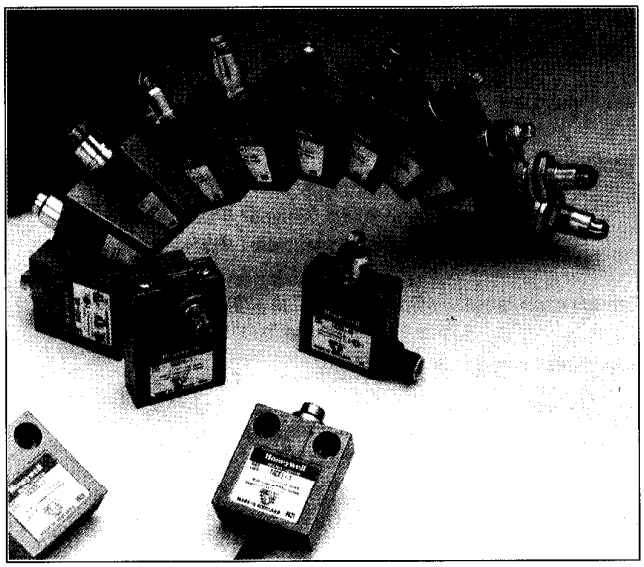
# 14CE/914CE Series (Miniature Limit Switch)

CE

## Features

- Compact construction
- Pre-wired or connector versions
- Die-cast Zinc housing
- Wide selection of actuators
- Gang mounting capability
- Cable length variations
- Side and bottom exit cable/connector
- Simple two-screw mounting
- Low temperature variants
- Fluorocarbon (FC) Sealing option
- IP65/66/67



## Benefits

- Suitable for applications where space is at a premium
- Fast and easy to install
- Suitable for difficult operating environments
- Application flexibility
- Multiple switching in small spaces
- Enhanced choice for application
- Suitable for aggressive environments

## Description

The entire range of 14CE and 914CE has been approved to meet the requirements of the Low Voltage directive and is therefore CE marked.

The 914CE is primarily intended for use in territories which expect UL and CSA listing and incorporates cable and construction per file number E41859 and LR15775 respectively. The main difference between the 914CE and the 14CE is that cable is measured in feet on the 914CE and in metres on 14CE.

The connectorised range of switches has proved to be extremely popular as a rapid replace option, particularly in applications where the cable run could be long and difficult to access and replace in application.

CE switches have different degrees of protection from IP65 to IP67 for the fully booted head styles. The option of fluorocarbon (FC) seals is available to customers who will apply the switches in harsh environments such as cutting fluid applications where fluorocarbon (fc) offers superior resistance to the harmful degrading effects of such fluids. Some of our most demanding OEMs have been successfully using these constructions in machinery for many years - a true test of the original design and the incorporation of fluorocarbon (FC) seals at critical points in the drive train. The cable entry is fully potted using a special compound to ensure that ingress is virtually impossible.

These miniature limit switches have served industry very well over several decades and are still one of the best switches on the market today.

## Smart Distributed System Version

Certain 14CE listings are now available for connection to a Smart Distributed System machine control network through an interface containing the Smart Distributed System communication circuitry. This offers more device level diagnostics, allowing monitoring of critical operations and the prevention of problems.

The Smart Distributed System is an intelligent CAN bus based control network, open at the device and controller level, optimised for discrete machine control on the factory floor. It also offers PC based control that builds on the intelligence embedded in switches and sensors. For more information please contact your nearest Honeywell sales office.

# 14CE Series Miniature Enclosed Switch

## Technical Data

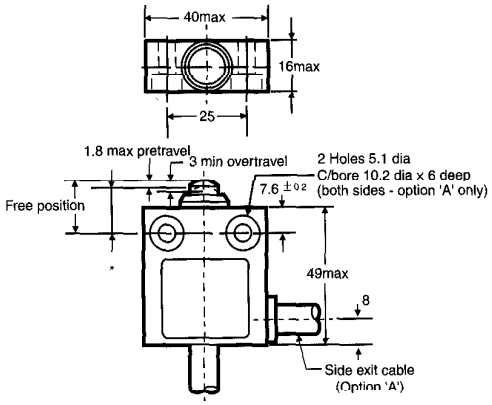
**Mechanical life** Up to 10 million operations.

**Degree of protection** 14CE type
Standard type IP65
With option 'K' type IP66
With boot seal type IP67

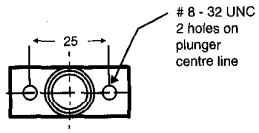
**Temperature range** Operating: 0°C to +70°C (32°F to 160°F)

**Approvals / standards** IEC 947-5-1
EN60947-5-1
AC14 D300
DC13 R300

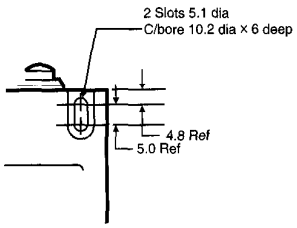
**Electrical** According to IEC 947-5-1
Rated insulation voltage Ui=250V
Rated inpulse withstand voltage
Uimp=1.5kV
Not suitable for insulation
SCPD, Quick blow fuse to IEC 127
suitable for rated current




Top Mounting
(Option P)



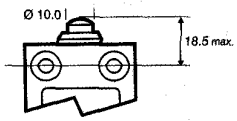

Elongated Mounting Holes
(Option B)




**Cable Type**

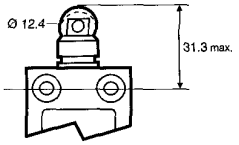
14CE type: 4 x 0.75 mm² harmonised CENELEC

## Actuator Types



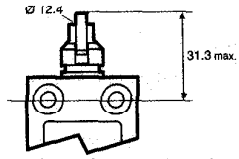

**1**

**Pin Plunger**




**2**

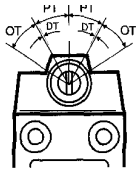
**Roller Plunger (Parallel)**




**3**

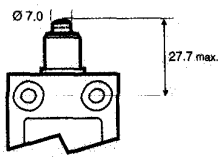
**Roller Plunger (Perpendicular)**

See Note 1



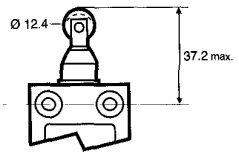

**16**

**Rotary action / lever**



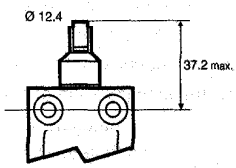

**18**

**Pin Plunger (Boot Sealed)**




**31**

**Roller Plunger Parallel (Boot Sealed)**




**55**

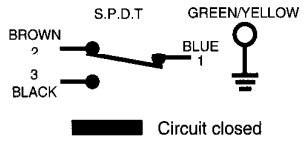
**Roller Plunger Perpendicular (Boot Sealed)**

## Ordering Guide:

**14 CE** **XX**

**Example :** 14CE1-3AK

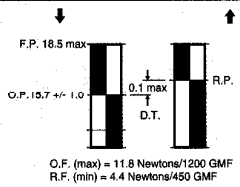
## Snap Action Contact




## Cable/Connector

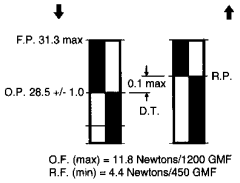
## Additional Options/ Codes

**1**



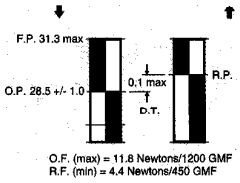

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**2**



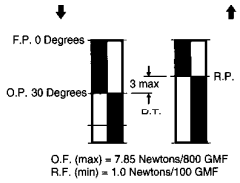

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**3**



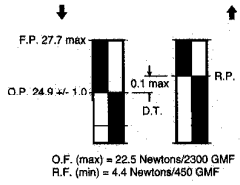

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**16**



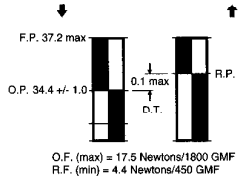

O.F. (max) = 7.85 Newtons/800 GMF
R.F. (min) = 1.0 Newtons/100 GMF

**18**



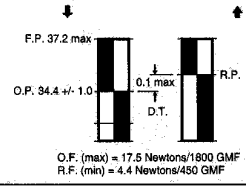

O.F. (max) = 22.5 Newtons/2300 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**31**




O.F. (max) = 17.5 Newtons/1800 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**55**



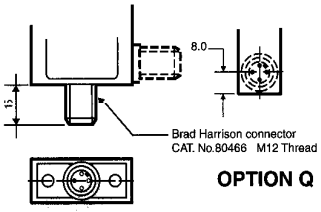

O.F. (max) = 17.5 Newtons/1800 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**Specify cable length in 1 metre increments e.g. 1 = 1 metre, 2 = 2 metre, etc. Maximum cable length available is 4 metres**

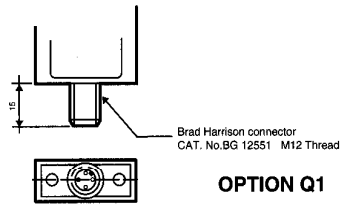
**Cable Standard:**
**4 Core PVC sheathed, colour of sheath: Black**

**Cable Option: 4 Core Silicone sheathed, colour of sheath: Brown (option code L)**

**If option codes Q or Q1 are selected then omit the cable length code.**

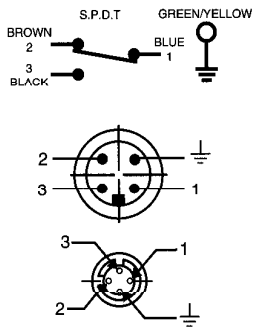



**OPTION Q**




**OPTION Q1**

CIRCUIT DIAGRAM




**A : Side Exit Cable or Connector.**
**B : Elongated Mounting Holes.**
**D : Halogen Free Cable.**
**G : Gold Contact Basic.**
**H : High Temperature (0°C to +120°C).**
**K : 'O' Ring Sealed Plunger.**
① When selecting this option it should be noted that this will increase the O.F. to 22.5 Newtons / 2300 GMF.
**L : Low Temperature (-40°C to +70°C).**
**L1 : Low Temperature as 'L' except:- cable not suitable for flexing.**
**Q : Brad Harrison Connector. M12 Micro DC type 4 pin.**
**Q1 : Brad Harrison Connector. M12 Micro AC type 4 pin.**
**V : Fluorocarbon (FC) Seal Material.**
**P : Top Mounting Holes.**

**Note:**
**Multiple selection of code options is allowed. However, all coding permutations are not available or permissible. When using multiple codes, arrange them in alphabetical order. e.g. 14CE1-3AK.**

**Note 1:**
**Levers sold separately. See page 46 (Auxiliary actuators)**

**X**

**XX**

# 914CE Series
# Miniature Enclosed Switch

## Technical Data

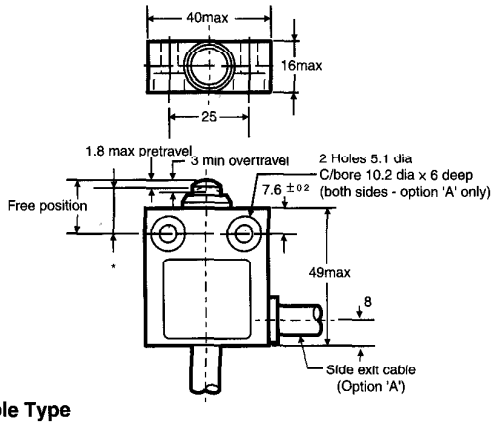
**Mechanical life** Up to 10 million operations.

**Degree of protection** 914CE
Standard type IP65
With option 'K' type IP66
With boot seal type IP67

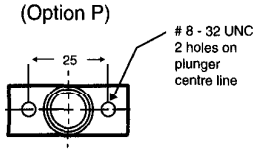
**Temperature range**
Operating:
0°C to +105°C
(32°F to 221°F)

**Approvals / standards**
IEC947-5-1
EN60947-5-1
AC14 D300
DC13 R300
UL recognised, file E41859
CSA Certified, file LR15775

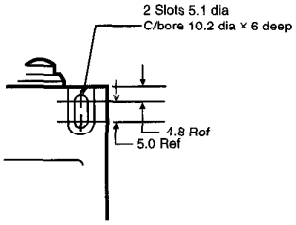
**Electrical** According to IEC 947-5-1.
Rated insulation voltage Ui = 250V.
Rated impulse withstand voltage Uimp = 1.5kV.
Not suitable for isolation.
SCPD, Quick blow fuse to IEC 127
suitable for rated current.




*Top Mounting*
(Option P)

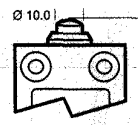



Elongated Mounting Holes
(Option B)

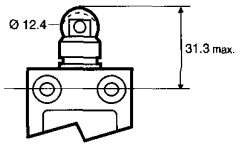



**Cable Type**
914CE type: 4 x 0.75 mm² SJTO (UL Approved)

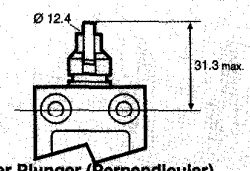
## Actuator Types



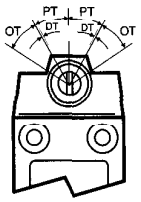

**1**
**Pin Plunger**




**2**
**Roller Plunger (Parallel)**

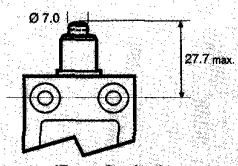



**3**
**Roller Plunger (Perpendicular)**

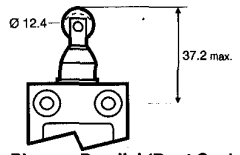



See Note 1

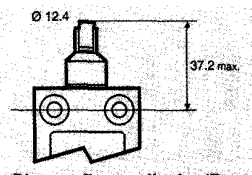
**16**
**Rotary action / lever**




**18**
**Pin Plunger (Boot Sealed)**




**31**
**Roller Plunger Parallel (Boot Sealed)**




**55**
**Roller Plunger Perpendicular (Boot Sealed)**

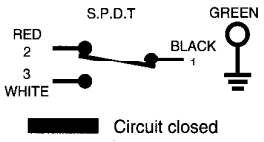
## Ordering Guide:

**914 CE** **XX**



**Example :** 914CE1-3AK

## Snap Action Contact

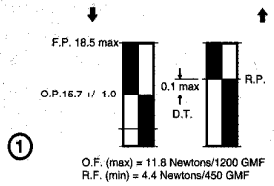



Circuit closed

## Cable/Connector

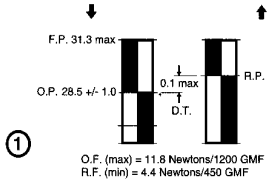
## Additional Option Codes

**1**



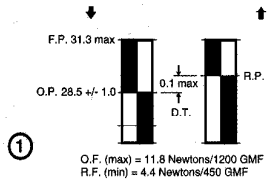

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**2**



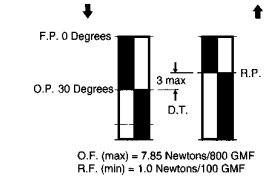

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**3**



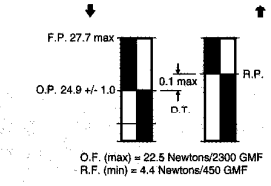

① O.F. (max) = 11.8 Newtons/1200 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**16**



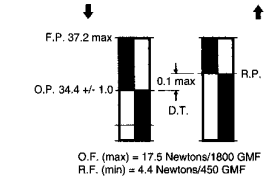

O.F. (max) = 7.85 Newtons/800 GMF
R.F. (min) = 1.0 Newtons/100 GMF

**18**



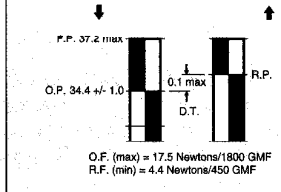

O.F. (max) = 22.5 Newtons/2300 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**31**




O.F. (max) = 17.5 Newtons/1800 GMF
R.F. (min) = 4.4 Newtons/450 GMF

**55**




O.F. (max) = 17.5 Newtons/1800 GMF
R.F. (min) = 4.4 Newtons/450 GMF

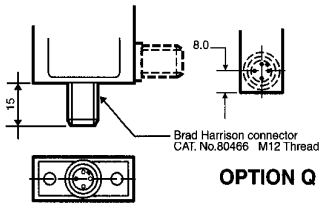
**Specify cable lengths in 3 feet increments**

**eg. 3=3 feet, 6=6 feet, etc. Maximum cable length is 12 feet.**

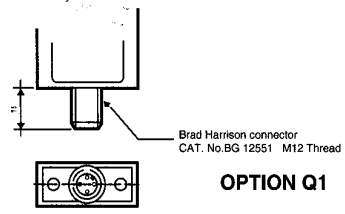
**Cable Standard:**

**SJTO 4 Core PVC sheathed, colour of sheath: Grey**

**If option codes Q or Q1 are selected then omit the cable length code.**

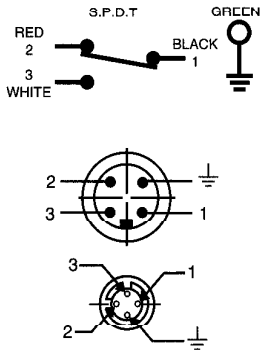



**OPTION Q**




**OPTION Q1**

CIRCUIT DIAGRAM




**A : Side Exit Cable or Connector.**

**B : Elongated Mounting Holes.**

**G : Gold Contact Basic.**

**K : 'O' Ring Sealed Plunger.**

① When selecting this option it should be noted that this will increase the O.F. to 22.5 Newtons / 2300 GMF.

**L1 : Low Temperature as 'L' except:- cable not suitable for flexing.**

**Q : Brad Harrison Connector. M12 Micro DC type 4 pin.**

**Q1 : Brad Harrison Connector. M12 Micro AC type 4 pin.**

**V : Fluorocarbon (FC) Seal Material.**

**P : Top Mounting Holes.**

**Note:**
**Multiple selection of code options is allowed. However, all coding permutations are not available or permissible. When using multiple codes, arrange them in alphabetical order. e.g. 914CE1-3AK.**

**Note 1:**
**Levers sold separately. See page 46 (Auxiliary actuators)**

**X** or **XX** **XX**