

“ β -Hairpin Peptides Containing a Novel β -Turn Mimic and an Unnatural Amino Acid that Mimics a Peptide β -Strand” Hashemzadeh, M.; Nowick, J. S. Presented at the 228th National Meeting of the American Chemical Society, Philadelphia, PA, August 2004; paper ORG 451.

Abstract: This paper describes β -hairpin peptides containing *δ -ornithine*, which mimics a β -turn, and the unnatural amino acid *Hao*, which mimics the conformation and hydrogen-bonding functionality of a β -strand. Although we have previously described peptides containing Hao and δ Orn [*JACS* **2000**, *122*, 7654; *JACS* **2002**, *124*, 4972; *JACS* **2003**, *125*, 876], the present report represents the first examples of peptides containing Hao and δ Orn that fold in aqueous solution. ^1H NMR and other structural studies of Val-Tyr-**Hao**-Leu-Val- δ **Orn**-Val-Leu-Lys-Ile-His-Ala-Leu-NH₂ and related β -hairpin peptides will be discussed.