Uploading Your Logs and Exploring Log Analytics

Last updated on April 19, 2018

This document provides instructions for uploading your syslog and Oracle database alert to populate your Log Analytics Cloud Service trial or subscription, and it serves a guide for exploring Log Analytics features quickly. This document, however, is not intended to be a tutorial on using Log Analytics.

Contents

Deploying uploadMyLog

This section documents how to ensure that the prerequisites of the uploadMyLog package are met, what the package contains, and how to install it.

Meeting the Prerequisites

Before using the uploadMyLog package to load sample logs to Log Analytics, ensure that the following prerequisites are met:

- You have a trial or subscription to Log Analytics cloud service

  Note:
  During the process of Log Analytics cloud service registration, you should receive an email notification from Oracle Cloud containing the information necessary for using this package including **Service Instance URL** and **Identity Domain**.

- You have access to a Unix variant host with cURL, which supports TLS 1.2 protocol
  - Checking TLS 1.2 support
    To check whether your cURL supports TLS 1.2 protocol, run the following command.

    ```
    $ curl --help | grep -i tlsv1.2
        --tlsv1.2       Use TLSv1.2 (SSL)
    ```

    If you see tls1.2 in the output, then it indicates that cURL supports TLS1.2 protocol.

  Note:
  This package cannot be implemented on a Windows platform.

- You have HTTPS connectivity from host to the Oracle Management Cloud (OMC)

  Note:
  If it is necessary to access Oracle Management Cloud through a proxy server, set the HTTPS_PROXY environment variable before running the cURL command.
  Example:
  `$ export HTTPS_PROXY=www-proxy.xyz.com:80`

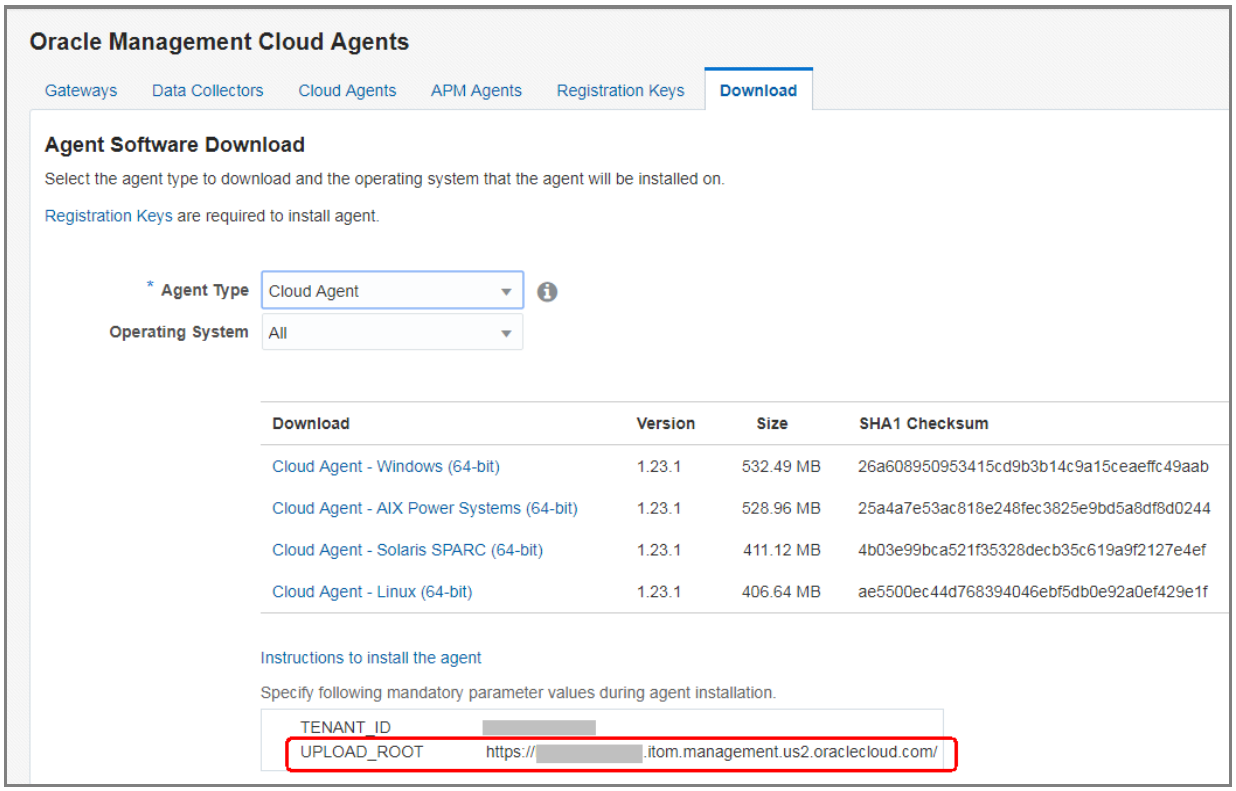
  - Checking connectivity to OMC
    Run the following command:

    ```
    $ curl -I --tlsv1.2 <UPLOAD_ROOT>
    ```

    <UPLOAD_ROOT>: URL for uploading logs to OMC

Note:
To obtain the value of the UPLOAD_ROOT parameter, log on to Oracle Management Cloud, navigate to **Administration*** > **Agents** > **Download** tab, and select an agent type from the **Agent Type** drop-down list. You should see the value of UPLOAD_ROOT at the bottom of the page as shown in the screenshot below.

* Click the navigation icon ☰ on the top-left corner to view the Management Cloud navigation pane if it is not already there.



Example:

```
$ curl -I --tlsv1.2 https://inst1-acme.itom.management.us2.oraclecloud.com
```

If the command is successful, you will see an output six.milar to the one below.

```
HTTP/1.0 200 Connection established

HTTP/1.1 200 OK
Date: Sat, 19 Aug 2017 00:56:42 GMT
Server: Oracle-Application-Server-11g
X-Frame-Options: SAMEORIGIN
Last-Modified: Wed, 09 Dec 2015 23:27:01 GMT
ETag: "2b14-5267f6d5bfb40"
Accept-Ranges: bytes
Content-Length: 11028
Vary: Accept-Encoding
Cache-Control: no-cache,no-store
Content-Type: text/html
Content-Language: en
```

Contents of Package: uploadMyLog

The uploadMyLog package contains the following:

- uploadMyLog.sh: The shell script for uploading on demand the sample logs provided with the package
- upload.properties: The file containing the properties used for uploading files
- uploadMyLog.pdf: The document you are reading

Installing uploadMyLog

To install the uploadMyLog package, follow these steps:

1. Download the uploadMyLog.zip file.
2. Stage the Zip file in a directory that your OS user account has read and write access. For example, stage the file in the /scratch directory.
3. Go to the stage directory and unzip the file.
   Example:

   ```
   $ cd /scratch
   $ unzip uploadMyLog.zip
   ```

   After extracting the Zip file as above, you will see a subdirectory named uploadMyLog in the current directory. This document refers to the uploadMyLog directory as SCRIPT_HOME.

Using uploadMyLog

The section provides the steps for using the uploadMyLog package to upload sample logs to explore Log Analytics features.

Uploading Sample Logs to Log Analytics

To upload the provided sample logs, follow these steps:

1. Before uploading logs, enter properties' values to be used in uploading logs in file <SCRIPT_HOME>/config/ upload.properties.
    - Go to the <SCRIPT_HOME>/config directory.

      Note:
      If you extracted file uploadMyLog.zip to directory /scratch, directory /scratch/uploadMyLog is your SCRIPT_HOME directory.

    - Use an editor of your choice to edit file upload.properties to set appropriate values for the following properties:
      Mandatory properties:

      ```
      UPLOAD_ROOT=<URL for uploading data to Oracle Management Cloud>
      Examples:
      UPLOAD_ROOT=https://inst1-acme.itom.management.us2.oraclecloud.com
      UPLOAD_ROOT=https://inst1-xyz.itom.management.europe.oraclecloud.com
      UPLOAD_ROOT=https://a123456.itom.management.us2.oraclecloud.com

      IDENTITY_DOMAIN=<Subscription identity domain>
      Example:
      IDENTITY_DOMAIN=acme

      USERNAME=<OMC user name>
      Example:
      USERNAME=john.doe@xyz.com
      ```

      Optional property:

      ```
      HTTPS_PROXY=<proxy_host>:<port>
      Example:
      HTTPS_PROXY=www-proxy.xyz.com:80
      ```

      Note:
      For obtaining the value of property UPLOAD_ROOT, see Meeting the Prerequisites.

2. To upload custom Database alert log, take the logs and zip them into an alertlog.zip file. Move alertlog.zip file into <SCRIPT_HOME>/logs.

3. To upload custom O/S message log, take the logs (/var/log/messages.*) and zip them into an messages.zip file. Move messages.zip file into <SCRIPT_HOME>/logs.

4. Go to the SCRIPT_HOME directory, and run the uploadMyLog.sh script to upload the sample alert logs and syslog, respectively, as shown below. Enter your OMC password when prompted.

```
$ ./uploadMyLog.sh alertlog
$ ./uploadMyLog.sh syslog
```

Take note of the name of the upload at the bottom of each script output. An upload is identified by its name in Log Analytics UI.
Examples of output lines containing upload names are:

```
Upload name: alertlog.2018-01-07_19:43:25
Upload name: syslog.2018-01-07_19:43:32
```

Note:
The uploadMyLog.sh will create the following entities, if they do not exist, when uploading logs:
my_db_instance: when uploading alert logs
my_host: when uploading syslog
In Log Analytics, you can query log records based on fields such as entity and upload name.

Verifying the Status of Uploads

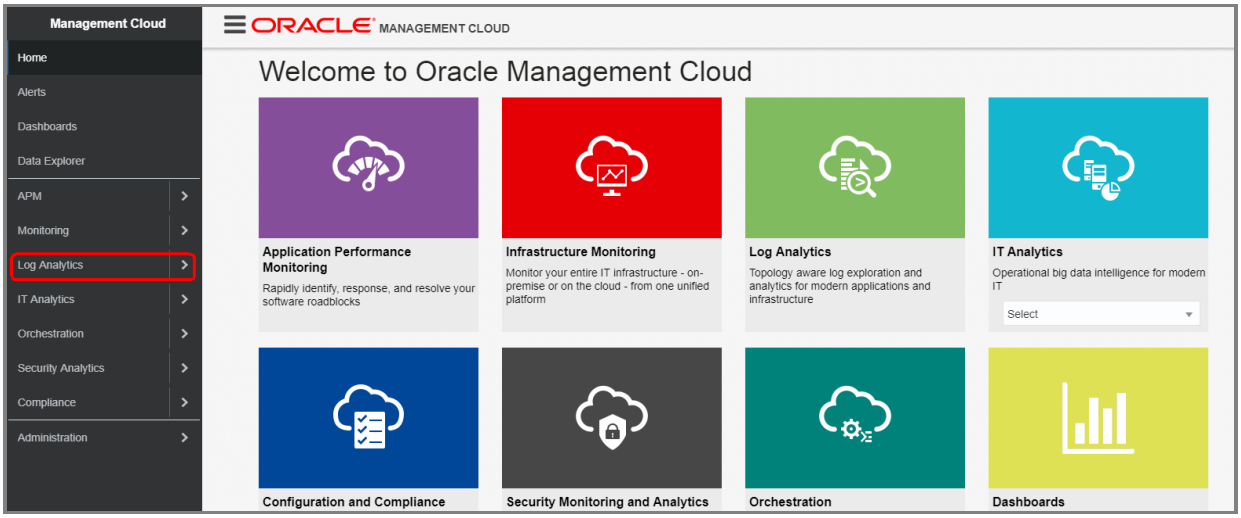
To verify the status of the uploads, follow these steps:

1. Log on to Oracle Management Cloud
   - Go to the Service Instance URL.

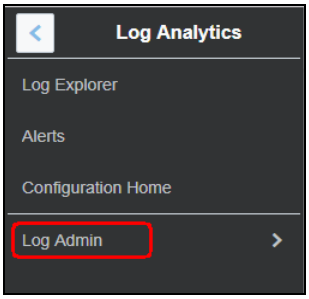
     Note:
     After a user account is created for you, you will receive an email titled “You’re the administrator for Oracle Cloud Services” from Oracle Cloud, which contains the Service Instance URL.

   - Enter your identity domain, and click **Go**.
   - Enter your username and password, and click **Sign In**.

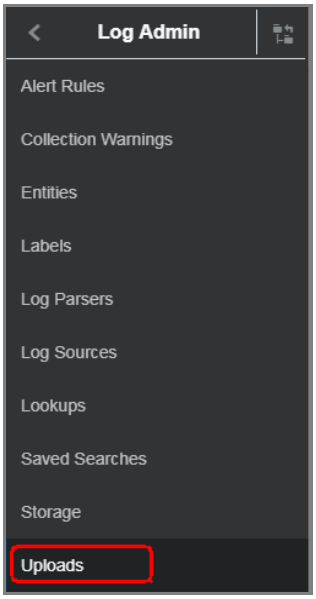
2. Navigate to Log Analytics
   From the Welcome to Oracle Management Cloud page, click the navigation icon ☰ on the top-left corner to view the Management Cloud navigation pane if it is not already there. Select **Log Analytics**.



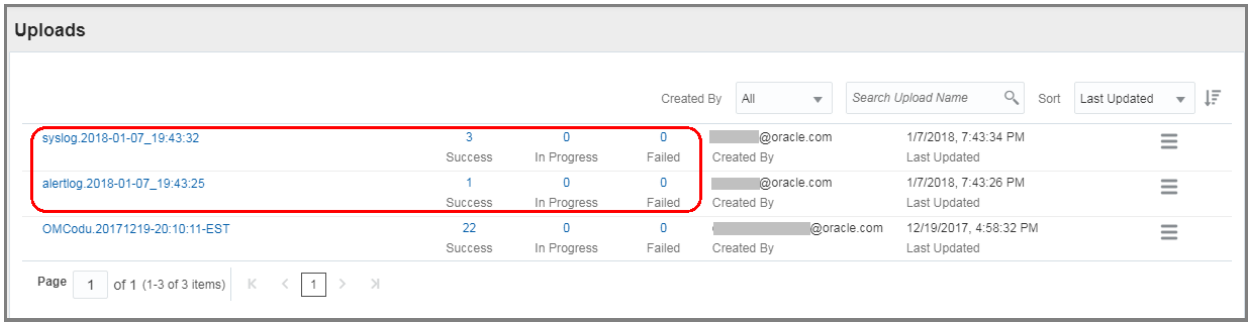
3. Navigate to the Uploads page
   a. From the left navigation pane, select **Log Admin**.



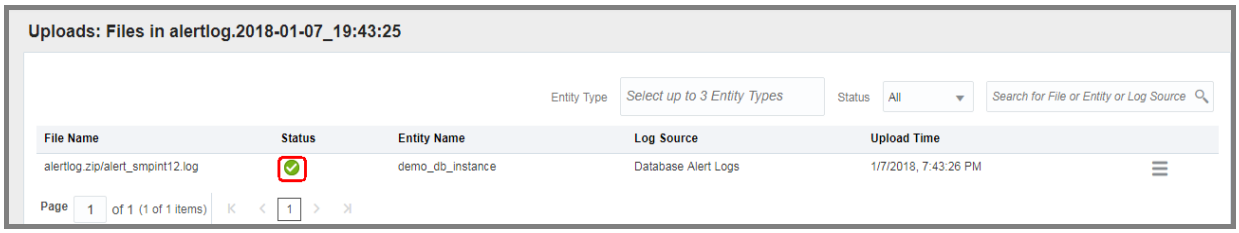
   b. Select **Uploads**.



4. View the status of the uploads
   From the Uploads page, you should see the uploads that you performed earlier. If an upload shows 0 in Progress and 0 Failed, it has completed.



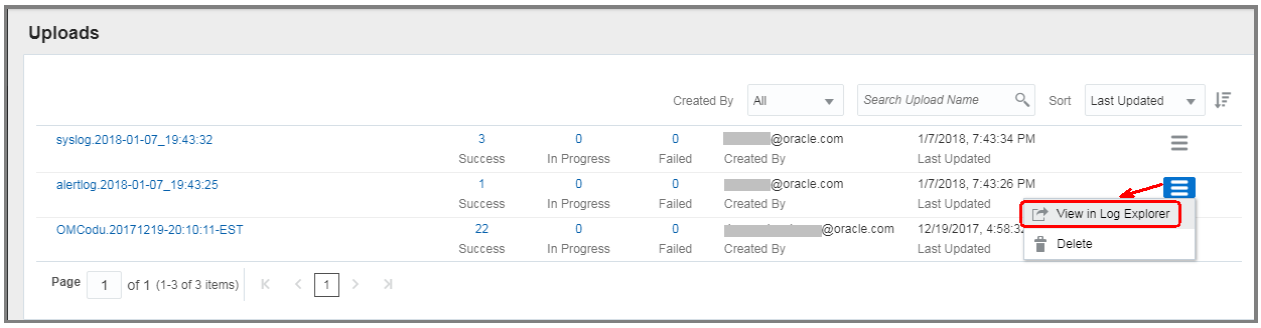
   If necessary, click an upload name to see the Status of the upload. For example, click **alertlog_<timestamp>**. If the upload has completed successfully, you will seen a green stick in the Status field as shown in the screenshot below.



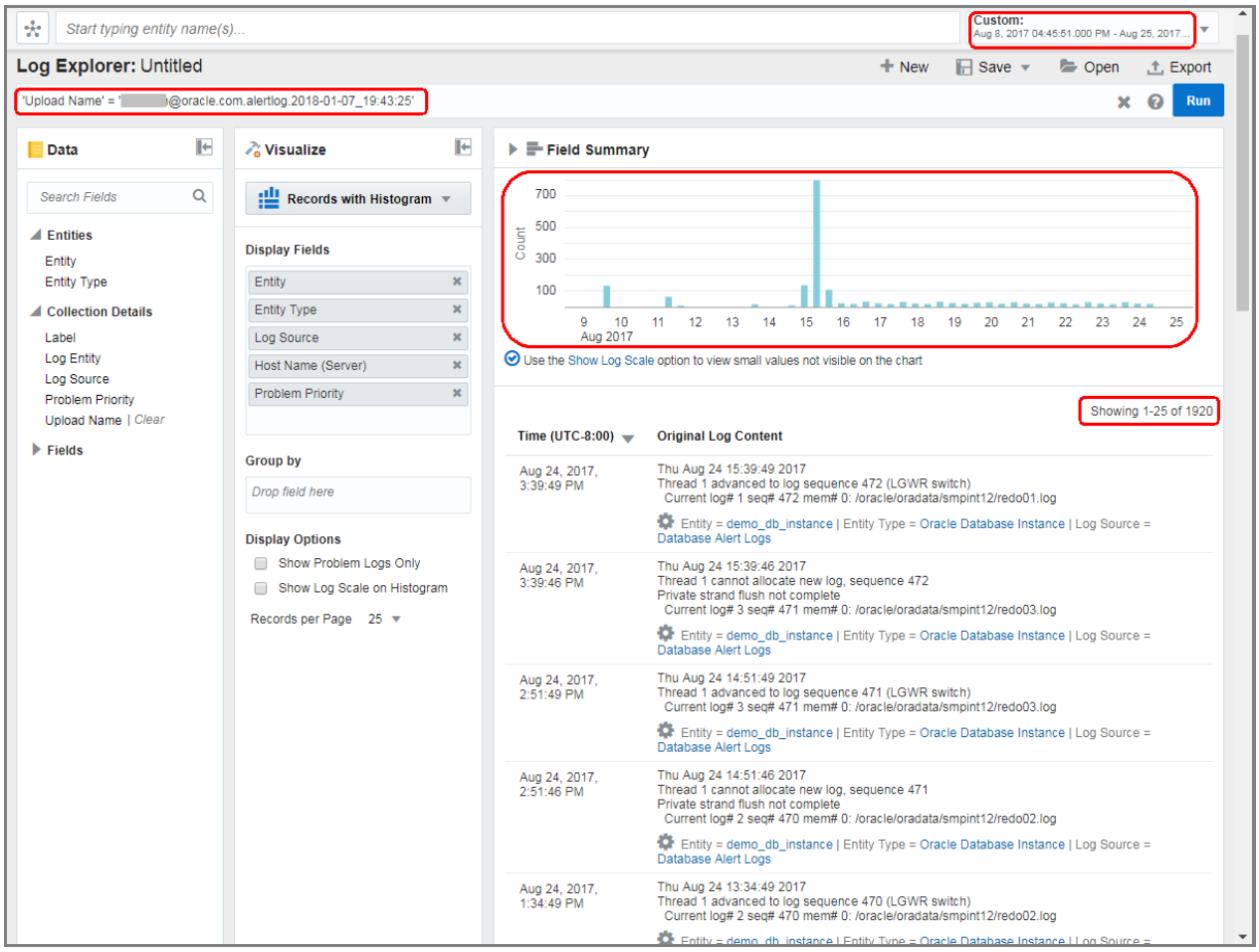
Viewing Uploaded Log Records

To view the records from an upload, follow these steps:

1. Navigate to the Uploads page. If necessary, see Verifying the Statuses of Uploads.
2. From the Uploads page, select an upload, click the menu icon ☰ on the right, and click **View in Log Explorer** to view the records from that upload. Let's perform the steps to view the alert log records in Log Explorer.



3. From the Log Explorer page, you can view the alert log records from the upload that you selected.



Some of the information shown on the page includes:

- The period of the uploaded alert log entries.
- The log entries came from the upload whose name is in the Query bar.
- The histogram shows the daily volumes of log records. This helps identify any abnormality in record volumes at a glance. You can drill down by clicking a bar on the chart.
- The first 25 of the records that came with the upload. The records are in date order from newest to oldest. You can reverse the order by clicking the arrowhead in the Time (<time zone>) field. You can browse the rest of log records by using the pagination at the bottom of the page.

Learning to Use Log Analytics

Log Analytics documentation including tutorials is available at the following URL:
https://docs.oracle.com/en/cloud/paas/management-cloud/log-analytics.html

Refer to Chapter 2 of Getting Started with Oracle Log Analytics Guide for instructions on troubleshooting problems using Oracle Log Analytics.

https://docs.oracle.com/en/cloud/paas/management-cloud/logcs/troubleshooting-problems-using-oracle-log-analytics.html

Refer to Chapter 3 of Getting Started with Oracle Log Analytics Guide for instructions on transforming logs into operational insights.

https://docs.oracle.com/en/cloud/paas/management-cloud/logcs/transforming-logs-operational-insight.html

Refer to Appendix A of Getting Started with Oracle Log Analytics Guide for Log Analytics Search Commands.

https://docs.oracle.com/en/cloud/paas/management-cloud/logcs/understanding-log-analytics-search-commands.html