
Subject: Plot with X-Axis ticks as string
Posted by [Kai](#) on Tue, 26 Jan 2016 12:58:27 GMT
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Hello everyone!

I'd like to plot monthly values of a parameter. The months go from April to November. How can I implement ticks at the x-axis which are simple strings, e.g. 'Apr', 'May'

So I plotted something and I tried to add a fitted x-axis to the plot as follows:

```
myplot_c1 = PLOT(parameters, NAME='Cluster', COLOR='red', XTEXT_COLOR='white',
YSTYLE=2, XSTYLE=3, YTITLE='Parameter', MIN_VALUE=-1, MAX_VALUE=1,
XTICKINTERVAL=1, YRANGE=[0.15,0.5])
```

```
xax = AXIS('X', LOCATION=[0,0.15], TICKVALUES=['Mar','Apr','May','Ju n','Jul','Aug','Sep','Oct'],
MINOR=1, MAJOR=-1, TICKLEN=0.015, TICKFONT_SIZE=11, TICKINTERVAL=1)
```

Somehow the monthly ticks just won't appear.

Any suggestions?

Cheers,
Kai

Subject: Re: Plot with X-Axis ticks as string
Posted by [Kai Heckel](#) on Sun, 31 Jan 2016 09:44:56 GMT
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Am Dienstag, 26. Januar 2016 13:58:30 UTC+1 schrieb Kai:

> Hello everyone!

>

> I'd like to plot monthly values of a parameter. The months go from April to November. How can I implement ticks at the x-axis which are simple strings, e.g. 'Apr', 'May'

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```

>

> Somehow the monthly ticks just won't appear.

>

> Any suggestions?
>
> Cheers,
> Kai

Does no one have any suggestions?

Regards,
Kai

Subject: Re: Plot with X-Axis ticks as string
Posted by [Paul Van Delst\[1\]](#) **on** Mon, 01 Feb 2016 16:26:24 GMT
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Hello,

Have a look at:

http://www.exelisvis.com/docs/LABEL_DATE.html

Also, playing around with user-defined functions for tick labeling might be useful (although I think the above is what you need). See:

http://www.exelisvis.com/docs/graphkeyw.html#graphkeyw_32887_78166_370350

in particular the section titled: "The name of a user-defined function:"

cheers,

paulv

On 01/31/16 04:44, Kai Heckel wrote:

> Am Dienstag, 26. Januar 2016 13:58:30 UTC+1 schrieb Kai:
>> Hello everyone!
>>
>> I'd like to plot monthly values of a parameter. The months go from
>> April to November. How can I implement ticks at the x-axis which
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> Does no one have any suggestions?
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> Regards, Kai
>
```

Subject: Re: Plot with X-Axis ticks as string

Posted by [Paul Van Delst\[1\]](#) on Mon, 01 Feb 2016 16:31:51 GMT

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Actually, since you're using function graphics, have a look at the C()
format codes:

http://www.exelisvis.com/docs/format_codes.html#files_283972_0996_2823814

But, again, I think label_date() is what you need.

For example in some of my code I do:

```
; Set up the date labeling
date_label = LABEL_DATE(DATE_FORMAT='%D %M%C%Y')
```

and then

```
tp[i] = PLOT( date_time, timing[*,i], $
    TITLE='Host : ' + host + '!C' + $
    'CRTM root : ' + crtroot + '!C' + $
    'Sensor Id : ' + sensor_id + '!C' + $
    'CRTM version : ' + crtver + '!C' + $
    'Current Date : ' + SYSTIME(), $
    XTITLE='Date', $
    YTITLE='Run time (sec.)', $
    XTICKFORMAT='LABEL_DATE', $
    /XSTYLE, $
    ...etc...
```

See the value for XTICKFORMAT?

cheers,

paulv

On 02/01/16 11:26, Paul van Delst wrote:

```
> Hello,  
>  
> Have a look at:  
>  
> http://www.exelisvis.com/docs/LABEL_DATE.html  
>  
>  
> Also, playing around with user-defined functions for tick labeling might  
> be useful (although I think the above is what you need). See:  
>  
> http://www.exelisvis.com/docs/graphkeyw.html#graphkeyw_32887 78166_370350  
>  
> in particular the section titled: "The name of a user-defined function."  
>  
> cheers,  
>  
> paulv  
>  
> On 01/31/16 04:44, Kai Heckel wrote:  
>> Am Dienstag, 26. Januar 2016 13:58:30 UTC+1 schrieb Kai:  
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>>> XTICKINTERVAL=1,YRANGE=[0.15,0.5])  
>>>  
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>>> AXIS('X',LOCATION=[0,0.15],TICKVALUES=['Mar','Apr','May','Ju n','Jul','Aug','Sep','Oct'],  
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>>> MINOR=1, MAJOR=-1, TICKLEN=0.015,TICKFONT_SIZE=11,TICKINTERVAL=1)  
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>>> Any suggestions?  
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>>> Cheers, Kai
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>> Does no one have any suggestions?
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>> Regards, Kai
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Subject: Re: Plot with X-Axis ticks as string
Posted by [lecacheux.alain](#) on Mon, 01 Feb 2016 18:23:54 GMT
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Le lundi 1 février 2016 17:31:54 UTC+1, Paul van Delst a écrit :

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> and then
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> 'Sensor Id : ' + sensor_id + '!C' + \$
> 'CRTM version : ' + crtversion + '!C' + \$
> 'Current Date : ' + SYSTIME(), \$
> XTITLE='Date', \$
> YTITLE='Run time (sec.)', \$
> XTICKFORMAT='LABEL_DATE', \$
> /XSTYLE, \$
> ...etc...
>
> See the value for XTICKFORMAT?
>
> cheers,
>
> paulv
>
> On 02/01/16 11:26, Paul van Delst wrote:
>> Hello,
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>> Have a look at:

```

>>
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>>
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>>>> Somehow the monthly ticks just won't appear.
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>>> Does no one have any suggestions?
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>>> Regards, Kai
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```

If your time variable is expressed in Julian days, you can even put a C format string in the

TICKFORMAT keyword. For instance, with :

pl = plot(jd, x, ..., XTICKFORMAT='(C(CYI4.4,"/",CMOI2.2,"/",CDI2.2))',...)

you get axis times such as 2016/02/01.

alx.

Subject: Re: Plot with X-Axis ticks as string

Posted by [Paul Van Delst\[1\]](#) on Mon, 01 Feb 2016 18:37:18 GMT

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On 02/01/16 13:23, alx wrote:

>
> If your time variable is expressed in Julian days, you can even put
> aC format string in the TICKFORMAT keyword. For instance, with :
> pl = plot(jd, x, ..., XTICKFORMAT='(C(CYI4.4,"/",CMOI2.2,"/",CDI2.2))',...)
> you get axis times such as 2016/02/01.
> alx.

Inline!

Très cool.

Subject: Re: Plot with X-Axis ticks as string

Posted by [Charlie Roberts](#) on Sun, 10 Apr 2016 18:16:44 GMT

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On Mon, 1 Feb 2016 11:26:24 -0500, Paul van Delst

<paul.vandelst@noaa.gov> wrote:

> On 01/31/16 04:44, Kai Heckel wrote:

>> Am Dienstag, 26. Januar 2016 13:58:30 UTC+1 schrieb Kai:

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>>>

>>> I'd like to plot monthly values of a parameter. The months go from

>>> April to November. How can I implement ticks at the x-axis which

>>> are simple strings, e.g. 'Apr', 'May'

>>>

How about reading the User's Guide? You can even get it on the net.

Page 58 of the User's Guide to PV Wave 7.5.

Example 1: Specifying Tick Labels and Values

and also

Example 2: Specifying Tick Lengths

on pp. 59-60.
