

NexBot Drives 631-002 Pressure Safety Mat

NexBot
Robotics

SKU: NXB-GEN-631-002 | Category: Safety Systems > Safety Mats & Bumpers > Pressure Safety Mats

Overview

The NexBot Drives 631-002 is a robust, pressure-sensitive safety mat designed to detect the presence of personnel within a hazardous area, triggering an immediate stop command to robotic systems. This mat serves as a critical component in a comprehensive safety system, safeguarding operators and technicians who may need to enter a robot's work envelope during production, maintenance, or setup. Constructed from a high-durability, anti-slip polyurethane material, the 631-002 is engineered to withstand the rigors of industrial settings, including exposure to common coolants, oils, and foot traffic. Its key benefit lies in its reliable and immediate response. When a specified weight, such as an operator's footstep, is detected, the internal switching elements change state, sending a signal to the machine's safety circuit. The mat's IP67 rating ensures dependable performance even in environments with dust and liquid spray, a significant advantage over lower-rated alternatives that can fail prematurely. This level of protection minimizes downtime and maintenance associated with component failure. Common applications include placement at the entry points of robotic welding cells, machine tending stations, and automated palletizing or packaging lines. The mat provides a defined safety zone that is simple for personnel to understand. With dimensions of 1200 x 800 mm, it covers a standard access point effectively. Installation is straightforward, connecting to a safety monitoring unit via a standard 4-wire M12 connection. Multiple mats can be interconnected to create larger or more complex protected zones, offering scalable safety solutions for diverse floor layouts. Regular inspection for physical damage is recommended to ensure continued safety compliance and operational integrity.

Technical Specifications

Parameter	Value	Unit
Weight	15.5	kg
Material	Polyurethane	
Voltage	24VDC	
IP Rating	IP67	

Parameter	Value	Unit
Country of Origin	CH	
Dimensions	1200 x 800 x 15 mm	

Safety Notice: This product must be installed and operated by qualified personnel in accordance with applicable safety standards (ISO 10218, IEC 61508).