Kate (faeriepunk@aol.com) writes:

> I'm relatively new to IDL and trying to create brain maps using
> diffusion tensor magnetic resonance imaging and display these images
> effectively in IDL. I have a map of my image and I want to specify the
> colours of the pixels not only based on the intensity value of the
> pixel, but also on the direction of the principle eigenvector
> associated with each pixel, thus the colour will be associated with
> direction and the intensity with magnitude. I have no idea how to do
> this, I know how to create a colour map based on the intensity value
> but I don't know how to take into account another factor that is not
> associated with the image but with another dataset and use this to
> determine the RGB mix. If someone could help me that would be
> fantastic!

I seriously doubt this is what you want to do. :-)

It is not a problem to do it. Make your image a
24-bit image. The red plane values are scaled
according to intensity, the green plane values
are scaled according to vector magnitude, and
the blue place values are kept constant.

I just don't think this is going to communicate
effectively to the viewer the important concepts
you are trying to demonstrate. I think it would
be better to use color for intensity and overlay
a vector field on the image to indicate vector
magnitude. Or, perhaps, two images, side by side
showing the comparison. Or three images, with the
last showing the combined information as above.

But you need someway to communicate the essential
idea and I don't think a simple pixel color is going
to work.

Cheers,

David

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David W. Fanning, Ph.D.
Fanning Software Consulting, Inc.
Phone: 970-221-0438, E-mail: david@dfanning.com
Coyote's Guide to IDL Programming: http://www.dfanning.com/