

## Math 1315 – College Algebra for Economics and Business Analysis – Section 001



**Instructor: Mr. Miguel Arellano**

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Office Hours: **MoWe 11:00 AM-11:50 AM**, or *Talk to Me After Class*; and by *Appointment*.

### Scheduled Meeting Times and Locations

**MoWeFr 9:00-9:50 AM** in room **110 PKH** (Pickard Hall)

### Textbook and Materials

1. **Algebra For Business & Econ Workbook Course Pack**, UTA, 2015 (loose-leaf), AND
2. Choose one of the following two options:
  - a. **Access Card only**: Applied Math Enhanced WebAssign 1-Term LOE Access Card, Cengage Learning, ISBN: 9781285857589
  - b. **Access Card and Textbook Bundle**: ACP Mathematical Applications, 11th Ed. (Custom UTA), by Harshbarger, Cengage Learning, ISBN: 9781305745124
3. Four **Scantron Forms**: Scantron Form **No. 882-E** (green)

Students who wish to enroll in Mr. Arellano's **WebAssign** course will use the **Class Key: uta 5036 3233** at the following website: <https://www.webassign.net/v4cgi/selfenroll/classkey.html>

### Calculator Policy

Students may use a basic scientific, basic financial, or TI-82, 83, or 84 calculator on exams. See the recommended list below. Students **may NOT** use **TI-30X Pro, TI-36X Pro, other graphing calculators, and calculators with QWERTY pad, communication-capable calculators, phones or other electronic devices.**

TI-30X-IIS, TI-30Xa, TI-30XS (*not* the Pro), TI BA II Plus, TI-82, TI-83, or TI-84 (Plus is ok),  
Casio fx-82M-S, Casio fx-85M-S, Casio FC-200 Financial Calculator,  
Sharp EL-531, Sharp EL-738C Financial Calculator, or Datexx DH-170FS EZ Financial Calculator

### Course Elements

#### Attendance Policy

At The University of Texas at Arlington, taking attendance is not required. Rather, each faculty member is free to develop his or her own methods of evaluating students' academic performance, which includes establishing course-specific policies on attendance. As the instructor of this section, I have adopted the following attendance policy. Attendance is mandatory to be successful in the course, but will not be taken.

## Course Schedule of Lessons and Exam Dates

The **Course Schedule** located in Blackboard provides a calendar of Lecture Topics and Exam dates. All due dates are in Central Time.

## Grade Calculation

| Attendance, Homework, Exams  | Percent of Grade |
|------------------------------|------------------|
| Homework                     | 10%              |
| Regular Exams (Average of 3) | 60%              |
| Comprehensive Final Exam     | 30%              |
| Total:                       | 100%             |

## Grading Scale

Grades will be computed based on the following distribution. Grades are rounded up accordingly.

|           |   |
|-----------|---|
| 90 — 100% | A |
| 80 — 89%  | B |
| 70 — 79%  | C |
| 60 — 69%  | D |
| Below 60% | F |

## Homework

Homework (HW) is mandatory, but will not be graded. All three Mid-Term Tests and the Final Exam will be based on problems similar to the Exercises assigned as Homework in the *official* Departmental **MATH 1315 Assignment Sheet**. Students have a **choice** to do their HW either 1) Online using the WebAssign software, or 2) simply work out the HW Exercises from the Assignment Sheet using a regular Notebook and pencil or pen. Note: The online **WebAssign** problems are exactly the **same** as those of the HW **Assignment Sheet**.

## Extra Credit

Extra Credit may be earned extra credit for the three Mid-Term Exams but not for the Final Exam by participating actively during class. Participating in class includes, but it is not limited to, asking questions, answering questions posed by the Instructor, proposing a different way of doing a problem, and even by pointing a mistake

## Exams

There will be three (3) proctored Exams throughout the course of the semester on the following **dates**: **Monday 9/28, Friday 10/30, and Wednesday 12/2/2015.**

- All exams will be administered during class time and must be completed within 50 consecutive minutes.
- You must bring your MavID and a Scantron Form No. 882-E (green) to each exam. You may also bring one 3"x 5" index card with notes front & back and an approved calculator (see list of approved calculators in Materials section). Blank scratch paper will be provided. No additional materials are allowed.
- You may not leave the room during an exam.

- Use of any unauthorized electronic devices or notes during an exam will result in a grade of ZERO.

## Final Exam

The final exam is a comprehensive, proctored exam containing material from all sections covered over the course of the semester.

The **Final Exam** is scheduled for **SATURDAY, DECEMBER, 12, 2015** from **3:30PM** to **6:00 PM**; place TBD.

- You must bring your MavID and a **Scantron Form No. 882-E** (green) to the final exam. You may also bring two 3"x 5" index cards with notes front & back and an **approved Calculator** (see list of approved calculators in Materials section). Blank scratch paper will be provided. **No additional materials are allowed.**
- The final exam will be taken in a location to be announced at least 1 week in advance.
- You may not leave the room during an exam.
- Use of any unauthorized electronic devices or notes during an exam will result in a grade of ZERO.

## Makeup Policy

**There are NO make-up exams.** If you know ahead of time that you are going to miss class for a legitimate reason, it is your responsibility to inform me and make the necessary arrangements. If you have a conflict with a scheduled exam due to a school sponsored or excused event, you **MUST** have documentation and you **MUST** arrange to take the exam **BEFORE** you leave. To request an alternate test date because of an approved conflict, please fill out the **Alternate Test Date Request** Form which can be found in Blackboard. You must either submit the form directly to me during class or office hours or email the form along with the necessary documentation at least two weeks prior to the first exam. A request for a rescheduled exam will only be considered in rare, documentable, and verifiable instances. The decision to grant an alternate test date will be at the sole discretion of the instructor and/or course coordinator.

## Announcements: via the University's Official MyMav Email Accounts

- Students are responsible for all information found in these announcements.
- Students should check their MyMav Email Account daily in case a class announcement is made.

## Help for Students

- Emporium Lab Tutors Pickard Hall 308 – Visit <http://www.uta.edu/math/emporium/> for more information.
- **MATH CLINIC** – located in **Pickard Hall 325**, offers **FREE daily TUTORING!**
- Supplemental Instruction – information is found within a tab in your Blackboard course.
- SOAR is a cost/share tutoring service Ransom Hall 205.
- Maverick Resource Hotline: 817-272-6107.
- Online help: [khanacademy.org](http://khanacademy.org).

## Software and System Requirements

**WebAssign** is tested and supported for the following Operating Systems/Browser versions:

- Mozilla® Firefox®, version 24 or later
  - Windows®, Mac® OS X, Linux®
- Google® Chrome™, version 35 or later

- Windows, Mac OS X
- Internet Explorer®, version 10 or later
  - Windows
- Apple® Safari®, version 6 or later
  - Mac OS X, iOS 6 or later on iPad®

Students are encouraged to install or update (free download) the following software:

- Adobe Flash Player version 11.9 or higher
- Adobe Reader version XI or higher

## Course Objectives

### Course Catalog Description

This course presents material covered in a traditional algebra course but with emphasis toward business applications. Topics include linear equations, systems of linear equations, systems of linear inequalities, elements of matrix algebra and probability.

### Learning Objectives and Outcomes

After completing the course, students should be able to demonstrate the following competencies:

- 1.0 Students will be able to perform integer operations and evaluate expressions containing variables, exponents, radicals, and fractions.
- 2.0 Students will be able to factor and perform operations on polynomials.
- 3.0 Students will be able to analyze and solve linear equations, inequalities and functions in a variety of business applications including revenue, cost, and profit scenarios.
- 4.0 Students will be able to solve quadratic equations using various techniques, graph quadratic functions, and determine break-even, maximum, and/or minimum points with respect to revenue, cost and/or profit functions.
- 5.0 Students will be able to evaluate, solve and use exponential and logarithmic equations and functions to model various economic phenomena.
- 6.0 Students will be able to apply various financial formulas and methods to determine interest, future value of savings plans and loans as well as debt repayment.
- 7.0 Students will be able to generate and solve systems of linear equations in a variety of business applications, including the use of matrix operations.
- 8.0 Students will be able to use graphical methods to solve linear inequalities and apply linear programming techniques.
- 9.0 Students will be able to calculate and solve various probability problems using tree diagrams, Bayes' formula, permutations and combinations.

## Course Policies

### Drop Policy

If you withdraw from the course for any reason, you must follow University procedures. It is your responsibility to execute these procedures correctly and within the deadlines. **Instructors are unable to drop students.** The Math Department Office can help with the withdrawal process. We strongly recommend that you drop the course if you are significantly behind in completing the required assignments. Students may drop or swap (adding and dropping a class concurrently) classes through self-service in MyMav from the beginning of the registration period through the late registration period. After the late registration

period, students must see their academic advisor to drop a class or withdraw. Undeclared students must see an advisor in the University Advising Center. Drops can continue through a point two-thirds of the way through the term or session. It is the student's responsibility to officially withdraw if they do not plan to attend after registering. **Students will not be automatically dropped for non-attendance.** Repayment of certain types of financial aid administered through the University may be required as the result of dropping classes or withdrawing. For more information, contact the Office of Financial Aid and Scholarships (<http://www.uta.edu/aao/fao>).

## Accommodations and Americans with Disabilities Act

The University of Texas at Arlington is on record as being committed to both the spirit and letter of all federal equal opportunity legislation, including The Americans with Disabilities Act (ADA), The Americans with Disabilities Amendments Act (ADAAA), and Section 504 of the Rehabilitation Act. All instructors at UT Arlington are required by law to provide "reasonable accommodations" to students with disabilities, so as not to discriminate on the basis of disability. Students are responsible for providing the instructor with official notification in the form of a letter certified by the Office for Students with Disabilities (OSD). Students experiencing a range of conditions (Physical, Learning, Chronic Health, Mental Health, and Sensory) that may cause diminished academic performance or other barriers to learning may seek services and/or accommodations by contacting:

The Office for Students with Disabilities, (OSD) [www.uta.edu/disability](http://www.uta.edu/disability) or calling 817-272-3364.  
Counseling and Psychological Services, (CAPS) [www.uta.edu/caps/](http://www.uta.edu/caps/) or calling 817-272-3671.

Only those students who have officially documented a need for an accommodation will have their request honored. Information regarding diagnostic criteria and policies for obtaining disability-based academic accommodations can be found at [www.uta.edu/disability](http://www.uta.edu/disability) or by calling the Office for Students with Disabilities at (817) 272-3364.

## Grade Grievances

Any appeal of a grade in this course must follow the procedures and deadlines for grade-related grievances as published in the current University Catalog. For undergraduate courses including this one, see <http://catalog.uta.edu/academicregulations/grades/#undergraduatetext>.

## Title IX

The University of Texas at Arlington does not discriminate on the basis of race, color, national origin, religion, age, gender, sexual orientation, disabilities, genetic information, and/or veteran status in its educational programs or activities it operates. For more information, visit [uta.edu/eos](http://uta.edu/eos). For information regarding Title IX, visit [www.uta.edu/titleIX](http://www.uta.edu/titleIX).

## Academic Integrity

It is the philosophy of The University of Texas at Arlington that academic dishonesty is a completely unacceptable mode of conduct and will not be tolerated in any form. This course includes a zero tolerance policy for academic dishonesty and students are expected to adhere to the UT Arlington Honor Code:

*I pledge, on my honor, to uphold UT Arlington's tradition of academic integrity, a tradition that values hard work and honest effort in the pursuit of academic excellence. I promise that I will submit only work that I personally create or contribute to group collaborations, and I will appropriately*

*reference any work from other sources. I will follow the highest standards of integrity and uphold the spirit of the Honor Code.*

All persons involved in academic dishonesty will be disciplined in accordance with University regulations and procedures. Discipline may include suspension or expulsion from the University. **Students found guilty of cheating will receive a grade of “F” for the course.**

*"Scholastic dishonesty includes but is not limited to cheating, plagiarism, collusion, the submission for credit of any work or materials that are attributable in whole or in part to another person, taking an examination for another person, any act designed to give unfair advantage to a student or the attempt to commit such acts." (Regents' Rules and Regulations, Series 50101, Section 2.2)*

## Student Support Services

UT Arlington provides a variety of resources and programs designed to help students develop academic skills, deal with personal situations, and better understand concepts and information related to their courses. Resources include tutoring, major-based learning centers, developmental education, advising and mentoring, personal counseling, and federally funded programs. For individualized referrals, students may visit the reception desk at University College (Ransom Hall), call the Maverick Resource Hotline at 817-272-6107, send a message to [resources@uta.edu](mailto:resources@uta.edu), or view the information at [www.uta.edu/resources](http://www.uta.edu/resources).

## Electronic Communication

UT Arlington has adopted MavMail as its official means to communicate with students about important deadlines and events, as well as to transact university-related business regarding financial aid, tuition, grades, graduation, etc. All students are assigned a MavMail account and are responsible for checking the inbox regularly. There is no additional charge to students for using this account, which remains active even after graduation. Information about activating and using MavMail is available at <http://www.uta.edu/oit/cs/email/mavmail.php>.

## Student Feedback Survey

At the end of each term, students enrolled in classes categorized as “lecture,” “seminar,” or “laboratory” shall be directed to complete an online Student Feedback Survey (SFS). Instructions on how to access the SFS for this course will be sent directly to each student through MavMail approximately 10 days before the end of the term. Each student’s feedback enters the SFS database anonymously and is aggregated with that of other students enrolled in the course. UT Arlington’s effort to solicit, gather, tabulate, and publish student feedback is required by state law; students are strongly urged to participate. For more information, visit <http://www.uta.edu/sfs>.

## Final Review Week

A period of five class days prior to the first day of final examinations in the long sessions shall be designated as Final Review Week. The purpose of this week is to allow students sufficient time to prepare for final examinations. During this week, there shall be no scheduled activities such as required field trips or performances; and no instructor shall assign any themes, research problems or exercises of similar scope that have a completion date during or following this week *unless specified in the class syllabus*. During Final Review Week, an instructor shall not give any examinations constituting 10% or more of the final grade, except makeup tests and laboratory examinations. In addition, no instructor shall give any portion of the final examination during Final Review Week. During this week, classes are held as scheduled. In addition,

instructors are not required to limit content to topics that have been previously covered; they may introduce new concepts as appropriate.

### **Emergency Exit Procedures**

Should we experience an emergency event that requires us to vacate the building, students should exit the room and move toward the nearest exit. When exiting the building during an emergency, one should never take an elevator but should use the stairwells. Faculty members and instructional staff will assist students in selecting the safest route for evacuation and will make arrangements to assist handicapped individuals.

### **Emergency Phone Numbers**

In case of an on-campus emergency, call the UT Arlington Police Department at **817-272-3003** (non-campus phone), **2-3003** (campus phone). You may also dial 911. We further recommend that you enter the UTA Police Department's emergency phone number into your own mobile phone. For non-emergencies, contact the UTA PD at 817-272-3381.

### **Student Intellectual Property Rights Statement**

A student shall retain all rights to work created as part of instruction or using university technology resources.

*"As the instructor for this course, I reserve the right to adjust the syllabus and course schedule in any way that serves the educational needs of the students enrolled in this course." – Alice Lubbe*