Mennonite DNA Project Y Chromosome Data Discussion by Tim Janzen (<u>tjanzen@comcast.net</u>) January 2024

The Low German Mennonite DNA Project Y chromosome data is available for download as an Excel spreadsheet. The headings are self-explanatory. There is a dark gray row between each surname. Thick black lines separate the various subgroups within surnames if there is more than one progenitor for that surname. In a few cases, it is unclear if a haplotype belongs in a specific subgroup. In such cases there is a question mark after the number in the subgroup column. Y chromosome STR marker values that are different from the modal value are highlighted in yellow. In such situations, a mutation has occurred within the past 500 years or so in one of the lineages from the original progenitor of that surname or subgroup. If the earliest known ancestors were known to be brothers the names of the brothers are highlighted in blue. The FTDNA kit numbers for new participants since the last update a year ago are highlighted in green. In some situations there is additional information for some multi-copy markers such as DYS459, DYS 464, and CDY on the Family Tree DNA website that is not included in the spreadsheet and the cells in the spreadsheet are highlighted in brown where this is the case. The information wasn't included in the spreadsheet for simplicity, but the data can be found in the project's website at https://www.familytreedna.com/public/menno/default.aspx?section=yresults after any project member has logged into the FTDNA website. Null values for DYS 425 have been highlighted in pink.

The comments below apply to the currently available Y chromosome marker results pertaining to the Low German Mennonite DNA project. Individual surnames are commented on only if there are results for at least one person from two or more unconnected lineages with that surname or if there is Y SNP or subclade information that is of interest. It should be kept in mind that the data for many men who have been tested by the SMGF are incomplete and that as more complete haplotypes become available for these men the conclusions based on the currently available partial haplotypes could potentially change. The numbers referred to for people in the comments are their Grandma numbers as they currently appear in the Grandma database. The abbreviation "NPE" stands for "non-parental event". A non-parental event is a situation where a boy does not inherit the Y chromosome of the male head of household he is raised with due to an adoption, an illegitimate birth, or a name change. A haplotype is a set of marker results for a given individual. The term recombinational loss of heterozygosity (RecLOH) is also used. See http://en.wikipedia.org/wiki/RecLOH for more information about this term. A terminal SNP is the most recently occurring Y chromosome SNP in a specific individual that has been placed on the Y chromosome SNP tree. For a more complete glossary of terms used in genetic genealogy see http://www.isogg.org/wiki/Genetics_Glossary. Some haplotypes have been linked to specific regions or population groups by DNA researcher Ken Nordvedt. The haplotypes are generally associated with those regions prior to the time when surnames came into existence and the progenitor who had the surname in question may not have lived in the region that the haplotype is associated with.

1. Abrahams. There are at results back for 3 different unconnected Abrahams families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Abrahams progenitor. This haplotype has been linked to Frisia by DNA researcher Ken

Nordtvedt. A male Abrams has done the BigY test and has been found to have the terminal SNP R-BY11999. This SNP is estimated to have been formed about 4200 years ago per YFull. The R-BY11999 SNP has also been found in a man from Ireland.

- 2. Adrian. The results are available for 4 different unconnected Adrian families. There are 2 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Franz Gerhard Adrian (b. ca 1830) #498921 and Peter Dietrich Adrian (b. ca 1781) #51956 are consistent with each other and form the first subgroup. The haplotypes of the descendants of Heinrich Jacob Adrian (b. 14 May 1779) #52690 and Jakob Adrian (1849-1919) #535968 are consistent with each other and form the second subgroup. This suggests that either there were two original Adrian progenitors, one for each subgroup, or that there was a NPE that occurred at some point in one of the two lineages. This haplotype of the first subgroup has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 3. Andres/Andreas. There are at least partial results back for 2 different unconnected Andres families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Andres progenitor.
- 4. Balzer. There are at least partial results back for 2 different unconnected Balzer families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Balzer progenitor.
- 5. Banman/Bahnman. There are at least partial results back for 3 different unconnected Banman families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Banman progenitor.
- 6. Barkman. The results are available for 3 male Barkmans or Bergmans. The haplotypes of the descendants of Abraham Barkman (1708-1777) #624324 are consistent with each other and form the first subgroup. The haplotype of the descendant of Johann Bergmann (1825-1886) #146119 is inconsistent with the haplotypes of the other group and forms a second subgroup. This isn't entirely surprising since Johann Bergmann (1825-1886) is known to have been born illegitimately.
- 7. Bartel. The results are available for 4 male Bartels. The haplotypes of the descendants of Heinrich Bartel (1766-1828) #859670 and David Bartel (1800-1849) #11880 are consistent with each other and form the first subgroup. The haplotype of the descendant of Heinrich Bartel (1834-1886) #327924 is inconsistent with the haplotypes of the other groups and forms a second subgroup. The haplotype of the descendant of Leonard Heinrich Peter Bartel (b. 1897) #208248 is inconsistent with the haplotypes of the other groups and forms a third subgroup. This suggests that either there were three original Bartel progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.
- 8. Bartsch. There are at least partial results back for 3 different unconnected Bartsch families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Bartsch progenitor.
- 9. Becker. There are at least partial results back for 2 different unconnected Becker families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Becker progenitor. Of interest is the fact that one of the Beckers does not have known Mennonite ancestry and descends from Frederic Becker who was born in 1824 in

Pomerania. A male Becker has done the BigY test and has been found to have the terminal SNP R-YP1129. This SNP is estimated to have been formed about 1800 years ago per YFull. The R-YP1129 SNP has primarily been found in men from Pomerania and from Germany.

- 10. Berg. There are at least partial results back for 7 different unconnected Berg families. The haplotypes are consistent with each other with the exception that the haplotype of the descendant of Franz Berg (1785-1841) #196091 is inconsistent with the haplotype of the other 6 Berg lineages that have been tested. This suggests that either there were two original Berg progenitors, one for Franz Berg's (1785-1841) #196091 lineage and one for the other Berg lineages, or that there was a NPE that occurred at some point in Franz Berg's (1785-1841) #196091 lineage. Note that the Bergs have a different progenitor than the Bergens.
- 11. Bergen. There are at least partial results back for 6 different unconnected Bergen families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that the 6 different Bergen families all descend from the same Bergen progenitor. A male Bergen has done the Y-Elite test with FullGenomes. He has been found to be in haplogroup R-L51. Note that the Bergens have a different progenitor than the Bergs.
- 12. Block. There are results back for 2 different unconnected Block families. The haplotypes of the descendants of Salomon Block (1766-1814) #139641 are inconsistent with the haplotype of the descendant of Peter Block (1767-1831) #32253. This suggests that either there were two original Block progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.
- 13. Born. There are results back for 2 different unconnected Born families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Born progenitor.
- 14. Boschman. There are at least partial results back for 3 different unconnected Boschman families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Boschman progenitor.
- 15. Braun. There are at least partial results back for 10 different unconnected Braun families. The haplotypes of 9 different unconnected Braun families are consistent with each other, suggesting that the 9 different families all descend from the same Braun progenitor. The haplotypes are consistent with each other with the exception that the haplotype of the descendant of Dirk Johan Braun (b. ca 1761) #197948 and the haplotype of the descendant of Heinrich Braun (1895-1954) #516390 is inconsistent with the haplotype of the other 9 Braun lineages that have been tested. This suggests that either there were three original Braun progenitors, one for Dirk Johan Braun's (b. ca 1761) #197948 lineage, one for Heinrich Braun's (1895-1954) #516390 lineage and one for the other Braun lineages, or that there was a NPE that occurred at some point in Dirk Johan Braun's (b. ca 1761) #197948 lineage and/or Heinrich Braun's (1895-1954) #516390 lineage. The haplotype of the descendant of Dirk Johan Braun's (b. ca 1761) #197948 lineage and/or Heinrich Braun's (1895-1954) #516390 lineage. The haplotype of the descendant of Dirk Johan Braun is quite similar to the haplotype of the descendant of Dirk Johan Braun is quite similar to the haplotype of the descendant of Dirk Johan Braun who was tested. There appears to have been a recombinational loss of heterozygosity (recLOH) event at markers DYS

459 and DYS 464 in the descendant of Diedrich Braun (1766-1851) #196157 who has been tested since he has values of 8 and 8 for DYS 459 and 14, 14, 14, and 14 for DYS 464 whereas the other Brauns typically have values of 8 and 10 for DYS 459 and 11, 14, 14, and 16 for DYS 464. A descendant of Johann Gerhard Braun (1836-1911) #158115 has been tested and his results match those of a descendant of Gerhard Braun (1755-1801). Both of these people have a value of 13 for DYS 393 whereas all of the other Brauns tested for this marker have a value of 14 for DYS 393. This suggests that Johann Braun (1836-1911) #158115 was likely a descendant of Nicholas Braun #431313. If so, then Johann Braun's (1836-1911) #158115 father Gerhard Braun was likely a son of Gerhard Braun (b. ca 1777) #196197. A member of the primary subgroup of 9 Brauns who have been tested has done the BigY test and has been found to have the terminal SNP I-A7728. This SNP is in the I-Y6644 subclade, a subclade that is estimated to have been formed about 1950 years ago per YFull.

- 16. Buller. There are results back for 2 different unconnected Buller families. The haplotype of the descendant of Benjamin Buller (b. 17894) #402138 is consistent with the haplotype of one of the descendants of Jeorge Buller (b. before 1660) #32675 who was tested. The haplotype of a second descendant of Jeorge Buller (b. before 1660) #32675 is inconsistent with the haplotypes of the other group and forms a second subgroup. This suggests that there was a NPE that occurred at some point in the lineage of the Mr. Buller whose haplotype doesn't match the that of the descendant of Benjamin Buller (b. 17894) #402138 who was tested. Note that the Bullers have a different progenitor than the Buhlers.
- 17. Cornelsen. There are results back for 2 different unconnected Cornelsen families. The haplotypes of the descendants of Johann Kornelsen (b. ca 1744) #5520 are inconsistent with the haplotype of the descendant of Cornelius Cornelsen (1721-1776) #811848. This suggests that either there were two original Cornelsen progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.
- 18. Dalke. A male Dalke has done the BigY test and has been found to have the terminal SNP N-BY69771. This SNP is in the N-M2783 subclade, a subclade that is estimated to have been formed about 2700 years ago per YFull. The N-M2783 SNP has primarily been found in men from Poland, Lithuania, and Russia.
- 19. Doerksen. There are at least partial results back for 10 different unconnected Doerksen families. There are 3 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of David Dirks (b. ca 1699) #34059, David Doerksen (1754-1801) #660112, David Doerksen (ca 1740-ca 1800) #266336, Julius Gerhard Dircksen (1746-1826) #21477, Salomon Doerksen (132-1890) #185279, David David Duerksen (b. 1778) #44775, and Abraham Doerksen (1830-1895) #182922 are consistent with each other and form the first subgroup. One male from this group has done the Big Y test and has the terminal SNP G-FT334895. His closest match on the Big Y descends from a paternal ancestor who lived in Ukraine, but the genealogical connection to this person is likely at least 2000 years back in time since there are many private SNPs that they do not share. The haplotypes of a descendant of David Duerksen (1761-1818) #14628 and a descendant of Johann Kornelius Duerksen (1766-ca 1855) #14530 are consistent with each other and form a second subgroup. The haplotype of the descendant of Gerhard Heinrich Dirks (1783-134) #61557 is inconsistent with the results of the other groups and forms a third subgroup. Of interest is the fact that the haplotype

of the descendants of David Duerksen (1761-1818) #14628 and Kornelius Duerksen (1750-1840) #70539 is a close match to the haplotype of the descendant of Rudolph Peter Kerber (b. 24 May 1890) #392593 as well as a man from Poland who is a descendant of Johann Kerber (ca 1770-ca 1831). Also of interest is that the haplotype of the descendants of David Duerksen (1761-1818) #14628 and Kornelius Duerksen (1750-1840) #70539 is a close match to the descendant of Arend Peters (1783-1846) #159456 and the Isaacs who have been tested.

- 20. Driedger. There are results back for 2 different unconnected Driedger families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Driedger progenitor. However, it should be noted that the two haplotypes don't have very many markers making a valid comparison difficult.
- 21. Dyck (and Dueck). There are at least partial results back for 24 different unconnected Dyck and Dueck families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that the 24 different Dyck families all descend from the same Dyck progenitor. The descendants of Friedrich Peter Dyck (d. 1891), Franz Johann Dyck (b. 1820) #101124, Philip Dyck (b. ca 1733) #159444, Philip van Dijck (b. ca 1564) #12831, Peter Van Dycke (b. 1632) #65041, Jacob Dyck (1727-1786) #180074, Peter Dyck (1749-1808) #266403, Jacob Dyck (b. 17 Mar 1828) #182126, and Johann Dyck (b. 17 Nov 1857) #24376 who have been tested all have a value of 14 at DYS 19 whereas the other Dycks who have been tested all have a value of 15 at DYS 19. This would suggest that Philip Dyck (b. ca 1733) #159444, Peter Dyck (b. ca 1730) #705322, Peter Dyck (1749-1808) #266403, and Jacob Dyck (1727-1786) #180074 were closely related to each other. Johann Dyck (b. 17 Nov 1857) #24376 may have been the descendant of one of these four men. The descendants of Heinrich Dyck (b. ca 1759) #44214, Jacob Dyck (b. ca 1754) #198078, Klaas Johann Dyck (1743-1821) #14167, and Johann Johann Dyck (b. 4 Oct 1837) #383899 who have been tested all have a value of 30 at DYS 389-2 whereas the other Dycks who have been tested most commonly have a value of 31 at DYS 389-2. This would suggest that Heinrich Dyck (b. ca 1759) #44214, Jacob Dyck (b. ca 1754) #198078 and Klaas Johann Dyck (1743-1821) #14167 were closely related to each other and Johann Johann Dyck (b. 4 Oct 1837) #383899 may have been a descendant of one of them. Three male Dycks have done the BigY test and have been found to have the SNP R-BY32751. This SNP probably was formed about 1000 AD or possibly later than that. The R-BY32751 SNP has been found in a man with the surname Penders who traces his ancestry to the village of Dieteren in the region zuid Limburg in the Netherlands in the early 1700s. Another relatively close match with the surname Otten traces his ancestry to the village of Schinnen in the early 1600s and possibly from the village of Sittard in the late 1500s. Dieteren is only about 10 to 20 kms away from Sittard and Schinnen. This suggests that the original Dyck progenitor was likely from zuid Limburg or somewhere in that region. A male Dyck has done the BigY test and has been found to have the terminal SNP R-BY146003. Two other male Dycks who have done the BigY have been found to have the terminal SNP R-Y240769. One of these men descends from Heinrich Dyck (1740-1798) #196314 and the other descends from Heinrich Dyck (b. 1788) #528121. This suggests that Heinrich Dyck (1740-1798) #196314 was closely related to Heinrich Dyck (b. 1788) #528121. A SNP upstream from R-BY146003, specifically R-

FGC43335, is estimated to have been formed about 3700 years ago per YFull. The R-FGC43335 SNP has been found in 2 men who trace their ancestry to the Netherlands.

- 22. Eitzen. The results are available for 4 male Eitzens. Two are descendants of Abraham Eidse (b. ca 1720) #63776. The othe two are descendants of Nicholas Edse (d. 1776) #917045. The haplotypes of the descendants of Nicholas Edse #917045 are inconsistent with the haplotypes of the descendants of Abraham Eidse #63776. This suggests that either there were two original Eitzen progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the two lineages. The haplotype of the descendant of Abraham Eidse (b. ca 1720) #63776 has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 23. Engbrecht. The descendant of Absolon Absolon Engbrecht (b. ca 1771) #102399 who has been tested has a haplotype that matches 40 of the 43 marker results for the Kroeker haplotype, suggesting that the two surnames originated in the same area of Europe within the past 500 to 1000 years. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 24. Enns. There are at least partial results back for 13 different unconnected Enns families. The haplotypes of the descendants of Dietrich Ens (1750-1825) #118136, Cornelius Enns (1788-1826) #50113, Jacob Enns (1796-1863) #456799, Abraham Enns (1787-1854) #265390, Isaak Enns (b. ca 1746) #196363, Isaak Enns (b. 1773) #265636, Johann Enns (b. 22 Aug 1853) #171191, Franz Enns (b. 19 Oct 1844) #185152, Gerhard Ens (ca 1755-1806) #199341, Gerhard Gerhard Enns (1896-1957) #460911, Abraham Entz (1742-1799) #7678, and Johann Klaas Enns (1741-1819) #44116 are consistent with each other, suggesting that they descend from the same Enns progenitor. The descendants of Dietrich Ens (1750-1825) #118136 and Cornelius Enns (1788-1826) #50113 who have been tested all have a value of 14 at DYS 389-1 whereas the other Ennses who have been tested have a value of 13 at DYS 389-1. This would suggest that Dietrich Ens (1750-1825) #118136 and Cornelius Enns (1788-1826) #50113 were closely related to each other. One male Enns from this subgroup has done the Big Y test and has the terminal SNP R-A20432. His closest matches on the Big Y descend from ancestors who lived in the Netherlands, Germany, England, Denmark, Norway and Sweden. These men likely all share a paternal ancestor who lived somewhere near the Low Countries about 300 AD. The haplotype of the descendant of Johann Enz (b. 17 Jan 1828) #405788 who has been tested is inconsistent with the haplotype of the other 13 Enns males who have been tested. This is not entirely surprising because Johann Enz #405788 is known to have been born illegitimately and he took the surname of his mother Maria Enz (1789-1832).
- 25. Epp. There are at least partial results back for 5 different unconnected Epp families. The haplotypes are consistent with each other with the exception of the haplotype of the descendant of Peter Epp (b. 1862) #684212, which is inconsistent with the haplotypes of the other 4 Epp lineages that have been tested. This suggests that either there were two original Epp progenitors, one for Peter Epp (b. 1862) #684212 and one for the other Epp lineages, or that there was a NPE that occurred at some point in Peter Epp 's (b. 1862) #684212 lineage. Note that the haplotype of the descendant of Peter Epp (b. 1862) #684212 is a close match to the Walls. The results for a grandson of Johann Epp #800426 are almost an exact match to the results for a descendant of Bernhard Epp (b. 1805) #946091. This suggests that Johann Epp #800426 was either a descendant of Bernhard Epp (b. 1805) #946091 or that they were at least distantly related.

- 26. Esau. There are at least partial results back for 8 different unconnected Esau families. The haplotypes are consistent with each other with the exception of the haplotype of the Aron Jacob Esau (b. ca 1783) #44916, which is inconsistent with the haplotypes of the other 7 Esau lineages that have been tested. This suggests that either there were two original Esau progenitors, one for Aron Jacob Esau (b. ca 1783) #44916 and one for the other Esau lineages, or that there was a NPE that occurred at some point in Aron Jacob Esau's (b. ca 1783) #44916 lineage. Of interest is the fact the haplotype of the descendants of Johann Frank Martens (b. ca 1865) #758639 is an exact match to the haplotype of the descendant of Aron Jacob Esau (b. ca 1783) #44916 who has been tested. Also note that there appears to have been a recombinational loss of heterozygosity (recLOH) event at marker DYS 385 in the descendants of Heinrich Esau (b. 1740) #4370 who have been tested since they have values of 11 and 11 for DYS 385 whereas the other Esaus typically have values of 10 and 15 or 11 and 15 for DYS 385.
- 27. Fadenrecht. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 28. Fast. There are at least partial results back for 12 different unconnected Fast families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Fast progenitor. A male Fast has done the BigY test and has been found to have the terminal SNP G-FT156330.
- 29. Fehr. There are at least partial results back for many different descendants of Benjamin De Fehr (ca 1733-1822) #196504 as well as a grandson of Eduard De Veer (b. 23 Feb 1893) #1074024, who is a descendant of Jan De Veer (b. 11 Aug 1521) #196491 through his grandson Abraham De Veer (b. ca 1585) #12799. The haplotypes are consistent with each other, suggesting that these families all descend from Jan De Veer (b. 11 Aug 1521) #196491. Benjamin De Fehr (ca 1733-1822) #196504 is a descendant of Gysbert De Veer (b. 7 Nov 1600) #12803, the brother of Abraham De Veer (b. ca 1585) #12799. These results are of interest since the haplotypes confirm that the descendants of Abraham De Veer (b. ca 1585) #12799 who stayed in the Netherlands are related to the descendants of Gysbert De Veer (b. 7 Nov 1600) #12803, who moved to Poland. This is the earliest connection to a common ancestor that has been confirmed by DNA testing in the Mennonite DNA project and the first Mennonite lineage that has been confirmed through DNA testing as having originated in the Netherlands. This haplotype has been linked to the Anglo-Saxons by DNA researcher Ken Nordtvedt.
- 30. Flaming. There are at least partial results back for 2 different unconnected Flaming families. The haplotypes are consistent with each other, suggesting that these Flaming families both descend from the same Flaming progenitor. There appears to have been a recombinational loss of heterozygosity (recLOH) event at marker DYS 464 in one of the descendants of Johann Flaming (b. ca 1756) #285004 who has been tested since his results for this marker are 17, 17, 19, and 19 whereas the results for his brother and the other Flaming who has been tested are 15, 15, 17, 19. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt. Two male Flamings have done the BigY test and have been found to have the terminal SNP R-FTA8880. Two males who have done the BigY who are in adjacent subclades to this SNP trace their ancestry to the Netherlands.
- 31. Friesen. There are at least partial results back for 24 different unconnected Friesen families. The haplotypes are consistent with each other with the exception that the haplotype of one descendant of Bernhard Friesen (b. ca 1752) #45114 and the haplotype

of the descendant of Jacob Friesen (ca 1734-1776) #3748 are inconsistent with the haplotypes of the other 30 Friesen lineages that have been tested. It appears that there was a NPE in the lineage of one of the descendants of Bernhard Friesen (b. ca 1752) #45114. It is possible that there were two original Friesen progenitors, one for Jacob Friesen (ca 1734-1776) #3748 and one for the other Friesen lineages. The more likely possibility is that there was a NPE that occurred at some point in the lineage of the Jacob Friesen (ca 1734-1776) #3748. The haplotype of a descendant of Martin Johann Friesen (b. 3 Jan 1858) #494115 is an exact match to the haplotype of the descendants of Isbrandt Johann Friesen (1765-1848) #196698, suggesting that Martin Johann Friesen (b. 3 Jan 1858) #494115 may have been a descendant of Isbrandt Johann Friesen (1765-1848) #196698. Two male Friesens have done the BigY test and have been found to have the terminal SNP I-S2335. This haplotype has been linked to the Anglo-Saxons by DNA researcher Ken Nordtvedt.

- 32. Froese. There are at least partial results back for 6 different unconnected Froese families. There are at least 2 different subgroups for this surname based on the results currently available. It appears that Peter Abram Froese (1755-1806) #173745, Cornelius Froese (d. 1834) #61794, Jacob Froese (1770-1830) #1502298, and Cornelius Froese (1746-1794) #110605 descend from the same Froese progenitor. Note that there appears to have been a recombinational loss of heterozygosity (recLOH) event at marker DYS 459, DYS 464, and CDY in the descendant of Peter Abram Froese (1755-1806) #173745 which is resulting in null values for those markers in that descendant. The haplotype of the descendants of Jacob Froese (b. 21 Jul 1863) #939205 may be consistent with the haplotypes of the descendants of Peter Abram Froese (1755-1806) #173745 and Abraham Abram Froese (b. 21 Jul 1863) #939205 lineage is unrelated to the lineages of Peter Abram Froese (1755-1806) #173745 and Abraham Abram Froese (b. 21 Jul 1863) #939205 descends from a third Froese progenitor or that there was a NPE somewhere in Jacob Froese's descendant's lineage.
- 33. Funk. There are at least partial results back for 8 different unconnected Funk families. The haplotypes are consistent with each other with the exception that the haplotypes of the descendants of Hans Funk (ca 1749-1795) #219693 are inconsistent with the haplotypes of the other 7 Funk lineages that have been tested. This suggests that either there were two original Funk progenitors, one for the lineage of Hans Funk (b. ca 1749-1795) #219693 and one for the other Funk lineages, or that there was a NPE that occurred at some point in Hans Funk's #219693 lineage. Note that the haplotypes of the descendants of Hans Funk (ca 1749-1795) #219693 are a reasonably close match to the haplotypes of the descendants of Heinrich Ediger (b. ca 1750) #30335. A male Funk who descends from Johann Funk (ca 1740-ca 1804) #198991 has done the BigY test and has been found to have the terminal SNP R-CTS9219. This SNP is estimated to have been found in men from southern Europe.
- 34. Geddert. There are results back for 2 different unconnected Geddert families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Geddert progenitor.

- 35. Gerbrandt. There are at least partial results back for 2 different unconnected Gerbrandt families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Gerbrandt progenitor.
- 36. Giesbrecht. There are at least partial results back for 7 different unconnected Giesbrecht families. There are two different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Wilhelm Giesbrecht (b. 1767) #266433, Gerhard Wilhelm Giesbrecht (b. ca 1747) #45209, Wilhelm Jacob Giesbrecht (1865-1919) #363715, and Jacob Giesbrecht (b. 1765) #198892 are consistent with each other and form the first subgroup. Wilhelm Jacob Giesbrecht (1865-1919) #363715 is thus likely to be a descendant of Wilhelm Giesbrecht (1701-1776) #266431 and/or Gerhard Wilhelm Giesbrecht (b. ca 1727) #45209. The haplotypes of the descendants of David Giesbrecht (1750-1802) #227280, Abraham Giesbrecht (ca 1739-1814) #158646 and Jacob Giesbrecht (b. ca 1708-1776) #330475 are consistent with each other and form a second subgroup.
- 37. Ginter/Guenther. There are at least partial results back for 3 different unconnected Ginter families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Ginter progenitor.
- 38. Goertzen (Goertz). There are at least partial results back for 16 different unconnected Goertzen, Goerzen, or Goertz families. There are 8 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Georg Goertzen (1725-1808) #101394, David Goertzen (b. 1793) #62878, Isaac Goertzen (1819-ca 1863) #1111027, and David Goerzen (1859-1934) #946287 are consistent with each other and form the first subgroup. David Goertzen (b. 1793) #62878, Isaac Goertzen (1819-ca 1863) #1111027, and David Goerzen (1859-1934) #946287 may have been descendants of Georg Goertzen (1725-1808) #101394. A male Goertzen in this subgroup has done the BigY test and has been found to have the terminal SNP I-Y32645. Note that the haplotypes of the men tested in the first subgroup are a close match to the Hildebrands who have been tested. The haplotypes of the descendants of Heinrich Goertz (b. 1827) #106364, Heinrich Goertz (1771-1813) #15466, Abraham Goertzen (b. ca 31 Dec 1740) #285756, and Stephen Goertz (ca 1748-1815) #353602 are consistent with each other and form a second subgroup. A male Goertz in this subgroup has done the BigY test and has been found to have the terminal SNP R-A20432. Another man whose surname is not Goertz or Goertzen who also shares this SNP traces his ancestry to Germany and two other men who are in an adjacent subclade trace their ancestry to the Netherlands. The haplotypes of the descendants of Peter Gertz (1753-1808) #312161 and Heinrich Goerz (ca 1814-1873) #412506 are consistent with each other and form a third subgroup. The haplotype of the descendants of Heinrich Goertz (ca 1739-1792) #312056 and Peter Peter Goertzen (b. 9 Feb 1859) #235593 are inconsistent with the haplotypes of the other groups and form a fourth subgroup. The haplotype of the descendant of Peter Goertzen (1904-1968) #478097 is inconsistent with the results of the other groups and forms a fifth subgroup. The haplotype of the descendant of Tobias Goertzen (b. 6 Apr 1768) #3234 is inconsistent with the results of the other groups and forms a sixth subgroup. The haplotype of the descendant of Gerhard Heinrich Gertz (1795-1828) #52849 is inconsistent with the results of the other groups and forms a

seventh subgroup. The haplotype of the descendant of Siebert Goertz (1731-1802) #312205 is inconsistent with the results of the other groups and forms an eighth subgroup.

- 39. Goossen. There are at least partial results back for 2 different unconnected Goossen families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Goossen progenitor.
- 40. Groening. There are results back for 2 different unconnected Groening families. The haplotype of the descendant of Johann Groening (1769-1825) #55129 is inconsistent with the haplotype of the descendant of Michael Groening (b. 1748) #714703. This suggests that either there were two original Groening progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages. A male descendant of Johann Groening (1769-1825) #55129 has done the BigY test and has been found to have the terminal SNP N-L731. This SNP is estimated to have been formed about 6000 years ago per YFull. The N-L731 SNP has been found in men from Poland.
- 41. Grunau. There are at least partial results back for 2 different unconnected Grunau families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Grunau progenitor.
- 42. Hamm. There are at least partial results back for 4 different unconnected Hamm families. There are 2 different subgroups for this surname based on the results currently available. The haplotype of the descendants of Jacob Peter Hamm (1860-ca 1912) #439515 is inconsistent with the results of the other group and thus forms the first subgroup. The haplotypes of the descendants of Martin Hamm (1871-1898) #529980, Jacob Hamm (1827-1895) #179688 and Peter Hamm (b. ca 1790) #187170 are consistent with each other and they are part of a second subgroup. This suggests that either there were two original Hamm progenitors, one for Jacob Peter Hamm (1860-ca 1912) #439515 and one for the other Hamm lineages, or that there was a NPE that occurred at some point in Jacob Peter Hamm's (1860-ca 1912) #439515 lineage. One male from the second subgroup has done the Big Y test and has the terminal SNP R-BY55642. His closest matches on the Big Y descend from ancestors who lived in Sweden and have the surnames Mellgren and Lindman. The genealogical connection between this subgroup of Hamms and the men whose ancestry is from Sweden is probably at least 1200 years back in time.
- 43. Harder. There are at least partial results back for 8 different unconnected Harder families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Harder progenitor. A male Harder has done the BigY test and has been found to have the terminal SNP I-BY199717. This haplotype has been linked to the Anglo-Saxons by DNA researcher Ken Nordtvedt.
- 44. Harms. There are results back for 2 different unconnected Harms families. The haplotypes of the descendants of Gerhard Harms (ca. 1720 ca 1776) #49701 is inconsistent with the haplotype of the descendant of Johann Johann Harms (b. 1771) #4487. This suggests that either there were two original Harms progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.

- 45. Hein. There are at least partial results back for 3 different unconnected Hein families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Hein progenitor. Note that the Heins lineages have a different progenitor than the Heinrichs lineages.
- 46. Heinrichs. There are at least partial results back for 2 different unconnected Heinrichs families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Heinrichs progenitor. Note that the Heinrichs lineages have a different progenitor than the Heins lineages.
- 47. Heppner. There are at least partial results back for 6 different men who descend from Peter Hoeppner (b. ca 1650) #187094. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers. A male Heppner has done the BigY test and has been found to have the terminal SNP E-FTC26873. He has a fairly close match on the Big Y who shares that SNP who has the surname van Bruegel who may have ancestry from the Netherlands, Belgium, or that region.
- 48. Hiebert/Huebert. There are at least partial results back for 18 different unconnected Hiebert families. The haplotypes are consistent with each other with the exception of the results for 6 men. The haplotypes of two descendants of Jacob Hiebert (b. 22 Sep 1833) #185479 through his sons Peter Hiebert (b. 2 May 1881) #194276 and David Hiebert (b. 15 Jan 1883) #194277 and the haplotype of a descendant of Peter Hiebert (b. ca 1780) #144981 don't match the haplotypes of the other Hieberts. A descendant of Jacob Hiebert's #185479 purported brother Abraham Hiebert (b. 7 Aug 1823) #184697 has been tested and this descendant's haplotype matches those of the other Hieberts who have been tested. This suggests that a NPE has occurred in regard to Jacob Hiebert #185479. A comparison of Jacob Hiebert's descendants' haplotypes to other Mennonite haplotypes demonstrates that they are a close match to the modal Penner haplotype. This suggests that the father of Jacob Hiebert #185479 was really a Penner. It is not known whether Jacob Hiebert was born illegitimately to Helena Siemens (b. 1 May 1804) #186874 or whether he was adopted into Abraham Hiebert's (b. ca 1799) #186873 and Helena Siemens' family. The haplotype of a descendant of Kornelius Johann Hiebert (b. ca 1758) #13216 through his son Martin Hiebert (b. ca 1787) #54066 doesn't match the haplotypes of three descendants of Kornelius Johann Hiebert (b. ca 1758) #13216 through his son Heinrich Hiebert (b. 3 Jun 1791) #132164. This would suggest that there has been a NPE at some point in the lineage of the descendant of Heinrich Hiebert (b. 3 Jun 1791) #132164. Either the lineage of Peter Hiebert (b. ca 1780) #144981 represents its own subgroup or there was a NPE that occurred at some point in his lineage. Likewise, the lineage of Jakob Huebert (b. 16 Oct 1861) #913068 represents its own subgroup or there was a NPE that occurred at some point in his lineage.
- 49. Hildebrand. There are partial results back for 4 different unconnected Hildebrand families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Hildebrand progenitor.
- 50. Hooge. There are results back for 2 different unconnected Hooge families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Hooge progenitor.

- 51. Isaac. There are partial results back for 5 different unconnected Isaac families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Isaac progenitor. Note that the haplotypes of the Isaacs are a reasonably close match to the haplotype of a descendant of Arend Peters (1783-1846) #159456.
- 52. Janzen. There are at least partial results back for 24 different unconnected Janzen families. There are 8 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Jacob Franz Janzen (b. ca 1730) #580914, Peter Peter Janzen (b. 13 Jul 1854) #507887, Julius Janzen (b. ca 1730) #199118, Abram Janzen (b. ca 1885) #953109, Peter Franz Janzen (1859-1920) #340831, Heinrich Peter Janzen (b. 1 Feb 1847) #265794, Franz Janzen (1820-1892) #182815, Cornelius Johann Janzen (1783-1860) #39043, Peter Julius Janzen #945629, Franz Janzen (b. 9 Nov 1808) #514291, Diedrich Gerhard Janzen (b. ca 1764) #61132, Peter Janzen (1817-1884) #467872, Wilhelm Peter Janzen (b. 1769) #53990, and Johann Janzen (b. ca 1736) #311369 are consistent with each other and form the first subgroup. This group of Janzens belonged to Frisian Mennonite churches in W. Prussia. Two members of this subgroup have done the BigY test and share the SNP of J-FGC6734 as well as 13 SNPs downstream from J-FGC6734. Of interest is the fact that two close matches to this group who also have the J-FGC6734 SNP trace their ancestry back to the Brabant region in Belgium. In his book "Mennonite Migrations (and The Old Colony)" on p. 79 Henry Schapansky states that a Michael Janszoon was a refugee from the area of Oosterhoot, Brabant who settled in West Prussia where he was a deacon in the Elbing Mennonite Church and where he died in 1550. He seems to be the Michael Janssen who was sentenced to death in absentia by the Council of Strokes in Oosterhoot in 1571 per an article sent by Jeroen van Oevelen to Tim Janzen in 2021. Given that the J-FGC6734 SNP is in haplogroup J-L70 it is possible that the progenitor for this group descends from Roman settlers in the Low Countries in the first or second century AD. Also of interest is the fact that the Suderman haplotype is a fairly close match to the haplotype of the first subgroup of Janzens and a Suderman who has done the BigY also has the J-FGC6734 SNP. This suggests that this subgroup of Janzens and the Sudermans share a common progenitor before the time that surnames came into existence (ca 1500), probably in the Low Countries. Peter Julius Janzen #945629 is likely a descendant of Julius Janzen (b. ca 1730) #199118, probably through his grandson Julius Janzen (b. ca 1781) #199133. The haplotype of the descendant of Paul Janzen (1704-1765) #11942 forms a second subgroup. Paul Janzen #11942 was a member of the Neugarten Frisian Mennonite Church in W. Prussia. The haplotypes of the descendants of Peter Janzen (b. ca 1762) #69404 form a third subgroup. The haplotypes of the descendants of Martin Janzen (b. 15 Nov 1786) #52647 and David Janzen (b. 4 Oct 1872) #174079 form a fourth subgroup. The haplotype of the descendant of Jakob Janzen (b. 23 Oct 1822) #20750 forms a fifth subgroup. The haplotypes of the descendants of Heinrich Janzen (b. ca 23 Dec 1727) #174079 and Franz Janzen (b. Abt 1767) #229645 form a sixth subgroup. The haplotypes of a descendant of Peter Jantz (b. 1650) #39121, a descendant of Andreas Janz (1860-1921) #811044 and a descendant of Jacob Janzen (b. ca 1805) #1305195 form a seventh subgroup. Peter Jantz #39121 was a member of the Przechowka Mennonite Church in Prussia. The haplotypes of two descendants of Gerhard Janzen (1874-1944) #94798 form an eighth subgroup.

- 53. Jost/Just. Results are available for descendants of Martin Just (1817-1877) #17082 and Martin Gerhard Jost (b. ca 1791) #21953. The haplotypes are inconsistent with each other. This suggests that either there were two original Jost/Just progenitors, one for each lineage or that there was a NPE that occurred at some point in one of the two lineages. Martin Just (1817-1877) #17082 is known to have been of Lutheran ancestry and thus it seems highly probable that there was never any connection between the Martin Just's (1817-1877) #17082 paternal lineage and Martin Gerhard Jost's (b. ca 1791) paternal lineage.
- 54. Kampen. There are results back for 2 different unconnected Kampen families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Kampen progenitor.
- 55. Kehler. Results are available for two descendants of Michael Phillip Kehler (b. ca 1779) #197008, one who descends from Michael Kehler's son Jacob Kehler (1812-1897) through Jacob's son Peter Kehler (1855-1929) #149038 and another who descends from Michael Kehler's son Gerhard Kehler (1825-1902). The haplotypes are inconsistent with each other. The results of the descendant of Gerhard Kehler (1825-1902) are consistent with the results from a descendant of Michael Kehler (1733-1801) #196997 through Michael's son Gerhard (b. ca 1761). This suggests that there was a NPE that occurred at some point in the lineage of Jacob Kehler (1812-1897). Further testing of additional descendants of Jacob Kehler (1812-1897) on other lines of descent is needed to determine which lineage had the NPE.
- 56. Kerber. There are results back for 3 different unconnected Kerber/Karber families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Kerber/Karber progenitor.
- 57. Klassen. There are at least partial results back for 29 different unconnected Klassen families. There are 4 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Abraham Jacob Klaassen (1790-1851) #3062, Heinrich Klassen (1862-1933) #164637, Isaac Klassen (d. 1780) #5598, Johann Aron Klaassen (b. 6 Jun 1777) #47683, Abraham Klaassen (1722-1788) #134053, Julius Klassen (1752-1804) #265383, Peter Klassen (1743-1802) #197190, Wilhelm Jacob Klassen (1860-1923) #98265, Abram Klassen (b. ca 1835) #454229, Gerhard Jakob Klassen (b. ca 1769) #529329, Abraham Klassen (d. 1922) #667198, Herman Classen (b. 30 Apr 1904) #169070, Abraham Claassen (1717-1775) #374949, David Klassen (1739-1804) #102635, Hans Klaassen (1665-1731) #505609, Jakob Peter Klassen (1854-1932) #933632, Franz Julius Peter Klassen (b. ca 1759) #53126, Abraham Klassen (1828-1904) #749558, David Klassen (1865-1951) #535692, Peter Klassen (1889-1919) #505242, Jacob Klassen (1818-1876) #156688, and Wilhelm Klassen (1830-1913) #945774 are consistent with each other and form the first subgroup. One member of this subgroup has done the BigY test and has a terminal SNP of E-FT259752. Of interest is the fact that another close match to this group who has also done the BigY traces his ancestry back to the Netherlands. The haplotypes of the descendants of Chonert Klassen (b. ca 1750) #311454, Jacob Jacob Klassen (b. 25 Oct 1856) #214860, and Peter Johann Klassen (1860-1910) #682842 form a second subgroup. Jacob Jacob Klassen (b. 25 Oct 1856) #214860 and Peter Klassen (1860-1910) #682842 were likely descendants of Chonert

Klassen (b. ca 1750) #311454. One member of this subgroup has done the BigY test and has a terminal SNP of R-BY63454. Of interest is the fact that another man who doesn't have the surname Klassen but who also shares this SNP traces his ancestry back to Sweden. The haplotype of the descendant of Peter Isaac Klassen (b. ca 1792) #44071 forms a third subgroup. It should be noted that the marker value for DYS 464b for the descendants of Abraham Jacob Klaassen (1790-1851) #3062, Peter Claassen (1785-1852) #932589, Peter Klassen (1889-1919) #505242, and Jacob Klassen (1818-1876) #156688 who were tested may not actually be 15 as is shown on the table of the results. These people were tested by Family Tree DNA, a company which doesn't report microvariants (short tandem repeat values that contain a partial repeat) for the markers it tests. The corresponding value for DYS 464b for multiple Klassens who were tested by the SMGF is 14.3, which is probably the true result for this marker for the above mentioned people who were tested by Family Tree DNA. A male Klassen from this subgroup has done the BigY test and has been found to have the terminal SNP R-A5588. This SNP is in the R-Z326 subclade, a subclade that is estimated to have been formed about 4400 years ago per YFull. The R-Z326 SNP has been found throughout Europe. The haplotype of the descendant of Gerhard Klassen (1858-1891) #266779 forms a fourth subgroup. Note that this haplotype is very similar to the Wiens modal haplotype. This would suggest that there has likely been an NPE in the ancestral lineage of this man and that he likely has a Wiens progenitor.

- 58. Kliewer. There are at least partial results back for 2 different unconnected Kliewer families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Kliewer progenitor.
- 59. Klippenstein. There are at least partial results back for 2 different unconnected Klippenstein families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Klippenstein progenitor. Johan Johann Klippenstein (b. 1865) #249515 was likely a descendant of Jacob Klippenstein (b. 1655) #195796.
- 60. Koehn. There are results back for 2 different unconnected Koehn families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Koehn progenitor.
- 61. Koop. There are at least partial results back for 3 different unconnected Koop families. The haplotypes are consistent with each other with the exception of a mutation which has occurred at one marker, suggesting that these families both descend from the same Koop progenitor. Of interest is the fact that the haplotype of the Koops who have tested is a fairly close match to the haplotype of a descendant of Henry Cobbe (1238-1310) who was from England. This would suggest that the original Koop progenitor may have been from England.
- 62. Krahn. There are at least partial results back for 3 different unconnected Krahn families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Krahn progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 63. Krause. There are results back for 3 different unconnected Krause families. The haplotypes of the descendants of Kornelius Krause (b. 18 Jan 1856) #225697 and Joseph Paul Krause (b. 18 Dec 1907) #802545 are consistent with each other and form the first

subgroup. The haplotype of the descendant of Cornelius Krause (b. ca 1752) #9242 is inconsistent with the other Krause haplotypes and thus forms a second subgroup. This suggests that either there were two original Krause progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.

- 64. Kroeker. There are at least partial results back for 11 different unconnected Kroeker families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Kroeker progenitor. A male Kroeker has done the BigY test and has been found to have the terminal SNP R-FT12728. Of interest is the fact that the descendant of Absolon Absolon Engbrecht (b. ca 1771) #102399 who has been tested has a haplotype that matches 40 of the 43 marker results for this Kroeker haplotype, suggesting that the two surnames originated in the same area of Europe within the past 500 to 1000 years. Note that the Kroeker lineages have a different progenitor than the Krueger lineages.
- 65. Lepp. There are results back for 2 different unconnected Lepp (or Loepp) families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Lepp (or Loepp) progenitor. One male Loepp has done the Big Y test and has the terminal SNP R-S10471. His closest matches on the Big Y descend from ancestors who lived in Germany.
- 66. Loewen. There are at least partial results back for 14 different unconnected Loewen families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Loewen progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 67. Martens. The results are available for 7 different unconnected Martens families. The haplotypes of the descendants of Johann Frank Martens (b. ca 1865) #758639 and Aron Wilhelm Martens (1756-1801 #7686 form the first subgroup. The haplotype of the descendant of Heinrich Johann Martens (b. ca 1787) #396792 forms a second subgroup. Two men who descend from Gerhard Martens (b. 1740) #707356 have been tested. A descendant of Heinrich Jacob Martens (b. 1894) #410521 has also tested and his haplotype is consistent with that of the descendants of Gerhard Martens (b. 1740), suggesting that Heinrich Martens may be a descendant of Gerhard Martens (b. 1740). Their haplotypes form a third subgroup. The haplotype of the descendant of Johann Gerhard Martens (1760-1831) #9117 forms a fourth subgroup. The haplotype of the descendant of Cornelius Martens (1724-1886) #197100 forms a fifth subgroup. The haplotypes of the 5 subgroups are inconsistent with each other. This suggests that either there were 5 original Martens progenitors, one for each lineage, or that there was a NPE that occurred at some point in one or more of the 5 lineages. Of interest is the fact the haplotype of the descendant of Johann Frank Martens (b. ca 1865) #758639 is an exact match to the haplotype of the descendant of Aron Jacob Esau (b. ca 1783) #44916 who has been tested. The haplotype of the descendant of Johann Frank Martens (b. ca 1865) #758639 has been linked to Frisia by DNA researcher Ken Nordtvedt. A male Martens has done the BigY test and has been found to have the terminal SNP R-BY27616. This SNP is in the R-Y52 subclade, a subclade that is estimated to have been formed about 4700 years ago per YFull. The R-Y52 SNP has primarily been found in men from England, Germany, and Russia.

- 68. Nachtigal. There are results back for 2 different unconnected Nachtigal families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Nachtigal progenitor.
- 69. Neufeld. There are at least partial results back for 18 different unconnected Neufeld families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Neufeld progenitor. The descendants of Abraham Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeldt (d. ca 1794) #197028, and Dirk Johann Neufeld (1767-1833) #134086 who have been tested all have a value of 16 at DYS 458 and have a value of 12 at DYS 442 whereas the other Neufelds who have been tested have a value of 15 at DYS 458 and generally have a value of 12 at DYS 442. This would suggest that Abraham Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeld (1736-1815) #100650, Jacob Johann Neufeld (b. 1824) #6514, Johan Neufeld (c. ca 1794) #197028 and Dirk Johann Neufeld (b. 1824) #6514, Johan Neufeld (c. ca 1794) #197028 and Dirk Johann Neufeld (1767-1833) #134086 were closely related to each other. This haplotype has been linked to the Anglo-Saxons by DNA researcher Ken Nordtvedt. A male Neufeld has done the BigY test and has been found to have the terminal SNP I-FT201757. Two other men who have done the BigY and who share this terminal SNP but do not have the Neufeld surname trace their ancestry to Germany and to Poland.
- 70. Neustadter. There are results back for 2 different unconnected Neustadter families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Neustadter progenitor.
- 71. Nickel. There are at least partial results back for 4 different unconnected Nickel families. The haplotypes of the descendants of Jacob Johann Nickel (1860-1913) #1009750, Peter Peter Nickel (b. 1797) #53589, and Heinrich Heinrich Nickel (1852-1920) #940664 are potentially consistent with each other, but additional marker values are needed for these different Nickel descendants before it can be determined if these families all descend from the same Nickel progenitor. These haplotypes form the first subgroup. The haplotype of the descendant of Johann Nickel (b. 1774) #707152 is inconsistent with the other Nickel haplotypes and thus forms a second subgroup.
- 72. Niebuhr. A male Niebuhr has done the BigY test and has been found to have the terminal SNP R-FT412992. This SNP is in the R-FT196931 subclade, a subclade that seems to have originated in Poland or in that region.
- 73. Niessen. There are results back for 2 different unconnected Niessen families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Niessen progenitor.
- 74. Olfert. There are at least partial results back for 2 different unconnected Olfert families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Olfert progenitor. Abram Aron Olfert (b. 13 Nov 1899) #816748 was likely a descendant of Abram Olfert (b. ca 1740) #46195.
- 75. Pankratz. There are at least partial results back for 2 different unconnected Pankratz families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Pankratz progenitor.
- 76. Pauls. There are results back for 3 different unconnected Pauls families. The haplotypes of the descendants of Abraham Pauls (1710-1782) #197145 and Jacob Pauls (1824-1894) #645182 are consistent with each other and form the first subgroup. The haplotype of the

descendant of Peter Heinrich Pauls (b. 1 Mar 1787) #55433 forms a second subgroup. This suggests that either there were two original Pauls progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the lineages.

- 77. Pektau. There are at least partial results back for 4 different unconnected Petkau families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Petkau progenitor.
- 78. Penner. There are at least partial results back for 51 different unconnected Penner families. The haplotypes of 46 different unconnected Penner families are consistent with each other, suggesting that the 46 different families all descend from the same Penner progenitor, a man who likely lived 400-600 years ago. The haplotypes of the descendants of Abraham Penner (1826-1907) #1072395, Julius Heinrich Penner (1846-1922) #30504, Abraham Abraham Penner (b. ca 1783) #62047, Jacob Jacob Wilhelm Penner (1854-1922) #500238, and Andreas Heinrich Penner (b. 1811) #12136 are all inconsistent with each other, as well as being inconsistent with the largest group of Penners. This suggests that either there was more than one original Penner progenitor, one each for the 5 above mentioned Penner lineages, or that there was a NPE that occurred at some point in one or more of these 5 lineages. Abraham Penner (1826-1907) #1072395 is known to have been born illegitimately and he took the surname of his mother Anna Penner #1122537, so it seems quite probable that his father was not a Penner. The haplotypes of the descendants of Abraham Penner (b. ca 1783) #62047 are a close match to the haplotype of a descendant of Peter Siemens (b. ca 1790) #58879, which would suggest that a NPE probably has occurred somewhere in the lineage of Abraham Penner #62047 and that men in this lineage who were tested actually descend from a male Siemens. The haplotype of the descendant of Julius Heinrich Penner (1846-1922) #30504 is a relatively close match to the haplotype of a descendant of Jeorge Buller (b. bef. 1660, d. aft 1702), with only 4 markers mismatching, would suggests that a NPE may have occurred somewhere in the lineage of Julius Heinrich Penner (1846-1922) #30504 and that the man in this lineage who was tested may actually descend from a male Buller. There is a discrepancy between the results from Family Tree DNA and the Sorenson Foundation for one of the four values of the multi-copy marker DYS 464 for a descendant of Cornelius Jacob Penner (1852-1920) #163093. FTDNA gives a value of 14 and the SMGF gives a value of 17 for one of the copies of this marker. To denote this discrepancy this marker value is highlighted in light green in the accompanying spreadsheet and the value 14 has been entered until the discrepancy can be resolved through additional testing. Similarly, there is a discrepancy between the results from Family Tree DNA and the Sorenson Foundation for one of the four values of the multi-copy marker DYS 464 for a descendant of Johann Penner (1786-aft. 1852) #70103. FTDNA gives a value of 15 and the SMGF gives a value of 16 for one of the copies of this marker. To denote this discrepancy this marker value is highlighted in light green in the accompanying spreadsheet and the value 15 has been entered until the discrepancy can be resolved through additional testing. There are results available for at least 37 markers for most of the 46 different unconnected Penner families that have haplotypes that are consistent with each other. Not surprisingly, the markers that most frequently have mismatches among this group of Penners are DYS 458, CDY a, and CDY b. These are all known to be markers that generally mutate faster than the other markers. Attempting to group all of

the Penners into family clusters based on similar haplotypes is somewhat tricky and must be done carefully due to the fact that the same mutation, particularly for the above three markers, may have occurred more than once in the lineages of these different Penner families relative to the original Penner progenitor's haplotype. The haplotypes of the descendants of Heinrich Penner (1753-1815) #57878, Abraham Penner (d. bef. 1890) #229032, and Edward Penner (1887-1982) #43515 are all very similar, each having a value of 19 for DYS 458, a value of 31 for DYS 449, and a value of 15 for DYS 456. This would suggest that Abraham Penner (d. bef. 1890) #229032 was likely a grandson of Heinrich Penner (1753-1815) #57878. This would not be surprising given that Abraham Penner #229032 is known to have been from Schoenhorst, Chortitza Colony and given that Heinrich Penner (1753-1815) #57878 also lived in Schoenhorst. Edward Penner (1887-1982) #43515 and Heinrich Penner (1753-1815) #57878 were likely descended from a Penner male who lived in the late 1600s or early 1700s in Prussia. Other conclusions about probable relationships will likely be possible once additional marker results are available and/or single nucleotide polymorphisms unique to specific Penner families are discovered. A male Penner has done a complete genome sequence and has been found to have the terminal SNP E-Z5013. This SNP is estimated to have been formed about 1800 years ago per YFull. The E-Z5013 SNP has been found in men who trace their ancestry to Spain, Morocco, Algeria, and Malta suggesting that the original progenitor of the Penners was likely from the Spain or that region and then migrated to the Netherlands or that region. At least two men with Penner ancestry have done the Big Y and those men share the terminal SNP E-FT239037.

- 79. Perk. A male Perk has done the BigY test and has been found to have the terminal SNP I-BY35220. A SNP just upstream from I-BY35220, specifically I-A8191, is estimated to have been formed about 3800 years ago per YFull. The I-A8191 SNP has been found in men from Germany and England.
- 80. Peters. There are at least partial results back for 18 different unconnected Peters families. There are at least 5 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Elias Peters (d. 1786) #176995 match and form the first subgroup. The haplotype of the descendant of Arend Peters (1783-1846) #159456 is potentially consistent with the haplotypes of the descendants of Elias Peters (d. 1786) #176995 and thus may also belong in the first subgroup. However, it is also possible that the lineage of Elias Peters (d. 1786) #176995 and the lineage of Arend Peters (1783-1846) #159456 share a common progenitor before the time that surnames came into existence (ca 1500). The haplotype of the descendant of Arend Peters (1783-1846) #159456 is a close match to the halotypes of the male Isaacs who have been tested. The haplotypes of the descendants of Abram Peters (b. 1860) #11029654, Abraham Jacob Peters (b. 1762) #70191, Gerhard Peters (1772-1848) #18759, Jacob Peters (b. ca 1810) #188316, Aron Peters (ca 1733-1784) #117398, Peter Peters (1881-1955) #182522, Johann Peters (1750-1834) #149667, and Jacob Peters (b. 1755) #138255 form a second subgroup. A male Peters from the second subgroup has done the BigY test and has been found to have the terminal SNP R-FGC72856. Of interest is the fact that another man who does not have the surname Peters who also shares this SNP traces his ancestry to the Netherlands. The haplotype of the descendant of Peter Peters (1777-1841) #176734 represents a third subgroup. The haplotypes of the descendants of Aron Peters (ca 1745-1802) #198928, Hermann Peters (b. ca 1744) #149662, Abraham Peters (1827-1851)

#2791, Johann Peters (1902-1986) #467244, Kornelius Peters (1850-1944) #495008, and Peter Isaac Peters (1901-1977) #475740 represent a fourth subgroup. The haplotype of the fourth subgroup has been linked to Frisia by DNA researcher Ken Nordtvedt. The haplotype of the descendant of Johan Peters (1863-1946) #177802 represents a fifth subgroup. Johann Peters #177802 was abandoned by his Russian mother, Netzell Petrowitsch, in a pigpen until picked up by a Mrs. Johann Doerksen. See the Grandma database for details.

- 81. Philipssen. A male Philipssen has done the BigY test and has been found to have the terminal SNP R-FTC51132. This SNP is in the R-BY42360 subclade. Mr. Philippsen has a fairly close match on the Big Y who traces his ancestry to the Netherlands, suggesting that the earliest Philipssen ancestor was likely from the Netherlands or that region.
- 82. Plenert. A male Plenert who has been tested has done the BigY test and has been found to have the terminal SNP R-ZP206. This SNP is estimated to have been formed about 2200 years ago per YFull. This SNP has also been found in a man from Great Britain.
- 83. Poetker. There are results back for 2 different unconnected Poetker families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Poetker progenitor. Johann Johann Poetker (b. 15 Oct 1850) #954971 was probably a descendant of Johan Poetker (b. ca 1762) #412754.
- 84. Quiring. There are results back for 4 different unconnected Quiring families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Quiring progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt. A male Quiring has done the BigY test and has been found to have the terminal SNP R-FT112467. Of interest is the fact that 9 other men who do not have the surname Quiring who also share this SNP trace their ancestry to the Netherlands.
- 85. Rahn. There are at least partial results back for 2 different unconnected Rahn families. Three of the people tested are purportedly descendants of Jacob Rahn (1750-1820) #132712. A descendant of Isebrandt Rahn (1683-1749) #951242 has also been tested. The haplotype of the descendant of Isebrandt Rahn #951242 is inconsistent with the haplotypes of the descendants of Jacob Rahn #132712. This suggests that either there were two original Rahn progenitors, one for each lineage, or that there was a NPE that occurred at some point in one of the two lineages. The haplotype of the descendant of Jacob Rahn (1750-1820) #132712 through his son Peter Rahn (1799-1886) #53531 is inconsistent with the haplotype of two descendants of Jacob Rahn (1750-1820) #132712 through his son Abraham Rahn (1782-1815) #209020. This indicates that a NPE has occurred somewhere in the lineage of one of the descendants of Jacob Rahn (1750-1820) #132712. Additional testing of male Rahns who descend from Jacob Rahn (1750-1820) #132712 on different lines of descent is needed to help sort where the NPE has occurred in one of the Rahn lineages.
- 86. Ratzlaff. There are at least partial results back for 3 different unconnected Ratzlaff families. The haplotypes are for two descendants of Bernhard Ratzlaff (ca 1834-1881) #479270 and the haplotype for a descendant of Peter Ratzlaff (1798-1854) #31787 are consistent with each other. The haplotype of a grandson of Heinrich Ratzlaff (b. 1861) #896571 who has been tested and who is a descendant of Hans Ratzlaff (b. ca 1590)

#36101 through Hans Ratzlaff's grandson Berent Ratzlaff (1660-ca 1717) #32092 is consistent with the haplotype of the two descendants of Bernhard Ratzlaff #479270 and the haplotype for a descendant of Peter Ratzlaff (1798-1854) #31787. However, the haplotype of a different descendant of Hans Ratzlaff (b. ca 1590) #36101 through Berent Ratzlaff's #32092 brother Hans Ratzlaff (b. 1 Jan 1661) #36105 is inconsistent with the haplotype of the two descendants of Bernhard Ratzlaff #479270. This suggests that a NPE has occurred somewhere in the lineage of the descendant of Hans Ratzlaff (b. 1661) #36105 who was tested and his purported ancestor. Additional testing of male Ratzlaffs who descend from Hans Ratzlaff (b. 1 Jan 1661) #36105 on different lines of descent is needed to help sort where the NPE has occurred in one of the Ratzlaff lineages.

- 87. Redekopp. There are at least partial results back for 3 different unconnected Redekopp families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Redekopp progenitor.
- 88. Regier. There are at least partial results back for 8 different unconnected Regier families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Regier progenitor.
- 89. Reimer. There are at least partial results back for 9 different unconnected Reimer families. The haplotypes are consistent with each other with the exception that the haplotype of the descendant of Johann Reimer (ca 1770-1819) #46407 is inconsistent with the haplotypes of the other 7 Reimer lineages that have been tested. This suggests that either there were two original Reimer progenitors, one for the lineage of Johann Reimer (ca 1770-1819) #46407 and one for the other Reimer lineages, or that there was a NPE that occurred at some point in the lineage of the descendant of Johann Reimer (ca 1770-1819) #46407 who was tested.
- 90. Rempel. There are at least partial results back for 7 different unconnected Rempel families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Rempel progenitor. The descendants of Bernhard Rempel (1763-1806) #101361, Peter Rempel (b. 6 Jul 1735) #198954, and Jacob Gerhard Rempel (b. 10 May 1862) #341796 who have been tested all have a value of 13 at DYS 442 whereas the other Rempels who have been tested have a value of 14 at DYS 442. This would suggest that Bernhard Rempel (1763-1806) #101361, Peter Rempel (b. 6 Jul 1735) #198954, and Jacob Gerhard Rempel (b. 10 May 1862) #341796 were more closely related to each other than to the other Rempels who have been tested. It should be noted that the marker value for DYS 448 for the descendant of Bernhard Rempel (1763-1806) #101361 who was tested may not actually be 20 as is shown on the table of the results. This person was tested by Family Tree DNA, a company which doesn't report microvariants (short tandem repeat values that contain a partial repeat) for the markers it tests. The corresponding value for DYS 448 for 6 Rempels who were tested by the SMGF is 19.2, which is probably the true result for this marker for the descendant of Bernhard Rempel #101361 as well.
- 91. Riediger. There are results back for 2 different unconnected Riediger families. The haplotypes are potentially consistent with each other but have mismatches at 4 markers, suggesting that these families likely descend from the same Riediger progenitor, but there is at least some uncertainty about this and they may share a common progenitor before the time that surnames came into existence (ca 1500).

- 92. Rogalsky. There are at least partial results back for 2 different unconnected Rogalsky families. The haplotypes are consistent with each other with the exception of a mutation which occurred at one marker, suggesting that these families both descend from the same Rogalsky progenitor.
- 93. Rosenfeld. There are at least partial results back for 2 different unconnected Rosenfeld families. The haplotypes are consistent with each other with the exception of a mutation which occurred at one marker, suggesting that these families both descend from the same Rosenfeld progenitor.
- 94. Sawatzky. There are at least partial results back for 3 different unconnected Sawatzky families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Sawatzky progenitor.
- 95. Schmidt. There are at least partial results back for 5 different unconnected Schmidt families. There are three different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Peter Schmidt (1802-1879) #29703, Kasper Schmidt (b. 1664) #273791, and Heinrich Schmidt (1795-1853) #50991 are consistent with each other and form the first subgroup. The haplotype of the descendant of August Schmidt (1802-1897) #209129 represents a second subgroup. The haplotype of the descendant of Martin Schmidt (b. 9 Apr 1766) #105940 represents a third subgroup. This suggests that either there were three original Schmidt progenitors, one for each subgroup or that there was a NPE that occurred at some point in the August Schmidt (1802-1897) #209129 lineage and/or the Martin Schmidt (b. 9 Apr 1766) #1059540 lineage.
- 96. Schroeder. There are results for 8 different unconnected Schroeder families. There are three different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Wilhelm Schroeder (1761-1829) #275130 and Simon Schroeder (1751-1808) #788737 are consistent with each other and form the first subgroup. The haplotypes of two descendants of Isaac Schroeder (1738-1789) #222095 represent a second subgroup, but are inconsistent with the haplotype of another descendant of Isaac Schroeder (1738-1789) #222095. The haplotypes of descendants of Isaac Schroeder's son Johann Schroeder (b. 1763) #196630 don't match the haplotype of the descendant of Isaac Schroeder's son Heinrich Schroeder (b. 1769) #14829. This suggests that an NPE occurred somewhere in the lineage of Johann Schroeder (b. 1763) #196630. The haplotypes of one of the descendants of Isaac Schroeder (1738-1789) #222095 through Isaac's son Heinrich Schroeder (b. 1769) #14829 and the descendants of Peter Schroeder (1718-1802) #694669, David Schroeder (b. ca. 1718) #1124609, Peter Schroeder (b. ca 1740) #351305, David Schroeder (b. ca. 1775) #44460, and David Schroeder (1796-1855) #1018188 are consistent with each other and form the third subgroup. The haplotypes of the descendants of Isaac Schroeder (1738-1789) #222095, Peter Schroeder (1718-1802) #694669 and David Schroeder (b. ca. 1718) #1124609 each have a value of 11 for DYS 439 whereas the other Schroeders in that subgroup have a value of 12 for DYS 439. This would suggest that Isaac Schroeder (1738-1789) #222095, Peter Schroeder (1718-1802) #694669 and David Schroeder (b. ca. 1718) #1124609 were closely related. The haplotype of the first subgroup has been linked to Scandinavia and the haplotype of the third subgroup has been linked to Frisia by DNA researcher Ken Nordtvedt.

- 97. Siemens. There are at least partial results back for 7 different unconnected Siemens families. There are 2 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Klaas Johann Siemens (1758-1834) #46557, Peter Siemens (b. ca 1790) #58879, Jacob Siemens (b. 18 May 1764) #2169, and Jakob Siemens (d. 1944) #1007967 are consistent with each other and form the first subgroup. The haplotypes of the descendants of Peter Siemens (b. ca 1845) #951210, Jacob Siemens (b. bef. 1740, d. ca 1786) #159479, and Peter Siemens (b. about 1800) #180306 are consistent with each other and form a second subgroup. This suggests that either there were two original Siemens progenitors, one for each subgroup, or that there was a NPE that occurred early on in one of the Siemens lineages.
- 98. Suderman. There are at least partial results back for 4 different unconnected Suderman families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that all 4 of these families descend from the same Suderman progenitor. A male Suderman has done the Big Y test and has a terminal SNP of J-BY110181. His closest match on the Big Y has the surname Feskens and traces his ancestry back to Belgium. Of interest is the fact that the Suderman haplotype is a fairly close match to the first subgroup of Janzens, suggesting that they share a common progenitor before the time that surnames came into existence (ca 1500), probably in the Low Countries. This subgroup of Janzens shares the J-FTC6734 SNP with the Sudermans. See the summary for the Janzen data for more details.
- 99. Teichroeb. There are at least partial results back for 2 different unconnected Teichroeb families. The haplotypes are consistent with each other with the exception of mutations which have occurred at one marker, suggesting that both of these families descend from the same Teichroeb progenitor.
- 100. Thiessen. There are at least partial results back for 10 different unconnected Thiessen families. The haplotypes are consistent with each other with the exception that the haplotype of the descendant of Johann Aron Thiessen (b. 31 May 1869) #342798 is inconsistent with the haplotypes of the other 9 Thiessen lineages that have been tested. This suggests that either there were two original Thiessen progenitors, one for the lineage of Johann Aron Thiessen (b. 31 May 1869) #342798 and one for the other Thiessen lineages, or that there was a NPE that occurred at some point in Johann Aron Thiessen's (b. 31 May 1869) #342798 lineage. It is possible that Francis Thijssen #341198 was the progenitor of all of the Mennonite Thiessens except for the lineage of Johann Aron Thiessen (b. 31 May 1869) #342798. The haplotype of the first subgroup has been linked to the Anglo-Saxons and the haplotype of the descendant of Johann Aron Thiessen (b. 31 May 1869) #342798 has been linked to Eastern Europe by DNA researcher Ken Nordtvedt.
- 101. Tiahrt. There are at least partial results back for 2 different unconnected Tiahrt families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that both of these families descend from the same Tiahrt progenitor.
- 102. Toews. There are at least partial results back for 11 different unconnected Toews families. The haplotype of a descendant of Martin Toews (1724-1775) #132706 through his son Johann Toews (1743-1811) #225388 is consistent with the haplotypes of the descendants of Julius Toews (1741-1780) #187161, Peter Toews (b. ca 1770) #914897, Isaac Toews (b. ca 1765) #46701, Dirk Toews (b. 1778) #46697, Franz Johann Toews

(1885-1966) #83441, Peter Toews (1778-1829) #777463, Abraham Toews (1747-1787) #706878, Johann Toews (1763-1803) #102986, Isaac Toews (1774-1831) #164449 and Johann Peter Toews (b. 1882). However, the haplotypes of a descendant of Gerhard Toews (b. 15 Oct 1860) #351537, a descendant of Johann Toews (b. 23 Feb 1876) #132684, and a descendant of Jakob Toews (1822-1909) #51740, all of whom are supposedly descended from Martin Toews (1724-1775) #132706 through his son Isaak Toews (ca 1754-1803) #132700, are inconsistent with the haplotype of the descendant of Martin Toews (1724-1775) #132706 through his son Johann Toews (1743-1811) #225388. This suggests that a NPE has occurred somewhere in the lineage of the Isaak Toews' (ca 1754-1803) #132700 descendants. This NPE must have occurred either with Isaak Toews (ca 1754-1803) #132700 or his son Abraham Toews (1781-1826) #51732 since descendants of Abraham Toews' sons Aron Toews (1815-1901) #51736 and Jakob Toews (1822-1909) #51740 both share the same haplotype.

- 103. Unger. There are results back for 4 different unconnected Unger families. The haplotypes are potentially consistent with each other but have mismatches at 4 markers, suggesting that these families likely descend from the same Unger progenitor, but there is at least some uncertainty about this and they may share a common progenitor before the time that surnames came into existence (ca 1500).
- 104. Unrau/Unruh. There are at least partial results back for 7 different unconnected Unrau and Unruh families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Unrau/Unruh progenitor. Two men with the surname Unrau/Unruh have done the BigY test and have been found to have the terminal SNP R-FGC51751. This SNP found in the R-S4060 subclade. The SNP R-S4060 is estimated to have been formed about 3200 years ago per YFull. The men who have the R-S4060 SNP who have been tested are primarily from England and Estonia.
- 105. Vogt. There are at least partial results back for 3 different unconnected Vogt families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Vogt progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 106. Voth. There are at least partial results back for 4 different unconnected Voth families. There are 2 different subgroups for this surname based on the results currently available. The haplotypes of the descendents of Johann Voth (d. 1832) #4541, Heinrich Voth (d. 1863) #307212, and Cornelius Voth (1838-1898) #180114 are consistent with each other with the exception of mutations which have occurred at some markers and form the first subgroup. Another male with the Voth surname has also been tested and his haplotype is inconsistent with the haplotypes of the other male Voths who have tested. This isn't particularly surprising since the paternal grandfather of this male Voth is unknown and his surname was probably not Voth.
- 107. Wall. There are results back for 8 different unconnected Wall families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Wall progenitor. This haplotype has been linked to the Anglo-Saxons by DNA researcher Ken Nordtvedt. A male Wall has done the Big Y test and has been found to have the terminal

SNP I-FGC31049. He has no close matches on the Big Y. His closest match on 67 STR markers has the surname Workman and has ancestral origins from Germany.

- 108. Warkentin. There are at least partial results back for 9 different unconnected Warkentin families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families all descend from the same Warkentin progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt. An additional Warkentin (kit #IN45036) has tested and his haplotype is consistent with the other Warkentins who have tested. However, his father is not known to have been a Warkentin.
- 109. Wedel. There are at least partial results back for 4 different unconnected Wedel families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Wedel progenitor. A male Wedel has done the BigY test and has been found to have the terminal SNP R-Y50863. There is one other man who has also done the BigY and also has this SNP. He has the surname Ptasnik and traces his ancestry to Poland.
- 110. Wiebe. There are results back for 16 different unconnected Wiebe families. The haplotypes are consistent with each other, suggesting that these families all descend from the same Wiebe progenitor. Some of the families have a marker value of 30 for DYS 449 and most of the rest have a marker value of 31. Those families with the same value for this marker are likely more closely related to each other than those who don't have the same marker value. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 111. Wieler. There are results back for 7 different unconnected Wieler families. There are 2 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Johann Wieler (b. 1771) #127055, Cornelius Wieler (1765-1807) #487640, Johan Heinrich Wieler (1758-1802) #197280, Peter Peter Wieler (1778-1850) #187168, Abraham Wieler (1740-1796) #1319059, and Abraham Wieler (1741-1805) #1009756 are consistent with each other and form the first subgroup. The haplotype of the descendant of Jacob Klaas Wieler (1794-1815) #55032 represents a second subgroup. This suggests that either there were two original Wieler progenitors, one for the lineage of Jacob Klaas Wieler (1794-1815) #55032 and one for the other Wieler lineages, or that there was a NPE that occurred at some point in Jacob Klaas Wieler's (1794-1815) #55032 lineage. The Wielers in the first subgroup have a marker value of 23 at YCA IIb where as the descendant of Abraham Wieler #1009756 has a value of 19 at that marker. This would suggest that there must have been a deletion of a relatively large portion of the short tandem repeat at this marker location, likely as the result of a recombinational loss of heterozygosity (RecLOH). Note that the haplotype of the descendant of Jacob Klaas Wieler (1794-1815) #55032 is a close match to the haplotype of the Warkentins who have been tested.
- Wiens. There are at least partial results back for 11 different unconnected Wiens families. There are 2 different subgroups for this surname based on the results currently available. The haplotypes of the descendants of Abram Wiens (b. ca 1735) #198228, Abram Wiens (b. 13 Aug 1896) #990794, Heinrich Wiens (1847-1921) #755624, Bernhard Wiens (1841-1886) #1030497, Peter Peter Wiens (1867-1909) #583819, Peter J. Wiens (1842-1913) #283887, Abraham Wiens (b. ca 1846) #45656, Johann Wiens (b. ca 1748) #47044, and Peter Wiens (1773-1823) #341095 are consistent with each other

and form the first subgroup. The haplotypes of the descendants of Jacob Johann Wiens (b. ca 1762) #47010 and Gerhard Jacob Wiens (16 Nov 1859) #513463 form a second subgroup. This suggests that either there were two original Wiens progenitors, one for the lineage of Jacob Johann Wiens (b. ca 1762) #47010 and Gerhard Jacob Wiens (16 Nov 1859) #513463 and one for the other Wiens lineages, or that there was a NPE that occurred at some point in the lineage of Jacob Johann Wiens (b. ca 1762) #47010 and Gerhard Jacob Wiens (16 Nov 1859) #513463. Gerhard Jacob Wiens (16 Nov 1859) #513463 was probably a descendant of Jacob Johann Wiens (b. ca 1762) #47010.

- 113. Willms. There are at least partial results back for 3 different unconnected Willms families. The haplotypes are consistent with each other with the exception of mutations which have occurred at some markers, suggesting that these families both descend from the same Willms progenitor. This haplotype has been linked to Frisia by DNA researcher Ken Nordtvedt.
- 114. Wittenberg. Two male Wittenbergs have done the BigY test and have been found to have the terminal SNP R-FT248324. Most of the males who have done the BigY who are in adjacent subclades to this SNP trace their ancestry to either Germany or to Poland.
- 115. Zacharias. There are at least partial results back for 2 different unconnected Zacharias families. The haplotypes are consistent with each other, suggesting that these families both descend from the same Zacharias progenitor. Jakob Zacharias (1885-1933) #945779 was likely a descendant of Wilhelm Zacharias (b. ca 1700) #8772.