

Fig. S1 a, Full-length *ORSF21* gene sequences amplified from *Senecio squalidus* genomic DNA. The *S*-genotype of the individual is indicated above each lane. b, Restriction digestion of cloned *S. squalidus* genomic *ORSF21* sequences with the restriction endonucleases *HindIII* and *RsaI*. The genotypes used were: Lanes 1–4, S_1S_2 ; lanes 5–8, S_1S_3 ; lanes 9–12, S_1S_6 ; lanes 13–15, S_1S_4 . The sequences were cloned from PCR products shown in a. In the case of genotypes S_1S_2 and S_1S_4 , the smaller PCR products (white arrows) were cloned

Fig. S2 a, 3D model of the SF21 protein, based on structural similarity to the hydrolase protein family. b, functionally similar sites between ORSF21 and a hydrolase signalling protein, RsbQ (Kaneko et al. 2005). Model produced using Phyre software (Kelley et al. 2000).



