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Elizabeth Beazley* (ebeazley@haverford.edu), Department of Mathematics, 370 Lancaster Avenue, Haverford, PA 19041, and **Margaret Nichols, Min Hae Park, Xiaolin Shi** and **Alexander Youcis**. *Bijjective Projections on Parabolic Quotients of Affine Weyl Groups*.

Affine Weyl groups and their parabolic quotients are used extensively as indexing sets for objects in representation theory, algebraic geometry, and number theory. Moreover, we can conveniently realize the elements of certain quotients via intuitive geometric and combinatorial models such as abaci, alcoves, coroot lattice points, and core partitions. Berg, Jones, and Vazirani have described a bijection between n -cores with first part equal to k and $(n - 1)$ -cores with first part less than or equal to k . In this talk we will discuss how to generalize this bijection of Berg, Jones, and Vazirani to parabolic quotients of affine Weyl groups in other classical Lie types. We have developed not only combinatorial techniques to describe this map, but also a geometric method utilizing the properties of the alcove model coming from the root system associated to the affine Weyl group. (Received February 15, 2013)