

Install Adobe Experience Manager Locally

Objectives:

- Understand local installation fundamentals
- Install AEM as a Cloud Service Locally
- Install AEM 6.5.x Locally
- Install a service pack



Local Installation Fundamentals

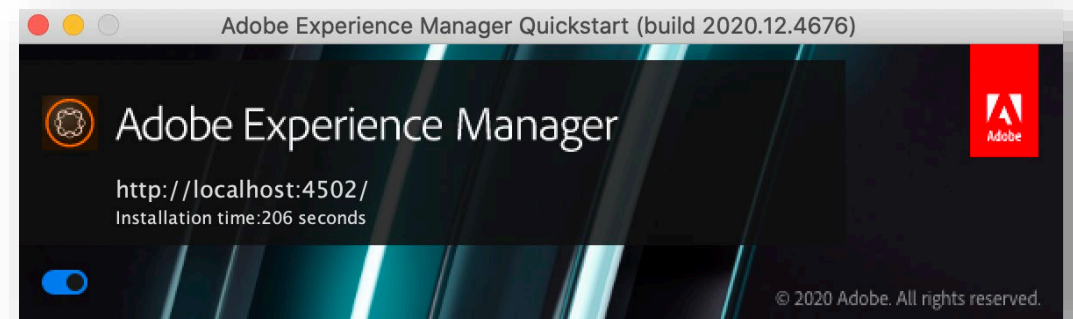
AEM runs on all operating systems that support Java SDK

All client interactions with AEM are done through a web browser

Development occurs on a local instance of AEM

Installation Requirements

- quickstart jar file
- A valid AEM license key properties file (6.5 only)
- Java 11
- Approximately 4 GB of free space per Service
- Approximately 4 GB of RAM (at the very minimum!)

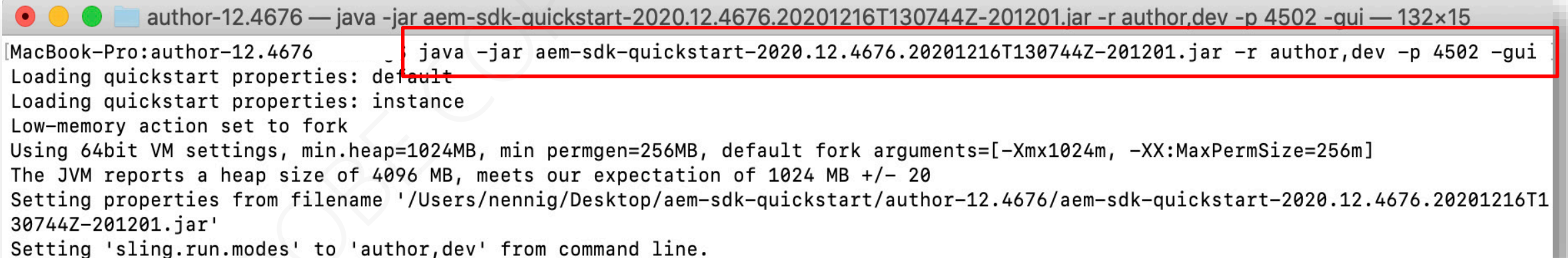


Install and Start AEM

“double-click on the jar” is only supported in AEM 6.5 and lower

Command line is recommended

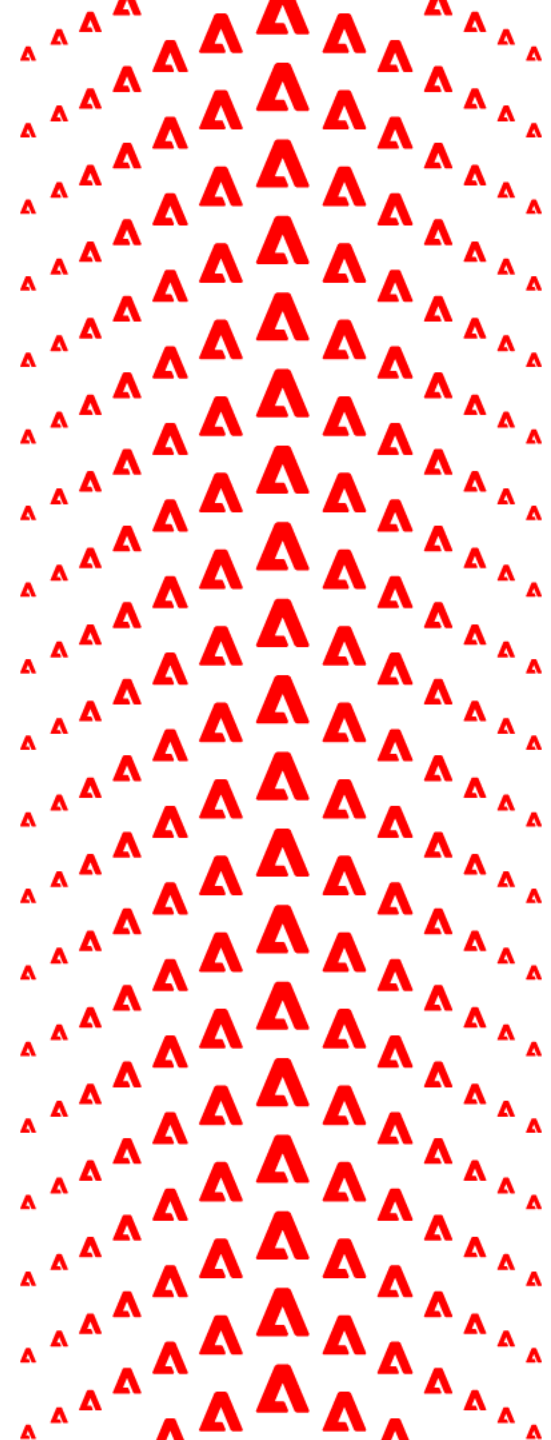
- `$ java -jar [Java options] <quickstart>.jar [AEM options]`
- AEM Options can include
 - runmodes, port, launch browser, launch server gui, forked process, unpack and no install, debug
- Learn more by viewing help `$ java -jar <quickstart>.jar -h`



The screenshot shows a terminal window titled "author-12.4676" with a red box highlighting the command: `java -jar aem-sdk-quickstart-2020.12.4676.20201216T130744Z-201201.jar -r author,dev -p 4502 -gui`. The output shows the quickstart properties being loaded, the JVM settings (64bit VM, min heap=1024MB, min permgen=256MB), and the sling.run.modes being set to 'author,dev'.

```
author-12.4676 — java -jar aem-sdk-quickstart-2020.12.4676.20201216T130744Z-201201.jar -r author,dev -p 4502 -gui — 132x15
MacBook-Pro:author-12.4676 java -jar aem-sdk-quickstart-2020.12.4676.20201216T130744Z-201201.jar -r author,dev -p 4502 -gui
Loading quickstart properties: default
Loading quickstart properties: instance
Low-memory action set to fork
Using 64bit VM settings, min.heap=1024MB, min permgen=256MB, default fork arguments=[-Xmx1024m, -XX:MaxPermSize=256m]
The JVM reports a heap size of 4096 MB, meets our expectation of 1024 MB +/- 20
Setting properties from filename '/Users/nennig/Desktop/aem-sdk-quickstart/author-12.4676/aem-sdk-quickstart-2020.12.4676.20201216T130744Z-201201.jar'
Setting 'sling.run.modes' to 'author,dev' from command line.
```




Install AEM as a Cloud Service Locally



Cloud Service | AEM SDK

Super-set of tools used to develop for AEM as a Cloud service:

- Quickstart Jar
 - The AEM runtime used for local development
- Dispatcher Tools
 - The set of tools used to develop against Dispatcher locally

| OSDisk (C:) > adobe > aem-sdk > aem-sdk-2020.6.3800.20200626T210738Z-200604 | | | |
|--|-------------------|---------------------|------------|
| Name | Date modified | Type | Size |
|  aem-sdk-dispatcher-tools-2.0.22-unix.sh | 4/28/2020 8:29 AM | Shell Script | 7,918 KB |
|  aem-sdk-dispatcher-tools-2.0.22-windows.zip | 4/28/2020 8:29 AM | Compressed (zipp... | 6,383 KB |
|  aem-sdk-quickstart.jar | 6/29/2020 7:21 PM | Executable Jar File | 383,413 KB |

Cloud Service | Download

Customer must have a valid maintenance or support contract to gain access to download

Redownload every two weeks or as needed

Optionally develop on the specific build that cloud environments are using

- Environment version can be found in Cloud Manager

Download the AEM SDK

- <https://experience.adobe.com/#/downloads/content/software-distribution/en/aemcloud.html>

Learn about the latest release


- <https://experienceleague.adobe.com/docs/experience-manager-release-information/aem-release-updates/aem-releases-updates.html>

Cloud Service | Create the install folder


- Extract the SDK
 - Extracted folder contains the quickstart jar
- Install via command line

```
$ java -jar aem-sdk-quickstart.jar -r author,dev -p 4502 -gui
```

- **Author** indicates author service while **dev** indicates the environment type



The screenshot shows a Windows File Explorer window with the address bar displaying the path: (C:) > adobe > aem-sdk > author-2021.2.4887.20210204T154817Z-210128. The main area shows a table of files and folders.

| Name | Date modified | Type |
|--|------------------|--------------------------|
|  aem-sdk-dispatcher-tools-2.0.39-unix.sh | 2/8/2021 9:47 AM | Shell Script |
|  aem-sdk-dispatcher-tools-2.0.39-windows.zip | 2/8/2021 9:47 AM | Compressed (zipped) F... |
|  aem-sdk-quickstart-2021.2.4887.20210204T154817Z-210128.jar | 2/8/2021 9:48 AM | Executable Jar File |

Note: The name aem-sdk-<build>.jar has been renamed to aem-sdk-quickstart.jar for simplicity.

Refresh AEM SDK | Quickstart and API

Cloud Service Only

Cloud Service runs on continuous releases

- Daily maintenance releases will have minimal changes in the SDK
- Monthly maintenance releases will typically have more impactful changes

Adobe recommends refreshing the SDK at least after a monthly maintenance release

- When you download a new SDK, update your POM with the same release number

Optionally use same release as Production service

- Can easily be found in Cloud Manager

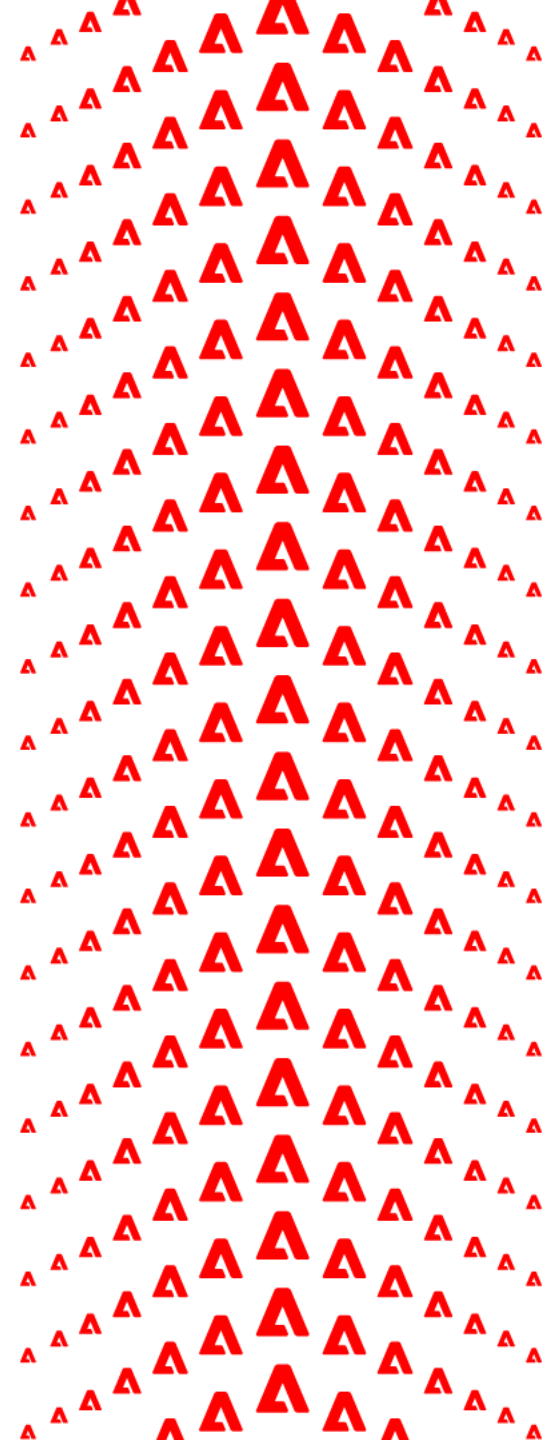
| ENVIRONMENTS | STATUS |
|---|---|
| vlab7-us-adls-prod https://author-cm-p3955-e9924-ns-tea... AEM RELEASE: 2019.11.1401.20191121T204747Z REGION: EAST US |  RUNNING |



Exercise

Exercise 1: Install the AEM SDK Quickstart Jar

Install AEM 6.5.x Locally



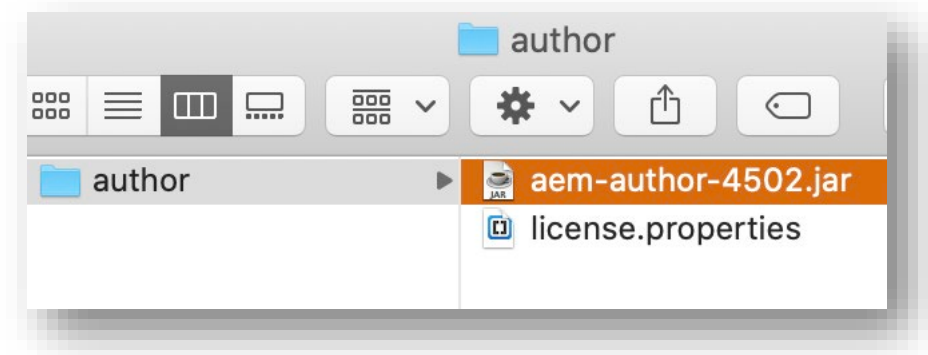
AEM 6.5.x | Download

Customer must have a valid maintenance or support contract to gain access to download AEM quickstart jar and license. Properties file

- <https://licensing.adobe.com/>
- Business partners can email spphelp@adobe.com

Dispatcher

- <https://experienceleague.adobe.com/docs/experience-manager-dispatcher/using/getting-started/release-notes.html>



AEM 6.5.x | Service Packs

Available Quarterly

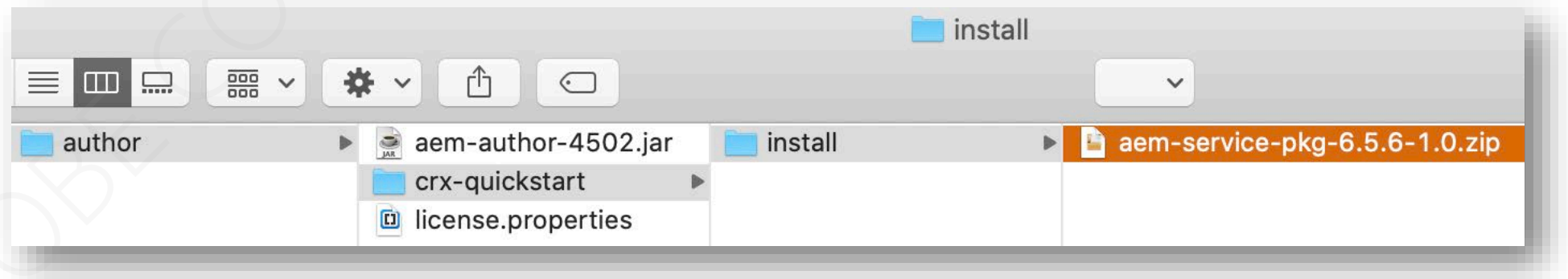
Download latest Service Packs

- <https://experience.adobe.com/#/downloads/content/software-distribution/en/aem.html>

Learn about the latest release

- <https://experienceleague.adobe.com/docs/experience-manager-release-information/aem-release-updates/aem-releases-updates.html>

Can be installed during install or through Package Manager post install

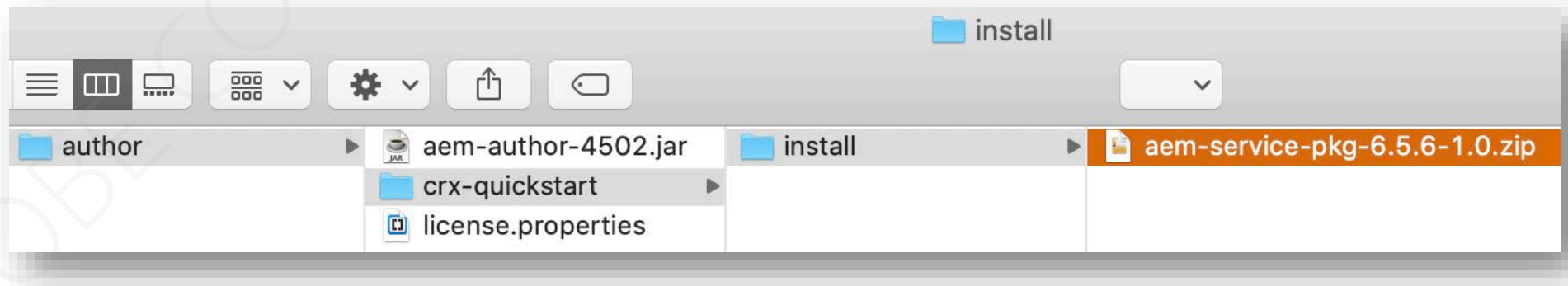


AEM 6.5.x | Create the install folder

- Create folders ~/author/crx-quickstart/install
- Under ~/author add the AEM 6.5 jar file and license file
- Under ~/author/crx-quickstart/install add the desired service pack zip
- Install via command line

```
$ java -jar aem-4502-author.jar -r author,dev -p 4502 -gui
```

- **Author** indicates author service while **dev** indicates the environment type



You can optionally double click on the jar to start AEM



Exercise

Install AEM 6.5 and Service Pack

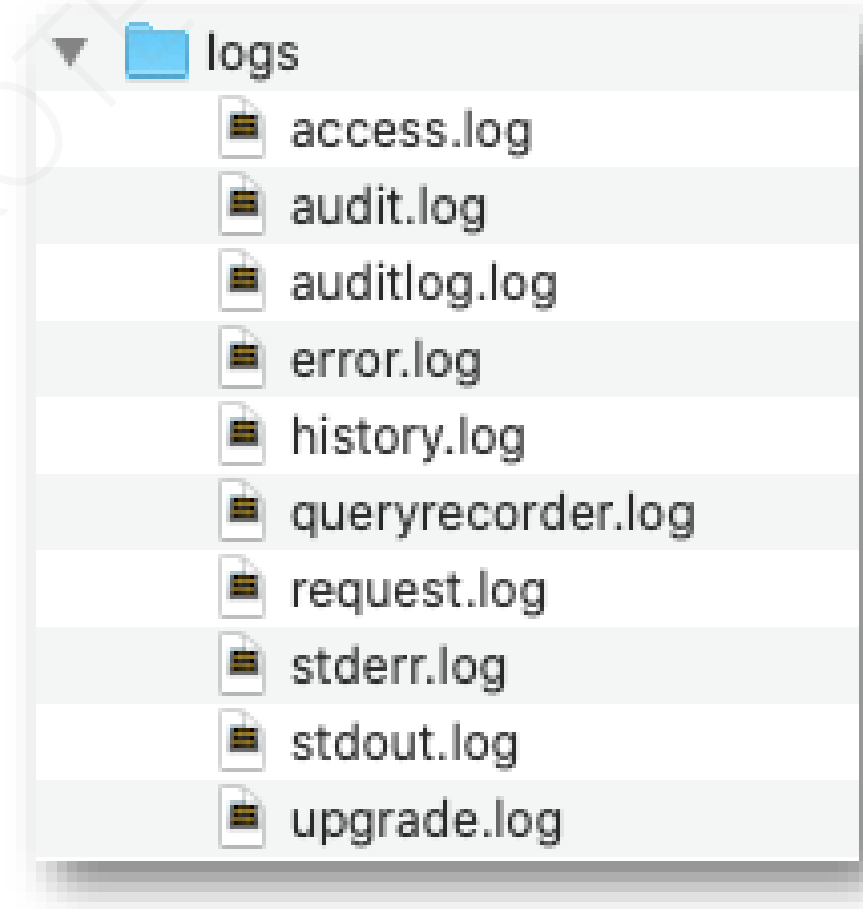
AEM Log Files

AEM logging is based on Sling logging

Sling logging exports four logging APIs:

- Simple Logging Facade for Java (SLF4J)
- Apache Commons Logging
- Log4j
- java.util.logging

By default, the error, access, history, and request logs rotate once per day





Exercise

Exercise 3: Observe the local log files



Key takeaways

- Local Installation Fundamentals
 - AEM runs on all operating systems that support Java SDK
 - All client interactions with AEM are done through a web browser
 - Development occurs on a local instance of AEM
- Super-set of tools used to develop for AEM as a Cloud service:
 - Quickstart Jar
 - Dispatcher Tools
- AEM 6.5.x
 - AEM quickstart jar and license. Properties file
 - Dispatcher

A man in a blue and green plaid shirt is pointing his right hand towards a screen, likely a presentation or a video. He is looking intently at the point of interest. To his left, a woman with long brown hair is also looking in the same direction, her hand resting on her chin. The background is a bright, out-of-focus interior space with large windows. The text "Q&A session" is overlaid in white on a dark horizontal band across the middle of the image.

Q&A session