

# Technical Data

## TRANSISTOR

### maximum ratings

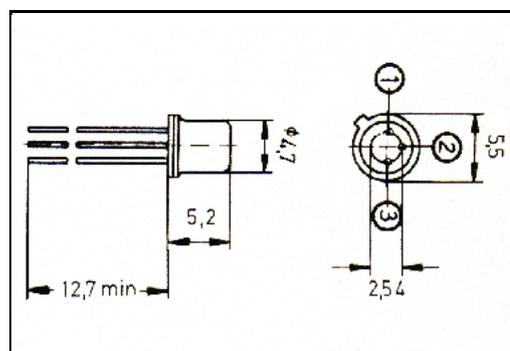
Voltage, Collector to Base (VCBO)	75.0	V	NO.	2N2222A-M
Voltage, Collector to Emitter (VCE)	40.0	V	TYPE	NPN
Voltage, Emitter to Base (VEBO)	6.0	V		
Collector Current (IC)	0.8	A		
Base Current (IB)	0.08	A	CASE	TO-18
Max. Power Dissipation (PT) at TC = 25 °C	1.8	W		MIL-S-19500
Max. Thermal Resistance (Rth J-C)	84.0	°C/W		BURN-IN 48h/125°C
Max. Junction Temperature (TJ)	200.0	°C		

### PERFORMANCE CHARACTERISTICS at $T_c = 25^\circ\text{C}$ , unless otherwise noted

NO.	SYMBOL	CONDITIONS	MIN.	MAX.	UNITS
1.	BVCEO	IC = 10 mA (1)	40.0	-	V
2.	BVCBO	IC = 10 $\mu$ A (1)	75.0	-	V
3.	BVEBO	IE = 10 $\mu$ A (1)	6.0	-	V
4.	ICBO	VCB = 60 V	-	10.0	nA
5.	-	VCB = 60 V, TA = 150 °C	-	10.0	$\mu$ A
6.	IEBO	VEB = 3 V	-	10.0	nA
7.	hFE	IC = 0.1 A, VCE = 10 V (1)	35.0	-	-
8.	-	IC = 1 mA, VCE = 10 V (1)	50.0	-	-
9.	-	IC = 10 mA, VCE = 10 V (1)	75.0	-	-
10.	-	IC = 150 mA, VCE = 10 V (1)	100.0	300.0	-
11.	-	IC = 500 mA, VCE = 10 V (1)	40.0	-	-
12.	VCE(SAT)	IC = 150 mA, IB = 15 mA (1)	-	0.3	V
13.	-	IC = 500 mA, IB = 50 mA (1)	-	1.0	V
14.	VBE(SAT)	IC = 150 mA, IB = 15 mA (1)	-	1.2	V
15.	-	IC = 500 mA, IB = 50 mA (1)	-	2.0	V
16.	fT	IC = 20 mA, VCE = 20 V	300.0	-	MHz
17.	Cobo	VCB = 10 V	-	8.0	pF
18.	Cebo	VEB = 0.5 V	-	25.0	pF
19.					
20.					

Notes (1)pulse-tested  $t_p \leq 300 \mu\text{s}$ , duty cycle  $\leq 2\%$

DIMENSIONS  
in mm



Marking 2N2222A-M + GREEN DOT

Customer GENERAL PURPOSE