1092-37-298 James Keesling* (kees@ufl.edu), Department of Mathematics, University of Florida, Gainesville, FL 32611-8105, and James Maissen (jmaissen@yahoo.com), Department of Mathematics, University of Texas, Brownsville, Brownsville, TX 78520. A characterization of the irrational points of the Sierpiński Carpet.

Krasinkiewicz proved that the Sierpiński Carpet, X, is $\frac{1}{2}$ -homogeneous, that is, there are just two orbits of the homeomorphism group of X. In this paper we give a characterization of these orbits as spaces. The result generalizes to higher dimensional spaces with similar construction. We give some applications of the result. (Received August 12, 2013)