2.1 ANDROID VIRTUAL DEVICE
After creating the first Android application, we need to create an Android Virtual Device (AVD) to run it. First, on the top of the interface, select Tools, then Android, and then AVD Manager (Tools → Android → AVD Manager). The AVD Manager is similar to Fig. 2.10.

![New Project in Android Studio](image)

**Figure 2.5** First Step of creating an Android Application in Android Studio.
Click “Create a virtual device”; the interface will be similar to Fig. 2.11. Choose Phone in the category list, and Nexus S as the device. Then click “Next.”

In the second step of creating an AVD in Android Studio, you can choose the version of Android SDK which you want to use, as shown in Fig. 2.12. Then click “Next.”

![Create New Project](image)

**Figure 2.6** First step of creating an Android application in Android Studio.
Figure 2.7 Second step of creating an Android application in Android Studio.
Figure 2.8 Last step of creating an Android application in Android Studio.

Figure 2.9 Interface of Android Studio with a new Android project.
In the last step of creating an AVD in Android Studio, you can change the name of the AVD you want to create, as shown in Fig. 2.13. Then click “Finish”.

The AVD is created, as shown in Fig. 2.14. Then click the green arrow on the right side to start this virtual device. After waiting a while, the virtual device is started, as shown in Fig. 2.15.

Then run your Android application on this virtual device. Select the application created before, and then click the green arrow to that was run it. At last, the Android application runs on the virtual device, as shown in Fig. 2.16.
Figure 2.11 First Step of Creating an Android Virtual Device in Android Studio -1.

Figure 2.12 Second Step of Creating an Android Virtual Device in Android Studio -2.
Figure 2.13 Last Step of Creating an Android Virtual Device in Android Studio.

Figure 2.14 New Virtual Device in AVD Manager in Android Studio.
Figure 2.15 Android Virtual Device in Android Studio

Figure 2.16 Android Application Running on the Android Virtual Device in Android Studio