

## Astable and Monostable Multivibrator and Applications of Astable Multivibrator

### 1. Astable Multivibrator:

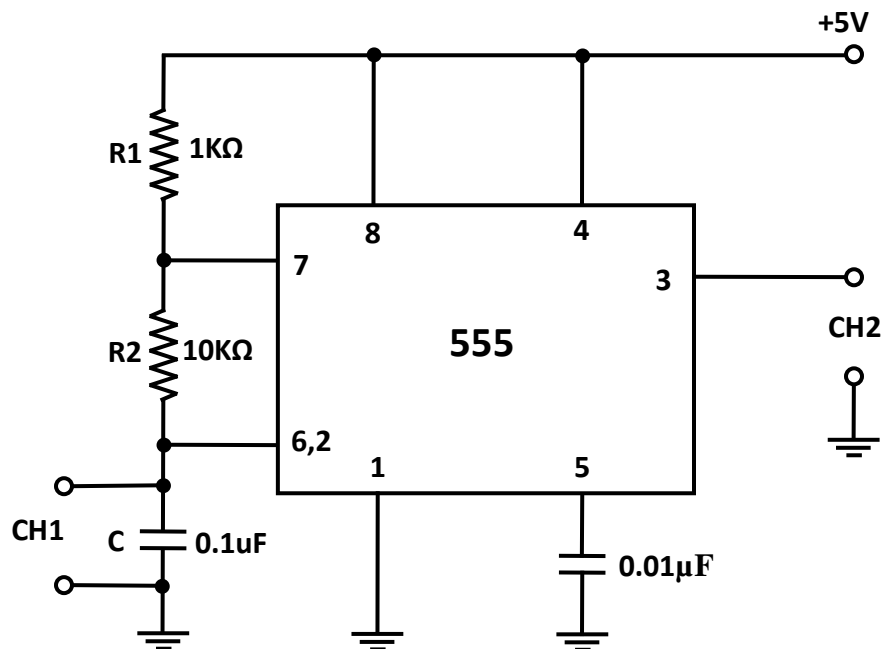
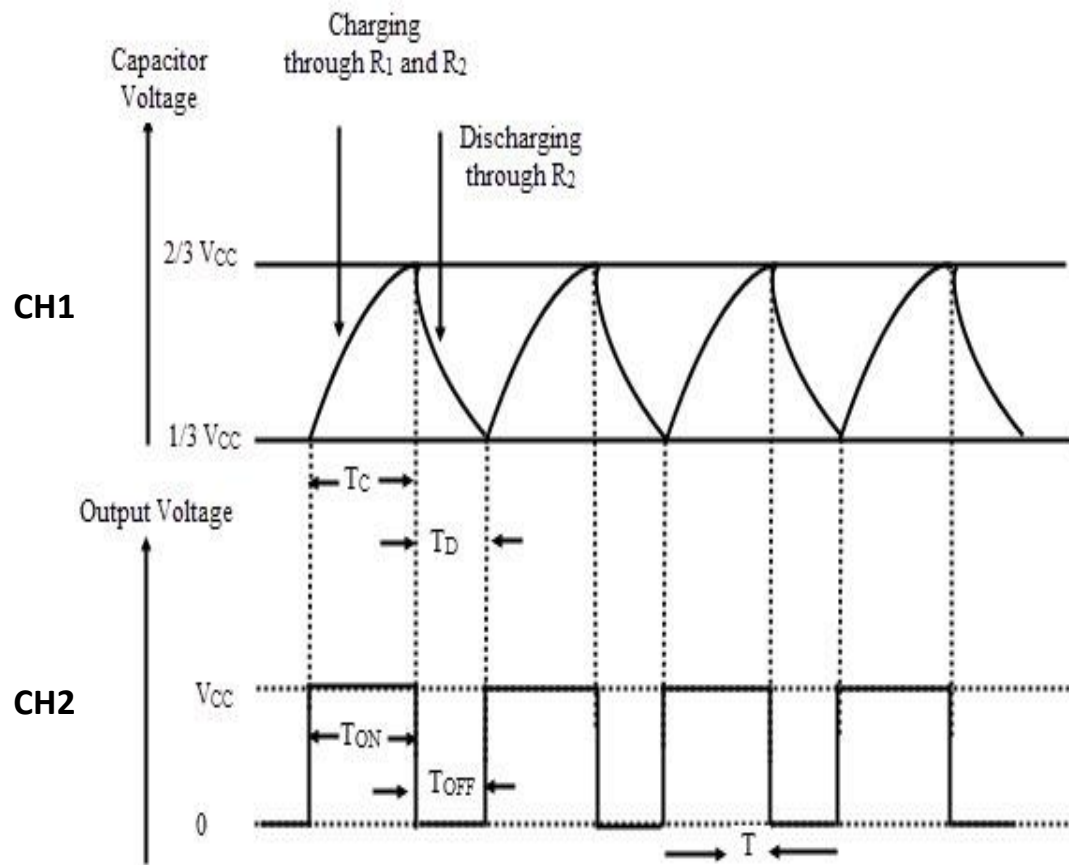


Fig 8.1: Astable Multivibrator Circuit



**Fig 8.2: Wave forms for Astable multivibrator .**

$$T_{ON} = 0.69 (R_1 + R_2)C$$

$$T_{OFF} = 0.69 (R_2)C$$

## 2. Monostable Multivibrator:

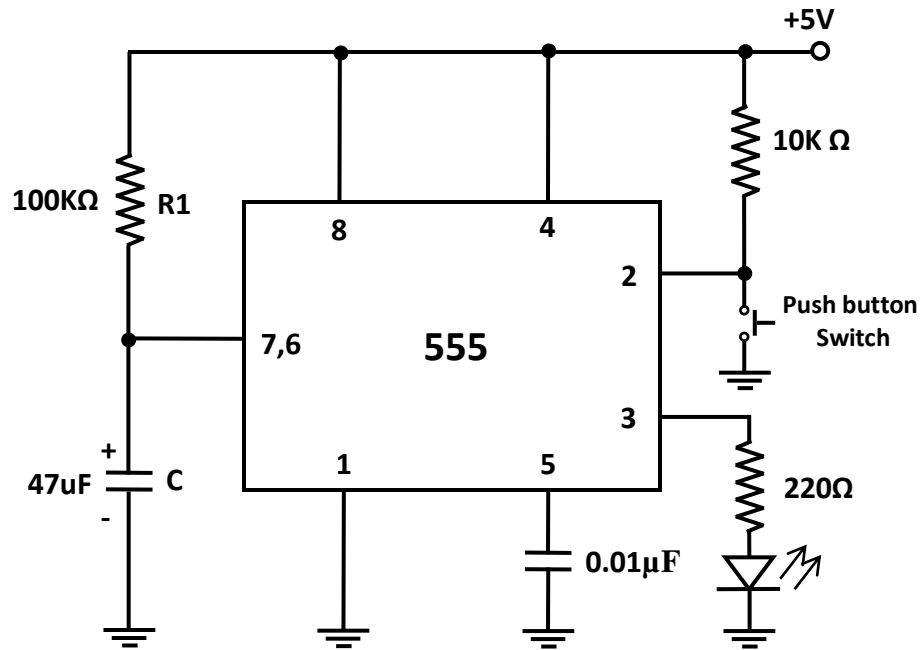


Fig 8.3: Monostable Multivibrator Circuit to glow LED at one shot.

$$\text{LED ON TIME} = T_{ON} = 1.1(R_1)C$$

### 3. Screamer:

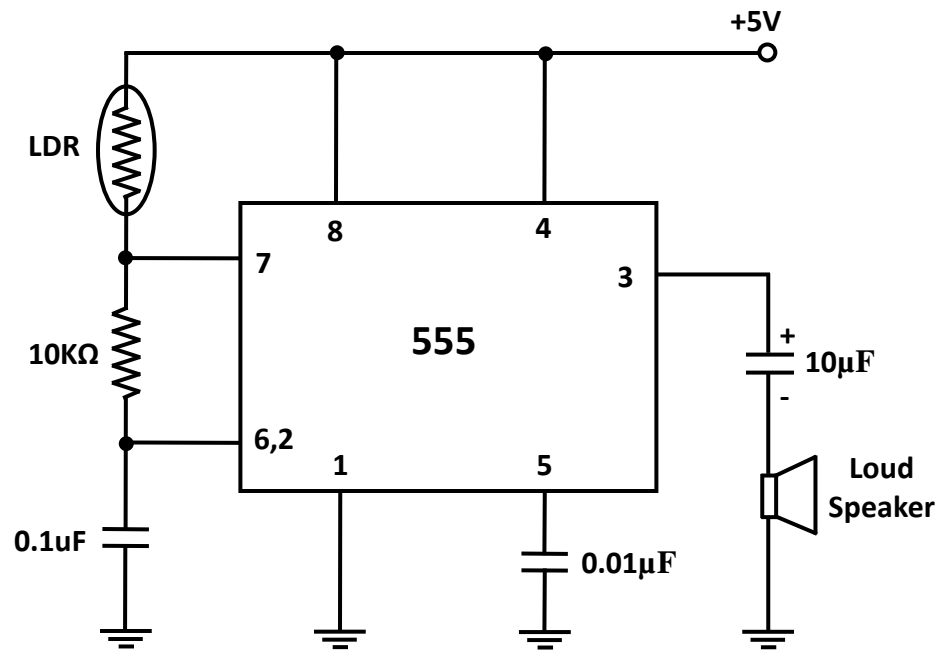


Fig 8.4: Screamer Circuit

#### 4. Rail Road Flashing Lights:

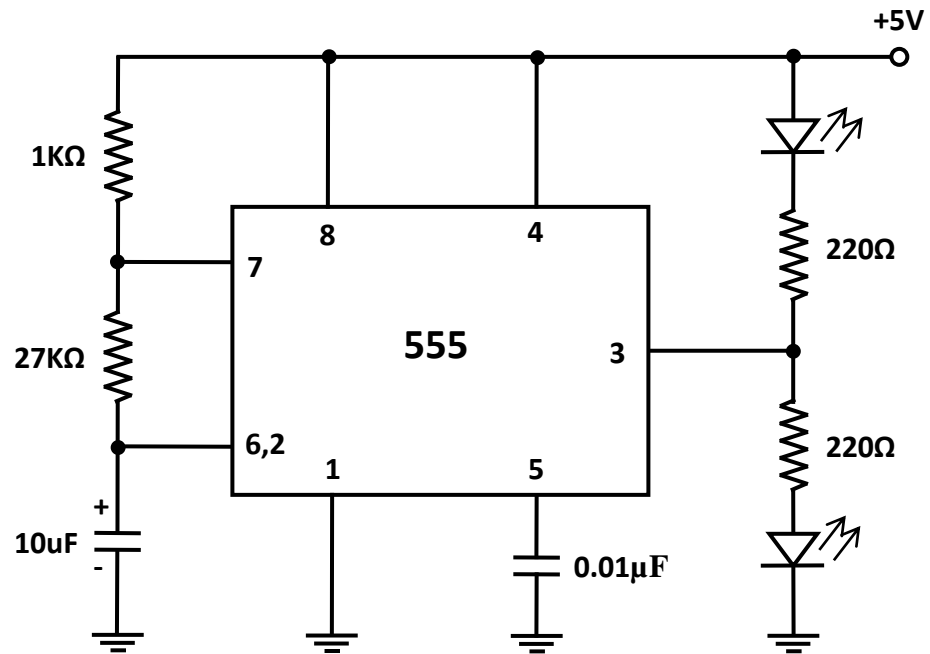


Fig 8.5: Rail Road Flasher Circuit