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Supplementary Figure 1. Border Associated macrophage (BAMs) labeling in the four different creER driver lines using either the Ai9 (tdTomato) or R26-YFP reporter mouse lines. The experimental timeline is shown on top of the panel. Representative images from each cre driver and Ai 9 (I) or R26-YFP (II) reporter line in pia and blood vessel associated macrophages and choroid plexus associated macrophages (III Ai tdTomato) or (IV R26-YFP) reporter. Scale bar = $100\mu m$.

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Supplementary Figure 2. FACS analysis of reporter-positive cells in total brain single cell resuspension confirms the reporter recombination efficiency differences among the three investigated CreER lines. tdTomato+ cell percentage from all three different lines show similar high-efficiency recombination and the YFP+ cells show higher recombination efficiency in the CX3CR1CreERJung-R26-YFP mice but significantly lower recombination efficiency in the P2RY12^{CreER}-R26-YFP mice and TMEM119^{CreER}-R26-YFP line. Each data point represents data from one animal. **p < 0.01 and ***p < 0.001, for Two way ANOVA analysis, Tukey post-hoc pairwise analysis. Data were combined from 2-3 independent cohorts of mice for each line.

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Supplementary Table 1. Double reporter labeling of P2ry12CreER(+/WT) after TAM				
Cell Condition	Mouse 1	Mouse 2	Mouse 3	Average
% of total tdTomato+	77.7778	88.09524	81.69014	82.52105
% of total YFP+	45.29915	35.71429	43.66197	41.55847
% of YFP+:tdTomato-	22.22222	11.90476	18.30986	17.47895
% of YFP-:tdTomato+	54.70085	64.28571	56.33803	58.44153
% of YFP+:tdTomato+	23.07692	23.80952	25.35211	24.07952
*All percentages are calculated by dir each animal.	viding the number of each o	category of cells with	n the total reporter p	ositive cells from

Supplementary Table 1. Quantification of the FACS analysis of the reporter+ microglia in whole brain single cell suspension prepared from the P2RY12CreER-Ai9-R26-YFP mice after TAM treatment.