

Texas A&M University-Texarkana
BIOL/CHEM/CJ 472: Introduction to Forensic Science
2012 Fall Semester
Thursdays 5:00 p.m. – 8:40 p.m., SCIT 201



Instructor

Dr. Artem Kireev

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Office Hours

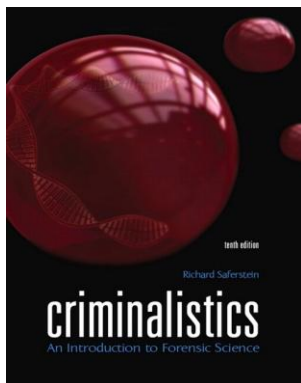
M: 11:00 a.m.–3:00 p.m., W: 12:00 p.m.–4:00 p.m., and F: 12:00 p.m.–4:00 p.m.

Catalog Description

BIOL/CHEM/CJ 472 Introduction to Forensic Science. The study of basic concepts, techniques, practices, and procedures of criminalistics, including the most current technologies in forensic analysis. Criminal investigation of actual cases will be discussed with a minimum of scientific terminology. In addition, the nature of physical evidence will be emphasized, including the use of DNA profiling. Strongly recommended for Criminal Justice majors and Pre-Allied Health track students in Biology.

Prerequisites: CHEM 1311 and BIOL 1306.

Textbooks



CRIMINALISTICS: An Introduction to Forensic Science by R. Saferstein, (10th Edition), Pearson-Prentice Hall, 2011. **ISBN-10: 0135045207, ISBN-13: 9780135045206.**

Course Objectives

This course will guide students into the background concepts of criminalistics. The general objective of this course is to familiarize students with a basic understanding of the science of criminalistics. The course is designed for both science and criminal justice majors and other interested in the related fields. After completion of this course students should have an understanding of the following:

- The most current technologies used in forensic analysis
- The various methods used to collect crime scene evidence
- Analysis of inorganic and organic substances
- The role of fingerprinting in forensic science
- Forensic toxicology and serology
- Document and voice examination
- DNA fingerprinting



Course Evaluation and Grading

Three lecture exams each worth 100 points will be given. Exams will be multiple choice and problem-solving format incorporating concepts and activities introduced in class. Quizzes, structured in a variety of ways, will be given at the beginning of each class meeting. Any reasonable resource may be used on the quizzes. One quiz grade will be dropped. There are also laboratory activities, assignments, and take-home exams. Five points will be given for attendance and timely completion of each laboratory session. Your grade on late work may be reduced by 10 points per day.

Exams (3@100 pts each)	300 points (30%)
Quizzes (8@20 pts each)	160 points (16%)
Labs (10@50 pts each)	500 points (50%)
Assignments (9@5 pts each)	45 points (4%)
Total:	1005 points (100%)

Grading Scale

90-100 %	= A
80-89 %	= B
70-79 %	= C
60-69 %	= D
0-59 %	= F

Make-up exams

Each student is required to take all examinations. Make-up examinations will be given only if the student has an excused or authorized absence, but students must contact the instructor no later than one week after the missed exam, or after return to campus, to indicate why they were absent and to request to take a make-up. It is the responsibility of the student to inquire as to the procedure for making up an exam. A grade of zero (0) will be recorded if the make-up is not taken in a timely manner. There are no make-ups on quizzes and other class assignments.

Assistance

Each student is encouraged to contact the professor for assistance with any class related problem. To discuss grades or concerns, email or call to make an appointment.

Academic Integrity

Academic honesty is expected of students enrolled in this course. Cheating on examinations, unauthorized collaboration, falsification of research data, plagiarism, and undocumented use of materials from any source constitute academic dishonesty and may be grounds for a grade of 'F' in the course and/or disciplinary actions. For additional information, see the university policy manual.

Lecture and Laboratory Rules

Attendance will be taken daily, either by students signing an attendance sheet or by the roll being called verbally. Each lecture will begin with announcements (if needed) followed by a brief review of information from, and/or questions about, the previous lecture. The roll will be taken immediately after the review, usually no more than 5 minutes into the class period. A student is responsible for the content of any missed laboratory period. Laboratory material will be tested on both lecture and laboratory exams. There will be no make-up laboratories. Anyone not present or not answering the roll call will be considered absent except as follows. Students arriving after the roll is called will be allowed to enter and participate. However, it is their responsibility to sign the tardy sheet that will be available.

Important!

- ***Once you have entered the lecture classroom, do not leave or you will be considered absent. Use the facilities before coming to class.***
- ***Cell Phones: Cell phones are to 'turned off' or 'turned to vibrate' during both lecture and laboratory and during all tests and exams. No exceptions!***

Methods of Instruction

- Lecture
- Demonstration
- Outside assignments
- Class discussion
- A-V Media/Internet
- Laboratory work

Lecture Schedule

Note: The following schedule is subject to modifications at any time during the semester. The lecture sequence may change and topics may end sooner or later than noted.

Date	Chapter	Topic
08/30/12	1	Introduction, Background, and History; U. S. Forensic Science Lab System
09/06/12	2	The Crime Scene

09/13/12	3	Physical Evidence
09/20/12	4 & 5	Physical Properties and Organic Analysis
09/27/12	8	Drugs
10/04/12	Video	Forensic Odontology and Anthropology; selected CSI episodes
10/11/12		Exam 1
10/18/12	9	Forensic Toxicology
10/25/12	10 & 12	Forensic Serology and Bloodstain Pattern Analysis
11/01/12	13	Hairs, Fibers, and Paint
11/08/12	Video	Exam 2; selected CSI episodes
11/15/12	14 & 15	Fire Investigation and Investigation of Explosions
11/22/12	11	DNA Fingerprinting
11/29/12	16	Fingerprints
12/06/12	Video	Exam 3; selected CSI episodes

Laboratory Activities

There will be approximately 10-planned laboratory sessions. Lab handouts will be provided before each lab session. No textbook is required.

Date	Laboratory	Topic
09/06/12	1	Classification vs. Individualization and Chain of Custody Fundamentals
09/13/12	2	Every Contact Leaves a Trace
09/27/12	3	Forensic Glass Analysis
10/04/12	4	Analysis of Drugs and Poisons
10/18/12	5 & 6/Video	Analysis of Blood Alcohol by Gas Chromatography; Bloodstain Analysis
10/25/12	7/Video	Blood Spatter Analysis
11/01/12	8	Forensic Hair Analysis
11/22/12	9/Video	Analysis of Fingerprints: Part I
11/29/12	10/Video	Analysis of Fingerprints: Part II

Disability Accommodations

Students with disabilities may request reasonable accommodations through the A&M-Texarkana Disability Service Office by calling call 903-223-3062.

Statement on E-Mail Usage

Upon application to Texas A&M University-Texarkana an individual will be assigned an A&M-Texarkana email account. This email account will be used to deliver official university correspondence. Each individual is responsible for information sent and received via the university email account and is expected to check the official A&M-Texarkana email account on a frequent and consistent basis. Faculty and students are required to utilize the university email account when communicating about coursework.

Attendance Policy and Course Withdrawal

Regular and punctual attendance is of paramount importance. You are expected to attend all meetings of the class, to arrive at the designated beginning time for the class, and to remain until the designated dismissal time for the class. Authorized absences are granted for students who are approved by the appropriate administrator of the University.

Examples of authorized absences include class field trips, University-sponsored workshops, musical performances, and intercollegiate sports participation. Daily quizzes, if administered, are given promptly at the beginning of class and cannot be made up and will not be given if you are not in your seat when they are handed out. The final drop/withdrawal date for the fall semester is published in the [University Calendar](#).

University Drop Policy

To drop this course after the census date (see [semester calendar](#)), a student must complete the Drop/Withdrawal Request Form, located on the University website <http://tamut.edu/Registrar/droppingwithdrawing-from-classes.html> or obtained in the Registrar's Office. The student must submit the signed and completed form to the instructor of each course indicated on the form to be dropped for his/her signature. The signature is not an "approval" to drop, but rather confirmation that the student has discussed the drop/withdrawal with the faculty member. The form must be submitted to the Registrar's office for processing in person, email Registrar@tamut.edu, mail (7101 University Ave., Texarkana, TX 75503) or fax (903-223-3140). Drop/withdraw forms missing any of the required information will not be accepted by the Registrar's Office for processing. It is the student's responsibility to ensure that the form is completed properly before submission. If a student stops participating in class (attending and submitting assignments) but does not complete and submit the drop/withdrawal form, a final grade based on work completed as outlined in the syllabus will be assigned.

We will use Blackboard (<http://bb91a.tamut.edu/>) to post various course materials. The information below will help you use Blackboard effectively.

Student Technical Assistance

- Solutions to common problems and FAQ's for your web-enhanced and online courses are found at this link:
<http://www.tamut.edu/webcourses/index.php?pageid=37>
- If you cannot find your resolution there, you can send in a support request detailing your specific problem here: <http://www.tamut.edu/webcourses/gethelp2.php>
- Blackboard Helpdesk contacts:
Office hours are: Monday - Friday, 8:00a to 5:00p
Julia Allen (main contact) 903-223-3154 jallen@tamut.edu
Kevin Williams (alternate) 903-223-1356 kevin.williams@tamut.edu
Frank Miller (alternate) 903-223-3156 frank.miller@tamut.edu
Nikki Thomson (alternate) 903-223-3083 nikki.thomson@tamut.edu