
Subject: Re: Plot scatter points with transparency
Posted by [dg86](#) on Tue, 18 Jul 2017 01:56:31 GMT

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On Friday, July 14, 2017 at 6:00:31 PM UTC-4, ChengYu Xi wrote:

> Is there a way to do transparent scatter plots? (Usually I use cgScatter2D.pro to do scatter plots)

>

> I need to overlay a large number of scatter points in one plot, which consist of several groups. I want to assign different groups with different colors. The problems is they just tend to block each other due to the large number. Is a way to plot them with transparency or any other good solution?

>

> Thanks,

> Chengyu

The plot() function does exactly what you want. Here's a sketch of what you might want to do:

```
colors = bytarr(n_elements(x))
p = plot(x, y, linestyle='', symbol='o', $
        /sym_filled, transparency=50, rgb_table=34, vert_colors=colors)
```

Your data points are stored in x and y. The linestyle and symbol options plot the data as circles that are not connected by lines. The flag /sym_filled fills the circles. You'll want to choose (or create) a color table. rgb_table=34 is a rainbow table. The vert_colors is an array of indexes into the color table, one for each point in the plot. You'll have to figure out what the indexes should be for your data. Finally, transparency=50 sets each plot symbol to 50% transparency. You'll want to adjust this number to get the effect you want.

There are lots of other options, and I recommend reading the documentation for the plot() function.

For what it's worth, the built-in function graphics routines are quite good for making publication-quality plots.

All the best,

David
