Assignment 4:

Exception Handling:

**Q1) Write a stored function to accept the bus\_no and date and print its allotted drivers. Raise an exception in case of invalid bus number.**

create or replace function chk\_drivers(int, date)

returns void as'

declare

bn int;

rec record;

begin

select into bn bno from bus where bno=$1;

if(bn is null) then

raise exception''Invalid bus number!'';

else

for rec in select dname from driver,bus,bd where bus.bno=bd.bno and driver.dno=bd.dno and bd.bno=$1 and duty\_date=$2

loop

raise notice''The alloted driver name is %:'',rec.dname;

end loop;

end if;

end;'

language 'plpgsql';

CREATE FUNCTION

select chk\_drivers(1001,'02-05-2020');

NOTICE: The alloted driver name is Shankar:

chk\_drivers

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**Q2) Write a stored function to display the all Dates on which a driver has driven any bus.(Accept driver name as input parameter).Raise an exception in case of invalid driver name.**

create or replace function disp\_date(text)

returns void as'

declare

name text;

rec record;

begin

select into name dname from driver where dname=$1;

if(name is null) then

raise exception''Invalid driver name....'';

for rec in select duty\_date,bno from bd,driver where driver.dno=bd.dno and dname=$1

loop

raise notice''The dates on which driver has driven bus are: % %'',rec.duty\_date,rec.bno;

end loop;

end if;

end;'

language 'plpgsql';

CREATE FUNCTION

select disp\_date('Shankar');

NOTICE: The dates on which driver has driven bus are: 2020-05-02 1001

NOTICE: The dates on which driver has driven bus are: 2020-06-15 1002

disp\_date

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**Q3) Write a stored function to display the details of the buses that run on route\_no = “ ”. (accept route\_no as input parameter). Raise an error in case of invalid driver name.**

create or replace function bus\_details(int)

returns void as'

declare

r int;

rec record;

begin

select into r rno from route where rno=$1;

if (r is null) then

raise exception''Invalid route number....'';

else

for rec in select bno,capacity,depot\_name from bus where rno = $1

loop

raise notice''The details of bus running on given route number are: % % %'',rec.bno, rec.capacity, rec.depot\_name;

end loop;

end if;

end;'

language 'plpgsql';

CREATE FUNCTION

select bus\_details(102);

NOTICE: The details of bus running on given route number are: 1003 45 Bhosari

bus\_details

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