Subject: Re: Implementation of G Statistic in IDL
Posted by crd319 on Fri, 20 Jun 2008 14:53:33 GMT
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http://www.mediateam.oulu.fi/publications/pdf/16.pdf
This is the original paper with the equation in it, since the other
one is somewhat difficult to read.
Chris

On Jun 20, 10:43 am, crd...@gmail.com wrote:
> I am working on a project which involves comparing two regions of an
> image by means of a "G statistic" The equation I am to use is as
> follows:
>
> E_(variable) denotes a Sigma (Summation) with variable as its
> condition
>
> ie:
> -------
> \
> /
> -------
> variable
>
> s,m are two histograms (256x8 2D histograms)
> i is a bin number
> f_i is the frequency at bin i
>
> The equation, as defined in the paper I'm using, is:
>
> G = 2*([E_s,m E_i f_i log f_i] -[E_s,m (E_i f_i) log (E_i f_i)] -
> [E_i (E_s,m f_i) log (E_s,m f_i)] +
> [(E_s,m E_i f_i) log (E_s,m E_i f_i)]
>
> I am trying to perform this comparison within a computer program but I
> am unsure of the logical flow of it, mostly since there are 3
> variables (s,m,i) but only one is explicitly shown to be used. I am
> not familiar with this complex of a problem so if anyone could help my
> try and decipher this equation, I would be grateful
>
> Chris