Subject: Re: Selecting data from two separate arrays
Posted by MarioIncandenza on Mon, 21 Jun 2010 20:33:01 GMT

On Jun 21, 12:57 pm, Fster <francis.colle...@live.co.uk> wrote:
> Would it be easier to combine them into one array? The issue is that
> one array is on the x and y axis, and the other is on x, y, z axis,
> BUT the x and y axis are the same for each of the arrays and equal
> number of grid points...

So, you want to select points from the XY array, and the extract the
corresponding data from the XYZ array, right?

There are quite a few ways to do this. Here's a simple one, not the
fastest, but the simplest code-wise:

```
DATA2 = <XY data>
DATA3= <XYZ data>
;Get size of Z dimension
NZ=(size(DATA3))[3]
; pick points from the XY data
F2 = WHERE(DATA2 ge VALUE,NF2)
; set up an array to hold the extracted 3D data
DATA3_EXTRACT = FLTARR(NF2,NZ)
; load the data into the array
for IZ=0l,NZ-1 do DATA3_EXTRACT[*,IZ]=(DATA3[*,*,IZ])[F2]
```

Subject: Re: Selecting data from two separate arrays
Posted by Fster on Mon, 21 Jun 2010 20:50:56 GMT

On 21 June, 21:33, Ed Hyer <ejh...@gmail.com> wrote:
> On Jun 21, 12:57 pm, Fster <francis.colle...@live.co.uk> wrote:
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```

Thanks I see whats going on here, but at DATA3_EXTRACT line, it is
saying 'Array dimensions must be greater than 0.' and execution is
halted at this line.

Subject: Re: Selecting data from two separate arrays
Posted by MarioIncandenza on Mon, 21 Jun 2010 23:35:58 GMT

On Jun 21, 1:50 pm, Fster <francis.colle...@live.co.uk> wrote:
> Thanks I see whats going on here, but at DATA3_EXTRACT line, it is
> saying 'Array dimensions must be greater than 0.' and execution is
> halted at this line.

>> DATA3_EXTRACT = FLTARR(NF2,NZ)

This means that either NF2 or NZ equals 0.
PRINT,SIZE(DATA3) ; are the data actually 3-dimensional?
HELP,F2 ; are there are data with DATA2 >= VALUE?

Subject: Re: Selecting data from two separate arrays
Posted by Fster on Tue, 22 Jun 2010 09:21:01 GMT

On 22 June, 00:35, Ed Hyer <ejh...@gmail.com> wrote:
> On Jun 21, 1:50 pm, Fster <francis.colle...@live.co.uk> wrote:
>
>> Thanks I see whats going on here, but at DATA3_EXTRACT line, it is
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>
> This means that either NF2 or NZ equals 0.
> PRINT,SIZE(DATA3) ; are the data actually 3-dimensional?
> HELP,F2 ; are there are data with DATA2 >= VALUE?

Thanks that was my error all is working brilliantly! much appreciated!

Subject: Re: Selecting data from two separate arrays
Posted by Fster on Tue, 22 Jun 2010 10:20:37 GMT

On 21 June, 21:33, Ed Hyer <ejh...@gmail.com> wrote:
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In IDL is last section of the last line is it indexing or multiplying?