
Subject: How to read data with format codes?

Posted by [Adam Solomon](#) on Sun, 14 Mar 2010 00:38:44 GMT

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Hi all, I've been pulling my hair out over using readf with a format code. So I have a data file with three columns of floats, all separated by a |. Here's an example:

```
| 355.9559189095| -79.4625574877| 0.279817 |  
| 355.5057979042| -79.4067330132| 0.189663 |  
| 359.5215546187| -79.7976864503| 0.161308 |  
| 357.7890741750| -79.6427829568| 0.026100 |  
| 354.7163524970| -79.3099884939| 0.026578 |  
| 354.6329916471| -79.3061286761| 0.025486 |  
| 0.0561720211 | -79.8234642170| 0.025670 |  
| 357.3786228505| -79.5728335169| 0.000030 |  
| 356.7569554568| -79.5138546776| 0.199416 |  
| 355.0388858964| -79.3264538270| 0.190393 |  
| 354.8099356150| -79.2912157538| 0.026006 |  
| 352.5968356937| -79.0184276231| 0.207497 |  
| 352.4362834602| -79.0094360366| 0.217226 |  
| 0.1800716026 | -79.8081762850| 0.091767 |  
| 359.0525340400| -79.7227001135| 0.205676 |  
| 354.7045386126| -79.2652363648| 0.119250 |
```

So every format code I've used which has even come close to working runs into issues at one point or another, probably because of the variable spacing. I want to read this file into three arrays, or a 3xlots array, or whatever - just any way to read in this data!! It's unbelievable that such a simple task is proving to be so difficult.

I won't bore you with all the format codes I've tried (none of which have worked) but here's the most recent example:

```
data=fltarr(3,rows-100);the 100 is so i don't run into EOF issues yet,  
just for testing  
readf,lun,data,format='(3(2x,F0.0))'
```

The problems with this particular one are that when the first column is longer (as in most of these examples), the minus sign doesn't get read in the second column, and there may be issues reading the third column (not sure; will look into it some more).

What's the appropriate way to read these data in?

Subject: Re: How to read data with format codes?

Posted by [Gray](#) on Mon, 15 Mar 2010 02:39:40 GMT

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On Mar 13, 8:38 pm, Adam Solomon <rampa...@gmail.com> wrote:

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> code. So I have a data file with three columns of floats, all
> separated by a |. Here's an example:

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> is longer (as in most of these examples), the minus sign doesn't get
> read in the second column, and there may be issues reading the third
> column (not sure; will look into it some more).

>
> What's the appropriate way to read these data in?

I's just use readcol from Astrolib.

Subject: Re: How to read data with format codes?
Posted by [H. Evans](#) on Tue, 16 Mar 2010 14:26:24 GMT
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On Mar 14, 1:38 am, Adam Solomon <rampa...@gmail.com> wrote:

>
> What's the appropriate way to read these data in?

I would have thought the simplest solution using only IDL functions was:

```
x = (read_ascii('test.lis',delim="|")).field1[[1,2,3],*]
```

H.

Subject: Re: How to read data with format codes?
Posted by [penteado](#) on Tue, 16 Mar 2010 15:59:49 GMT
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On Mar 16, 11:26 am, "H. Evans" <blogs...@googlemail.com> wrote:

> I would have thought the simplest solution using only IDL functions
> was:
>
> x = (read_ascii('test.lis',delim="|")).field1[[1,2,3],*]

That is right. I forgot that read_ascii can take just the delimiter as a keyword, without needing the whole template.
