

Thinking of a software

- Two push buttons are needed to increment the prescaler
- This can be achieved by counting from 1 to 5 and each count refers to one of the five values of the ATmega 32 prescalers 1 to 1 and 2 to 8 and so on
- If the counting value is either greater than 5 or less than zero, the software will reset both the generated frequency and the counting number
- The digital converted value from potentiometer will be saved in a variable
- This variable will be used to set the ocr0 compare value

Then the TCNT0 is sent to a port to be converted to an analog signal using r2 ladder circuit

Hardware required

- microcontroller Atmega32 50 LE
- breadboard
- 20cm Male to Male 40 Jumper Set Connecting Wire 20LE
- K Ω Carbon Resistor 1W – 2 Kohm 10 LE
- DSO UNI-T UTD-2062 60 MHz oscilloscope 8200 LE
- Two push buttons

Power supply circuit in case of using ac voltage or 12v dc battery