**AppStack Migration Utility:**

App Volumes Migration Utility helps to migrate appstacks that are provisioned in 2.x environments to be deployed in 4.x App Volumes. This should be installed on a VM having access to the datastore having the appstacks to be migrated. Currently migration of VMDK based appstacks is only supported.

When the utility is started (needs admin access), it prompts to save appstacks storage location and the migration destination format in the settings page. Migration format can be VHD, VMDK or can be both but user needs to provide at least one of the format.

User should login to the App Volumes Manager server using the credentials that’s generally used to login to the server via web browser. If https is used for communicating with AVM, self-signed certificate should be imported from AVM to the machine having the migration utility installed.

**Procedure to import the self-signed certificate from AVM**

1. Copy the self-signed certificate from [C:\Program Files (x86)\CloudVolumes\Manager\nginx\conf\appvol_self_vmware.com.crt] to the computer where the migration utility is installed.
2. Import the self-signed certificate to the computer where the migration utility is installed.
   a. On the computer, start MMC (mmc.exe).
   b. Add the Certificates snap-in for the computer account and manage certificates for the local computer.
   c. Import the self-signed certificate into Trusted Root Certification Authorities > Certificates.
The utility then lists the 2.x appstacks that are accessible to that AVM server, if there are more appstacks than that can be accommodated in a single page, appstacks would be accommodated across multiple pages.
User could select one or more appstacks for migration. Once an appstack is submitted for migration, the utility will show that migration is in progress and will report back the status of migration.

Once migration is successful, migration utility generates .json, .VMDK and/or .VHD files based on the migration format chosen in the settings page. Migrated appstack is available in the VMDK / VHD file.

**Importing Appstacks to AV 4.0:**

In order to import appstacks to the AV 4.0 server, user needs to copy the .VMDK and .json to the ppv\packages folder in the installed location of the AVM sever. Once the files are copied, user needs to logon to AV 4.0 using a browser and select “Upload prepackaged volumes” (available in Configuration -> Storage tabs)
Once the upload is completed, user should import the appstacks from the datastore location (used for uploading VMDKs). After import is done, user should see the migrated appstacks in the Application Tab of the AV 4.0. Now this appstack can be used in AV 4.0 environment.

FAQs:

- Would each application in a single 2.x appstack be migrated as separate appbundle in 4.x appstack?
  
  No, all the applications in a 2.x appstack will be migrated as one appbundle in 4.x appstack.

- Would this utility migrate 2.x based VHD appstacks?
  
  Migration of 2.x VHD based appstacks are not supported.

- Can writable volumes be migrated using this utility?
  
  No, writable volumes can't be migrated using this utility.