



# Oracle new Join Syntax Additional Examples

# CROSS JOIN

- ♦ 

```
SELECT first_name,  
last_name,  
department_name  
FROM employees,  
departments;
```
- ♦ 

```
SELECT first_name,  
last_name,  
department_name  
FROM employees  
CROSS JOIN  
departments;
```

# NATURAL JOINS

- ◆ 

```
SELECT
d.department_name,
l.city FROM
departments d,
locations l WHERE
d.location_id =
l.location_id AND
d.country = l.country;
```

- ◆ 

```
SELECT
department_name, city
FROM departments
NATURAL JOIN
locations;
```

# USING

- ◆ 

```
SELECT
d.department_name,
l.city FROM
departments d,
locations l WHERE
d.location_id =
l.location_id
```

- ◆ 

```
SELECT
d.department_name,
l.city FROM
departments d JOIN
locations l USING
(location_id);
```

# COLUMN NAMES DO NOT MATCH

- ◆ 

```
SELECT
d.department_name,
l.city FROM
departments d,
locations l WHERE
d.location_id = l.id;
```

- ◆ 

```
SELECT
d.department_name,
l.city FROM
departments d JOIN
locations l ON
(d.location_id =
l.id);
```

# > 1 COLUMN

- ♦ 

```
SELECT employee_id,  
city, department_name  
FROM locations l,  
departments d, employees  
e WHERE d.location_id =  
l.location_id AND  
d.department_id =  
e.department_id;
```
- ♦ 

```
SELECT employee_id,  
city, department_name  
FROM locations l JOIN  
departments d ON  
(d.location_id =  
l.location_id) JOIN  
employees e ON  
(d.department_id =  
e.department_id);
```

# LEFT OUTER JOIN

- ♦ 

```
SELECT e.last_name,  
d.department_name FROM  
employees e, departments d  
WHERE e.department_id =  
d.department_id(+);
```
- ♦ 

```
SELECT e.last_name,  
d.department_name FROM  
employees e LEFT OUTER JOIN  
departments d ON  
(e.department_id =  
d.department_id);
```

# RIGHT OUTER JOINS

- ♦ 

```
SELECT e.last_name,  
d.department_name FROM  
employees e, departments d  
WHERE e.department_id(+) =  
d.department_id;
```
- ♦ 

```
SELECT e.last_name,  
d.department_name FROM  
employees e RIGHT OUTER  
JOIN departments d ON  
(e.department_id =  
d.department_id);
```



# FULL OUTER JOIN

- ♦ 

```
SELECT e.last_name,  
       d.department_name FROM  
employees e FULL OUTER JOIN  
departments d ON  
  (e.department_id =  
   d.department_id);
```
- ♦ UNION WITH LEFT AND RIGHT  
OUTER JOIN

# EXPLAINING YOUR PLANS

```
delete from plan_table;  
explain plan for <query>;  
select * from table(dbms_xplan.display);
```