

Ricci Curvature Tensor and Non-Riemannian Quantities

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Abstract. There are several notions of Ricci curvature tensor in Finsler geometry and spray geometry. One of them is defined by the Hessian of the well-known Ricc curvature. In this paper we will introduce a new notion of Ricci curvature tensor and discuss its relationship with the Ricci curvature and some non-Riemannian quantities. By this Ricci curvature tensor, we shall have a better understanding on these non-Riemannian quantities.