

CS450_summer

Date : 07/13/2017

Assignment 3: Relational Algebra

Queries

1.

project (select ((Items rename (lid as Ino, Iname as N, Desc as Description, Quant as Q, Price as P, Dcode as D)) join (project (select(Available join (Available rename (Sno as S, lid as I, Cost as C))) where (Sno<S) and (Cost=C) and (lid=I)) over lid)) where Ino = lid) over Ino, Description

2.

project (select ((Items rename (lid as Ino, Iname as N, Desc as Description, Quant as IQuant, Price as P, Dcode as D)) join (select (Purchase join (Procurement rename (TransNo as T, lid as I, Sid as S, Quantity as Q, Date as D))) where (lid = I) and (Quantity > Q))) where Ino = I) over Ino, Description

3.

(project (select Items where Quant > 20) over lid, Desc) difference (project(Items join (project(select Purchase where Date > 170000)over lid))over lid, Desc)

4.

project (select(Items rename (lid as Ino, Iname as N, Desc as Description, Quant as IQuant, Price as P, Dcode as D) join Procurement) where (Ino = lid) and (IQuant > 20) and (Date > 160000) and (Date < 170000)) over Ino, Description

5.

project (select (Customers join ((project (select Creditcard where Exp < 170714) over Owner) difference (project (select Creditcard where Exp > 170714) over Owner))) where Cid = Owner) over Cid, Cname

6.

project(Customers join (divide (project (select (Customers join (Creditcard join (Purchase join (project (select Available where Sno = "S001") over lid)))) where Cid = Owner) over lid, Cid) by (project (select Available where Sno = "S001") over lid)))over Cid, Cname

7.

project (select (Customers join (Creditcard join (select (Purchase join Items) where (Date > 160000)
and (Date < 170000) and (Price > 100)))) where Cid = Owner) over Cid, Cname

8.

project (select ((project Employees over Eid, Ename, WorkDept) join (project Departments over Dcode,
Manager)) where (Manager = Eid) and (Dcode <> WorkDept)) over Eid, Ename, WorkDept, Dcode

9.

project (select(Employees join (Employees rename Eid as E1, Ename as N1, skills as S1, WorkDept as
W1)) where(Eid <> E1)and (WorkDept = W1) and (skills = S1)) over Eid, Ename, E1, N1

10.

(project (select(Employees join (Employees rename Eid as E1, Ename as N1, skills as S1, WorkDept as
W1)) where(Eid <> E1)and (WorkDept = W1) and (skills = S1)) over Eid, Ename, E1, N1) difference
(project (select(Employees join (Employees rename Eid as E1, Ename as N1, skills as S1, WorkDept as
W1)) where(Eid = E1)and (WorkDept = W1) and (skills <> S1)) over Eid, Ename, E1, N1)