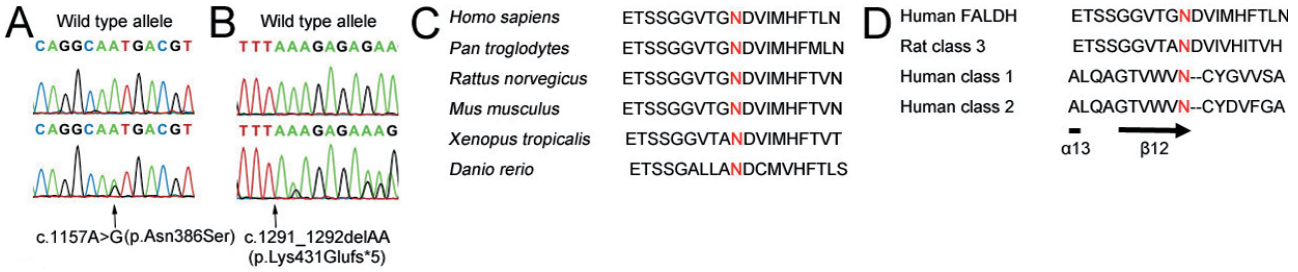

Fig. S1. ALDH3A2 mutations in the patient with Sjögren-Larsson syndrome and sequence alignments around the missense mutation. (A) Direct sequencing reveals a heterozygous c.1157A>G (p.N386S) transition in exon 8 of the *ALDH3A2* gene in the patients and their mother, but not in their father or normal control samples. (B) A heterozygous c.1291_1292delAA (p.Lys431Glufs*5) mutation is found in exon 9 of *ALDH3A2* in the patients and their father, but not in their mother or in normal controls. (C) Fatty aldehyde dehydrogenase (FALDH) amino-acid sequence alignment shows the level of conservation in diverse species of the amino-acid N386 (*red characters*), which was altered by the missense mutation in the present family. (D) A sequence alignment between the FALDH, rat class 3 and human class 1 and class 2 ALDHs showing the relative locations of key residues in these enzymes. The asparagine residue at codon 386 of FALDH is strictly conserved (*red characters*). Secondary structure components found in the class 3 rat ALDH structure are indicated with a bar and an arrow. The bar represents the α-helix and arrow represents β-strands. (Modified from Liu et al. (7)).