



Data Sheet

Dual Axis Fingertip Joystick JS2000



Mobile Machine Management

The JS2000 dual axis fingertip joystick is an element of the flexible, powerful, expandable, and affordable joystick family of mobile machine management products.

The JS2000 has been specially designed to provide two and three axis proportional control in a compact package that meets the harsh operating requirements of today's mobile machine market.

Ergonomic and Precise Operation

Developed for applications where ergonomics and precise proportional control are required, the JS2000's compact design provides smooth fingertip control with low operating forces that minimize repetitive stresses and operator fatigue.

Compact Design

The compact design of the JS2000 is ideal for mounting in low clearance locations such as seating armrests and chest packs.

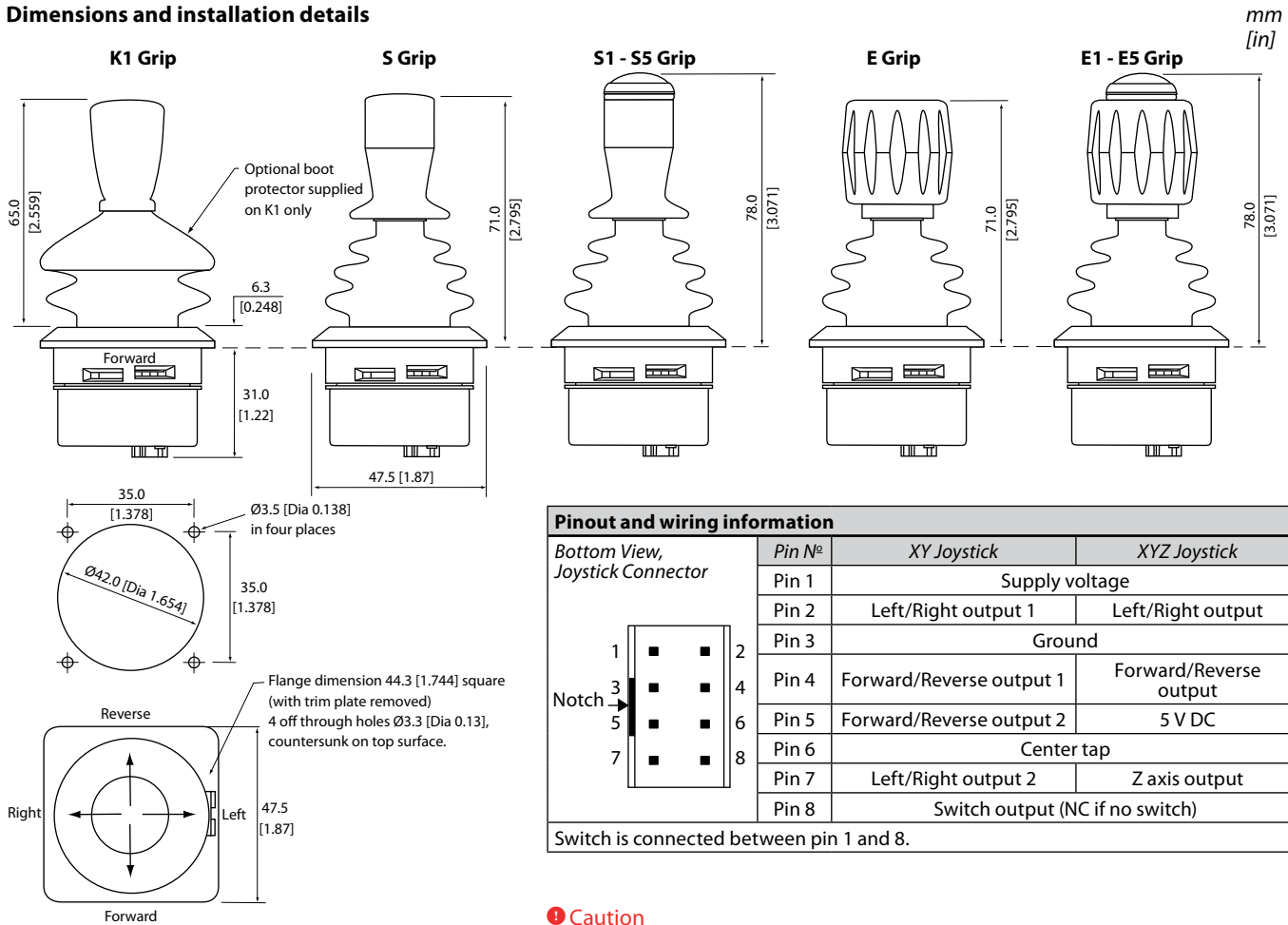
Reliability

In applications where safety and long maintenance free life is required, the contactless and redundant Hall Effect sensing design provides security and reliability in an easy to operate device.

Features and options:

- Contactless hall effect sensing
- Redundant sensors
- Single or dual axis
- Multiple gate options
- Spring return to center
- Compact size
- Low operating forces
- Easy installation
- Operating life > 15 million cycles
- Output: 10 to 90% Vs
- IP 65 environmental sealing above panel
- CE approved
- Multiple grip options, including Z-axis twist

Dimensions and installation details



Pinout and wiring information			
Bottom View, Joystick Connector	Pin №	XY Joystick	XYZ Joystick
	Pin 1	Supply voltage	
	Pin 2	Left/Right output 1	Left/Right output
	Pin 3	Ground	
	Pin 4	Forward/Reverse output 1	Forward/Reverse output
	Pin 5	Forward/Reverse output 2	5 V DC
	Pin 6	Center tap	
	Pin 7	Left/Right output 2	Z axis output
	Pin 8	Switch output (NC if no switch)	

Switch is connected between pin 1 and 8.

Caution
Red lead on mating connector ribbon cable is assigned to pin 8.

P005 229E Panel mounting detail

Specifications

Electrical characteristics	
Sensor type	Hall effect
Resolution	Infinite
Supply voltage (Vs)	5 ± 0.5 V DC regulated
Output voltage	10 to 90% nominal of Vs
Current consumption	17.5 mA nominal

Mechanical characteristics	
Lever mechanical angle	20° forward/reverse (single axis only)
Lever operating force	2 N [0.45 lbf] nominal (full deflection)
XY axes expected life	15 million cycles
Z axis	5 million cycles
Weight (without grip)	0.090 kg [0.198 lb]

Environmental parameters	
Operating temperature	-25 °C to 70 °C [-77 °F to 158 °F]
Storage temperature	-40 °C to 70 °C [-104 °F to 158 °F]
Protection	IP 65 BS EN 60529

Mating connector assemblies	
Type	Danfoss ordering number
Connector with 400 mm [15.75 in] ribbon cable	10102031

See Danfoss publication *JS2000 Dual Axis Fingertip Joystick, Technical Information* for more information. Danfoss product literature is online at www.danfoss.com.

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