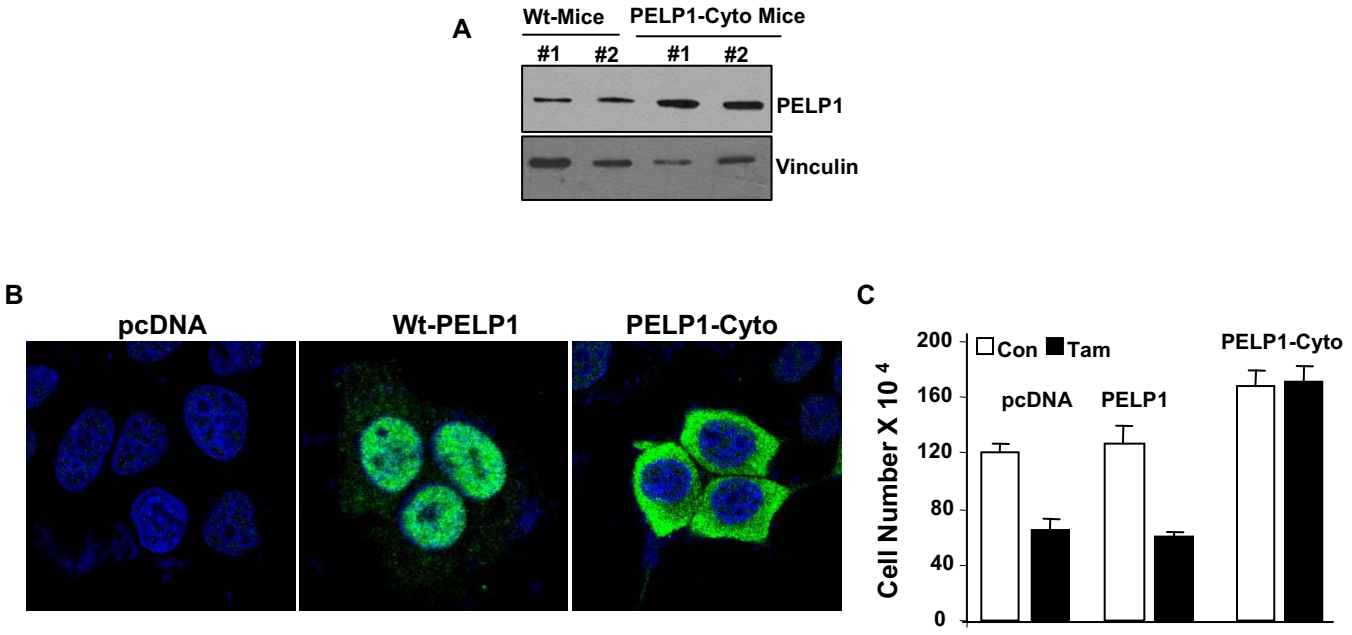
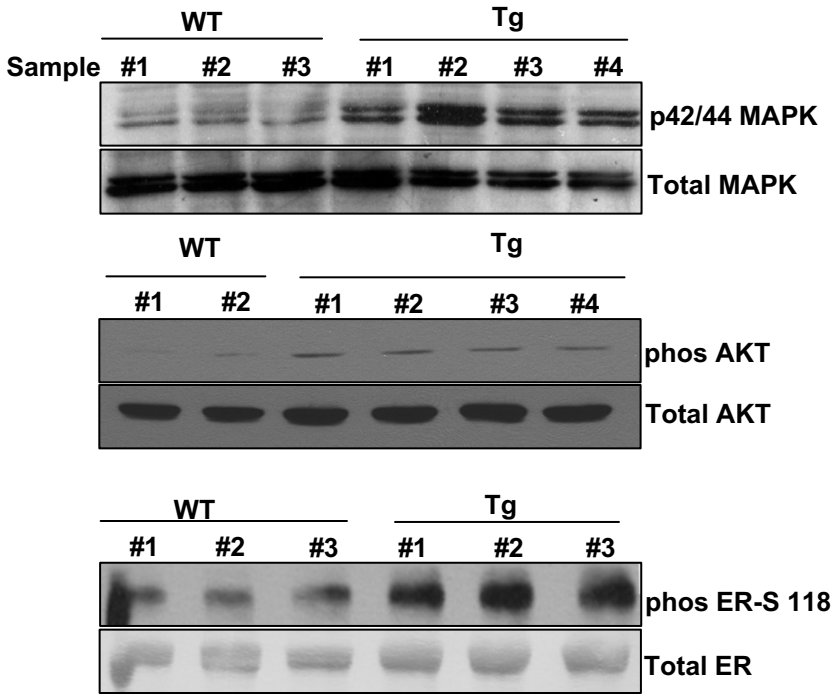
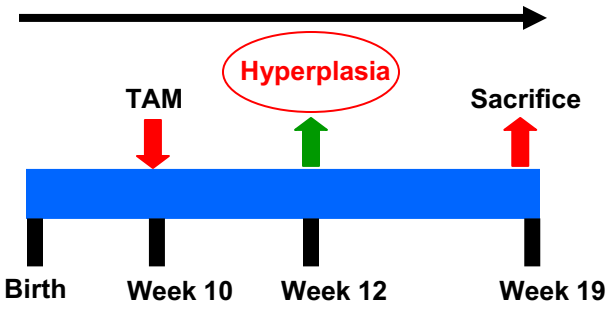


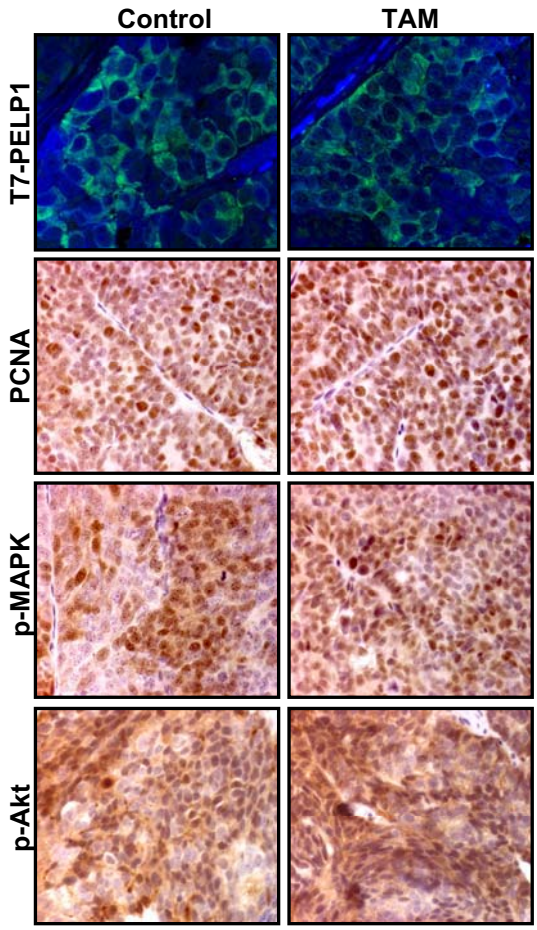

**Supplementary Figure 1.** A) Levels of PELP1 in Wt and PELP1-Cyto transgenic mice. B) MCF-7 cells expressing pcDNA,PELP1-WT or PELP1-cyto were cultured and fixed in methanol. The localization of T7-tagged PELP1 in these clones was analyzed by confocal microscopy using T7 mAb. C) pcDNA, PELP1-WTand PELP1-cyto–expressing clones were cultured in 5% DCC serum for 48 hours and treated with or without tamoxifen ($10^{-8}$ mol/L, *C*) for 5 days, and the cell number was determined.



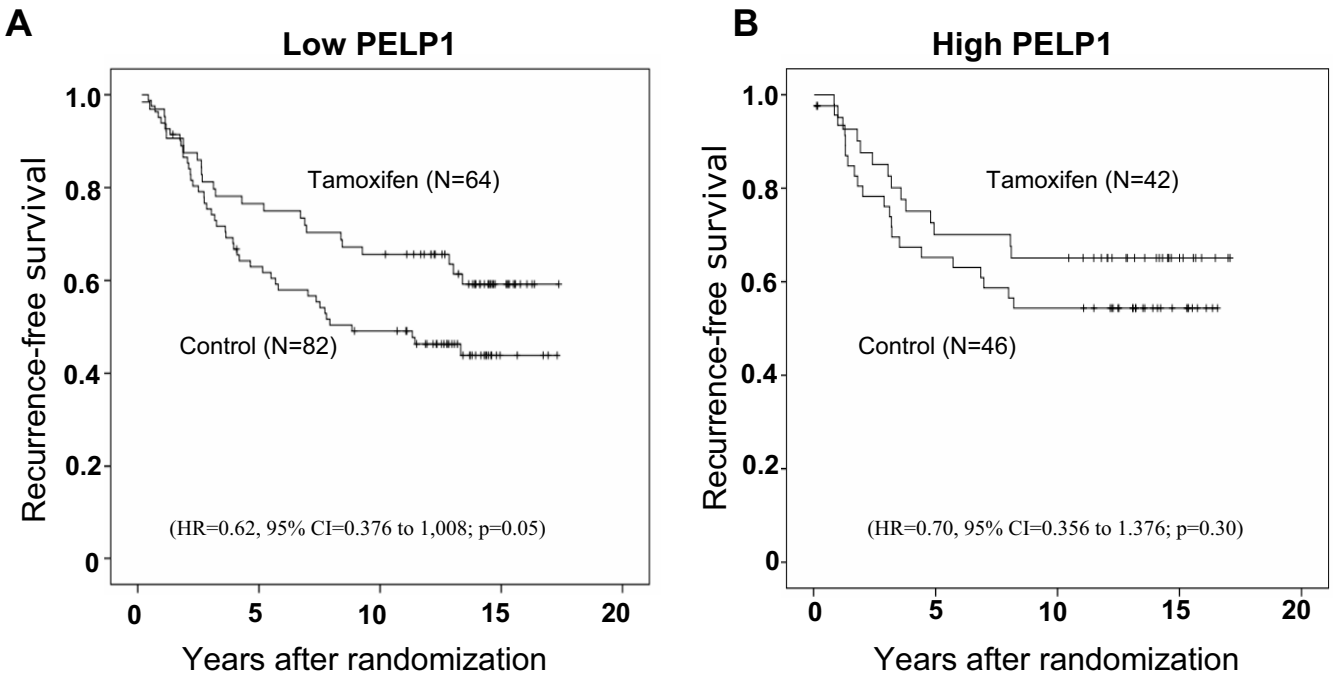

**Supplementary Figure 2.** Western blot analysis showing expression of phospho-MAPK, phospho-Akt, and phospho ER-serine 118 in mammary glands from WT and Tg mice.




**Supplementary Figure 3.** Schematic representation of the steps followed for evaluating the effect of TAM in PELP1-cyto transgenic mice.




**Supplementary Figure 4.** Immunohistochemical analysis showing staining of T7-PELP1, phospho MAPK, phospho Akt and PCNA in tumors from 4A.




**Supplementary Figure 5.** Recurrence-free survival was analyzed in relation to tamoxifen treatment for the two cytoplasmic PELP1 groups, i.e. low PELP1 and high PELP1, in ERα positive breast tumors. The low-expression group (A) showed a significant difference in tamoxifen treatment response (HR=0.62, 95% CI=0.376 to 1,008; p=0.05) whereas the high-expression group (B) did not (HR=0.70, 95% CI=0.356 to 1.376; p=0.30).