Cmap Cloud: Embedding a Cmap in a Web Page

1  Accessing a Cmap using the CmapViewer

The CmapViewer is the default web viewer for Cmaps stored on the Cmap Cloud. In its simplest form, it opens a Web page and displays the Cmap. Additionally, it allows the user to specify the size of the iframe in which Cmap will be displayed, and allows the user to control some aspects of how the Cmap is displayed. The CmapViewer generates an SVG image of the Cmap retrieved from the Cmap Cloud, and thus presents a high-quality display of the Cmap at whatever scale the user chooses. With appropriate permissions, the CmapViewer allows users to Annotate the Cmaps. The Annotations are compatible with Annotations in CmapTools.

The CmapViewer on the Cmap Cloud replaces the html/web viewer with which Cmaps have traditionally been displayed from CmapServers.

The Cmap can be accessed by:

1. Using a direct viewer URL
2. Using a Cmap resource URL

1.1 CmapViewer URLs

Cmaps in the Cmap Cloud (and in the CmapTools network in general) are identified by their unique resource-id. Users don’t need to manage these resource-ids, they are handled by the CmapTools software. However, we need to make reference to the resource-id when explaining the format of the Cmap’s URL. The URL displayed on a Cmap’s window in CmapTools, as shown in Section 4 below, already incorporates the resource-id, and thus the user does not have to worry about it.

The URL to a Cmap can directly invoke the CmapViewer by using the format:

https://cmapcloud.ihmc.us:443/viewer/cmap/<resource-id>

The URL that is generally used to access a resource on the server to display the HTML version of a Cmap is formatted as:

https://cmapcloud.ihmc.us:443/rid=<resource-id>

Both formats will invoke the CmapViewer and display the Cmap, e.g.:

https://cmapcloud.ihmc.us:443/rid=1N7WL8GC2-1022C4F-2WCD

2  Embedding the CmapViewer
A Cmap stored in the Cmap Cloud can be embedded into any Web page. The embedding code allows various configuration options. The Cmap is embedded using an iframe tag.

```html
<iframe src="viewer-url" width="width" height="height" frameborder="0"></iframe>
```

The viewer-url is the direct viewer URL formatted as specified in section 1.1. The width and height are numeric values specifying the width and height for the iframe specifying how much space the Cmap is permitted to take up on the page. The Cmaps are automatically scaled to fit the size of the iframe. The frameborder attribute removes the default border for an iframe.

Here is some example HTML with a concept map embedded in a page.

```html
<!DOCTYPE html>
<html>
<head>
  <meta http-equiv="Content-Type" content="text/html; charset=UTF-8" />
  <meta http-equiv="X-UA-Compatible" content="IE=edge"/>
  <meta name="viewport" content="width=device-width, initial-scale=1"/>

  <title>Embedded CmapViewer</title>

  <link rel="stylesheet" type="text/css" href="resources/css/bootstrap/bootstrap.css" />
  <link rel="stylesheet" type="text/css" href="resources/css/bootstrap/bootstrap-theme.css" />
  <link rel="stylesheet" type="text/css" href="resources/css/cmap.css" />
</head>
<body>
  <div class="container">
    <div class="cmap-message">
      <p class="legend">Embedded Cmap</p>

      <p>Below is an embedded Cmap using the tag</p>
      <code>&lt;iframe src="https://cmapcloud.ihmc.us/viewer/cmap/1N7WL8GC2-1022C4F-2WCD" width="640" height="480" frameborder="0" &gt;&lt;/iframe&gt;</code>

      <iframe src="https://cmapcloud.ihmc.us/viewer/cmap/1N7WL8GC2-1022C4F-2WCD" width="640" height="480" frameborder="0"></iframe>
    </div>
  </div>

  <div id="footer">
    <div class="copyright">
      &copy; 2014 IHMC
    </div>
  </div>
</body>
</html>
```
3 Configuring the CmapViewer

The CmapViewer has a number of options to configure the mode in which the viewer is displayed, how the viewer is visualized, and what is and what is not visualized as part of the CmapViewer.

The following query parameters can be specified with the CmapViewer URL to configure the CmapViewer:

<table>
<thead>
<tr>
<th>Parameter Name</th>
<th>Value</th>
<th>Default</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>title</td>
<td>true</td>
<td>false</td>
<td>true</td>
</tr>
<tr>
<td>cmapBorder</td>
<td>true</td>
<td>false</td>
<td>false</td>
</tr>
<tr>
<td>toolbar</td>
<td>true</td>
<td>false</td>
<td>true</td>
</tr>
<tr>
<td>footer</td>
<td>true</td>
<td>false</td>
<td>true</td>
</tr>
<tr>
<td>annotationEnabled</td>
<td>true</td>
<td>false</td>
<td>false</td>
</tr>
</tbody>
</table>

The following URL displays only the concept map without any other of the web viewer components.

```url
https://cmapcloud.ihmc.us/viewer/cmap/1N7WL8GC2-1022C4F-2WCD
?title=false&cmapBorder=false&toolbar=false&footer=false
```

The following URL displays the concept map in annotation mode with the toolbar and border around the concept map, but without title and footer:

```url
https://cmapcloud.ihmc.us/viewer/cmap/1N7WL8GC2-1022C4F-2WCD
?annotationEnabled=true&title=false&footer=false
```

4 URL in CmapTools Client

Opening a Cmap that is stored on the Cmap Cloud (requires CmapTools v6 or later) will display, at the bottom, the URL for the Cmap and an icon that when clicked will display the code needed to embed the Cmap in a web page. The URL can be copied, clicking the button on the left invokes the CmapViewer with its default options, and the button on the right displays embedding code that can be used to embed the Cmap in a Web page, using the options described above.