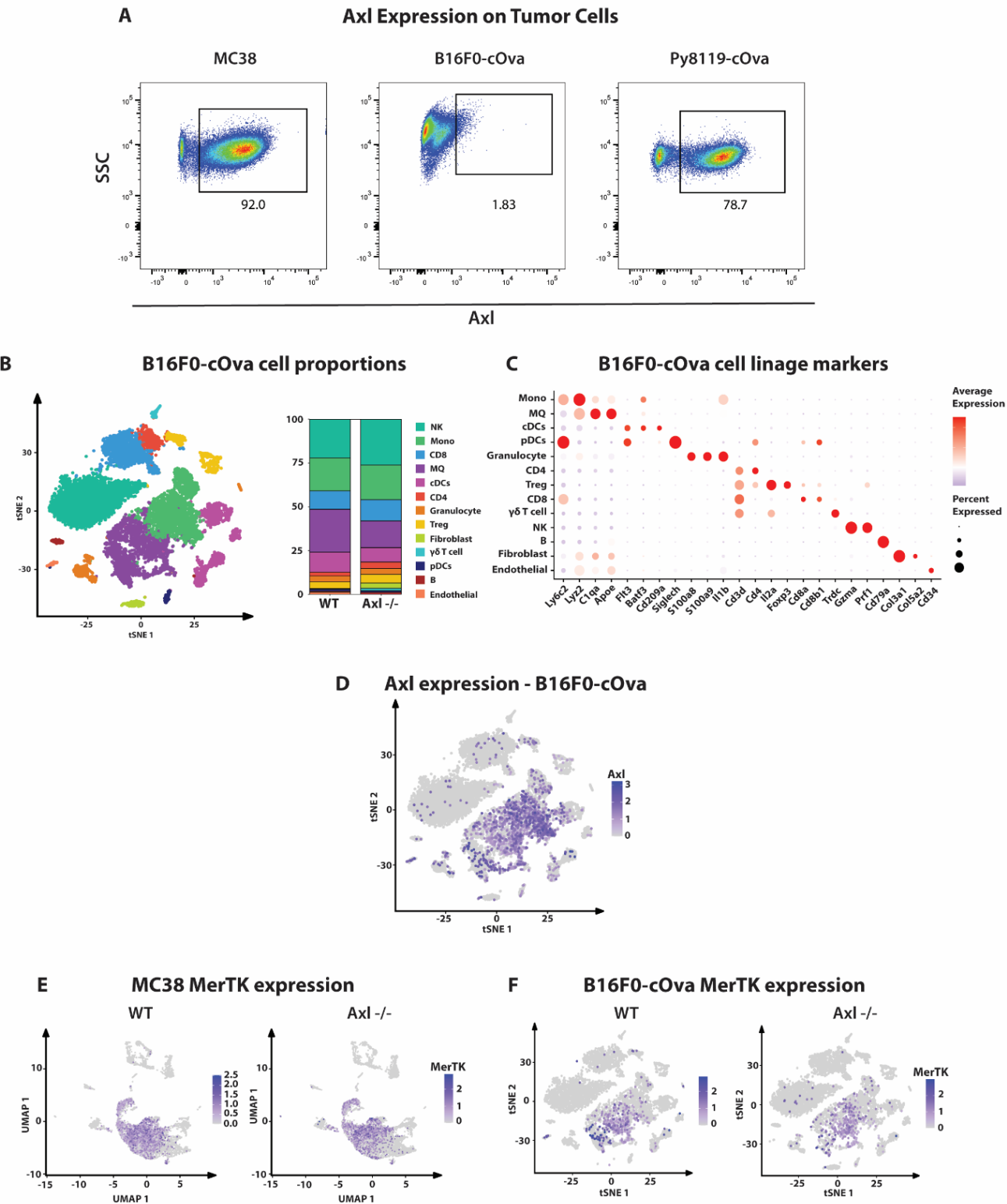
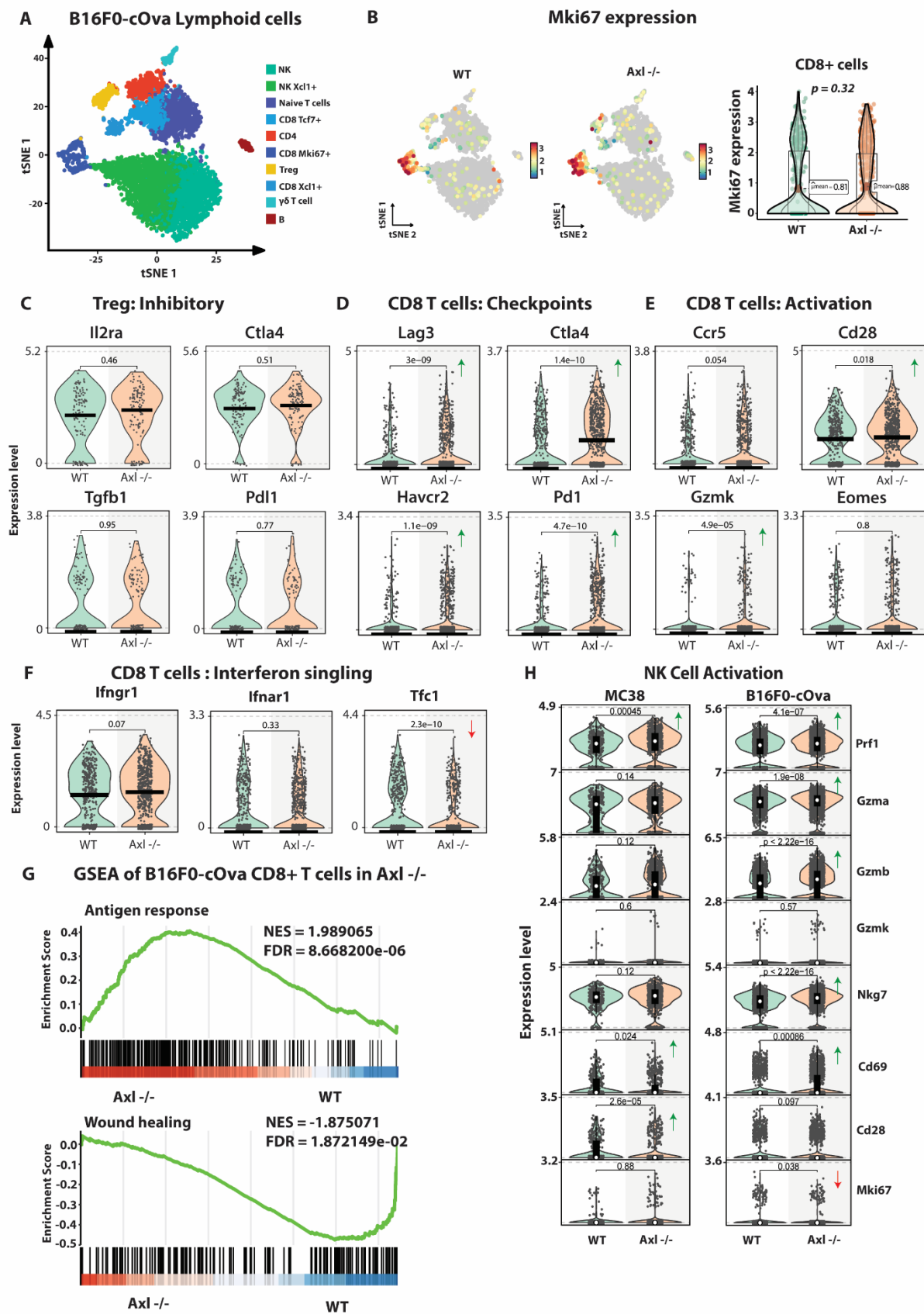


Supplemental Figures



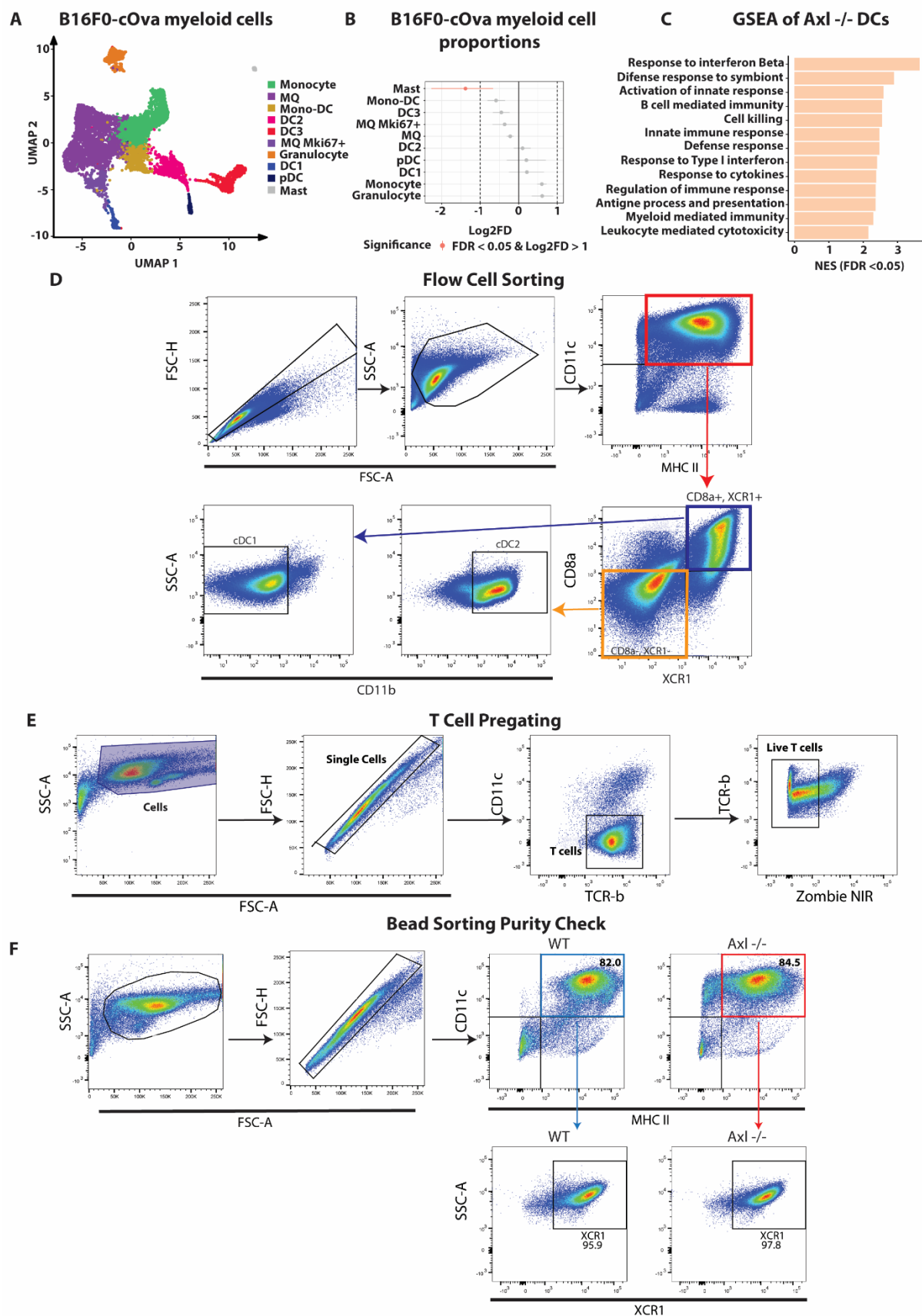
Supplemental Figure 1.

(**A**) Flow cytometry plots displaying levels of Axl expression on MC38, B16F0-cOva and Py8119-cOva cell lines. (**B**) TSNE projection illustrating the intratumoral immune cell populations in B16F0-cOva tumors merged between Wild type and Axl^{-/-} host (left panel) and the proportions between each genotype (right panel). (**C**) Heatmap displaying canonical cell type markers used to annotate immune cell clusters. (**D**) TSNE projection illustrating expression levels of Axl across individual immune cell clusters. (**E-F**) UMAP and TSNE projections showing MerTK expression levels in both WT and Axl KO mice across MC38 and B16F0-cOva tumor models respectively.



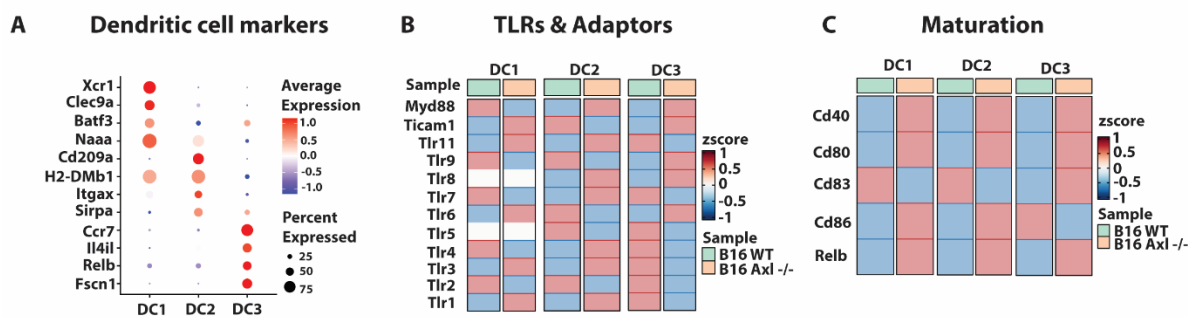
Supplemental Figure 2.

(A) UMAP projection subset on lymphoid cells in B16F0-cOva tumor-bearing mice merged between WT and Axl KO (n= 6302 cells). (B) UMAP projection illustrating KI67 expression on intratumoral lymphoid cells in B16F0-cOva tumors (left panel). Violin plot comparing Ki67 expression levels between CD8⁺ T cells found in WT and Axl KO mice (right panel). (C-F), Violin plots comparing gene expression levels of inhibitory molecules on Treg cells (C), immune checkpoints on CD8⁺ T cells (D), activation markers on CD8⁺ T cells (E), and interferon signaling associated molecules between WT and Axl KO mice (F). (G) Gene set enrichment analysis reveals enhanced antigen response pathways and reduced wound healing pathways in CD8⁺ T cells from Axl KO mice compared to WT. (H) Violin plots comparing expression levels of activation markers on NK cells from WT and Axl KO mice in both MC38 and B16F0-cOva tumors.



Supplemental Figure 3

(A) UMAP projection merged between WT and Axl KO mice subset on myeloid cells in B16F0-cOva tumors (n=7441 cells). (B) Plot illustrating distribution of cellular population between WT and Axl KO mice. (C) GSEA depicting top signaling pathways enriched in DCs from Axl KO mice over WT. (D) Flow cytometry plots depicting the flow sorting strategy for splenic DC1 and DC2 cells. (E) Flow cytometry plots illustrating OTI CD8+ T cell pre-gating strategy. (F) Flow cytometry plots depicting cell purity post DC1 bead sorting.



Supplemental Figure 5

(A) Flow plot displaying immunophenotyping markers for DC1, DC2, and DC3 subpopulations found in B16F0-cOva tumors. (B) Heatmap comparing expression scores of toll like receptors and adapter proteins between WT and Axl -/- DC subpopulations. (C) Heatmap comparing expression of maturation markers between WT and Axl -/- DC subpopulations.