

**NATIONAL INSTITUTE OF TECHNOLOGY,  
TIRUCHIRAPPALLI-15**



**Department of Computer Applications**

**TASKHUB**  
(DBMS PROJECT)

*Submitted By*

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*Under the guidance of*

**Dr. R Eswari**

*Submitted in fulfillment of the project in PL/SQL*

# NATIONAL INSTITUTE OF TECHNOLOGY, TIRUCHIRAPPALLI - 15



## CERTIFICATE

*This is to certify that **SUKHLAL AHIRWAR**, student of 2<sup>nd</sup> semester MCA (batch 2018-2021) of National Institute of Technology, Tiruchirappalli has successfully completed the project '**TASKHUB**' PL/SQL under the guidance of **Dr. R Eswari**.*

Signature

(Dr. R Eswari)

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## PROBLEM DESCRIPTION AND ANALYSIS

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The Project titled "TASKHUB" is a database management system for Task provided by Keen and Solved by Wizard. Problem statement will be given by keen in the form of task, a task can be any of the business operation or execution which is commercially legal and a task may be a Query or Drought regarding any of the Procedure and any kind of enthusiasm.

# SCHEMA AND TABLE DESCRIPTION

---

## TABLE: KEEN

Name	Null?	Type
-----		
KEENID	NOT NULL	VARCHAR2(10)
PASSWORD	NOT NULL	VARCHAR2(20)
NAME	NOT NULL	VARCHAR2(20)
GENDER	NOT NULL	CHAR(1)
DOB	NOT NULL	DATE
MOBILE	NOT NULL	NUMBER(10)
EMAIL		VARCHAR2(30)
ADDRESS		VARCHAR2(30)
JOIN	NOT NULL	DATE
TASKASK	NOT NULL	NUMBER(5)

## TABLE: WIZARD

Name	Null?	Type
-----		
WIZARDID	NOT NULL	VARCHAR2(10)
PASSWORD	NOT NULL	VARCHAR2(20)
NAME	NOT NULL	VARCHAR2(20)
GENDER	NOT NULL	CHAR(1)
DOB	NOT NULL	DATE
MOBILENO	NOT NULL	NUMBER(10)
EMAIL		VARCHAR2(30)
ADDRESS		VARCHAR2(20)
WJOIN	NOT NULL	DATE
SOLVED	NOT NULL	NUMBER(5)

TABLE: **TASK**

Name	Null?	Type
-----		
TASKID	NOT NULL	VARCHAR2(10)
DES	NOT NULL	VARCHAR2(100)
TIME	NOT NULL	DATE
KEENID	NOT NULL	VARCHAR2(10)
ISSOLVE	NOT NULL	CHAR(1)

TABLE: **PROPOSE**

Name	Null?	Type
-----		
PID	NOT NULL	VARCHAR2(10)
TASKID	NOT NULL	VARCHAR2(10)
WIZID	NOT NULL	VARCHAR2(10)
DURATION	NOT NULL	NUMBER(5)
TIME	NOT NULL	DATE
ISACCEPT	NOT NULL	CHAR(1)

TABLE: **SOLUTION**

Name	Null?	Type
-----		
SID	NOT NULL	VARCHAR2(10)
PID	NOT NULL	VARCHAR2(10)
SOL	NOT NULL	VARCHAR2(100)
TAKETIME	NOT NULL	NUMBER(5)

# CREATING TABLES

---

## **CREATE TABLE TASK**

```
(      "TASKID" VARCHAR2(10 BYTE) NOT NULL
ENABLE,
      "DES" VARCHAR2(100 BYTE) NOT NULL ENABLE,
      "TIME" DATE NOT NULL ENABLE,
      "KEENID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "ISSOLVE" CHAR(1 BYTE) NOT NULL ENABLE,
      PRIMARY KEY ("TASKID"),
      CONSTRAINT "SYSTASKID" CHECK (TASKID LIKE
'T%') ENABLE
) ;
```

## **CREATE TABLE KEEN**

```
(      "KEENID" VARCHAR2(10 BYTE) NOT NULL
ENABLE,
      "PASSWORD" VARCHAR2(20 BYTE) NOT NULL
ENABLE,
      "NAME" VARCHAR2(20 BYTE) NOT NULL ENABLE,
      "GENDER" CHAR(1 BYTE) NOT NULL ENABLE,
      "DOB" DATE NOT NULL ENABLE,
      "MOBILE" NUMBER(10,0) NOT NULL ENABLE,
      "EMAIL" VARCHAR2(30 BYTE),
      "ADDRESS" VARCHAR2(30 BYTE),
      "JOIN" DATE NOT NULL ENABLE,
      "TASKASK" NUMBER(5,0) DEFAULT 0 NOT NULL
ENABLE,
      CONSTRAINT "SYS_KEENEMAILAT" CHECK (EMAIL
LIKE '%@%') ENABLE,
```

```

        CONSTRAINT "SYSKEENPRIMARY" PRIMARY KEY
("KEENID"),
        CONSTRAINT "SYSKEENADDK" CHECK (KEENID LIKE
'K%') ENABLE,
        CONSTRAINT "SYSKEENADDMF" CHECK (GENDER IN
('M','F')) ENABLE
    ) ;

```

```

CREATE TABLE "WIZARD"
(
    "WIZARDID" VARCHAR2(10 BYTE) NOT NULL
ENABLE,
    "PASSWORD" VARCHAR2(20 BYTE) NOT NULL
ENABLE,
    "NAME" VARCHAR2(20 BYTE) NOT NULL ENABLE,
    "GENDER" CHAR(1 BYTE) NOT NULL ENABLE,
    "DOB" DATE NOT NULL ENABLE,
    "MOBILENO" NUMBER(10,0) NOT NULL ENABLE,
    "EMAIL" VARCHAR2(30 BYTE),
    "ADDRESS" VARCHAR2(20 BYTE),
    "WJOIN" DATE NOT NULL ENABLE,
    "SOLVED" NUMBER(5,0) DEFAULT 0 NOT NULL
ENABLE,
    CONSTRAINT "SYSWIZPRI" PRIMARY KEY
("WIZARDID"),
    CONSTRAINT "SYSWIZMF" CHECK (GENDER IN
('M','F')) ENABLE,
    CONSTRAINT "SYSWIZEMAILAT" CHECK (EMAIL
LIKE '%@%') ENABLE,
    CONSTRAINT "SYSWIZW" CHECK (WIZARDID LIKE
'W%') ENABLE
) ;

```



**CREATE TABLE "PROPOSE"**

```
(      "PID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "TASKID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "WIZID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "DURATION" NUMBER(5,0) NOT NULL ENABLE,
      "TIME" DATE NOT NULL ENABLE,
      "ISACCEPT" CHAR(1 BYTE) NOT NULL ENABLE,
      CONSTRAINT "SYSPROISA" CHECK (ISACCEPT IN
('Y','N')) ENABLE,
      CONSTRAINT "SYSPROP" CHECK (PID LIKE 'P%')
ENABLE,
      CONSTRAINT "SYSPROPRI" PRIMARY KEY ("PID")
,
      CONSTRAINT "SYSTASKFOR" FOREIGN KEY
("TASKID")
      REFERENCES "TASK" ("TASKID") ENABLE,
      CONSTRAINT "SYSPROWFOR" FOREIGN KEY
("WIZID")
      REFERENCES "WIZARD" ("WIZARDID") ENABLE
) ;
```

**CREATE TABLE "SOLUTION"**

```
(      "SID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "PID" VARCHAR2(10 BYTE) NOT NULL ENABLE,
      "SOL" VARCHAR2(100 BYTE) NOT NULL ENABLE,
      "TAKETIME" NUMBER(5,0) NOT NULL ENABLE,
      CONSTRAINT "SYSSOLP" FOREIGN KEY ("PID")
      REFERENCES PROPOSE ("PID") ENABLE
) ;
```

```
CREATE TABLE LOGIN
  ( STATUS CHAR(1) DEFAULT 'F',
    ID VARCHAR2(10),
    CONSTRAINT "LOGINSTATUS" CHECK (STATUS IN
('T','F')) ENABLE
  );
```

```
CREATE SEQUENCE SEQ
  START WITH 1
  INCREMENT BY 1
  CACHE 10000;
```

## INITIALIZING VALUES

---

```
SET SERVEROUTPUT ON;
SET LINESIZE 200;
SET PAGESIZE 200;
```

# MODULES

---

## **PACKAGE: PROALL**

CREATE OR REPLACE

PACKAGE PROALL AS

```
    procedure logout;  
    procedure myrights;  
    procedure proposeaccept(id in varchar2);  
    procedure proposetask(v in varchar2,t  
varchar2);  
    procedure signin(id in varchar2,pass in  
varchar2);  
    procedure signup;  
    procedure solve;  
    procedure taskhub;  
    procedure taskask;  
END PROALL;
```

## PROCEDURES, VIEW AND TRIGGER

---

```
CREATE OR REPLACE PROCEDURE LOGOUT AS
BEGIN
    update login set status='F';
END LOGOUT;
```

```
CREATE OR REPLACE PROCEDURE MYRIGHTS IS
cursor c1 is select id from login;
cursor c2 is select status from login;
id varchar2(10);
t char(1);
BEGIN
open c1;
open c2;
fetch c2 into t;
    if t='T' then
        fetch c1 into id;
        if id like 'W%' then
            DBMS_OUTPUT.PUT_LINE('WIZARD:');
            DBMS_OUTPUT.PUT_LINE('1.PROPOSE A TASK
:propose(taskid)');
            DBMS_OUTPUT.PUT_LINE('2.PROVIDE SOLUTION
:solve(proposeid,solution)');
            DBMS_OUTPUT.PUT_LINE('3.SEARCH TASK :task');
            DBMS_OUTPUT.PUT_LINE('4.SEARCH MY Proposals
:totalproposed');
            DBMS_OUTPUT.PUT_LINE('5.SEARCH proposed
accepted :searchaccepted');
            DBMS_OUTPUT.PUT_LINE('6.LOGOUT : logout');
        end if;
        if id like 'K%' then
            DBMS_OUTPUT.PUT_LINE('KEEN:');
```

```

        DBMS_OUTPUT.PUT_LINE('1.TASK :
taskask(desc)');
        DBMS_OUTPUT.PUT_LINE('2.SEARCH SOLUTION
:searchsolve()');
        DBMS_OUTPUT.PUT_LINE('3.ASKED TASK
:asktask');
        DBMS_OUTPUT.PUT_LINE('3.SEARCH PROPOSED
:task');
        DBMS_OUTPUT.PUT_LINE('4.PROPOSE
ACCEPT:proposeaccept(pid)');
        DBMS_OUTPUT.PUT_LINE('5.LOGOUT : logout');
        end if;
        else
        DBMS_OUTPUT.PUT_LINE(' Login Please
!!!!!!!!!!!!');
        end if;
close c1;
close c2;
END MYRIGHTS;

```

```

CREATE OR REPLACE PROCEDURE PROPOSEACCEPT(id in
varchar2)AS
BEGIN
    update propose set isaccept='Y' where pid=id;
END PROPOSEACCEPT;

```

```

create or replace PROCEDURE SIGNIN(idd in
varchar2,pass in varchar2)  is

```

```

k KEEN.KEENID%type;
w WIZARD.WIZARDID%type;
d varchar2(20);
p varchar2(20);

```

```

cursor c3 is select password from keen where
keenid=idd;
cursor c4 is select password from wizard where
wizardid=idd;
BEGIN
  open c3;
  open c4;

  delete from login;
  fetch c3 into p;
  fetch c4 into d;
  if pass = p then
    DBMS_OUTPUT.PUT_LINE('KEEN LOGGED IN');
  else if pass = d then
    DBMS_OUTPUT.PUT_LINE('WIZARD LOGGED IN');
  else
    DBMS_OUTPUT.PUT_LINE('Wrong ID password');
  end if;
end if;
close c3;
close c4;
insert into login values('T',idd);
END SIGNIN;

```

```

create or replace PROCEDURE PROPOSETASK(id in
varchar2,dur in number ) is
pid varchar2(10) ;
w varchar2(10);
BEGIN
  pid := concat('P',seq.nextval);

  select id into w from login;
  insert into propose
(pid,taskid,wizid,duration,time,isaccept)
values(pid,id,w,dur,sysdate,'N');

```

```
END PROPOSETASK;  
/
```

```
CREATE OR REPLACE PROCEDURE SIGNUP(kw in  
varchar2,n in varchar2,p in varchar2,g in char,d  
in date,m in number,e in varchar2,a in varchar2)  
is  
id varchar2(10);  
BEGIN  
    if kw='keen' or kw='KEEN' then  
        id:=concat('K',seq.nextval);  
        insert into keen  
values(id,p,n,g,d,m,e,a,sysdate,0);  
        DBMS_OUTPUT.PUT_line(concat('Your ID is:',id));  
  
        else if kw='wizard' or kw='WIZARD' then  
            id:=concat('W',seq.nextval);  
            insert into wizard  
values(id,p,n,g,d,m,e,a,sysdate,0);  
            DBMS_OUTPUT.PUT_line(concat('Your ID is:',id));  
  
        else  
            dbms_output.put_line('worng input format');  
        end if;  
    end if;  
  
END SIGNUP;
```

```
CREATE OR REPLACE PROCEDURE SOLVE(p in  
varchar2,de in varchar2) AS  
idd varchar2(10);  
t    number(5);  
BEGIN  
    idd:=concat('S',seq.nextval);
```

```

    select round(time-sysdate) into t from propose
where pid=p;
    insert into solution values (idd,p,de,t);
END SOLVE;

```

```

CREATE OR REPLACE PROCEDURE TASKASK(des in
varchar2) is
cursor c1 is select id from login;
id varchar2(10);
tid varchar2(10);
BEGIN
open c1;
fetch c1 into id;
close c1;
tid:=concat('T',seq.nextval);
    insert into task
values(tid,des,sysdate,id,'F');
    dbms_output.put_line(tid);
END TASKASK;

```

```

create or replace procedure TaskHub is
begin
dbms_output.put_line('##### TASKHUB
#####');
dbms_output.put_line('1. signin(id,password) ');
dbms_output.put_line('2.
signup(keen/wizard,name,password,gender (M/F) ,dob
,monile,email,address) ');

end taskhub;

```



**CREATE OR REPLACE VIEW ASKTASK AS**

```
SELECT des as TASK
FROM task where
keenid=(select id from login);
```

**create or replace view searchaccepted as**

```
select PID from propose where wizid=(select id
from login) and isaccept='Y';
```

**create or replace view searchproposed as**

```
select
propose.PID,propose.TASKID,propose.WIZID,propose
.duration from propose,task,keen,login where
propose.taskid=task.taskid and
task.keenid=keen.keenid and keen.keenid=login.id
and task.issolve='F';
```

**create or replace view searchsolve as**

```
select sol from solution , propose , task ,
login,keen where solution.pid=propose.pid and
(propose.taskid=task.taskid) and (task.keenid =
keen.keenid) and (keen.keenid = login.id) ;
```

**create or replace view searchtask as**

```
select taskid,des,time from task where
issolve='F' ;
```

```
create or replace view totalpropose as  
select PID from propose where wizid=(select id  
from login);
```

#### **CREATE OR REPLACE TRIGGER ISSOLVE**

```
after INSERT ON solution  
REFERENCING OLD AS OLD NEW AS NEW  
for each row  
declare  
p varchar2(10);  
BEGIN  
    select task.taskid into p from propose,task  
where propose.pid=:new.pid and  
propose.taskid=task.taskid;  
    update task set issolve='T' where taskid=p;  
END;
```

#### **CREATE OR REPLACE TRIGGER INCASK**

```
AFTER INSERT ON task  
REFERENCING OLD AS OLD NEW AS NEW  
FOR EACH ROW  
declare  
ta number(5);  
BEGIN  
select taskask into ta from keen where  
keenid=:new.keenid;  
    update keen set taskask=ta+1 where  
keenid=:new.keenid;  
END;
```

# ENHANCEMENT AND CONCLUSION

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## **Enhancement:**

TASKHUB is a best idea for a centralized platform for every kind of business Where any of the broker is needed. Broker system will be removed from the service provider and customer.

This is the Web Application Project so efficiency, reliability and speed of work will be increased. Reaching to the customers will be very easy for service providers. This will be the central communication hub for selling the services.

## **Conclusion:**

My project TASKHUB direct me to learn the working of database concepts and Working procedure of seller and buyer.

How the database system helps in real world. Dr. R Eswari support me to work and teach me to handle this problem.

# REFERENCES AND BIBLIOGRAPHY

---

1. **Koch and Loney** – Oracle 8 : The complete reference
2. **Ivan Bayross** - SQL, PL/SQL : The programming language of Oracle
3. **Korth and Sudershan** - Database System Concepts
4. **Oracle sql/plsql tutorial**