

SHARK

# POWER METERING IP PLATFORM

## What is Shark?

Designed to deliver precise energy measurement, Dolphin Semiconductor's Shark platform is tailored to ensure compliancy with Class 0.2 s standards for accurate billing.

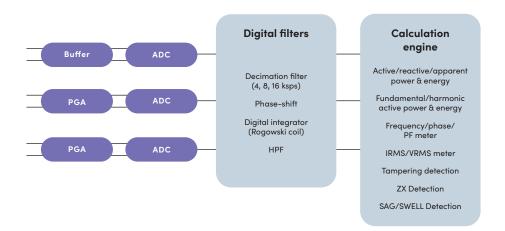
Its highly accurate analog front-end (AFE) reduces errors in power calculations, making it suitable for both single-phase (residential) and three-phase (industrial) applications.

By supporting both configurations within a single IP, it simplifies design processes, accelerates development timelines, and enhances flexibility, allowing scalability across various power metering solutions while minimizing costs and complexity.

#### **APPLICATIONS**

- > Single-phase meter
- > Three-phase meter

## ONE FITS ALL



### **MAIN BENEFITS**

Low noise at low frequency

Low offset

Very low gain error < 0.05% (for class 0,1)

Integrated power computation algorithms

Pin and BOM cost reduction

Synchronized channels and phase shifting calibration

## **KEY FEATURES**

22-24 bit  $\Delta\Sigma$  ADC

Only 1mm<sup>2</sup> total IP footprint

Built-in Power Energy Computer (PCE)

Programmable data rate up to 32 ksps

Exceeds IEC 62053-22 Classes 0.2 s requirements

Chopper stabilized PGA

Input DC blocking capacitor free



