1046-41-331 Martin Bartelt* (mbartelt@pcs.cnu.edu), Mathematics Department, Christopher Newport University, Newport News, VA 23606, and John Swetits (jswetits@odu.edu), Department of Mathematics and Statistics, Old Dominion University, Norfolk, VA 23529. Functions with strongly unique best approximates are dense in vector valued approximation.

H. Blatt showed that in uniform approximation from a Haar set of dimension n in C(X), for X a compact subset of the complex plane, the set of functions which have a reference of minimal length 2n+1 is dense in C(X) if and only if X has at most n isolated points. These minimal length reference functions all have strongly unique best approximates. We extend this result to uniform vector valued approximation in $C(X, \mathbb{R}^m)$ for a generalized Haar set in the case when n = mk. (Received August 26, 2008)