Kit Specificity
This assay kit contains antibodies which recognize invariant epitopes on PERK. The protein detected by this kit corresponds to UniProt ID Q9Z2B5. PERK is also known as EIF2AK3 and eukaryotic translation initiation factor 2 alpha kinase 3. These antibodies recognize PERK of human and mouse origin. Other species should be tested on a case-by-case basis.

Control Lysate Information
Positive Control Lysate: Prepared from L929 cells, cultured to confluence in T175 flasks in 10% FBS containing medium. Cells were treated with 500 nM Thapsigargin for 20 minutes at 37°C and lysed in 4 mL of SureFire Ultra Lysis Buffer.

Representative Data
Data obtained with a 2-plate, 2-incubation protocol. L929 cells were plated overnight at 40K cells/well. Cells were treated with Thapsigargin at the indicated concentrations for 20 minutes in complete media. Cells were lysed with SureFire Ultra Lysis Buffer and assayed separately for Total and Phospho (Thr980) PERK, using respective SureFire Ultra kits. Equivalent to approximately 8,000 cells/datapoint.