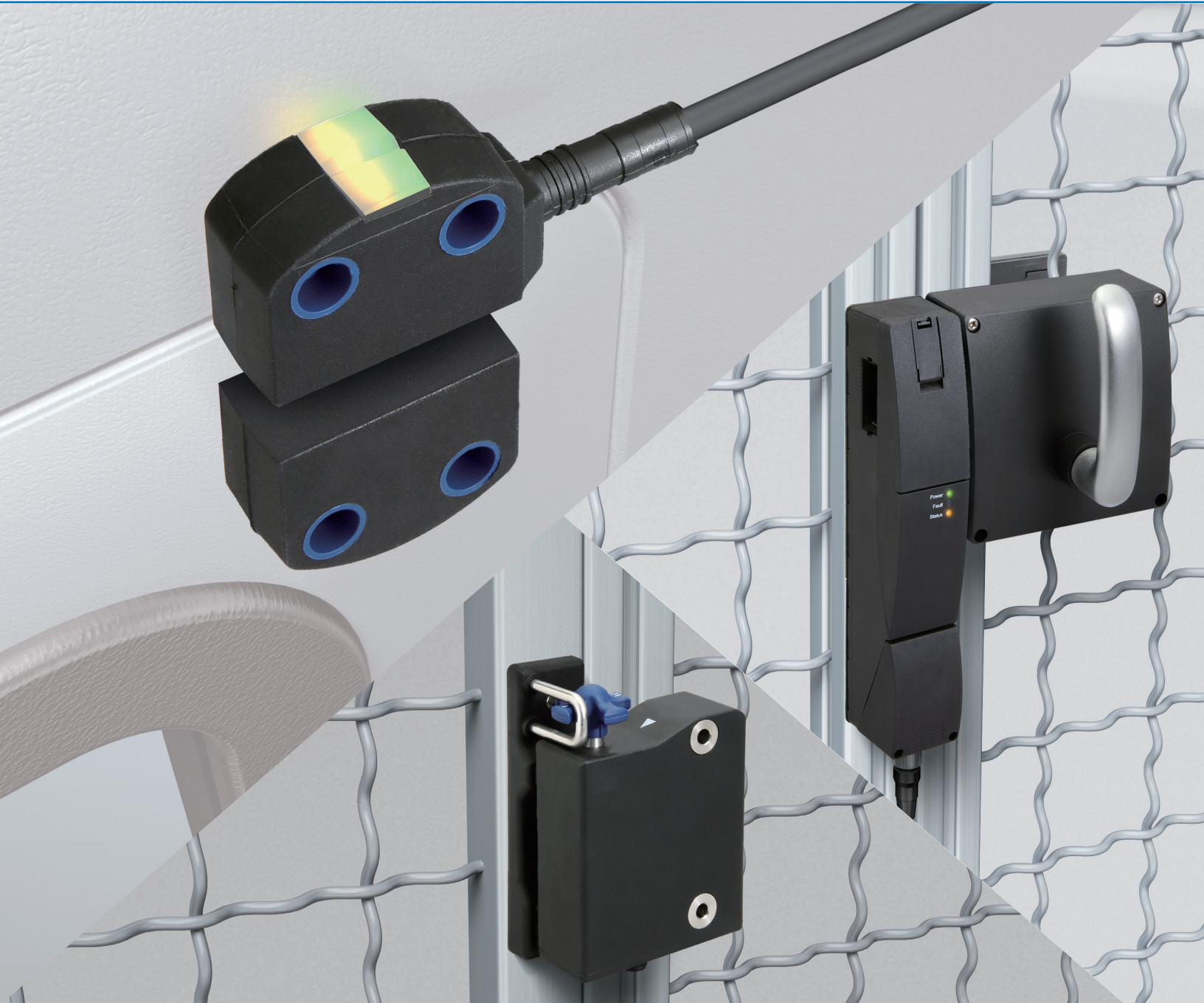


# D41 Series

High-Coded Safety Door Switch



Reduce risk of bypassing with cost-effective, versatile and easy-to-use safety door switches

# Prevent accidents on the factory floor

Preventing safety system defeat is one of the most pressing challenges on the factory floor. Many accidents can be traced back to the unauthorized manipulation of safety door switches that are meant to restrict access to hazardous areas like robotic cells and packaging line.

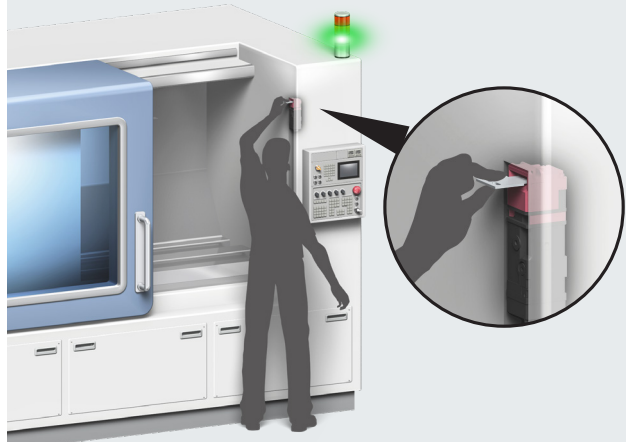
To reduce accident rates, many countries are adopting the ISO 14119 standard and following its principles for the design and selection of interlocking devices.

## Minimize the bypassing of interlocking devices

A typical way to bypass an interlocking devices is to release the lock with a spare actuator. This exposes the operator to hazardous areas and dramatically increases the probability of an accident. ISO 14119 discusses best practices for preventing defeat when selecting and installing a safety door switch.

Defeatable

The machine is running even if the movable guard is opened.



**Possible impacts of an accident**

Improper operation without following the procedure can lead to accidents. This may result in compensation for the injured personnel, disruption of the production plan, or economic loss due to production shutdown.

**More serious risk of business continuity**

If an industrial accident occurs, the governmental authorities may order the company to suspend operation, or to change the use of the machinery.



Defeat prevention

The machine is stopped when the movable guard is opened.



**Protection against tampering**

Reliable safety solutions reduce bypassing practicing and motivate operators to follow production and maintenance procedures on the factory floor. Having more reliable safety solutions makes the production environment safer, improves safety management, and contributes to reducing accident rates.

**Compliance with laws and regulations**

Compliance with ISO 14119 (to which local safety standards in each country conform) serves as evidence of due diligence and is often used as part of the validation and verification process.

# Reduce defeating risk by using high-coded devices

The Omron D41 Series high-coded safety door switch reduces risk of defeat and improves cost of ownership thanks to its ease of use and simplified troubleshooting. A high-coded safety switch, as defined by EN ISO14119, is one where a sensor is paired with a high-level coded actuator for which more than 1,000 variations are available.

D41 Series according to ISO 14119 facilitates standard compliant design

## Non-Contact D41D

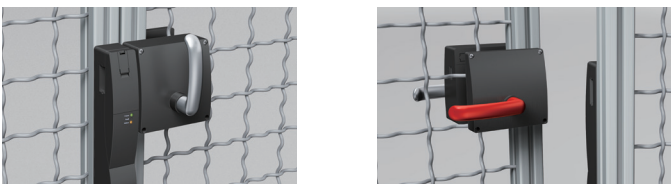
- The compact design fits into tight spaces inside machines and does not hinder entry through openings. D41D matches with machine design while providing flexible installation options.
- Quick and automatic pairing of all series-connected switches can be done at once, reducing the design efforts and commissioning time.



Actuators fit in narrow spaces inside machines.

## Guard Lock (for Gate) D41G

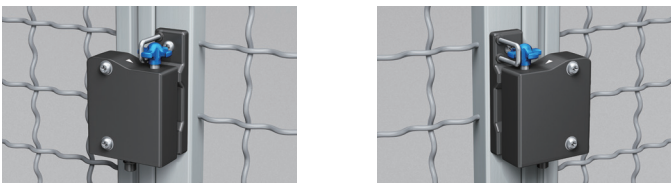
- The safety door switch with an integrated door handle offers an ergonomic actuator and reduce design efforts of a guard.
- Available with an optional emergency exit that can be activated from inside a hazardous area, allowing people to escape even during a power failure.



Actuators for right hinged doors and actuators for left hinged doors are available.

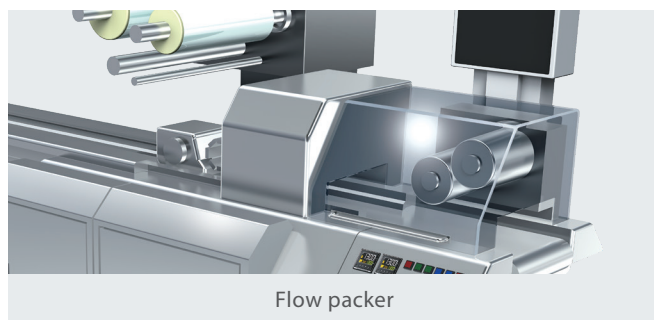
## Guard Lock D41L

- The unique design of the D41L prevents accumulation of water, dust and food within the device and supports ECOLAB-certified detergent resistance for quick cleaning.
- High tolerance to door misalignment



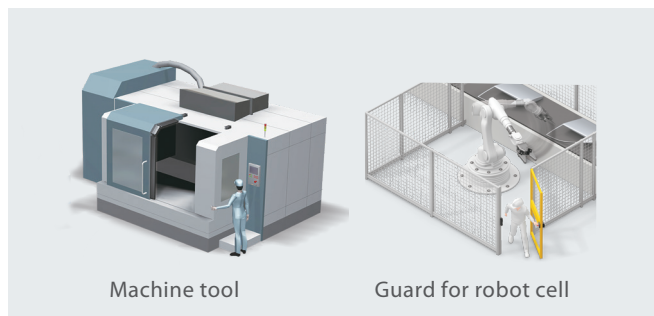
Identical mounting for left and right hinged doors.

### Small machine with small opening



Flow packer

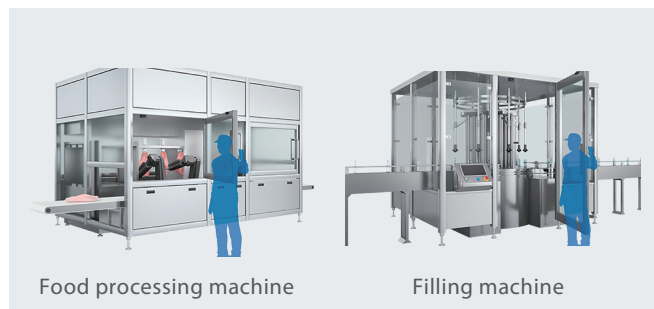
### Machinery with partial or full-body access



Machine tool

Guard for robot cell

### Food machinery



Food processing machine

Filling machine



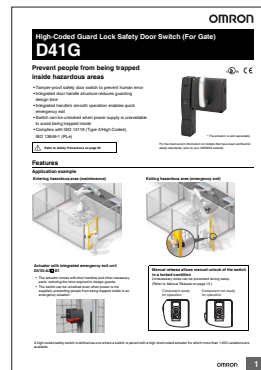
# High-Coded Safety Door Switch Datasheets



Non-Contact D41D



Guard Lock D41L



Guard Lock (for Gate) D41G

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