Limitations on Android devices

Secured Screen Limitations

Some applications are using SECURE FLAG in their application activities. This flag may block us from getting a screenshot from the device.

For most devices we are able to get screenshots using other methods, however, on some devices we can't get screenshots from such applications. On such cases, you will see a black screen instead of the actual device reflection.

A non-comprehensive list of such devices includes:

Marketing Name	Model (other models might work)
LG V50 ThinQ	LM-V500N
LG G8 ThinQ	LG-G820
LG G6	LG-H873
LG Aristo 3	LMX220
LG G5	LG-H831
LG G5	LG-H860
LG G7 ThinQ	LM-G710
LG Stylo 5	LM-Q720
LG Wing 5G	LM-F100V
Vivo	Across models
Huawei	P20 Pro/MatePad

To get screenshots from such app you can do one of the following:

- Build your application without this SECURE FLAG.
- Use our Manual instrumentation tool, with -disableSecurityMode flag.

Device reboot

The USB connection type for OPPO device is not saved and resets to "Charge Only" after reboot. To make the device usable again, the device setting must be changed manually (requires physical access).

Therefore, a reboot is not supported for OPPO devices.

Additional steps for OnePlus devices

In developers options the option **Disable permission monitoring** should be **enabled**.

Limitation with Huawei and Xiaomi devices

For Huawei devices: If the device gets disconnected often or can't be connected to the cloud at all, the following option should be **enabled** in the **Developer Options** menu:

- Allow ADB debugging in charge only mode

In order to install applications from USB on the device the following should be **disabled** in the **Developer Options** menu:

- Verify app over USB
- Monitor apps installed by ADB (When available, this option isn't available for every device)

The following options should be **enabled** the **Developer Options** menu:

- Install via USB

If you are unable to enable **Install via USB**, enable **USB debugging (Security settings)** first, that should let you enable the former option.

Additional options for Huawei devices

If the device's connection is not stable after previous steps, or the device can't be launched in manual/automation session, take the following steps:

- Go to Settings Battery App Launch
- In the list search for 'UIAutomator' and tick it off
- In the window opened click OK without ticking anything

ⓘ **NOTE: Recommendations for setting up HarmonyOS devices**
1. **To automate the web applications, google chrome must be installed manually as per the flow below:**
   a. Open Petal Search Application on the device.
   b. Search for "Chrome"
   c. Tap Install
   d. If prompted with pop-up "Allow Petal Search to Access Files" - Click on **Allow**.
   e. If prompted with pop-up "Allow Petal Search to Install Apps" - Click on **Allow**
2. **Turn off password vault to avoid popups, else automation execution can have issues. You can do it by going to Settings →
   Password → Password Vault → Turn OFF**
3. **In certain applications running in HarmonyOS which uses SECURE_FLAG, you will see a black screen instead of the actual
   device reflection. In such a situation, click "Switch Apps" or "Back" from STMW**

Additional options for Xiaomi devices

Xiaomi devices will prompt before any application installation, **disabling** the following in the **Developer Options** menu should allow installation via USB without prompt (except for the first one).

Both options are on the bottom of the **Developer Options** menu:

- Turn on MIUI optimisation
- Notify about high-risk features

Android 12 & 13 limitation

Currently, Android 12 and 13 secured screens are only supported in **Instrumented** mode.

Non-instrumented apps with secured screens will not have actual screens displayed and a black image will be displayed instead (this includes setting /changing pin codes in settings app).