# Practices for Lesson 14: Creating Views

Practices for Lesson 14: Overview

Practices Overview

This practice covers the following topics:

Creating a simple view

Creating a complex view

Creating a view with a check constraint

Attempting to modify data in the view

Querying the dictionary views for view information

Removing views

Practice 14-1: Creating Views

Overview:

In this practice, you create and use views, query data dictionary views for view information, and remove views.

Tasks

The staff in the HR department wants to hide some of the data in the EMPLOYEES table. Create a view called EMPLOYEES\_VU based on the employee numbers, employee last names, and department numbers from the EMPLOYEES table. The heading for the employee name should be EMPLOYEE.

Confirm that the view works. Display the contents of the EMPLOYEES\_VU view.

**…**

Using your EMPLOYEES\_VU view, write a query for the HR department to display all employee names and department numbers.

**…**

Department 80 needs access to its employee data. Create a view named dept80 that contains the employee numbers, employee last names, and department numbers for all employees in department 80. You have been asked to label the view columns EMPNO, EMPLOYEE, and DEPTNO. For security purposes, do not allow an employee to be reassigned to another department through the view.

Display the structure and contents of the DEPT80 view.

**…**

Test your view. Attempt to reassign Abel to department 50.

Run lab\_14\_07.sql to create the dept50 view for this exercise.

You need to determine the names and definitions of all the views in your schema. Create a report that retrieves view information, the view name and text, from the USER\_VIEWS data dictionary view.

**Note:** EMP\_DETAILS\_VIEW was created as part of your schema.

**Note:** You can see the complete definition of the view if you use Run Script (or press F5) in SQL Developer. If you use Execute Statement (or press F9) in SQL Developer, scroll horizontally in the result pane. If you use SQL\*Plus, to see more contents of a LONG column, use the SET LONG *n* command, where *n* is the value of the number of characters of the LONG column that you want to see.

Remove the views created in this practice.

Solution 4-1: Creating Views

The staff in the HR department wants to hide some of the data in the EMPLOYEES table. Create a view called EMPLOYEES\_VU based on the employee numbers, employee last names, and department numbers from the EMPLOYEES table. The heading for the employee name should be EMPLOYEE.

Confirm that the view works. Display the contents of the EMPLOYEES\_VU view.

Using your EMPLOYEES\_VU view, write a query for the HR department to display all employee names and department numbers.

Department 80 needs access to its employee data. Create a view named DEPT80 that contains the employee numbers, employee last names, and department numbers for all employees in department 80. They have requested that you label the view columns EMPNO, EMPLOYEE, and DEPTNO. For security purposes, do not allow an employee to be reassigned to another department through the view.

Display the structure and contents of the DEPT80 view.

Test your view. Attempt to reassign Abel to department 50.

The error is because the dept80 view has been created with the WITH CHECK OPTION constraint. This ensures that the DEPTNO column in the view is protected from being changed.

Run lab\_14\_07.sql to create the dept50 view for this exercise. You need to determine the names and definitions of all the views in your schema. Create a report that retrieves view information, the view name and text, from the USER\_VIEWS data dictionary view.

**Note:** The EMP\_DETAILS\_VIEW was created as part of your schema.

**Note:** You can see the complete definition of the view if you use Run Script (or press F5) in SQL Developer. If you use Execute Statement (or press F9) in SQL Developer, scroll horizontally in the result pane. If you use SQL\*Plus to see more contents of a LONG column, use the SET LONG *n* command, where *n* is the value of the number of characters of the LONG column that you want to see.

Remove the views created in this practice.