Course: TECH 5312
Title: Total Productive Maintenance
Section: 01
Semester: Fall 2010
Class Time: W 6-8:40pm

Instructor: Dominick E. Fazarro, Ph.D.
Office: 242
Office Hours: M 9-10am 2-5pm; W 9-10am

Other Availability:
Phone: 903.565.5911
Email: dfazarro@uttyler.edu
Preferred Contact: N/A

Course Content:
This three hour graduate course will entail the primary focus of constant improvement in the overall equipment effectiveness (OEE) as it relates to equipment and capital assets. Other associated topics as life cycle costing, maintenance budgeting, machine availability. TPM brings maintenance into focus as a necessary and vitality important part of the business. TPM is used at all levels of the organization.

Course Learning Objectives:
These are the objectives for this course:

- Understand how TPM improves operations by preventing equipment breakdowns; prevention of product defects and rejects; improving equipment effectiveness and efficiency; involving and training operators in equipment maintenance
- Understand the usage of tools for TPM implementation and able to identify and eliminate loss through TPM implementation
- Understand the roles and responsibilities of a TPM implementation organization and the critical issues
- Understand the economic side to TPM and how it relates to Return on Investment (ROI)

Student Learning Outcomes
At the end of the course, students learning outcomes should be aligned with the Industrial Technology program outcomes:

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<thead>
<tr>
<th>Program Outcomes</th>
<th>TECH 5312</th>
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<tr>
<td>1. An ability to apply the knowledge to practical uses of management</td>
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<td>2. An ability to plan and assess problems to determine viable solutions</td>
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<td>3. An ability to design a system, component, or process to meet desired needs.</td>
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<td>4. An ability to use communication and writing skills</td>
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<td>5. An understanding of professional and ethical responsibility</td>
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6. An ability to communicate effectively.
7. An awareness of the impact of engineering and technology solutions in a global and societal context.
8. An awareness and commitment for lifelong learning.

Course Competencies

- **Computer-based skills**: Each student will present using PowerPoint and other delivery technology to enhance delivery of reports/project
- **Communication skills**: Each student will exhibit a mastery of both written and oral skills in plant visitation reports and maintenance manager interview.
- **Problem-Solving**: Each student will gather and use critical-thinking skills to develop business plan to reduce monetary loss
- **Ethical/Ethical Business Issues for decision making and Behavior**: Ethical issues will be presented when covering the subjects of budgeting and purchasing issues.
- **Accountability**: Each student will complete the course objective and requirements to meet the above course competencies

Assignments

- Issue discussions (round table)
- Journal entries
- Internet (Research) Assignments
- Assigned reading materials
- Midterm (Case Study)
- Final project

Learning-Management

Students will be able to view announcements, course progress, and retrieve some assignments using Blackboard™. This technology enable students to be proactive in their learning and effective communication between the student and instructor.

Grading Policy and Criteria to Determine Final Course Grade:

Exploration trips, videos, and guest speakers will be supplemental to the course

Weighted grade distributions#

- Journal entries 10%
- Internet (Research) Assignments 15%
- Book Assignments 15%
- Midterm (Case Study) 25%
- Final project 35%

Date of Final Exam:
Nov, 13-18, 2010
Calendar/Schedule:

Date to Withdraw Without Penalty:
OCTOBER 29, 2010

Attendance and Make-Up Policy:
Attendance is expected in this course in order to achieve maximum learning for all participants. Unforeseen circumstances do sometimes arise, so periodic absences may occur. If you find that you must miss a class meeting, please contact the instructor prior to the start of class. Please be on time. If you must arrive late, let the instructor know prior to the start of class. Laptops are permitted but the wireless internet card must be disabled during the class. Also, cell phones must be turned off and put away during class.

If a student is sick or have a death in the immediate family, the instructor will discuss the arrangements for turning in make-up work. The student must have written proof too make up an assignment or exam.

Writing Assistance
Each student is entitled to free writing assistance in the Writing Center. Students who take advantage of this service will receive five extra points on essay grades if they take their drafts to the Writing Center. The student
must provide documentation that he or she received assistance in the Center. **An appointment is strongly advised.**

**Required Textbooks, Materials, and Supplies:**

**Required Activities Scheduled Outside of Regularly-Scheduled Class time (fees, tickets, procedures and/or forms required):**
There will be one exploration trip for the semester. More information will be provided once the course begins.

**Department Website:** www.utttyler.edu/hrdt

**Students Rights and Responsibilities**
To know and understand the policies that affect your rights and responsibilities as a student at UT Tyler, please follow this link: http://www.utttyler.edu/wellness/StudentRightsandResponsibilities.html

**Grade Replacement/Forgiveness**
If you are repeating this course for a grade replacement, you must file an intent to receive grade forgiveness with the registrar by the 12th day of class. Failure to do so will result in both the original and repeated grade being used to calculate your overall grade point average. Undergraduates will receive grade forgiveness (grade replacement) for only three course repeats; graduates, for two course repeats during his/her career at UT Tyler.

**State-Mandated Course Drop Policy**
Texas law prohibits a student who began college for the first time in Fall 2007 or thereafter from dropping more than six courses during their entire undergraduate career. This includes courses dropped at another 2-year or 4-year Texas public college or university. For purposes of this rule, a dropped course is any course that is dropped after the 12th day of class (See Schedule of Classes for the specific date). Exceptions to the 6-drop rule may be found in the catalog. Petitions for exemptions must be submitted to the Registrar's Office and must be accompanied by documentation of the extenuating circumstance. Please contact the Registrar's Office if you have any questions.

**Disability Services**
In accordance with federal law, a student requesting accommodation must provide documentation of his/her disability to the Disability Support Services counselor. If you have a disability, including a learning disability, for which you request an accommodation, please contact Ida MacDonald in the Disability Support Services office in UC 282, or call (903) 566-7079.

**Student Absence due to Religious Observance**
Students who anticipate being absent from class due to a religious observance are requested to inform the instructor of such absences by the second class meeting of the semester.

**Student Absence for University-Sponsored Events and Activities**
If you intend to be absent for a university-sponsored event or activity, you (or the event sponsor) must notify the instructor at least two weeks prior to the date of the planned absence. At that time the instructor will set a date and time when make-up assignments will be completed.

**Social Security and FERPA Statement:**
It is the policy of The University of Texas at Tyler to protect the confidential nature of social security numbers. The University has changed its computer programming so that all students have an identification number. The electronic transmission of grades (e.g., via e-mail) risks violation of the Family Educational Rights and Privacy Act; grades will not be transmitted electronically.
Emergency Exits and Evacuation:
Everyone is required to exit the building when a fire alarm goes off. Follow your instructor’s directions regarding the appropriate exit. If you require assistance during an evacuation, inform your instructor in the first week of class. Do not re-enter the building unless given permission by University Police, Fire department, or Fire Prevention Services.

Expected Classroom Etiquette
The University of Texas at Tyler is committed to promoting a level of classroom etiquette that is conducive to maximum teaching and learning. Therefore, the following etiquette is expected of students:

1. Attend class each time the class meets.
2. Be on time for class and remain for the entire period. Students are inconsiderate of their classmates when they arrive late and leave early.
3. Refrain from talking while the teacher or another student is lecturing. Idle chattering and giggling are disruptive to the class and disrespectful to the teacher and classmates.
4. Without prior approval from the instructor, students are not allowed to use cell-phones, devices with earphones or any other electronic device (including laptops) in class.
5. Be attentive and participate in class.
6. Refrain from eating and drinking in the classroom.