

**Supplementary Table 1.** Effect of 5B8 vs IgG2b on Maximum Clinical Score in EAE experiments.

EAE experiment	Maximum Clinical Score		P value	Type of test	Number of mice
	IgG2b	5B8			
PLP <sub>139-151</sub>	2.45	1.53	$P = 0.015$	Welch's t-test	IgG2b (n = 16) 5B8 (n = 16)
MOG <sub>35-55</sub>	2.58	1.00	$P = 0.018$	Welch's t-test	IgG2b (n = 11) 5B8 (n = 12)
Th1 adoptive EAE	3.68	2.64	$P = 0.005$	Welch's t-test	IgG2b (n = 15) 5B8 (n = 24)
PLP <sub>139-151</sub> (Therapeutic treatment)	3.375	1.9	$P = 0.002$	Welch's t-test	IgG2b (n = 10) 5B8 (n = 10)

Table showing mean maximum clinical score of disease. Statistical analysis was done with two-tailed Welch's t-test.

**Supplementary Table 2.** Effect of 5B8 vs IgG2b on Day of Onset in EAE experiments.

EAE experiments	Day of Onset		P value	Type of test	Number of mice
	IgG2b	5B8			
PLP <sub>139-151</sub>	13	14.5	$P = 0.005$	Log-rank test	IgG2b (n = 16) 5B8 (n = 16)
MOG <sub>35-55</sub>	15.5	18	$P = 0.023$	Log-rank test	IgG2b (n = 11) 5B8 (n = 12)
Th1 adoptive EAE	9	11	$P = 0.014$	Log-rank test	IgG2b (n = 15) 5B8 (n = 24)

Table showing mean day of onset. Statistical analysis was done with two-tailed Welch's t-test.

**Supplementary Table 3.** Sequence of primers used for RT Quantitative PCR.

<b>RT QPCR primers</b>	<b>Forward Primer</b>	<b>Reverse Primer</b>
Ccl24	CTCCTTCTCCTGGTAGCCTGC	GTGATGAAGATGACCCCTGCCTT
Tnfsf18	CGAGTCCTGCATGGTTAA	TCAGCTTCCCATCAGATGTC
IL-12p40	TCCCCATTCCTACTTCTCCCTC	GGAACGCACCTTTCTGGTTACA
Cxcl3	CATCCAGAGCTTGACGGTGAC	CTTGCCGCTCTTCAGTATCTTCTT
IFN- $\gamma$	TCAAGTGGCATAGATGTGGAAGAA	TGGCTCTGCAGGATTTTCATG
TNF- $\alpha$	TCCCAGGTTCTCTTCAAGGGA	GGTGAGGAGCACGTAGTCGG
IL-1 $\beta$	GCAACTGTTCTGAACTCAACT	ATCTTTTGGGGTCCGTCAACT
Cxcl10	CCAAGTGCTGCCGTCATTTTC	GGCTCGCAGGGATGATTTCAA
GAPDH	CAAGGCCGAGAATGGGAAG	GGCCTCACCCCATTTGATGT