Subject: Re: Simple format code issue.
Posted by polystethylene on Wed, 09 Dec 2009 20:07:09 GMT
View Forum Message <> Reply to Message

You know what, I'm just being stupid.

It is being held to the desired precision isn't it? I'm just not
printing it out at the desired precision. What a fool.

Sorry guys - nothing to see here, please disperse :D

Subject: Re: Simple format code issue.
Posted by penteado on Wed, 09 Dec 2009 20:09:24 GMT
View Forum Message <> Reply to Message

On Dec 9, 6:02 pm, polystethylene <polystethyl...@hotmail.com> wrote:
> This one should be a doddle to resolve; but I can't for the life of me
> see what I'm doing wrong.
>
> I have 2 columns of data like this:
>
> 5147.475098 0.987662
> 5147.476562 0.985164
> 5147.478516 0.975080
> 5147.479980 0.991375
> 5147.481445 0.982826
> 5147.482910 0.987368
>
> etc...
>
> I would normally read this in with a format code like this:
>
> (2x,F0,3x,F0) - or sometimes drop the x's as you don't really need
> them...
>
> Anyway, this code reads the data in to 8 sig fig (1st column), and 6
> sig fig (second column)
>
> So then I tried a code of (F10.6, F0)... and I get the same issue - I
> can't get more than 4 d.p precision...
>
> I tried it with Doubles as well; but no luck. This has got to be
> simple right? Format codes are a weakness of mine, so I'm totally
> stumped.
>
> Any ideas?
>

> Cheers,
> Stefan

What makes you think you do not have more than 4 digits? This description makes it sound like the sky is falling.

Anyway, if you have nicely formatted columns like that in your file, you probably do not even need to specify a format, depending on how you read it.

Can you tell us exactly what you use to read the file and why you think there is a problem?

Subject: Re: Simple format code issue.
Posted by Kenneth P. Bowman on Wed, 09 Dec 2009 21:09:18 GMT
View Forum Message <> Reply to Message

In article
<a40dd69e-ed04-4a18-969e-5c41c9acffc7@d10g2000yqh.googlegroups.com>,
 polystethylene <polystethylene@hotmail.com> wrote:

> This one should be a doddle to resolve; but I can't for the life of me
> see what I'm doing wrong.
>
> I have 2 columns of data like this:
>
> 5147.475098 0.987662
> 5147.476562 0.985164
> 5147.478516 0.975080
> 5147.479980 0.991375
> 5147.481445 0.982826
> 5147.482910 0.987368
>
> etc...
>
> I would normally read this in with a format code like this:
>
> (2x,F0,3x,F0) - or sometimes drop the x's as you don't really need
> them...
>
> Anyway, this code reads the data in to 8 sig fig (1st column), and 6
> sig fig (second column)
>
> So then I tried a code of (F10.6, F0)... and I get the same issue - I
> can't get more than 4 d.p precision...
>
> I tried it with Doubles as well; but no luck. This has got to be

> simple right? Format codes are a weakness of mine, so I'm totally
> stumped.
>
> Any ideas?
>
> Cheers,
> Stefan

If you really want 11 digits of precision, make sure you are reading
into double precision floating point variables.

Ken Bowman

Subject: Re: Simple format code issue.
Posted by polystethylene on Wed, 09 Dec 2009 23:06:07 GMT
View Forum Message <> Reply to Message

That's a good tip. Is it therefore the case that I could read in a
value to 11 digits of precision - but that it won't be correct if I
use floats instead of doubles?

It was as I suspected - I saw the values in the 'variables' tab in the
debug window of the workspace, which only showed the values to 4.d.p,
when really they were to 6dp/10sf all along.

Thanks for the responses; as ever this place is full of helpful
people. Always nice to get a response from someone who's book I own as
well :D

Subject: Re: Simple format code issue.
Posted by penteado on Wed, 09 Dec 2009 23:20:10 GMT
View Forum Message <> Reply to Message

On Dec 9, 9:06 pm, polystethylene <polystethyl...@hotmail.com> wrote:
> That's a good tip. Is it therefore the case that I could read in a
> value to 11 digits of precision - but that it won't be correct if I
> use floats instead of doubles?

Yes, it is the case. Floats are only good to some 6 digits, and
exponents to about 37. Doubles go to about 15 digits.

You may find useful to see

http://www.dfanning.com/math_tips/sky_is_falling.html
