
Subject: Re: Compute area between curves

Posted by [Jeremy Bailin](#) on Thu, 16 Oct 2008 12:18:42 GMT

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On Oct 15, 11:42 pm, Craig Markwardt

<craigm...@REMOVEcow.physics.wisc.edu> wrote:

> frankosuna <frankos...@gmail.com> writes:

>

>> I need to come up with some measurement to see how close the edge
>> detected ring from the image and the ring from the wireframe are. They
>> are ellipses and they do cross since we're trying to get them as close
>> as possible.

>

> OK, it still sounds like the "best" way to do it is take your points
> and re-sample them to the same grid, so they are directly comparable.
> In principle you can re-sample in X, but I think it would be better to
> convert the original points to R,PHI polar coordinates and sample to a
> uniform PHI grid. At that stage, you can compute
> $TOTAL((R_MEAS - R_WIREFRAME)^2)$
> which is effectively a chi-square, which then also measures goodness
> of your fit. [I.e. forget about integrals.]

>

> Craig

>

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> Craig B. Markwardt, Ph.D. EMAIL: cbmarkwardt+use...@gmail.com

> -----

If the difference is just translational, I'd still just use an FFT to
cross-correlate the original images and find the peak...

-Jeremy.
