

TOSHIBA Transistor Silicon NPN Triple Diffused Type (Darlington power transistor)

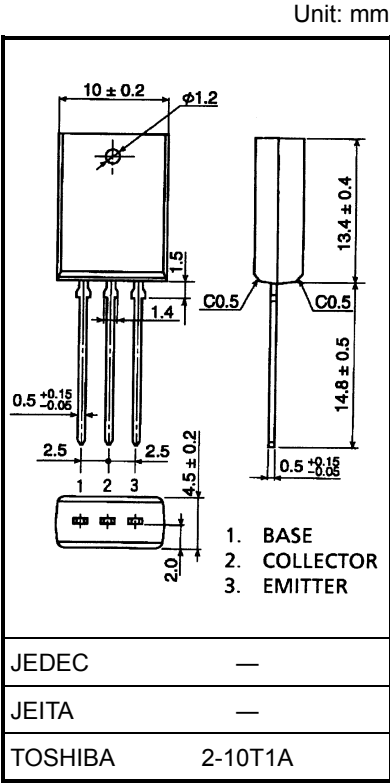
2SD2526

High Power Switching Applications
Hammer Drive, Pulse Motor Drive Applications

- High DC current gain: $h_{FE} = 2000$ (min) ($V_{CE} = 3\text{ V}$, $I_C = 3\text{ A}$)
- Low saturation voltage: $V_{CE(sat)} = 1.5\text{ V}$ (max) ($I_C = 3\text{ A}$)
- Complementary to 2SB1641

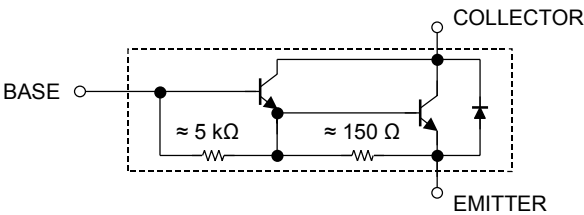
Maximum Ratings ($T_a = 25^{\circ}\text{C}$)

Characteristics		Symbol	Rating	Unit
Collector-base voltage		V_{CBO}	100	V
Collector-emitter voltage		V_{CEO}	100	V
Emitter-base voltage		V_{EBO}	7	V
Collector current	DC	I_C	5	A
	Pulse		8	
Base current		I_B	0.5	A
Collector power dissipation		P_C	1.8	W
Junction temperature		T_j	150	$^{\circ}\text{C}$
Storage temperature range		T_{stg}	-55 to 150	$^{\circ}\text{C}$

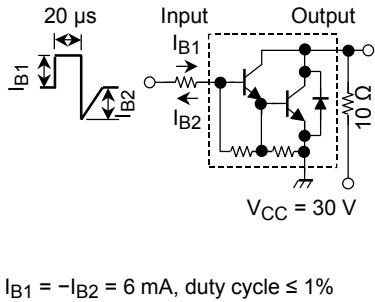


Weight: 1.5 g (typ.)

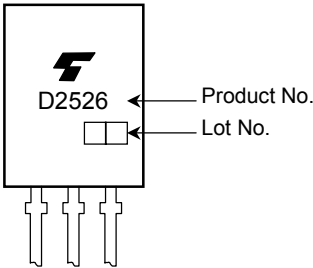
Equivalent Circuit



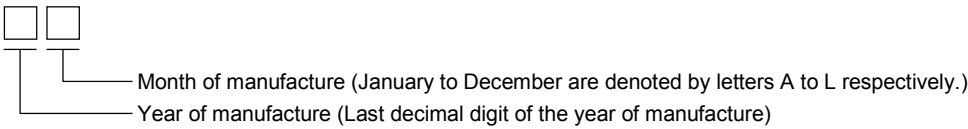
Electrical Characteristics (Ta = 25°C)

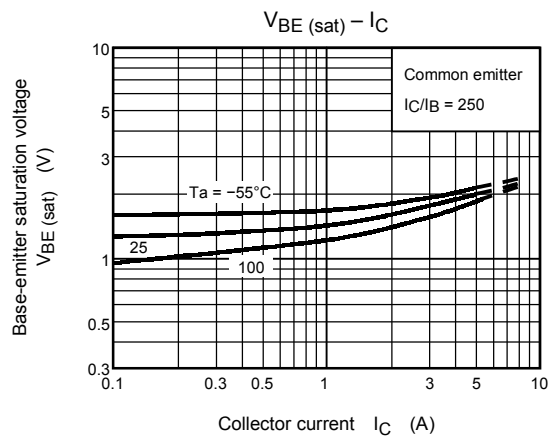
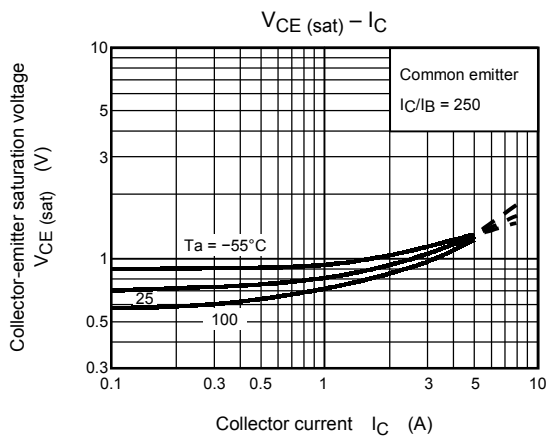
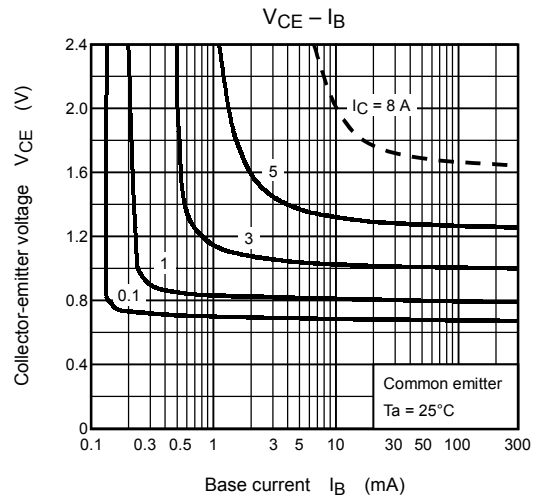
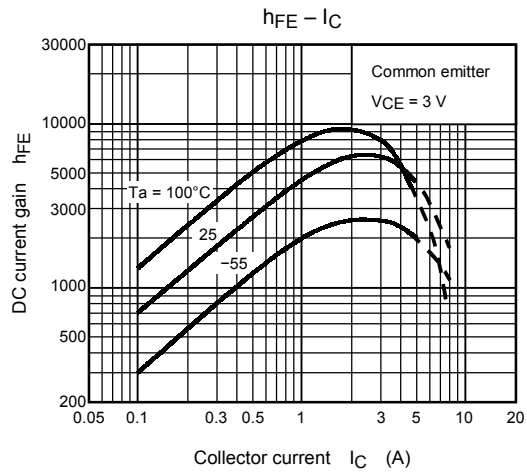
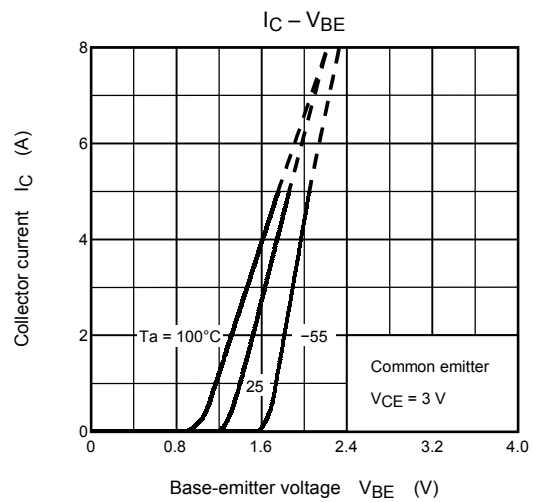
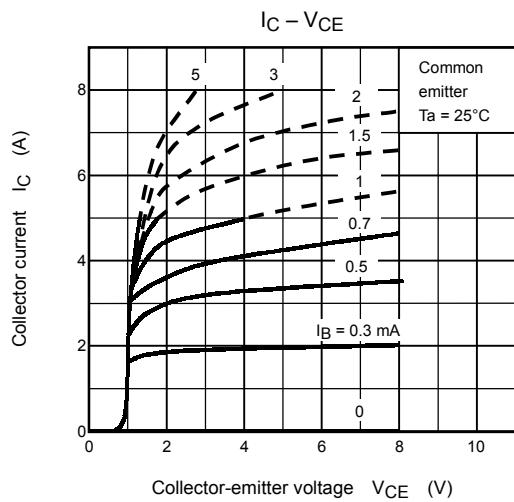
Characteristics		Symbol	Test Condition	Min	Typ.	Max	Unit
Collector cut-off current		ICBO	V _{CB} = 100 V, I _E = 0	—	—	100	μA
Emitter cut-off current		IEBO	V _{EB} = 6 V, I _C = 0	—	—	2.5	mA
Collector-emitter breakdown voltage		V (BR) CEO	I _C = 30 mA, I _B = 0	100	—	—	V
DC current gain	h _{FE} (1)		V _{CE} = 3 V, I _C = 3 A	2000	—	15000	
	h _{FE} (2)		V _{CE} = 3 V, I _C = 5 A	1000	—	—	
Collector-emitter saturation voltage	V _{CE} (sat) (1)		I _C = 3 A, I _B = 6 mA	—	1.1	1.5	V
	V _{CE} (sat) (2)		I _C = 5 A, I _B = 20 mA	—	1.3	2.5	
Base-emitter saturation voltage		V _{BE} (sat)	I _C = 3 A, I _B = 6 mA	—	1.7	2.5	V
Switching time	Turn-on time	t _{on}	 IB ₁ = -IB ₂ = 6 mA, duty cycle ≤ 1%	—	1.0	—	μs
	Storage time	t _{stg}		—	4.0	—	
	Fall time	t _f		—	2.5	—	

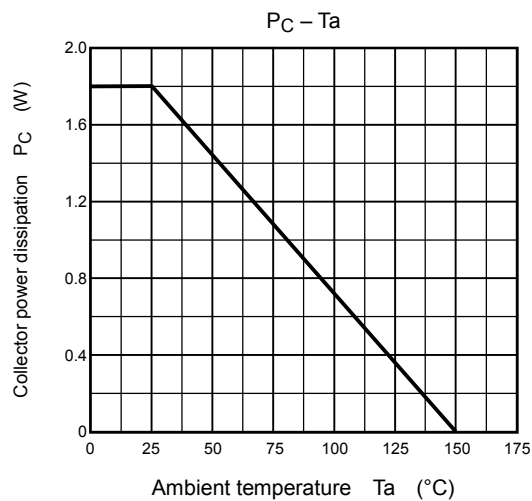
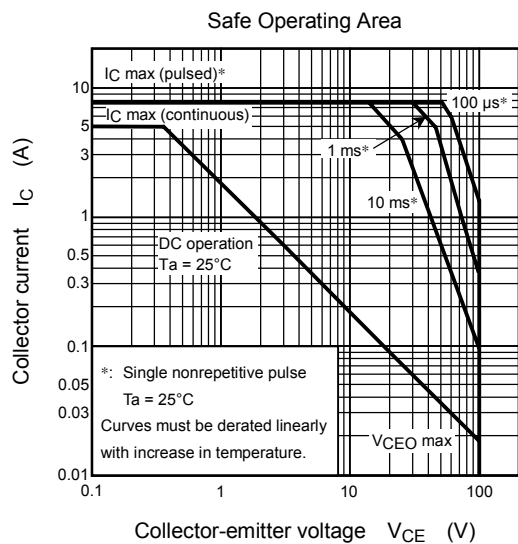
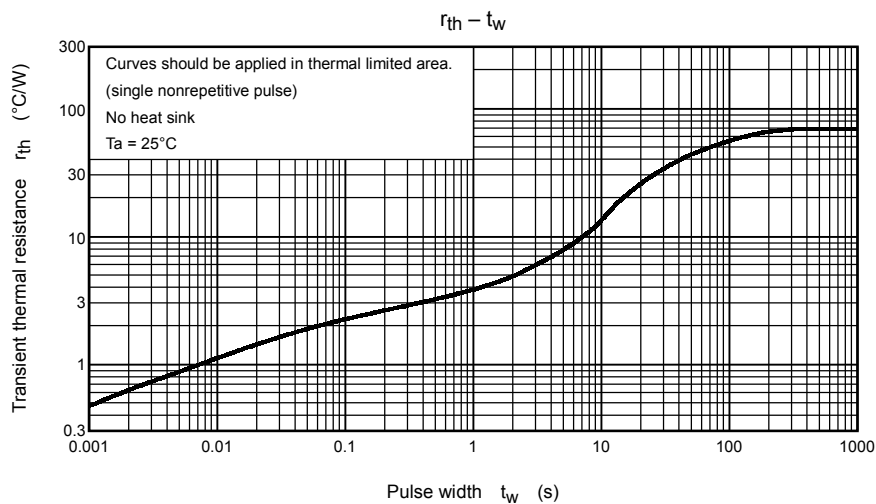
Marking



Explanation of Lot No.







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