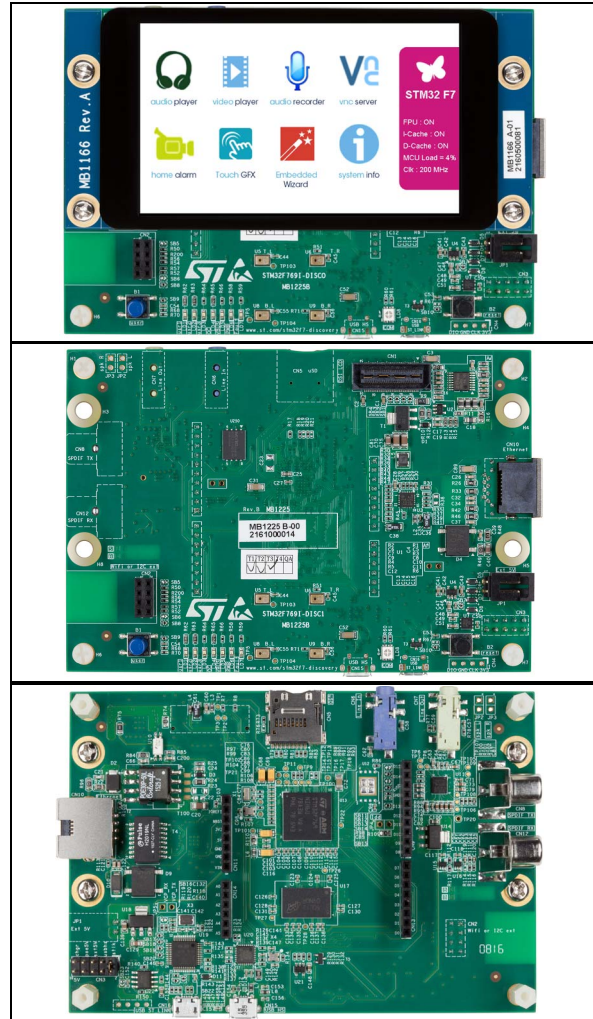


Features

- STM32F769NIH6 microcontroller featuring 2 Mbytes of Flash memory and 512+16+4 Kbytes of RAM, in BGA216 package
- On-board ST-LINK/V2-1 supporting USB reenumeration capability
- USB ST-LINK functions: virtual COM port, mass storage, debug port
- 4" capacitive touch LCD display with MIPI® DSI connector (on STM32F769I-DISCO only)
- SAI audio codec
- Two audio line jacks, one for input and one for output
- Stereo speaker outputs
- Four ST MEMS microphones on DFSDM inputs
- Two SPDIF RCA input and output connectors
- Two push-buttons (user and reset)
- 512-Mbit Quad-SPI Flash memory
- 128-Mbit SDRAM
- Connector for microSD card
- Wi-Fi or Ext-EEP daughterboard connector
- USB OTG HS with Micro-AB connector
- Ethernet connector compliant with IEEE-802.3-2002
- Five power supply options:
 - ST LINK/V2-1
 - USB HS connector
 - 5 V from RJ45 (Power Over Ethernet)
 - 5 V from Arduino™ or external connector
 - USB charger
- Power Over Ethernet based on IEEE 802.3af (Powered Device, 48 V to 5 V, 3 W)
- Power supply output for external applications: 3.3 V or 5 V
- Arduino™ Uno V3 connectors



1. Pictures are not contractual. From top to bottom: STM32F769I-DISCO top view, STM32F769I-DISCO top view, STM32F769I-DISCO and STM32F769I-DISCO1 bottom view.

- Comprehensive free software including a variety of examples, part of the STM32Cube package
- Supported by a wide choice of integrated development environments

1 Description

The STM32F7 discovery kit allows users to develop and share applications with the STM32F7 Series microcontrollers based on the ARM[®] Cortex[®]-M7 core.

The discovery kit enables a wide diversity of applications taking benefit from audio, multi- sensor support, graphics, security, video and high-speed connectivity features.

The Arduino[™] connectivity support provides unlimited expansion capabilities with a large choice of specialized add-on boards.

2 System requirements

- Windows[®] OS (XP, 7, 8) or Linux 64-bit or OS X[®]
- USB Type-A to Micro-B cable

3 Development toolchains

- Keil[®]: MDK-ARM^{™(a)}
- IAR[™]: EWARM^(a)
- GCC-based IDEs (free AC6: SW4STM32, Atollic[®] TrueSTUDIO^{®(a)}, ...)

4 Demonstration software

The demonstration software is preloaded in the STM32F769NIH6 MCU Flash memory. The latest versions of the demonstration source code and associated documentation can be downloaded from the www.st.com/stm32f7-discovery webpage.

a. On Windows only.

5 Ordering information

To order the discovery kit with the STM32F769NI MCU, refer to [Table 1](#).

Table 1. List of the order codes

Order code	Product package
STM32F769I-DISCO	with LCD display
STM32F769I-DISC1	without LCD display

6 Technology partners

MICRON:

- 128-Mbit SDRAM, part number MT48LC4M32B2

MACRONIX:

- 512-Mbit Quad-SPI NOR Flash memory device, part number MX25L51245G

7 Revision history

Table 2. Document revision history

Date	Revision	Changes
20-Apr-2016	1	Initial release.
26-Aug-2016	2	Updated the Section 5: Ordering information to introduce the STM32F769I-DISC1 order code.

IMPORTANT NOTICE – PLEASE READ CAREFULLY

STMicroelectronics NV and its subsidiaries ("ST") reserve the right to make changes, corrections, enhancements, modifications, and improvements to ST products and/or to this document at any time without notice. Purchasers should obtain the latest relevant information on ST products before placing orders. ST products are sold pursuant to ST's terms and conditions of sale in place at the time of order acknowledgement.

Purchasers are solely responsible for the choice, selection, and use of ST products and ST assumes no liability for application assistance or the design of Purchasers' products.

No license, express or implied, to any intellectual property right is granted by ST herein.

Resale of ST products with provisions different from the information set forth herein shall void any warranty granted by ST for such product.

ST and the ST logo are trademarks of ST. All other product or service names are the property of their respective owners.

Information in this document supersedes and replaces information previously supplied in any prior versions of this document.

© 2016 STMicroelectronics – All rights reserved

