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**MAMMALIAN GENETIC MODELS WITH MINIMAL
OR COMPLEX PHENOTYPES**

**Loss of Histochemical Identity in Mast Cells Lacking
Carboxypeptidase A**

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Cover photograph (Copyright © 2005, American Society for Microbiology. All Rights Reserved.): α -Actinin activates vinculin in adhesion complexes. The α -actinin dimer (red and green) binds to vinculin through the agency of a vinculin binding site present at the end of its rod domain, which is proposed to swing out to bind to vinculin. α -Actinin binds the N-terminal helical bundle of vinculin (pink), disrupting its interactions with vinculin's tail domain (cyan). The three remaining helical bundles of vinculin are also shown in yellow, orange, and dark blue. Swiss-3T3 cells stained for vinculin and F-actin are shown in the background (*See related article on p. 6112*).