Subject: Re: read lambert projected image Posted by David Fanning on Sat, 21 Jun 2014 18:30:38 GMT View Forum Message <> Reply to Message

audrey.schaufelberger@gmail.com writes:

> I am afraid I don't quite understand what you mean... I have an image showing the farside of the moon. The complete farside, so I know that the map ranges from 90...270 deg in longitude and from -90...90 deg in latitude. I also know that the projection used is a lambert equal area projection. In addition, the map fills the image, i.e., (90/0) deg touches the left center, (180/90) deg the top center, (270/0) deg the right center and (180/-90) deg the bottom center of the image. So in theory I guess, since everything seems well defined, I should be able to determine the lon/lat pair corresponding to a x/y image coordinate. I was hoping there was a procedure where I can tell what projection a map is plotted with, and the procedure would read the .jpg while assigning each x/y image coordinate the right lon/lat coordinate.

> but that might be a bit much I ask for..

With a JPEG image, you are asking for too much. Can you find the same image in a GeoTiff image format? That will have the map projection information you need built into it. Failing that, NASA (or whoever created the original image) usually have information about the map projection used, etc. Since this is the moon, you will need to know its radius, and what kind of Geoid (sphere, ellipsoid, etc) was used to determine the latitude and longitude points. It wouldn't surprise me if the organization that captured the image has already created latitude and longitude arrays for every image pixel. Have you looked for these?

Cheers,

David

--

David Fanning, Ph.D.
Fanning Software Consulting, Inc.
Coyote's Guide to IDL Programming: http://www.dfanning.com/
Sepore ma de ni thue. ("Perhaps thos speakest truth.")