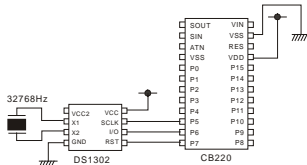


NOTE 9. DS1302 RTC

DS1302 RTC (Real Time Clock) is a chip that will acts as an electronic time keeper. It has the ability to keep time and date in real-time. We will show you how to implement this clock chip into your application in this note.



Pin	Function	I/O Direction	Explanation
RST	Reset	Input	Data transfer when High
SCLK	System Clock	Input	Clock signal
I/O	Data Input/Output	Input / Output	Data input/output

<Filename: ds1302.cul>

```

Const Device = CB220
Const iorst = 7
Const iodio = 6
Const ioclk = 5
Dim I As Integer
Dim adr As Byte
High iorst
Shiftout ioclk,iodio,0,&h8e,8
Shiftout ioclk,iodio,0,0,8
Low iorst
Delay 1
High iorst
Shiftout ioclk,iodio,0,&h80,8
Shiftout ioclk,iodio,0,&H50,8
    
```

```

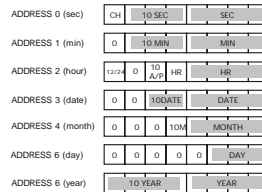
Low iorst

Do
    High iorst
    adr = &h81
    Shiftout ioclk,iodio,0,adr,8
    i = Shiftin(ioclk,iodio,4,8)
    Debug Hex i,cr
Low iorst
    Delay 1000
Loop
    
```

The above code will read ADDRESS 0, seconds value, and display it onto the DEBUG window.

At the beginning of the program, we will enable writes to the DS1302 chip and set the ADDRESS 0 to 50 seconds.

Within the Do Loop, we will read the data from DS1302. The DS1302 chip has 6 addresses as shown below:



These addresses can be used to read and write to the DS1302.

Please note that the data is in BCD code format.

<END>