**Team member:**

1. Liusu Wang
2. Kuangyou Yao

**Project:**

We decide to improve the existing visualization of T-cell epitope mapping. The current visualization tool can be found through this URL:

<http://www.hiv.lanl.gov/content/sequence/jbrowse/?loc=Gag%3A1..500&tracks=PROTEIN%2CSub-protein_map&data=hivdata%2FEpitope-protein&highlight>=

We will be cooperating with Andrew Gartland, a staff scientist at Fred Hutchinson Cancer Research Center and Mike Dapp, a Post-Doctoral HIV researcher in UW Immunology.

**Project Significance:**

The goal of the software is to assist in finding a potential cure for the deadly disease AIDS.

According to Andrew, research shows that most people infected with HIV have T-cells that target epitopes that are **ineffective** at recognizing the virus over time. However a small minority of people known as “elite controllers” have T-cells that target a very **unique** set of epitopes and are able to control without ever developing AIDS.

**Tool Set**

1. D3
2. SQL (Maybe)