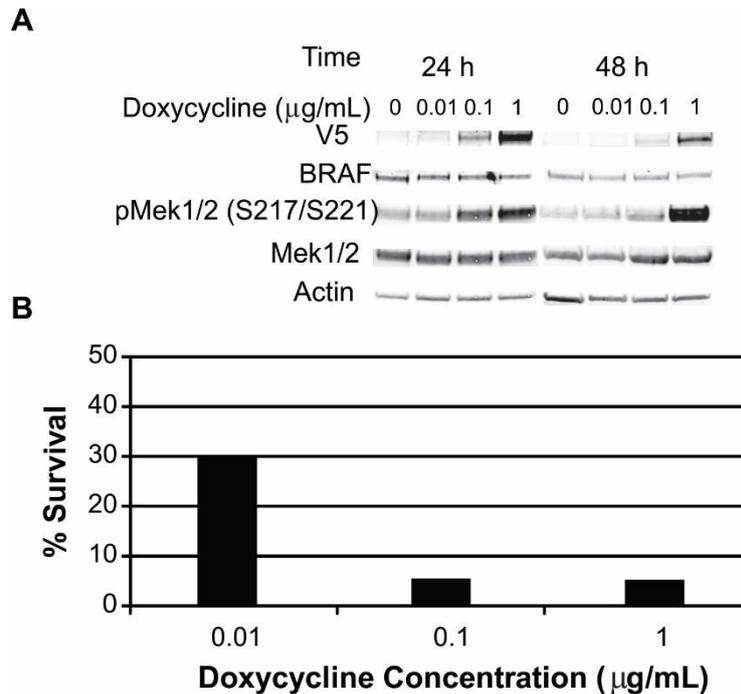
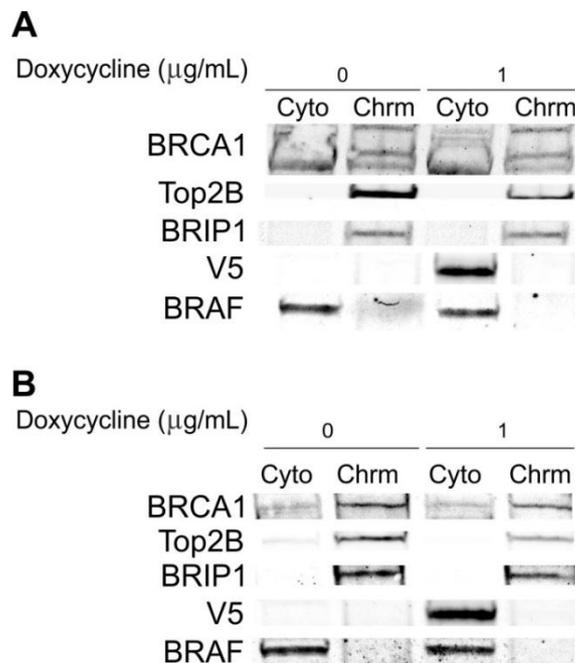


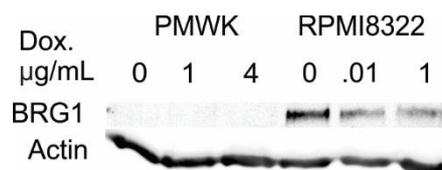
## Supplementary Materials



**Figure S1.** F1-hTERT + TetON + V5-BRAF(V600E) cells grown in the amount of doxycycline shown. **(A)** Western Blot is whole cell lysates after 24 or 48 h in doxycycline. **(B)** Inactivation of colony formation by induction of oncogenic BRAF.



**Figure S2.** F1-hTERT + TetON + V5-BRAF(V600E) cells grown for **(A)** 24 h or **(B)** 48 h in doxycycline. Cyto cytoplasm; Chrm chromatin fraction. Cells fractionated according to methods. Each lane of the Western Blot is loaded with an equal cell number. Blot shows a modest reduction in the amount of chromatin associated BRCA1 after 48 h.



**Figure S3.** Western Blot of whole cell lysates. PMWK: PMWK + TetON + V5-BRAF(V600E) cells; RPMI8322: RPMI8322 + TetON + V5-BRAF(V600E) cells. The PMWK + TetON + V5-BRAF(V600E) cells do not express any BRG1 protein and oncogenic BRAF expression reduces the amount of BRG1 in the RPMI8322 cell line.

**Table S1.** Aberration frequencies of the parental RPMI8322 + TetON cell line  $\pm 1$   $\mu\text{g/mL}$  doxycycline,  $\pm\text{UVB}$  ( $1D_0$ ). Cells were treated as described in the methods. As compared to the RPMI8322 line without doxycycline in Figure 5, doxycycline had no effect on the induction or frequency of aberrations.

Treatment	Breaks	Frequency	
		Exchanges	Total Aberrations
Sham	0.03	0.00	0.04
Sham + UVB	1.1	0.94	2.0
1 $\mu\text{g/mL}$ Doxycycline	0.04	0.00	0.06
1 $\mu\text{g/mL}$ Doxycycline + UVB	0.66	0.51	1.2