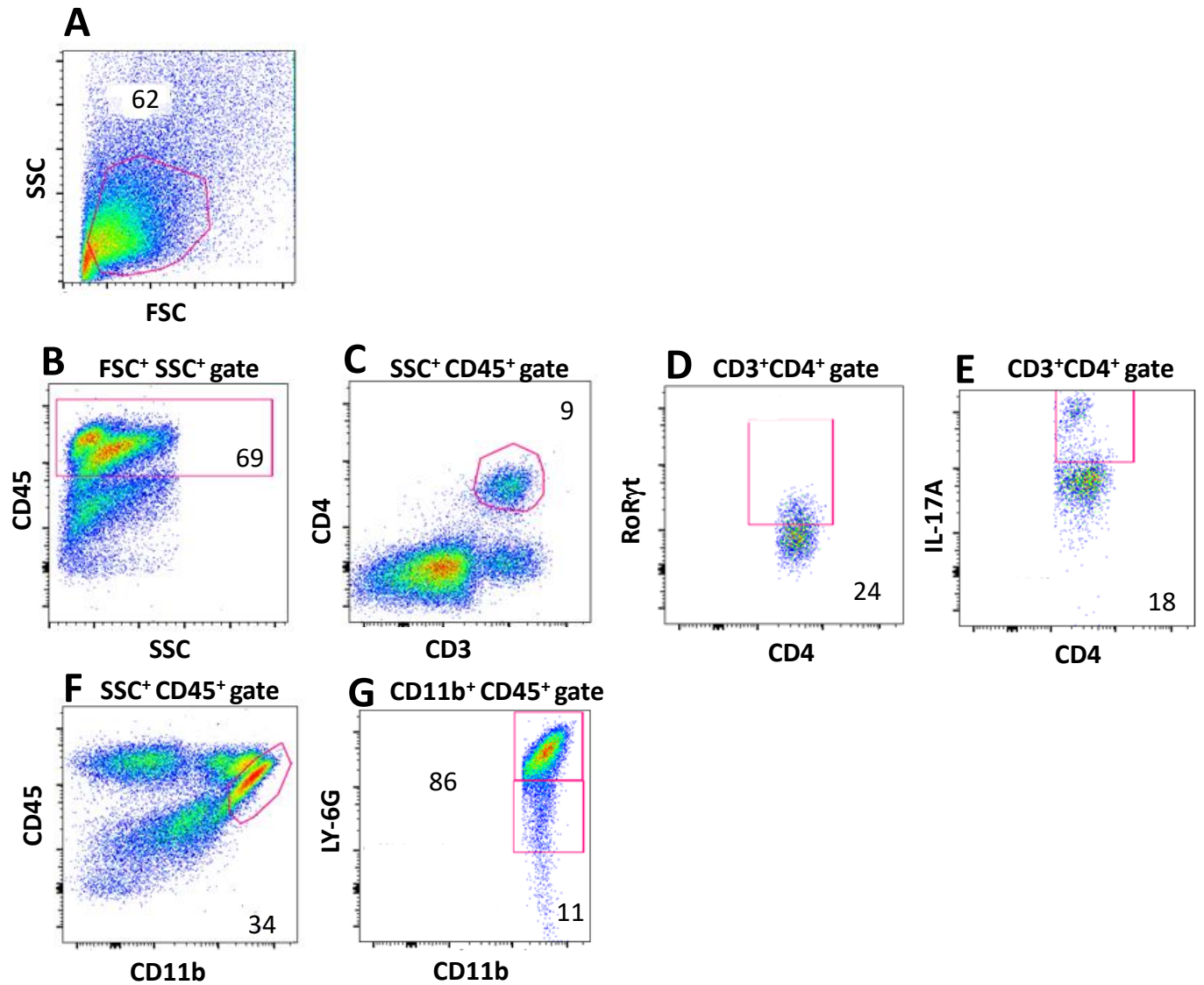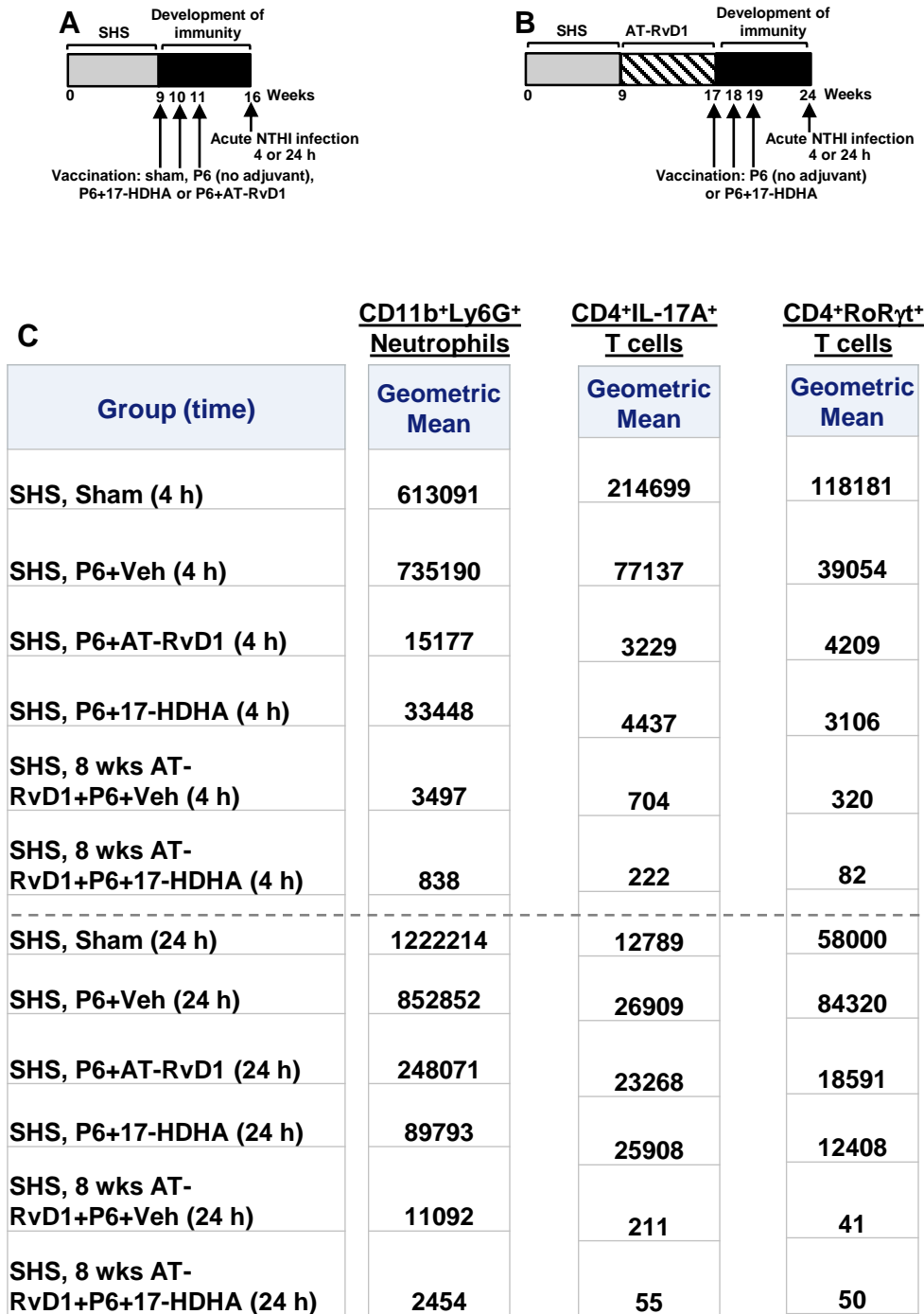## Supplemental Figure 1

SUPPLEMENTAL FIGURE 1. Representative plots showing the gating strategy adopted for the step by step analysis of different immune cell subsets in the lung. Total lung leukocytes were gated based on (**A**) FSC-SSC and (**B**) subsequently by SSC-CD45$^+$ gate. (**C**) SSC-CD45$^+$ population were further gated for CD3$^+$CD4$^+$ T cells which were subsequently gated for (**D**) CD4$^+$RORγt$^+$ and (**E**) CD4$^+$IL-17A$^+$ T cells. (**F**) For quantifying neutrophils, SSC-CD45$^+$ population were gated for CD45$^+$CD11b$^+$ cells to subsequently gate for (**G**) CD11b$^+$LY-6G$^+$ neutrophils.

A SHS | Development of immunity | 0 9 10 11 16 Weeks

Acute NTHI infection 4 or 24 h

Vaccination: sham, P6 (no adjuvant), P6+17-HDHA or P6+AT-RvD1

B SHS | AT-RvD1 | Development of immunity | 0 9 17 18 19 24 Weeks

Acute NTHI infection 4 or 24 h

Vaccination: P6 (no adjuvant) or P6+17-HDHA

C

Group (time)	CD11b$^+$Ly6G$^+$ Neutrophils Geometric Mean	CD4$^+$IL-17A$^+$ T cells Geometric Mean	CD4$^+$RoRγt$^+$ T cells Geometric Mean
SHS, Sham (4 h)	613091	214699	118181
SHS, P6+Veh (4 h)	735190	77137	39054
SHS, P6+AT-RvD1 (4 h)	15177	3229	4209
SHS, P6+17-HDHA (4 h)	33448	4437	3106
SHS, 8 wks AT-RvD1+P6+Veh (4 h)	3497	704	320
SHS, 8 wks AT-RvD1+P6+17-HDHA (4 h)	838	222	82
SHS, Sham (24 h)	1222214	12789	58000
SHS, P6+Veh (24 h)	852852	26909	84320
SHS, P6+AT-RvD1 (24 h)	248071	23268	18591
SHS, P6+17-HDHA (24 h)	89793	25908	12408
SHS, 8 wks AT-RvD1+P6+Veh (24 h)	11092	211	41
SHS, 8 wks AT-RvD1+P6+17-HDHA (24 h)	2454	55	50

SUPPLEMENTAL Table 1. The table represents experimental schema (**A,B**) and geometric mean values (**C**) of various markers under study at 4 and 24 h time points post acute NTHI infection in SHS-exposed, P6 vaccinated mice. n=5 mice per group/time point. The statistical methods employed are provided in the methods section in the main text. Markers under study were CD11b$^+$Ly6G$^+$ Neutrophils, CD4$^+$IL-17A$^+$ Th17 T cells and CD4$^+$RoRgt$^+$ Th17 T cells.