Figure S1. Relationship between amino acids concertation (g/100 g of seeds) and protein concentration (g / 100 g of seeds) in seed of mutant lines. Each point indicates the amino acid concentration in each mutant line. The r value represents the Pearson correlation.

Figure S2. Number of mutant lines with various concentrations of non- protein amino acids such as taurine, lanthionine, and ornithine etc. The x value indicates g/100 gram of dry seed sample. Total protein was extracted from 100 g of seeds and the amino acids were quantified. Control line (BTx623) is indicated by a red bar in each panel.