

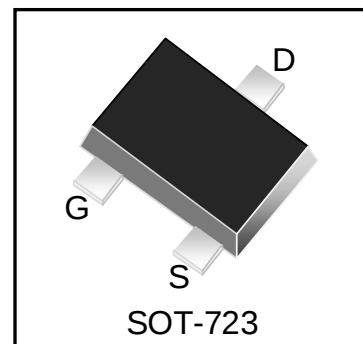


WM02N08H

N-Channel MOSFET

Features

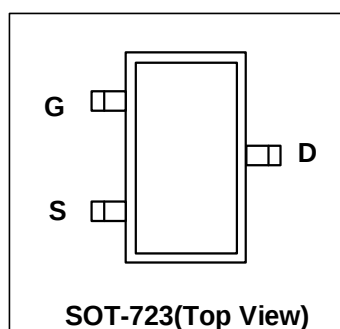
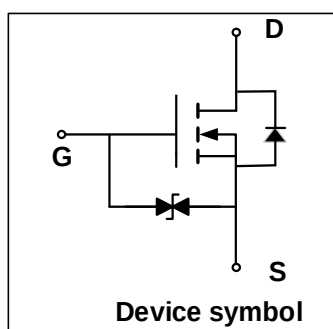
- $V_{DS} = 20\text{ V}$, $I_D = 0.75\text{ A}$
 $R_{DS(on)} < 0.38\Omega$ @ $V_{GS} = 4.5\text{ V}$
 $R_{DS(on)} < 0.45\Omega$ @ $V_{GS} = 2.5\text{ V}$
- Trench MOSFET Technology
- Low Threshold Voltage
- Pb Free Device
- ESD Protected



Mechanical Characteristics

- SOT-723 Package
- Marking : Making Code
- RoHS Compliant

Schematic & PIN Configuration



Absolute Maximum Rating

Parameter	Symbol	Value	Unit
Drain-Source Voltage	V_{DS}	20	V
Gate-Source Voltage	V_{GS}	± 10	V
Continuous Drain Current	I_D	0.75	A
Pulsed Drain Current ¹	I_{DM}	1.8	A
Power Dissipation	P_D	150	mW
Junction Temperature	T_J	150	°C
Storage Temperature	T_{STG}	-55 to +150	°C
Thermal Resistance from Junction to Ambient ²	$R_{\theta JA}$	833	°C/W

Electrical Characteristics ($T_{amb}=25^{\circ}\text{C}$ unless otherwise noted)

Parameter	Symbol	Test Condition	Min.	Typ.	Max.	Unit
Static Characteristics						
Drain-Source Breakdown Voltage	BV _{DSS}	V _{GS} = 0 V, I _D = 250μA	20	-	-	V
Zero Gate Voltage Drain Current	I _{DSS}	V _{DS} =20V, V _{GS} = 0 V	-	-	1	μA
Gate-body Leakage Current	I _{GSS}	V _{DS} = 0 V, V _{GS} = ±10V	-	-	±20	μA
Gate Threshold Voltage ³	V _{GS(th)}	V _{DS} = V _{GS} , I _D = 250μA	0.35	0.75	1.1	V
Drain-Source On-state Resistance ³	R _{DS(on)}	V _{GS} = 4.5V, I _D = 0.65A	-	0.19	0.38	Ω
		V _{GS} = 2.5V, I _D = 0.55A	-	0.26	0.45	
		V _{GS} = 1.8V, I _D = 0.45A	-	0.35	-	
Dynamic Characteristics						
Input Capacitance	C _{iss}	V _{GS} = 0V, V _{DS} = 16V, f = 1MHz	-	54		pF
Output Capacitance	C _{oss}		-	10		
Reverse Transfer Capacitance	C _{rss}		-	7.5		
Switching Characteristics						
Turn-on Delay Time ⁴	t _{d(on)}	V _{DS} =10V, V _{GS} =4.5V, I _D =0.5A, R _{GEN} =10Ω	-	6.7	-	nS
Rise Time ⁴	t _r			4.8	-	
Turn-off Delay Time ⁴	t _{d(off)}		-	17.3	-	
Fall Time ⁴	t _f		-	7.4	-	
Source-Drain Diode Characteristics						
Body Diode Voltage	V _{SD}	I _S =0.15A, V _{GS} = 0V	-	-	1.2	V

Notes:

1. Repetitive Rating: Pulse width limited by maximum junction temperature.
2. Surface mounted on FR4 board using 1 square inch pad size, 1oz single-side copper.
3. Pulse Test: Pulse width $\leq 300\mu\text{s}$, duty cycle $\leq 2\%$.
4. Guaranteed by design, not subject to product

Typical Characteristics

Figure 1. Output Characteristics

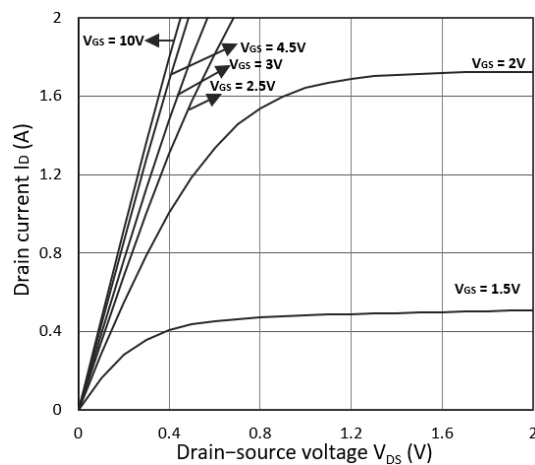


Figure 2. Transfer Characteristics

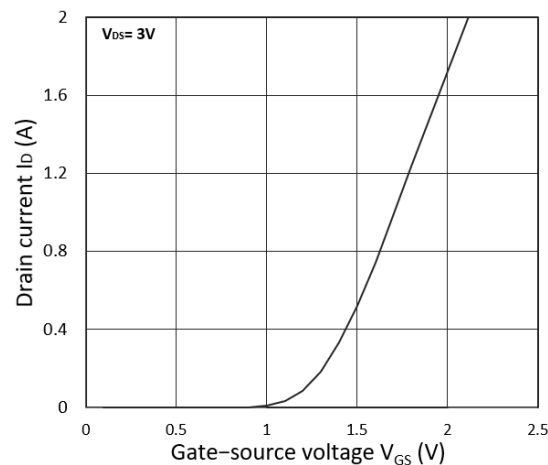


Figure 3. $R_{DS(ON)}$ vs. I_D

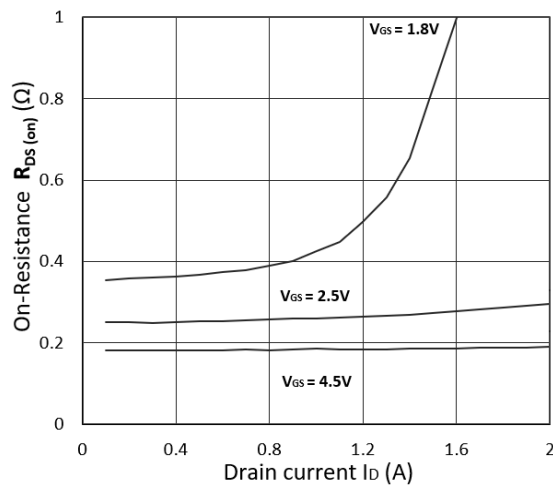


Figure 4. $R_{DS(ON)}$ vs. V_{GS}

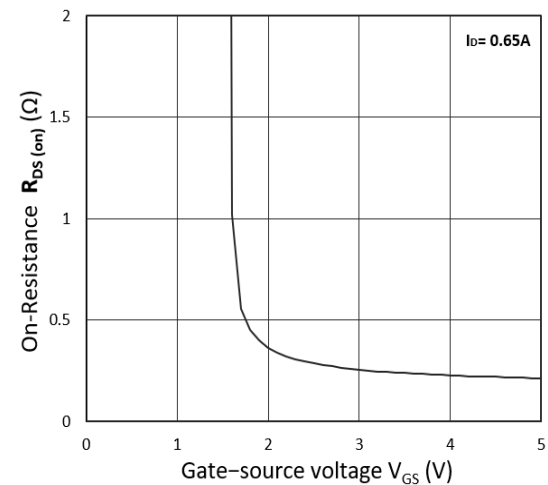


Figure 5. I_S vs. V_{SD}

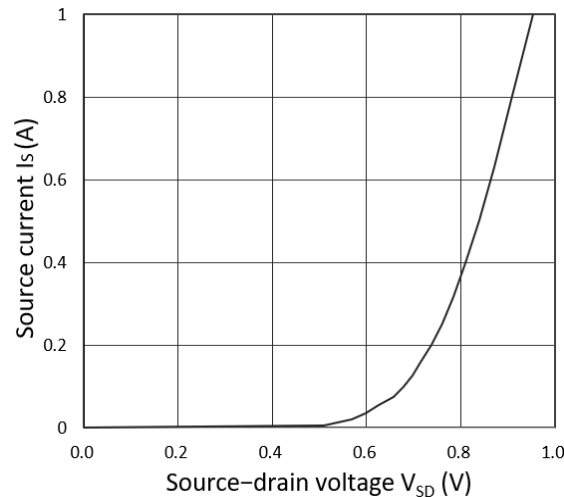
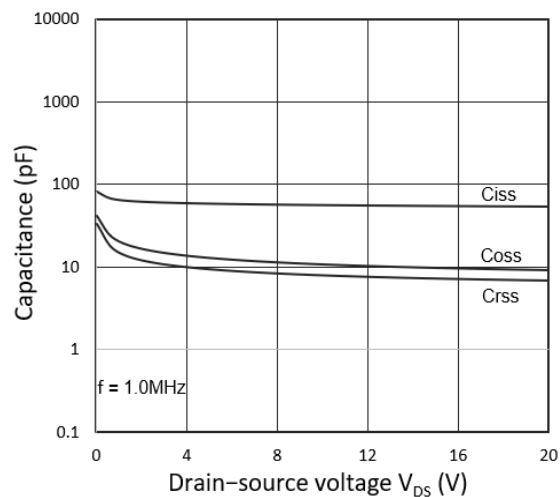
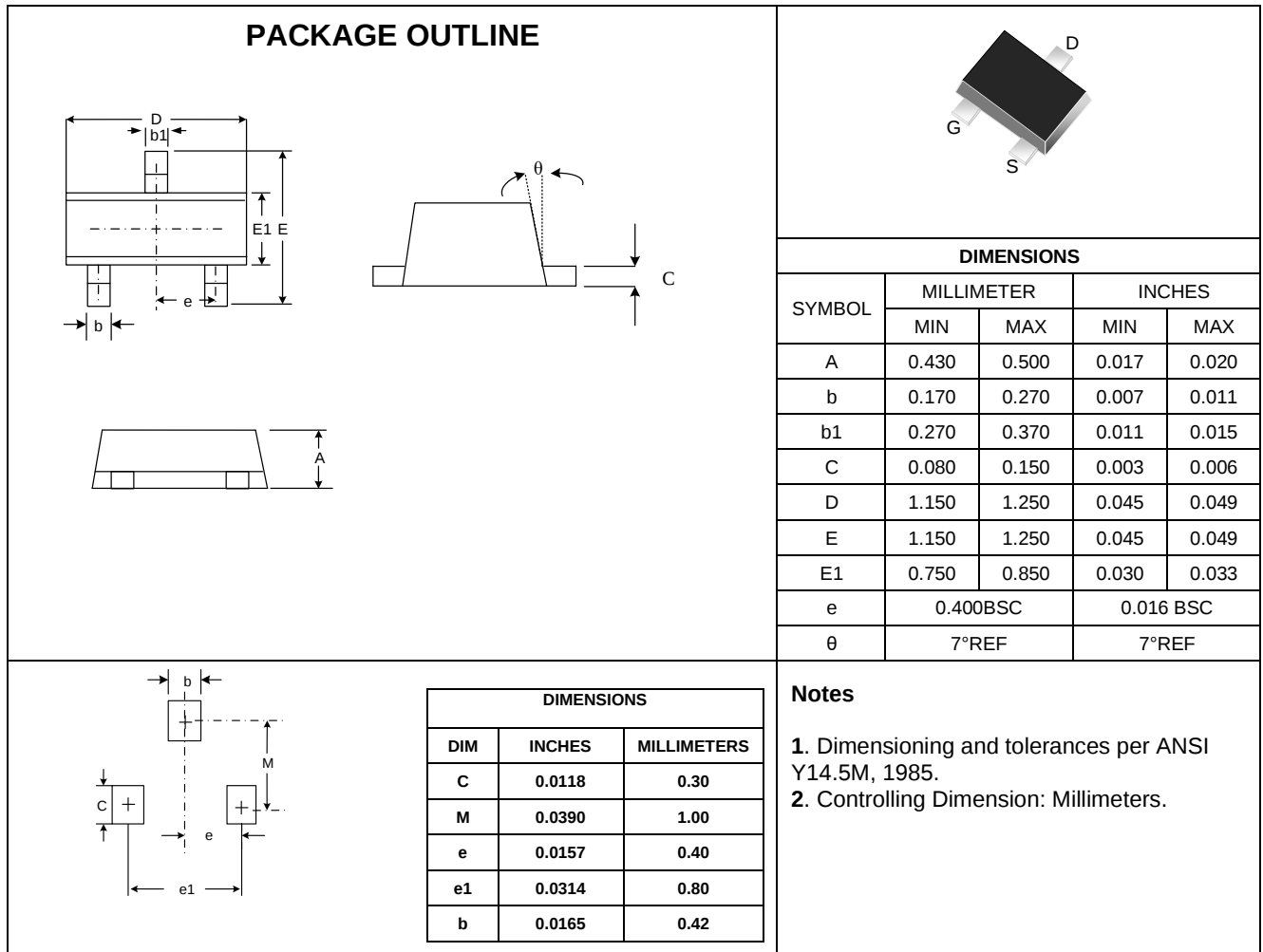


Figure 6. Capacitance Characteristics



Outline Drawing – SOT-723



Marking Codes

Part Number	WM02N08H
Marking Code	02K

Package Information

Qty: 8k/Reel

CONTACT INFORMATION

No.1001, Shiwan (7) Road, Pudong District, Shanghai, P.R.China.201207

Tel: 86-21-68969993 Fax: 86-21-50757680 Email: market@way-on.comWAYON website: <http://www.way-on.com>

For additional information, please contact your local Sales Representative.

WAYON® is registered trademark of Wayon Corporation.

Specifications are subject to change without notice.

The device characteristics and parameters in this data sheet can and do vary in different applications and actual device performance may vary over time. Users should verify actual device performance in their specific applications.

单击下面可查看定价，库存，交付和生命周期等信息

[>>WAY-ON\(维安\)](#)