**ARM® Cortex®- M**

**32-bit Microcontroller**

**NuMicro® Family**

**ISP Programming Tool**

**Revision History**

*The information described in this document is the exclusive intellectual property of  
 Nuvoton Technology Corporation and shall not be reproduced without permission from Nuvoton.*

*Nuvoton is providing this document only for reference purposes of NuMicro microcontroller based system design. Nuvoton assumes no responsibility for errors or omissions.*

*All data and specifications are subject to change without notice.*

For additional information or questions, please contact: Nuvoton Technology Corporation.

[www.nuvoton.com](http://www.nuvoton.com)

### 

### Revision 3.05 (Released 2019-10-15)

1. Supported TF5100 for Motor MCU.
2. Supported M480LD for NuMicro M4 series.
3. Supported M252 for NuMicro M23 series.
4. Supported NUC1311 for NuMicro M0 series.
5. Supported M031G&I for NuMicro M0 series.
6. Modified DialogConfiguration\_I94000 CONFIG1 reserved bit to 0.
7. Added lost NUC029NAN flash information in FlashInfo.cpp.
8. Supported M261 for NuMicro M23 series.
9. Supported Nu-Link2 ISP-Bridge functionality.
10. Updated chip database version from V1.0.0.9 to V1.0.0.35 for NuVoice series.
11. Removed Visual Studio 2008 ISP project file.

The ISPTool samples repository is available on GitLab.

<https://gitlab.com/OpenNuvoton/nuvoton-tools/ISPTool>

### Revision 2.06 (Released 2019-03-13)

1. Added support for NM1230 series.
2. Added support for NUC029xGE series.
3. Added support for M031 series.
4. Added support for ML51 series.
5. Added support for NUC1261 series.
6. Added support for MS51 series.
7. Added 8051-1T series ISP sample codes.

### Revision 2.05 (Released 2018-09-05)

1. Added support for M4521 series.
2. Added M480 USBD High-Speed ISP Sample.
3. Added support for NUC2201 series.
4. Added support for NUC029xDE series.
5. Added support for NUC029xEE series.
6. Removed entry pin restriction for ISP\_USCI\_UART samples. (NM1120 and Mini57)
7. Added support for M2351 series.

### Revision 2.04 (Released 2018-03-29)

1. Added support for M480 series.
2. Fixed NUC123 external clock bring up issue.
3. Fixed Mini58 reset failed issue caused by external clock stable bit.
4. Supplied Visual Studio 2008 ISP project.
5. Updated User Configuration Options for Nano100AN, Nano103, NUC123 and M051 series.
6. Added an option to reset and run code in APROM.
7. Updated NUC100BSP and NUC200BSP to fix USBD driver Zero Flag issue.
8. Added support for NuVoice chips include I91000, I91200, I94100, ISD9100 and N575 series.
9. Added support for NM1200\_NM1100 series.

The ISPTool samples repository is available on GitHub and GITEE.

Please check the following link to get the latest update.

<https://github.com/OpenNuvoton/ISPTool>  
<https://gitee.com/OpenNuvoton/ISPTool>

### Revision 2.03 (Released 2017-06-21)

1. Updated Mini51BSP, Mini55BSP, Mini58BSP, Nano100A\_BSP, Nano100B\_BSP, Nano103BSP and NUC472\_442BSP drivers to fix known issues.
2. Added support for M0564, NUC126 and NUC121 series.
3. Added backward capability for legacy ISP firmware.
4. Added support for NUC505 IAP function in MTP mode.
5. Added an option to specify Data Flash address for 8051 1T series.
6. Fixed the USB surprise removal issue.
7. Added support for Mini57 and Nano102\_112 series.

The latest ISPTool can be found at: <https://github.com/OpenNuvoton/ISPTool>

### Revision 2.00 (Released 2016-09-01)

1. Updated all BSP versions to fix known issue.
2. Fixed bug in Data Flash programming error for all series.
3. Fixed bug in CONFIG programming for NUC472\_442 series.
4. Changed USB PID to 0x3F00.
5. Supported all M0, M4 and 8051-1T series in ISP Tool.

### Revision 1.47 (Released 2015-07-28)

1. Supported PC tool and Firmware source code in “(1) Application Program” and “(2) Nuvoton Standard ISP Code” folder.
2. Supported M0519, NM1500, NM1200, Mini58 and NUC123AE series.
3. Supported NUC505 IAP function (non-FMC type of ISP).
4. Updated NUC029xAN firmware to use internal clock.
5. Fixed the firmware bug “jumping to APROM failed when ISP time-out happened” in NUC472 and ISD9100 series.
6. Fixed the bug in ISP PC tool for incorrect NUC120LC1DN flash size.
7. Supported NUC505 I2C Master and I2C Slave ISP firmware.
8. Supported NUC029xAN UART Master ISP firmware.

### Revision 1.46 (Released 2014-11-28)

1. Supported NUC472 ISP connected via Ethernet interface.
2. Supported Mini51X, ISD9100, M45xD and M45xC series.

### Revision 1.45.1 (Released 2014-07-31)

1. Supported NUC131 and M0518 series.

### Revision 1.45 (Released 2014-06-10)

1. Added M451 Series and NUC029 support.
2. Added the form of the hardware connection for COM port or USB interface.
3. Modified description for Hardware Connection for ‘ISP through COM Port or USB’.

### Revision 1.44 (Released 2014-01-20)

1. Added Mini51BN, MINI51DE, M051CN, M051DE, NUC200, and Nano112 support.
2. Added the User Configuration form for M051AN/BN, M051CN/DE, MINI51AN, MINI51BN, MINI51DE, Nano100, Nano112, NUC100, NUC122, NUC123, and NUC200 series.
3. Updated the project file format to include APROM and Data Flash images file body, not only file path.
4. Removed “Erase Flag”, which causes Data Flash be erased. Also, updated all ISP firmware to version 2.4.
5. Provided Nano112 ISP firmware.

### Revision 1.42.1 (Released 2012-08-28)

1. Added NUC123 support.

### Revision 1.41.3 (Released 2011-11-17)

1. Modified Data Flash base address error for Nano100 and Mini51 series.

### Revision 1.41.2 (Released 2011-08-29)

1. Supported Nano100 and Mini51 series.

### Revision 1.41 (Released 2011-04-29)

1. Supported ISP project file.

### Revision 1.40 (Released 2011-03-21)

1. Updated Nuvoton Standard ISP Code to v2.3, which Integrated the ‘ISP through COM port’ and ‘ISP through USB’ function for NUC120/140/101, and improved the operation stability.
2. Added ‘Erase Flag’ for erasing control of Data Flash during ISP operation.
3. Fixed some application program bugs.

### Revision 1.32 (Released 2010-12-08)

1. Preliminary version.

**Important Notice**

**Nuvoton Products are neither intended nor warranted for usage in systems or equipment, any malfunction or failure of which may cause loss of human life, bodily injury or severe property damage. Such applications are deemed, “Insecure Usage”.**

**Insecure usage includes, but is not limited to: equipment for surgical implementation, atomic energy control instruments, airplane or spaceship instruments, the control or operation of dynamic, brake or safety systems designed for vehicular use, traffic signal instruments, all types of safety devices, and other applications intended to support or sustain life.**

**All Insecure Usage shall be made at customer’s risk, and in the event that third parties lay claims to Nuvoton as a result of customer’s Insecure Usage, customer shall indemnify the damages and liabilities thus incurred by Nuvoton.**

