**HOMEWORK**

1. Run the following script:

CREATE TABLE tbl\_accounts (accid NUMBER(6), balance NUMBER (10,2),

check (balance>=0));

INSERT INTO tbl\_accounts VALUES (1169, 7350.00);

INSERT INTO tbl\_accounts VALUES (1170, 8900.46);

COMMIT;

Open two independence session (Ctrl + Shift + N), run these statements.

| **Time** | **Session1** | **Output1** | **Session2** | **Output2** |
| --- | --- | --- | --- | --- |
| t0 | SET TRANSACTION NAME 'HW1'; |  |  |  |
| t1 | Update tbl\_accounts set balance=balance+79 where accid=1169; |  |  |  |
| t2 | Select \* from tbl\_accounts; |  | Select \* from tbl\_accounts; |  |
| t3 | Commit; |  |  |  |
| t4 | Select \* from tbl\_accounts; |  | Select \* from tbl\_accounts; |  |

Why the result is difference at time t2?

Is the data at time t4 still difference? Why?

1. Run the following script:

Drop table tbl\_accounts;

CREATE TABLE tbl\_accounts (accid NUMBER(6), balance NUMBER (10,2),

check (balance>=0));

INSERT INTO tbl\_accounts VALUES (1169, 7350.00);

INSERT INTO tbl\_accounts VALUES (1170, 8900.46);

INSERT INTO tbl\_accounts VALUES (1175, 679.50);

INSERT INTO tbl\_accounts VALUES (1177, 400000);

COMMIT;

/

Create or replace procedure decAccount

As

Begin

For acc in (select \* from tbl\_accounts order by accid asc )

Loop

Update tbl\_accounts set balance=balance-1000 where accid=acc.accid;

End loop;

End;

|  |  |  |
| --- | --- | --- |
| **Time** | **Session1** | **Output1** |
| t0 | select \* from tbl\_accounts; |  |
| t1 | begin  decAccount;  end; |  |
| t2 | select \* from tbl\_accounts; |  |

Compare data at time t0 and t2. Why is the data not difference?

1. Run the following script:

Drop table tbl\_accounts;

CREATE TABLE tbl\_accounts (accid NUMBER(6), balance NUMBER (10,2),

check (balance>=0));

INSERT INTO tbl\_accounts VALUES (1169, 7350.00);

INSERT INTO tbl\_accounts VALUES (1170, 8900.46);

INSERT INTO tbl\_accounts VALUES (1175, 679.50);

INSERT INTO tbl\_accounts VALUES (1177, 400000);

COMMIT;

Create or replace procedure decAccount

As

Begin

For acc in (select \* from tbl\_accounts order by accid asc)

Loop

Update tbl\_accounts set balance=balance-1000 where accid=acc.accid;

**Commit;**

End loop;

End;

|  |  |  |
| --- | --- | --- |
| **Time** | **Session1** | **Output1** |
| t0 | select \* from tbl\_accounts; |  |
| t1 | begin  decAccount;  end; |  |
| t2 | select \* from tbl\_accounts; |  |

Why is the data at time t0 and t2 difference?