NEW PRODUCT	DIGILENT A National Instruments Company	*Release Year* 2016	*Released Quarter* Q4
Digilent Part Number 410-330		*Category* Pmods	

OVERVIEW

Product Name: Pmod JSTK2: Two-axis Joystick

Product Subtitle: Replacement for Pmod JSTK Digilent PN:410-116

Product Description: With a two-axis joystick on a center button, a trigger button, and a programmable RGB LED capable of 24-bit color, the Digilent Pmod JSTK2 is ideally suited for embedded or digital systems that require proportional control from the user, such as robotic applications. The Pmod JSTK2 utilizes two potentiometers oriented orthogonally to one another and are manipulated by moving the joystick in the X and Y directions. As the joystick moves, the voltage output at the sweep pin of each potentiometer changes and is measured by the 10-bit ADC present on the embedded PIC16F1618 microcontroller. The raw measured data is stored at a rate of 100 Hz as a 16-bit right-justified variable in RAM with the upper 6 bits masked with zeros. We have created some fantastic 3D printed cases for the Pmod JSTK2. If you have access to a 3D printer, or 3D printing services, you can print these yourself using the links below!

- 3D print files for dual joystick
- 3D print files for single joystick

Key Search Terms: PIC16F1618, 2 axis joystick, 24-bit RGB LED

Video Link: N/A

Datasheet: https://reference.digilentinc.com/reference/pmod/pmodjstk2/reference-manual

Demo / Project Links:

Microprocessor

- *MPIDE library and demo code*
- *Arduino IDE library and example code*
- *How to Use the PmodJSTK With the WF32* - *Community Project*
- *Plug and Play Pmods Using LabVIEW* - *Community Project*

Programmable Logic

- *How to Build Your Own Claw Game Structure* - *Community Project*
- *How to Use a Joystick With an FPGA* - *Community Project*
- *Building Jousting Robots* - *Community Project*
- *Using a Joystick to Control Stepper Motors with an FPGA* - *Community Project*

Features

- Embedded PIC16F1618 microcontroller
- Factory calibrated two-axis resistive joystick
- Center joystick button
- Trigger-style pushbutton
- 24-bit RGB LED
- 6-pin Pmod connector with SPI interface
- Follows Pmod Interface Specification Type 2
- Library and example code available

Product Image

Image Links:

- https://flic.kr/p/DgB71n (Oblique)
- https://flic.kr/p/CWLhu3 (Top)
- https://flic.kr/p/Cruvv2 (Bottom)
- https://flic.kr/p/KFFT7u (With 3D printed case, case is not included)

3 Target Applications

- N/A

Related Products

- All Digilent FPGA boards
- Digilent Pro Mx7

NEW PRODUCT	DIGILENT A National Instruments Company	*Release Year* 2016	*Released Quarter* Q4
Digilent Part Number 410-330		*Category* Pmods	

PRODUCT DATA

*Dimension**	1x1x1 inches	*Weight**	0.06 lbs
Product Type	☒Digilent ☐Resell		
Packaging	ESD Bag		
Export	EAR99	*HTS Code*	8473.30.11.80
Kit Contents	☐USB Cable ☐Voucher ☐Power Supply Other: <Example>		
Certifications	☒CE ☒RoHs ☒Reach ☐Other:		

***Dimension & Weight include packaging**