



## ONE CHIP AM RADIO CIRCUIT CD7642CP

### ● DESCRIPTION

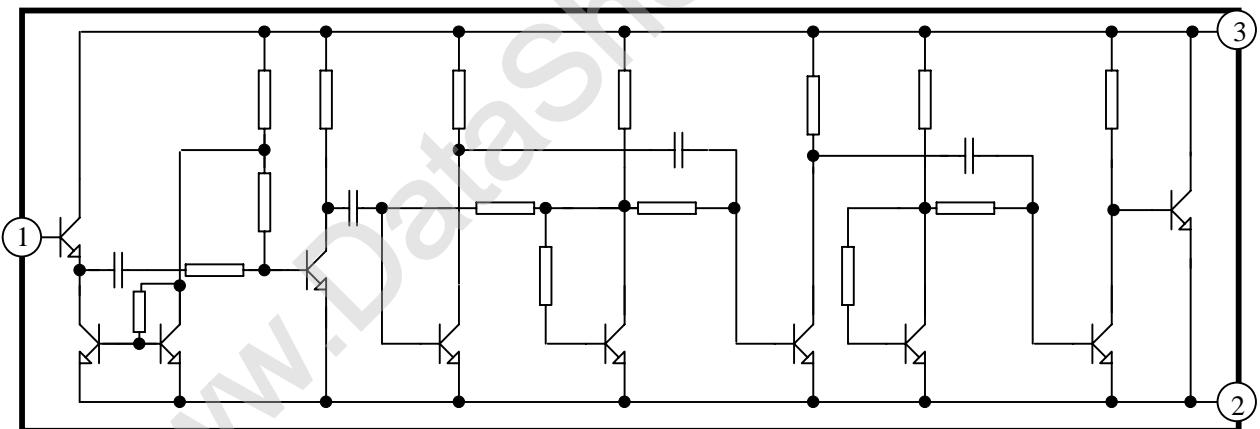
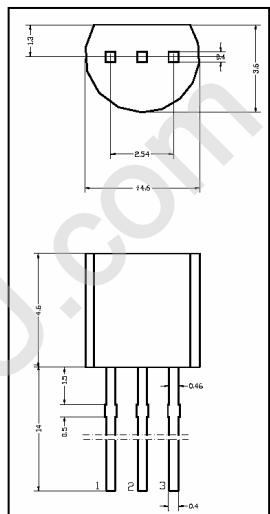
The CD7642CS is suitable for low voltage portable Radio, cassette system and other wireless AM system. The package of CD7642CS is TO-92.

### FEATURE

- Low operating voltage: Down to Vcc=1.3V
- Low Quiescent Current: Icco=0.2mA
- Low external component required.

### EQUIVALENT CIRCUIT

Outline Drawing

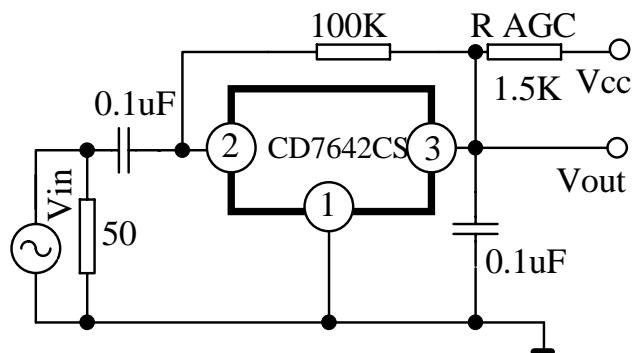
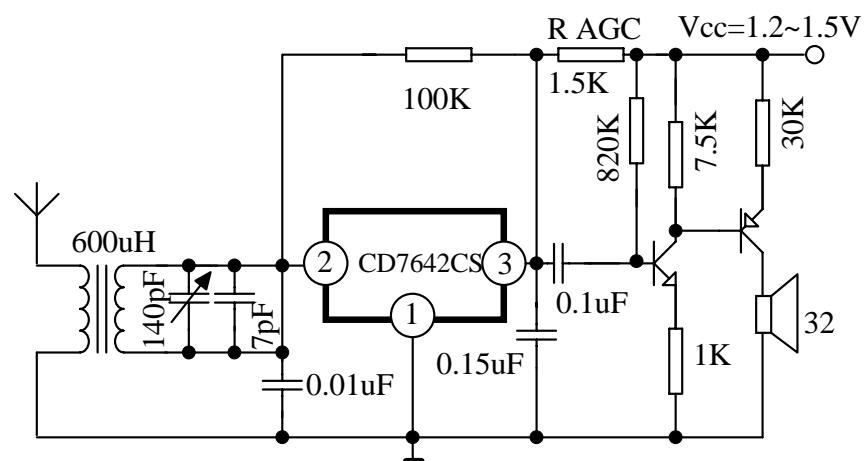


### ABSOLUTE MAXIMUM RATINGS (Ta=25°C)

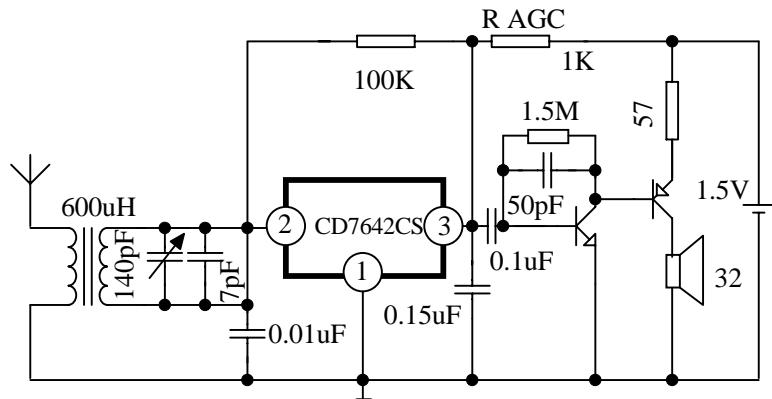
Characteristic	Symbol	Value	Unit
Supply Voltage	Vcc	6	V
Operating Temperature	Topr	-10~60	°C
Storage Temperature	Tstg	-55~150	°C

**ELECTRICAL CHARACTERISTICS**(Unless otherwise specified:  $T_a=25^\circ\text{C}$ ,  $V_{cc}=1.3\text{V}$ ,  $f_m=1\text{kHz}$ ,  $f_o=1\text{MHz}$ ,  $\text{MOD}=30\%$ )

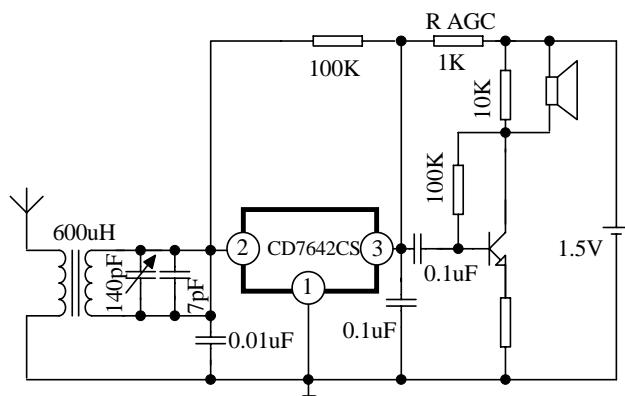
Characteristics	Test conditions	Symbol	Min.	Typ.	Max.	Unit
Supply Voltage		$V_{cc}$	1.2	1.3	1.6	V
Quiescent Current	$V_i=0$	$I_{cco}$	0.14	0.2	0.3	mA
Input Resistance		$R_i$		3		$M\Omega$
Maximum Sensitivity	$V_{OD}=3\text{mV}$	$SM$		600		$\mu\text{V}$
Detector Output Voltage	$V_i=10\text{mV}$	$V_{OD}$	5	15	30	mV
The Range of AGC		$\Delta A$		30		dB

**TEST CIRCUIT****APPLICATION CIRCUIT**

Circuit 1



Circuit 2



Circuit 3

**CHARACTERISTIC CURVE**