Subject: Missing fill colours in contour plot

Posted by Sir Loin Steak on Tue, 15 Jan 2013 20:56:23 GMT

I am trying to do a contour plot of a latitude-longitude array, but I keep getting gaps in my plot, as shown in the following image: http://www.physics.open.ac.uk/~lsteele/contour.png. I'm stumped as to the reason, as it's not as if it's missing contours at the very end ranges of the contour values - it's somewhere in between. Anyhow, I'm sure the knowledgable folks on here will know!

I have defined a blue-white-red colour scheme and loaded it in with tvlct, but the problem occurs with other colour schemes too. I am calculating my contour levels and colours as follows (with ncont the number of contours I'm plotting):

```
minv   = floor(min(array))
maxv   = ceil(max(array))
maxval = max([abs(array),abs(array)])
clevels = -maxval + findgen(ncont)/(ncont-1)*2*maxval
ccol   = floor(findgen(ncont)/(ncont-1)*250)
```

I am then plotting my contour plot as:

```
device, decomposed=0
bwr_colour, red_vec, grn_vec, blu_vec
tvlct,  red_vec, grn_vec, blu_vec
contour, array, lon, lat, $
     levels=clevels, c_colors=ccol, /fill, $
     background=cgColor('white'), color=cgColor('black'), $
     xrange=[-180,180], yrange=[-90,90], xstyle=1, ystyle=1, $
     yticks=6, ytickv=[-90,-60,-30,0,30,60,90], $
     xticks=6, xtickv=[-180,-120,-60,0,60,120,180], $
     xtitle='Longitude', ytitle='Latitude', charsize=1.5, $
     title=plotsym+' (all motions) / g m!u-1!n s!u-1!n'
```

If anyone can offer any suggestions then I'll be very grateful, as it's bugging me now!

Cheers,

Liam