

1096-VE-1115      **Niloofer Ramezani\*** (niloofer.ramezani@unco.edu), 501 20th St., McKee 518, Campus Box 124, Department of Applied Statistics and Research, University of Northern Colorado, Greeley, CO 80639. *The effect of early high school mathematics achievement on public schools' students' college ready performance in Texas.*

The Academic Excellence Indicator contains information on students' performance, which is one of the most important response variables in educational studies. Using the large dataset from Texas Education Agency, performance on college admission tests (ACT and SAT) and college ready graduates' percentage are used as indicators to measure college readiness as response variables and are compared based on the power of their models. The main goal is finding the effect of early high school mathematics achievement on public schools' students' college ready performance. By using "Incremental Partitioning of Variance" within a multiple regression for this longitudinal study, the models are fit over four years by entering variables in different orders. College ready performance is modeled based on students' mathematics scores over two years, annual dropout rates, and some demographic variables. Applying this method and some other Statistical analysis shows the relationship among variables and also the best indicator for this regression model which is ACT. For this study, these variables do a better job predicting ACT than the other response variables. For future research, these models and this dependent variable may be used for other groups of students using cross-validation methods. (Received September 13, 2013)