PFS ///

PFS Automotive & Ergonomic Metrology

PFS-3AX Configuration Request Brief

Revision 1 · 2 November 2026 · inquiry@pedalforcesensor.com

> **Planning targets, not a released manufacturing datasheet.** No validated performance, stock, certification or approved interchangeability is established by this document.

3-Axis Pedal & Bicycle Force Sensors

Separate vertical pedal force from fore-aft and lateral components for cockpit ergonomics and laboratory bicycle pedal-force analysis.

Request code	Nominal selection	Architecture
PFS-3AX-BIKE	Fz 1,000–2,000 N; Fx / Fy ±500 N	Fx / Fy / Fz; Three-axis configuration
PFS-3AX-RUDDER	Fz 1,000–2,000 N; Fx / Fy ±500 N	Fx / Fy / Fz; Three-axis configuration
PFS-2AX-PEDAL	Fz 1,000 N; Fy ±500 N	Fy / Fz; Two-axis configuration

Envelope and mounting request

Request Fz 1–2 kN and Fx / Fy ±500 N, or the two-axis Fy / Fz variant. Confirm simultaneous combined loads.

BIKE requests a pedal / crank adapter; RUDDER requests a cockpit fixture. Neither interface is established by a component photograph.

Signal chain and acceptance evidence

Independent bridge channels with synchronized acquisition, axis signs and a cross-axis calibration matrix.

Record the coordinate origin, transformation to the application frame, combined-load envelope and cross-talk uncertainty.

Include with the RFQ

1. Define coordinate axes, sign convention and combined force limits.
2. Request a cross-axis calibration matrix and synchronised acquisition.
3. For bicycle power, provide crank angle and cadence measurement separately.
4. Connector gender / key / pin view, cable length, supply, output and receiving instrument.
5. Quantity, destination, target delivery, drawing revision and calibration requirements.

Documents to obtain before design release

Approved dimensioned PFS drawing / STEP, pin schedule, configured signal map, serial-specific calibration and agreed acceptance evidence are not included here. Request them for the exact configuration at inquiry@pedalforcesensor.com.
