ETHAN ROSS, University of Toronto

Singular Riemannian Foliations and Foliate Vector Fields

Singular Riemannian Foliations (SRFs) are a class of reasonably well-behaved singular foliations (in the sense of Stefan-Sussmann) which appear quite naturally when studying isometric group actions or riemannian submersions with singularities. One nice feature of SRFs is that they induce a canonical decomposition of the underlying manifold into embedded submanifolds equipped with regular Riemannian foliations. In this talk, I will demonstrate that this additional decomposition is in fact a singular foliation and provide a new proof that the pieces of this decomposition form a stratification.