

sur site1:

>>>>>

```
create table compte as(select compte.* from compte@lienCentre,clients@lienCentre where
compte.idclient=clients.idclient and ville='Casablanca' and
```

```
solde<0);
```

```
create table clients as(select distinct clients.* from clients@lienCentre,compte where
clients.idclient=compte.idclient);
```

```
create table agence as(select distinct agence.* from agence@lienCentre,compte where
agence.idagence=compte.idagence);
```

sur site2:

>>>>>>

```
create table compte as(select compte.* from compte@lienCentre,clients@lienCentre where
compte.idclient=clients.idclient and ville='Rabat' and
```

```
solde>=0);
```

```
create table clients as(select distinct clients.* from clients@lienCentre,compte where
clients.idclient=compte.idclient);
```

```
create table agence as(select distinct agence.* from agence@lienCentre,compte where
agence.idagence=compte.idagence);
```

Creation des synonymes:

>>>>>>

```
create public synonym ClientsSite1 for Clients@lienSite1;
```

```
create public synonym CompteSite1 for Compte@lienSite1;
```

```
create public synonym AgenceSite1 for Agence@lienSite1;
```

```
create public synonym ClientsSite2 for Clients@lienSite2;
```

```
create public synonym CompteSite2 for Compte@lienSite2;
```

```
create public synonym AgenceSite2 for Agence@lienSite2;
```

Duplication du fragment du site 1 dans 2 :

>>>>>>>

```
create table Clients1 as(select Clients.* from Clients@lienSite1);
```

```
create table Compte1 as(select Compte.* from Compte@lienSite1);
```

```
create table Agence1 as(select agence.* from agence@lienSite1);
```

Trigger de duplication:

>>>>>>>>

```
create or replace trigger SYNCH_DUPLI_Client
```

```
before insert or update or delete on Clients
```

```
for each row
```

```
begin
```

```
begin
```

```
if inserting then
```

```
insert into clients1@liensite2
```

```
values(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);
```

```
elsif updating then
```

```
update clients1@liensite2 set ville=:new.ville,age=:new.age where idclient=:new.idclient;
```

```
elsif deleting then
```

```
delete from clients1@liensite2 where idclient=:old.idclient;
```

```
end if;
```

```
end;
```

```
end;
```

```
create or replace trigger SYNCH_DUPLI_Client
```

```
before insert or update or delete on Clients
```

```
for each row
```

```

begin
    begin
        if inserting then

            insert into clients1@liensite2
values(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);

        elsif updating then

            update clients1@liensite2 set ville=:new.ville,age=:new.age where idclient=:new.idclient;

        elsif deleting then

            delete from clients1@liensite2 where idclient=:old.idclient;

        end if;

    end;
end;

```

```

create or replace trigger Synch_InsertCompte

```

```

before insert on Compte

```

```

for each row

```

```

begin

```

```

    declare

```

```

    ville_c clients.ville%type;

```

```

    c_client clients%rowtype;

```

```

    c_agence agence%rowtype;

```

```

    count_agence integer;

```

```

    count_c integer;

```

```

begin

select ville into ville_c from clients where idclient=:new.idclient;

if(ville_c='Casablanca' and :new.solde<0)then

    select count(*) into count_c from clientssite1 where idclient=:new.idclient;

    if(count_c=0)then

        select clients.* into c_client from clients where idclient=:new.idclient;

        insert into clientssite1 values c_client;

    end if;

    select count(*) into count_agence from agencesite1 where idagence=:new.idagence;

    if(count_agence=0)then

        select agence.* into c_agence from agence where idagence=:new.idagence;

        insert into agencesite1 values c_agence;

    end if;

    insert into comptesite1 values
(:new.idcompte,:new.numcompte,:new.solde,:new.idclient,:new.idagence);

elseif(ville_c='Rabat' and :new.solde>=0)then

    select count(*) into count_c from clientssite2 where idclient=:new.idclient;

    if(count_c=0)then

        select clients.* into c_client from clients where idclient=:new.idclient;

        insert into clientssite2 values c_client;

    end if;

    select count(*) into count_agence from agencesite2 where idagence=:new.idagence;

    if(count_agence=0)then

        select agence.* into c_agence from agence where idagence=:new.idagence;

        insert into agencesite2 values c_agence;

    end if;

```

```
        insert into compsite1 values
(:new.idcompte,:new.numcompte,:new.solde,:new.idclient,:new.idagence);

    end if;

end;

end;
```

create or replace trigger Synch_deleteClient

before delete on Clients

for each row

begin

declare

c1 integer;

c2 integer;

begin

select count(*) into c1 from compteSite1 where idclient=:old.idclient;

select count(*) into c2 from compteSite2 where idclient=:old.idclient;

if(:old.ville='Casablanca' and c1>0)then

delete from ClientsSite1 where idclient=:old.idclient;

elsif(:old.ville='Rabat' and c2>0)then

delete from ClientsSite2 where idclient=:old.idclient;

end if;

end;

end;

create or replace trigger Synch_deleteCompte

before delete on Compte

for each row

begin

declare

v clients.ville%type;

count_c integer;

begin

select ville into v from clients where idclient=:old.idclient;

if(v='Casablanca' and :old.solde<0)then

delete from comptesite1 where idcompte=:old.idcompte;

select count(*) into count_c from comptesite1 where idclient=:old.idclient;

if(count_c=0)then

delete from clientssite1 where idclient=:old.idclient;

end if;

elsif(v='Rabat' and :old.solde >=0)then

delete from comptesite2 where idcompte=:old.idcompte;

select count(*) into count_c from comptesite2 where idclient=:old.idclient;

if(count_c=0)then

delete from clientssite2 where idclient=:old.idclient;

end if;

end if;

end;

end;

create or replace trigger SYN_UPDATECLIENT

before update on Clients

for each row

begin

declare

count_c_positif integer;

count_c_negatif integer;

count_agence integer;

cursor cur1 is(select compte.* from compte where idclient=:new.idclient and solde<0);

cursor cur2 is(select compte.* from compte where idclient=:new.idclient and solde>=0);

a agence%rowtype;

r compte%rowtype;

begin

select count(*) into count_c_negatif from compte where idclient=:new.idclient and solde<0;

select count(*) into count_c_positif from compte where idclient=:new.idclient and solde>=0;

if(:old.ville='Casablanca')then

if(:new.ville='Casablanca')then

if(count_c_negatif>0)then

update clientssite1 set age=:new.age where idclient=:new.idclient;

end if;

else

if(count_c_negatif>0)then

delete from clientssite1 where idclient=:old.idclient;

end if;

if(:new.ville='Rabat')then

if(count_c_positif>0)then

```

        insert into clientssite2
values(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);

        open cur2;

        fetch cur2 into r;

        while cur2%found loop

            insert into comptesite2 values r;

            fetch cur2 into r;

        end loop;

        close cur2;

    end if;

end if;

end if;

elseif(:old.ville='Rabat')then

    if(:new.ville='Rabat')then

        if(count_c_positif>0)then

            update clientssite2 set age=:new.age where idclient=:new.idclient;

        end if;

    else

        if(count_c_positif>0)then

            delete from clientssite2 where idclient=:old.idclient;

        end if;

        if(:new.ville='Casablanca')then

            if(count_c_negatif>0)then

                insert into clientssite1
values(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);

                open cur1;

                fetch cur1 into r;

                while cur1%found loop

```



```

        insert into compsite1 values r;

        fetch cur1 into r;

    end loop;

    close cur1;

end if;

end if;

end if;

else

    if(:new.ville='Casablanca')then

        if(count_c_negatif>0)then

            insert into clientssite1 values
(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);

            open cur1;

            fetch cur1 into r;

            while cur1%found loop

                insert into compsite1 values r;

                fetch cur1 into r;

            end loop;

            close cur1;

        end if;

    elsif(:new.ville='Rabat')then

        if(count_c_positif>0)then

            insert into clientssite2
values(:new.idclient,:new.nomclient,:new.prenomclient,:new.ville,:new.age);

            open cur2;

            fetch cur2 into r;

            while cur2%found loop

                insert into compsite2 values r;

```

```

        fetch cur2 into r;

    end loop;

    close cur2;

end if;

end if;

end if;

end;

end;

```

create or replace trigger syn_update_compte

before update on compte

for each row

begin

declare

v clients.ville%type;

count_compte integer;

count_client integer;

count_agence integer;

r clients%rowtype;

a agence%rowtype;

begin

select ville into v from clients where idclient=:new.idclient;

if(v='Casablanca')then

if(:old.solde<0)then

if(:new.solde<0)then

update comptesite1 set solde=:new.solde where idcompte=:new.idcompte;

elsif(:new.solde>=0)then

```

delete from comptesite1 where idcompte=:old.idcompte;

select count(*) into count_compte from comptesite1 where idclient=:old.idclient;

if(count_compte=0)then

    delete from clientssite1 where idclient=:old.idclient;

end if;

end if;

elsif(:old.solde>=0)then

    if(:new.solde<0)then

        select count(*) into count_client from clientssite1 where idclient=:new.idclient;

        if(count_client=0)then

            select clients.* into r from clients where idclient=:new.idclient;

            insert into clientssite1 values r;

        end if;

        select count(*) into count_agence from agencesite1 where idagence=:new.idagence;

        if(count_agence=0)then

            select agence.* into a from agence where idagence=:new.idagence;

            insert into agencesite1 values a;

        end if;

        insert into comptesite1 values
(:new.idcompte,:new.numcompte,:new.solde,:new.idclient,:new.idagence);

    end if;

end if;

elsif(v='Rabat')then

    if(:old.solde>=0)then

        if(:new.solde>=0)then

            update comptesite2 set solde=:new.solde where idcompte=:new.idcompte;

        elsif(:new.solde<0)then

            delete from comptesite2 where idcompte=:old.idcompte;

```

[illegible]

```
select clients.idclient,nomclient,prenomclient,ville,age from clients,compte where  
clients.idclient=compte.idclient and ville='Casablanca' and solde>0;
```

```
select distinct Tab1.idclient,Tab1.nomclient,tab1.prenomclient,tab1.ville,tab1.age from Tab1,Tab2  
where Tab1.idclient=Tab2.idclient;
```

```
select distinct idclient,nomclient,prenomclient,ville,age from (select clients.* from clients,compte  
where clients.idclient=compte.idclient and ville='Casablanca' and solde>=0)
```

```
where idclient in (select idclient from clientssite1);
```