

Global Format Registry

System Use Case: **Render Digital Object**

Use Case ID	OCLC-14
Description	Render the given digital object to the user's output device.
Actors	Repository
Assumptions	The Repository has the necessary software installed locally or proper copyrights to transfer the object to an external site have been secured from the content owner.
Preconditions	The Repository has obtained a digital object. The Repository has determined the format of the object (by executing OCLC-11). The format of the object registered in the registry has at least one rendering software URI defined.
Triggers	The need to render the digital object at user's request.
Primary Scenario	Execute OCLC-5 using the object's identifying attributes as query. For the first returned ID, execute OCLC-3 (see Issues below). Identify which rendering software to execute, extract the URI of the transformer and locate the local renderer executable. Render the object (this action is considered abstract because there are many ways to actually render an object on the user's hardware, including remote rendering capabilities like Unix X-server or AT&T's VNC).
Primary Result	Render the object (or its derivative) on the user's hardware.
Post-Conditions	
Architecture requirements (Non-functional)	The rendering function may not be remote. For example, to protect the copyrights of a collection, the user may have to travel to a controlled lab hosted by participating institutions, or the user may have to deploy a certain machine configuration that is certified to perform the rendering function.
Notes	The Repository may choose to transform the object into another format and then render the derivative. This can happen due to network bandwidth constraints, copyright issues or the need to preserve the integrity of the object (for example, by rendering a text object as an image to prevent copy and paste).
Issues	A 100% match must be returned to be considered valid. See Issues noted in Use Case OCLC-5 Search For Format Descriptors.