Supplemental Data

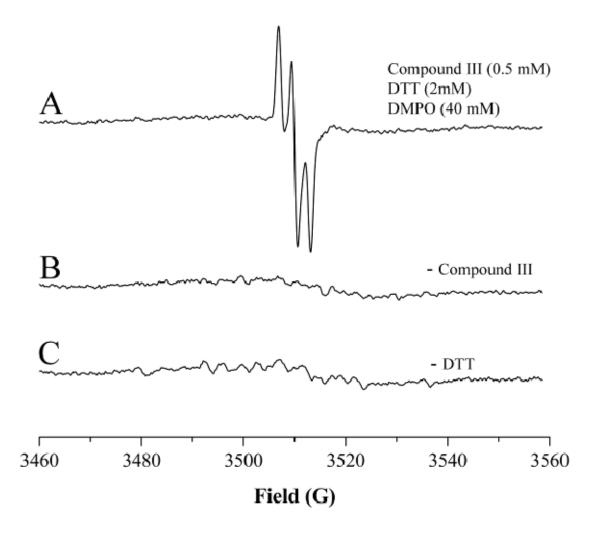


Figure S1. ESR spin trapping of compound III-derived radicals with DMPO. A. 0.5 mM compound III, 2 mM DTT and 40 mM DMPO in 50 mM NaCl, pH7.0, were mixed and transferred into 0.7 mm quartz capillary tubes. The experimental spectrum was recorded after signal averaging three scans at room temperature. **B.** Same as **A**, except that compound III was omitted from the system. **C.** Same as **A**, except that DTT was omitted from the system. ESR measurements were performed on a Bruker EMX-8/2.7 spectrometer (Bruker Instrument, Billerica, MA) operating at 9.857 GHz with 100 KHz modulation frequency. The samples were scanned at the following instrument settings: 100 G sweep width, 3.99×10^3 gain, 6.3 mW microwave power, 41.9 s sweep time, 0.164 s time constant, and 1.0 G modulation amplitude.

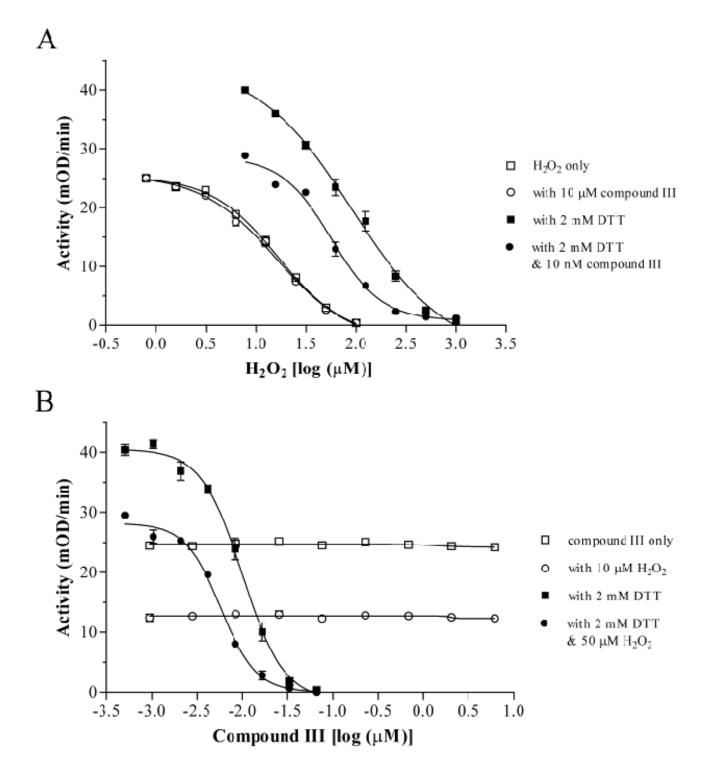


Figure S2. Interaction of compound III and H_2O_2 on inhibition of caspase-3. A. Dose-dependent curves of caspse-3 inhibited by H_2O_2 .Caspase-3 was incubated with 2 times-diluted H_2O_2 with (\bigcirc) or without (\square) compound III in 2 mM DTT-contained (solid) or DTT-free (hollow) assay buffer for 15 min at room temperature. The residual caspase-3 activity was determined after incubation. **B.** Dose-dependent curves of caspse-3 inhibited by compound III. Caspase-3 was incubated with 2 or 3 times-diluted compound III with (\bigcirc) or without (\square) H_2O_2 in 2 mM DTT-contained (solid) or DTT-free (hollow) assay buffer for 15 min at room temperature. The residual caspase-3 activity was determined after incubation.