# Honeywell Sensing and Control



# 11SM1-T2



Actual product appearance may vary.

SM Series Subminiature Basic Switch, Single Pole Double Throw (SPDT), 250 Vac, 5 A, Pin Plunger Actuator, Solder Termination

#### Features

- Long operating life
  Elongated mounting hole for easier, more accurate mounting

• Choice of actuation (plunger, as well as a variety of integral and auxiliary actuators)

• Choice of electrical termination (solder, quick connect, PCB)

• Choice of operating characteristics (sensitive differential travel as low as 0,0254 mm [0.001 in] maximum, low operating force to 0,56 N [2.0 oz] maximum)

• Optional series constructions available (gold contacts for low energy switching, bifurcated gold contacts for maximum reliability, power load switching capability to 11 A)

• MIL-PFR-8805 qualified listings available

### Description

MICRO SWITCH<sup>™</sup> SM Series subminiature basic switches are used for simple or precision on/off application needs. The MICRO SWITCH<sup>™</sup> SM Series switches are slightly larger than the MICRO SWITCH<sup>™</sup> SX Series switches. These switches combine small size and light weight with ample electrical capacity, precision operation and long life.

## **Potential Applications**

- Aerospace
- Instrumentation
- Appliances
- Vending machines
- Timing devices
- Office equipment
- Computer/business
- equipment
- Test instruments
- Medical/dental equipment
- Communications equipment
- HVAC equipment
- Manually operated devices
- Valves

Switch TypeMICRO SWITCH™ Subminiature 1,7 mm H × 6.35 mm W × 20.3 mm L [0.5 in H × 0.25 in W × 0.8 sm L [0.5 in H × 0.25 in W × 0.8 sm L [0.5 in H × 0.25 in W × 0.8SealedNoAmpere Rating5 ACircuitrySingle Pole Double Throw (SPDT)ActuatorPin PlungerTerminationSolderOperating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA,UL,ENECContact Type0.83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (0.F.)0,28 N [1.0 oz] min.Pretravel (0.T.)0,1 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (0.P.)3.83 mm ± 0,38 am [0.330 in ± 0.315 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark1054UL File #1252Agency Approvals and Standards1054Mounting Centers0,26 N m [0.38 in]Mounting Centers0,26 N m [0.38 in]Pickage Height124 M m [0.49 in]Pickage Length124 M m [0.49 in]Pickage Length1000 for [1000 for]Pickage Length1000 for]Approxale1000 for]Notal Lington1000 for]Pickage Length1000 for	Product Specifications	
Ampere Rating5 ACircuitrySingle Pole Double Throw (SPDT)ActuatorPin PlungerTerminationSolderOperating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA,UL,ENECContact Type0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,1 mm [0.004 in] max.Oyerating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,08 mm ± 0,38 mm [0.330 in ± 0.015 in]Husing MaterialGeneral Purpose PhenolicHigh Temperature104 °C [400 °F]CE mark1058-1UL File #12252CSA File #1054Mounting Centers9,65 mm [0.38 in]Mounting Centers0,24 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height1,24 mm [0.49 in]Package Length6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Switch Type	12,7 mm H x 6,35 mm W x 20,3 mm L [0.5 in H x 0.25 in W x 0.8
CircuitrySingle Pole Double Throw (SPDT)CircuitrySingle Pole Double Throw (SPDT)ActuatorPin PlungerTerminationSolderOperating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA,UL,ENECContact Type0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,13 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Width6,35 mm [0.78 in]Package Length9,0211905 Snap switches	Sealed	No
ActuatorPin PlungerTerminationSolderOperating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA, UL, ENECContact TypeSilverOperating Force (O.F.)0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,11 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in Ib]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package LengthMost applicationsCommentJouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Ampere Rating	5 A
TerminationSolderOperating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA,UL,ENECContact Type0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,1 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #Qet N [1.0 ag in]Mounting Centers9,65 mm [0.38 in]Mounting Centers0,26 N m [2.3 in Ib]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Length9,08 mm [0.78 in]Recommended ForDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Circuitry	Single Pole Double Throw (SPDT)
Operating Temperature Range-55 °C to 125 °C [-67 °F to 257 °F]Voltage250 VacApprovalsCSA,UL,ENECContact Type3ilverOperating Force (O.F.)0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark112522CSA File #LR41372Agency Approvals and Standards9,65 mm [0.38 in]Mounting Centers9,65 mm [0.38 in]Weight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Length9,8 mm [0.78 in]Package Length50 mole turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Actuator	Pin Plunger
Voltage250 VacApprovalsCSA,UL,ENECContact TypeSilverOperating Force (O.F.)0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,13 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Length19,8 mm [0.78 in]Recommended ForMoust applicationsCommentJouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Termination	Solder
ApprovalsCSA,UL,ENECApprovalsSilverOperating Force (O.F.)0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,11 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g (0.006 lb]Package Height19,8 mm [0.78 in]Package LengthMost applicationsAvailabilityGlobalUNSPSC Code30211905 Snap switches	Operating Temperature Range	-55 °C to 125 °C [-67 °F to 257 °F]
Contact TypeSilverOperating Force (O.F.)0,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,1 3 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package LengthMost applicationsCommentJouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Voltage	250 Vac
Operating Force (O.F.)O,83 N - 1,39 N [3.0 oz - 5.0 oz]Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,1 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Approvals	CSA,UL,ENEC
Release Force (R.F.)0,28 N [1.0 oz] min.Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,13 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Length9,98 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Contact Type	Silver
Pretravel (P.T.)0,5 mm [0.020 in] max.Overtravel (O.T.)0,13 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package LengthMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Operating Force (O.F.)	0,83 N - 1,39 N [3.0 oz - 5.0 oz]
Overtravel (O.T.)O,13 mm [0.005 in] min.Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g [0.006 lb]Package Height19,8 mm [0.78 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905 Snap switches	Release Force (R.F.)	0,28 N [1.0 oz] min.
Differential Travel (D.T.)0,1 mm [0.004 in] max.Operating Position (O.P.) $8,38 \text{ mm \pm 0,38 mm [0.330 in \pm 0.015 in]}$ Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Length9,85 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905	Pretravel (P.T.)	0,5 mm [0.020 in] max.
Operating Position (O.P.)8,38 mm ± 0,38 mm [0.330 in ± 0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Length6,35 mm [0.25 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905	Overtravel (O.T.)	0,13 mm [0.005 in] min.
Answer0.015 in]Housing MaterialGeneral Purpose PhenolicHigh Temperature204 °C [400 °F]CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Veight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Length6,35 mm [0.25 in]Package LengthDuble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Differential Travel (D.T.)	0,1 mm [0.004 in] max.
High Temperature204 °C [400 °F]High Temperature61058-1CE mark61058-1UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsAvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Operating Position (O.P.)	
CE mark61058-1CE markE12252UL File #LR41372CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommented ForDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Housing Material	General Purpose Phenolic
UL File #E12252CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentJouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC CommodityNot applications	High Temperature	204 °C [400 °F]
CSA File #LR41372Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	CE mark	61058-1
Agency Approvals and Standards1054Mounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC CommodityAutomation	UL File #	E12252
Nounting Centers9,65 mm [0.38 in]Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	CSA File #	LR41372
Maximum Tightening Torque0,26 N m [2.3 in lb]Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Agency Approvals and Standards	1054
Weight2,72 g [0.006 lb]Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Mounting Centers	9,65 mm [0.38 in]
Package Height12,4 mm [0.49 in]Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905Snap switches	Maximum Tightening Torque	0,26 N m [2.3 in lb]
Package Width6,35 mm [0.25 in]Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Weight	2,72 g [0.006 lb]
Package Length19,8 mm [0.78 in]Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Package Height	12,4 mm [0.49 in]
Recommended ForMost applicationsCommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Package Width	6,35 mm [0.25 in]
CommentDouble turret type solder terminals.AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Package Length	19,8 mm [0.78 in]
AvailabilityGlobalUNSPSC Code30211905UNSPSC Commodity30211905	Recommended For	Most applications
UNSPSC Code30211905UNSPSC Commodity30211905 Snap switches	Comment	Double turret type solder terminals.
UNSPSC Commodity 30211905 Snap switches	Availability	Global
	UNSPSC Code	30211905
Series Name SM	UNSPSC Commodity	30211905 Snap switches
	Series Name	SM

