



Figure. S1. Bcl-2 regulated the CQ-induced and CQ-NaHCO<sub>3</sub>-loaded HMs-induced autophagic cell death. Representative images and quantification of autophagic cell death induced through CQ or CQ-NaHCO<sub>3</sub>-loaded PLGA HMs. Flag-vBcl-2-transfected, Flag-Mito-Bcl-2-transfected and Flag-ER-Bcl-2-transfected MCF-7 cells were treated with 60  $\mu$ M CQ or 300  $\mu$ g/mL CQ-NaHCO<sub>3</sub>-loaded (equal to 30  $\mu$ M CQ) PLGA HMs for 48 h. Scale bars: 10  $\mu$ m. Scale bars: 10  $\mu$ m. Red arrows: autophagic death, white arrows: autophagosome apoptosis, blue arrows: apoptosis. The data are shown as the means  $\pm$  S.E.M. \* $P$ <0.05, \*\*  $P$ <0.01, \*\*\*  $P$ <0.001 compared with the controls.