Course Number and Section (PTAC-2314-161IN)
Name of Course (Process Quality)
Course Semester (Summer 2021)

Instructor Information:
Jasline Randle
Email: jrandle5@com.edu
Online office hours: Tuesdays 5:00 pm to 8:00 pm via Microsoft Teams

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.

All email correspondence should make good use of the Subject line, with your own name, course number and purpose on it [Subject: Doe, Jane – 2314 HW WK3]. If you attach a file to either Blackboard or e-mail, the file name should look something like this (use your own name and file name): [Doe_Jane_homework5].

Student hours and location: 100% online

Required Textbook: *Process Quality* by CAPT (ISBN: 0-13-700409-5)

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: PTAC 2314–Process Quality is one of the eight core courses in the Process Technology Alliance curriculum which is 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 will explore the history of Quality including Juran's, Crosby's and Deming's theories, and the current applications in today's petrochemical industry. Internal and external customer/supplier relationships will be examined. Qualitative aspects of quality and the statistical methods which affect the quantitative aspects of measuring quality will be taught and used throughout the course. Students will be exposed to the benefits of continuous improvements and quality work as they pertain to developing a high-performance work team.

Students must have completed COSC 1301 and Math 1314 or TECM 1303 in order to take the PTAC course. Failure to have completed these courses prior to enrollment in this class will result in the student being dropped from the class.

Course Requirements: As this is an online class, students must have the appropriate equipment and a reliable internet connection to complete the course. The COM IT department has indicated taking online exams on a phone, even when using the Blackboard app, is difficult and tricky at best and highly recommends taking online exams by computer.

Student Learner Outcomes: Students successfully completing this course will demonstrate competency in the following Core Objectives. Competency will be demonstrated through exams, homework assignments, class participation, and the two team projects.

1. Reading: Ability to analyze & interpret a variety of language based & media materials such as: textbook material, PowerPoint slides, videos, and printed notes.
2. Writing: Competency is the ability to produce clear, correct, & coherent prose adapted to purpose, occasion & audience. This will be demonstrated through short-answer and essay questions and team projects.
3. Speaking: Competency is the ability to communicate orally in clear, coherent & persuasive language adapted to purpose. This will be demonstrated through project oral presentations.
4. Listening: At the college level is the ability to analyze & interpret various forms of auditory expression. This will be demonstrated through lecture, videos, and team presentations.
5. Critical Thinking: Embraces methods for applying qualitative skills analytically to subject matter in order to evaluate arguments & to construct alternate strategies. Creativity: Means novel product, activity or interaction demonstrating originality &/or flexibility. These will be demonstrated through exam questions and team projects.
6. Computer Literacy: is the ability to use & apply technology in communicating, problem solving, acquiring & processing information.
7. Mathematical Literacy: Ability to apply mathematical tools including technology to develop, solve, & interpret mathematical models.
8. Cultural Competence: Ability to develop & demonstrate awareness, knowledge, attitudes, & skills necessary to interact in a diverse & globally interdependent world.

Determination of Course Grade/Detailed Grading Formula:
20% Participation (Blackboard access, Office hours visit, Assignment submission)
20% Homework/Discussion Questions
60% Exam Average

Grading Scale:

90 – 100	= A	
80 – 89	= B	
70 – 79	= C	**Students must receive a minimum grade of C to pass this course.**
60 – 69	= D	
0 – 59	= F	

Exam 1: Chapters 1-5
Exam 2: Chapters 6-10
Exam 3: Chapters 11-15
Final Exam: Chapters 1-16

Exams will primarily test the student's understanding of the chapters from the textbook **"*Process Quality*" and chapter slides.** All exams will be administered online with the amount of time allotted for a scheduled class period (170 minutes) to complete unless otherwise agreed to by the instructor. **The final exam is optional for any student whose exam average for Exams 1-3 is 90% or greater.**

Course Outline:

Wk. #, Date	Topic (Chapter Number)	Reading and Assignment Due
Wk1, 6/7	Ch 1 (Intro to Process Quality); Ch 2 (Variability Concepts); Ch 3 (Process Capability)	Read Chapters 1, 2 & 3 Work on Ch 1, 2 & 3 HW
Wk2, 6/14	Ch 4 (Variables Control Chart); Ch 5 (Attributes Control Charts)	Read Ch 4 & 5 Work on Ch 4 & 5 HW
Wk3, 6/21	Review Chapters 1 - 5	**Turn in Ch 1 – 5 HW** **Submit Exam 1 (Ch 1 – 5)**
Wk4, 6/28	Ch 6 (Other Basic Quality Tools); Ch 7 (Designed Experiments); Ch 8 (Root Cause Analysis)	Read Chapters 6, 7 & 8 Work on Ch 6, 7 & 8 HW
Wk5, 7/5	Ch 9 (Customer Quality); Ch 10 (Six Sigma)	Read Chapters 9 & 10 Work on Ch 9 & 10 HW
Wk6, 7/12	Review Chapters 6 - 10	**Turn in Ch 6 – 10 HW** **Submit Exam 2 (Ch 6 – 10)**
Wk7, 7/19	Ch 11 (Teams); Ch 12 (Management Systems)	Read Chapters 11 & 12 Work on Ch 11 & 12 HW
Wk8, 7/26	Ch 13 (Quality Reliability Planning); Ch 14 (Lean); Ch 15 (Quality Costs)	Read Chapters 13, 14 & 15 Work on Ch 13, 14 & 15 HW
Wk9, 8/2	Ch 16 (Putting the Puzzle Together)	**Turn in Ch 11 – 15 HW** **Submit Exam 3 (Ch 11 – 15)**
Wk10, 8/9	Review Chapters 1 - 16	**Submit Final Exam (Chapters 1 -16)**

Make-Up Policy:
There are no make-ups for exams. There are no extra credit points given to late assignments. Deadline for taking online exams may be extended provided arrangements are made with your professor prior to the scheduled deadline. Extended exams may score no higher than 90% unless arrangement were made prior to the original exam deadline. Homework not turned in on the due date may be scored at 80% of the maximum unless prior arrangements are made.

Late Work Policy:
No late assignments will be accepted. Assignments submitted late will not be graded or returned. Students will earn a grade of zero (0) on late assignments. All assignments should be submitted before 11:59 pm on the due date via the designated area on Blackboard.

Return Work Policy
In most cases, assignments will be graded and returned within 14 business days of submission.

Attendance Policy:
A record will be kept of participation (Blackboard access, Assignment submission, Office Hours visit, etc.). Failure to participate will result in an Early Academic Alert notification and other possible actions. Course participation data can be provided to future employers at their request. Makeup work is the responsibility of the student and contacting fellow classmates to get details on missed assignments is highly encouraged.

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 10-week Summer 2021 session is August 2.**

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 disciplinary action. Academic dishonesty is also the copying of homework or class assignments, such as project reports. If copying is discovered, all students with copied work will be given a grade of zero for the specific assignment. If more than one instance of copying by a student is discovered, a grade of "F" for the course will be given to the student.

Student Concerns: 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 Derrick Lewis, the Department Chair Industrial Careers, at 409-933-8607 or dlewis22@com.edu.

Student Learner Outcome	Maps to Core Objective	Assessed via this Assignment
1. Students will demonstrate knowledge of historical significance of events, key players, and foundational principles in the successful implementation of Process Quality in the Petro-chemical Industry today	70% of students will answer the questions on this topic correctly.	Exam and Homework
2. Students will understand and apply foundational principles of statistics to complex problems to minimize nonconformance and unplanned events that adversely affect Process Quality in the Petro-chemical Industry today.	70% of students will answer the questions on this topic correctly.	Exam and Homework
3. Students will know and understand how to sustain continuous improvement through teamwork, management systems, and planning, and they will know the cost to quality and customers associated with taking no action and its effect on Process Quality in the Petro-chemical Industry today.	70% of students will answer the questions on this topic correctly.	Exam, Homework, and Class Projects
4. Students will know and understand the key principles for root cause analysis and corrective action by applying industry-common root cause methodologies and root cause analyses tools.	70% of students will be assessed a minimum grade of C on their class project report.	Exam, Root Cause Analysis Project, and Final Project Report

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 at 409-933-8618 or kwaters@com.edu or Holly Bankston at 409-933-8520 hbankston@com.edu; both of whom are in the student success center. Counseling services are available on campus in the student center for free and students can also email counseling@com.edu to setup their appointment. Appointments are strongly encouraged; however, some concerns may be addressed on a walk-in basis.

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 www.com.edu/coronavirus. In compliance with Governor Abbott's May 18 Executive Order, 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 com.edu/coronavirus for future updates.