

## Supplemental Data

# Mutation Spectrum of *STAR* and the Founder Effect of p.Q258\* in Korean Patients with Congenital Lipoid Adrenal Hyperplasia

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**Supplementary Table S1.** Karyotype and mutations in the *STAR* gene of 45 patients from 42 families.

Family number	Patient number	Sex of rearing	Karyotype	STAR gene	
				Allele 1	Allele 2
1	1*	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
2	2*	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
3	3	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
4	4	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
5	5*	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
6	6	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
7	7	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
8	8	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
9	9	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
10	10	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
10	11	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
11	12*	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
12	13*	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
13	14	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
14	15	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
15	16	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
16	17	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
16	18	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
17	19	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
18	20	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
19	21	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
20	22	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
21	23	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
22	24	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
23	25	F	46,XY	c.772C>T (p.Q258*)	c.545G>A (p.R182H)
24	26	F	46,XY	c.772C>T (p.Q258*)	c.653C>T
25	27	F	46,XY	c.745-6_810del	c.653C>T
26	28	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
27	29*	F	46,XX	c.772C>T (p.Q258*)	c.559G>A (p.V187M)
28	30	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
29	31	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)

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Supplementary Table S1. Continued.

Family number	Patient number	Sex of rearing	Karyotype	STAR gene	
				Allele 1	Allele 2
30	32	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
31	33	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
32	34 <sup>+</sup>	M	46,XY	c.772C>T (p.Q258*)	c.815G>A (p.R272H)
33	35*	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
34	36	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
35	37*, <sup>+</sup>	F	46,XX	c.772C>T (p.Q258*)	c.815G>A (p.R272H)
36	38	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
37	39	F	46,XX	c.772C>T (p.Q258*)	c.543C>T (p.R182C)
37	40	F	46,XX	c.772C>T (p.Q258*)	c.543C>T (p.R182C)
38	41	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
39	42	F	46,XX	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
40	43*, <sup>+</sup>	F	46,XX	c.772C>T (p.Q258*)	c.559G>A (p.V187M)
41	44*	F	46,XY	c.772C>T (p.Q258*)	c.772C>T (p.Q258*)
42	45*	F	46,XX	c.772C>T (p.Q258*)	c.407del (p.E136Gfs*50)

, indicates the patients who were included in this study; <sup>+</sup>, indicates nonclassical late onset CLAH patients

**Supplementary Table S2.** Haplotype analysis of individuals with mutations in the STAR gene.

	Physical position on chromosome 8 (hg19)	Patient 1	Patient 2	Patient 3	Patient 4	Patient 5	Patient 6	Patient 7	Patient 8	Patient 9	Patient 10
8	rs6986132	37815009	CC								
8	rs802170	37815121	TT	AT	TT						
8	rs1892818	37817175	GG								
8	rs4998	37821486	CC	GC	GC						
8	rs4994	37823798	CC	TC							
8	rs2298423	37834312	CC	CC	CC	CC	AC	CC	CC	AC	AC
8	rs73674110	37845945	AA								
8	rs2186458	37854599	GG	TG	GG						
8	rs58656606	37864599	AA	AA	AA	AA	CA	AA	AA	CA	CA
8	rs6605630	37869772	GG	GG	GG	GG	AG	GG	GG	AG	AG
8	rs73674118	37870395	GG								
8	rs59709543	37870582	GG	GG	GG	GG	AG	GG	GG	AG	AG
8	rs28813686	37883438	CC								
8	rs28797500	37884310	CC								
8	rs3813521	37887422	CC								
8	rs28368989	37889785	TT								
8	rs28377666	37899702	GG								
8	rs6605631	37902453	AA								
8	rs28570677	37908814	GG								
8	rs7816482	37923459	TT	TT	TT	TT	CT	TT	TT	TT	TT
8	rs78758900	37930661	GG	GG	GG	GG	AG	GG	GG	GG	GG
8	rs28877647	37946551	GG								
8	rs2073351	37963239	GG								
8	rs2843743	37976368	GG	AG	AG						
8	rs2517388	37977732	TT	GT	GT						
8	rs2720044	37980587	AA								
8	rs2843740	37985897	GG	GG	GG	GG	AG	GG	GG	AG	AG
8	rs2517397	37992515	TT	TT	TT	TT	CT	TT	TT	TT	TT
8	rs63215562	37999998	TT	CT	CT						
8	rs28361934	38000804	TT								
8	rs35045158	38001335	CC								
8	rs34575008	38001561	AA								
8	rs16887217	38004425	TT								
8	rs2720049	38004911	GG								
8	rs7819423	38004975	AA								
8	rs72552290	38006184	CC								
8	rs6474491	38013848	TT								

\*Shared haplotype of each patient from paternal or maternal alleles are marked by gray color.

The father of patient 5, the mother of patient 9, and the mother of patient 10 are carriers of the p.V187M, p.R272H, and p.E136Gfs\*50, respectively. The other parents are carriers of p.Q258\*.