# SECD 2523
# SECTION 10


# LECTURER: ROZILAWATI BINTI DOLLAH @ MD ZAIN


# PROJECT TITLE: SQL LAB4 (DML3) PART2


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Part 1 : Use a Self-Join to Join a Table to Itself (S6L9 Objective 2)

1.  Write a query that will display who the supervisor is for each of the sales representatives. The information should be displayed in two columns, the first column will be the first name and last name of the sales representative and the second will be the first name and last name of the supervisor. The column aliases should be Rep and Supervisor.
    SELECT sr.first_name || ' ' || sr.last_name AS "Rep",sv.first_name || ' ' || sv.last_name AS "Supervisor" FROM sales_representatives sr JOIN sales_representatives sv ON sr.supervisor_id = sv.id;

| Rep | Supervisor |
| --- | --- |
| Charles Raymond | Charles Raymond |
| Victoria Wright | Charles Raymond |
| Barry Speed | Charles Raymond |

Part 2 : Use OUTER joins (S6L9 Objective 3)

1.  Write a query that will display all of the team and customer information even if there is no match with the table on the left (team).
    SELECT* FROM teams t LEFT OUTER JOIN customers c ON t.id = c.tem_id;

| ID | NAME | NUMBER_OF_PLAYERS | DISCOUNT | CTR_NUMBER | EMAIL | FIRST_NAME | LAST_NAME | PHONE_NUMBER | CURRENT_BALANCE | SRE_ID | TEM_ID | LOYALTY_CARD_NUMBER |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| t001 | Rockets | 25 | 10 | c00001 | bob.thornberry@heatmail.com | Robert | Thornberry | 01234567898 | 150 | sr01 | t001 | - |
| t002 | Celtics | 42 | 20 | c00101 | unknown@here.com | John | Doe | 03216547808 | 987.5 | sr01 | t002 | - |
| t003 | Rovers | 8 | - | c01986 | marga187@delphiview.com | Maria | Galant | 01442736589 | 125.65 | sr03 | t003 | - |
| t004 | Jets | 10 | 5 | - | - | - | - | - | - | - | - | - |

Part 3 : Generating a Cartesian Product (S6L9 Objective 4)

1.  Create a Cartesian product between the customer and sales representative tables
    SELECT* FROM customers CROSS JOIN sales_representatives;

| CTR_NUMBER | EMAIL | FIRST_NAME | LAST_NAME | PHONE_NUMBER | CURRENT_BALANCE | SRE_ID | TEM_ID | LOYALTY_CARD_NUMBER | ID | EMAIL | FIRST_NAME | LAST_NAME | PHONE_NUMBER | COMMISSION_RATE | SUPERVISOR_ID |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| c00001 | bob.thornberry@heatmail.com | Robert | Thornberry | 01234567898 | 150 | sr01 | t001 | - | sr01 | chray@ob1.com | Charles | Raymond | 0134598761 | 10 | sr01 |
| c00012 | jjones@freemail.com | Jennifer | Jones | 01505214598 | 0 | - | - | lc1015 | sr01 | chray@ob1.com | Charles | Raymond | 0134598761 | 10 | sr01 |
| c00101 | unknown@here.com | John | Doe | 03216547808 | 987.5 | sr01 | t002 | - | sr01 | chray@ob1.com | Charles | Raymond | 0134598761 | 10 | sr01 |
| c00103 | MurciaA@globaltech.com | Andrew | Murcia | 07715246890 | 85 | - | - | lc2341 | sr01 | chray@ob1.com | Charles | Raymond | 0134598761 | 10 | sr01 |
| c01986 | marga187@delphiview.com | Maria | Galant | 01442736589 | 125.65 | sr03 | t003 | - | sr01 | chray@ob1.com | Charles | Raymond | 0134598761 | 10 | sr01 |
| c00001 | bob.thornberry@heatmail.com | Robert | Thornberry | 01234567898 | 150 | sr01 | t001 | - | sr02 | vwright@ob1.com | Victoria | Wright | 0134598762 | 5 | sr01 |
| c00012 | jjones@freemail.com | Jennifer | Jones | 01505214598 | 0 | - | - | lc1015 | sr02 | vwright@ob1.com | Victoria | Wright | 0134598762 | 5 | sr01 |
| c00101 | unknown@here.com | John | Doe | 03216547808 | 987.5 | sr01 | t002 | - | sr02 | vwright@ob1.com | Victoria | Wright | 0134598762 | 5 | sr01 |
| c00103 | MurciaA@globaltech.com | Andrew | Murcia | 07715246890 | 85 | - | - | lc2341 | sr02 | vwright@ob1.com | Victoria | Wright | 0134598762 | 5 | sr01 |
| c01986 | marga187@delphiview.com | Maria | Galant | 01442736589 | 125.65 | sr03 | t003 | - | sr02 | vwright@ob1.com | Victoria | Wright | 0134598762 | 5 | sr01 |
| c00001 | bob.thornberry@heatmail.com | Robert | Thornberry | 01234567898 | 150 | sr01 | t001 | - | sr03 | bspeed@ob1.com | Barry | Speed | 0134598763 | 5 | sr01 |
| c00012 | jjones@freemail.com | Jennifer | Jones | 01505214598 | 0 | - | - | lc1015 | sr03 | bspeed@ob1.com | Barry | Speed | 0134598763 | 5 | sr01 |
| c00101 | unknown@here.com | John | Doe | 03216547808 | 987.5 | sr01 | t002 | - | sr03 | bspeed@ob1.com | Barry | Speed | 0134598763 | 5 | sr01 |
| c00103 | MurciaA@globaltech.com | Andrew | Murcia | 07715246890 | 85 | - | - | lc2341 | sr03 | bspeed@ob1.com | Barry | Speed | 0134598763 | 5 | sr01 |
| c01986 | marga187@delphiview.com | Maria | Galant | 01442736589 | 125.65 | sr03 | t003 | - | sr03 | bspeed@ob1.com | Barry | Speed | 0134598763 | 5 | sr01 |