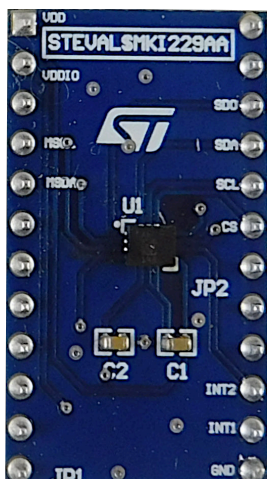


LSM6DSO16IS adapter board for a standard DIL24 socket



Features

- Complete [LSM6DSO16IS](#) pinout for a standard DIL24 socket
- Fully compatible with the [STEVAL-MKI109V3](#) motherboard
- RoHS compliant

Description

The [STEVAL-MKI229A](#) is an adapter board designed to facilitate the evaluation of the [LSM6DSO16IS](#) 6-axis IMU (inertial measurement unit) with ISPU (intelligent sensor processing unit). The board offers an effective solution for fast system prototyping and device evaluation directly within the user's own application.

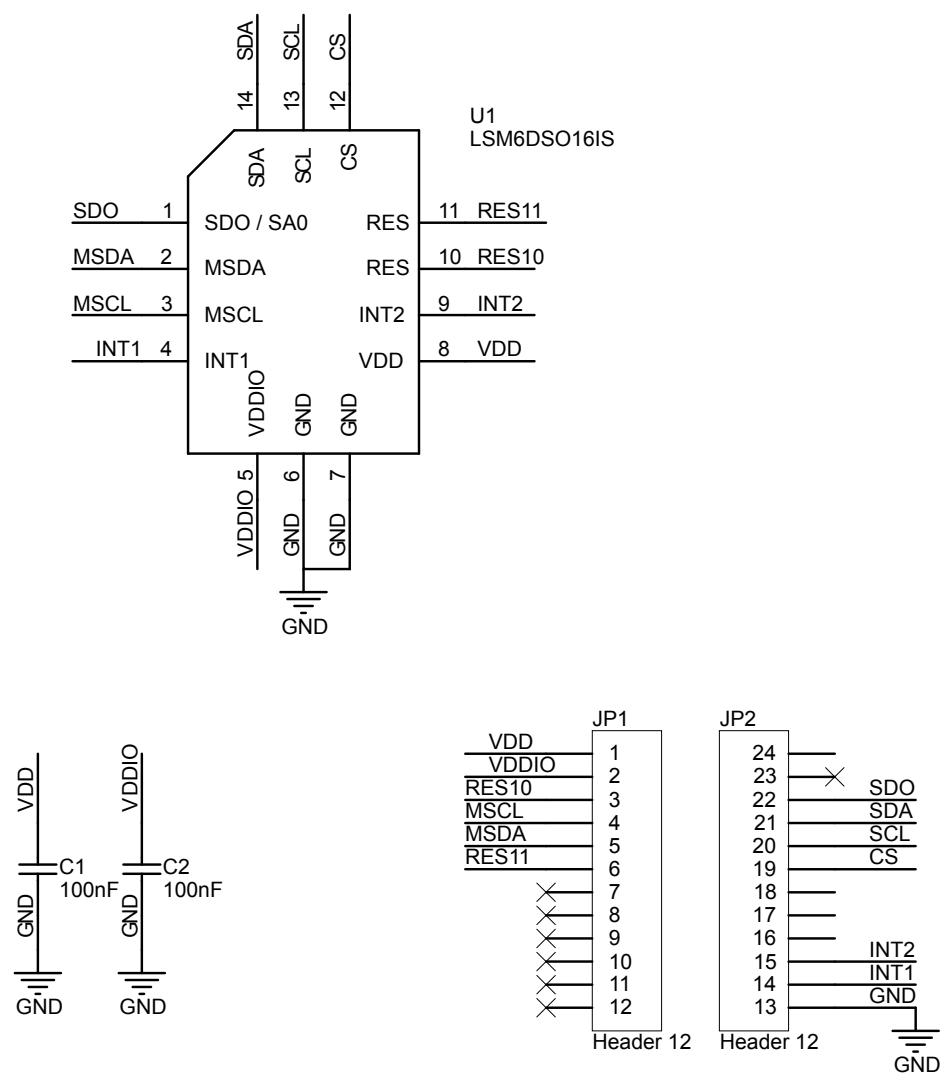
The [STEVAL-MKI229A](#) can be plugged into a standard DIL24 socket. The adapter provides the complete [LSM6DSO16IS](#) pinout and comes ready-to-use with the required decoupling capacitors on the VDD power supply line.

This adapter is supported by the [STEVAL-MKI109V3](#) motherboard, which includes a high-performance 32-bit microcontroller functioning as a bridge between the sensor and a PC, on which it is possible to use the downloadable [MEMS Studio](#) graphical user interface or dedicated software routines for customized applications.

The [STEVAL-MKI229A](#) adapter board can also be plugged into other boards like the [X-NUCLEO-IKS01A3](#) expansion board.

Product summary	
LSM6DSO16IS adapter board for a standard DIL24 socket	STEVAL-MKI229A
6-axis IMU (inertial measurement unit): always-on 3-axis accelerometer and 3-axis gyroscope with ISPU (intelligent sensor processing unit)	LSM6DSO16IS
MEMS adapter motherboard based on the STM32F401VE	STEVAL-MKI109V3
Motion MEMS and environmental sensor expansion board for STM32 Nucleo	X-NUCLEO-IKS01A3
Applications	IoT and connected devices

Figure 1. STEVAL-MKI229A circuit schematic



2 Board versions

Table 1. STEVAL-MKI229A versions

Finished good	Schematic diagrams	Bill of materials
STEVAL\$MKI229AA ⁽¹⁾	STEVAL\$MKI229AA schematic diagrams	STEVAL\$MKI229AA bill of materials

1. This code identifies the first version of the STEVAL-MKI229A evaluation board.

Revision history

Table 2. Document revision history

Date	Revision	Changes
30-Mar-2022	1	Initial release
27-Aug-2024	2	Updated Description to include MEMS Studio software solution Updated product summary table Minor textual updates

IMPORTANT NOTICE – 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 acknowledgment.

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. For additional information about ST trademarks, refer to www.st.com/trademarks. 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.

© 2024 STMicroelectronics – All rights reserved