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Supplemental Data

The Plasminogen Fibrinolytic Pathway

Is Required for Hematopoietic Regeneration

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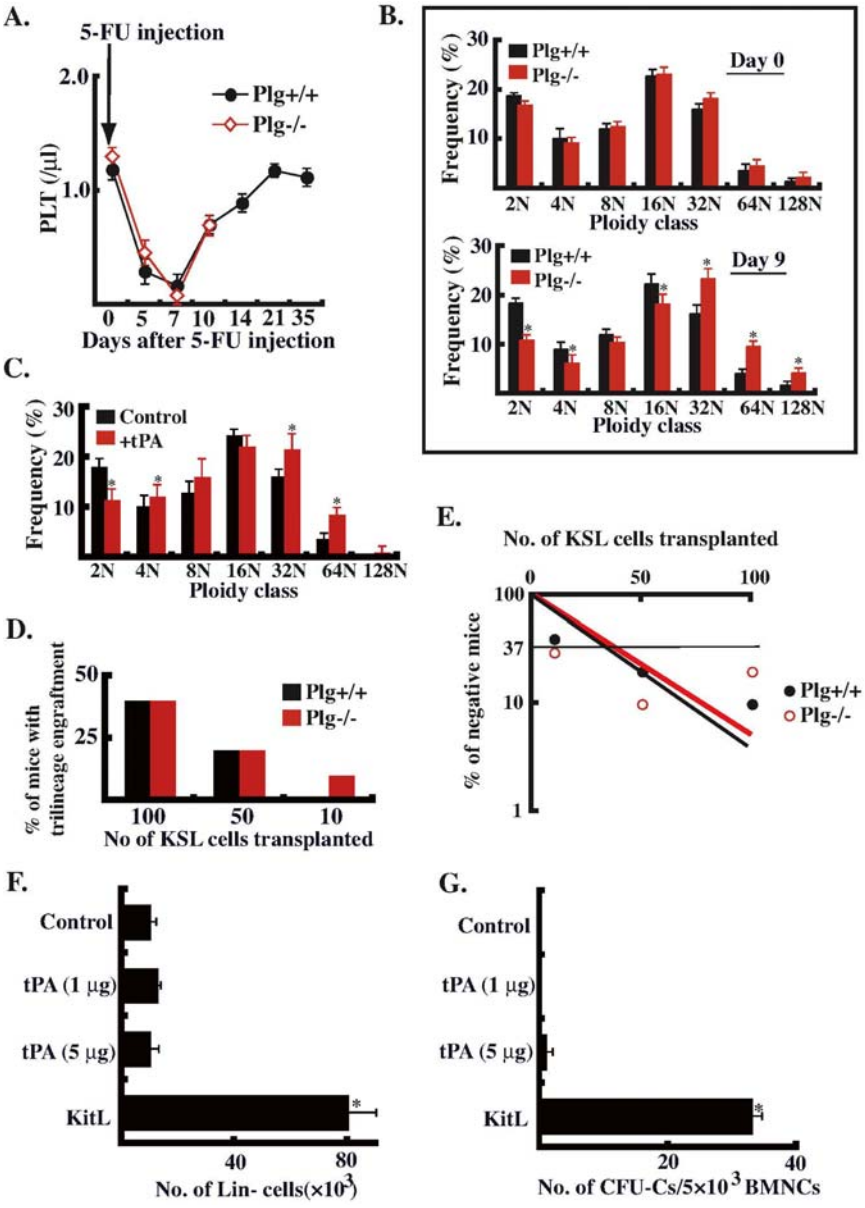

Figure S1. (A-B) Impaired megakaryopoiesis after myelosuppression in plasminogen (Plg) deficient mice. Plg+/+ (n=12) and Plg-/- mice (n=12) received a single dose of the myelosuppressive agent 5-FU i.v. (A) Platelets were counted using a Neubauer chamber. (B) BM cells were stained with propidium iodide (PI) and analyzed for cell ploidy by FACS. (C) BMMCs of tPA and non-tPA treated animals were stained with PI and analyzed for cell ploidy by FACS as indicated. (D-E) Functionally normal HSCs in Plg deficient mice. Lethally irradiated Ly-5.1 mice were injected with 10, 50 or 100 KSL (c-Kit+/Sca-1+/lin-) cells (1o recipient mice per cell concentration) from Plg+/+ and Plg-/- mice together with CD45.1 normal BM competitor cells. (D) After 7 month, the percentage of mice surviving and showing >5% CD45.2 cells in PB by FACS was determined. (E) Identical competitive repopulating units (at 37% of negative mice) for Plg+/+ and Plg-/- KSL cells. (F-G) tPA-mediated cell and progenitor proliferation does not occur in the absence of a stromal feeder layer. Lin- cells from Plg +/+ mice were cultured in the presence/absence of tPA with/without KitL in a suspension culture. After 4 days cells were harvested, (F) counted and (G) subjected into a progenitor assay (n=3). Error bars represent SEM.