

Laboratorio Oracle BPMN

IN79Ñ-1

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Obejetivo

- ▶ Hacer un proceso simplificado de credito y ejecutarlo directamente en el servidor.

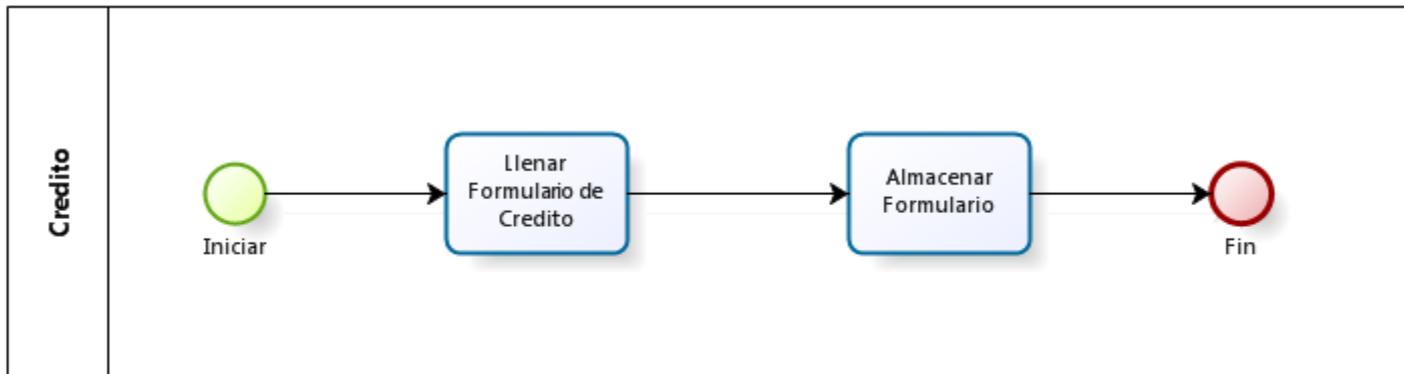


El Proceso

- ▶ Un proceso de solicitud de crédito comienza cuando el cliente decide pedir un crédito vía web.
- ▶ El cliente debe llenar los siguientes datos:
 - ▶ RUT
 - ▶ Nombre Completo
 - ▶ Fecha de nacimiento
 - ▶ Monto del crédito.
- ▶ Posteriormente la solicitud de crédito debe ser almacenada para que en otro proceso sea revisada.



Solucion BPMN



Proceso en Oracle BPMN

Requisitos para comenzar

- ▶ Jdeveloper
- ▶ BPM Extension
- ▶ SOA extension

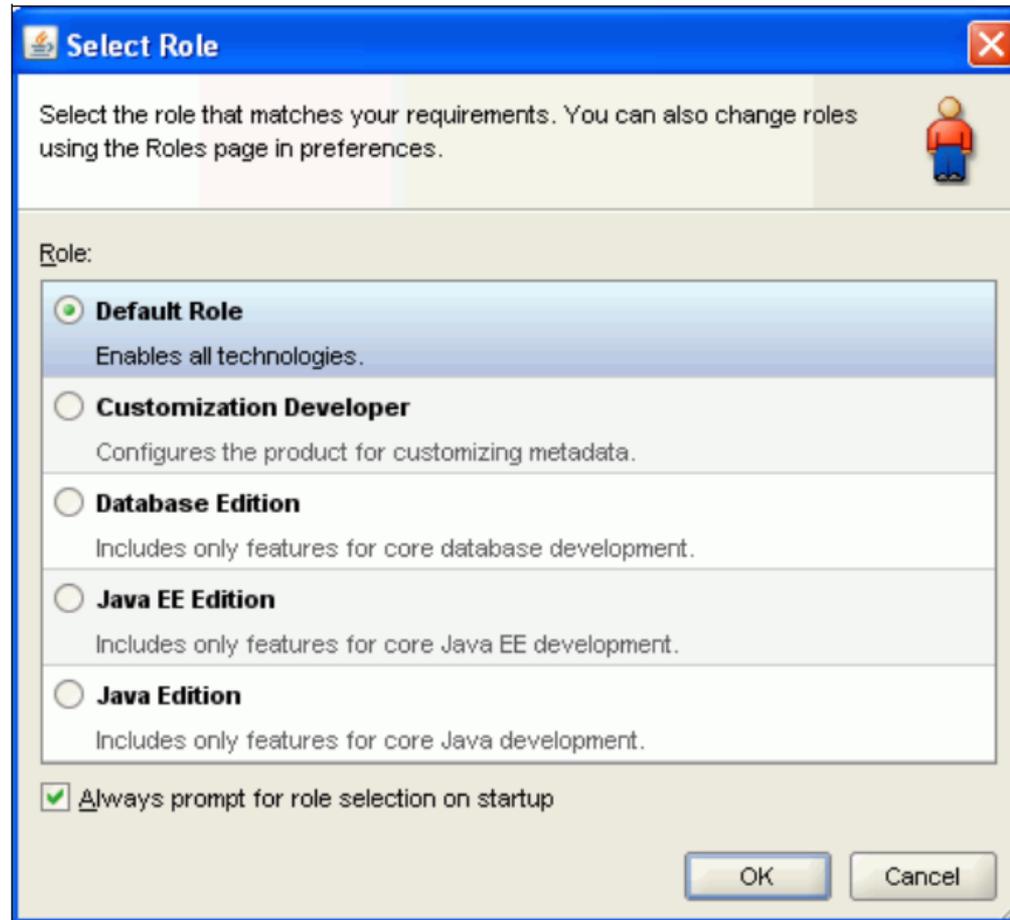


Pasos Para la Creacion del primer Proyecto

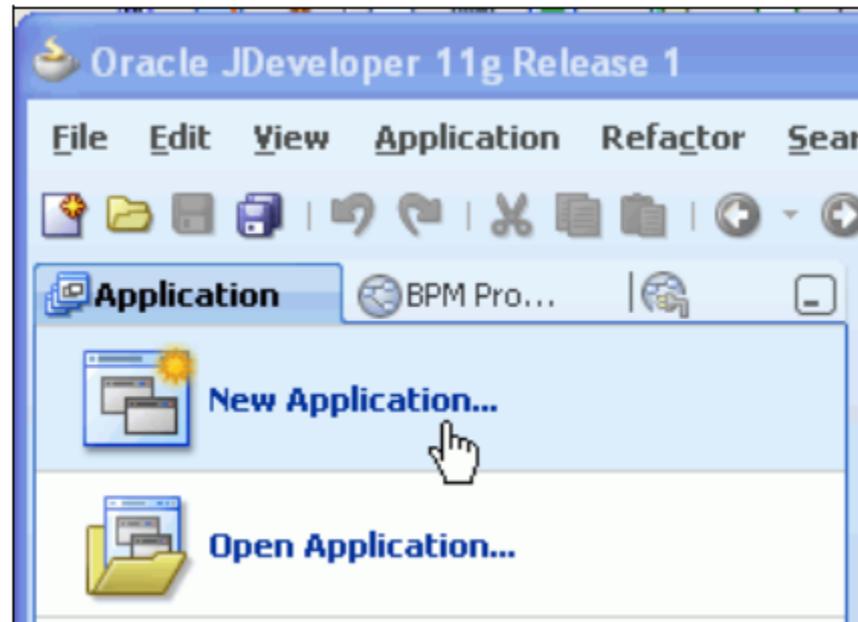
1. Crear Proyecto
2. Crear Proceso
3. Crear Objetos de negocio
4. Crear Fomulario
5. Servicio Para Grabar formulario
6. Definir Roles
7. Desplegar en servidor
8. Test y monitoreo



1. Crear Proyecto

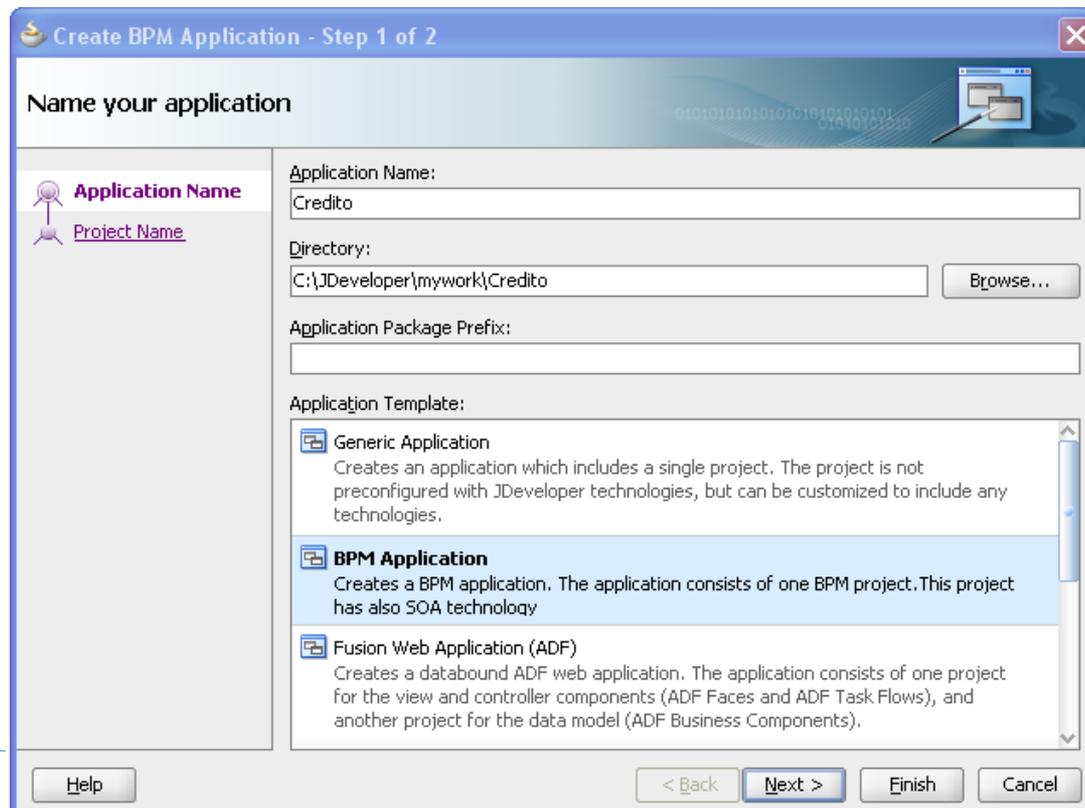


1. Crear Proyecto



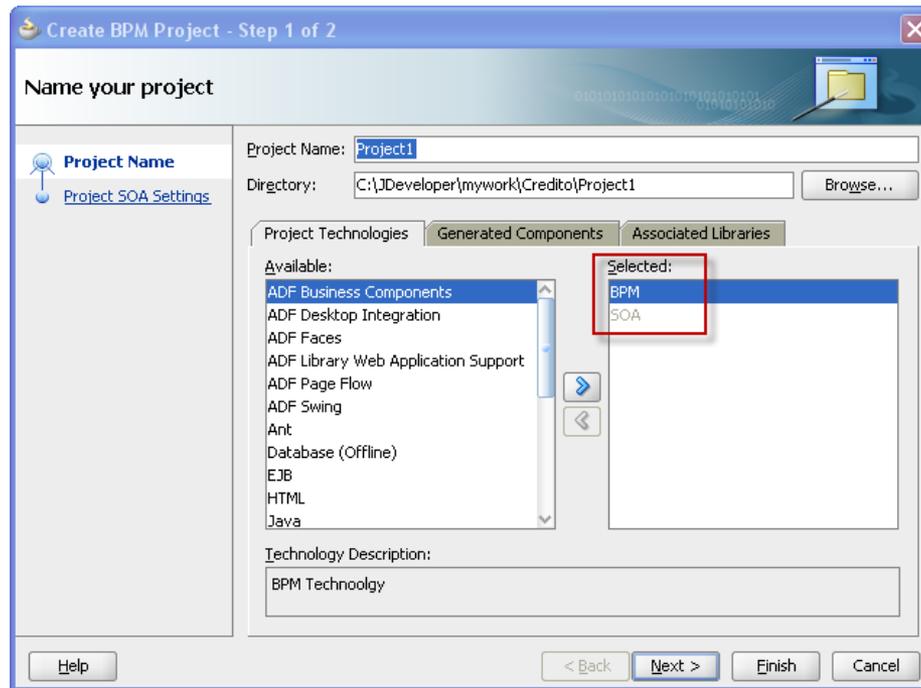
1. Crear Proyecto

- ▶ Application Name: **Credito[nombre]**
- ▶ Application Template: **BPM Application**

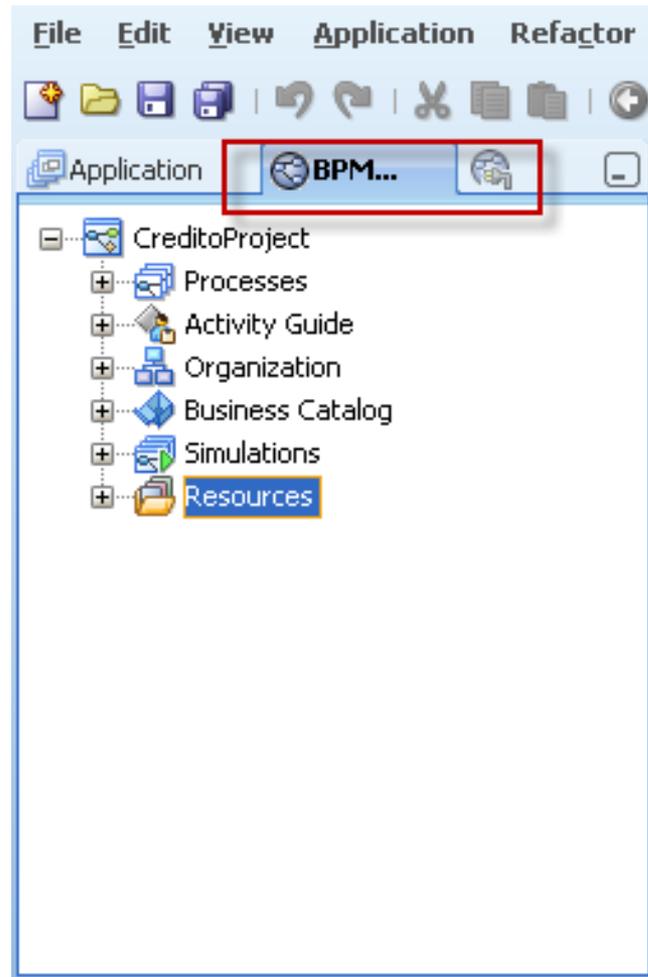


1. Crear Proyecto

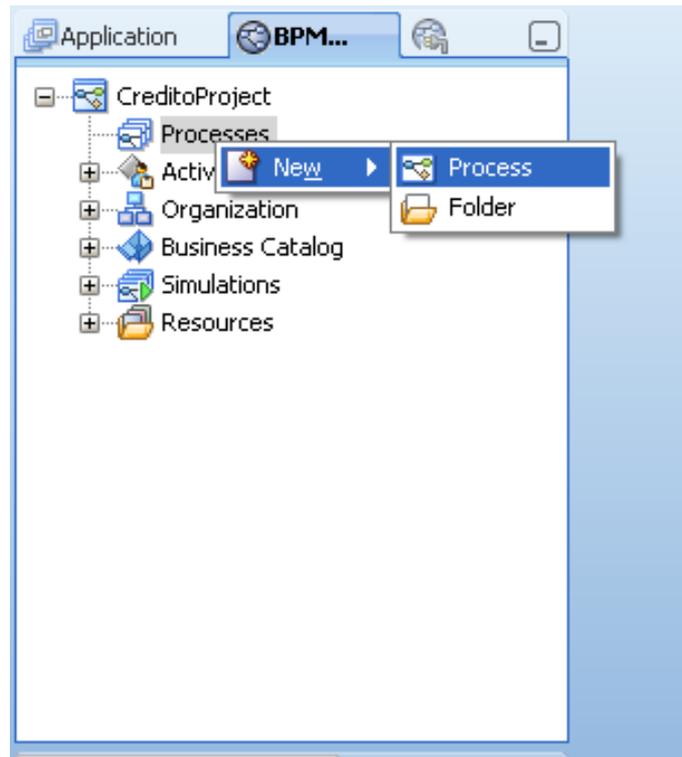
- ▶ Project Name: **CreditoProject**
- ▶ Technologies: **BPM y SOA**



2. Crear Proceso

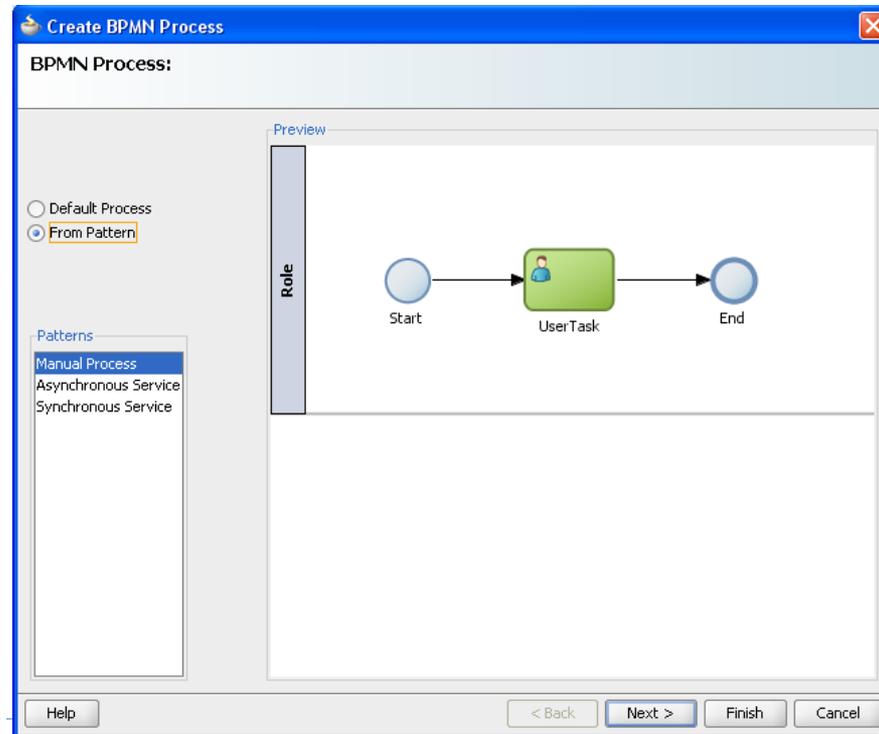


2. Crear Proceso



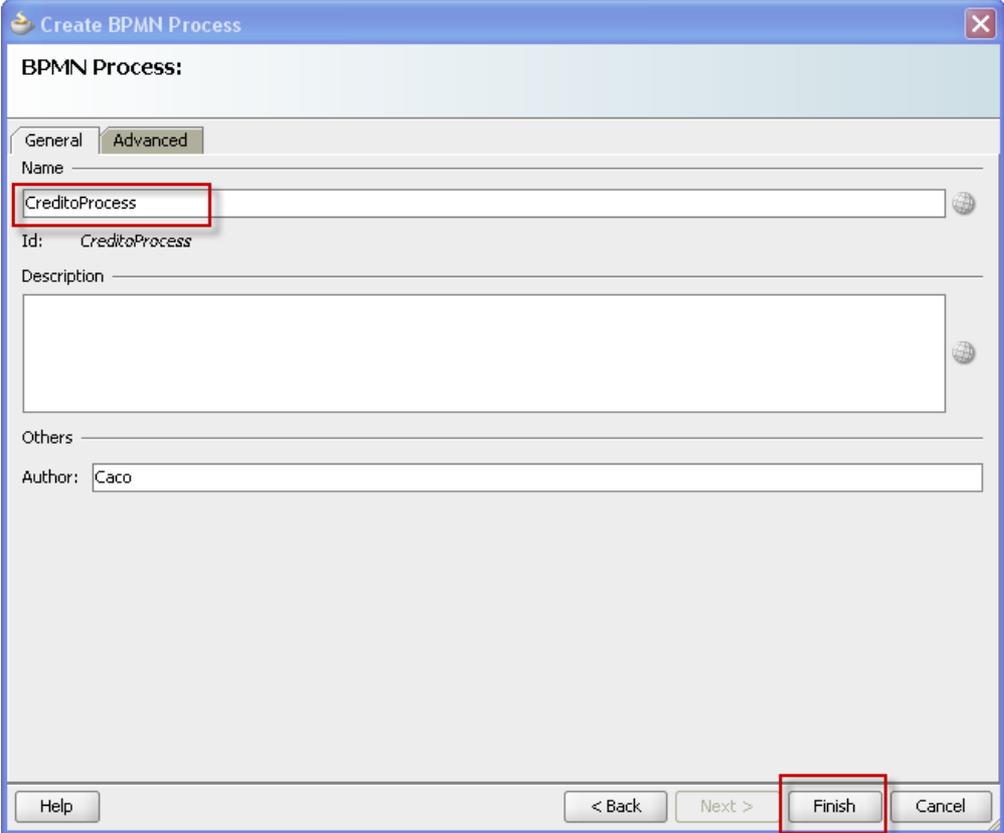
2. Crear Proceso

- ▶ From Pattern:
- ▶ Manual Process



2. Crear Proceso

- ▶ Name: Credito Process
- ▶ Finish



The screenshot shows a dialog box titled "Create BPMN Process". It has two tabs: "General" and "Advanced". The "Name" field is filled with "CreditoProcess" and is highlighted with a red box. Below it, the "Id" field is also filled with "CreditoProcess". The "Description" field is empty. The "Others" section has an "Author" field filled with "Caco". At the bottom, there are four buttons: "Help", "< Back", "Next >", and "Finish". The "Finish" button is highlighted with a red box.

Create BPMN Process

BPMN Process:

General Advanced

Name: CreditoProcess

Id: CreditoProcess

Description:

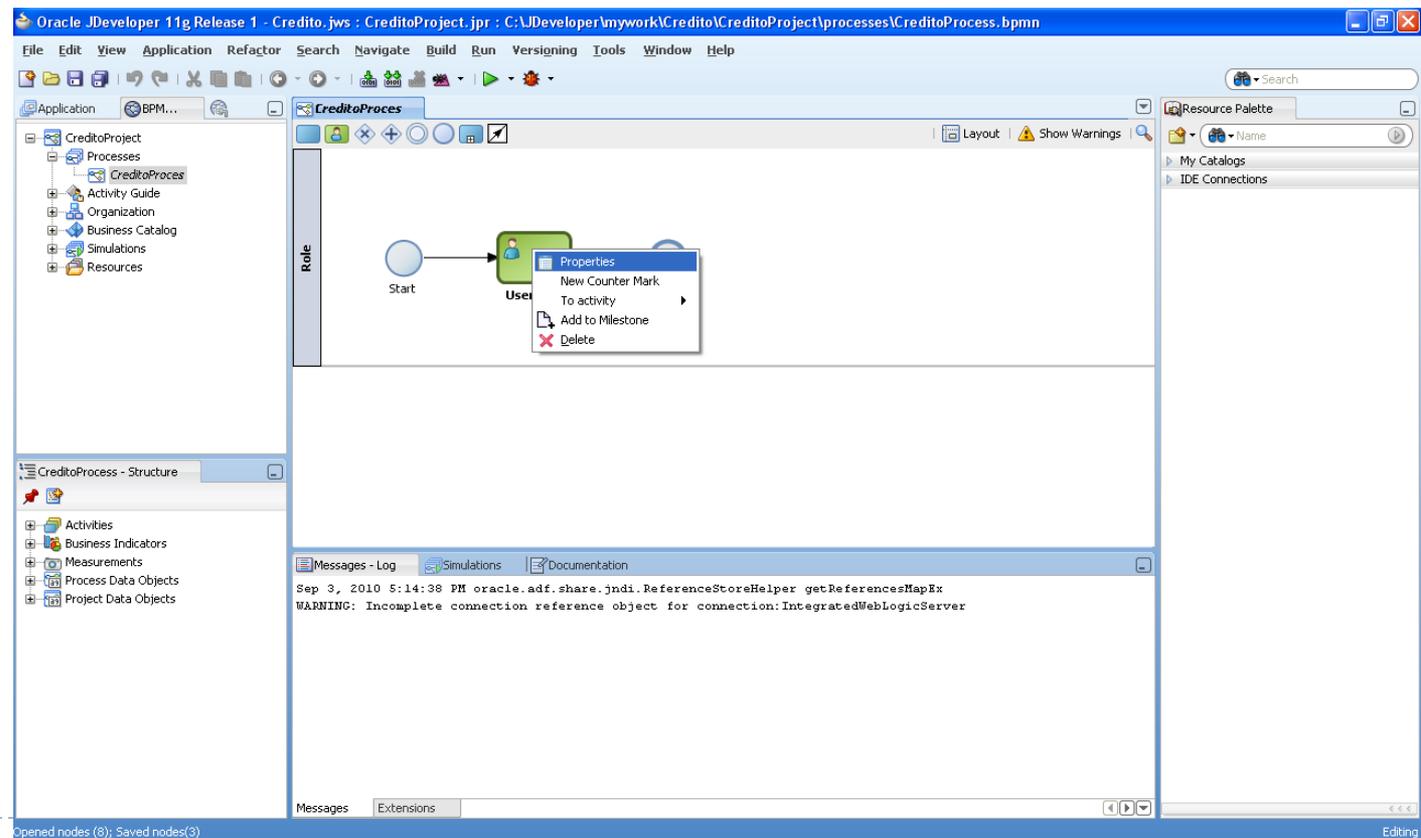
Others:

Author: Caco

Help < Back Next > Finish Cancel

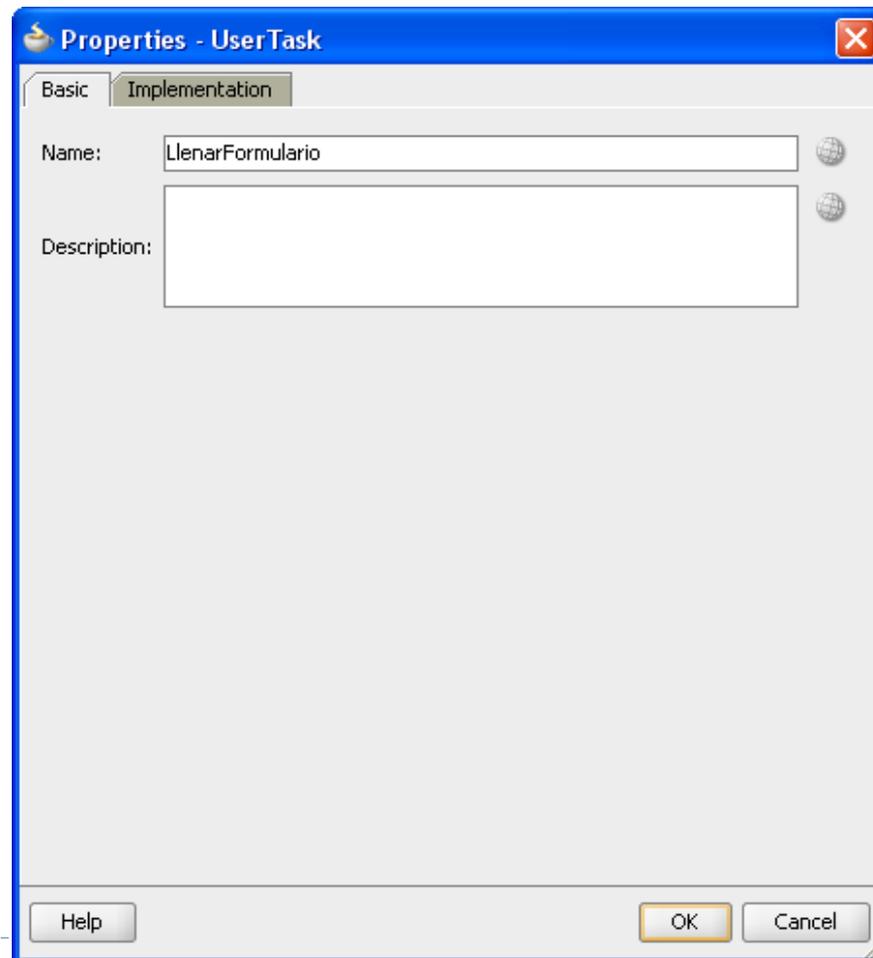
2. Crear Proceso

- ▶ Cambiar Nombre Actividad
- ▶ Sobre la actividad, boton derecho: **Properties**



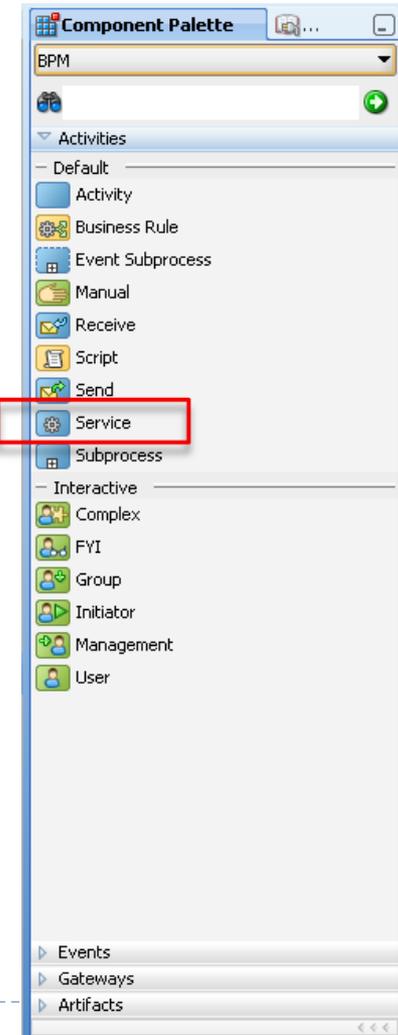
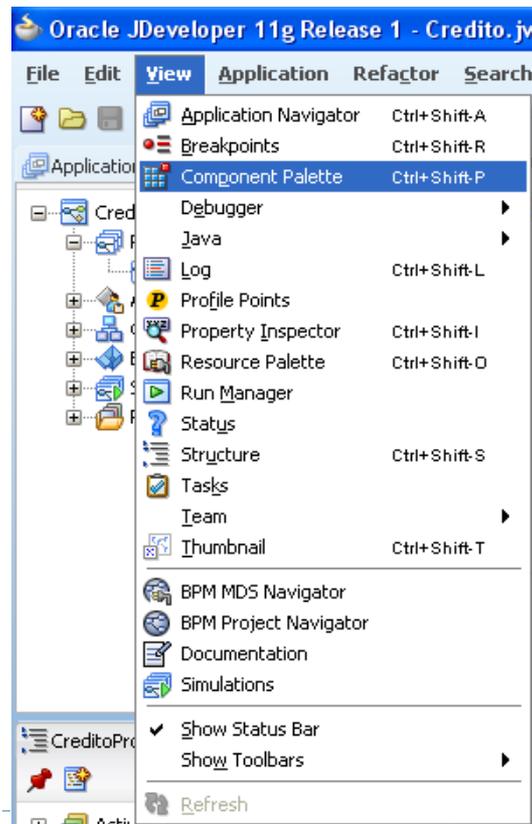
2. Crear Proceso

- ▶ Name: LlenarFormulario



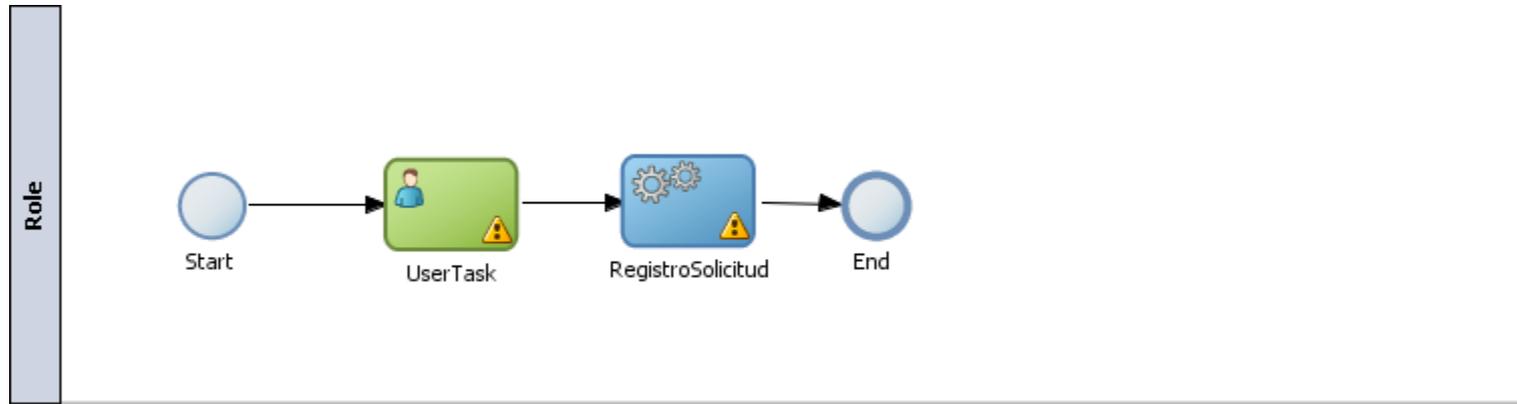
2. Crear Proceso

▶ View->Component Palette



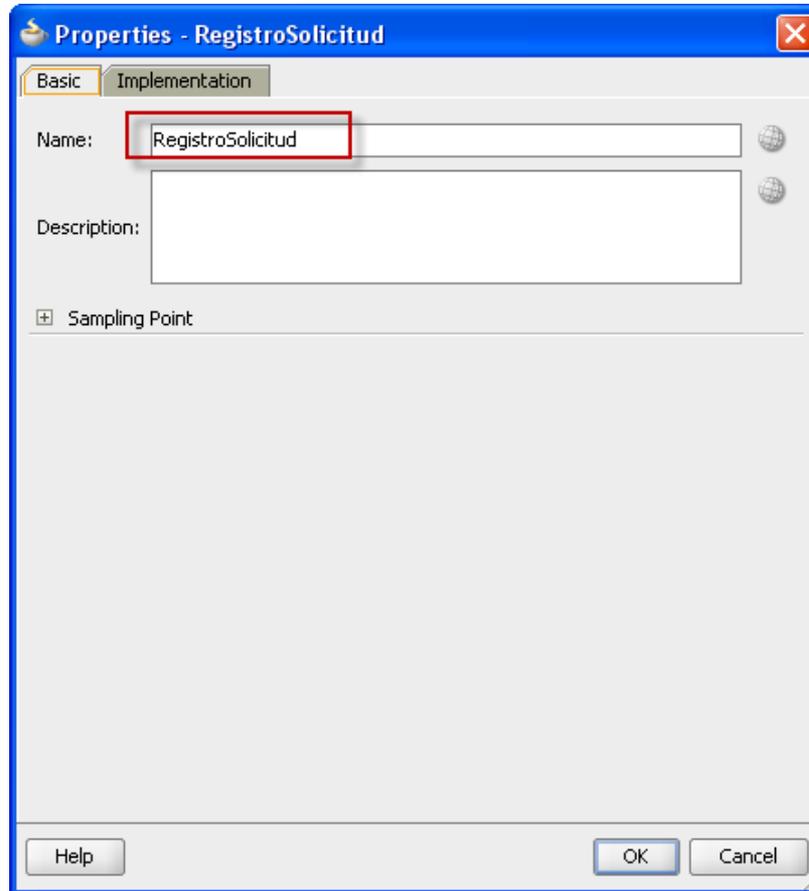
2. Crear Proceso

Agregar Actividad Registro Solicitud



2. Crear Proceso Agregar Actividad Registro Solicitud

- ▶ Name: **RegistroSolicitud**



2. Crear Proceso

The screenshot displays the Oracle JDeveloper 11g IDE with a BPMN process diagram titled "CreditoProcess". The process flow is as follows:

```
graph LR; Start((Start)) --> UserTask[UserTask]; UserTask --> RegistrarSolicitud[RegistrarSolicitud]; RegistrarSolicitud --> End((End));
```

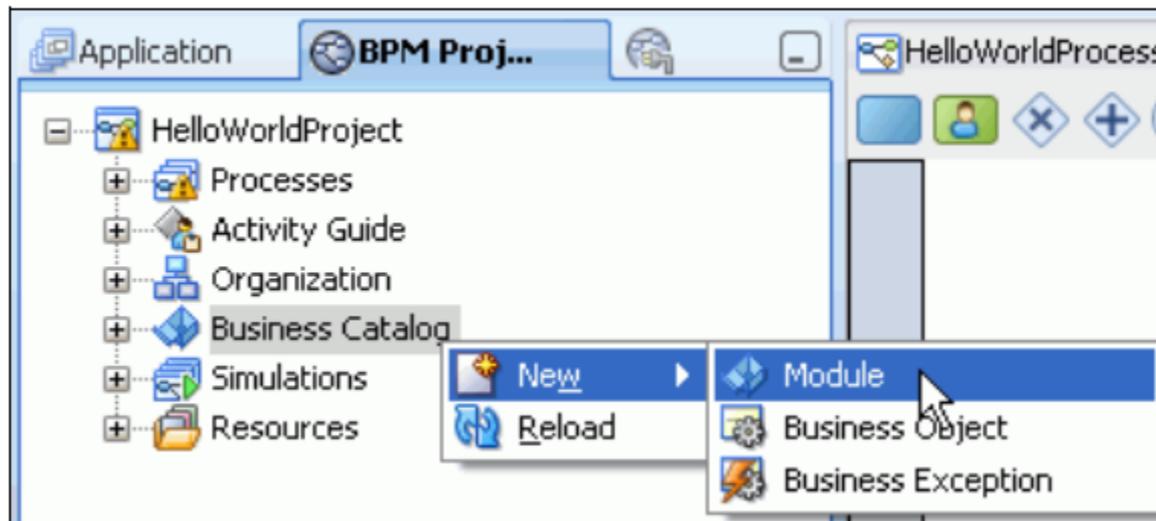
The interface includes several panels:

- Project Explorer:** Shows the project structure with folders for "Processes", "SOA Content", "classes", "testsuites", "xsd", "xsl", "Business Rules", and files like "composite.xml", "CreditoProcess.componentType", and "CreditoProcessDocumentation.xml".
- Component Palette:** Lists various BPMN elements such as Activity, Business Rule, Event Subprocess, Manual, Receive, Script, Send, Service, Subprocess, Complex, FYI, Group, Initiator, Management, and User.
- Messages-Log:** Displays error messages, including "One or more metadata store location(s) configured in SOA project(s) will not compile!" and "MDS-01333: missing element 'mds-config'".

The status bar at the bottom indicates the file path: "C:\JDeveloper\mywork\Credito\CreditoProject\CreditoProcess.jpr".

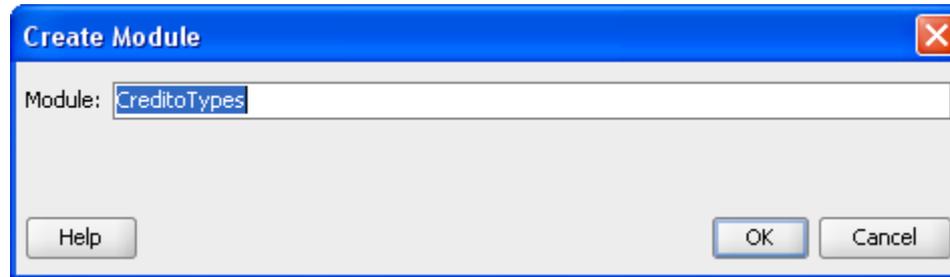
3. Crear Objetos De negocio

▶ Nuevo Modulo



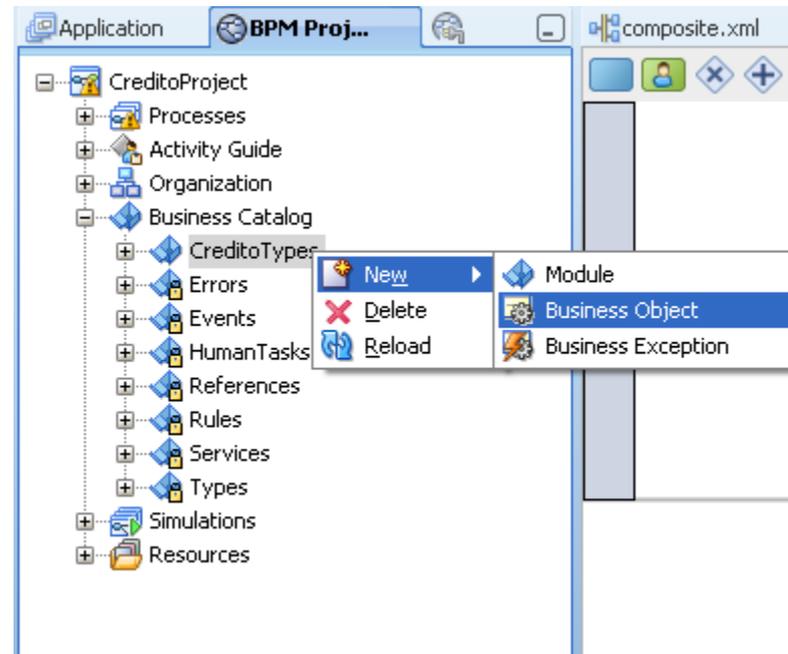
3. Crear Objetos De negocio

▶ Module: **CreditoTypes**



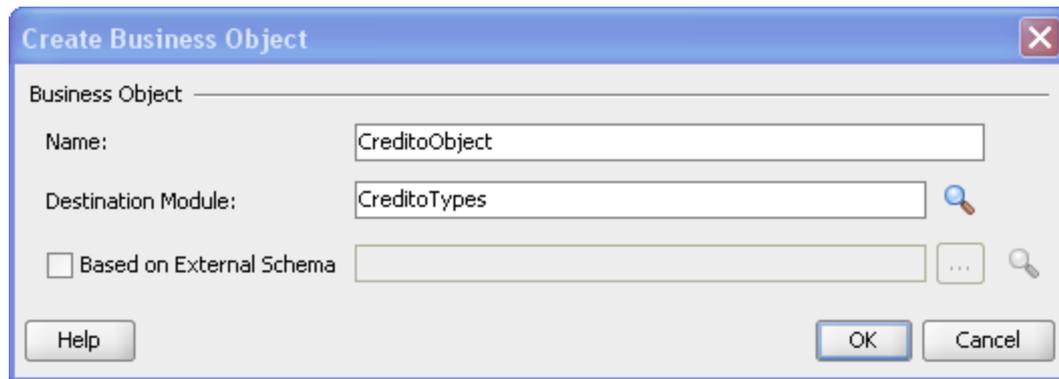
3. Crear Objetos De negocio

▶ New Business Object



3. Crear Objetos De negocio

- ▶ Name: **CreditoObject**



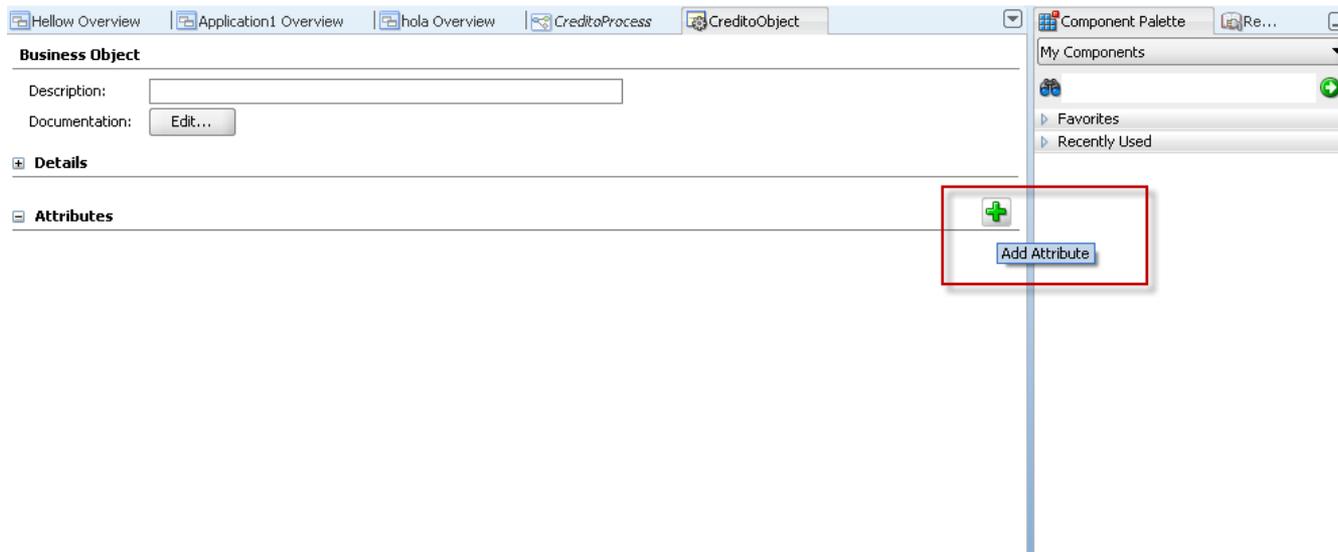
The screenshot shows a dialog box titled "Create Business Object". It contains the following fields and controls:

- Business Object**: A label above the input fields.
- Name:** A text input field containing "CreditoObject".
- Destination Module:** A text input field containing "CreditoTypes" with a search icon to its right.
- Based on External Schema:** A checkbox that is unchecked, followed by an empty text input field and a search icon.
- Buttons:** "Help", "OK", and "Cancel" buttons are located at the bottom of the dialog.



3. Crear Objetos De negocio

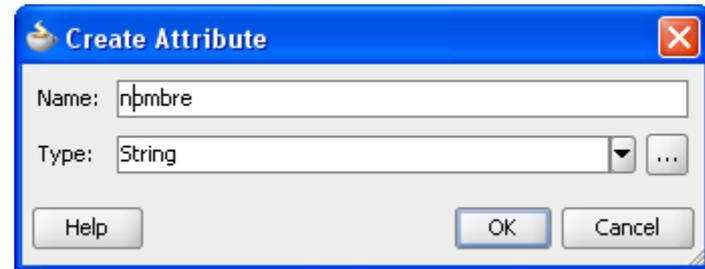
▶ Añadir Atributos



3. Crear Objetos De negocio

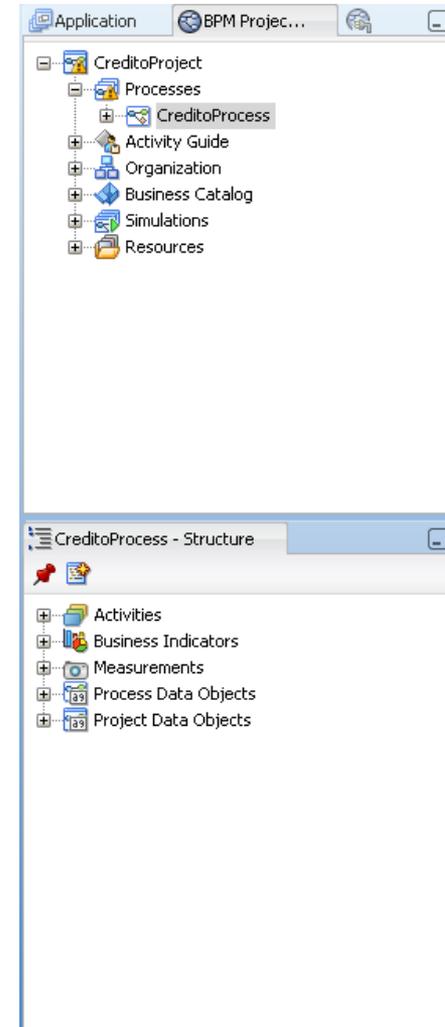
▶ Añadir Atributos:

| Name | Type |
|-----------------|--------|
| Nombre | String |
| Rut | String |
| FechaNacimiento | Time |
| Monto | Int |



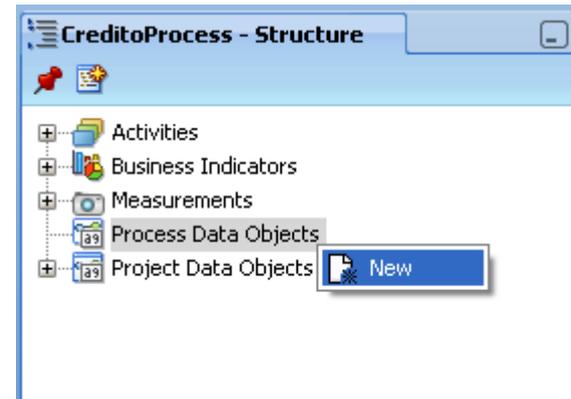
3. Crear Objetos De negocio

- ▶ En processes
 - ▶ CreditoProcess
 - ▶ Ver Structure
- ▶ Si no esta se puede añadir esa ventana en
 - ▶ View
 - ▶ Structure



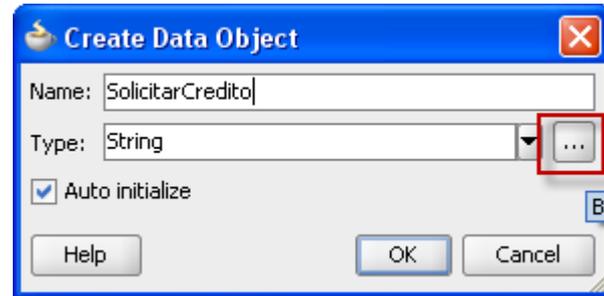
3. Crear Objetos De negocio

- ▶ En Process Data Object:
 - ▶ **New**

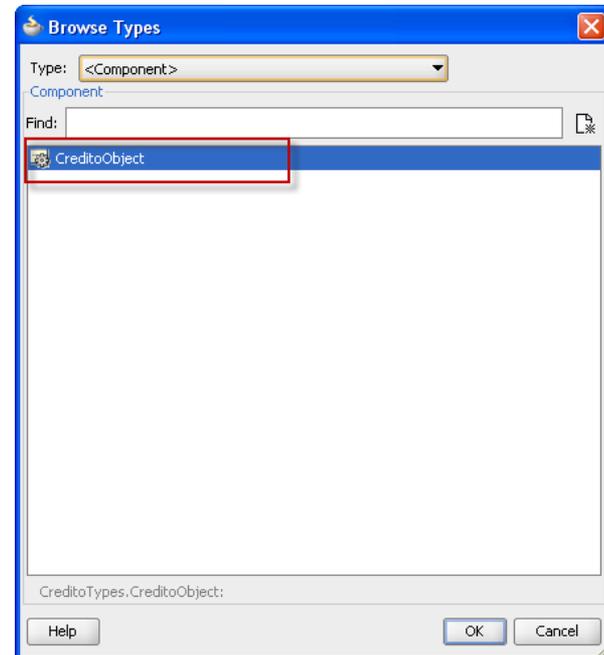


3. Crear Objetos De negocio

- ▶ Name: **SolicitarCredito**
- ▶ Type: ...

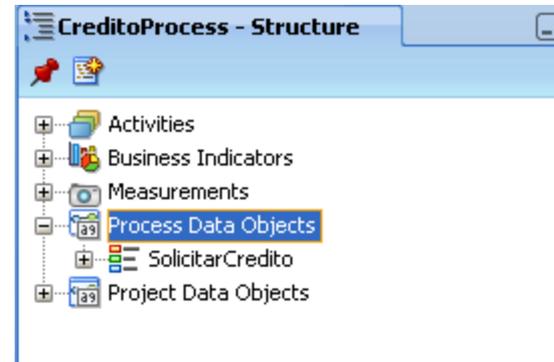


- ▶ Browse Types
- ▶ Type: **<Component>**
 - ▶ **CreditoObject**



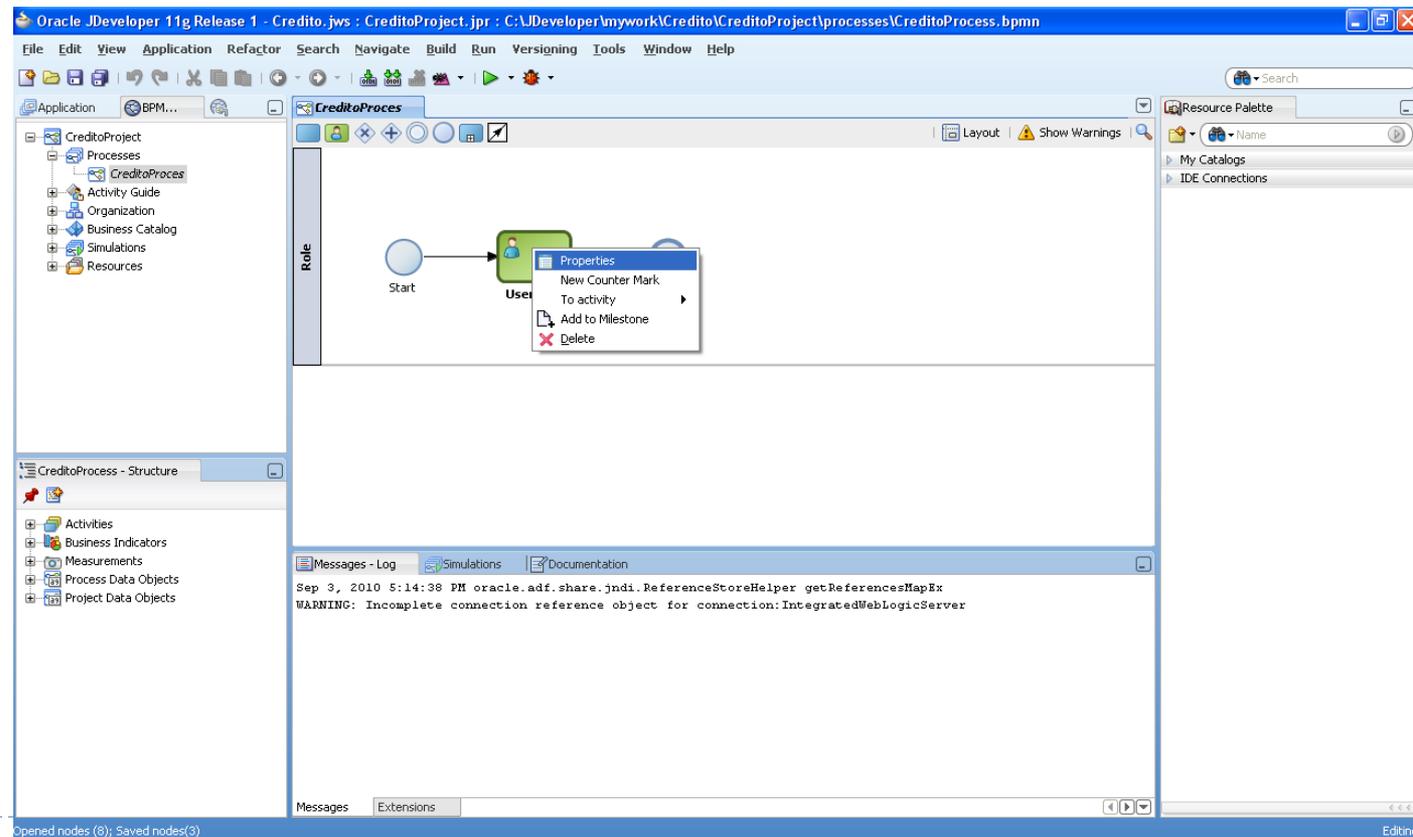
3. Crear Objetos De negocio

- ▶ El Data Object Solicitar Credito esta creado



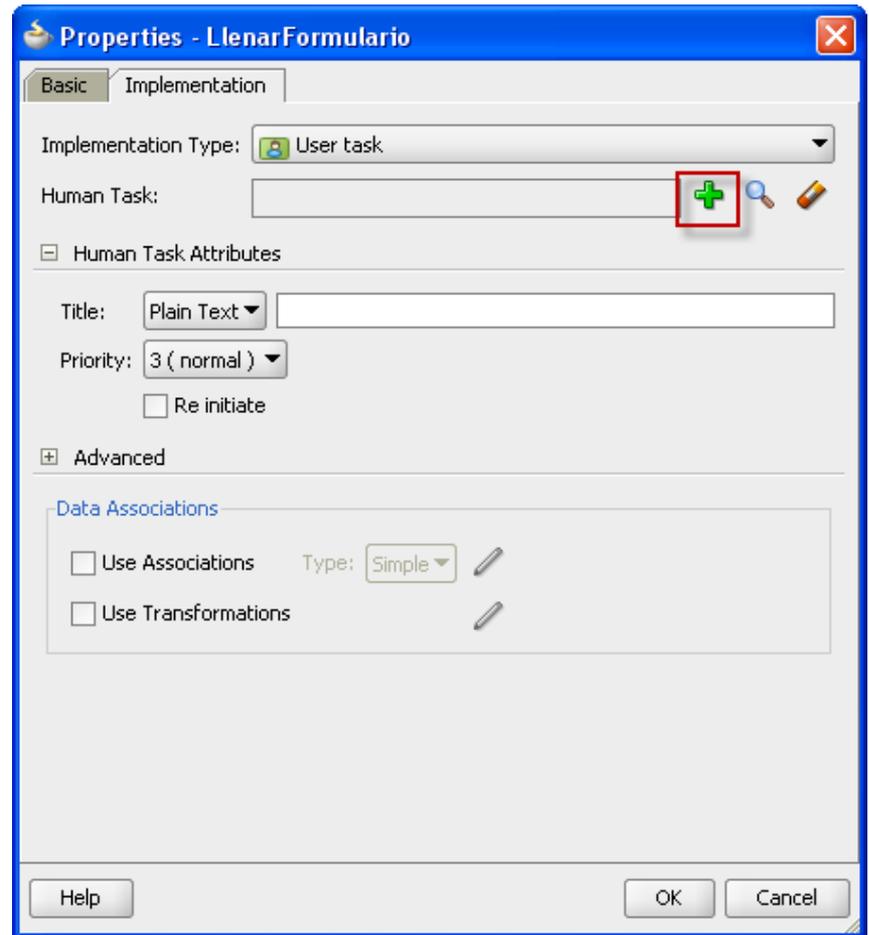
4. Crear Fomulario

- ▶ Implementacion del Formulaio
- ▶ Sobre la actividad, boton derecho: **Properties**



4. Crear Fomulario

- ▶ EN la pestaña
IMPLEMENTATION
- ▶ Definir Tarea Humana con +



4. Crear Fomulario

| | |
|------------|--|
| Name | EscribirFormulario |
| Pattern | Initiator |
| Title | Llenar formulario solicitud de credito |
| Parameters | + Añadir objetos de negocio |

Create Human Task

General

Name: Priority: 3 (normal)

Pattern:

Title:

Outcomes:

Parameters: 

| Parameter | Name | Type | Editable |
|-----------|------|------|----------|
|-----------|------|------|----------|

Outcome target:  

Help OK Cancel



4. Crear Fomulario

- ▶ Asociar el objeto de negocio solicitarCredito ya creado Arrastrandolo a los parametros
- ▶ Seleccionar “Editable”

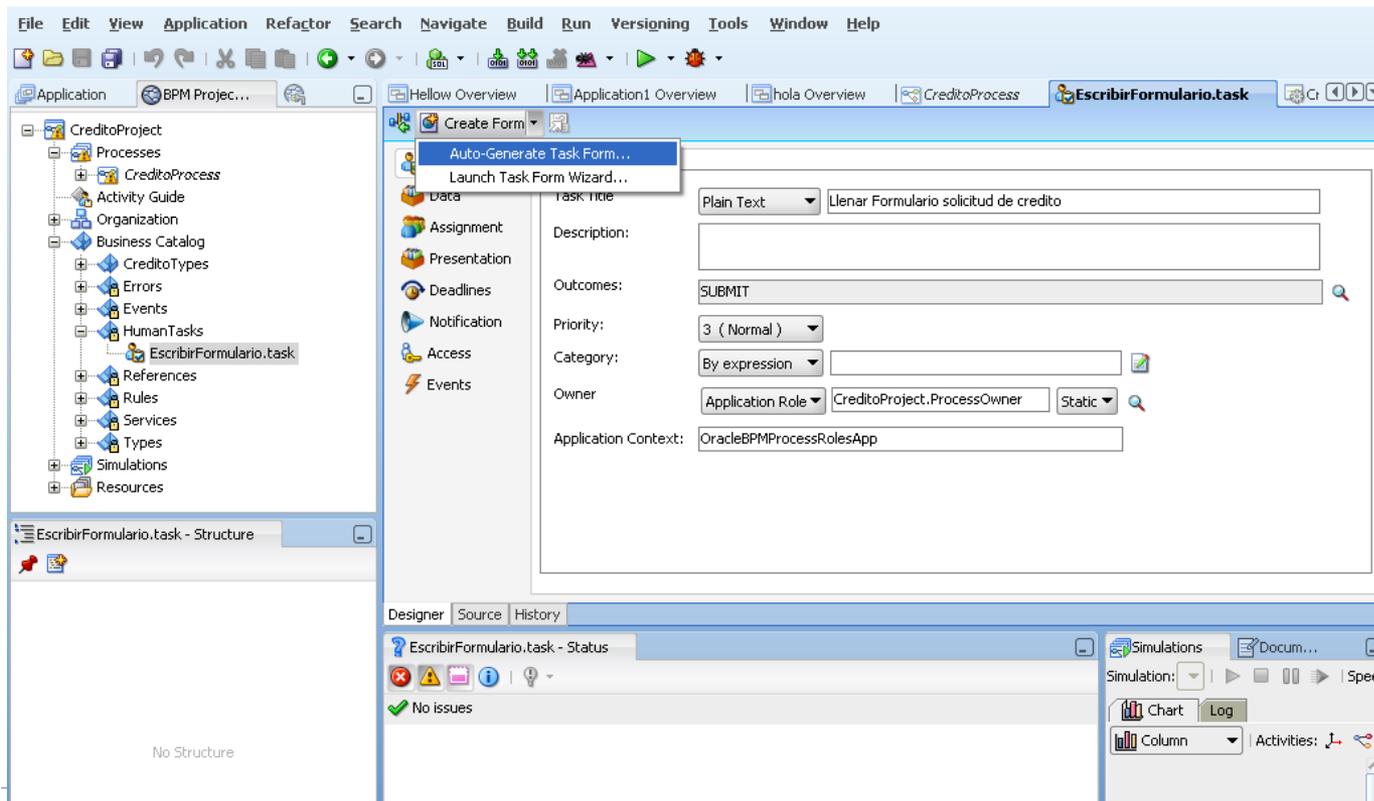
The screenshot shows two dialog boxes side-by-side. The left dialog, titled 'Create Human Task', has a 'General' tab. It contains fields for Name (EscibirFormulario), Priority (3 (normal)), Pattern (Initiator), Title (Llenar Formulario solicitud de credito), and Outcomes (SUBMIT). Below these is a 'Parameters' table with the following data:

| Parameter | Name | Type | Editable |
|---------------|------------------|------------------------|-------------------------------------|
| CreditoObject | SolicitarCredito | CreditoTypes.Credit... | <input checked="" type="checkbox"/> |

The right dialog, titled 'Data Object', has instructions to 'Drag Data Objects to Parameters table and Outcome Target field.' It shows a tree view with 'CreditoProcess' expanded, containing 'SolicitarCredito' (highlighted in blue) and 'CreditoProject'. A red arrow points from 'SolicitarCredito' in this dialog to the 'SolicitarCredito' parameter in the 'Parameters' table of the 'Create Human Task' dialog.

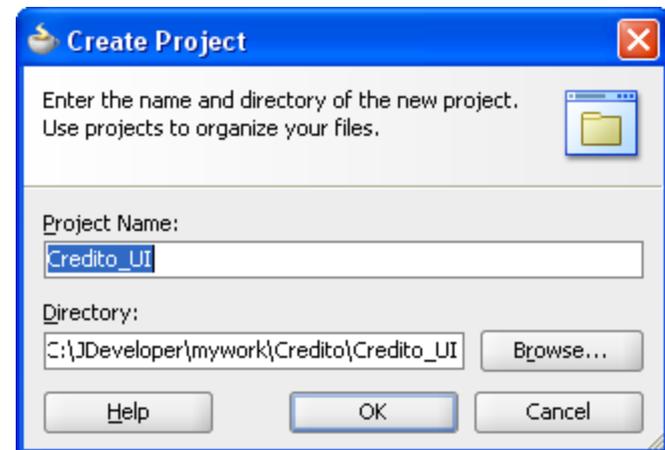
4. Crear Fomulario

- ▶ Abrir “EscribirFormulario” en Buisness Catalog > Human Task> EscribirFormulario.task
- ▶ En create Form > Auto-Generate Task Form

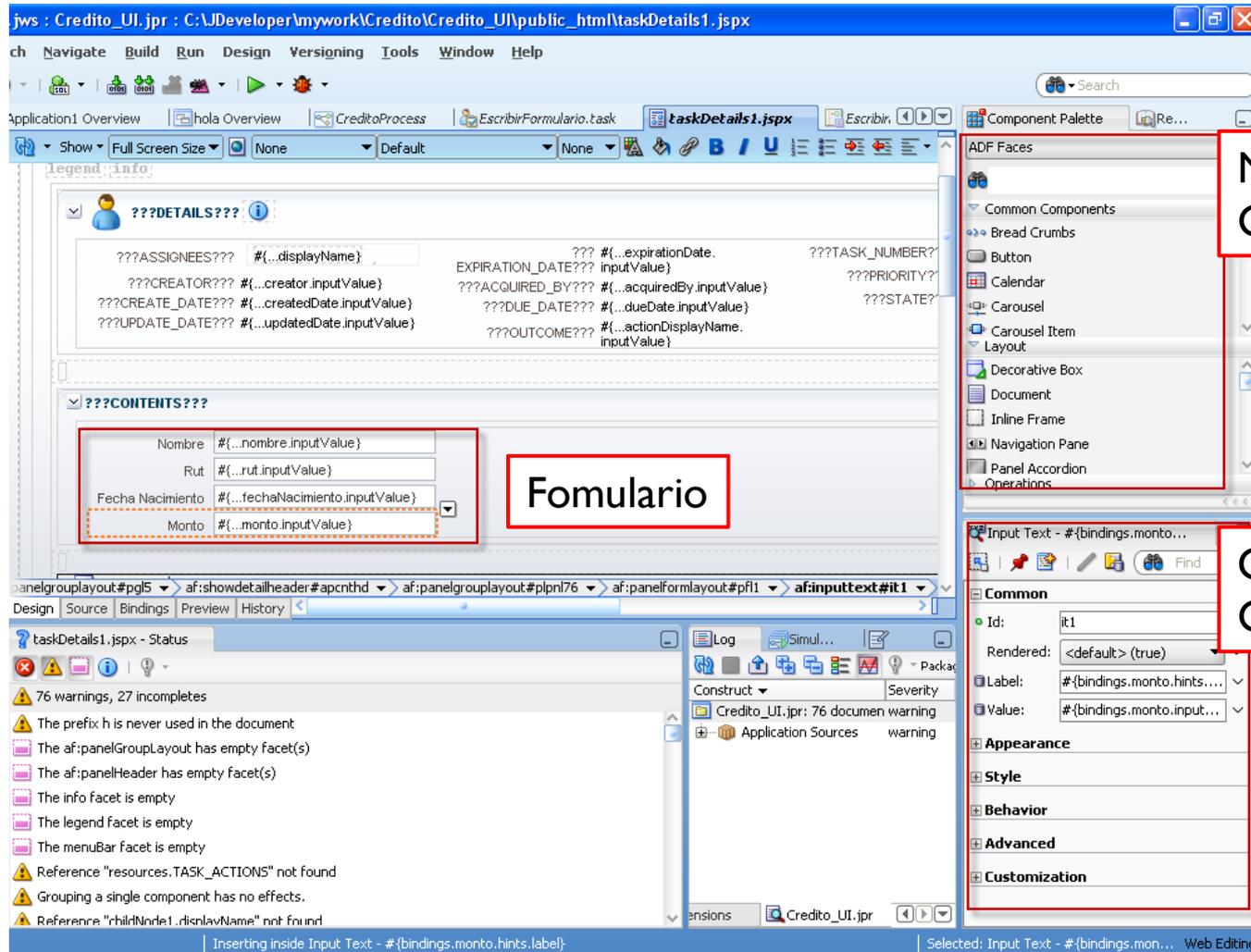


4. Crear Fomulario

- ▶ Project Name:
 - ▶ Credito_UI



4. Crear Fomulario

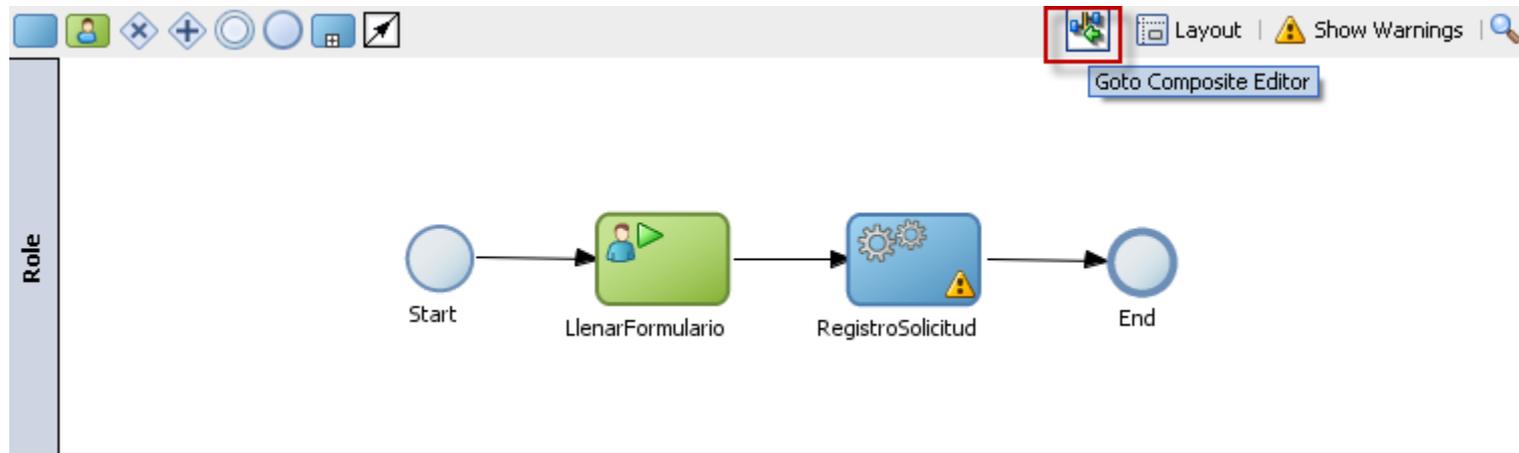


Nuevas Componentes

Opciones de Componentes

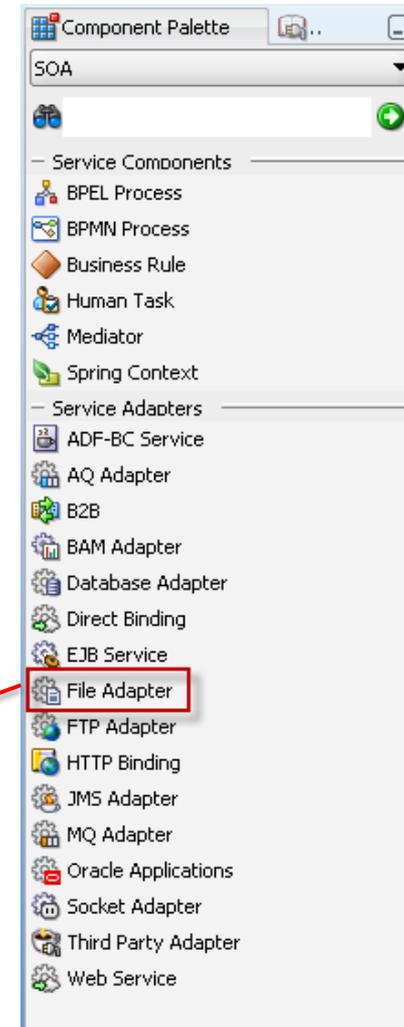
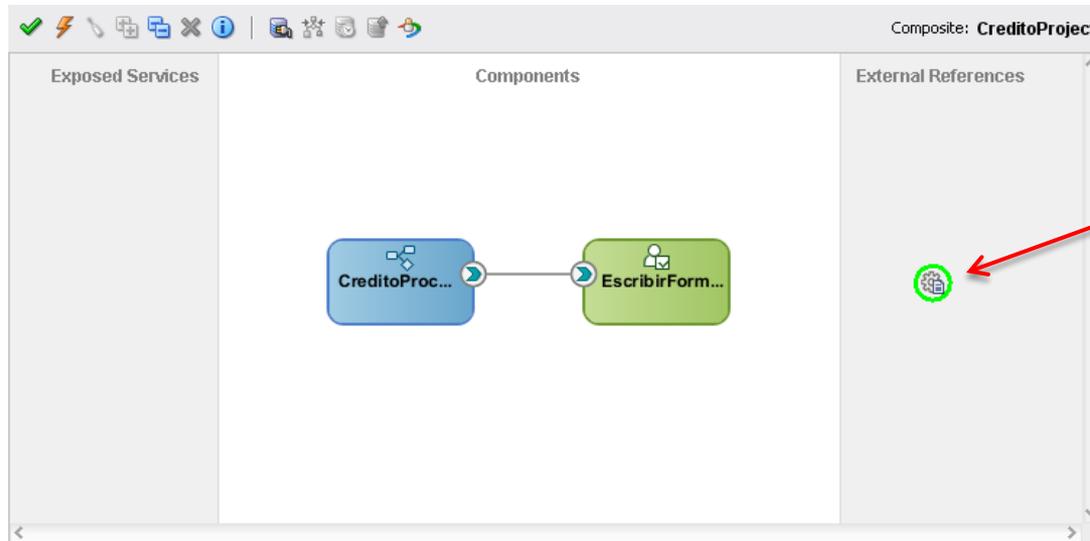
5. Servicio Para Grabar formulario

- ▶ Ir a Composite Editor



5. Servicio Para Grabar formulario

- ▶ Paleta de componentes.
- ▶ Componentes SOA
 - ▶ Elegir File Adapter
- ▶ Drag and Drop a “External References”



5. Servicio Para Grabar formulario

▶ Service Name:

- ▶ GuardadSolicitud

▶ Adapter Interface:

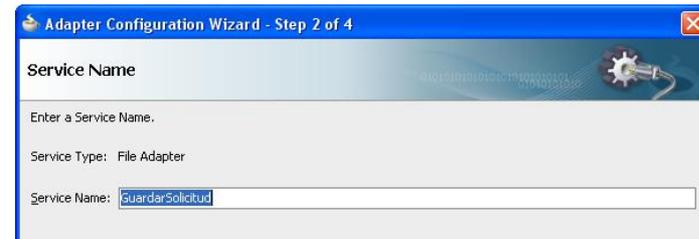
- ▶ Define from operator and schema

▶ Operation Type:

- ▶ Write File

▶ Operation Name:

- ▶ Escribir



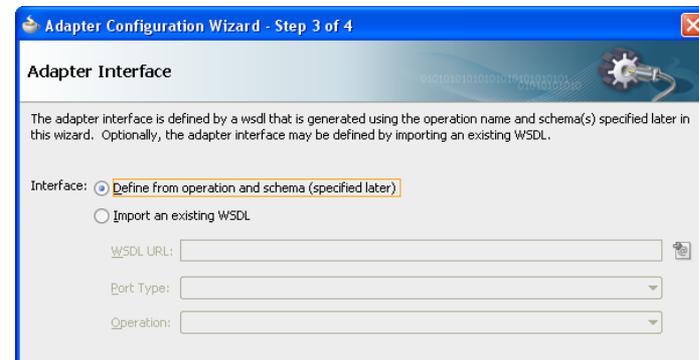
Adapter Configuration Wizard - Step 2 of 4

Service Name

Enter a Service Name.

Service Type: File Adapter

Service Name:



Adapter Configuration Wizard - Step 3 of 4

Adapter Interface

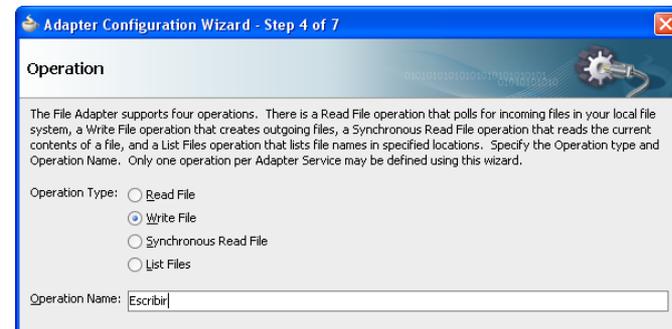
The adapter interface is defined by a wsdl that is generated using the operation name and schema(s) specified later in this wizard. Optionally, the adapter interface may be defined by importing an existing WSDL.

Interface: Define from operation and schema (specified later)
 Import an existing WSDL

WSDL URL:

Port Type:

Operation:



Adapter Configuration Wizard - Step 4 of 7

Operation

The File Adapter supports four operations. There is a Read File operation that polls for incoming files in your local file system, a Write File operation that creates outgoing files, a Synchronous Read File operation that reads the current contents of a file, and a List Files operation that lists file names in specified locations. Specify the Operation type and Operation Name. Only one operation per Adapter Service may be defined using this wizard.

Operation Type: Read File
 Write File
 Synchronous Read File
 List Files

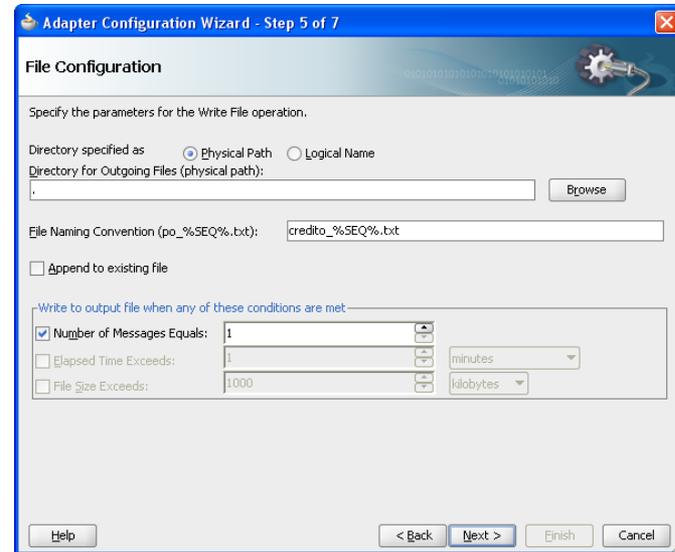
Operation Name:

5. Servicio Para Grabar formulario

▶ Directory Outgoing Files:

▶ .

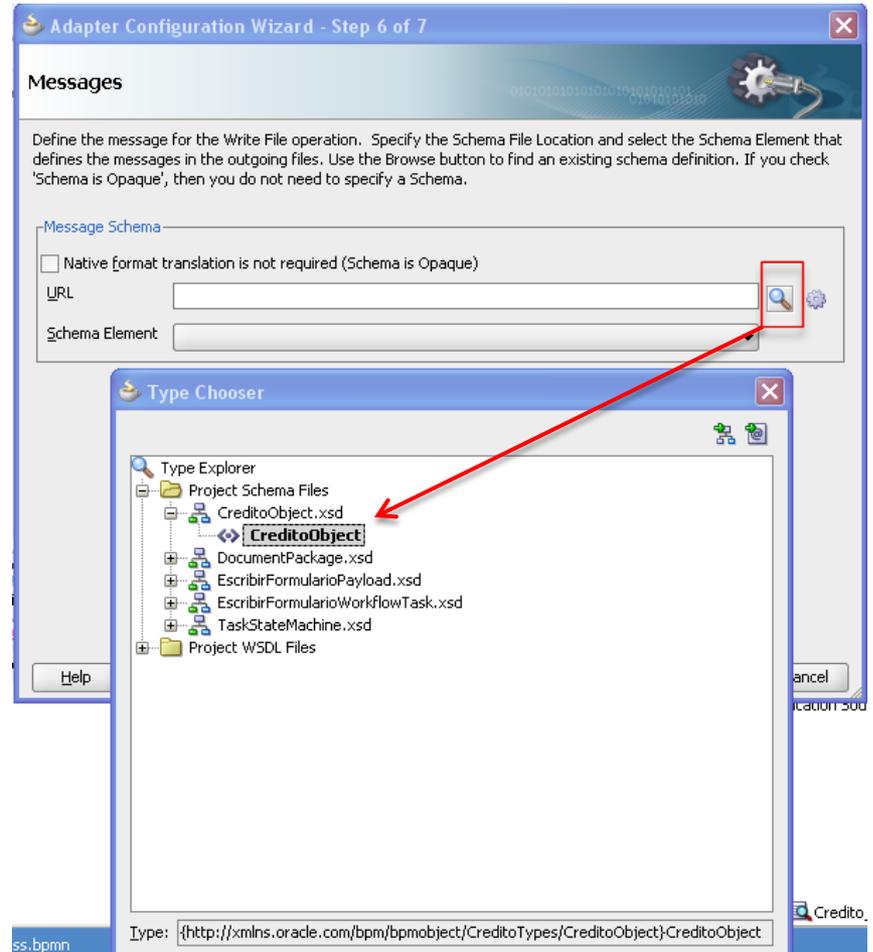
▶ File Naming: Credito_%Seq%.txt



5. Servicio Para Grabar formulario

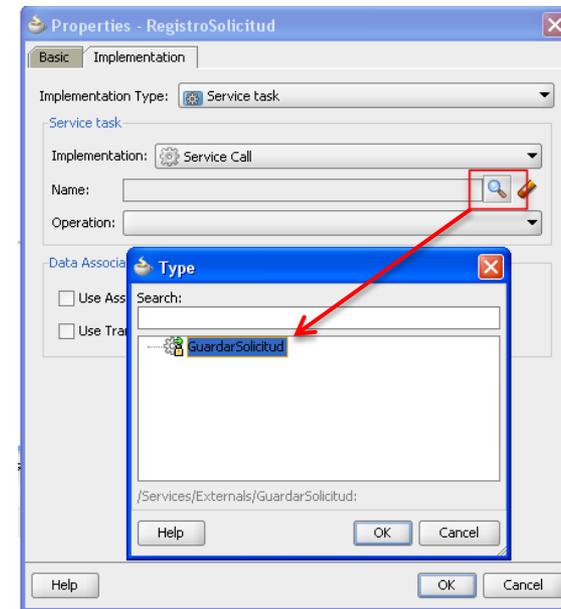
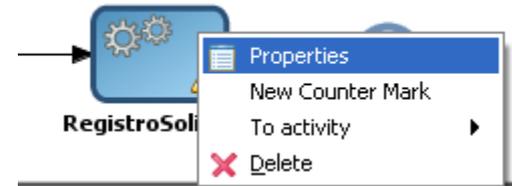
► URL

- Asociar con **CreditoObject**



5. Servicio Para Grabar formulario

- ▶ Asociar Servicio Creado a RegistroSolicitud.
 - ▶ Boton derecho en RegistroSolicitud
 - ▶ Properties
- ▶ En pestaña implementation
 - ▶ Implementation: **Service Call**
 - ▶ Name: *Buscar (lupa)*
 - ▶ **Guardar Solicitud**



5. Servicio Para Grabar formulario

▶ Usar Associations

▶ Edit

Properties - Write Message

Basic Implementation

Implementation Type: Service task

Service task

Implementation: Service Call

Name: MessageWriter

Operation: write

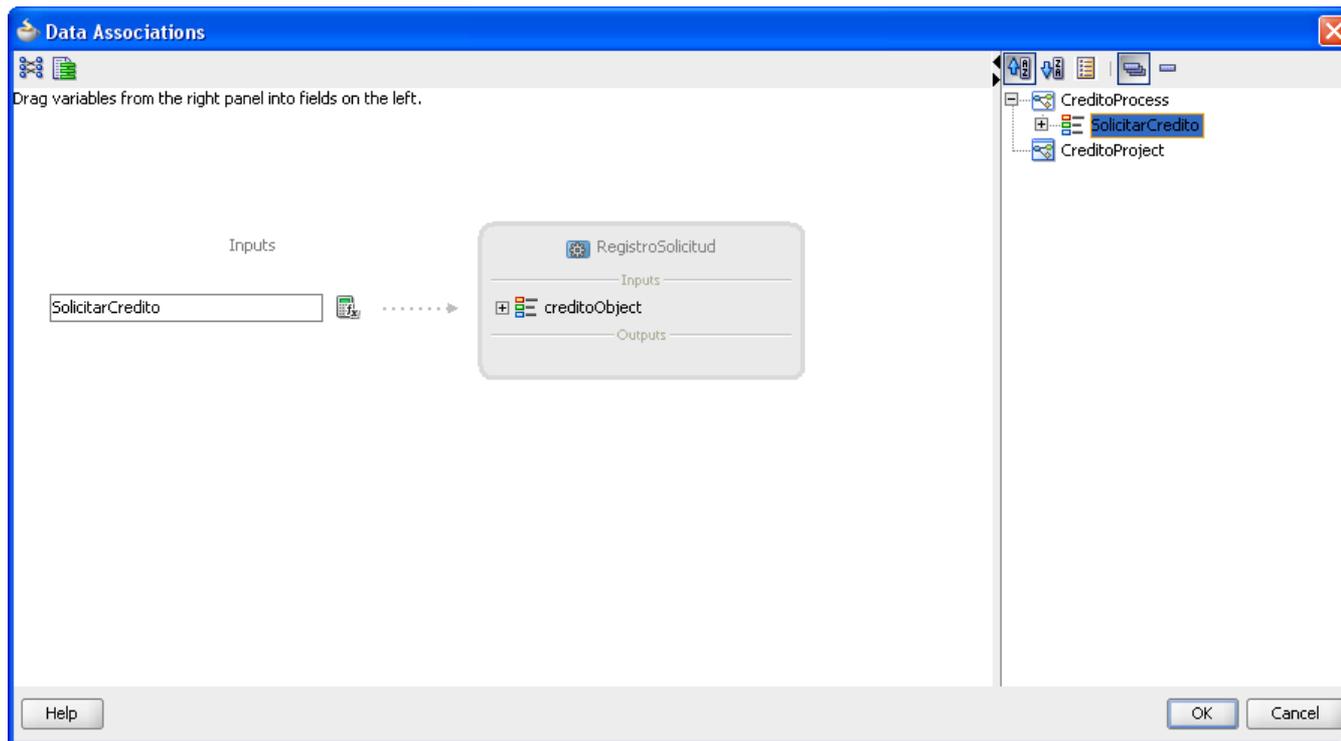
Data Associations

Use Associations Use Transformations

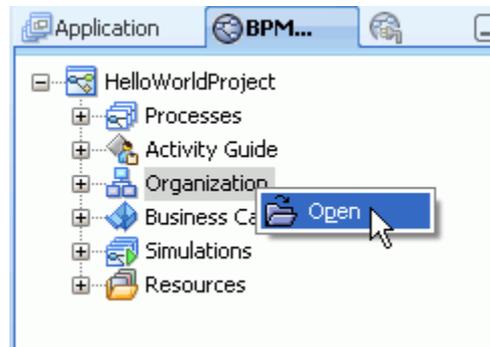
Type: Simple

5. Servicio Para Grabar formulario

▶ Arrastrar Solicitar Credito a Inputs

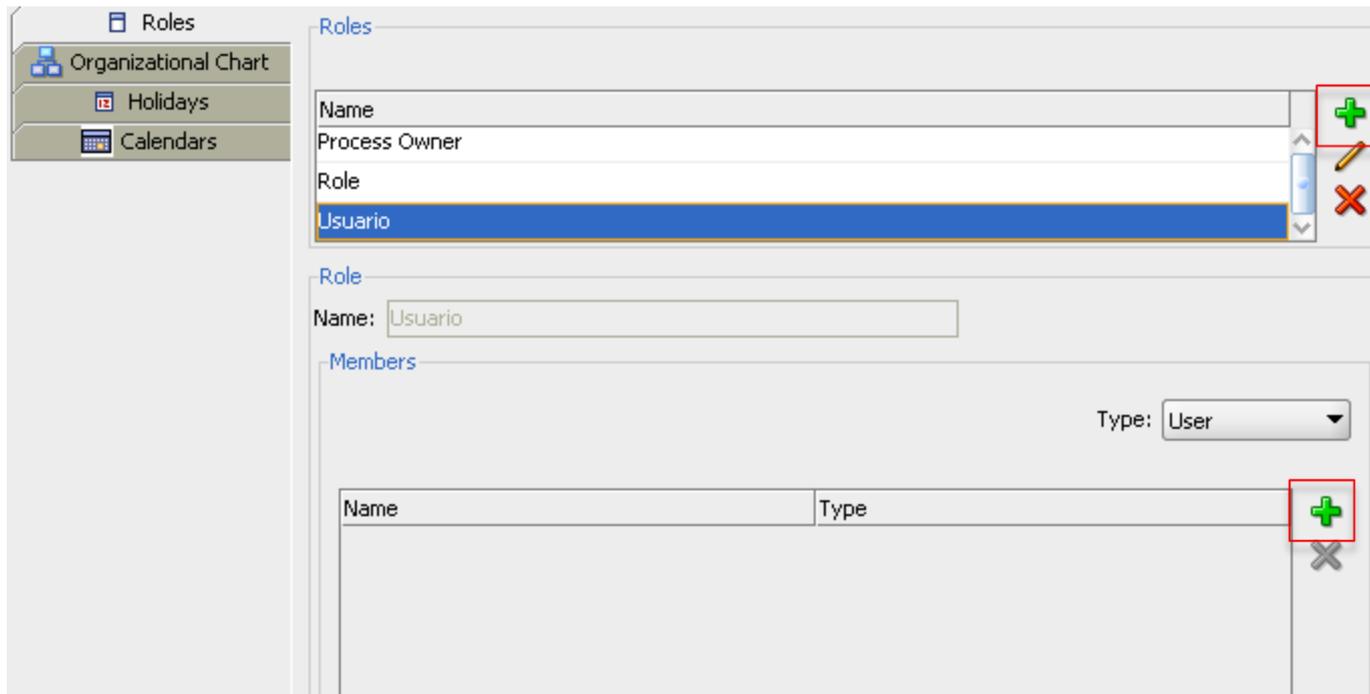


6. Definir Roles

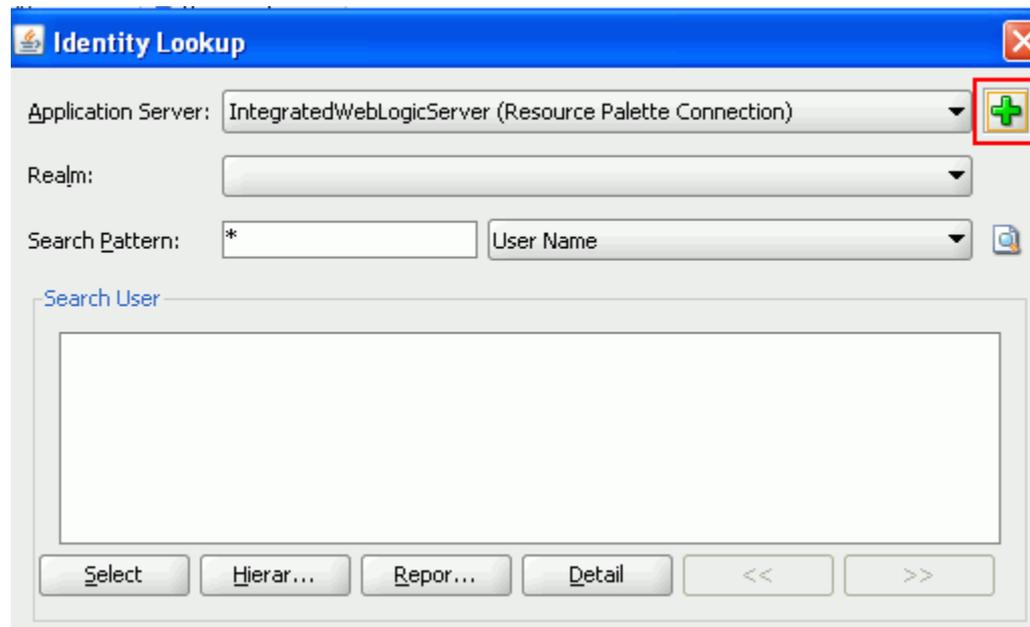


6. Definir Roles

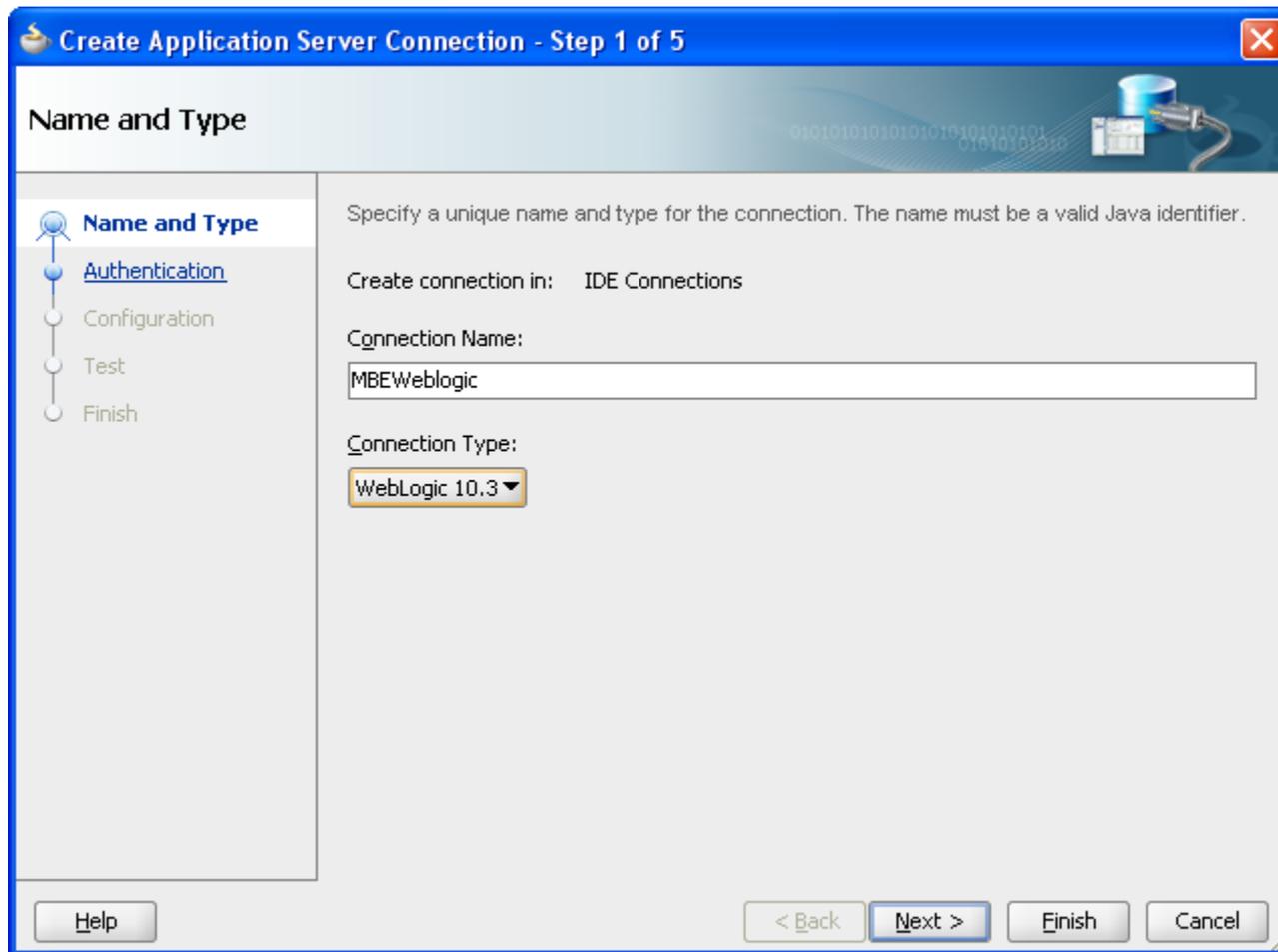
- ▶ Roles:Añadir (+)
 - ▶ Usuario
- ▶ Members: Añadir (+)



6. Definir Roles



6. Definir Roles



6. Definir Roles

- ▶ User: weblogic
- ▶ Password: welcome1

The screenshot shows a wizard window titled "Create Application Server Connection - Step 2 of 5". The "Authentication" step is selected in the left-hand navigation pane. The main area contains the following text and fields:

Specify a username and password to authenticate the connection.

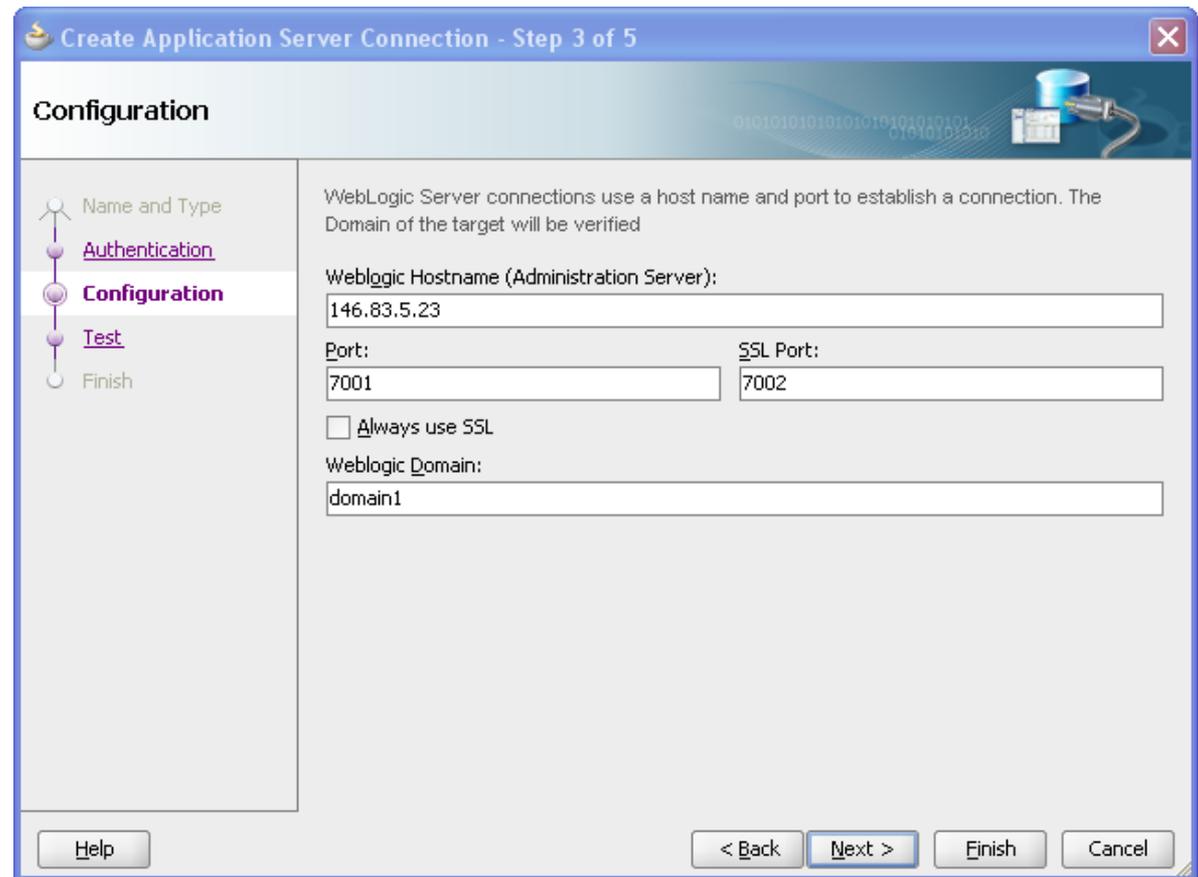
Username:

Password:

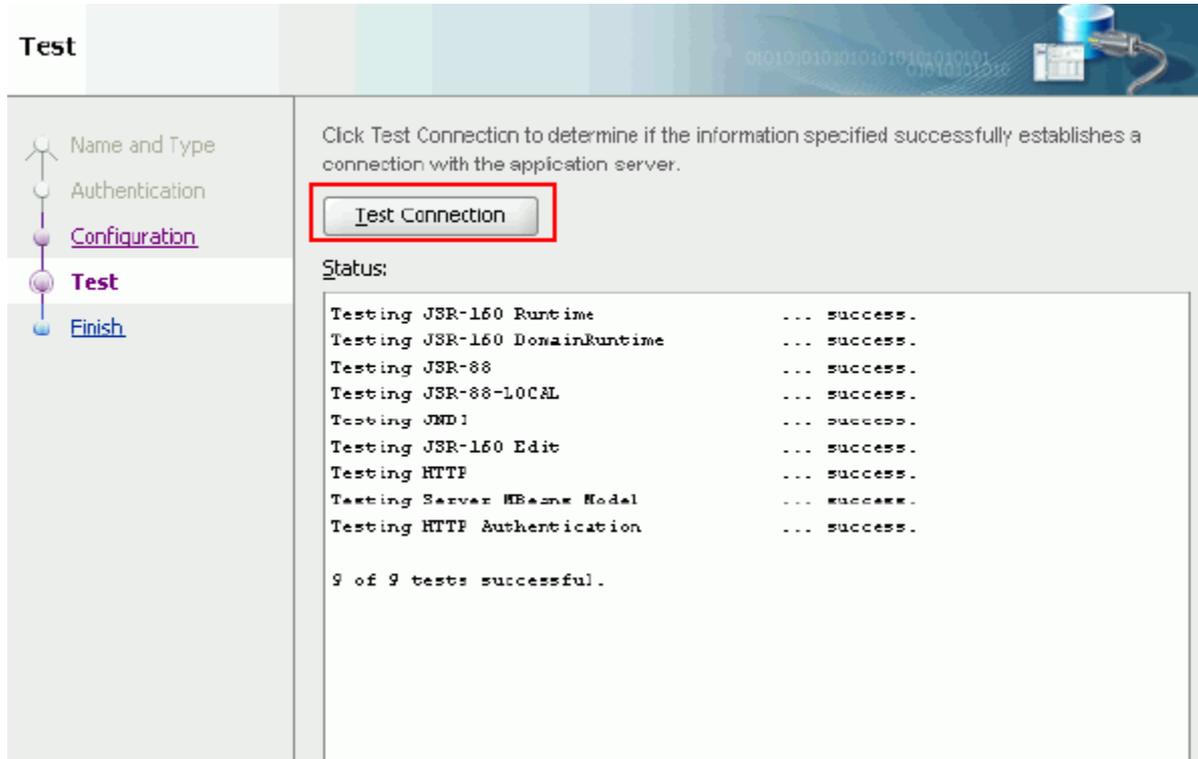
At the bottom of the window, there are four buttons: "Help", "< Back", "Next >", and "Cancel". The "Next >" button is highlighted with a red box.

6. Definir Roles

- ▶ Weblogic Server: **146.83.5.23**
- ▶ Port: **7001**
- ▶ SSL: **7002**
- ▶ Domain:
 - ▶ **Domain1**



6. Definir Roles



Test

Click Test Connection to determine if the information specified successfully establishes a connection with the application server.

Test Connection

Status:

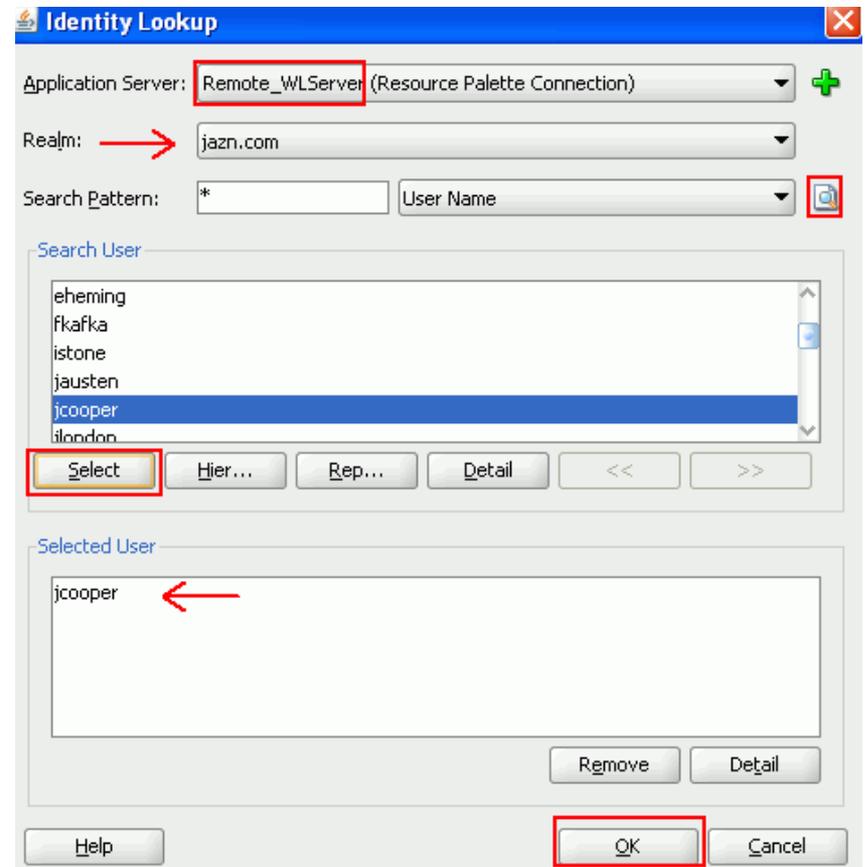
| | |
|-------------------------------|--------------|
| Testing JSR-160 Runtime | ... success. |
| Testing JSR-160 DomainRuntime | ... success. |
| Testing JSR-88 | ... success. |
| Testing JSR-88-LOCAL | ... success. |
| Testing JNDI | ... success. |
| Testing JSR-160 Edit | ... success. |
| Testing HTTP | ... success. |
| Testing Server MBean Model | ... success. |
| Testing HTTP Authentication | ... success. |

9 of 9 tests successful.

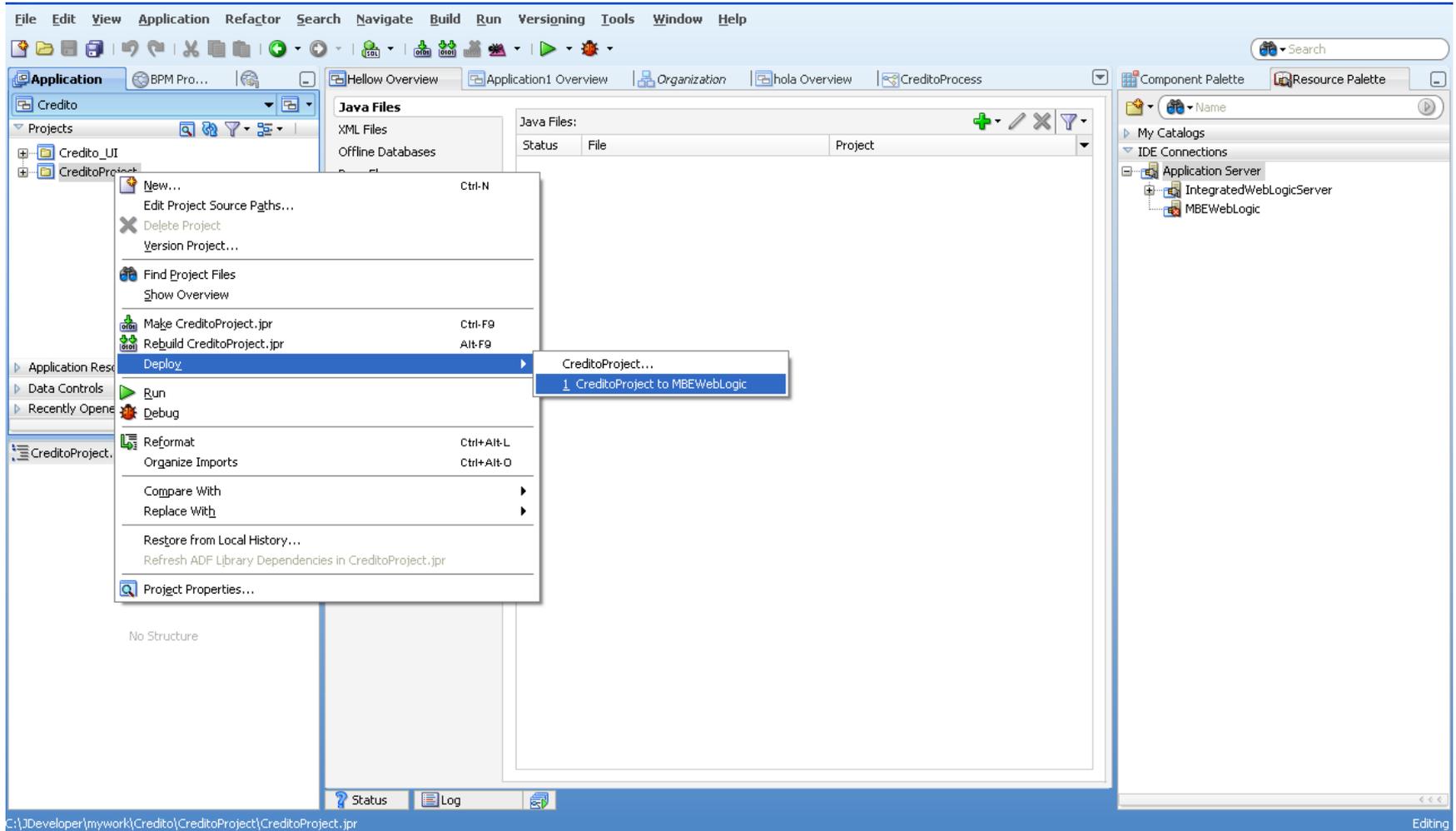
The screenshot shows a software interface for testing a connection. On the left, there is a vertical navigation pane with five items: 'Name and Type', 'Authentication', 'Configuration', 'Test', and 'Finish'. The 'Test' item is currently selected and highlighted. The main area of the window contains a 'Test Connection' button, which is highlighted with a red rectangle. Below the button, there is a 'Status:' section containing a list of tests and their results. All tests listed are successful. The tests include JSR-160 Runtime, JSR-160 DomainRuntime, JSR-88, JSR-88-LOCAL, JNDI, JSR-160 Edit, HTTP, Server MBean Model, and HTTP Authentication. At the bottom of the status section, it says '9 of 9 tests successful.'



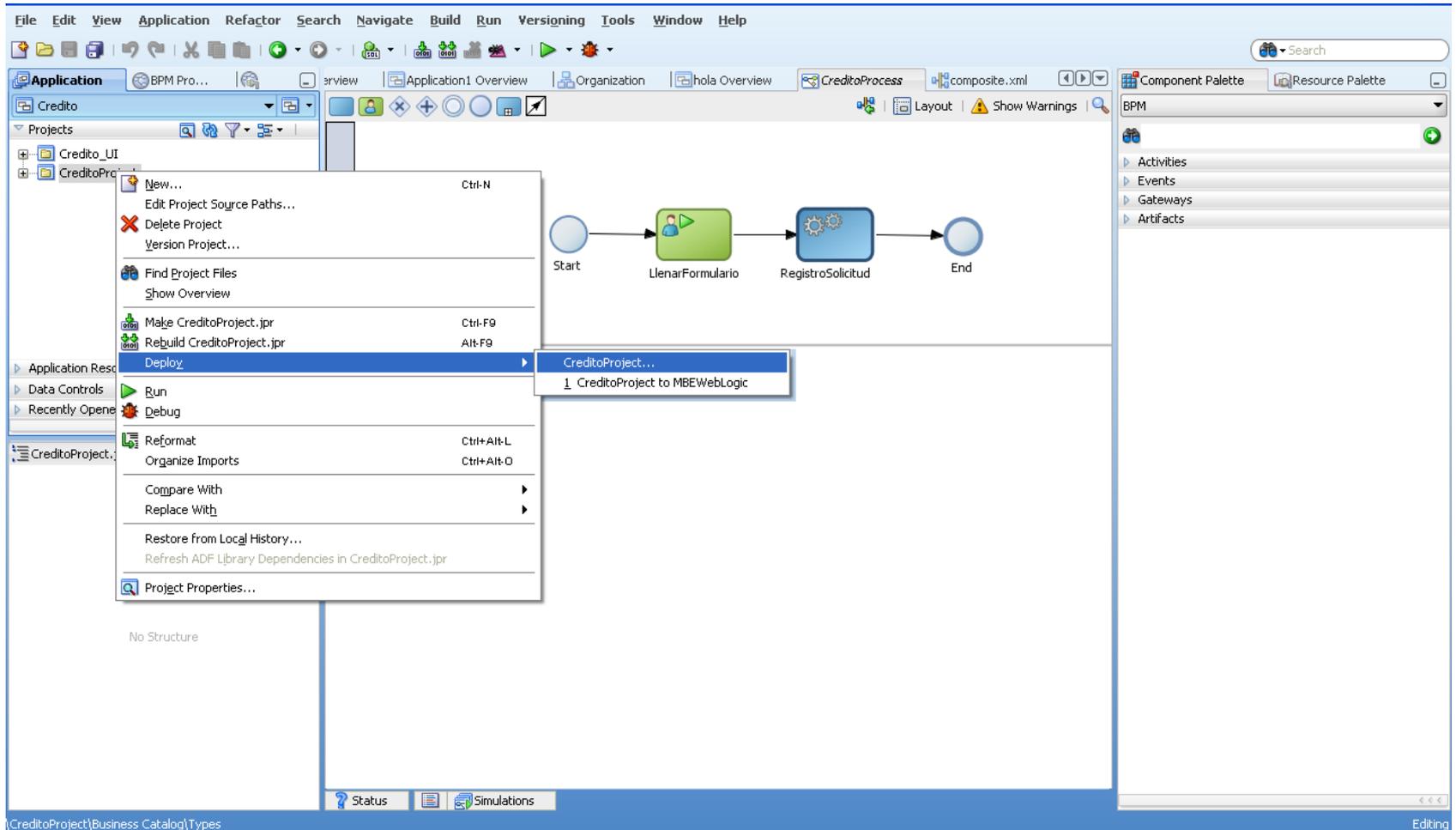
- ▶ Application Server: **MBEweblogic**
- ▶ Realm: **Jazn.com**
- ▶ User: **Jcooper**



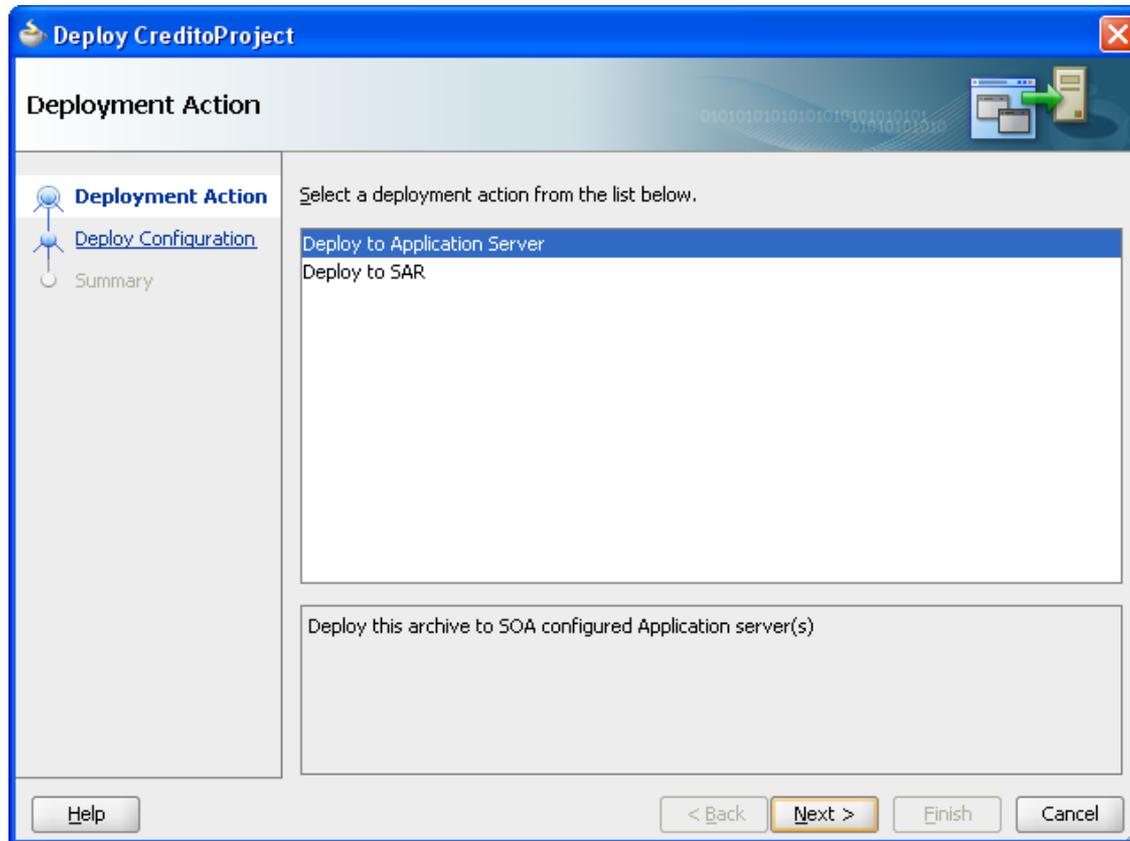
7. Desplegar en servidor



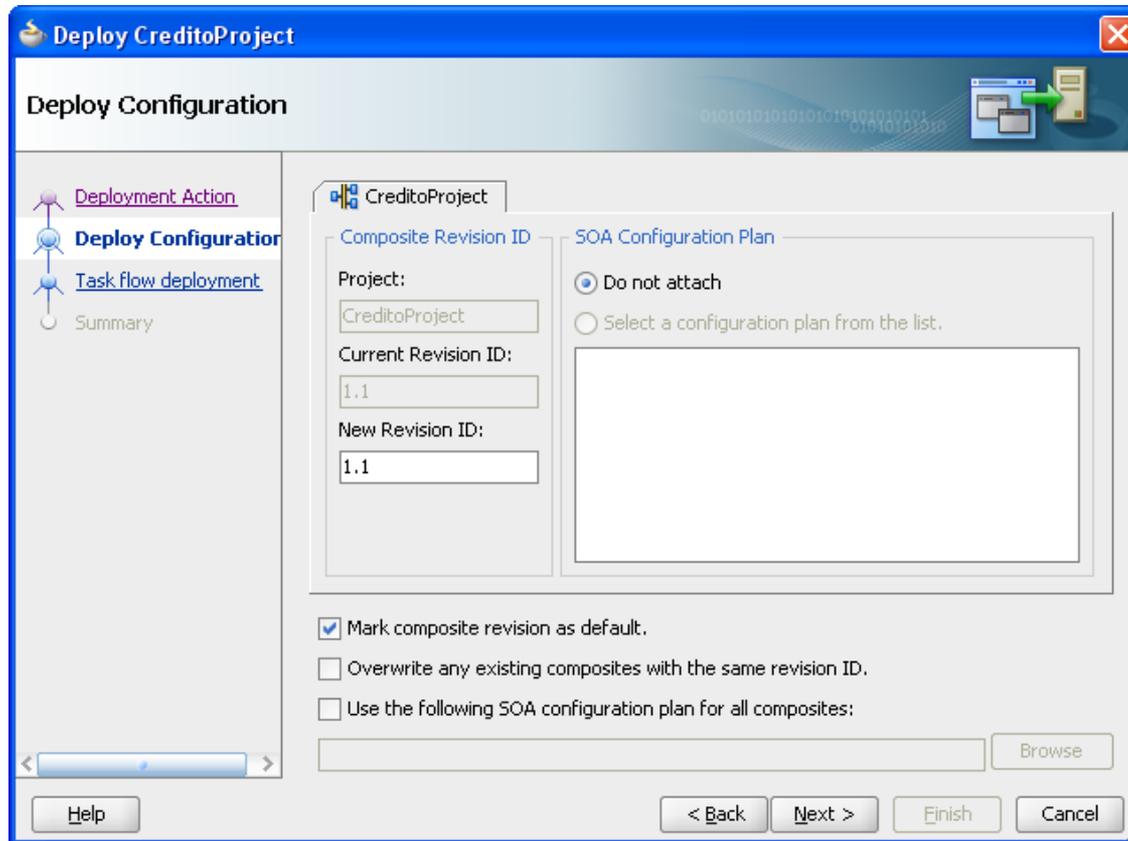
7. Desplegar en servidor

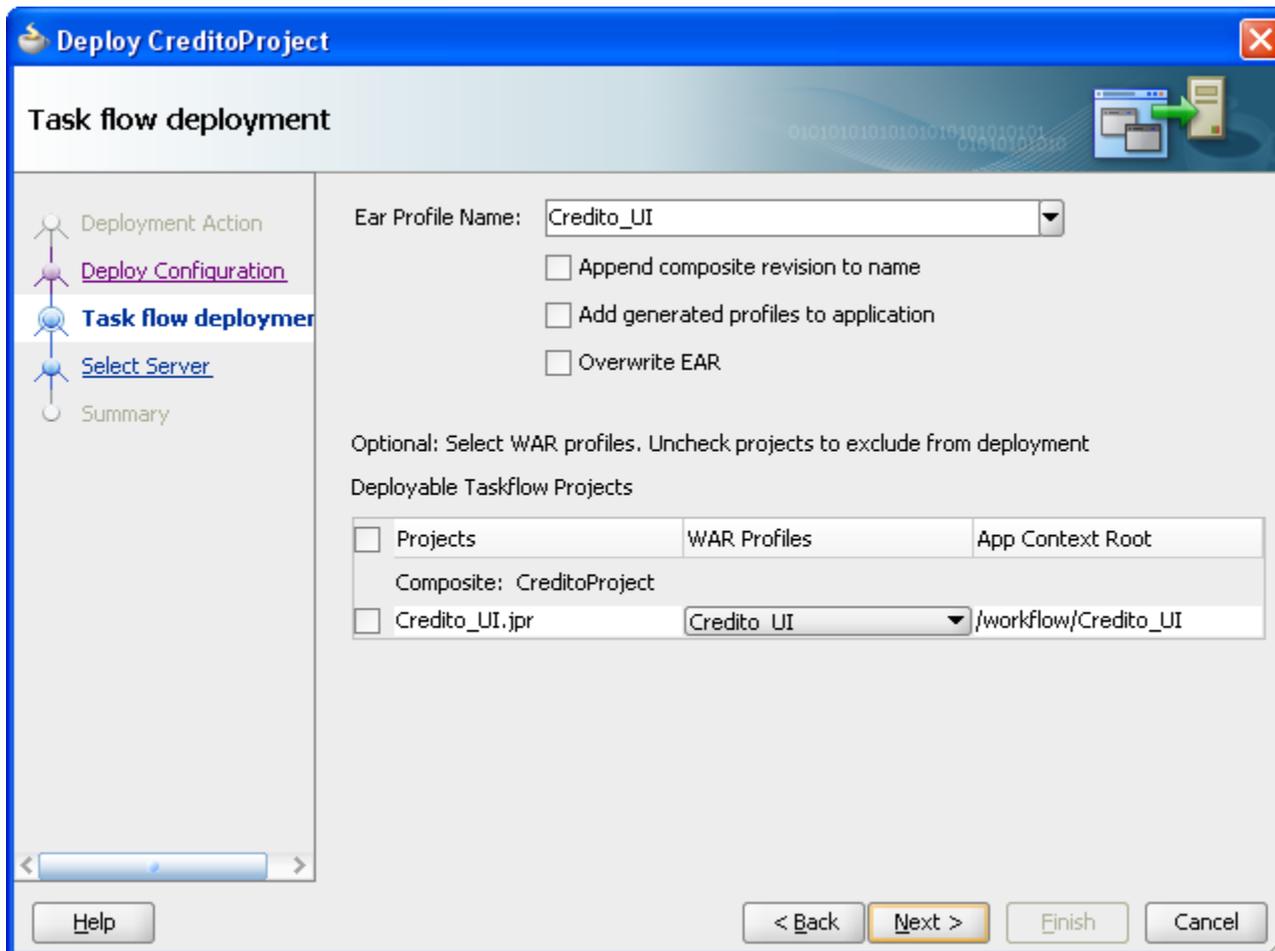


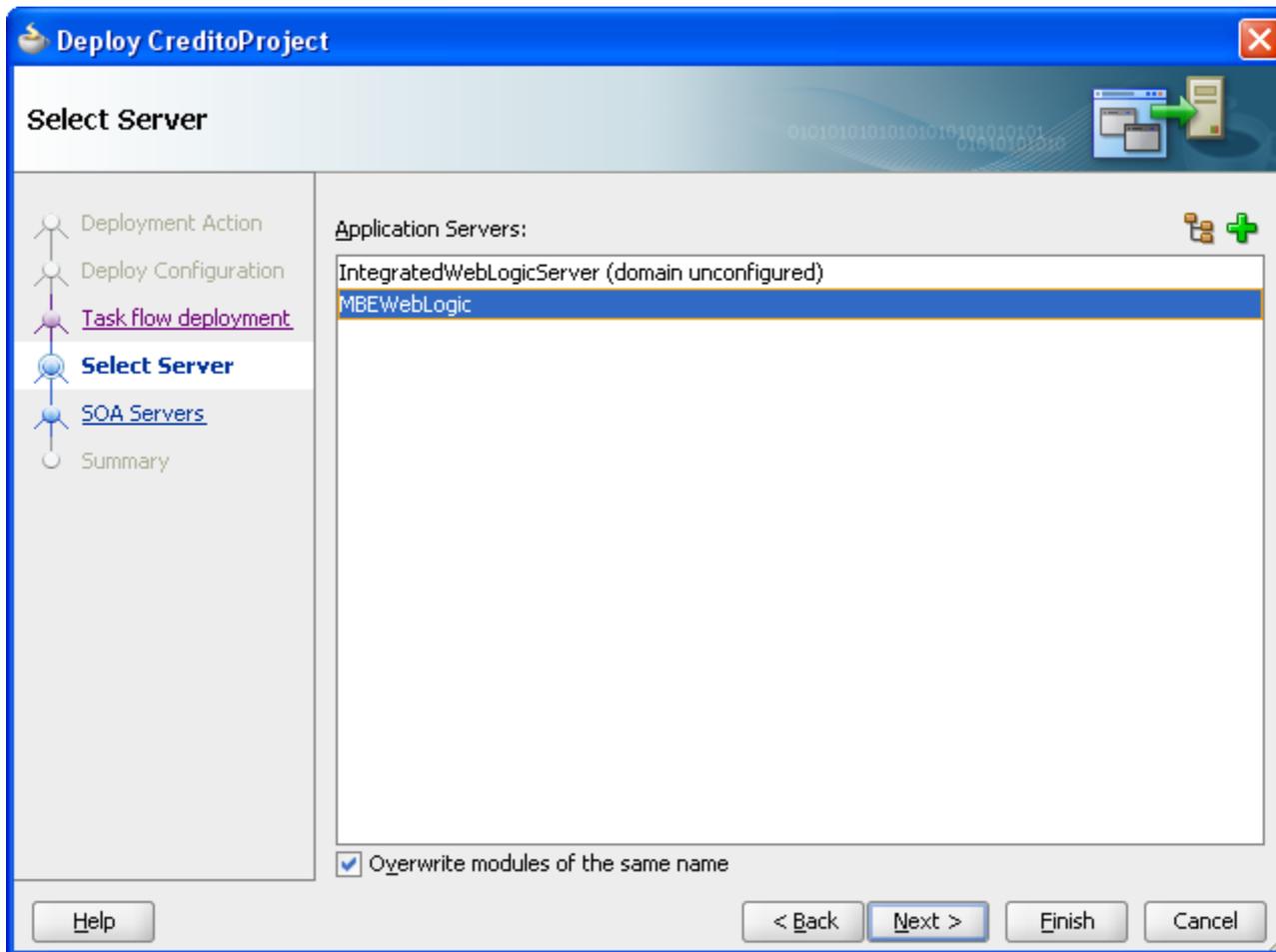
7. Desplegar en servidor



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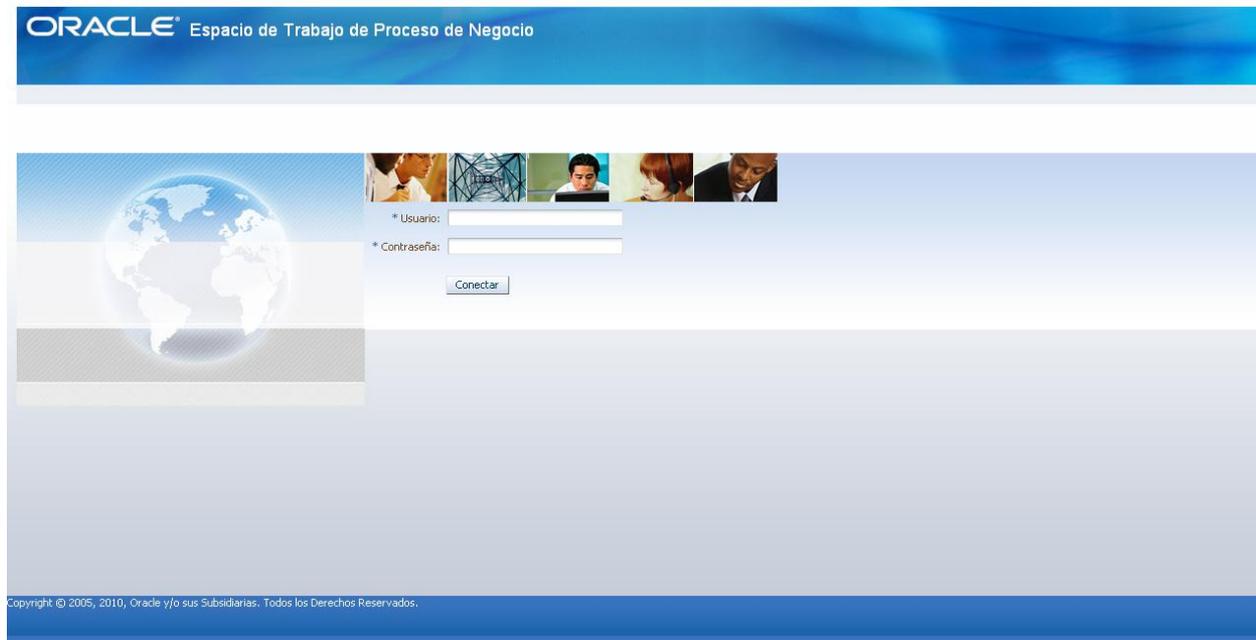






8. Test y monitoreo

- ▶ <http://146.83.5.23:7001/bpm/workspace/>
- ▶ User: Jcooper
- ▶ Pass: welcome1



8. Test y monitoreo

The screenshot displays the Oracle Business Process Workspace interface. The main content area is titled "My Tasks" and shows a list of tasks. The task list has the following columns: Title, Number, Priority, Assignees, State, Created, and Expires. One task is visible: "Llenar Formulario solicitud de credito" with Number 200103, Priority 3, Assignees "CreditoProjec...", State "Assigned", and Created "Sep 7, 2010 4:19 PM".

| Title | Number | Priority | Assignees | State | Created | Expires |
|--|--------|----------|------------------|----------|---------------------|---------|
| Llenar Formulario solicitud de credito | 200103 | 3 | CreditoProjec... | Assigned | Sep 7, 2010 4:19 PM | |

Below the table, there is a message: "Please select a task to see the details".

The left sidebar contains navigation options: Applications (with a sub-item "[CreditoProject] CreditoProcess v1.1"), Worklist Views (with sub-items: Inbox, My Work Queues, Standard Views (Due Soon, High Priority, Past Day, Past Week, Past Month, Past Quarter, New Tasks), My Views, Proxy Work Queues, Shared Views), Reports, and Task Status.