
Subject: Re: map MODIS HDF data to Mercator conformal projection
Posted by [K. Bowman](#) on Mon, 09 May 2005 17:04:23 GMT

[View Forum Message](#) <> [Reply to Message](#)

In article <1115656061.013044.326330@f14g2000cwb.googlegroups.com>, zhangyw3982@sina.com wrote:

> I am a primary learner of IDL. Now I want to use the IDL to reproject
> the HDF data to Mercator conformal projection. I can use the IDL read
> it and TVSCL it , but I can't map it.I try to use the map_set and
> map_image. But I can't do it. I have the question? If the IDL can do
> what I hope? If it can, can you give me some help or some good ideas? I
> use the Windows system, I have take the MRT(modis reprojection tool)and
> MRTSwath. And I also try the MS2GT, all of the tools can give me most
> help. But I only want to use the IDL to it , can I ? Thanks a lot

It is very difficult to tell from the documentation, but MAP_IMAGE is designed to plot data that is on a regular longitude-latitude grid. If you are trying to plot swath (scan) data, you will need to use a different approach.

The simplest is to call MAP_SET and then use PLOTS to plot each satellite field of view (fov). You need to know the longitude and latitude of every fov. Set the display color for each fov with the COLOR keyword of PLOTS. If you need a larger plotting marker than PSYM = 3 provides, see the USERSYM procedure.

Ken Bowman

Subject: Re: map MODIS HDF data to Mercator conformal projection
Posted by [wita](#) on Tue, 10 May 2005 14:34:39 GMT

[View Forum Message](#) <> [Reply to Message](#)

I do not really see why you would like to use IDL for this job when MRT can do it for you. Also the MODIS HDF files are in a Sinusoidal projection. This projection is supported by IDL's MAP_SET command but i never used it so I can't help you with its parameters.

My advice is simple:

- use MRT to process the MODIS HDF files and specify the output corners to project them onto a fixed grid.
- Write the result to disk as a generic binary file
- Use IDL READU function to read the binary data into an IDL array
- Use MAP_SET to set the right projection onto your data.

and you're done.

best regard,

