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Chinenye Ofodile* (chinenye.ofodile@asurams.edu), Albany State University, 504 College Dr., Albany, GA 31705. The Enumeration of 132-Pattern Occurrences in Dumont Permutations of Length Four.

In this undergraduate research project, we enumerate Dumont permutations of length four containing pattern 132. Patterns are order-isomorphism classes of permutations (or, more generally, of strings over a totally ordered alphabet). Strings are order-isomorphic if and only if pairs of elements in the same positions satisfy the same pairwise comparisons. Dumont permutations are classes of permutations that satisfy certain restrictions based on parity of positions or values of elements. This work parallels the work of Burstein, Elizalde and Mansour, who enumerated Dumont permutations that avoided certain three or four letter patterns, and the work of Noonan and Zeilberger, who enumerated all permutations with one or two occurrences of some patterns. (Received September 13, 2016)