Subject: 3d-polar

Posted by David Miller on Wed, 27 Oct 1999 07:00:00 GMT

View Forum Message <> Reply to Message

I have a dataset collected using a scanning lidar (laser radar) looking up from the ground. The scan is conical. The data is in a 2-D array (x-time, y-range) and I want to 'overlay' the data on a 3-D cone to show how the data is in reality.

Any suggestions on how to do this (using IDL of course)?

Thanks, Dave

Subject: Re: 3d-polar

Posted by David Miller on Thu, 28 Oct 1999 07:00:00 GMT

View Forum Message <> Reply to Message

Any hints on how to set up the 3-D cone polygon? Don't I need vertices in order to overlay an image?

Thanks, Dave

David Fanning <davidf@dfanning.com> wrote in message news:MPG.1281cb243322e5c7989920@news.frii.com...

> David Miller (millerdo@erols.com) writes:

>

- >> I have a dataset collected using a scanning lidar (laser radar) looking up
- >> from the ground. The scan is conical. The data is in a 2-D array (x-time,
- >> y-range) and I want to 'overlay' the data on a 3-D cone to show how the data
- >> is in reality.

>>

>> Any suggestions on how to do this (using IDL of course)?

>

- > I think I would do this in object graphics by creating
- > the 3D cone as a polygon object. You could easily
- > (one command) drape the 2D array onto the polygon
- > object as a texture map. With object graphics you
- > will have the added capability of rotating the
- > object interactively in 3D space.

>

> Cheers,

>

> David

>

> --

- > David Fanning, Ph.D.
- > Fanning Software Consulting
- > Phone: 970-221-0438 E-Mail: davidf@dfanning.com
- > Coyote's Guide to IDL Programming: http://www.dfanning.com/
- > Toll-Free IDL Book Orders: 1-888-461-0155

Subject: Re: 3d-polar

Posted by ronn on Thu, 28 Oct 1999 07:00:00 GMT

View Forum Message <> Reply to Message

In article <MPG.1281cb243322e5c7989920@news.frii.com>, davidf@dfanning.com (David Fanning) wrote:

> David Miller (millerdo@erols.com) writes:

>

- >> I have a dataset collected using a scanning lidar (laser radar) looking up
- >> from the ground. The scan is conical. The data is in a 2-D array (x-time,
- >> y-range) and I want to 'overlay' the data on a 3-D cone to show how the data
- >> is in reality.

>>

>> Any suggestions on how to do this (using IDL of course)?

>

- > I think I would do this in object graphics by creating
- > the 3D cone as a polygon object. You could easily
- > (one command) drape the 2D array onto the polygon
- > object as a texture map. With object graphics you
- > will have the added capability of rotating the
- > object interactively in 3D space.

>

If you want an example of how to do this go to my web site at http://www.rlkling.com/freeware/objects.htm and download the meshObjectDemo zip file. All the code you need is there, and it is even commented!

-Ronn

--

Ronn Kling Ronn Kling Consulting www.rlkling.com

Sent via Deja.com http://www.deja.com/

Subject: Re: 3d-polar

Posted by davidf on Thu, 28 Oct 1999 07:00:00 GMT

View Forum Message <> Reply to Message

David Miller (millerdo@erols.com) writes:

- > I have a dataset collected using a scanning lidar (laser radar) looking up
- > from the ground. The scan is conical. The data is in a 2-D array (x-time,
- > y-range) and I want to 'overlay' the data on a 3-D cone to show how the data
- > is in reality.

>

> Any suggestions on how to do this (using IDL of course)?

I think I would do this in object graphics by creating the 3D cone as a polygon object. You could easily (one command) drape the 2D array onto the polygon object as a texture map. With object graphics you will have the added capability of rotating the object interactively in 3D space.

Cheers,

David

--

David Fanning, Ph.D.

Fanning Software Consulting

Phone: 970-221-0438 E-Mail: davidf@dfanning.com

Coyote's Guide to IDL Programming: http://www.dfanning.com/

Toll-Free IDL Book Orders: 1-888-461-0155