## Features

- Low cost
- Consumer electronics
- Microprocessor systems
- Excellent for automotive applications

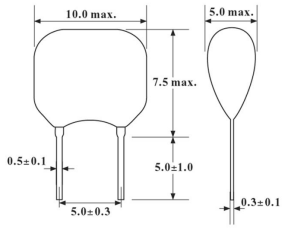
# Res. THT

## Specification

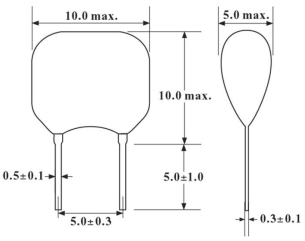
| Type | ZTAWS/MG | ZTARS/MG | ZTA/MT | ZTA/MX |
|---|---|---|---|---|
| Frequency Range (MHz) | 2,00~ 6,00 | 6,01 ~ 12,00 | 6,00 ~ 13,00 | 12,00 ~ 60,00 |
| Frequency Tolerance (25°C) | ±0,5% | ±0,5% | ±0,5% | ±0,5% |
| Temperature Stability (-20°C - +80°C) | ±0,3% | ±0,3% | ±0,3% | ±0,3% |
| Aging (over 10 years) | ±0,3% | ±0,3% | ±0,3% | ±0,3% |
| Load capacitance (pF) C1 | 30 | 30 | 30 | 30 |
| Load capacitance (pF) C2 | 30 | 30 | 30 | 30 |
| Resonant impedance (Ω) max. | 80 | 50 | 30 | 25 |
| Content of bag | 500 pcs | 500 pcs | 500 pcs | 500 pcs |
| According to RoHS 2011/65/EU | yes | yes | yes | yes |

## Drawing (mm)

ZTAMG Series




ZTAMT Series




ZTAMX Series

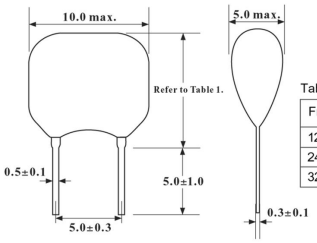
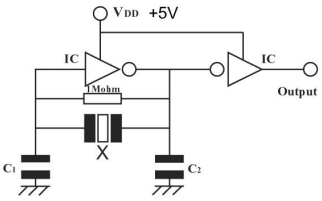



Table 1.

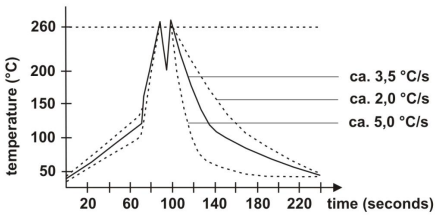
| Frequency Range | Height |
|---|---|
| 12.00 ~ 23.99MHz | 10.0mm max. |
| 24.00 ~ 31.99MHz | 7.5 mm max. |
| 32.00 ~ 60.00MHz | 6.5 mm max. |

## Test Circuit/Waveform




C1 C2 : as listed
IC: 1/6 74HCU04 x 2 (MG; MX)
1/6 4069UBP x 2 (MT)
X : Ceramic Resonator

## Soldering profile




## Order code

| R | - 20.000000M | - ZTA/MX | - 0.5 | - 0.3 | - H | - 30/30 |
|---|---|---|---|---|---|---|
| **Part** | **Frequency** | **Type/Package** | **Frequency tolerance** | **Temperature tolerance** | **Temperature range** | **Load capacitance** |
| R=Resonator | M=MHz | ZTAWS/MG<br>ZTARS/MG<br>ZTA/MT<br>ZTA/MX | ±%<br>(25°C) | ±%<br>(Temp. range) | H=-20°C ~ +80°C | pF<br>C1/C2 |