Some solutions for Assignment 6

- 4.6.2.a and 4.6.b have the same mapping in this case.

  Person(<u>name, addr</u>)
  Child(<u>name, addr</u>,motherName,motherAddr,fatherName,fatherAddr)
  Father(<u>fatherName, fatherAddr</u>)
  Mother(<u>motherName, motherAddr</u>)
  Married(<u>wifeName,wifeAddr</u>,husbandName,husbandAddr)
  childOf(<u>childName,childAddr,parentName,parentAddr</u>)

  Foreign keys:

  FK (name,addr) in Child references key (name,addr) in Person
  FK (fatherName,fatherAddr) in Child references key (name,addr) in Person
  FK (motherName,motherAddr) in Child references key (name,addr) in Person
  FK (fatherName,fatherAddr) in Father references key (name,addr) in Person
  FK (motherName,motherAddr) in Mother references key (name,addr) in Person
  FK (wifeName,wifeAddr) in Married references key (motherName,motherAddr) in Mother
  FK (husbandName,wifeAddr) in Married references key (fatherName,fatherAddr) in Father

  I dropped 4.6.2.c from this problem set since we did not cover this in class.

- − 4.6.1 a
    Department(<u>name</u>, chair)
    Course(<u>cdept,cnumber</u>, room)
    LabCourse(<u>cdept,cnumber</u>, computerallocation)

    Foreign keys:

    FK (cdept) in Course references key (name) in Department
    FK (cdept,number) in LabCourse references key (cdept,number) in Course

  − 4.6.1 b
    Department(<u>name</u>, chair)
    Course(<u>cdept,cnumber</u>, room)
    LabCourse(<u>cdept,cnumber</u>, computerallocation,room,chair)

    Foreign keys:

    FK (cdept) in Course references key (name) in Department
    FK (cdept,number) in LabCourse references key (cdept,number) in Course