

# BRCs019N10SHTL

Rev.C Apr.-2025

TOLL-8L N

N-Channel MOSFET in a TOLL-8L Plastic Package.

$V_{DS}(V)=100V$   $I_D=292A$

$R_{DS(ON)}@10V$  1.9m (Typ.1.6mR)

HF Product.

# BRCs019N10SHTL

Rev.C Apr.-2025



DATA SHEET

Parameter	Symbol	Rating	Unit
Drain-Source Voltage	$V_{DS}$	100	V
Drain Current - Continuous	$I_D$	292	A
Drain Current - Continuous	$I_D(T_c=100^\circ\text{C})$	292	A
Drain Current - Pulsed	$I_{DM}$	1168	A
Gate-Source Voltage	$V_{GS}$	$\leq 20$	V
Power Dissipation	$P_{tot}$	312.5	W
Continuous-Source Current	$I_S$	292	A

Single Pulse Avalanche  
Energy( $V_{DD}=50V, L=1mH$ )

EmJ880.3(A)  $\theta_{Jc}$  7.02 678.44 481.32 .47998 ref555.62

# BRCs019N10SHTL

Rev.C Apr.-2025

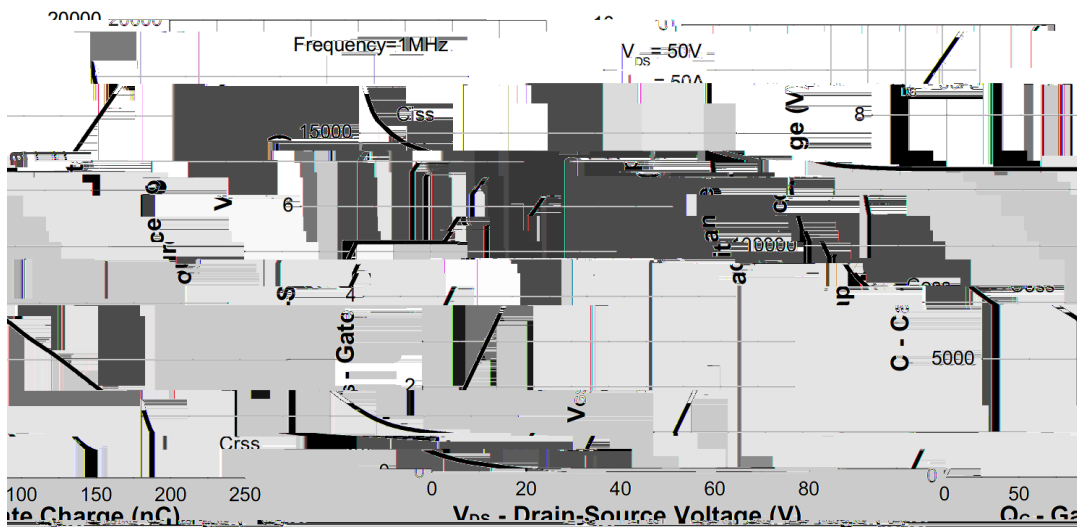
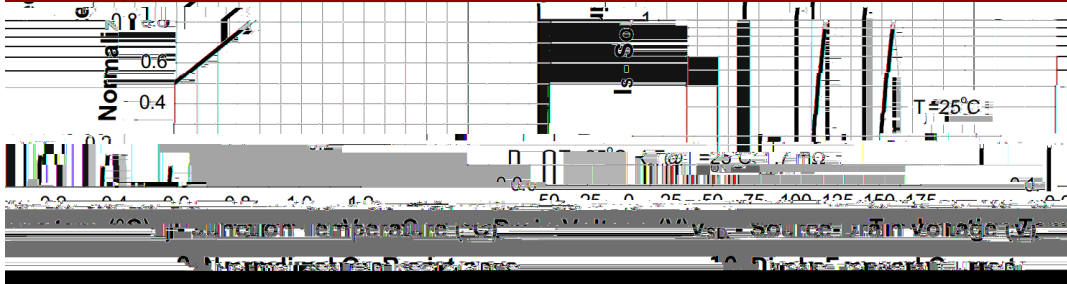
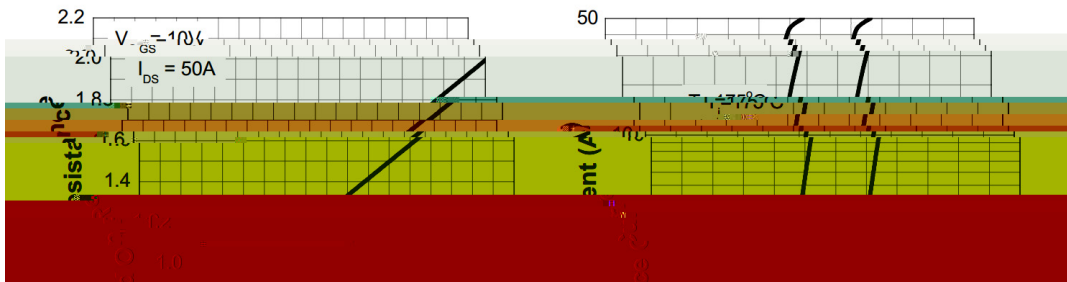
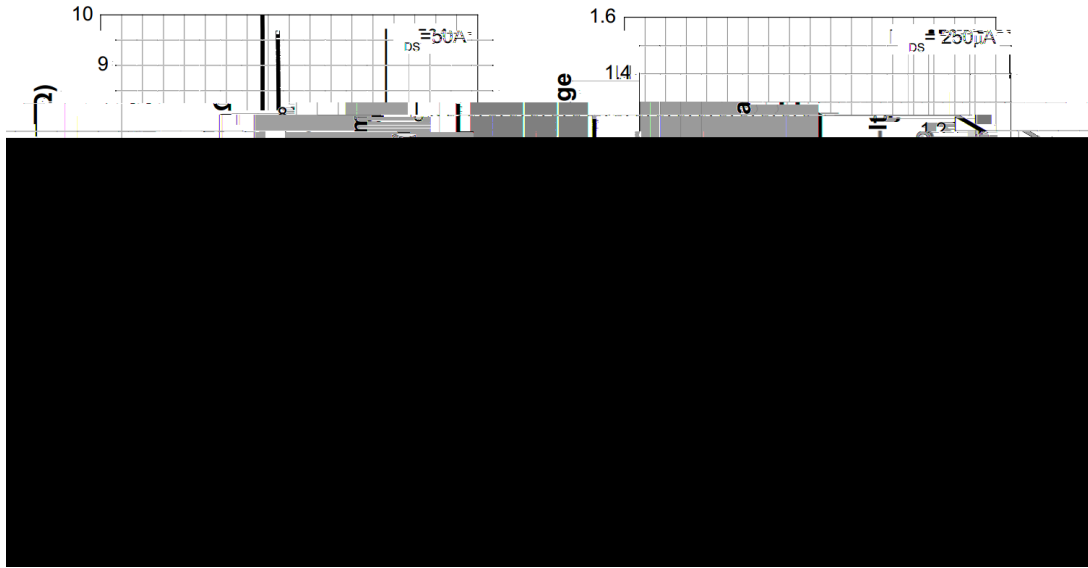


DATA SHEET

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Turn-On Delay Time	$t_{d(on)}$	$V_{GS}=10V$ $V_{DS}=50V$ $R_L=1\Omega$ $R_G=3.9\Omega$ $I_{DS}=50A$		59		ns
Turn-On Rise Time	$t_r$			66		
Turn-Off Delay Time	$t_{d(off)}$			185		
Turn-Off Fall Time	$t_f$			95		
Reverse Recovery Time	$t_{rr}$	$I_{DS} = 50 A, V_{GS} = 0 V$ $di_{SD}/dt = 100 A/\mu s$		66		nS
Reverse Recovery Charge	$Q_{rr}$					



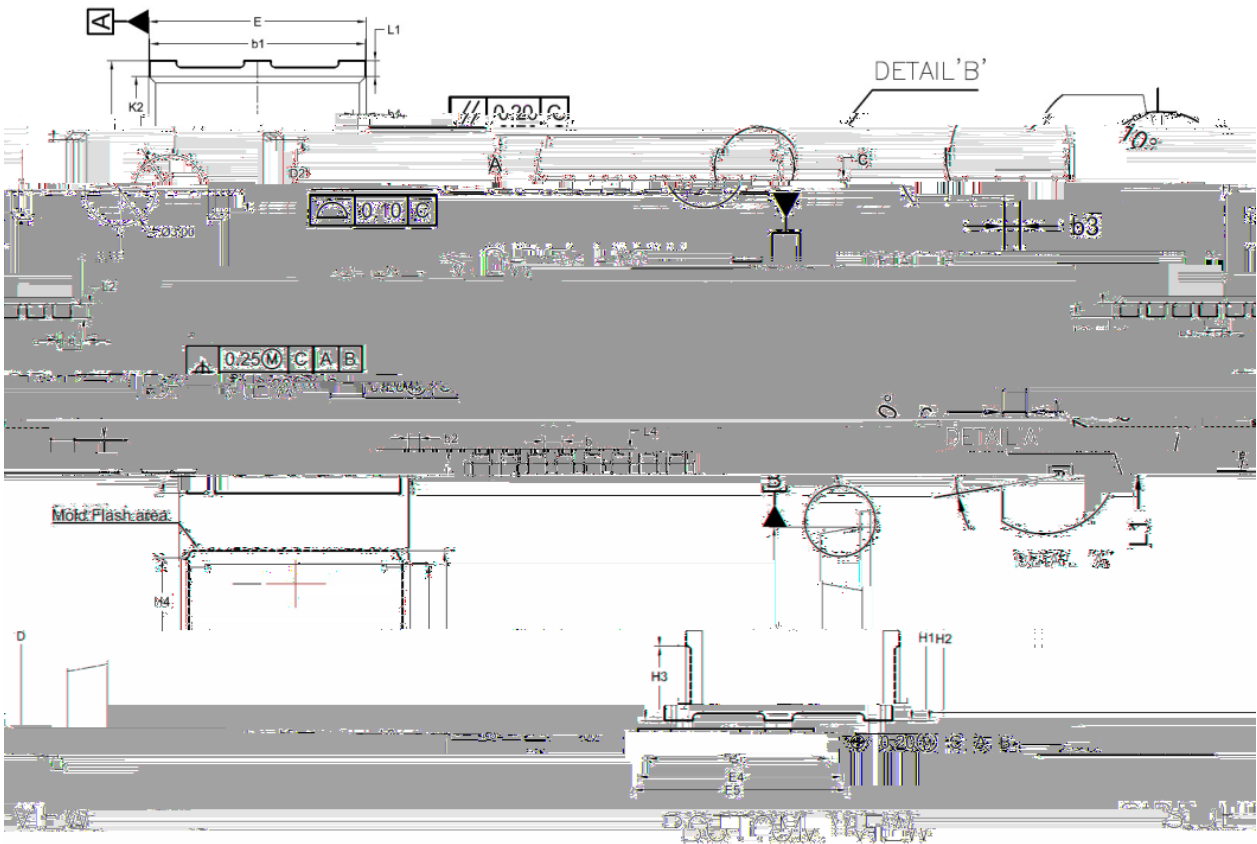
/ Electrical Characteristic Curve



12. Gate Charge

11. Capacitance

**/ Package Dimensions**



Jpd Yf c	; `d \ej `fej `@`D `cd \Kij `			Jpd Yf c	; `d \ej `fej `@`D `cd \Kij `		
	D @%	EFD%	D 80%		D @%	EFD%	D 80%
A	2.200	2.300	2.400	b1	9.700	9.800	9.900
c	0.492	0.500	0.508	b1	0.420	0.460	0.500
D	10.280	10.380	10.480	b3	0.350		
E	9.800	9.900	10.000	b4	0.600		
e	1.20 BSC			b5	3.100		
H	11.580	11.680	11.780	b6	1.200		
H1	6.650	6.750	6.850	L	1.700	1.900	2.100
H2	7.300			L1	0.700		
H3	3.200			L2	0.600 H		

**BRCS019N10SHTL**  
Rev.C Apr.-2025

