COM1005 Assignment 2:

Results:

2.

H7 parent of H8 H8 parent of E H7 grandfather of E

4

/Jill parent of David /Jill is female /Jill parent of Shula /Jill is female /David sibling of Shula /Shula sibling of David /David brother of Shula /David parent of Pip /David is male /Shula parent of Daniel /Shula is female Shula sister of David /David uncle of Daniel Shula aunt of Pip Pip cousin of Daniel Pip nephew of Shula David uncle of Daniel Daniel cousin of Pip Daniel nephew of David

5.

My code came out with a very long answer, so here is the last block:

kf= [Jill mother of David, Jill is female, David father of Pip, Shula mother of Daniel, David brother of Shula, Jill parent of David, Jill is female, Jill parent of Shula, Jill is female, David parent of Pip, David is male, Shula parent of David, Shula sibling of Shula, David sibling of David, Shula sibling of Shula, David sibling of David, Shula sibling of Shula, Shula sibling of Shula, Shula sibling of Shula, Shula sibling of Shula, Shula sibling of Pip, Jill aunt of Pip, Shula aunt of Daniel, David cousin of Shula, Shula sunt of Pip, Shula go Pip, Jill aunt of Pip, Shula aunt of Pip, Daniel sibling of Daniel, Shula cousin of Daniel, Shula sibling of Daniel, Shula sibling of Daniel, Jill aunt of Daniel, Shula sister of David, Shula sister of Shula, Shula sister of David, David cousin of Pip, Daniel cousin of Pip, Daniel nephew of David, David brother of David, David brother of Shula, Shula brother of David, Shula sister of David, Shula sister of David, David cousin of David, Shula sister of Shula, Shula brother of David, Shula sister of Shula, Shula cousin of David, Shula cousin of David, Shula cousin of David, David cousin of David, Pip cousin of Daniel, Pip nephew of Shula, Pip nephew of Shula, Pip pephew of Shula, Pip nephew of Shula, Pip cousin of Daniel, P

the [Daniel nephew of Shula]
pursuing Daniel nephew of Shula]
pursuing Daniel nephew of Shula [Jill mother of Shula, David father of Pip, Shula mother of Daniel, David brother of Shula, Jill parent of David, Jill is female, Jill
parent of Shula, Jill is female, David parent of Pip, David is male, Shula parent of Daniel, Shula is female, David uncle of Daniel, David sibling of David,
David sibling of Shula, David sibling of David, Shula sibling of David, Jill aunt of David, Shula aunt of David, David cousin of David, Shula sibling of Shula,
Shula sibling of Shula, David sibling of Shula, Shula sibling of Shula, Jill aunt of Shula, Shula aunt of Shula, David cousin of Shula, Shula cousin of Shula,
Pip sibling of Pip, Pip sibling of Pip, Jill aunt of Pip, Daniel cousin of Pip, Daniel sibling of Daniel, David uncle of Daniel, David cousin of Daniel, Shula cousin of Daniel, David paniel cousin of Daniel, Shula sister of David, Shula sister of David, Shula sister of David, Shula sister of David, Shula sister of Shula, Shula sister of Shula, Shula aunt of ?c, Daniel cousin of Pip, Daniel nephew of David, David brother of David, David brother of David, Shula sister of David, Shula brother of David, Shula sister of David, Shula brother of David, Shula sister of David, Shula brother of David, Shula sister of Shula, Shula brother of David, Shula sister of David, Shula brother of Shula, Shula brother of Shula,

Shula, Pip nephew of Jill, Pip cousin of Daniel, Pip nephew of Shula, Daniel brother of Daniel, Daniel brother of Daniel, Daniel cousin of David, Daniel cousin of Shula, Daniel nephew of Shula, Daniel nephew of Shula, Daniel nephew of Pip, Daniel nephew of David, Shula aunt of Pip, Shula aunt of Pip, Shula aunt of Daniel, Pip cousin of Daniel, Pip cousin of Daniel, Pip nephew of Shula, Pic cousin of Daniel, Pip, Shula aunt of Daniel, Pip, Shula aunt of Daniel, Pip, Shula aunt of Daniel, Pip nephew of Shula, Pip nephew of Shula, Daniel nephew of Shula, Daniel cousin of Daniel, Pip nephew of Shula, Daniel cousin of Daniel, Daniel nephew of Shula, Daniel cousin of Daniel, Pip nephew of Shula, Daniel cousin of Daniel, Pip nephew of Shula, Daniel cousin of Daniel, Pip nephew of Shula, Pip cousin of Daniel, Daniel nephew of Shula, Daniel cousin

as you can see, it just iterated everything to every rule.

6.
(all times in milliseconds)

The run time of RunRuleNet was:

Start time: 1462826104447 End time: 1462826104473

Time Taken: 26

The run time of TestFChain was:

Start time: 1462826313454 End time: 1462826313521

Time Taken: 67