OMRON

Sealed Tilt Switch

- Pure mechanical tilt detector
- Sealed enclosure
- Output capacity from 0.1 mA at 5 VDC to 100 mA at 30 VDC
- RoHS Compliant



Ordering Information

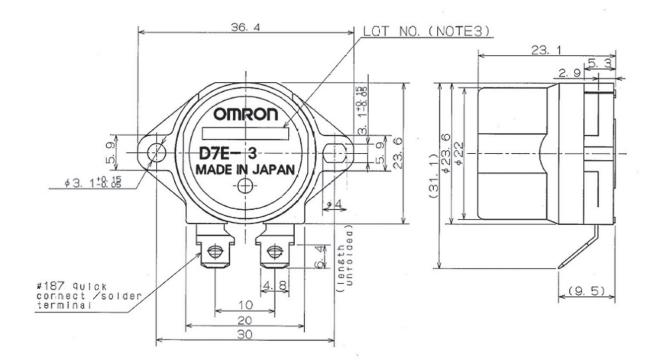
Operating Angle	Model
50 to 80 degrees	D7E-3

Characteristics

Operating angle	Tilt of 50 to 80 degrees, when the switch is tilted gradually (approx. 1 degree/s) from the horizontal											
Returning angle	Tilt of more than 25 degrees, when the switch is tilted gradually (approx. 1 degree/s) from the horizontal											
Permissible mounting level	1 degree max. from the horizontal											
Contact form	Single pole single throw (NC contact / slow action)											
Mounting	Pitch: 30 mm 2 screws (M3)											
	Height: 5.3 mm											
Soldering	Soldering iron: temperature 350 ±10°, 3 sec. max											
Ratings	5 VDC, 0.1 mA to 30 VDC, 100 mA (resistive load)											
Insulation resistance	100 M Ω min. (250 VDC, between each terminal of the same polarity)											
	To measure off condition											
Contact resistance	300 m Ohm max. (Initial value)											
Vibration during	Condition: Vibration: 200 gal (1 cycle: 0.5 sec.)											
transportation	Vibration direction: 2 axial directions											
	Time: Total 50 hours											
Shock	Condition: Acceleration: 980 m/s ² 3 times											
	Shock direction: 3 axial directions											
Operating temperature and	Temperature: -25° to +60° (with no icing and condensation)											
humidity	Humidity: 45 to 95% RH											
Storage temperature and	Temperature: -25° to +60° (with no icing and condensation)											
humidity	Humidity: 45 to 95% RH protection											
Protection	IP67											

Dimensions

Unit: mm



OMRON

																										M	
	1 —	— 	T -	т — 1	— 	 I	т — I	1 —			т — _													T -	т — I		
	J	 	 _	⊥ 	! 	L _ 	⊥ 	! 	! 		⊥ 			⊥ 				⊥ 	 	L I		! 	 	 		! 	
		¦	<u> </u> -	<u> </u>	¦—	 	<u> </u>		' ·	<u> </u>	<u> </u>	¦ —		<u> </u>			 –	<u> </u>		 –	<u> </u>		<u> </u>	 -	<u> </u>	¦	
⊢ —		 	। +− −	। + ──	 	। ├── -	+ —	 	 	। †− −	' + —	—	। ⊢ -	। +	 	 	। ┼── ──	। + ──	 —	ı ├── -	 	 	 	 	⊥ + —	 	 -
1	i I	1	1	1	i I	1	1		 	i I			i I	1			1	1				 	i I	1	1	i I	
			+ 	+ — 		-	+ 	· —	 		+ —			+			+ 	+ — 				· —		+ 	+		
<u> </u>		' 	<u>-</u> _	<u> </u>	' — I	' 	<u>-</u> _	!	' ·	<u>-</u> _		' <u>—</u>	' 	<u>-</u> _	:	' 	<u> </u>	<u> </u>	' <u>—</u>	' 	<u> </u>		'	<u>-</u> -	<u> </u>	' <u> </u>	<u>' '</u>
· 	1-		÷ -	; † —	- —		- + –	- —			; † —			; † —	- —		; 	; † —	—			1 -		÷ -	; † —	—	
				+			+ _				+							+							+ _		
i		Ì					Ì				Ì												I				
	 	·	<u> </u>	 	·	-	<u> </u>	·	· ·	<u> </u>	 		· <u> </u>		·	 	<u> </u>	 	·	·		:	·	 		·	
Γ -	1 -		Γ -	Τ —	—		Τ –			Γ -	т —			Τ —			Γ -	Τ —		· 		1 -	,	Τ -	т —		
⊢ −			+ -	+ —	—	⊢ -	+ -			⊢ −	+ —	—	⊢ -	+ -			+ -	+ —	—	⊢ -				+ -	+	—	⊢ ⊣
L _			L _			L _				L _	⊥ _		L.							L _	L _			L.			
-	ī —			_							_							_				i —					
-			+ -	+ —	—	⊢ -	+ -				+ —	—	⊢ -	+ -	—		+ -	+ —	—	⊢ -				+ -	+ -	—	\vdash –
⊢ _			⊥ _	↓		L	↓ _			⊢ _	↓		L -	⊢ _			Ļ _	↓		L _				⊥ -	↓ _		
	<u> </u>		<u> </u>			<u> </u>	<u> </u>			<u> </u>	<u> </u>			<u> </u>	<u> </u>	l	<u> </u>	<u> </u>		L	<u> </u>			<u> </u>			
dash	1 —		Τ -	† —	—		\top	_		Γ -	† —		— -	\top	_		Γ -	† —		— –		1 —		T -	+ -	—	
\vdash –		—	+ -	+ —	—	⊢ -	+ -			- −	+ —	—	⊢ -	+ -				+ —	—	<u>⊢</u> –				+ -	+	—	⊢ ⊣
	<u> </u>		L _	<u> </u>			<u> </u>			L _	<u> </u>		L .	L _				<u> </u>		L _		<u> </u>					
+ -			+ -	+ —	-		+ -	—																+ -	+	-	⊢ ⊣
L _	!		Ļ _	↓		L -	Ļ _		·	Ļ _	<u> </u>	!	L -	Ļ _			Ļ _	<u> </u>		L _				Ļ -	<u> </u>		
	-		<u> </u>	 - —	!		 		! <u> </u>	<u> </u>	<u> </u>	!	<u> </u>	 			 	 						 	<u> </u>	!	
	1 -		T -	T —			Ţ				Ţ							1						T -			
⊢ _			+ 1	+	—		+		·	 	+ —	—		+	—		+ 1	+	— 					+ 1	+	—	
<u> </u>	<u> </u>	I	<u> </u>	<u> </u>		<u> </u>	<u> </u>		!	<u> </u>	<u> </u>		<u> </u>	<u> </u>			<u> </u>	<u> </u>		 	<u> </u>			<u> </u>	<u> </u>		
	1	 	 	і т —	 —	 	 	I 1 —	 	 	і т —	 —	 	 	I 1 —	 	 	і т —	 —	 		1	 	 	- 	 —	
1	1	1	1	1	1	1	l I	l I	1	I I	l I					l I	1	1	1	 		1	l I	1	1	l I	
	1 —	— 	т - I	т — I	— 		т — І	1 — I			т — 											1 — I	I— I	T	- -	— 	
	J	' 	 	⊥ 	' 	 	⊥ 	! 												∟ _ I		! 	' 	 		' 	
			<u> </u>	<u> </u>	¦	- 	- 				<u> </u>						 –	<u> </u>		 			. —		<u> </u>	. —	
			- 	' + —	—		+ -	 			' † —						' 	' + —	 —	' 		' —		1			· ·
1	1		1		1																		i I				
 			+ 	+ — 		-	+ 		 	 	+ —			+			+ 	+ — 				· —		+ 	+ —		
<u> </u>	<u> </u>	'— I	<u>-</u> -	<u> </u>	' —	' 	<u> </u>	:	' ·	<u>-</u> _	<u> </u>	' —	<u> </u>	<u> </u>	- 	' 	<u> </u>	<u> </u>	' —	' 				<u>-</u> -	<u> </u>		
· 	, 1 —	—	- -	; † —	—		; † –	- —	— ·		+ —				- —		; 	; † —	—			, —		+ -	+	—	
				↓			↓ _											+							↓		
											Ì																
			 			-					<u> </u>	. <u> </u>	<u> </u>	<u> </u>	-					— – I				<u> </u>			· <u> </u>
Γ -	1 —		Γ -	Τ —			Τ -	1 —		Γ -	Τ —			T —			Τ -	Τ —				ı —		Τ -	Τ —	-	
L _		I	L _	L	I	L	L		I	L _	L	I	L -	L		I	L	L	I	L	L		I	L		I	

All sales are subject to Omron Electronic Components LLC standard terms and conditions of sale, which can be found at http://www.components.omron.com/components/web/webfiles.nsf/sales_terms.html

ALL DIMENSIONS SHOWN ARE IN MILLIMETERS. To convert millimeters into inches, multiply by 0.03937. To convert grams into ounces, multiply by 0.03527.



55 E. Commerce Drive, Suite B Schaumburg, IL 60173

OMRON ON-LINE

Global - http://www.omron.com USA - http://www.components.omron.com

847-882-2288

Cat. No. X305-E-1

10/10 Spec

Specifications subject to change without notice

Printed in USA

Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

Omron: D7E-3