
Subject: Re: Where Function with Arrays

Posted by [Craig Markwardt](#) on Tue, 20 Jul 2004 13:48:48 GMT

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rats@mail.geog.uvic.ca (Rafael Loos) writes:

> Hi,
> I have two arrays. Both of them have 3 columns (First array:(INDEX, X,
> Altitude) and the other array:(INDEX, Y, Altitude). The first column
> is the INDEX that I have created to make some intersection with both
> arrays.
> After the intersection a new array was created to contain all the
> intersection points.
> Now that I have these values I want to find the respective rows for
> each array.
> I was trying to do something like that:
>
> int = setIntersection(ArrayX, ArrayY)
> newArray = where(XArray[0,*] EQ int[*])
>
> But it is not possible.

Unfortunately setIntersection only gives you the values, not the indices, so you are stuck trying to get the intersection a second time when you really just wanted the indices the first time.

The way you can do this is to append the two arrays together, sort and uniq them. But really I've already done this in a routine called CMSET_OP(), which will return the indices of an array intersection like this:

```
wh = cmset_op(ArrayX, 'AND', ArrayY, /INDEX)
```

which will give you indices into the ArrayX array. You can then reverse the order of X/Y and get the indices into the ArrayY array. Of course, you should check for the case of no intersection whatsoever.

Good luck,
Craig

<http://cow.physics.wisc.edu/~craigm/idl/idl.html> (under "Array/Set" utilities)

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