Subject: Re: Technique to find maximum in 100x100 element moving box
Posted by Lajos Foldy on Thu, 13 Oct 2016 17:58:48 GMT
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On Thursday, October 13, 2016 at 7:01:56 PM UTC+2, fawltyl...@gmail.com wrote:

> Try this:

Revised version, faster and without ifs:

```
pro test
nx=3200
ny=3248
m=100

m2=m/2
seed=123
data=randomu(seed,nx,ny)

tic
tmp1=transpose(data)
tmp2=fltarr(ny,nx,/nozero)
FOR i = 0, nx-1 DO BEGIN
       FOR j = 0, m2         DO tmp2[j,i] = max(tmp1[0   :j+m2, i])
       FOR j = m2+1, ny-m2-1 DO tmp2[j,i] = max(tmp1[j-m2:j+m2, i])
       FOR j = ny-m2, ny-1   DO tmp2[j,i] = max(tmp1[j-m2:ny-1, i])
    ENDFOR
tmp2=transpose(tmp2)
data_max=fltarr(nx,ny,/nozero)
FOR j = 0, ny-1 DO BEGIN
       FOR i = 0, m2         DO data_max[i,j] = max(tmp2[0   :i+m2, j])
       FOR i = m2+1, nx-m2-1 DO data_max[i,j] = max(tmp2[i-m2:i+m2, j])
       FOR i = nx-m2, nx-1   DO data_max[i,j] = max(tmp2[i-m2:nx-1, j])
    ENDFOR
toc

end
```

regards,
Lajos

ps: the i-50:i+50 subscript range has 101 elements, not 100.