

# **Asymptotic behavior of BV functions in metric measure spaces of controlled geometry**

Nageswari Shanmugalingam

We will describe the asymptotic behavior of functions of bounded variation. The setting is that of a complete metric measure space equipped with a doubling measure supporting a 1-Poincaré inequality with respect to the upper gradient structure. The tools used include pointed measured Gromov-Hausdorff limits of measures, and tangent cones. The results discussed here are based on joint work with Sylvester Eriksson-Bique, James T. Gill, and Panu Lahti.