
Subject: Re: More Map Projection Madness
Posted by [David Fanning](#) on Fri, 04 Nov 2011 17:34:53 GMT
[View Forum Message](#) <> [Reply to Message](#)

David Fanning writes:

```
> What is wrong with the right side of this Equirectangular
> map projection?
>
> IDL> m = map_proj_init(117, datum=19, /gctp)
> IDL> map_grid, map_structure=m, linestyle=0
> IDL> map_continents, map_structure=m
>
> There seem to be extra lines at odd angles at
> the top and bottom of the map on the right-hand
> side.
```

As I have received no answer, I thought perhaps my example wasn't working. Here is code that reliably shows the problem I am having with map projections. In particular, when I set up the projection with Map_Proj_Init and try to draw grid lines, I am getting extraneous and ill-positioned lines showing up on the plot. If you look at the right-hand side of the third window, you can see an example of what I mean.

```
.*****
,
lons = -180 > Indgen(11)*36-180 < 180
lats = -90 > Indgen(11)*18-90 < 90
window, 0, Title='Normal Map Grid'
map_set, /Cylindrical, Position=[0.1, 0.1, 0.9, 0.9]
map_grid, lats=lats, lons=lons

window, 1, Title='OK GCTP Map Grid'
m = Map_Proj_Init('Miller Cylindrical', Datum='Sphere', /GCTP)
plot, [0,1], xrange=m.uv_box[[0,2]], yrange=m.uv_box[[1,3]], $
  xstyle=5, ystyle=5, /noerase, /nodata, $
  Position=[0.1, 0.1, 0.9, 0.9]
map_grid, lats=lats, lons=lons, map_structure=m

window, 2, Title='Screwed Up GCTP Map Grid'
m = Map_Proj_Init('Cylindrical')
plot, [0,1], xrange=m.uv_box[[0,2]], yrange=m.uv_box[[1,3]], $
  xstyle=5, ystyle=5, /noerase, /nodata, $
  Position=[0.1, 0.1, 0.9, 0.9]
map_grid, lats=lats, lons=lons, map_structure=m
END
```

.*****
;

Cheers,

David

--

David Fanning, Ph.D.

Fanning Software Consulting, Inc.

Coyote's Guide to IDL Programming: <http://www.idlcoyote.com/>

Sepore ma de ni thui. ("Perhaps thou speakest truth.")
