# Cache Deletion

Opensimulator has many caches of data to improve performance. You may optionally clear these caches. The system will refresh them at the next startup. This will slow your system down dramatically on the next boot as it must re-fetch all assets the next time it starts.

Opensim must be stopped to clear script and the Avatar Bake caches.

Graphical user interface, application

Description automatically generated

* **Script cache:** Clearing the script cache is only necessary after an update to Opensim binaries. DreamGrid will not remove the “.STATE” files so your virtual pets will not die.
* **Avatars bakes cache:** this folder holds the various baked skin layers.
* **Asset cache:**  holds the assets (mesh, prims, textures) and is typically exceptionally large. It automatically flushes itself every 48 hours.
* **Image cache:** holds the images and is typically exceptionally large.
* **Mesh cache:** holds mesh pieces.
* **Users:** Clears any logged in Users. They may be stuck online.

# Flotsam Cache Settings

OpenSimulator has an asset cache that stores the assets retrieved from an asset service. This reduces the load on a remote asset service and improves OpenSimulator responsiveness.

**Viewer cache** is for modern viewers. If you use old viewers, you may have issues. Turn this off for old viewers.

**Cache Enabled**: The cache should always be enabled.

**Cache Directory** man be moved to another disk. It is best practice to save all large folders such as this cache to another disk.

**Log level** is for debugging.

**Timeout in Hours** is how you set how much disk it uses. Lower numbers = less disk space. The larger the number, the better performance you will get. Typical numbers are 24 hours for small grids, a few hours for large grids.

Graphical user interface, text, application

Description automatically generated

# Flotsam asset cache

Note: You must run the Flotsam asset cache if you are running the FsAssets file system database.

The Flotsam asset cache stores assets on disk and in memory.

At the moment, the amount of memory or filesystem storage used by the cache can only be limited via manual actions (wiping all or part of cached assets from the filesystem), by console commands (e.g. "fcache clear") or by timeout settings (e.g. FileCacheTimeout = 1 to automatically remove cache files not accessed for 1 hours).

**General principles**

When OpenSimulator needs an asset (e.g., in response to a viewer request for a notecard), then it first asks the cache for this data. If the data is not found in the cache, then it asks the grid asset service (or a foreign asset service in the case of Hypergrid). If the asset is found, then it is both stored in the cache and returned to the user.

If an asset is uploaded to OpenSimulator (e.g., by the viewer uploading an animation), then the asset is immediately kept in cache (if there is room and the asset is not temporary) and sent to the asset service (if the asset is not temporary).

Therefore, at any point you can wipe any temporary data stored by the asset cache (e.g., on the filesystem), since the next request for that asset will simply query the asset service as the asset will not be found in cache.