String Operations

1.Format the names of members

Query: select surname || ', ' || firstname as name from cd.members

SQLOUTPUT:

```
exercises=# select surname || ', ' || firstname as name from cd.members;
          name
-------------------------
 GUEST, GUEST
 Smith, Darren
 Smith, Tracy
 Rownam, Tim
 Joplette, Janice
 Butters, Gerald
 Tracy, Burton
 Dare, Nancy
 Boothe, Tim
 Stibbons, Ponder
 Owen, Charles
 Jones, David
 Baker, Anne
 Farrell, Jemima
 Smith, Jack
 Bader, Florence
 Baker, Timothy
 Pinker, David
 Genting, Matthew
 Mackenzie, Anna
 Coplin, Joan
 Sarwin, Ramnaresh
 Jones, Douglas
 Rumney, Henrietta
 Farrell, David
 Worthington-Smyth, Henry
 Purview, Millicent
 Tupperware, Hyacinth
 Hunt, John
 Crumpet, Erica
 Smith, Darren
(31 rows)
```

2.Find facilities by a name prefix

Query: select * from cd.facilities where name like 'Tennis%';

SQLOUTPUT:

```
exercises=# select * from cd.facilities where name like 'Tennis%';
 facid |      name      | membercost | guestcost | initialoutlay | monthlymaintenance
-------+----------------+------------+-----------+---------------+--------------------
     0 | Tennis Court 1 |          5 |        25 |         10000 |                200
     1 | Tennis Court 2 |          5 |        25 |          8000 |                200
(2 rows)
```

3.Perform a case-insensitive search

Query: select * from cd.facilities where upper(name) like 'TENNIS%';

SQLOUTPUT:

```
exercises=# select * from facilities where upper(name) like 'TENNIS%';
 facid |      name      | membercost | guestcost | initialoutlay | monthlymaintenance
-------+----------------+------------+-----------+---------------+--------------------
     0 | Tennis Court 1 |          6 |        30 |         10000 |                200
     1 | Tennis Court 2 |        6.6 |      33.0 |         10000 |                200
(2 rows)
```

4.Find telephone numbers with parentheses

Query: select memid, telephone from cd.members where telephone similar to '%[()]%';

SQLOUTPUT:

```
exercises=# select memid, telephone from members where telephone similar to '%[()]%';
 memid | telephone
-------+-----------
(0 rows)
```

5.Pad zip codes with leading zeroes

Query: select lpad(cast(zipcode as char(5)),5,'0') zip from cd.members order by zip

SQLOUTPUT:

```
exercises=# select lpad(cast(zipcode as char(5)),5,'0') zip from cd.members order by zip
exercises-# ;
  zip
------
 00000
 00234
 00234
 04321
 04321
 10383
 11986
 23423
 28563
 33862
 34232
 43532
 43533
 45678
 52365
 54333
 56754
 57392
 58393
 64577
 65332
 65464
 66796
 68666
 69302
 75655
 78533
 80743
 84923
 87630
 97676
(31 rows)
```

6.Count the number of members whose surname starts with each letter of the alphabet

Query: select substr (mems.surname,1,1) as letter, count(*) as count from cd.members mems group by letter order by letter

SQLOUTPUT:

```
exercises=# select substr (mems.surname,1,1) as letter, count(*) as count
exercises-#     from cd.members mems
exercises-#     group by letter
exercises-#     order by letter
exercises-# ;
 letter | count
--------+-------
 B      |     5
 C      |     2
 D      |     1
 F      |     2
 G      |     2
 H      |     1
 J      |     3
 M      |     1
 O      |     1
 P      |     2
 R      |     2
 S      |     6
 T      |     2
 W      |     1
(14 rows)
```

7.Clean up telephone numbers

Query: select memid, regexp_replace(telephone, '[^0-9]', '', 'g') as telephone

from cd.members

order by memid;

SQLOUTPUT:

```
exercises=# select memid, regexp_replace(telephone, '[^0-9]', '', 'g') as telephone
exercises-#     from cd.members
exercises-#     order by memid;
 memid | telephone
-------+------------
     0 | 0000000000
     1 | 5555555555
     2 | 5555555555
     3 | 8446930723
     4 | 8339424710
     5 | 8440784130
     6 | 8223549973
     7 | 8337764001
     8 | 8114332547
     9 | 8331603900
    10 | 8555425251
    11 | 8445368036
    12 | 8440765141
    13 | 8550160163
    14 | 8221633254
    15 | 8334993527
    16 | 8339410824
    17 | 8114096734
    20 | 8119721377
    21 | 8226612898
    22 | 8224992232
    24 | 8224131470
    26 | 8445368036
    27 | 8229898876
    28 | 8557559876
    29 | 8558943758
    30 | 8559419786
    33 | 8226655327
    35 | 8997206978
    36 | 8117324816
    37 | 8225773541
(31 rows)
```