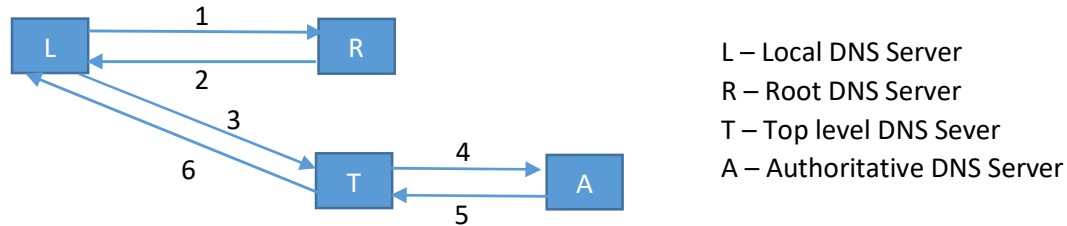# Lab 5 – DNS Simulation

Consider a DNS hierarchy, as indicated in the figure below, using an iterative name resolution mechanism till the root DNS server, followed by a recursive mechanism to completely resolve the name.

L – Local DNS Server
R – Root DNS Server
T – Top level DNS Sever
A – Authoritative DNS Server

Simulate the above when top level DNS server

- caches the resource records obtained from the authoritative DNS server
- does not use cache the resource records obtained from the authoritative DNS server

Compare the time taken in each of the above scenarios.

Note: At least 2 top level DNS servers (1 with cache and another without) should run in parallel. The root DNS server should redirect the local DNS servers based on the request.