



DWIN Linux LCD Screen (36 series) QT Cross-compile Configuration



1 Install Qt Creator.....	1
1.1 System Requirements.....	1
1.2 Download Qt Creator.....	1
1.3 Install Qt Creator.....	1
2 Set up the cross-compilation environment.....	5
2.1 Run the Qt Creator.....	5
2.2 Set up the cross-compilation environment.....	5
3 Compile Qt project	11
3.1 Open the project.....	11
3.2 Add environment variables	13
3.3 Run qmake	14
3.4 Build.....	16
Important Disclaimer	20

1 Install Qt Creator

1.1 System Requirements

This document is based on Ubuntu 14.04 system for verification. Other versions of Ubuntu systems should work but are not verified.

1.2 Download Qt Creator

The version of Qt Creator used in this document is 2.7.2. Please download the version that matches the operating system.

 source/	02-Jul-2013 19:43	-	
 qt-creator-windows-opensource-2.7.2.exe	02-Jul-2013 19:43	53M	Details
 qt-creator-mac-opensource-2.7.2.dmg	02-Jul-2013 19:43	53M	Details
 qt-creator-linux-x86_64-opensource-2.7.2.bin	02-Jul-2013 19:43	62M	Details
 qt-creator-linux-x86-opensource-2.7.2.bin	02-Jul-2013 19:43	63M	Details
 qt-creator-2.7.2-src.zip	02-Jul-2013 19:43	27M	Details
 qt-creator-2.7.2-src.tar.gz	02-Jul-2013 19:43	22M	Details

1.3 Install Qt Creator

Copy the installer to your Ubuntu system and add execute permissions to the file:

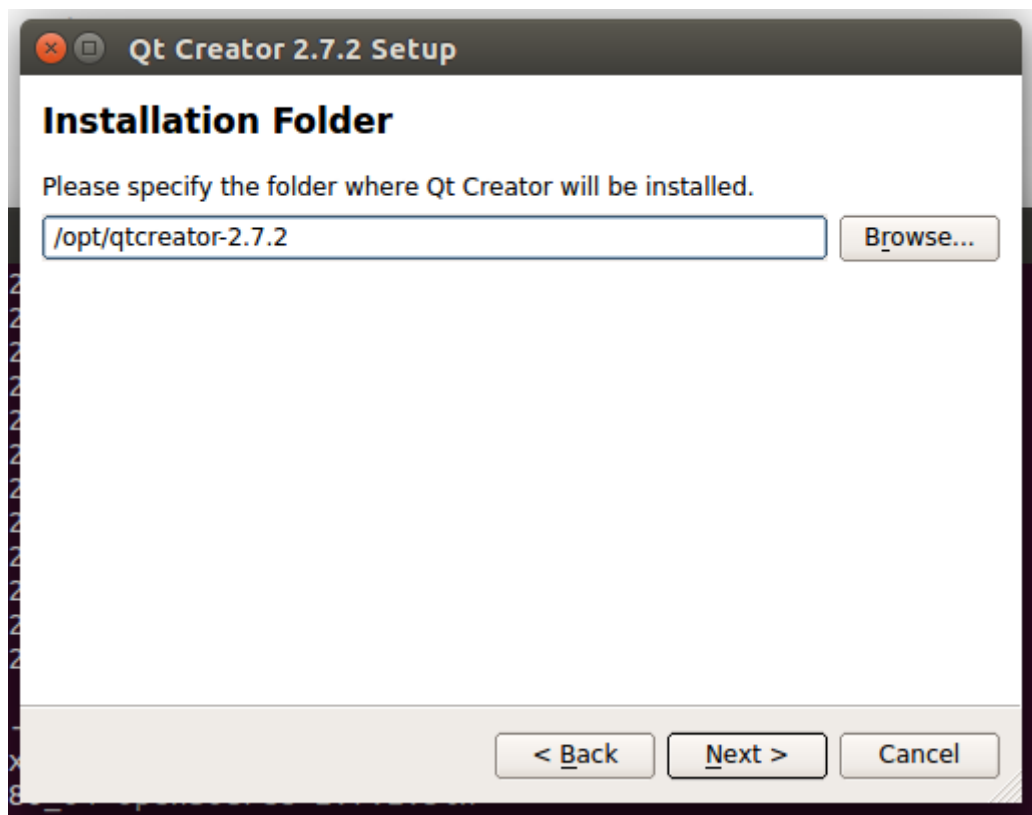
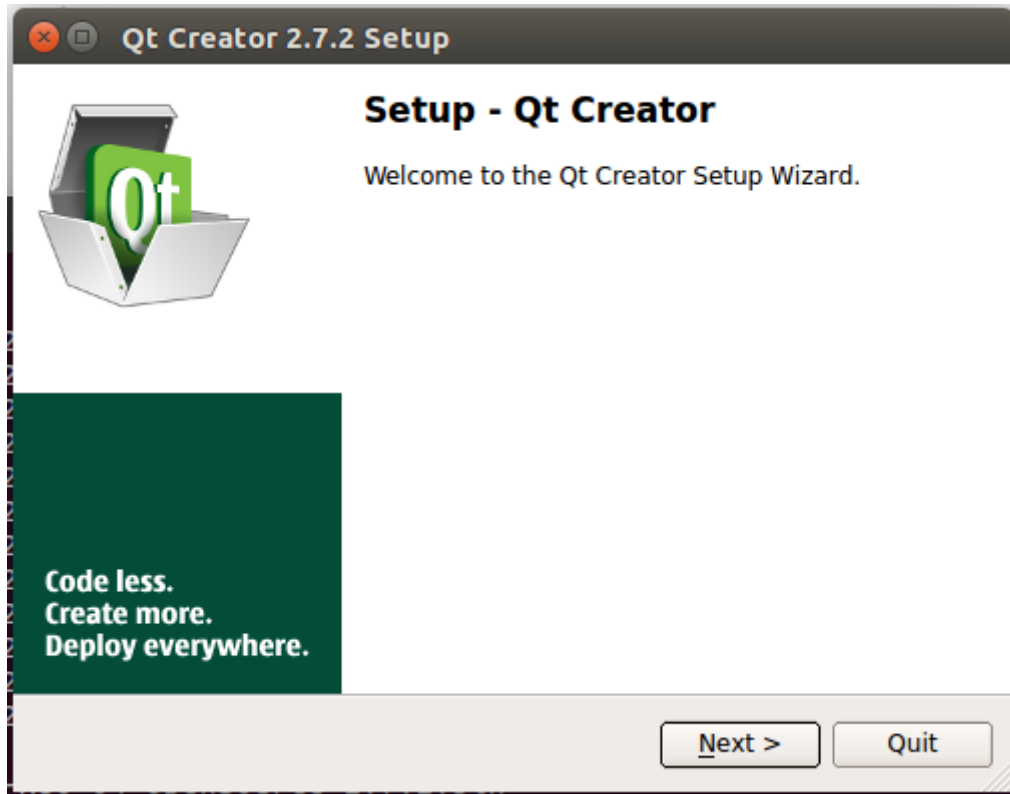
```
# chmod +x qt-creator-linux-x86_64-opensource-2.7.2.bin
```

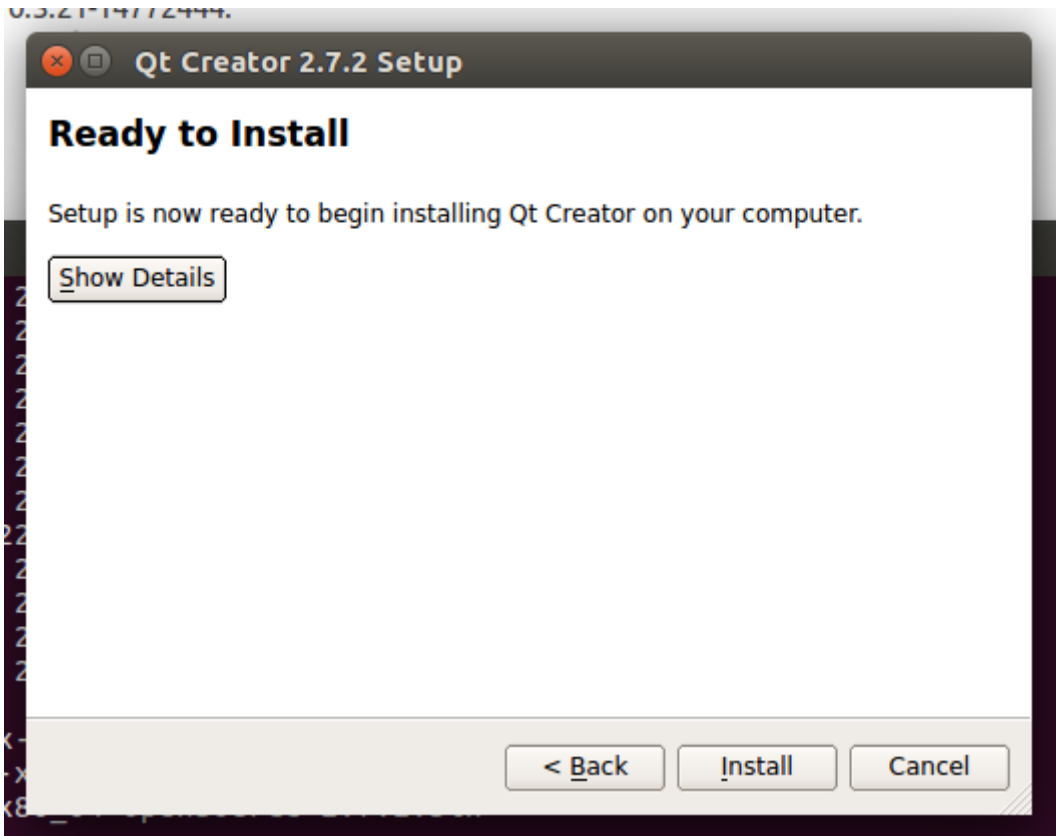
```
dwinvm@ubuntu:~$ chmod +x qt-creator-linux-x86_64-opensource-2.7.2.bin
```

Run the installer

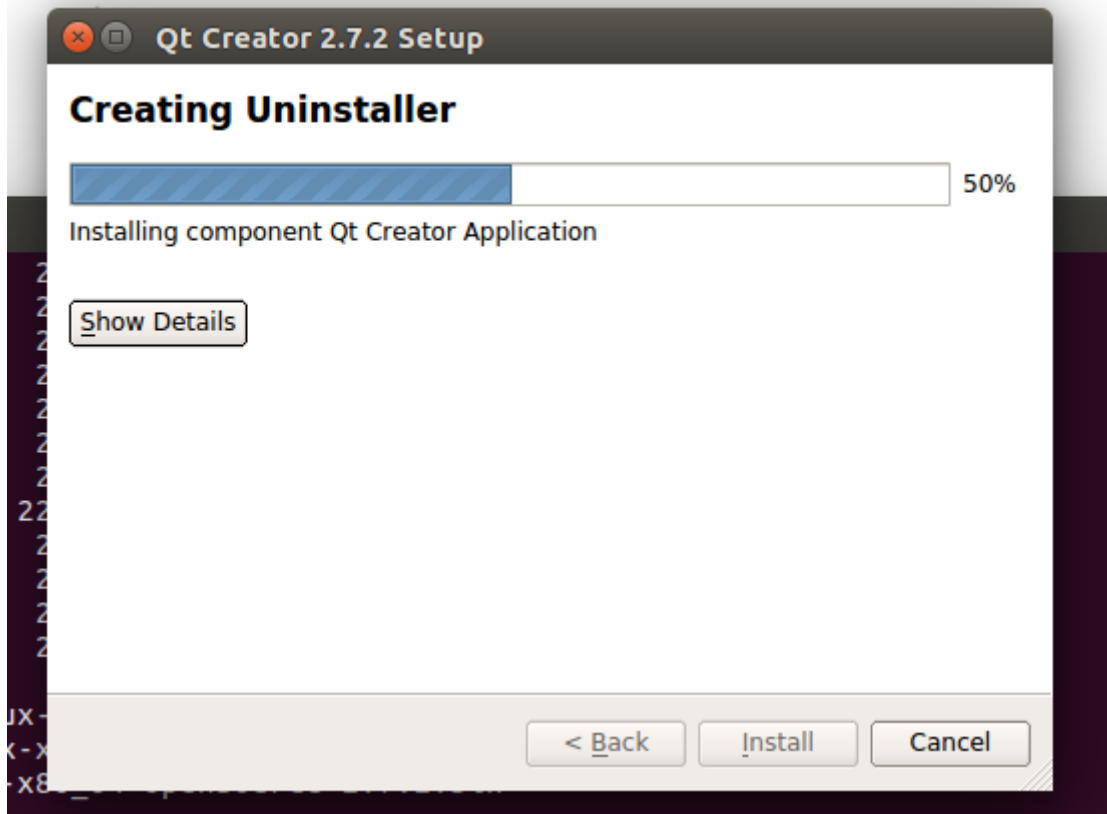
```
# sudo ./qt-creator-linux-x86_64-opensource-2.7.2.bin
```

Click the “Next”:





10.3.21-14772444.



10.3.21-14772444.

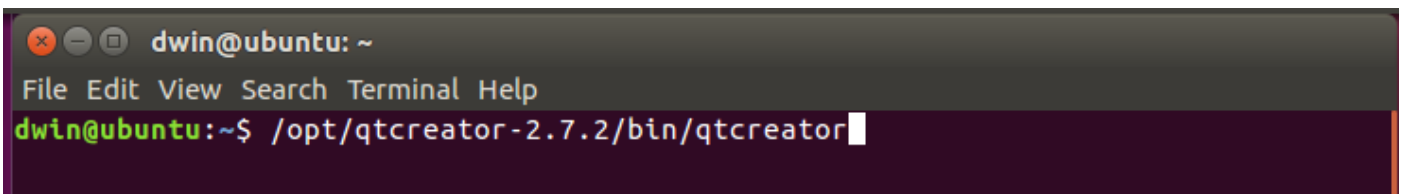


2 Set up the cross-compilation environment

2.1 Run the Qt Creator

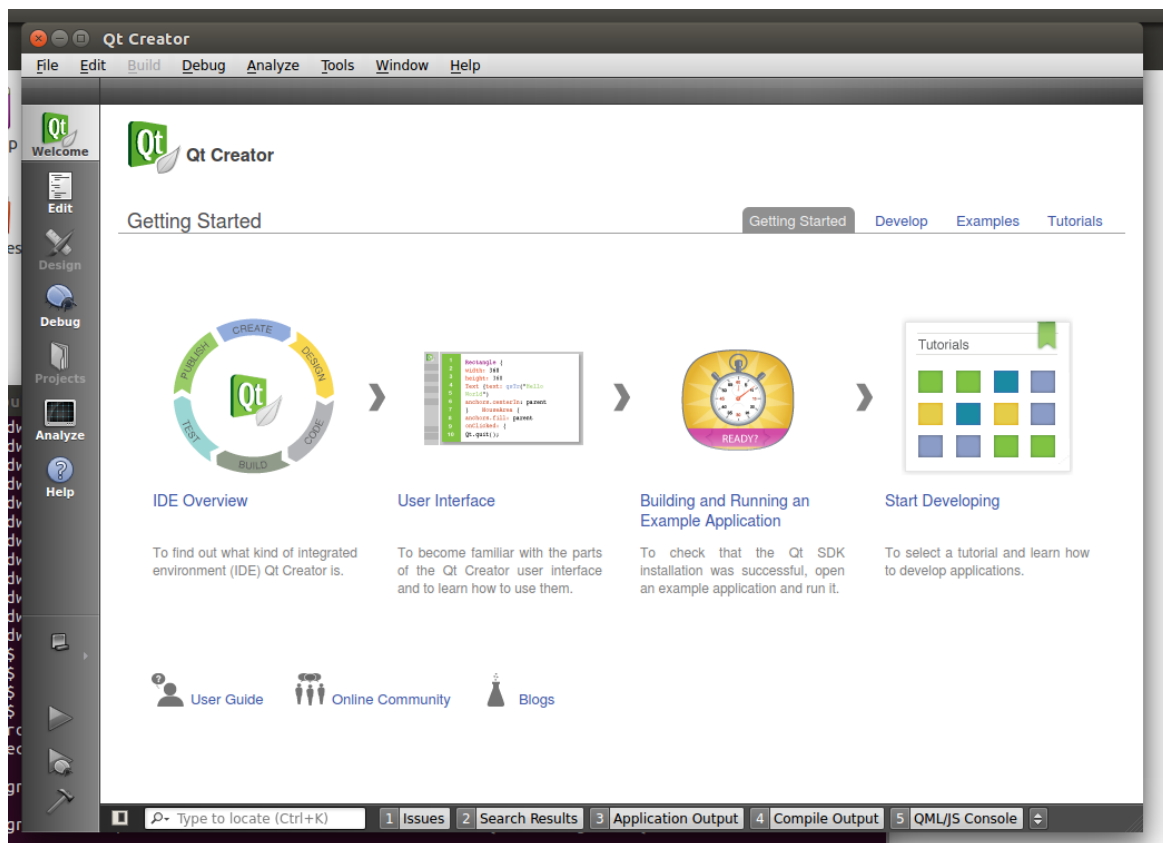
The Qt Creator executable file is in the bin directory of the installation directory.

```
# /opt/qtcreator-2.7.2/bin/qtcreator
```



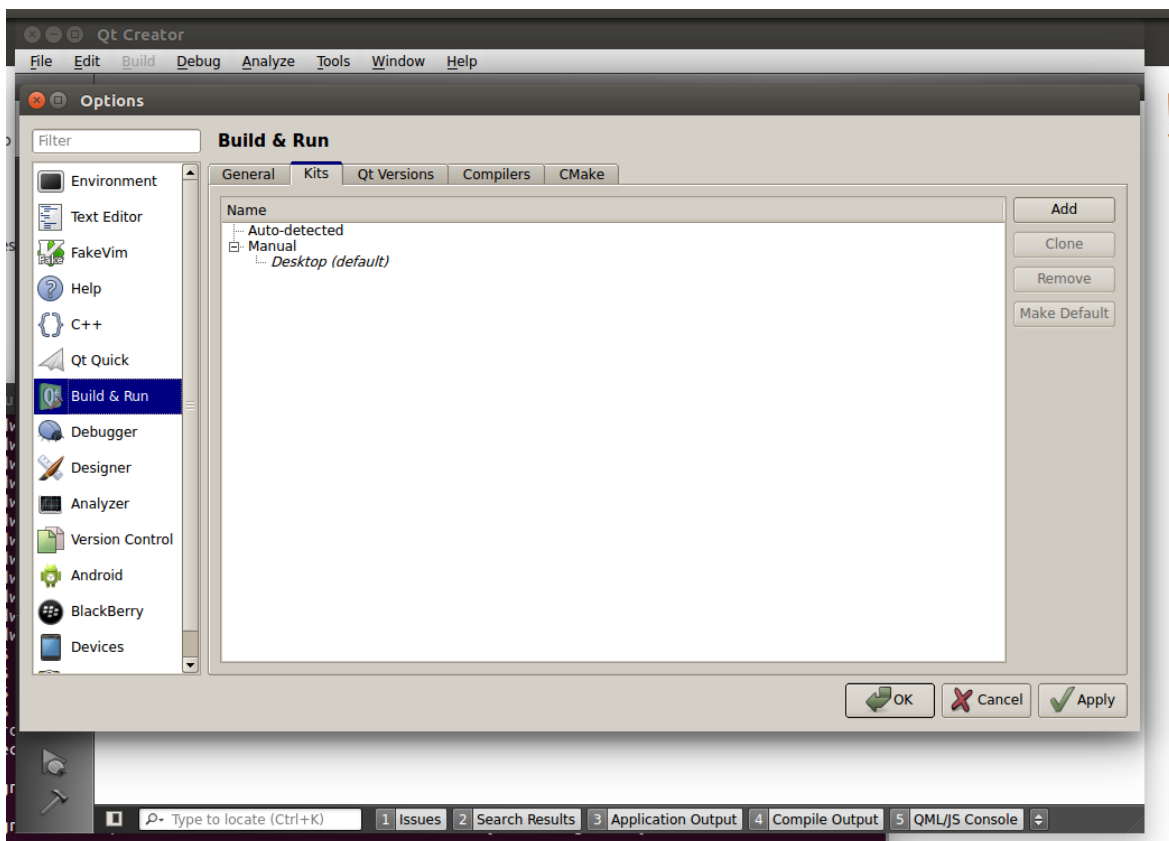
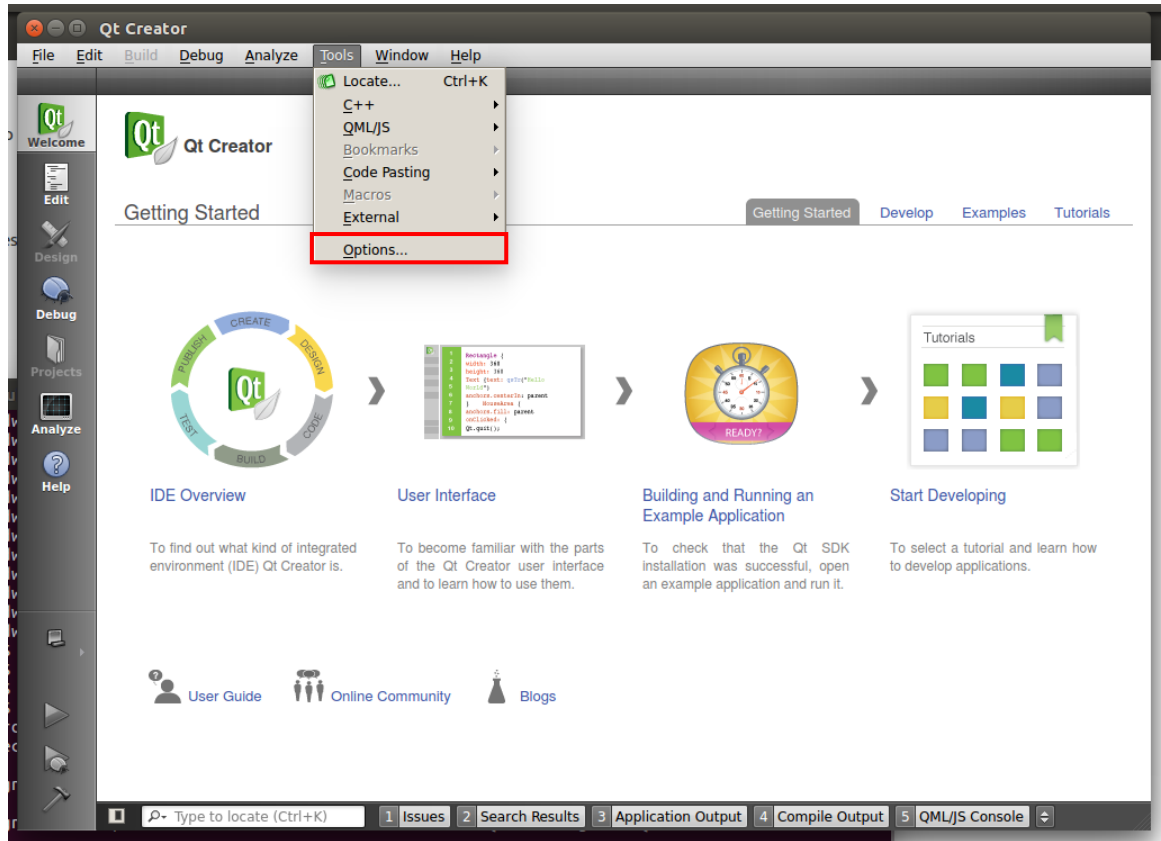
```
dwinn@ubuntu: ~  
File Edit View Search Terminal Help  
dwinn@ubuntu:~$ /opt/qtcreator-2.7.2/bin/qtcreator
```

The interface of software is as below.



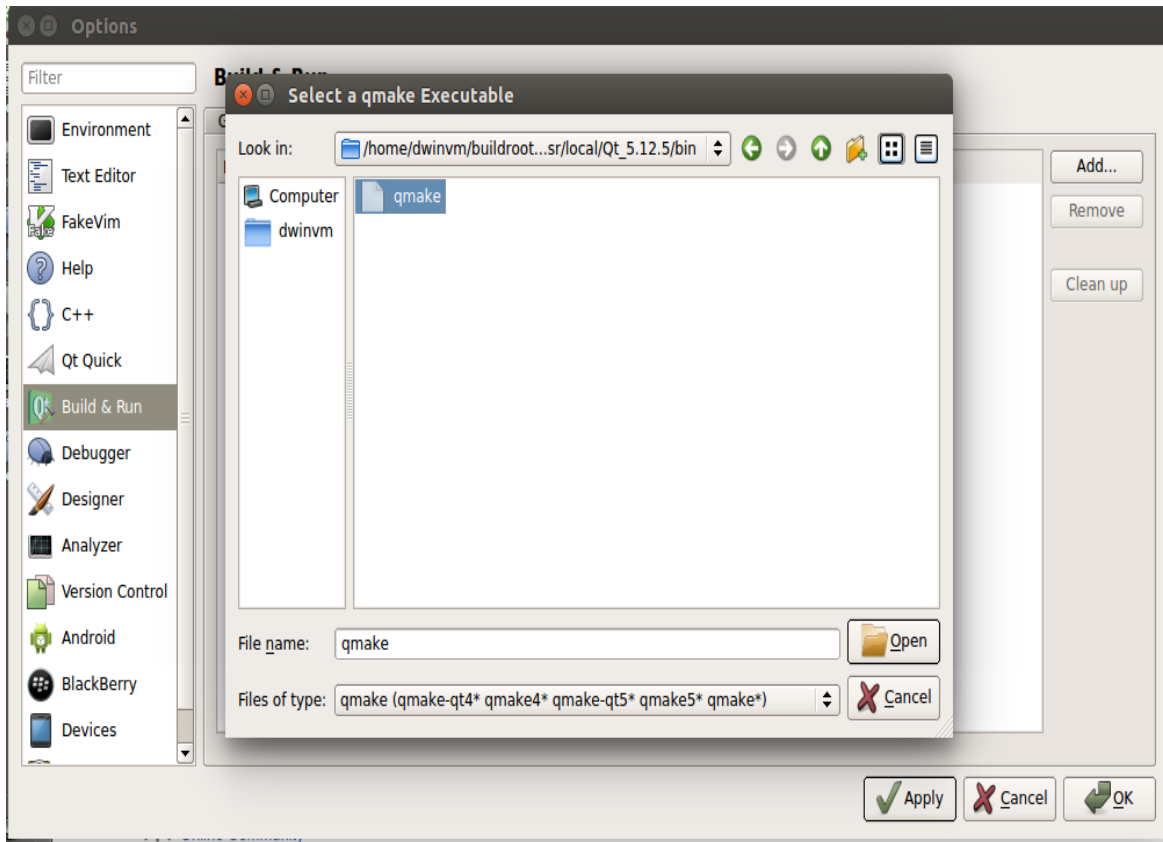
2.2 Set up the cross-compilation environment

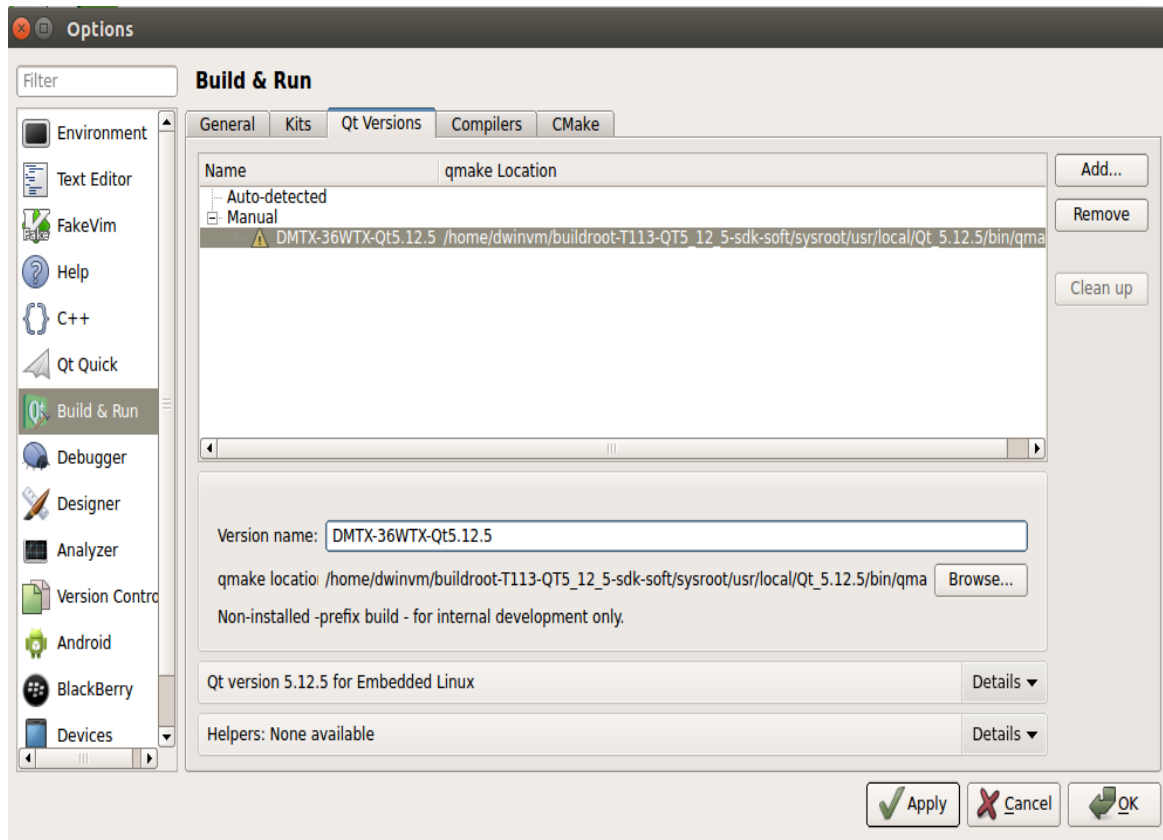
Choose [tool] – [options] as below.



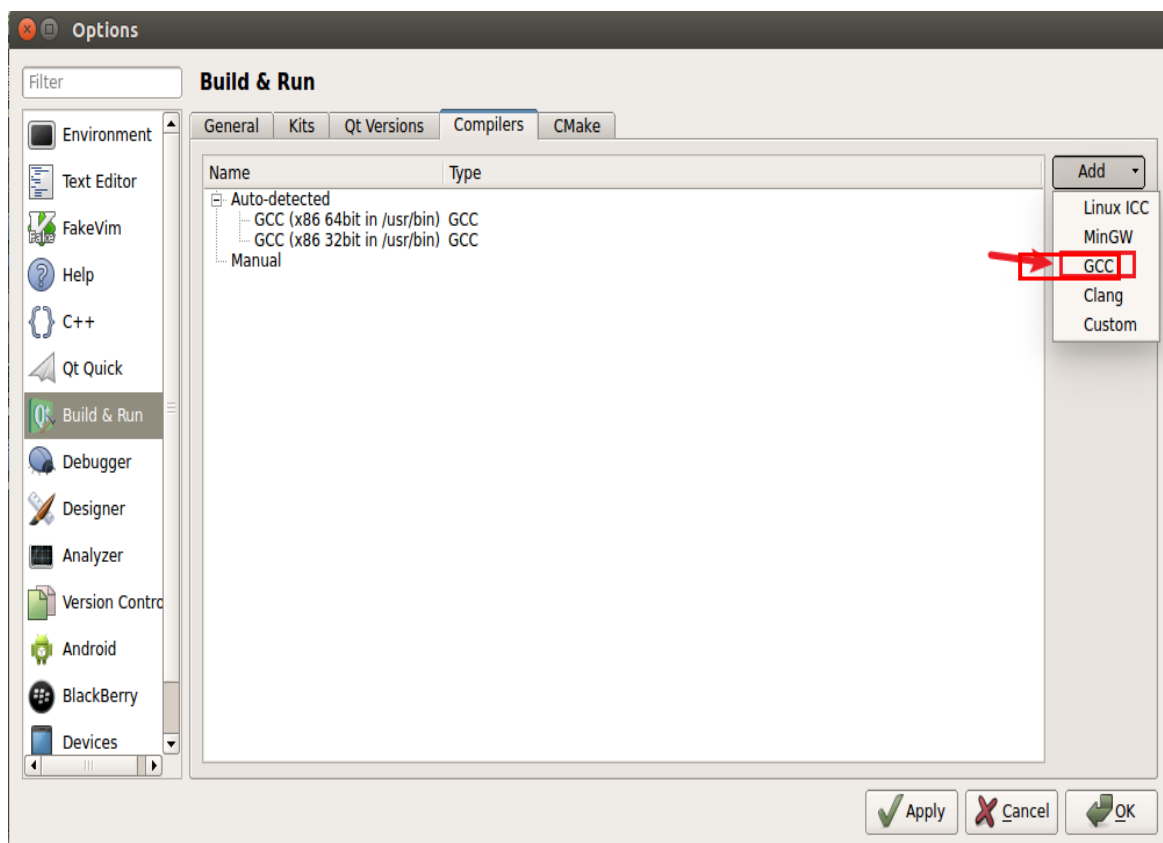
Set qmake: choose [Build & Run] – [Qt Version] – [Add],

“qmake” is in the ‘sysroot/usr/local/Qt_5.12.5/bin/’ directory of buildroot-T113-QT5_12_5-sdk-soft20221012.tar.gz

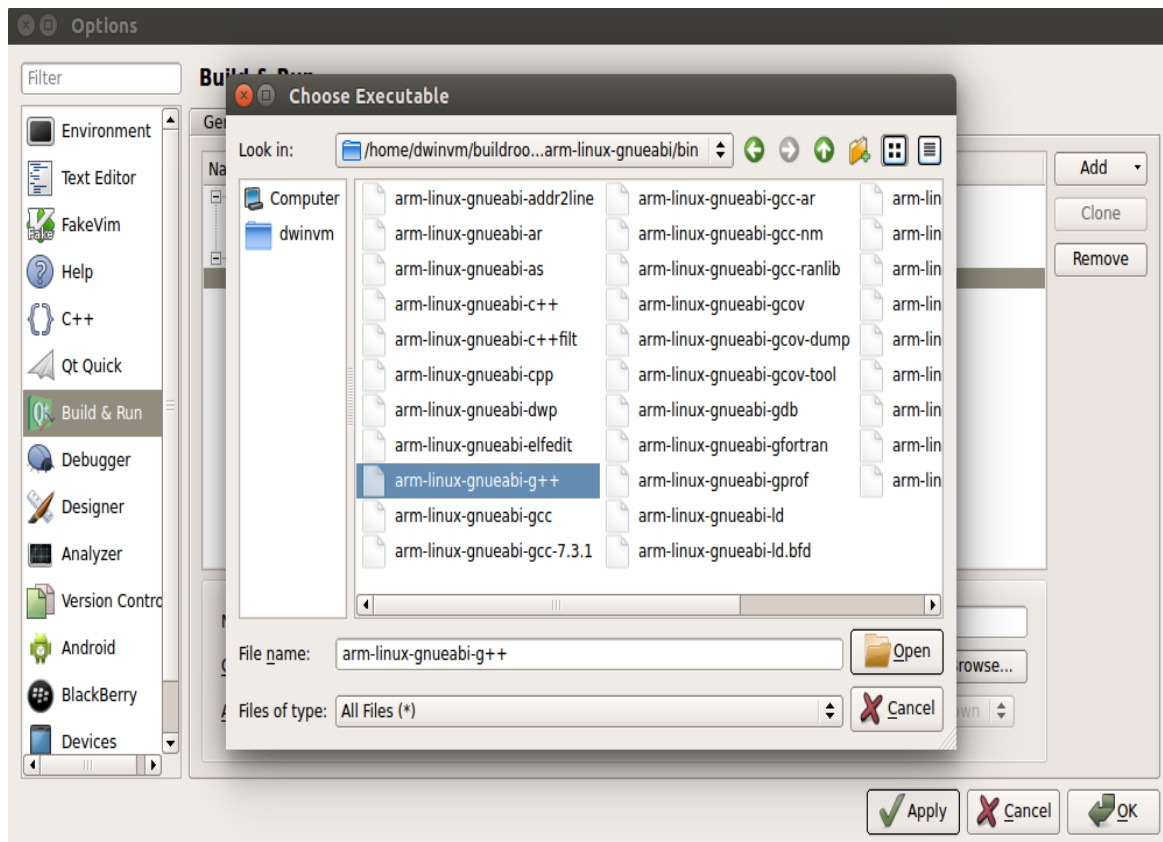


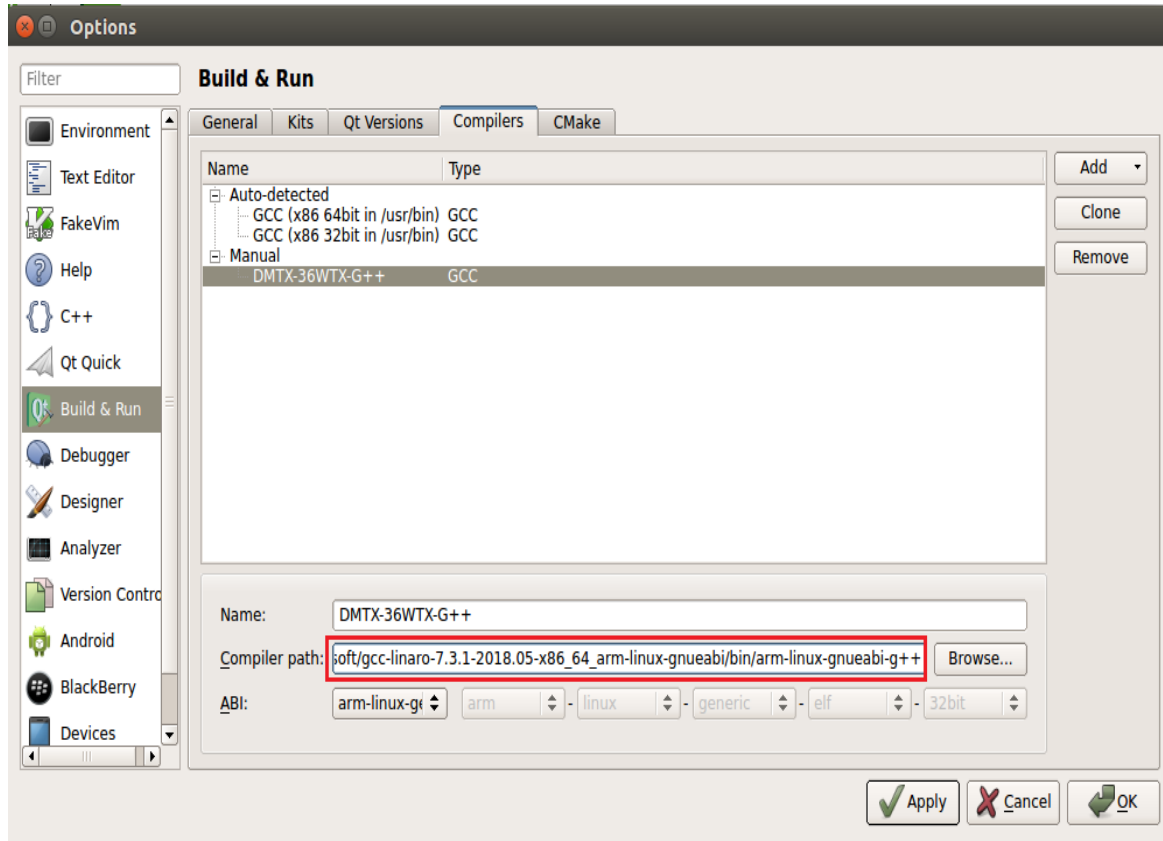


Set compilation toolchain: choose [Build & Run] – [Compilers] – [Add] – [GCC]:

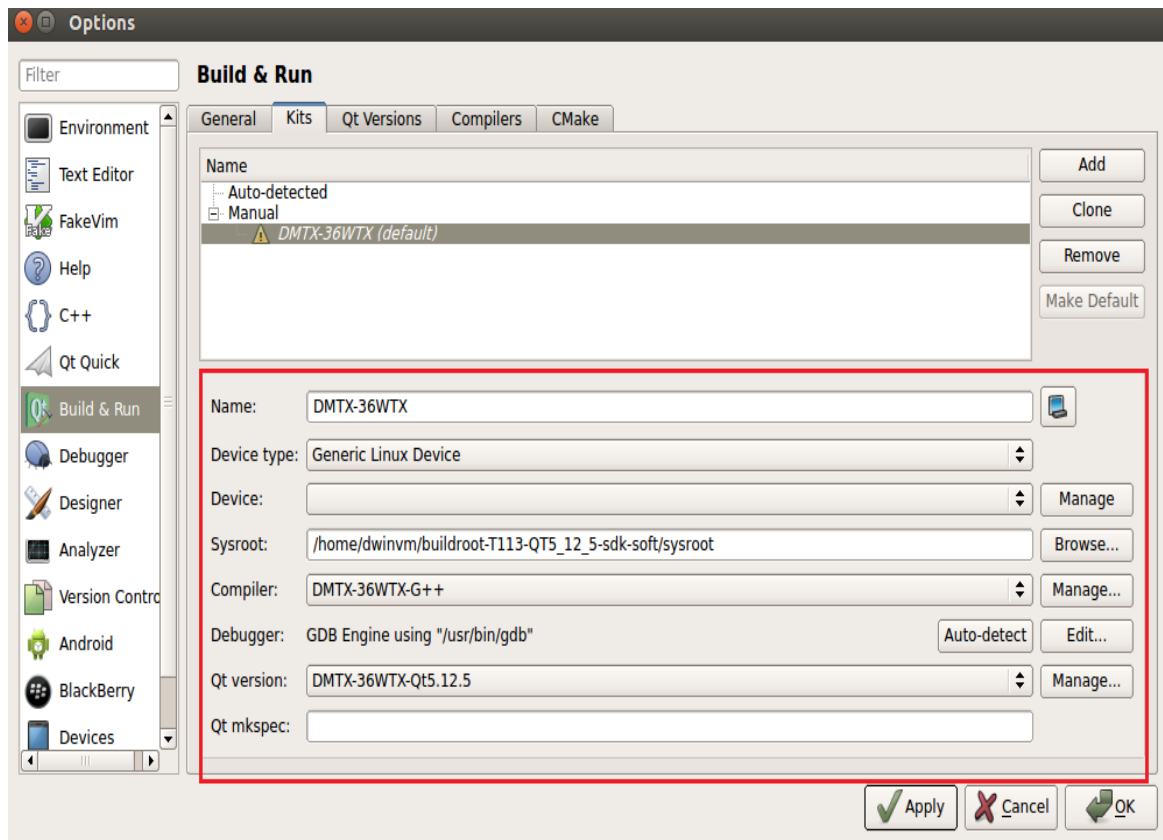


The compiler is located in the 'gcc-linaro-7.3.1-2018.05-x86_64_arm-linux-gnueabi/bin' directory of the 'buildroot-T113-QT5_12_5-sdk-soft20221012.tar.gz' package.





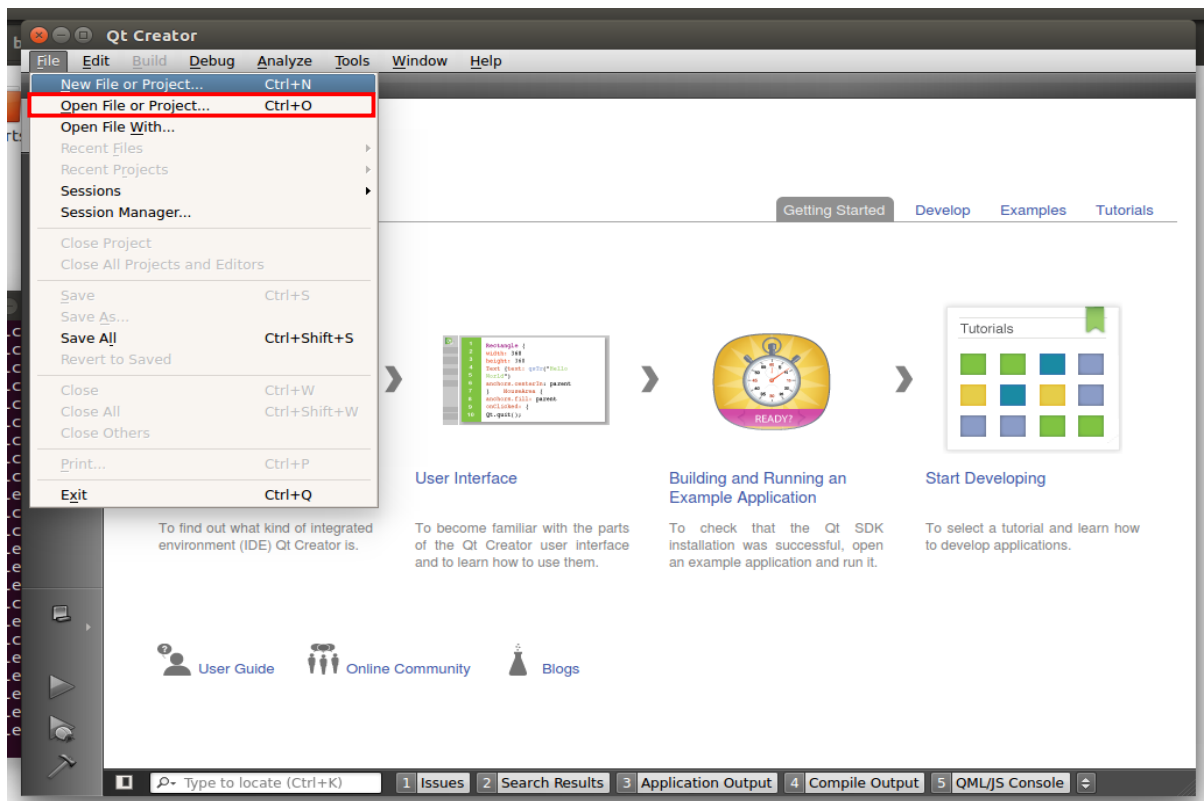
Set up the build kit: choose [Build & Run] – [Kits]:



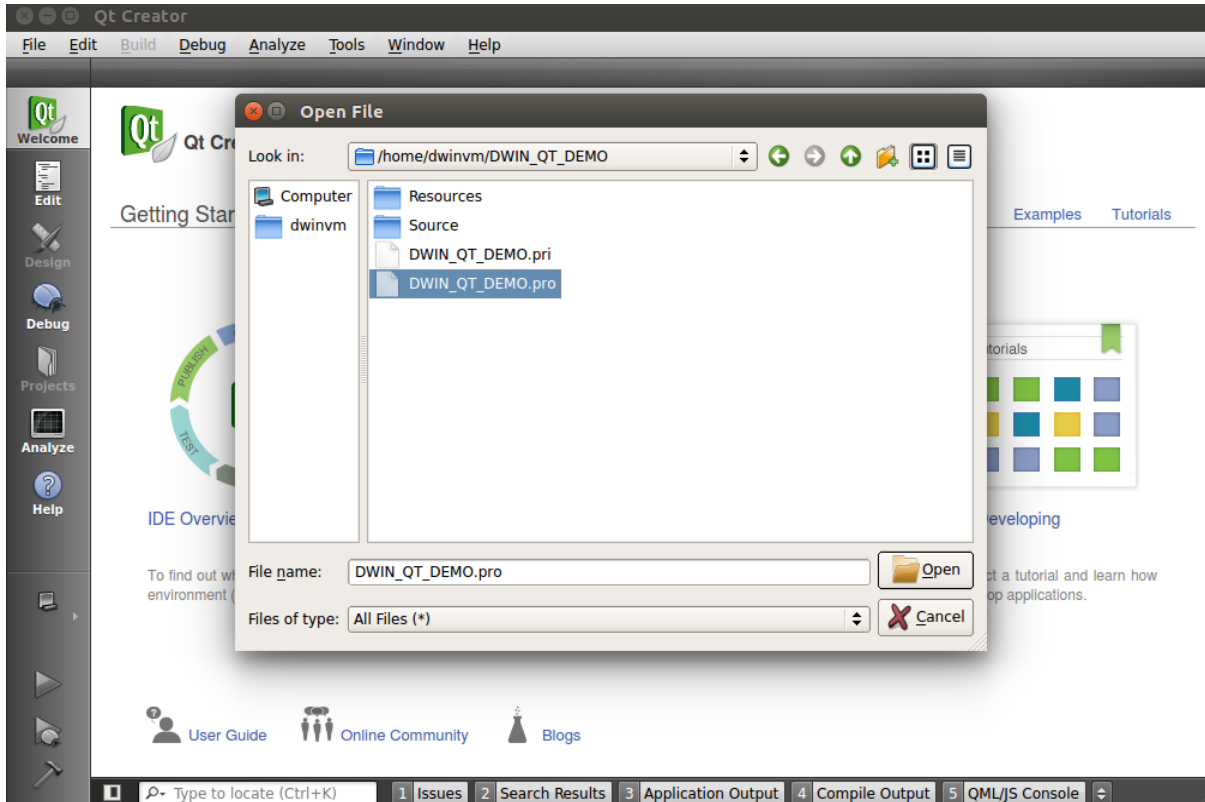
3 Compile Qt project

3.1 Open the project

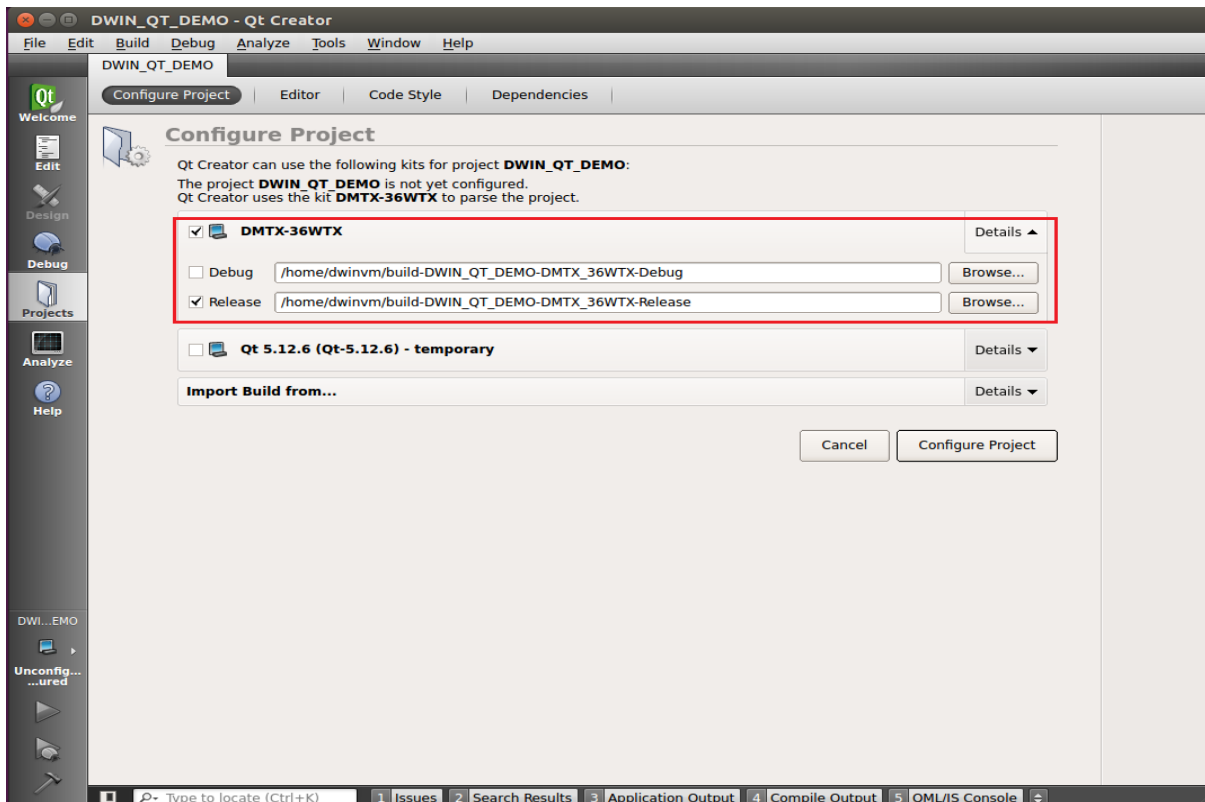
[File] – [open file or project]:



Choose the Qt project:



Configure the project:

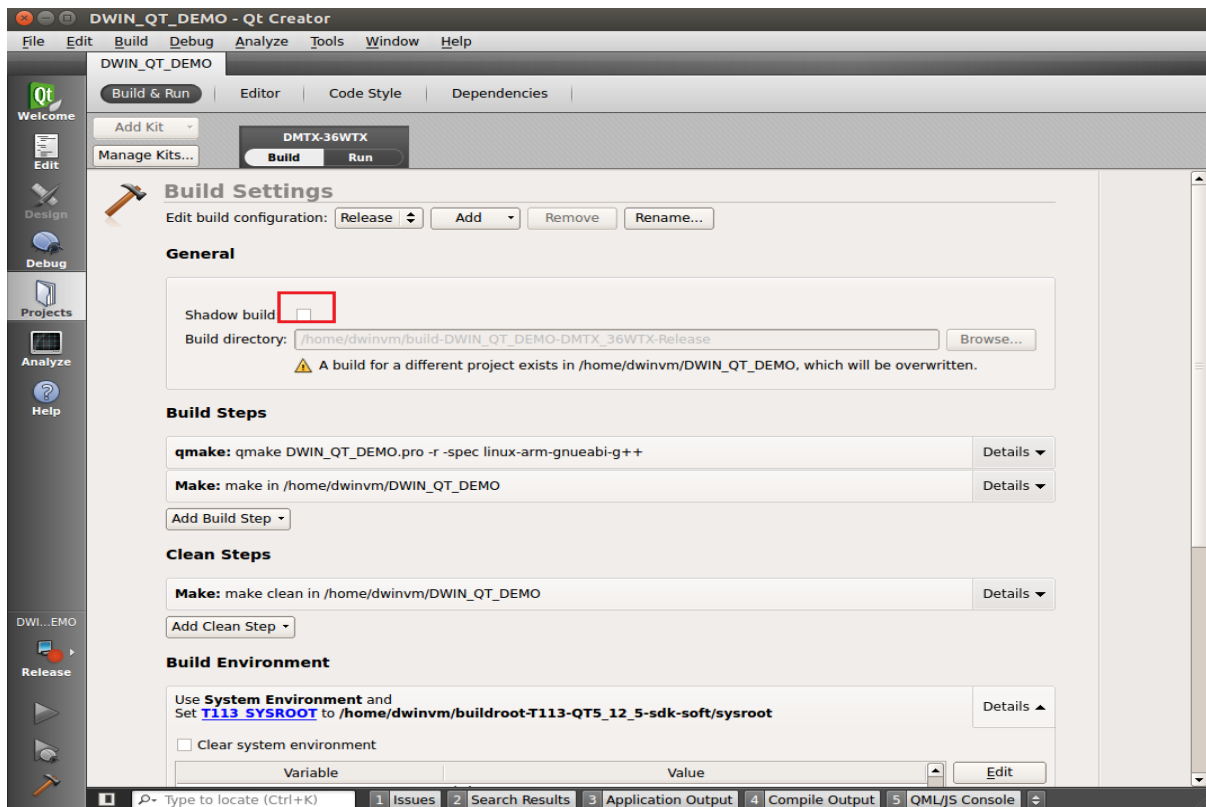


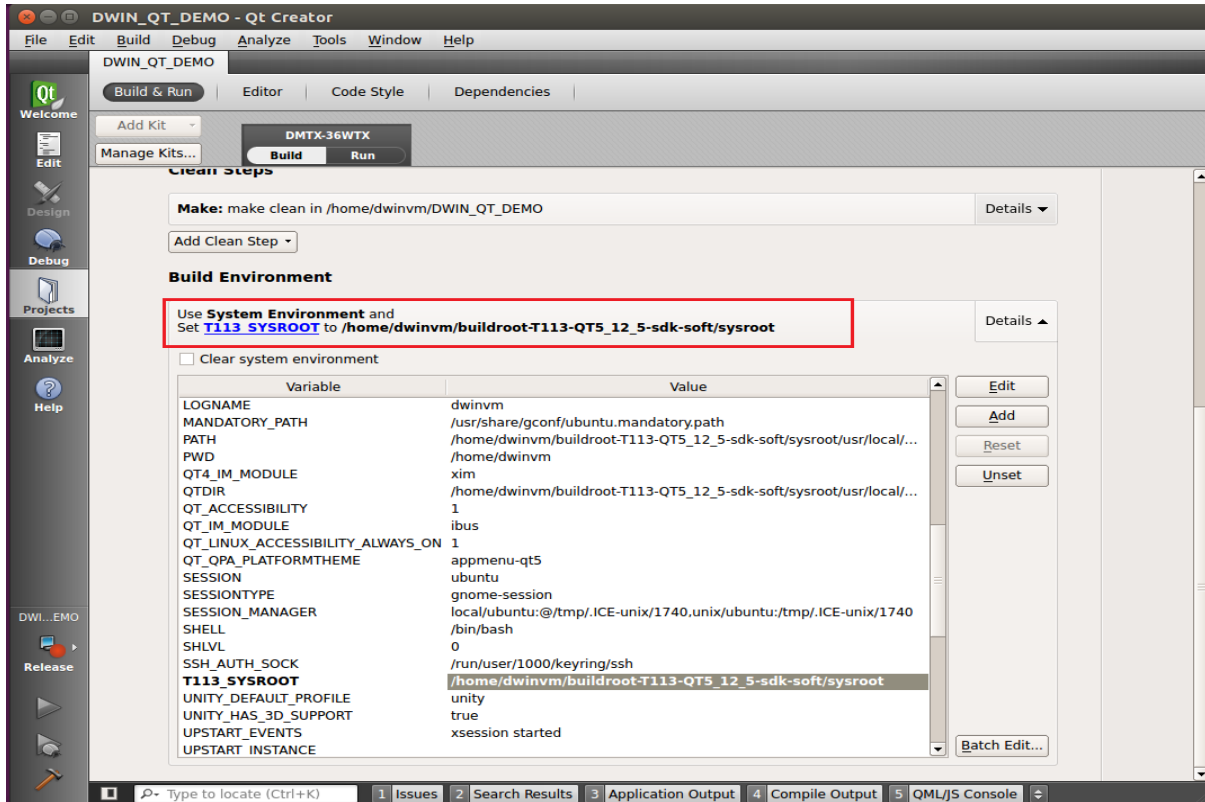
3.2 Add environment variables

Go to [Projects] – [Build & Run] - [Build Environment], and add a variable:

Variable Name: T113_SYSROOT

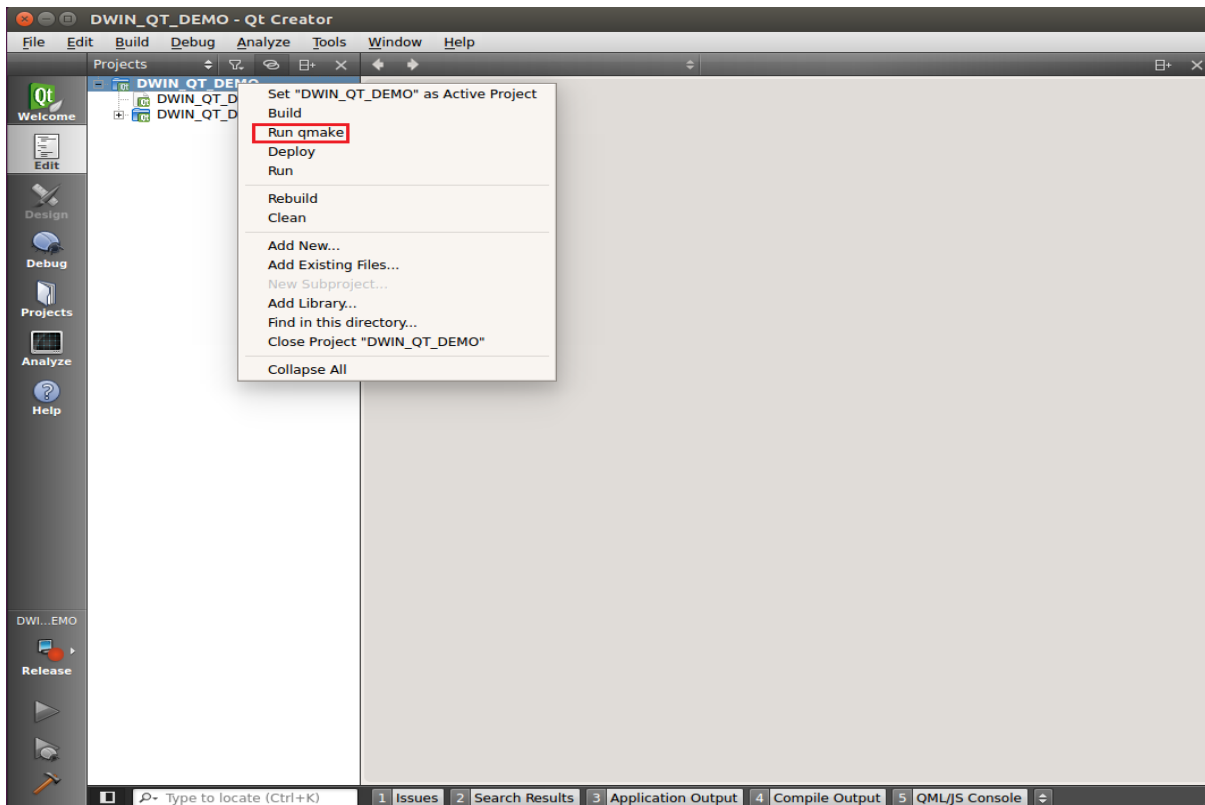
Value: 'sysroot' directory of the 'buildroot-T113-QT5_12_5-sdk-soft20221012.tar.gz' package



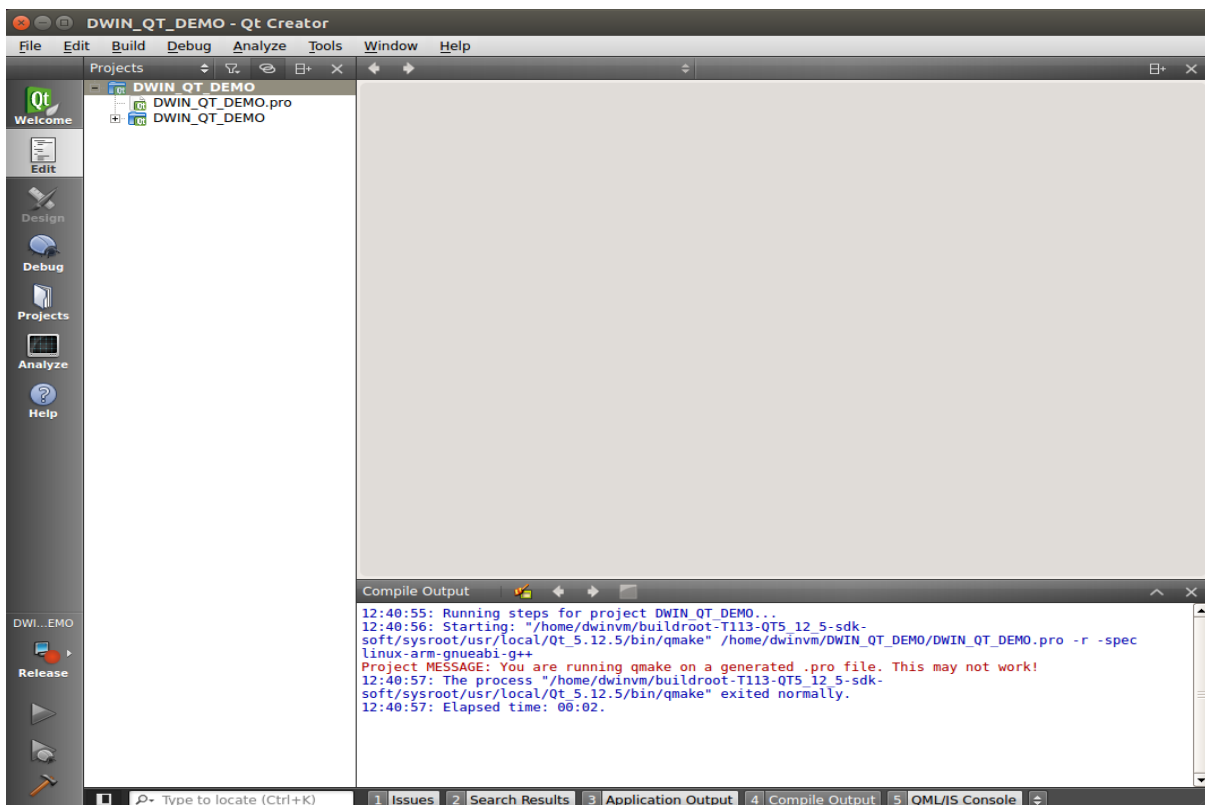


3.3 Run qmake

Choose project, right click – run qmake

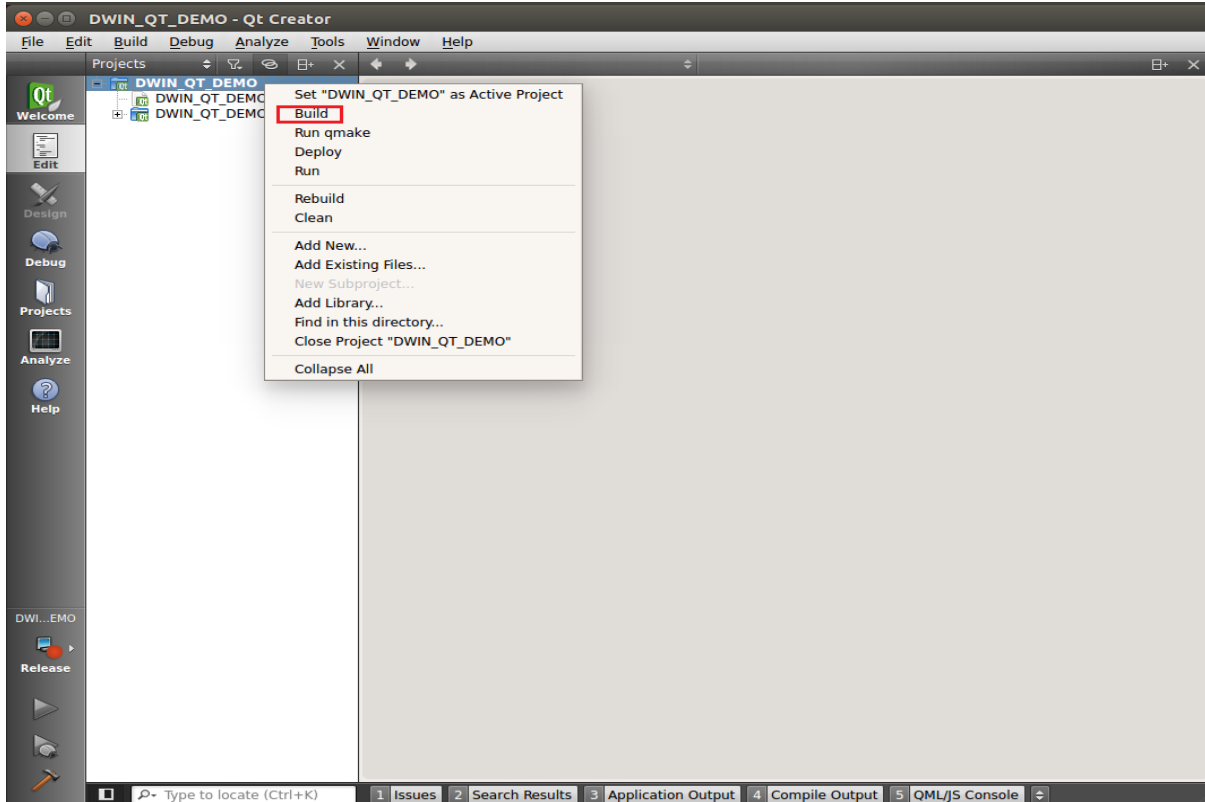


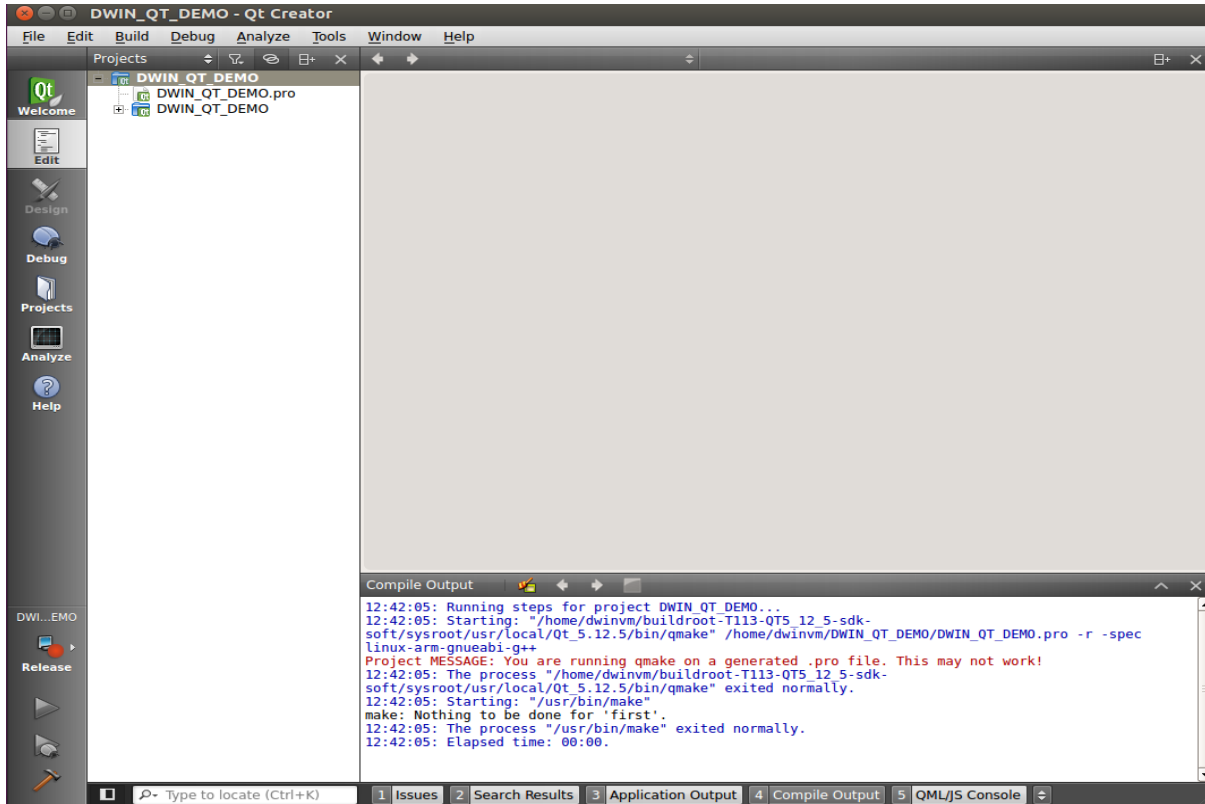
When qmake is successful, it looks like the image below (the red part is the printout of DWIN_QT_DEMO.pro, which does not affect).



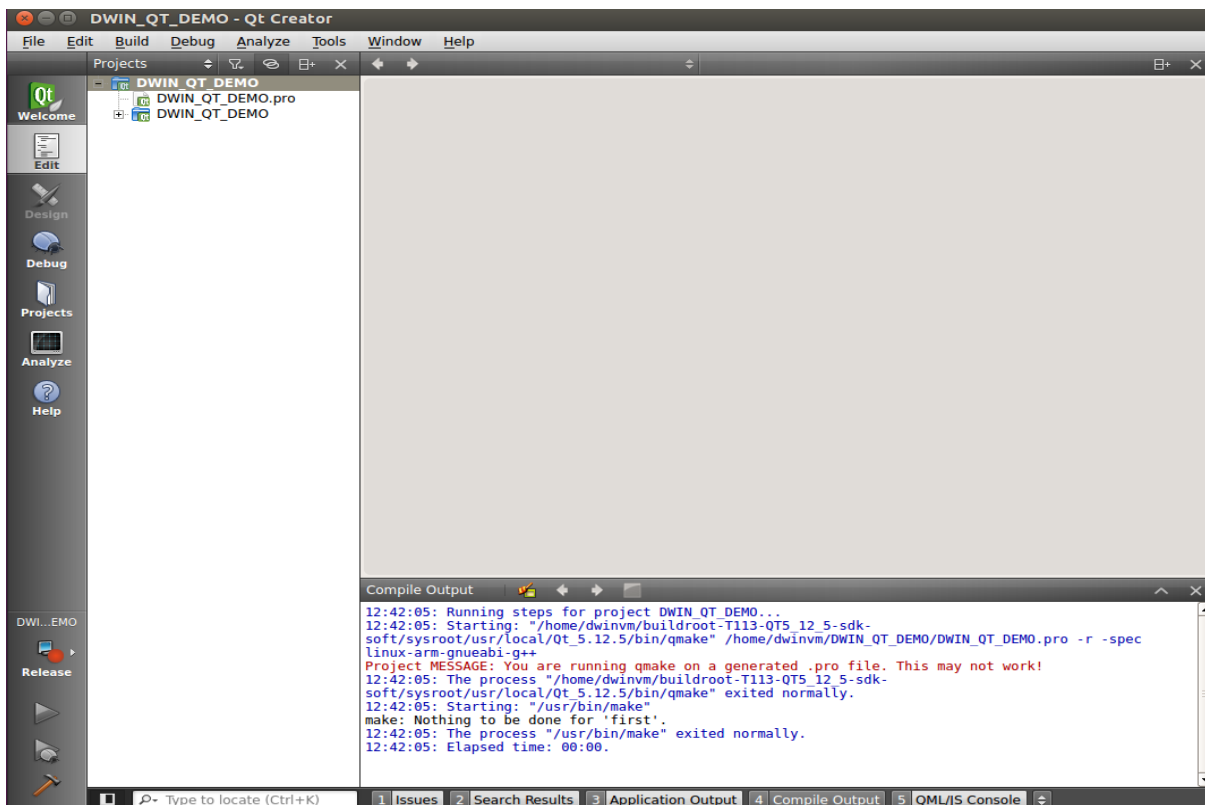
3.4 Build

Right key the project and choose [Build].





At this point, the target files have been generated in the project directory and can be copied to the screen for execution.



```
dwinvm@ubuntu: ~/DWIN_QT_DEMO
dwinvm@ubuntu:~$ cd DWIN_QT_DEMO/
dwinvm@ubuntu:~/DWIN_QT_DEMO$ ls
dwinqtdemo          moc_toolbody.o      Resources
DWIN_QT_DEMO.pri    moc_toolcomtest.cpp Source
DWIN_QT_DEMO.pro    moc_toolcomtest.o  toolbasetest.o
DWIN_QT_DEMO.pro.user moc_toolheader.cpp  toolbody.o
main.o              moc_toolheader.o   toolcomtest.o
mainwindow.o        moc_toolsqltest.cpp toolheader.o
Makefile            moc_toolsqltest.o  toolsqltest.o
moc_mainwindow.cpp  moc_toolstartpage.cpp toolstartpage.o
moc_mainwindow.o    moc_toolstartpage.o tooltouchtest.o
moc_predefs.h        moc_tooltouchtest.cpp tooltranslator.o
moc_toolbasetest.cpp moc_tooltouchtest.o toolutility.o
moc_toolbasetest.o  qrc_DWIN_QT_DEMO.cpp
moc_toolbody.cpp    qrc_DWIN_QT_DEMO.o
dwinvm@ubuntu:~/DWIN_QT_DEMO$
```



Revision Records

Rev	Revise Date	Content	Editor
00	2023-06-09	First Edition	Zheng Jianxin

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Thank you all for continuous support of DWIN, and your approval is the driving force of our progress!



Important Disclaimer

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