Subject: Re: Search and Replace in 2D Array (Image)
Posted by vikramivatury on Thu, 28 May 2009 20:34:27 GMT
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On May 28, 4:19 pm, "Jean H." <jghas...@DELTHIS.ucalgary.ANDTHIS.ca>
wrote:
> vikramivat...@gmail.com wrote:
>> Hello,
>
>> I have an image "m" which is [1229 x 1229] pixels that contains 1's
>> and 0's. I also have an image "img" which is [1229 x 1229] that
>> contains pixel IDs. For every 1 in image "m" it corresponds to a
>> certain pixel ID in image "img". I am trying to write a loop in IDL
>> that scans through the pixels of image "m" and when its get to a 1,
>> spit out its information from "img". I used the 'where' function (w =
>> where m gt 1.....ids = img(w))
>
> should be GE or EQ, not GT, or you will never have the ones selected
>
> and that worked fine in outputting
>
>> a 1D array of 1510441 pixels, but I am trying to do it for a 2D array
>> using loops.
>
>> img = read_tiff('NP.tif')
>> ids = fltarr(1229,1229)
>
>> for i = 0,1228 do begin
>> for j = 0,1228 do begin
>> if (m(i,j) eq 1.) then begin
>
> Be careful here. Don't use a float if your data is byte/integer. If it
> is of type float, you must do "where X-1.0 lt epsilon"... read David
> Fanning's "the sky is falling" article
>
>> ids(i,j) = img(m(i,j))
>
> This will always be equal to 1. Are you sure you want to subset m here?
>
>> endif
>> endfor
>> endfor
>
>> Any suggestions would be great.
>
>> Thanks,
>> Vikram
>

> "where" remains your friend here.
>
> img = read_tiff('NP.tif')
> ids = fltarr(1229,1229)
> OneIDX = where(m eq 1)
> ids[oneIDX] = img[oneIDX]
>
> If you really want, you can convert back the 1D index to 2D with
> ARRAY_INDICES, but it changes nothing to the above.
>
> Jean

Great! Thats exactly what I wanted. Thanks Jean.

-Vikram
