Wanted: Image Registration Programs.

I am trying to register two images.

That is, I wish to warp one image so that its features overlay the
somewhat similar features on another image.

The images I am using are sufficiently noisy and dissimilar (JPL
AirSAR images of natural topography taken along orthogonal azimuth
directions--i.e., most features that show in each image don't show
in the other, and they are distorted somewhat in shape and a lot in
brightness from each other) that it is very difficult for an
operator to pick out good tie points. (Which probably eliminates
the automatic IDL SAR registration software that JPL and NASA
supply to do this--they expect nearly parallel azimuth directions
and very similar features.)

I have looked at ENVI's image registration, which is based on user
selected tie points. Unfortunately, the user interface is very
clumsy, and it looks quite impractical for this application.

I even tried writing my own registration program, with a little
better interface (it lets me blink back and forth between the two
images, lets me choose small correlation boxes for semi-automated
tie point generation, and lets me adjust tie points to try to make
the local regions overlay). But I did not get very good results,
on some parts of the image, even when I pick 9 widely spaced tie
points and 2nd order polywarp and poly_2d calls.

Someone out there must have done this before. Is any no-cost
software available? If someone else has something close, I could
probably exchange my own attempts for theirs.
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