KENNESAW STATE UNIVERSITY

SYLLABUS
COLLEGE OF COMPUTING AND SOFTWARE ENGINEERING
DEPARTMENT OF INFORMATION TECHNOLOGY
IT 4153: ADVANCED DATABASE

Course Information

Class meeting time:
Modality and Location:
Syllabus is posted in D2L

Instructor

Name: Linh Le
E-mail: lle13@kennesaw.edu
Office Location: J-340
Office Hours:
Course Communication:
- **KSU email** is the **best way** to reach the instructor. Students' emails will be replied within 24 hours during the weekday. Weekend and holidays don't apply.
- When email the instructor using accounts other than D2L email, put the course number in the subject line. Emails without proper subject line will not be replied.
- Avoid using personal email. Sensitive information (such as your grades) can only be sent to D2L email or KSU email account.

Course Description

This course will study how databases are used with programming applications. Topics include advanced PL/SQL (or similar database programming language), database transaction, database security, database maintenance, and distributed and web databases.

Prerequisites: none.
Credit Hours: 3
Required Texts: *No Textbook Required*
Recommended Texts: TBD
Technology Requirements:

- This class uses D2L as hosting site. Run a system check to ensure your computer work with D2L. Check out UITS D2L training: http://uits.kennesaw.edu/support/d2ltraining.php .

- Internet Connection. A high-speed Internet connection such as DSL or cable Internet access is highly recommended. You may also use computer labs on campus to complete the coursework.
- A web camera is required for a student to take final exam.

Student Learning Outcomes

1. By the end of the course, students who complete this course successfully will be able to
2. Describe current and emerging database models and technologies;
3. Develop functions and procedures for data manipulation and database access auditing;
4. Describe database monitoring and performance tuning;
5. Describe database security and administration issues, including backup and recovery;
6. Explain the concepts of data warehousing and data mining.

Course Requirements and Assignment

People learn through interactions, to facilitate interactive learning this course will use Discussions feature of D2L. Discussions will take place in an **asynchronous** manner.

There are 13 content modules in this course – one for each week. Last week will be dedicated to the group project implementation and deployment. New learning modules will come with a lab assignment that is done with Oracle 18c. New contents, quizzes, assignments, etc. will be posted on Wednesday 6:00 pm. All module assignments are due at 11:59 pm on Wednesday.

Evaluation and Grading Policies

Weight Distribution

Grading Item	Weight
Discussions	10
Quizzes	10
Assignment Labs	30
Midterm exam	20
Final exam	30
Total	**100%**

Grading Scale:
90% - 100% A
80% - 89% B
70% - 79% C
60% - 69% D
0% - 59% E

Grades will be rounded up if they are > or = .5 or above, for example, an 89.6 is an A, but 79.2 is a C.

Course Policies

Course Attendance Policy
- For on campus/hybrid section, students are expected to come to each class on time. Stay during the whole class period.
- For both campus/hybrid and online section, students' attendance is also measured by how often a student login in D2L course website, participation of online discussion, as well as on-time completion of homework.

Grading Items Turnaround Time
- The grades for the quizzes and exams will be available five business days after the due date
- The grades for labs/assignments/projects will be available five business days after the due date

Assignments & Exam Policy

- All assignments **MUST** be submitted through D2L (https://kennesaw.view.usg.edu/) course website by the deadline specified in course calendar. Email submission will **NOT** be accepted. Any assignment that is less or equal than 24 hours late is subject to 10% penalty. Any assignment that is less or equal than 48 hours late is subject to 20% penalty. Any assignment that is more than 48 hours late will **NOT** be accepted.
- All quizzes and exams MUST be completed on D2L website by the deadline specified in course calendar. The quizzes exams can't be opened/submitted after the deadline.
- If you must miss an exam due to illness, you must e-mail or call the instructor before the scheduled time. Failure to notify the instructor prior to the scheduled time will produce an automatic zero for the exam. NO makeup test except for emergencies with proof (e.g. doctor's slip).

Student Responsibility
For this class, you are expected to spend seven to eight hours each week on coursework:
- Check KSU email regularly;
- Login D2L course website frequently to access the course material (at least every other day);
- Follow the weekly study guide in the learning module;
- Study the assigned material such as virtual lectures, textbook chapters and the PowerPoint slides;
- Complete assigned quiz/assignment/discussion/project on time.

Tips for Effective Online Learning
For an online class, students can really enjoy the benefits of learning at you own pace and at the place of your choice. Below are some tips for effective online learning.
- *Check D2L course website frequently*. It's recommended that students should login D2L course site **AT LEAST** every other day. Always be aware of current status of the course. Take advantage of the posted learning material such as recorded lectures.
- *Work with the instructor closely*. If you have any question, contact the instructor immediately. You can either email or text me and your message is guaranteed to be replied within 12 hours.
- *Start your work early*. If you can start a task early, don't start late. Assuming you spend the same amount of time completing the task, starting later will be much more stressful than

starting early. Never start until the last minute! You'll have no turnaround time if you need help or something happens.

- *Keep up with the work*. Don't fall behind. If you do, contact the instructor immediately for what you need to do. The instructor may also contact you if he is concerned. Respond to the instructor's inquiry promptly.

Class Communication Rules

In any classroom setting there are communication rules in place that encourage students to respect others and their opinions. In an online environment, the do's and don'ts of online communication are referred to as **Netiquette**. As a student in my course you should:

- Be sensitive and reflective to what others are saying.
- **Avoid typing in all capitals** because it is difficult to read and is considered the electronic version of 'shouting'.
- Don't flame - These are outbursts of extreme emotion or opinion.
- Think before you hit the post (enter/reply) button. You can't take it back! Don't use offensive language.
- Use clear subject lines.
- Don't use abbreviations or acronyms unless the entire class knows them. Be forgiving. Anyone can make a mistake.
- Keep the dialog collegial and professional, humor is difficult to convey in an online environment.
- Always **assume good intent** and **respond accordingly**. If you are unsure of or annoyed by a message, wait 24 hours before responding.

Course Schedule

The course schedule is tentative and is subject to change. Please use D2L course calendar as accurate due dates.

Week	Start Date	Module
Week 1		Module 0 Orientation Module 1 SQL Review
Week 2		Module 1 SQL Review
Week 3		Module 2 Introduction to SQL Procedures & Functions
Week 4		Module 3 Advanced SQL Procedures & Functions
Week 5		Module 4 Triggers
Week 6		Review for midterm
Week 7		Module 5 Database Environment
Week 8		Module 6 Performance Management
Week 9		Module 7 Database Security
Week 10		Module 8 Database Backup and Recovery
Week 11		Module 9 Data Warehouse
Week 12		Module 10 NoSQL Databases
Week 13		Module 11 Special purpose databases
Week 14		Review for final
Week 15		Review/Final (TBA)
		Final (if previous week is for review)

Important dates:
- Add/Drop ends:
- Last Day to Withdraw Without Academic Penalty:
- Last Day to Withdraw for the Term With a WF:
- Last Day of Class:

Institutional Policies

- [Federal, BOR, & KSU Course Syllabus Policies](#)
- [Academic Integrity Statement](#)
  - Examples of violation of academic integrity: 1) copy from others or from Internet; 2) allow others to copy your work; 3) use other's help or help other in completing the quizzes or exams.
  - The first violation of academic integrity, the student will immediately receive 0 for the associated grading item. For the 2nd violation, the student will receive a fail grade for this course.

KSU Statements on Course Delivery and COVID-19

Course Delivery
KSU may shift the method of course delivery at any time during the semester in compliance with University System of Georgia health and safety guidelines. In this case, alternate teaching modalities that may be adopted include hyflex, hybrid, synchronous online, or asynchronous online instruction.
COVID-19 illness
If you are feeling ill, please stay home and contact your health professional. In addition, please email your instructor to say you are missing class due to illness. Signs of COVID-19 illness include, but are not limited to, the following:
- Cough
- Fever of 100.4 or higher
- Runny nose or new sinus congestion
- Shortness of breath or difficulty breathing
- Chills
- Sore Throat
- New loss of taste and/or smell

COVID-19 vaccines are a critical tool in "Protecting the Nest." If you have not already, you are strongly encouraged to get vaccinated immediately to advance the health and safety of our campus community. As an enrolled KSU student, you are eligible to receive the vaccine on campus. Please call (470) 578-6644 to schedule your vaccination appointment or you may walk into one of our student health clinics.
For more information regarding COVID-19 (including testing, vaccines, extended illness procedures and accommodations), see KSU's official [Covid-19 website](#).
Face Coverings

Based on guidance from the University System of Georgia (USG), all vaccinated and unvaccinated individuals are encouraged to wear a face covering while inside campus facilities. Unvaccinated individuals are also strongly encouraged to continue to socially distance while inside campus facilities, when possible.

Student Resources

This link contains information on help and resources available to students: [KSU Student Resources for Course Syllabus](#)