**Kell High School Career Technology Dept.**

**Intro to Drafting Survey of Engineering 3D Modeling PLTW IED**

**Course Description**:

 In these classes, teammates will learn about the engineering and design process, from identifying a problem, development, to production. The course is project intensive, Problem Based Learning (PRL). The class involves lectures, team discussion, on-line research, material processes and practical applications. There will be many one-day projects and several longer projects. In teams, you will be assigned a project and develop a solution through the design process and present to the class or outside client. Teams will use drafting, concept sketching, 3D modeling and printing, Power Point and Logger Pro to help through the design process to presentation.

**Grading**:

* Projects **65%**
* Work Ethic **15%**

Work Ethics: As a part of the Career Tech curriculum, I will be evaluating each student in the classroom on industry related standards to determine their employability. This portion of the grade will be based on work ethic, attitude, dress, in class behavior, attendance, ability to work with others, staying on task, etc. This grade is given once a month placing a large emphasis on being a work ready student.

* Quiz, Test **10%**
* Final Exam **10%**

**In class resources**:

Textbooks: Home Depot home Improvement 123; *Technical Drawing*, Fourth Edition, Goetsch Nelson Chalk; *Architectural Drafting and Design*, Fifth Edition, Jefferis and Madsen; *Drafting and Design*, Seventh Edition, Kicklighter and Brown

On-line/Video resources: PLTW Home site, YouTube.com, History Channel, Engineering Marvels Myth Busters and other related engineering and design related materials

Outside Resources: Community leaders of related industries