Supplementary Information



Supplementary Figures

Figure S1. Ler sensitizes various cancer cells to PIs-mediated cell death (**A**) Cells were treated with the indicated concentrations of PIs and/or Ler for 24 h and cellular viability was assessed using <u>the</u> IncuCyte as described in Materials and Methods. The percentage of live cells was normalized to that of untreated control cells (100%). Data represent the means \pm S.D. (n = 7). One-way ANOVA and Bonferroni's post hoc test. * p < 0.001 vs PI treated cells. (**B**) Isoboles for the combination of PIs and Ler that proved iso-effective (IC₅₀) for inhibiting cell viability.



Figure S2. Combinations of each DHP and Btz selectively <u>induce</u> cell death in various cancer cells. (**A**) Cells were treated with the indicated concentrations of Btz and/or DHPs for 24 h and cellular viability was assessed using <u>the</u> IncuCyte as described in Materials and Methods. The percentage of live cells was normalized to that of untreated control cells (100%). Data represent the means \pm S.D. (n = 7). One-way ANOVA and Bonferroni's post hoc test. * p < 0.001 vs PI treated cells. (**B**) Isoboles for the combination of PIs and Ler that proved iso-effective (IC₅₀) for inhibiting cell viability.



Figure S3. Combination of Btz and Ler induces cytoplasmic vacuolation in various cancer cells. Cellular morphologies were observed by phase-contrast microscopy. Bars, 20 μ m. Cells were treated with Btz and/or Ler (for SNU-668 cells, 4 nM Btz and/or 10 μ M; for NCI-H460 cells, 15 nM Btz and/or Ler 10 μ M; for BxPC-3 cells, 20 nM and/or 10 μ M Ler) for 24 h. Bars, 20 μ m.



Figure S4. Btz/Ler-induced dilation of mitochondria and the ER does not depend on apoptosis, necroptosis, ferroptosis, or autophagy. YFP-ER cells were untreated or pretreated with 2 μ M CHX, 20 μ M z-VAD, 20 μ M Nec-1, 1 μ M Fer-1, 0.25 mM 3-MA, or 10 nM BafA1 and further treated with 4 nM Btz and/or 10 μ M Ler for 12 h. Cells were stained with MTR and observed by confocal microscopy. Bars, 20 μ m.