



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



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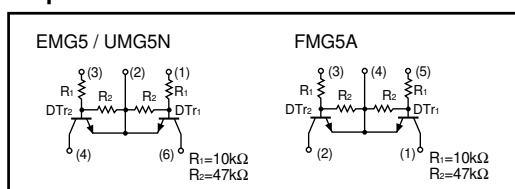
Emitter common (dual digital transistors)

EMG5 / UMG5N / FMG5A

●Features

- 1) Two DTC114Y chips in a EMT or UMT or SMT package.

●Equivalent circuit



●Absolute maximum ratings (Ta = 25°C)

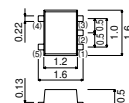
Parameter	Symbol	Limits	Unit
Supply voltage	V _{CC}	50	V
Input voltage	V _{IN}	40 -6	V
Output current	I _O I _C (Max.)	100 100	mA
Power dissipation	Pd	150 (TOTAL) 300 (TOTAL)	mW *1 *2
Junction temperature	T _j	150	°C
Storage temperature	T _{stg}	-55~+150	°C

*1 120mW per element must not be exceeded.

*2 200mW per element must not be exceeded.

●External dimensions (Units : mm)

EMG5

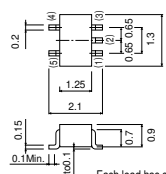


Each lead has same dimensions

ROHM : EMT5

Abbreviated symbol : G5

UMG5N

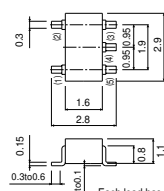


Each lead has same dimensions

ROHM : UMT5
EIAJ : SC-88A

Abbreviated symbol : G5

FMG5A



Each lead has same dimensions

ROHM : SMT5
EIAJ : SC-74A

Abbreviated symbol : G5

Transistors

●Electrical characteristics (Ta = 25°C)

Parameter	Symbol	Min.	Typ.	Max.	Unit	Conditions
Input voltage	$V_{I(off)}$	—	—	0.3	V	$V_{CC}=5V$, $I_O=100\mu A$
	$V_{I(on)}$	1.4	—	—		$V_O=0.3V$, $I_O=1mA$
Output voltage	$V_{O(on)}$	—	0.1	0.3	V	$I_O=5mA$, $I_I=0.25mA$
Input current	I_I	—	—	0.88	mA	$V_I=5V$
Output current	$I_{O(off)}$	—	—	0.5	μA	$V_{CC}=50V$, $V_I=0V$
DC current gain	G_I	68	—	—	—	$V_O=5V$, $I_O=5mA$
Transition frequency	f_T	—	250	—	MHz	$V_{CE}=-10V$, $I_E=5mA$, $f=100MHz$ *
Input resistance	R_I	7	10	13	$k\Omega$	—
Resistance ratio	R_2/R_1	3.7	4.7	5.7	—	—

* Transition frequency of the device

●Packaging specifications

Type	Package	Taping		
	Code	T2R	TR	T148
	Basic ordering unit (pieces)	8000	3000	3000
EMG5	○	—	—	—
UMG5N	—	○	—	—
FMG5A	—	—	—	○