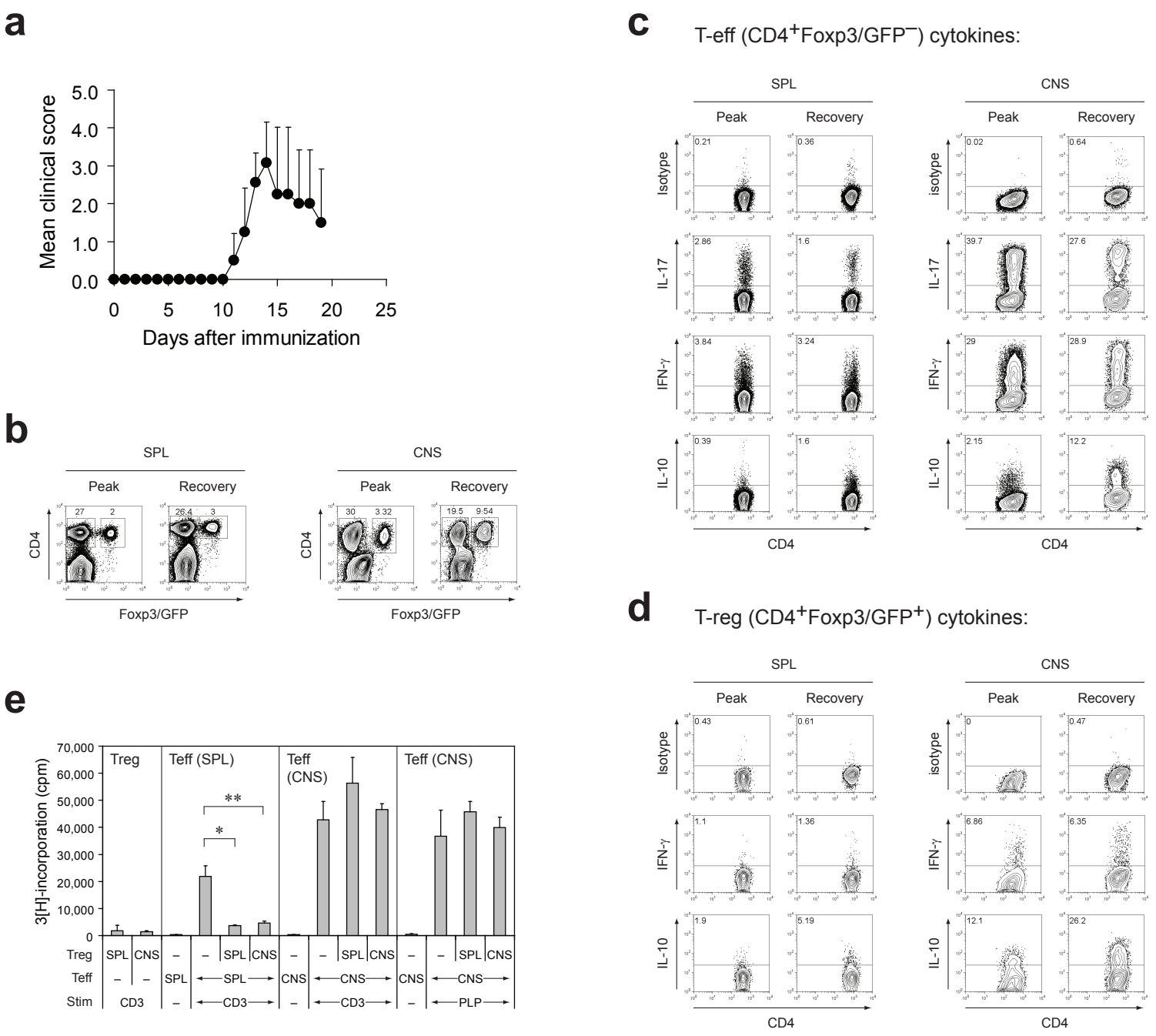
Supplementary Figure 4



Supplementary Figure 4. T-eff and T-reg dynamics and function during the first disease episode in $PLP_{139-151}$ induced EAE. (**a**) SJL mice were crossed with *Foxp3gfp*.KI-mice and back-crossed onto the SJL genetic background for at least four generations (SJL *Foxp3gfp*.KI). In these mice, the expression of Foxp3 was linked to the expression of GFP as described for the original *Foxp3gfp*.KI-mice. EAE was induced by immunization with $PLP_{139-151}$/CFA and the disease course was followed for 20 days (n=9, +SD). (**b**) Splenocytes and CNS mononuclear cells were isolated from female SJL *Foxp3gfp*.KI-mice at the peak of disease (d14) and during recovery (d19) and stained for CD4. The percentages of $CD4^+Foxp3/GFP^-$ T-cells (T-eff) and $CD4^+Foxp3/GFP^+$ T-cells (T-reg) within the mononuclear cell populations of the spleen and the CNS are shown. (**c**, **d**) Mononuclear cells were prepared from SJL *Foxp3gfp*.KI-mice at the peak of disease and during recovery, stimulated *ex vivo* with PMA/ionomycin and stained for CD4 and intracellular cytokines. (**c**) Cytokine expression (percentages) in the T-eff gate ($CD4^+Foxp3/GFP^-$). (**d**) Cytokine expression (percentages) in the T-reg gate ($CD4^+Foxp3/GFP^+$). (**e**) T-eff ($CD4^+Foxp3/GFP^-$) and T-reg ($CD4^+Foxp3/GFP^+$) were isolated by FACS-sorting from the spleen and the CNS of SJL *Foxp3gfp*.KI-mice at the peak of disease (d14). Splenic T-eff and CNS-T-eff were compared for their susceptibility to suppression by spleen-derived or CNS-derived T-reg in anti-CD3-driven and $PLP_{139-151}$-specific proliferation assays. Mean 3[H]-thymidine-incorporation of triplicate cultures (+SD). *P<5x10^{-5}, **P<3x10^{-5}, t-test.