## VESTSHELL VERMONT INC.

MANUFACTURERS OF FERROUS INVESTMENT CASTINGS

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May 19, 1983

Remington Arms Company, Inc. Ilion, N.Y. 13357

Attn: Dwayne Ricci

Dear Dwayne:

As discussed in our telecon of 05/18/83, these are the Bolt Handle samples Montreal cast in an effort to finalize P/N D-92227's configuration. Due to Remington's recent concern with cracking problems in the neck area, the. main criteria as Vestshell understood it, was to develop a bolt handle with no cracking problems. We used Dwg. D-92227 Alt.4 which had been revised at our request as a starting point in this objective. We changed one cavity of the die to this alteration with very encouraging results. The "cracking" was not, however, eliminated 100%. Since trial and error, and measurement of results was the only way to proceed, Vestshell decided to minimize the cost to Remington by not altering the master pattern with each new attempt. Instead, an actual bolt handle was welded and ground to serve as a master pattern until a final decision can be made and the tooling finalized. Our next attempt was considerably beefier at the neck area but 100% O.K. in magnaflux. These are the samples you have before you. Please note that the neck and body have been blended by hand and will appear considerably smoother and "to print" when the 4-cavity die is altered by a toolmaker.

Vestshell has succeeded in casting a bolt handle design that shows the maximum strength and structural integrity Remington would need from a bolt handle (ie. no evidence of cracks in magnaflux). The balance or trade-off between strength and desthetics in this design must be determined by Remington's engineers. These keep in mind that we must be able to work to clear and achievable specifications. Also, as you know better than anyone Dwayne, D-92227 requirements put Vestshell Vt. at a disadvantage with the old die now in use. Future delivery requirements can only be met by bringing the 4-cavity die on line as soon as possible.

Yours truly,

VESTSHELL VERMONT INC.

HEINZ VALENTA Vice-President

HV/clv Encl.