

# edk2-vUDK2018环境搭建

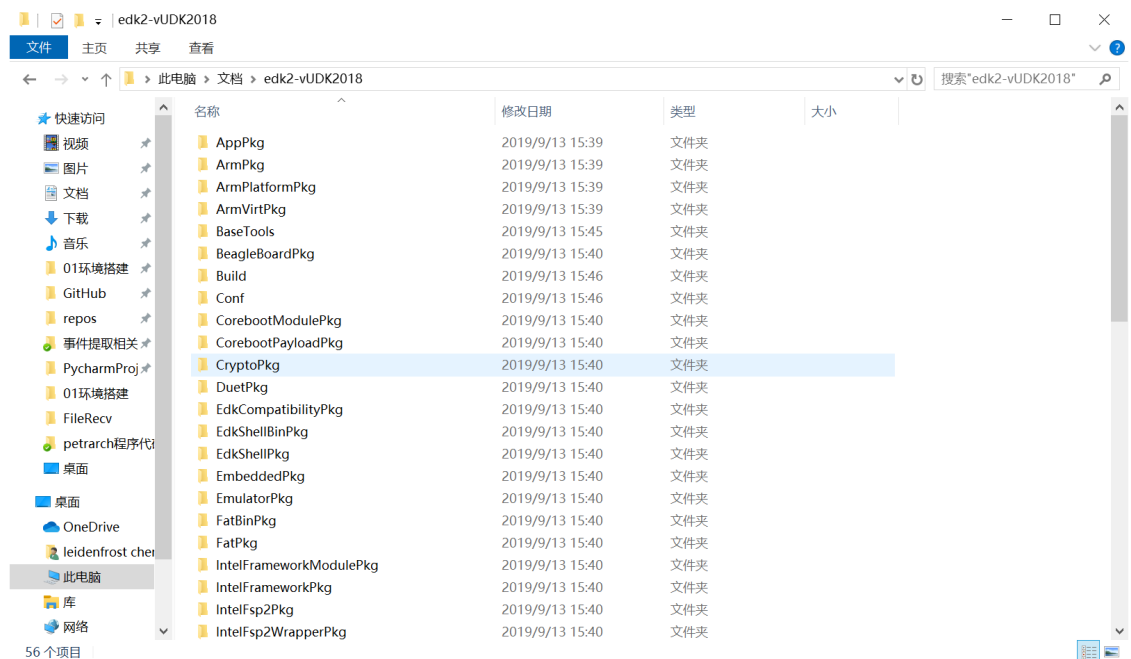
## 环境所需

1. Microsoft Visual Studio 2017
2. NASM 2.12.01
3. Python2.7
4. Openssl

## 安装步骤

1. 下载UDK2018 release源码，并解压到任一文件夹

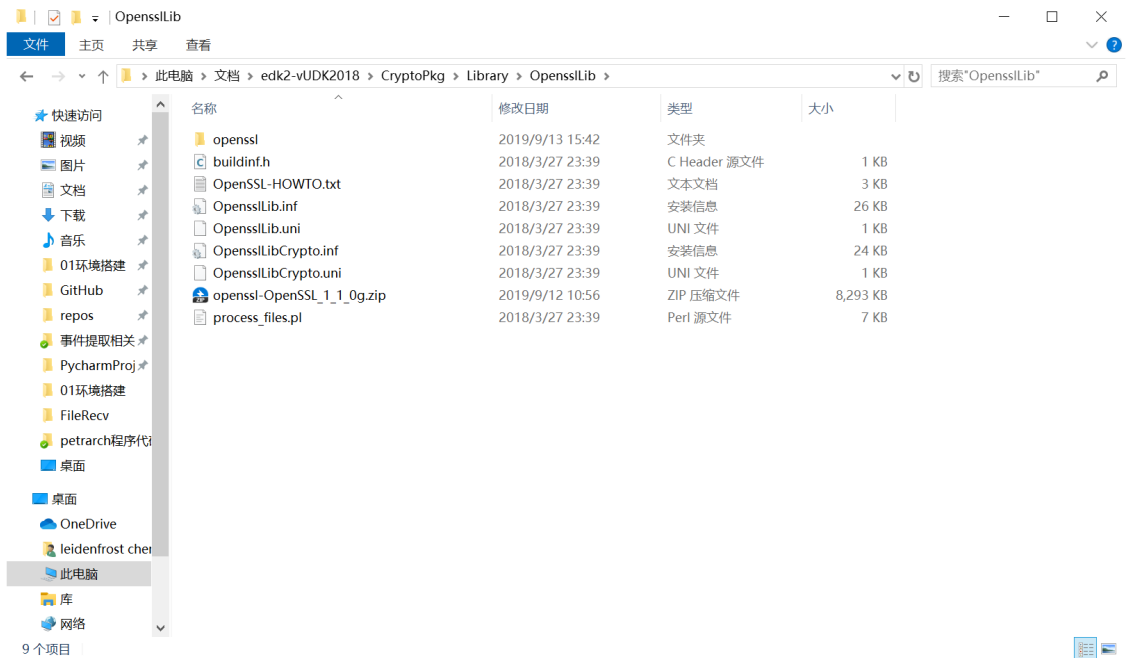
下载地址 <https://github.com/tianocore/edk2/archive/vUDK2018.zip>



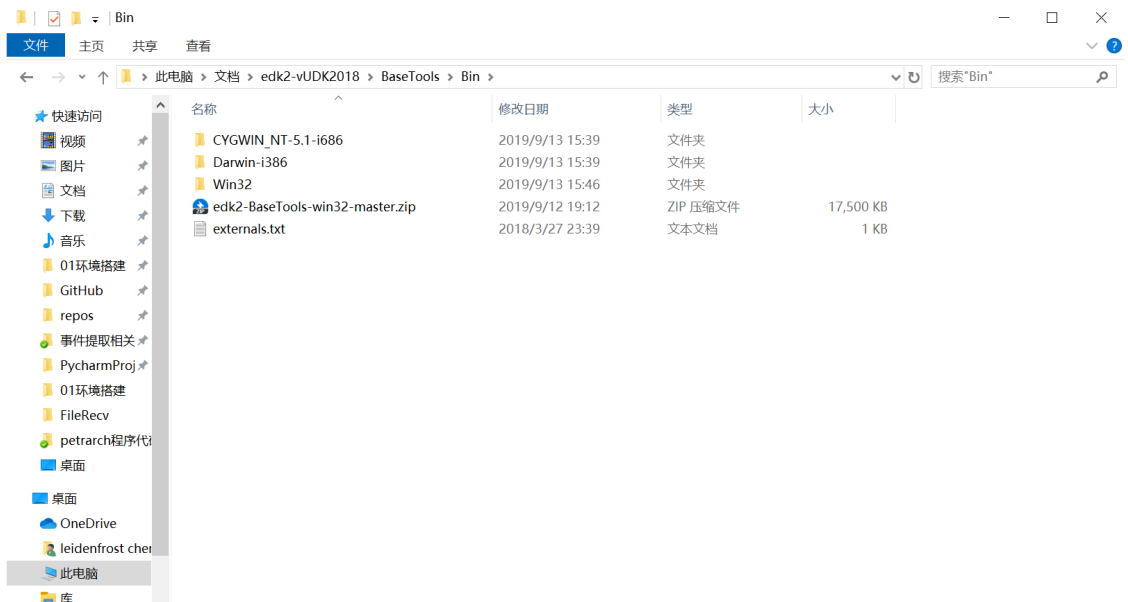
2. 生成OpenSSL 加密库

下载地址: [https://github.com/openssl/openssl/archive/OpenSSL\\_1\\_1\\_0g.zip](https://github.com/openssl/openssl/archive/OpenSSL_1_1_0g.zip)

下载文件为一个压缩包，解压完成后将解压得到的文件夹放入CryptoPkg\Library\OpensslLib，并且重命名为openssl



3. 预搭建base tools。从<https://github.com/tianocore/edk2-BaseTools-win32> 并解压到 BaseTools\Bin, 重命名为Win32



4. 运行edksetup.sh, 之后修在Conf目录下的target.txt。把TOOL\_CHAIN\_TAG 的值修改为VS2017

```
target.txt - 记事本
文件(F) 编辑(E) 格式(O) 查看(V) 帮助(H)
TARGET_ARCH      = IA32

# TOOL_DEFINITION_FILE Filename Optional Specify the name of the
filename to use for specifying
#
# the tools to use for the build. If not specified,
# WORKSPACE/Conf/tools_def.txt will be used for the
build.
TOOL_CHAIN_CONF   = Conf/tools_def.txt

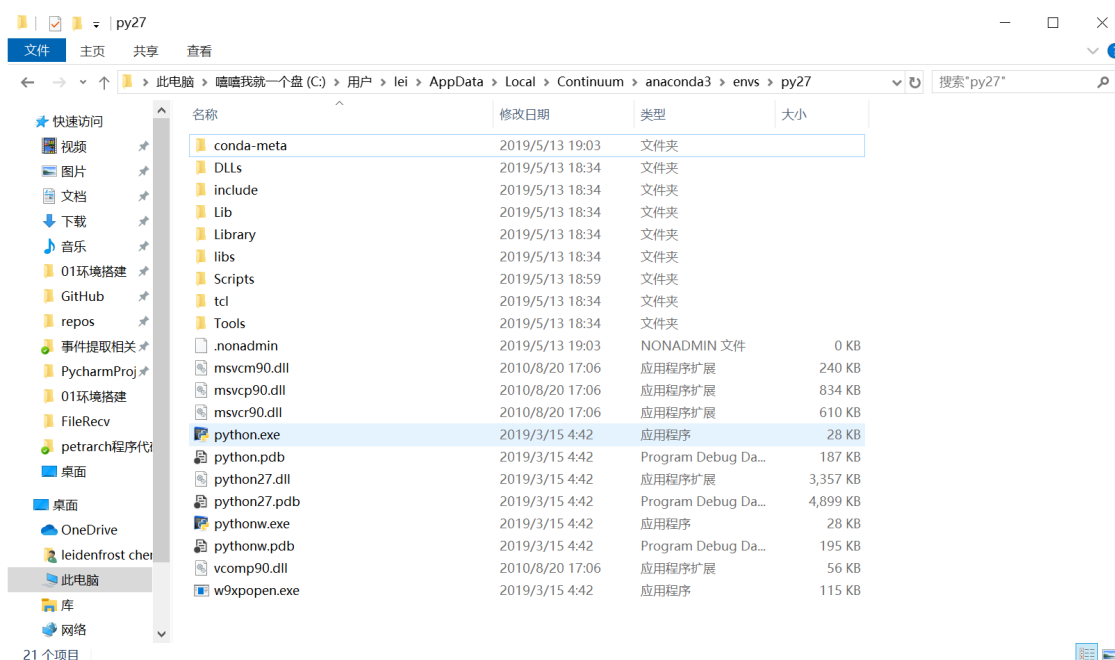
# TAGNAME          List Optional Specify the name(s) of the tools_def.txt
TagName to use.
#
# If not specified, all applicable TagName tools will be
# used for the build. The list uses space character
separation.
TOOL_CHAIN_TAG     = VS2017

# MAX_CONCURRENT_THREAD_NUMBER NUMBER Optional The number of
concurrent threads. If not specified or set
#
# to zero, tool automatically detect number of
processor

第 1 行, 第 1 列    100%    Windows (CRLF)    UTF-8
```

5. 打开VS2017控制台窗口，因为我电脑本身默认Python版本是3，所以我使用虚拟环境搭建了一个Python2.7的环境。执行命令前重新指定Python环境

```
1 | set PYTHON_HOME=C:\Users\lei\AppData\Local\Continuum\anaconda3\envs\py27
```



6. 之后依次执行 `edksetup.bat rebuild`，`edksetup.bat --nt32`，`build`，`build run`。发现如下弹窗，并在 `Build\NT32IA32\DEBUG_VS2017\IA32` 下发现文件 `helloWorld.elf` 文件即为编译成功



1. <https://github.com/tianocore/tianocore.github.io/wiki/UDK2018-How-to-Build#how-to-build-windows-system>
2. [https://blog.csdn.net/qg\\_39155263/article/details/82965744](https://blog.csdn.net/qg_39155263/article/details/82965744)