EmuCore

FPGA Reservoir Computer

Summary

QCi's first reservoir computing product is an edge device that is photonic-inspired, FPGA-based, and optimized for recurrent neural network applications. This device can be applied to solve a variety of problems related to serial data structures, including time series prediction, image recognition, and text classification. It's fast, affordable, energy-efficient – and brings the power of a standalone edge computing solution to your desktop.

Specifications

Dimensions	170 mm x 90 mm x 55 mm
Weight	0.6 kg
Power Requirements	USB-C input power control with 45W power adaptor
Typical Power Consumption	10W
Operating Temperature	0°C to 70°C
Data Interface	10/100/1000 wired ethernet
Transient Response Rate	10M nodes/sec
Number of Internal Nodes	up to 8,192 internal nodes