

# Supplemental Information

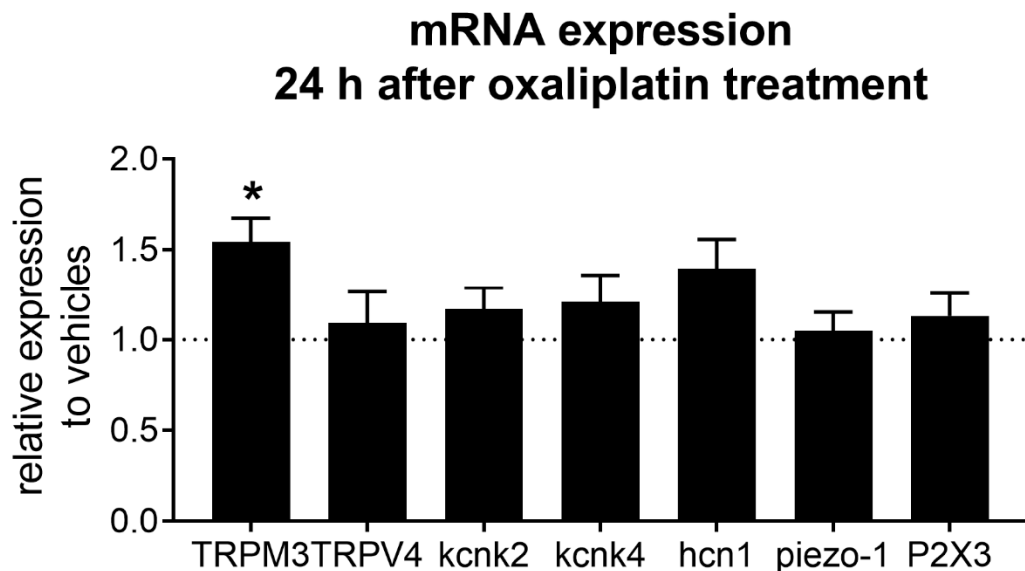
## Oxaliplatin Causes Transient Changes in TRPM8 Channel Activity

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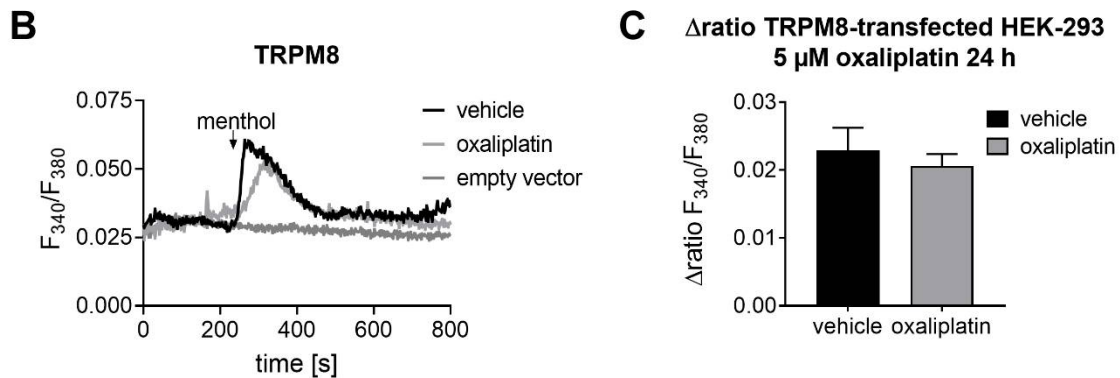
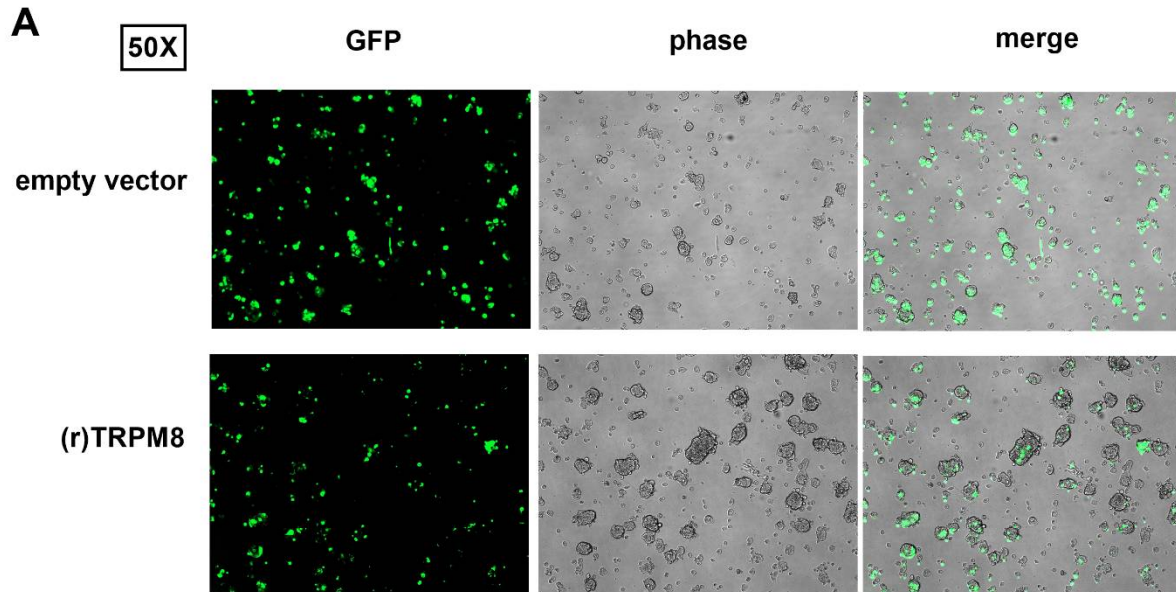
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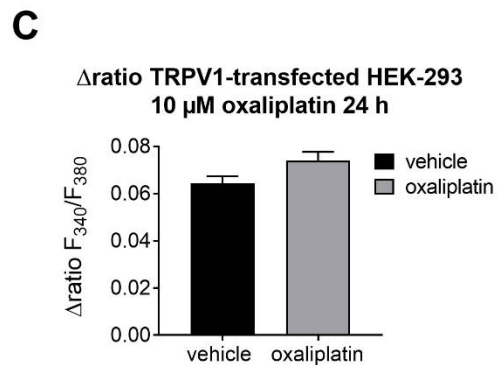
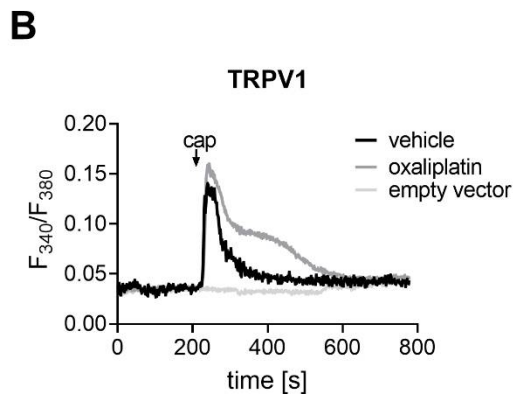
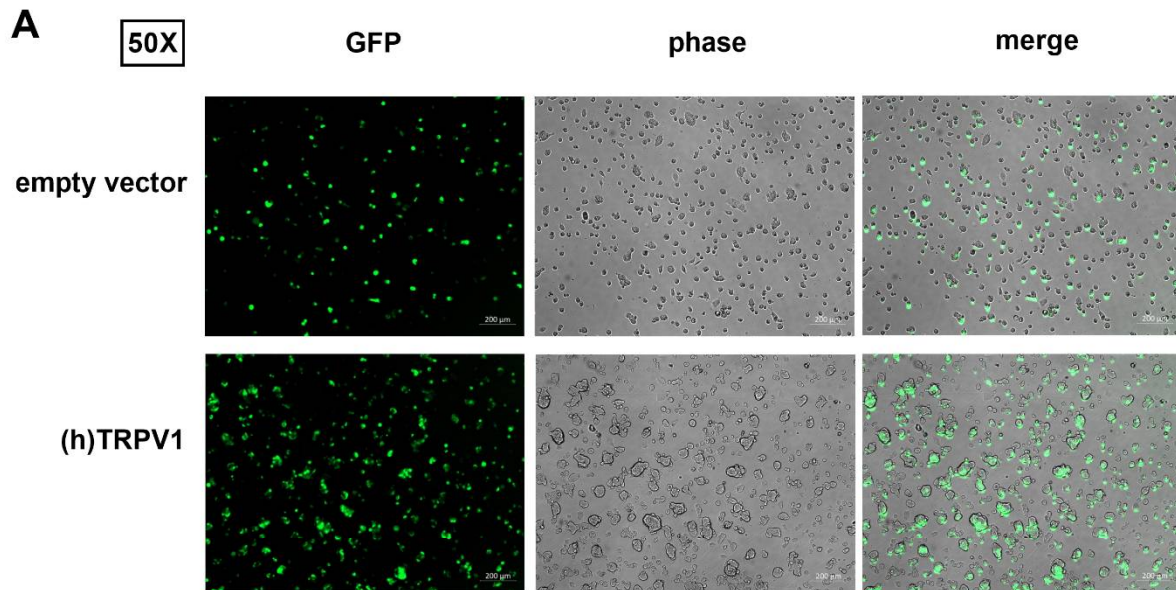
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**Figure S1. mRNA expression of different ion channels in DRGs 24 h after oxaliplatin or vehicle treatment.** Relative mRNA expression of the TRPM3- (transient receptor potential melastatin 3), TRPV4- (transient receptor potential vanilloid 4), kcnk2- (two-pore domain potassium channel 2), kcnk4- (two-pore domain potassium channel 4), hcn1- (hyperpolarization-activated cyclic nucleotide-gated channel 1), piezo-1- and P2X3- (purinergic receptor 2X3) transcript. Data represents the means  $\pm$  SEM from n=4-9 mice per condition; \*p<0.05; one-way ANOVA and Dunnett's multiple comparison test.



**Figure S2. TRPM8-transfected HEK293-cells 24 h after oxaliplatin treatment (5  $\mu$ M).** (A) Representative fluorescence and phase contrast images of TRPM8 and empty-vector (pEGFP) transfected HEK293-cells captured at 50X magnification. (B) Representative  $Ca^{2+}$ -responses after menthol stimulation (300  $\mu$ M, 45 s) of TRPM8 and empty-vector transfected HEK293-cells which were treated with vehicle (DMSO) or 5  $\mu$ M oxaliplatin for 24 h. (C)  $\Delta$ ratio  $F_{340}/F_{380}$  of the amplitude after a transient  $Ca^{2+}$ -influx after stimulating TRPM8-transfected HEK293-cells after oxaliplatin (5  $\mu$ M) or vehicle treatment with menthol. Data represents the means  $\pm$  SEM from n=39-44 TRPM8-transfected HEK293-cells per condition; two-tailed unpaired t-test with Welch's correction.



**Figure S3.** TRPV1-transfected HEK293-cells 24 h after oxaliplatin (10  $\mu$ M) treatment. **(A)** Representative fluorescence and phase contrast images of TRPV1 and empty-vector (pEGFP) transfected HEK293-cells captured at 50X magnification. **(B)** Representative  $Ca^{2+}$ -responses after capsaicin (cap) stimulation (300 nM, 20 s) of TRPV1 and empty-vector transfected HEK293-cells which were treated with vehicle (DMSO) or 10  $\mu$ M oxaliplatin for 24 h. **(C)**  $\Delta$ ratio  $F_{340}/F_{380}$  of the amplitude after a transient  $Ca^{2+}$ -influx after stimulating TRPV1-transfected HEK293-cells after oxaliplatin (10  $\mu$ M) or vehicle treatment with capsaicin. Data represents the means  $\pm$  SEM from n=113-126 TRPV1-transfected HEK293-cells per condition; two-tailed unpaired t-test with Welch's correction.