CURL Site Deployment Guide

Overview

This document describes the steps required to deploy the CURL Site application. There are currently two options for deploying CURL Site. Option 1 is with the Docker container system via a docker image file. Option 2 is via a Java JAR file. These options are described further in the following sections.

Option 1: Docker Based Deployment

Requirements

- Desktop operating system: Mac OS X Yosemite 10.10.3 or above, Windows 10, Ubuntu (14.04, 16.04, 16.10, 17.04), CentOS, Debian, Fedora
- Docker CE (latest stable)

Installing Docker Software

1. Download Docker for your platform from www.docker.com.
2. Install Docker by opening the installation file.
3. Login into Docker Hub from a terminal window using your Docker ID and password:

```
$ docker login
Login with your Docker ID to push and pull images from Docker
Hub. If you don't have a Docker ID, head over to
https://hub.docker.com to create one.
Username: your docker username
Password: your docker password
Login Succeeded
```

Deploying CURL Site Docker Image

From a terminal window, use the following commands to deploy the CURL Site docker image:

1. Create a directory to hold the configuration file for CURL Site:

```
$ mkdir ~/curl-site
```

2. Create a file named *docker-compose.yml* in the *~/curl-site* directory and add the following to it:

```
version: "3"
```

```
services:

  app:
    image: cudd2v/curl-site:1.0.0-BETA
    ports:
     - 8080:8080
    volumes:
     - curl-site:/curl-site

volumes:
  curl-site:
```

3. Use docker-compose to deploy and start the CURL Site container:

```
$ docker-compose up -d
Creating network "docker_default" with the default driver
Creating volume "docker_curl-site" with default driver
Pulling app (cudd2v/curl-site:1.0.0-BETA)...
1.0.0-BETA: Pulling from cudd2v/curl-site
d5c6f90da05d: Already exists
1300883d87d5: Already exists
c220aa3cfc1b: Already exists
2e9398f099dc: Already exists
dc27a084064f: Already exists
c0bf323d5027: Already exists
5b09765af9b4: Already exists
84d1e98261b2: Pull complete
659aa089b0f9: Pull complete
Digest:
sha256:b37edd94402208c3ae58dd0cef2a2fa20a27ce1467c6926a262fcc9976
e0571d
Status: Downloaded newer image for cudd2v/curl-site:1.0.0-BETA
Creating docker_app_1 ...
Creating docker_app_1 ... done
```

From a browser navigate to: *http://localhost:8080* to access the CURL Site application.

Stopping and Starting Docker CURL Site Container

From a terminal window, use the following commands to stop the CURL Site docker container:

1. Change directory to ~/curl-site or wherever you created the docker-compose.yml file for CURL Site

```
$ cd ~/curl-site
```

2. Use docker-compose to stop the container:
   ```
   $ docker-compose stop
   Stopping docker_app_1 ... done
   ```

From a terminal window, use the following commands to start the CURL Site docker container:

1. Change directory to ~/curl-site or wherever you created the docker-compose.yml file for CURL Site
   ```
   $ cd ~/curl-site
   ```

2. Use docker-compose to start the container:
   ```
   $ docker-compose start
   Starting app ... done
   ```

Removing CURL Site Application

From a terminal window, use the following commands to remove the CURL Site docker container, associated volume, and image. Note that this will also remove all data that was uploaded into the CURL Site application.

1. Change directory to ~/curl-site or wherever you created the docker-compose.yml file for CURL Site:
   ```
   $ cd ~/curl-site
   ```

2. Use docker-compose to remove the container, its associated volume, and image:
   ```
   $ docker-compose down --volumes --rmi all
   Stopping docker_app_1 ... done
   Removing docker_app_1 ... done
   Removing network docker_default
   Removing volume docker_curl-site
   Removing image cudd2v/curl-site:1.0.0-BETA
   ```

Running on a Different Network Port

If you are already running an application on network port 8080, you may configure CURL Site to use a different port.

1. Change directory to ~/curl-site or wherever you created the docker-compose.yml file for CURL Site:
   ```
   $ cd ~/curl-site
   ```

2. Use docker-compose to remove any existing containers:
   ```
   $ docker-compose down
   Stopping docker_app_1 ... done
   Removing docker_app_1 ... done
   ```

```
Removing network docker_default
```

3. Edit the *docker-compose.yml* file and change the left occurrence of 8080 to another number, such as 9090 in the following example:

```
version: "3"
services:

  app:
    image: cudd2v/curl-site:1.0.0-BETA
    ports:
     - 9090:8080
    volumes:
     - curl-site:/curl-site

volumes:
  curl-site:
```

4. Use docker-compose to deploy an container that will now use the new network port:

```
$ docker-compose up -d
Creating network "docker_default" with the default driver
Creating docker_app_1 ...
Creating docker_app_1 ... done
```

5. Navigate to *http://localhost:9090* or whatever new port you chose.

Option 2: Java JAR Based Deployment

Requirements

- Desktop operating system: Mac OS X 10.10 or above, Windows 7 or 10, Ubuntu 14 or above, CentOS, Debian, Fedora
- Oracle Java JRE 1.8

Installing Oracle Java JRE 1.8

1. From a terminal window use the following commands to determine if Oracle Java 1.8 is installed (note that update version may be different on your system):
   ```
   $ java -version
   java version "1.8.0_121"
   Java(TM) SE Runtime Environment (build 1.8.0_121-b13)
   Java HotSpot(TM) 64-Bit Server VM (build 25.121-b13, mixed mode)
   ```

2. If the java command is not found or version 1.8 is not installed, then download it from the Oracle website at:
   http://www.oracle.com/technetwork/java/javase/downloads/jre8-downloads-2133155.html

3. Follow the instructions, provided on the Oracle website, to install Java JRE 1.8.

Deploying CURL Site Application

Mac OS X or Linux

1. Create a directory where you will install the CURL Site application files, e.g. ~/curl-site.
2. From a browser window navigate to https://github.com/CUD2V/curl-site/releases and download the curl-site.jar, curl-site.mv.db, and curl-site.sh files into the the curl-site directory.
3. Edit the curl-site.sh file and set the CURL_SITE_BASE_DIRECTORY variable to point to the directory you created in step 1.
4. From a terminal window, enable execute permission for the curl-site.sh file:
   ```
   $ chmod u+x ~/curl-site/curl-site.sh
   ```

Windows

1. Create a directory where you will install the CURL Site application files, e.g. \Users*username*\curl-site.

2. From a browser window navigate to https://github.com/CUD2V/curl-site/releases and download the curl-site.jar, curl-site.mv.db, and curl-site.sh files into the the curl-site directory.
3. Edit the curl-site.sh file and set the CURL_SITE_BASE_DIRECTORY variable to point to the curl-site directory.

Starting CURL Site Application

Mac OS X or Linux

1. Execute the curl-site.sh script.

Windows

1. Execute the curl-site.bat file.

Stopping CURL Site Application

1. Type CTRL-C in the terminal window where the CURL Site application is running.

Removing CURL Site Application

1. Delete the curl-site directory and its contents.

Running on a Different Network Port

If you are already running an application on network port 8080, you may configure CURL Site to use a different port.

1. Change directory to where you copied the CURL Site files.
2. Edit curl-site.sh (Linix) or curl-site.bat (Windows) and change the server.port value to another number, such as 9090 in this example

```
java -jar $CURL_SITE_BASE_DIRECTORY/curl-site.jar
--server.port=9090
```

3. Execute the curl-site.sh (Linix) or curl-site.bat (Windows) to start the CURL Site application and then navigate to *http://localhost:9090* or whatever new port you chose.