
Subject: Re: box generator

Posted by [Katarzyna Szymanska](#) on Tue, 22 May 2007 11:01:40 GMT

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Hi Stefano,

Few remarks concerning the direction generation:

- 1) the possible distributions of the (physically meaningful) directions are infinite: the uniform direction is the simplest, corresponds to the s-wave in the two-body kinematics and is mostly used to evaluate the relative acceptances and efficiencies at different solid angles
- 2) therefore, we think that the collaboration needs such a distribution which is generated by $-1 < \cos(\theta) < +1$ and $0 < \phi < 360$, both uniform.
- 3) nevertheless, if someone uses the "uniform theta" distribution, which should peak the directions forward, one has to remember that the relative and absolute acceptances, efficiencies must be suitably normalized.
- 4) in any case, it will be useful to comment clearly the "uniform theta" distribution and its physical meaning in terms of directions.

Regards,

Felice and Kasia
