

Workshop Oracle Content & Experience - REST API

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Integrando Oracle Content & Experience com REST API

O objetivo deste material é permitir a integração das funcionalidades do Content & Experience OCE via REST API. Para que isto seja possível, são necessários alguns passos:

1. Configurar o IDCS para autenticar via Oauth em uma instância de OCE
2. Obter o token Oauth a partir da API REST do IDCS configurada para a aplicação OCE
3. Configurar a chamada REST com a funcionalidade pretendida passando o Bearer Token para autenticar a API

Obtendo o Token Oauth para o Oracle Content & Experience

Vá para <https://docs.oracle.com/en/cloud/paas/content-cloud/developer/authentication-oracle-content-and-experience-rest-apis.html> e clique na opção “Integrate Using OAuth As s Resource Owner”

Developing for Oracle Content and Experience

Authentication for Oracle Content and Experience REST APIs

Access to Oracle Content and Experience REST APIs is restricted and requires any user or application to authenticate. The only supported authentication mechanism is OAuth.

There are currently two methods for obtaining an OAuth token. The quickest and easiest way to try out the REST APIs is from a browser. This enables a developer to sign in using their user name and password to manually obtain an OAuth token. This token can then be used to call the REST APIs. While a simple approach, this requires the user to sign in through a browser, so it is not applicable for use in integrations.

For integrating with the REST APIs, an OAuth token must be obtained for a user through the use of a Resource Owner grant created in Oracle Identity Cloud Service. This approach can be used in an integration either by securely saving the user's credentials (for example, a dedicated system user account) or by providing a sign-in screen in the third-party application to capture the user's credentials (for example, on an employee intranet).

The following topics describe how to use OAuth tokens and Resource Owner grants:

- Try Out the APIs Using OAuth
- Integrate Using Oauth As a Resource Owner**

Na página seguinte, você deverá montar seu link para acessar o Oracle Identity Cloud Service (IDCS) que é composto por <https://<idcs-url>/ui/v1/adminconsole> conforme abaixo:

Integrate Using Oauth As a Resource Owner

A Resource Owner can generate OAuth tokens for other users. You can use Identity Cloud Service (IDCS) to configure a confidential application to authorize a Resource Owner grant for requesting tokens.

To configure a confidential application to authorize a Resource Owner grant:

- Go to the IDCS admin console <https://<idcs-url>/ui/v1/adminconsole>
- Click to add a new application in the **Applications** section.
- Select **Confidential Application**.
- Give the application a name and, optionally, a description, and press **Enter**.
- Choose to configure this application as a client.
- Select the **Resource Owner** grant type on the **Authorization** screen.
- Scroll down to the **Token Issuance Policy** section and, under **Resources**, click **Add Scope** to give the application access to the Oracle Content and Experience instance required.
- Select the correct instance.
- Click the right arrow to select the scope. The one ending in `urn:opc:cec:all` is the only scope required.
- Click **Next** until the end of the train. The **Resources**, **Web Tier Policy**, and **Authorization** stops are related to applications that have some resource authenticated or authorized by IDCS; for example, a web application. In the case of a simple server-server client, which is discussed here, this isn't relevant.
- Click **Finish**.
- Note the **Client ID** and **Client Secret** values because you'll need those to get a token later.
- Check **Activate** and then click **Save** to enable the application.

To request a token:

- Make a form post to `<idcs-url>/oauth2/v1/token`.
- Authentication is HTTP basic, where the user name is the client ID and the password is the client secret. The HTTP authorization header must specify Basic authentication.
- The following table describes the fields.

Neste momento, para logar-se ao admin console do IDCS, você precisa ter acesso como administrador.

Siga o tutorial para poder obter o token de autenticação necessário para utilizar a API REST do Oracle Content & Experience (OCE).

Faça o login no IDCS com suas credenciais:

<https://<seu id idcs>.identity.oraclecloud.com/ui/v1/adminconsole>

The screenshot shows the Oracle Cloud Identity and Access Management (IDCS) sign-in interface. At the top center, the "ORACLE Cloud" logo is displayed above the user name "ladsedigdev". Below the user name, the text "Oracle Cloud Account Sign In" is visible. The page contains two input fields: "User Name" and "Password", both of which are highlighted with a red rectangular border. Below these fields is a large blue "Sign In" button. Further down, there is a link "Need help signing in? [Click here](#)". Below this link, the text "Or sign in with" is followed by a horizontal line and a "Oracle SSO" button, which features the Oracle logo and the text "Oracle SSO".

Você deve entrar no dashboard do IDCS conforme a imagem abaixo:

Siga o tutorial conforme as instruções “Integration using Oauth As a Resource Owner” para obter seu token Oauth e seguir com o próximo capítulo.

Obtendo o token Oauth com a chamada REST ao IDCS via Postman:

Configure a autorização para a chamada com seu clientId e secretId:

Configure os parâmetros para a chamada:

The screenshot shows the Postman interface with a request to "POST CEC - IDCS get token access f..." to "https://idcs-1456.idf9a.identity.oraclecloud.com/oauth2/v1/token". The "Body" tab is selected, showing a table of parameters:

KEY	VALUE	DESCRIPTION
grant_type	password	Insira este parametro com o conteúdo "password"
scope	https://A3C	Este é o link de escopo configurado no IDCS
username	cristiano.hoshikawa@oracle.com	
password	[redacted]	Utilize seu login e senha da OCI

Se tudo estiver configurado corretamente, você obterá o Oauth token conforme abaixo:

The screenshot shows the Postman interface with a successful response from the previous call. The "Body" tab is selected, displaying the JSON token response:

```
1 {  
2   "access_token": "  
3     ey3j4nXQjUz1N16IjFkdUp4M0RfUzL2em0w5jZ0VWpsZ0F1240mhtTZG5Mjlndy1hZLyk0z0LLCjNXQj01j2dENBeKpmWF8tc2zLXSwtaNjRTYkpJm0zNcL0LLCjraW0j01jTsu0j05uSHx0tFWSIsImFzYig1LT7TjU2In0,  
4     ey1j2cVx3R61jo1oW1cm1jYvv02hpY2Fnby1sInN1y1i6InNyaXN0awFuwy5ob3Noawthd2FaB3JhY2xLlnNbSisInVz2XfbG9jYwXlIjoi2w4iC1c2VyLnRlbmFudCsuyW11joiawRjcyvxDUZTzDm3yza0ZTAw0TA  
5     w0Dc20GRNND1jZG5YS  
6     JN2E3M2UyNjC1NGY0N  
7     l9syW5n1j0jzW41LC1J  
8     RUM1LLCj0jZw5hbnq101J  
9     oaiVthd2E1LcJzdWfJfb  
10    RoChM6KC9cL0Ez00Y3Nz0MNKRBMzRBnj150EY40TA00MyRkIxRDBBLmN1Y5vY3Aub33hY2x1Y2xvdh0uY29t0j08M1vv1iwiiaHR0chM6XC9cL0Ez00Y3Nz0MNKRBMzRBnj150EY40TA00MyRkIxRDBBLmN1Y5vY3Aub33hY2x1Y  
11    2xvdW0uy29t0j08M1vvb3NuXc9z62npYwccL2fwas1sInVyb1jvcG6bGJHYXMGb69nawNhbdG1aw090TNDRjC3n2z2REEEzNE2EMjK4Rjg5MDR0Q2j6QjFBMEELCjodRwc2pcL1uvv0TNDRjC3Mz02REEzNE2Hjk4Rjg5MDR0Q2j6Q  
12    0jFEMEEu72Vj1m9jC5vcfJ6Vg16912C5jz06ND02qXCrkb2N1bwVudhNcL2LudGVncmFba9wX9zb2NpVwxsXsw1dxNlC19pZC16j12NDz2N21jYT50TQ3Zm2D30Tc3z2m440G11iw1dGVuYw5bX2Lzcyl6mh0dB  
13    z0lwvxC9pZGnLTLTE0NTZL2VKMzdjMDRjMDA5MDA4NzY4ZGQ0Mmjk2j1hlmK2W5baxRS5Lm9yYmNs3b3VklmVbTo0NDMf0,  
14    Ydo7b0DYA44320z000j-k7fmUSUKesLdz1sBw8jVMqvY01L-a-5Ft3tUm4l1jxjxhWlqqGd96MtF514vSFkwdklt-SxvaCeh7BaG6XFTCk-q-e57Xk12Xltcc4o_D2u0W0zi-Ln7RskhV0ovUjulEspyArqCCfdUkP5LKu9sXU5g36  
15    izroTq-0Fy65fZB1g43A15mu5sTwzIvxQKTDQh-2kw9DEfAGB6ns4VvCLYA_2A41u-W0eJdlPrj1iywQm0uk49v9a56AhAm5x16E21-ej7LlsQFC-UvVsYGGVG9jH9hXj5MLXTX1Gf9q0ie7UjkevvbgbhTTtIyZJEs9,  
16    "token_type": "Bearer",  
17    "expires_in": 604800  
18  }
```

Acessando a API REST de Documents

Vá para a página da documentação do Oracle Content & Experience na seção "Documents" em <https://docs.oracle.com/en/cloud/paas/content-cloud/rest-api-documents/Authorization.html>

Nesta página, você encontrará como fazer a autenticação para utilizar as APIs de Documents e toda a documentação para operar com Documents, como executar o upload de arquivos, manejar pastas, downloads entre outros.

The screenshot shows the REST API for Documents page on the Oracle Cloud Platform. The left sidebar contains navigation links for Introduction, About the REST APIs, All REST Endpoints, Get Started, Quick Start, Authorization, Send Requests, Status Codes, Error Messages, cURL Access, Tasks, and various sub-sections under Applinks, Catalog, Collections, Configuration, Files, Folders, and Metadata Collection. The main content area is titled "Authorization". It explains that OAuth can be used to authorize requests to the REST API for Documents. It details a two-step process: obtaining an OAuth token and using it to access the REST API. Step 1 shows a browser URL: `https://Content and Experience Cloud URL:port/documents/web?IdcService=GET`. Step 2 shows a curl command: `curl -i -H 'Authorization: Bearer token' --request GET {Content and Experience Cloud URL:port}/documents/web?IdcService=GET`. Navigation arrows and a search bar are also visible.

O primeiro link desta página permite você obter o Oauth Token, porém isto só funcionará se você acessa-lo via browser se antes você já estiver autenticado na página do OCE, o que não é interessante no modo programático. Você já conseguiu o Oauth Token no capítulo anterior.

This screenshot is identical to the one above, but the URL in the first step of the OAuth instructions is highlighted with a red box. This highlights the specific part of the tutorial where the user needs to copy the URL to obtain the Bearer Token.

Para este tutorial, o segundo link é o mais importante, pois é neste link que obteremos o Bearer Token para acessar as APIs REST de Documents:

Copie este link e identifique-o como “Bearer Token Documents”. Você irá montar esta chamada no Postman.

Para isto, você precisa montar seu link do OCE, que está estruturado da seguinte forma:

<https://<seu id do OCE>.cec.ocp.oraclecloud.com/documents/api/1.2/files/data>

A partir do OCE, você consegue obter este ID.

Agora preencha o Postman:

Vá para a sessão Authorization e configure da seguinte forma:

The screenshot shows the Postman interface with a red box highlighting the 'Authorization' tab. Under 'Type', 'Bearer Token' is selected. To the right, a token value 'eyJ4NXQjUzI1NiI6jI...' is entered into a text input field, with a red arrow pointing to it from below. Below the token input, a note says 'Este é o Oauth Token obtido no tutorial anterior'.

E vamos parametrizar os dados para a chamada a API REST de upload de Documento:

The screenshot shows the Postman interface with the 'Body' tab selected. Under 'Content Type', 'form-data' is chosen. A red box highlights the 'primaryFile' key in the 'KEY' column. In the 'VALUE' column, there is a 'File' button with a red arrow pointing to it from below. The 'parentID' parameter is also shown with a red arrow pointing to its value 'self'. The 'filename' and 'jsonInputParameters' fields are also highlighted with red boxes.

KEY	VALUE	DESCRIPTION
<input checked="" type="checkbox"/> filename	@Screenshot 2020-05-21 17.56.34.png	
<input checked="" type="checkbox"/> jsonInputParameters	{"parentID":"self"}	Anexar o arquivo no Postman
<input checked="" type="checkbox"/> primaryFile	<input type="file"/>	O parametro primaryFile precisa ser do tipo File

Se tudo ocorreu bem, você deverá ter um retorno parecido com este:

The screenshot shows the Postman interface with a successful API call to "OCE - Documents - Upload File". The response body, which contains JSON data about the uploaded item, is highlighted with a red box.

```

1 {
2   "createdBy": {
3     "displayName": "Cristiano Hoshikawa",
4     "id": "U364                     E8932EF836",
5     "loginName": "cristiano.hoshikawa@oracle.com",
6     "type": "user"
7   },
8   "createdTime": "2020-05-22T22:20:25Z",
9   "errorCode": "0",
10  "errorKey": "!csServiceStatusMessage_checkin,SOMETHING000[13610",
11  "errorMessage": "Successfully checked in content item 'SOMETHING000[13610'.",
12  "id": "D072                     1893B906",
13  "mimeType": "image/png",
14  "modifiedBy": {
15    "displayName": "Cristiano Hoshikawa",
16    "id": "U36495                  32EF836",
17    "loginName": "cristiano.hoshikawa@oracle.com",
18    "type": "user"
19 }

```

E seu documento irá subir no Oracle Content & Experience como abaixo:

The screenshot shows the Oracle Content & Experience Cloud (OCE) interface. The left sidebar shows various navigation options like Home, Assets, Sites, Recommendations, Developer, Analytics, and Documents. The main area displays a list of documents. One specific document, "@Screenshot 2020-05-21 17.56.3...", is highlighted with a red box.

Name	Version	Last Updated	Updated By	Type
CafeSupremoIntranet Assets	v1	1/30/2020	You	
@Screenshot 2020-05-21 17.56.3...	v2	1 hour ago	You	PNG
CafeSupremo.zip	v1	1/30/2020	You	ZIP
CafeSupremoIntranet.zip	v1	1/30/2020	You	ZIP
reference-cafesupremo.zip	v1	1/30/2020	You	ZIP