Timing Mode: **SINGLE SHOT ON BREAK**
Category: **TIMER WITH RELAY**
Series: **TGPS**

**CUBE RELAY, 10 AMPS**

**TGPS Timers**
TGPS series Cube Relay Single Shot On Break timers are a unique combination of digital CMOS timing circuitry with a relay output in a compact 2" x 2" configuration.

These units provide the same functional performance as plug-in relay timers, but at significant cost savings.

Key features: Normally Open (N.O.) isolated initiate switch; relay common is totally isolated.

**Timing Mode**
Power must be applied to the input voltage terminals continuously. Upon closing and opening an external initiate switch, the load is instantaneously energized and the time delay cycle starts.

When the delay period expires, the timer will reset to its original position and the timer is ready for another cycle.

<table>
<thead>
<tr>
<th>INPUT VOLTAGE</th>
<th>ON</th>
<th>RESET</th>
</tr>
</thead>
<tbody>
<tr>
<td>OFF</td>
<td></td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>EXTERNAL INITIATE SWITCH</th>
<th>CLOSED</th>
<th>OPEN</th>
</tr>
</thead>
<tbody>
<tr>
<td>ON</td>
<td></td>
<td></td>
</tr>
<tr>
<td>OFF</td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>LOAD</th>
<th>ON</th>
<th>OFF</th>
</tr>
</thead>
<tbody>
<tr>
<td>DELAY</td>
<td></td>
<td></td>
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</tbody>
</table>

**FEATURES**

- High current-carrying capacity up to 10 amps
- Transient protected
- 100% Load isolation
- No leakage in N.O. position
- No heat sinking required
- Available in any time delay period required
- Digital CMOS timing
- No minimum load required
- Totally encapsulated for protection from harsh environments
- 100% Operational testing before shipping
- RoHS compliant
**FIXED TIME PERIODS**

**Input Voltage:**
- VDC: 12, 24-28 or 48
- VAC: 24, 48, 120 or 230, 50/60Hz
- Special AC or DC voltages available

**Time Delay:**
- **Timing Mode:** Single Shot on Break
- **Type:** Digital CMOS
- **Time Range:** 0.2 seconds to 24 hours
- **Time Adjustments:** Factory-fixed time period; variable, with adjustments on timer, or terminals for external resistor or potentiometer

**Repeatability:** ±0.5%

**Setting Accuracy:**
- **Fixed time period:** ±10% of nominal time.
- **Variable time range:**
  - +15% -5% max. time, -10% min. time

**Reset/Recycle Time:** 25 milliseconds

**Initiate Time:** 6 milliseconds or less

**Relay Life Expectancy:**
- **Mechanical:** 20 million operations
- **Electrical:** 100,000 operations

**Protection:**
- **Polarity Protection:** All DC units have reverse polarity protection
- **Transient Protection:** 18 joules
- **Dielectric Strength:** 1800V RMS 60Hz

**Temperature Ranges:**
- **Storage:** -40°C to +85°C
- **Operating:** -25°C to +65°C

**Physical Data:**
- **Mounting:** Surface with one #8 screw
- **Connection & Termination:** 0.25” quick connects

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**OPTIONS SELECTION**

<table>
<thead>
<tr>
<th>Mode of Operation</th>
<th>Series</th>
<th>Input Voltage</th>
<th>Examples of Time Ranges</th>
<th>Time Adjustment Method</th>
<th>Relay Output Form</th>
<th>Options</th>
</tr>
</thead>
<tbody>
<tr>
<td>Single Shot On Break</td>
<td>TGPS</td>
<td>1 120 VAC</td>
<td>0001 0.2 to 1 sec.</td>
<td>A Variable, integral, knob on timer.</td>
<td></td>
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</tr>
<tr>
<td></td>
<td></td>
<td>2 230 VAC</td>
<td>0010 0.2 to 10 sec.</td>
<td>B Variable, external knob remote.</td>
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</tr>
<tr>
<td></td>
<td></td>
<td>3 24 VAC</td>
<td>0100 2 to 100 sec.</td>
<td>C Fixed, internal, factory set.</td>
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<td></td>
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<tr>
<td></td>
<td></td>
<td>4 24-28 VDC</td>
<td>Any range up to 24 hours available.</td>
<td>D Fixed, external, resistor remote.</td>
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<tr>
<td></td>
<td></td>
<td>5 48 VAC</td>
<td></td>
<td></td>
<td>1 SPDT</td>
<td>H 10 Amps</td>
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<tr>
<td></td>
<td></td>
<td>6 48 VDC</td>
<td></td>
<td></td>
<td>2 SPST (N.O.)</td>
<td>S Special</td>
</tr>
<tr>
<td></td>
<td></td>
<td>7 12 VDC</td>
<td></td>
<td></td>
<td>3 SPST (N.C.)</td>
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<td></td>
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<td>8 Any in between AC voltage (specify)</td>
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<tr>
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<td>9 Any in between DC voltage (specify)</td>
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**Specifications subject to change without notice.**