COURSE SYLLABUS Fall 2015

Introduction to Surveying

**SRVY 1301**  
Number

**3 - 0 - 3**  
Lecture - Lab - Credit

**Basic Computer Aided Drafting**  
Prerequisite

This syllabus has been reviewed and is current on the date indicated.

Prepared By: Monica Wagner  
Date: 8/11/2015

Reviewed By: Caleb Steed  
Date: 8/11/15

Division Director/Designee:  
Date:
SRVY 1301  
Introduction to Surveying  
Course Syllabus  

I. Instructor Information

Name: Monica Wagner  
Phone: 325-235-7448

Campus Office: Sweetwater – Administration Building  
email: Monica.Wagner@tstc.edu

Office Hours: By Appointment Only  
Advisement Hours: By Appointment Only

Program Chair / Director: Caleb Steed  
Program Chair/Director email: Caleb.Steed@tstc.edu

II. Class Times, Location

SRVY 1301 – Mondays – 8:30 AM – 9:55 AM  
Sweetwater Campus – 4DAP Room 210, Brownwood Campus, - 4BW1 Room 118, Abilene Campus – 4ABC Room 400.

III. Program Outcomes

1. The Computer-Aided Drafting student will demonstrate competency in producing numerous drawings and projects using the commands of computer aided drafting design software.
2. The Computer-Aided Drafting students will demonstrate competency in producing drawings using industry drawing standards to demonstrate their knowledge of these standards.
3. The Computer-Aided Drafting student will demonstrate competency in producing industry drawings and projects utilizing the basic and advanced productivity tools in computer-aided drafting.

IV. Course Description & Introduction

An overview of the surveying profession. The history of surveying and its impact on the world. Review of the mathematics used in surveying. Introduction to basic surveying equipment with emphasis on measurements. Instruction on surveying procedures and the limitation of errors. Calculation to determine precision and error of closure.

Learning Outcomes
The student will:

A. Describe the surveying profession and its historical impact
B. Demonstrate an understanding of basic surveying terminology, surveying equipment and measurements
C. List the steps required in performing a survey
D. Employ mathematical skills and use scientific calculators to calculate survey error and adjustment
VI. Assessment Methods & Grading Policy

<table>
<thead>
<tr>
<th>Grade</th>
<th>Percent</th>
<th>Description</th>
<th>Grade Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>90-100</td>
<td>Excellent/Superior Performance Level</td>
<td>4</td>
</tr>
<tr>
<td>B</td>
<td>80-89</td>
<td>Above Required Performance Level</td>
<td>3</td>
</tr>
<tr>
<td>C</td>
<td>70-79</td>
<td>Minimum Required Performance Level</td>
<td>2</td>
</tr>
<tr>
<td>D</td>
<td>60-69</td>
<td>Below Required Performance Level</td>
<td>1</td>
</tr>
<tr>
<td>F</td>
<td>Below 60</td>
<td>Failure to meet Performance Requirements</td>
<td>0</td>
</tr>
<tr>
<td>W</td>
<td>--</td>
<td>Withdrawal</td>
<td>0</td>
</tr>
<tr>
<td>CR</td>
<td>--</td>
<td>Credit</td>
<td>0</td>
</tr>
<tr>
<td>AUD</td>
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<td>Audit of Course</td>
<td>0</td>
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See College Catalog for complete descriptions.

SRVY 1301 is a Hybrid Class. The lecture portion of this class will be held every Monday from 8:30 AM – 9:55 AM for 15 weeks. The lecture portion of this class will be held in the following locations: Sweetwater Campus – 4DAP Room 210, Brownwood Campus, -4BW1 Room 118, Abilene Campus – 4ABC Room 400.

Lectures may consist of hands-on learning exercises. Completed assignments are due on or before the date and time specified. The submission link closes on the due date and time specified for the unit. Students must successfully pass the final validations in order to pass this course.

No late work will be accepted. There is a 10% professionalism grade for this course. This professionalism grade will cover coming to class, turning in your work on time, being courteous and treating others with respect. There will be a 3 point deduction in grade for each lecture missed and each assignment missed. You will begin the class with a 100% for your Professionalism grade, and points will be deducted as necessary.

Overall grades will be weighted as follows:
10% - Professionalism
10% - Discussion Questions and Discussion Responses
40% - Homework Assignments
20% - Trigonometry Quizzes
20% - Final Validations

VIII. Textbook/Reference Materials
Title: Surveying Fundamentals and Practices
Author: Jerry Nathanson, Michael T. Lanzafama, Philip Kissam
Publisher: Pearson
IX. Additional Resources & Supplies

<table>
<thead>
<tr>
<th>Quantity</th>
<th>Item Description</th>
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<tbody>
<tr>
<td>1</td>
<td>Internet Connection</td>
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<tr>
<td>1</td>
<td>Laptop (With minimum requirements of the following)</td>
</tr>
<tr>
<td></td>
<td>• Intel Core 2 Duo 2.2 Ghz or equivalent</td>
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<tr>
<td></td>
<td>• 15.4 Widescreen Display</td>
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<tr>
<td></td>
<td>• 120 GB HD (250 GB or higher recommended)</td>
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<td></td>
<td>• 3 GB (3072 MB) RAM</td>
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<td></td>
<td>• Wireless Adapter</td>
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<td>• CD/DVD Burner</td>
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<td>• 256 MB Video (NVidia preferred)</td>
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<td></td>
<td>• 3 Year Manufacturer Warranty</td>
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</tbody>
</table>

Headset and 1GB Jump Drive

X. Class Participation Policy & Student Conduct

Texas State Technical College expects students to participate in classroom activities so that learning objectives of the course can be accomplished. Students who fail to meet participation expectations may be promptly dropped from the course. Participation guidelines are as follows:

1. Students are required to complete all assigned reading and homework prior to attending class.
2. Students are required to actively participate in all class activities including group work, projects, etc.
3. Students are required to turn-in all assignments on time and take examinations as scheduled. Learning objectives of the course can be accomplished. Students who fail to meet participation expectations may be promptly dropped from the course. Lectures: Important material from the text and outside sources will be covered in online videos. Students should plan to take careful notes since some of the material will not be covered in the textbook.

Assignments: Review Assignments, class activities, and special projects will be periodically assigned to reinforce the material being taught.

All work turned in must be your own. Any work turned in represented as your own, and later determined that it is not your work, will be considered plagiarism. The punishment for plagiarism will be removal from the course with a grade of F and possible removal from the program and/or college.
XI. Safety
- Campus building occupants are required to evacuate buildings when a fire alarm activates. Alarm activation or announcement requires exiting and assembling outside.
- Familiarize yourself with all exit doors of each classroom and building you may occupy while receiving instructions. The nearest exit door may not be the door you used when entering the building.
- Students requiring evacuation assistance should inform the instructor during the first week of class.
- In the event of evacuation, follow the faculty’s or class instructor’s instructions.
- Do Not re-enter a building unless given instructions by the Fire Department, Campus/Local Police, or Fire Prevention Services.

XII. Special Needs
If you have a documented disability that will impact your work in this class, please contact the ADA Coordinator, so that appropriate arrangements for your accommodations can be made. The counselor on your campus can assist you in this process. In accordance with the federal law, a student requesting accommodations must provide documentation of his/her disability to the ADA Coordinator. For more information call (325) 236-8292 or email amy.freeman@tstc.edu.

XIII. Course Schedule
Notice: The assignments and due dates are subject to change at the instructor’s discretion. See Moodle for assignments and instructions.

Unit 1 - Week 1: Chapter 1 – Basic Concepts in Surveying
Unit 2 - Week 2: Map Symbols
Unit 3 - Week 3: Chapter 2 – Measurements and Computations
Unit 4 - Week 4: Chapter 3 – Basic Mathematics for Surveying
Unit 5 – Week 5: Chapter 4 – Measuring Horizontal Distances
Unit 6 – Week 6: Chapter 5 – Measuring Vertical Distances
Unit 7 – Week 7: Chapter 6 – Measuring Angles and Directions
Unit 8 – Week 8: Chapter 7 – Horizontal Control Surveys
Unit 9 – Week 9: Chapter 8 – Property Surveys
Unit 10 – Week 10: Legal Descriptions and Plot Plans
Unit 11 – Week 11: Chapter 9 – Topographic Surveys and Maps
Unit 12 – Week 12: Chapter 10 – Highway Curves and Earthwork
Unit 13 – Week 13: Profiles
Unit 14 – Week 14: Chapter 11 – Construction Surveys
Unit 15 – Week 15: Final Validations
XIV. Instructor CV – Monica Wagner

<table>
<thead>
<tr>
<th>Name of Institution</th>
<th>Degree Earned</th>
<th>Date Earned</th>
</tr>
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<tbody>
<tr>
<td>Texas State Technical College West Texas</td>
<td>Associate of Applied Science Computer Aided Drafting and Design Technology</td>
<td>December 2014</td>
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<tr>
<td>West Texas A&amp;M University</td>
<td>Bachelor of Science General Studies</td>
<td>August 2010</td>
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<p>| Industry, Teaching or Training, and Other Experience Relevant To Course |</p>
<table>
<thead>
<tr>
<th>Description of Experience Related To Course</th>
<th>Date Began</th>
<th>Date Ended</th>
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<tr>
<td>The Mills Corporation – Tenant Construction Coordinator</td>
<td>1997-2003</td>
<td></td>
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<tr>
<td>Winmark Homes – Construction Estimator</td>
<td>2003-2006</td>
<td></td>
</tr>
<tr>
<td>Texas State Technical College West Texas – Director of Special Projects / Director of Physical Plant</td>
<td>2007-Present</td>
<td></td>
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</table>
Student Acknowledgement:

This is to acknowledge that I have received a copy of the syllabus for the course SRVY 1301 Introduction to Surveying and I understand that it is my responsibility to read and understand the syllabus and to abide by the guidelines presented therein.

__________________________________  ________________________________
Student Printed Name    Signature

_______________
Date