

CP316

Initializing Registers

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Example

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Here's an example configuring Timer 0.

Here's a code fragment:

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```
;;; initialization  
movlf b'10001000',T0CON;enable t0-no prescale
```

Doing it all in one assignment hides the details.

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Showing each step makes the purpose more obvious.

One way to do this is:

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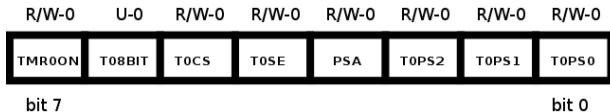
```
;;; initialization
  clrf  T0CON ;clear register
  bsf   T0CON, PSA ; bypass prescaler
  bsf   T0CON, TMR0ON; turn on timer
```

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Note some bits don't matter with these settings.

T0CON



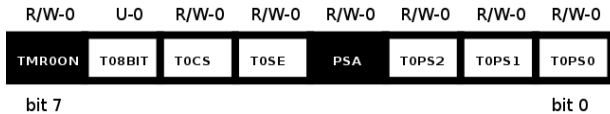
Start with all bits *cleared*

T0CON



Set PSA

T0CON



Set TMR0ON

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bcf   T0CON, T08BIT; 16-bit mode
bcf   T0CON, T0CS; internal clock
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Note that other bits don't matter with these settings.

T0CON

R/W-0	U-0	R/W-0	R/W-0	R/W-0	R/W-0	R/W-0	R/W-0
TMR0ON	T08BIT	T0CS	T0SE	PSA	T0PS2	T0PS1	T0PS0
bit 7							bit 0

Start with all bits *set*

T0CON

R/W-0	U-0	R/W-0	R/W-0	R/W-0	R/W-0	R/W-0	R/W-0
TMR0ON	T08BIT	T0CS	T0SE	PSA	T0PS2	T0PS1	T0PS0
bit 7							bit 0



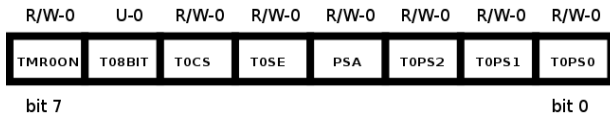
Clear T08BIT

T0CON



Clear T0CS

T0CON



X

X

X

X

These bits don't matter