


NEW PRODUCT	 A National Instruments Company	Release Year 2019	Released Quarter Q4
Digilent Part Number 410-397		Category Add On Board	

OVERVIEW

Product Name: Zmod DAC 1411: SYZYGY-compatible Dual-channel 14-bit Digital-to-Analog Converter Module

Product Subtitle: TBA

Product Description: The Zmod DAC is one of Digilent's first SYZYGY-compliant expansion modules. The SYZYGY standard offers a much higher speed/bandwidth digital interface than Pmods, but at a much smaller and lower-cost form-factor than FMC, enabling the user to configure an FPGA development board with the right I/O for their application.

Driven by the SYZYGY carrier, the Zmod DAC can generate two simultaneous signals (50Ω, ±5V, single-ended, 14-bit, 100MS/s, 40MHz+ bandwidth). The analog outputs can be connected to a circuit using SMA cables.

When coupled to a base board using SYZYGY expansion, like the Eclipse Z7 or Genesys ZU, the combination will serve as a powerful prototyping platform for instrumentation, high-speed control, and SDR products. By utilizing these expansion capabilities, users can spend more time on the analytical and system-level aspects of the solution rather than having to focus on the component-level interactions of the devices.

Key Search Terms: Syzygy, high speed, Analog, Digital, Analog Devices, DAC, Zmods, Zynq, Ultrascale+, MPSoC, SDR Software-Defined Radio, Instrumentation, Radio Frequency, RF

Video Link: TBA

Datasheet: TBA

Demo / Project Links: TBA

Features

- Channels: 2
- Channel type: single ended
- Resolution: 14-bit
- Absolute Resolution (amplitude ≤1.25V): 167μV
- Absolute Resolution (amplitude >1.25V): 665μV
- Output impedance: 50Ω
- Sample rate (real time): 100MS/s.
- AC amplitude (max): ±5 V.
- Analog bandwidth: 40 MHz @ 3dB, 20 MHz @ 0.5dB, 14 MHz @ 0.1dB
- Slew rate (2V step): 180V/μs

Target Applications

- TBA

Product Image



Image Links:

- <https://flic.kr/p/2hwWTDh> (Oblique)
- <https://flic.kr/p/2hwU9qj> (Top)

Related Products

- Eclipse Z7 (410-393)
- Genesys ZU