

Figure S1 PPI network of the DEGs in MEPM cells. PPI, protein-protein interaction; DEGs, differentially expressed genes; MPEM, mouse embryonic palatal mesenchymal.



**Figure S2** Validation of RNA-Seq results by qRT-PCR. (A,C) *Saa3* and *Cxcl5* were uniquely decreased in β-catenin silenced MEPM cells compared to NC group, (B,D) while Saa3 and Cxcl5 exhibited significantly upregulated mRNA expression level in β-catenin overexpressed MEPM cells. Data are presented as mean ± SD. \*P<0.05, \*\*P<0.01, \*\*\*P<0.001. NC, negative control; KD, knockdown; MEPM, mouse embryonic palatal mesenchymal; qRT-PCR, quantitative real-time polymerase chain reaction.

Table S1 The detailed primer sequences were as follows

Gene	Sequence (5'-3')
β-catenin	F: AGGAATGAAGGCGTGGCAACATAC
	R: GGCACCAATGTCCAGTCCAAGATC
Saa3	F: AGAGAGGCTGTTCAGAAGTTCA
	R: AGCAGGTCGGAAGTGGTTG
Cxcl5	F: TGCGTTGTGTTTGCTTAACCG
	R: CTTCCACCGTAGGGCACTG
GAPDH	F: GGTTGTCTCCTGCGACTTCA
	R: TGGTCCAGGGTTTCTTACTCC