

# NTP Analysis

Raw Data:

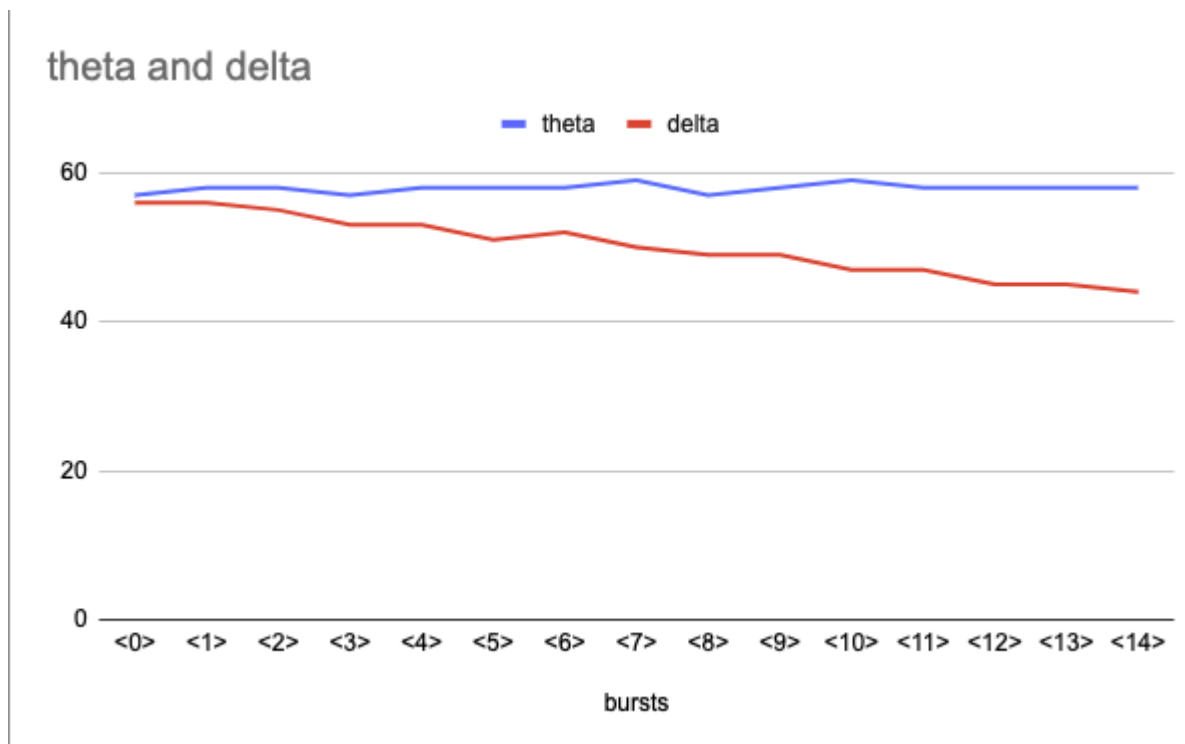
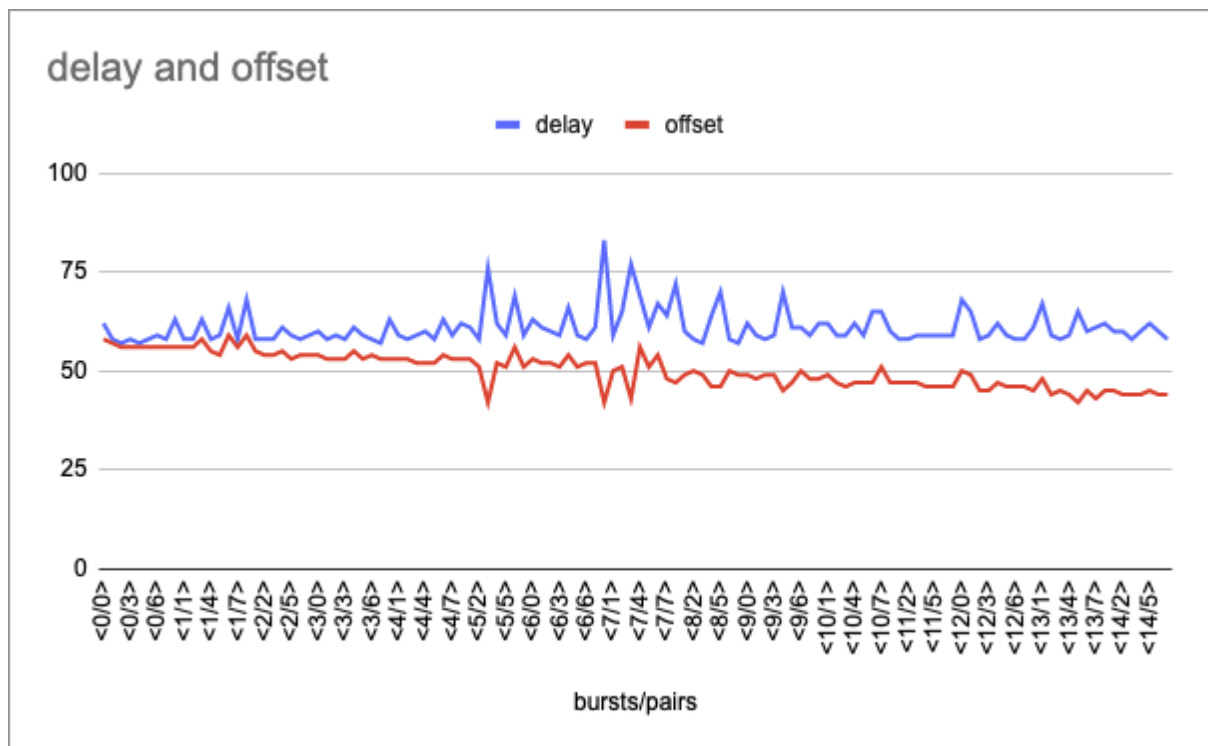
<https://docs.google.com/spreadsheets/d/1t0tOGmtMwkvY7zxqmViY4OwUXPmLFs-0aaxW8ECeUAA/edit?usp=sharing>

Github :

<https://github.com/Ryo0929/Assignment3>

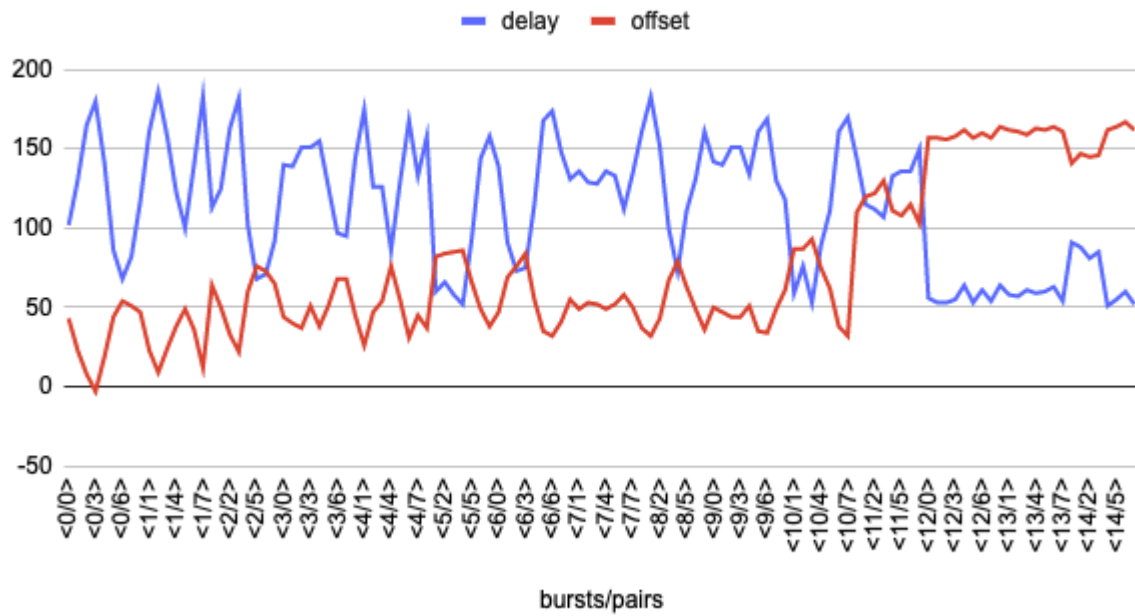
The shorter and more symmetric the round-trip time is, the more accurate the estimate of the current time will be.

local to public server

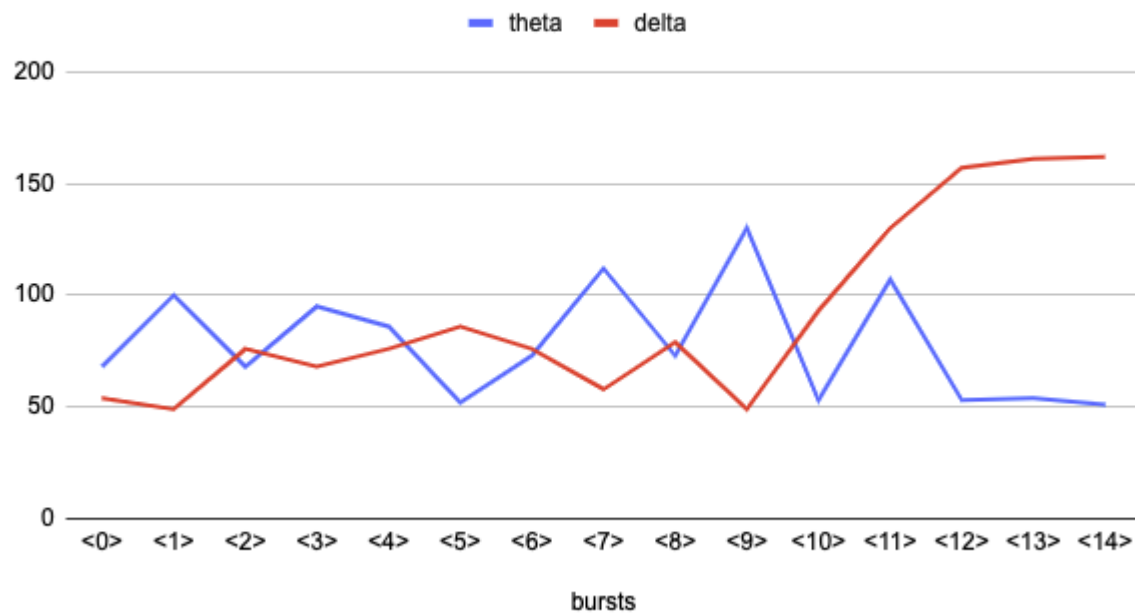


local to cloud server

### delay and offset

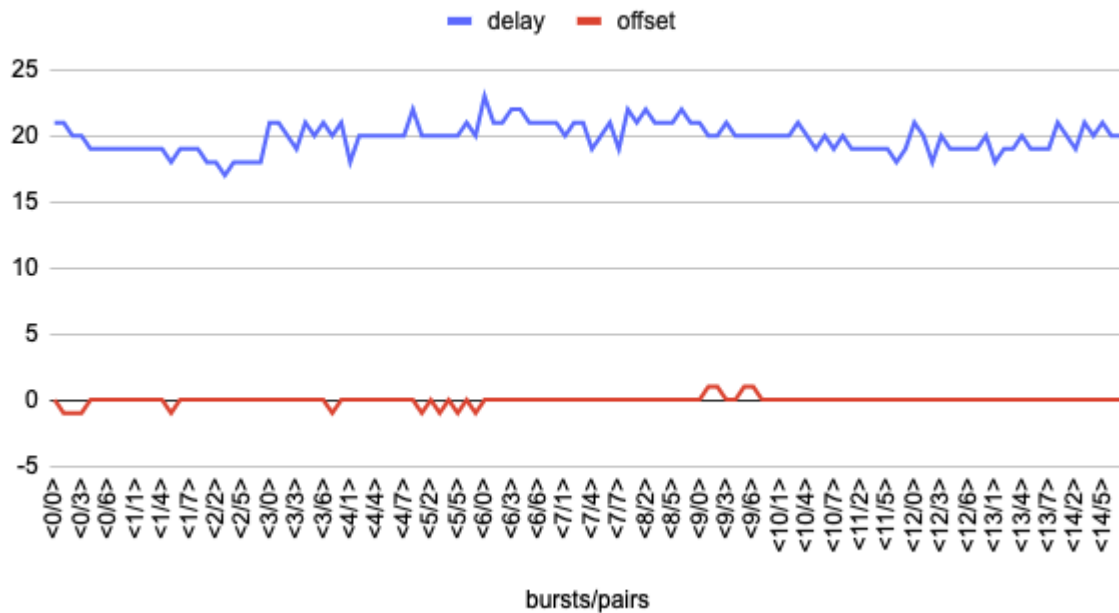


### theta and delta

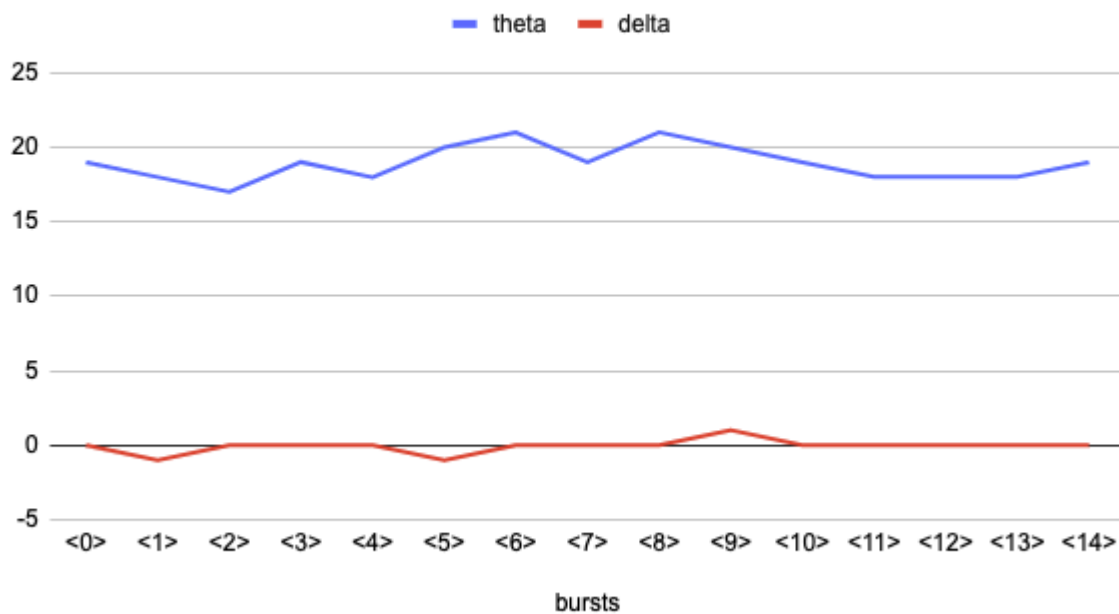


client and server on the same LAN

delay and offset



theta and delta



## Discussion

Based on the graphs above, we can find a pattern that, in general, the higher the delay number(round trip time) is, the higher the offset value will be, which results in a less accurate

current estimate, and vice versa. For example, in NTP communication between LAN, both delay and offset value are quite low, whereas in communication between local and cloud servers, the delay and offset value are generally high and unstable.