Impaired autophagic degradation of transforming growth factor-β-induced protein by macrophages in lattice corneal dystrophy

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Figure 1

(A) RT-PCR and Western blot (WB) detection of CD11b and CD14 expression in macrophages isolated from peripheral bloods of people with TGFBIP gene mutation. (B) RT-PCR and WB detection of TGFBIp expression in macrophages isolated from peripheral bloods of people with TGFBIP gene mutation. (C) The morphology of the recombinant mutant TGFBIp (rMU-TGFBIp) and wild type TGFBIp (rWT-TGFBIp) detected
by transmission electron microscope. (D) TGFBIp uptake into macrophages isolated from the normal subject (not TGFB1 gene mutation) was detected by WB. (E) The colocalization of TGFBIp, LC3 and LAMP1 in the macrophages exposed to MU and WT TGFBIp were observed by confocal microscopy. (F) The TGFBIp concentration in the culture medium was detected by WB using an anti-6-His antibody.

Figure 2

(A) Macrophages from TGFB1 mutation objects were exposed to only MU TGFBIp (MU) or WT TGFBIp combining with RNA interfering against Beclin 1 (siWT) as shown in Fig. 3A. CD68 and CD36 at indicated time points were detected by Western blotting (WB). (B) The expressions of CD68 and CD36 in macrophages from TGFB1 mutation objects that do not expose to any MU or WT TGFBIp.