Week 9

SuiteCloud Development Framework (SDF)

Session 9 Overview

- SDF Introduction (SuiteCloud Development Framework)
- Setting up SDF
- SDF Deployment Workflow

Introduction to SDF Deployment

What is SDF?

SuiteCloud Development Framework (SDF) is a development and deployment technology from NetSuite that allows developers to build, manage, and deploy NetSuite customizations as project-based files.

Instead of manually configuring settings within the NetSuite UI, SDF provides a structured and version-controlled way to develop, validate, and deploy changes.

Key Features of SDF

Project-based Development – Stores NetSuite customizations in an XML-based project structure.

Version Control Friendly – Works well with Git or other version control systems.

Supports Automation – Enables CI/CD pipelines for automated deployments.

Cross-Account Deployment – Allows deploying customizations between sandbox, production, or separate NetSuite accounts.

Validation Before Deployment – Ensures customizations are compatible before deploying.

Oracle Help Center: SuiteCloud Development Framework Overview

What is SuiteCloud CLI?

SuiteCloud CLI (Command Line Interface) is a command-line tool that allows developers to interact with the NetSuite environment using terminal commands.

It is a key component of SDF, enabling developers to create, manage, validate, and deploy NetSuite projects without relying on the UI.

SuiteCloud CLI continued

SuiteCloud CLI is used to create and manage **SDF projects** on a local machine.

It provides commands to **authenticate, validate, and deploy** NetSuite customizations.

Supports automation and **CI/CD integration** for continuous deployment.

Simplifies managing **NetSuite account customizations** by handling them as code.

Common CLI Commands

Command	Description
`suitecloud account:setup`	Configures authentication with NetSuite.
`suitecloud project:create`	Creates a new SDF project.
`suitecloud project:validate`	Checks for errors before deployment.
`suitecloud project:deploy`	Deploys the project to NetSuite.

Why use SDF instead of the NetSuite UI?

Feature	NetSuite UI	SDF
Version Control	No built-in version tracking	Works with Git
Collaboration	Manual & Isolated changes	Enables team-based development
Automated Deployment	Requires manual updates	Supports CI/CD
Cross-Account Deployment	Manual import / export	One-click deployment

Setting up SuiteCloud CLI + SDF

Setting up SuiteCloud CLI

Installing + Setting up SuiteCloud CLI

1. Run the following command in Command Prompt:

```
npm install -g @oracle/suitecloud-cli
```

2. Navigate to the location of an existing project and run:

```
suitecloud account:setup
```

SDF Deployment Workflow

Creating an SDF Project

Open the terminal and navigate to your desired folder and run the following.
Replace ‘MySDFProject’ with your project name

```
suitecloud project:create -p MySDFProject -t ACCOUNT_CUSTOMIZATION
```

Managing XML custom objects

In SDF, **custom records, scripts, workflows, and other NetSuite objects** are stored as XML files.

All custom objects are stored in XML format and can be version-controlled.

```xml
<?xml version="1.0" encoding="UTF-8"?>
<customrecord scriptid="custrecord_myrecord">
    <label>My Custom Record</label>
    <fields>
        <field scriptid="custfield_example">
            <label>Example Field</label>
            <type>TEXT</type>
        </field>
    </fields>
</customrecord>
```

Validating your project

This command will validate that all XML structure is correct and ensures that dependencies are met before deployment

Errors will be listed in the terminal

```
suitecloud project:validate
```

Deploying to NetSuite

This command pushes all project files to NetSuite

```
suitecloud project:deploy
```

Sample Use Cases

Use Case 1: Migrating custom scripts, records, and workflows between accounts

Use Case 2: Version control and rollback using Git integration

Use Case 3: Automating deployments with CI/CD pipelines

Use Case 4: Managing multiple NetSuite accounts (sandbox vs production)

Hands-on Exercise

Objective: Set up and configure SuiteCloud CLI + create a project using SDF

Tasks:

1. Install SuiteCloud CLI
2. Connect to your NetSuite account
3. Create an SDF project
4. Deploy to NS