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Mario Micheli^{*} (mariomicheli@gmail.com), UCLA Mathematics Department, 520 Portola Plaza, Math Sciences Building 6363, Los Angeles, CA 90095. A computable formulation of curvature for the Riemannian manifold of Landmarks.

In the past few years there has been a growing interest, in diverse scientific communities, in endowing "shape spaces" with Riemannian metrics, so to be able to measure similarities between shapes and perform statistical analysis on data sets (e.g. for object recognition, target detection and tracking, classification, and automated medical diagnostics). The geometry of such spaces has started to emerge only very recently; in this talk we will explore the sectional curvature for the Riemannian manifold of landmark points (which is one of the simplest, in that it is finite-dimensional) and discuss its effects on applications. (Received August 17, 2010)