

**Supplementary Table 2. Identified breast cancer associated variants in affected 71 individuals.**

Gene/ Exon/Intron/UTR	Nucleotide change <sup>a</sup>	Effect on protein	rs Number <sup>b</sup>	Carrier Frequency		P-values	OR;95%CI	Status
<b><i>BRCA1</i></b>								
Exon 18	5095C>T	Arg1699Trp	rs55770810	<b>0.014 (1/71)</b> TT 0 (0/71) CT 0.014 (1/71) CC 0.986 (70/71)	na	-	-	Reported <sup>c, d</sup>
<b><i>CHEK2</i></b>								
Exon 3	470T>C	Ile157Thr	-	<b>0.071 (5/70)</b> CC 0 (0/70) TC 0.071 (5/70) TT 0.929 (65/70)	0.055 (21/381) CC 0 (0/381) TC 0.055 (21/381) TT 0.945 (360/381)	<b>0.578</b>	<b>1.32; 0.48-3.62</b>	Reported <sup>e</sup>
Exon 10	1100delC <sup>f</sup>	Fs, stop at codon 381	-	<b>0.042(3/71)</b>	0.016 (6/380)	<b>0.155</b>	<b>2.75; 0.67-11.26</b>	Reported <sup>e</sup>

CI: confidence interval, Fs: frameshift, na: not analyzed, OR:odds ratio. <sup>a</sup>The reference sequences were obtained from the UCSC Genome Browser [44] and the accession numbers were following: *BRCA1*: [UCSC Genome Browser:NM\_007295.2] and *CHEK2*: [UCSC Genome Browser:NM\_007194.3]. The accession numbers for the protein sequences obtained from the Swiss-Prot Protein knowledgebase [45] were following: *BRCA1*: [Swiss-Prot:P38398] and *CHEK2*: [Swiss-Prot:O96017], <sup>b</sup>The RefSNP number, obtained from the NCBI Single Nucleotide Polymorphism database (dbSNP) [46]. <sup>c</sup>The NCBI dbSNP [46]. <sup>d</sup>The Breast Cancer Information Core database [47]. <sup>e</sup>Reported in the Finnish population by Vahteristo et al.[11]. <sup>f</sup>Heterozygous deletion or insertion.