
Subject: Re: Dates conversions

Posted by [Dick Jackson](#) on Thu, 05 Nov 2015 23:08:15 GMT

[View Forum Message](#) <> [Reply to Message](#)

On Thursday, 5 November 2015 10:47:30 UTC-8, luc...@gmail.com wrote:

> Hello I have a problem and I am trying to see if IDL can solve this

>

> I have an initial date

> 08/05/2012 05:14:39

>

> and then my data is arrange in days and fractions of days

> DAY

> 9.77013 -> meaning 9.77013 days after the initial date

> 9.77037

> 9.77060

> 9.77083

> 9.77106

> 9.77130

> 9.77153

> 9.77175

> 9.77199

> 9.77222

> 9.77245

>

> is there a way that IDL can help me to convert each point to real date and time given the start date and time ?

>

>

> Thanks

This should do it.

```
d0Str = '08/05/2012 05:14:39'
```

```
;; Assuming mm/dd/yyyy: correct?
```

```
d0Jul = 0.0D ; Initialize to Double for millisecond accuracy
```

```
ReadS, d0Str, d0Jul, $
```

```
Format='(C(CMOI2,X,CDI2,X,CYI4,X,CHI2,X,CMI2,X,CSI2))'
```

```
dOffsets = [9.77013, 9.77037, 9.77060, 9.77083, 9.77106, 9.77130, 9.77153, $  
            9.77175, 9.77199, 9.77222, 9.77245]
```

```
dJuls = d0Jul + dOffsets
```

```
Print, [d0Jul, dJuls], $
```

```
Format='(C(CMOI2.2,"/",CDI2.2,"/",CYI4.4,X,CHI2.2,";",CMI2.2, ":",CSI2.2))'
```

For output, I get:

```
08/05/2012 05:14:39
08/14/2012 23:43:38
08/14/2012 23:43:58
08/14/2012 23:44:18
08/14/2012 23:44:38
08/14/2012 23:44:58
08/14/2012 23:45:19
08/14/2012 23:45:39
08/14/2012 23:45:58
08/14/2012 23:46:18
08/14/2012 23:46:38
08/14/2012 23:46:58
```

Those are truncated seconds, by the way. For more precision (which may be illusory):

Print, [d0Jul, dJuls], \$

Format='(C(CMOI2.2,"/","CDI2.2,"/","CYI4.4,X,CHI2.2,":","CMI2.2,":","CSF6.3))'

```
08/05/2012 05:14:39.000
08/14/2012 23:43:38.232
08/14/2012 23:43:58.968
08/14/2012 23:44:18.840
08/14/2012 23:44:38.712
08/14/2012 23:44:58.584
08/14/2012 23:45:19.320
08/14/2012 23:45:39.192
08/14/2012 23:45:58.200
08/14/2012 23:46:18.936
08/14/2012 23:46:38.808
08/14/2012 23:46:58.680
```

Dick Jackson Software Consulting Inc.

Victoria, BC, Canada --- <http://www.d-jackson.com>
