

# **Peter Larson – One of my Brorström First-Cousins**

by Burks Oakley II  
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## ***Introduction***

My mother was Grace Florence Brorström (1916-2000). Her older brother was Paul Thure Brorström Jr. (1913-2001). All four of their grandparents were Swedish immigrants who came to America in the 1880's.

My Uncle Paul had six children:

Peter Thure Brorström – born in 1947  
Elizabeth “Beth” Ruth Brorström – born in 1949  
David Arlon Brorström – born in 1952, died in 1953  
Annmarie Brorström – born in 1954  
Sue Gwen Brorström – born in 1955  
Stuart Wayne Eck – born in 1956

Paul's first five children were with his wife Harriet (1923-1984), while his sixth child was with Sue Helen Eck (1925-2005). As adults, Peter changed his name to Peter Larson and Sue changed her name to Susan Baker.

For many years now, I have known about my DNA matches with my first-cousins Beth, Annmarie, and Susan. In 2016, I learned about my DNA match with another first-cousin, Stuart. In early 2019, Peter had his DNA tested on the 23andme.com website – the last of my Brorström first-cousins to have their DNA tested. This short narrative presents some results of Peter's DNA test.

## ***Peter's DNA on 23andme.com***

Peter's DNA test found that he is 99.7% European, as shown in the following chart:



Peter is 38.1% Scandinavian, as would be expected from his father's Swedish ancestry. He is 17.8% French & German, and that includes Belgium and the Netherlands – Peter's mother Harriet Buyck was indeed descended from the Buyck family in Belgium.

By comparison, Annmarie is 100% European, including 43.3% Scandinavian and 20.4% French & German. Susan is 100% European, including 43.8% Scandinavian and 22.5% French & German.

Bottom line – no surprises with Peter's ethnicity. Well, maybe the 0.1% East Asian & Native American that neither Annmarie or Susan have stands out as different. But I don't put a lot of confidence in these types of estimates.

Peter's DNA matches on the 23andme.com website are consistent with what I know about his family. Here are some of his top matches:



The screenshot shows the 23andMe DNA Relatives interface. At the top, the 23andMe logo is on the left, 'DNA Relatives' is in the center, and a purple circle with 'PL' is on the right. Below this is a list of matches, each with a star icon, a profile picture or initials, the name, the relationship, and the percentage of DNA shared along with the number of segments.

Match	Relationship	DNA Shared	Segments
☆  <b>Annmarie Brorstrom DeMattia</b> <small>Owned Profile</small>	Sister	51.2%	42
☆  <b>Susan Baker</b>	Sister	42.4%	56
☆  <b>Elise Baker</b>	Niece	22.1%	44
☆  <b>Rebekah Rhodes</b>	Niece	22.0%	52
☆  <b>Burks Oakley</b>	First Cousin	13.1%	33
☆  <b>Amy Oakley</b>	First to Second Cousin	7.75%	19
☆  <b>Paul Horton</b>	Second to Third Cousin	2.45%	3
☆  <b>Amanda Hundley</b>	Third to Fourth Cousin	0.91%	3
☆  <b>Ben Hundley</b>	Third to Fifth Cousin	0.51%	2

Peter has his largest DNA matches with his sisters Annmarie and Susan. He has DNA matches with his nieces Elise Baker (Susan's daughter) and Rebekah Rhodes (Beth's daughter). He has DNA matches with me (a first-cousin) and my daughter Amy (a first-cousin once-removed). He also has a DNA match with Paul Horton, who is his second-cousin and is descended from Peter's great-aunt Ebba Brorström. Finally, he has DNA matches with Amanda and Ben Hundley, who are his third-cousins, descended from his second-great grandparents Erik Larsson (born 1835) and Anna Maria Larsdotter (born 1842). Peter also has a number of



Siblings average 2600 cM, with a range of 2150 to 3070 cM. So the DNA matches between the Brorström siblings are exactly in the expected range.

Stuart Eck is a half-sibling to Peter, Beth, Annmarie, and Susan (they have the same father but different mothers). Here are Stuart's DNA matches with his half-siblings:

Peter & Stuart share 2009.5 cM  
Annmarie & Stuart share 1971.7 cM  
Beth & Stuart share 1933.7 cM  
Susan & Stuart share 1702.6 cM

Bettinger found that half-siblings share 1753 cM on average, with a range of 1320 – 2134 cM. So Stuart's DNA matches with his half-siblings are just as expected.

Nothing newsworthy here.

Next, I looked at MY DNA matches with my five first-cousins:

Burks and Peter – 1012.3 cM  
Burks and Stuart – 974.7 cM  
Burks and Susan – 914.2 cM  
Burks and Annmarie – 858.4 cM  
Burks and Beth – 793.2 cM

Bettinger found that first-cousins average 869 cM, with a range of 533 cM to 1379 cM. So the matches between my first-cousins and me are exactly what would be expected.

One last random comparison – Göran Grotting is our fourth-cousin once-removed (4C1R). We all are descended from a couple that lived in Fjärås, Sweden, in the early 1800's. Here are our DNA matches with Goran:

Susan and Göran Grotting share 50.2 cM  
Stuart and Göran Grotting share 38.3 cM  
Beth and Göran Grotting share 33.1 cM  
Burks and Göran Grotting share 26.6 cM  
Annmarie and Göran Grotting share 14.2 cM  
Peter and Göran Grotting do NOT have a DNA match

Bettinger found that 4C1R average 20 cM, with a range of 0 to 57 cM. So it looks like the six of us span almost the entire range of observed DNA matches. These results emphasize the random way that DNA is inherited – Susan and Göran have a large 50.2 cM match, while Susan’s brother Peter doesn’t match Göran at all.

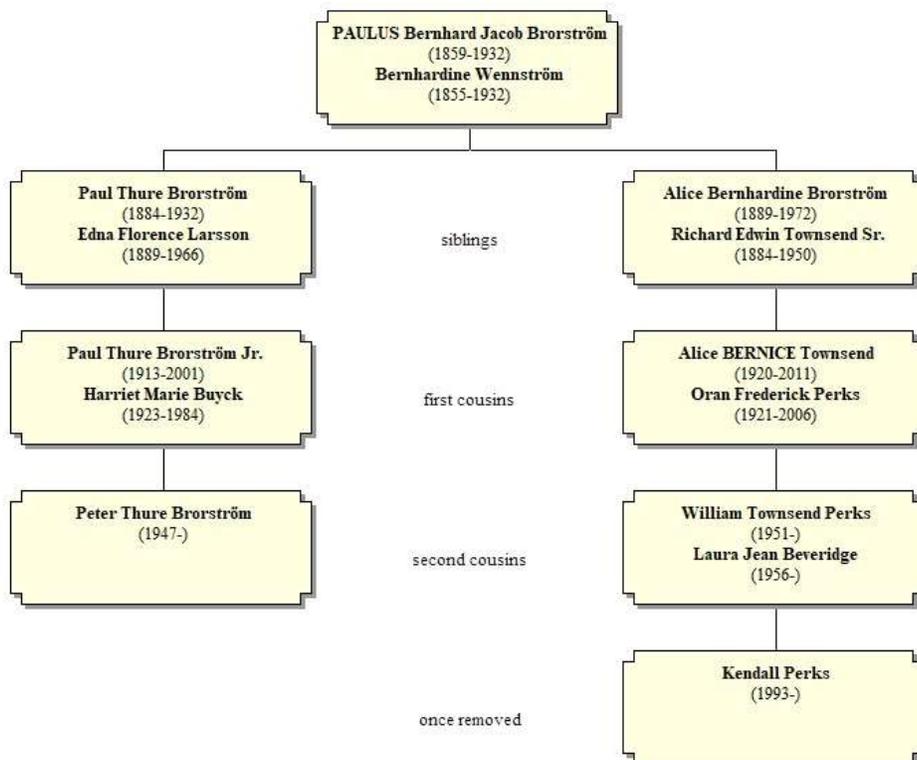
In looking at Peter’s top DNA matches on GEDmatch.com, I learned that he has a nice DNA match with Kendall Perks:

Comparing Kit RG2124558 (Peter Larson) and A221561 (Kendall Perks)

Chr	B37 Start Pos'n	B37 End Pos'n	Centimorgans (cM)	SNPs
1	28,432,549	41,139,341	17.7	542
1	53,153,432	62,803,211	15.1	505
1	238,154,347	249,210,707	24.7	565
5	112,291,861	120,661,074	7.6	331
12	6,061,491	34,375,830	41.8	1,398
15	39,981,402	70,686,243	34.0	1,170
16	84,544,608	86,513,221	8.1	218
19	1,904,612	17,088,810	37.6	845
19	53,982,712	58,518,516	15.2	351
20	36,589,678	52,707,522	26.6	867
22	23,263,708	33,030,026	20.0	498

Total Half-Match segments (HIR) = 248.6 cM (6.936 Pct)  
 Estimated number of generations to MRCA = 2.9

Kendall is Peter’s second-cousin once-removed (2C1R); she is a great-granddaughter of Peter’s great-aunt Alice Brorström Townsend (1889-1972). Peter and Kendall share 248.6 cM of DNA. Bettinger found that 2C1R average 129 cM, with a range of 0 – 325 cM. The software on the GEDmatch.com website estimated that their Most Recent Common Ancestor (MRCA) was 2.9 generations in the past. They both are descended from the Swedish immigrant couple Paulus Brorström (1859-1932) and his wife Bernhardine Wennström (1855-1932):

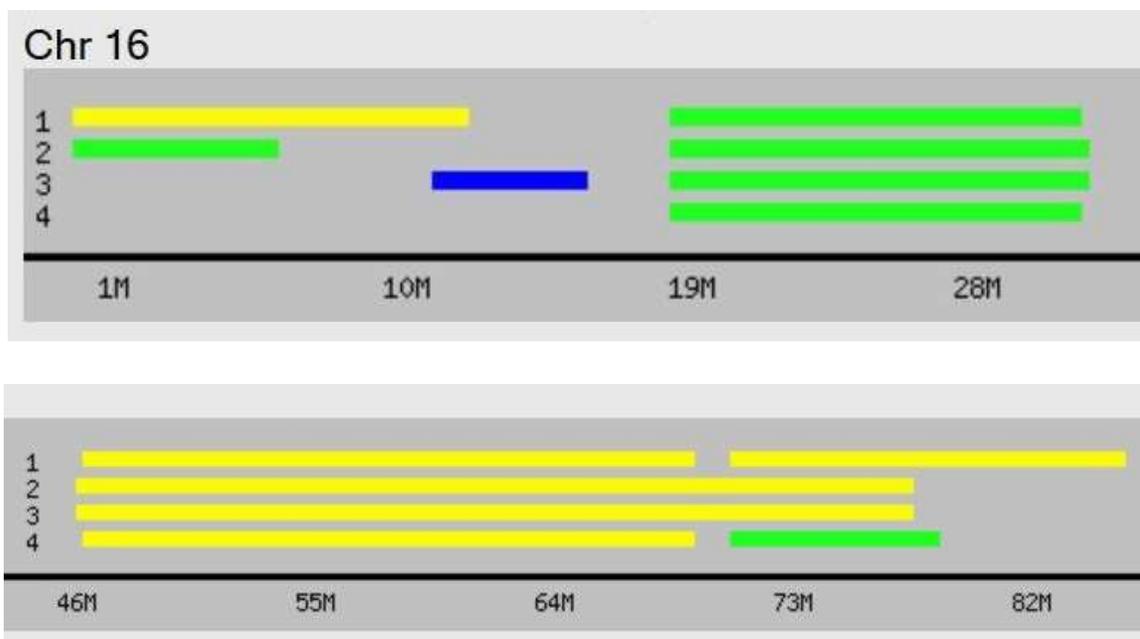


The common ancestors are 3 generations back for Peter and 4 generations back for Kendall, so the MRCA should be 3.5 (the average of 3 and 4). However, since their DNA match is much larger than average for a 2C1R relationship, the software predicted that their relationship is closer (estimated MRCA of 2.9). By comparison, Beth's match with Kendall is 140.7 cM, with an estimated MRCA of 3.3 (much closer to the actual 3.5). And my match with Kendall is 137.7 cM, with an estimated MRCA of 3.4 (even closer to the actual 3.5).

Again, no surprises, and it is nice to see Peter's DNA match with another branch of the Brorström-Wennström family.

As I mentioned earlier, the software on the GEDmatch.com website allows users to make detailed comparisons of DNA matches between multiple individuals.

The following two panels show how Annmarie, Beth, Susan, and Stuart match Peter on Chromosome 16:



(1) Beth, (2) Stuart, (3) Annmarie, and (4) Susan

Note that Peter is not shown – the colored bars show where the others match Peter on Chromosome 16. The result of this comparison is that all five of them have almost identical segments in three locations on Chromosome 16. Again, this is to be expected, given their close genetic relationship.

### ***Conclusion***

In this narrative, I have presented some of the results of Peter Larson’s DNA “test” on the 23andme.com website, as well as specific details about his DNA matches on the GEDmatch.com website.

Peter is 99.9% of European ancestry, with large ancestry from Scandinavia and Belgium – this is entirely consistent with what we know about the ethnicity of his parents, Paul and Harriet.

Peter’s largest DNA matches are with his full siblings, Beth, Annmarie, and Susan, and he has matches with several nieces and various cousins. Using GEDmatch.com, I found the expected DNA matches with other individuals, including his half-brother Stuart.

The bottom line is that there were absolutely no surprises in the results of Peter’s DNA test.