Subject: Re: Converting 24 bit images to 8 bit images with a specific colour table
Posted by Liam Gumley on Thu, 06 May 1999 07:00:00 GMT
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Phil Aldis wrote:
> If I have a 24bit image and I want to convert it to an 8bit image
> which uses a particular table, so find nearest values.
> This is of particular use, when you're writing multiple gifs from 24
> bit images, because color_quan, will obviously not work, because the
> colour table has to be global.

If you want to create a GIF which contains 2 sub images derived from 24 bit true color images, you need to split the color table. Here's an example:

```
PRO TEST_COLORS

;- Create a true color image

dim = 256
truedata = rebin( indgen( dim ), dim, dim )
data = intarr( dim, dim, 3 )
data[ *, *, 0 ] = truedata
data[ *, *, 1 ] = rotate( truedata, 1 )
data[ *, *, 2 ] = rotate( truedata, 2 )
bottom = 0B
ncolors = 256
image = bytscl( data, top=ncolors-1 ) + bottom

;- Convert to pseudo color with 128 colors
;- (bottom half of color table)

pseudo1 = color_quan( image, 3, r1, g1, b1, colors=128 )

;- Create another true color image

data[ *, *, 0 ] = truedata
data[ *, *, 1 ] = truedata
data[ *, *, 2 ] = truedata
image = bytscl( data, top=ncolors-1 ) + bottom

;- Convert to pseudo color with 128 colors
;- (top half of color table)

pseudo2 = color_quan( image, 3, r2, g2, b2, colors=128 ) + 128B

;- Save the images and color tables to GIF
```

write_gif, 'test_colors.gif', [pseudo1,pseudo2], [r1,r2], [g1,g2],
[b1,b2]

END

Cheers,
Liam.

Liam E. Gumley
Space Science and Engineering Center, UW-Madison
http://cimss.ssec.wisc.edu/~gumley

Subject: Re: Converting 24 bit images to 8 bit images with a specific colour table
Posted by philaldis on Fri, 07 May 1999 07:00:00 GMT
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On Thu, 06 May 1999 12:13:18 -0500, Liam Gumley
<Liam.Gumley@ssec.wisc.edu> wrote:

> Phil Aldis wrote:
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> bit true color images, you need to split the color table. Here's an
> example:
>

> ---
> Liam E. Gumley
> Space Science and Engineering Center, UW-Madison
> http://cimss.ssec.wisc.edu/~gumley

Okay well, I should have made myself more clear. I'm currently working on an object graphics environment , which uses direct graphics to display. Whe you put a load of objects together, you put them into a view object, which is like the IDLgrview object, and this can be displayed in the window object, or sent to the postscript object. However, I thought some gif, bmp etc. output objects would be kinda cool.

So you'd pass the gif object a view and it would display it in a

pixmap, tvrd() the image and write it to gif. The problem is that the only way I can be really sure of getting the right values back from a tvrd() is to set true colour on, and get back a true colour image. So then I want to pass this image back through the colour tables that they have specfiied (which by default would be the current ones), and find the closest match.

I hope I've now explained myself a bit better, and if you look at teh code I put in with my initial post, I think it's amde a bit clearer what I mean.

Cheers,
Phil
