
Subject: Re: SPAWN with AWK

Posted by on Sat, 09 Mar 2013 10:28:57 GMT

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

Den lördagen den 9:e mars 2013 kl. 10:38:58 UTC+1 skrev Hannah:

> Hi there,

>

> I have to read in a lot of data files in my IDL script and thought about using SPAWN with AWK for this. So far, I did it with READCOL and WHERE functions but I find it kind of convenient to do it with just one line in AWK (but I have no idea of the efficiencies, if someone could say anything to this..).

>

> No I have some problems with my command, as there are too many ". The line looks like this:

>

> spawn, "awk '{if (min=="") {min=max=\$17}; if (\$17>max) {(max=\$17) && (maxid=\$1)}; if ((\$17<min) && (\$17!=0.)) {(min=\$17) && (minid=\$1)}} END {print min, minid, max, maxid}' dat file" val_vec

>

> Not surprisingly, I get an "unterminated string" error because of the "s at (min==""). So my question is, if anyone has an idea to fix this either in the awk command or anyhow in IDL.

You could try building the string by concatenating substrings using, like this:

```
IDL> print,"awk '" + '{if (min=="") {min=max=$17}; if ($17>max) {(max=$17) && (maxid=$1)}; if (($17<min) && ($17!=0.)) {(min=$17) && (minid=$1)}} END {print min, minid, max,maxid}' + "'" + '
dat file" val_vec'
```

```
awk '{if (min=="") {min=max=$17}; if ($17>max) {(max=$17) && (maxid=$1)}; if (($17<min) && ($17!=0.)) {(min=$17) && (minid=$1)}} END {print min, minid, max,maxid}' dat file" val_vec
```

Subject: Re: SPAWN with AWK

Posted by [Chip Helms](#) on Sat, 09 Mar 2013 15:54:43 GMT

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

I think IDL is interpreting the "" as a single " (since " ends the string in this case "" is used to place a single double-quote...if you started your string with a ' instead, you'd have to use " to have IDL print a single '). If you change it to (min="") I think it should work. Also, as to reading data with spawn and awk, my experience has been that it is considerably less efficient than IDL's built-in routines, but the difference is not usually noticeable unless you are calling spawn/awk a large number of times (such as in a for loop).

Cheers,

Chip

On Saturday, March 9, 2013 9:38:58 AM UTC, Hannah wrote:

> Hi there,

>

>

>
>
>
> I have to read in a lot of data files in my IDL script and thought about using SPAWN with AWK for this. So far, I did it with READCOL and WHERE functions but I find it kind of convenient to do it with just one line in AWK (but I have no idea of the efficiencies, if someone could say anything to this..).
>
>
>
> No I have some problems with my command, as there are too many ". The line looks like this:
>
>
>
> spawn, "awk '{if (min=="") {min=max=\$17}; if (\$17>max) {(max=\$17) && (maxid=\$1)}; if ((\$17<min) && (\$17!=0.)) {(min=\$17) && (minid=\$1)}} END {print min, minid, max, maxid}' dat file" val_vec
>
>
>
> Not surprisingly, I get an "unterminated string" error because of the "s at (min==""). So my question is, if anyone has an idea to fix this either in the awk command or anyhow in IDL.
>
>
>
>
>
> Thanks for your help!
>
> Hannah

Subject: Re: SPAWN with AWK
Posted by [hannah_ue](#) on Mon, 11 Mar 2013 08:36:17 GMT
[View Forum Message](#) <> [Reply to Message](#)

Thanks Mat and Chip for your responses!
Mats suggestions is working exactly as I want it to.

Cheers, Hannah
