1014-06-39 Michel P. Serfati\* (serfati@math.jussieu.fr). On some properties of Post lattices of r-classifications.

In a previous paper (Discrete Maths, 1999), one gave the definition and studied some basic properties of the Post lattice Pr(E) of all the r-classifications of a set E. Such a lattice is an algebraic achievement of Post multivalued logical ideas. This talk is devoted to some specific new properties of these lattices, namely near successors (of a classification), Mobius function (for such a lattice), set-preserving re-arrangements (between two lattices), and finally multivalued binary relations on a set E. (Received June 30, 2005)