 2011
Mediterranean	Italy	Italians	Indo-European	Italic	884	1.47%	Boattini et al. 2013
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	0.84%	Francalacci et al. 2015
South Asia	Southwest India	Vokkaliga	Dravidian		102	32.35%	Chennakrishnaiah et al. 2013
South Asia	Pakistan	Baloch	Indo-European	Iranian	59	28.81%	Qamar et al. 2002
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	44	25.00%	Firasat et al. 2007
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	44	25.00%	Qamar et al. 2002
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	25.00%	Di Cristofaro et al. 2013
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	24.00%	Di Cristofaro et al. 2013
South Asia	Orissa	Oriya Brahmin	Indo-European	Indo-Aryan	24	20.84%	Sahoo et al. 2006
South Asia	South India	Ambalakarar	Dravidian		29	20.69%	Sengupta et al. 2006
South Asia	South India	Vanniyar	Dravidian		25	20.00%	Sengupta et al. 2006
South Asia	Bombay	Konkani Brahmins	Indo-European	Indo-Aryan	43	18.60%	Kivisild et al. 2003

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
South Asia	Gujarat	Bhils	Indo-European	Indo-Aryan	22	18.18%	Sharma et al. 2009
South Asia	Sri Lanka	Sinhalese	Indo-European	Indo-Aryan	39	17.95%	Kivisild et al. 2003
South Asia	Southwest India	Lingayat	Dravidian		101	17.82%	Chennakrishnaiah et al. 2013
South Asia	Pakistan	Parsi	Indo-European	Indo-Aryan	90	17.78%	Qamar et al. 2002
South Asia	South India	Pallan	Dravidian		29	17.24%	Sengupta et al. 2006
South Asia	South India	Iyer	Dravidian		29	17.24%	Sengupta et al. 2006
South Asia	Andhra Pradesh	Banjara (Lambadi)	Indo-European	Indo-Aryan	35	17.14%	Kivisild et al. 2003
South Asia	Pakistan	Burusho	Isolate		94	17.02%	Qamar et al. 2002
South Asia	South India	Iyengar	Dravidian		30	16.67%	Sengupta et al. 2006
South Asia	Pakistan	Burusho	Isolate		97	16.50%	Firasat et al. 2007
South Asia	Kashmir	Gujars	Indo-European	Indo-Aryan	49	16.33%	Sharma et al. 2009
South Asia	South India	Vellalar	Dravidian		31	16.13%	Sengupta et al. 2006
South Asia	North Pakistan	Burusho	Isolate		20	15.00%	Sengupta et al. 2006
South Asia	Pakistan	Burusho	Isolate		20	15.00%	Di Cristofaro et al. 2013
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	15.00%	Sengupta et al. 2006
South Asia	Andra Pradesh	Pardhan	Dravidian		128	14.84%	Thanseem et al. 2006
South Asia	Andhra Pradesh	Chenchu	Dravidian		41	14.63%	Kivisild et al. 2003
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	93	12.90%	Qamar et al. 2002
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	96	12.50%	Firasat et al. 2007
South Asia	Punjab	Punjabi	Indo-European	Indo-Aryan	66	12.12%	Kivisild et al. 2003
South Asia	Bombay	Gujarati	Indo-European	Indo-Aryan	29	10.34%	Kivisild et al. 2003
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	20	10.00%	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
South Asia	Maharashtra	Brahmin	Indo-European	Indo-Aryan	32	10.00%	Sharma et al. 2009
South Asia	South India	Irula	Dravidian		30	10.00%	Sengupta et al. 2006
South Asia	Tamil Nadu	Parayar	Dravidian		24	8.34%	Arunkumar et al. 2012
South Asia	Pakistan	Brahui	Dravidian		25	8.00%	Di Cristofaro et al. 2013
South Asia	Uttar-Pradesh	Tharu	Indo-European	Indo-Aryan	164	7.93%	Chaubey et al. 2014
South Asia	Gujarat	Brahmin	Indo-European	Indo-Aryan	64	7.81%	Sharma et al. 2009
South Asia	Tamil Nadu	Thoda	Dravidian		26	7.70%	Arunkumar et al. 2012
South Asia	Bihar	Paswan	Indo-European	Indo-Aryan	27	7.41%	Sharma et al. 2009
South Asia	Tamil Nadu	Paravar	Dravidian		27	7.41%	Arunkumar et al. 2012
South Asia	Pakistan	Brahui	Dravidian		110	7.27%	Qamar et al. 2002
South Asia	Madhya Pradesh	Brahmin	Indo-European	Indo-Aryan	42	7.14%	Sharma et al. 2009
South Asia	Bangladesh	Tripuri	Sino-Tibetan	Tibeto-Burman	88	7.00%	Gazi et al. 2013
South Asia	Northern India	Rajput	Indo-European	Indo-Aryan	29	6.90%	Sengupta et al. 2006
South Asia	Central India	Kamar	Dravidian		30	6.67%	Sengupta et al. 2006
South Asia	Uttarakhand	Tharu	Indo-European	Indo-Aryan	45	6.67%	Chaubey et al. 2014
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	122	6.56%	Qamar et al. 2002
South Asia	Maharashtra	Mahadeo Koli	Indo-European	Indo-Aryan	50	6.00%	Thangaraj et al. 2010
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	270	5.93%	Lee et al. 2014
South Asia	Kashmir	Pandits	Indo-European	Indo-Aryan	51	5.88%	Sharma et al. 2009
South Asia	Tamil Nadu	Pallar	Dravidian		51	5.88%	Arunkumar et al. 2012
South Asia	Morang, Nepal	Tharu	Indo-European	Indo-Aryan	37	5.40%	Fornarino et al. 2009
South Asia	Himachal	Brahmin	Indo-European	Indo-Aryan	30	5.26%	Sharma et al. 2009
South Asia	Bihar	Brahmin	Indo-European	Indo-Aryan	38	5.26%	Sharma et al. 2009
South Asia	Bangladesh	Marma	Sino-Tibetan	Tibeto-Burman	60	5.00%	Gazi et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
South Asia	Jharkhand	Pahariya	Indo-European	Indo-Aryan	100	5.00%	Borkar et al. 2011
South Asia	Gujarat, India	Dhodia	Indo-European	Indo-Aryan	63	4.76%	Khurana et al. 2014
South Asia	Gujarat, India	Dubla	Indo-European	Indo-Aryan	42	4.76%	Khurana et al. 2014
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	31	4.76%	Di Cristofaro et al. 2013
South Asia	Tamil Nadu	Vadama	Indo-European	Indo-Aryan	63	4.76%	Arunkumar et al. 2012
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	45	4.44%	Borkar et al. 2011
South Asia	Tamil Nadu	Vanniyar NTN	Dravidian		96	4.16%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Tamil Jains	Dravidian		100	4.00%	Arunkumar et al. 2012
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	4.00%	Sengupta et al. 2006
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	51	3.92%	Debnath et al. 2011
South Asia	Tamil Nadu	Parayar NTN	Dravidian		52	3.84%	Arunkumar et al. 2012
South Asia	Jharkhand	Ho	Austro-Asiatic		28	3.57%	Borkar et al. 2011
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	57	3.50%	Fornarino et al. 2009
South Asia	Madhya Pradesh	Saharia	Indo-European	Indo-Aryan	57	3.24%	Sharma et al. 2009
South Asia	Uttar Pradesh	Brahmin	Indo-European	Indo-Aryan	31	3.21%	Sharma et al. 2009
South Asia	Tamil Nadu	Paliyan	Dravidian		95	3.16%	Arunkumar et al. 2012
South Asia	Andra Pradesh	Naikpod	Dravidian		68	2.94%	Thanseem et al. 2006
South Asia	Jharkhand	Oraon	Dravidian		110	2.73%	Borkar et al. 2011
South Asia	Gujarat, India	Chaudhari	Indo-European	Indo-Aryan	113	2.65%	Khurana et al. 2014
South Asia	Jharkhand	Munda	Austro-Asiatic		94	2.13%	Borkar et al. 2011
South Asia	Tamil Nadu	Valayar	Dravidian		95	2.11%	Arunkumar et al. 2012
South Asia	Maharashtra	Thakur	Indo-European	Indo-Aryan	48	2.00%	Thangaraj et al. 2010
South Asia	Jharkhand	Birhor	Austro-Asiatic		100	2.00%	Borkar et al. 2011
South Asia	Tamil Nadu	Piramalai Kallar	Dravidian		53	1.89%	Arunkumar et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
South Asia	Andra Pradesh	Andh	Indo-European	Indo-Aryan	54	1.86%	Thanseem et al. 2006
South Asia	West Bengal	Bengali	Indo-European	Indo-Aryan	54	1.85%	Debnath et al. 2011
South Asia	Tamil Nadu	Pulayar	Dravidian		63	1.59%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Maravar	Dravidian		80	1.25%	Arunkumar et al. 2012
South Asia	Jharkhand	Santhal	Austro-Asiatic		90	1.11%	Borkar et al. 2011
South Asia	Tamil Nadu	Ezhava	Dravidian		95	1.05%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Nadar Cape	Dravidian		98	1.02%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Yadhava	Dravidian		107	0.93%	Arunkumar et al. 2012
Southwest Asia	Turkey	Laz	Kartvelian		36	41.67%	Balanovsky et al. 2017
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	16.60%	Grugni et al. 2012
Southwest Asia	Lebanon	Lebanese Druze	Afro-Asiatic	Semitic	31	13.00%	Haber et al. 2016
Southwest Asia	Lebanon	Lebanese Christians	Afro-Asiatic	Semitic	52	12.00%	Haber et al. 2016
Southwest Asia	Syria	Syrians	Afro-Asiatic	Semitic	518	10.42%	Haber et al. 2011
Southwest Asia	Eastern Iran	Persians	Indo-European	Iranian	77	9.09%	Malyarchuk et al. 2013
Southwest Asia	Iran	Iranians	Indo-European	Iranian	324	8.33%	Haber et al. 2011
Southwest Asia	Western Iran	Kurds	Indo-European	Iranian	25	8.00%	Malyarchuk et al. 2013
Southwest Asia	Lebanon	Lebanese Muslims	Afro-Asiatic	Semitic	43	7.00%	Haber et al. 2016
Southwest Asia	Iran	Persians Fars	Indo-European	Iranian	44	6.80%	Grugni et al. 2012
Southwest Asia	Iran	Turkmen	Turkic		68	5.80%	Grugni et al. 2012
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	914	5.25%	Zalloua et al. 2008
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	1202	4.99%	Haber et al. 2011
Southwest Asia	Iran	Gilak	Indo-European	Iranian	64	4.80%	Grugni et al. 2012
Southwest Asia	Turkey	Turks	Turkic		523	4.21%	Cinnioglu et al. 2004
Southwest Asia	Iran	Persians Yazd	Indo-European	Iranian	46	4.20%	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M20	Reference
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	3.85%	Hovhannisyan et al. 2014
Southwest Asia	Iran	Persians Khorasan	Indo-European	Iranian	59	3.40%	Grugni et al. 2012
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	3.33%	King et al. 2011
Southwest Asia	Turkey	Central Anatolia	Turkic		90	3.33%	King et al. 2011
Southwest Asia	Iran	Azerbaijani	Turkic		63	3.20%	Grugni et al. 2012
Southwest Asia	Turkey	Central Anatolia	Turkic		90	3.00%	Borkar et al. 2011
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	2.03%	Hovhannisyan et al. 2014
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	2.01%	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	1.94%	Hovhannisyan et al. 2014
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	1.91%	Abu-Amero et al. 2009
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	1.70%	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Iron)	Indo-European	Iranian	230	0.90%	Balanovsky et al. 2011
Southwest Asia	Oman	Arabs	Afro-Asiatic	Semitic	121	0.83%	Luis et al. 2004
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.80%	Balanovsky et al. 2011
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	0.50%	Hovhannisyan et al. 2014
Western Europe	Central Portugal	Portuguese	Indo-European	Italic	46	2.20%	Carvalho et al. 2008
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.26%	Larmuseau et al. 2014

Supplementary Table 11.2. Survey of T-M184 Variation (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T-M184	Reference
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	9.00%	Balanovsky et al. 2017
Caucasus	Russia	Avars	North Caucasian		42	4.76%	Yunusbayev et al. 2012
Caucasus	Armenia	Armenians (Eastern)	Indo-European	Armenian	416	4.57%	Hovhannisyan et al. 2014
Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	Indo-European	Armenian	92	4.00%	Balanovsky et al. 2017
Caucasus	Russia: Krasnodar	Armenians Krasnodar	Indo-European	Armenian	117	4.00%	Balanovsky et al. 2017
Caucasus	Russia	Karachays	Turkic		69	2.90%	Yunusbayev et al. 2012
Caucasus	Daghestan	Lezgians	North Caucasian		81	2.50%	Balanovsky et al. 2011
Caucasus	Russia	Andis	North Caucasian		49	2.04%	Yunusbayev et al. 2012
Caucasus	Russia: Adygea	Armenians Adygei	Indo-European	Armenian	49	2.00%	Balanovsky et al. 2017
Caucasus	Russia: Krasnodar	Armenians Hemsheni	Indo-European	Armenian	89	2.00%	Balanovsky et al. 2017
Caucasus	Russia	Abkhaz	North Caucasian		58	1.70%	Balanovsky et al. 2011
Caucasus	Georgia	Imereti	Kartvelian		62	1.60%	Balanovsky et al. 2017
Caucasus	Russia	Kumyks	Turkic		73	1.37%	Yunusbayev et al. 2012
Caucasus	Russia	Nogais, Kuban	Turkic		87	1.15%	Yunusbayev et al. 2012
Caucasus	Russia	Kabardin	North Caucasian		140	0.71%	Yunusbayev et al. 2012
Caucasus	Russia	Chechens (Ingushetia)	North Caucasian		112	0.70%	Balanovsky et al. 2011
Caucasus	Russia	Cherkessians	North Caucasian		142	0.70%	Balanovsky et al. 2011
Caucasus	Georgia	Abkhaz	North Caucasian		162	0.62%	Yunusbayev et al. 2012
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	3.57%	Haber et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T-M184	Reference
Central Asia	Uzbekistan	Dungan	Sino-Tibetan	Chinese	31	3.00%	Zhabagin et al. 2017
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	1.41%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	1.15%	Di Cristofaro et al. 2013
Central Asia	Kazakhstan (Zhanakorgan)	Kazakh	Turkic		94	1.00%	Zhabagin et al. 2017
East Asia	Xingjiang, China	Uyghurs	Turkic		48	2.08%	Zhong et al. 2011
Eastern Europe	Moldova	Gagauz	Turkic		89	3.40%	Varzari et al. 2009
Eastern Europe	Bulgaria	Bulgarians	Indo-European	Slavic	808	1.60%	Karachanak et al. 2013
Eastern Europe	Slovakia	Slovaks	Indo-European	Slavic	164	0.61%	Rebala et al. 2013
Mediterranean	Smyrna, Greece	Greeks	Indo-European	Greek	58	3.45%	King et al. 2011
Mediterranean	Phokaia, Greece	Greeks	Indo-European	Greeks	31	3.23%	King et al. 2011
Mediterranean	Cyprus	Greek Cypriots	Indo-European	Greek	629	2.54%	Voskarides et al. 2017
Mediterranean	Italy	Italians	Indo-European	Italic	884	2.37%	Boattini et al. 2013
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	2.26%	Francalacci et al. 2015
Mediterranean	Lerna/Franchthi Cave, Greece	Greeks	Indo-European	Greek	57	1.75%	King et al. 2011
Mediterranean	Greece	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	1.75%	King et al. 2011
Mediterranean	Greece	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	1.75%	King et al. 2011
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	150	6.70%	Mendez et al. 2011
North Africa	Egypt	Arabs	Afro-Asiatic	Semitic	147	5.44%	Luis et al. 2004
North Africa	Sudan	Oromo	Afro-Asiatic	Cushitic	78	5.13%	Hassan et al. 2008
North Africa	Sudan	Amhara	Afro-Asiatic	Semitic	48	4.17%	Hassan et al. 2008
South Asia	Bihar	Brahmin	Indo-European	Indo-Aryan	38	13.16%	Sharma et al. 2009
South Asia	Uttar Pradesh	Gond	Dravidian		38	10.81%	Sharma et al. 2009

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T-M184	Reference
South Asia	Kashmir	Pandits	Indo-European	Indo-Aryan	51	9.80%	Sharma et al. 2009
South Asia	Kashmir	Gujars	Indo-European	Indo-Aryan	49	8.16%	Sharma et al. 2009
South Asia	Madhya Pradesh	Gond	Dravidian		31	6.25%	Sharma et al. 2009
South Asia	Maharashtra	Brahmin	Indo-European	Indo-Aryan	32	3.33%	Sharma et al. 2009
South Asia	Gujarat	Brahmin	Indo-European	Indo-Aryan	64	3.13%	Sharma et al. 2009
South Asia	Western India	Chitpavan Brahmin	Indo-European	Indo-Aryan	66	3.00%	Gaikwad and Kashyap 2005
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	270	1.48%	Lee et al. 2014
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	96	1.00%	Firasat et al. 2007
Southwest Asia	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	20.19%	Hovhannisyan et al. 2014
Southwest Asia	Middle East	Assyrians	Afro-Asiatic	Semitic	31	12.90%	Mendez et al. 2011
Southwest Asia	Iran	Assyrians	Afro-Asiatic	Semitic	39	10.30%	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	8.50%	Grugni et al. 2012
Southwest Asia	Iran	Azerbaijani	Turkic		63	7.90%	Grugni et al. 2012
Southwest Asia	Middle East	Druze	Afro-Asiatic	Semitic	39	7.70%	Mendez et al. 2011
Southwest Asia	Iran	Persians Fars	Indo-European	Iranian	44	6.80%	Grugni et al. 2012
Southwest Asia	Oman	Arabs	Afro-Asiatic	Semitic	121	6.61%	Luis et al. 2004
Southwest Asia	Iran	Persians Yazd	Indo-European	Iranian	46	6.40%	Grugni et al. 2012
Southwest Asia	Turkey	Armenians (Central)	Indo-European	Armenian	200	6.00%	Hovhannisyan et al. 2014
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	36	5.60%	Mendez et al. 2011
Southwest Asia	Syria	Syrians	Afro-Asiatic	Semitic	95	5.40%	Mendez et al. 2011
Southwest Asia	Middle East	Palestinians	Afro-Asiatic	Semitic	115	5.30%	Mendez et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T-M184	Reference
Southwest Asia	Iran	Persians Khorasan	Indo-European	Iranian	59	5.10%	Grugni et al. 2012
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	5.10%	Abu-Amero et al. 2009
Southwest Asia	Turkey	Armenians (Western)	Indo-European	Armenian	148	4.73%	Hovhannisyan et al. 2014
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	914	4.70%	Zalloua et al. 2008
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	1202	4.49%	Haber et al. 2011
Southwest Asia	Eastern Iran	Persians	Indo-European	Iranian	77	3.90%	Malyarchuk et al. 2013
Southwest Asia	Turkey	Armenians (Van)	Indo-European	Armenian	103	3.88%	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Turks (Western Anatolia)	Turkic		30	3.33%	King et al. 2011
Southwest Asia	Turkey	Central Anatolia	Turkic		90	3.33%	King et al. 2011
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	187	3.10%	Mendez et al. 2011
Southwest Asia	Turkey	Turks	Turkic		33	3.03%	King et al. 2011
Southwest Asia	Iran	Armenians (Salmast)	Indo-European	Armenian	199	2.51%	Hovhannisyan et al. 2014
Southwest Asia	Turkey	Turks	Turkic		523	2.49%	Cinnioglu et al. 2004
Southwest Asia	Iran	Iranians	Indo-European	Iranian	324	2.16%	Haber et al. 2011
Southwest Asia	Turkey	Turks (Northwest Anatolia)	Turkic		52	1.92%	King et al. 2011
Southwest Asia	Iran	Turkmen	Turkic		68	1.40%	Grugni et al. 2012
Southwest Asia	Iran	Ossetians (Digor)	Indo-European	Iranian	127	0.80%	Balanovsky et al. 2011
Southwest Asia	Syria	Syrians	Afro-Asiatic	Semitic	518	0.77%	Haber et al. 2011
Sub-Saharan Africa	Southern Africa	Lemba	Niger-Congo	Bantoid	34	17.60%	Mendez et al. 2011
Sub-Saharan Africa	Tanzania	Wairak	Niger-Congo	Bantoid	43	11.63%	Luis et al. 2004

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T-M184	Reference
Sub-Saharan Africa	Uganda	Ng'arkarimojong	Nilo-Saharan		118	0.85%	Gomes et al. 2010
Western Europe	Central Portugal	Portuguese	Indo-European	Italic	46	4.30%	Carvalho et al. 2008
Western Europe	Iberia	Iberians	Indo-European	Italic	559	2.86%	Flores et al. 2004
Western Europe	France	French	Indo-European	Italic	558	1.61%	Ramos-Luis et al. 2014
Western Europe	Iberia	Iberians	Indo-European	Italic	1882	1.54%	Santos et al. 2014
Western Europe	Bavaria, Germany	Germans	Indo-European	Germanic	218	0.92%	Rebala et al. 2013
Western Europe	Mecklenburg, Germany	Germans	Indo-European	Germanic	131	0.76%	Rebala et al. 2013
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.65%	Larmuseau et al. 2014

Supplementary Table 11.3. Survey of LT-L298 Variation (Regional View).

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
Caucasus	Chechens	North Caucasian		165	17.58%	Yunusbayev et al. 2012
Caucasus	Avars	North Caucasian		42	14.28%	Yunusbayev et al. 2012
Caucasus	Chechens	North Caucasian		100	14.00%	Balanovsky et al. 2011
Caucasus	Armenians Erzurum	Indo-European	Armenian	99	12.03%	Balanovsky et al. 2017
Caucasus	Armenians Don	Indo-European	Armenian	92	10.52%	Balanovsky et al. 2017
Caucasus	Chechens	North Caucasian		20	10.00%	Caciagli et al. 2009
Caucasus	Ingush	North Caucasian		105	8.57%	Yunusbayev et al. 2012
Caucasus	Tats	Indo-European	Iranian	24	8.33%	Karafet et al. 2016
Caucasus	Chechens (Chechnya)	North Caucasian		118	7.00%	Balanovsky et al. 2011
Caucasus	Armenians Krasnodar	Indo-European	Armenian	117	6.56%	Balanovsky et al. 2017
Caucasus	Abkhaz	North Caucasian		162	5.56%	Yunusbayev et al. 2012
Caucasus	Armenians (Eastern)	Indo-European	Armenian	416	5.53%	Hovhannisyan et al. 2014
Caucasus	Abkhaz	North Caucasian		58	5.10%	Balanovsky et al. 2011
Caucasus	Imereti	Kartvelian		62	4.83%	Balanovsky et al. 2017
Caucasus	Armenians Hemsheni	Indo-European	Armenian	89	4.25%	Balanovsky et al. 2017
Caucasus	Armenians Adygei	Indo-European	Armenian	49	4.07%	Balanovsky et al. 2017
Caucasus	Lezgians	North Caucasian		81	3.70%	Balanovsky et al. 2011
Caucasus	Chamalal	North Caucasian		27	3.70%	Yunusbayev et al. 2012
Caucasus	Avars	North Caucasian		115	3.00%	Balanovsky et al. 2011
Caucasus	Karachays	Turkic		69	2.90%	Yunusbayev et al. 2012
Caucasus	Ingush	North Caucasian		143	2.80%	Balanovsky et al. 2011
Caucasus	Adyghe	North Caucasian		154	2.60%	Yunusbayev et al. 2012

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
Caucasus	Chechens (Ingushetia)	North Caucasian		112	2.40%	Balanovsky et al. 2011
Caucasus	Abazins	North Caucasian		88	2.27%	Yunusbayev et al. 2012
Caucasus	Andis	North Caucasian		49	2.04%	Yunusbayev et al. 2012
Caucasus	Shapsugs	North Caucasian		100	2.00%	Balanovsky et al. 2011
Caucasus	Armenians	Indo-European	Armenian	57	1.75%	Yunusbayev et al. 2012
Caucasus	Kabardin	North Caucasian		140	1.42%	Yunusbayev et al. 2012
Caucasus	Cherkessians	North Caucasian		142	1.40%	Balanovsky et al. 2011
Caucasus	Kumyks	Turkic		73	1.37%	Yunusbayev et al. 2012
Caucasus	Nogais, Kuban	Turkic		87	1.15%	Yunusbayev et al. 2012
Caucasus	North Ossetians	Indo-European	Iranian	132	0.76%	Yunusbayev et al. 2012
Central Asia	Tajiks	Indo-European	Iranian	40	22.50%	Malyarchuk et al. 2013
Central Asia	Tajiks	Indo-European	Iranian	56	12.48%	Haber et al. 2012
Central Asia	Pashtuns (Pathans)	Indo-European	Iranian	49	12.24%	Haber et al. 2012
Central Asia	Pashtuns (Pathans)	Indo-European	Iranian	190	9.47%	Lacau et al. 2012
Central Asia	Uzbeks	Turkic		127	9.45%	Di Cristofaro et al. 2013
Central Asia	Pashtuns (Pathans)	Indo-European	Iranian	87	8.05%	Di Cristofaro et al. 2013
Central Asia	Tajiks	Indo-European	Iranian	142	7.75%	Di Cristofaro et al. 2013
Central Asia	Dungan	Sino-Tibetan	Chinese	31	6.00%	Zhabagin et al. 2017
Central Asia	Uzbek	Turkic		67	5.97%	Zhabagin et al. 2017
Central Asia	Kazakh	Turkic		94	5.26%	Zhabagin et al. 2017
Central Asia	Uzbek	Turkic		98	5.10%	Zhabagin et al. 2017
Central Asia	Turkmen	Turkic		74	4.05%	Di Cristofaro et al. 2013
Central Asia	Hazara	Indo-European	Iranian	77	3.90%	Di Cristofaro et al. 2013
Central Asia	Uzbek	Turkic		52	3.85%	Zhabagin et al. 2017

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
Central Asia	Hazara	Indo-European	Iranian	60	1.66%	Haber et al. 2012
Central Asia	Kyrgyz	Turkic		132	1.52%	Di Cristofaro et al. 2013
Central Asia	Karakalpak	Turkic		100	1.00%	Zhabagin et al. 2017
East Asia	Uyghurs	Turkic		48	10.41%	Zhong et al. 2011
East Asia	Uyghurs	Turkic		50	4.00%	Zhong et al. 2011
East Asia	Uyghurs	Turkic		71	2.82%	Zhong et al. 2011
Eastern Europe	Gagauz	Turkic		89	3.40%	Varzari et al. 2009
Eastern Europe	Bulgarians	Indo-European	Slavic	808	1.80%	Karachanak et al. 2013
Eastern Europe	Slovaks	Indo-European	Slavic	164	0.61%	Rebala et al. 2013
Mediterranean	Greek Cypriots	Indo-European	Greek	629	4.44%	Voskarides et al. 2017
Mediterranean	Italians	Indo-European	Italic	884	3.84%	Boattini et al. 2013
Mediterranean	Greeks (Nea Nikomedeia)	Indo-European	Greek	57	3.50%	King et al. 2011
Mediterranean	Greeks	Indo-European	Greek	58	3.45%	King et al. 2011
Mediterranean	Greeks	Indo-European	Greeks	31	3.23%	King et al. 2011
Mediterranean	Sardinians	Indo-European	Italic	1194	3.10%	Francalacci et al. 2015
Mediterranean	Greeks	Indo-European	Greek	57	1.75%	King et al. 2011
Mediterranean	Greeks (Sesklo/Dimini)	Indo-European	Greek	57	1.75%	King et al. 2011
North Africa	Egyptians	Afro-Asiatic	Semitic	150	6.70%	Mendez et al. 2011
North Africa	Arabs	Afro-Asiatic	Semitic	147	5.44%	Luis et al. 2004
North Africa	Oromo	Afro-Asiatic	Cushitic	78	5.13%	Hassan et al. 2008
North Africa	Amhara	Afro-Asiatic	Semitic	48	4.17%	Hassan et al. 2008
South Asia	Vokkaliga	Dravidian		102	32.35%	Chennakrishnaiah et al. 2013
South Asia	Baloch	Indo-European	Iranian	59	28.81%	Qamar et al. 2002
South Asia	Kalash	Indo-European	Indo-Aryan	44	25.00%	Qamar et al. 2002

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
South Asia	Kalash	Indo-European	Indo-Aryan	20	25.00%	Di Cristofaro et al. 2013
South Asia	Kalash	Indo-European	Indo-Aryan	44	25.00%	Firasat et al. 2007
South Asia	Gujars	Indo-European	Indo-Aryan	49	24.49%	Sharma et al. 2009
South Asia	Baloch	Indo-European	Iranian	25	24.00%	Di Cristofaro et al. 2013
South Asia	Oriya Brahmin	Indo-European	Indo-Aryan	24	20.84%	Sahoo et al. 2006
South Asia	Ambalakarar	Dravidian		29	20.69%	Sengupta et al. 2006
South Asia	Vanniyar	Dravidian		25	20.00%	Sengupta et al. 2006
South Asia	Konkani Brahmins	Indo-European	Indo-Aryan	43	18.60%	Kivisild et al. 2003
South Asia	Brahmin	Indo-European	Indo-Aryan	38	18.42%	Sharma et al. 2009
South Asia	Bhils	Indo-European	Indo-Aryan	22	18.18%	Sharma et al. 2009
South Asia	Sinhalese	Indo-European	Indo-Aryan	39	17.95%	Kivisild et al. 2003
South Asia	Lingayat	Dravidian		101	17.82%	Chennakrishnaiah et al. 2013
South Asia	Parsi	Indo-European	Indo-Aryan	90	17.78%	Qamar et al. 2002
South Asia	Iyer	Dravidian		29	17.24%	Sengupta et al. 2006
South Asia	Pallan	Dravidian		29	17.24%	Sengupta et al. 2006
South Asia	Banjara (Lambadi)	Indo-European	Indo-Aryan	35	17.14%	Kivisild et al. 2003
South Asia	Burusho	Isolate		94	17.02%	Qamar et al. 2002
South Asia	Iyengar	Dravidian		30	16.67%	Sengupta et al. 2006
South Asia	Burusho	Isolate		97	16.50%	Firasat et al. 2007
South Asia	Vellalar	Dravidian		31	16.13%	Sengupta et al. 2006
South Asia	Pandits	Indo-European	Indo-Aryan	51	15.68%	Sharma et al. 2009
South Asia	Maratha	Indo-European	Indo-Aryan	20	15.00%	Sengupta et al. 2006
South Asia	Burusho	Isolate		20	15.00%	Di Cristofaro et al. 2013
South Asia	Burusho	Isolate		20	15.00%	Sengupta et al. 2006
South Asia	Pardhan	Dravidian		128	14.84%	Thanseem et al. 2006

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
South Asia	Chenchu	Dravidian		41	14.63%	Kivisild et al. 2003
South Asia	Pashtuns (Pathans)	Indo-European	Iranian	96	13.50%	Firasat et al. 2007
South Asia	Brahmin	Indo-European	Indo-Aryan	32	13.33%	Sharma et al. 2009
South Asia	Pashtuns (Pathans)	Indo-European	Iranian	93	12.90%	Qamar et al. 2002
South Asia	Punjabi	Indo-European	Indo-Aryan	66	12.12%	Kivisild et al. 2003
South Asia	Brahmin	Indo-European	Indo-Aryan	64	10.94%	Sharma et al. 2009
South Asia	Gond	Dravidian		38	10.81%	Sharma et al. 2009
South Asia	Gujarati	Indo-European	Indo-Aryan	29	10.34%	Kivisild et al. 2003
South Asia	Irula	Dravidian		30	10.00%	Sengupta et al. 2006
South Asia	Pashtuns (Pathans)	Indo-European	Iranian	20	10.00%	Di Cristofaro et al. 2013
South Asia	Parayar	Dravidian		24	8.34%	Arunkumar et al. 2012
South Asia	Brahui	Dravidian		25	8.00%	Di Cristofaro et al. 2013
South Asia	Tharu	Indo-European	Indo-Aryan	164	7.93%	Chaubey et al. 2014
South Asia	Thoda	Dravidian		26	7.70%	Arunkumar et al. 2012
South Asia	Paravar	Dravidian		27	7.41%	Arunkumar et al. 2012
South Asia	Pashtuns (Pathans)	Indo-European	Iranian	270	7.41%	Lee et al. 2014
South Asia	Paswan	Indo-European	Indo-Aryan	27	7.41%	Sharma et al. 2009
South Asia	Brahui	Dravidian		110	7.27%	Qamar et al. 2002
South Asia	Brahmin	Indo-European	Indo-Aryan	42	7.14%	Sharma et al. 2009
South Asia	Tripuri	Sino-Tibetan	Tibeto-Burman	88	7.00%	Gazi et al. 2013
South Asia	Rajput	Indo-European	Indo-Aryan	29	6.90%	Sengupta et al. 2006
South Asia	Kamar	Dravidian		30	6.67%	Sengupta et al. 2006
South Asia	Tharu	Indo-European	Indo-Aryan	45	6.67%	Chaubey et al. 2014
South Asia	Sindhi	Indo-European	Indo-Aryan	122	6.56%	Qamar et al. 2002
South Asia	Gond	Dravidian		31	6.25%	Sharma et al. 2009

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
South Asia	Mahadeo Koli	Indo-European	Indo-Aryan	50	6.00%	Thangaraj et al. 2010
South Asia	Pallar	Dravidian		51	5.88%	Arunkumar et al. 2012
South Asia	Tharu	Indo-European	Indo-Aryan	37	5.40%	Fornarino et al. 2009
South Asia	Brahmin	Indo-European	Indo-Aryan	30	5.26%	Sharma et al. 2009
South Asia	Marma	Sino-Tibetan	Tibeto-Burman	60	5.00%	Gazi et al. 2013
South Asia	Pahariya	Indo-European	Indo-Aryan	100	5.00%	Borkar et al. 2011
South Asia	Dhodia	Indo-European	Indo-Aryan	63	4.76%	Khurana et al. 2014
South Asia	Dubla	Indo-European	Indo-Aryan	42	4.76%	Khurana et al. 2014
South Asia	Vadama	Indo-European	Indo-Aryan	63	4.76%	Arunkumar et al. 2012
South Asia	Sindhi	Indo-European	Indo-Aryan	31	4.76%	Di Cristofaro et al. 2013
South Asia	Rajbanshi	Indo-European	Indo-Aryan	45	4.44%	Borkar et al. 2011
South Asia	Vanniyar NTN	Dravidian		96	4.16%	Arunkumar et al. 2012
South Asia	Tamil Jains	Dravidian		100	4.00%	Arunkumar et al. 2012
South Asia	Koknasth Brahmin	Indo-European	Indo-Aryan	25	4.00%	Sengupta et al. 2006
South Asia	Rajbanshi	Indo-European	Indo-Aryan	51	3.92%	Debnath et al. 2011
South Asia	Parayar NTN	Dravidian		52	3.84%	Arunkumar et al. 2012
South Asia	Ho	Austro-Asiatic		28	3.57%	Borkar et al. 2011
South Asia	Tharu	Indo-European	Indo-Aryan	57	3.50%	Fornarino et al. 2009
South Asia	Saharia	Indo-European	Indo-Aryan	57	3.24%	Sharma et al. 2009
South Asia	Brahmin	Indo-European	Indo-Aryan	31	3.21%	Sharma et al. 2009
South Asia	Paliyan	Dravidian		95	3.16%	Arunkumar et al. 2012
South Asia	Chitpavan Brahmin	Indo-European	Indo-Aryan	66	3.00%	Gaikwad and Kashyap 2005
South Asia	Naikpod	Dravidian		68	2.94%	Thanseem et al. 2006
South Asia	Oraon	Dravidian		110	2.73%	Borkar et al. 2011
South Asia	Chaudhari	Indo-European	Indo-Aryan	113	2.65%	Khurana et al. 2014

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
South Asia	Munda	Austro-Asiatic		94	2.13%	Borkar et al. 2011
South Asia	Valayar	Dravidian		95	2.11%	Arunkumar et al. 2012
South Asia	Thakur	Indo-European	Indo-Aryan	48	2.00%	Thangaraj et al. 2010
South Asia	Birhor	Austro-Asiatic		100	2.00%	Borkar et al. 2011
South Asia	Piramalai Kallar	Dravidian		53	1.89%	Arunkumar et al. 2012
South Asia	Andh	Indo-European	Indo-Aryan	54	1.86%	Thanseem et al. 2006
South Asia	Bengali	Indo-European	Indo-Aryan	54	1.85%	Debnath et al. 2011
South Asia	Pulayar	Dravidian		63	1.59%	Arunkumar et al. 2012
South Asia	Maravar	Dravidian		80	1.25%	Arunkumar et al. 2012
South Asia	Santhal	Austro-Asiatic		90	1.11%	Borkar et al. 2011
South Asia	Ezhava	Dravidian		95	1.05%	Arunkumar et al. 2012
South Asia	Nadar Cape	Dravidian		98	1.02%	Arunkumar et al. 2012
South Asia	Yadhava	Dravidian		107	0.93%	Arunkumar et al. 2012
Southwest Asia	Laz	Kartvelian		36	41.67%	Balanovsky et al. 2017
Southwest Asia	Armenians (Sasun)	Indo-European	Armenian	104	24.04%	Hovhannisyan et al. 2014
Southwest Asia	Baloch	Indo-European	Iranian	24	16.60%	Grugni et al. 2012
Southwest Asia	Persians Fars	Indo-European	Iranian	44	13.60%	Grugni et al. 2012
Southwest Asia	Lebanese Druze	Afro-Asiatic	Semitic	31	13.00%	Haber et al. 2016
Southwest Asia	Persians	Indo-European	Iranian	77	12.99%	Malyarchuk et al. 2013
Southwest Asia	Assyrians	Afro-Asiatic	Semitic	31	12.90%	Mendez et al. 2011
Southwest Asia	Lebanese Christians	Afro-Asiatic	Semitic	52	12.00%	Haber et al. 2016
Southwest Asia	Syrians	Afro-Asiatic	Semitic	518	11.19%	Haber et al. 2011
Southwest Asia	Azerbaijani	Turkic		63	11.10%	Grugni et al. 2012
Southwest Asia	Persians Yazd	Indo-European	Iranian	46	10.60%	Grugni et al. 2012
Southwest Asia	Iranians	Indo-European	Iranian	324	10.49%	Haber et al. 2011

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
Southwest Asia	Assyrians	Afro-Asiatic	Semitic	39	10.30%	Grugni et al. 2012
Southwest Asia	Kurds	Indo-European	Iranian	59	10.20%	Grugni et al. 2012
Southwest Asia	Lebanese	Afro-Asiatic	Semitic	914	9.95%	Zalloua et al. 2008
Southwest Asia	Lebanese	Afro-Asiatic	Semitic	1202	9.48%	Haber et al. 2011
Southwest Asia	Persians Khorasan	Indo-European	Iranian	59	8.50%	Grugni et al. 2012
Southwest Asia	Kurds	Indo-European	Iranian	25	8.00%	Malyarchuk et al. 2013
Southwest Asia	Druze	Afro-Asiatic	Semitic	39	7.70%	Mendez et al. 2011
Southwest Asia	Arabs	Afro-Asiatic	Semitic	121	7.44%	Luis et al. 2004
Southwest Asia	Turkmen	Turkic		68	7.20%	Grugni et al. 2012
Southwest Asia	Saudis	Afro-Asiatic	Semitic	157	7.01%	Abu-Amero et al. 2009
Southwest Asia	Lebanese Muslims	Afro-Asiatic	Semitic	43	7.00%	Haber et al. 2016
Southwest Asia	Armenians (Western)	Indo-European	Armenian	148	6.76%	Hovhannisyan et al. 2014
Southwest Asia	Turks	Turkic		523	6.70%	Cinnioglu et al. 2004
Southwest Asia	Central Anatolia	Turkic		90	6.66%	King et al. 2011
Southwest Asia	Turks (Western Anatolia)	Turkic		30	6.66%	King et al. 2011
Southwest Asia	Armenians (Central)	Indo-European	Armenian	200	6.50%	Hovhannisyan et al. 2014
Southwest Asia	Armenians (Van)	Indo-European	Armenian	103	5.82%	Hovhannisyan et al. 2014
Southwest Asia	Iraqis	Afro-Asiatic	Semitic	36	5.60%	Mendez et al. 2011
Southwest Asia	Syrians	Afro-Asiatic	Semitic	95	5.40%	Mendez et al. 2011
Southwest Asia	Palestinians	Afro-Asiatic	Semitic	115	5.30%	Mendez et al. 2011
Southwest Asia	Gilak	Indo-European	Iranian	64	4.80%	Grugni et al. 2012
Southwest Asia	Armenians (Salmast)	Indo-European	Armenian	199	4.52%	Hovhannisyan et al. 2014
Southwest Asia	Jordanians	Afro-Asiatic	Semitic	187	3.10%	Mendez et al. 2011
Southwest Asia	Turks	Turkic		33	3.03%	King et al. 2011

Region	Population	Language Family	Branch	Sample Size	Frequency LT-L298	Reference
Southwest Asia	Central Anatolia	Turkic		90	3.00%	Borkar et al. 2011
Southwest Asia	Turks (Northwest Anatolia)	Turkic		52	1.92%	King et al. 2011
Southwest Asia	Ossetians (Digor)	Indo-European	Iranian	127	1.60%	Balanovsky et al. 2011
Southwest Asia	Ossetians (Iron)	Indo-European	Iranian	230	0.90%	Balanovsky et al. 2011
Sub-Saharan Africa	Lemba	Niger-Congo	Bantoid	34	17.60%	Mendez et al. 2011
Sub-Saharan Africa	Wairak	Niger-Congo	Bantoid	43	11.63%	Luis et al. 2004
Sub-Saharan Africa	Ng'arkarimjong	Nilo-Saharan		118	0.85%	Gomes et al. 2010
Western Europe	Portuguese	Indo-European	Italic	46	6.50%	Carvalho et al. 2008
Western Europe	Iberians	Indo-European	Italic	559	2.86%	Flores et al. 2004
Western Europe	French	Indo-European	Italic	558	1.61%	Ramos-Luis et al. 2014
Western Europe	Iberians	Indo-European	Italic	1882	1.54%	Santos et al. 2014
Western Europe	Germans	Indo-European	Germanic	218	0.92%	Rebala et al. 2013
Western Europe	Flemish	Indo-European	Germanic	773	0.91%	Larmuseau et al. 2014
Western Europe	Germans	Indo-European	Germanic	131	0.76%	Rebala et al. 2013

Supplementary Table 11.4. Survey of L-M20 Variation (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency L-M20	Reference
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Druze	31	13.00%	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Christians	52	12.00%	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Syria	Syrians	518	10.42%	Haber et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Muslims	43	7.00%	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese	914	5.25%	Zalloua et al. 2008
Dravidian		South Asia	Southwest India	Vokkaliga	102	32.35%	Chennakrishnaiah et al. 2013
Dravidian		South Asia	South India	Ambalakarar	29	20.69%	Sengupta et al. 2006
Dravidian		South Asia	South India	Vanniyar	25	20.00%	Sengupta et al. 2006
Dravidian		South Asia	Southwest India	Lingayat	101	17.82%	Chennakrishnaiah et al. 2013
Dravidian		South Asia	South India	Pallan	29	17.24%	Sengupta et al. 2006
Dravidian		South Asia	South India	Iyer	29	17.24%	Sengupta et al. 2006
Dravidian		South Asia	South India	Iyengar	30	16.67%	Sengupta et al. 2006
Dravidian		South Asia	South India	Vellalar	31	16.13%	Sengupta et al. 2006
Dravidian		South Asia	Andra Pradesh	Pardhan	128	14.84%	Thanseem et al. 2006
Dravidian		South Asia	Andhra Pradesh	Chenchu	41	14.63%	Kivisild et al. 2003
Dravidian		South Asia	South India	Irula	30	10.00%	Sengupta et al. 2006
Dravidian		South Asia	Tamil Nadu	Parayar	24	8.34%	Arunkumar et al. 2012
Dravidian		South Asia	Pakistan	Brahui	25	8.00%	Di Cristofaro et al. 2013
Dravidian		South Asia	Tamil Nadu	Thoda	26	7.70%	Arunkumar et al. 2012
Dravidian		South Asia	Tamil Nadu	Paravar	27	7.41%	Arunkumar et al. 2012
Dravidian		South Asia	Pakistan	Brahui	110	7.27%	Qamar et al. 2002
Dravidian		South Asia	Central India	Kamar	30	6.67%	Sengupta et al. 2006

Language Family	Branch	Region	Location	Population	Sample Size	Frequency L-M20	Reference
Dravidian		South Asia	Tamil Nadu	Pallar	51	5.88%	Arunkumar et al. 2012
Indo-European	Armenian	Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	92	6.52%	Balanovsky et al. 2017
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	44	25.00%	Firasat et al. 2007
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	20	25.00%	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	44	25.00%	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Orissa	Oriya Brahmin	24	20.84%	Sahoo et al. 2006
Indo-European	Indo-Aryan	South Asia	Bombay	Konkani Brahmins	43	18.60%	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Gujarat	Bhils	22	18.18%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Sri Lanka	Sinhalese	39	17.95%	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Pakistan	Parsi	90	17.78%	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Andhra Pradesh	Banjara (Lambadi)	35	17.14%	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Kashmir	Gujars	49	16.33%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	West India	Maratha	20	15.00%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Punjab	Punjabi	66	12.12%	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Bombay	Gujarati	29	10.34%	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Maharashtra	Brahmin	32	10.00%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Uttar-Pradesh	Tharu	164	7.93%	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	Gujarat	Brahmin	64	7.81%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Bihar	Paswan	27	7.41%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Madhya Pradesh	Brahmin	42	7.14%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Northern India	Rajput	29	6.90%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Uttarakhand	Tharu	45	6.67%	Chaubey et al. 2014

Language Family	Branch	Region	Location	Population	Sample Size	Frequency L-M20	Reference
Indo-European	Indo-Aryan	South Asia	Pakistan	Sindhi	122	6.56%	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Maharashtra	Mahadeo Koli	50	6.00%	Thangaraj et al. 2010
Indo-European	Indo-Aryan	South Asia	Kashmir	Pandits	51	5.88%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Morang, Nepal	Tharu	37	5.40%	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Himachal	Brahmin	30	5.26%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Bihar	Brahmin	38	5.26%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Jharkhand	Pahariya	100	5.00%	Borkar et al. 2011
Indo-European	Iranian	South Asia	Pakistan	Baloch	59	28.81%	Qamar et al. 2002
Indo-European	Iranian	South Asia	Pakistan	Baloch	25	24.00%	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Tajikistan	Tajiks	40	22.50%	Malyarchuk et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Baloch	24	16.60%	Grugni et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	93	12.90%	Qamar et al. 2002
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	96	12.50%	Firasat et al. 2007
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	49	12.24%	Haber et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	20	10.00%	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	190	9.47%	Lacau et al. 2012
Indo-European	Iranian	Southwest Asia	Eastern Iran	Persians	77	9.09%	Malyarchuk et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	56	8.91%	Haber et al. 2012
Indo-European	Iranian	Caucasus	Daghestan	Tats	24	8.33%	Karafet et al. 2016
Indo-European	Iranian	Southwest Asia	Iran	Iranians	324	8.33%	Haber et al. 2011
Indo-European	Iranian	Southwest Asia	Western Iran	Kurds	25	8.00%	Malyarchuk et al. 2013

Language Family	Branch	Region	Location	Population	Sample Size	Frequency L-M20	Reference
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	87	6.90%	Di Cristofaro et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Persians Fars	44	6.80%	Grugni et al. 2012
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	142	6.34%	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	270	5.93%	Lee et al. 2014
Isolate		South Asia	Pakistan	Burusho	94	17.02%	Qamar et al. 2002
Isolate		South Asia	Pakistan	Burusho	97	16.50%	Firasat et al. 2007
Isolate		South Asia	North Pakistan	Burusho	20	15.00%	Sengupta et al. 2006
Isolate		South Asia	Pakistan	Burusho	20	15.00%	Di Cristofaro et al. 2013
Kartvelian		Southwest Asia	Turkey	Laz	36	41.67%	Balanovsky et al. 2017
North Caucasian		Caucasus	Russia	Chechens	165	17.58%	Yunusbayev et al. 2012
North Caucasian		Caucasus	Daghestan	Chechens	100	14.00%	Balanovsky et al. 2011
North Caucasian		Caucasus	Dagestan	Chechens	20	10.00%	Caciagli et al. 2009
North Caucasian		Caucasus	Russia	Avars	42	9.52%	Yunusbayev et al. 2012
North Caucasian		Caucasus	Russia	Ingush	105	8.57%	Yunusbayev et al. 2012
North Caucasian		Caucasus	Russia	Chechens (Chechnya)	118	7.00%	Balanovsky et al. 2011
Sino-Tibetan	Tibeto-Burman	South Asia	Bangladesh	Tripuri	88	7.00%	Gazi et al. 2013
Sino-Tibetan	Tibeto-Burman	South Asia	Bangladesh	Marma	60	5.00%	Gazi et al. 2013
Turkic		Central Asia	Afghanistan	Uzbeks	127	9.45%	Di Cristofaro et al. 2013
Turkic		East Asia	Xingjiang, China	Uyghurs	48	8.33%	Zhong et al. 2011
Turkic		Central Asia	Uzbekistan (Fergana)	Uzbek	67	5.97%	Zhabagin et al. 2017
Turkic		Southwest Asia	Iran	Turkmen	68	5.80%	Grugni et al. 2012

Language Family	Branch	Region	Location	Population	Sample Size	Frequency L-M20	Reference
Turkic		Central Asia	Uzbekistan (Xorezm) Uzbek		98	5.10%	Zhabagin et al. 2017

Supplementary Table 11.5. Survey of T-M184 Variation (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency T-M184	Reference
Afro-Asiatic	Cushitic	North Africa	Sudan	Oromo	78	5.13%	Hassan et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Assyrians	31	12.90%	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	39	10.30%	Grugni et al. 2012
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Druze	39	7.70%	Mendez et al. 2011
Afro-Asiatic	Semitic	North Africa	Egypt	Egyptians	150	6.70%	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Oman	Arabs	121	6.61%	Luis et al. 2004
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Iraqis	36	5.60%	Mendez et al. 2011
Afro-Asiatic	Semitic	North Africa	Egypt	Arabs	147	5.44%	Luis et al. 2004
Afro-Asiatic	Semitic	Southwest Asia	Syria	Syrians	95	5.40%	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Palestinians	115	5.30%	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	157	5.10%	Abu-Amero et al. 2009
Dravidian		South Asia	Uttar Pradesh	Gond	38	10.81%	Sharma et al. 2009
Dravidian		South Asia	Madhya Pradesh	Gond	31	6.25%	Sharma et al. 2009
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	20.19%	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Georgia	Armenians Erzurum	99	9.00%	Balanovsky et al. 2017
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Central)	200	6.00%	Hovhannisyan et al. 2014
Indo-European	Indo-Aryan	South Asia	Bihar	Brahmin	38	13.16%	Sharma et al. 2009

Language Family	Branch	Region	Location	Population	Sample Size	Frequency T-M184	Reference
Indo-European	Indo-Aryan	South Asia	Kashmir	Pandits	51	9.80%	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Kashmir	Gujars	49	8.16%	Sharma et al. 2009
Indo-European	Iranian	Southwest Asia	Iran	Kurds	59	8.50%	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Fars	44	6.80%	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Yazd	46	6.40%	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Khorasan	59	5.10%	Grugni et al. 2012
Niger-Congo	Bantoid	Sub-Saharan Africa	Southern Africa	Lemba	34	17.60%	Mendez et al. 2011
Niger-Congo	Bantoid	Sub-Saharan Africa	Tanzania	Wairak	43	11.63%	Luis et al. 2004
Turkic		Southwest Asia	Iran	Azerbaijani	63	7.90%	Grugni et al. 2012

Supplementary Table 11.6. Survey of LT-L298 Variation (Language View).

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Afro-Asiatic	Cushitic	North Africa	Sudan	Oromo	78	0.05	Hassan et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Druze	31	0.13	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Assyrians	31	0.13	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Christians	52	0.12	Haber et al. 2016
Afro-Asiatic	Semitic	Southwest Asia	Syria	Syrians	518	0.11	Haber et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Iran	Assyrians	39	0.10	Grugni et al. 2012
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese	914	0.10	Zalloua et al. 2008
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese	1202	0.09	Haber et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Druze	39	0.08	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Oman	Arabs	121	0.07	Luis et al. 2004
Afro-Asiatic	Semitic	Southwest Asia	Saudi Arabia	Saudis	157	0.07	Abu-Amero et al. 2009
Afro-Asiatic	Semitic	Southwest Asia	Lebanon	Lebanese Muslims	43	0.07	Haber et al. 2016
Afro-Asiatic	Semitic	North Africa	Egypt	Egyptians	150	0.07	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Iraq	Iraqis	36	0.06	Mendez et al. 2011
Afro-Asiatic	Semitic	North Africa	Egypt	Arabs	147	0.05	Luis et al. 2004
Afro-Asiatic	Semitic	Southwest Asia	Syria	Syrians	95	0.05	Mendez et al. 2011
Afro-Asiatic	Semitic	Southwest Asia	Middle East	Palestinians	115	0.05	Mendez et al. 2011
Dravidian		South Asia	Southwest India	Vokkaliga	102	0.32	Chennakrishnaiah et al. 2013
Dravidian		South Asia	South India	Ambalakarar	29	0.21	Sengupta et al. 2006
Dravidian		South Asia	South India	Vanniyar	25	0.20	Sengupta et al. 2006
Dravidian		South Asia	Southwest India	Lingayat	101	0.18	Chennakrishnaiah et al. 2013

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Dravidian		South Asia	South India	Pallan	29	0.17	Sengupta et al. 2006
Dravidian		South Asia	South India	Iyer	29	0.17	Sengupta et al. 2006
Dravidian		South Asia	South India	Iyengar	30	0.17	Sengupta et al. 2006
Dravidian		South Asia	South India	Vellalar	31	0.16	Sengupta et al. 2006
Dravidian		South Asia	Andra Pradesh	Pardhan	128	0.15	Thanseem et al. 2006
Dravidian		South Asia	Andhra Pradesh	Chenchu	41	0.15	Kivisild et al. 2003
Dravidian		South Asia	Uttar Pradesh	Gond	38	0.11	Sharma et al. 2009
Dravidian		South Asia	South India	Irula	30	0.10	Sengupta et al. 2006
Dravidian		South Asia	Tamil Nadu	Parayar	24	0.08	Arunkumar et al. 2012
Dravidian		South Asia	Pakistan	Brahui	25	0.08	Di Cristofaro et al. 2013
Dravidian		South Asia	Tamil Nadu	Thoda	26	0.08	Arunkumar et al. 2012
Dravidian		South Asia	Tamil Nadu	Paravar	27	0.07	Arunkumar et al. 2012
Dravidian		South Asia	Pakistan	Brahui	110	0.07	Qamar et al. 2002
Dravidian		South Asia	Central India	Kamar	30	0.07	Sengupta et al. 2006
Dravidian		South Asia	Madhya Pradesh	Gond	31	0.06	Sharma et al. 2009
Dravidian		South Asia	Tamil Nadu	Pallar	51	0.06	Arunkumar et al. 2012
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Sasun)	104	0.24	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Georgia	Armenians Erzurum	99	0.12	Balanovsky et al. 2017
Indo-European	Armenian	Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	92	0.11	Balanovsky et al. 2017
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Western)	148	0.07	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Russia: Krasnodar	Armenians Krasnodar	117	0.07	Balanovsky et al. 2017

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Central)	200	0.07	Hovhannisyan et al. 2014
Indo-European	Armenian	Southwest Asia	Turkey	Armenians (Van)	103	0.06	Hovhannisyan et al. 2014
Indo-European	Armenian	Caucasus	Armenia	Armenians (Eastern)	416	0.06	Hovhannisyan et al. 2014
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	44	0.25	Firasat et al. 2007
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	20	0.25	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	Pakistan	Kalash	44	0.25	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Kashmir	Gujars	49	0.24	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Orissa	Oriya Brahmin	24	0.21	Sahoo et al. 2006
Indo-European	Indo-Aryan	South Asia	Bombay	Konkani Brahmins	43	0.19	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Bihar	Brahmin	38	0.18	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Gujarat	Bhils	22	0.18	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Sri Lanka	Sinhalese	39	0.18	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Pakistan	Parsi	90	0.18	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Andhra Pradesh	Banjara (Lambadi)	35	0.17	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Kashmir	Pandits	51	0.16	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	West India	Maratha	20	0.15	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Maharashtra	Brahmin	32	0.13	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Punjab	Punjabi	66	0.12	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Gujarat	Brahmin	64	0.11	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Bombay	Gujarati	29	0.10	Kivisild et al. 2003
Indo-European	Indo-Aryan	South Asia	Uttar-Pradesh	Tharu	164	0.08	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	Bihar	Paswan	27	0.07	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Madhya Pradesh	Brahmin	42	0.07	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Northern India	Rajput	29	0.07	Sengupta et al. 2006

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Indo-European	Indo-Aryan	South Asia	Uttarakhand	Tharu	45	0.07	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	Pakistan	Sindhi	122	0.07	Qamar et al. 2002
Indo-European	Indo-Aryan	South Asia	Maharashtra	Mahadeo Koli	50	0.06	Thangaraj et al. 2010
Indo-European	Indo-Aryan	South Asia	Morang, Nepal	Tharu	37	0.05	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Himachal	Brahmin	30	0.05	Sharma et al. 2009
Indo-European	Indo-Aryan	South Asia	Jharkhand	Pahariya	100	0.05	Borkar et al. 2011
Indo-European	Iranian	South Asia	Pakistan	Baloch	59	0.29	Qamar et al. 2002
Indo-European	Iranian	South Asia	Pakistan	Baloch	25	0.24	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Tajikistan	Tajiks	40	0.23	Malyarchuk et al. 2013
Indo-European	Iranian	Southwest Asia	Iran	Baloch	24	0.17	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Fars	44	0.14	Grugni et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	96	0.14	Firasat et al. 2007
Indo-European	Iranian	Southwest Asia	Eastern Iran	Persians	77	0.13	Malyarchuk et al. 2013
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	93	0.13	Qamar et al. 2002
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	56	0.12	Haber et al. 2012
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	49	0.12	Haber et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Yazd	46	0.11	Grugni et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Iranians	324	0.10	Haber et al. 2011
Indo-European	Iranian	Southwest Asia	Iran	Kurds	59	0.10	Grugni et al. 2012
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	20	0.10	Di Cristofaro et al. 2013
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	190	0.09	Lacau et al. 2012
Indo-European	Iranian	Southwest Asia	Iran	Persians Khorasan	59	0.09	Grugni et al. 2012
Indo-European	Iranian	Caucasus	Daghestan	Tats	24	0.08	Karafet et al. 2016
Indo-European	Iranian	Central Asia	Afghanistan	Pashtuns (Pathans)	87	0.08	Di Cristofaro et al. 2013
Indo-European	Iranian	Southwest Asia	Western Iran	Kurds	25	0.08	Malyarchuk et al. 2013

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Indo-European	Iranian	Central Asia	Afghanistan	Tajiks	142	0.08	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	Pakistan	Pashtuns (Pathans)	270	0.07	Lee et al. 2014
Indo-European	Italic	Western Europe	Central Portugal	Portuguese	46	0.07	Carvalho et al. 2008
Isolate		South Asia	Pakistan	Burusho	94	0.17	Qamar et al. 2002
Isolate		South Asia	Pakistan	Burusho	97	0.17	Firasat et al. 2007
Isolate		South Asia	Pakistan	Burusho	20	0.15	Di Cristofaro et al. 2013
Isolate		South Asia	North Pakistan	Burusho	20	0.15	Sengupta et al. 2006
Kartvelian		Southwest Asia	Turkey	Laz	36	0.42	Balanovsky et al. 2017
Niger-Congo	Bantoid	Sub-Saharan Africa	Southern Africa	Lemba	34	0.18	Mendez et al. 2011
Niger-Congo	Bantoid	Sub-Saharan Africa	Tanzania	Wairak	43	0.12	Luis et al. 2004
North Caucasian		Caucasus	Russia	Chechens	165	0.18	Yunusbayev et al. 2012
North Caucasian		Caucasus	Russia	Avars	42	0.14	Yunusbayev et al. 2012
North Caucasian		Caucasus	Daghestan	Chechens	100	0.14	Balanovsky et al. 2011
North Caucasian		Caucasus	Dagestan	Chechens	20	0.10	Caciagli et al. 2009
North Caucasian		Caucasus	Russia	Ingush	105	0.09	Yunusbayev et al. 2012
North Caucasian		Caucasus	Russia	Chechens (Chechnya)	118	0.07	Balanovsky et al. 2011
North Caucasian		Caucasus	Georgia	Abkhaz	162	0.06	Yunusbayev et al. 2012
North Caucasian		Caucasus	Russia	Abkhaz	58	0.05	Balanovsky et al. 2011
Sino-Tibetan	Chinese	Central Asia	Uzbekistan	Dungan	31	0.06	Zhabagin et al. 2017
Sino-Tibetan	Tibeto-Burman	South Asia	Bangladesh	Tripuri	88	0.07	Gazi et al. 2013
Sino-Tibetan	Tibeto-Burman	South Asia	Bangladesh	Marma	60	0.05	Gazi et al. 2013
Turkic		Southwest Asia	Iran	Azerbaijani	63	0.11	Grugni et al. 2012
Turkic		East Asia	Xingjiang, China	Uyghurs	48	0.10	Zhong et al. 2011

Language Family	Branch	Region	Location	Population	Sample Size	Frequency LT-L298	Reference
Turkic		Central Asia	Afghanistan	Uzbeks	127	0.09	Di Cristofaro et al. 2013
Turkic		Southwest Asia	Iran	Turkmen	68	0.07	Grugni et al. 2012
Turkic		Southwest Asia	Turkey	Turks	523	0.07	Cinnioglu et al. 2004
Turkic		Southwest Asia	Turkey	Turks (Western Anatolia)	30	0.07	King et al. 2011
Turkic		Southwest Asia	Turkey	Central Anatolia	90	0.07	King et al. 2011
Turkic		Central Asia	Uzbekistan (Fergana)	Uzbek	67	0.06	Zhabagin et al. 2017
Turkic		Central Asia	Kazakhstan (Zhanakorgan)	Kazakh	94	0.05	Zhabagin et al. 2017
Turkic		Central Asia	Uzbekistan (Xorezm)	Uzbek	98	0.05	Zhabagin et al. 2017

Supplementary Table 11.7. Survey of L1a1-M27 Variation.

	Location	Population	Language Family	Branch	Sample Size	Frequency L-M27	Reference
Central Asia	Afghanistan	Uzbeks	Turkic		127	4.72%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	87	4.60%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Turkmen	Turkic		74	4.05%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	77	3.90%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	142	2.82%	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	56	1.78%	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	190	1.05%	Lacau et al. 2012
South Asia	Southwest India	Vokkaliga	Dravidian		102	28.43%	Chennakrishnaiah et al. 2013
South Asia	South India	Ambalakarar	Dravidian		29	20.69%	Sengupta et al. 2006
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	20.00%	Di Cristofaro et al. 2013
South Asia	South India	Vanniyar	Dravidian		25	20.00%	Sengupta et al. 2006
South Asia	Bombay	Konkani Brahmins	Indo-European	Indo-Aryan	43	18.60%	Kivisild et al. 2003
South Asia	Sri Lanka	Sinhalese	Indo-European	Indo-Aryan	39	17.95%	Kivisild et al. 2003
South Asia	Southwest India	Lingayat	Dravidian		101	17.82%	Chennakrishnaiah et al. 2013
South Asia	South India	Iyer	Dravidian		29	17.24%	Sengupta et al. 2006
South Asia	Andhra Pradesh	Banjara (Lambadi)	Indo-European	Indo-Aryan	35	17.14%	Kivisild et al. 2003
South Asia	South India	Iyengar	Dravidian		30	16.67%	Sengupta et al. 2006
South Asia	South India	Vellalar	Dravidian		31	16.13%	Sengupta et al. 2006
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	15.00%	Sengupta et al. 2006
South Asia	Andhra Pradesh	Chenchu	Dravidian		41	14.63%	Kivisild et al. 2003
South Asia	South India	Pallan	Dravidian		29	13.79%	Sengupta et al. 2006

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M27	Reference
South Asia	Punjab	Punjabi	Indo-European	Indo-Aryan	66	12.12%	Kivisild et al. 2003
South Asia	Bombay	Gujarati	Indo-European	Indo-Aryan	29	10.34%	Kivisild et al. 2003
South Asia	South India	Irula	Dravidian		30	10.00%	Sengupta et al. 2006
South Asia	Uttar-Pradesh	Tharu	Indo-European	Indo-Aryan	164	7.93%	Chaubey et al. 2014
South Asia	Uttarakhand	Tharu	Indo-European	Indo-Aryan	45	6.67%	Chaubey et al. 2014
South Asia	Central India	Kamar	Dravidian		30	6.67%	Sengupta et al. 2006
South Asia	Tamil Nadu	Pallar	Dravidian		51	5.88%	Arunkumar et al. 2012
South Asia	Morang, Nepal	Tharu	Indo-European	Indo-Aryan	37	5.40%	Fornarino et al. 2009
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	96	5.20%	Firasat et al. 2007
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	20	5.00%	Di Cristofaro et al. 2013
South Asia	Gujarat, India	Dhodia	Indo-European	Indo-Aryan	63	4.76%	Khurana et al. 2014
South Asia	Gujarat, India	Dubla	Indo-European	Indo-Aryan	42	4.76%	Khurana et al. 2014
South Asia	Orissa	Oriya Brahmin	Indo-European	Indo-Aryan	24	4.17%	Sahoo et al. 2006
South Asia	Tamil Nadu	Parayar	Dravidian		24	4.17%	Arunkumar et al. 2012
South Asia	Pakistan	Brahui	Dravidian		25	4.00%	Di Cristofaro et al. 2013
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	4.00%	Sengupta et al. 2006
South Asia	Tamil Nadu	Thoda	Dravidian		26	3.85%	Arunkumar et al. 2012
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	57	3.50%	Fornarino et al. 2009
South Asia	Tamil Nadu	Paliyan	Dravidian		95	3.16%	Arunkumar et al. 2012
South Asia	Gujarat, India	Chaudhari	Indo-European	Indo-Aryan	113	2.65%	Khurana et al. 2014
South Asia	Tamil Nadu	Valayar	Dravidian		95	2.11%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Vanniyar NTN	Dravidian		96	2.08%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Tamil Jains	Dravidian		100	2.00%	Arunkumar et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency L-M27	Reference
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	51	1.96%	Debnath et al. 2011
South Asia	Tamil Nadu	Parayar NTN	Dravidian		52	1.92%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Piramalai Kallar	Dravidian		53	1.89%	Arunkumar et al. 2012
South Asia	West Bengal	Bengali	Indo-European	Indo-Aryan	54	1.85%	Debnath et al. 2011
South Asia	Tamil Nadu	Vadama	Indo-European	Indo-Aryan	63	1.59%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Pulayar	Dravidian		63	1.59%	Arunkumar et al. 2012
South Asia	Tamil Nadu	Ezhava	Dravidian		95	1.05%	Arunkumar et al. 2012
Southwest Asia	Lebanon	Lebanese Druze	Afro-Asiatic	Semitic	31	10.00%	Haber et al. 2016
Southwest Asia	Syria	Syrians	Afro-Asiatic	Semitic	518	9.46%	Haber et al. 2011
Southwest Asia	Iran	Baloch	Indo-European	Iranian	24	8.30%	Grugni et al. 2012
Southwest Asia	Lebanon	Lebanese Muslims	Afro-Asiatic	Semitic	43	7.00%	Haber et al. 2016
Southwest Asia	Iran	Iranians	Indo-European	Iranian	324	6.79%	Haber et al. 2011
Southwest Asia	Iran	Persians Fars	Indo-European	Iranian	44	2.30%	Grugni et al. 2012
Southwest Asia	Iran	Persians Yazd	Indo-European	Iranian	46	2.10%	Grugni et al. 2012
Southwest Asia	Iran	Kurds	Indo-European	Iranian	59	1.70%	Grugni et al. 2012
Southwest Asia	Iran	Gilak	Indo-European	Iranian	64	1.60%	Grugni et al. 2012
Southwest Asia	Lebanon	Lebanese	Afro-Asiatic	Semitic	1202	1.58%	Haber et al. 2011
Southwest Asia	Saudi Arabia	Saudis	Afro-Asiatic	Semitic	157	1.27%	Abu-Amero et al. 2009

Supplementary Table 11.8. Survey of L1a2-M357 Variation.

Region	Location	Population	Language Family	Branch	Frequency L-M357	Reference
Caucasus	Russia	Chechens	North Caucasian		0.16	Yunusbayev et al. 2012
Caucasus	Daghestan	Chechens	North Caucasian		0.14	Balanovsky et al. 2011
Caucasus	Russia	Ingush	North Caucasian		0.09	Yunusbayev et al. 2012
Caucasus	Daghestan	Tats	Indo-European	Iranian	0.08	Karafet et al. 2016
Caucasus	Russia	Chechens (Chechnya)	North Caucasian		0.07	Balanovsky et al. 2011
Caucasus	Russia	Ingush	North Caucasian		0.03	Balanovsky et al. 2011
Caucasus	Russia	Chechens (Ingushetia)	North Caucasian		0.01	Balanovsky et al. 2011
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	0.12	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	0.08	Lacau et al. 2012
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	0.05	Haber et al. 2012
Central Asia	Afghanistan	Uzbeks	Turkic		0.04	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Tajiks	Indo-European	Iranian	0.04	Di Cristofaro et al. 2013
Central Asia	Afghanistan	Hazara	Indo-European	Iranian	0.02	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns (Pathans)	Indo-European	Iranian	0.01	Di Cristofaro et al. 2013
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	0.25	Di Cristofaro et al. 2013
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	0.23	Firasat et al. 2007
South Asia	Pakistan	Burusho	Isolate		0.15	Di Cristofaro et al. 2013
South Asia	North Pakistan	Burusho	Isolate		0.15	Sengupta et al. 2006
South Asia	Pakistan	Burusho	Isolate		0.12	Firasat et al. 2007
South Asia	Tamil Nadu	Paravar	Dravidian		0.07	Arunkumar et al. 2012

Region	Location	Population	Language Family	Branch	Frequency L-M357	Reference
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	0.07	Firasat et al. 2007
South Asia	Northern India	Rajput	Indo-European	Indo-Aryan	0.07	Sengupta et al. 2006
South Asia	Pakistan	Pashtuns (Pathans)	Indo-European	Iranian	0.05	Di Cristofaro et al. 2013
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	0.05	Di Cristofaro et al. 2013
South Asia	Tamil Nadu	Parayar	Dravidian		0.04	Arunkumar et al. 2012
South Asia	Pakistan	Brahui	Dravidian		0.04	Di Cristofaro et al. 2013
South Asia	Pakistan	Baloch	Indo-European	Iranian	0.04	Di Cristofaro et al. 2013
South Asia	Southwest India	Vokkaliga	Dravidian		0.04	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu	Thoda	Dravidian		0.04	Arunkumar et al. 2012
South Asia	South India	Pallan	Dravidian		0.03	Sengupta et al. 2006
South Asia	Tamil Nadu	Vadama	Indo-European	Indo-Aryan	0.03	Arunkumar et al. 2012
South Asia	Tamil Nadu	Vanniyar NTN	Dravidian		0.02	Arunkumar et al. 2012
South Asia	Tamil Nadu	Tamil Jains	Dravidian		0.02	Arunkumar et al. 2012
South Asia	Tamil Nadu	Parayar NTN	Dravidian		0.02	Arunkumar et al. 2012
South Asia	Tamil Nadu	Maravar	Dravidian		0.01	Arunkumar et al. 2012
South Asia	Tamil Nadu	Nadar Cape	Dravidian		0.01	Arunkumar et al. 2012
Southwest Asia	Iran	Baloch	Indo-European	Iranian	0.08	Grugni et al. 2012
Southwest Asia	Iran	Turkmen	Turkic		0.06	Grugni et al. 2012
Southwest Asia	Iran	Persians Fars	Indo-European	Iranian	0.05	Grugni et al. 2012
Southwest Asia	Iran	Persians Khorasan	Indo-European	Iranian	0.03	Grugni et al. 2012

Region	Location	Population	Language Family	Branch	Frequency L-M357	Reference
Southwest Asia	Iran	Persians Yazd	Indo-European	Iranian	0.02	Grugni et al. 2012
Southwest Asia	Iran	Gilak	Indo-European	Iranian	0.02	Grugni et al. 2012
Southwest Asia	Iran	Azerbaijani	Turkic		0.02	Grugni et al. 2012

Supplementary Table 11.9. Survey of T1a1-L162 Variation.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T1a1-L162	Reference
Mediterranean	Italy	Italians	Indo-European	Italic	884	0.79%	Boattini et al. 2013
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	2.09%	Francalacci et al. 2015
North Africa	Egypt	Egyptians	Afro-Asiatic	Semitic	150	6.70%	Mendez et al. 2011
Southwest Asia	Middle East	Palestinians	Afro-Asiatic	Semitic	115	1.80%	Mendez et al. 2011
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	187	2.60%	Mendez et al. 2011
Southwest Asia	Syria	Syrians	Afro-Asiatic	Semitic	95	4.30%	Mendez et al. 2011
Southwest Asia	Iraq	Iraqis	Afro-Asiatic	Semitic	36	5.60%	Mendez et al. 2011
Southwest Asia	Middle East	Druze	Afro-Asiatic	Semitic	39	7.70%	Mendez et al. 2011
Southwest Asia	Middle East	Assyrians	Afro-Asiatic	Semitic	31	12.90%	Mendez et al. 2011
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.26%	Larmuseau et al. 2014

Supplementary Table 11.10. Survey of T1a2-L162 Variation.

Region	Location	Population	Language Family	Branch	Sample Size	Frequency T1a2-L131	Reference
Mediterranean	Sardinia	Sardinians	Indo-European	Italic	1194	0.17%	Francalacci et al. 2015
Southwest Asia	Middle East	Palestinians	Afro-Asiatic	Semitic	115	3.50%	Mendez et al. 2011
Southwest Asia	Jordan	Jordanians	Afro-Asiatic	Semitic	187	0.50%	Mendez et al. 2011
Sub-Saharan Africa	Southern Africa	Lemba	Niger-Congo	Bantoid	34	17.60%	Mendez et al. 2011
Western Europe	Flanders	Flemish	Indo-European	Germanic	773	0.39%	Larmuseau et al. 2014

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Supplementary Tables for Chapter 12 and Paragroup KR-M526*

Supplementary Table 12.1. Survey of KR-M526* among Australian- and Papuan-Speaking Populations.

Region	Location	Population	Language Family	Sample Size	Frequency KR-M526*	Reference
Australia	Queensland	Aboriginal Australians	Australian	129	15.50%	Nagle et al. 2016
Australia	South Australia	Aboriginal Australians	Australian	265	14.34%	Nagle et al. 2016
Australia	Victoria	Aboriginal Australians	Australian	186	8.60%	Nagle et al. 2016
Australia	Northern Territory	Aboriginal Australians	Australian	77	6.49%	Nagle et al. 2016
Island Southeast Asia	Northwest New Guinea	Moskona	East Bird's Head-Sentani	10	50.00%	Mona et al. 2007
Island Southeast Asia	Northwest New Guinea	Mantion	East Bird's Head-Sentani	11	18.18%	Mona et al. 2007
Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	East New Britain	39	5.13%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Mali (Baining)	East New Britain	24	4.17%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Sulka	Isolate	33	51.52%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Kuot	Isolate	32	15.63%	Scheinfeldt et al. 2006
Island Southeast Asia	Northwest New Guinea	Hatam	Isolate	12	8.33%	Mona et al. 2007
Island Southeast Asia	Northwest New Guinea	Karon Dori	Maybrat	22	36.36%	Mona et al. 2007
Island Southeast Asia	Northwest New Guinea	Maibrat	Maybrat	24	25.00%	Mona et al. 2007
Island Southeast Asia	Bougainville	Aita	North Bougainville	18	16.67%	Scheinfeldt et al. 2006

Region	Location	Population	Language Family	Sample Size	Frequency KR-M526*	Reference
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea	23	34.78%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea	28	32.14%	Karafet et al. 2010
Island Southeast Asia	Northwest New Guinea	Baham	Trans-New Guinea	24	12.50%	Mona et al. 2007
Island Southeast Asia	Papua New Guinea	Highlands	Trans-New Guinea	31	6.45%	Kayser et al. 2006
Island Southeast Asia	Western New Guinea	Asmat	Trans-New Guinea	20	5.00%	Kayser et al. 2003
Island Southeast Asia	Western New Guinea	Citak	Trans-New Guinea	28	3.60%	Kayser et al. 2003
Island Southeast Asia	Papua New Guinea	Rossel Islanders	Yele-West New Britain	80	33.80%	Oven et al. 2014
Island Southeast Asia	PNG, West New Britain	Ata	Yele-West New Britain	45	28.89%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Anem	Yele-West New Britain	34	14.71%	Scheinfeldt et al. 2006
Oceania	Solomon Islands	Western Province	Central Solomons	32	59.40%	Cox and Lahr 2006
Oceania	Solomon Islands	Savo	Central Solomons	30	13.30%	Delfin et al. 2012
Oceania	Solomon Islands	Russell Islanders	Central Solomons	32	9.40%	Delfin et al. 2012
Oceania	Solomon Islands	Vella Lavella	Central Solomons	44	6.80%	Delfin et al. 2012

Supplementary Table 12.2. Papuan Languages of Indonesia, Papua New Guinea, East Timor, and the Solomon Islands. Source: Ethnologue 2018.

Language Family	Languages	Speakers	Countries
Trans-New Guinea	478	3,500,000	Papua New Guinea, Indonesia, and East Timor
West Papuan	23	269,000	Indonesia
Torricelli	57	114,000	Papua New Guinea
East Bird's Head-Sentani	8	72,000	Indonesia
South Bougainville	9	69,000	Papua New Guinea
Ramu-Lower Sepik	32	66,000	Papua New Guinea
Language Isolates	9	33,300	Papua New Guinea and Indonesia
Maybrat	2	25,000	Indonesia
Border	15	17,000	Papua New Guinea and Indonesia
Sepik	55	16,300	Papua New Guinea
South-Central Papuan	22	16,000	Papua New Guinea and Indonesia
Tor-Kwerba	24	16,000	Indonesia
Central Solomons	4	14,800	Solomon Islands
East New Britain	6	14,000	Papua New Guinea
North Bougainville	4	10,000	Papua New Guinea
Lakes Plain	19	9,700	Indonesia
Nimboran	5	8,500	Indonesia
East Geelvink Bay	12	8,000	Indonesia
Yuat	6	7,700	Papua New Guinea
Eastern Trans-Fly	4	6,800	Papua New Guinea
Yele-West New Britain	3	6,600	Papua New Guinea
Skou	8	5,900	Papua New Guinea and Indonesia
Unclassified Languages	11	5,600	Papua New Guinea and Indonesia
Mairasi	3	4,400	Indonesia
Pauwasi	5	3,700	Papua New Guinea and Indonesia
Kwomtari	3	3,000	Papua New Guinea
Senagi	2	3,000	Papua New Guinea and Indonesia
Senagi	2	3,000	Papua New Guinea and Indonesia
Fas	2	2,800	Papua New Guinea
Piawi	2	2,600	Papua New Guinea
Somahai	2	2,200	Indonesia
Arai (Left May)	6	2,000	Papua New Guinea
Arafundi	3	2,000	Papua New Guinea
Mongol-Langam	3	2,000	Papua New Guinea

Language Family	Languages	Speakers	Countries
Kaure	3	900	Indonesia
Lower Mameramo	2	800	Indonesia
Amto-Musan	2	500	Papua New Guinea
Bayono-Awbono	2	200	Indonesia

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Languages

Bibliography for Chapter 12 and Supplementary Tables

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**Supplementary Tables for Chapter 13 and Haplogroups M-P256
and S-B254**

Supplementary Table 13.1. Survey of M-P256 Populations (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Australia	Queensland	Aboriginal Australians	Australian		129	2.33%	Nagle et al. 2016
Australia	Northern Territory	Aboriginal Australians	Australian		77	1.30%	Nagle et al. 2016
Australia	South Australia	Aboriginal Australians	Australian		265	0.75%	Nagle et al. 2016
Island Southeast Asia	Papua New Guinea	Wanigela	Austronesian	Malayo-Polynesian	21	90.50%	Oven et al. 2014
Island Southeast Asia	PNG, New Hanover	Lavongai	Austronesian	Malayo-Polynesian	43	81.40%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Bereina	Austronesian	Malayo-Polynesian	35	71.42%	Kayser et al. 2006
Island Southeast Asia	Northwest New Guinea	Biak	Austronesian	Malayo-Polynesian	10	70.00%	Mona et al. 2007
Island Southeast Asia	PNG, New Ireland	Tigak	Austronesian	Malayo-Polynesian	21	52.38%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Madak	Austronesian	Malayo-Polynesian	19	47.37%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Notsi	Austronesian	Malayo-Polynesian	14	42.86%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Kove	Austronesian	Malayo-Polynesian	24	41.67%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Nalik	Austronesian	Malayo-Polynesian	17	41.18%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Airara	Austronesian	Malayo-Polynesian	32	40.60%	Oven et al. 2014
Island Southeast Asia	Northwest New Guinea	Wandamen	Austronesian	Malayo-Polynesian	10	40.00%	Mona et al. 2007

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Island Southeast Asia	PNG, West New Britain	Melamela	Austronesian	Malayo-Polynesian	14	35.71%	Scheinfeldt et al. 2006
Island Southeast Asia	Bougainville	Teop	Austronesian	Malayo-Polynesian	18	33.33%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Nakanai	Austronesian	Malayo-Polynesian	36	30.56%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Trobriand Islands	Austronesian	Malayo-Polynesian	53	30.19%	Kayser et al. 2006
Island Southeast Asia	Papua New Guinea	Trobriand Islands	Austronesian	Malayo-Polynesian	60	28.40%	Oven et al. 2014
Island Southeast Asia	PNG, West New Britain	Mamusi	Austronesian	Malayo-Polynesian	43	27.91%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Mengen	Austronesian	Malayo-Polynesian	23	26.09%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Mainland (eastern tip)	Austronesian	Malayo-Polynesian	24	25.00%	Oven et al. 2014
Island Southeast Asia	Papua New Guinea	Normanby	Austronesian	Malayo-Polynesian	27	22.20%	Oven et al. 2014
Island Southeast Asia	Eastern Indonesia	Flores	Austronesian	Malayo-Polynesian	394	20.81%	Karafet et al. 2010
Island Southeast Asia	PNG, East New Britain	Tolai	Austronesian	Malayo-Polynesian	49	20.41%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Fergusson	Austronesian	Malayo-Polynesian	35	20.00%	Oven et al. 2014
Island Southeast Asia	West Timor, Indonesia	Kletek Rainen	Austronesian	Malayo-Polynesian	17	17.60%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Umaklaran	Austronesian	Malayo-Polynesian	41	17.10%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Maluccas	Austronesian	Malayo-Polynesian	30	16.67%	Karafet et al. 2010

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Island Southeast Asia	West Timor, Indonesia	Kletek Suai	Austronesian	Malayo-Polynesian	15	13.30%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Kamanasa	Austronesian	Malayo-Polynesian	62	12.90%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Lembata	Austronesian	Malayo-Polynesian	92	11.96%	Karafet et al. 2010
Island Southeast Asia	Bougainville	Saposa	Austronesian	Malayo-Polynesian	26	11.54%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor, Indonesia	Besikama	Austronesian	Malayo-Polynesian	42	9.50%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Solor	Austronesian	Malayo-Polynesian	43	9.40%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Eastern Indonesia	East Timor	Austronesian	Malayo-Polynesian	33	9.02%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	West Timor, Indonesia	Kletek Wefatuk	Austronesian	Malayo-Polynesian	15	6.70%	Tumonggor et al. 2014
Island Southeast Asia	Indonesia	Timor	Austronesian	Malayo-Polynesian	509	6.10%	Karafet et al. 2015
Island Southeast Asia	West Timor, Indonesia	Umanen Lawalu	Austronesian	Malayo-Polynesian	49	6.10%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Sumba	Austronesian	Malayo-Polynesian	350	4.86%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	Sulawesi	Austronesian	Malayo-Polynesian	54	3.70%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	Flores	Austronesian	Malayo-Polynesian	71	2.82%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Papua New Guinea	Sudest	Austronesian	Malayo-Polynesian	38	2.60%	Oven et al. 2014
Island Southeast Asia	Eastern Indonesia	Adonara	Austronesian	Malayo-Polynesian	96	2.08%	Mona et al. 2009, Mona et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Island Southeast Asia	West Timor, Indonesia	Kateri	Austronesian	Malayo-Polynesian	50	2.00%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Raimanawe	Austronesian	Malayo-Polynesian	50	2.00%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Laran	Austronesian	Malayo-Polynesian	50	2.00%	Tumonggor et al. 2014
Island Southeast Asia	Western Indonesia	Bali	Austronesian	Malayo-Polynesian	641	0.60%	Karafet et al. 2015
Island Southeast Asia	Vanuatu	Vanuatu	Creole		44	38.60%	Karafet et al. 2015
Island Southeast Asia	Northwest New Guinea	Mantion	East Bird's Head-Sentani		11	54.55%	Mona et al. 2007
Island Southeast Asia	PNG, East New Britain	Mali (Baining)	East New Britain		24	91.66%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	East New Britain		39	51.29%	Scheinfeldt et al. 2006
Island Southeast Asia	Northwest New Guinea	Hatam	Isolate		12	75.00%	Mona et al. 2007
Island Southeast Asia	PNG, New Ireland	Kuot	Isolate		32	53.13%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Sulka	Isolate		33	21.21%	Scheinfeldt et al. 2006
Island Southeast Asia	Northwest New Guinea	Karon Dori	Maybrat		22	27.27%	Mona et al. 2007
Island Southeast Asia	Northwest New Guinea	Maibrat	Maybrat		24	8.33%	Mona et al. 2007
Island Southeast Asia	Bougainville	Aita	North Bougainville		18	83.33%	Scheinfeldt et al. 2006
Island Southeast Asia	Western New Guinea	Una	Trans-New Guinea		46	100.00%	Kayser et al. 2003

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Island Southeast Asia	Western New Guinea	Ketengban	Trans-New Guinea		19	100.00%	Kayser et al. 2003
Island Southeast Asia	Western New Guinea	Citak	Trans-New Guinea		28	85.70%	Kayser et al. 2003
Island Southeast Asia	Western New Guinea	Asmat	Trans-New Guinea		20	75.00%	Kayser et al. 2003
Island Southeast Asia	Papua New Guinea	Kapuna	Trans-New Guinea		46	45.65%	Kayser et al. 2006
Island Southeast Asia	Papua New Guinea	Highlands	Trans-New Guinea		31	35.49%	Kayser et al. 2006
Island Southeast Asia	Northwest New Guinea	Ekari	Trans-New Guinea		19	21.05%	Mona et al. 2007
Island Southeast Asia	Indonesia	Pantar	Trans-New Guinea		26	19.20%	Karafet et al. 2015
Island Southeast Asia	Northwest New Guinea	Baham	Trans-New Guinea		24	16.67%	Mona et al. 2007
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea		28	14.29%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea		23	13.04%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Eastern Indonesia	Pantar	Trans-New Guinea		28	10.71%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	PNG, West New Britain	Anem	Yele-West New Britain		34	52.94%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Ata	Yele-West New Britain		45	40.00%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Rossel Islanders	Yele-West New Britain		80	6.30%	Oven et al. 2014
Oceania	Solomon Islands	Choiseul	Austronesian	Malayo-Polynesian	36	91.80%	Delfin et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Frequency M-P256	Reference
Oceania	Solomon Islands	Ranongga	Austronesian	Malayo-Polynesian	44	84.10%	Delfin et al. 2012
Oceania	Solomon Islands	Simbo	Austronesian	Malayo-Polynesian	20	80.00%	Delfin et al. 2012
Oceania	Solomon Islands	Guadalcanal	Austronesian	Malayo-Polynesian	53	52.80%	Delfin et al. 2012
Oceania	Solomon Islands	Santa Cruz	Austronesian	Malayo-Polynesian	36	49.90%	Delfin et al. 2012
Oceania	Solomon Islands	Malaita	Austronesian	Malayo-Polynesian	98	45.80%	Delfin et al. 2012
Oceania	Solomon Islands	Isabel	Austronesian	Malayo-Polynesian	53	35.90%	Delfin et al. 2012
Oceania	Fiji	Fijians	Austronesian	Malayo-Polynesian	107	35.52%	Kayser et al. 2006
Oceania	Solomon Islands	Makira	Austronesian	Malayo-Polynesian	39	28.30%	Delfin et al. 2012
Oceania	Solomon Islands	Gela	Austronesian	Malayo-Polynesian	47	19.20%	Delfin et al. 2012
Oceania	Tonga	Tongans	Austronesian	Malayo-Polynesian	29	17.24%	Kayser et al. 2006
Oceania	East Futuna	East Futunans	Austronesian	Malayo-Polynesian	50	12.00%	Kayser et al. 2006
Oceania	Samoa	Samoans	Austronesian	Malayo-Polynesian	62	3.22%	Kayser et al. 2006
Oceania	Solomon Islands	Ontong Java	Austronesian	Malayo-Polynesian	32	3.10%	Delfin et al. 2012
Oceania	Solomon Islands	Savo	Central Solomons		30	76.70%	Delfin et al. 2012
Oceania	Solomon Islands	Vella Lavella	Central Solomons		44	70.40%	Delfin et al. 2012
Oceania	Solomon Islands	Russell Islanders	Central Solomons		32	59.40%	Delfin et al. 2012
Oceania	Solomon Islands	Western Province	Central Solomons		32	9.40%	Cox and Lahr 2006

Supplementary Table 13.2. Survey of S-B254 Populations (Regional View).

Region	Location	Population	Lang Family	Branch	Sample Size	Frequency S-B254	Reference
Australia	South Australia	Aboriginal Australians	Australian		265	21.51%	Nagle et al. 2016
Australia	Northern Territory	Aboriginal Australians	Australian		77	19.48%	Nagle et al. 2016
Australia	Queensland	Aboriginal Australians	Australian		129	3.10%	Nagle et al. 2016
Australia	Victoria	Aboriginal Australians	Australian		186	2.15%	Nagle et al. 2016
Island Southeast Asia	Philippines	Aeta	Austronesian	Malayo-Polynesian	25	60.00%	Karafet et al. 2015
Island Southeast Asia	West Timor, Indonesia	Kletek Suai	Austronesian	Malayo-Polynesian	15	40.00%	Tumonggor et al. 2014
Island Southeast Asia	PNG, West New Britain	Mamusi	Austronesian	Malayo-Polynesian	43	39.53%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Mengen	Austronesian	Malayo-Polynesian	23	39.13%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Tolai	Austronesian	Malayo-Polynesian	49	36.74%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Melamela	Austronesian	Malayo-Polynesian	14	35.71%	Scheinfeldt et al. 2006
Island Southeast Asia	Eastern Indonesia	Lembata	Austronesian	Malayo-Polynesian	92	33.69%	Karafet et al. 2010
Island Southeast Asia	PNG, New Ireland	Notsi	Austronesian	Malayo-Polynesian	14	28.57%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Madak	Austronesian	Malayo-Polynesian	19	26.31%	Scheinfeldt et al. 2006
Island Southeast Asia	Eastern Indonesia	Lembata	Austronesian	Malayo-Polynesian	31	25.80%	Mona et al. 2009, Mona et al. 2011

Region	Location	Population	Lang Family	Branch	Sample Size	Frequency S-B254	Reference
Island Southeast Asia	PNG, West New Britain	Nakanai	Austronesian	Malayo-Polynesian	36	25.00%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor, Indonesia	Kletek Rainen	Austronesian	Malayo-Polynesian	17	23.60%	Tumonggor et al. 2014
Island Southeast Asia	Papua New Guinea	Airara	Austronesian	Malayo-Polynesian	32	21.90%	Oven et al. 2014
Island Southeast Asia	West Timor, Indonesia	Besikama	Austronesian	Malayo-Polynesian	42	21.50%	Tumonggor et al. 2014
Island Southeast Asia	Northwest New Guinea	Biak	Austronesian	Malayo-Polynesian	10	20.00%	Mona et al. 2007
Island Southeast Asia	Eastern Indonesia	Sumba	Austronesian	Malayo-Polynesian	350	17.72%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	Maluccas	Austronesian	Malayo-Polynesian	30	16.67%	Karafet et al. 2010
Island Southeast Asia	Papua New Guinea	Sudest	Austronesian	Malayo-Polynesian	38	15.80%	Oven et al. 2014
Island Southeast Asia	PNG, New Ireland	Tigak	Austronesian	Malayo-Polynesian	21	14.29%	Scheinfeldt et al. 2006
Island Southeast Asia	Eastern Indonesia	Flores	Austronesian	Malayo-Polynesian	71	12.68%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	West Timor, Indonesia	Umanen Lawalu	Austronesian	Malayo-Polynesian	49	10.20%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Umaklaran	Austronesian	Malayo-Polynesian	41	9.70%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Solor	Austronesian	Malayo-Polynesian	43	9.30%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Eastern Indonesia	East Timor	Austronesian	Malayo-Polynesian	33	9.09%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Indonesia	Timor	Austronesian	Malayo-Polynesian	509	8.70%	Karafet et al. 2015

Region	Location	Population	Lang Family	Branch	Sample Size	Frequency S-B254	Reference
Island Southeast Asia	Papua New Guinea	Mainland (eastern tip)	Austronesian	Malayo-Polynesian	24	8.40%	Oven et al. 2014
Island Southeast Asia	Eastern Indonesia	Flores	Austronesian	Malayo-Polynesian	394	8.12%	Karafet et al. 2010
Island Southeast Asia	West Timor, Indonesia	Raimanawe	Austronesian	Malayo-Polynesian	50	8.00%	Tumonggor et al. 2014
Island Southeast Asia	Bougainville	Saposa	Austronesian	Malayo-Polynesian	26	7.69%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor, Indonesia	Kletek Wefatuk	Austronesian	Malayo-Polynesian	15	6.70%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Kamanasa	Austronesian	Malayo-Polynesian	62	6.40%	Tumonggor et al. 2014
Island Southeast Asia	West Timor, Indonesia	Kakaniuk	Austronesian	Malayo-Polynesian	47	6.40%	Tumonggor et al. 2014
Island Southeast Asia	PNG, New Ireland	Nalik	Austronesian	Malayo-Polynesian	17	5.88%	Scheinfeldt et al. 2006
Island Southeast Asia	Western Indonesia	Borneo	Austronesian	Malayo-Polynesian	86	5.80%	Karafet et al. 2015
Island Southeast Asia	Eastern Indonesia	Sulawesi	Austronesian	Malayo-Polynesian	54	5.56%	Karafet et al. 2010
Island Southeast Asia	Bougainville	Teop	Austronesian	Malayo-Polynesian	18	5.56%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor, Indonesia	Laran	Austronesian	Malayo-Polynesian	50	4.00%	Tumonggor et al. 2014
Island Southeast Asia	Papua New Guinea	Fergusson	Austronesian	Malayo-Polynesian	35	2.90%	Oven et al. 2014
Island Southeast Asia	PNG, New Hanover	Lavongai	Austronesian	Malayo-Polynesian	43	2.33%	Scheinfeldt et al. 2006
Island Southeast Asia	Eastern Indonesia	Adonara	Austronesian	Malayo-Polynesian	96	2.08%	Mona et al. 2009, Mona et al. 2011

Region	Location	Population	Lang Family	Branch	Sample Size	Frequency S-B254	Reference
Island Southeast Asia	Western Indonesia	Bali	Austronesian	Malayo-Polynesian	641	0.30%	Karafet et al. 2015
Island Southeast Asia	Vanuatu	Vanuatu	Creole		44	22.70%	Karafet et al. 2015
Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	East New Britain		39	43.59%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Mali (Baining)	East New Britain		24	4.17%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, New Ireland	Kuot	Isolate		32	21.88%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Sulka	Isolate		33	18.19%	Scheinfeldt et al. 2006
Island Southeast Asia	Northwest New Guinea	Ekari	Trans-New Guinea		19	73.68%	Mona et al. 2007
Island Southeast Asia	Papua New Guinea	Kapuna	Trans-New Guinea		46	54.34%	Kayser et al. 2006
Island Southeast Asia	Papua New Guinea	Highlands	Trans-New Guinea		31	51.63%	Kayser et al. 2006
Island Southeast Asia	Eastern Indonesia	Pantar	Trans-New Guinea		28	17.86%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Indonesia	Pantar	Trans-New Guinea		26	15.40%	Karafet et al. 2015
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea		28	7.14%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	Alor	Trans-New Guinea		23	4.35%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	West Timor, Indonesia	Tialai	Trans-New Guinea		24	4.20%	Tumonggor et al. 2014
Island Southeast Asia	Western New Guinea	Citak	Trans-New Guinea		28	3.60%	Kayser et al. 2003

Region	Location	Population	Lang Family	Branch	Sample Size	Frequency S-B254	Reference
Island Southeast Asia	PNG, West New Britain	Ata	Yele-West New Britain		45	31.11%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Rossel Islanders	Yele-West New Britain		80	30.00%	Oven et al. 2014
Island Southeast Asia	PNG, West New Britain	Anem	Yele-West New Britain		34	14.70%	Scheinfeldt et al. 2006
Oceania	Solomon Islands	Makira	Austronesian	Malayo-Polynesian	39	38.50%	Delfin et al. 2012
Oceania	Samoa Archipelago	Tutuila	Austronesian	Malayo-Polynesian	24	25.00%	Mirabal et al. 2012
Oceania	Tonga	Tongans	Austronesian	Malayo-Polynesian	52	23.40%	Mirabal et al. 2012
Oceania	Samoa Archipelago	West Samoa	Austronesian	Malayo-Polynesian	61	13.10%	Mirabal et al. 2012
Oceania	Solomon Islands	Santa Cruz	Austronesian	Malayo-Polynesian	36	11.10%	Delfin et al. 2012
Oceania	Leeward Society Islands	Bora Bora, Rai'atea, and Taha'a	Austronesian	Malayo-Polynesian	72	10.00%	Hudjashov et al. 2018
Oceania	Solomon Islands	Guadalcanal	Austronesian	Malayo-Polynesian	53	9.40%	Delfin et al. 2012
Oceania	Solomon Islands	Malaita	Austronesian	Malayo-Polynesian	98	7.20%	Delfin et al. 2012
Oceania	Solomon Islands	Ontong Java	Austronesian	Malayo-Polynesian	32	6.30%	Delfin et al. 2012
Oceania	Solomon Islands	Simbo	Austronesian	Malayo-Polynesian	20	5.00%	Delfin et al. 2012
Oceania	Samoa Archipelago	Manua	Austronesian	Malayo-Polynesian	21	4.80%	Mirabal et al. 2012
Oceania	Solomon Islands	Ranongga	Austronesian	Malayo-Polynesian	44	4.50%	Delfin et al. 2012
Oceania	Solomon Islands	Isabel	Austronesian	Malayo-Polynesian	53	3.80%	Delfin et al. 2012
Oceania	New Zealand	Maori	Austronesian		48	2.00%	Hudjashov et al. 2018
Oceania	Samoa	Samoans	Austronesian	Malayo-Polynesian	62	1.61%	Kayser et al. 2006
Oceania	Solomon Islands	Western Province	Central Solomons		32	3.10%	Cox and Lahr 2006

Supplementary Table 13.3. Papuan and S1a1b1-M254.

Language Family	Region	Location	Population	Sample Size	Frequency S-M254	Reference
Trans-New Guinea	Island Southeast Asia	Northwest New Guinea	Ekari	19	73.68%	Mona et al. 2007
Trans-New Guinea	Island Southeast Asia	Papua New Guinea	Kapuna	46	52.17%	Kayser et al. 2006
Trans-New Guinea	Island Southeast Asia	Papua New Guinea	Highlands	31	51.63%	Kayser et al. 2006
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Pantar	28	17.86%	Mona et al. 2009, Mona et al. 2011
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Alor	28	7.14%	Karafet et al. 2010
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Alor	23	4.35%	Mona et al. 2009, Mona et al. 2011
Trans-New Guinea	Island Southeast Asia	West Timor, Indonesia	Tialai	24	4.20%	Tumonggor et al. 2014
Yele-West New Britain	Island Southeast Asia	Papua New Guinea	Rossel Islanders	80	30.00%	Oven et al. 2014

Supplementary Table 13.4. Papuan and M1a1-P34.

Language Family	Region	Location	Population	Sample Size	Frequency M-P34	Reference
East Bird's Head-Sentani	Island Southeast Asia	Northwest New Guinea	Mantion	11	54.55%	Mona et al. 2007
Isolate	Island Southeast Asia	Northwest New Guinea	Hatam	12	75.00%	Mona et al. 2007
Maybrat	Island Southeast Asia	Northwest New Guinea	Karon Dori	22	27.27%	Mona et al. 2007
Maybrat	Island Southeast Asia	Northwest New Guinea	Maibrat	24	8.33%	Mona et al. 2007
Trans-New Guinea	Island Southeast Asia	Papua New Guinea	Kapuna	46	45.65%	Kayser et al. 2006
Trans-New Guinea	Island Southeast Asia	Papua New Guinea	Highlands	31	32.26%	Kayser et al. 2006
Trans-New Guinea	Island Southeast Asia	Northwest New Guinea	Ekari	19	21.05%	Mona et al. 2007
Trans-New Guinea	Island Southeast Asia	Northwest New Guinea	Baham	24	16.67%	Mona et al. 2007
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Alor	28	14.29%	Karafet et al. 2010
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Alor	23	13.04%	Mona et al. 2009, Mona et al. 2011
Trans-New Guinea	Island Southeast Asia	Eastern Indonesia	Pantar	28	10.71%	Mona et al. 2009, Mona et al. 2011
Yele-West New Britain	Island Southeast Asia	Papua New Guinea	Rossel Islanders	80	6.30%	Oven et al. 2014

Supplementary Table 13.5. Papuan and S1a2-P79.

Language Family	Region	Location	Population	Sample Size	Frequency S-P79	Reference
East New Britain	Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	39	41.03%	Scheinfeldt et al. 2006
East New Britain	Island Southeast Asia	PNG, East New Britain	Mali (Baining)	24	4.17%	Scheinfeldt et al. 2006
Isolate	Island Southeast Asia	PNG, New Ireland	Kuot	32	18.75%	Scheinfeldt et al. 2006
Isolate	Island Southeast Asia	PNG, East New Britain	Sulka	33	18.19%	Scheinfeldt et al. 2006
Yele-West New Britain	Island Southeast Asia	PNG, West New Britain	Ata	45	26.67%	Scheinfeldt et al. 2006
Yele-West New Britain	Island Southeast Asia	PNG, West New Britain	Anem	34	5.88%	Scheinfeldt et al. 2006

Supplementary Table 13.6. Papuan and M1a2a-P87.

Language Family	Region	Location	Population	Sample Size	Frequency M-P87	Reference
Central Solomons	Oceania	Solomon Islands	Vella Lavella	44	0.159	Delfin et al. 2012
Central Solomons	Oceania	Solomon Islands	Savo	30	0.067	Delfin et al. 2012
East New Britain	Island Southeast Asia	PNG, East New Britain	Mali (Baining)	24	0.5833	Scheinfeldt et al. 2006
East New Britain	Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	39	0.2821	Scheinfeldt et al. 2006
Isolate	Island Southeast Asia	PNG, New Ireland	Kuot	32	0.5313	Scheinfeldt et al. 2006
Isolate	Island Southeast Asia	PNG, East New Britain	Sulka	33	0.0909	Scheinfeldt et al. 2006
North Bougainville	Island Southeast Asia	Bougainville	Aita	18	0.8333	Scheinfeldt et al. 2006
Yele-West New Britain	Island Southeast Asia	PNG, West New Britain	Ata	45	0.3556	Scheinfeldt et al. 2006
Yele-West New Britain	Island Southeast Asia	PNG, West New Britain	Anem	34	0.0588	Scheinfeldt et al. 2006

Supplementary Table 13.7. Papuan and M2-M353.

Population	Language Family	Region	Location	Sample Size	Frequency M2-M353	Reference
Russell Islanders	Central Solomons	Oceania	Solomon Islands	32	40.60%	Delfin et al. 2012
Savo	Central Solomons	Oceania	Solomon Islands	30	43.30%	Delfin et al. 2012
Vella Lavella	Central Solomons	Oceania	Solomon Islands	44	43.20%	Delfin et al. 2012

Supplementary Table 13.8. Papuan and M3-P117.

Language Family	Region	Location	Population	Sample Size	Frequency M-P117	Reference
Central Solomons	Oceania	Solomon Islands	Savo	30	26.70%	Delfin et al. 2012
Central Solomons	Oceania	Solomon Islands	Russell Islanders	32	18.80%	Delfin et al. 2012
Central Solomons	Oceania	Solomon Islands	Vella Lavella	44	4.50%	Delfin et al. 2012
East New Britain	Island Southeast Asia	PNG, East New Britain	Mali (Baining)	24	33.33%	Scheinfeldt et al. 2006
East New Britain	Island Southeast Asia	PNG, East New Britain	Kaket (Baining)	39	23.08%	Scheinfeldt et al. 2006
Isolate	Island Southeast Asia	PNG, East New Britain	Sulka	33	12.12%	Scheinfeldt et al. 2006
Yele-West New Britain	Island Southeast Asia	PNG, West New Britain	Anem	34	47.06%	Scheinfeldt et al. 2006

Supplementary Table 13.9. Frequency Data for S1a1a1-P308.

Language Family	Region	Location	Population	Sample Size	Frequency S-P308	Reference
Australian	Australia	South Australia	Aboriginal Australians	265	21.51%	Nagle et al. 2016
Australian	Australia	Northern Territory	Aboriginal Australians	77	19.48%	Nagle et al. 2016
Australian	Australia	Queensland	Aboriginal Australians	129	3.10%	Nagle et al. 2016
Australian	Australia	Victoria	Aboriginal Australians	186	2.15%	Nagle et al. 2016

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Supplementary Tables for Chapter 14 and Haplogroup N-M231

Supplementary Table 14.1. Survey of Paleolithic Y-DNA Samples.

Reference Sample No.	Description of Remains	Y-SNP	Death	Earth Sciences Period	Geological Period	Technological Period	Reference
1	Ust'-Ishim Man	NO-M214	45 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2014; Ilumae et al. 2016.
2	Oase1. Peștera cu Oase cave in Romania	NO-M214	37-42 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Trinkaus et al. 2003; Fu et al. 2014; Fu et al. 2015; Poznik et al. 2016.
3	Kostenki14. Found at Markina Gora, Voronezh Oblast, Southwest Russia	C1b-F1370	36-39 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
4	GoyetQ116-1. Found at Troisième Caverne in Belgium.	C1a-CTS11043	34-35 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.
5	Vestonice16. Found in the Pavlovské Hills in the Czech Republic	C1a2-V20	29-30 thousand years ago.	Marine Isotope Stage Three.	Pleistocene	Paleolithic	Fu et al. 2016.

Supplementary Table 14.2. Survey of Populations with the N1b-F2930 Mutation.

Region	Location	Population	Family	Sub Fam 1	Sub Fam 2	Sample Size	N1b-F2930 Freq	References
East Asia	Heilongjiang Province	Han	Sino-Tibetan	Chinese		34	11.76%	Hu et al. 2015
East Asia	Northwest China	Han	Sino-Tibetan	Chinese		44	6.82%	Hu et al. 2015
East Asia	Guangxi Autonomous Region	Han	Sino-Tibetan	Chinese		19	5.26%	Hu et al. 2015
East Asia	Sichuan Province, China	Han	Sino-Tibetan	Chinese		121	4.96%	Hu et al. 2015
East Asia	Eastern China	Han	Sino-Tibetan	Chinese		499	3.81%	Hu et al. 2015
East Asia	Gansu Province, China	Han	Sino-Tibetan	Chinese		1126	3.73%	Hu et al. 2015
East Asia	Shandong Province, China	Han	Sino-Tibetan	Chinese		874	3.55%	Hu et al. 2015
East Asia	South China	Han	Sino-Tibetan	Chinese		173	3.47%	Hu et al. 2015
East Asia	Southwestern China	Han	Sino-Tibetan	Chinese		34	2.94%	Hu et al. 2015
East Asia	North-Central China	Hui	Sino-Tibetan	Chinese		286	2.80%	Hu et al. 2015
East Asia	Northern China	Han	Sino-Tibetan	Chinese		219	1.83%	Hu et al. 2015
East Asia	Northeastern China	Han	Sino-Tibetan	Chinese		84	1.19%	Hu et al. 2015
East Asia	South-Central China	Muya	Sino-Tibetan	Tibeto-Burman	Ngwi-Burmese	140	4.29%	Hu et al. 2015
East Asia	Central China	Qiang	Sino-Tibetan	Tibeto-Burman	Northeastern Tibeto-Burman	149	3.36%	Hu et al. 2015
East Asia	Eastern China	Tujia	Sino-Tibetan	Tibeto-Burman	Northeastern Tibeto-Burman	42	2.38%	Hu et al. 2015
East Asia	Southern China	Queyu	Sino-Tibetan	Tibeto-Burman	Northeastern Tibeto-Burman	135	2.22%	Hu et al. 2015
East Asia	Central China	Jiarong	Sino-Tibetan	Tibeto-Burman	Northeastern Tibeto-Burman	94	2.13%	Hu et al. 2015
East Asia	South-Central China	Lhoba	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	109	28.44%	Hu et al. 2015

Region	Location	Population	Family	Sub Fam 1	Sub Fam 2	Sample Size	N1b-F2930 Freq	References
East Asia	Southwestern China	Monpa	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	15	6.67%	Hu et al. 2015
East Asia	Ü-Tsang Province, Tibet	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	788	5.96%	Hu et al. 2015
East Asia	Tingri County, Tibet	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	113	5.31%	Hu et al. 2015
East Asia	Kham Region, Tibet	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	429	4.66%	Hu et al. 2015
East Asia	Gong Bu, Tibet	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	104	2.88%	Hu et al. 2015
East Asia	Ambo Region, Tibet	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	506	2.77%	Hu et al. 2015
East Asia	Gansu Province, China	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	264	2.65%	Hu et al. 2015
East Asia	Xining, Western China	Tibetans	Sino-Tibetan	Tibeto-Burman	Western Tibeto-Burman	122	1.64%	Hu et al. 2015
East Asia	Southeastern China	Zhuang	Tai-Kadai	Kam-Tai		29	10.34%	Hu et al. 2015

Supplementary Table 14.3. Survey of Populations with the N1a-F1206 Mutation.

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Baltic	Karelia Republic, Russia	Karelians	Uralic	Finnic	132	53.03%	Lappalainen et al. 2008
Baltic	Lithuania	Lithuanians	Indo-European	Baltic	164	43.90%	Lappalainen et al. 2008
Baltic	Latvia	Latvians	Indo-European	Baltic	86	41.86%	Tambets et al. 2004; Ilumae et al. 2016
Baltic	Latvia	Latvians	Indo-European	Baltic	113	41.59%	Lappalainen et al. 2008
Baltic	Lithuania	Lithuanians	Indo-European	Baltic	111	40.54%	Ilumae et al. 2016
Baltic	Kola Peninsula, Russia	Sami (Saami)	Uralic	Sami	23	39.13%	Tambets et al. 2004
Baltic	Lithuania	Lithuanians	Indo-European	Baltic	196	36.73%	Kasperavičiūtė et al. 2004
Baltic	Estonia	Estonians	Uralic	Finnic	119	33.61%	Lappalainen et al. 2008
Baltic	Archangelsk, Russia	Russians	Indo-European	Slavic	28	28.57%	Mirabal et al. 2009
Baltic	Arkhangelsk Oblast, Russia	Russians	Indo-European	Slavic	42	28.57%	Fechner et al. 2008
Baltic	Estonia	Estonians	Uralic	Finnic	235	27.66%	Rootsi et al. 2007; Ilumae et al. 2016
Baltic	Archangelsk, Russia	Russians	Indo-European	Slavic	106	21.70%	Balanovsky et al. 2008; Ilumae et al. 2016
Baltic	Pinega	Russians	Indo-European	Slavic	103	21.36%	Balanovsky et al. 2008; Ilumae et al. 2016
Baltic	Russia	Veps	Uralic	Finnic	40	20.00%	Rootsi et al. 2007; Ilumae et al. 2016
Baltic	Russia	Karelians	Uralic	Finnic	139	17.27%	Rootsi et al. 2007; Ilumae et al. 2016
Caucasus	Caucasus	Nogais	Turkic		119	11.76%	Ilumae et al. 2016
Central Asia	Kazakhstan	Kazakh (Shymkent)	Turkic		55	16.36%	Zhabagin et al. 2017
East Asia	Hulunbuir Region	Mongols (Buriyad)	Mongolic		53	62.26%	Hu et al. 2015

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
East Asia	Northeastern Mongolia	Mongols	Mongolic		20	20.00%	Di Cristofaro et al. 2013
East Asia	Northeastern China	Nanai (Hezhe)	Tungusic		45	17.78%	Xue et al. 2006
East Asia	Hulunbuir Region	Mongols (Bargod)	Mongolic		23	17.39%	Hu et al. 2015
East Asia	Northwestern Mongolia	Mongols	Mongolic		97	13.40%	Di Cristofaro et al. 2013
East Asia	Sichuan Province, China	Horpa (Daofu)	Sino-Tibetan	Tibeto-Burman	16	12.50%	Wang et al. 2014
East Asia	Mongolia	Mongols	Mongolic		381	12.34%	Ilumae et al. 2016
Eastern Europe	Volga-Uralic, Udmurtia	Udmurts	Uralic	Permian	54	77.78%	Rootsi et al. 2007; Ilumae et al. 2016
Eastern Europe	Volga-Uralic	Mari	Uralic	Mari	51	41.18%	Rootsi et al. 2007; Ilumae et al. 2016
Eastern Europe	Pskov	Russians	Indo-European	Slavic	40	35.00%	Malyarchuk and Derenko 2008
Eastern Europe	Volga-Uralic, Chuvash Republic	Chuvash	Turkic		114	32.46%	Rootsi et al. 2007; Ilumae et al. 2016
Eastern Europe	Novgorod Oblast	Russians	Indo-European	Slavic	40	27.50%	Fechner et al. 2008
Eastern Europe	Ivanovo Oblast	Russians	Indo-European	Slavic	40	22.50%	Fechner et al. 2008
Eastern Europe	Oryol, Russia	Russians	Indo-European	Slavic	36	19.44%	Malyarchuk and Derenko 2008
Eastern Europe	Pskov	Russians	Indo-European	Slavic	132	18.94%	Balanovsky et al. 2008; Ilumae et al. 2016

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Eastern Europe	Smolensk Oblast	Russians	Indo-European	Slavic	43	16.28%	Fechner et al. 2008
Eastern Europe	Bryansk Oblast	Russians	Indo-European	Slavic	43	16.28%	Fechner et al. 2008
Eastern Europe	Volot, Russia	Russians	Indo-European	Slavic	40	15.00%	Malyarchuk and Derenko 2008
Eastern Europe	Vologda Oblast	Russians	Indo-European	Slavic	40	15.00%	Fechner et al. 2008
Eastern Europe	Nizhni Novgorod, Russia	Russians	Indo-European	Slavic	58	13.79%	Malyarchuk and Derenko 2008
Eastern Europe	Vladimir	Russians	Indo-European	Slavic	51	13.73%	Malyarchuk and Derenko 2008
Eastern Europe	Veliki Novgorod, Russia	Russians	Indo-European	Slavic	37	13.51%	Malyarchuk and Derenko 2008
Eastern Europe	Tver, Russia	Russians	Indo-European	Slavic	38	13.16%	Mirabal et al. 2009
Eastern Europe	Kursk, Russia	Russians	Indo-European	Slavic	40	12.50%	Mirabal et al. 2009
Eastern Europe	Oryol Oblast	Russians	Indo-European	Slavic	42	11.90%	Fechner et al. 2008
Eastern Europe	Belgorod	Russians	Indo-European	Slavic	143	11.89%	Balanovsky et al. 2008; Ilumae et al. 2016
Eastern Europe	Tula, Russia	Russians	Indo-European	Slavic	43	11.63%	Malyarchuk and Derenko 2008
Eastern Europe	Kalmyk Republic	Kalmyks	Mongolic		426	11.50%	Malyarchuk et al. 2013
Eastern Europe	Republic of Mordovia	Mordvins (Pop 2)	Uralic	Mordvin	203	11.33%	Ilumae et al. 2016

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Eastern Europe	Lipetsk Oblast	Russians	Indo-European	Slavic	47	10.64%	Fechner et al. 2008
Northern Eurasia	Northwestern Siberia	Nenets (Tundra)	Uralic	Samoyed	59	98.31%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Northwestern Siberia	Nenets (Forest)	Uralic	Samoyed	89	96.63%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Northwestern Siberia	Nganasans	Uralic	Samoyed	38	94.74%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Siberia	Yakuts	Turkic		121	91.74%	Kharkov 2005; Rootsi et al. 2007
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts (Vilyuy)	Turkic		59	91.53%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Lower Ob River Valley, Russia	Khanty	Uralic	Uralic	28	89.29%	Pimenoff et al. 2008
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts (Central)	Turkic		92	88.04%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Northwestern Siberia	Komi	Uralic	Permian	28	85.71%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Western Siberia	Nenets	Uralic	Samoyed	42	83.33%	Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts	Turkic		65	81.54%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Siberia	Khanty	Uralic	Uralic	27	81.48%	Mirabal et al. 2009
Northern Eurasia	Northwestern Siberia	Khanty	Uralic	Uralic	57	78.95%	Rootsi et al. 2007
Northern Eurasia	Northwestern Siberia	Khanty	Uralic	Uralic	47	76.60%	Karafet et al. 2002; Rootsi et al. 2007

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Northern Eurasia	Lower Ob River Valley, Russia	Mansi	Uralic	Uralic	25	76.00%	Pimenoff et al. 2008
Northern Eurasia	Southern Siberia	Tofalars	Turkic		30	70.00%	Derenko et al. 2007
Northern Eurasia	Western Siberia	Khanty and Mansi	Uralic	Uralic	63	69.84%	Ilumae et al. 2016
Northern Eurasia	Sakha Republic	Even	Tungusic		46	69.57%	Pakendorf et al. 2007
Northern Eurasia	Izhevsk, Russia	Komi	Uralic	Permian	54	68.52%	Mirabal et al. 2009
Northern Eurasia	Altai-Sayan Region	Shors	Turkic		21	66.67%	Gubina et al. 2013
Northern Eurasia	Komi Republic, Russia	Komi (Syktyk distr.)	Uralic	Permian	17	64.71%	Ilumae et al. 2016
Northern Eurasia	Priluzski, Russia	Komi	Uralic	Permian	49	61.22%	Mirabal et al. 2009
Northern Eurasia	Komi Republic, Russia	Komi (Izhemsky distr.)	Uralic	Permian	30	60.00%	Ilumae et al. 2016
Northern Eurasia	Northeastern Siberia	Yupik	Eskimo-Aleut		22	54.55%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Central Siberia, Sakha Republic	Evenks	Tungusic		57	54.39%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Eastern Siberia	Chukchi	Chukotko-Kamchatkan		46	54.35%	Ilumae et al. 2016
Northern Eurasia	Western Siberia	Nganasans	Uralic	Samoyed	50	54.00%	Ilumae et al. 2016
Northern Eurasia	Eastern Siberia	Chukchi	Chukotko-Kamchatkan		56	53.57%	Kharkov 2005; Rootsi et al. 2007

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Northern Eurasia	Northeastern Siberia	Koryaks	Chukotko-Kamchatkan		12	50.00%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Central Siberia, Sakha Republic	Dolgan (Yakutia)	Turkic		10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Southern Siberia	Khakas	Turkic		64	50.00%	Derenko et al. 2007
Northern Eurasia	Republic of Buryatia, Russia	Buryats	Mongolic		298	47.99%	Kharkov et al. 2014
Northern Eurasia	Eastern Siberia	Yupik	Eskimo-Aleut		17	47.06%	Ilumae et al. 2016
Northern Eurasia	Altai Republic	Kumadins	Turkic		17	47.06%	Dulik et al. 2012
Northern Eurasia	Altai-Sayan Region	Khakas	Turkic		176	46.02%	Gubina et al. 2013
Northern Eurasia	Central Siberia, Sakha Republic	Even	Tungusic		24	45.83%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Eastern Siberia	Nanai (Hezhe)	Tungusic		130	44.62%	Ilumae et al. 2016
Northern Eurasia	Buryat Republic	Buryats	Mongolic		111	44.14%	Ilumae et al. 2016
Northern Eurasia	Tuva Republic	Tuvans	Turkic		419	43.44%	Kharkov et al. 2013
Northern Eurasia	Altai-Sayan Region	Tuvans	Turkic		102	42.16%	Gubina et al. 2013
Northern Eurasia	Southern Siberia	Khakas	Turkic		174	41.38%	Rootsi et al. 2007; Ilumae et al. 2016
Northern Eurasia	Southern Siberia	Shors	Turkic		23	39.13%	Rootsi et al. 2007; Ilumae et al. 2016

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Northern Eurasia	Northern Siberia, Taymyr Peninsula	Dolgan (Taymyr)	Turkic		54	37.04%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Northwestern Siberia	Dolgan	Turkic		67	34.33%	Karafet et al. 2002; Rootsi et al. 2007
Northern Eurasia	Southern Siberia	Tuvans	Turkic		95	33.68%	Ilumae et al. 2016
Northern Eurasia	Altai-Sayan Region	Altai (Altaians, Altay)	Turkic		59	30.51%	Gubina et al. 2013
Northern Eurasia	Southern Siberia	Evenks	Tungusic		41	29.27%	Derenko et al. 2007
Northern Eurasia	Southern Siberia	Tuvans	Turkic		134	29.10%	Derenko et al. 2007
Northern Eurasia	Altai Republic	Altai (Altaians, Altay)	Turkic		61	27.87%	Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Yukaghirs	Yukaghir		11	27.27%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Komi Republic, Russia	Komi (Permians)	Uralic	Permian	60	25.00%	Ilumae et al. 2016
Northern Eurasia	Southern Siberia	Koryaks	Chukotko-Kamchatkan		16	25.00%	Derenko et al. 2007
Northern Eurasia	Eastern Siberia	Koryaks	Chukotko-Kamchatkan		36	22.22%	Kharkov 2005; Rootsi et al. 2007
Northern Eurasia	Eastern Siberia	Koryaks	Chukotko-Kamchatkan		9	22.22%	Ilumae et al. 2016
Northern Eurasia	Western Siberia	Tatars	Turkic		221	22.17%	Ilumae et al. 2016
Northern Eurasia	Altai Republic	Chelkans	Turkic		25	20.00%	Dulik et al. 2012

Region	Location	Population	Family	Sub Fam	Sample Size	N1a-F1206 Freq	References
Northern Eurasia	Southern Siberia	Buryats	Mongolic		217	18.89%	Derenko et al. 2007
Northern Eurasia	Southern Siberia	Shors	Turkic		38	18.42%	Derenko et al. 2007
Northern Eurasia	Volga-Uralic	Tatars	Turkic		133	15.04%	Ilumae et al. 2016
Northern Eurasia	Eastern Siberia	Yupik	Eskimo-Aleut		31	12.90%	Kharkov 2005; Rootsi et al. 2007
Northern Eurasia	Southern Siberia	Sojot	Turkic		28	10.71%	Derenko et al. 2007
Scandinavia	Finland	Finns	Uralic	Finnic	536	58.58%	Lappalainen et al. 2008
Scandinavia	Finland	Sami (Saami)	Uralic	Sami	69	55.07%	Tambets et al. 2004
Scandinavia	Sweden	Sami (Saami)	Uralic	Sami	38	44.74%	Karlsson et al. 2006
Scandinavia	Sweden	Sami (Saami)	Uralic	Sami	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016
Scandinavia	Sweden	Swedes	Indo-European	Germanic	160	14.38%	Lappalainen et al. 2008
Scandinavia	Finland	Finns	Uralic	Finnic	39	12.82%	Altshuler et al. 2010; Ilumae et al. 2016

Supplementary Table 14.4. Survey of Populations with the N1a2b-P43 Mutation (Regional View).

Region	Population	Family	Location	Sub Fam 1	Sample Size	N-P43 Freq	References
Baltic							
	Veps	Uralic	Russia	Finnic	40	17.50%	Rootsi et al. 2007; Ilumae et al. 2016
	Russians	Indo-European	Pinega	Slavic	103	16.50%	Balanovsky et al. 2008; Ilumae et al. 2016
	Russians	Indo-European	Archangelsk, Russia	Slavic	106	6.60%	Balanovsky et al. 2008; Ilumae et al. 2016
Central Asia							
	Kyrgyz-SouthWest	Turkic	Kyrgyzstan		20	5.00%	Di Cristofaro et al. 2013
East Asia							
	Nanai (Hezhe)	Tungusic	Northeastern China		45	17.78%	Xue et al. 2006
	Mongols	Mongolic	Northeastern Mongolia		20	10.00%	Di Cristofaro et al. 2013
	Oroqen	Tungusic	Northeastern China		31	6.45%	Xue et al. 2006
	Mongols	Mongolic	Mongolia		381	5.77%	Ilumae et al. 2016
Eastern Europe							
	Mari	Uralic	Volga-Uralic	Mari	51	15.69%	Rootsi et al. 2007; Ilumae et al. 2016
	Udmurts	Uralic	Volga-Uralic, Udmurtia	Permian	54	11.11%	Rootsi et al. 2007; Ilumae et al. 2016
	Chuvash	Turkic	Volga-Uralic, Chuvash Republic		114	9.65%	Rootsi et al. 2007; Ilumae et al. 2016
Northern Eurasia							

Region	Population	Family	Location	Sub Fam 1	Sample Size	N-P43 Freq	References
	Nganasans	Uralic	Northwestern Siberia	Samoyed	38	92.11%	Karafet et al. 2002; Rootsi et al. 2007
	Khanty	Uralic	Siberia	Uralic	27	77.78%	Mirabal et al. 2009
	Nenets (Tundra)	Uralic	Northwestern Siberia	Samoyed	59	74.58%	Karafet et al. 2002; Rootsi et al. 2007
	Nenets	Uralic	Western Siberia	Samoyed	42	69.05%	Ilumae et al. 2016
	Mansi	Uralic	Lower Ob River Valley, Russia	Uralic	25	60.00%	Pimenoff et al. 2008
	Nganasans	Uralic	Western Siberia	Samoyed	50	54.00%	Ilumae et al. 2016
	Khanty	Uralic	Northwestern Siberia	Uralic	57	52.63%	Rootsi et al. 2007
	Kumadins	Turkic	Altai Republic		17	47.06%	Dulik et al. 2012
	Nenets (Forest)	Uralic	Northwestern Siberia	Samoyed	89	44.94%	Karafet et al. 2002; Rootsi et al. 2007
	Tofalars	Turkic	Southern Siberia		30	43.33%	Derenko et al. 2007
	Khanty	Uralic	Northwestern Siberia	Uralic	47	38.30%	Karafet et al. 2002; Rootsi et al. 2007
	Komi	Uralic	Northwestern Siberia	Permian	28	35.71%	Karafet et al. 2002; Rootsi et al. 2007
	Komi (Syktyk distr.)	Uralic	Komi Republic, Russia	Permian	17	35.29%	Ilumae et al. 2016
	Khakas	Turkic	Southern Siberia		64	34.38%	Derenko et al. 2007
	Khanty and Mansi	Uralic	Western Siberia	Uralic	63	26.98%	Ilumae et al. 2016
	Tuvans	Turkic	Tuva Republic		419	25.06%	Kharkov et al. 2013
	Khanty	Uralic	Lower Ob River Valley, Russia	Uralic	28	25.00%	Pimenoff et al. 2008

Region	Population	Family	Location	Sub Fam 1	Sample Size	N-P43 Freq	References
	Evenks	Tungusic	Southern Siberia		41	24.39%	Derenko et al. 2007
	Dolgan (Taymyr)	Turkic	Northern Siberia, Taymyr Peninsula		54	24.07%	Fedorova et al. 2013; Ilumae et al. 2016
	Even	Tungusic	Sakha Republic		46	21.74%	Pakendorf et al. 2007
	Tuvans	Turkic	Altai-Sayan Region		102	21.57%	Gubina et al. 2013
	Chelkans	Turkic	Altai Republic		25	20.00%	Dulik et al. 2012
	Tuvans	Turkic	Southern Siberia		95	20.00%	Ilumae et al. 2016
	Tuvans	Turkic	Southern Siberia		134	18.66%	Derenko et al. 2007
	Tatars	Turkic	Western Siberia		221	17.19%	Ilumae et al. 2016
	Khakas	Turkic	Altai-Sayan Region		176	17.05%	Gubina et al. 2013
	Komi	Uralic	Izhevsk, Russia	Permian	54	16.67%	Mirabal et al. 2009
	Koryaks	Chukotko-Kamchatkan	Northeastern Siberia		12	16.67%	Karafet et al. 2002; Rootsi et al. 2007
	Komi (Izhemsky distr.)	Uralic	Komi Republic, Russia	Permian	30	16.67%	Ilumae et al. 2016
	Khakas	Turkic	Southern Siberia		174	16.67%	Rootsi et al. 2007; Ilumae et al. 2016
	Shors	Turkic	Southern Siberia		38	15.79%	Derenko et al. 2007
	Komi	Uralic	Priluzski, Russia	Permian	49	14.29%	Mirabal et al. 2009
	Yupik	Eskimo-Aleut	Eastern Siberia		31	12.90%	Kharkov 2005; Rootsi et al. 2007
	Dolgan	Turkic	Northwestern Siberia		67	11.94%	Karafet et al. 2002; Rootsi et al. 2007

Region	Population	Family	Location	Sub Fam 1	Sample Size	N-P43 Freq	References
	Yupik	Eskimo-Aleut	Eastern Siberia		17	11.76%	Ilumae et al. 2016
	Yakuts	Turkic	Central Siberia, Sakha Republic		65	10.77%	Fedorova et al. 2013; Ilumae et al. 2016
	Altai (Altaians, Altay)	Turkic	Altai-Sayan Region		59	10.17%	Gubina et al. 2013
	Tatars	Turkic	Volga-Uralic		133	9.77%	Ilumae et al. 2016
	Shors	Turkic	Southern Siberia		23	8.70%	Rootsi et al. 2007; Ilumae et al. 2016
	Even	Tungusic	Central Siberia, Sakha Republic		24	8.33%	Fedorova et al. 2013; Ilumae et al. 2016
	Altai (Altaians, Altay)	Turkic	Altai Republic		61	8.20%	Ilumae et al. 2016
	Selkups	Uralic	Western Siberia	Samoyed	43	6.98%	Ilumae et al. 2016
	Selkups	Uralic	Northwestern Siberia	Samoyed	131	6.87%	Karafet et al. 2002; Rootsi et al. 2007
	Komi (Permians)	Uralic	Komi Republic, Russia	Permian	60	6.67%	Ilumae et al. 2016
	Evenks	Tungusic	Central Siberia, Sakha Republic		57	5.26%	Fedorova et al. 2013; Ilumae et al. 2016

Supplementary Table 14.5. Survey of Populations with the N1a1-M46/Tat Mutation (Regional View).

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
Baltic							
	Karelians	Karelia Republic, Russia	Uralic	Finnic	132	53.03%	Lappalainen et al. 2008
	Lithuanians	Lithuania	Indo-European	Baltic	164	43.90%	Lappalainen et al. 2008
	Latvians	Latvia	Indo-European	Baltic	86	41.86%	Tambets et al. 2004; Ilumae et al. 2016
	Latvians	Latvia	Indo-European	Baltic	113	41.59%	Lappalainen et al. 2008
	Lithuanians	Lithuania	Indo-European	Baltic	111	40.54%	Ilumae et al. 2016
	Sami (Saami)	Kola Peninsula, Russia	Uralic	Sami	23	39.13%	Tambets et al. 2004
	Lithuanians	Lithuania	Indo-European	Baltic	196	36.73%	Kasperavičiūtė et al. 2004
	Estonians	Estonia	Uralic	Finnic	119	33.61%	Lappalainen et al. 2008
	Russians	Archangelsk, Russia	Indo-European	Slavic	28	28.57%	Mirabal et al. 2009
	Russians	Arkhangelsk Oblast, Russia	Indo-European	Slavic	42	28.57%	Fechner et al. 2008
	Estonians	Estonia	Uralic	Finnic	235	27.66%	Rootsi et al. 2007; Ilumae et al. 2016
	Karelians	Russia	Uralic	Finnic	139	16.55%	Rootsi et al. 2007; Ilumae et al. 2016
	Russians	Archangelsk, Russia	Indo-European	Slavic	106	15.09%	Balanovsky et al. 2008; Ilumae et al. 2016
Caucasus							
	Nogais	Caucasus	Turkic		119	11.76%	Ilumae et al. 2016
Central Asia							

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Kazakh (Shymkent)	Kazakhstan	Turkic		55	16.36%	Zhabagin et al. 2017
East Asia							
	Mongols (Buriyad)	Hulunbuir Region	Mongolic		53	60.38%	Hu et al. 2015
	Mongols (Bargod)	Hulunbuir Region	Mongolic		23	13.04%	Hu et al. 2015
	Horpa (Daofu)	Sichuan Province, China	Sino-Tibetan	Tibeto-Burman	16	12.50%	Wang et al. 2014
	Mongols	Northwestern Mongolia	Mongolic		97	12.37%	Di Cristofaro et al. 2013
	Mongols	Northeastern Mongolia	Mongolic		20	10.00%	Di Cristofaro et al. 2013
Eastern Europe							
	Udmurts	Volga-Uralic, Udmurtia	Uralic	Permian	54	66.67%	Rootsi et al. 2007; Ilumae et al. 2016
	Russians	Pskov	Indo-European	Slavic	40	35.00%	Malyarchuk and Derenko 2008
	Russians	Novgorod Oblast	Indo-European	Slavic	40	27.50%	Fechner et al. 2008
	Mari	Volga-Uralic	Uralic	Mari	51	25.49%	Rootsi et al. 2007; Ilumae et al. 2016
	Chuvash	Volga-Uralic, Chuvash Republic	Turkic		114	22.81%	Rootsi et al. 2007; Ilumae et al. 2016
	Russians	Ivanovo Oblast	Indo-European	Slavic	40	22.50%	Fechner et al. 2008
	Russians	Oryol, Russia	Indo-European	Slavic	36	19.44%	Malyarchuk and Derenko 2008
	Russians	Pskov	Indo-European	Slavic	132	18.18%	Balanovsky et al. 2008; Ilumae et al. 2016
	Russians	Bryansk Oblast	Indo-European	Slavic	43	16.28%	Fechner et al. 2008

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Russians	Smolensk Oblast	Indo-European	Slavic	43	16.28%	Fechner et al. 2008
	Russians	Volot, Russia	Indo-European	Slavic	40	15.00%	Malyarchuk and Derenko 2008
	Russians	Vologda Oblast	Indo-European	Slavic	40	15.00%	Fechner et al. 2008
	Russians	Nizhni Novgorod, Russia	Indo-European	Slavic	58	13.79%	Malyarchuk and Derenko 2008
	Russians	Veliki Novgorod, Russia	Indo-European	Slavic	37	13.51%	Malyarchuk and Derenko 2008
	Russians	Tver, Russia	Indo-European	Slavic	38	13.16%	Mirabal et al. 2009
	Russians	Kursk, Russia	Indo-European	Slavic	40	12.50%	Mirabal et al. 2009
	Russians	Oryol Oblast	Indo-European	Slavic	42	11.90%	Fechner et al. 2008
	Russians	Vladimir	Indo-European	Slavic	51	11.76%	Malyarchuk and Derenko 2008
	Russians	Tula, Russia	Indo-European	Slavic	43	11.63%	Malyarchuk and Derenko 2008
	Mordvins (Pop 2)	Republic of Mordovia	Uralic	Mordvin	203	11.33%	Ilumae et al. 2016
	Russians	Belgorod	Indo-European	Slavic	143	11.19%	Balanovsky et al. 2008; Ilumae et al. 2016
	Russians	Lipetsk Oblast	Indo-European	Slavic	47	10.64%	Fechner et al. 2008
	Kalmyks	Kalmyk Republic	Mongolic		426	10.09%	Malyarchuk et al. 2013
Northern Eurasia							
	Yakuts (Vilyuy)	Central Siberia, Sakha Republic	Turkic		59	91.53%	Fedorova et al. 2013; Ilumae et al. 2016
	Yakuts	Siberia	Turkic		121	89.26%	Kharkov 2005; Rootsi et al. 2007

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Yakuts (Central)	Central Siberia, Sakha Republic	Turkic		92	85.87%	Fedorova et al. 2013; Ilumae et al. 2016
	Yakuts	Central Siberia, Sakha Republic	Turkic		65	70.77%	Fedorova et al. 2013; Ilumae et al. 2016
	Khanty	Lower Ob River Valley, Russia	Uralic	Uralic	28	64.29%	Pimenoff et al. 2008
	Shors	Altai-Sayan Region	Turkic		21	61.90%	Gubina et al. 2013
	Yupik	Northeastern Siberia	Eskimo-Aleut		22	54.55%	Karafet et al. 2002; Rootsi et al. 2007
	Chukchi	Eastern Siberia	Chukotko-Kamchatkan		46	54.35%	Ilumae et al. 2016
	Chukchi	Eastern Siberia	Chukotko-Kamchatkan		56	53.57%	Kharkov 2005; Rootsi et al. 2007
	Komi	Izhevsk, Russia	Uralic	Permian	54	51.85%	Mirabal et al. 2009
	Nenets (Forest)	Northwestern Siberia	Uralic	Samoyed	89	51.69%	Karafet et al. 2002; Rootsi et al. 2007
	Dolgan (Yakutia)	Central Siberia, Sakha Republic	Turkic		10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
	Komi	Northwestern Siberia	Uralic	Permian	28	50.00%	Karafet et al. 2002; Rootsi et al. 2007
	Evenks	Central Siberia, Sakha Republic	Tungusic		57	49.12%	Fedorova et al. 2013; Ilumae et al. 2016
	Even	Sakha Republic	Tungusic		46	47.83%	Pakendorf et al. 2007

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Buryats	Republic of Buryatia, Russia	Mongolic		298	47.65%	Kharkov et al. 2014
	Komi	Priluzski, Russia	Uralic	Permian	49	46.94%	Mirabal et al. 2009
	Nanai (Hezhe)	Eastern Siberia	Tungusic		130	44.62%	Ilumae et al. 2016
	Komi (Izhemsky distr.)	Komi Republic, Russia	Uralic	Permian	30	43.33%	Ilumae et al. 2016
	Khanty and Mansi	Western Siberia	Uralic	Uralic	63	42.86%	Ilumae et al. 2016
	Buryats	Buryat Republic	Mongolic		111	41.44%	Ilumae et al. 2016
	Khanty	Northwestern Siberia	Uralic	Uralic	47	38.30%	Karafet et al. 2002; Rootsi et al. 2007
	Even	Central Siberia, Sakha Republic	Tungusic		24	37.50%	Fedorova et al. 2013; Ilumae et al. 2016
	Yupik	Eastern Siberia	Eskimo-Aleut		17	35.29%	Ilumae et al. 2016
	Koryaks	Northeastern Siberia	Chukotko-Kamchatkan		12	33.33%	Karafet et al. 2002; Rootsi et al. 2007
	Shors	Southern Siberia	Turkic		23	30.43%	Rootsi et al. 2007; Ilumae et al. 2016
	Komi (Syktyk distr.)	Komi Republic, Russia	Uralic	Permian	17	29.41%	Ilumae et al. 2016
	Khakas	Altai-Sayan Region	Turkic		176	28.98%	Gubina et al. 2013
	Yukaghirs	Central Siberia, Sakha Republic	Yukaghir		11	27.27%	Fedorova et al. 2013; Ilumae et al. 2016
	Tofalars	Southern Siberia	Turkic		30	26.67%	Derenko et al. 2007

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Khanty	Northwestern Siberia	Uralic	Uralic	57	26.32%	Rootsi et al. 2007
	Koryaks	Southern Siberia	Chukotko-Kamchatkan		16	25.00%	Derenko et al. 2007
	Khakas	Southern Siberia	Turkic		174	24.71%	Rootsi et al. 2007; Ilumae et al. 2016
	Nenets (Tundra)	Northwestern Siberia	Uralic	Samoyed	59	23.73%	Karafet et al. 2002; Rootsi et al. 2007
	Dolgan	Northwestern Siberia	Turkic		67	22.39%	Karafet et al. 2002; Rootsi et al. 2007
	Koryaks	Eastern Siberia	Chukotko-Kamchatkan		9	22.22%	Ilumae et al. 2016
	Koryaks	Eastern Siberia	Chukotko-Kamchatkan		36	22.22%	Kharkov 2005; Rootsi et al. 2007
	Tuvans	Altai-Sayan Region	Turkic		102	20.59%	Gubina et al. 2013
	Altai (Altaians, Altay)	Altai-Sayan Region	Turkic		59	20.34%	Gubina et al. 2013
	Altai (Altaians, Altay)	Altai Republic	Turkic		61	19.67%	Ilumae et al. 2016
	Buryats	Southern Siberia	Mongolic		217	18.43%	Derenko et al. 2007
	Tuvans	Tuva Republic	Turkic		419	18.38%	Kharkov et al. 2013
	Komi (Permians)	Komi Republic, Russia	Uralic	Permian	60	18.33%	Ilumae et al. 2016
	Mansi	Lower Ob River Valley, Russia	Uralic	Uralic	25	16.00%	Pimenoff et al. 2008
	Khakas	Southern Siberia	Turkic		64	15.63%	Derenko et al. 2007

Region	Population	Location	Family	Sub Fam 1	Sample Size	N-M46/Tat Freq	References
	Nenets	Western Siberia	Uralic	Samoyed	42	14.29%	Ilumae et al. 2016
	Tuvans	Southern Siberia	Turkic		95	13.68%	Ilumae et al. 2016
	Dolgan (Taymyr)	Northern Siberia, Taymyr Peninsula	Turkic		54	12.96%	Fedorova et al. 2013; Ilumae et al. 2016
	Sojot	Southern Siberia	Turkic		28	10.71%	Derenko et al. 2007
	Tuvans	Southern Siberia	Turkic		134	10.45%	Derenko et al. 2007
Scandinavia							
	Finns	Finland	Uralic	Finnic	536	58.21%	Lappalainen et al. 2008
	Sami (Saami)	Finland	Uralic	Sami	69	55.07%	Tambets et al. 2004
	Sami (Saami)	Sweden	Uralic	Sami	38	44.74%	Karlsson et al. 2006
	Sami (Saami)	Sweden	Uralic	Sami	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016
	Swedes	Sweden	Indo-European	Germanic	160	14.38%	Lappalainen et al. 2008
	Finns	Finland	Uralic	Finnic	39	12.82%	Altshuler et al. 2010; Ilumae et al. 2016

Supplementary Table 14.6. Survey of Populations with the N1a1a1a2-B211 Mutation (Language View).

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-B211 Freq	References
Indo-European	Slavic	Belarusians	Eastern Europe	Belarus	267	1.12%	Kushniarevich et al. 2013; Ilumae et al. 2016
		Chuvash	Eastern Europe	Volga-Uralic, Chuvash Republic	114	20.18%	Rootsi et al. 2007; Ilumae et al. 2016
Turkic		Altai (Altaians, Altay)	Northern Eurasia	Altai Republic	61	6.56%	Ilumae et al. 2016
Uralic	Mari	Mari	Eastern Europe	Volga-Uralic	51	13.73%	Rootsi et al. 2007; Ilumae et al. 2016
	Mordvin	Mordvins (Pop 1)	Eastern Europe	Republic of Mordovia	60	5.00%	Ilumae et al. 2016
		Mordvins (Pop 2)	Eastern Europe	Republic of Mordovia	203	10.34%	Ilumae et al. 2016
Permian	Udmurts	Eastern Europe	Volga-Uralic, Udmurtia	54	66.67%	Rootsi et al. 2007; Ilumae et al. 2016	

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-B211 Freq	References
		Komi (Permians)	Northern Eurasia	Komi Republic, Russia	60	11.67%	Illumae et al. 2016
		Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	17.65%	Illumae et al. 2016
	Uralic	Komi (Izhemsky distr.)	Northern Eurasia	Komi Republic, Russia	30	43.33%	Illumae et al. 2016
		Khanty and Mansi	Northern Eurasia	Western Siberia	63	19.05%	Illumae et al. 2016

Supplementary Table 14.7. Survey of Populations with the N1a1a1a1a2-Z1936 Mutation (Language View).

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-Z1936 Freq	References
Indo-European							
	Baltic						
		Latvians	Baltic	Latvia	86	1.16%	Tambets et al. 2004; Ilumae et al. 2016
	Slavic						
		Russians	Baltic	Archangelsk, Russia	106	22.64%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Baltic	Pinega	103	19.42%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Kostroma	51	9.80%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Kursk, Russia	45	6.67%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Pskov	132	3.79%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Voronez	96	3.13%	Balanovsky et al. 2008; Ilumae et al. 2016
		Ukrainians	Eastern Europe	Ukraine	566	1.06%	Rootsi et al. 2007; Ilumae et al. 2016
		Russians	Eastern Europe	Smolensk	100	1.00%	Balanovsky et al. 2008; Ilumae et al. 2016
Turkic							
		Bashkir	Eastern Europe	Bashkortostan	568	14.96%	Ilumae et al. 2016
		Chuvash	Eastern Europe	Volga-Uralic, Chuvash Republic	114	3.51%	Rootsi et al. 2007; Ilumae et al. 2016
		Tatars	Northern Eurasia	Volga-Uralic	133	12.78%	Ilumae et al. 2016
		Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	7.41%	Fedorova et al. 2013; Ilumae et al. 2016
		Tatars	Northern Eurasia	Western Siberia	221	5.43%	Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-Z1936 Freq	References
Uralic							
	Finnic						
		Veps	Baltic	Russia	40	32.50%	Rootsi et al. 2007; Ilumae et al. 2016
		Karelians	Baltic	Russia	139	20.14%	Rootsi et al. 2007; Ilumae et al. 2016
		Estonians	Baltic	Estonia	235	2.98%	Rootsi et al. 2007; Ilumae et al. 2016
		Finns	Scandinavia	Finland	39	41.03%	Altshuler et al. 2010; Ilumae et al. 2016
	Mordvin						
		Mordvins (Pop 1)	Eastern Europe	Republic of Mordovia	60	5.00%	Ilumae et al. 2016
		Mordvins (Pop 2)	Eastern Europe	Republic of Mordovia	203	1.97%	Ilumae et al. 2016
	Permian						
		Komi (Izhemsky distr.)	Northern Eurasia	Komi Republic, Russia	30	10.00%	Ilumae et al. 2016
		Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	5.88%	Ilumae et al. 2016
		Komi (Permians)	Northern Eurasia	Komi Republic, Russia	60	5.00%	Ilumae et al. 2016
	Sami						
		Sami (Saami)	Scandinavia	Sweden	35	20.00%	Tambets et al. 2004; Ilumae et al. 2016
	Samoyed						
		Nenets	Northern Eurasia	Western Siberia	42	9.52%	Ilumae et al. 2016
		Nganasans	Northern Eurasia	Western Siberia	50	4.00%	Ilumae et al. 2016

Uralic

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-Z1936 Freq	References
		Khanty and Mansi	Northern Eurasia	Western Siberia	63	7.94%	Ilumae et al. 2016

Supplementary Table 14.8. Survey of Populations with the N1a1a1a1a4-M2019 Mutation (Language View).

Family	Population	Region	Location	Sample Size	N-M2019 Freq	References
Tungusic	Evenks	Northern Eurasia	Central Siberia, Sakha Republic	57	47.37%	Fedorova et al. 2013; Ilumae et al. 2016
Tungusic	Even	Northern Eurasia	Central Siberia, Sakha Republic	24	29.17%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Yakuts (Vilyuy)	Northern Eurasia	Central Siberia, Sakha Republic	59	89.83%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Yakuts (Central)	Northern Eurasia	Central Siberia, Sakha Republic	92	85.87%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Yakuts	Northern Eurasia	Central Siberia, Sakha Republic	65	69.23%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Dolgan (Yakutia)	Northern Eurasia	Central Siberia, Sakha Republic	10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Shors	Northern Eurasia	Southern Siberia	23	4.35%	Rootsi et al. 2007; Ilumae et al. 2016
Turkic	Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	3.70%	Fedorova et al. 2013; Ilumae et al. 2016
Turkic	Nogais	Caucasus	Caucasus	119	2.52%	Ilumae et al. 2016
Turkic	Karakalpak	Central Asia	Karakalpakstan	100	2.00%	Ilumae et al. 2016
Turkic	Tuvans	Northern Eurasia	Southern Siberia	95	1.05%	Ilumae et al. 2016
Uralic	Khanty and Mansi	Northern Eurasia	Western Siberia	63	12.70%	Ilumae et al. 2016

Supplementary Table 14.9. Survey of Populations with the N1a1a1a1a-VL29 Mutation (Language View).

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-VL29 Freq	References
Indo-European							
	Baltic						
		Lithuanians	Baltic	Lithuania	111	39.64%	Ilumae et al. 2016
		Latvians	Baltic	Latvia	86	38.37%	Tambets et al. 2004; Ilumae et al. 2016
	Slavic						
		Russians	Baltic	Archangelsk, Russia	106	13.21%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Baltic	Pinega	103	3.88%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Pskov	132	18.18%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Belgorod	143	9.09%	Balanovsky et al. 2008; Ilumae et al. 2016
		Belarusians	Eastern Europe	Belarus	267	7.87%	Kushniarevich et al. 2013; Ilumae et al. 2016
		Ukrainians	Eastern Europe	Ukraine	566	6.89%	Rootsi et al. 2007; Ilumae et al. 2016
		Russians	Eastern Europe	Kursk, Russia	45	6.67%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Smolensk	100	6.00%	Balanovsky et al. 2008; Ilumae et al. 2016
		Russians	Eastern Europe	Orjol	110	4.55%	Balanovsky et al. 2008; Ilumae et al. 2016
		Poles	Eastern Europe	Poland	93	4.30%	Rootsi et al. 2007; Ilumae et al. 2016
		Russians	Eastern Europe	Voronez	96	3.13%	Balanovsky et al. 2008; Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-VL29 Freq	References
Turkic		Russians	Eastern Europe	Kostroma	51	1.96%	Balanovsky et al. 2008; Ilumae et al. 2016
		Nogais	Caucasus	Caucasus	119	1.68%	Ilumae et al. 2016
		Tatars (Crimean)	Eastern Europe	Crimea	277	2.89%	Ilumae et al. 2016
		Chuvash	Eastern Europe	Volga-Uralic, Chuvash Republic	114	2.63%	Rootsi et al. 2007; Ilumae et al. 2016
		Tatars	Northern Eurasia	Volga-Uralic	133	3.76%	Ilumae et al. 2016
		Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	3.70%	Fedorova et al. 2013; Ilumae et al. 2016
		Tatars	Northern Eurasia	Western Siberia	221	1.36%	Ilumae et al. 2016
Uralic							
	Finnic						
		Estonians	Baltic	Estonia	235	27.66%	Rootsi et al. 2007; Ilumae et al. 2016
		Karelians	Baltic	Russia	139	15.11%	Rootsi et al. 2007; Ilumae et al. 2016
		Veps	Baltic	Russia	40	2.50%	Rootsi et al. 2007; Ilumae et al. 2016
		Finns	Scandinavia	Finland	39	12.82%	Altshuler et al. 2010; Ilumae et al. 2016
	Mari						
		Mari	Eastern Europe	Volga-Uralic	51	11.76%	Rootsi et al. 2007; Ilumae et al. 2016
	Permian						

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-VL29 Freq	References
		Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	11.76%	Ilumae et al. 2016
		Komi (Permians)	Northern Eurasia	Komi Republic, Russia	60	1.67%	Ilumae et al. 2016
	Sami						
		Sami (Saami)	Scandinavia	Sweden	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016
	Samoyed						
		Nenets	Northern Eurasia	Western Siberia	42	14.29%	Ilumae et al. 2016
		Selkups	Northern Eurasia	Western Siberia	43	2.33%	Ilumae et al. 2016

Supplementary Table 10.10. The N1a1a1a1c-B479 Mutation.

Family	Population	Location	Sample Size	N-B479 Freq	References
Tungusic	Nanai (Hezhe)	Eastern Siberia	130	43.85%	Illumae et al. 2016

Supplementary Table 14.11. Survey of Populations with the N1a1a1a1a3a-F4205 Mutation.

Family	Population	Region	Location	Sample Size	N-F4205 Freq	References
Mongolic	Mongols (Buriyad)	East Asia	Hulunbuir Region	53	47.17%	Hu et al. 2015
Mongolic	Buryats	Northern Eurasia	Buryat Republic	111	41.44%	Illumae et al. 2016
Turkic	Nogais	Caucasus	Caucasus	119	6.72%	Illumae et al. 2016
Turkic	Tuvans	Northern Eurasia	Southern Siberia	95	6.32%	Illumae et al. 2016
Mongolic	Mongols	East Asia	Mongolia	381	6.30%	Illumae et al. 2016
Mongolic	Mongols (Bargod)	East Asia	Hulunbuir Region	23	4.35%	Hu et al. 2015
Turkic	Altai (Altaians, Altay)	Northern Eurasia	Altai Republic	61	3.28%	Illumae et al. 2016
Turkic	Tatars	Northern Eurasia	Western Siberia	221	2.26%	Illumae et al. 2016
Turkic	Kazakhs	Central Asia	Kazakhstan	185	2.16%	Rootsi et al. 2007; Illumae et al. 2016
Turkic	Tatars (Crimean)	Eastern Europe	Crimea	277	1.08%	Illumae et al. 2016
Turkic	Karakalpak	Central Asia	Karakalpakstan	100	1.00%	Illumae et al. 2016

Supplementary Table 14.12. The N1a1a1a1a3b-B202 Mutation.

Family	Population	Region	Location	Sample Size	N-B202 Freq	References
Chukotko-Kamchatkan	Chukchi	Northern Eurasia	Eastern Siberia	46	47.83%	Ilumae et al. 2016
Chukotko-Kamchatkan	Koryaks	Northern Eurasia	Eastern Siberia	9	22.22%	Ilumae et al. 2016
Eskimo-Aleut	Yupik	Northern Eurasia	Eastern Siberia	17	23.53%	Ilumae et al. 2016

Supplementary Table 14.13. N1a1-M46/Tat and Reindeer Herders.

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
Chukotko-Kamchatkan		Chukchi	Northern Eurasia	Eastern Siberia	46	54.35%	Ilumae et al. 2016
		Chukchi	Northern Eurasia	Eastern Siberia	56	53.57%	Kharkov 2005; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Northeastern Siberia	12	33.33%	Karafet et al. 2002; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Southern Siberia	16	25.00%	Derenko et al. 2007
		Koryaks	Northern Eurasia	Eastern Siberia	36	22.22%	Kharkov 2005; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Eastern Siberia	9	22.22%	Ilumae et al. 2016
Tungusic		Even	Northern Eurasia	Sakha Republic	46	47.83%	Pakendorf et al. 2007
		Even	Northern Eurasia	Central Siberia, Sakha Republic	24	37.50%	Fedorova et al. 2013; Ilumae et al. 2016
		Evenks	Northern Eurasia	Central Siberia, Sakha Republic	57	49.12%	Fedorova et al. 2013; Ilumae et al. 2016
		Evenks	Northern Eurasia	Southern Siberia	41	4.88%	Derenko et al. 2007
Turkic		Dolgan	Northern Eurasia	Northwestern Siberia	67	22.39%	Karafet et al. 2002; Rootsi et al. 2007
		Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	12.96%	Fedorova et al. 2013; Ilumae et al. 2016
		Dolgan (Yakutia)	Northern Eurasia	Central Siberia, Sakha Republic	10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
		Sojot	Northern Eurasia	Southern Siberia	28	10.71%	Derenko et al. 2007

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
		Tofalars	Northern Eurasia	Southern Siberia	30	26.67%	Derenko et al. 2007
		Tuvans	Northern Eurasia	Altai-Sayan Region	102	20.59%	Gubina et al. 2013
		Tuvans	Northern Eurasia	Tuva Republic	419	18.38%	Kharkov et al. 2013
		Tuvans	Northern Eurasia	Southern Siberia	95	13.68%	Ilumae et al. 2016
		Tuvans	Northern Eurasia	Southern Siberia	134	10.45%	Derenko et al. 2007
		Yakuts	Northern Eurasia	Siberia	121	89.26%	Kharkov 2005; Rootsi et al. 2007
		Yakuts	Northern Eurasia	Central Siberia, Sakha Republic	65	70.77%	Fedorova et al. 2013; Ilumae et al. 2016
		Yakuts (Central)	Northern Eurasia	Central Siberia, Sakha Republic	92	85.87%	Fedorova et al. 2013; Ilumae et al. 2016
		Yakuts (Vilyuy)	Northern Eurasia	Central Siberia, Sakha Republic	59	91.53%	Fedorova et al. 2013; Ilumae et al. 2016
Uralic							
	Uralic	Khanty	Northern Eurasia	Lower Ob River Valley, Russia	28	64.29%	Pimenoff et al. 2008
	Uralic	Khanty	Northern Eurasia	Northwestern Siberia	47	38.30%	Karafet et al. 2002; Rootsi et al. 2007
	Uralic	Khanty	Northern Eurasia	Northwestern Siberia	57	26.32%	Rootsi et al. 2007
	Uralic	Khanty	Northern Eurasia	Siberia	27	3.70%	Mirabal et al. 2009
	Permian	Komi	Northern Eurasia	Izhevsk, Russia	54	51.85%	Mirabal et al. 2009
	Permian	Komi	Northern Eurasia	Northwestern Siberia	28	50.00%	Karafet et al. 2002; Rootsi et al. 2007
	Permian	Komi	Northern Eurasia	Priluzski, Russia	49	46.94%	Mirabal et al. 2009
	Permian	Komi (Izhemsky distr.)	Northern Eurasia	Komi Republic, Russia	30	43.33%	Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
	Permian	Komi (Permians)	Northern Eurasia	Komi Republic, Russia	60	18.33%	Ilumae et al. 2016
	Permian	Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	29.41%	Ilumae et al. 2016
	Samoyed	Nenets	Northern Eurasia	Western Siberia	42	14.29%	Ilumae et al. 2016
	Samoyed	Nenets (Forest)	Northern Eurasia	Northwestern Siberia	89	51.69%	Karafet et al. 2002; Rootsi et al. 2007
	Samoyed	Nenets (Tundra)	Northern Eurasia	Northwestern Siberia	59	23.73%	Karafet et al. 2002; Rootsi et al. 2007
	Samoyed	Nganasans	Northern Eurasia	Northwestern Siberia	38	2.63%	Karafet et al. 2002; Rootsi et al. 2007
	Samoyed	Nganasans	Northern Eurasia	Western Siberia	50	0.00%	Ilumae et al. 2016
	Sami	Sami (Saami)	Scandinavia	Finland	69	55.07%	Tambets et al. 2004
	Sami	Sami (Saami)	Scandinavia	Sweden	38	44.74%	Karlsson et al. 2006
	Sami	Sami (Saami)	Scandinavia	Sweden	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016
	Samoyed	Selkups	Northern Eurasia	Western Siberia	43	2.33%	Ilumae et al. 2016
	Samoyed	Selkups	Northern Eurasia	Northwestern Siberia	131	0.00%	Karafet et al. 2002; Rootsi et al. 2007
Yukaghir		Yukaghirs	Northern Eurasia	Central Siberia, Sakha Republic	11	27.27%	Fedorova et al. 2013; Ilumae et al. 2016

Supplementary Table 14.14. N1a1a1a2-B211 and Reindeer Herders.

Region	Location	Population	Family	Sub Fam 1	Sample Size	N-B211 Freq	References
Northern Eurasia	Komi Republic, Russia	Komi (Izhemsky distr.)	Uralic	Permian	30	43.33%	Ilumae et al. 2016
Northern Eurasia	Komi Republic, Russia	Komi (Syktyk distr.)	Uralic	Permian	17	17.65%	Ilumae et al. 2016
Northern Eurasia	Komi Republic, Russia	Komi (Permians)	Uralic	Permian	60	11.67%	Ilumae et al. 2016

Supplementary Table 14.15. N1a1a1a1a2-Z1936 and Reindeer Herders.

Region	Location	Population	Family	Sub Fam 1	Sample Size	N-Z1936 Freq	References
Northern Eurasia							
	Komi Republic, Russia	Komi (Izhemsky distr.)	Uralic	Permian	30	10.00%	Ilumae et al. 2016
	Western Siberia	Nenets	Uralic	Samoyed	42	9.52%	Ilumae et al. 2016
	Northern Siberia, Taymyr Peninsula	Dolgan (Taymyr)	Turkic		54	7.41%	Fedorova et al. 2013; Ilumae et al. 2016
	Komi Republic, Russia	Komi (Syktyk distr.)	Uralic	Permian	17	5.88%	Ilumae et al. 2016
	Komi Republic, Russia	Komi (Permians)	Uralic	Permian	60	5.00%	Ilumae et al. 2016
	Western Siberia	Nganasans	Uralic	Samoyed	50	4.00%	Ilumae et al. 2016
Scandinavia							
	Sweden	Sami (Saami)	Uralic	Sami	35	20.00%	Tambets et al. 2004; Ilumae et al. 2016

Supplementary Table 14.16. N1a1a1a1a4-M2019 and Reindeer Herders.

Region	Location	Population	Family	Sample Size	N-M2019 Freq	References
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts (Vilyuy)	Turkic	59	89.83%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts (Central)	Turkic	92	85.87%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Yakuts	Turkic	65	69.23%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Dolgan (Yakutia)	Turkic	10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Evenks	Tungusic	57	47.37%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Central Siberia, Sakha Republic	Even	Tungusic	24	29.17%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Northern Siberia, Taymyr Peninsula	Dolgan (Taymyr)	Turkic	54	3.70%	Fedorova et al. 2013; Ilumae et al. 2016
Northern Eurasia	Southern Siberia	Tuvans	Turkic	95	1.05%	Ilumae et al. 2016

Supplementary Table 14.17. N1a1a1a1a1a-VL29 and Reindeer Herders.

Region	Location	Population	Family	Sub Fam 1	Sample Size	N-VL29 Freq	References
Northern Eurasia							
	Western Siberia	Nenets	Uralic	Samoyed	42	14.29%	Ilumae et al. 2016
	Komi Republic, Russia	Komi (Syktyk distr.)	Uralic	Permian	17	11.76%	Ilumae et al. 2016
	Northern Siberia, Taymyr Peninsula	Dolgan (Taymyr)	Turkic		54	3.70%	Fedorova et al. 2013; Ilumae et al. 2016
	Western Siberia	Selkups	Uralic	Samoyed	43	2.33%	Ilumae et al. 2016
	Komi Republic, Russia	Komi (Permians)	Uralic	Permian	60	1.67%	Ilumae et al. 2016
Scandinavia							
	Sweden	Sami (Saami)	Uralic	Sami	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016

Supplementary Table 14.18. N1a1a1a1a3b-B202 and Reindeer Herders.

Region	Location	Population	Family	Sample Size	N-B202 Freq	References
Northern Eurasia	Eastern Siberia	Chukchi	Chukotko-Kamchatkan	46	47.83%	Ilumae et al. 2016
Northern Eurasia	Eastern Siberia	Koryaks	Chukotko-Kamchatkan	9	22.22%	Ilumae et al. 2016

Supplementary Table 14.19. Survey of Populations with the N1a2b-P43 Mutation (Language View).

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-P43 Freq	References
Chukotko-Kamchatkan		Koryaks	Northern Eurasia	Northeastern Siberia	12	16.67%	Karafet et al. 2002; Rootsi et al. 2007
	Eskimo-Aleut						
		Yupik	Northern Eurasia	Eastern Siberia	31	12.90%	Kharkov 2005; Rootsi et al. 2007
		Yupik	Northern Eurasia	Eastern Siberia	17	11.76%	Ilumae et al. 2016
Indo-European							
	Slavic	Russians	Baltic	Pinega	103	16.50%	Balanovsky et al. 2008; Ilumae et al. 2016
Mongolic							
		Mongols	East Asia	Northeastern Mongolia	20	10.00%	Di Cristofaro et al. 2013
Tungusic							
		Nanai (Hezhe)	East Asia	Northeastern China	45	17.78%	Xue et al. 2006
		Evenks	Northern Eurasia	Southern Siberia	41	24.39%	Derenko et al. 2007

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-P43 Freq	References
		Even	Northern Eurasia	Sakha Republic	46	21.74%	Pakendorf et al. 2007
Turkic							
		Kumadins	Northern Eurasia	Altai Republic	17	47.06%	Dulik et al. 2012
		Tofalars	Northern Eurasia	Southern Siberia	30	43.33%	Derenko et al. 2007
		Khakas	Northern Eurasia	Southern Siberia	64	34.38%	Derenko et al. 2007
		Tuvans	Northern Eurasia	Tuva Republic	419	25.06%	Kharkov et al. 2013
		Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	24.07%	Fedorova et al. 2013; Ilumae et al. 2016
		Tuvans	Northern Eurasia	Altai-Sayan Region	102	21.57%	Gubina et al. 2013
		Tuvans	Northern Eurasia	Southern Siberia	95	20.00%	Ilumae et al. 2016
		Chelkans	Northern Eurasia	Altai Republic	25	20.00%	Dulik et al. 2012
		Tuvans	Northern Eurasia	Southern Siberia	134	18.66%	Derenko et al. 2007
		Tatars	Northern Eurasia	Western Siberia	221	17.19%	Ilumae et al. 2016
		Khakas	Northern Eurasia	Altai-Sayan Region	176	17.05%	Gubina et al. 2013
		Khakas	Northern Eurasia	Southern Siberia	174	16.67%	Rootsi et al. 2007; Ilumae et al. 2016
		Shors	Northern Eurasia	Southern Siberia	38	15.79%	Derenko et al. 2007

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-P43 Freq	References
		Dolgan	Northern Eurasia	Northwestern Siberia	67	11.94%	Karafet et al. 2002; Rootsi et al. 2007
		Yakuts	Northern Eurasia	Central Siberia, Sakha Republic	65	10.77%	Fedorova et al. 2013; Ilumae et al. 2016
		Altai (Altaians, Altay)	Northern Eurasia	Altai-Sayan Region	59	10.17%	Gubina et al. 2013
Uralic							
	Finnic						
		Veps	Baltic	Russia	40	17.50%	Rootsi et al. 2007; Ilumae et al. 2016
	Mari						
		Mari	Eastern Europe	Volga-Uralic	51	15.69%	Rootsi et al. 2007; Ilumae et al. 2016
	Permian						
		Udmurts	Eastern Europe	Volga-Uralic, Udmurtia	54	11.11%	Rootsi et al. 2007; Ilumae et al. 2016
		Komi	Northern Eurasia	Northwestern Siberia	28	35.71%	Karafet et al. 2002; Rootsi et al. 2007
		Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	35.29%	Ilumae et al. 2016
		Komi (Izhemsky distr.)	Northern Eurasia	Komi Republic, Russia	30	16.67%	Ilumae et al. 2016
		Komi	Northern Eurasia	Izhevsk, Russia	54	16.67%	Mirabal et al. 2009
		Komi	Northern Eurasia	Priluzski, Russia	49	14.29%	Mirabal et al. 2009
	Samoyed						
		Nganasans	Northern Eurasia	Northwestern Siberia	38	92.11%	Karafet et al. 2002; Rootsi et al. 2007

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-P43 Freq	References
Uralic		Nenets (Tundra)	Northern Eurasia	Northwestern Siberia	59	74.58%	Karafet et al. 2002; Rootsi et al. 2007
		Nenets	Northern Eurasia	Western Siberia	42	69.05%	Ilumae et al. 2016
		Nganasans	Northern Eurasia	Western Siberia	50	54.00%	Ilumae et al. 2016
		Nenets (Forest)	Northern Eurasia	Northwestern Siberia	89	44.94%	Karafet et al. 2002; Rootsi et al. 2007
		Khanty	Northern Eurasia	Siberia	27	77.78%	Mirabal et al. 2009
		Mansi	Northern Eurasia	Lower Ob River Valley, Russia	25	60.00%	Pimenoff et al. 2008
		Khanty	Northern Eurasia	Northwestern Siberia	57	52.63%	Rootsi et al. 2007
		Khanty	Northern Eurasia	Northwestern Siberia	47	38.30%	Karafet et al. 2002; Rootsi et al. 2007
		Khanty and Mansi	Northern Eurasia	Western Siberia	63	26.98%	Ilumae et al. 2016
		Khanty	Northern Eurasia	Lower Ob River Valley, Russia	28	25.00%	Pimenoff et al. 2008

Supplementary Table 14.20. Survey of Populations with the N1a1-M46/Tat Mutation (Language View).

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
Chukotko-Kamchatkan		Chukchi	Northern Eurasia	Eastern Siberia	46	54.35%	Ilumae et al. 2016
		Chukchi	Northern Eurasia	Eastern Siberia	56	53.57%	Kharkov 2005; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Northeastern Siberia	12	33.33%	Karafet et al. 2002; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Southern Siberia	16	25.00%	Derenko et al. 2007
		Koryaks	Northern Eurasia	Eastern Siberia	36	22.22%	Kharkov 2005; Rootsi et al. 2007
		Koryaks	Northern Eurasia	Eastern Siberia	9	22.22%	Ilumae et al. 2016
Eskimo-Aleut		Yupik	Northern Eurasia	Northeastern Siberia	22	54.55%	Karafet et al. 2002; Rootsi et al. 2007
		Yupik	Northern Eurasia	Eastern Siberia	17	35.29%	Ilumae et al. 2016
Indo-European	Baltic	Lithuanians	Baltic	Lithuania	164	43.90%	Lappalainen et al. 2008
	Baltic	Latvians	Baltic	Latvia	86	41.86%	Tambets et al. 2004; Ilumae et al. 2016
	Baltic	Latvians	Baltic	Latvia	113	41.59%	Lappalainen et al. 2008
	Baltic	Lithuanians	Baltic	Lithuania	111	40.54%	Ilumae et al. 2016
	Baltic	Lithuanians	Baltic	Lithuania	196	36.73%	Kasperavičiūtė et al. 2004

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
	Germanic	Swedes	Scandinavia	Sweden	160	14.38%	Lappalainen et al. 2008
	Slavic	Russians	Baltic	Arkhangelsk Oblast, Russia	42	28.57%	Fechner et al. 2008
	Slavic	Russians	Baltic	Archangelsk, Russia	28	28.57%	Mirabal et al. 2009
	Slavic	Russians	Baltic	Archangelsk, Russia	106	15.09%	Balanovsky et al. 2008; Ilumae et al. 2016
	Slavic	Russians	Eastern Europe	Pskov	40	35.00%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Novgorod Oblast	40	27.50%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Ivanovo Oblast	40	22.50%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Oryol, Russia	36	19.44%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Pskov	132	18.18%	Balanovsky et al. 2008; Ilumae et al. 2016
	Slavic	Russians	Eastern Europe	Smolensk Oblast	43	16.28%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Bryansk Oblast	43	16.28%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Vologda Oblast	40	15.00%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Volot, Russia	40	15.00%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Nizhni Novgorod, Russia	58	13.79%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Veliki Novgorod, Russia	37	13.51%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Tver, Russia	38	13.16%	Mirabal et al. 2009
	Slavic	Russians	Eastern Europe	Kursk, Russia	40	12.50%	Mirabal et al. 2009
	Slavic	Russians	Eastern Europe	Oryol Oblast	42	11.90%	Fechner et al. 2008
	Slavic	Russians	Eastern Europe	Vladimir	51	11.76%	Malyarchuk and Derenko 2008
	Slavic	Russians	Eastern Europe	Tula, Russia	43	11.63%	Malyarchuk and Derenko 2008

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
	Slavic	Russians	Eastern Europe	Belgorod	143	11.19%	Balanovsky et al. 2008; Ilumae et al. 2016
	Slavic	Russians	Eastern Europe	Lipetsk Oblast	47	10.64%	Fechner et al. 2008
Mongolic							
		Mongols (Buriyad)	East Asia	Hulunbuir Region	53	60.38%	Hu et al. 2015
		Mongols (Bargod)	East Asia	Hulunbuir Region	23	13.04%	Hu et al. 2015
		Mongols	East Asia	Northwestern Mongolia	97	12.37%	Di Cristofaro et al. 2013
		Mongols	East Asia	Northeastern Mongolia	20	10.00%	Di Cristofaro et al. 2013
		Kalmyks	Eastern Europe	Kalmyk Republic	426	10.09%	Malyarchuk et al. 2013
		Buryats	Northern Eurasia	Republic of Buryatia, Russia	298	47.65%	Kharkov et al. 2014
		Buryats	Northern Eurasia	Buryat Republic	111	41.44%	Ilumae et al. 2016
		Buryats	Northern Eurasia	Southern Siberia	217	18.43%	Derenko et al. 2007
Sino-Tibetan							
	Tibeto-Burman	Horpa (Daofu)	East Asia	Sichuan Province, China	16	12.50%	Wang et al. 2014
Tungusic							
		Evenks	Northern Eurasia	Central Siberia, Sakha Republic	57	49.12%	Fedorova et al. 2013; Ilumae et al. 2016
		Even	Northern Eurasia	Sakha Republic	46	47.83%	Pakendorf et al. 2007
		Nanai (Hezhe)	Northern Eurasia	Eastern Siberia	130	44.62%	Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
Turkic		Even	Northern Eurasia	Central Siberia, Sakha Republic	24	37.50%	Fedorova et al. 2013; Ilumae et al. 2016
		Nogais	Caucasus	Caucasus	119	11.76%	Ilumae et al. 2016
		Kazakh (Shymkent)	Central Asia	Kazakhstan	55	16.36%	Zhabagin et al. 2017
		Chuvash	Eastern Europe	Volga-Uralic, Chuvash Republic	114	22.81%	Rootsi et al. 2007; Ilumae et al. 2016
		Yakuts (Vilyuy)	Northern Eurasia	Central Siberia, Sakha Republic	59	91.53%	Fedorova et al. 2013; Ilumae et al. 2016
		Yakuts	Northern Eurasia	Siberia	121	89.26%	Kharkov 2005; Rootsi et al. 2007
		Yakuts (Central)	Northern Eurasia	Central Siberia, Sakha Republic	92	85.87%	Fedorova et al. 2013; Ilumae et al. 2016
		Yakuts	Northern Eurasia	Central Siberia, Sakha Republic	65	70.77%	Fedorova et al. 2013; Ilumae et al. 2016
		Shors	Northern Eurasia	Altai-Sayan Region	21	61.90%	Gubina et al. 2013
		Dolgan (Yakutia)	Northern Eurasia	Central Siberia, Sakha Republic	10	50.00%	Fedorova et al. 2013; Ilumae et al. 2016
		Shors	Northern Eurasia	Southern Siberia	23	30.43%	Rootsi et al. 2007; Ilumae et al. 2016
		Khakas	Northern Eurasia	Altai-Sayan Region	176	28.98%	Gubina et al. 2013
		Tofalars	Northern Eurasia	Southern Siberia	30	26.67%	Derenko et al. 2007
		Khakas	Northern Eurasia	Southern Siberia	174	24.71%	Rootsi et al. 2007; Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
		Dolgan	Northern Eurasia	Northwestern Siberia	67	22.39%	Karafet et al. 2002; Rootsi et al. 2007
		Tuvans	Northern Eurasia	Altai-Sayan Region	102	20.59%	Gubina et al. 2013
		Altai (Altaians, Altay)	Northern Eurasia	Altai-Sayan Region	59	20.34%	Gubina et al. 2013
		Altai (Altaians, Altay)	Northern Eurasia	Altai Republic	61	19.67%	Ilumae et al. 2016
		Tuvans	Northern Eurasia	Tuva Republic	419	18.38%	Kharkov et al. 2013
		Khakas	Northern Eurasia	Southern Siberia	64	15.63%	Derenko et al. 2007
		Tuvans	Northern Eurasia	Southern Siberia	95	13.68%	Ilumae et al. 2016
		Dolgan (Taymyr)	Northern Eurasia	Northern Siberia, Taymyr Peninsula	54	12.96%	Fedorova et al. 2013; Ilumae et al. 2016
		Sojot	Northern Eurasia	Southern Siberia	28	10.71%	Derenko et al. 2007
		Tuvans	Northern Eurasia	Southern Siberia	134	10.45%	Derenko et al. 2007
Uralic							
	Finnic	Karelians	Baltic	Karelia Republic, Russia	132	53.03%	Lappalainen et al. 2008
	Finnic	Estonians	Baltic	Estonia	119	33.61%	Lappalainen et al. 2008
	Finnic	Estonians	Baltic	Estonia	235	27.66%	Rootsi et al. 2007; Ilumae et al. 2016
	Finnic	Karelians	Baltic	Russia	139	16.55%	Rootsi et al. 2007; Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
	Finnic	Finns	Scandinavia	Finland	536	58.21%	Lappalainen et al. 2008
	Finnic	Finns	Scandinavia	Finland	39	12.82%	Altshuler et al. 2010; Ilumae et al. 2016
	Mari	Mari	Eastern Europe	Volga-Uralic	51	25.49%	Rootsi et al. 2007; Ilumae et al. 2016
	Mordvin	Mordvins (Pop 2)	Eastern Europe	Republic of Mordovia	203	11.33%	Ilumae et al. 2016
	Permian	Udmurts	Eastern Europe	Volga-Uralic, Udmurtia	54	66.67%	Rootsi et al. 2007; Ilumae et al. 2016
	Permian	Komi	Northern Eurasia	Izhevsk, Russia	54	51.85%	Mirabal et al. 2009
	Permian	Komi	Northern Eurasia	Northwestern Siberia	28	50.00%	Karafet et al. 2002; Rootsi et al. 2007
	Permian	Komi	Northern Eurasia	Priluzski, Russia	49	46.94%	Mirabal et al. 2009
	Permian	Komi (Izhemsky distr.)	Northern Eurasia	Komi Republic, Russia	30	43.33%	Ilumae et al. 2016
	Permian	Komi (Syktyk distr.)	Northern Eurasia	Komi Republic, Russia	17	29.41%	Ilumae et al. 2016
	Permian	Komi (Permians)	Northern Eurasia	Komi Republic, Russia	60	18.33%	Ilumae et al. 2016
	Sami	Sami (Saami)	Baltic	Kola Peninsula, Russia	23	39.13%	Tambets et al. 2004
	Sami	Sami (Saami)	Scandinavia	Finland	69	55.07%	Tambets et al. 2004
	Sami	Sami (Saami)	Scandinavia	Sweden	38	44.74%	Karlsson et al. 2006
	Sami	Sami (Saami)	Scandinavia	Sweden	35	17.14%	Tambets et al. 2004; Ilumae et al. 2016

Family	Sub Fam 1	Population	Region	Location	Sample Size	N-M46/Tat Freq	References
	Samoyed	Nenets (Forest)	Northern Eurasia	Northwestern Siberia	89	51.69%	Karafet et al. 2002; Rootsi et al. 2007
	Samoyed	Nenets (Tundra)	Northern Eurasia	Northwestern Siberia	59	23.73%	Karafet et al. 2002; Rootsi et al. 2007
	Samoyed	Nenets	Northern Eurasia	Western Siberia	42	14.29%	Ilumae et al. 2016
	Uralic	Khanty	Northern Eurasia	Lower Ob River Valley, Russia	28	64.29%	Pimenoff et al. 2008
	Uralic	Khanty and Mansi	Northern Eurasia	Western Siberia	63	42.86%	Ilumae et al. 2016
	Uralic	Khanty	Northern Eurasia	Northwestern Siberia	47	38.30%	Karafet et al. 2002; Rootsi et al. 2007
	Uralic	Khanty	Northern Eurasia	Northwestern Siberia	57	26.32%	Rootsi et al. 2007
	Uralic	Mansi	Northern Eurasia	Lower Ob River Valley, Russia	25	16.00%	Pimenoff et al. 2008
Yukaghir		Yukaghirs	Northern Eurasia	Central Siberia, Sakha Republic	11	27.27%	Fedorova et al. 2013; Ilumae et al. 2016

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Supplementary Tables for Chapter 15 and Haplogroup O-M175

Supplementary Table 15.1. Survey of O-M175 Populations (Regional View).

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Central Asia	Uzbekistan-Tashkent	Dungan	Chinese		31	45%	Zhabagin et al. 2017
Central Asia	Uzbekistan-Fergana Region	Uzbek	Turkic		67	13%	Zhabagin et al. 2017
East Asia	Laos	Suy	Austro-Asiatic	Mon-Khmer	39	100%	Cai et al. 2011
East Asia	Southern China	Palyu	Austro-Asiatic	Mon-Khmer	30	100%	Cai et al. 2011
East Asia	Laos	Oy	Austro-Asiatic	Mon-Khmer	50	100%	Cai et al. 2011
East Asia	Salavan, Laos	Suy	Austro-Asiatic	Mon-Khmer	39	100%	Wang et al. 2013
East Asia	Laos	Mal	Austro-Asiatic	Mon-Khmer	50	100%	Cai et al. 2011
East Asia	Laos	Katu	Austro-Asiatic	Mon-Khmer	45	100%	Cai et al. 2011
East Asia	Salavan, Laos	Inh	Austro-Asiatic	Mon-Khmer	34	100%	Wang et al. 2013
East Asia	Laos	Jeh	Austro-Asiatic	Mon-Khmer	32	100%	Cai et al. 2011
East Asia	Laos	Inh	Austro-Asiatic	Mon-Khmer	34	100%	Cai et al. 2011
East Asia	Laos	Aheu	Austro-Asiatic	Mon-Khmer	38	97%	Cai et al. 2011
East Asia	Laos	Kataang	Austro-Asiatic	Mon-Khmer	38	97%	Cai et al. 2011
East Asia	Vietnam	Talieng	Austro-Asiatic	Mon-Khmer	35	97%	Cai et al. 2011
East Asia	Laos	Ngeq	Austro-Asiatic	Mon-Khmer	35	97%	Cai et al. 2011
East Asia	Southern China	Bugan	Austro-Asiatic	Mon-Khmer	32	97%	Cai et al. 2011
East Asia	Laos	Brau	Austro-Asiatic	Mon-Khmer	32	97%	Cai et al. 2011
East Asia	Laos	Alak	Austro-Asiatic	Mon-Khmer	31	97%	Cai et al. 2011
East Asia	Laos	Xinhmul	Austro-Asiatic	Mon-Khmer	29	97%	Cai et al. 2011
East Asia	Khamkheut, Laos	Bo	Austro-Asiatic	Mon-Khmer	29	97%	Wang et al. 2013
East Asia	Southern China	Bit	Austro-Asiatic	Mon-Khmer	28	96%	Cai et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Laos	Bo	Austro-Asiatic	Mon-Khmer	28	96%	Cai et al. 2011
East Asia	Salavan, Laos	Kataang	Austro-Asiatic	Mon-Khmer	38	95%	Wang et al. 2013
East Asia	Laos	Lamet	Austro-Asiatic	Mon-Khmer	35	94%	Cai et al. 2011
East Asia	Guangxi, China	Bolyu	Austro-Asiatic	Mon-Khmer	30	93%	Li et al. 2008b
East Asia	Guangxi, China	Gin (Jing)	Austro-Asiatic	Mon-Khmer	45	91%	Zhong et al. 2011
East Asia	Laos	Khmu	Austro-Asiatic	Mon-Khmer	51	90%	Cai et al. 2011
East Asia	Xam-Tai, Laos	Ksingmul	Austro-Asiatic	Mon-Khmer	29	90%	Wang et al. 2013
East Asia	Laos	Sô	Austro-Asiatic	Mon-Khmer	50	88%	Cai et al. 2011
East Asia	Boualapha, Laos	Sô	Austro-Asiatic	Mon-Khmer	50	88%	Wang et al. 2013
East Asia	Southern China	Ava	Austro-Asiatic	Mon-Khmer	29	86%	Cai et al. 2011
East Asia	Vietnam	Vietnamese	Austro-Asiatic	Mon-Khmer	76	83%	He et al. 2012
East Asia	Yunnan, China	Palaung (De'ang)	Austro-Asiatic	Mon-Khmer	28	82%	Zhong et al. 2011
East Asia	Khamkheut, Laos	Aheu	Austro-Asiatic	Mon-Khmer	37	81%	Wang et al. 2013
East Asia	Laos	Laven	Austro-Asiatic	Mon-Khmer	50	80%	Cai et al. 2011
East Asia	Laos	Blang	Austro-Asiatic	Mon-Khmer	52	79%	Cai et al. 2011
East Asia	Vietnam	Vietnamese	Austro-Asiatic	Mon-Khmer	70	79%	Karafet et al. 2010
East Asia	Xaignabouri, Laos	Mal	Austro-Asiatic	Mon-Khmer	50	78%	Wang et al. 2013
East Asia	Northern Thailand	Mon	Austro-Asiatic	Mon-Khmer	18	78%	Brunelli et al. 2017
East Asia	Thateng and Lamam, Laos	Alak	Austro-Asiatic	Mon-Khmer	31	77%	Wang et al. 2013
East Asia	Vietnam	Vietnamese	Austro-Asiatic	Mon-Khmer	48	77%	Kim et al. 2011
East Asia	Thateng, Laos	Katu	Austro-Asiatic	Mon-Khmer	46	76%	Wang et al. 2013
East Asia	Vietnam	Vietnamese	Austro-Asiatic	Mon-Khmer	41	76%	Hong et al. 2006

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Nale, Laos	Lamet	Austro-Asiatic	Mon-Khmer	42	71%	Wang et al. 2013
East Asia	Luang-Prabang, Laos	Khmu	Austro-Asiatic	Mon-Khmer	52	69%	Wang et al. 2013
East Asia	Samakhixai, Laos	Bru (Brao)	Austro-Asiatic	Mon-Khmer	32	69%	Wang et al. 2013
East Asia	Northern Thailand	Lawa	Austro-Asiatic	Mon-Khmer	50	68%	Brunelli et al. 2017
East Asia	Thateng, Laos	Laven	Austro-Asiatic	Mon-Khmer	50	66%	Wang et al. 2013
East Asia	Samakhixai, Laos	Oy	Austro-Asiatic	Mon-Khmer	50	64%	Wang et al. 2013
East Asia	Yunnan, China	Wa	Austro-Asiatic	Mon-Khmer	16	63%	Zhong et al. 2011
East Asia	Louang-Namtha, Laos	Bit	Austro-Asiatic	Mon-Khmer	28	54%	Wang et al. 2013
East Asia	Dakchung and Thateng, Laos	Jeh	Austro-Asiatic	Mon-Khmer	32	53%	Wang et al. 2013
East Asia	Salavan, Laos	Ngeq	Austro-Asiatic	Mon-Khmer	35	49%	Wang et al. 2013
East Asia	Taiwan, China	Rukai	Austronesian	Formosan	11	100%	Li et al. 2008b
East Asia	Taiwan, China	Thao	Austronesian	Formosan	16	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Pazeh	Austronesian	Formosan	40	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Siraya (Tainan)	Austronesian	Formosan	30	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Yunlin	Austronesian	Formosan	21	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Tsou	Austronesian	Formosan	41	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Atayal	Austronesian	Formosan	52	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Taroko	Austronesian	Formosan	20	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Amis	Austronesian	Formosan	28	100%	Li et al. 2008b
East Asia	Taiwan, China	Saisat	Austronesian	Formosan	11	100%	Li et al. 2008b
East Asia	Taiwan, China	Paiwan	Austronesian	Formosan	22	100%	Li et al. 2008b
East Asia	Taiwan, China	Rukai	Austronesian	Formosan	29	100%	Trejaut et al. 2014

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Taiwan, China	Paiwan	Austronesian	Formosan	25	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Puyuma	Austronesian	Formosan	23	100%	Trejaut et al. 2014
East Asia	Taiwan, China	Atayal	Austronesian	Formosan	22	100%	Li et al. 2008b
East Asia	Taiwan, China	Tsou	Austronesian	Formosan	18	100%	Li et al. 2008b
East Asia	Taiwan, China	Bunun	Austronesian	Formosan	56	98%	Trejaut et al. 2014
East Asia	Taiwan, China	Siraya (Hwalien)	Austronesian	Formosan	38	97%	Trejaut et al. 2014
East Asia	Taiwan, China	Siraya (Pingtun)	Austronesian	Formosan	85	96%	Trejaut et al. 2014
East Asia	Taiwan, China	Saisiyat	Austronesian	Formosan	24	96%	Trejaut et al. 2014
East Asia	Taiwan, China	Thao	Austronesian	Formosan	22	95%	Li et al. 2008b
East Asia	Taiwan, China	Amis	Austronesian	Formosan	39	95%	Trejaut et al. 2014
East Asia	Taiwan, China	Siraya Makato	Austronesian	Formosan	37	95%	Li et al. 2008b
East Asia	Taiwan, China	Bunun	Austronesian	Formosan	17	94%	Li et al. 2008b
East Asia	Taiwan, China	Kategalan	Austronesian	Formosan	30	93%	Trejaut et al. 2014
East Asia	Taiwan, China	Pyuma	Austronesian	Formosan	11	91%	Li et al. 2008b
East Asia	Taiwan, China	Siraya (Kaohsiung)	Austronesian	Formosan	40	90%	Trejaut et al. 2014
East Asia	Taiwan, China	Papura	Austronesian	Formosan	18	83%	Trejaut et al. 2014
East Asia	Taiwan, China	Siraya (Tainen Coast)	Austronesian	Formosan	38	82%	Trejaut et al. 2014
East Asia	Taiwan, China	Pazeh	Austronesian	Formosan	21	71%	Li et al. 2008b
East Asia	Vietnam	Cham	Austronesian	Malayo-Polynesian	11	100%	Li et al. 2008b
East Asia	Taiwan, China	Yami	Austronesian	Malayo-Polynesian	30	100%	Trejaut et al. 2014
East Asia	Hainan, China	Tsat	Austronesian	Malayo-Polynesian	31	87%	Li et al. 2008b
East Asia	Indonesia	Indonesians	Austronesian	Malayo-Polynesian	36	86%	Hong et al. 2006

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Hainan Island, China	Utsat	Austronesian	Malayo-Polynesian	72	78%	Li et al. 2013
East Asia	Malaysia	Malaysians	Austronesian	Malayo-Polynesian	32	75%	Karafet et al. 2010
East Asia	Vietnam	Cham	Austronesian	Malayo-Polynesian	59	59%	He et al. 2012
East Asia	Guangxi, China	Han	Chinese		82	100%	Zhao et al. 2010
East Asia	Jiangxi, China	Han	Chinese		26	100%	Zhong et al. 2011
East Asia	Nanning, Guangxi, China	Pinghua	Chinese		38	100%	Lu et al. 2013
East Asia	Chendu, China	Han	Chinese		34	97%	Xue et al. 2006
East Asia	Guangxi, China	Han	Chinese		27	96%	Zhong et al. 2011
East Asia	Tiandong, Guangxi, China	Pinghua	Chinese		20	95%	Lu et al. 2013
East Asia	Pingguo, Guangxi, China	Pinghua	Chinese		123	92%	Lu et al. 2013
East Asia	Guangxi, China	Pinghua	Chinese		101	90%	Gan et al. 2008
East Asia	Shanghai, China	Han	Chinese		39	90%	Wang et al. 2013
East Asia	Taiwan, China	Taiwanese Han	Chinese		352	89%	Trejaut et al. 2014
East Asia	Guangxi, China	Pinghua-Han	Chinese		101	89%	Wang et al. 2013
East Asia	Zhejiang, China	Han	Chinese		70	89%	Wang et al. 2013
East Asia	Jiangxi, China	Han	Chinese		33	88%	Wang et al. 2013
East Asia	Hunan, China	Han	Chinese		24	88%	Wang et al. 2013
East Asia	Anhui, China	Han	Chinese		72	88%	Wang et al. 2013
East Asia	Yunnan, China	Han	Chinese		53	87%	Zhong et al. 2011
East Asia	Guangxi, China	Han	Chinese		59	86%	Wang et al. 2013
East Asia	Chongqing, China	Han	Chinese		43	86%	Zhong et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Hubei, China	Han	Chinese		57	86%	Zhong et al. 2011
East Asia	Meixian, China	Han	Chinese		35	86%	Xue et al. 2006
East Asia	Zhejiang, China	Han	Chinese		55	85%	Zhong et al. 2011
East Asia	Shanghe, Shandong, China	Han	Chinese		48	85%	Wang et al. 2013
East Asia	Guizhou, China	Han	Chinese		107	85%	Zhong et al. 2011
East Asia	Guangdong, China	Han	Chinese		33	85%	Zhong et al. 2011
East Asia	Sichuan, China	Han	Chinese		38	84%	Zhong et al. 2011
East Asia	Jiangsu, China	Han	Chinese		179	82%	Wang et al. 2013
East Asia	Hunan, China	Han	Chinese		38	82%	Zhong et al. 2011
East Asia	China	Han	Chinese		165	81%	Karafet et al. 2010
East Asia	Zhitai, Shandong, China	Han	Chinese		43	79%	Wang et al. 2013
East Asia	Fujian, China	Han	Chinese		43	79%	Zhong et al. 2011
East Asia	Jilin, China	Han	Chinese		33	79%	Zhong et al. 2011
East Asia	Beijing, China	Han	Chinese		51	78%	Kim et al. 2011
East Asia	Lijin, Shandong, China	Han	Chinese		59	78%	Wang et al. 2013
East Asia	Harbin, China	Han	Chinese		35	77%	Xue et al. 2006
East Asia	Feixian, Shandong, China	Han	Chinese		35	77%	Wang et al. 2013
East Asia	Mouping, Shandong, China	Han	Chinese		48	77%	Wang et al. 2013
East Asia	Gaotang, Shandong, China	Han	Chinese		29	76%	Wang et al. 2013
East Asia	Sichuan, China	Han	Chinese		137	75%	Wang et al. 2013

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Dongming, Shandong, China	Han	Chinese		40	75%	Wang et al. 2013
East Asia	Henan, China	Han	Chinese		27	74%	Wang et al. 2013
East Asia	Guangrao, Shandong, China	Han	Chinese		23	74%	Wang et al. 2013
East Asia	Jiangsu, China	Han	Chinese		38	74%	Zhong et al. 2011
East Asia	Heilongjiang, China	Han	Chinese		67	73%	Zhong et al. 2011
East Asia	Dezhou, Shandong, China	Han	Chinese		51	73%	Wang et al. 2013
East Asia	Beijing	Han	Chinese		65	72%	Hong et al. 2006
East Asia	Linshu, Shandong, China	Han	Chinese		53	72%	Wang et al. 2013
East Asia	Yiyuan, Shandong, China	Han	Chinese		28	71%	Wang et al. 2013
East Asia	Cangshan, Shandong, China	Han	Chinese		52	71%	Wang et al. 2013
East Asia	Shandong, China	Han	Chinese		52	71%	Zhong et al. 2011
East Asia	Shandong, China	Han	Chinese		54	70%	Wang et al. 2013
East Asia	Gansu, China	Han	Chinese		49	69%	Zhong et al. 2011
East Asia	Yili, China	Han	Chinese		32	69%	Xue et al. 2006
East Asia	Penglai, Shandong, China	Han	Chinese		87	67%	Wang et al. 2013
East Asia	Zhangqiu, Shandong, China	Han	Chinese		48	67%	Wang et al. 2013
East Asia	Yanzhou, Shandong, China	Han	Chinese		24	67%	Wang et al. 2013
East Asia	Yunnan	Han	Chinese		41	66%	Hong et al. 2006

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Anhui, China	Han	Chinese		52	65%	Zhong et al. 2011
East Asia	Longnan, Gansu, China	Han	Chinese		121	65%	Wang et al. 2013
East Asia	Henan, China	Han	Chinese		45	64%	Zhong et al. 2011
East Asia	Qingyang, Gansu, China	Han	Chinese		61	64%	Wang et al. 2013
East Asia	Jilin, China	Han	Chinese		36	64%	Wang et al. 2013
East Asia	Qingzhou, Shandong, China	Han	Chinese		22	64%	Wang et al. 2013
East Asia	Lanzhou, Gansu, China	Han	Chinese		100	63%	Wang et al. 2013
East Asia	Liaoning, China	Han	Chinese		40	63%	Zhong et al. 2011
East Asia	Pingliang, Gansu, China	Han	Chinese		203	62%	Wang et al. 2013
East Asia	Dingxi, Gansu, China	Han	Chinese		166	61%	Wang et al. 2013
East Asia	Tianshui, Gansu, China	Han	Chinese		353	61%	Wang et al. 2013
East Asia	Ningjin, Shandong, China	Han	Chinese		45	60%	Wang et al. 2013
East Asia	Qihe, Shandong, China	Han	Chinese		25	60%	Wang et al. 2013
East Asia	Zhanhua, Shandong, China	Han	Chinese		30	60%	Wang et al. 2013
East Asia	Baiyin, Gansu, China	Han	Chinese		101	57%	Wang et al. 2013
East Asia	Zoucheng, Shandong, China	Han	Chinese		32	56%	Wang et al. 2013
East Asia	Heilongjiang, China	Han	Chinese		41	54%	Wang et al. 2013

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Rizhao, Shandong, China	Han	Chinese		33	52%	Wang et al. 2013
East Asia	Lanzhou, China	Han	Chinese		30	50%	Xue et al. 2006
East Asia	Wuwei, Gansu, China	Han	Chinese		64	48%	Wang et al. 2013
East Asia	Shanxi, China	Han	Chinese		56	48%	Zhong et al. 2011
East Asia	Ningxia, China	Hui	Chinese		62	35%	Zhong et al. 2011
East Asia	Central China	Hui	Chinese		35	29%	Xue et al. 2006
East Asia	Hainan, China	Miao	Hmong-Mien	Hmongic	20	100%	Zhong et al. 2011
East Asia	Southern China	Bunu (Southern)	Hmong-Mien	Hmongic	20	95%	Cai et al. 2011
East Asia	Guizhou, China	Miao	Hmong-Mien	Hmongic	45	93%	Zhong et al. 2011
East Asia	China	Miao	Hmong-Mien	Hmongic	58	86%	Karafet et al. 2010
East Asia	Southern China	Miao (Guizhou)	Hmong-Mien	Hmongic	49	86%	Cai et al. 2011
East Asia	Southern China	Miao (Yunnan)	Hmong-Mien	Hmongic	49	86%	Cai et al. 2011
East Asia	Southern China	Pa Then	Hmong-Mien	Hmongic	31	81%	Cai et al. 2011
East Asia	Southern China	Miao (Hunan)	Hmong-Mien	Hmongic	100	74%	Cai et al. 2011
East Asia	Southern China	Hmong (Daw)	Hmong-Mien	Hmongic	51	59%	Cai et al. 2011
East Asia	Luang-Prabang, Laos	Hmong White	Hmong-Mien	Hmongic	27	19%	Wang et al. 2013
East Asia	Xam-Tai, Laos	Hmong	Hmong-Mien	Hmongic	17	12%	Wang et al. 2013
East Asia	China	She	Hmong-Mien	Ho Nte	51	100%	Karafet et al. 2010
East Asia	Southeastern China	She	Hmong-Mien	Ho Nte	34	97%	Xue et al. 2006
East Asia	Fujian, China	She	Hmong-Mien	Ho Nte	45	93%	Zhong et al. 2011
East Asia	Southern China	She (Northern)	Hmong-Mien	Ho The	56	88%	Cai et al. 2011
East Asia	Southern China	Mien (Northern)	Hmong-Mien	Mienic	33	97%	Cai et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Southern China	Kimmun (Mountain)	Hmong-Mien	Mienic	32	97%	Cai et al. 2011
East Asia	Southern China	Kimmun (Blue)	Hmong-Mien	Mienic	28	96%	Cai et al. 2011
East Asia	Guangdong, China	Yao	Hmong-Mien	Mienic	27	96%	Zhong et al. 2011
East Asia	Southern China	Yao (Liannan)	Hmong-Mien	Mienic	35	94%	Xue et al. 2006
East Asia	Southern China	Zaomin	Hmong-Mien	Mienic	37	92%	Cai et al. 2011
East Asia	Southern China	Mien (Southern)	Hmong-Mien	Mienic	31	90%	Cai et al. 2011
East Asia	Southern China	Mien (Straggler)	Hmong-Mien	Mienic	20	90%	Cai et al. 2011
East Asia	Southern China	Mien (Native)	Hmong-Mien	Mienic	41	88%	Cai et al. 2011
East Asia	Southern China	Mien (Western)	Hmong-Mien	Mienic	47	87%	Cai et al. 2011
East Asia	Southern China	Kimmun (Lowland)	Hmong-Mien	Mienic	41	83%	Cai et al. 2011
East Asia	Guangxi, China	Yao	Hmong-Mien	Mienic	55	80%	Zhong et al. 2011
East Asia	China	Yao	Hmong-Mien	Mienic	60	78%	Karafet et al. 2010
East Asia	Southern China	Yao (Bama)	Hmong-Mien	Mienic	35	77%	Xue et al. 2006
East Asia	Southern China	Yao (Lowland)	Hmong-Mien	Mienic	31	74%	Cai et al. 2011
East Asia	Guangxi, China	Mien	Hmong-Mien	Mienic	11	36%	Wang et al. 2013
East Asia	Japan	Japanese	Japonic		157	56%	Kim et al. 2011
East Asia	Japan	Japanese	Japonic		107	54%	Hong et al. 2006
East Asia	Japan	Japanese	Japonic		2390	54%	Sato et al. 2014
East Asia	Japan	Japanese	Japonic		263	53%	Naitoh et al. 2013
East Asia	Korea	Koreans	Koreanic		706	79%	Kwon et al. 2015
East Asia	Korea	Koreans	Koreanic		706	77%	Park et al. 2012
East Asia	Korea	Koreans	Koreanic		506	76%	Kim et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Korea	Koreans	Koreanic		154	75%	Hong et al. 2006
East Asia	Jilin, Dunhua, China	Koreans	Koreanic		203	52%	Wang et al. 2013
East Asia	Inner Mongolia, Chifeng, China	Mongols	Mongolic		76	55%	Wang et al. 2013
East Asia	Northeastern China	Daur	Mongolic		39	54%	Xue et al. 2006
East Asia	Mongolia	Khalkh	Mongolic		45	42%	Kim et al. 2011
East Asia	Northwest China	Bonan	Mongolic		27	41%	Shou et al. 2010
East Asia	Northwest China	Monguor (Tu)	Mongolic		50	40%	Shou et al. 2010
East Asia	Northwest China	Mongols	Mongolic		50	38%	Shou et al. 2010
East Asia	Mongolia	Buryats	Mongolic		36	36%	Kim et al. 2011
East Asia	Mongolia	Khalkh	Mongolic		48	25%	Hong et al. 2006
East Asia	Mongolia	Buryat	Mongolic		50	20%	Hong et al. 2006
East Asia	Northwest China	Yugur	Mongolic		32	19%	Shou et al. 2010
East Asia	Qinghai, Huzhu, China	Monguor (Tu)	Mongolic		126	18%	Wang et al. 2013
East Asia	Inner Mongolia	Mongols	Mongolic		22	18%	Zhong et al. 2011
East Asia	Mongolia	Mongols	Mongolic		160	15%	Di Cristofaro et al. 2013
East Asia	Northwest China	Dongxiang	Mongolic		35	11%	Shou et al. 2010
East Asia	Southern China	Li (Hlai)	Tai-Kadai	Hlai	34	100%	Xue et al. 2006
East Asia	Hainan, China	Li (Hlai)	Tai-Kadai	Hlai	26	100%	Zhong et al. 2011
East Asia	Hainan, China	Jiamao	Tai-Kadai	Hlai	27	100%	Li et al. 2008b
East Asia	Hainan, China	Hlai	Tai-Kadai	Hlai	34	97%	Li et al. 2008b
East Asia	Guizhou, China	Li (Hlai)	Tai-Kadai	Hlai	14	79%	Zhong et al. 2011
East Asia	Boualapha, Laos	Phu Thai	Tai-Kadai	Kam-Tai	24	100%	Wang et al. 2013

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Guangxi, China	Zhuang	Tai-Kadai	Kam-Tai	22	100%	Li et al. 2008b
East Asia	Khamkheut, Laos	Tai Mène	Tai-Kadai	Kam-Tai	24	100%	Wang et al. 2013
East Asia	Vientiane, Laos	Lao	Tai-Kadai	Kam-Tai	59	98%	Wang et al. 2013
East Asia	Hainan, China	Lingao	Tai-Kadai	Kam-Tai	30	97%	Li et al. 2008b
East Asia	Guizhou, China	Bouyei (Buyi)	Tai-Kadai	Kam-Tai	54	94%	Zhong et al. 2011
East Asia	Guangxi, China	Dong	Tai-Kadai	Kam-Tai	17	94%	Zhong et al. 2011
East Asia	Northern Thailand	Lue	Tai-Kadai	Kam-Tai	91	93%	Brunelli et al. 2017
East Asia	Guizhou, China	Then	Tai-Kadai	Kam-Tai	30	93%	Li et al. 2008b
East Asia	Guizhou, China	Maonan	Tai-Kadai	Kam-Tai	15	93%	Zhong et al. 2011
East Asia	Northern Thailand	Yong	Tai-Kadai	Kam-Tai	26	92%	Brunelli et al. 2017
East Asia	Guangdong, China	Biao	Tai-Kadai	Kam-Tai	34	91%	Li et al. 2008b
East Asia	Guangxi, China	Cao Miao	Tai-Kadai	Kam-Tai	33	91%	Li et al. 2008b
East Asia	Northern Thailand	Khon Muang	Tai-Kadai	Kam-Tai	191	91%	Brunelli et al. 2017
East Asia	Guangxi, China	Zhuang	Tai-Kadai	Kam-Tai	61	90%	Zhong et al. 2011
East Asia	Northern Thailand	Shan	Tai-Kadai	Kam-Tai	20	90%	Brunelli et al. 2017
East Asia	Southern China	Bouyei (Buyi)	Tai-Kadai	Kam-Tai	35	89%	Xue et al. 2006
East Asia	Xam-Tai, Laos	Tai Dam	Tai-Kadai	Kam-Tai	50	88%	Wang et al. 2013
East Asia	Xaignabouri, Laos	Rien	Tai-Kadai	Kam-Tai	49	88%	Wang et al. 2013
East Asia	Guangxi, China	Zhuang	Tai-Kadai	Kam-Tai	39	87%	Chen et al. 2006
East Asia	Thailand	Thai	Tai-Kadai	Kam-Tai	50	86%	Hong et al. 2006
East Asia	Thailand	Thai	Tai-Kadai	Kam-Tai	40	85%	Kim et al. 2011
East Asia	Yunnan, China	Dai	Tai-Kadai	Kam-Tai	18	83%	Zhong et al. 2011
East Asia	Guangxi, China	Sui (Shui)	Tai-Kadai	Kam-Tai	50	82%	Li et al. 2008b

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Guangxi, China	Mulam	Tai-Kadai	Kam-Tai	11	82%	Gan et al. 2008
East Asia	Laos	Lao	Tai-Kadai	Kam-Tai	25	80%	He et al. 2012
East Asia	Guangxi, China	Man-Caolan	Tai-Kadai	Kam-Tai	30	80%	Li et al. 2008b
East Asia	Huaphuan, Laos	Tai Deang	Tai-Kadai	Kam-Tai	48	79%	Wang et al. 2013
East Asia	Northern Thailand	Yuan	Tai-Kadai	Kam-Tai	85	78%	Brunelli et al. 2017
East Asia	Guangxi, China	Mulam	Tai-Kadai	Kam-Tai	51	76%	Deng et al. 2013
East Asia	Guangxi, China	Zhuang	Tai-Kadai	Kam-Tai	21	76%	Gan et al. 2008
East Asia	Northern Thailand	Kuen	Tai-Kadai	Kam-Tai	24	75%	Brunelli et al. 2017
East Asia	Guangxi, China	Dong	Tai-Kadai	Kam-Tai	38	74%	Li et al. 2008b
East Asia	Guangxi, China	Mulam	Tai-Kadai	Kam-Tai	40	73%	Li et al. 2008b
East Asia	Guizhou, China	Sui (Shui)	Tai-Kadai	Kam-Tai	29	72%	Zhong et al. 2011
East Asia	Guangxi, China	Kam	Tai-Kadai	Kam-Tai	27	70%	Wang et al. 2013
East Asia	Guangxi, China	Zhuang	Tai-Kadai	Kam-Tai	63	70%	Zhao et al. 2010
East Asia	Hunan, China	Dong	Tai-Kadai	Kam-Tai	45	67%	Zhong et al. 2011
East Asia	Guangxi, China	Maonan	Tai-Kadai	Kam-Tai	32	66%	Li et al. 2008b
East Asia	Guangxi, China	Chadong	Tai-Kadai	Kam-Tai	21	62%	Deng et al. 2013
East Asia	Boualapha, Laos	Saek	Tai-Kadai	Kam-Tai	35	60%	Wang et al. 2013
East Asia	Xiang-Khuoang, Laos	Phuan	Tai-Kadai	Kam-Tai	22	59%	Wang et al. 2013
East Asia	Northern Thailand	Thai	Tai-Kadai	Kam-Tai	17	59%	He et al. 2012
East Asia	Guangxi, China	Zhuang-GB	Tai-Kadai	Kam-Tai	21	52%	Wang et al. 2013
East Asia	Guangxi, China	Laka	Tai-Kadai	Kam-Tai	23	39%	Gan et al. 2008
East Asia	Xam-Tai and Xam Nua, Laos	Kang	Tai-Kadai	Kam-Tai	12	33%	Wang et al. 2013

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Guangxi, China	Yerong	Tai-Kadai	Kra	16	100%	Li et al. 2008b
East Asia	Yunnan, China	Laqua	Tai-Kadai	Kra	25	100%	Li et al. 2008b
East Asia	Yunnan, China	White Gelao	Tai-Kadai	Kra	14	100%	Li et al. 2008b
East Asia	Guizhou, China	Red Gelao	Tai-Kadai	Kra	31	90%	Li et al. 2008b
East Asia	Hainan, China	Cun	Tai-Kadai	Kra	31	90%	Li et al. 2008b
East Asia	Guizhou, China	Mollao	Tai-Kadai	Kra	30	87%	Li et al. 2008b
East Asia	Guangxi, China	Blue Gelao	Tai-Kadai	Kra	30	83%	Li et al. 2008b
East Asia	Guizhou, China	Gelao	Tai-Kadai	Kra	21	81%	Zhong et al. 2011
East Asia	Guizhou, China	Qau	Tai-Kadai	Kra	13	77%	Li et al. 2008b
East Asia	Hainan, China	Gelong	Tai-Kadai	Kra	79	76%	Li et al. 2010
East Asia	Yunnan, China	Lachi	Tai-Kadai	Kra	30	67%	Li et al. 2008b
East Asia	Yunnan, China	Buyang	Tai-Kadai	Kra	32	53%	Li et al. 2008b
East Asia	Tibet	Deng	Tibeto-Burman	Central Tibeto-Burman	90	96%	Kang et al. 2012
East Asia	Tibet, Shannan, China	Tibetans	Tibeto-Burman	Central Tibeto-Burman	251	47%	Wang et al. 2013
East Asia	Tibet, Nagqu, China	Tibetans	Tibeto-Burman	Central Tibeto-Burman	258	45%	Wang et al. 2013
East Asia	Tibet, Lhasa, China	Tibetans	Tibeto-Burman	Central Tibeto-Burman	278	33%	Wang et al. 2013
East Asia	Qinghai, Xi'ning, China	Tibetans	Tibeto-Burman	Central Tibeto-Burman	128	28%	Wang et al. 2013
East Asia	Zhangye, Gansu, China	Tibetan Amdo	Tibeto-Burman	Central Tibeto-Burman	265	22%	Wang et al. 2013
East Asia	Louang-Namtha, Laos	Phunoi	Tibeto-Burman	Ngwi-Burmese	27	93%	Wang et al. 2013
East Asia	Yunnan, China	Yi (Yizu)	Tibeto-Burman	Ngwi-Burmese	27	74%	Zhong et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Sichuan, China	Yi (Yizu)	Tibeto-Burman	Ngwi-Burmese	24	67%	Zhong et al. 2011
East Asia	Southern China	Hani	Tibeto-Burman	Ngwi-Burmese	34	65%	Xue et al. 2006
East Asia	Myanmar	Bamar	Tibeto-Burman	Ngwi-Burmese	59	63%	Peng et al. 2014
East Asia	Yunnan, China	Hani	Tibeto-Burman	Ngwi-Burmese	60	55%	Zhong et al. 2011
East Asia	Thailand	Akha	Tibeto-Burman	Ngwi-Burmese	27	37%	Trejaut et al. 2014
East Asia	Central China	Qiang	Tibeto-Burman	Northeastern Tibeto-Burman	33	94%	Xue et al. 2006
East Asia	Yunnan, China	Bai	Tibeto-Burman	Northeastern Tibeto-Burman	34	82%	Zhong et al. 2011
East Asia	Guizhou, China	Tujia	Tibeto-Burman	Northeastern Tibeto-Burman	33	67%	Zhong et al. 2011
East Asia	China	Tujia	Tibeto-Burman	Northeastern Tibeto-Burman	49	65%	Karafet et al. 2010
East Asia	Hubei, China	Tujia	Tibeto-Burman	Northeastern Tibeto-Burman	26	58%	Zhong et al. 2011
East Asia	Sichuan, China	Horpa (Daofu)	Tibeto-Burman	Northeastern Tibeto-Burman	16	50%	Wang et al. 2014
East Asia	Sichuan, China	Horpa (Danba)	Tibeto-Burman	Northeastern Tibeto-Burman	18	44%	Wang et al. 2014
East Asia	Sichuan, Yajiang, China	Queyu	Tibeto-Burman	Northeastern Tibeto-Burman	148	36%	Wang et al. 2013
East Asia	Wenxian, Gansu, China	Baima	Tibeto-Burman	Northeastern Tibeto-Burman	136	31%	Wang et al. 2013
East Asia	Sichuan, Danba, China	Jiarong	Tibeto-Burman	Northeastern Tibeto-Burman	104	31%	Wang et al. 2013
East Asia	Sichuan, China	Qiang	Tibeto-Burman	Northeastern Tibeto-Burman	27	30%	Zhong et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Sichuan, Aba, China	Qiang	Tibeto-Burman	Northeastern Tibeto-Burman	170	24%	Wang et al. 2013
East Asia	Sichuan, Kangding, China	Muya	Tibeto-Burman	Northeastern Tibeto-Burman	158	15%	Wang et al. 2013
East Asia	Yunnan, China	Jingpo	Tibeto-Burman	Sal	30	90%	Zhong et al. 2011
East Asia	Sichuan, China	Khams (Yajiang)	Tibeto-Burman	Western Tibeto-Burman	47	62%	Wang et al. 2014
East Asia	Sichuan, China	Khams (Xinlong)	Tibeto-Burman	Western Tibeto-Burman	46	57%	Wang et al. 2014
East Asia	Tibet, Lhasa, China	Khams	Tibeto-Burman	Western Tibeto-Burman	39	36%	Wang et al. 2013
East Asia	Tibet	Luoba	Tibeto-Burman	Western Tibeto-Burman	130	35%	Kang et al. 2012
East Asia	Tibet	Tibetans	Tibeto-Burman	Western Tibeto-Burman	2354	33%	Qi et al. 2013
East Asia	Xizang, China	Tibetans	Tibeto-Burman	Western Tibeto-Burman	191	29%	Zhong et al. 2011
East Asia	Tibet, Qamdo, China	Khams	Tibeto-Burman	Western Tibeto-Burman	279	28%	Wang et al. 2013
East Asia	Tibet, Nyingchi, China	Khams	Tibeto-Burman	Western Tibeto-Burman	140	26%	Wang et al. 2013
East Asia	Inner Mongolia	Evenks	Tungusic		31	74%	Zhong et al. 2011
East Asia	Manchuria	Manchu	Tungusic		48	73%	Hong et al. 2006
East Asia	Manchuria, China	Manchus	Tungusic		30	70%	Kim et al. 2011
East Asia	Liaoning, China	Manchu	Tungusic		66	68%	Zhong et al. 2011
East Asia	Northwest China	Xibe	Tungusic		32	56%	Shou et al. 2010
East Asia	Northeastern China	Nanai (Hezhe)	Tungusic		45	51%	Xue et al. 2006

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
East Asia	Inner Mongolia, Chifeng, China	Manchu	Tungusic		48	46%	Wang et al. 2013
East Asia	Northeastern China	Manchu	Tungusic		35	46%	Xue et al. 2006
East Asia	Xingjiang, China	Xibe	Tungusic		61	39%	Zhong et al. 2011
East Asia	Heilongjiang, China	Manchu	Tungusic		24	38%	Zhong et al. 2011
East Asia	Northwestern China	Xibe	Tungusic		41	37%	Xue et al. 2006
East Asia	Northern China	Evenks	Tungusic		26	35%	Xue et al. 2006
East Asia	Jilin, China	Manchu	Tungusic		173	31%	Wang et al. 2013
East Asia	Northern China	Oroquen	Tungusic		31	29%	Xue et al. 2006
East Asia	Northwest China	Salar	Turkic		35	34%	Shou et al. 2010
East Asia	Northwestern China	Uyghurs	Turkic		39	18%	Xue et al. 2006
East Asia	Xingjiang, China	Uyghurs	Turkic		71	13%	Zhong et al. 2011
East Asia	Northwest China	Uyghurs	Turkic		50	10%	Shou et al. 2010
Eastern Europe	Kalmyk Republic, Russia	Kalmyks	Mongolic		426	12%	Malyarchuk et al. 2013
Indian Ocean	Nicobar Islands	Shompen	Austro-Asiatic	Mon-Khmer	12	100%	Trivedi et al. 2006
Indian Ocean	Madagascar	Antemoro (Antalaotra)	Austronesian	Malayo-Polynesian	43	44%	Capredon et al. 2013
Indian Ocean	Madagascar	Highland Malagasy	Austronesian	Malayo-Polynesian	133	39%	Tofanelli et al. 2009
Indian Ocean	Madagascar	Malagasy Cotiers	Austronesian	Malayo-Polynesian	59	20%	Tofanelli et al. 2009
Indian Ocean	Madagascar	Antemoro (Ampanabaka)	Austronesian	Malayo-Polynesian	46	15%	Capredon et al. 2013
Island Southeast Asia	Indonesia	Nias	Austronesian	Malayo-Polynesian	12	100%	Li et al. 2008b
Island Southeast Asia	Nias, Indonesia	Nias	Austronesian	Malayo-Polynesian	60	100%	Karafet et al. 2010

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Island Southeast Asia	Indonesia	Palembang	Austronesian	Malayo-Polynesian	11	91%	Li et al. 2008b
Island Southeast Asia	Mentawai, Indonesia	Mentawai Islanders	Austronesian	Malayo-Polynesian	74	86%	Karafet et al. 2010
Island Southeast Asia	Bali	Balinese	Austronesian	Malayo-Polynesian	641	86%	Karafet et al. 2010
Island Southeast Asia	Philippines	Filipinos	Austronesian	Malayo-Polynesian	69	86%	Hong et al. 2006
Island Southeast Asia	Indonesia	Bangka	Austronesian	Malayo-Polynesian	13	85%	Li et al. 2008b
Island Southeast Asia	Sumatra, Indonesia	Sumatrans	Austronesian	Malayo-Polynesian	38	84%	Karafet et al. 2010
Island Southeast Asia	Indonesia	Sumbawa	Austronesian	Malayo-Polynesian	18	83%	Li et al. 2008b
Island Southeast Asia	Philippines	Filipinos	Austronesian	Malayo-Polynesian	210	81%	Delfin et al. 2011
Island Southeast Asia	Indonesia	Banjar	Austronesian	Malayo-Polynesian	15	80%	Li et al. 2008b
Island Southeast Asia	Philippines	Filipinos	Austronesian	Malayo-Polynesian	146	79%	Trejaut et al. 2014
Island Southeast Asia	Java, Indonesia	Javanese	Austronesian	Malayo-Polynesian	61	77%	Karafet et al. 2010
Island Southeast Asia	Indonesia	Makassar	Austronesian	Malayo-Polynesian	13	77%	Li et al. 2008b
Island Southeast Asia	Indonesia	Sasak	Austronesian	Malayo-Polynesian	15	73%	Li et al. 2008b
Island Southeast Asia	Indonesia	Torajan	Austronesian	Malayo-Polynesian	15	73%	Li et al. 2008b
Island Southeast Asia	Indonesia	Bugis	Austronesian	Malayo-Polynesian	15	67%	Li et al. 2008b
Island Southeast Asia	Borneo, Indonesia	Bornean	Austronesian	Malayo-Polynesian	86	66%	Karafet et al. 2010
Island Southeast Asia	Indonesia	Kaili	Austronesian	Malayo-Polynesian	15	53%	Li et al. 2008b
Island Southeast Asia	Indonesia	Minangkabau	Austronesian	Malayo-Polynesian	15	53%	Li et al. 2008b
Island Southeast Asia	Admiralty Islands	Kurti	Austronesian	Malayo-Polynesian	18	50%	Kayser et al. 2008
Island Southeast Asia	Philippines	Filipinos	Austronesian	Malayo-Polynesian	48	50%	Karafet et al. 2010
Island Southeast Asia	Sulawesi, Indonesia	Sulawesi	Austronesian	Malayo-Polynesian	54	50%	Karafet et al. 2010
Island Southeast Asia	Indonesia	Minahasa	Austronesian	Malayo-Polynesian	14	43%	Li et al. 2008b

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Island Southeast Asia	Borneo	Ma'anyan	Austronesian	Malayo-Polynesian	159	43%	Kusuma et al. 2015
Island Southeast Asia	Indonesia	Tengger	Austronesian	Malayo-Polynesian	12	42%	Li et al. 2008b
Island Southeast Asia	Indonesia	Dayak	Austronesian	Malayo-Polynesian	15	40%	Li et al. 2008b
Island Southeast Asia	Papua New Guinea	Woodlark Islanders	Austronesian	Malayo-Polynesian	13	38%	Oven et al. 2014
Island Southeast Asia	Admiralty Islands	Seimat-Wuvulu	Austronesian	Malayo-Polynesian	11	36%	Kayser et al. 2008
Island Southeast Asia	Bougainville	Buka	Austronesian	Malayo-Polynesian	10	30%	Scheinfeldt et al. 2006
Island Southeast Asia	Papua New Guinea	Trobriand Islanders	Austronesian	Malayo-Polynesian	60	28%	Oven et al. 2014
Island Southeast Asia	Bougainville	Teop	Austronesian	Malayo-Polynesian	18	28%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor	Kateri	Austronesian	Malayo-Polynesian	50	24%	Tumonggor et al. 2014
Island Southeast Asia	Admiralty Islands	Nyindrou	Austronesian	Malayo-Polynesian	17	24%	Kayser et al. 2008
Island Southeast Asia	West Timor	Kakaniuk	Austronesian	Malayo-Polynesian	47	23%	Tumonggor et al. 2014
Island Southeast Asia	Eastern Indonesia	Solor	Austronesian	Malayo-Polynesian	43	23%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	Indonesia	Alor	Austronesian	Malayo-Polynesian	13	23%	Li et al. 2008b
Island Southeast Asia	PNG, West New Britain	Melamela	Austronesian	Malayo-Polynesian	14	21%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Kove	Austronesian	Malayo-Polynesian	24	21%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor	Fatuketi	Austronesian	Malayo-Polynesian	35	20%	Tumonggor et al. 2014
Island Southeast Asia	Admiralty Islands	Titan	Austronesian	Malayo-Polynesian	21	19%	Kayser et al. 2008
Island Southeast Asia	West Timor	Besikama	Austronesian	Malayo-Polynesian	42	19%	Tumonggor et al. 2014
Island Southeast Asia	Flores, Indonesia	Flores Islanders	Austronesian	Malayo-Polynesian	394	19%	Karafet et al. 2010
Island Southeast Asia	West Timor	Laran	Austronesian	Malayo-Polynesian	50	18%	Tumonggor et al. 2014

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Island Southeast Asia	PNG, New Ireland	Nalik	Austronesian	Malayo-Polynesian	17	18%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, West New Britain	Nakani	Austronesian	Malayo-Polynesian	36	17%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor	Kamanasa	Austronesian	Malayo-Polynesian	62	16%	Tumonggor et al. 2014
Island Southeast Asia	Admiralty Islands	Nali	Austronesian	Malayo-Polynesian	19	16%	Kayser et al. 2008
Island Southeast Asia	Sumba, Indonesia	Sumbanese	Austronesian	Malayo-Polynesian	350	16%	Karafet et al. 2010
Island Southeast Asia	Eastern Indonesia	East Timor	Austronesian	Malayo-Polynesian	33	15%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	PNG, New Ireland	Tigak	Austronesian	Malayo-Polynesian	21	14%	Scheinfeldt et al. 2006
Island Southeast Asia	Eastern Indonesia	Flores	Austronesian	Malayo-Polynesian	71	14%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	West Timor	Kletek Suai	Austronesian	Malayo-Polynesian	15	13%	Tumonggor et al. 2014
Island Southeast Asia	West Timor	Umaklaran	Austronesian	Malayo-Polynesian	41	12%	Tumonggor et al. 2014
Island Southeast Asia	Bougainville	Saposa	Austronesian	Malayo-Polynesian	26	12%	Scheinfeldt et al. 2006
Island Southeast Asia	PNG, East New Britain	Tolai	Austronesian	Malayo-Polynesian	49	10%	Scheinfeldt et al. 2006
Island Southeast Asia	West Timor	Lawalu	Austronesian	Malayo-Polynesian	49	10%	Tumonggor et al. 2014
Island Southeast Asia	West Timor	Raimanawe	Austronesian	Malayo-Polynesian	50	10%	Tumonggor et al. 2014
Island Southeast Asia	Admiralty Islands	Andra-Hus	Austronesian	Malayo-Polynesian	20	10%	Kayser et al. 2008
Island Southeast Asia	Eastern Indonesia	Pantar	Trans-New Guinea		28	43%	Mona et al. 2009, Mona et al. 2011
Island Southeast Asia	West Timor	Tialai	Trans-New Guinea		24	13%	Tumonggor et al. 2014
Island Southeast Asia	Papua New Guinea	Rossel Islanders	Yele-West New Britain		80	30%	Oven et al. 2014
Northern Eurasia	Southeastern Siberia	Udege	Tungusic		21	19%	Jin et al. 2010
Northern Eurasia	Altai Republic, Russia	Altaiian Kazakhs	Turkic		119	26%	Dulik et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Oceania	Polynesia	Niueans	Austronesian	Malayo-Polynesian	10	90%	Kayser et al. 2006
Oceania	Solomon Islands	Bellona	Austronesian	Malayo-Polynesian	28	89%	Delfin et al. 2012
Oceania	Solomon Islands	Rennel	Austronesian	Malayo-Polynesian	38	71%	Delfin et al. 2012
Oceania	Solomon Islands	Kolombangara	Austronesian	Malayo-Polynesian	17	65%	Delfin et al. 2012
Oceania	Polynesia	Tongans	Austronesian	Malayo-Polynesian	52	54%	Mirabal et al. 2012
Oceania	Tonga	Tongans	Austronesian	Malayo-Polynesian	12	50%	Karafet et al. 2010
Oceania	Polynesia	Tuvalu	Austronesian	Malayo-Polynesian	100	45%	Kayser et al. 2006
Oceania	Polynesia	East Futuna	Austronesian	Malayo-Polynesian	50	42%	Kayser et al. 2006
Oceania	Polynesia	Tongans	Austronesian	Malayo-Polynesian	29	41%	Kayser et al. 2006
Oceania	Solomon Islands	Isabel	Austronesian	Malayo-Polynesian	53	38%	Delfin et al. 2012
Oceania	Samoan Archipelago	Tutula	Austronesian	Malayo-Polynesian	24	38%	Mirabal et al. 2012
Oceania	Solomon Islands	Gela	Austronesian	Malayo-Polynesian	47	32%	Delfin et al. 2012
Oceania	Tahiti	Tahitians	Austronesian	Malayo-Polynesian	24	29%	Karafet et al. 2010
Oceania	Samoan Archipelago	West Samoa	Austronesian	Malayo-Polynesian	61	26%	Mirabal et al. 2012
Oceania	Polynesia	Samoans	Austronesian	Malayo-Polynesian	62	26%	Kayser et al. 2006
Oceania	Samoa	Samoans	Austronesian	Malayo-Polynesian	12	25%	Karafet et al. 2010
Oceania	Leeward Society Islands	Leeward Society Islanders	Austronesian	Malayo-Polynesian	72	24%	Hudjashov et al. 2018
Oceania	New Zealand	Maori	Austronesian	Malayo-Polynesian	48	21%	Hudjashov et al. 2018
Oceania	American Samoa	Samoans	Austronesian	Malayo-Polynesian	6	17%	Karafet et al. 2010
Oceania	Solomon Islands	Makira	Austronesian	Malayo-Polynesian	39	15%	Delfin et al. 2012
Oceania	Solomon Islands	Guadalcanal	Austronesian	Malayo-Polynesian	53	15%	Delfin et al. 2012
Oceania	Solomon Islands	Simbo	Austronesian	Malayo-Polynesian	20	15%	Delfin et al. 2012

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
Oceania	Samoa Archipelago	Manua	Austronesian	Malayo-Polynesian	21	14%	Mirabal et al. 2012
Oceania	Polynesia	Fijians	Austronesian	Malayo-Polynesian	107	13%	Kayser et al. 2006
Oceania	Solomon Islands	Rononga	Austronesian	Malayo-Polynesian	44	11%	Delfin et al. 2012
Oceania	Solomon Islands	Vella Lavella	Central Solomons		44	14%	Delfin et al. 2012
Oceania	Vanuatu	Ni-Vanuatu	Creole		44	18%	Karafet et al. 2010
South Asia	Meghalaya, India	Khasi	Austro-Asiatic	Mon-Khmer	92	73%	Kumar et al. 2007
South Asia	Meghalaya	Khasi	Austro-Asiatic	Mon-Khmer	40	73%	Tamang et al. 2018
South Asia	Orissa, India	Juang	Austro-Asiatic	Munda	49	98%	Kumar et al. 2007
South Asia	Jharkhand, India	Birjia	Austro-Asiatic	Munda	24	96%	Kumar et al. 2007
South Asia	Maharashtra, India	Korku	Austro-Asiatic	Munda	59	81%	Kumar et al. 2007
South Asia	East India	Ho	Austro-Asiatic	Munda	30	80%	Sengupta et al. 2006
South Asia	Northeastern India	Santhal (Santal)	Austro-Asiatic	Munda	90	78%	Borkar et al. 2011
South Asia	Northeastern India	Ho	Austro-Asiatic	Munda	28	75%	Borkar et al. 2011
South Asia	Eastern India	Kharia	Austro-Asiatic	Munda	34	74%	Debnath et al. 2011
South Asia	East India	Santhal (Santal)	Austro-Asiatic	Munda	14	71%	Sengupta et al. 2006
South Asia	Jharkhand, India	Asur	Austro-Asiatic	Munda	55	64%	Kumar et al. 2007
South Asia	Jharkhand and West Bengal, India	Birhor	Austro-Asiatic	Munda	38	63%	Kumar et al. 2007
South Asia	Jharkhand and West Bengal, India	Bhumij	Austro-Asiatic	Munda	89	63%	Kumar et al. 2007
South Asia	Jharkhand and Chattisgarh, India	Korwa	Austro-Asiatic	Munda	42	60%	Kumar et al. 2007
South Asia	Northeastern India	Birhor	Austro-Asiatic	Munda	100	52%	Borkar et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
South Asia	Jharkhand and West Bengal, India	Santhal (Santal)	Austro-Asiatic	Munda	109	47%	Kumar et al. 2007
South Asia	India: Jharkhand, West Bengal, Orissa	Munda	Austro-Asiatic	Munda	53	45%	Kumar et al. 2007
South Asia	Eastern India	Kol	Austro-Asiatic	Munda	62	42%	Debnath et al. 2011
South Asia	India: Jharkhand, West Bengal, Orissa	Kharia	Austro-Asiatic	Munda	36	39%	Kumar et al. 2007
South Asia	Northeastern India	Munda	Austro-Asiatic	Munda	94	38%	Borkar et al. 2011
South Asia	Orissa, India	Ho	Austro-Asiatic	Munda	79	38%	Kumar et al. 2007
South Asia	Eastern India	Santhal (Santal)	Austro-Asiatic	Munda	51	37%	Debnath et al. 2011
South Asia	India: Jharkhand, West Bengal, Orissa	Savara	Austro-Asiatic	Munda	47	15%	Kumar et al. 2007
South Asia	Jharkhand and West Bengal, India	Mahali	Austro-Asiatic	Munda	25	12%	Kumar et al. 2007
South Asia	South India	Konda Reddy	Dravidian		30	67%	Sengupta et al. 2006
South Asia	Chattishgarh, India	Nagesia	Dravidian		14	57%	Kumar et al. 2007
South Asia	South India	Koya Dora	Dravidian		27	48%	Sengupta et al. 2006
South Asia	Central India	Kamar	Dravidian		30	43%	Sengupta et al. 2006
South Asia	India: Jharkhand and Chattisgarh	Oraon	Dravidian		91	32%	Kumar et al. 2007
South Asia	Northeastern India	Oraon	Dravidian		110	12%	Borkar et al. 2011
South Asia	Central India	Muria	Dravidian		20	10%	Sengupta et al. 2006
South Asia	Orissa, India	Bhuiyan	Indo-European	Indo-Aryan	81	84%	Kumar et al. 2007
South Asia	Chattishgarh, India	Pando	Indo-European	Indo-Aryan	23	65%	Kumar et al. 2007
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	57	54%	Fornarino et al. 2009
South Asia	Eastern India	Rajbanshi	Indo-European	Indo-Aryan	51	47%	Debnath et al. 2011

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
South Asia	Butwal, Nepal	Tharu	Indo-European	Indo-Aryan	10	40%	Chaubey et al. 2014
South Asia	Chattishgarh, India	Kanwar	Indo-European	Indo-Aryan	41	39%	Kumar et al. 2007
South Asia	Orissa, India	Bathudi	Indo-European	Indo-Aryan	36	36%	Kumar et al. 2007
South Asia	Haldwani, India	Tharu	Indo-European	Indo-Aryan	22	32%	Chaubey et al. 2014
South Asia	Morang, Nepal	Tharu	Indo-European	Indo-Aryan	37	30%	Fornarino et al. 2000
South Asia	Chitwan, Nepal	Tharu	Indo-European	Indo-Aryan	77	29%	Fornarino et al. 2000
South Asia	Central India	Halba	Indo-European	Indo-Aryan	21	29%	Sengupta et al. 2006
South Asia	Tulsipur, Nepal	Tharu	Indo-European	Indo-Aryan	21	29%	Chaubey et al. 2014
South Asia	Bangladesh	Chakma	Indo-European	Indo-Aryan	89	26%	Gazi et al. 2013
South Asia	Nainital, India	Tharu	Indo-European	Indo-Aryan	23	22%	Chaubey et al. 2014
South Asia	Mahrajganj, India	Tharu	Indo-European	Indo-Aryan	42	19%	Chaubey et al. 2014
South Asia	Northeastern India	Rajbanshi	Indo-European	Indo-Aryan	45	18%	Borkar et al. 2011
South Asia	Deoria, India	Tharu	Indo-European	Indo-Aryan	47	17%	Chaubey et al. 2014
South Asia	Eastern India	Bengali	Indo-European	Indo-Aryan	54	15%	Debnath et al. 2011
South Asia	Gorakhpur, India	Tharu	Indo-European	Indo-Aryan	38	13%	Chaubey et al. 2014
South Asia	Northeastern India	Paharia	Indo-European	Indo-Aryan	100	13%	Borkar et al. 2011
South Asia	Manipur	Poumai Naga	Tibeto-Burman	Angami-Pochuri	50	100%	Tamang et al. 2018
South Asia	Nagaland	Chakhesang	Tibeto-Burman	Angami-Pochuri	55	95%	Tamang et al. 2018
South Asia	Nagaland	Sema Naga	Tibeto-Burman	Angami-Pochuri	54	17%	Tamang et al. 2018
South Asia	Arunachal Pradesh	Nyishi	Tibeto-Burman	Central Tibeto-Burman	48	75%	Tamang et al. 2018
South Asia	Nagaland	Ao Naga	Tibeto-Burman	Central-Naga	67	63%	Tamang et al. 2018
South Asia	Bangladesh	Marma	Tibeto-Burman	Ngwi-Burmese	60	73%	Gazi et al. 2013

Region	Location	Population	Lang Family	Sub Fam 1	Sample Size	O-M175 all	Reference
South Asia	Northeast India	Mizo	Tibeto-Burman	Sal	27	96%	Sengupta et al. 2006
South Asia	Mizoram	Mizo	Tibeto-Burman	Sal	46	96%	Tamang et al. 2018
South Asia	Northeast India	Tripuri	Tibeto-Burman	Sal	21	90%	Sengupta et al. 2006
South Asia	Eastern India	Rabha	Tibeto-Burman	Sal	26	85%	Debnath et al. 2011
South Asia	Northeast India	Jamatia	Tibeto-Burman	Sal	30	83%	Sengupta et al. 2006
South Asia	Meghalaya, India	Garo	Tibeto-Burman	Sal	33	76%	Kumar et al. 2007
South Asia	Bangladesh	Tripuri	Tibeto-Burman	Sal	88	63%	Gazi et al. 2013
South Asia	Northeastern India	Mech	Tibeto-Burman	Sal	20	60%	Borkar et al. 2011
South Asia	Eastern India	Dhimal	Tibeto-Burman	Sal	36	50%	Debnath et al. 2011
South Asia	Eastern India	Mech	Tibeto-Burman	Sal	36	44%	Debnath et al. 2011
South Asia	Uttarakhand	Ban Ravat	Tibeto-Burman	Western Tibeto-Burman	38	92%	Tamang et al. 2018
South Asia	Nepal	Tamang	Tibeto-Burman	Western Tibeto-Burman	45	87%	Gayden et al. 2007
South Asia	West Bengal	Subba	Tibeto-Burman	Western Tibeto-Burman	44	86%	Tamang et al. 2018
South Asia	Northeastern India	Lachung	Tibeto-Burman	Western Tibeto-Burman	20	50%	Borkar et al. 2011
South Asia	Eastern India	Lachungpa	Tibeto-Burman	Western Tibeto-Burman	11	36%	Debnath et al. 2011
South Asia	West Bengal	Sherpa	Tibeto-Burman	Western Tibeto-Burman	54	30%	Tamang et al. 2018
South Asia	Nepal	Newar	Tibeto-Burman	Western Tibeto-Burman	66	21%	Gayden et al. 2007
South Asia	Jammu and Kashmir, India	Changpa	Tibeto-Burman	Western Tibeto-Burman	50	10%	Tamang et al. 2018

Supplementary Table 15.2. Frequency and Distribution of O2a1c-002611 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Austro-Asiatic	Mon- Khmer	East Asia	Vietnam	Vietnamese	0.14	Karafet et al. 2010
Austro-Asiatic	Mon-Khmer	East Asia	Khamkheut, Laos	Bo	0.07	Wang et al. 2013
Austro-Asiatic	Mon-Khmer	East Asia	Salavan, Laos	Kataang	0.05	Wang et al. 2013
Austro-Asiatic	Mon-Khmer	East Asia	Salavan, Laos	Suy	0.05	Wang et al. 2013
Austro-Asiatic	Mon-Khmer	East Asia	Boualapha, Laos	Sô	0.04	Wang et al. 2013
Austro-Asiatic	Mon-Khmer	East Asia	Salavan, Laos	Inh	0.03	Wang et al. 2013
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	0.03	He et al. 2012
Austro-Asiatic	Mon-Khmer	East Asia	Thateng, Laos	Laven	0.02	Wang et al. 2013
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainen Coast)	0.29	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Kaohsiung)	0.18	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Hwalien)	0.13	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainan)	0.10	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtun)	0.07	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Papura	0.06	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	0.05	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Yunlin	0.05	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Kategalan	0.03	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Rainan	0.06	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	0.05	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	0.04	Delfin et al. 2011
Austronesian	Malayo-Polynesian	East Asia	Taiwan, China	Yami	0.03	Trejaut et al. 2014

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Besikama	0.02	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	0.02	Karafet et al. 2010
Chinese		East Asia	Feixian, Shandong, China	Han	0.34	Wang et al. 2013
Chinese		East Asia	Hunan, China	Han	0.33	Wang et al. 2013
Chinese		East Asia	Mouping, Shandong, China	Han	0.25	Wang et al. 2013
Chinese		East Asia	Ningjin, Shandong, China	Han	0.22	Wang et al. 2013
Chinese		East Asia	Shandong, China	Han	0.22	Wang et al. 2013
Chinese		East Asia	Dezhou, Shandong, China	Han	0.22	Wang et al. 2013
Chinese		East Asia	Yiyuan, Shandong, China	Han	0.21	Wang et al. 2013
Chinese		East Asia	Gaotang, Shandong, China	Han	0.21	Wang et al. 2013
Chinese		East Asia	Zoucheng, Shandong, China	Han	0.19	Wang et al. 2013
Chinese		East Asia	Jiangsu, China	Han	0.18	Wang et al. 2013
Chinese		East Asia	Qingzhou, Shandong, China	Han	0.18	Wang et al. 2013
Chinese		East Asia	Anhui, China	Han	0.18	Wang et al. 2013
Chinese		East Asia	Lanzhou, Gansu, China	Han	0.18	Wang et al. 2013
Chinese		East Asia	Shanghai, China	Han	0.18	Wang et al. 2013
Chinese		East Asia	Zhitai, Shandong, China	Han	0.16	Wang et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Chinese		East Asia	Lijin, Shandong, China	Han	0.15	Wang et al. 2013
Chinese		East Asia	Jiangxi, China	Han	0.15	Wang et al. 2013
Chinese		East Asia	Rizhao, Shandong, China	Han	0.15	Wang et al. 2013
Chinese		East Asia	Henan, China	Han	0.15	Wang et al. 2013
Chinese		East Asia	Sichuan, China	Han	0.15	Wang et al. 2013
Chinese		East Asia	Zhejiang, China	Han	0.14	Wang et al. 2013
Chinese		East Asia	Taiwan, China	Taiwanese Han	0.14	Trejaut et al. 2014
Chinese		East Asia	Guangrao, Shandong, China	Han	0.13	Wang et al. 2013
Chinese		East Asia	Pingliang, Gansu, China	Han	0.13	Wang et al. 2013
Chinese		East Asia	Dongming, Shandong, China	Han	0.13	Wang et al. 2013
Chinese		East Asia	Heilongjiang, China	Han	0.12	Wang et al. 2013
Chinese		East Asia	Tianshui, Gansu, China	Han	0.12	Wang et al. 2013
Chinese		East Asia	Penglai, Shandong, China	Han	0.11	Wang et al. 2013
Chinese		East Asia	Qingyang, Gansu, China	Han	0.11	Wang et al. 2013
Chinese		East Asia	Jilin, China	Han	0.11	Wang et al. 2013
Chinese		East Asia	China	Han	0.11	Karafet et al. 2010
Chinese		East Asia	Baiyin, Gansu, China	Han	0.11	Wang et al. 2013
Chinese		East Asia	Zhangqiu, Shandong, China	Han	0.10	Wang et al. 2013
Chinese		East Asia	Zhanhua, Shandong, China	Han	0.10	Wang et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Chinese		East Asia	Longnan, Gansu, China	Han	0.10	Wang et al. 2013
Chinese		East Asia	Cangshan, Shandong, China	Han	0.10	Wang et al. 2013
Chinese		East Asia	Yanzhou, Shandong, China	Han	0.08	Wang et al. 2013
Chinese		East Asia	Shanghe, Shandong, China	Han	0.08	Wang et al. 2013
Chinese		East Asia	Qihe, Shandong, China	Han	0.08	Wang et al. 2013
Chinese		East Asia	Wuwei, Gansu, China	Han	0.08	Wang et al. 2013
Chinese		East Asia	Dingxi, Gansu, China	Han	0.07	Wang et al. 2013
Chinese		East Asia	Guangxi, China	Pinghua-Han	0.03	Wang et al. 2013
Chinese		East Asia	Linshu, Shandong, China	Han	0.02	Wang et al. 2013
Chinese		East Asia	Guangxi, China	Han	0.02	Wang et al. 2013
Hmong-Mien	Hmongic	East Asia	China	Miao	0.21	Karafet et al. 2010
Japonic		East Asia	Japan	Japanese	0.05	Sato et al. 2014
Japonic		East Asia	Japan	Japanese	0.04	Naitoh et al. 2013
Koreanic		East Asia	Korea	Koreans	0.10	Park et al. 2012
Koreanic		East Asia	Korea	Koreans	0.10	Kwon et al. 2015
Koreanic		East Asia	Jilin, Dunhua, China	Koreans	0.09	Wang et al. 2013
Mongolic		East Asia	Inner Mongolia, Chifeng, China	Mongols	0.07	Wang et al. 2013
Mongolic		East Asia	Qinghai, Huzhu, China	Monguor (Tu)	0.03	Wang et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Thai	0.12	He et al. 2012
Tai-Kadai	Kam-Tai	East Asia	Vientiane, Laos	Lao	0.05	Wang et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Chadong	0.05	Deng et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Boualapha, Laos	Phu Thai	0.04	Wang et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Khamkheut, Laos	Tai Mène	0.04	Wang et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Xaignabouri, Laos	Rien	0.04	Wang et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Laos	Lao	0.04	He et al. 2012
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	0.04	Deng et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Kam	0.04	Wang et al. 2013
Tibeto-Burman	Central Tibeto-Burman	East Asia	Zhangye, Gansu, China	Tibetan Amdo	0.03	Wang et al. 2013
Tibeto-Burman	Central Tibeto-Burman	East Asia	Qinghai, Xi'ning, China	Tibetans	0.02	Wang et al. 2013
Tibeto-Burman	Central Tibeto-Burman	East Asia	Tibet, Lhasa, China	Tibetans	0.01	Wang et al. 2013
Tibeto-Burman	Central Tibeto-Burman	East Asia	Tibet, Nagqu, China	Tibetans	0.01	Wang et al. 2013
Tibeto-Burman	Central Tibeto-Burman	East Asia	Tibet, Shannan, China	Tibetans	0.00	Wang et al. 2013
Tibeto-Burman	Ngwi-Burmese	East Asia	Louang-Namtha, Laos	Phunoi	0.04	Wang et al. 2013
Tibeto-Burman	Ngwi-Burmese	East Asia	Thailand	Akha	0.04	Trejaut et al. 2014
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	China	Tujia	0.08	Karafet et al. 2010
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Wenxian, Gansu, China	Baima	0.07	Wang et al. 2013
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, Yajiang, China	Queyu	0.03	Wang et al. 2013
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, Aba, China	Qiang	0.02	Wang et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	O-002611	Reference
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, Kangding, China	Muya	0.01	Wang et al. 2013
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, Danba, China	Jiarong	0.01	Wang et al. 2013
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Xinlong)	0.15	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	Tibet, Lhasa, China	Khams	0.03	Wang et al. 2013
Tibeto-Burman	Western Tibeto-Burman	East Asia	Tibet, Qamdo, China	Khams	0.01	Wang et al. 2013
Tibeto-Burman	Western Tibeto-Burman	East Asia	Tibet, Nyingchi, China	Khams	0.01	Wang et al. 2013
Tungusic		East Asia	Jilin, China	Manchu	0.04	Wang et al. 2013
Tungusic		East Asia	Inner Mongolia, Chifeng, China	Manchu	0.02	Wang et al. 2013

Supplementary Table 15.3. Distribution and Frequency of O2a2b1a2-F114 (Language View).

Lang Family	Region	Location	Population	Sample Size	O-F114	Reference
Chinese	East Asia	Northwest China	Han	47	0.19	Ning et al. 2016
Chinese	East Asia	North China	Han	225	0.15	Ning et al. 2016
Chinese	East Asia	China	Han	93	0.15	Ning et al. 2016
Chinese	East Asia	East China	Han	450	0.14	Ning et al. 2016
Chinese	East Asia	Southwest China	Han	36	0.14	Ning et al. 2016
Chinese	East Asia	Northeast China	Han	80	0.11	Ning et al. 2016
Chinese	East Asia	South China	Han	158	0.09	Ning et al. 2016
Koreanic	East Asia	Korea	Koreans	706	0.10	Kwon et al. 2015
Mongolic	East Asia	China	Mongols	196	0.01	Ning et al. 2016
Tungusic	East Asia	China	Manchu	16	0.19	Ning et al. 2016

Supplementary Table 15.4. Frequency and Distribution of O2a2b1a1-M117 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Bit	28	0.32	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Ava	29	0.28	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Northern Thailand	Mon	18	0.22	Brunelli et al. 2017
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Kataang	38	0.16	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Mal	50	0.14	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Khmu	51	0.14	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Blang	52	0.12	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Palyu	30	0.10	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Northern Thailand	Lawa	50	0.10	Brunelli et al. 2017
Austro-Asiatic	Mon-Khmer	East Asia	Guangxi, China	Bolyu	30	0.10	Li et al. 2008b
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Bugan	32	0.09	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Xinhmul	29	0.07	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Laven	50	0.04	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Alak	31	0.03	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Inh	34	0.03	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Talieng	35	0.03	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Oy	50	0.02	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Sô	50	0.02	Cai et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bugis	15	0.07	Li et al. 2008b
Austronesian	Malayo-Polynesian	East Asia	Hainan Island, China	Utsat	72	0.04	Li et al. 2013
Austronesian	Malayo-Polynesian	East Asia	Hainan, China	Tsat	31	0.03	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Chinese		East Asia	South China	Han	158	0.23	Ning et al. 2016
Chinese		East Asia	Tiandong, Guangxi, China	Pinghua	20	0.20	Lu et al. 2013
Chinese		East Asia	North China	Han	225	0.18	Ning et al. 2016
Chinese		East Asia	Northeast China	Han	80	0.18	Ning et al. 2016
Chinese		East Asia	Guangxi, China	Han	82	0.17	Zhao et al. 2010
Chinese		East Asia	East China	Han	450	0.15	Ning et al. 2016
Chinese		East Asia	Guangxi, China	Pinghua	101	0.15	Gan et al. 2008
Chinese		East Asia	Chendu, China	Han	34	0.15	Xue et al. 2006
Chinese		East Asia	Harbin, China	Han	35	0.14	Xue et al. 2006
Chinese		East Asia	Meixian, China	Han	35	0.11	Xue et al. 2006
Chinese		East Asia	Northwest China	Han	47	0.11	Ning et al. 2016
Chinese		East Asia	Nanning, Guangxi, China	Pinghua	38	0.11	Lu et al. 2013
Chinese		East Asia	Lanzhou, China	Han	30	0.10	Xue et al. 2006
Chinese		East Asia	China	Han	93	0.09	Ning et al. 2016
Chinese		East Asia	Southwest China	Han	36	0.08	Ning et al. 2016
Chinese		East Asia	Yili, China	Han	32	0.06	Xue et al. 2006
Chinese		East Asia	Pingguo, Guangxi, China	Pinghua	123	0.04	Lu et al. 2013
Chinese		East Asia	Central China	Hui	35	0.03	Xue et al. 2006
Hmong-Mien	Hmongic	East Asia	Southern China	Pa Then	31	0.13	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Hunan)	100	0.09	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Hmong (Daw)	51	0.08	Cai et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Yunnan)	49	0.06	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Guizhou)	49	0.02	Cai et al. 2011
Hmong-Mien	Ho Nte	East Asia	Southeastern China	She	34	0.18	Xue et al. 2006
Hmong-Mien	Ho The	East Asia	Southern China	She (Northern)	56	0.09	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Straggler)	20	0.35	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Blue)	28	0.32	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Western)	47	0.23	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Northern)	33	0.18	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Lowland)	31	0.16	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Liannan)	35	0.14	Xue et al. 2006
Hmong-Mien	Mienic	East Asia	Southern China	Zaomin	37	0.14	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Lowland)	41	0.12	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Native)	41	0.07	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Southern)	31	0.06	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Mountain)	32	0.06	Cai et al. 2011
Indo-European	Indo-Aryan	South Asia	Chitwan, Nepal	Tharu	57	0.49	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Eastern India	Rajbanshi	51	0.43	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	Chitwan, Nepal	Tharu	77	0.29	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Morang, Nepal	Tharu	37	0.19	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	Eastern India	Bengali	54	0.07	Debnath et al. 2011
Japonic		East Asia	Japan	Japanese	263	0.04	Naitoh et al. 2013
Koreanic		East Asia	Korea	Koreans	706	0.13	Kwon et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Koreanic		East Asia	Korea	Koreans	706	0.01	Park et al. 2012
Mongolic		East Asia	Northeastern China	Daur	39	0.08	Xue et al. 2006
Mongolic		East Asia	Mongolia	Mongols	160	0.06	Di Cristofaro et al. 2013
Mongolic		East Asia	China	Mongols	196	0.03	Ning et al. 2016
Mongolic		Northern Eurasia	Buryatia, Russia	Buryats	298	0.01	Kharkov et al. 2014
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Shan	20	0.35	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Hainan, China	Lingao	30	0.27	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Khon Muang	191	0.24	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Yuan	85	0.18	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Lue	91	0.18	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Kuen	24	0.17	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	39	0.15	Chen et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Yong	26	0.12	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Dong	38	0.11	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	21	0.10	Gan et al. 2008
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Chadong	21	0.10	Deng et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	63	0.08	Zhao et al. 2010
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	22	0.05	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Southern China	Bouyei (Buyi)	35	0.03	Xue et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	51	0.02	Deng et al. 2013
Tai-Kadai	Kra	East Asia	Yunnan, China	Lachi	30	0.23	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Guizhou, China	Red Gelao	31	0.16	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Guizhou, China	Qau	13	0.08	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Tai-Kadai	Kra	East Asia	Hainan, China	Cun	31	0.03	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Yunnan, China	Buyang	32	0.03	Li et al. 2008b
Tibeto-Burman	Central Tibeto-Burman	East Asia	Tibet	Deng	90	0.63	Kang et al. 2012
Tibeto-Burman	Ngwi-Burmese	East Asia	Southern China	Hani	34	0.06	Xue et al. 2006
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, China	Horpa (Danba)	18	0.22	Wang et al. 2014
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Central China	Qiang	33	0.09	Xue et al. 2006
Tibeto-Burman	Sal	South Asia	Eastern India	Rabha	26	0.58	Debnath et al. 2011
Tibeto-Burman	Sal	South Asia	Eastern India	Dhimal	36	0.42	Debnath et al. 2011
Tibeto-Burman	Sal	South Asia	Eastern India	Mech	36	0.25	Debnath et al. 2011
Tibeto-Burman	Western Tibeto-Burman	South Asia	Nepal	Tamang	45	0.84	Gayden et al. 2007
Tibeto-Burman	Western Tibeto-Burman	East Asia	Tibet	Luoba	130	0.31	Kang et al. 2012
Tibeto-Burman	Western Tibeto-Burman	East Asia	Tibet	Tibetans	2354	0.30	Qi et al. 2013
Tibeto-Burman	Western Tibeto-Burman	South Asia	Nepal	Newar	66	0.21	Gayden et al. 2007
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Yajiang)	47	0.19	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Xinlong)	46	0.11	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	South Asia	Eastern India	Lachungpa	11	0.09	Debnath et al. 2011
Tungusic		East Asia	China	Manchu	16	0.50	Ning et al. 2016

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M117	Reference
Tungusic		East Asia	Northeastern China	Nanai (Hezhe)	45	0.16	Xue et al. 2006
Tungusic		East Asia	Northern China	Evenks	26	0.15	Xue et al. 2006
Tungusic		East Asia	Northeastern China	Manchu	35	0.14	Xue et al. 2006
Tungusic		East Asia	Northwestern China	Xibe	41	0.05	Xue et al. 2006
Tungusic		East Asia	Northern China	Oroquen	31	0.03	Xue et al. 2006
Turkic		East Asia	Northwestern China	Uyghurs	39	0.05	Xue et al. 2006
Turkic		East Asia	Northwestern China	Uyghurs	31	0.03	Xue et al. 2006
Turkic		Northern Eurasia	Tuva Republic, Russia	Tuvans	419	0.02	Kharkov et al. 2013
Turkic		Central Asia	Afghanistan	Uzbek	127	0.02	Di Cristofaro et al. 2013

Supplementary Table 15.5. Frequency and Distribution of O2a2b2a2b-B451 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-B451	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Amis	39	36%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Puyuma	23	13%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Papura	18	11%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Hwalien)	38	8%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainan)	30	7%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Taroko	20	5%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtun)	85	5%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Paiwan	25	4%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	40	3%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tongans	52	54%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	Tutilla	24	33%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	West Samoa	61	26%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	18%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Oceania	Leeward Society Islands	Leeward Society Islanders	72	11%	Hudjashov et al. 2018
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	Manua	21	5%	Mirabal et al. 2012

Supplementary Table 15.6. Frequency and Distribution of O1a1a-M307 among Austronesians.

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Taroko	20	95%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Atayal	52	90%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Tsou	41	90%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Thao	16	88%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Saisiyat	24	88%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Rukai	29	69%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	40	53%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Puyuma	23	48%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Hwalien)	38	45%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Amis	39	41%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Paiwan	25	40%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtung)	85	35%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Yunlin	21	33%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainan)	30	30%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Kategalan	30	30%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Kaohsiung)	40	15%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Papura	18	6%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainen Coast)	38	3%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Rukai	11	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Pyuma	11	0%	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Bunun	56	0%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Atayal	22	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Paiwan	22	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Thao	22	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Siraya Makato	37	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	21	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Amis	28	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Tsou	18	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	China	Taiwanese Aboriginals	48	0%	Arunkumar et al. 2015
Austronesian	Formosan	East Asia	Taiwan, China	Bunun	17	0%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Saisat	11	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	East Asia	Taiwan, China	Yami	30	50%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	East Asia	Vietnam	Cham	59	3%	He et al. 2012
Austronesian	Malayo-Polynesian	East Asia	Malaysia	Malaysians	32	3%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	East Asia	Indonesia	Indonesians	36	0%	Hong et al. 2006
Austronesian	Malayo-Polynesian	East Asia	China	Paiwan	208	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	East Asia	Hainan Island, China	Utsat	72	0%	Li et al. 2013
Austronesian	Malayo-Polynesian	East Asia	Ratanakri , Cambodia	Jarai	45	0%	Zhang et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	East Asia	Hainan, China	Tsat	31	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	East Asia	Northern Cambodia	Jarai	45	0%	Zhang et al. 2014
Austronesian	Malayo-Polynesian	East Asia	Vietnam	Cham	11	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Antemoro (Antalaotra)	43	0%	Capredon et al. 2013
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Malagasy Cotiers	59	0%	Tofanelli et al. 2009
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Highland Malagasy	133	0%	Tofanelli et al. 2009
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Antemoro (Ampanabaka)	46	0%	Capredon et al. 2013
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Antemoro (Anteony)	40	0%	Capredon et al. 2013
Austronesian	Malayo-Polynesian	Island Southeast Asia	Nias, Indonesia	Nias	60	87%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Mentawai, Indonesia	Mentawai Islanders	74	28%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	14%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bali	Balinese	641	11%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Ma'anyan	159	10%	Kusuma et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Java, Indonesia	Javanese	61	10%	Karafet et al. 2010

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Flores, Indonesia	Flores Islanders	394	9%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Umaklaran	41	7%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Laran	50	4%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Moluccas, Indonesia	Moluccans	30	3%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Fatuketi	35	3%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumatra, Indonesia	Sumatrans	38	3%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo, Indonesia	Bornean	86	2%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	48	2%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Lembata, Indonesia	Lembata Islanders	92	1%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumba, Indonesia	Sumbanese	350	1%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Lawalu	49	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Besikama	42	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Wefatuk	15	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Adonara	96	0%	Mona et al. 2009, Mona et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	East Timor	33	0%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Flores	71	0%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Raimanawe	50	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	87	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nali	19	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Lembata	31	0%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Java, Indonesia	Java	114	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Malaysia	Malay	50	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Banjarmasin	27	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bali	641	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Mataran	40	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Toraja	49	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sumba	350	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kamanasa	62	0%	Tumonggor et al. 2014

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Flores	394	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Palu	28	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Malaysia	Kota Kinabalu	44	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Misima Islanders	14	0%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Trobriand Islanders	60	0%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Woodlark Islanders	13	0%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kateri	50	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kakaniuk	47	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Rainan	17	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Suai	15	0%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sumatra	95	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Pekanbaru	31	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sulawesi	54	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Tigak	21	0%	Scheinfeldt et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Mamusi	43	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sulawesi, Indonesia	Sulawesi	54	0%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Buka	10	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Teop	18	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Saposa	26	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Madak	19	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Solor	43	0%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Notsi	14	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sumba	14	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Nalik	17	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sumbawa	18	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Hanover	Lavongai	43	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Borneo	126	0%	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, East New Britain	Tolai	49	0%	Scheinfeldt et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Melamela	14	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Mengen	23	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Nakani	36	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	210	0%	Delfin et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Kove	24	0%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	69	0%	Hong et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nyindrou	17	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Nias	12	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Seimat-Wuvulu	11	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Titan	21	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Ere-Kele	14	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Andra-Hus	20	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Kurti	18	0%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bangka	13	0%	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Alor	13	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Palembang	11	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sasak	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Dayak	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Banjar	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Tengger	12	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bugis	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Torajan	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Minahasa	14	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Makassar	13	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Kaili	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Minangkabau	15	0%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Oceania	Samoa	Samoans	12	8%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	American Samoa	Samoans	6	0%	Karafet et al. 2010

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Oceania	Tahiti	Tahitians	24	0%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Niueans	10	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Tonga	Tongans	12	0%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	Leeward Society Islands	Leeward Society Islanders	72	0%	Hudjashov et al. 2018
Austronesian	Malayo-Polynesian	Oceania	New Zealand	Maori	48	0%	Hudjashov et al. 2018
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Guadalcanal	53	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Santa Cruz	36	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Simbo	20	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Bellona	28	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Rennel	38	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Cook Islanders	77	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Ronongga	44	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Makira	39	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tongans	29	0%	Kayser et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M307	Reference
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Isabel	53	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	West Samoa	61	0%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Gela	47	0%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Samoans	62	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Polynesia	East Futuna	50	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tuvalu	100	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Fijians	107	0%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tongans	52	0%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	Tutilla	24	0%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Samoan Archipelago	Manua	21	0%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Kolombangara	17	0%	Delfin et al. 2012

Supplementary Table 15.7. Frequency and Distribution of O1a2-M110 among Austronesians.

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M110	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Bunun	56	61%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Bunun	17	59%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Paiwan	25	28%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Paiwan	22	27%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Rukai	29	24%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Puyuma	23	22%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	21	19%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Rukai	11	18%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Amis	39	18%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Amis	28	18%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtung)	85	18%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainan)	30	13%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Hwalien)	38	13%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	40	13%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Saisat	11	9%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Pyuma	11	9%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Kategalan	30	7%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Thao	16	6%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Tsou	18	6%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Tsou	41	5%	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Thao	22	5%	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Saisiyat	24	4%	Trejaut et al. 2014

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M110	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Atayal	52	2%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Antemoro (Antalaotra)	43	16%	Capredon et al. 2013
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Antemoro (Ampanabaka)	46	15%	Capredon et al. 2013
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Kurti	18	50%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Seimat-Wuvulu	11	36%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Woodlark Islanders	13	31%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	210	20%	Delfin et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Titan	21	19%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kateri	50	18%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nyindrou	17	18%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Trobriand Islanders	60	17%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nali	19	16%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Makassar	13	15%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Nias, Indonesia	Nias	60	13%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kakaniuk	47	13%	Tumonggor et al. 2014

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M110	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	12%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Andra-Hus	20	10%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Laran	50	10%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Fatuketi	35	9%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	48	8%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sulawesi, Indonesia	Sulawesi	54	7%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Misima Islanders	14	7%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Ere-Kele	14	7%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Torajan	15	7%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Suai	15	7%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Wefatuk	15	7%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumba, Indonesia	Sumbanese	350	6%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Lawalu	49	6%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Raimanawe	50	6%	Tumonggor et al. 2014

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M110	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo, Indonesia	Bornean	86	6%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Umaklaran	41	5%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Moluccas, Indonesia	Moluccans	30	3%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Ma'anyan	159	3%	Kusuma et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Java, Indonesia	Javanese	61	2%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kamanasa	62	2%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Mentawai, Indonesia	Mentawai Islanders	74	1%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bali	Balinese	641	1%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Kolombangara	17	24%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Gela	47	13%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Guadalcanal	53	9%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Makira	39	5%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Isabel	53	4%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Ronongga	44	2%	Delfin et al. 2012

Supplementary Table 15.8. Frequency and Distribution of O1a-M119 (all) for Island Southeast Asia and Oceania (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M119 all	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Nias, Indonesia	Nias	60	100%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Mentawai, Indonesia	Mentawai Islanders	74	86%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Palembang	11	64%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	210	63%	Delfin et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Kurti	18	50%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Makassar	13	46%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	42%	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Woodlark Islanders	13	38%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Seimat-Wuvulu	11	36%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Tengger	12	33%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bugis	15	33%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bangka	13	31%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Trobriand Islanders	60	28%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Banjar	15	27%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Teop	18	22%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Minahasa	14	21%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bali	Balinese	641	21%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sulawesi, Indonesia	Sulawesi	54	20%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kateri	50	20%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Buka	10	20%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Dayak	15	20%	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M119 all	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Torajan	15	20%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Kaili	15	20%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Titan	21	19%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nyindrou	17	18%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kakaniuk	47	17%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	69	16%	Hong et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Nali	19	16%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	East Timor	33	15%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Ma'anyan	159	15%	Kusuma et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Java, Indonesia	Javanese	61	15%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Fatuketi	35	14%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Laran	50	14%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Solor	43	14%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumatra, Indonesia	Sumatrans	38	13%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumba, Indonesia	Sumbanese	350	13%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Umaklaran	41	12%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Besikama	42	12%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bougainville	Saposa	26	12%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	48	10%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Andra-Hus	20	10%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Flores, Indonesia	Flores Islanders	394	10%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Tigak	21	10%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Mamusi	43	9%	Scheinfeldt et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M119 all	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo, Indonesia	Bornean	86	9%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Mengen	23	9%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Lawalu	49	8%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Admiralty Islands	Ere-Kele	14	7%	Kayser et al. 2008
Austronesian	Malayo-Polynesian	Island Southeast Asia	Papua New Guinea	Misima Islanders	14	7%	Oven et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Notsi	14	7%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Flores	71	7%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Moluccas, Indonesia	Moluccans	30	7%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Suai	15	7%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Wefatuk	15	7%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sasak	15	7%	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Raimanawe	50	6%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Ireland	Nalik	17	6%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Lembata, Indonesia	Lembata Islanders	92	3%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, West New Britain	Nakani	36	3%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	PNG, New Hanover	Lavongai	43	2%	Scheinfeldt et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kamanasa	62	2%	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Adonara	96	1%	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Kolombangara	17	59%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Makira	39	13%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Gela	47	13%	Delfin et al. 2012

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M119 all	Reference
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Guadalcanal	53	11%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Tonga	Tongans	12	8%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	Samoa	Samoans	12	8%	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Oceania	Leeward Society Islands	Leeward Society Islanders	72	7%	Hudjashov et al. 2018
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Isabel	53	6%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Fijians	107	6%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Samoa Archipelago	Manua	21	5%	Mirabal et al. 2012
Austronesian	Malayo-Polynesian	Oceania	New Zealand	Maori	48	4%	Hudjashov et al. 2018
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Samoans	62	3%	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Oceania	Solomon Islands	Ronongga	44	2%	Delfin et al. 2012
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tuvalu	100	1%	Kayser et al. 2006
Central Solomons		Oceania	Solomon Islands	Savo	30	3%	Delfin et al. 2012
Central Solomons		Oceania	Solomon Islands	Vella Lavella	44	2%	Delfin et al. 2012
Creole		Oceania	Vanuatu	Ni-Vanuatu	44	11%	Karafet et al. 2010
Isolate		Island Southeast Asia	PNG, East New Britain	Sulka	33	6%	Scheinfeldt et al. 2006
Trans-New Guinea		Island Southeast Asia	West Timor	Tialai	24	13%	Tumonggor et al. 2014
Trans-New Guinea		Island Southeast Asia	Eastern Indonesia	Pantar	28	7%	Mona et al. 2009, Mona et al. 2011
Yele-West New Britain		Island Southeast Asia	Papua New Guinea	Rossel Islanders	80	30%	Oven et al. 2014

Supplementary Table 15.9. Frequency and Distribution of O1b1a1a-M95 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Mon-Khmer	Indian Ocean	Nicobar Islands	Shompen	12	1.00	Trivedi et al. 2006
Austro-Asiatic	Mon-Khmer	Indian Ocean	Nicobar Islands	Nicobarese	11	1.00	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	Indian Ocean	Nicobar Islands	Shompen	12	1.00	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Lun	13	0.92	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Lun	13	0.92	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Kuy	37	0.92	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Stung Treng, Cambodia	Kuy	37	0.92	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Suy	39	0.87	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Xinhmul	29	0.86	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Nan, Thailand	Htin	35	0.86	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Thailand	Phai (Htin)	35	0.86	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Lamet	35	0.86	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Lamet	35	0.86	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Inh	34	0.79	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Inh	34	0.79	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Kratie, Cambodia	Mel	19	0.79	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Mel	19	0.79	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Pnong	26	0.77	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Kratie, Cambodia	Phnong	26	0.77	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Kachac	17	0.76	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Kachac	17	0.76	Zhang et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Mal	50	0.74	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Tompoun	51	0.73	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Tompoun	51	0.73	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Alak	31	0.71	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Katu	45	0.69	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Katu	45	0.69	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Aheu	38	0.68	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Bo	28	0.68	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Stieng	12	0.67	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Khmu	51	0.67	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Mal	50	0.66	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Talieng	35	0.66	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Brau	32	0.66	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Bru (Brao)	37	0.65	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Brao	37	0.65	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Bo	28	0.64	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Kreung	22	0.64	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Kreung	22	0.64	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Talieng	35	0.63	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Brau	32	0.63	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Oy	50	0.62	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Khmu	51	0.61	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Oy	50	0.60	Cai et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Alak	31	0.58	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Suy	39	0.56	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Sô	50	0.54	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Bit	28	0.54	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Bit	28	0.54	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Kratie, Cambodia	Khmer	34	0.53	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Khmer	34	0.53	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Aheu	38	0.53	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Bugan	32	0.50	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Ratanakri , Cambodia	Kravet	24	0.50	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Cambodia	Kravet	24	0.50	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Ngeq	35	0.49	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Ngeq	35	0.49	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	South Asia	Meghalaya, India	Khasi	21	0.48	Chaubey et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Jeh	32	0.47	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Jeh	32	0.47	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Laven	50	0.44	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Sô	50	0.42	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Laven	50	0.42	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	South Asia	Meghalaya, India	Khasi	92	0.41	Kumar et al. 2007
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Kataang	38	0.39	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Thailand	Lawa	41	0.34	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Chiang Mai, Thailand	Lawa	41	0.34	Zhang et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Southwestern China	Bulang	55	0.31	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Yunnan, China	Bulang	55	0.31	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Blang	52	0.31	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	South Asia	Northeast India	Khasi	98	0.31	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	80	0.29	Arunkumar et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Guangxi, China	Bolyu	30	0.23	Li et al. 2008b
Austro-Asiatic	Mon-Khmer	East Asia	Southern China	Palyu	30	0.23	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Yunnan, China	De'ang	68	0.19	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Southwestern China	Palaung (De'ang)	68	0.19	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Chiang Mai, Thailand	Palaung	16	0.19	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Northern Thailand	Palaung (De'ang)	16	0.19	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Xinhmul	29	0.17	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	41	0.12	Hong et al. 2006
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	76	0.12	He et al. 2012
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Kataang	38	0.11	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Yunnan, China	Wa	57	0.09	Zhang et al. 2015
Austro-Asiatic	Mon-Khmer	East Asia	Southwestern China	Wa	57	0.09	Zhang et al. 2014
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	70	0.07	Karafet et al. 2010
Austro-Asiatic	Munda	South Asia	Orissa, India	Juang	49	0.98	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Chattishgarh, India	Birhor	27	0.96	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	Jharkhand, India	Birjia	24	0.96	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Orissa, India	Bonda	42	0.95	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	Maharashtra, India	Birhor	35	0.94	Chaubey et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Munda	South Asia	Orissa, India	Juang	54	0.89	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	Bihar, India	Ho	45	0.84	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	Maharashtra, India	Korku	59	0.81	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	East India	Ho	30	0.80	Sengupta et al. 2006
Austro-Asiatic	Munda	South Asia	East India	Gadaba	84	0.80	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	Jharkhand, India	Asur	48	0.73	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	East India	Santhal (Santal)	14	0.71	Sengupta et al. 2006
Austro-Asiatic	Munda	South Asia	Eastern India	Kharia	34	0.71	Debnath et al. 2011
Austro-Asiatic	Munda	South Asia	Northeastern India	Santhal (Santal)	90	0.69	Borkar et al. 2011
Austro-Asiatic	Munda	South Asia	East India	Langia Soura	64	0.69	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	Northeastern India	Ho	28	0.68	Borkar et al. 2011
Austro-Asiatic	Munda	South Asia	Jharkhand, India	Asur	55	0.64	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Jharkhand and West Bengal, India	Birhor	38	0.63	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Jharkhand and West Bengal, India	Bhumij	89	0.63	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	East India	Ho	115	0.63	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	Jharkhand and Chattisgarh, India	Korwa	42	0.60	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Orissa, India	Savara	21	0.52	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	East India	Munda	104	0.49	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	Chattishgarh, India	Kharia	37	0.49	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	Northeastern India	Birhor	100	0.48	Borkar et al. 2011
Austro-Asiatic	Munda	South Asia	West India	Korku	66	0.47	Arunkumar et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austro-Asiatic	Munda	South Asia	Jharkhand and West Bengal, India	Santhal (Santal)	109	0.47	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	East India	Bondo Lower	28	0.46	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	India: Jharkhand, West Bengal, Orissa	Munda	53	0.45	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	East India	Santal	121	0.43	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	India: Jharkhand, West Bengal, Orissa	Kharia	36	0.39	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Orissa, India	Ho	79	0.38	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Eastern India	Santhal (Santal)	51	0.37	Debnath et al. 2011
Austro-Asiatic	Munda	South Asia	Eastern India	Kol	62	0.37	Debnath et al. 2011
Austro-Asiatic	Munda	South Asia	Northeastern India	Munda	94	0.35	Borkar et al. 2011
Austro-Asiatic	Munda	South Asia	Jharkhand, India	Santhal (Santal)	20	0.35	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	East India	Bondo	48	0.31	Arunkumar et al. 2015
Austro-Asiatic	Munda	South Asia	Jharkhand, India	Mahali	32	0.19	Chaubey et al. 2011
Austro-Asiatic	Munda	South Asia	India: Jharkhand, West Bengal, Orissa	Savara	47	0.15	Kumar et al. 2007
Austro-Asiatic	Munda	South Asia	Jharkhand and West Bengal, India	Mahali	25	0.12	Kumar et al. 2007
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	21	0.14	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Saisat	11	0.09	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Amis	28	0.07	Li et al. 2008b
Austronesian	Formosan	East Asia	Taiwan, China	Papura	18	0.06	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya Makato	37	0.05	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainen Coast)	38	0.05	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Kategalan	30	0.03	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	40	0.03	Trejaut et al. 2014
Austronesian	Formosan	East Asia	China	Taiwanese Aboriginals	48	0.02	Arunkumar et al. 2015
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtung)	85	0.01	Trejaut et al. 2014
Austronesian	Malayo- Polynesian	East Asia	Northern Cambodia	Jarai	45	0.76	Zhang et al. 2014
Austronesian	Malayo- Polynesian	East Asia	Ratanakri , Cambodia	Jarai	45	0.76	Zhang et al. 2015
Austronesian	Malayo- Polynesian	Island Southeast Asia	Bali	Balinese	641	0.57	Karafet et al. 2010
Austronesian	Malayo- Polynesian	Island Southeast Asia	Indonesia	Bali	641	0.57	Arunkumar et al. 2015
Austronesian	Malayo- Polynesian	Island Southeast Asia	Java, Indonesia	Javanese	61	0.49	Karafet et al. 2010
Austronesian	Malayo- Polynesian	Island Southeast Asia	Java, Indonesia	Java	114	0.46	Arunkumar et al. 2015
Austronesian	Malayo- Polynesian	Island Southeast Asia	Indonesia	Mataran	40	0.43	Arunkumar et al. 2015
Austronesian	Malayo- Polynesian	Island Southeast Asia	Indonesia	Banjarmasin	27	0.33	Arunkumar et al. 2015
Austronesian	Malayo- Polynesian	Island Southeast Asia	Indonesia	Torajan	15	0.33	Li et al. 2008b
Austronesian	Malayo- Polynesian	Island Southeast Asia	Malaysia	Malay	50	0.32	Arunkumar et al. 2015
Austronesian	Malayo- Polynesian	East Asia	Malaysia	Malaysians	32	0.31	Karafet et al. 2010

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austronesian	Malayo-Polynesian	East Asia	Vietnam	Cham	59	0.31	He et al. 2012
Austronesian	Malayo-Polynesian	East Asia	Indonesia	Indonesians	36	0.28	Hong et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Banjar	15	0.27	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Borneo	126	0.26	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Pekanbaru	31	0.26	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bangka	13	0.23	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo, Indonesia	Bornean	86	0.21	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sasak	15	0.20	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Palembang	11	0.18	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Palu	28	0.18	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Toraja	49	0.16	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Malaysia	Kota Kinabalu	44	0.16	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sumatra, Indonesia	Sumatrans	38	0.16	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sumatra	95	0.15	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Highland Malagasy	133	0.14	Tofanelli et al. 2009

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Dayak	15	0.13	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Minangkabau	15	0.13	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Sulawesi	54	0.13	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Sulawesi, Indonesia	Sulawesi	54	0.13	Karafet et al. 2010
Austronesian	Malayo-Polynesian	East Asia	Taiwan, China	Yami	30	0.10	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Indian Ocean	Madagascar	Malagasy Cotiers	59	0.08	Tofanelli et al. 2009
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Makassar	13	0.08	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo	Ma'anyan	159	0.08	Kusuma et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Minahasa	14	0.07	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kletek Suai	15	0.07	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Kaili	15	0.07	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Flores, Indonesia	Flores Islanders	394	0.05	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Flores	394	0.05	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Flores	71	0.04	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	East Asia	Hainan Island, China	Utsat	72	0.04	Li et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	87	0.03	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	East Asia	Hainan, China	Tsat	31	0.03	Li et al. 2008b
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Tuvalu	100	0.03	Kayser et al. 2006
Austronesian	Malayo-Polynesian	East Asia	China	Paiwan	208	0.03	Arunkumar et al. 2015
Austronesian	Malayo-Polynesian	Island Southeast Asia	Eastern Indonesia	Solor	43	0.02	Mona et al. 2009, Mona et al. 2011
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	48	0.02	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	West Timor	Kateri	50	0.02	Tumonggor et al. 2014
Austronesian	Malayo-Polynesian	Oceania	Polynesia	Samoans	62	0.02	Kayser et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	69	0.01	Hong et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	210	0.01	Delfin et al. 2011
Chinese		East Asia	Guangxi, China	Han (Na Po)	82	0.55	Arunkumar et al. 2015
Chinese		East Asia	Guangxi, China	Han	82	0.54	Zhao et al. 2010
Chinese		East Asia	Guangxi, China	Pinghua	101	0.43	Gan et al. 2008
Chinese		East Asia	Guangxi, China	Pinghua-Han	101	0.43	Arunkumar et al. 2015
Chinese		East Asia	Nanning, Guangxi, China	Pinghua	38	0.37	Lu et al. 2013
Chinese		East Asia	Tiandong, Guangxi, China	Pinghua	20	0.30	Lu et al. 2013

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Chinese		East Asia	Pingguo, Guangxi, China	Pinghua	123	0.20	Lu et al. 2013
Chinese		East Asia	China	Han	165	0.06	Karafet et al. 2010
Chinese		East Asia	Taiwan, China	Taiwanese Han	352	0.04	Trejaut et al. 2014
Chinese		East Asia	Lanzhou, China	Han	30	0.03	Xue et al. 2006
Chinese		East Asia	Guangxi, China	Yao	60	0.03	Arunkumar et al. 2015
Chinese		East Asia	Yili, China	Han	32	0.03	Xue et al. 2006
Chinese		East Asia	Chendu, China	Han	34	0.03	Xue et al. 2006
Chinese		East Asia	Yunnan	Han	41	0.02	Hong et al. 2006
Chinese		East Asia	China	Han	890	0.01	Arunkumar et al. 2015
Dravidian		South Asia	Orissa, India	Gadabas	27	0.89	Chaubey et al. 2011
Dravidian		South Asia	South India	Konda Reddy	30	0.67	Sengupta et al. 2006
Dravidian		South Asia	East India	Dhongria Kondh	86	0.62	Arunkumar et al. 2015
Dravidian		South Asia	Chattishgarh, India	Nagesia	14	0.57	Kumar et al. 2007
Dravidian		South Asia	South India	Koya Dora	27	0.48	Sengupta et al. 2006
Dravidian		South Asia	Central India	Kamar	30	0.43	Sengupta et al. 2006
Dravidian		South Asia	East India	Binjhal	109	0.39	Arunkumar et al. 2015
Dravidian		South Asia	East India	Oraon	116	0.35	Arunkumar et al. 2015
Dravidian		South Asia	India: Jharkhand and Chattisgarh	Oraon	91	0.32	Kumar et al. 2007
Dravidian		South Asia	East India	Gond Ori	102	0.26	Arunkumar et al. 2015
Dravidian		South Asia	East India	Kisan	105	0.25	Arunkumar et al. 2015
Dravidian		South Asia	East India	Koya	103	0.24	Arunkumar et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Dravidian		South Asia	East India	Konda Kammara	51	0.24	Arunkumar et al. 2015
Dravidian		South Asia	Central India	Gond	40	0.20	Arunkumar et al. 2015
Dravidian		South Asia	East India	Konda Reddy	49	0.18	Arunkumar et al. 2015
Dravidian		South Asia	Northeastern India	Oraon	110	0.11	Borkar et al. 2011
Dravidian		South Asia	Central India	Muria	20	0.10	Sengupta et al. 2006
Dravidian		South Asia	East India	Jalari	99	0.08	Arunkumar et al. 2015
Dravidian		South Asia	South India	Madiga	49	0.04	Arunkumar et al. 2015
Dravidian		South Asia	South India	Thoda	27	0.04	Arunkumar et al. 2015
Dravidian		South Asia	South India	Sattibalija	100	0.03	Arunkumar et al. 2015
Dravidian		South Asia	South India	Nattukottai Chettiar	174	0.02	Arunkumar et al. 2015
Dravidian		South Asia	South India	Mala	98	0.02	Arunkumar et al. 2015
Dravidian		South Asia	West India	Gond Ma	56	0.02	Arunkumar et al. 2015
Dravidian		South Asia	South India	Billava	78	0.01	Arunkumar et al. 2015
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Yunnan)	49	0.31	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Guizhou)	49	0.16	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Pa Then	31	0.13	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Laos	Hmong	17	0.12	Arunkumar et al. 2015
Hmong-Mien	Hmongic	East Asia	Laos	Hmong	27	0.11	Arunkumar et al. 2015
Hmong-Mien	Hmongic	East Asia	Guangxi, China	Miao	58	0.10	Arunkumar et al. 2015
Hmong-Mien	Hmongic	East Asia	Southern China	Bunu (Southern)	20	0.10	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Hunan)	100	0.09	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Hmong (Daw)	51	0.06	Cai et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Hmong-Mien	Hmongic	East Asia	China	Miao	58	0.03	Karafet et al. 2010
Hmong-Mien	Ho Nte	East Asia	Guangxi, China	She	51	0.35	Arunkumar et al. 2015
Hmong-Mien	Ho Nte	East Asia	Southeastern China	She	34	0.09	Xue et al. 2006
Hmong-Mien	Ho The	East Asia	Southern China	She (Northern)	56	0.04	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Guangxi, China	Mien	11	0.36	Arunkumar et al. 2015
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Mountain)	32	0.31	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Lowland)	41	0.24	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Northern)	33	0.21	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Southern)	31	0.19	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Blue)	28	0.18	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Lowland)	31	0.16	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Western)	47	0.15	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Native)	41	0.07	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Liannan)	35	0.06	Xue et al. 2006
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Bama)	35	0.03	Xue et al. 2006
Hmong-Mien	Mienic	East Asia	China	Yao	60	0.02	Karafet et al. 2010
Indo-European	Indo-Aryan	South Asia	Orissa, India	Bhuiyan	81	0.84	Kumar et al. 2007
Indo-European	Indo-Aryan	South Asia	Orissa, India	Baiga	42	0.81	Chaubey et al. 2011
Indo-European	Indo-Aryan	South Asia	Jharkhand, India	Mawasi	27	0.67	Chaubey et al. 2011
Indo-European	Indo-Aryan	South Asia	Chattishgarh, India	Pando	23	0.65	Kumar et al. 2007
Indo-European	Indo-Aryan	South Asia	Madhya-Pradesh, India	Baiga	23	0.52	Chaubey et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Indo-European	Indo-Aryan	South Asia	Central India	Kamar	20	0.50	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Chattishgarh, India	Kanwar	41	0.39	Kumar et al. 2007
Indo-European	Indo-Aryan	South Asia	Orissa, India	Bathudi	36	0.36	Kumar et al. 2007
Indo-European	Indo-Aryan	South Asia	Central India	Halba	21	0.29	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Bangladesh	Chakma	89	0.16	Gazi et al. 2013
Indo-European	Indo-Aryan	South Asia	Northeastern India	Rajbanshi	45	0.16	Borkar et al. 2011
Indo-European	Indo-Aryan	South Asia	West India	Kolam	37	0.14	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Northeastern India	Paharia	100	0.13	Borkar et al. 2011
Indo-European	Indo-Aryan	South Asia	Morang, Nepal	Tharu	37	0.11	Fornarino et al. 2009
Indo-European	Indo-Aryan	South Asia	West Bengal, India	Lodha	47	0.09	Kumar et al. 2007
Indo-European	Indo-Aryan	South Asia	East India	Relli	109	0.06	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Haldwani, India	Tharu	22	0.05	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	Deoria, India	Tharu	47	0.04	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	East India	Khandayat	48	0.04	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	South India	Namboodiri	51	0.04	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Eastern India	Bengali	54	0.04	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	West India	Vasava	87	0.03	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Central India	Halba	68	0.03	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Allahabad, India	Tharu	37	0.03	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	Mahrajganj, India	Tharu	42	0.02	Chaubey et al. 2014
Indo-European	Indo-Aryan	South Asia	West India	Siddi	50	0.02	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	Eastern India	Rajbanshi	51	0.02	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	Northeast India	Kalita	114	0.02	Arunkumar et al. 2015
Indo-European	Indo-Aryan	South Asia	West India	Charan	69	0.01	Arunkumar et al. 2015

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Japonic		East Asia	Japan	Japanese	2390	0.01	Sato et al. 2014
Mongolic		East Asia	Northwest China	Bonan	27	0.19	Shou et al. 2010
Mongolic		East Asia	Northeastern China	Daur	39	0.15	Xue et al. 2006
Mongolic		East Asia	China	Mongols	73	0.07	Arunkumar et al. 2015
Mongolic		East Asia	Northwest China	Monguor (Tu)	50	0.02	Shou et al. 2010
Mongolic		East Asia	Northwest China	Mongols	50	0.02	Shou et al. 2010
Tai-Kadai	Hlai	East Asia	Southern China	Li (Hlai)	34	0.59	Xue et al. 2006
Tai-Kadai	Hlai	East Asia	Hainan, China	Hlai	34	0.29	Li et al. 2008b
Tai-Kadai	Hlai	East Asia	Hainan, China	Jiamao	27	0.22	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Laos	Tai Mene	24	0.83	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Laos	Tai Deang	44	0.82	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	22	0.73	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Laos	Saek	30	0.67	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Laos	Tai Dam	50	0.66	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Laos	Phuan	22	0.59	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Maonan	32	0.56	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Laos	Lao	59	0.54	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Laos	Phu Tai	24	0.54	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Laos	Rien	50	0.54	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Northern Cambodia	Lao	27	0.52	Zhang et al. 2014
Tai-Kadai	Kam-Tai	East Asia	Stung Treng, Cambodia	Lao	27	0.52	Zhang et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guizhou, China	Then	30	0.50	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Thailand	Thai	50	0.48	Hong et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Sui (Shui)	50	0.44	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	21	0.43	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	21	0.43	Gan et al. 2008
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Dong	38	0.39	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Southern China	Bouyei (Buyi)	35	0.37	Xue et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Laos	Lao	25	0.36	He et al. 2012
Tai-Kadai	Kam-Tai	East Asia	Laos	Kang	12	0.33	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	40	0.30	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	51	0.27	Deng et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Kam	27	0.26	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Minz-Zhuang	63	0.24	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Yala, Thailand	Thai	99	0.22	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Central Thailand	Thai	501	0.22	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Man-Caolan	30	0.20	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Chadong	21	0.19	Deng et al. 2013
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	63	0.19	Zhao et al. 2010
Tai-Kadai	Kam-Tai	East Asia	Guangdong, China	Biao	34	0.18	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Thai	17	0.18	He et al. 2012
Tai-Kadai	Kam-Tai	East Asia	Hainan, China	Lingao	30	0.13	Li et al. 2008b
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Zhuang	39	0.13	Chen et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	11	0.09	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Laka	23	0.09	Arunkumar et al. 2015
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Cao Miao	33	0.03	Li et al. 2008b
Tai-Kadai	Kam-Tai	South Asia	Northeast India	Ahom	36	0.03	Arunkumar et al. 2015
Tai-Kadai	Kra	East Asia	Guizhou, China	Mollao	30	0.63	Li et al. 2008b

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Tai-Kadai	Kra	East Asia	Guangxi, China	Yerong	16	0.63	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Yunnan, China	Laqua	25	0.60	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Yunnan, China	White Gelao	14	0.43	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Guizhou, China	Red Gelao	31	0.16	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Guizhou, China	Qau	13	0.15	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Yunnan, China	Lachi	30	0.10	Li et al. 2008b
Tai-Kadai	Kra	East Asia	Hainan, China	Gelong	79	0.04	Li et al. 2010
Tai-Kadai	Kra	East Asia	Guangxi, China	Blue Gelao	30	0.03	Li et al. 2008b
Tibeto-Burman	Central Tibeto-Burman	South Asia	Northeast India	Mishing	33	0.06	Arunkumar et al. 2015
Tibeto-Burman	Central Tibeto-Burman	South Asia	Northeast India	Galo	84	0.01	Arunkumar et al. 2015
Tibeto-Burman	Ngwi-Burmese	East Asia	Laos	Phunoi	27	0.48	Arunkumar et al. 2015
Tibeto-Burman	Ngwi-Burmese	East Asia	Myanmar	Bamar	59	0.17	Peng et al. 2014
Tibeto-Burman	Ngwi-Burmese	South Asia	Bangladesh	Marma	60	0.17	Gazi et al. 2013
Tibeto-Burman	Ngwi-Burmese	East Asia	Southern China	Hani	34	0.06	Xue et al. 2006
Tibeto-Burman	Ngwi-Burmese	East Asia	Thailand	Akha	27	0.04	Trejaut et al. 2014
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Central China	Qiang	33	0.09	Xue et al. 2006
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	China	Baima	136	0.02	Arunkumar et al. 2015
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	China	Qiang	170	0.02	Arunkumar et al. 2015
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	China	Queyu	148	0.01	Arunkumar et al. 2015
Tibeto-Burman	Sal	South Asia	Northeastern India	Mech	20	0.55	Borkar et al. 2011
Tibeto-Burman	Sal	South Asia	Northeast India	Mizo	27	0.48	Sengupta et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M95	Reference
Tibeto-Burman	Sal	South Asia	Northeast India	Kuki	77	0.44	Arunkumar et al. 2015
Tibeto-Burman	Sal	South Asia	Northeast India	Garo	107	0.21	Arunkumar et al. 2015
Tibeto-Burman	Sal	South Asia	Northeast India	Karbi	109	0.19	Arunkumar et al. 2015
Tibeto-Burman	Sal	South Asia	Meghalaya, India	Garo	33	0.18	Kumar et al. 2007
Tibeto-Burman	Sal	South Asia	Bangladesh	Tripuri	88	0.18	Gazi et al. 2013
Tibeto-Burman	Sal	South Asia	Meghalaya, India	Garo	25	0.16	Chaubey et al. 2011
Tibeto-Burman	Sal	South Asia	Eastern India	Mech	36	0.11	Debnath et al. 2011
Tibeto-Burman	Sal	South Asia	Northeast India	Jamatia	30	0.07	Sengupta et al. 2006
Tibeto-Burman	Sal	South Asia	Northeast India	Tripuri	21	0.05	Sengupta et al. 2006
Tibeto-Burman	Sal	South Asia	Northeast India	Meitei	124	0.03	Arunkumar et al. 2015
Tibeto-Burman	Sal	South Asia	Eastern India	Dhimal	36	0.03	Debnath et al. 2011
Tibeto-Burman	Sal	South Asia	Northeast India	Naga	67	0.01	Arunkumar et al. 2015
Tibeto-Burman	Western Tibeto-Burman	South Asia	Northeastern India	Lachung	20	0.45	Borkar et al. 2011
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Xinlong)	46	0.02	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Yajiang)	47	0.02	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	China	Tibetan Amdo	260	0.02	Arunkumar et al. 2015
Tibeto-Burman	Western Tibeto-Burman	East Asia	China	Tibetan Khams	200	0.02	Arunkumar et al. 2015
Tungusic		East Asia	Northern China	Evenks	26	0.04	Xue et al. 2006
Tungusic		East Asia	China	Manchu	219	0.02	Arunkumar et al. 2015
Turkic		East Asia	Northwest China	Salar	35	0.03	Shou et al. 2010

Supplementary Table 15.10. Frequency and Distribution of O2a2a1a2-M7 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M7	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Ngeq	35	0.49	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Jeh	32	0.47	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Oy	50	0.34	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Brau	32	0.25	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Laven	50	0.24	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Talieng	35	0.23	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Katu	45	0.22	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Kataang	38	0.18	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Alak	31	0.13	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	76	0.11	He et al. 2012
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Inh	34	0.09	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Sô	50	0.08	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Bo	28	0.07	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	70	0.06	Karafet et al. 2010
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Lamet	35	0.06	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Suy	39	0.03	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Mal	50	0.02	Cai et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Laos	Khmu	51	0.02	Cai et al. 2011
Austronesian	Formosan	East Asia	Taiwan, China	Yunlin	21	0.05	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtung)	85	0.04	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Kaohsiung)	40	0.03	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Borneo, Indonesia	Bornean	86	0.20	Karafet et al. 2010

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M7	Reference
Austronesian	Malayo-Polynesian	East Asia	Malaysia	Malaysians	32	0.13	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Java, Indonesia	Javanese	61	0.11	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Tengger	12	0.08	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Bangka	13	0.08	Li et al. 2008b
Austronesian	Malayo-Polynesian	Island Southeast Asia	Indonesia	Torajan	15	0.07	Li et al. 2008b
Austronesian	Malayo-Polynesian	East Asia	Vietnam	Cham	59	0.05	He et al. 2012
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	48	0.02	Karafet et al. 2010
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	0.02	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Bali	Balinese	641	0.01	Karafet et al. 2010
Chinese		East Asia	Meixian, China	Han	35	0.06	Xue et al. 2006
Chinese		East Asia	Yili, China	Han	32	0.03	Xue et al. 2006
Chinese		East Asia	Guangxi, China	Pinghua	101	0.03	Gan et al. 2008
Chinese		East Asia	China	Han	165	0.02	Karafet et al. 2010
Chinese		East Asia	Pingguo, Guangxi, China	Pinghua	123	0.02	Lu et al. 2013
Chinese		East Asia	Taiwan, China	Taiwanese Han	352	0.01	Trejaut et al. 2014
Hmong-Mien	Hmongic	East Asia	China	Miao	58	0.36	Karafet et al. 2010
Hmong-Mien	Hmongic	East Asia	Southern China	Hmong (Daw)	51	0.33	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Yunnan)	49	0.12	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Bunu (Southern)	20	0.10	Cai et al. 2011

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M7	Reference
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Guizhou)	49	0.04	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Miao (Hunan)	100	0.04	Cai et al. 2011
Hmong-Mien	Hmongic	East Asia	Southern China	Pa Then	31	0.03	Cai et al. 2011
Hmong-Mien	Ho Nte	East Asia	China	She	51	0.57	Karafet et al. 2010
Hmong-Mien	Ho Nte	East Asia	Southeastern China	She	34	0.29	Xue et al. 2006
Hmong-Mien	Ho The	East Asia	Southern China	She (Northern)	56	0.25	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Liannan)	35	0.51	Xue et al. 2006
Hmong-Mien	Mienic	East Asia	China	Yao	60	0.48	Karafet et al. 2010
Hmong-Mien	Mienic	East Asia	Southern China	Yao (Bama)	35	0.34	Xue et al. 2006
Hmong-Mien	Mienic	East Asia	Southern China	Zaomin	37	0.32	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Native)	41	0.07	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Southern)	31	0.06	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Straggler)	20	0.05	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Kimmun (Blue)	28	0.04	Cai et al. 2011
Hmong-Mien	Mienic	East Asia	Southern China	Mien (Western)	47	0.02	Cai et al. 2011
Koreanic		East Asia	Korea	Koreans	706	0.00	Park et al. 2012
Tai-Kadai	Kam-Tai	East Asia	Southern China	Bouyei (Buyi)	35	0.17	Xue et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Mulam	11	0.09	Gan et al. 2008
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Khon Muang	191	0.09	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Yong	26	0.08	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Lue	91	0.07	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Shan	20	0.05	Brunelli et al. 2017
Tai-Kadai	Kam-Tai	East Asia	Guangxi, China	Laka	23	0.04	Gan et al. 2008
Tai-Kadai	Kam-Tai	East Asia	Northern Thailand	Yuan	85	0.02	Brunelli et al. 2017

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M7	Reference
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	China	Tujia	49	0.06	Karafet et al. 2010
Tibeto-Burman	Northeastern Tibeto-Burman	East Asia	Sichuan, China	Horpa (Danba)	18	0.06	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Yajiang)	47	0.04	Wang et al. 2014
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Xinlong)	46	0.02	Wang et al. 2014
Tungusic		East Asia	Northern China	Oroquen	31	0.03	Xue et al. 2006

Supplementary Table 15.11. Distribution and Frequency of O2a2b1a1a-M133 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-M133	Reference
Austronesian	Formosan	East Asia	Taiwan, China	Yunlin	21	0.38	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Kaohsiung)	40	0.35	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Papura	18	0.22	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Kategalan	30	0.17	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainen Coast)	38	0.13	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Tainan)	30	0.10	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Pazeh	40	0.10	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Hwalien)	38	0.08	Trejaut et al. 2014
Austronesian	Formosan	East Asia	Taiwan, China	Siraya (Pingtun)	85	0.02	Trejaut et al. 2014
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	146	0.01	Trejaut et al. 2014
Chinese		East Asia	Taiwan, China	Taiwanese Han	352	0.22	Trejaut et al. 2014
Koreanic		East Asia	Korea	Koreans	706	0.12	Park et al. 2012
Tibeto-Burman	Ngwi-Burmese	East Asia	Thailand	Akha	27	0.04	Trejaut et al. 2014

Supplementary Table 15.12. Frequency and Distribution of O1b2-SRY465 (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-SRY465	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	70	0.01	Karafet et al. 2010
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	48	0.04	Kim et al. 2011
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	41	0.12	Hong et al. 2006
Austronesian	Malayo-Polynesian	Island Southeast Asia	Philippines	Filipinos	69	0.01	Hong et al. 2006
Austronesian	Malayo-Polynesian	East Asia	Indonesia	Indonesians	36	0.17	Hong et al. 2006
Chinese		East Asia	Taiwan, China	Taiwanese Han	352	0.01	Trejaut et al. 2014
Chinese		East Asia	Beijing	Han	65	0.06	Hong et al. 2006
Chinese		East Asia	Beijing, China	Han	51	0.02	Kim et al. 2011
Chinese		East Asia	Yunnan	Han	41	0.10	Hong et al. 2006
Japonic		East Asia	Japan	Japanese	2390	0.10	Sato et al. 2014
Japonic		East Asia	Japan	Japanese	263	0.08	Naitoh et al. 2013
Japonic		East Asia	Japan	Japanese	157	0.05	Kim et al. 2011
Japonic		East Asia	Japan	Japanese	107	0.07	Hong et al. 2006
Koreanic		East Asia	Korea	Koreans	706	0.22	Park et al. 2012
Koreanic		East Asia	Korea	Koreans	706	0.01	Kwon et al. 2015
Koreanic		East Asia	Korea	Koreans	506	0.23	Kim et al. 2011
Koreanic		East Asia	Korea	Koreans	154	0.14	Hong et al. 2006
Mongolic		East Asia	Mongolia	Mongols	160	0.01	Di Cristofaro et al. 2013
Mongolic		East Asia	Mongolia	Buryat	50	0.02	Hong et al. 2006
Mongolic		East Asia	Northeastern China	Daur	39	0.03	Xue et al. 2006

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-SRY465	Reference
Mongolic		East Asia	Mongolia	Buryats	36	0.03	Kim et al. 2011
Tibeto-Burman	Western Tibeto-Burman	East Asia	Sichuan, China	Khams (Xinlong)	46	0.02	Wang et al. 2014
Tungusic		East Asia	Manchuria	Manchu	48	0.08	Hong et al. 2006
Tungusic		East Asia	Northeastern China	Nanai (Hezhe)	45	0.04	Xue et al. 2006
Tungusic		East Asia	Northwestern China	Xibe	41	0.02	Xue et al. 2006
Tungusic		East Asia	Northeastern China	Manchu	35	0.06	Xue et al. 2006
Tungusic		East Asia	Manchuria, China	Manchus	30	0.03	Kim et al. 2011
Tungusic		Northern Eurasia	Southeastern Siberia	Udege	21	0.10	Jin et al. 2010

Supplementary Table 15.13. Frequency and Distribution of O1b2a1a1-47z (Language View).

Lang Family	Sub Fam 1	Region	Location	Population	Sample Size	O-47z	Reference
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	41	0.05	Hong et al. 2006
Austro-Asiatic	Mon-Khmer	East Asia	Vietnam	Vietnamese	70	0.03	Karafet et al. 2010
Austronesian	Malayo-Polynesian	East Asia	Indonesia	Indonesians	36	0.03	Hong et al. 2006
Japonic		East Asia	Japan	Japanese	263	0.25	Naitoh et al. 2013
Japonic		East Asia	Japan	Japanese	157	0.24	Kim et al. 2011
Japonic		East Asia	Japan	Japanese	2390	0.22	Sato et al. 2014
Japonic		East Asia	Japan	Japanese	107	0.20	Hong et al. 2006
Koreanic		East Asia	Korea	Koreans	706	0.10	Kwon et al. 2015
Koreanic		East Asia	Korea	Koreans	706	0.10	Park et al. 2012
Koreanic		East Asia	Korea	Koreans	506	0.09	Kim et al. 2011
Koreanic		East Asia	Korea	Koreans	154	0.06	Hong et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Thailand	Thai	50	0.04	Hong et al. 2006
Tai-Kadai	Kam-Tai	East Asia	Thailand	Thai	40	0.03	Kim et al. 2011
Tungusic		East Asia	Manchuria	Manchu	48	0.19	Hong et al. 2006

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Supplementary Tables for Chapter 16 and Haplogroup Q-M242

Supplementary Table 16.1. Survey of Q-M242 among Eurasian Populations.

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
Baltic	Estonia	Estonians	Uralic	118	0.85%	Lappalainen et al. 2008
Baltic	Latvia	Latvians	Indo-European	113	0.88%	Lappalainen et al. 2008
Caucasus	Georgia	Abkhaz	Kabardians	162	0.62%	Yunubayev et al. 2012
Caucasus	Russia	Kabardians	Kabardians	140	0.71%	Yunubayev et al. 2012
Caucasus	Russia	Cherkessians	North Caucasian	126	0.79%	Yunubayev et al. 2012
Caucasus	Caucasus	Abazins	North Caucasian	88	3.41%	Yunubayev et al. 2012
Caucasus	Russia	Balkars	Turkic	135	3.70%	Yunubayev et al. 2012
Caucasus	Russia	Chechens	North Caucasian	165	4.85%	Yunubayev et al. 2012
Caucasus	Daghestan	Tat	Indo-European	24	12.50%	Karafet et al. 2016
Central Asia	Kyrgyzstan	Kyrgyz	Turkic	132	0.76%	Di Cristofaro 2013
Central Asia	Afghanistan	Tajiks	Turkic	56	1.79%	Haber et al. 2012
Central Asia	Afghanistan	Pashtuns	Indo-European	87	2.30%	Di Cristofaro 2013
Central Asia	Afghanistan	Hazara	Indo-European	77	2.60%	Di Cristofaro 2013
Central Asia	Afghanistan	Pathans	Indo-European	190	3.16%	Lacau et al. 2012
Central Asia	Afghanistan	Tajiks	Turkic	142	3.52%	Di Cristofaro 2013
Central Asia	Kazakhstan	Kazakh (Shymkent)	Turkic	55	3.64%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek (Fergana)	Turkic	67	4.48%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Karakalpak	Turkic	100	6.00%	Zhabagin et al. 2017
Central Asia	Afghanistan	Hazara	Indo-European	60	6.67%	Haber et al. 2012
Central Asia	Afghanistan	Uzbek	Turkic	127	8.66%	Di Cristofaro 2013
Central Asia	Uzbekistan	Dungan	Sino-Tibetan	31	9.68%	Zhabagin et al. 2017

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
Central Asia	Kazakhstan	Kazakh (Kazaly)	Turkic	81	9.88%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek (Xorezm)	Turkic	98	11.22%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Uzbek (Tashkent)	Turkic	52	17.31%	Zhabagin et al. 2017
Central Asia	Afghanistan	Pashtuns	Indo-European	49	18.37%	Haber et al. 2012
Central Asia	Afghanistan	Turkmen	Turkic	74	33.78%	Di Cristofaro 2013
Central Asia	Uzbekistan	Turkmen (Xo'jayli)	Turkic	62	70.97%	Zhabagin et al. 2017
Central Asia	Uzbekistan	Turkmen (Shumanay)	Turkic	21	80.95%	Zhabagin et al. 2017
East Asia	Xizang, China	Tibetans	Sino-Tibetan	222	0.45%	Zhong et al. 2011
East Asia	Liaoning, China	Manchu	Tungusic	109	0.92%	Zhong et al. 2011
East Asia	Guizhou, China	Han	Sino-Tibetan	231	1.30%	Zhong et al. 2011
East Asia	Sichuan, China	Han	Sino-Tibetan	62	1.61%	Zhong et al. 2011
East Asia	Heilongjiang, China	Han	Sino-Tibetan	124	1.61%	Zhong et al. 2011
East Asia	Shandong	Han	Sino-Tibetan	115	1.74%	Zhong et al. 2011
East Asia	Guangxi, China	Yao	Hmong-Mien	55	1.82%	Zhong et al. 2011
East Asia	Korea	Koreans	Koreanic	706	1.84%	Park et al. 2012
East Asia	Northwestern China	Mongols	Mongolic	50	2.00%	Shou et al. 2010
East Asia	Northwestern China	Monguor (Tu)	Mongolic	50	2.00%	Shou et al. 2010
East Asia	Guizhou, China	Miao	Hmong-Mien	45	2.22%	Zhong et al. 2011
East Asia	Northwestern China	Kyrgyz	Turkic	45	2.22%	Shou et al. 2010
East Asia	Guangxi, China	Gin (Jing)	Austro-Asiatic	45	2.22%	Zhong et al. 2011

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
East Asia	Hunan, China	Dong	Tai-Kadai	45	2.22%	Zhong et al. 2011
East Asia	Yunnan, China	Han	Sino-Tibetan	133	2.26%	Zhong et al. 2011
East Asia	Zhejiang, China	Han	Sino-Tibetan	85	2.35%	Zhong et al. 2011
East Asia	Liaoning, China	Han	Sino-Tibetan	40	2.50%	Zhong et al. 2011
East Asia	Guizhou, China	Tujia	Sino-Tibetan	33	3.03%	Zhong et al. 2011
East Asia	Ningxia, China	Hui	Austro-Asiatic	62	3.23%	Zhong et al. 2011
East Asia	Yunnan, China	Hani	Sino-Tibetan	60	3.33%	Zhong et al. 2011
East Asia	Jilin, China	Han	Sino-Tibetan	84	3.57%	Zhong et al. 2011
East Asia	Shanxi, China	Han	Sino-Tibetan	112	3.57%	Zhong et al. 2011
East Asia	Northwestern China	Uyghur	Turkic	50	4.00%	Shou et al. 2010
East Asia	Heilongjiang, China	Manchu	Tungusic	24	4.17%	Zhong et al. 2011
East Asia	Sichuan, China	Khams (Xinlong)	Sino-Tibetan	46	4.35%	Wang et al. 2014
East Asia	Henan, China	Han	Sino-Tibetan	66	4.55%	Zhong et al. 2011
East Asia	Inner Mongolia	Mongols	Mongolic	22	4.55%	Zhong et al. 2011
East Asia	Hunan, China	Han	Sino-Tibetan	61	4.92%	Zhong et al. 2011
East Asia	Northwestern China	Russ	Indo-European	19	5.26%	Shou et al. 2010
East Asia	Gansu, China	Han	Sino-Tibetan	221	5.43%	Zhong et al. 2011
East Asia	Xinjiang, China	Keriyans	Turkic	70	5.71%	Chen et al. 2014
East Asia	Xingjiang, China	Uyghurs	Turkic	187	5.88%	Zhong et al. 2011
East Asia	Mongolia	Mongols	Mongolic	160	6.25%	Di Cristofaro 2013
East Asia	Chongqing, China	Han	Sino-Tibetan	43	6.98%	Zhong et al. 2011
East Asia	Vietnam	Vietnamese	Austro-Asiatic	71	7.04%	Karafet et al. 2015

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
East Asia	Anhui, China	Han	Sino-Tibetan	52	7.69%	Zhong et al. 2011
East Asia	Jiangsu, China	Han	Sino-Tibetan	39	7.69%	Zhong et al. 2011
East Asia	Ayeyarwady region, Myanmar	Bamar	Sino-Tibetan	11	18.18%	Peng et al. 2014
East Asia	Northwestern China	Dongxiang	Mongolic	35	22.86%	Shou et al. 2010
East Asia	Xinjiang, China	Chinese Tuva	Turkic	150	25.33%	Chen et al. 2011
East Asia	Western Mongolia	Mongols	Mongolic	22	100.00%	Battaglia et al. 2013
Eastern Europe	Belarus	Belarusians	Indo-European	565	0.18%	Kushniarevich et al. 2013
Eastern Europe	Bulgaria	Bulgarians	Indo-European	808	0.50%	Karachanak et al. 2013
Eastern Europe	Moldolva	Moldavians	Indo-European	125	0.80%	Varzari et al. 2013
Mediterranean	Crete	Cretans	Indo-European	168	1.19%	Martinez et al. 2007
Mediterranean	Sicily	Sicilians	Indo-European	236	2.54%	Di Gaetano et al. 2009
Middle East	Salmast, Iran	Armenians	Indo-European	199	1.51%	Hovhannisyan et al. 2014
Middle East	Lebanon	Lebanese	Afro-Asiatic	125	1.60%	Haber et al. 2016
Middle East	Turkey	Turks	Turkic	523	1.91%	Cinnioglu et al. 2004
Middle East	Iraq	Iraqis	Afro-Asiatic	154	1.95%	Al Zahery et al. 2011
Middle East	Lebanon	Lebanese	Afro-Asiatic	914	1.97%	Zalloua et al. 2008
Middle East	Iran	Iranians	Indo-European	186	2.69%	Di Cristofaro 2013
Middle East	Iraq	Marsh Arabs	Afro-Asiatic	143	2.80%	Al Zahery et al. 2011
Middle East	Iran	Iranians	Indo-European	150	4.00%	Regueiro et al. 2006
Northern Eurasia	Sakha Republic	Yakuts	Turkic	184	0.54%	Pakendorf et al. 2006
Northern Eurasia	Siberia, Russia	Nenets	Uralic	148	1.35%	Tambets et al. 2004

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
Northern Eurasia	Siberia, Russia	Even	Tungusic	63	3.17%	Malyarchuk et al. 2011
Northern Eurasia	Republic of Khakassia, Russia	Khakas	Turkic	176	3.98%	Gubina et al. 2013
Northern Eurasia	Republic of Khakassia	Khakas	Turkic	251	4.78%	Kharkov et al. 2011
Northern Eurasia	Tuva Republic, Russai	Tuvans	Turkic	102	4.90%	Gubina et al. 2013
Northern Eurasia	Siberia, Russia	Khakas	Turkic	64	6.25%	Malyarchuk et al. 2011
Northern Eurasia	Altai Republic, Russia	Altaians	Turkic	59	8.47%	Gubina et al. 2013
Northern Eurasia	Siberia, Russia	Koryaks	Chukotko-Kamchatkan	39	10.26%	Malyarchuk et al. 2011
Northern Eurasia	Siberia, Russia	Tatars	Turkic	776	10.95%	Agdzhoyan et al. 2016
Northern Eurasia	Chukotka	Chukchi	Chukotko-Kamchatkan	24	12.50%	Lell et al. 2002
Northern Eurasia	Tuva Republic, Russia	Tuvans	Turkic	419	13.13%	Kharkov et al. 2013
Northern Eurasia	Altai Republic, Russia	Altaians	Turkic	146	13.70%	Kharkov et al. 2007
Northern Eurasia	Sakha Republic	Tuvans	Turkic	55	16.36%	Pakendorf et al. 2006
Northern Eurasia	Tuva Republic	Mongolians	Mongolic	146	16.44%	Regueiro et al. 2013
Northern Eurasia	Sakha Republic	Koryaks	Chukotko-Kamchatkan	12	16.67%	Pakendorf et al. 2007

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
Northern Eurasia	Siberia, Russia	Altaians	Turkic	98	17.35%	Tambets et al. 2004
Northern Eurasia	Chukotka	Yupik	Eskimo-Aleut	33	21.21%	Lell et al. 2002
Northern Eurasia	Altai Republic	Altaians	Turkic	189	24.34%	Dulik et al. 2012a
Northern Eurasia	Krasnoyarsk Krai	Enets	Uralic	4	25.00%	Flegontov et al. 2016b
Northern Eurasia	Siberia, Russia	Altaians	Turkic	89	25.84%	Malyarchuk et al. 2011
Northern Eurasia	Siberia, Russia	Yupik	Eskimo-Aleut	32	28.13%	Regueiro et al. 2013
Northern Eurasia	Sakha Republic	Yukaghir	Yukaghir	13	30.77%	Pakendorf et al. 2006
Northern Eurasia	Siberia, Russia	Tuva	Turkic	108	37.96%	Malyarchuk et al. 2011
Northern Eurasia	Siberia, Russia	Todjins	Turkic	26	38.46%	Malyarchuk et al. 2011
Northern Eurasia	Krasnoyarsk Krai	Selkup	Uralic	7	57.14%	Flegontov et al. 2016b
Northern Eurasia	Siberia, Russia	Selkups	Uralic	131	66.41%	Tambets et al. 2004
Northern Eurasia	Krasnoyarsk Krai	Kets	Yeniseian	20	90.00%	Flegontov et al. 2016b
Northern Eurasia	Siberia, Russia	Kets	Yeniseian	48	93.75%	Tambets et al. 2004
Northern Eurasia	Kamchatka Peninsula	Koryaks	Chukotko-Kamchatkan	5	100.00%	Battaglia et al. 2013
Scandinavia	Finland	Finns	Uralic	536	0.19%	Lappalainen et al. 2006

Region	Location	Population	Language Family	Sample Size	Percent Q-M242	Reference
South Asia	India and Nepal	Tharu	Indo-European	240	1.67%	Chaubey et al. 2014
South Asia	Madhya Pradesh	Saharia	Indo-European	57	1.75%	Sharma et al. 2009
South Asia	Kashmir	Gujars	Indo-European	49	2.04%	Sharma et al. 2009
South Asia	Pakistan	Burusho	Isolate	92	2.17%	Firasat et al. 2007
South Asia	Madhya Pradesh	Brahmins	Indo-European	42	4.76%	Sharma et al. 2009
South Asia	Pakistan	Sindhi	Indo-European	21	4.76%	Di Cristofaro 2013
South Asia	Pakistan	Pathans	Indo-European	270	5.19%	Lee et al. 2014
South Asia	Pakistan	Pathan	Indo-European	96	5.21%	Firasat et al. 2007
South Asia	Bihar	Brahmins	Indo-European	38	5.26%	Sharma et al. 2009
South Asia	Gujarat, India	Gamit	Indo-European	18	5.56%	Khurana et al. 2014
South Asia	Kashmir	Pandits	Indo-European	51	5.88%	Sharma et al. 2009
South Asia	Madhya Pradesh	Gonds	Dravidian	64	6.25%	Sharma et al. 2009
South Asia	Uttar Pradesh	Brahmins	Indo-European	31	6.45%	Sharma et al. 2009
South Asia	Pakistan	Hazara	Indo-European	25	8.00%	Di Cristofaro 2013
South Asia	Pakistan	Pathans	Indo-European	20	10.00%	Di Cristofaro 2013
Western Europe	Flanders Region, Netherlands and Belgium	Flemish	Indo-European	773	0.39%	Larmuseau et al. 2013

Supplementary Table 16.2. Survey of Q-M242 among Native American Populations.

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
Central America	Central America	Bribri and Cabecar	Chibchan	11	100%	Lell et al. 2002
Central America	Central America	Guaymi (Ngäbe, Ngöbe)	Chibchan	8	100%	Lell et al. 2002
Central America	Central America	Boruca	Chibchan	16	100%	Lell et al. 2002
Central America	Nicaragua	Rama	Chibchan	10	100%	Melton et al. 2013
Central America	Costa Rica	Huetar	Chibchan	11	100%	Melton et al. 2013
Central America	Costa Rica	Abrojo-Guaymi	Chibchan	13	100%	Melton et al. 2013
Central America	Costa Rica	Maleku	Chibchan	6	100%	Melton et al. 2013
Central America	Panama	Kuna	Chibchan	16	100%	Melton et al. 2013, Accunce et al. 2008
Central America	Panama	Guaymi (Ngäbe, Ngöbe)	Chibchan	29	100%	Melton et al. 2013, Accunce et al. 2008
Central America	Panama	Teribe	Chibchan	12	100%	Melton et al. 2013, Ruiz-Narvaez et al. 2005
Central America	Panama	Bribri	Chibchan	13	100%	Melton et al. 2013, Ruiz-Narvaez et al. 2005
Central America	Panama	Cabecar	Chibchan	23	100%	Melton et al. 2013, Ruiz-Narvaez et al. 2005
Central America	Costa Rica/Panama	Guaymi (Ngäbe, Ngöbe)	Chibchan	17	100%	Zegura et al. 2004
Central America	Panama	Kuna	Chibchan	9	100%	Zegura et al. 2004
Central America	Panama	Emberá	Chocoan	30	100%	Melton et al. 2013, Accunce et al. 2008
Central America	Mexico	Seri	Isolate	15	100%	Malhi et al. 2008
Central America	Mexico and Guatamala	Mayans	Mayan	288	100%	Perez-Benedico et al. 2016
Central America	Chiapas, Mexico	Tzotzil	Mayan	4	100%	Rangel-Villalobos et al. 2008
Central America	Guatamala	Mayans	Mayan	39	100%	Regueiro et al. 2013
Central America	Yucatan, Mexico	Mayans	Mayan	56	100%	Regueiro et al. 2013

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
Central America	Mexico	Maya	Mayan	14	100%	Sandoval et al. 2012
Central America	Mexico	Maya	Mayan	62	100%	Zegura et al. 2004
Central America	Mexico	Mixe	Mixe-Zoquean	7	100%	Kemp et al. 2010
Central America	Mexico	Mixe	Mixe-Zoquean	12	100%	Zegura et al. 2004
Central America	Mexico	Zapotec	Otomanguean	6	100%	Kemp et al. 2010
Central America	Mexico	Mixtec	Otomanguean	20	100%	Kemp et al. 2010
Central America	Mexico	Trique	Otomanguean	22	100%	Sandoval et al. 2012
Central America	Mexico	Mixtec	Otomanguean	2	100%	Sandoval et al. 2012
Central America	Mexico	Otomi	Otomanguean	4	100%	Sandoval et al. 2012
Central America	Mexico	Mixtec	Otomanguean	26	100%	Zegura et al. 2004
Central America	Mexico	Zapotec	Otomanguean	12	100%	Zegura et al. 2004
Central America	Michoacan, Mexico	Purépecha	Tarascan	15	100%	Rangel-Villalobos et al. 2008
Central America	Mexico	Purépecha	Tarascan	6	100%	Sandoval et al. 2012
Central America	Costa Rica	Chorotega	Unclassified	11	100%	Melton et al. 2013
Central America	Mexico	Nahua-Cuetzalan	Uto-Aztecan	10	100%	Kemp et al. 2010
Central America	Mexico	Tarahumara	Uto-Aztecan	19	100%	Kemp et al. 2010
Central America	Mexico	Nahua-Atocpan	Uto-Aztecan	6	100%	Kemp et al. 2010
Central America	Mexico	Huichol	Uto-Aztecan	12	100%	Kemp et al. 2010
Central America	Mexico	Cora	Uto-Aztecan	43	100%	Kemp et al. 2010
Central America	Jalisco and Nayarit, Mexico	Huichol	Uto-Aztecan	34	100%	Rangel-Villalobos et al. 2008
Central America	South of Puebla, Mexico	Nahua	Uto-Aztecan	27	100%	Rangel-Villalobos et al. 2008
Central America	Chihuahua, Mexico	Tarahumara	Uto-Aztecan	11	100%	Rangel-Villalobos et al. 2008
Central America	Mexico	Pima	Uto-Aztecan	49	100%	Sandoval et al. 2012
Central America	Mexico	Nahua	Uto-Aztecan	58	100%	Sandoval et al. 2012

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
Central America	Mexico	Tarahumara	Uto-Aztecan	13	100%	Sandoval et al. 2012
North America	United States	Chippewa	Algic	8	100%	Bolnick et al. 2006
North America	United States	Turtle Mountain Chippewa	Algic	3	100%	Bolnick et al. 2006
North America	Canada	Chippewa	Algic	18	83%	Bortolini et al. 2003
North America	United States	Cheyenne	Algic	34	79%	Zegura et al. 2004
North America	United States	Chippewa	Algic	8	50%	Bolnick et al. 2006
North America	Greenland	Greenlanders	Eskimo-Aleut	122	100%	Olofsson et al. 2015
North America	Greenland	Eskimos	Eskimo-Aleut	48	100%	Zegura et al. 2004
North America	Aleutian Islands	Aleuts	Eskimo-Aleut	21	100%	Zlojutro et al. 2009
North America	Canada	Eskimos	Eskimo-Aleut	32	97%	Dulik et al. 2012b
North America	Greenland	Eskimos	Eskimo-Aleut	29	93%	Bosch et al. 2003
North America	North America	Navajo	Eyak-Athabaskan	19	100%	Lell et al. 2002
North America	United States	Navajo	Eyak-Athabaskan	73	99%	Zegura et al. 2004
North America	Arizona, United States	Apache	Eyak-Athabaskan	22	91%	Malhi et al. 2008
North America	Southeastern Alaska, USA	Tlingit	Eyak-Athabaskan	11	91%	Schurr et al. 2012
North America	United States	Apache	Eyak-Athabaskan	89	84%	Zegura et al. 2004
North America	Canada	Dogrib	Eyak-Athabaskan	30	57%	Dulik et al. 2012b
North America	Canada	Gwich'in (Kutchin)	Eyak-Athabaskan	17	53%	Dulik et al. 2012b
North America	Alaska, United States	Tanana	Eyak-Athabaskan	10	50%	Zegura et al. 2004
North America	United States	Stillwell Cherokee	Iroquoian	15	100%	Bolnick et al. 2006
North America	United States	Red Cross Cherokee	Iroquoian	17	94%	Bolnick et al. 2006

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
North America	New Mexico, United States	Jemez	Kiowa-Tanoan	13	100%	Kemp et al. 2010
North America	United States	Choctaw	Muskogean	11	100%	Bolnick et al. 2006
North America	United States	Chickasaw	Muskogean	5	100%	Bolnick et al. 2006
North America	North America	Seminole	Muskogean	9	100%	Lell et al. 2002
North America	United States	Creek	Muskogean	10	90%	Bolnick et al. 2006
North America	United States	Sioux	Siouan-Catawban	18	78%	Bolnick et al. 2006
North America	United States	Sioux	Siouan-Catawban	16	69%	Zegura et al. 2004
North America	Arizona, United States	Akimel O'odham (Pima)	Uto-Aztecan	15	100%	Kemp et al. 2010
North America	Arizona, United States	Tohono O'odham (Papago)	Uto-Aztecan	8	100%	Kemp et al. 2010
North America	United States	Akimel O'odham (Pima)	Uto-Aztecan	21	100%	Zegura et al. 2004
South America	Bolivia	Aymara	Aymaran	57	100%	Gaya-Vidal et al. 2011
South America	Peru	Puno	Aymaran	3	100%	Roewer et al. 2013
South America	Bolivia	Aymara	Aymaran	41	100%	Sandoval et al. 2013
South America	Peru	Aymara	Aymaran	34	100%	Sandoval et al. 2013
South America	Brazil	Wai-wai	Cariban	9	100%	Bisso-Machado 2011
South America	Brazil	Arara	Cariban	8	100%	Bisso-Machado 2011
South America	Brazil	Tiriyó	Cariban	4	100%	Bortolini et al. 2003
South America	Venezuela	Yukpa	Cariban	12	100%	Bortolini et al. 2003
South America	South America	Ye'kuana (Makiritare)	Cariban	17	100%	Lell et al. 2002
South America	French Guiana	Apalaí	Cariban	48	100%	Mazières et al. 2008
South America	French Guiana	Kalina	Cariban	17	100%	Mazières et al. 2008
South America	Brazil	Mapuera	Cariban	5	100%	Roewer et al. 2013

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
South America	Brazil	Tiriyo	Cariban	35	100%	Roewer et al. 2013
South America	Brazil	Arara	Cariban	20	100%	Roewer et al. 2013
South America	Brazil	Pacaás Novos	Chapacuran	9	100%	Bisso-Machado 2011
South America	Brazil	Pacaás Novos	Chapacuran	15	100%	Bortolini et al. 2003
South America	Venezuela	Motilon (Bari)	Chibchan	12	100%	Bortolini et al. 2003
South America	Venezuela	Motilon (Bari)	Chibchan	16	100%	Roewer et al. 2013
South America	Colombia	Malayo (Arsario)	Chibchan	6	100%	Rojas et al. 2010
South America	Colombia	Arhuaco (Ijka)	Chibchan	19	100%	Rojas et al. 2010
South America	Peru	Uru	Chipaya-Uru	25	100%	Sandoval et al. 2013
South America	Bolivia	Uru	Chipaya-Uru	12	100%	Sandoval et al. 2013
South America	Colombia	Emberá	Chocoan	24	100%	Roewer et al. 2013
South America	Colombia	Emberá	Chocoan	12	100%	Rojas et al. 2010
South America	Colombia	Waunana	Chocoan	29	100%	Rojas et al. 2010
South America	Colombia	Emberá	Chocoan	10	100%	Zegura et al. 2004
South America	Colombia	Waunana	Chocoan	12	100%	Zegura et al. 2004
South America	Argentina	Tehuelche	Chon	13	100%	Bailliet et al. 2009
South America	Argentina	Tehuelche	Chon	10	100%	Roewer et al. 2013
South America	Patagonia	Tehuelche	Chon	10	100%	Sala and Corach 2014
South America	Argentina	Mocoví	Guaykuruan	24	100%	Bailliet et al. 2009
South America	Argentina	Toba	Guaykuruan	10	100%	Bailliet et al. 2009
South America	Argentina	Toba	Guaykuruan	40	100%	Roewer et al. 2013
South America	Argentina	Pilaga-Labomba	Guaykuruan	13	100%	Roewer et al. 2013
South America	Argentina	Toba	Guaykuruan	44	100%	Toscanini et al. 2011
South America	Brazil	Ticuna	Isolate	33	100%	Bortolini et al. 2003
South America	Venezuela	Warao	Isolate	12	100%	Bortolini et al. 2003

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
South America	Colombia	Ticuna	Isolate	26	100%	Rojas et al. 2010
South America	Ecuador	Waorani	Isolate	40	93%	Roewer et al. 2013
South America	Brazil	Xavante	Jean	15	100%	Bisso-Machado 2011
South America	Brazil	Kayapo (Gorotire)	Jean	14	100%	Bisso-Machado 2011
South America	Brazil	Kayapo (Xikrin)	Jean	6	100%	Bisso-Machado 2011
South America	Brazil	Kayapo (Mekranoti)	Jean	7	100%	Bisso-Machado 2011
South America	Brazil	Zoro	Jean	6	100%	Bisso-Machado 2011
South America	Brazil	Kaingang	Jean	19	100%	Bortolini et al. 2003
South America	Brazil	Kraho	Jean	9	100%	Bortolini et al. 2003
South America	Brazil	Kayapo (Mekranoti)	Jean	5	100%	Bortolini et al. 2003
South America	Brazil	Kayapo (Gorotire)	Jean	5	100%	Bortolini et al. 2003
South America	Brazil	Kaingang	Jean	40	100%	Marrero et al. 2007
South America	Brazil	Kayapo	Jean	17	100%	Roewer et al. 2013
South America	Peru	Huambisa	Jivaroan	16	100%	Di Corcia et al. 2016
South America	Peru	Yanesha	Maipurean	111	100%	Barbieri et al. 2014
South America	Colombia	Wayuu	Maipurean	13	100%	Bortolini et al. 2003
South America	Peru	Asháninka	Maipurean	8	100%	Di Corcia et al. 2016
South America	French Guiana	Machiguenga	Maipurean	26	100%	Mazières et al. 2008
South America	French Guiana	Palikur	Maipurean	33	100%	Mazières et al. 2008
South America	Brazil	Terena	Maipurean	32	100%	Roewer et al. 2013
South America	Venezuela	Wayuu	Maipurean	19	100%	Roewer et al. 2013
South America	Peru	Yanesha	Maipurean	18	100%	Sandoval et al. 2013
South America	Peru	Machiguenga	Maipurean	11	100%	Sandoval et al. 2013
South America	Colombia	Wayu	Maipurean	9	100%	Zegura et al. 2004

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
South America	Argentina	Mapuche	Mapudungun	15	100%	Bailliet et al. 2009
South America	Chile	Huilliche	Mapudungun	13	100%	Bailliet et al. 2009
South America	Chile	Pehuenche	Mapudungun	15	100%	Bailliet et al. 2009
South America	Argentina	Mapuche	Mapudungun	49	100%	Roewer et al. 2013
South America	Patagonia	Mapuche	Mapudungun	14	100%	Sala and Corach 2014
South America	Paraguay	Lengua	Mascoyan	23	100%	Bailliet et al. 2009
South America	Paraguay	Lengua	Mascoyan	12	100%	Bisso-Machado 2011
South America	Argentina	Wichí (Mataco)	Matacoan	46	100%	Bailliet et al. 2009
South America	Argentina	Chorote	Matacoan	8	100%	Bailliet et al. 2009
South America	Argentina	Wichi	Matacoan	45	100%	Roewer et al. 2013
South America	Argentina	Wichí (Mataco)	Matacoan	81	100%	Sevini et al. 2013
South America	Bolivia	Chimane	Mosetenan	8	100%	Roewer et al. 2013
South America	Colombia	Paez (Nasa)	Paezan	3	100%	Roewer et al. 2013
South America	Colombia	Guambiano	Paezan	23	100%	Roewer et al. 2013
South America	Peru	Cashibo	Panoan	22	100%	Di Corcia et al. 2016
South America	Peru	Shipibo-Conibo	Panoan	22	100%	Di Corcia et al. 2016
South America	Peru	Shipibo-Conibo	Panoan	21	100%	Roewer et al. 2013
South America	Colombia	Inga (Ingano)	Quechuan	8	100%	Bortolini et al. 2003
South America	Bolivia	Quechua	Quechuan	43	100%	Gaya-Vidal et al. 2011
South America	Argentina	Colla	Quechuan	14	100%	Roewer et al. 2013
South America	Peru	Chuquibamba	Quechuan	16	100%	Roewer et al. 2013
South America	Peru	Chumbivilca	Quechuan	10	100%	Roewer et al. 2013
South America	Peru	Huanca	Quechuan	13	100%	Roewer et al. 2013
South America	Colombia	Inga (Ingano)	Quechuan	9	100%	Rojas et al. 2010
South America	Colombia	Kogi	Quechuan	17	100%	Rojas et al. 2010

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
South America	Peru	Quechua	Quechuan	177	100%	Sandoval et al. 2013
South America	Bolivia	Quechua	Quechuan	29	100%	Sandoval et al. 2013
South America	Argentina	Colla	Quechuan	10	100%	Toscanini et al. 2011
South America	Ecuador	Kichwa	Quechuan	42	74%	Roewer et al. 2013
South America	Brazil	Gavião	Tupian	7	100%	Bisso-Machado 2011
South America	Brazil	Surui	Tupian	7	100%	Bisso-Machado 2011
South America	Brazil	Parakana	Tupian	17	100%	Bisso-Machado 2011
South America	Brazil	Karitiana	Tupian	9	100%	Bisso-Machado 2011
South America	Brazil	Araweté	Tupian	4	100%	Bisso-Machado 2011
South America	Paraguay	Aché	Tupian	53	100%	Bortolini et al. 2003
South America	Brazil	Asurini	Tupian	4	100%	Bortolini et al. 2003
South America	Brazil	Cinta Larga	Tupian	15	100%	Bortolini et al. 2003
South America	Brazil	Guaraní	Tupian	51	100%	Bortolini et al. 2003
South America	Brazil	Parakanã	Tupian	20	100%	Bortolini et al. 2003
South America	Brazil	Ka'apor	Tupian	16	100%	Bortolini et al. 2003
South America	Brazil	Wayampi	Tupian	14	100%	Bortolini et al. 2003
South America	Brazil	Guaraní (Mbyá)	Tupian	60	100%	Marrero et al. 2007
South America	French Guiana	Wayampi	Tupian	38	100%	Mazières et al. 2008
South America	French Guiana	Emerillon	Tupian	9	100%	Mazières et al. 2008
South America	Brazil	Zo'é	Tupian	25	100%	Roewer et al. 2013
South America	Brazil	Karitiana	Tupian	17	100%	Roewer et al. 2013
South America	Brazil	Gavião	Tupian	18	100%	Roewer et al. 2013
South America	Brazil	Urubu-Kaapor	Tupian	27	100%	Roewer et al. 2013
South America	Brazil	Asurini	Tupian	15	100%	Roewer et al. 2013
South America	Brazil	Wayampi	Tupian	13	100%	Roewer et al. 2013

Region	Location	Population	Language Family	Native Samples	Percent of Native	Reference
South America	Brazil	Awa-Guajá	Tupian	46	100%	Roewer et al. 2013
South America	Argentina	Guarani	Tupian	97	100%	Roewer et al. 2013
South America	Brazil	Parakana	Tupian	38	100%	Roewer et al. 2013
South America	Colombia	Witoto	Witotoan	3	100%	Bortolini et al. 2003
South America	Colombia	Yagua	Yaguan	7	100%	Bortolini et al. 2003
South America	South America	Yanomami	Yanomaman	8	100%	Lell et al. 2002
South America	Brazil	Yanomami	Yanomaman	10	100%	Roewer et al. 2013
South America	Paraguay	Ayoreo	Zamucoan	7	100%	Bailliet et al. 2009
South America	Peru	Inquito	Zaparoan	5	100%	Roewer et al. 2013

Supplementary Table 16.3. Indigenous Languages of the Western Hemisphere.

Name	Classification	Languages
Otomanguean	Family	177
Tupian	Family	76
Uto-Aztecan	Family	61
Maipurean	Family	60
Quechuan	Family	45
Eyak-Athabaskan	Family	44
Algic	Family	42
Cariban	Family	32
Mayan	Family	31
Panoan	Family	27
Salish	Family	26
Tucanoan	Family	25
Chibchan	Family	20
Mixe-Zoquean	Family	17
Jean	Family	16
Siouan-Catawban	Family	14
Totonacan	Family	12
Eskimo-Aleut	Family	11
Cochimí-Yuman	Family	9
Iroquoian	Family	9
Chocoan	Family	8
Miwok-Costanoan	Family	8
Paezan	Family	8
Matacoan	Family	7
Pomoan	Family	7
Puinavean	Family	7
Witotoan	Family	7
Chumashan	Family	6
Mascoyan	Family	6
Muskogean	Family	6
Nambiquaran	Family	6
Tacanan	Family	6
Wakashan	Family	6
Arauan	Family	5
Caddoan	Family	5

Name	Classification	Languages
Chapacuran	Family	5
Guajiboan	Family	5
Guaykuruan	Family	5
Kiowa-Tanoan	Family	5
Misumalpan	Family	5
Sahaptian	Family	5
Zaparoan	Family	5
Barbacoan	Family	4
Huavean	Family	4
Jivaroan	Family	4
Maiduan	Family	4
Yanomaman	Family	4
Aymaran	Family	3
Bororoan	Family	3
Sálvian	Family	3
Tsimshian	Family	3
Wintuan	Family	3
Cahuapanan	Family	2
Chinookan	Family	2
Chipaya-Uru	Family	2
Cholonan	Family	2
Chon	Family	2
Haida	Family	2
Harákmbut	Family	2
Jabutian	Family	2
Katukinan	Family	2
Keresan	Family	2
Mapudungu	Family	2
Maxakalian	Family	2
Palaihnihan	Family	2
Purian	Family	2
Tarascan	Family	2
Tequistlatecan	Family	2
Yaguan	Family	2
Yukian	Family	2
Zamucoan	Family	2

Name	Classification	Languages
Botocudoan	Family	1
Chimakuan	Family	1
Coosan	Family	1
Jicaquean	Family	1
Kamakanan	Family	1
Karajá	Family	1
Kaweskarán	Family	1
Lencan	Family	1
Mosetenan	Family	1
Muran	Family	1
Takelman	Family	1
Tiniguan	Family	1
Yokutsan	Family	1
Aikanã	Isolate	1
Andoque	Isolate	1
Arutani	Isolate	1
Aushiri	Isolate	1
Callawalla	Isolate	1
Camsá	Isolate	1
Candoshi-Shapra	Isolate	1
Canichana	Isolate	1
Cayubaba	Isolate	1
Chimariko	Isolate	1
Chiquitano	Isolate	1
Chitimacha	Isolate	1
Cofán	Isolate	1
Esselen	Isolate	1
Guató	Isolate	1
latê	Isolate	1
Irántxe	Isolate	1
Itonama	Isolate	1
Kanoé	Isolate	1
Karirí-Xocó	Isolate	1
Karok	Isolate	1
Klamath-Modoc	Isolate	1
Kunza	Isolate	1

Name	Classification	Languages
Kutenai	Isolate	1
Kwaza	Isolate	1
Leco	Isolate	1
Molale	Isolate	1
Movima	Isolate	1
Muniche	Isolate	1
Natchez	Isolate	1
Ofayé	Isolate	1
Omurano	Isolate	1
Oti	Isolate	1
Pankararú	Isolate	1
Puelche	Isolate	1
Rikbaktsa	Isolate	1
Salinan	Isolate	1
Sapé	Isolate	1
Seri	Isolate	1
Shasta	Isolate	1
Siuslaw	Isolate	1
Taushiro	Isolate	1
Ticuna	Isolate	1
Tonkawa	Isolate	1
Trumai	Isolate	1
Tunica	Isolate	1
Tuxá	Isolate	1
Uamué	Isolate	1
Urarina	Isolate	1
Vilela	Isolate	1
Woorani	Isolate	1
Warao	Isolate	1
Washo	Isolate	1
Xinca	Isolate	1
Xukurú	Isolate	1
Yámana	Isolate	1
Yuchi	Isolate	1
Yuracare	Isolate	1
Yuwana	Isolate	1

Name	Classification	Languages
Zuni	Isolate	1
Abishira	Unclassified	1
Agavotaguerra	Unclassified	1
Aguano	Unclassified	1
Arára, Mato Grosso	Unclassified	1
Cagua	Unclassified	1
Carabayo	Unclassified	1
Chipiajes	Unclassified	1
Coxima	Unclassified	1
Himarimã	Unclassified	1
Iapama	Unclassified	1
Kaimbé	Unclassified	1
Kamba	Unclassified	1
Kambiwá	Unclassified	1
Kapinawá	Unclassified	1
Karahawyana	Unclassified	1
Korubo	Unclassified	1
Mangue	Unclassified	1
Natagaimas	Unclassified	1
Pankararé	Unclassified	1
Pijao	Unclassified	1
Pumé	Unclassified	1
Quinqui	Unclassified	1
Shanenawa	Unclassified	1
Tapeba	Unclassified	1
Tingui-Boto	Unclassified	1
Tremembé	Unclassified	1
Truká	Unclassified	1
Wakoná	Unclassified	1
Wasu	Unclassified	1
Yarí	Unclassified	1

1063 Total Languages

Data Source: *Ethnologue* 2016. 19th edition. Edited by M. Paul Lewis, Gary F. Simons, and Charles D. Fennig. Dallas, Texas: SIL International. Online version: <http://www.ethnologue.com>.

Supplementary Table 16.4. Survey of Q-M242 among North American Indigenous Populations.

Language Family	Location	Population	No. Q-M242 Samples	Reference
Algic	United States	Cheyenne	27	Zegura et al. 2004
Algic	United States	Chippewa	8	Bolnick et al. 2006
Algic	United States	Chippewa	4	Bolnick et al. 2006
Algic	Canada	Chippewa	15	Bortolini et al. 2003
Algic	United States	Turtle Mountain Chippewa	3	Bolnick et al. 2006
Eskimo-Aleut	Greenland	Greenlanders	122	Olofsson et al. 2015
Eskimo-Aleut	Aleutian Islands	Aleuts	21	Zlojutro et al. 2009
Eskimo-Aleut	Greenland	Eskimos	48	Zegura et al. 2004
Eskimo-Aleut	Canada	Eskimos	31	Dulik et al. 2012b
Eskimo-Aleut	Greenland	Eskimos	27	Bosch et al. 2003
Eyak-Athabaskan	Canada	Dogrib	17	Dulik et al. 2012b
Eyak-Athabaskan	United States	Apache	75	Zegura et al. 2004
Eyak-Athabaskan	United States	Navajo	72	Zegura et al. 2004
Eyak-Athabaskan	North America	Navajo	19	Lell et al. 2002
Eyak-Athabaskan	Arizona, United States	Apache	20	Malhi et al. 2008
Eyak-Athabaskan	Canada	Gwich'in (Kutchin)	9	Dulik et al. 2012b
Eyak-Athabaskan	Southeastern Alaska, USA	Tlingit	10	Schurr et al. 2012
Eyak-Athabaskan	Alaska, United States	Tanana	5	Zegura et al. 2004
Iroquoian	United States	Stillwell Cherokee	15	Bolnick et al. 2006
Iroquoian	United States	Red Cross Cherokee	16	Bolnick et al. 2006
Isolate	Southeastern Alaska, USA	Haida	1	Schurr et al. 2012
Kiowa-Tanoan	New Mexico, United States	Jemez	13	Kemp et al. 2010

Language Family	Location	Population	No. Q-M242 Samples	Reference
Muskogean	United States	Choctaw	11	Bolnick et al. 2006
Muskogean	United States	Creek	9	Bolnick et al. 2006
Muskogean	North America	Seminole	9	Lell et al. 2002
Muskogean	United States	Chickasaw	5	Bolnick et al. 2006
Siouan-Catawban	United States	Sioux	14	Bolnick et al. 2006
Siouan-Catawban	United States	Sioux	11	Zegura et al. 2004
Uto-Aztecan	Arizona, United States	Tohono O'odham (Papago)	8	Kemp et al. 2010
Uto-Aztecan	Arizona, United States	Akimel O'odham (Pima)	15	Kemp et al. 2010
Uto-Aztecan	United States	Akimel O'odham (Pima)	21	Zegura et al. 2004

Supplementary Table 16.5. Survey of Q1b-M3 among North American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Algic	United States	Chippewa	8	25%	Bolnick et al. 2006
Algic	Canada	Chippewa	18	17%	Bortolini et al. 2003
Algic	United States	Chippewa	8	38%	Bolnick et al. 2006
Algic	United States	Turtle Mountain Chippewa	3	100%	Bolnick et al. 2006
Eskimo-Aleut	Aleutian Islands	Aleuts	21	57%	Zlojutro et al. 2009
Eskimo-Aleut	Greenland	Eskimos	29	21%	Bosch et al. 2003
Eskimo-Aleut	Canada	Eskimos	32	19%	Dulik et al. 2012b
Eskimo-Aleut	Greenland	Greenlanders	122	43%	Olofsson et al. 2015
Eyak-Athabaskan	Canada	Dogrib	30	50%	Dulik et al. 2012b
Eyak-Athabaskan	Canada	Gwich'in (Kutchin)	17	35%	Dulik et al. 2012b
Eyak-Athabaskan	North America	Navajo	19	100%	Lell et al. 2002
Eyak-Athabaskan	Southeastern Alaska, USA	Tlingit	11	73%	Schurr et al. 2012
Iroquoian	United States	Red Cross Cherokee	17	53%	Bolnick et al. 2006
Iroquoian	United States	Stillwell Cherokee	15	73%	Bolnick et al. 2006
Isolate	Southeastern Alaska, USA	Haida	1	100%	Schurr et al. 2012
Kiowa-Tanoan	New Mexico, United States	Jemez	13	77%	Kemp et al. 2010
Muskogean	United States	Chickasaw	5	80%	Bolnick et al. 2006

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Muskogean	United States	Choctaw	11	64%	Bolnick et al. 2006
Muskogean	United States	Creek	10	50%	Bolnick et al. 2006
Muskogean	North America	Seminole	9	100%	Lell et al. 2002
Siouan-Catawban	United States	Sioux	18	39%	Bolnick et al. 2006
Uto-Aztecan	Arizona, United States	Akimel O'odham (Pima)	15	73%	Kemp et al. 2010
Uto-Aztecan	Arizona, United States	Tohono O'odham (Papago)	8	75%	Kemp et al. 2010

Supplementary Table 16.6. Survey of Q1b-Z780 among North American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-Z780	Reference
Algic	Canada	Chippewa	18	67%	Bortolini et al. 2003
Algic	United States	Chippewa	8	25%	Bolnick et al. 2006
Algic	United States	Chippewa	8	63%	Bolnick et al. 2006
Eyak-Athabaskan	Canada	Gwich'in (Kutchin)	17	18%	Dulik et al. 2012b
Iroquoian	United States	Red Cross Cherokee	17	41%	Bolnick et al. 2006
Iroquoian	United States	Stillwell Cherokee	15	27%	Bolnick et al. 2006
Kiowa-Tanoan	New Mexico, United States	Jemez	13	23%	Kemp et al. 2010
Muskogean	United States	Chickasaw	5	20%	Bolnick et al. 2006
Muskogean	United States	Choctaw	11	36%	Bolnick et al. 2006
Muskogean	United States	Creek	10	40%	Bolnick et al. 2006
Siouan-Catawban	United States	Sioux	18	39%	Bolnick et al. 2006
Uto-Aztecan	Arizona, United States	Akimel O'odham (Pima)	15	27%	Kemp et al. 2010
Uto-Aztecan	Arizona, United States	Tohono O'odham (Papago)	8	25%	Kemp et al. 2010

Supplementary Table 16.7. Survey of C2b-P39 among North American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent C2b-P39	Reference
Algic	United States	Cheyenne	34	21%	Zegura et al. 2004
Algic	Canada	Chippewa	18	17%	Bortolini et al. 2003
Algic	United States	Chippewa	8	50%	Bolnick et al. 2006
Eskimo-Aleut	Greenland	Eskimos	29	7%	Bosch et al. 2003
Eskimo-Aleut	Canada	Eskimos	32	3%	Dulik et al. 2012b
Eyak-Athabaskan	United States	Apache	89	16%	Zegura et al. 2004
Eyak-Athabaskan	Arizona, United States	Apache	22	9%	Malhi et al. 2008
Eyak-Athabaskan	Canada	Dogrib	30	43%	Dulik et al. 2012b
Eyak-Athabaskan	Canada	Gwich'in (Kutchin)	17	47%	Dulik et al. 2012b
Eyak-Athabaskan	United States	Navajo	73	1%	Zegura et al. 2004
Eyak-Athabaskan	Alaska, United States	Tanana	10	50%	Zegura et al. 2004
Eyak-Athabaskan	Southeastern Alaska, USA	Tlingit	11	9%	Schurr et al. 2012
Iroquoian	United States	Red Cross Cherokee	17	6%	Bolnick et al. 2006
Muskogean	United States	Creek	10	10%	Bolnick et al. 2006
Siouan-Catawban	United States	Sioux	18	22%	Bolnick et al. 2006
Siouan-Catawban	United States	Sioux	16	31%	Zegura et al. 2004

Supplementary Table 16.8. North American and Northern Eurasian Ancient Q-M242 Data.

Reference No.	Mutation	Region	Description	Death (Years Ago)	Cultural Tradition	Source
1	Q1b1-L53	Northern Eurasia	NEO232. Ust-Belsky II, Shumilikha, Russia.	4259	Neolithic	Sikora et al. 2018
2	Q1b1b-YP4004	North America	Lovelock4. Lovelock Cave, Nevada, US	1800	Amerindian	Moreno-Mayar et al. 2018b
3	Q1b1a2-Z780	North America	Anzick-1. Child 1 to 2 years of age. Anzick archeological site, western Montana, USA.	13000	Amerindian	Rasmussen et al. 2014
4	Q1b1a1a-M3	North America	Shuka Kaa, Prince of Wales Island, Alaska.	10300	Amerindian	Kemp et al. 2007
5	Q1b1a1a2-Y4276	Northern Eurasia	Neo 247. Ekven site , Cape Dezhnev, Siberia, Russia.	1942	Eskimo	Sikora et al. 2018
6	Q1b1a1a2-Y4276	North America	SDMM-16743. San Nicholas Island, CA USA	1172	Amerindian	Scheib et al. 2018
7	Q1b1a1a2a-B34	North America	523a. Palm site, Cook Inlet beach 36km north of Kenai, Alaska.	200	Athabaskan	Scheib et al. 2018
8	Q1b1a1a2a-B34	North America	RM85. The Teston Road ossuary is situated about 30 kilometers north of Toronto in Vaughan, Ontario	500	Amerindian	Scheib et al. 2018
9	Q1b1a1a1-M848	North America	Kennewick man, Kennewick, Washington, USA.	8358	Amerindian	Grugni et al. 2019. Rasmussen et al. 2015
10	Q1b1a1a1-M848	North America	AHUR_2064. Spirit Cave, Nevada, USA	10000	Amerindian	Moreno-Mayar et al. 2018b
11	Q1b1a1a1e1-M924	North America	SDMM-17806. Point Sal, CA USA.	1599	Amerindian	Scheib et al. 2018
12	Q1b1a1a1e1-M924	North America	MDLH-PE7066. San Miguel Island, CA, USA.	0	Amerindian	Scheib et al. 2018
13	Q1a2a-L712	North America	378620. Chaluka Midden, Umnak Island, Aleutian Islands, USA.	770	Eskimo	Flegontov et al. 2017

Reference No.	Mutation	Region	Description	Death (Years Ago)	Cultural Tradition	Source
14	Q1a2a-L712	Northern Eurasia	I1526 Ust'-Belaya man. Ust'-Belaya II, Chukotka, Russia.	4200	Eskimo	Flegontov et al. 2017
15	Q1a2a1a1-B277	Northern Eurasia	I1524 Old Bering Sea, Uelen, Chukotka, Russia.	1180	Eskimo	Flegontov et al. 2017
16	Q1a2a1a1-B277	North America	378544. Ship Rock Island, Aleutian Islands, USA.	760	Eskimo	Flegontov et al. 2017
17	Q1a2a1a1-B277	North America	I5319 Tochak McGrath, Upper Kuskokwim River, Alaska, USA.	790	Athabaskan	Flegontov et al. 2017
18	Q1a1-F746	Northern Eurasia	NEO241. Ekven site , Cape Dezhnev, Siberia, Russia.	2014	Eskimo	Sikora et al. 2018
19	Q1a1b-B143	Northern Eurasia	Neo 250. Ekven site , Cape Dezhnev, Siberia, Russia.	2145	Eskimo	Sikora et al. 2018
20	Q1a1b-B143	North America	Saqqaq man. Qeqertasussuk, Northwestern Greenland.	4000	Eskimo	Grugni et al. 2019; Rasmussen et al. 2010
21	Q1a1a-M120	Northern Eurasia	Kolyma 1. Duvanny Yar, lower Kolyma river, northeastern Siberia.	10000	Paleolithic	Sikora et al. 2018

Supplementary Table 16.9. Survey of Q-M242 among Central American Indigenous Populations.

Language Family	Location	Population	No. Q-M242 Samples	Reference
Chibchan	Costa Rica	Abrojo-Guaymi	13	Melton et al. 2013
Chibchan	Central America	Boruca	16	Lell et al. 2002
Chibchan	Panama	Bribri	13	Melton et al. 2013
Chibchan	Central America	Bribri and Cabecar	11	Lell et al. 2002
Chibchan	Panama	Cabecar	23	Melton et al. 2013
Chibchan	Costa Rica/Panama	Guaymi (Ngäbe, Ngöbe)	17	Zegura et al. 2004
Chibchan	Central America	Guaymi (Ngäbe, Ngöbe)	8	Lell et al. 2002
Chibchan	Panama	Guaymi (Ngäbe, Ngöbe)	29	Melton et al. 2013
Chibchan	Costa Rica	Huetar	11	Melton et al. 2013
Chibchan	Panama	Kuna	16	Melton et al. 2013
Chibchan	Panama	Kuna	9	Zegura et al. 2004
Chibchan	Costa Rica	Maleku	6	Melton et al. 2013
Chibchan	Nicaragua	Rama	10	Melton et al. 2013
Chibchan	Panama	Teribe	12	Melton et al. 2013
Chocoan	Panama	Emberá	30	Melton et al. 2013
Isolate	Mexico	Seri	15	Malhi et al. 2008
Mayan	Mexico	Maya	14	Sandoval et al. 2012
Mayan	Mexico	Maya	62	Zegura et al. 2004
Mayan	Guatamala	Mayans	39	Regueiro et al. 2013
Mayan	Yucatan, Mexico	Mayans	56	Regueiro et al. 2013
Mayan	Mexico and Guatamala	Mayans	288	Perez-Benedico et al. 2016
Mayan	Chiapas, Mexico	Tzotzil	4	Rangel-Villalobos et al. 2008

Language Family	Location	Population	No. Q-M242 Samples	Reference
Mixe-Zoquean	Mexico	Mixe	7	Kemp et al. 2010
Mixe-Zoquean	Mexico	Mixe	12	Zegura et al. 2004
Otomanguean	Mexico	Mixtec	2	Sandoval et al. 2012
Otomanguean	Mexico	Mixtec	20	Kemp et al. 2010
Otomanguean	Mexico	Mixtec	26	Zegura et al. 2004
Otomanguean	Mexico	Otomi	4	Sandoval et al. 2012
Otomanguean	Mexico	Trique	22	Sandoval et al. 2012
Otomanguean	Mexico	Zapotec	6	Kemp et al. 2010
Otomanguean	Mexico	Zapotec	12	Zegura et al. 2004
Tarascan	Mexico	Purépecha	6	Sandoval et al. 2012
Tarascan	Michoacan, Mexico	Purépecha	15	Rangel-Villalobos et al. 2008
Unclassified	Costa Rica	Chorotega	11	Melton et al. 2013
Uto-Aztecan	Mexico	Cora	43	Kemp et al. 2010
Uto-Aztecan	Mexico	Huichol	12	Kemp et al. 2010
Uto-Aztecan	Jalisco and Nayarit, Mexico	Huichol	34	Rangel-Villalobos et al. 2008
Uto-Aztecan	Mexico	Nahua	58	Sandoval et al. 2012
Uto-Aztecan	South of Puebla, Mexico	Nahua	27	Rangel-Villalobos et al. 2008
Uto-Aztecan	Mexico	Nahua-Atocpan	6	Kemp et al. 2010
Uto-Aztecan	Mexico	Nahua-Cuetzalan	10	Kemp et al. 2010
Uto-Aztecan	Mexico	Pima	49	Sandoval et al. 2012
Uto-Aztecan	Mexico	Tarahumara	13	Sandoval et al. 2012
Uto-Aztecan	Mexico	Tarahumara	19	Kemp et al. 2010
Uto-Aztecan	Chihuahua, Mexico	Tarahumara	11	Rangel-Villalobos et al. 2008

Supplementary Table 16.10. Survey of Q1b-M3 among Central American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Chibchan	Costa Rica	Abrojo-Guaymi	13	100%	Melton et al. 2013
Chibchan	Central America	Boruca	16	100%	Lell et al. 2002
Chibchan	Panama	Bribri	13	100%	Melton et al. 2013
Chibchan	Central America	Bribri and Cabecar	11	100%	Lell et al. 2002
Chibchan	Panama	Cabecar	23	100%	Melton et al. 2013
Chibchan	Panama	Guaymi (Ngäbe, Ngöbe)	29	79%	Melton et al. 2013
Chibchan	Central America	Guaymi (Ngäbe, Ngöbe)	8	100%	Lell et al. 2002
Chibchan	Costa Rica	Huetar	11	100%	Melton et al. 2013
Chibchan	Panama	Kuna	16	100%	Melton et al. 2013
Chibchan	Costa Rica	Maleku	6	100%	Melton et al. 2013
Chibchan	Nicaragua	Rama	10	100%	Melton et al. 2013
Chibchan	Panama	Teribe	12	100%	Melton et al. 2013
Chocoan	Panama	Emberá	30	77%	Melton et al. 2013
Mayan	Guatamala	Mayans	39	74%	Regueiro et al. 2013
Mayan	Mexico and Guatamala	Mayans	288	84%	Perez-Benedico et al. 2016
Mayan	Yucatan, Mexico	Mayans	56	77%	Regueiro et al. 2013
Mayan	Chiapas, Mexico	Tzotzil	4	100%	Rangel-Villalobos et al. 2008
Mixe-Zoquean	Mexico	Mixe	7	100%	Kemp et al. 2010
Otomanguean	Mexico	Mixtec	20	100%	Kemp et al. 2010
Otomanguean	Mexico	Zapotec	6	100%	Kemp et al. 2010

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Tarascan	Michoacan, Mexico	Purépecha	15	100%	Rangel-Villalobos et al. 2008
Unclassified	Costa Rica	Chorotega	11	73%	Melton et al. 2013
Uto-Aztecan	Mexico	Cora	43	95%	Kemp et al. 2010
Uto-Aztecan	Mexico	Huichol	12	100%	Kemp et al. 2010
Uto-Aztecan	Jalisco and Nayarit, Mexico	Huichol	34	100%	Rangel-Villalobos et al. 2008
Uto-Aztecan	South of Puebla, Mexico	Nahua	27	100%	Rangel-Villalobos et al. 2008
Uto-Aztecan	Mexico	Nahua-Atocpan	6	50%	Kemp et al. 2010
Uto-Aztecan	Mexico	Nahua-Cuetzalan	10	90%	Kemp et al. 2010
Uto-Aztecan	Mexico	Tarahumara	19	74%	Kemp et al. 2010
Uto-Aztecan	Chihuahua, Mexico	Tarahumara	11	100%	Rangel-Villalobos et al. 2008

Supplementary Table 16.11. Survey of Q1b-Z780 among Central American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-Z780	Reference
Chibchan	Panama	Guaymi (Ngäbe, Ngöbe)	29	21%	Melton et al. 2013
Chocoan	Panama	Emberá	30	23%	Melton et al. 2013
Mayan	Guatamala	Mayans	39	26%	Regueiro et al. 2013
Mayan	Yucatan, Mexico	Mayans	56	23%	Regueiro et al. 2013
Mayan	Mexico and Guatamala	Mayans	288	16%	Perez-Benedico et al. 2016
Unclassified	Costa Rica	Chorotega	11	27%	Melton et al. 2013
Uto-Aztecan	Mexico	Cora	43	5%	Kemp et al. 2010
Uto-Aztecan	Mexico	Nahua-Atocpan	6	50%	Kemp et al. 2010
Uto-Aztecan	Mexico	Nahua-Cuetzalan	10	10%	Kemp et al. 2010
Uto-Aztecan	Mexico	Tarahumara	19	26%	Kemp et al. 2010

Supplementary Table 16.12. Survey of Q-M242 among South American Indigenous Populations.

Language Family	Location	Population	No. Q-M242 Samples	Reference
Aymaran	Bolivia	Aymara	57	Gaya-Vidal et al. 2011
Aymaran	Peru	Aymara	34	Sandoval et al. 2013
Aymaran	Bolivia	Aymara	41	Sandoval et al. 2013
Aymaran	Peru	Puno	3	Roewer et al. 2013
Cariban	French Guiana	Apalaí	48	Mazières et al. 2008
Cariban	Brazil	Arara	20	Roewer et al. 2013
Cariban	Brazil	Arara	8	Bisso-Machado 2011
Cariban	French Guiana	Kalina	17	Mazières et al. 2008
Cariban	Brazil	Mapuera	5	Roewer et al. 2013
Cariban	Brazil	Tiriyo	35	Roewer et al. 2013
Cariban	Brazil	Tiriyó	4	Bortolini et al. 2003
Cariban	Brazil	Wai-wai	9	Bisso-Machado 2011
Cariban	South America	Ye'kuana (Makiritare)	17	Lell et al. 2002
Cariban	Venezuela	Yukpa	12	Bortolini et al. 2003
Chapacuran	Brazil	Pacaás Novos	9	Bisso-Machado 2011
Chapacuran	Brazil	Pacaás Novos	15	Bortolini et al. 2003
Chibchan	Colombia	Arhuaco (Ijka)	19	Rojas et al. 2010
Chibchan	Colombia	Malayo (Arsario)	6	Rojas et al. 2010
Chibchan	Venezuela	Motilon (Bari)	12	Bortolini et al. 2003
Chibchan	Venezuela	Motilon (Bari)	16	Roewer et al. 2013
Chipaya-Uru	Peru	Uru	25	Sandoval et al. 2013

Language Family	Location	Population	No. Q-M242 Samples	Reference
Chipaya-Uru	Bolivia	Uru	12	Sandoval et al. 2013
Chocoan	Colombia	Emberá	24	Roewer et al. 2013
Chocoan	Colombia	Emberá	10	Zegura et al. 2004
Chocoan	Colombia	Emberá	12	Rojas et al. 2010
Chocoan	Colombia	Waunana	12	Zegura et al. 2004
Chocoan	Colombia	Waunana	29	Rojas et al. 2010
Chon	Argentina	Tehuelche	13	Bailliet et al. 2009
Chon	Argentina	Tehuelche	10	Roewer et al. 2013
Chon	Patagonia	Tehuelche	10	Sala and Corach 2014
Guaykuruan	Argentina	Mocoví	24	Bailliet et al. 2009
Guaykuruan	Argentina	Pilaga-Labomba	13	Roewer et al. 2013
Guaykuruan	Argentina	Toba	44	Toscanini et al. 2011
Guaykuruan	Argentina	Toba	40	Roewer et al. 2013
Guaykuruan	Argentina	Toba	10	Bailliet et al. 2009
Isolate	Brazil	Ticuna	33	Bortolini et al. 2003
Isolate	Colombia	Ticuna	26	Rojas et al. 2010
Isolate	Ecuador	Waorani	37	Roewer et al. 2013
Isolate	Venezuela	Warao	12	Bortolini et al. 2003
Jean	Brazil	Kaingang	19	Bortolini et al. 2003
Jean	Brazil	Kaingang	40	Marrero et al. 2007
Jean	Brazil	Kayapo	17	Roewer et al. 2013
Jean	Brazil	Kayapo (Gorotire)	14	Bisso-Machado 2011
Jean	Brazil	Kayapo (Gorotire)	5	Bortolini et al. 2003
Jean	Brazil	Kayapo (Mekranoti)	7	Bisso-Machado 2011

Language Family	Location	Population	No. Q-M242 Samples	Reference
Jean	Brazil	Kayapo (Mekranoti)	5	Bortolini et al. 2003
Jean	Brazil	Kayapo (Xikrin)	6	Bisso-Machado 2011
Jean	Brazil	Kraho	9	Bortolini et al. 2003
Jean	Brazil	Xavante	15	Bisso-Machado 2011
Jean	Brazil	Zoro	6	Bisso-Machado 2011
Jivaroan	Peru	Huambisa	16	Di Corcia et al. 2016
Maipurean	Peru	Asháninka	8	Di Corcia et al. 2016
Maipurean	Peru	Machiguenga	11	Sandoval et al. 2013
Maipurean	French Guiana	Machiguenga	26	Mazières et al. 2008
Maipurean	French Guiana	Palikur	33	Mazières et al. 2008
Maipurean	Brazil	Terena	32	Roewer et al. 2013
Maipurean	Colombia	Wayu	9	Zegura et al. 2004
Maipurean	Venezuela	Wayuu	19	Roewer et al. 2013
Maipurean	Colombia	Wayuu	13	Bortolini et al. 2003
Maipurean	Peru	Yanesha	111	Barbieri et al. 2014
Maipurean	Peru	Yanesha	18	Sandoval et al. 2013
Mapudungun	Chile	Huilliche	13	Bailliet et al. 2009
Mapudungun	Patagonia	Mapuche	14	Sala and Corach 2014
Mapudungun	Argentina	Mapuche	49	Roewer et al. 2013
Mapudungun	Argentina	Mapuche	15	Bailliet et al. 2009
Mapudungun	Chile	Pehuenche	15	Bailliet et al. 2009
Mascoyan	Paraguay	Lengua	12	Bisso-Machado 2011
Mascoyan	Paraguay	Lengua	23	Bailliet et al. 2009

Language Family	Location	Population	No. Q-M242 Samples	Reference
Matacoan	Argentina	Chorote	8	Bailliet et al. 2009
Matacoan	Argentina	Wichi	45	Roewer et al. 2013
Matacoan	Argentina	Wichí (Mataco)	81	Sevini et al. 2013
Matacoan	Argentina	Wichí (Mataco)	46	Bailliet et al. 2009
Mosetenan	Bolivia	Chimane	8	Roewer et al. 2013
Paezan	Colombia	Guambiano	23	Roewer et al. 2013
Paezan	Colombia	Paez (Nasa)	3	Roewer et al. 2013
Panoan	Peru	Cashibo	22	Di Corcia et al. 2016
Panoan	Peru	Shipibo-Conibo	21	Roewer et al. 2013
Panoan	Peru	Shipibo-Conibo	22	Di Corcia et al. 2016
Quechuan	Peru	Chumbivilca	10	Roewer et al. 2013
Quechuan	Peru	Chuquibamba	16	Roewer et al. 2013
Quechuan	Argentina	Colla	10	Toscanini et al. 2011
Quechuan	Argentina	Colla	14	Roewer et al. 2013
Quechuan	Peru	Huanca	13	Roewer et al. 2013
Quechuan	Colombia	Inga (Ingano)	8	Bortolini et al. 2003
Quechuan	Colombia	Inga (Ingano)	9	Rojas et al. 2010
Quechuan	Ecuador	Kichwa	31	Roewer et al. 2013
Quechuan	Colombia	Kogi	17	Rojas et al. 2010
Quechuan	Bolivia	Quechua	43	Gaya-Vidal et al. 2011
Quechuan	Bolivia	Quechua	29	Sandoval et al. 2013
Quechuan	Peru	Quechua	177	Sandoval et al. 2013
Tupian	Paraguay	Aché	53	Bortolini et al. 2003
Tupian	Brazil	Araweté	4	Bisso-Machado 2011
Tupian	Brazil	Asurini	4	Bortolini et al. 2003

Language Family	Location	Population	No. Q-M242 Samples	Reference
Tupian	Brazil	Asurini	15	Roewer et al. 2013
Tupian	Brazil	Awa-Guajá	46	Roewer et al. 2013
Tupian	Brazil	Cinta Larga	15	Bortolini et al. 2003
Tupian	French Guiana	Emerillon	9	Mazières et al. 2008
Tupian	Brazil	Gavião	18	Roewer et al. 2013
Tupian	Brazil	Gavião	7	Bisso-Machado 2011
Tupian	Argentina	Guarani	97	Roewer et al. 2013
Tupian	Brazil	Guaraní	51	Bortolini et al. 2003
Tupian	Brazil	Guaraní (Mbyá)	60	Marrero et al. 2007
Tupian	Brazil	Ka'apor	16	Bortolini et al. 2003
Tupian	Brazil	Karitiana	9	Bisso-Machado 2011
Tupian	Brazil	Karitiana	17	Roewer et al. 2013
Tupian	Brazil	Parakana	38	Roewer et al. 2013
Tupian	Brazil	Parakana	17	Bisso-Machado 2011
Tupian	Brazil	Parakanã	20	Bortolini et al. 2003
Tupian	Brazil	Surui	7	Bisso-Machado 2011
Tupian	Brazil	Urubu-Kaapor	27	Roewer et al. 2013
Tupian	Brazil	Wayampi	13	Roewer et al. 2013
Tupian	French Guiana	Wayampi	38	Mazières et al. 2008
Tupian	Brazil	Wayampi	14	Bortolini et al. 2003
Tupian	Brazil	Zo'é	25	Roewer et al. 2013
Witotoan	Colombia	Witoto	3	Bortolini et al. 2003
Yaguan	Colombia	Yagua	7	Bortolini et al. 2003
Yanomaman	Brazil	Yanomami	10	Roewer et al. 2013

Language Family	Location	Population	No. Q-M242 Samples	Reference
Yanomaman	South America	Yanomami	8	Lell et al. 2002
Zamucoan	Paraguay	Ayoreo	7	Bailliet et al. 2009
Zaparoan	Peru	Inquito	5	Roewer et al. 2013

Supplementary Table 16.13. Survey of Q1b-M3 among South American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Aymaran	Peru	Aymara	34	85%	Sandoval et al. 2013
Aymaran	Bolivia	Aymara	57	89%	Gaya-Vidal et al. 2011
Aymaran	Bolivia	Aymara	41	83%	Sandoval et al. 2013
Aymaran	Peru	Puno	3	100%	Roewer et al. 2013
Cariban	French Guiana	Apalaí	48	100%	Mazières et al. 2008
Cariban	Brazil	Arara	20	65%	Roewer et al. 2013
Cariban	Brazil	Arara	8	100%	Bisso-Machado 2011
Cariban	French Guiana	Kalina	17	100%	Mazières et al. 2008
Cariban	Brazil	Mapuera	5	100%	Roewer et al. 2013
Cariban	Brazil	Tiriyo	35	94%	Roewer et al. 2013
Cariban	Brazil	Tiriyó	4	100%	Bortolini et al. 2003
Cariban	Brazil	Wai-wai	9	100%	Bisso-Machado 2011
Cariban	South America	Ye'kuana (Makiritare)	17	100%	Lell et al. 2002
Cariban	Venezuela	Yukpa	12	100%	Bortolini et al. 2003
Chapacuran	Brazil	Pacaás Novos	15	100%	Bortolini et al. 2003
Chapacuran	Brazil	Pacaás Novos	9	100%	Bisso-Machado 2011
Chibchan	Colombia	Arhuaco (Ijka)	19	100%	Rojas et al. 2010
Chibchan	Colombia	Malayo (Arsario)	6	100%	Rojas et al. 2010
Chibchan	Venezuela	Motilon (Bari)	12	100%	Bortolini et al. 2003
Chibchan	Venezuela	Motilon (Bari)	16	100%	Roewer et al. 2013
Chipaya-Uru	Peru	Uru	25	100%	Sandoval et al. 2013

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Chipaya-Uru	Bolivia	Uru	12	100%	Sandoval et al. 2013
Chocoan	Colombia	Emberá	24	83%	Roewer et al. 2013
Chocoan	Colombia	Emberá	12	92%	Rojas et al. 2010
Chocoan	Colombia	Waunana	29	7%	Rojas et al. 2010
Chon	Argentina	Tehuelche	10	100%	Roewer et al. 2013
Chon	Argentina	Tehuelche	13	100%	Bailliet et al. 2009
Chon	Patagonia	Tehuelche	10	100%	Sala and Corach 2014
Guaykuruan	Argentina	Mocoví	24	92%	Bailliet et al. 2009
Guaykuruan	Argentina	Pilaga-Labomba	13	100%	Roewer et al. 2013
Guaykuruan	Argentina	Toba	10	100%	Bailliet et al. 2009
Guaykuruan	Argentina	Toba	40	100%	Roewer et al. 2013
Guaykuruan	Argentina	Toba	44	95%	Toscanini et al. 2011
Isolate	Colombia	Ticuna	26	73%	Rojas et al. 2010
Isolate	Brazil	Ticuna	33	21%	Bortolini et al. 2003
Isolate	Ecuador	Waorani	40	93%	Roewer et al. 2013
Isolate	Venezuela	Warao	12	100%	Bortolini et al. 2003
Jean	Brazil	Kaingang	40	93%	Marrero et al. 2007
Jean	Brazil	Kaingang	19	100%	Bortolini et al. 2003
Jean	Brazil	Kayapo	17	100%	Roewer et al. 2013
Jean	Brazil	Kayapo (Gorotire)	5	100%	Bortolini et al. 2003
Jean	Brazil	Kayapo (Gorotire)	14	93%	Bisso-Machado 2011
Jean	Brazil	Kayapo (Mekranoti)	7	86%	Bisso-Machado 2011
Jean	Brazil	Kayapo (Mekranoti)	5	100%	Bortolini et al. 2003
Jean	Brazil	Kayapo (Xikrin)	6	100%	Bisso-Machado 2011
Jean	Brazil	Kraho	9	100%	Bortolini et al. 2003

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Jean	Brazil	Xavante	15	100%	Bisso-Machado 2011
Jean	Brazil	Zoro	6	67%	Bisso-Machado 2011
Jivaroan	Peru	Huambisa	16	69%	Di Corcia et al. 2016
Maipurean	Peru	Asháninka	8	100%	Di Corcia et al. 2016
Maipurean	Peru	Machiguenga	11	100%	Sandoval et al. 2013
Maipurean	French Guiana	Machiguenga	26	88%	Mazières et al. 2008
Maipurean	French Guiana	Palikur	33	97%	Mazières et al. 2008
Maipurean	Brazil	Terena	32	100%	Roewer et al. 2013
Maipurean	Colombia	Wayuu	13	54%	Bortolini et al. 2003
Maipurean	Venezuela	Wayuu	19	100%	Roewer et al. 2013
Maipurean	Peru	Yanesha	18	100%	Sandoval et al. 2013
Maipurean	Peru	Yanesha	111	98%	Barbieri et al. 2014
Mapudungun	Chile	Huilliche	13	92%	Bailliet et al. 2009
Mapudungun	Argentina	Mapuche	15	93%	Bailliet et al. 2009
Mapudungun	Patagonia	Mapuche	14	100%	Sala and Corach 2014
Mapudungun	Argentina	Mapuche	49	100%	Roewer et al. 2013
Mapudungun	Chile	Pehuenche	15	100%	Bailliet et al. 2009
Mascoyan	Paraguay	Lengua	23	70%	Bailliet et al. 2009
Mascoyan	Paraguay	Lengua	12	67%	Bisso-Machado 2011
Matacoan	Argentina	Chorote	8	100%	Bailliet et al. 2009
Matacoan	Argentina	Wichi	45	100%	Roewer et al. 2013
Matacoan	Argentina	Wichí (Mataco)	81	100%	Sevini et al. 2013
Matacoan	Argentina	Wichí (Mataco)	46	98%	Bailliet et al. 2009
Mosetenan	Bolivia	Chimane	8	13%	Roewer et al. 2013

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Paezan	Colombia	Guambiano	23	61%	Roewer et al. 2013
Paezan	Colombia	Paez (Nasa)	3	100%	Roewer et al. 2013
Panoan	Peru	Cashibo	22	100%	Di Corcia et al. 2016
Panoan	Peru	Shipibo-Conibo	21	100%	Roewer et al. 2013
Panoan	Peru	Shipibo-Conibo	22	100%	Di Corcia et al. 2016
Quechuan	Peru	Chumbivilca	10	90%	Roewer et al. 2013
Quechuan	Peru	Chuquibamba	16	100%	Roewer et al. 2013
Quechuan	Argentina	Colla	14	100%	Roewer et al. 2013
Quechuan	Argentina	Colla	10	100%	Toscanini et al. 2011
Quechuan	Peru	Huanca	13	100%	Roewer et al. 2013
Quechuan	Colombia	Inga (Ingano)	8	13%	Bortolini et al. 2003
Quechuan	Colombia	Inga (Ingano)	9	11%	Rojas et al. 2010
Quechuan	Ecuador	Kichwa	42	67%	Roewer et al. 2013
Quechuan	Colombia	Kogi	17	100%	Rojas et al. 2010
Quechuan	Bolivia	Quechua	29	100%	Sandoval et al. 2013
Quechuan	Peru	Quechua	177	93%	Sandoval et al. 2013
Quechuan	Bolivia	Quechua	43	100%	Gaya-Vidal et al. 2011
Tupian	Paraguay	Aché	53	100%	Bortolini et al. 2003
Tupian	Brazil	Araweté	4	75%	Bisso-Machado 2011
Tupian	Brazil	Asurini	4	100%	Bortolini et al. 2003
Tupian	Brazil	Asurini	15	100%	Roewer et al. 2013
Tupian	Brazil	Awa-Guajá	46	100%	Roewer et al. 2013
Tupian	Brazil	Cinta Larga	15	100%	Bortolini et al. 2003
Tupian	French Guiana	Emerillon	9	100%	Mazières et al. 2008

Language Family	Location	Population	Native Samples	Percent Q1b-M3	Reference
Tupian	Brazil	Gavião	18	100%	Roewer et al. 2013
Tupian	Brazil	Gavião	7	100%	Bisso-Machado 2011
Tupian	Argentina	Guarani	97	100%	Roewer et al. 2013
Tupian	Brazil	Guaraní	51	92%	Bortolini et al. 2003
Tupian	Brazil	Guaraní (Mbyá)	60	93%	Marrero et al. 2007
Tupian	Brazil	Ka'apor	16	100%	Bortolini et al. 2003
Tupian	Brazil	Karitiana	17	100%	Roewer et al. 2013
Tupian	Brazil	Karitiana	9	100%	Bisso-Machado 2011
Tupian	Brazil	Parakana	38	100%	Roewer et al. 2013
Tupian	Brazil	Parakana	17	100%	Bisso-Machado 2011
Tupian	Brazil	Parakanã	20	100%	Bortolini et al. 2003
Tupian	Brazil	Surui	7	100%	Bisso-Machado 2011
Tupian	Brazil	Urubu-Kaapor	27	100%	Roewer et al. 2013
Tupian	Brazil	Wayampi	13	100%	Roewer et al. 2013
Tupian	French Guiana	Wayampi	38	100%	Mazières et al. 2008
Tupian	Brazil	Wayampi	14	100%	Bortolini et al. 2003
Tupian	Brazil	Zo'é	25	100%	Roewer et al. 2013
Witotoan	Colombia	Witoto	3	100%	Bortolini et al. 2003
Yaguan	Colombia	Yagua	7	86%	Bortolini et al. 2003
Yanomaman	Brazil	Yanomami	10	10%	Roewer et al. 2013
Yanomaman	South America	Yanomami	8	100%	Lell et al. 2002
Zamucoan	Paraguay	Ayoreo	7	71%	Bailliet et al. 2009
Zaparoan	Peru	Inquito	5	100%	Roewer et al. 2013

Supplementary Table 16.14. Survey of Q1b-Z780 among South American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1b-Z780	Reference
Aymaran	Bolivia	Aymara	57	11%	Gaya-Vidal et al. 2011
Aymaran	Bolivia	Aymara	41	17%	Sandoval et al. 2013
Aymaran	Peru	Aymara	34	15%	Sandoval et al. 2013
Cariban	Brazil	Arara	20	35%	Roewer et al. 2013
Cariban	Brazil	Tiriyo	35	6%	Roewer et al. 2013
Chocoan	Colombia	Emberá	24	17%	Roewer et al. 2013
Chocoan	Colombia	Emberá	12	8%	Rojas et al. 2010
Chocoan	Colombia	Waunana	29	93%	Rojas et al. 2010
Guaykuruan	Argentina	Mocoví	24	8%	Bailliet et al. 2009
Isolate	Brazil	Ticuna	33	12%	Bortolini et al. 2003
Isolate	Colombia	Ticuna	26	27%	Rojas et al. 2010
Jean	Brazil	Kaingang	40	8%	Marrero et al. 2007
Jean	Brazil	Kayapo (Gorotire)	14	7%	Bisso-Machado 2011
Jean	Brazil	Kayapo (Mekranoti)	7	14%	Bisso-Machado 2011
Jean	Brazil	Zoro	6	33%	Bisso-Machado 2011
Maipurean	French Guiana	Machiguenga	26	12%	Mazières et al. 2008
Maipurean	French Guiana	Palikur	33	3%	Mazières et al. 2008
Maipurean	Colombia	Wayuu	13	31%	Bortolini et al. 2003
Mapudungun	Chile	Huilliche	13	8%	Bailliet et al. 2009

Language Family	Location	Population	Native Samples	Percent Q1b-Z780	Reference
Mapudungun	Argentina	Mapuche	15	7%	Bailliet et al. 2009
Mascoyan	Paraguay	Lengua	23	30%	Bailliet et al. 2009
Mascoyan	Paraguay	Lengua	12	33%	Bisso-Machado 2011
Matacoan	Argentina	Wichí (Mataco)	46	2%	Bailliet et al. 2009
Mosetenan	Bolivia	Chimane	8	88%	Roewer et al. 2013
Paezan	Colombia	Guambiano	23	39%	Roewer et al. 2013
Quechuan	Peru	Chumbivilca	10	10%	Roewer et al. 2013
Quechuan	Colombia	Inga (Ingano)	9	89%	Rojas et al. 2010
Quechuan	Colombia	Inga (Ingano)	8	88%	Bortolini et al. 2003
Quechuan	Ecuador	Kichwa	42	7%	Roewer et al. 2013
Quechuan	Peru	Quechua	177	7%	Sandoval et al. 2013
Tupian	Brazil	Araweté	4	25%	Bisso-Machado 2011
Tupian	Brazil	Guaraní	51	8%	Bortolini et al. 2003
Tupian	Brazil	Guaraní (Mbyá)	60	7%	Marrero et al. 2007
Yaguan	Colombia	Yagua	7	14%	Bortolini et al. 2003
Yanomaman	Brazil	Yanomami	10	90%	Roewer et al. 2013
Zamucoan	Paraguay	Ayoreo	7	29%	Bailliet et al. 2009

Supplementary Table 16.15. Survey of Q1a-F746 among North American Indigenous Populations.

Language Family	Location	Population	Native Samples	Percent Q1a-F746	Reference
Eskimo-Aleut	Canada	Eskimos	32	78.13%	Dulik et al. 2012b
Eskimo-Aleut	Greenland	Greenlanders	122	57.38%	Olofsson et al. 2015
Eyak-Athabaskan	Canada	Dogrib	30	3.33%	Dulik et al. 2012b

Supplementary Table 16.16. Survey of Q-M242, Q1-F903 and Q1b-M3 among Northeast Asian Populations.

Language Family	Location	Population	No. Q-M242 Samples	Q1-F903 Samples	Q1b-M3 Samples	Reference
Chukotko-Kamchatkan	Chukotka	Chukchi	3	0	3	Lell et al. 2002
Chukotko-Kamchatkan	Kamchatka Peninsula	Koryaks	5	3	2	Battaglia et al. 2013
Chukotko-Kamchatkan	Sakha Republic	Koryaks	2	0	0	Pakendorf et al. 2007
Chukotko-Kamchatkan	Siberia, Russia	Koryaks	4	4	0	Malyarchuk et al. 2011
Eskimo-Aleut	Chukotka	Yupik	7	0	7	Lell et al. 2002
Eskimo-Aleut	Siberia, Russia	Yupik	9	2	6	Regueiro et al. 2013

Supplementary Table 16.17. Survey of the Q1a-M120 Mutation among Asian Populations.

Region	Location	Population	Language Family	Sample Size	Percent Q1a1a-M120	Reference
East Asia	Western Mongolia	Mongols	Mongolic	22	13.64%	Battaglia et al. 2013
East Asia	Northwestern China	Russ	Indo-European	19	5.26%	Shou et al. 2010
East Asia	Northwestern China	Uyghur	Turkic	50	4.00%	Shou et al. 2010
East Asia	Northwestern China	Mongols	Mongolic	50	2.00%	Shou et al. 2010
East Asia	Mongolia	Mongols	Mongolic	160	1.25%	Di Cristofaro 2013
Northern Eurasia	Tuva Republic	Mongolians	Mongolic	146	0.68%	Regueiro et al. 2013

Supplementary Table 16.18. Survey of the Q1a-M25 Mutation among Asian Populations.

Region	Location	Population	Language Family	Sample Size	Percent Q1a2-M25	Reference
Central Asia	Afghanistan	Turkmen	Turkic	74	31.08%	Di Cristofaro 2013
Central Asia	Afghanistan	Uzbek	Turkic	127	0.79%	Di Cristofaro 2013
East Asia	Western Mongolia	Mongols	Mongolic	22	13.64%	Battaglia et al. 2013
East Asia	Mongolia	Mongols	Mongolic	160	0.63%	Di Cristofaro 2013
Eastern Europe	Bulgaria	Bulgarians	Indo-European	808	0.12%	Karachanak et al. 2013
Middle East	Iran	Iranians	Indo-European	150	4.00%	Regueiro et al. 2006
Middle East	Iran	Iranians	Indo-European	186	1.08%	Di Cristofaro 2013
Middle East	Iraq	Marsh Arabs	Afro-Asiatic	143	0.70%	Al Zahery et al. 2011
Middle East	Lebanon	Lebanese	Afro-Asiatic	914	0.44%	Zalloua et al. 2008
Middle East	Turkey	Turks	Turkic	523	0.19%	Cinnioglu et al. 2004
Northern Eurasia	Altai Republic	Altaians	Turkic	189	0.53%	Dulik et al. 2012a

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Supplementary Tables for Chapter 17 and Haplogroup R-M207

Supplementary Table 17.1. Distribution of Mesolithic R1b-M343 Mutations.

St Clair Ref	Reference No. from Study	Death	Region	Location	Mutation	Reference
72	I4630	9222	Baltic	Zvejnieki, Latvia	R1b1a1a-P297	Mathieson et al. 2018
2	Latvia_Hg2	8000	Baltic	Zvejnieki, Latvia	R1b1b-M335	Jones et al. 2017
67	I5235	10835	Eastern Europe	Padina, Serbia	R1b1a-L761	Mathieson et al. 2018
71	I4081	9335	Eastern Europe	Ostrovul Corbului, Romania	R1b1a-L761	Mathieson et al. 2018
73	I1734	9202	Eastern Europe	Vasil'evka, Ukraine	R1b1a-L761	Mathieson et al. 2018
76	I4916	8763	Eastern Europe	Hadučka Vodenica, Serbia	R1b1a-L761	Mathieson et al. 2018
77	I5411	8600	Eastern Europe	Schela Cladovei, Romania	R1b-M343	Mathieson et al. 2018
78	I5772	8450	Eastern Europe	Vlasac, Serbia	R1b1a-L761	Mathieson et al. 2018
79	I4666	8017	Eastern Europe	Lepenski Vir, Serbia	R1b1a-L761	Mathieson et al. 2018
33	I0124	7549	Eastern Europe	Lebyanzhinka, Sok River, Samara, Russia.	R1b1a1a-P297	Mathieson et al. 2015
84	I5408	7450	Eastern Europe	Ostrovul Corbului, Romania	R1b1a-L761	Mathieson et al. 2018
1	Villabruna	14000	Mediterranean	Dolomite Mountains, northern Italy	R1b1-L278	Fu et al. 2016

Supplementary Table 17.2. Distribution of Mesolithic R1a-M420 Mutations.

St. Clair Reference No.	Standard aDNA Reference	Death	Region	Location	Mutation	Reference
32	I0061	8280	Baltic	Yuzhnyy Oleni Ostrov, Karelia, Russia.	R1a-M420	Mathieson et al. 2015
69	I1819	10643	Eastern Europe	Vasil'evka, Ukraine	R1a-M420	Mathieson et al. 2018
74	I5876	8822	Eastern Europe	Dereivka, Ukraine	R1a-M420	Mathieson et al. 2018

Supplementary Table 17.3. Contemporary Distribution of R1b1a1a1-M73 (Regional View).

Region	Location	Population	Language Famil	Sub Family 1	Sample Size	Percent R1b-M73	Reference
Caucasus	Caucasus Russia	Nogais, Kara	Turkic		76	16%	Yunubayev et al. 2012
Caucasus	Caucasus Russia	Balkars	Turkic		135	10%	Yunubayev et al. 2012
Caucasus	Northwest Caucasus	Balkars	Turkic		136	10%	Myres et al. 2011
Eastern Europe	Bashkortostan , Russia	Bashkir	Turkic		586	13%	Myres et al. 2011
Eastern Europe	Russia, Volga- Ural Region	Mordvins	Uralic		59	10%	Trofimova et al. 2015
Northern Eurasia	Siberia, Russia	Shors	Turkic		38	13%	Malyarchuk et al. 2011
Northern Eurasia	Siberia, Russia	Teleuts	Turkic		44	11%	Malyarchuk et al. 2011
South Asia	North Pakistan	Hazara	Indo-European	Iranian	25	32%	Sengupta et al. 2006
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	32%	Di Cristofaro et al. 2013

Supplementary Table 17.4. Contemporary Distribution of R1b1a1a2a1a1-U106 (Language View).

Language Family	Sub Family 1	Region	Population	Sample Size	Percent R1b-U106	Reference
Indo-European	Celtic	Western Europe	Scots	168	12%	Busby et al. 2012
Indo-European	Celtic	Western Europe	Welsh	129	10%	Busby et al. 2012
Indo-European	Germanic	Western Europe	Frisians	94	43%	Busby et al. 2012
Indo-European	Germanic	Western Europe	Dutch	87	37%	Myres et al. 2011
Indo-European	Germanic	Western Europe	Germans	102	27%	Busby et al. 2012
Indo-European	Germanic	Western Europe	English	102	25%	Myres et al. 2011
Indo-European	Germanic	Western Europe	Germans	349	24%	Rebala et al. 2013
Indo-European	Germanic	Scandinavia	Danes	35	23%	Cruciani et al. 2011b
Indo-European	Germanic	Western Europe	Austrians	18	22%	Myres et al. 2011
Indo-European	Germanic	Western Europe	English	337	22%	Busby et al. 2012
Indo-European	Germanic	Western Europe	Germans	321	21%	Myres et al. 2011
Indo-European	Germanic	Western Europe	Germans	77	21%	Cruciani et al. 2011b
Indo-European	Germanic	Scandinavia	Norwegians	138	20%	Busby et al. 2012
Indo-European	Germanic	Scandinavia	Danes	110	18%	Myres et al. 2011
Indo-European	Germanic	Scandinavia	Danes	174	18%	Valverde et al. 2016
Indo-European	Germanic	Western Europe	Orkney Islanders	112	17%	Busby et al. 2012
Indo-European	West Slavic	Eastern Europe	Poles	40	10%	Cruciani et al. 2011b

Supplementary Table 17.5. Contemporary Distribution of R1b1a1a2a1a2a -DF27 (Language View).

Language Family	Sub Family 1	Region	Population	Sample Size	Percent R1b-DF27	Reference
Indo-European	Italic	Western Europe	Spanish	644	45%	Valverde et al. 2016
Indo-European	Italic	Western Europe	Portuguese	110	41%	Valverde et al. 2016
Indo-European	Italic	Western Europe	French	145	17%	Valverde et al. 2016
Isolate - Basque		Western Europe	Basques	341	63%	Valverde et al. 2016

Supplementary Table 17.6. Contemporary Distribution of R1b1a1a2a1a2b-U152 (Language View).

Language Family	Sub Family 1	Region	Population	Sample Size	Percent R1b-U152	Reference
Indo-European	Germanic	Western Europe	Germans	102	18%	Busby et al. 2012
Indo-European	Germanic	Western Europe	Germans	77	12%	Cruciani et al. 2011b
Indo-European	Germanic	Western Europe	Germans	321	10%	Myres et al. 2011
Indo-European	Italic	Mediterranean	Corsicans	24	42%	Busby et al. 2012
Indo-European	Italic	Mediterranean	Italians	34	35%	Cruciani et al. 2011b
Indo-European	Italic	Mediterranean	Corsicans	28	32%	Cruciani et al. 2011b
Indo-European	Italic	Western Europe	French	43	21%	Cruciani et al. 2011b
Indo-European	Italic	Mediterranean	Italians	282	20%	Myres et al. 2011
Indo-European	Italic	Mediterranean	Italians	884	19%	Boattini et al. 2013
Indo-European	Italic	Mediterranean	Italians	262	18%	Cruciani et al. 2011b
Indo-European	Italic	Mediterranean	Italians	432	17%	Busby et al. 2012
Indo-European	Italic	Western Europe	French	93	15%	Myres et al. 2011
Indo-European	Italic	Western Europe	French	558	14%	Ramos-Luis, E. et al. 2014
Indo-European	Italic	Mediterranean	Sicilians	258	14%	Busby et al. 2012
Indo-European	Italic	Western Europe	French	482	13%	Busby et al. 2012
Indo-European	Italic	Mediterranean	Sicilians	86	12%	Cruciani et al. 2011b
Indo-European	Italic	Mediterranean	Sardinians	270	10%	Cruciani et al. 2011b

Supplementary Table 17.7. Contemporary Distribution of R1b1a1a2a1a2c1-M529 (Language View).

Language Family	Sub Family 1	Region	Population	Sample Size	Percent R1b-M529	Reference
Indo-European	Celtic	Western Europe	Irish	377	0.74	Busby et al. 2012
Indo-European	Celtic	Western Europe	Irish	99	0.59	Myres et al. 2011
Indo-European	Celtic	Western Europe	Irish	146	0.54	Valverde et al. 2016
Indo-European	Celtic	Western Europe	Scots	168	0.52	Busby et al. 2012
Indo-European	Celtic	Western Europe	Welsh	129	0.46	Busby et al. 2012
Indo-European	Germanic	Western Europe	Orkney Islanders	112	0.34	Busby et al. 2012
Indo-European	Germanic	Western Europe	English	102	0.25	Myres et al. 2011
Indo-European	Germanic	Western Europe	English	337	0.15	Busby et al. 2012
Indo-European	Italic	Western Europe	French	145	0.52	Valverde et al. 2016
Indo-European	Italic	Western Europe	French	482	0.16	Busby et al. 2012

Supplementary Table 17.8. Contemporary Distribution of R1b1a2-V88 (Regional View).

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1b-V88	Reference
Eastern Europe	Bulgaria	Sephardic Bulgarians	Indo-European	South Slavic	20	5%	D'Atanasio et al. 2018
Mediterranean	Italy	Sardinians	Indo-European	Italic	375	1%	D'Atanasio et al. 2018
Middle East	Jordan: Amman & Dead Sea	Jordanians	Afro-Asiatic	Semitic	146	14%	Myres et al. 2011
North Africa	Sudan	Hausa	Afro-Asiatic	Chadic	32	41%	Hassan et al. 2008
North Africa	Egypt	Egyptian Berbers from Siwa	Afro-Asiatic	Semitic	93	26%	D'Atanasio et al. 2018
North Africa	Sudan	Copts	Afro-Asiatic	Egyptian	33	15%	Hassan et al. 2008
North Africa	Algeria	Mozabite Berbers	Afro-Asiatic	Berber	67	12%	Cruciani et al. 2010b
North Africa	Sudan	Nubians	Nilo-Saharan		39	10%	Hassan et al. 2008
North Africa	Libya	Taureg	Afro-Asiatic	Berber	47	6%	Ottoni et al. 2011
North Africa	Egypt	Northern Egyptians	Afro-Asiatic	Semitic	52	6%	D'Atanasio et al. 2018
North Africa	Egypt	Egyptians from Baharia	Afro-Asiatic	Semitic	41	5%	D'Atanasio et al. 2018
North Africa	Baharia, Egypt	Egyptians	Afro-Asiatic	Semitic	41	5%	Cruciani et al. 2010b
North Africa	Sudan	Beja	Afro-Asiatic	Cushitic	42	5%	Hassan et al. 2008
North Africa	Egypt	Northern Egyptians	Afro-Asiatic	Semitic	49	4%	Cruciani et al. 2010b
North Africa	Morocco	Ouarzazate Berbers	Afro-Asiatic	Berber	32	3%	Cruciani et al. 2010b
North Africa	Morocco	Ouarzazate Berbers	Afro-Asiatic	Berber	31	3%	D'Atanasio et al. 2018

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1b-V88	Reference
North Africa	Southern Egypt	Egyptians	Afro-Asiatic	Semitic	69	3%	Cruciani et al. 2010b
North Africa	Siwa, Egypt	Egyptian Berbers	Afro-Asiatic	Berber	93	2%	Cruciani et al. 2010b
North Africa	Algeria	Mozabite Berbersb	Afro-Asiatic	Berber	67	2%	D'Atanasio et al. 2018
North Africa	Libya	Libian Arabs	Afro-Asiatic	Semitic	71	1%	D'Atanasio et al. 2018
Sub-Saharan Africa	Northern Cameroon	Mafa	Afro-Asiatic	Chadic	8	88%	Cruciani et al. 2010b
Sub-Saharan Africa	Cameroon	Mada	Afro-Asiatic	Chadic	17	82%	Cruciani et al. 2010b
Sub-Saharan Africa	Cameroon	Uldeme	Afro-Asiatic	Chadic	22	64%	Cruciani et al. 2010b
Sub-Saharan Africa	Southern Nigeria	Yoruba	Niger-Congo	Non-Bantoid	21	48%	Cruciani et al. 2010b
Sub-Saharan Africa	Northern Cameroon	Shuwa Arabs	Afro-Asiatic	Semitic	5	40%	Cruciani et al. 2010b
Sub-Saharan Africa	Chad	Toubou	Nilo-Saharan		71	34%	Haber et al. 2016
Sub-Saharan Africa	Niger	Fula Zinder	Niger-Congo	Non-Bantoid	16	31%	Bučková et al 2013
Sub-Saharan Africa	Niger	Fula Diffa	Niger-Congo	Non-Bantoid	13	31%	Bučková et al 2013
Sub-Saharan Africa	Northern Cameroon	Mundang	Niger-Congo	Non-Bantoid	21	29%	Cruciani et al. 2010b
Sub-Saharan Africa	Northern Cameroon	Masa	Afro-Asiatic	Chadic	7	29%	Cruciani et al. 2010b
Sub-Saharan Africa	Chad	Laal	Isolate - Laal		26	23%	Haber et al. 2016
Sub-Saharan Africa	Northern Cameroon	Giziga	Afro-Asiatic	Chadic	9	22%	Cruciani et al. 2010b
Sub-Saharan Africa	Chad	Sara	Nilo-Saharan		61	20%	Haber et al. 2016
Sub-Saharan Africa	Chad	Ngambay	Nilo-Saharan		11	18%	Cruciani et al. 2010b
Sub-Saharan Africa	Niger	Fulbe	Niger-Congo	Non-Bantoid	7	14%	Cruciani et al. 2010b

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1b-V88	Reference
Sub-Saharan Africa	Northern Cameroon	Kanuri	Nilo-Saharan		7	14%	Cruciani et al. 2010b
Sub-Saharan Africa	Northern Cameroon	Gidar	Afro-Asiatic	Chadic	9	11%	Cruciani et al. 2010b
Sub-Saharan Africa	Northern Cameroon	Daba	Afro-Asiatic	Chadic	19	11%	Cruciani et al. 2010b
Sub-Saharan Africa	Nigeria	Hausa	Afro-Asiatic	Chadic	10	10%	Cruciani et al. 2010b
Sub-Saharan Africa	Niger	Fula Ader	Niger-Congo	Non-Bantoid	20	10%	Bučková et al 2013
Sub-Saharan Africa	Northern Cameroon	Fali	Niger-Congo	Non-Bantoid	48	8%	Cruciani et al. 2010b
Sub-Saharan Africa	Burkina Faso	Fula Balatungur	Niger-Congo	Non-Bantoid	13	8%	Bučková et al 2013
Sub-Saharan Africa	Northern Cameroon	Fulbe	Niger-Congo	Non-Bantoid	18	6%	Cruciani et al. 2010b
Sub-Saharan Africa	Niger	Fula Abala	Niger-Congo	Non-Bantoid	21	5%	Bučková et al 2013
Sub-Saharan Africa	Cameroon	Fula Tcheboua	Niger-Congo	Non-Bantoid	22	5%	Bučková et al 2013
Sub-Saharan Africa	Niger	Berber	Afro-Asiatic	Berber	22	5%	Cruciani et al. 2010b
Sub-Saharan Africa	Chad	Fula Bongor	Niger-Congo	Non-Bantoid	25	4%	Bučková et al 2013
Sub-Saharan Africa	Cameroon (North)	Ouldeme	Afro-Asiatic	Chadic	24	96%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Mafa	Afro-Asiatic	Chadic	9	88%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Podowko	Afro-Asiatic	Chadic	5	80%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Guiziga	Afro-Asiatic	Chadic	9	77%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Toupouri	Niger-Congo	Non-Bantoid	31	71%	D'Atanasio et al. 2018

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1b-V88	Reference
Sub-Saharan Africa	Cameroon (North)	Mada	Afro-Asiatic	Chadic	10	70%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Guidar	Afro-Asiatic	Chadic	9	67%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Moundang	Niger-Congo	Non-Bantoid	21	67%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Daba	Afro-Asiatic	Chadic	29	51%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Other Chadic	Afro-Asiatic	Chadic	8	50%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Mandara	Afro-Asiatic	Chadic	82	43%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Moundang	Niger-Congo	Non-Bantoid	5	40%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Toupouri	Niger-Congo	Non-Bantoid	13	39%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)/Chad	Shuwa Arabs	Afro-Asiatic	Semitic	6	33%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Massa	Afro-Asiatic	Chadic	7	28%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Sara	Nilo-Saharan		12	25%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Fali	Niger-Congo	Non-Bantoid	105	22%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Other Chadic	Afro-Asiatic	Chadic	5	20%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)/Chad	Fulbe	Niger-Congo	Non-Bantoid	79	19%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Ngambai	Nilo-Saharan		12	17%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Kanuri	Nilo-Saharan		7	14%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Goulaye	Nilo-Saharan		7	14%	D'Atanasio et al. 2018

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1b-V88	Reference
Sub-Saharan Africa	Niger	Fulbe	Niger-Congo	Non-Bantoid	7	14%	D'Atanasio et al. 2018
Sub-Saharan Africa	Nigeria (North)	Hausa	Afro-Asiatic	Chadic	9	11%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Gor	Nilo-Saharan		9	11%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Tali	Niger-Congo	Non-Bantoid	22	10%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (North)	Ngambai	Nilo-Saharan		11	9%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Massa	Afro-Asiatic	Chadic	11	9%	D'Atanasio et al. 2018
Sub-Saharan Africa	Chad	Madjingay	Nilo-Saharan		15	7%	D'Atanasio et al. 2018
Sub-Saharan Africa	Nigeria (South)	Yoruba	Niger-Congo	Non-Bantoid	20	5%	D'Atanasio et al. 2018
Sub-Saharan Africa	Niger	Tuareg	Afro-Asiatic	Berber	22	5%	D'Atanasio et al. 2018
Sub-Saharan Africa	Cameroon (South)	Ewondo	Niger-Congo	Bantoid	31	3%	D'Atanasio et al. 2018

Supplementary Table 17.9. Contemporary Distribution of R1b1a2-V88 (Language View).

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R1b-V88	Reference
Afro-Asiatic	Berber	North Africa	Mozabite Berbers	Algeria	67	12%	Cruciani et al. 2010b
Afro-Asiatic	Berber	North Africa	Taureg	Libya	47	6%	Ottoni et al. 2011
Afro-Asiatic	Berber	Sub-Saharan Africa	Tuareg	Niger	22	5%	D'Atanasio et al. 2018
Afro-Asiatic	Berber	Sub-Saharan Africa	Berber	Niger	22	5%	Cruciani et al. 2010b
Afro-Asiatic	Berber	North Africa	Ouarzazate Berbers	Morocco	32	3%	Cruciani et al. 2010b
Afro-Asiatic	Berber	North Africa	Ouarzazate Berbers	Morocco	31	3%	D'Atanasio et al. 2018
Afro-Asiatic	Berber	North Africa	Egyptian Berbers	Siwa, Egypt	93	2%	Cruciani et al. 2010b
Afro-Asiatic	Berber	North Africa	Mozabite Berbers	Algeria	67	2%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Ouldeme	Cameroon (North)	24	96%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Mafa	Cameroon (North)	9	88%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Mafa	Northern Cameroon	8	88%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Mada	Cameroon	17	82%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Podowko	Cameroon (North)	5	80%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Guiziga	Cameroon (North)	9	77%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Mada	Cameroon (North)	10	70%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Guidar	Cameroon (North)	9	67%	D'Atanasio et al. 2018

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R1b-V88	Reference
Afro-Asiatic	Chadic	Sub-Saharan Africa	Uldeme	Cameroon	22	64%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Daba	Cameroon (North)	29	51%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Other Chadic	Cameroon (North)	8	50%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Mandara	Cameroon (North)	82	43%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	North Africa	Hausa	Sudan	32	41%	Hassan et al. 2008
Afro-Asiatic	Chadic	Sub-Saharan Africa	Masa	Northern Cameroon	7	29%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Massa	Cameroon (North)	7	28%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Giziga	Northern Cameroon	9	22%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Other Chadic	Chad	5	20%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Gidar	Northern Cameroon	9	11%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Hausa	Nigeria (North)	9	11%	D'Atanasio et al. 2018
Afro-Asiatic	Chadic	Sub-Saharan Africa	Daba	Northern Cameroon	19	11%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Hausa	Nigeria	10	10%	Cruciani et al. 2010b
Afro-Asiatic	Chadic	Sub-Saharan Africa	Massa	Chad	11	9%	D'Atanasio et al. 2018
Afro-Asiatic	Cushitic	North Africa	Beja	Sudan	42	5%	Hassan et al. 2008
Afro-Asiatic	Egyptian	North Africa	Copts	Sudan	33	15%	Hassan et al. 2008
Afro-Asiatic	Semitic	Sub-Saharan Africa	Shuwa Arabs	Northern Cameroon	5	40%	Cruciani et al. 2010b

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R1b-V88	Reference
Afro-Asiatic	Semitic	Sub-Saharan Africa	Shuwa Arabs	Cameroon (North)/Chad	6	33%	D'Atanasio et al. 2018
Afro-Asiatic	Semitic	North Africa	Egyptian Berbers from Siwa	Egypt	93	26%	D'Atanasio et al. 2018
Afro-Asiatic	Semitic	Middle East	Jordanians	Jordan: Amman & Dead Sea	146	14%	Myres et al. 2011
Afro-Asiatic	Semitic	North Africa	Northern Egyptians	Egypt	52	6%	D'Atanasio et al. 2018
Afro-Asiatic	Semitic	North Africa	Egyptians from Baharia	Egypt	41	5%	D'Atanasio et al. 2018
Afro-Asiatic	Semitic	North Africa	Egyptians	Baharia, Egypt	41	5%	Cruciani et al. 2010b
Afro-Asiatic	Semitic	North Africa	Northern Egyptians	Egypt	49	4%	Cruciani et al. 2010b
Afro-Asiatic	Semitic	North Africa	Egyptians	Southern Egypt	69	3%	Cruciani et al. 2010b
Afro-Asiatic	Semitic	North Africa	Libian Arabs	Libya	71	1%	D'Atanasio et al. 2018
Indo-European	Italic	Mediterranean	Sardinians	Italy	375	1%	D'Atanasio et al. 2018
Indo-European	South Slavic	Eastern Europe	Sephardic Bulgarians	Bulgaria	20	5%	D'Atanasio et al. 2018
Isolate - Laal		Sub-Saharan Africa	Laal	Chad	26	23%	Haber et al. 2016
Niger-Congo	Bantoid	Sub-Saharan Africa	Ewondo	Cameroon (South)	31	3%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Toupouri	Cameroon (North)	31	71%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Moundang	Cameroon (North)	21	67%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Yoruba	Southern Nigeria	21	48%	Cruciani et al. 2010b

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R1b-V88	Reference
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Moundang	Chad	5	40%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Toupouri	Chad	13	39%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Zinder	Niger	16	31%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Diffa	Niger	13	31%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Mundang	Northern Cameroon	21	29%	Cruciani et al. 2010b
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fali	Cameroon (North)	105	22%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fulbe	Cameroon (North)/Chad	79	19%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fulbe	Niger	7	14%	Cruciani et al. 2010b
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fulbe	Niger	7	14%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Ader	Niger	20	10%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Tali	Cameroon (North)	22	10%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fali	Northern Cameroon	48	8%	Cruciani et al. 2010b
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Balatungur	Burkina Faso	13	8%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fulbe	Northern Cameroon	18	6%	Cruciani et al. 2010b
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Yoruba	Nigeria (South)	20	5%	D'Atanasio et al. 2018
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Abala	Niger	21	5%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Tcheboua	Cameroon	22	5%	Bučková et al 2013
Niger-Congo	Non-Bantoid	Sub-Saharan Africa	Fula Bongor	Chad	25	4%	Bučková et al 2013
Nilo-Saharan		Sub-Saharan Africa	Toubou	Chad	71	34%	Haber et al. 2016

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R1b-V88	Reference
Nilo-Saharan		Sub-Saharan Africa	Sara	Chad	12	25%	D'Atanasio et al. 2018
Nilo-Saharan		Sub-Saharan Africa	Sara	Chad	61	20%	Haber et al. 2016
Nilo-Saharan		Sub-Saharan Africa	Ngambay	Chad	11	18%	Cruciani et al. 2010b
Nilo-Saharan		Sub-Saharan Africa	Ngambai	Chad	12	17%	D'Atanasio et al. 2018
Nilo-Saharan		Sub-Saharan Africa	Kanuri	Northern Cameroon	7	14%	Cruciani et al. 2010b
Nilo-Saharan		Sub-Saharan Africa	Kanuri	Cameroon (North)	7	14%	D'Atanasio et al. 2018
Nilo-Saharan		Sub-Saharan Africa	Goulaye	Chad	7	14%	D'Atanasio et al. 2018
Nilo-Saharan		Sub-Saharan Africa	Gor	Chad	9	11%	D'Atanasio et al. 2018
Nilo-Saharan		North Africa	Nubians	Sudan	39	10%	Hassan et al. 2008
Nilo-Saharan		Sub-Saharan Africa	Ngambai	Cameroon (North)	11	9%	D'Atanasio et al. 2018
Nilo-Saharan		Sub-Saharan Africa	Madjingay	Chad	15	7%	D'Atanasio et al. 2018

Supplementary Table 17.10. R1b1a1a2a2-CTS1078 aDNA.

St Clair Ref	aDNA Ref	Region	Location	Death	Culture	Mutation	Reference
21	RISE555.SG	Eastern Europe	Stalingrad Quarry, Russia	4627	Bronze Age	R1b1a1a2a2-CTS1078	Allentoft et al. 2015
26	RISE547.SG	Northern Eurasia	Temrta, Russia	4711	Yamnaya	R1b1a1a2a2-CTS1078	Allentoft et al. 2015
27	RISE548.SG	Northern Eurasia	Temrta, Russia.	4650	Yamnaya	R1b1a1a2a2-CTS1078	Allentoft et al. 2015
38	I0429	Eastern Europe	Lopatino, Sok River, Samara, Russia	5079	Yamnaya	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
41	I0370	Eastern Europe	Ishkinovka, Eastern Orenburg, Pre-Ural steppe, Samara	4950	Yamnaya	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
43	I0231	Eastern Europe	Ekaterinovka, Southern Steppe, Samara	4792	Yamnaya	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
44	I0440	Eastern Europe	Lopatino, Sok River, Samara, Russia	4727	Yamnaya	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
47	I0126	Eastern Europe	Kutuluk River, Samara, Russia	4627	Bronze Age	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
48	I0374	Eastern Europe	Nikolaevka III, Samara River, Samara, Russia	4450	Bronze Age	R1b1a1a2a2-CTS1078	Mathieson et al. 2015
95	I5884	Eastern Europe	Dereivka, Ukraine	4743	Neolithic	R1b1a1a2a2-CTS1078	Mathieson et al. 2018
96	I3499	Eastern Europe	Beli Manastir-Popova Zemlja, Croatia	4725	Neolithic	R1b1a1a2a2-CTS1078	Mathieson et al. 2018
101	I5270	Northern Eurasia	Elo, Russia	5081	Afanasievo	R1b1a1a2a2-CTS1078	Narasimhan et al. 2019
102	I2071	Northern Eurasia	Altai Mountains, Russia	4968	Afanasievo	R1b1a1a2a2-CTS1078	Narasimhan et al. 2019
103	I5278	Northern Eurasia	Lower Tyumechin, Altai Mountains, Russia	4948	Afanasievo	R1b1a1a2a2-CTS1078	Narasimhan et al. 2019
104	I7671	Eastern Europe	Samara Oblast, Volga River Valley, Bobrovka, Russia	4733	Bronze Age	R1b1a1a2a2-CTS1078	Narasimhan et al. 2019

St Clair Ref	aDNA Ref	Region	Location	Death	Culture	Mutation	Reference
106	I6712	Northern Eurasia	Middle Yenisei region, Afanasieva Gora, Russia	4632	Afanasievo	R1b1a1a2a2-CTS1078	Narasimhan et al. 2019

Supplementary Table 17.11. Contemporary distribution of R1b1a1a2a2-CTS1078 (Regional View).

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent CTS 1078	Reference
Baltic	Estonia	Estonians	Uralic	Finnic	210	1%	Myres et al. 2011
Caucasus	Northeast Caucasus	Bagvalals	North Caucasian		28	68%	Myres et al. 2011
Caucasus	Northeast Caucasus	Tabasarans	North Caucasian		43	40%	Myres et al. 2011
Caucasus	Russia: Adygea	Armenians Adigei	Indo-European	Armenian	49	20%	Balanovski et al. 2017
Caucasus	Northeast Caucasus	Lezgis	North Caucasian		31	16%	Myres et al. 2011
Caucasus	Georgia	Armenians Erzurum	Indo-European	Armenian	99	15%	Balanovski et al. 2017
Caucasus	Northeast Caucasus	Kumyks	Turkic		76	15%	Myres et al. 2011
Caucasus	Daghestan	Daghestani	North Caucasian		49	14%	Busby et al. 2012
Caucasus	Russia: Krasnodar	Armenians Krasnodar	Indo-European	Armenian	117	12%	Balanovski et al. 2017
Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	Indo-European	Armenian	92	9%	Balanovski et al. 2017
Caucasus	Georgia	Imereti	Kartvelian		62	6%	Balanovski et al. 2017
Caucasus	Northeast Caucasus	Andis	North Caucasian		49	6%	Myres et al. 2011
Caucasus	Northwest Caucasus	Ossetians	Indo-European	Iranian	134	5%	Myres et al. 2011
Caucasus	Northeast Caucasus	Karachays	Turkic		69	4%	Myres et al. 2011
Caucasus	South Caucasus	Armenians	Indo-European	Armenian	26	4%	Myres et al. 2011

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent CTS 1078	Reference
Caucasus	Northwest Caucasus	Abazas	North Caucasian		89	3%	Myres et al. 2011
Caucasus	South Caucasus	Abkhaz	North Caucasian		162	3%	Myres et al. 2011
Caucasus	Northwest Caucasus	Balkars	Turkic		136	3%	Myres et al. 2011
Caucasus	Northeast Caucasus	Dargins	North Caucasian		68	3%	Myres et al. 2011
Caucasus	Northwest Caucasus	Kabardians	North Caucasian		141	3%	Myres et al. 2011
Caucasus	Northeast Caucasus	Avars	North Caucasian		42	2%	Myres et al. 2011
Caucasus	South Caucasus	Megrels	Kartvelian		67	2%	Myres et al. 2011
Central Asia	Afghanistan	Afghans	Indo-European	Iranian	51	6%	Busby et al. 2012
Eastern Europe	Bashkortostan, Russia	Bashkir	Turkic		586	23%	Myres et al. 2011
Eastern Europe	Kosovo	Kosovans	Indo-European	South Slavic	114	19%	Myres et al. 2011
Eastern Europe	Hungary	Hungarians	Uralic		113	8%	Myres et al. 2011
Eastern Europe	Bashkortostan, Russia	Tatars	Turkic		39	8%	Myres et al. 2011
Eastern Europe	Romania	Romanians	Indo-European	Italic	330	7%	Myres et al. 2011
Eastern Europe	Poland	Poles	Indo-European	West Slavic	202	7%	Myres et al. 2011
Eastern Europe	Poland	Poles	Indo-European	West Slavic	174	6%	Busby et al. 2012
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	87	6%	Myres et al. 2011
Eastern Europe	Slovenia	Slovenes	Indo-European	South Slavic	102	6%	Myres et al. 2011
Eastern Europe	Serbia	Serbians	Indo-European	South Slavic	113	5%	Myres et al. 2011
Eastern Europe	Macedonia	Macedonians	Indo-European	South Slavic	79	5%	Myres et al. 2011
Eastern Europe	Slovakia	Slovaks	Indo-European	West Slavic	276	5%	Myres et al. 2011

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent CTS 1078	Reference
Eastern Europe	Romania	Romanians	Indo-European	Italic	59	5%	Busby et al. 2012
Eastern Europe	Russia	Urdmurts	Uralic	Permian	54	4%	Myres et al. 2011
Eastern Europe	Belarus	Belarusians	Indo-European	East Slavic	205	3%	Myres et al. 2011
Eastern Europe	Bulgaria	Bulgarians	Indo-European	South Slavic	30	3%	Busby et al. 2012
Eastern Europe	Croatia	Croatians	Indo-European	South Slavic	108	3%	Myres et al. 2011
Eastern Europe	Herzegovina	Herzegovinans	Indo-European	South Slavic	141	3%	Myres et al. 2011
Eastern Europe	Kazan, Russia	Tatars	Turkic		80	3%	Myres et al. 2011
Eastern Europe	Russia	Russians	Indo-European	East Slavic	1037	2%	Myres et al. 2011
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	504	2%	Myres et al. 2011
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	55	2%	Busby et al. 2012
Eastern Europe	Russia	Chuvash	Turkic		117	2%	Myres et al. 2011
Eastern Europe	Croatia	Croatians	Indo-European	East Slavic	144	1%	Busby et al. 2012
Eastern Europe	Bosnia	Bosnians	Indo-European	South Slavic	78	1%	Myres et al. 2011
Mediterranean	Albania	Albanians	Indo-European	Albanian	158	13%	Busby et al. 2012
Mediterranean	Sicily	Sicilians	Indo-European	Italic	258	12%	Busby et al. 2012
Mediterranean	Italy	Italians	Indo-European	Italic	432	9%	Busby et al. 2012
Mediterranean	Greece	Greeks	Indo-European	Greek	185	9%	Myres et al. 2011
Mediterranean	Italy	Italians	Indo-European	Italic	282	8%	Myres et al. 2011
Mediterranean	Crete	Cretans	Indo-European	Greek	193	8%	Myres et al. 2011
Mediterranean	Greece	Greeks	Indo-European	Greeks	167	5%	Busby et al. 2012
Mediterranean	Corsica	Corsicans	Indo-European	Italic	24	4%	Busby et al. 2012
Middle East	Turkey	Turks	Turkic		322	20%	Busby et al. 2012
Middle East	Turkey	Turks	Turkic		611	14%	Myres et al. 2011
Middle East	Iran	Iranians	Indo-European	Iranian	328	10%	Busby et al. 2012

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent CTS 1078	Reference
Middle East	Iran	Iranians	Indo-European	Iranian	150	8%	Myres et al. 2011
Middle East	Syria	Syrians	Afro-Asiatic	Semitic	72	7%	Busby et al. 2012
Middle East	Iraq	Iraqi	Afro-Asiatic	Semitic	33	3%	Busby et al. 2012
Middle East	Jordan	Jordanians	Afro-Asiatic	Semitic	76	3%	Myres et al. 2011
Middle East	Jordan: Amman & Dead Sea	Jordanians	Afro-Asiatic	Semitic	146	2%	Myres et al. 2011
Northern Eurasia	Perm Oblast, Russia	Komi	Uralic	Permian	61	12%	Myres et al. 2011
Scandinavia	Sweden South (Malmö)	Swedes	Indo-European	Germanic	139	5%	Myres et al. 2011
Scandinavia	Denmark	Danes	Indo-European	Germanic	110	4%	Myres et al. 2011
Scandinavia	Norway	Norwegians	Indo-European	Germanic	138	1%	Busby et al. 2012
Western Europe	Germans	Germans	Indo-European	Germanic	102	13%	Busby et al. 2012
Western Europe	Portugal	Portuguese	Indo-European	Italic	300	10%	Busby et al. 2012
Western Europe	France	French	Indo-European	Italic	482	5%	Busby et al. 2012
Western Europe	England	English	Indo-European	Germanic	102	4%	Myres et al. 2011
Western Europe	Spain	Spanish	Indo-European	Italic	359	4%	Busby et al. 2012
Western Europe	England	English	Indo-European	Germanic	337	4%	Busby et al. 2012
Western Europe	Germany	Germans	Indo-European	Germanic	321	4%	Myres et al. 2011
Western Europe	Orkney	Orkney Islanders	Indo-European	Germanic	112	4%	Busby et al. 2012
Western Europe	Ireland	Irish	Indo-European	Celtic	377	3%	Busby et al. 2012
Western Europe	France	French	Indo-European	Italic	93	3%	Myres et al. 2011
Western Europe	Spain	Spanish	Indo-European	Italic	454	2%	Myres et al. 2011
Western Europe	Ireland	Irish	Indo-European	Celtic	99	2%	Myres et al. 2011
Western Europe	Wales	Welsh	Indo-European	Celtic	129	2%	Busby et al. 2012

Supplementary Table 17.12. Contemporary Distribution of R1a1a1b1a-Z282 (Regional View).

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1a-Z282	Reference
Baltic	Russia	Karelians	Uralic	Finnic	140	40%	Underhill et al. 2010; Underhill et al. 2015
Baltic	Russia	Veps	Uralic	Finnic	39	36%	Underhill et al. 2010; Underhill et al. 2015
Baltic	Estonia	Estonians	Uralic	Finnic	236	31%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Belarus	Belarusians	Indo-European	East Slavic	364	56%	Underhill et al. 2010; Kushniarevich et al 2013; Underhill et al. 2015
Eastern Europe	Russia	Russians	Indo-European	East Slavic	433	53%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Poland	Poles	Indo-European	West Slavic	202	50%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Ukraine	Ukrainians	Indo-European	East Slavic	498	47%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Slovakia	Slovaks	Indo-European	West Slavic	257	46%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Czech Republic	Czechs	Indo-European	West Slavic	53	38%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Russia	Mari	Uralic		51	29%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Croatia	Croatians	Indo-European	South Slavic	108	29%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Poland	Poles	Indo-European	West Slavic	520	28%	Rebala et al. 2013
Eastern Europe	Croatia	Croatians	Indo-European	South Slavic	720	26%	Sarac et al. 2016

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R1a-Z282	Reference
Eastern Europe	Tatarstan, Russia	Tatars	Turkic		66	24%	Underhill et al. 2010; Underhill et al. 2015
Eastern Europe	Slovenia	Slovenes	Indo-European	West Slavic	180	20%	Underhill et al. 2010; Underhill et al. 2015
Northern Eurasia	Russia	Komi	Uralic	Permian	112	21%	Underhill et al. 2010; Underhill et al. 2015
Scandinavia	Norway	Norwegians	Indo-European	Germanic	118	21%	Underhill et al. 2015
Western Europe	Germany	Sorbs	Indo-European	West Slavic	123	57%	Rebala et al. 2013

Supplementary Table 17.13. Contemporary Distribution of R1a1a1b2-Z93 (Regional View).

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
Caucasus	Daghestan	Tats	Indo-European	Iranian	24	25%	Karafet et al. 2016
Caucasus	Caucasus	Balkars	Turkic		136	25%	Underhill et al. 2010; Underhill et al. 2015
Caucasus	Caucasus	Karachays	Turkic		69	25%	Underhill et al. 2010; Underhill et al. 2015
Central Asia	Afghanistan	Pashtuns	Indo-European	Iranian	84	52%	Di Cristofaro et al. 2013; Underhill et al. 2015
Central Asia	Kyrgyzstan	Kyrgyz	Turkic		232	47%	Underhill et al. 2010; Underhill et al. 2015
Central Asia	Afghanistan	Tajik	Indo-European	Iranian	140	24%	Di Cristofaro et al. 2013; Underhill et al. 2015
Central Asia	Afghanistan	Uzbeks	Turkic		125	23%	Di Cristofaro et al. 2013; Underhill et al. 2015
Northern Eurasia	Russia	Altai (Altaians, Altay)	Turkic		61	38%	Underhill et al. 2010; Underhill et al. 2015
Northern Eurasia	Russia	Khakas	Turkic		76	33%	Underhill et al. 2010; Underhill et al. 2015
South Asia	East India	West Bengal Brahmin	Indo-European	Indo-Aryan	18	72%	Sengupta et al. 2006
South Asia	Gujarat	Pavagadhi Chaudhari	Indo-European	Indo-Aryan	29	62%	Khurana et al. 2014
South Asia	Pakistan	Sindhi	Indo-European	Indo-Aryan	21	52%	Di Cristofaro et al. 2013
South Asia	South Pakistan	Sindhi	Indo-European	Indo-Aryan	21	52%	Sengupta et al. 2006
South Asia	Pakistan	Pathans	Indo-European	Iranian	270	49%	Lee et al. 2014
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	48%	Sengupta et al. 2006
South Asia	West Bengal	Bengali	Indo-European	Indo-Aryan	54	41%	Debnath et al. 2011
South Asia	Pakistan	Pathans	Indo-European	Iranian	20	40%	Di Cristofaro et al. 2013

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	North Pakistan	Pathans	Indo-European	Iranian	20	40%	Sengupta et al. 2006
South Asia	Northern India	Chamar	Indo-European	Indo-Aryan	18	39%	Sengupta et al. 2006
South Asia	Northern India	Uttar Pradesh Brahmin	Indo-European	Indo-Aryan	14	36%	Sengupta et al. 2006
South Asia	Andra Pradesh	Andh	Indo-European	Indo-Aryan	54	31%	Thanseem et al. 2006
South Asia	Northern India	Rajput	Indo-European	Indo-Aryan	29	31%	Sengupta et al. 2006
South Asia	South India	Iyengar	Dravidian		30	30%	Sengupta et al. 2006
South Asia	Pakistan	Makrani	Indo-European	Indo-Aryan	20	30%	Di Cristofaro et al. 2013
South Asia	Gujarat	Konkana	Indo-European	Indo-Aryan	24	29%	Khurana et al. 2014
South Asia	Maharashtra	Thakur	Indo-European	Indo-Aryan	48	29%	Thangaraj et al. 2010
South Asia	Northeastern India	Rajbanshi	Indo-European	Indo-Aryan	45	29%	Borkar et al. 2011
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	28%	Di Cristofaro et al. 2013
South Asia	South Pakistan	Baloch	Indo-European	Iranian	25	28%	Sengupta et al. 2006
South Asia	South India	Iyer	Dravidian		29	28%	Sengupta et al. 2006
South Asia	Maharashtra	Mahadeo Koli	Indo-European	Indo-Aryan	50	26%	Thangaraj et al. 2010
South Asia	Nepal	Newar	Sino-Tibetan	Tibeto-Burman	66	26%	Gayden et al. 2007
South Asia	South India	Pallan	Dravidian		29	24%	Sengupta et al. 2006
South Asia	South Pakistan	Brahui	Dravidian		25	24%	Sengupta et al. 2006
South Asia	Pakistan	Brahui	Dravidian		25	24%	Di Cristofaro et al. 2013
South Asia	Tamil Nadu, India	Mukkuvar	Dravidian		17	24%	Arunkumar et al. 2012
South Asia	Northeastern India	Paharia	Indo-European	Indo-Aryan	100	23%	Borkar et al. 2011
South Asia	West India	Nav Buddha	Indo-European	Indo-Aryan	14	21%	Sengupta et al. 2006
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	19	21%	Sengupta et al. 2006

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	Tamil Nadu, India	Tamil Jains	Dravidian		100	20%	Arunkumar et al. 2012
South Asia	Pakistan	Kalash	Indo-European	Indo-Aryan	20	20%	Di Cristofaro et al. 2013
South Asia	Southwest India	Lingayat	Dravidian		101	20%	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu, India	Kota	Dravidian		62	19%	Arunkumar et al. 2012
South Asia	Andra Pradesh	Naikpod	Dravidian		68	19%	Thanseem et al. 2006
South Asia	Central India	Halba	Indo-European	Indo-Aryan	21	19%	Sengupta et al. 2006
South Asia	Gujarat	Dhodia	Indo-European	Indo-Aryan	63	19%	Khurana et al. 2014
South Asia	West Bengal	Rajbanshi	Indo-European	Indo-Aryan	51	18%	Debnath et al. 2011
South Asia	Tamil Nadu, India	Mullukurumba	Dravidian		29	17%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Valayar	Dravidian		95	16%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Maravar	Dravidian		80	15%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Vanniyar	Dravidian		21	14%	Arunkumar et al. 2012
South Asia	South India	Ambalakarar	Dravidian		29	14%	Sengupta et al. 2006
South Asia	South India	Vellalar	Dravidian		31	13%	Sengupta et al. 2006
South Asia	Gujarat	Vasava	Indo-European	Indo-Aryan	24	13%	Khurana et al. 2014
South Asia	Andra Pradesh	Pardhan	Dravidian		128	13%	Thanseem et al. 2006
South Asia	Gujarat	Valvi Chaudhari	Indo-European	Indo-Aryan	32	13%	Khurana et al. 2014
South Asia	South India	Kota	Dravidian		16	13%	Sengupta et al. 2006
South Asia	Northeastern India	Oraon	Dravidian		110	12%	Borkar et al. 2011
South Asia	Tamil Nadu, India	Thoda	Dravidian		26	12%	Arunkumar et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	Tamil Nadu, India	Paravar	Dravidian		27	11%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Yadhava	Dravidian		107	10%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Nadar TNV	Dravidian		59	10%	Arunkumar et al. 2012
South Asia	North Pakistan	Burusho	Isolate - Burushaski		20	10%	Sengupta et al. 2006
South Asia	East India	Agharia	Austro-Asiatic	Munda	10	10%	Sengupta et al. 2006
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	10%	Sengupta et al. 2006
South Asia	Pakistan	Burusho	Isolate - Burushaski		20	10%	Di Cristofaro et al. 2013
South Asia	Tamil Nadu, India	Pallar	Dravidian		51	10%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Parayar NTN	Dravidian		52	10%	Arunkumar et al. 2012
South Asia	Gujarat	Dubla	Indo-European	Indo-Aryan	42	10%	Khurana et al. 2014
South Asia	Tamil Nadu, India	Vanniyar NTN	Dravidian		96	9%	Arunkumar et al. 2012
South Asia	Nepal	Tharu	Indo-European	Indo-Aryan	171	9%	Fornarino et al. 2009
South Asia	Tamil Nadu, India	Parayar	Dravidian		24	8%	Arunkumar et al. 2012
South Asia	West Bengal	Dhimal	Sino-Tibetan	Tibeto-Burman	36	8%	Debnath et al. 2011
South Asia	Nepal	Tharu	Indo-European	Indo-Aryan	170	8%	Fornarino et al. 2009; Underhill et al. 2015
South Asia	Gujarat	Nana Chaudhari	Indo-European	Indo-Aryan	25	8%	Khurana et al. 2014
South Asia	South India	Vanniyar	Dravidian		25	8%	Sengupta et al. 2006
South Asia	Southwest India	Vokkaliga	Dravidian		102	8%	Chennakrishnaiah et al. 2013
South Asia	East India	Mahishya	Indo-European	Indo-Aryan	13	8%	Sengupta et al. 2006

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	Gujarat	Mota Chaudhari	Indo-European	Indo-Aryan	27	7%	Khurana et al. 2014
South Asia	South India	Konda Reddy	Dravidian		30	7%	Sengupta et al. 2006
South Asia	Northeast India	Jamatia	Sino-Tibetan	Tibeto-Burman	30	7%	Sengupta et al. 2006
South Asia	Tamil Nadu, India	Betta Kurumba	Dravidian		17	6%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Kanikaran	Dravidian		17	6%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Kurumba	Dravidian		35	6%	Arunkumar et al. 2012
South Asia	Gujarat	Gamit	Indo-European	Indo-Aryan	18	6%	Khurana et al. 2014
South Asia	Tamil Nadu, India	Ezhava	Dravidian		95	5%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Sourashtra	Indo-European	Indo-Aryan	40	5%	Arunkumar et al. 2012
South Asia	Northeastern India	Mech	Sino-Tibetan	Tibeto-Burman	20	5%	Borkar et al. 2011
South Asia	Northeastern India	Lachung	Sino-Tibetan	Tibeto-Burman	20	5%	Borkar et al. 2011
South Asia	Northeast India	Tripuri	Sino-Tibetan	Tibeto-Burman	21	5%	Sengupta et al. 2006
South Asia	Tamil Nadu, India	Brahacharanam	Indo-European	Indo-Aryan	21	5%	Arunkumar et al. 2012
South Asia	Nepal	Tamang	Sino-Tibetan	Tibeto-Burman	45	4%	Gayden et al. 2007
South Asia	Tamil Nadu, India	Kattunaickan	Dravidian		46	4%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Nadar Cape	Dravidian		98	4%	Arunkumar et al. 2012

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	Tamil Nadu, India	Piramalai Kallar	Dravidian		53	4%	Arunkumar et al. 2012
South Asia	Northeastern India	Ho	Austro-Asiatic	Munda	28	4%	Borkar et al. 2011
South Asia	Bangladesh	Marma	Sino-Tibetan	Tibeto-Burman	60	3%	Gazi et al. 2013
South Asia	West Bengal	Oraon	Dravidian		31	3%	Debnath et al. 2011
South Asia	West Bengal	Kol	Austro-Asiatic	Munda	62	3%	Debnath et al. 2011
South Asia	Northeastern India	Birhor	Austro-Asiatic	Munda	100	3%	Borkar et al. 2011
South Asia	West Bengal	Kharia	Austro-Asiatic	Munda	34	3%	Debnath et al. 2011
South Asia	Tamil Nadu, India	Irula	Dravidian		80	3%	Arunkumar et al. 2012
South Asia	Northeastern India	Munda	Austro-Asiatic	Munda	94	2%	Borkar et al. 2011
South Asia	West Bengal	Santhal	Austro-Asiatic	Munda	51	2%	Debnath et al. 2011
South Asia	Bangladesh	Chakma	Indo-European	Indo-Aryan	89	1%	Gazi et al. 2013
South Asia	Northeastern India	Santhal	Austro-Asiatic	Munda	90	1%	Borkar et al. 2011
South Asia	Tamil Nadu, India	Kadar	Dravidian		28	0%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Vadama	Indo-European	Indo-Aryan	63	0%	Arunkumar et al. 2012
South Asia	Bangladesh	Tripuri	Sino-Tibetan	Tibeto-Burman	88	0%	Gazi et al. 2013
South Asia	East India	Bagdi	Indo-European	Indo-Aryan	11	0%	Sengupta et al. 2006
South Asia	West Bengal	Rabha	Sino-Tibetan	Tibeto-Burman	26	0%	Debnath et al. 2011

Region	Location	Population	Language Family	Branch	Sample Size	Percent R1a-Z93	Reference
South Asia	Tamil Nadu, India	Paliyan	Dravidian		95	0%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Iyengar	Indo-European	Indo-Aryan	11	0%	Arunkumar et al. 2012
South Asia	Sikkim	Lachungpa	Sino-Tibetan	Tibeto-Burman	11	0%	Debnath et al. 2011
South Asia	South India	Kurumba	Dravidian		19	0%	Sengupta et al. 2006
South Asia	North Pakistan	Hazara	Indo-European	Iranian	25	0%	Sengupta et al. 2006
South Asia	Pakistan	Hazara	Indo-European	Iranian	25	0%	Di Cristofaro et al. 2013
South Asia	South India	Irula	Dravidian		30	0%	Sengupta et al. 2006
South Asia	East India	Lodha	Indo-European	Indo-Aryan	20	0%	Sengupta et al. 2006
South Asia	Tamil Nadu, India	Pulayar	Dravidian		63	0%	Arunkumar et al. 2012

Supplementary Table 17.14. Contemporary Distribution of R1a1a1b1a1-M458 (Language View).

Language Family	Sub Family 1	Region	Location	Population	Sample Size	Percent R1a-M458	Reference
Indo-European	East Slavic	Eastern Europe	Belarus	Belarusians	364	15%	Underhill et al. 2010; Kushniarevich et al. 2013; Underhill et al. 2015
Indo-European	East Slavic	Eastern Europe	Belarus	Belarusians	565	15%	Kushniarevich et al. 2013
Indo-European	East Slavic	Eastern Europe	Lviv Region, Ukraine	Ukrainians	154	14%	Mielnik-Sikorska et al. 2013.
Indo-European	East Slavic	Eastern Europe	Ukraine	Ukrainians	498	13%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	East Slavic	Eastern Europe	Russia	Russians	433	12%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Finnic	Baltic	Russia	Veps	39	15%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Finnic	Baltic	Russia	Karelians	140	14%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	Italic	Eastern Europe	Moldavia	Moldavians	125	13%	Varzari et al. 2013
Indo-European	South Slavic	Eastern Europe	Croatia	Croatians	108	19%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Western Europe	Germany	Sorbs	123	57%	Rebala et al. 2013
Indo-European	West Slavic	Eastern Europe	Czech Republic	Czechs	53	30%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Poland	Poles	520	28%	Rebala et al. 2013
Indo-European	West Slavic	Eastern Europe	Poland	Poles	202	25%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Slovakia	Slovaks	257	21%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Slovakia	Slovaks	164	16%	Rebala et al. 2013

Supplementary Table 17.15. Contemporary Distribution of R1a1a1b1a2b-M558 (Language View).

Language Family	Sub Family 1	Region	Location	Population	Sample Size	Percent R1a-M558	Reference
Indo-European	Armenian	Caucasus	Russia: Rostov and Myasnikovsky Regions	Armenians Don	92	13%	Balanovski et al. 2017
Indo-European	East Slavic	Eastern Europe	Russia	Russians	433	26%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	East Slavic	Eastern Europe	Belarus	Belarusians	364	23%	Underhill et al. 2010; Kushniarevich et al. 2013; Underhill et al. 2015
Indo-European	East Slavic	Eastern Europe	Ukraine	Ukrainians	498	18%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	South Slavic	Eastern Europe	Croatia	Croatians	720	19%	Sarac et al. 2016
Indo-European	South Slavic	Eastern Europe	Bosnia	Bosnians	78	12%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Slovakia	Slovaks	257	22%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Poland	Poles	202	19%	Underhill et al. 2010; Underhill et al. 2015
Indo-European	West Slavic	Eastern Europe	Slovenia	Slovenes	180	17%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Eastern Europe	Tatarstan, Russia	Tatars	66	15%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Eastern Europe	Russia, Bashkortostan	Tatars	39	13%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Eastern Europe	Russia	Chuvash	117	11%	Underhill et al. 2010; Underhill et al. 2015
Uralic		Eastern Europe	Russia	Mari	51	24%	Underhill et al. 2010; Underhill et al. 2015

Language Family	Sub Family 1	Region	Location	Population	Sample Size	Percent R1a-M558	Reference
Uralic		Eastern Europe	Hungary	Hungarians	113	12%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Finnic	Baltic	Estonia	Estonians	236	19%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Finnic	Baltic	Russia	Veps	39	15%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Finnic	Baltic	Russia	Karelians	140	10%	Underhill et al. 2010; Underhill et al. 2015
Uralic	Permian	Eastern Europe	Russia	Udmurt	54	11%	Underhill et al. 2010; Underhill et al. 2015

Supplementary Table 17.16. Contemporary Distribution of R1a1a1b2- Z93 (Language View).

Language Family	Branch	Region	Population	Location	Percent R1a-Z93	Reference
Austro-Asiatic	Munda	South Asia	Agharia	East India	10%	Sengupta et al. 2006
Dravidian		South Asia	Iyengar	South India	30%	Sengupta et al. 2006
Dravidian		South Asia	Iyer	South India	28%	Sengupta et al. 2006
Dravidian		South Asia	Pallan	South India	24%	Sengupta et al. 2006
Dravidian		South Asia	Brahui	South Pakistan	24%	Sengupta et al. 2006
Dravidian		South Asia	Brahui	Pakistan	24%	Di Cristofaro et al. 2013
Dravidian		South Asia	Mukkuvar	Tamil Nadu, India	24%	Arunkumar et al. 2012
Dravidian		South Asia	Tamil Jains	Tamil Nadu, India	20%	Arunkumar et al. 2012
Dravidian		South Asia	Lingayat	Southwest India	20%	Chennakrishnaiah et al. 2013
Dravidian		South Asia	Kota	Tamil Nadu, India	19%	Arunkumar et al. 2012
Dravidian		South Asia	Naikpod	Andra Pradesh	19%	Thanseem et al. 2006
Dravidian		South Asia	Mullukurumb a	Tamil Nadu, India	17%	Arunkumar et al. 2012
Dravidian		South Asia	Valayar	Tamil Nadu, India	16%	Arunkumar et al. 2012
Dravidian		South Asia	Maravar	Tamil Nadu, India	15%	Arunkumar et al. 2012
Dravidian		South Asia	Vanniyar	Tamil Nadu, India	14%	Arunkumar et al. 2012

Language Family	Branch	Region	Population	Location	Percent R1a-Z93	Reference
Dravidian		South Asia	Ambalakarar	South India	14%	Sengupta et al. 2006
Dravidian		South Asia	Vellalar	South India	13%	Sengupta et al. 2006
Dravidian		South Asia	Pardhan	Andra Pradesh	13%	Thanseem et al. 2006
Dravidian		South Asia	Kota	South India	13%	Sengupta et al. 2006
Dravidian		South Asia	Oraon	Northeastern India	12%	Borkar et al. 2011
Dravidian		South Asia	Thoda	Tamil Nadu, India	12%	Arunkumar et al. 2012
Dravidian		South Asia	Paravar	Tamil Nadu, India	11%	Arunkumar et al. 2012
Dravidian		South Asia	Yadhava	Tamil Nadu, India	10%	Arunkumar et al. 2012
Dravidian		South Asia	Nadar TNV	Tamil Nadu, India	10%	Arunkumar et al. 2012
Indo-European	Indo-Aryan	South Asia	West Bengal Brahmin	East India	72%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Pavagadhi Chaudhari	Gujarat	62%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Sindhi	South Pakistan	52%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Sindhi	Pakistan	52%	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	Koknasth Brahmin	West India	48%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Bengali	West Bengal	41%	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	Chamar	Northern India	39%	Sengupta et al. 2006

Language Family	Branch	Region	Population	Location	Percent R1a-Z93	Reference
Indo-European	Indo-Aryan	South Asia	Uttar Pradesh Brahmin	Northern India	36%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Andh	Andra Pradesh	31%	Thanseem et al. 2006
Indo-European	Indo-Aryan	South Asia	Rajput	Northern India	31%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Makrani	Pakistan	30%	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	Konkana	Gujarat	29%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Thakur	Maharashtra	29%	Thangaraj et al. 2010
Indo-European	Indo-Aryan	South Asia	Rajbanshi	Northeastern India	29%	Borkar et al. 2011
Indo-European	Indo-Aryan	South Asia	Mahadeo Koli	Maharashtra	26%	Thangaraj et al. 2010
Indo-European	Indo-Aryan	South Asia	Paharia	Northeastern India	23%	Borkar et al. 2011
Indo-European	Indo-Aryan	South Asia	Nav Buddha	West India	21%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Kalash	Pakistan	21%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Kalash	Pakistan	20%	Di Cristofaro et al. 2013
Indo-European	Indo-Aryan	South Asia	Dhodia	Gujarat	19%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Halba	Central India	19%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Rajbanshi	West Bengal	18%	Debnath et al. 2011
Indo-European	Indo-Aryan	South Asia	Valvi Chaudhari	Gujarat	13%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Vasava	Gujarat	13%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Maratha	West India	10%	Sengupta et al. 2006

Language Family	Branch	Region	Population	Location	Percent R1a-Z93	Reference
Indo-European	Iranian	Central Asia	Pashtuns	Afghanistan	52%	Di Cristofaro et al. 2013; Underhill et al. 2015
Indo-European	Iranian	South Asia	Pathans	Pakistan	49%	Lee et al. 2014
Indo-European	Iranian	South Asia	Pathans	Pakistan	40%	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	Pathans	North Pakistan	40%	Sengupta et al. 2006
Indo-European	Iranian	South Asia	Baloch	Pakistan	28%	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	Baloch	South Pakistan	28%	Sengupta et al. 2006
Indo-European	Iranian	Caucasus	Tats	Daghestan	25%	Karafet et al. 2016
Indo-European	Iranian	Central Asia	Tajik	Afghanistan	24%	Di Cristofaro et al. 2013; Underhill et al. 2015
Isolate - Burushaski		South Asia	Burusho	Pakistan	10%	Di Cristofaro et al. 2013
Isolate - Burushaski		South Asia	Burusho	North Pakistan	10%	Sengupta et al. 2006
Sino-Tibetan	Tibeto-Burman	South Asia	Newar	Nepal	26%	Gayden et al. 2007
Turkic		Central Asia	Kyrgyz	Kyrgyzstan	47%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Northern Eurasia	Altai (Altaians, Altay)	Russia	38%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Northern Eurasia	Khakas	Russia	33%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Caucasus	Balkars	Caucasus	25%	Underhill et al. 2010; Underhill et al. 2015
Turkic		Caucasus	Karachays	Caucasus	25%	Underhill et al. 2010; Underhill et al. 2015

Language Family	Branch	Region	Population	Location	Percent R1a-Z93	Reference
Turkic		Central Asia	Uzbeks	Afghanistan	23%	Di Cristofaro et al. 2013; Underhill et al. 2015

Supplementary Table 17.17. Contemporary distribution of R2a-M124 (Regional View).

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R2a-M124	Reference
Central Asia	Kazakhstan	Kazakh (Zhanakorgan)	Turkic		94	12%	Zhabagin et al. 2017
East Asia	Northern Thailand	Mon	Mon-Khmer		18	17%	Brunelli et al. 2017
Middle East	Turkey	Armenians (Sasun)	Indo-European	Armenian	104	17%	Hovhannisyan et al. 2014
Northern Eurasia	Siberia, Russia	Kalmyks	Mongolic		60	10%	Malyarchuk et al. 2011
South Asia	Tamil Nadu, India	Paravar	Dravidian		27	37%	Arunkumar et al. 2012
South Asia	East India	Lodha	Indo-European	Indo-Aryan	20	35%	Sengupta et al. 2006
South Asia	East India	Agharia	Austro-Asiatic	Munda	10	30%	Sengupta et al. 2006
South Asia	Tamil Nadu, India	Kadar	Dravidian		28	29%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Iyengar	Indo-European	Indo-Aryan	11	27%	Arunkumar et al. 2012
South Asia	Nepal	Newar	Sino-Tibetan	Tibeto-Burman	66	26%	Gayden et al. 2007
South Asia	South India	Kota	Dravidian		16	25%	Sengupta et al. 2006
South Asia	West Bengal	Oraon	Dravidian		31	23%	Debnath et al. 2011
South Asia	East India	West Bengal Brahmin	Indo-European	Indo-Aryan	18	22%	Sengupta et al. 2006
South Asia	Gujarat	Konkana	Indo-European	Indo-Aryan	24	21%	Khurana et al. 2014
South Asia	West India	Koknasth Brahmin	Indo-European	Indo-Aryan	25	20%	Sengupta et al. 2006
South Asia	West India	Maratha	Indo-European	Indo-Aryan	20	20%	Sengupta et al. 2006
South Asia	Gujarat	Valvi Chaudhari	Indo-European	Indo-Aryan	32	19%	Khurana et al. 2014
South Asia	Tamil Nadu, India	Mukkuvar	Dravidian		17	18%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Parayar NTN	Dravidian		52	17%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Yadhava	Dravidian		107	17%	Arunkumar et al. 2012

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R2a-M124	Reference
South Asia	Tamil Nadu, India	Pulayar	Dravidian		63	16%	Arunkumar et al. 2012
South Asia	Southwest India	Lingayat	Dravidian		101	16%	Chennakrishnaiah et al. 2013
South Asia	West Bengal	Santhal	Austro-Asiatic	Munda	51	16%	Debnath et al. 2011
South Asia	East India	Mahishya	Indo-European	Indo-Aryan	13	15%	Sengupta et al. 2006
South Asia	North Pakistan	Burusho	Isolate - Burushaski		20	15%	Sengupta et al. 2006
South Asia	Pakistan	Burusho	Isolate - Burushaski		20	15%	Di Cristofaro et al. 2013
South Asia	Gujarat	Dhodia	Indo-European	Indo-Aryan	63	14%	Khurana et al. 2014
South Asia	Tamil Nadu, India	Brahacharanam	Indo-European	Indo-Aryan	21	14%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Vanniyar	Dravidian		21	14%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Maravar	Dravidian		80	14%	Arunkumar et al. 2012
South Asia	Southwest India	Vokkaliga	Dravidian		102	14%	Chennakrishnaiah et al. 2013
South Asia	Tamil Nadu, India	Pallar	Dravidian		51	14%	Arunkumar et al. 2012
South Asia	Tamil Nadu, India	Ezhava	Dravidian		95	13%	Arunkumar et al. 2012
South Asia	Pakistan	Baloch	Indo-European	Iranian	25	12%	Di Cristofaro et al. 2013
South Asia	South Pakistan	Brahui	Dravidian		25	12%	Sengupta et al. 2006
South Asia	South India	Vanniyar	Dravidian		25	12%	Sengupta et al. 2006
South Asia	Maharashtra	Mahadeo Koli	Indo-European	Indo-Aryan	50	12%	Thangaraj et al. 2010
South Asia	Pakistan	Brahui	Dravidian		25	12%	Di Cristofaro et al. 2013
South Asia	Andra Pradesh	Naikpod	Dravidian		68	12%	Thanseem et al. 2006
South Asia	Northern India	Chamar	Indo-European	Indo-Aryan	18	11%	Sengupta et al. 2006
South Asia	Tamil Nadu, India	Tamil Jains	Dravidian		100	11%	Arunkumar et al. 2012
South Asia	Andra Pradesh	Pardhan	Dravidian		128	11%	Thanseem et al. 2006
South Asia	Northeastern India	Ho	Austro-Asiatic	Munda	28	11%	Borkar et al. 2011

Region	Location	Population	Language Family	Sub Family 1	Sample Size	Percent R2a-M124	Reference
South Asia	South India	Kurumba	Dravidian		19	11%	Sengupta et al. 2006
South Asia	South India	Iyer	Dravidian		29	10%	Sengupta et al. 2006
South Asia	South India	Iyengar	Dravidian		30	10%	Sengupta et al. 2006
South Asia	Pakistan	Makrani	Indo-European	Indo-Aryan	20	10%	Di Cristofaro et al. 2013
South Asia	South India	Irula	Dravidian		30	10%	Sengupta et al. 2006

Supplementary Table 17.18. R2a-M124 aDNA.

St. Clair Reference Number	aDNA Reference from Literature	Region	Location	Death (years ago)	Cultural Tradition	Best Resolved Informative Mutation	Reference
99	I4085	Central Asia	Turkestan, Tepe Anau, Turkmenistan	5450	Neolithic	R2a-M124	Narasimhan et al. 2019
112	I7492	Central Asia	Sappali Tepe, Uzbekistan	3827	Bronze Age	R2a-M124	Narasimhan et al. 2019
98	I1954	Middle East	Ganj Dareh, Iran	10093	Neolithic	R2a-M124	Narasimhan et al. 2019

Supplementary Table 17.19. Contemporary Distribution of R2a-M124 (Language View).

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R2a-M124	Reference
Austro-Asiatic	Munda	South Asia	Agharia	East India	10	30%	Sengupta et al. 2006
Austro-Asiatic	Munda	South Asia	Santhal	West Bengal	51	16%	Debnath et al. 2011
Austro-Asiatic	Munda	South Asia	Ho	Northeastern India	28	11%	Borkar et al. 2011
Dravidian		South Asia	Paravar	Tamil Nadu, India	27	37%	Arunkumar et al. 2012
Dravidian		South Asia	Kadar	Tamil Nadu, India	28	29%	Arunkumar et al. 2012
Dravidian		South Asia	Kota	South India	16	25%	Sengupta et al. 2006
Dravidian		South Asia	Oraon	West Bengal	31	23%	Debnath et al. 2011
Dravidian		South Asia	Mukkuvar	Tamil Nadu, India	17	18%	Arunkumar et al. 2012
Dravidian		South Asia	Parayar NTN	Tamil Nadu, India	52	17%	Arunkumar et al. 2012
Dravidian		South Asia	Yadhava	Tamil Nadu, India	107	17%	Arunkumar et al. 2012
Dravidian		South Asia	Pulayar	Tamil Nadu, India	63	16%	Arunkumar et al. 2012
Dravidian		South Asia	Lingayat	Southwest India	101	16%	Chennakrishnaiah et al. 2013
Dravidian		South Asia	Vanniyar	Tamil Nadu, India	21	14%	Arunkumar et al. 2012
Dravidian		South Asia	Maravar	Tamil Nadu, India	80	14%	Arunkumar et al. 2012
Dravidian		South Asia	Vokkaliga	Southwest India	102	14%	Chennakrishnaiah et al. 2013

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R2a-M124	Reference
ravidian		South Asia	Pallar	Tamil Nadu, India	51	14%	Arunkumar et al. 2012
Dravidian		South Asia	Ezhava	Tamil Nadu, India	95	13%	Arunkumar et al. 2012
Dravidian		South Asia	Vanniyar	South India	25	12%	Sengupta et al. 2006
Dravidian		South Asia	Brahui	Pakistan	25	12%	Di Cristofaro et al. 2013
Dravidian		South Asia	Brahui	South Pakistan	25	12%	Sengupta et al. 2006
Dravidian		South Asia	Naikpod	Andra Pradesh	68	12%	Thanseem et al. 2006
Dravidian		South Asia	Tamil Jains	Tamil Nadu, India	100	11%	Arunkumar et al. 2012
Dravidian		South Asia	Pardhan	Andra Pradesh	128	11%	Thanseem et al. 2006
Dravidian		South Asia	Kurumba	South India	19	11%	Sengupta et al. 2006
Dravidian		South Asia	Iyer	South India	29	10%	Sengupta et al. 2006
Dravidian		South Asia	Irula	South India	30	10%	Sengupta et al. 2006
Dravidian		South Asia	Iyengar	South India	30	10%	Sengupta et al. 2006
Indo-European	Armenian	Middle East	Armenians (Sasun)	Turkey	104	17%	Hovhannisyan et al. 2014
Indo-European	Indo-Aryan	South Asia	Lodha	East India	20	35%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Iyengar	Tamil Nadu, India	11	27%	Arunkumar et al. 2012
Indo-European	Indo-Aryan	South Asia	West Bengal Brahmin	East India	18	22%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Konkana	Gujarat	24	21%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Maratha	West India	20	20%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Koknasth Brahmin	West India	25	20%	Sengupta et al. 2006

Language Family	Sub Family 1	Region	Population	Location	Sample Size	Percent R2a-M124	Reference
Indo-European	Indo-Aryan	South Asia	Valvi Chaudhari	Gujarat	32	19%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Mahishya	East India	13	15%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Dhodia	Gujarat	63	14%	Khurana et al. 2014
Indo-European	Indo-Aryan	South Asia	Brahacharanam	Tamil Nadu, India	21	14%	Arunkumar et al. 2012
Indo-European	Indo-Aryan	South Asia	Mahadeo Koli	Maharashtra	50	12%	Thangaraj et al. 2010
Indo-European	Indo-Aryan	South Asia	Chamar	Northern India	18	11%	Sengupta et al. 2006
Indo-European	Indo-Aryan	South Asia	Makrani	Pakistan	20	10%	Di Cristofaro et al. 2013
Indo-European	Iranian	South Asia	Baloch	Pakistan	25	12%	Di Cristofaro et al. 2013
Isolate - Burushaski		South Asia	Burusho	North Pakistan	20	15%	Sengupta et al. 2006
Isolate - Burushaski		South Asia	Burusho	Pakistan	20	15%	Di Cristofaro et al. 2013
Mongolic		Northern Eurasia	Kalmyks	Siberia, Russia	60	10%	Malyarchuk et al. 2011
Mon-Khmer		East Asia	Mon	Northern Thailand	18	17%	Brunelli et al. 2017
Sino-Tibetan	Tibeto-Burman	South Asia	Newar	Nepal	66	26%	Gayden et al. 2007
Turkic		Central Asia	Kazakh (Zhanakorgan)	Kazakhstan	94	12%	Zhabagin et al. 2017

Comments for Chapter 17 and Supplementary Tables

Table 5.17.1. Distribution of Mesolithic R1b-M343 Mutations.

“Death” refers to the age of the sample in years.

Table 5.17.2. Distribution of Mesolithic R1a-M420 Mutations.

“Death” refers to the age of the sample in years.

Table 5.17.8. Contemporary Distribution of R1b1a2-V88 (Regional View).

Upstream R1b mutations reported by Hassan et al. (2008) are assumed to be R1a-V88 as suggested by Cruciani et al. (2010).

Table 5.17.9. Contemporary Distribution of R1b1a2-V88 (Language View).

Upstream R1b mutations reported by Hassan et al. (2008) are assumed to be R1a-V88 as suggested by Cruciani et al. (2010).

Table 5.17.10. R1b1a1a2a2-CTS1078 aDNA.

“Death” refers to the age of the sample in years.

Table 5.17.11. Contemporary distribution of R1b1a1a2a2-CTS1078 (Regional View).

Data from Myres et al. (2011) and Busby et al. (2012) are R1b-M269 (xL51) as suggested by Balanovsky et al. (2017). Frequency results for CTS1078 could be overinflated, especially for Western Europe.

Table 5.17.13. Contemporary Distribution of R1a1a1b2-Z93 (Regional View).

Previously reported upstream R1a mutations for South Asia are assumed to be R1a-Z93, as suggested by Underhill et al. (2015).

Table 5.17.16. Contemporary Distribution of R1a1a1b2- Z93 (Language View).

Previously reported upstream R1a mutations for South Asia are assumed to be R1a-Z93, as suggested by Underhill et al. (2015).

Table 5.17.18. R2a-M124 aDNA.

“Death” refers to the age of the sample in years.

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