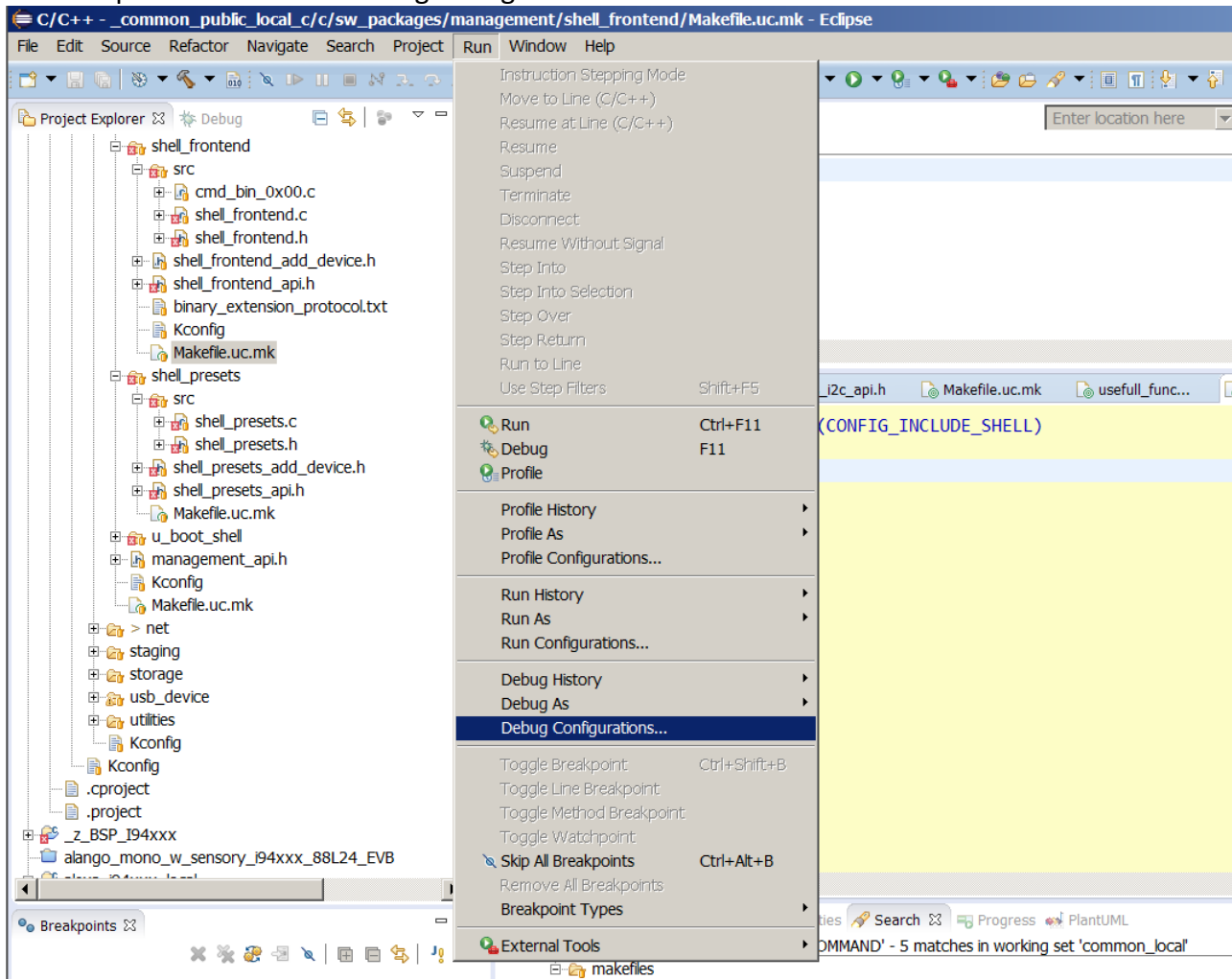
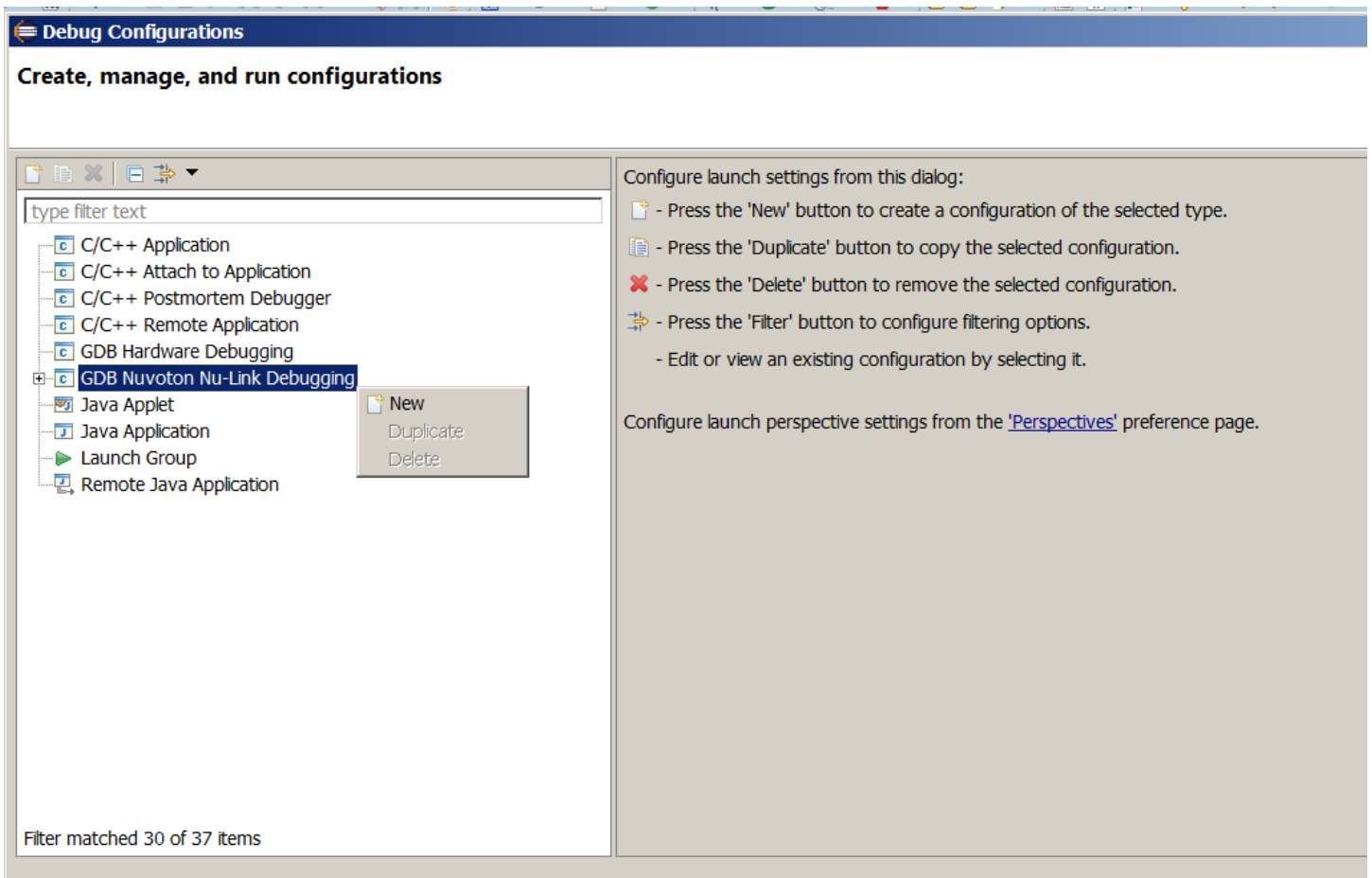


A. Creating debug configuration in NuEclipse.

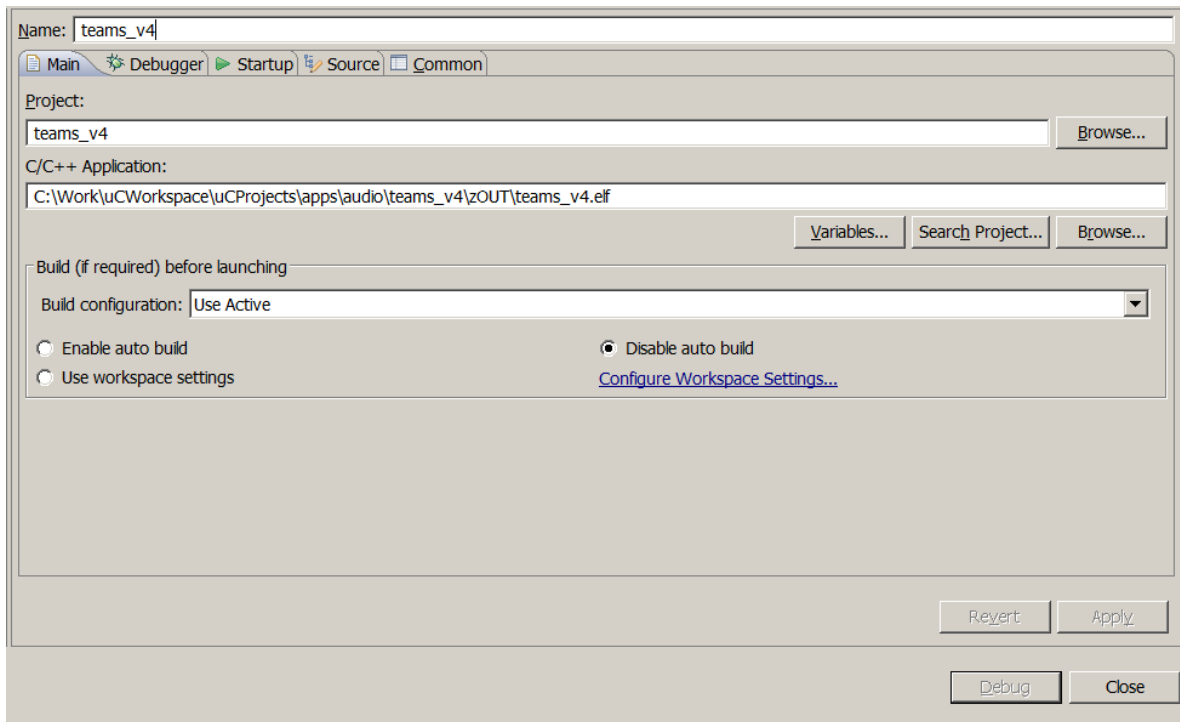
1. Go to Eclipse menu->Run->"Debug Configuration"



2. Right click on “GDB Nuvoton Nu-Link Debugging” and select ‘New’.



3. Main tab:



- i. Select some name for configuration.
- ii. In 'Project field press 'Browse...'' and select the project you want to debug.
- iii. In "C/C++ Application" put path to the output .elf file of you compilation. Usually the output located in \$(YOUR_APP)/zOUT/ folder.

4. Debugger tab:

The screenshot shows the Eclipse IDE's 'Debugger' tab configuration for a project named 'teams_v4'. The window is divided into several sections:

- OpenOCD Setup:**
 - ☒ Start OpenOCD locally
 - Executable: C:\Work\NuEclipse\V1.01.014\NuEclipse\edipse\OpenOCD\bin/\${openocd_nulink_executable} (with Browse... and Variables... buttons)
 - GDB port: 3333
 - Telnet port: 4444
 - Config options: -f ../scripts/interface/nulink.cfg -f ../scripts/target/numicroM4.cfg
 - ☒ Allocate console for OpenOCD
 - ☐ Allocate console for the telnet connection
- GDB Client Setup:**
 - Executable: C:\work\UCWorkspace\tools\windows\gcc\arm-none-eabi-4.9.3\bin\arm-none-eabi-gdb.exe (with Browse... and Variables... buttons)
 - Other options: (empty field)
 - Commands: set mem inaccessible-by-default off
- Remote Target:**
 - Host name or IP address: localhost
 - Port number: 3333
 - ☐ Force thread list update on suspend
 - [Restore defaults](#)

At the bottom right, there are buttons for 'Revert', 'Apply', 'Debug', and 'Close'.

- i. Select 'Start OpenOCD Locally'
- ii. In OpenOCD 'Executable:' make sure that path points to openocd.exe executable.
- iii. GDB port : 3333
- iv. Telnet por: 4444
- v. Config options:
select proper configuration based on your target SOC:
M4 : -f ../scripts/interface/nulink.cfg -f ../scripts/target/numicroM4.cfg
M0 : -f ../scripts/interface/nulink.cfg -f ../scripts/target/numicroM0.cfg
- vi. In GDB Client Setup
 - a. Executable: **IMPORTANT!** You have to select gdb from compiler package that you used to compile the project.
 - b. Commands: set mem inaccessible-by-default off

5. Startup tab

Name:

☒ Initial Reset Type:

☐ Enable ARM semihosting

☐ Erase chip

Chip Series:

☐ Write Config0: 0x Config1: 0x Config2: 0x Config3: 0x

Load Symbols and Executable

☒ Load symbols

☒ Use project binary:

☐ Use file:

Symbols offset (hex):

☐ Load executable to flash

☒ Use project binary:

☒ Use file:

Executable offset (hex):

☐ Load executable to SRAM

☒ Use project binary:

☐ Use file:

Executable offset (hex):

Run/Restart Commands

☐ Pre-run/Restart reset Type: (always executed at Restart)

☐ Set program counter at (hex):

☒ Set breakpoint at:

☒ Continue

- i. in Chip series:
 - For M4 – select NuMicro M4
 - For M0 – select NuMicro M0
- ii. Check 'Load Symbols and Executable' and select 'Use project binary. ...'
- iii. Un-check 'Load executable to flash'
- iv. Un-check 'Load executable to SRAM'