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CSCI3170 Assignment 1

Question 1

1. paper(title, author)

cite(cite-title, being-cited-title)

1. person(driver-id, address, name)

car(license, model, year)

accident(report-number, location, date)

owns(driver-id, license)

participated(driver-id, license, report-number, damage-amount)

Question 2

Diagram

Description automatically generated

Since the given relational schemes do not specify the primary keys, we assume the relation “buy” has only primary key “product\_id” such that it is a 1:M relationship.

Question 3

1. {pid, pname, funding}, {pid, pname}, {pid, funding}, {pname, funding}, {pid}
2. {dname}, {location, dhead}

Diagram

Description automatically generated

1. "Assign" is uniquely identified by the participating entities, that is each "Student", "Project" and "Advisor" can only form a tuple in "Assign". To resolve the issue, adding "Assignment” does allow a "Advisor" assigns a "Project" to a "Student" more than once with different "Distributed date" of "Assignment". See the diagram below.

Diagram

Description automatically generated