**Registration and Matching of Perspective Surface Normal Maps** ([DOI: 10.1109/ICIP.2007.4379644](https://doi-org.umasslowell.idm.oclc.org/10.1109/ICIP.2007.4379644))

This article goes over a method for recognizing normal maps from 3D objects compared to a reference model that has been rotated by a somewhat small number of degrees. They do 2D stretching and 3D rotations along axis. The article goes into depth on the equations used for stretching and rotating. Additionally, they did a test on their algorithm and their result were above 90% accurate between -8 and +14 degrees of difference from the original with added noise of up to 40 degrees.