INVESTIGATION OF PATTERN GRADING ASSUMPTIONS MADE IN THE SIZING OF U.S. WOMEN'S CLOTHING FOR THE UPPER TORSO, PART ONE<br>Nancy Schofield, Karen LaBat, and Gloria Williams<br>Univ. of Minnesota, St. Paul, MN 55108

Fit and sizing are a major consumer complaint for U.S. women. Current research is focusing on the inadequacies of the system and the development of alternatives. The sizing of garments is actually accomplished by grading. This research examines that process.

The search for assumptions used in grading had three objectives: (1) to examine a range of sizing charts to determine common assumptions, (2) to determine whether measurements used in sizing charts could be used for grade rules, and (3) to examine published grading sources to determine assumptions made in the grading process.
U.S. sizing charts dating from 1873 through current catalogs were examined. The increments between sizes were calculated and compared. Four assumptions were identified.

Individual points on the garment pattern were compared with body landmarks and measurements to determine whether the sizing information could be used for grade rules. At most, $39 \%$ of the grade rule components of a simple woman's bodice could be based on sizing measurements.

The available published sources on grading were examined and compared. The charts of increases at each point were compared to determine the range of values, the kind of increment, and whether there was agreement. Six additional assumptions used in the grading process were identified.

The comparison of grading with sizing showed that the few sizing measurements are augmented by proportional rules and set increments. Sizing is therefore only one set of infor-mation that is used in grading. Part two of this research will test these assumptions using anthropometric data.

