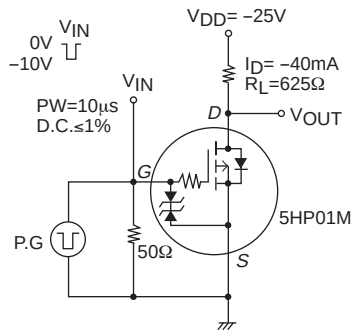


5HP01M

Electrical Characteristics at Ta=25°C

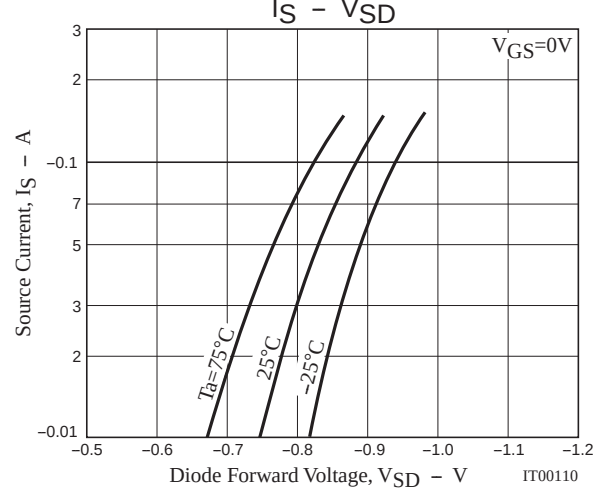
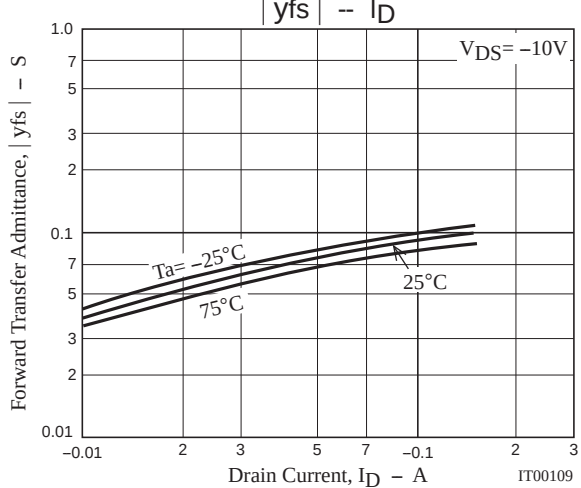
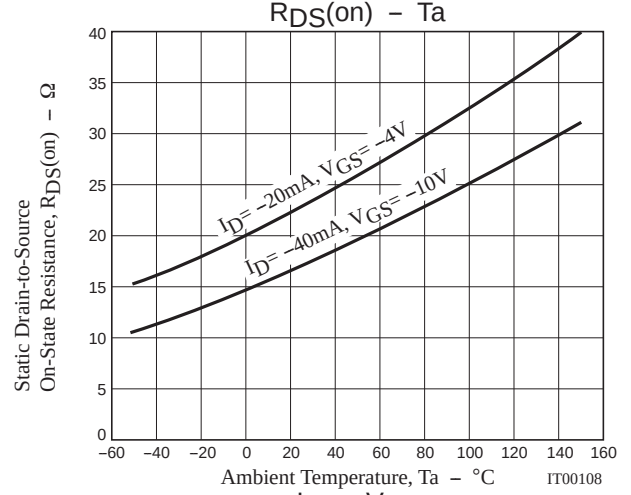
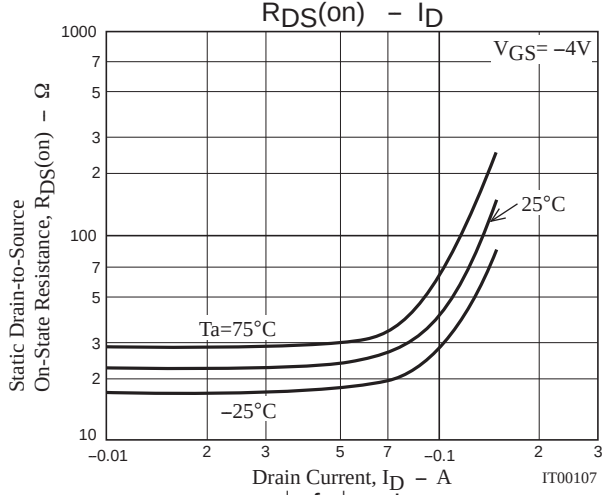
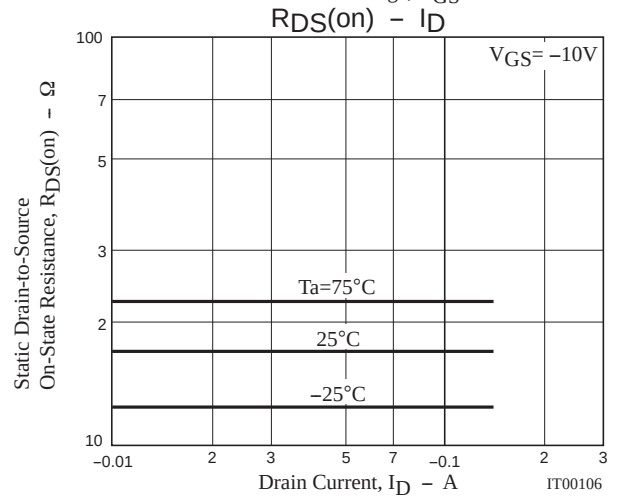
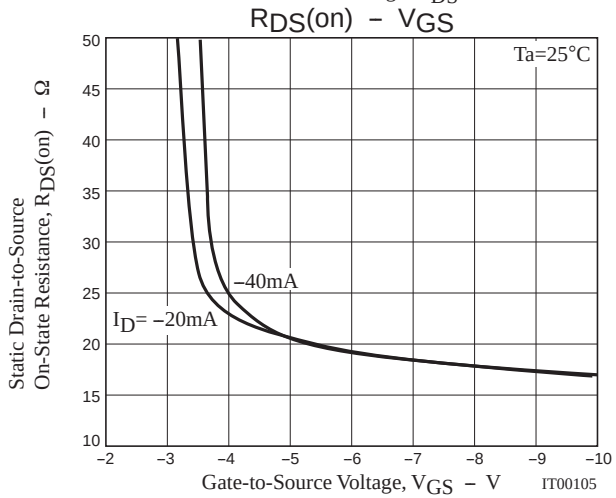
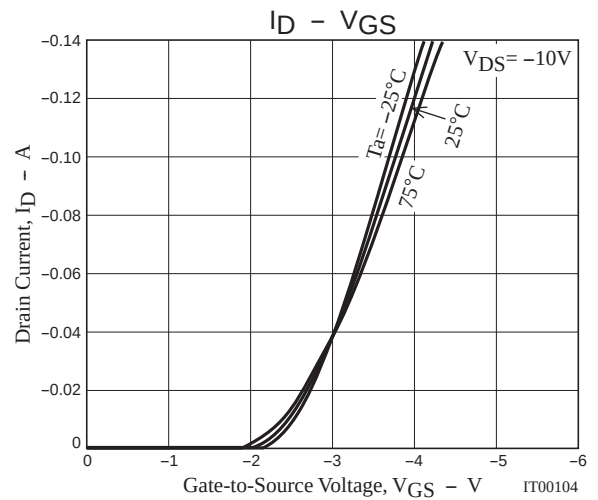
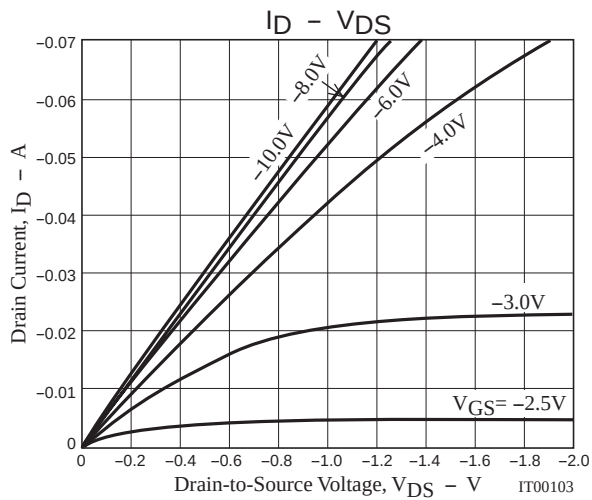
Parameter	Symbol	Conditions	Ratings			Unit
			min	typ	max	
Drain-to-Source Breakdown Voltage	$V_{(BR)DSS}$	$I_D = -1mA, V_{GS} = 0V$	-50			V
Zero-Gate Voltage Drain Current	I_{DSS}	$V_{DS} = -50V, V_{GS} = 0V$			-1	μA
Gate-to-Source Leakage Current	I_{GSS}	$V_{GS} = \pm 16V, V_{DS} = 0V$			± 10	μA
Cutoff Voltage	$V_{GS(off)}$	$V_{DS} = -10V, I_D = -100\mu A$	-1		-2.5	V
Forward Transfer Admittance	$ y_{fs} $	$V_{DS} = -10V, I_D = -40mA$	50	70		mS
Static Drain-to-Source On-State Resistance	$R_{DS(on)1}$	$I_D = -40mA, V_{GS} = -10V$		17	22	Ω
	$R_{DS(on)2}$	$I_D = -20mA, V_{GS} = -4V$		23	32	Ω
Input Capacitance	C_{iss}	$V_{DS} = -10V, f = 1MHz$		6.2		pF
Output Capacitance	C_{oss}			4.0		pF
Reverse Transfer Capacitance	C_{rss}			1.3		pF
Turn-ON Delay Time	$t_{d(on)}$	See specified Test Circuit.		13		ns
Rise Time	t_r			10		ns
Turn-OFF Delay Time	$t_{d(off)}$			100		ns
Fall Time	t_f			150		ns
Total Gate Charge	Q_g	$V_{DS} = -10V, V_{GS} = -10V, I_D = -70mA$		1.32		nC
Gate-to-Source Charge	Q_{gs}			0.17		nC
Gate-to-Drain "Miller" Charge	Q_{gd}			0.34		nC
Diode Forward Voltage	V_{SD}	$I_S = -70mA, V_{GS} = 0V$		-0.85	-1.2	V

Switching Time Test Circuit

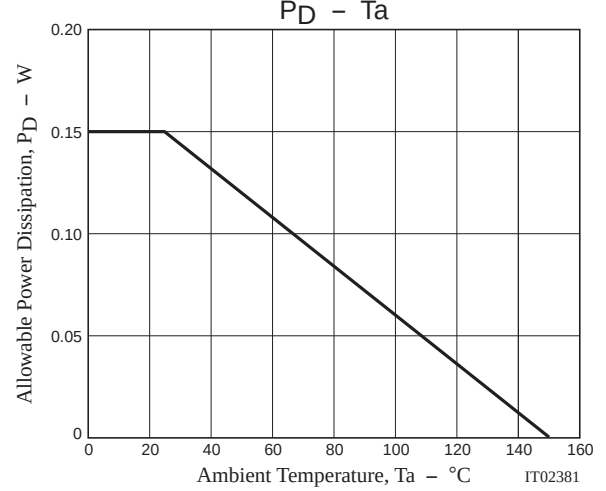
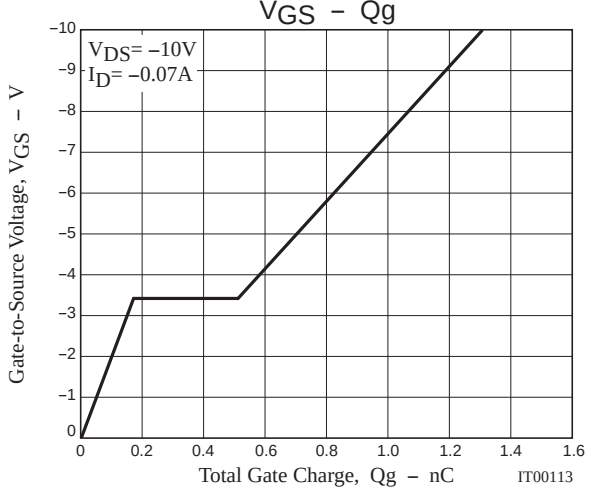
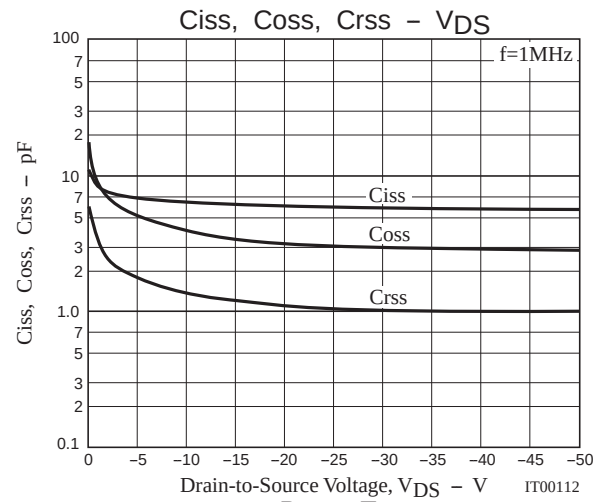
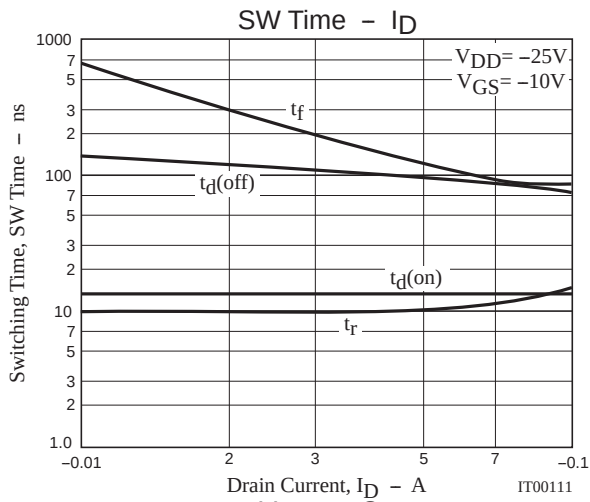


Ordering Information

Device	Package	Shipping	memo
5HP01M-TL-E	MCP	3,000pcs./reel	Pb Free
5HP01M-TL-H	MCP	3,000pcs./reel	Pb Free and Halogen Free



5HP01M



Embossed Taping Specification

5HP01M-TL-E, 5HP01M-TL-H

1. Packing Format

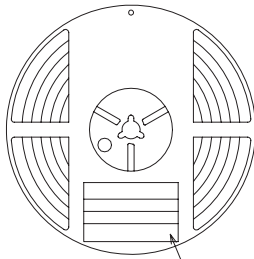
Package Name	Carrier Tape Type	Maximum Number of devices contained (pcs)			Packing format	
		Reel	Inner box	Outer box	Inner BOX (C-1)	Outer BOX (A-7)
MCP	MCP	3,000	15,000	90,000	5 reels contained Dimensions:mm (external) 183×72×185	6 inner boxes contained Dimensions:mm (external) 440×195×210

Reel label, Inner box label
(unit:mm)

Outer box label

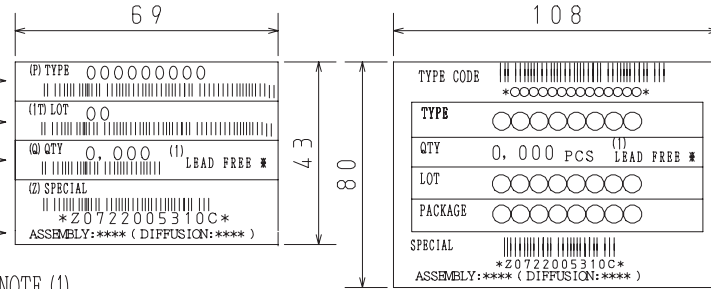
It is a label at the time of factory shipments.
The form of a label may change in physical distribution process.

Packing method



Reel label

Type No.
LOT No.
Quantity
Origin



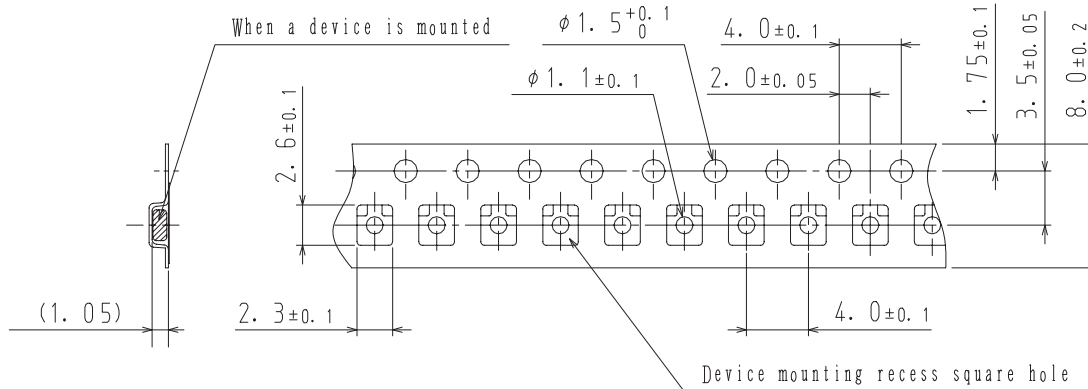
NOTE (1)

The LEAD FREE * description shows that the surface treatment of the terminal is lead free.

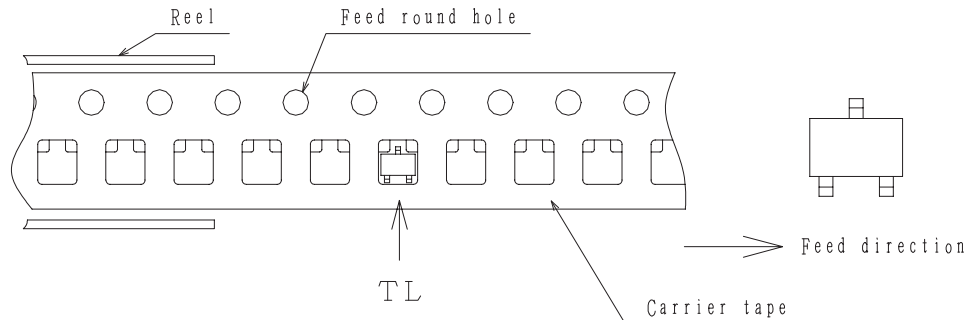
Label	JEITA Phase
LEAD FREE 3	JEITA Phase 3A
LEAD FREE 4	JEITA Phase 3

2. Taping configuration

2-1. Carrier tape size (unit:mm)



2-2. Device placement direction

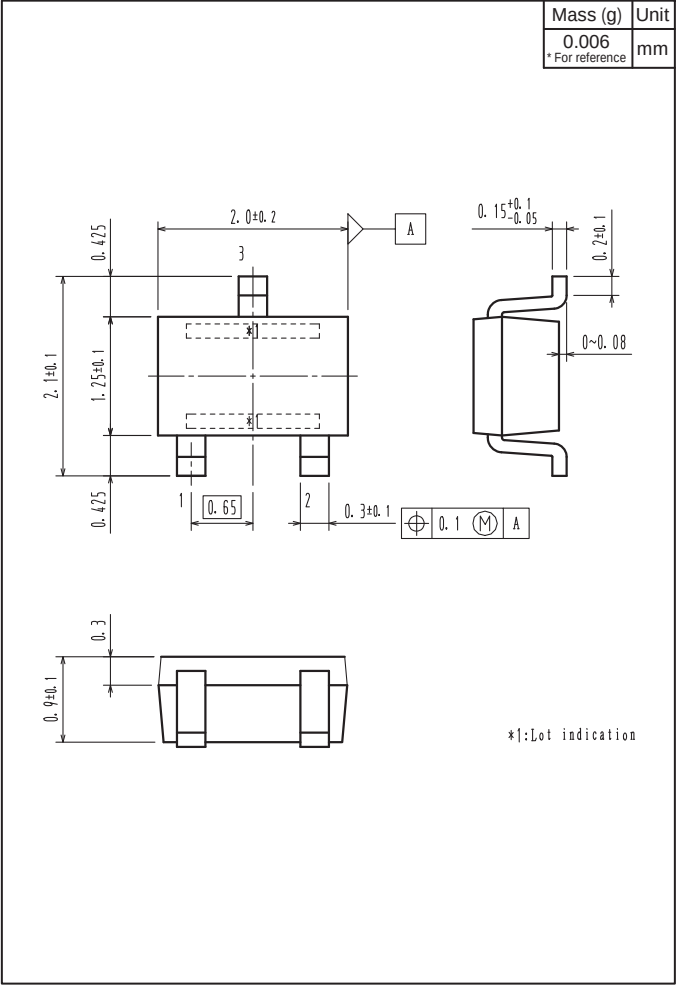


Those with oen electrode terminal on the feed hole side.....TL

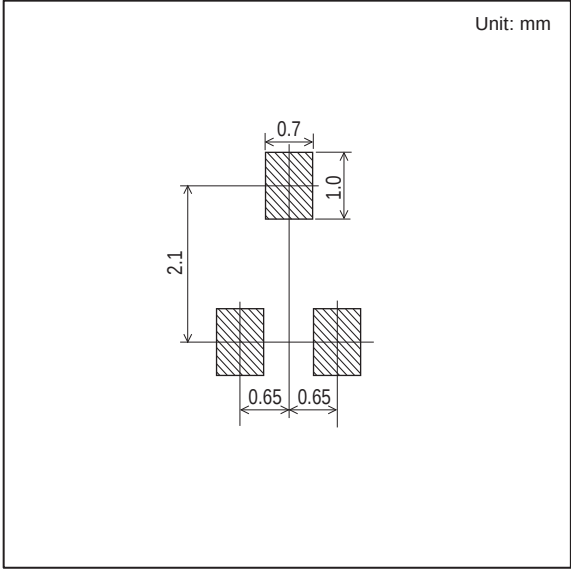
5HP01M

Outline Drawing

5HP01M-TL-E, 5HP01M-TL-H



Land Pattern Example



Note on usage : Since the 5HP01M is a MOSFET product, please avoid using this device in the vicinity of highly charged objects.

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