

EXERCISE 13

Creating Views

1. What are three uses for a view from a DBA's perspective?

- i) To restrict data access.
- ii) To make complex queries easy
- iii) To provide data independence.

2. Create a simple view called view_d_songs that contains the ID, title and artist from the DJs on Demand table for each "New Age" type code. In the subquery, use the alias "Song Title" for the title column.

```
create view view_d_songs as  
select s.id, s.title as "song title", s.artist from d-songs s  
join d-types t on s.type-code = t.type-code where  
t.description = 'new age';
```

3. SELECT * FROM view_d_songs. What was returned?

The query returns the ID, song title (the alias for title) and artist columns for all songs that are classified as 'new age'.

4. REPLACE view_d_songs. Add type_code to the column list. Use aliases for all columns.

```
create or replace view view_d_songs as select s.id,  
s.title as "song title", s.artist, s.type-code from d-songs s  
join d-types t on s.type-code = t.type-code where  
t.description = 'new age'.
```

Or use alias after the CREATE statement as shown.

5. Jason Tsang, the disk jockey for DJs on Demand, needs a list of the past events and those planned for the coming months so he can make arrangements for each event's equipment setup. As the company manager, you do not want him to have access to the price that clients paid for their events. Create a view for Jason to use that displays the name of the event, the event date, and the theme description. Use aliases for each column name.

```
create or replace view dj-events-list as  
select e.name as event-name, e.event-date as  
event-date, t.description as theme-description  
from cd-events e join d-themes t on e.theme-code =  
t.theme-code;
```

6. It is company policy that only upper-level management be allowed access to individual employee salaries. The department managers, however, need to know the minimum, maximum, and average salaries, grouped by department. Use the Oracle database to prepare a view that displays the needed information for department managers.

```
create or replace view dept-salary-analysis as  
select d.department-name, min(e.salary) as  
min-salary, max(e.salary) as max-salary,  
avg(e.salary) as avgSalary from employees e  
join departments d on e.department-id =  
d.department-id group by d.department-name;
```