

Table S1. The genotypes identified in this study among Russian patients carrying pathogenic or probably pathogenic gene variants.

Gene	Genotype		Effect		ClinVar ID, The ClinVar accession numbers ⁶		Type of Inheritance	Number of Patients	Phenotype
	Allele 1	Allele 2	Allele 1	Allele 2	Allele 1	Allele 2			
ADGRV1	c.6610C>T	c.10198C>T	p.Gln2204*	p.Gln3400*	this study, SCV002754430	this study, SCV002754431	AR	1	SN NSHL
MYO15A	c.6046+1G>A	c.8910del	splice	p.Val2971fs*63	VCV000164536	this study, SCV002754432	AR	1	SN NSHL
MYO7A	c.1738_1745del	c.5573T>C	p.Val581Leufs*28	p.Leu1858Pro	this study, SCV002754433	VCV000043288	AR	1	SN NSHL
MYO7A	c.2558G>A	wt	p.Arg853His	wt	VCV000043186	-	AD	1	SN NSHL
MYO7A	c.2557C>T	wt	p.Arg853Cys	wt	VCV001333565	-	AD	1	SN NSHL
MYO7A	c.3262C>T	c.3893G>A	p.Gln1088*	p.Gly1298Glu	VCV000371695	this study, SCV002754434	AR	1	SN NSHL
MYO7A	c.3612_3615del	c.4528G>A	p.Ser1205Argfs*26	p.Glu1510Lys	this study, SCV002754435	this study, SCV002754436	AR	1	SN NSHL
OTOA	c.562_569dup	g.(?_21624041)_(21730798_?)del	p.Phe191fs*48	del(OTOA)	this study, SCV002754437	VCV000003561	AR	1	SN NSHL
OTOF	c.2656del	c.2656del	p.Val886Serfs*114	p.Val886Serfs*114	this study ^c , SCV002754438	this study ^c , SCV002754438	AR	1	SN NSHL+AN
OTOF	c.4799+1G>A	c.3192C>G	splice	p.Tyr1064*	VCV000164841	SCV002754442	AR	1	SN NSHL+AN
OTOF	c.5169_5170del	c.4903A>T	p.Ile1724Leufs*19	p.Arg1635*	this study ^c , SCV002754439	this study ^c , SCV002754440	AR	1	SN NSHL+AN
OTOF	c.4903A>T	c.2214+5G>C	p.Arg1635*	splice	this study ^c ,	this study ^c ,	AR	1	SN

						SCV002754440	SCV002754441		NSHL+AN
<i>POU3F4</i>	c.916C>T	-	p.Gln306*	-	SCV002754444	-	XLR	1	SN NSHL
<i>POU3F4</i>	c.983A>G	-	p.Asn328Ser	-	this study, SCV002754443	-	XLR	1	SN NSHL
<i>PTPRQ</i>	c.1291C>T	c.2726del	p.Arg431*	p.Glu909Glyfs*15	this study, SCV002754445	SCV002754446	AR	1	SN NSHL
<i>SLC26A4</i>	c.85G>C	c.107A>C	p.Glu29Gln	p.His36Pro	VCV000004839	this study, SCV002754447	AR	2	SN NSHL,SN NSHL+EV A
<i>SLC26A4</i>	c.1262A>G	c.107A>C	p.Gln421Arg	p.His36Pro	VCV000430229	this study, SCV002754447	AR	1	SN NSHL
<i>SLC26A4</i>	c.1001G>T	c.208C>T	p.Gly334Val (splice)	p.Pro70Ser	VCV000189039	this study, SCV002754448	AR	1	SN NSHL+EV A
<i>SLC26A4</i>	c.1001G>T	c.1001G>T	p.Gly334Val, HC	p.Gly334Val (splice)	VCV000189039	VCV000189039	AR	1	SN NSHL
<i>SLC26A4</i>	c.1229C>T	c.317C>A	p.Thr410Met	p.Ala106Asp	VCV000043498	VCV001065204	AR	1	SN NSHL+EV A
<i>STRC</i>	c.2171_2174del	g.(?_43890333)_ (43940887_?)del	p.Val724Glyfs*6	del(STRC-CKMT1B - CATSPER2)	VCV000004344	VCV000688049	AR	3	SN NSHL
<i>STRC</i>	c.2171_2174del	g.(?_43906612)_ (43906674_?)?del	p.Val724Glyfs*6	delSTRC,ex5	VCV000004344	this study ^c , SCV002754455	AR	1	SN NSHL
<i>STRC</i>	g.(?_43890333)_ (43940887_?)del	g.(?_43890333)_ (43940887_?)del	del(STRC-CKMT1B - CATSPER2)	del(STRC-CKMT1B - CATSPER2)	VCV000688049	VCV000688049	AR	5	SN NSHL
<i>STRC</i>	g.(?_43890333)_ (43940887_?)del	g.(?_43890333)_ (43897714_?)del	del(STRC-CKMT1B - CATSPER2)	del(STRC- CKMT1B)	VCV000688049	SCV002754456	AR	2	SN NSHL
<i>STRC</i>	g.(?_43890333)_ (43940887_?)del	g.(?_43890333)_ (43893072_?)del	del(STRC-CKMT1B - CATSPER2)	delSTRC,ex25	VCV000688049	SCV002754457	AR	1	SN NSHL

<i>STRC</i>	c.4402C>T	g.(?_43890333)_ (43940887_?)del	p.Arg1468*	del(STRC-CKMT1B - CATSPER2)	VCV000179758	VCV00068804 9	AR	1	SN NSHL
<i>STRC</i>	c.4057C>T	g.(?_43890333)_ (43940887_?)del	p.Gln1353*	del(STRC-CKMT1B - CATSPER2)	VCV000242391	VCV00068804 9	AR	1	SN NSHL
<i>TECTA</i>	c.5597C>T	wt	p.Thr1866Met	wt	VCV000236058	-	AD	1	SN NSHL
<i>TECTA</i>	c.1756C>T	c.2458A>T	p.Arg586*	p.Lys820*	VCV001704157	this study, SCV00275444 9	AR	1	SN NSHL
<i>TMC1</i>	c.1750C>T	c.1250G>A	p.Gln584*	p.Gly417Glu	this study, SCV002754450	SCV002754451	AR	1	SN NSHL
<i>TMPRSS</i> 3	c.413C>A	c.208del	p.Ala138Glu	p.His70fs*19	VCV000046119	VCV00016549 2	AR	1	SN NSHL
<i>TMPRSS</i> 3	c.310G>A	c.46C>T	p.Glu104Lys	p.Arg16*	VCV000504522	VCV00121002 8	AR	1	SN NSHL
<i>USH2A</i>	c.11864G>A	c.11864G>A	p.Trp3955*	p.Trp3955*	VCV000002357	VCV00000235 7	AR	2	SN NSHL
<i>USH2A</i>	c.11864G>A	c.14365C>T	p.Trp3955*	p.Gln4789*	VCV000002357	VCV00081698 7	AR	1	SN NSHL
<i>USH2A</i>	c.11864G>A	c.1606T>C	p.Trp3955*	p.Cys536Arg	VCV000002357	VCV00004847 1	AR	1	SN NSHL
<i>USH2A</i>	c.12234_12235de 1	c.12234_12235del	p.Asn4079Trpfs*19	p.Asn4079Trpfs*19	VCV000096665	VCV00009666 5	AR	1	SN NSHL
<i>USH2A</i>	c.11864G>A	g.(?_216270461)_ (216260162_?)del	p.Trp3955*	delUSH2A,ex22-24.	VCV000002357	SCV002754454	AR	1	SN NSHL
<i>USH2A</i>	c.11864G>A	g.(?_216108034)_ (216108100_?)de 1	p.Trp3955*	delUSH2A,ex38	VCV000002357	this study^c, SCV00275445 2	AR	1	SN NSHL
<i>USH2A</i>	c.2610C>A	g. (?_216462679)_ (216462739_?)del	p.Cys870*	delUSH2A,ex11	VCV000557167	this study^c, SCV00275445 3	AR	1	SN NSHL

Bold font indicates the variants identified for the first time; a—designations are given in accordance with the ACMG recommendations for the interpretation and classification of nucleotide sequence variants [21,22]; b—"VCV-" corresponds to the variant description identification numbers (ClinVarID) in the ClinVar database, —"SCV-" corresponds to the variant accession numbers in the ClinVar database; "rs-" in the dbSNP database; c—variants identified in the same patients are presented in the articles by Markova et al. and Lalayants et al. [14-16]; inheritance type:

AD—autosomal dominant; AR—autosomal recessive; XLR—X-linked recessive; SN NSHL—sensorineural NSHL; SN NSHL+EVA—SN NSHL with enlarged vestibular aqueduct; SN NSHL+AN—SN NSHL with auditory neuropathy.