NAME

specang − spectral angle change detction

SYNOPSIS

specang −i *file1* [**−a**] [**−v**] < *file2*

DESCRIPTION

specang calculates the angle between pixel vectors in two multi- or hypervariate images. This is an intensity independent measure. If **−a** is specified the dot product rather than the angle is calculated. **−i** defining one of the input images is not optional. (The other input image comes from *stdin*.)

Input files must be band-interleaved-by-line (BIL, see *bil(1)*). The two input images must have the same format, either byte, short, unsigned short, int or float. Output format is float.

OPTIONS

−i *file1* one of the two input sequences

−a output dot product instead of angle (the angle is the inverse cosine of the dot product)

−v verbose

SEE ALSO

spam(1), bil(1), discrim(1), disc(1), maf(1)

REFERENCES

J.W. Boardman (1992): *Spectral Angle Mapping*, to be published.

Center for the Study of Earth from Space (CSES), Cooperative Institute for Research in Environmental Sciences (CIRES), University of Colorado, Boulder (1992): *SIPS User's Guide, Spectral Image Processing System Version 1.2.*

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