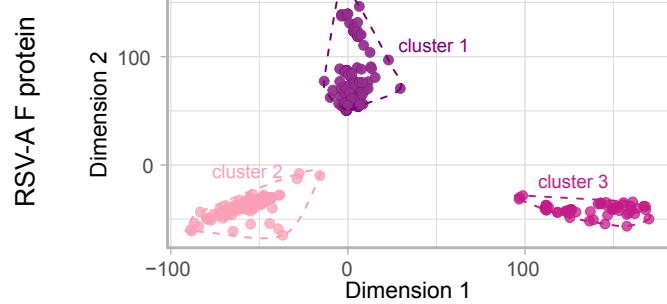


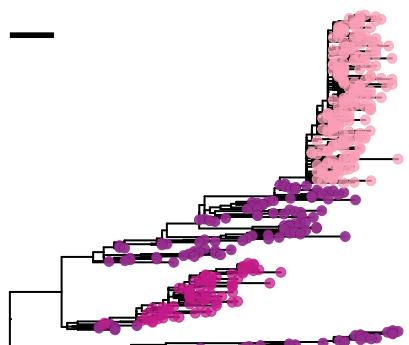
● Without G duplication

◇ With G duplication

T-cell immune epitope landscape



Phylogeny



T-cell epitope immune distance from estimated TMRCA



Genetic hamming distance from estimated TMRCA

