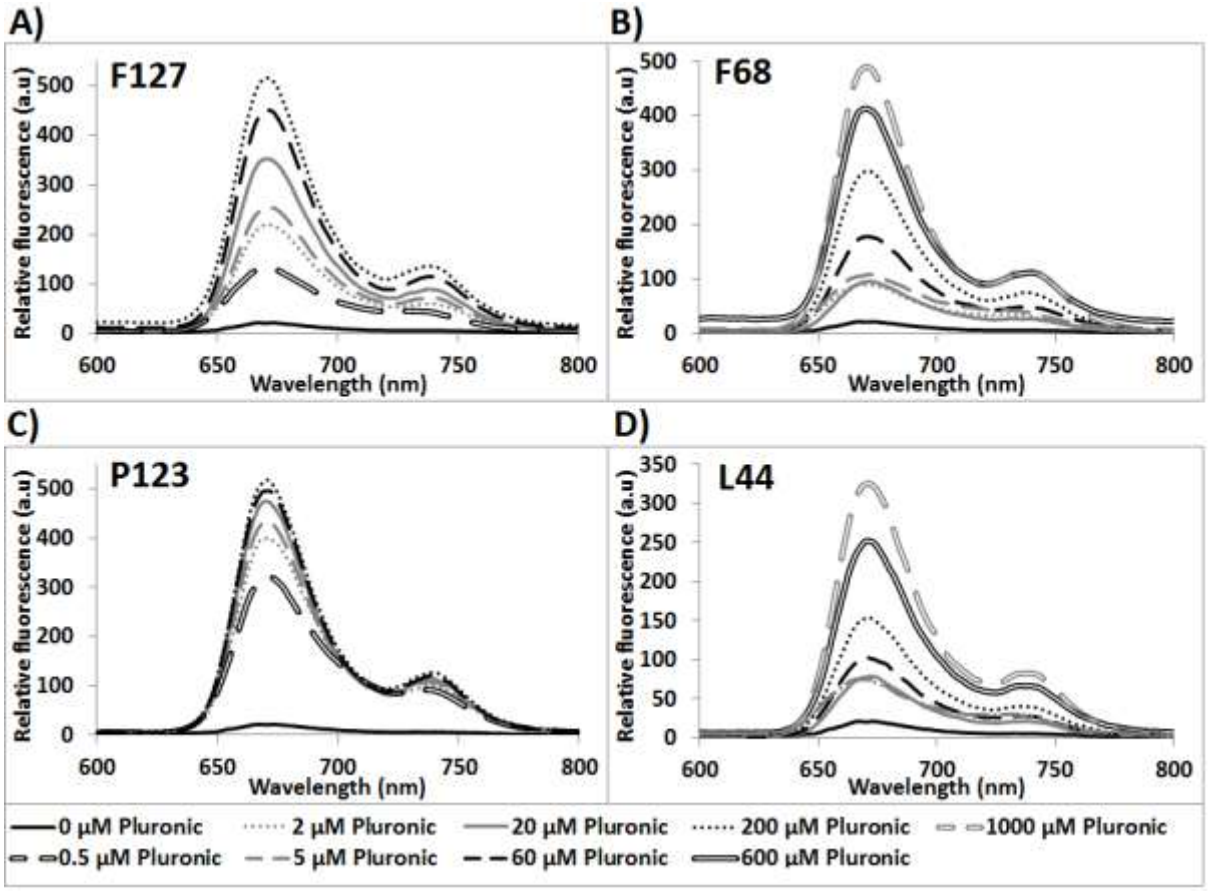
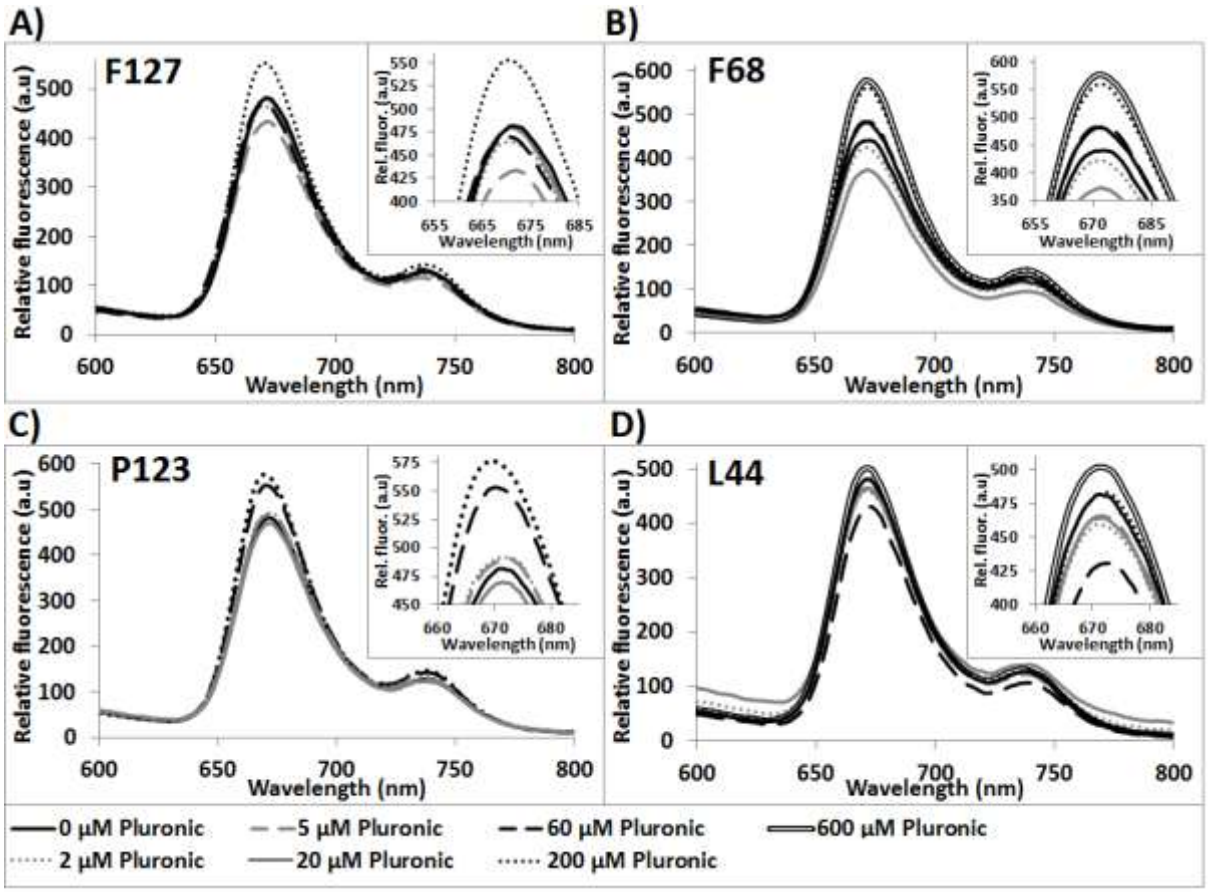
Supplementary data

Fig. S1



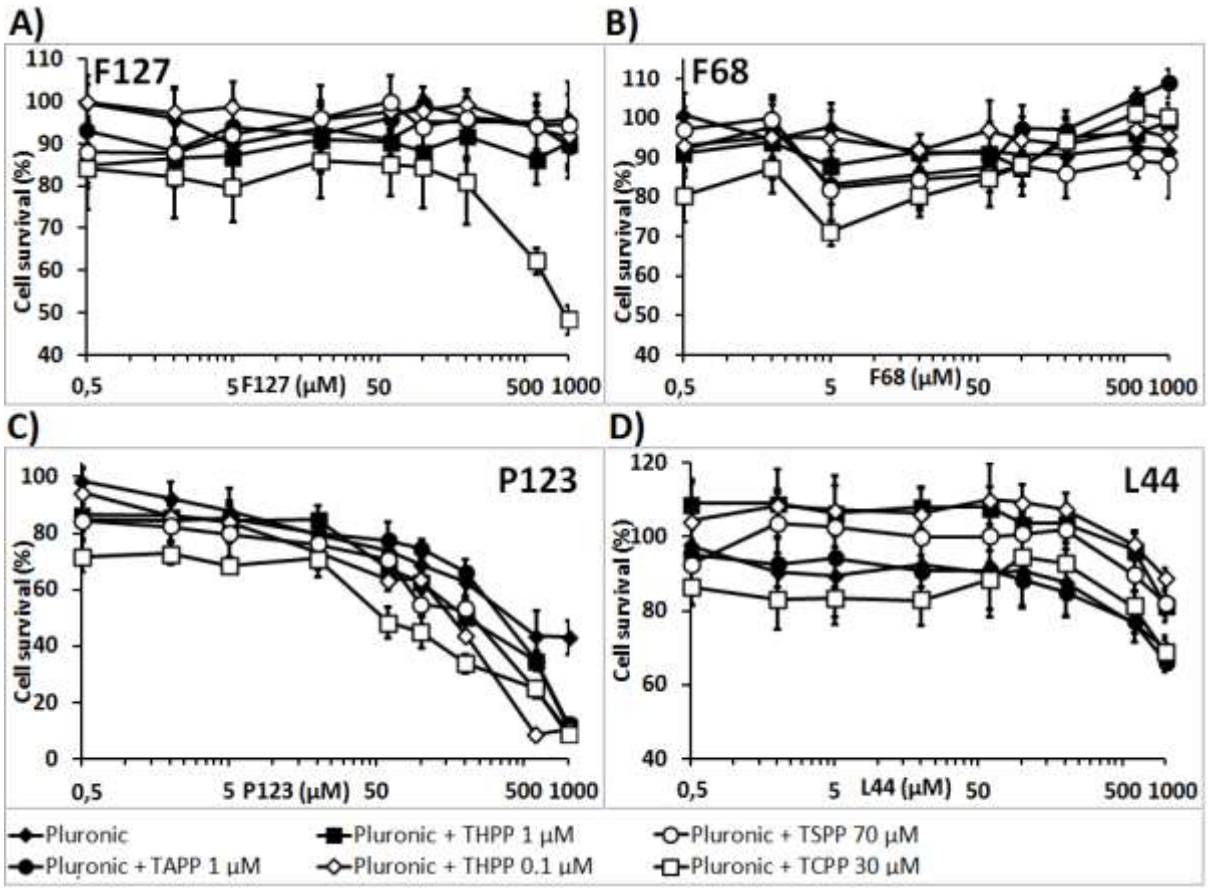
Fluorescence emission spectra (λ_{ex} = 423 nm) of THPP (0.05 µM) in PBS solubilized by F127 (A), F68 (B), P123 (C) or L44 (D). One fluorescence spectrum, representative for 5 replicate experiments is presented.

Fig. S2



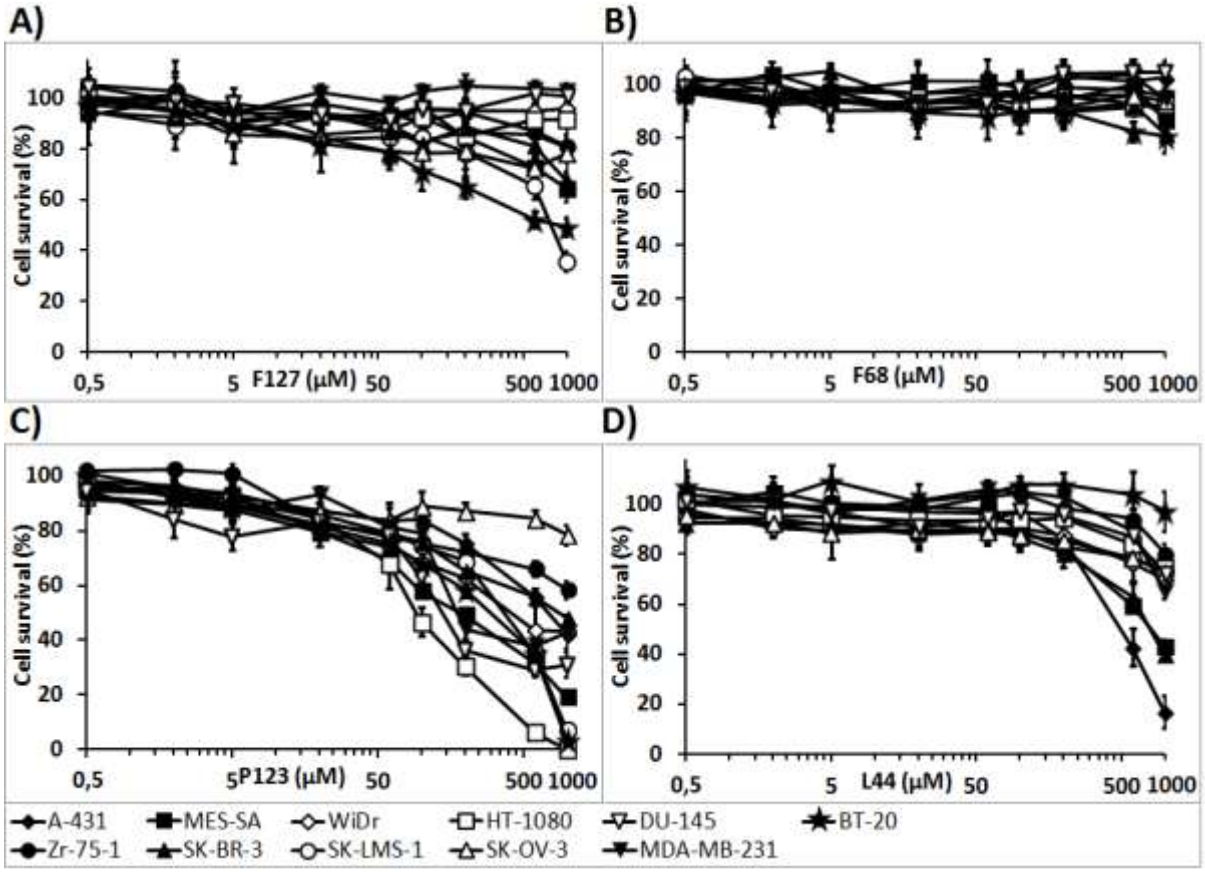
Fluorescence emission spectra (λ_{ex} = 423 nm) of THPP (0.05 µM) in 10 % FCS in PBS solubilized by F127 (A), F68 (B), P123 (C) or L44 (D). One fluorescence spectrum, representative for 5 replicate experiments is presented. Insets present the main fluorescence emission band. Rel. fluor. = Relative fluorescence.

Fig. S3



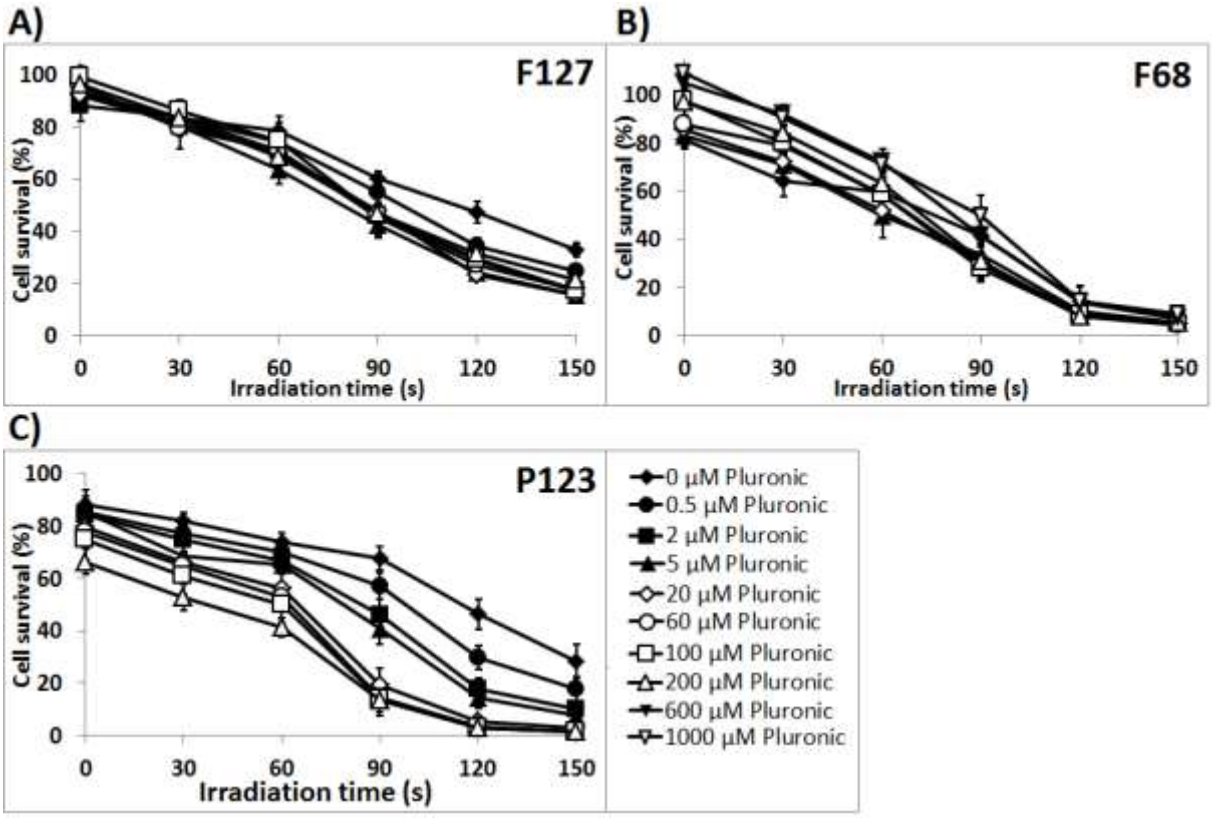
Cell survival of WiDr cells after 18 hours treatment in the dark with Pluronics alone and in combination with four different PS as indicated on the figure. Horizontal axes are presented in a logarithmic scale. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S4



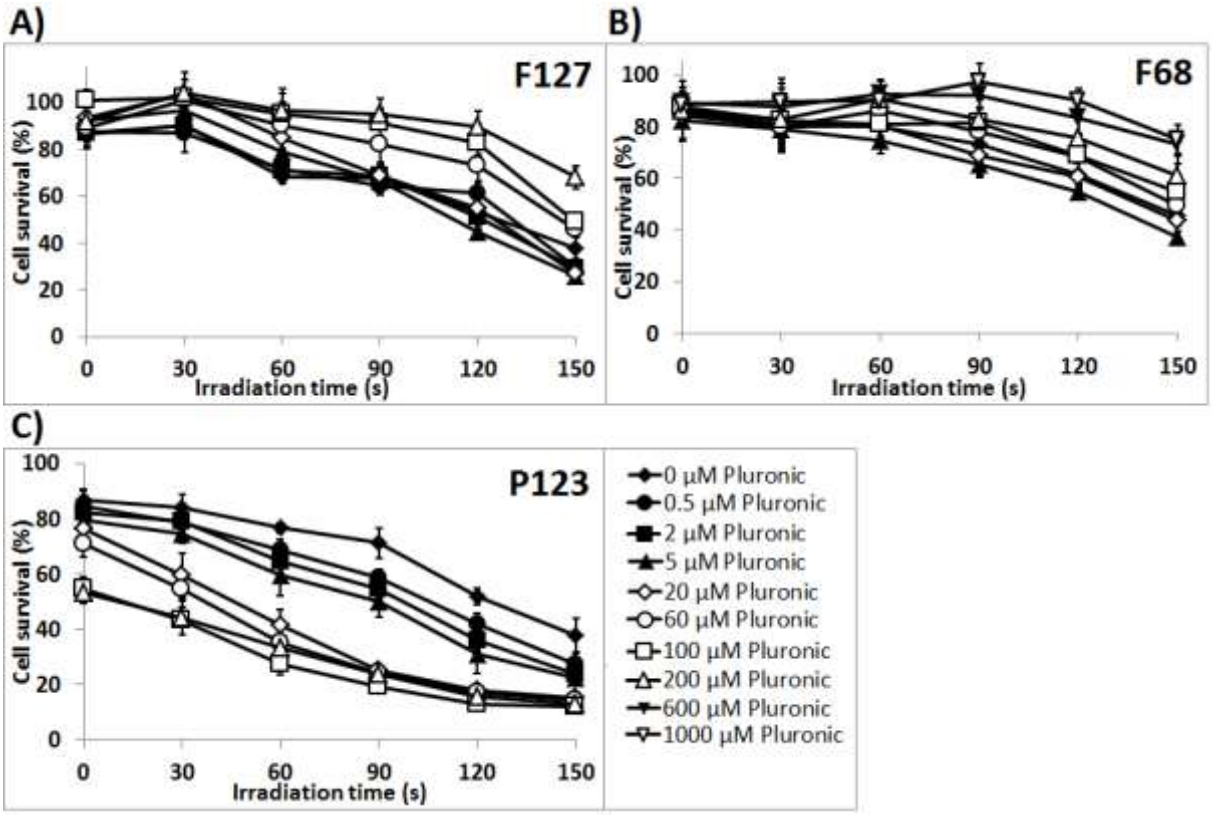
Cell survival of 11 different cancer cell lines as a function of Pluronic (as indicated on the figure) concentration after 18 hours treatment in the dark. Horizontal axes are presented in a logarithmic scale. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S5



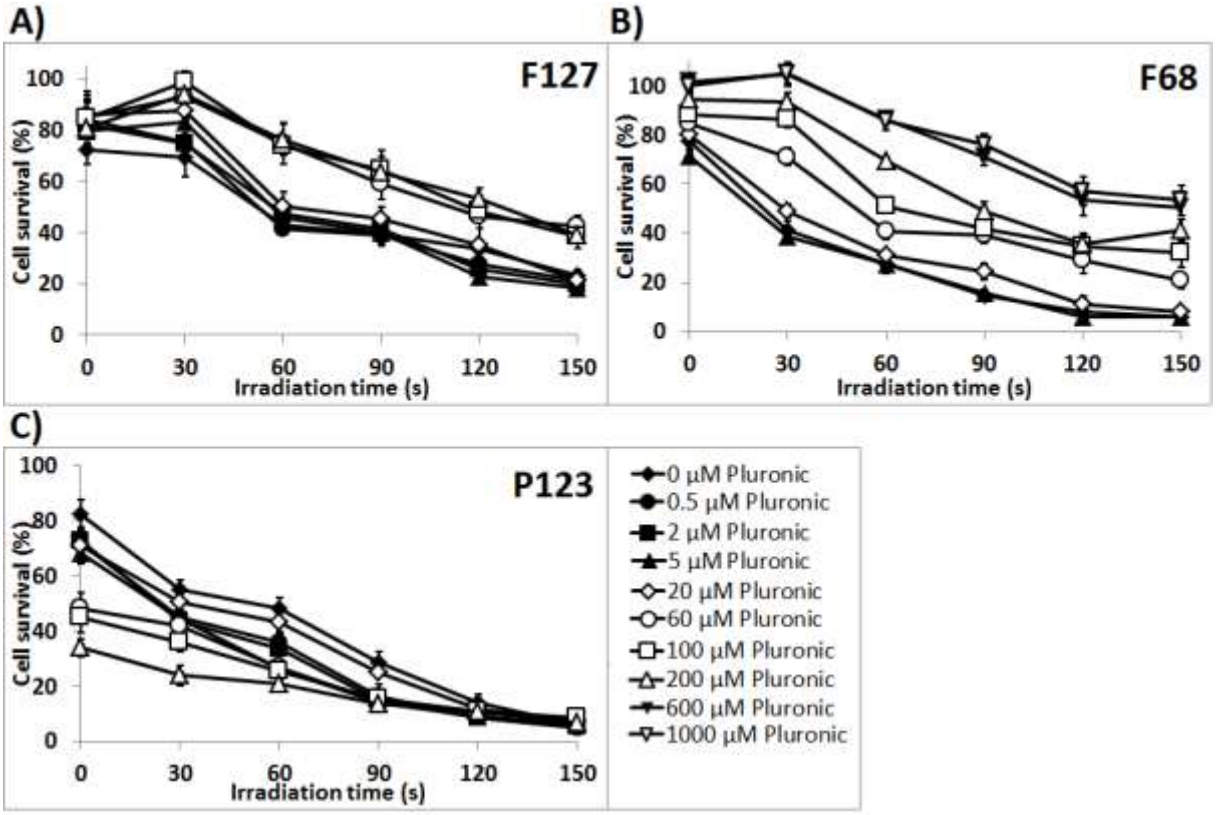
Cell survival of WiDr cells after 18 hours incubation with formulations containing 1 µM TAPP and Pluronic and subsequently exposed to light. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S6



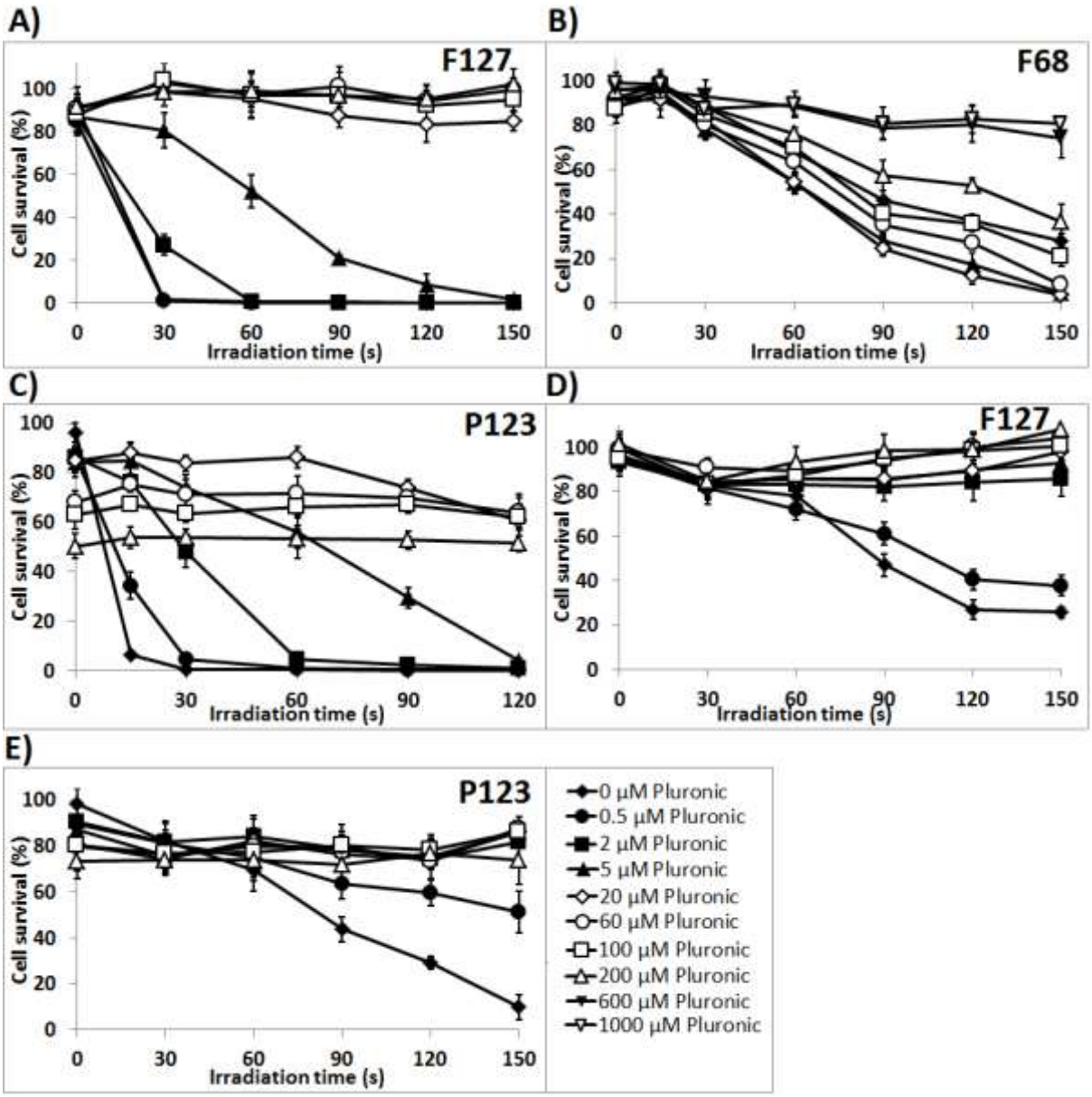
Cell survival of WiDr cells after 18 hours incubation with formulations containing 70 µM TSPP and Pluronic and subsequently exposed to light. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S7



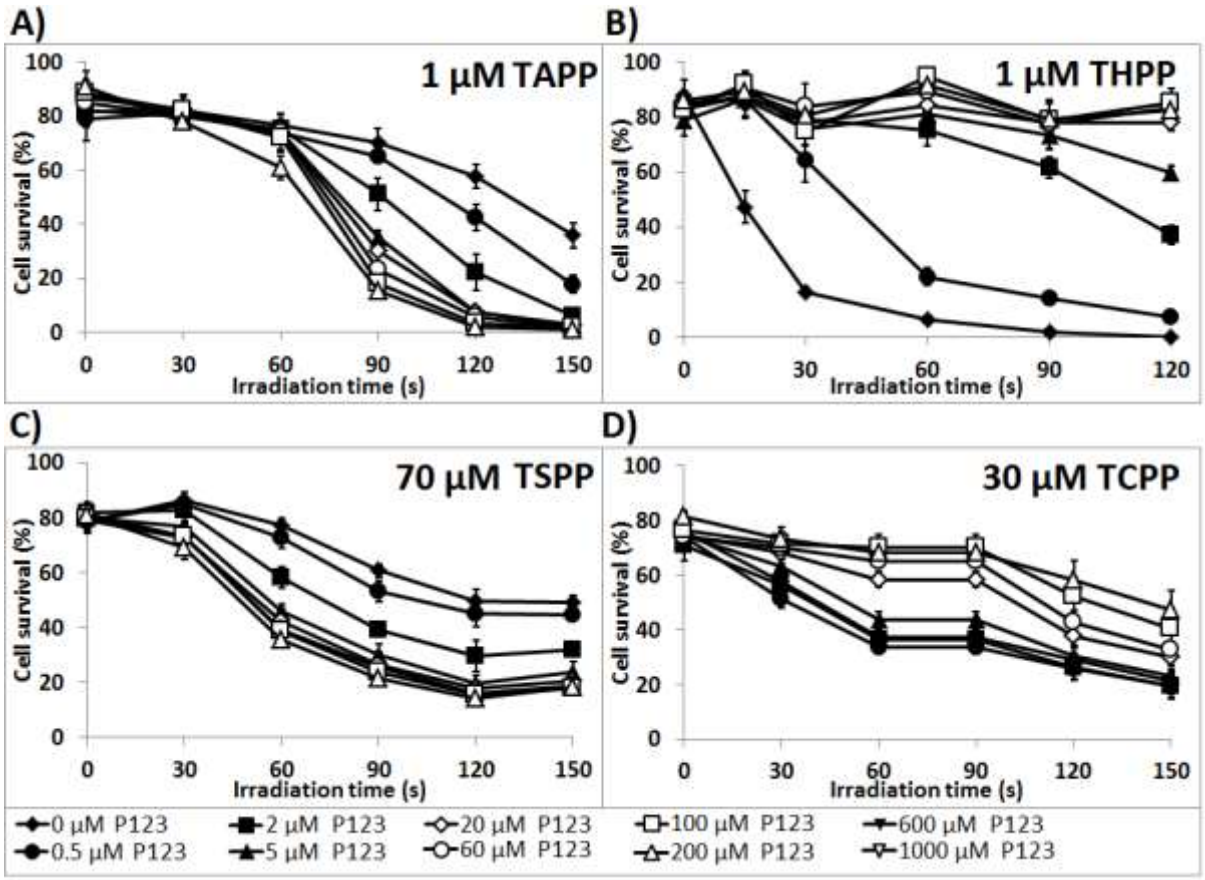
Cell survival of WiDr cells after 18 hours incubation with formulations containing 30 µM TCPP and Pluronic and subsequently exposed to light. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S8



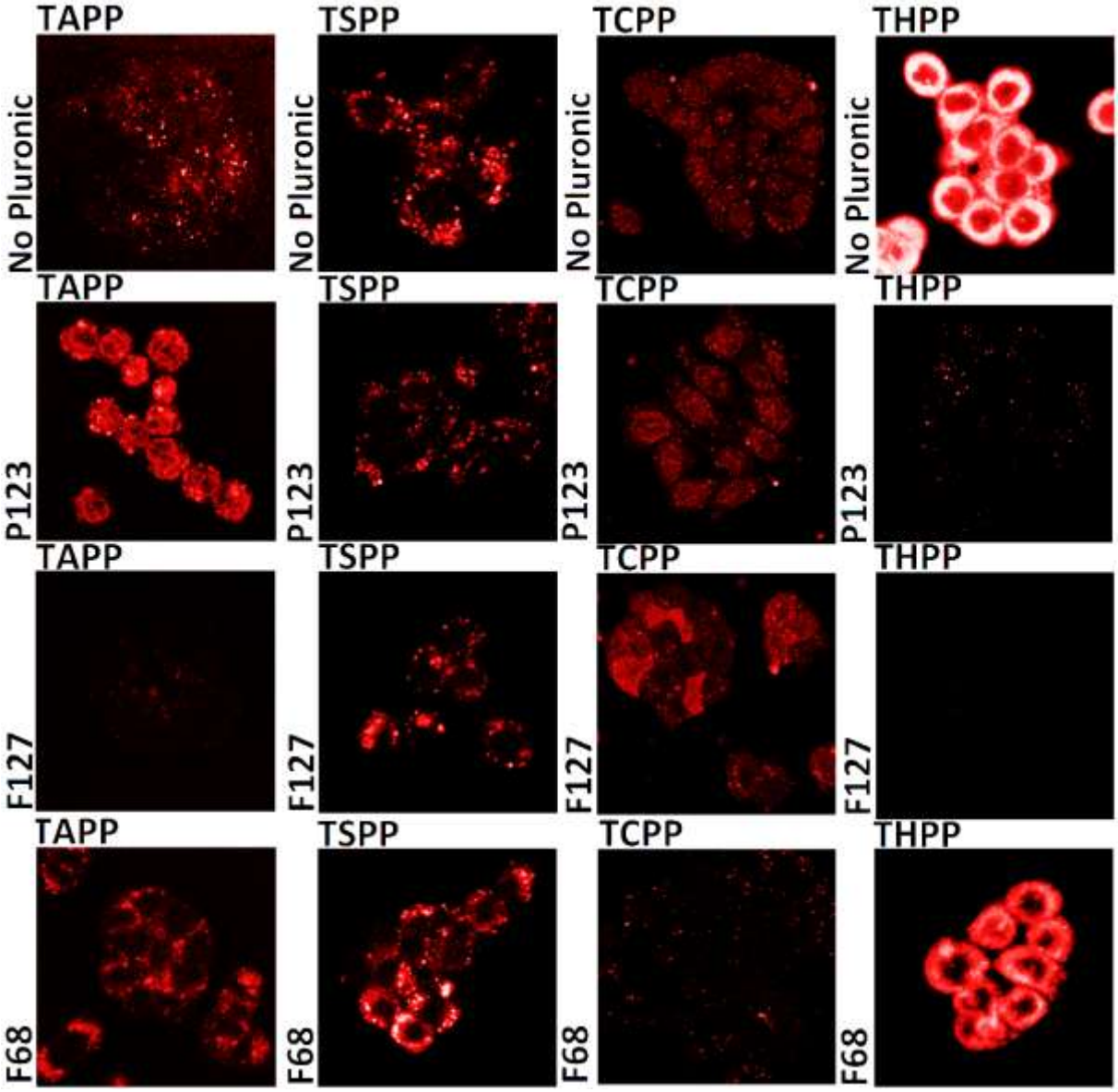
Cell survival of WiDr cells after 18 hours incubation with formulations containing 0.1 µM THPP (B, D, E) or 1 µM THPP (A, C) and Pluronic F127 (A, D), F68 (B), P123 (C, E) and subsequently exposed to light. The results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S9



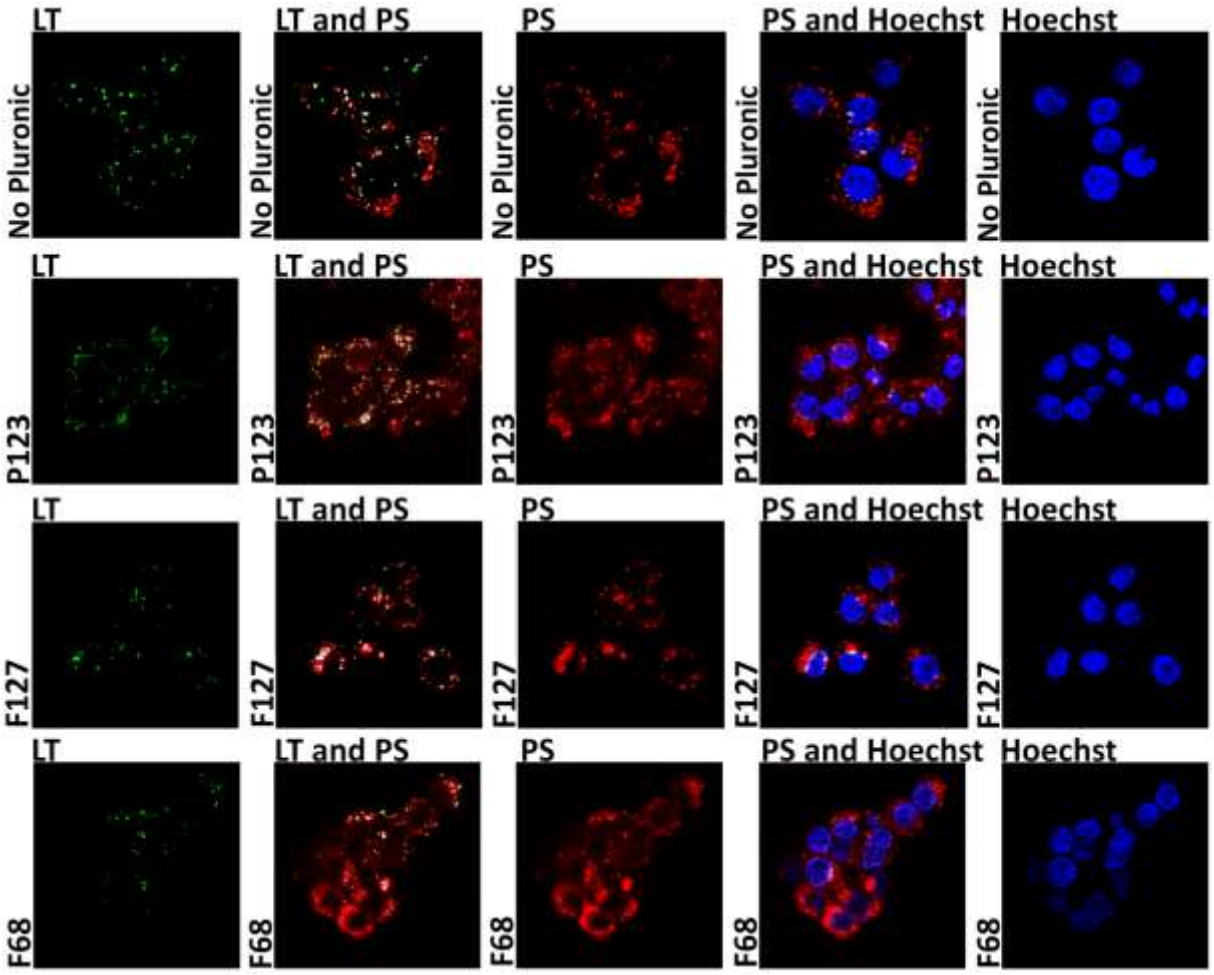
Cell survival of SK-OV-3 cells after 18 hours incubation with formulations containing PS and P123 and subsequently exposed to light. Results are presented as mean ± SD (n = 6) of one experiment, and are representative of two separate experiments. The cell survival is normalized against untreated control. Cells were incubated with 10 % FCS.

Fig. S10



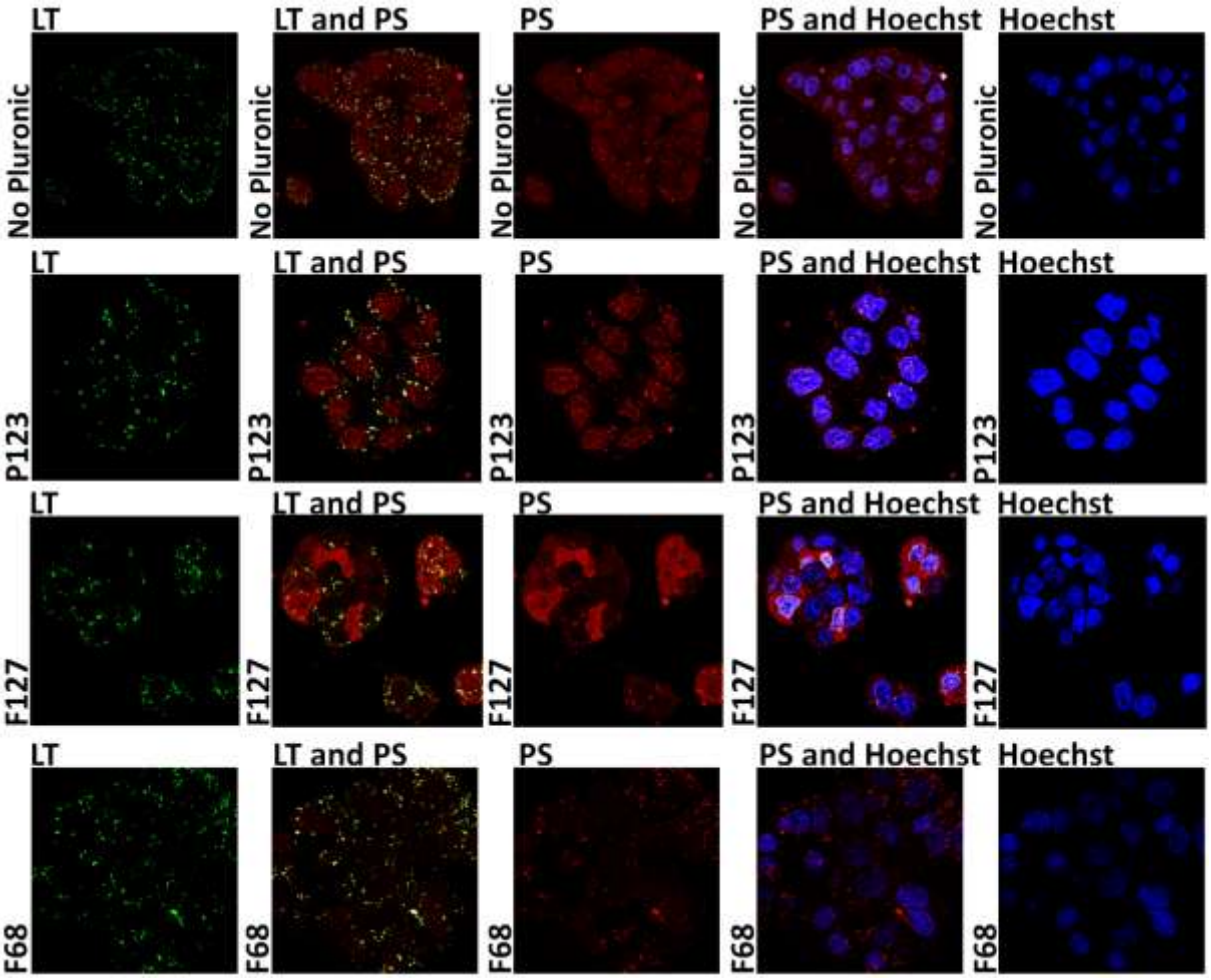
Confocal microscopy images of WiDr cells incubated for 18 hours with 10 % FCS and 1 μM TAPP or THPP, or 70 μM TSPP or TCPP, alone or in preparations with 100 μM P123 or F127 or F68. The fluorescence in the images is directly comparable to each other. The figure is based on Figs. 7 and 8, but the fluorescence has been adjusted to allow for direct comparisons within the figure.

Fig. S11



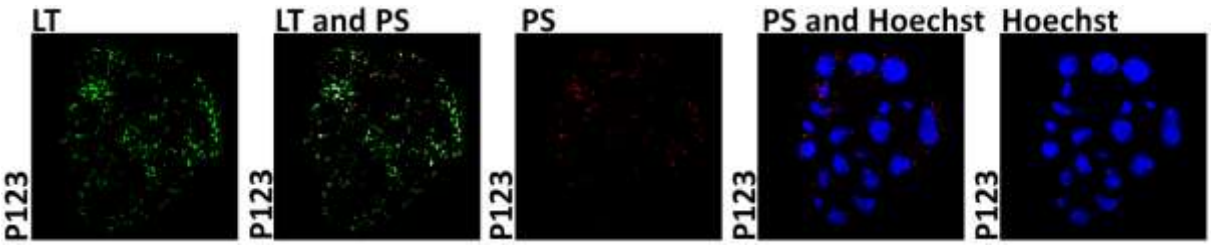
Confocal microscopy images of WiDr cells incubated for 18 hours with 10 % FCS and 70 µM TSPP (red fluorescence) alone or in preparations with 100 µM P123 or F127 or F68. Cells were exposed to LT (1 hour) and Hoechst (15 min) before imaging. Images showing the fluorescence from TSPP and florescence dyes are presented both separately and combined. White color shows colocalized fluorochromes. The color contrast and brightness in the images were adjusted to optimize the visualization.

Fig. S12



Confocal microscopy of WiDr cells incubated for 18 hours with 10 % FCS and 70 µM TCPP (red fluorescence) alone or in preparations with 100 µM P123 or F127 or F68. Cells were exposed to LT (1 hour) and Hoechst (15 min) before imaging. Images showing the fluorescence from TCPP and florescence dyes are presented both separately and combined. White color indicates colocalized fluorochromes. The color contrast and brightness in the images were adjusted to optimize the visualization.

Fig. S13



Confocal microscopy images of WiDr cells incubated for 18 hours with 10 % FCS and 1 µM THPP (red fluorescence) alone or in preparations with 100 µM P123. Cells were exposed to LT (1 hour) and Hoechst (15 min) before imaging. Images showing the fluorescence from THPP and florescence dyes are presented both separately and combined. White color shows colocalized fluorochromes. The color contrast and brightness in the images were adjusted to optimize the visualization.

Table S1

Formulation	LD_{50} (µM)
P123 alone	415 ± 10
P123 + TAPP 1 µM	450 ± 45
P123 + THPP 1 µM	160 ± 45
P123 + THPP 0.1 µM	190 ± 30
P123 + TSPP 70 µM	305 ± 60
P123 + TCPP 30 µM	50 ± 5
F127 + TCPP 30 µM	975 ± 25

Dark toxicity (expressed as LD_{50}, given in µM of Pluronics) for different formulations, used to treat (18 hours) WiDr cancer cells. LD_{50} was > 1000 µM for other formulations containing F68, L44 and F127. LD_{50} was calculated, based upon 2 independent experiments. Values are given with standard error of two independent experiments (n = 6).

Table S2

Cell line	LD_{50} (µM)		
	P123	**L44**	**F127**
MES-SA	365 ± 95	913 ± 88	> 1000
A-431	885 ± 115	528 ± 8	
SK-BR-3	953 ± 48	833 ± 3	
BT-20	393 ± 43	> 1000	743 ± 18
SK-LMS-1	350 ± 100		835 ± 5
HT-1080	73 ± 23		> 1000
DU-145	135 ± 15		
MDA-MB-231	168 ± 18		
WiDr	415 ± 10		
Zr-75-1	> 1000		
SK-OV-3			

Dark toxicity (expressed as LD_{50}, given in µM of Pluronics) for different cancer cell lines, subjected to 18 hours treatment with Pluronics P123, L44 and F127. In case of F68, LD_{50} was > 1000 µM for all cell lines. LD_{50} was calculated, based upon 2 independent experiments. Values are given with standard error of two independent experiments (n = 6).