

Statistical Engineering Group
W. L. Gore, Supervisor

Machine performance studies have been made in certain of the shot shell manufacturing areas. These studies should result in substantial improvement in quality and reduction of scrap and inspection costs for battery cup, basewad winding, head stamp, priming and loading areas.

Process variations in shot shell tube diameter have been evaluated. Further tests are being performed in order to evaluate relationships between physical properties of papers and process variations in tube diameter, wax content, and performance at casualty testing.

The primer assembly operations have been studied and recommendations for equipment maintenance are being carried out. An evaluation has been made of the control of pellet weight by bridge thickness.

Several drop test control procedures have been developed for use by the Technical and Plant personnel.

An investigation has been made of Caliber .50 A.P.I. penetration performance and changes in the bullet manufacturing process have been made which have improved the penetration performance of this product.

ARMS SECTION, G. R. McCORMICK, MANAGER

Gun Design Unit, P. B. Rutherford, Superintendent
Engineering Unit, R.A.A. Hentschel, Superintendent

Project: Model 721, Bolt Action High Power Rifle - L-3121
Personnel: M. H. Smith, P. Henriksen, H. C. Moss, R. W. Angell,
Engineering Unit; M. H. Walker, Design Unit
Authorized Amount: \$71,100 Total Expended to Date: \$29,981