

## Course Number and Section (PTAC-2438-111CL)

## Name of Course (Process Tech III-Operations)

**Course Semester (Summer 2021)** 

# Room TVB 1552 Time and days of course T & TH- 8:00 AM - 12:50 PM

**Instructor:** Karen Kupsa

Email: kskupsa@com.edu Phone: 713-819-4746

**Communicating with your instructor:** ALL electronic communication with the instructor must be through your COM email. Due to FERPA restrictions, faculty cannot share any information about performance in the class through other electronic means.

#### **Student hours and location:**

Cell Phone – 713-819-4746

Office Hours: Monday 4:15 PM to 5:00 PM

Tuesday 3:30 PM to 5:00 PM Wednesday 4:15 PM to 5:00 PM

#### **Required Textbook:**

Operations Student Workbook & Timtene Manual by CAPT (one book)
Operations Lab Manual Exercises by COM PTEC
Operations Lecture Manual by COM PTEC
Bring Your "A" Game to Work, Workbook
Desert Survival Situation Booklet

**Textbook Purchasing Statement:** A student attending College of the Mainland is not under any obligation to purchase a textbook from the college-affiliated bookstore. The same textbook may also be available from an independent retailer, including an online retailer.

### **Course Description:**

Process Technology III – Operations is one of the eight core courses in the Process Technology Alliance curriculum, sponsored by the North American Process Technology Alliance (NAPTA, formerly GCPTA). The two-year program has been created to train students for careers as process technicians in the chemical and refining process industries. This course is typically taken in the 4th semester of the PTEC program.

The course uses existing knowledge presented the PTAC 1410 – Equipment, PTAC 2420 – Systems, and PTAC 1432 – Instrumentation courses to bring together and understand the operation of an entire processing unit. Students study concepts related to commissioning, normal startup, normal operations, normal shutdown, turnarounds, and abnormal situations, as well as the process technician's role in performing the tasks associated with these concepts within an operating unit. The Envision Simulator will be utilized extensively.

### Course requirements (including description of any special projects or assignments):

All 5 tests will be done in the classroom.

All labs will be done on your computers.

The procedure homework assignment must be typed.

The P&ID homework must be neatly hand drawn.

Classroom Conduct Policy: College of the Mainland requires that students enrolled at COM be familiar with the Standards of Student Conduct, which can be found in the on-line Student Handbook. <a href="http://www.com.edu/student-services/student-handbook.php">http://www.com.edu/student-services/student-handbook.php</a>. Students should always act in a professional manner. Disruptive students will be held accountable according to college policy. Any violations of the Code of Conduct will result in a referral to the Office for student Conduct and may result in dismissal from this class.

Electronic Devices: All electronic devices (e.g., cell phones, pagers, cameras, ipads, ipods, tape recorders, laptop computers and other devices) shall not be used in the classroom. This policy takes effect immediately as the student enters the classroom and remains in effect until the class session has been concluded for the day. This policy includes the period between all classroom breaks, i.e., all electronic devices shall be silenced and stowed away whenever the student is in the classroom. An initial violation of this policy by the student during the semester will result in five points being deducted from the student's final semester grade. A second violation by the student will result in another five points being deducted from the student's final grade. Subsequent violations will result in all students in the class losing 1% for each subsequent occurrence. After four (4) occurrences by the same student, the student will be dropped from the class. Students using such devices during an exam will be expelled from the class and will receive an immediate "F" for the course. Hand-held calculators only may be used during an exam; no other electronic devices may be used. No resource material of any kind will be allowed on the desk/table during any exam.

Syllabus Changes: The instructor reserves the right to make changes to this syllabus during the semester as needed to facilitate instruction and/or course needs.

**Determination of Course Grade/Detailed Grading Formula** 

Grading Scale: 550 - 500 499 - 450 449 - 400 399 - 350 Below 350	= A = B = C = D = F	
Five Tests Four Homework Assignment Five Lab Exercises BYAG Exercises TOTAL	gnments	338 72 90 50 550
Test 1 Test 2 Test 3 Test 4 Test 5	118 25 25 50 120	
Homework 1 Homework 2 Homework 3 Homework 4	12 20 20 20	Math Drawing Procedure LOTO
Lab 1 Lab 2 Lab 3 Lab 4 Lab 5	10 20 20 20 20 20	Model 6 Model 8 Model 9 Model 10 Model 3
BYAG BYAG BYAG BYAG BYAG	10 10 10 10 10	Chapter 1 Chapter 2 Chapter 4 Chapter 5 Chapter 6

NOTE: Failure to turn in assigned homework assignments and labs, or to make a credible attempt will have the homework and lab grade entered as negative twice the homework and value. (e.g., if the homework and are worth 10 points it will be entered as a -20). Homework and labs are due at the beginning of class. Late homework and labs will not be accepted.

Make-Up Policy: Tests not taken on the scheduled day (unless previously agreed to by the instructor) must be made up in 5 school days. The test will receive no higher than 90% of the actual grade.

**Course outline**: Operations – Summer 2021 T/TH General Schedule

Week#	Day/Date	Торіс	Reading Assignments & Homework Due Dates
1	1-T 6/08/21	1st Day of Class: Intro + Syllabus + Expectations + BYAG + Explain Grading %'s	
	2-TH 6/10/21	Review of Chemistry & Physics HW 1 Math Problems Read Ch. 1 BYAG (1,10,14,15) Labs	Read Chapter 1 (BYAG) (due 6/22/21) Complete pages 1,10,14 and 15 in your (BYAG) workbook (10 points) (due 6/22/21) HW 1 Math Problems (12 points) (due 6/22/21)
2	3-T 6/15/21	P&ID's I & 2 Drawing Exercise, Pipe flow walkthrough, HW 2 Drawing, Lab 1	Complete Lab 1 (Model 6) (10 points) (due 6/24/21) HW 2 Drawing (20 points) (due 7/8/21)
	4-TH 6/17/21	Timtene Unit – Intro	
3	5-T 6/22/21	Timtene Unit – Utilities Read Ch. 2 BYAG (4, 23, 27, 29) Turn in BYAG pages 1,10,14, 15. HW 1 Math problems	Read Chapter 2 (BYAG) (due 7/1/21) Complete pages 4, 23, 27, 29 in your (BYAG) workbook (10 points) (due7/1/21) HW 1 Math problems due Pages 1,10,14 and 15 in your (BYAG) workbook
	6-TH 6/24/21	Timtene Unit Lab 2 Questions Lab 1 (Model 6) due	Complete Lab 2 (Model 8) (20 points) (due 7/8/21) Lab 1 (Model 6) due
4	7-T 6/29/21	Exam 1 – 118 points	
	8-TH 7/1/21	Communications Maintenance Read Ch. 4 BYAG (6, 40, 41, 44) Turn in BYAG pages 4, 23, 27, 29.	Read Chapter 4 (BYAG) (due 7/13/21) Complete pages 6, 40, 41, 44 in your (BYAG) workbook (10 points) (due7/13/21) Pages 4, 23, 27, and 29 in your (BYAG) workbook
5	9-T 7/6/21	General Lab	
	10-TH 7/8/21	Procedures HW 3 – Procedure Labs 3 & 4 Lab 2 (Model 8) due HW 2 Drawing due	HW 3 Procedure (20 points) (due 7/22/21) Complete Labs 3 & 4 (Models 9 & 10) (20 points each) (due 7/20/21) Lab 2 (Model 8) due HW 2 Drawing due
6	11-T 7/13/21	Exam 2-PSM Test – 25 points	Read Chapter 5 (BYAG) (due 7/22/21)

		Read Ch. 5 BYAG (9, 61, 63, 66)  Turn in BYAG pages 6, 40, 41, 44.	Complete pages 9, 61, 63, 66 in your (BYAG) workbook (10 points) (due 7/22/21) Pages 6, 40, 41, 44 in your (BYAG) workbook
	12-TH 7/15/21	SHE LOTO HW 4 - LOTO	HW 4 LOTO (20 points) (due 7/29/21)
	13-T 7/20/21	Emergencies Film Diagnosis Lab 5 Labs 3 & 4 (Models 9 & 10) due	Complete Lab 5 (Model 3) (20 points) (due 7/29/21) Labs 3 & 4 (Models 9 & 10) due
7	14-TH 7/22/21	Distillation Unit Status Read Ch. 6 BYAG (7, 48, 51, 52) Turn in BYAG pages 9, 61, 63, 66. HW 3 Procedure due	Read Chapter 6 (BYAG) (due 8/3/21) Complete pages 7, 48, 51, 52 in your (BYAG) workbook (10 points) (due 8/3/21) Pages 9, 61, 63, 66 in your (BYAG) workbook HW 3 Procedure due
	15-T 7/27/21	General Lab	
8	16-TH 7/29/21	Exam 3 - Envision Simulator test - 50 points HW 4 LOTO due Lab 5 (Model 3) due	HW 4 LOTO due Lab 5 (Model 3) due
9	17-T 8/3/21	Questions Turn in BYAG pages 7, 48, 51, 52.	Pages 7, 48, 51, 52 in your (BYAG) workbook due
	18-TH 8/5/21	Exam 3 BYAG – 25 points	
10	19-T 8/10/21	Exam 5 – 120 points	
	20-TH 8/12/21	General Lab	

<sup>\*</sup>Schedule is subject to change at the discretion of the instructor(s).

Attendance Policy: Much of the learning occurs in the classroom setting through lectures and labs. It is difficult to learn all the concepts simply by reading the course textbook. Class participation is essential to learning. Many of the class sessions cover topics that have no handouts. Good note taking is important to be successful in this class. Many hands on and group activities take place in the classroom. Attendance is taken each class period. If you miss class and any activities that are graded, you will get a zero and no make ups are allowed.

If you find that you are going to miss a scheduled class for any reason, please notify your professor by e-mail, as soon as possible. Making contact with fellow classmates is highly encouraged to get details on missed assignments.

Attends class and is punctual – The student attends every class period, arrives on time for class activities or informs the instructor in a timely manner of unavoidable situations that cause the student to be late or miss class. Whatever we cover, will not be repeated.

**Withdrawal Policy:** Students may withdraw from this course for any reason prior to the last eligible day for a "W" grade. Before withdrawing students should speak with the instructor and consult an advisor. Students are only permitted to withdraw six times during their college career by State law. The last day to withdraw for the 16-week Fall session is August 2, 2021.

**FN Grading:** The FN grade is issued in cases of *failure due to a lack of attendance*, as determined by the instructor. The FN grade may be issued for cases in which the student ceases or fails to attend class, submit assignments, or participate in required capacities, and for which the student has failed to withdraw. The issuing of the FN grade is at the discretion of the instructor.

**Early Alert Program:** The Student Success Center at College of the Mainland has implemented an Early Alert Program because student success and retention are very important to us. I have been asked to refer students to the program throughout the semester if they are having difficulty completing assignments or have poor attendance. If you are referred to the Early Alert Program you will be contacted by someone in the Student Success Center who will schedule a meeting with you to see what assistance they can offer in order for you to meet your academic goals.

**Academic Dishonesty:** Any incident of academic policy will be dealt with in accordance with college policy and the Student Handbook. Academic dishonesty – such as cheating on exams is an extremely serious offense and will result in a **grade of zero** on that exam and the student will be referred to the Office of Student Conduct for the appropriate discipline action.

**Plagiarism:** Plagiarism is using someone else's words or ideas and claiming them as your own. Plagiarism is a very serious offense. Plagiarism includes paraphrasing someone else's words without giving proper citation, copying directly from a website and pasting it into your paper, using someone else's words without quotation marks. Any assignment containing any plagiarized material will receive a **grade of zero** and the student will be referred to the Office of Student Conduct for the appropriate discipline action.

**Concerns/Questions Statement:** If you have any questions or concerns about any aspect of this course, please contact me using the contact information previously provided. If, after discussing your concern with me, you continue to have questions, please contact the PTEC Department Chair of Industrial Technology, Derrick Lewis at 409-933-8607 or email dlewis22@com.edu.

<b>Student Learner Outcome</b>	Maps to Core Competencies	Assessed via this Assignment
1. Operate various	Critical Thinking	Distillation Test
process systems		
2. Write and follow	Communication - writing	LOTO assignment, procedure
safety and operational		assignment
procedures		

3. Collect and use data	Empirical and Quantitative	Lab exercises
for determination of	skills	
process specifications		
4. Work in self-directed	Teamwork	Distillation Jeopardy,
teams		Survival, Egg Exercise

Grade Appeal Process: Concerns about the accuracy of grades should first be discussed with the instructor. A request for a change of grade is a formal request and must be made within six months of the grade assignment. Directions for filing an appeal can be found in the student handbook. https://build.com.edu/uploads/sitecontent/files/student-services/Student\_Handbook\_2019-2020v5.pdf. An appeal will not be considered because of general dissatisfaction with a grade, penalty, or outcome of a course. Disagreement with the instructor's professional judgment of the quality of the student's work and performance is also not an admissible basis for a grade appeal. https://build.com.edu/uploads/sitecontent/files/student-services/Student\_Handbook\_2019-2020v5.pdf

**Academic Success & Support Services:** College of the Mainland is committed to providing students the necessary support and tools for success in their college career. Support is offered through our Tutoring Services, Library, Counseling, and through Student Services. Please discuss any concerns with your faculty or an advisor.

**ADA Statement:** Any student with a documented disability needing academic accommodations is requested to contact Holly Bankston at 409-933-8520 or hbankston@com.edu. The Office of Services for Students with Disabilities is in the Student Success Center.

Counseling Statement: Any student that is needing counseling services is requested to please contact Kelly Waters in the student success center at 409-933-8618 or kwaters@com.edu. Counseling services are available on campus in the student center for free and students can also email counseling@com.edu to setup their appointment. For Summer 2020, services are being offered virtually.

COVID-19 Statement: All students, faculty, and staff are expected to familiarize themselves with materials and information contained on the College of the Mainland's Coronavirus Information site at <a href="www.com.edu/coronavirus">www.com.edu/coronavirus</a>. In compliance with <a href="Governor Abbott's May 18 Executive Order">Governor Abbott's May 18 Executive Order</a>, face coverings/masks will no longer be required on COM campus. Protocols and college signage are being updated. We will no longer enforce any COM protocol that requires face coverings. We continue to encourage all members of the COM community to distance when possible, use hygiene measures, and get vaccinated to protect against COVID-19. Please visit <a href="com.edu/coronavirus">com.edu/coronavirus</a> for future updates.