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D. Christopher Stephens* (cstephen@mtsu.edu), Department of Mathematical Sciences, Middle Tennessee State University, 1301 East Main Street, Murfreesboro, TN 37132, and **Roi Krakovski** and **Xiaoya Zha**. *Subdivisions of K_5 in Graphs Embedded on Surfaces With Face-Width at least Five.*

We prove that if G is a 5-connected graph embedded on a surface Σ (other than the sphere) with face-width at least 5, then G contains a subdivision of K_5 . This is a special case of a conjecture of P. Seymour, that every 5-connected non-planar graph contains a subdivision of K_5 . Moreover, we prove that if G is 6-connected and embedded with face-width at least 5, then for every $v \in V(G)$, G contains a subdivision of K_5 whose branch vertices are v and four neighbors of v . (Received September 14, 2010)