

MASTER OF SCIENCE IN LEADERSHIP AND HUMAN RESOURCE DEVELOPMENT

IDENTIFYING MIDSHIPMEN FOR ACADEMIC ASSISTANCE USING ENTRY VARIABLES

Arthur W. Watson-Lieutenant, United States Navy

B.S., United States Naval Academy, 1995

Master of Science in Leadership and Human Resource Development-May 2000

Advisors: Gregory Hildebrandt, Graduate School of Business and Public Policy

Eric Bowman, United States Naval Academy

Each graduating class from the United States Naval Academy experiences an attrition rate of approximately 24 percent. A significant portion of that attrition is attributed to academic difficulties. The Academy provides various programs such as the Plebe Intervention Program (PIP) to assist midshipmen experiencing academic difficulty. The purpose of this study was to develop an empirical approach to selecting first-year Naval Academy Midshipmen for academic intervention based upon objective initial entry data. Categorical values from the Learning and Study Strategies Inventory (LASSI), SAT scores and high school rank were incorporated as independent variables in a linear regression model with dependent variable Cumulative Quality Point Rating (CQPR). Two regression analyses were conducted to develop the final equation. Results of the 2nd regression indicate class standing, individualized SAT Math and SAT Verbal scores were highly significant at the 0.01 level relative to academic performance. Several LASSI variables also proved valuable in the model. Motivation, Attitude, Time Management, Select Main Ideas, Study Aids and Test Strategies were also significant at the 0.05 level. While these results were encouraging, the low R² value of 3.27 indicated that the model could not predict CQPR for a specific case with accuracy. However, utilizing this equation empirically enhances current intervention program selection processes significantly improving the identification of academically challenged midshipmen.

KEYWORDS: Academic Intervention, Linear Regression, Academic Performance Prediction

