

Supplemental Figure Legends

Supplemental Figure 1. Confirmation of mitochondrial purity and integrality. (A) Western blot was used to check the mitochondrial characterizations using prohibitin antibody as the mitochondrial biomarker, and GAPDH antibody as the cytoplasm biomarker. The labels of L, H and K represent liver, heart and kidney, respectively. (B) TEM images of mitochondrial preparations from heart, kidney and liver.

Supplemental Figure 2. Comparison of the images of confocal microscopy for the CHANG cells treated with/without alcohol

Supplemental Figure 3. Assay of AKR enzyme activity. The mitochondrial proteins of rat liver, kidney and heart were suspended in PB buffer, and the same amount mitochondrial proteins from different tissues were loaded to the reaction buffer, respectively. After the reaction was initialized by NBA, the AKR enzyme activity was measured by monitoring NADPH absorbance changes at 340nm within 3m.