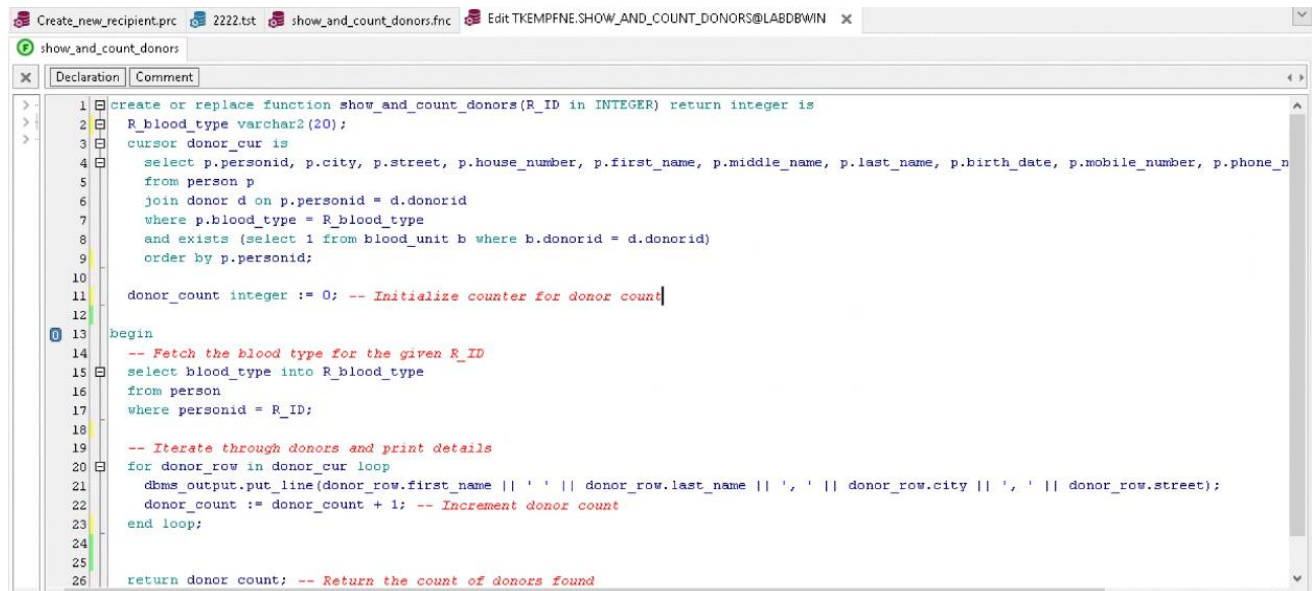


## דוח הגשת הפרויקט שלב 3

מגישות שירה הופמן וטל קמפנר.

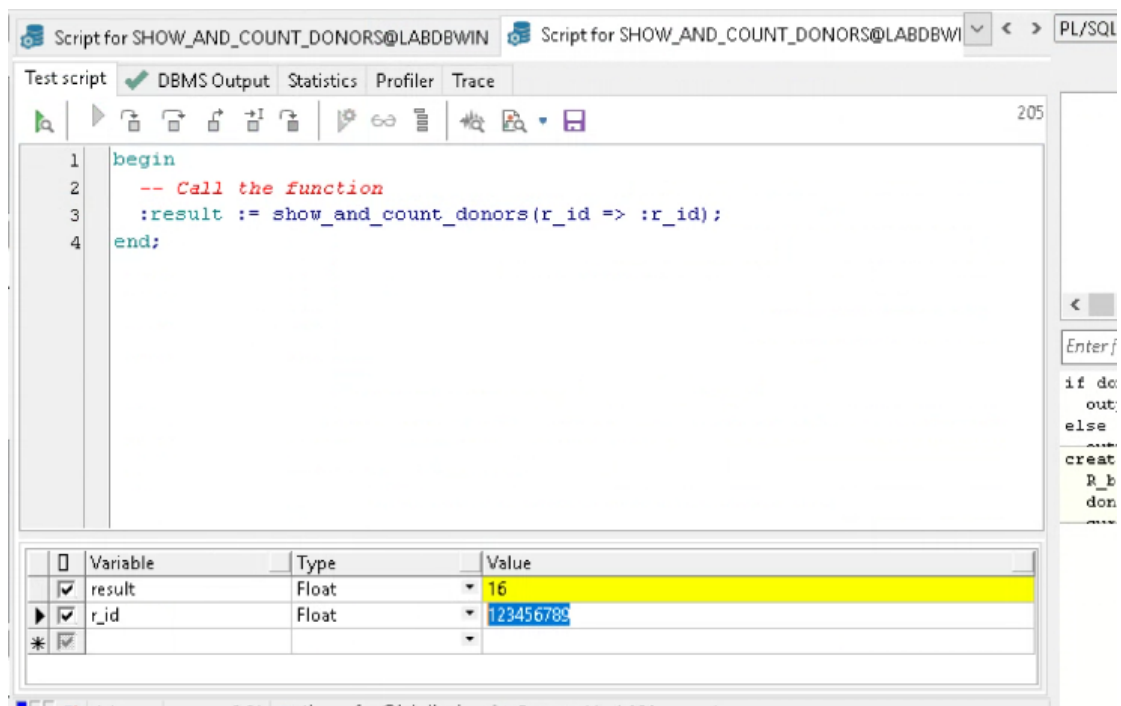
## תוכנית ראשונה

**פונקציה** - יצרנו פונקציה קיבלה מ.ז של אדם ששמור במאגר כנתרם והדפיסה את כל האנשים שיש להם תרומות דם במאגר דם מסוג הדם שלו. הפונקציה מחזירה את מספר האנשים שנמצאו.



```
1 create or replace function show_and_count_donors(R_ID in INTEGER) return integer is
2   R_blood_type varchar2(20);
3   cursor donor_cur is
4     select p.personid, p.city, p.street, p.house_number, p.first_name, p.middle_name, p.last_name, p.birth_date, p.mobile_number, p.phone_n
5     from person p
6     join donor d on p.personid = d.donorid
7     where p.blood_type = R_blood_type
8     and exists (select 1 from blood_unit b where b.donorid = d.donorid)
9     order by p.personid;
10
11   donor_count integer := 0; -- Initialize counter for donor count
12
13 begin
14   -- Fetch the blood type for the given R_ID
15   select blood_type into R_blood_type
16   from person
17   where personid = R_ID;
18
19   -- Iterate through donors and print details
20   for donor_row in donor_cur loop
21     dbms_output.put_line(donor_row.first_name || ' ' || donor_row.last_name || ', ' || donor_row.city || ', ' || donor_row.street);
22     donor_count := donor_count + 1; -- Increment donor count
23   end loop;
24
25   return donor_count; -- Return the count of donors found
26
```

להלן הרצת הפונקציה:



```
1 begin
2   -- Call the function
3   :result := show_and_count_donors(r_id => :r_id);
4 end;
```

Variable	Type	Value
result	Float	16
r_id	Float	123456789

והפלט:

ה

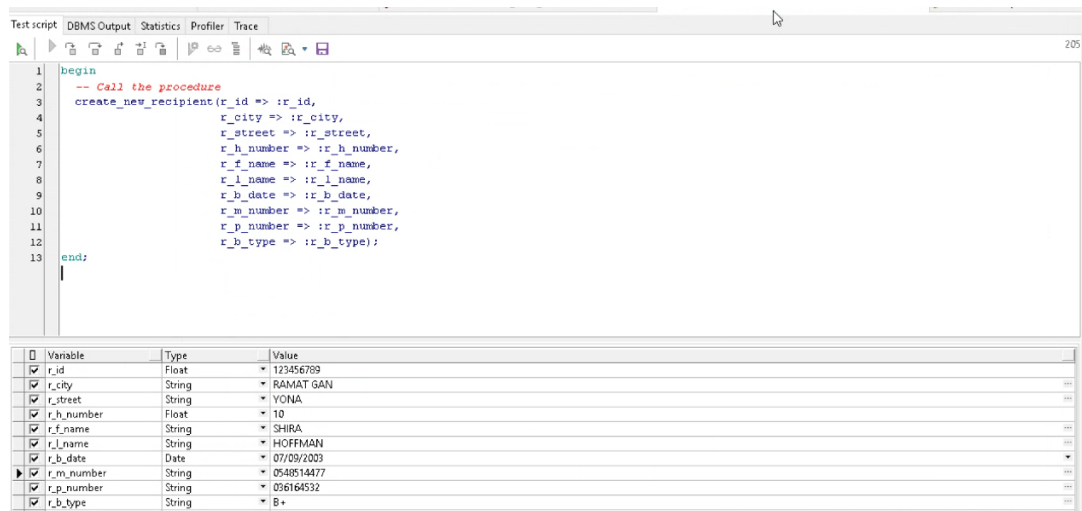
```
test script  Demo Output  Statistics  Profiler  Trace
Clear  Buffer size 10000  Enabled

Bunnie Yarnold, Szeged, Kings
Kinsley Blatcher, Sambopinggir, Kenwood
Worden Skeats, Dengmu, Coleman
Jerad Bischof, Uruzg?n, Talisman
Clarette Tomasino, Blizne, Columbus
Rolando Nayer, ?, "a1?,@?«l, Westridge
Cynthy Payler, Sibubuhan, Brown
Layton Worsall, Chilliwack, Twin Pines
Errick Cumber, Sabanalarga, Eastlawn
Thibaud Burde, Alenquer, Laurel
Powell Christon, Sukarame, Delaware
Jerrilyn Sterte, A?«a, Delaware
Philippa Tremmil, Iogach, Shasta
Tristam Domb, R?bigh, Michigan
Christopher Spilling, Hostomice, Fairview
Lauren Cough, Len?«nsk?«y, Shoshone
|
```

**פרוצדורה** – מקבלת מ.ז, עיר, רחוב, מספר בית, שם, תאריך לידה ומספר טלפון ומוסיפה למערכת אדם חדש הזקוק לתרומת דם. אם הגיל של הנתרם גדול מ60 המצב הרפואי לו ישמר כקריטי.

```
1 create or replace procedure Create_new_recipient(R_ID in INTEGER, R_CITY in VARCHAR2, R_STREET in VARCHAR2 ,
2 R_H_NUMBER in INTEGER , R_F_NAME in VARCHAR2, R_L_NAME in VARCHAR2, R_B_DATE in DATE, R_M_NUMBER in VARCHAR2,
3 R_P_NUMBER in VARCHAR2 , R_B_TYPE in VARCHAR2) is
4 age INTEGER;
5 R_M_CONDITION VARCHAR2(20);
6 begin
7 age := trunc(trunc(months_between(sysdate, R_B_DATE))/12);
8 if age > 60 then
9 R_M_CONDITION := 'Critical';
10 else
11 R_M_CONDITION := 'Non-Critical' ;
12 END IF;
13 INSERT INTO person (
14 PERSONID,
15 CITY,
16 STREET,
17 HOUSE_NUMBER,
18 FIRST_NAME,
19 LAST_NAME,
20 BIRTH_DATE,
21 MOBILE_NUMBER,
22 PHONE_NUMBER,
23 BLOOD_TYPE
24 ) VALUES (
25 R_ID,
26 R_CITY,
27 R_STREET,
28 R_H_NUMBER,
29 R_F_NAME,
30 R_L_NAME,
31 R_B_DATE,
32 R_M_NUMBER,
33 R_P_NUMBER,
34 R_B_TYPE
35 );
36 INSERT INTO recipient (
37 RECIPIENTID,
38 MEDICAL_CONDITION
39 ) VALUES (
40 R_ID,
41 R_M_CONDITION
42 );
43
44 COMMIT;
45
46 end Create_new_recipient;
```

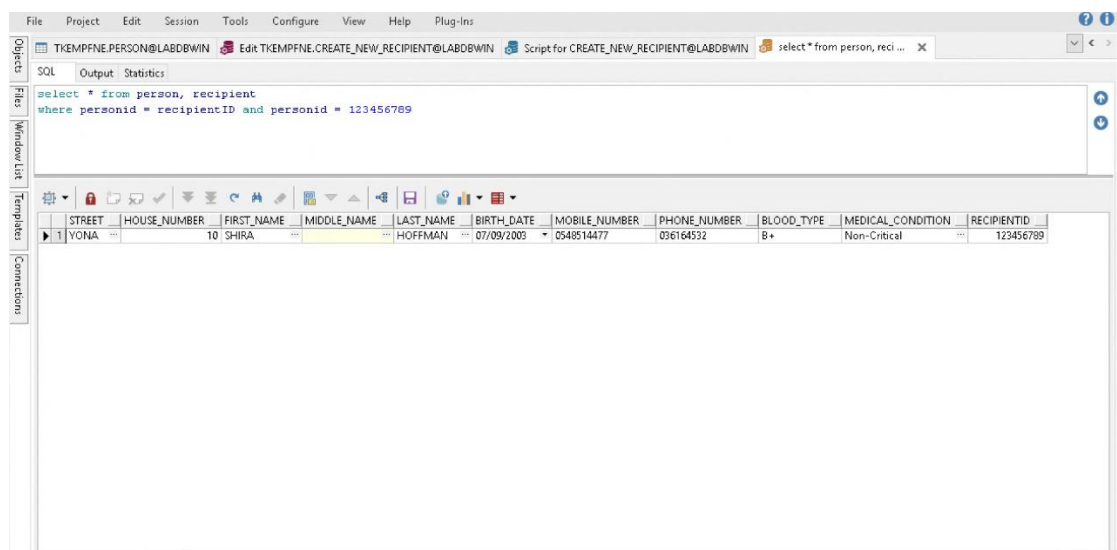
הרצה:



```
1 begin
2   -- Call the procedure
3   create_new_recipient(r_id => :r_id,
4                       r_city => :r_city,
5                       r_street => :r_street,
6                       r_h_number => :r_h_number,
7                       r_f_name => :r_f_name,
8                       r_l_name => :r_l_name,
9                       r_b_date => :r_b_date,
10                      r_m_number => :r_m_number,
11                      r_p_number => :r_p_number,
12                      r_b_type => :r_b_type);
13 end;
```

Variable	Type	Value
r_id	Float	123456789
r_city	String	RAMAT GAN
r_street	String	YONA
r_h_number	Float	10
r_f_name	String	SHIRA
r_l_name	String	HOFFMAN
r_b_date	Date	07/09/2003
r_m_number	String	0548514477
r_p_number	String	036164532
r_b_type	String	B+

ניתן לראות שנכנס המידע לבסיס הנתונים (ועם מצב רפואי לא קריטי):



```
select * from person_recipient
where personid = recipientid and personid = 123456789
```

STREET	HOUSE_NUMBER	FIRST_NAME	MIDDLE_NAME	LAST_NAME	BIRTH_DATE	MOBILE_NUMBER	PHONE_NUMBER	BLOOD_TYPE	MEDICAL_CONDITION	RECIPIENTID
YONA	10	SHIRA	HOFFMAN	HOFFMAN	07/09/2003	0548514477	036164532	B+	Non-Critical	123456789

תוכנית-

קולטת מהמשתמש 1 למציאת תורמים מתאימים לאדם שנמצא כבר במאגר ו2 להכנסת אדם חדש הזקוק לתרומה למערכת. התוכנית קולטת את המידע הדרוש לכל פעולה ופועלת בהתאם לתפריט.

```
DECLARE
user_input VARCHAR2(10);
result VARCHAR2(100);
r_id INTEGER;
r_city VARCHAR2(50);
r_street VARCHAR2(50);
r_h_number INTEGER;
r_f_name VARCHAR2(50);
r_l_name VARCHAR2(50);
r_b_date DATE;
r_m_number VARCHAR2(10);
r_p_number VARCHAR2(9);
r_b_type VARCHAR2(3);
BEGIN
-- Prompt user to enter a number 1 or 2
dbms_output.put_line('Enter 1 in order to find matching donors or 2 in order to create a new recipient:');

-- Read user input
user_input := '<1OR2'; -- Input will be prompted

-- Determine which function to call based on user input
IF user_input = '1' THEN
    dbms_output.put_line('Enter your ID:');
    r_id := TO_NUMBER('<ID');
    IF r_id IS NULL THEN
        RAISE_APPLICATION_ERROR(-20001, 'ID parameter is missing.');
```

English (United States)  
US keyboard

```
    END IF;
    result := show_and_count_donors(r_id => r_id);

ELSIF user_input = '2' THEN
    dbms_output.put_line('Please enter recipient details:');

    dbms_output.put_line('Recipient ID:');
    r_id := TO_NUMBER('<ID'); -- Example input for recipient ID
    IF r_id IS NULL THEN
        RAISE_APPLICATION_ERROR(-20002, 'Recipient ID parameter is missing.');
```

dbms\_output.put\_line('City:');  
r\_city := '<city'; -- Example input for city  
IF r\_city IS NULL OR r\_city = '' THEN  
 RAISE\_APPLICATION\_ERROR(-20003, 'City parameter is missing.');

dbms\_output.put\_line('Street:');  
r\_street := '<street'; -- Example input for street  
IF r\_street IS NULL OR r\_street = '' THEN  
 RAISE\_APPLICATION\_ERROR(-20004, 'Street parameter is missing.');

dbms\_output.put\_line('House Number:');  
r\_h\_number := TO\_NUMBER('<house\_num'); -- Example input for house number  
IF r\_h\_number IS NULL THEN  
 RAISE\_APPLICATION\_ERROR(-20005, 'House Number parameter is missing.');

```
    END IF;
END IF;
```

```

dbms_output.put_line('First Name:');
r_f_name := '&first_name'; -- Example input for first name
IF r_f_name IS NULL OR r_f_name = '' THEN
    RAISE_APPLICATION_ERROR(-20006, 'First Name parameter is missing.');
```

```

END IF;

dbms_output.put_line('Last Name:');
r_l_name := '&last_name'; -- Example input for last name
IF r_l_name IS NULL OR r_l_name = '' THEN
    RAISE_APPLICATION_ERROR(-20007, 'Last Name parameter is missing.');
```

```

END IF;

dbms_output.put_line('Birth Date (DD/MM/YYYY):');
r_b_date := TO_DATE('&birth_date', 'DD/MM/YYYY'); -- Example input for birth date
IF r_b_date IS NULL THEN
    RAISE_APPLICATION_ERROR(-20008, 'Birth Date parameter is missing or invalid format.');
```

```

END IF;

dbms_output.put_line('Mobile Number:');
r_m_number := '&mobile_number'; -- Example input for mobile number
IF r_m_number IS NULL OR r_m_number = '' THEN
    RAISE_APPLICATION_ERROR(-20009, 'Mobile Number parameter is missing.');
```

```

END IF;

dbms_output.put_line('Phone Number:');
r_p_number := '&phone_number'; -- Example input for phone number
IF r_p_number IS NULL OR r_p_number = '' THEN
    RAISE_APPLICATION_ERROR(-20010, 'Phone Number parameter is missing.');
```

```

END IF;

dbms_output.put_line('Blood Type:');
r_b_type := '&blood_type';
IF r_b_type IS NULL OR r_b_type = '' THEN
    RAISE_APPLICATION_ERROR(-20011, 'Blood Type parameter is missing.');
```

```

END IF;

-- Call the function to create a new recipient
create_new_recipient(
    r_id => r_id,
    r_city => r_city,
    r_street => r_street,
    r_h_number => r_h_number,
    r_f_name => r_f_name,
    r_l_name => r_l_name,
    r_b_date => r_b_date,
    r_m_number => r_m_number,
    r_p_number => r_p_number,
    r_b_type => r_b_type
);

ELSE
    RAISE_APPLICATION_ERROR(-20012, 'Invalid input. Please enter 1 or 2.');
```

```

RETURN; -- Exit the block if input is invalid
END IF;

-- Print the result
DBMS_OUTPUT.PUT_LINE(result);

```

```

EXCEPTION
    WHEN VALUE_ERROR THEN
        DBMS_OUTPUT.PUT_LINE('Invalid input format.');
```

```

    WHEN NO_DATA_FOUND THEN
        DBMS_OUTPUT.PUT_LINE('This person does not exist.');
```

```

    WHEN OTHERS THEN
        DBMS_OUTPUT.PUT_LINE('An error occurred: ' || SQLERRM);
END;
```

הרצת התוכנית על הקלט 1:

```

10 INTEGER;
city VARCHAR2(50);
street VARCHAR2(50);
h_number INTEGER;
f_name VARCHAR2(50);
l_name VARCHAR2(50);
b_date DATE;
m_number VARCHAR2(15);
p_number VARCHAR2(9);
b_type VARCHAR2(3);
v
Prompt user to enter input
dbms_output.put_line('Enter your input: ');

Read user input
user_input := '&10R2';

Determine which function to call
IF user_input = '1' THEN
    dbms_output.put_line('Enter your ID:');
```

**Variables**

Name	Value
10R2	1
ID	123456788
city	
street	
house_num	
first_name	
last_name	

OK Cancel Clear

```

declare
    user_input v
    result varchar2(100)
    v_id integer
end
declare
    user_input v
    result varchar2(100)
    v_id integer
end

sysdate

to_date(sysdate, 'DD/MM/YYYY')

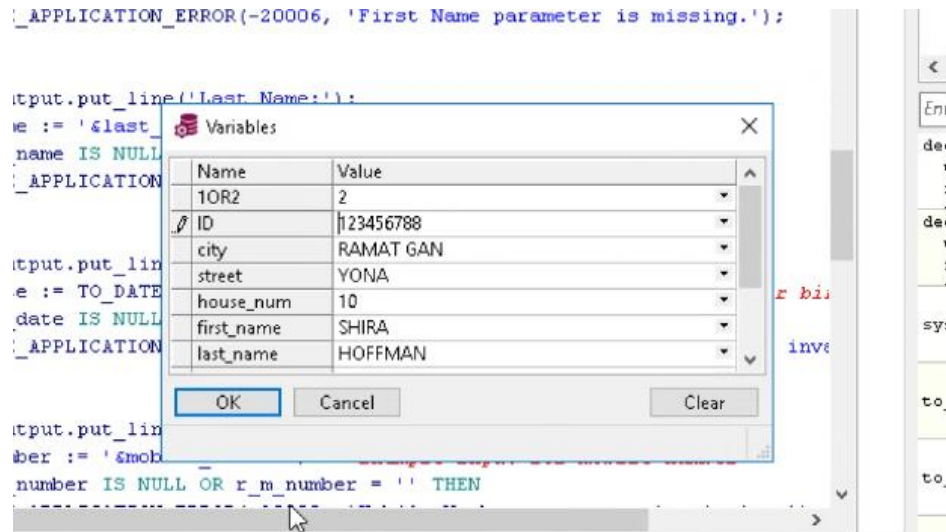
to_date(sysdate, 'DD/MM/YYYY')

```

פלט:



הרצת התוכנית על הקלט 2:



ניתן לראות נכנס לבסיס נתונים נתרם חדש:



SQL Output Statistics

```
select * from PERSON
where first_name = 'SHIRA'
```

	PERSONID	CITY	STREET	HOUSE_NUMBER	FIRST_NAME	MIDDLE_NAME	LAST_NAME
1	123456780	RAMAT GAN	YONA	10	SHIRA		HOFFMAN
2	123456788	RAMAT GAN	YONA	10	SHIRA		HOFFMAN
3	123456789	RAMAT GAN	YONA	10	SHIRA		HOFFMAN

Enter filter te...

```
declare
user_inp
result v
...
declare
user_inp
result v
...
sysdate
to_date(sy
```

התוכנית יודעת לטפל בחריגות כגון בחירת אופציה שאינה התפריט חיפוש תורם לאדם שאינו במערכת ועוד.

SQL Output Statistics

Clear Buffer size 10000 ☒ Enabled

```
Enter 1 in order to find matching donors or 2 in order to create a new recipient:
An error occurred: ORA-20012: Invalid input. Please enter 1 or 2.
```

Variables

Name	Value
1OR2	1
ID	123456789
city	
street	
house_num	
first_name	
last_name	

OK Cancel Clear

SQL Output Statistics

Clear Buffer size 10000 ☒ Enabled

```
Enter 1 in order to find matching donors or 2 in order to creat
Enter your ID:
This person dose not exist.
```

Variables

Name	Value
1OR2	1
ID	10000000
city	
street	
house_num	
first_name	
last_name	

OK Cancel Clear



## תוכנית שניה

**פונקציה** - מקבלת עיר ומחזירה את המעבדה הנמצאת בעיר. במקרה ויש מספר מעבדות מחזירה את המעבדה שנלקחו ממנה הכי קצת מנות.

```
1 create or replace function find_donation_place(d_city in Varchar2) return integer is
2 v_least_used_place integer;
3 BEGIN
4     -- Query to find places in the given city and their corresponding counts in blood_unit
5     SELECT placecode
6     INTO v_least_used_place
7     FROM (
8         SELECT p.placecode, COUNT(bu.placecode) AS unit_count
9         FROM lab p
10        LEFT JOIN blood_unit bu ON p.placecode = bu.placecode
11        WHERE p.city = d_city
12        GROUP BY p.placecode
13        ORDER BY COUNT(bu.placecode) ASC
14     )
15     WHERE ROWNUM = 1; -- Get the place with the least count
16
17     RETURN v_least_used_place;
18 EXCEPTION
19     WHEN NO_DATA_FOUND THEN
20         RETURN NULL; -- Handle case where no places are found in the city
21     WHEN OTHERS THEN
22         RAISE; -- Raise the exception for other errors
23 END;
```

tkempfne@labdbwin - Compiled successfully

הרצה:

select city,placecode from LAB

Script for FIND\_DONATION\_PLACE@LABDBWIN

Test script DBMS Output Statistics Profiler Trace

```
1 begin
2     -- Call the function
3     :result := find_donation_place(d_city => :d_city);
4 end;
```

Variable	Type	Value
result	Float	36
d_city	String	Huntsville

1:1 0:01 tkempfne@labdbwin Executed in 1.968 seconds

TKEMPfNE.LAB@LABDBWIN select city,placecode from LAB Script for FIND\_DONATION\_PLACEC

SQL Output Statistics

```
select city,placecode from LAB
```

	CITY	PLACECODE
8	Bern	26
9	Pensacola	1
10	Anchorage	48
11	Angers	5
12	Kanazawa	38
13	Cobham	50
14	Huntsville	36
15	Nicosia	40
16	New boston	6
17	Paramus	34
18	Meppel	43
19	Northbrook	42
20	Matsue	13
21	Koblenz	8

tkempfne@labdbwin 24 rows selected in 0.081 seconds

**פרוצדורה** - מקבלת מספר מעבדה ומוסיפה אליה תרומת דם חדשה. תאריך התרומה יקבע להיום ותאריך התפוגה לעוד שנה. במידה והתרומה נכנסה בהצלחה יודפסו כל התרומות הקודמות של אותו תורם- תאריך וליטר.

Add\_blood\_unit Add\_blood\_unit

```

1 create or replace procedure Add_blood_unit(b_liter in integer, b_donor_id in integer, b_placecode integer) is
2 number_unit integer;
3 d_name varchar2(20);
4 begin
5     select max(unit_id) into number_unit from blood_unit;
6     --the collection date is set to todays date, and the expiration date is set to next year.
7     insert into BLOOD_UNIT (collection_date, expiration_date, liter, unit_id, donorid, placecode)
8     values (trunc(sysdate), trunc(SYSDATE + INTERVAL '1' YEAR), b_liter, number_unit + 1, b_donor_id, b_placecode);
9     if SQL%ROWCOUNT=1 then
10        select p.first_name into d_name
11        from donor d, person p
12        where d.donorid=p.personid and d.donorid= b_donor_id;
13        DBMS_OUTPUT.put_line('blood unit was added successfully');
14        DBMS_OUTPUT.put_line(d_name||'s blood units');
15        for bu in (select * from blood_unit where donorid = b_donor_id) loop
16            DBMS_OUTPUT.put_line(bu.collection_date||','||bu.liter);
17        end loop;
18    end if;
19    commit;
20 end Add_blood_unit;

```

הרצה:

The screenshot shows a PL/SQL Test script window with the following code:

```
1 begin
2   -- Call the procedure
3   add_blood_unit(b_liter => :b_liter,
4                 b_donor_id => :b_donor_id,
5                 b_placecode => :b_placecode);
6 end;
```

The execution results are shown in a table below the code:

Variable	Type	Value
b_liter	Float	2
b_donor_id	Float	196814159
b_placecode	Float	36

The status bar at the bottom indicates: 1:1 0:01 tkempfne@labdbwin Executed in 1.163 seconds

ניתן לראות שנוספה היום תרומה חדשה:

The screenshot shows a SQL query window with the following query:

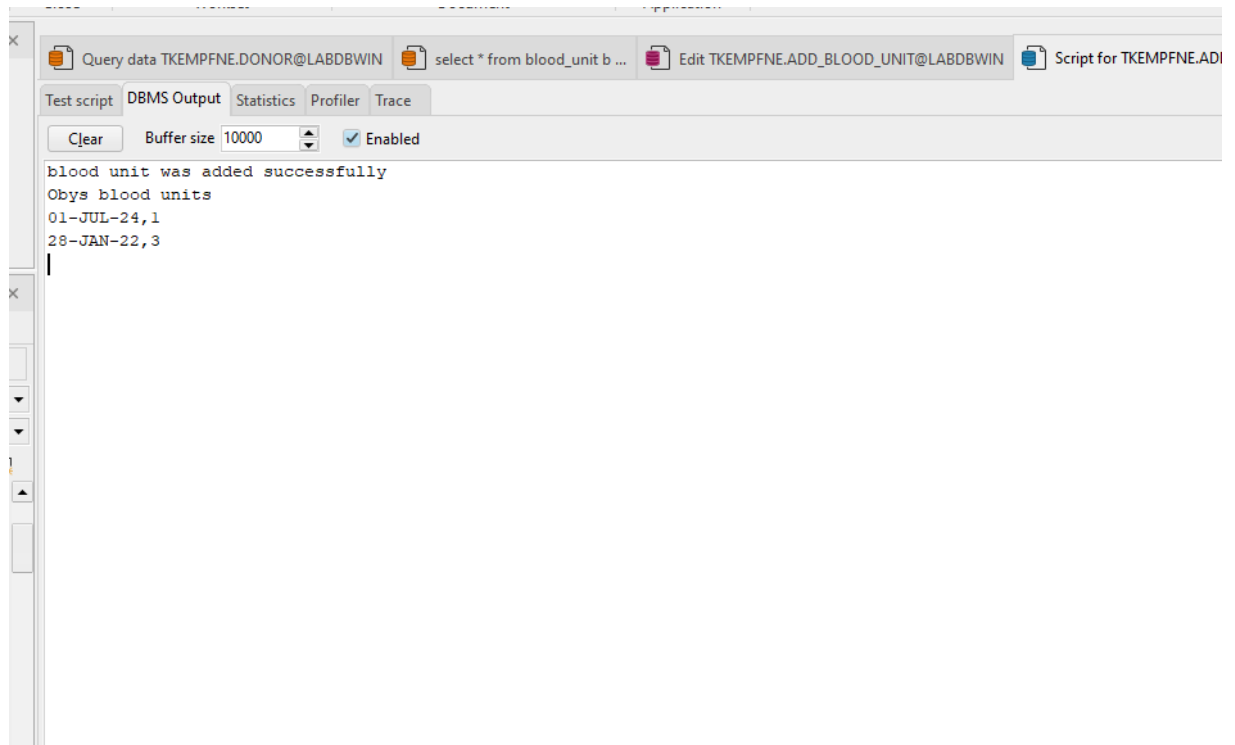
```
select * from blood_unit
where donorid = 196814159
```

The query results are shown in a table below the query:

	COLLECTION_DATE	EXPIRATION_DATE	LITER	UNIT_ID	RECIVED_DATE	DONORID	RECIPIENTID
1	18/07/2022	16/12/2025	1	613	14/12/2023	196814159	534368732
2	13/02/2022	19/04/2026	3	646	06/03/2024	196814159	122959836
3	30/06/2024	30/06/2025	2	824		196814159	
4	20/01/2023	05/01/2026	2	196	26/02/2024	196814159	543760376

The status bar at the bottom indicates: Query data DONOR@LABDBWIN select \* from blood\_unit w ... Script for ADD\_BLOOD\_UNIT@LABDBWIN PL/SQL Clip

וכך יראה פלט של התוכנית:



The screenshot shows a database management tool interface. The 'DBMS Output' window is active, displaying the following text:

```
blood unit was added successfully
Obys blood units
01-JUL-24,1
28-JAN-22,3
```

**תוכנית-**

קולטת מהמשתמש 1 למציאת מעבדה בעירו ו2 לתרומת מנת דם בעיר. נתוכנית קולטת את הפרמטרים הדרושים ומבצעת את הפעולות בהתאם לתפריט.

```
Query data DONOR@LABDBWIN  select * from blood_unit.w... PROGRAM2.sql X Query data LAB@LABDBWIN Query data DONOR@LABDBWIN select * from BLOOD_UNIT t...
SQL Output Statistics
DECLARE
  user_input VARCHAR2(10);
  result VARCHAR2(100);
  b_donor_id INTEGER;
  d_city VARCHAR2(50);
  b_placecode INTEGER;
  b_liter INTEGER;
BEGIN
  -- Prompt user to enter a number 1 or 2
  dbms_output.put_line('Enter 1 in order to find closest donation place or 2 in order to add a new blood unit:');

  -- Read user input
  user_input := '&1OR2'; -- Input will be prompted

  -- Determine which function to call based on user input
  IF user_input = '1' THEN
    dbms_output.put_line('Enter city:');
    d_city := '&CITY'; -- Prompt for input

    IF d_city IS NULL OR d_city = '' THEN
      RAISE_APPLICATION_ERROR(-20001, 'City parameter is missing.');
```

```
END IF;

  -- Call the function to find closest donation place
  result := find_donation_place(d_city => d_city);

ELSIF user_input = '2' THEN

  dbms_output.put_line('Please enter blood unit details:');

  dbms_output.put_line('Blood Liter:');
  b_liter := TO_NUMBER('&blood_liter'); -- Prompt for input

  IF b_liter IS NULL THEN
    RAISE_APPLICATION_ERROR(-20011, 'Liter parameter is missing.');
```

```
END IF;

  dbms_output.put_line('Donor ID:');
  b_donor_id := TO_NUMBER('&DonorID'); -- Prompt for input

  IF b_donor_id IS NULL THEN
    RAISE_APPLICATION_ERROR(-20002, 'Donor ID parameter is missing.');
```

```
END IF;

  dbms_output.put_line('Place Code:');
  b_placecode := TO_NUMBER('&place_code'); -- Prompt for input

  IF b_placecode IS NULL THEN
    RAISE_APPLICATION_ERROR(-20010, 'Place code parameter is missing.');
```

```
END IF;

  -- Call the function to add a new blood unit
  add_blood_unit(
    b_liter => b_liter,
    b_donor_id => b_donor_id,
    b_placecode => b_placecode
  );

ELSE
  RAISE_APPLICATION_ERROR(-20012, 'Invalid input. Please enter 1 or 2.');
```

```
RETURN; -- Exit the block if input is invalid
END IF;

-- Print the result
DBMS_OUTPUT.PUT_LINE(result);

EXCEPTION
  WHEN VALUE_ERROR THEN
    DBMS_OUTPUT.PUT_LINE('Invalid input format.');
```

```
  WHEN NO_DATA_FOUND THEN
    DBMS_OUTPUT.PUT_LINE('This person does not exist.');
```

הרצת התוכנית על הקלט 1:

```

IF b_placecode IS NULL THEN
    RAISE_APPLICATION_ERROR(-20010, 'Place code parameter is missing.');
```

```

END IF;

-- Call the function to add a new blood unit
add_blood_unit(
    b_liter => b_liter,
    b_donor_id => b_donor_id,
    b_placecode => b_placecode
);

ELSE
    RAISE_APPLICATION_ERROR(-20012, 'Invalid input. Please enter a valid value.');
```

```

RETURN; -- Exit the block if input is invalid
END IF;

-- Print the result
DBMS_OUTPUT.PUT_LINE(result);

EXCEPTION
    WHEN VALUE_ERROR THEN
        DBMS_OUTPUT.PUT_LINE('Invalid input format.');
```

```

    WHEN NO_DATA_FOUND THEN
        DBMS_OUTPUT.PUT_LINE('This person does not exist.');
```

Variables
✕

Name	Value
10R2	1
City	La Plata
blood_liter	
DonorID	
place_code	

OK
Cancel
Clear

פלט:

Query data DONOR@LABDBWIN
select \* from blood\_unit w ...
PROGRAM2.sql
Query data LAB@LABDBWIN
Query data DONOR@LABDBWIN
select \* from B

SQL
Output
Statistics

Clear
Buffer size 10000
Enabled

Enter 1 in order to find closest donation place or 2 in order to add a new blood unit:  
Enter city:  
27  
|

ניתן לראות שאכן יש בעיר את מעבדה 27:

Query data DONOR@LABDBWIN
select \* from blood\_unit w ...
PROGRAM2.sql
Query data LAB@LABDBWIN
Query data DONOR@LABDBWIN

SQL
Output
Statistics

select \* from LAB t

	CITY	STREET	HOUSE_NUMBER	PLACECODE
1	La Plata	Argentina	7	27
2	Cambridge	Canada	5	44
3	Ohita	Japan	36	35
4	San Jose	Costa Rica	3	49
5	Waalwijk	Netherlands	23	41
6	Valladolid	Spain	2	32
7	Green bay	USA	35	19
8	Bern	Switzerland	7	26
9	Pensacola	USA	28	1

הרצת התוכנית על הקלט 2:

```
10, 'Place code parameter is missing.');
```

```
new blood unit
```

```
, 'Invalid input. Please ente
```

```
sput is invalid
```

```
input format.');
```

NameValue

10R2

CityLa Plata

blood\_liter3

DonorID200401164

place\_code27

OKCancelClear

FileProjectEditSessionToolsConfigureViewHelpPlug-Ins

Query data DONOR@LABDBWINselect \* from blood\_unit w...PROGRAM2.sqlQuery data LAB@LABDBWINQuery data DONOR@LABDBWINselect \* from BLOOD\_UNIT t...

SQLOutputStatistics

ClearBuffer size10000Enabled

Enter 1 in order to find closest donation place or 2 in order to add a new blood unit:  
Please enter blood unit details:  
Blood Liter:  
Donor ID:  
Place Code:

ניתן לראות שהמנה נוספה לבסיס הנתונים והמעדה בה היא נלקחה היא המעבדה שנמצאת בעיר שהוזנה:

Query data DONOR@LABDBWINselect \* from blood\_unit w...PROGRAM2.sqlQuery data LAB@LABDBWINQuery data DONOR@LABDBWINselect \* from BLOOD\_UNIT t...

SQLOutputStatistics

select \* from blood\_unit  
where donorid = 200401164

Collection DateExpiration DateLiterUnit IDReceived DateDonor IDRecipient IDDonation Group NamePlace Code

1	28/01/2023	18/12/2025	1	545	19/03/2024	200401164	997486433	Rogahn and Sons	5
2	24/06/2023	24/08/2026	3	554		200401164		Hilpert-Stracke	30
3	01/07/2024	01/07/2025	3	825		200401164			27
4	01/07/2024	01/07/2025	3	826		200401164			27
5	07/03/2023	26/01/2026	3	474	22/01/2024	200401164	749526799	Mohr-Schamberger	26
6	06/02/2023	21/01/2026	2	485	24/04/2024	200401164	262916015	Hintz-Reynolds	30
7	12/06/2022	13/03/2026	3	541	26/02/2024	200401164	219689648	Dooley Group	29



התוכנית יודעת לטפל בחריגות כגון בחירת אופיה שאינה בתפריט או אי הזנת פרמטר.

