

Introduction to Real Estate

FINA 466

FALL 2018

Instructor: William H. Harrison, Jr.

Office: Moore School; 4th floor West (river) side; office # 456 H (Finance Dept.)
Office Hours: **Tuesday & Thursday 10:00 AM – 2:30 PM (by appointment); and 6:00 PM until whenever ... but text or email first for an appointment** as I may be elsewhere in building ... or I may be committed to another student.

I will occasionally be here on Wednesdays ... but contact first to confirm

Phone: Cell ... (**Emergencies only !**) ... 843-276-6116 ... or send text message

Email: **harrison7311@gmail.com** **Note ... Type “Student 466” in the “Subject” line so that it won’t be spammed out of my server.**

PLEASE ... DO NOT USE THE BLACKBOARD MESSAGING SYSTEM TO TRY TO REACH ME... YOU WON'T

Course Description:

Real Estate, as a class of investment, is unique among traditional mainstream assets in fundamental and systemic ways.

In addition to its heterogeneity, its illiquidity, and the opaqueness of its markets, it is typically levered ... much to the dismay of many academic economists. And due to this “debt-equity” orientation, the studies of Real Estate Investment and Real Estate Finance are inextricably entwined. A more “academic” approach focuses on a “top-down” concept via a sophisticated analysis of structured finance ... especially mortgage-backed securitization and institutional investment vehicles. Yet, some 80% of non-residential investment in the US is domiciled in relatively small non-institutional holdings, particularly in single asset LLCs and partnerships of varying degrees of investor sophistication.

This course intends to familiarize the student with the fundamentals of real estate investment analysis principles that drive the marketplace; whether considering a personal investment in a NNN convenience store lease in a tertiary market ... or an institutional \$ Billion office tower in Shanghai. This course builds on the basics of real estate oriented time-value-of-money (TVM) concepts and calculations introduced in FINA 366.

Learning Outcomes:

The (successful) student will become proficient in understanding such varied concepts as;

- Quantification of alternative mortgage finance options as “an investment” exercise
- Understanding the recent real estate and capital markets crisis
- An understanding of the nature of commercial leases, rents, and the market for space
- Competency in Income Property Investment Analysis on an after-tax basis
- An ability to understand and use risk quantification tools
- Quantification of the incremental returns from the use of leverage and leverage alternatives, and understanding their effect on overall risk.

A General Course Outline:

- A. Residential Financial Analysis
 1. Effective Borrowing Cost
 2. Incremental Borrowing Cost
- B. Markets in Crisis
 1. The Residential Crisis
 2. CRE and the Commercial Banking Crisis
 3. Group Presentations on Current CRE Topics
- C. Single Family Housing
 1. Investment – Lease vs. Own
 2. Tax Considerations
- D. Introduction to Income Producing Properties
 1. Classifications
 2. Leases
 3. Rents
 4. Space Calculations
- E. Investment Analysis
 1. Taxation
 2. Investment Strategies
- F. Financial Leverage
 1. Leverage Theory
 2. Financing Alternatives
- G. Risk Analysis
 1. Sensitivity Analysis
 2. Standard Deviation Analysis
- H. Financing Corporate Real Estate (Optional)
 1. Lease vs. Own Analysis
- I. A Case Study in Real Estate Investment

Prerequisites:

FINA 366 ... If you haven't taken FINA 366 and / or FINA 363 (or have an absolutely thorough familiarity and ease with TVM techniques) **it will likely be fatal.**

Class Structure, Required Reading & Laptops:

Classes will consist of lectures, problem solving, and discussion of assigned readings and cases. Students are expected to read assigned materials prior to class so they may actively participate. Written homework will occasionally be assigned. Generally, the lectures will emphasize those areas of the text that the Instructor considers most relevant to a successful completion of the course. In addition, the Instructor's lectures may bring in new material not necessarily covered by the text. Likewise, there may be material of relevance in the text reading that the Instructor may not cover in class.

Because of the nature and speed of the material covered, **it will not be possible to keep up with the class (or pass quizzes) without reading in advance;** this will involve your consistent preparation.

After a decade of encouragement of student use of in-class laptops, research is now clearly showing that the personal and classroom distractions from laptop abuse and the lack of significant pedagogical upside, pose learning obstacles that outweigh intended benefits. Many academic institutions and departments (including the Moore School Finance Department) are shifting to a neutral / negative stance on their use. Your instructor's policy is that **laptop use will NOT be permitted during class** unless approved through the Office of Student Disabilities (OSD).

Attendance & Testing :

Class attendance is expected and roll will often be taken. **THERE WILL BE NO OPPORTUNITY TO SIGN THE ROLL AFTER THE CLASS HAS ADJOURNED ... SO PLEASE DON'T ASK FOR A PERSONAL EXCEPTION, REGARDLESS OF THE CIRCUMSTANCES.** I tend to award extra subjective "bonus points" to students who can successfully avoid the myriad of "excuses" (see below) for non-attendance. If a student can somehow manage to miss no more than two classes, there is an opportunity for subjective points awarded at the end of the semester. The following is an excerpt from the University's Class Attendance Policy:

*Absence from more than 10% of the class's sessions, **whether excused or unexcused**, is excessive and the instructor may choose to exact a grade penalty for such absences ... It must be emphasized that the "10 percent rule" state above applies to both excused and unexcused absences*

PER THE ABOVE, THERE IS NO DIFFERENCE BETWEEN AN "EXCUSED" AND AN "UNEXCUSED" ABSENCE. Therefore, there is no reason for you to feel compelled to advise the Instructor or forward any medical records or absence explanations.

There will "generally" be a short quiz each week or two. **Quizzes will come from the text reading assigned or lecture material covered in that day's class and / or the class before.** Missed quizzes will result in a grade of zero. **THERE WILL BE NO MAKE-UPS FOR QUIZZES.** (The only exception for quizzes will be for varsity sports tournaments with a signed note from a coach.)

However, **all students will be allowed to DROP THEIR TWO (2) LOWEST QUIZ SCORES.** This option is meant to allow the student some personal latitude is dealing with a variety of unexpected personal situations or competing school requirements that may come up. In order for a student to earn any grade points on any given quiz, that student's raw score must equal 50% or higher.

The **QUIZ DROPS** and the **ABSENCE POLICY** are both meant to address and include:

- illness
- family emergencies and funerals
- varsity sports
- job interviews, conferences, and job fairs
- early vacation departure
- football / sports “festivities”
- priorities of studies for other courses, tests etc.
- hangovers, “mental health days”, or “just don’t want to get out of bed” days
- everything else imaginable, including Armageddon and “the End of the World”

PLEASE DO NOT ASK FOR EXCEPTIONS to this quite liberal absence / grading policy.

There will be two (2) mid-term exams, and 95 + % of the questions for such will be come from the lecture notes and class / homework problems ... not the textbook. **Make-up Midterm and Final Exams will be considered ONLY with a valid (e.g. medical emergency) documented (e.g. health provider) excuse.**

This course’s exams and quizzes are generally multiple-choice and graded on a curve.

Scantron allows the instructor to see a full distribution curve for each test. I typically want to see the median score fall in the 75 - 80% range after the curve is applied, and I will apply the same “curve” to each student’s score to accomplish this. This allows me to give a somewhat more “challenging” test and then raise everyone’s point scores accordingly. While the curve may vary broadly, I am typically seeing 7 to 15 point positive adjustments. This curve concept tends to “spread-out” the grades and accomplishes two things; ... first, it shows me (and the student) early-on just who is struggling so that I can offer help and advice (if requested) ... second, it does an excellent job of distinguishing those who are striving to excel from the rest of the pack ... as well as those who are merely coasting. **With respect to quizzes (not exams), in order to receive any points, the student must have achieved a raw score (before curve) of 50% ... otherwise the quiz grade will be recorded as a zero.** There are typically several students in each class who, as a result, will end the semester with average course grades well in excess of 100 (the record to date is 117) on the traditional grade system.

Make-up Exams:

As mentioned above, there are **no make-ups for quizzes** (except varsity athletics). Make-ups for midterms and final exam (with medical excuse etc.) will be given **in my office “AFTER” the scheduled test date (only) ... no exceptions . IT IS THE RESPONSIBILITY OF THE STUDENT TO MAKE THE ARRANGEMENTS FOR ANY EXAM MAKE-UPS ... “NOT” THE INSTRUCTOR.** The make-up testing may NOT be of the same format as the regular in-class exams. (It takes 5 to 6 hours for an instructor to create a class midterm exam, so

it is not feasible to generate a 2nd exam for an individual student(s). A make-up may consist of oral presentation, essay, written calculations and the like. Further, there may not be a “curve” available for make-ups since there is no basis for comparison with other students. **THE DEADLINE FOR ALL MAKE-UPS IS 6:00 PM IN THE LAST DAY OF REGULARLY SCHEDULED CLASS** ... otherwise the grade will be registered as a zero.

In other words, **MAKE-UP EXAMS SHOULD BE YOUR OPTION OF LAST RESORT !**

Calculators and “Time Value of Money” (TVM) :

It will be very-very important that you be able to follow the calculator keystrokes that I give you in class and / or in the text. Those keystrokes are given to you in the text and in my lectures in Hewlett Packard 10-B / 12C etc. entry logic. Certain calculators (notably the TI series) do not use this logic ! If you are already comfortable with TVM, IRR, DCF, NPV etc. with another calculator / logic (TI logic etc) then no problem. However, I will **NOT** be able to devote class time to explaining alternative entry logic for other calculators ... very disruptive and confusing !

If you ignore this advice, you will be extremely challenged to have to learn a new concept, a new calculator, and instant conversion from HP logic to TI logic all at the same time. One of the above is challenging enough. I won't say that you can't do it, but it is guaranteed you will not have a pleasant experience trying ... and making a good grade will be problematic at best (better get a tutor !).

If you have doubts, I would encourage you to invest \$35 (guess) in an HP-10B, HP-12C, or a recent HP model upgrade. Alternatively, borrow one from other students if necessary.

Once TVM instruction begins you will be expected to **bring your calculator to EVERY CLASS.**

Instructor Presentations:

The Instructor will utilize PowerPoint presentations for most of this course. These presentations will “generally” be posted to Blackboard prior to class.

Homework / Reading the Text Assignments:

We will be covering only about 60% of the text over this course ... approximately 12-13 chapters ... and the reading requirements will not be onerous. The **INSTRUCTOR EXPECTS THAT YOU WILL HAVE READ THE ASSIGNED TEXT PRIOR TO CLASS. AND THE QUIZZES WILL TEST YOUR ADHERENCE TO THIS POLICY.** The “more detailed” financial examples presented in the text (that the instructor feels are relevant) will be covered in class, but will **NOT** be tested on the quizzes.

I will occasionally require written homework / assignments to be prepared for class and submitted for grading / scoring. Homework is an **INDIVIDUAL** assignment, and while I have no problems with students “collaborating” on homework “methodology”, the **“copying” of another’s work (digital or otherwise) is NOT within the bounds of “Academic Honesty”**.

There is an intended “bright line” between “*collaboration*” (general discussion of concepts and methodology) among students and *copying / plagiarism* ... which is cheating (see “Academic Honesty” below). **If that “collaboration” line appears fuzzy to you, then DON’T EVEN APPROACH IT. The consequences of mistakenly pushing this boundary could be fatal.** If in doubt, see me. The excuse “*I misunderstood*” after-the-fact won't even be considered.

Your homework assignments may be a combination of Blackboard submitted work (on-line) or in-class submitted (written). Homework submitted after the class due date (note ... “beginning” of class) will be given only “partial” credit, if any, at the discretion of the instructor. For in-class submitted written assignments (versus on-line assignments) no credit will be awarded once solutions are posted to Blackboard (usually by 7 PM that same evening).

With respect to in-class submitted assignments, if situations arise which might cause you to miss class then it is incumbent upon you to either have a classmate / friend / paid stranger submit your homework in class on your behalf or, alternatively, to slide the “time dated” homework under my office door (#456 H) before class time. **Under no circumstances will I accept emailed assignments.** Unless specified otherwise, all homework must be submitted at the beginning of the class (or to Blackboard if applicable) on the date shown on the Class Schedule posted to Blackboard. This Schedule is subject to change weekly ... and it probably will ... so **CONSISTENTLY MONITOR THE CLASS SCHEDULE FOR UPDATES.**

Final Course Grades via Point System:

Rather than including the Grade Point Computation Chart within the syllabus, I have posted it to Blackboard as a separate file. I strongly encourage all students to use the self-assessment feature to track their individual earned points toward their course grade goal.

Note that I will retain **UP TO** twenty (20) points latitude in assigning individual final course grades based on homework, attendance, and class participation / attitude. **THERE IS NO FORMULA FOR SUCH LATITUDE. IT IS BY INTENT, SUBJECTIVE ... AND BASED UPON MY PREROGATIVE ONLY.** Generally, I expect the student to have been quite diligent with respect to attendance and to have submitted all homework assignments **to even be eligible** for any of these subjective points. Any expressed or implied expectation by a student that he / she “deserves” to receive such points is a near-guarantee that they won't.

Final course grades will be assigned per the point system at the top of the Grade Point Computation Chart.

Previously, classes of this course have typically generated a grade of an “A” for about **20-30 %** of the students with roughly the same percentage of “B’s”. The failure rate for this course has rarely exceeded **20 %**.

This Point system chart may be amended from time to time as needs dictate. Always check the Chart posted to Blackboard for any changes / most recent version.

Academic Honesty:

NO FORM OF ACADEMIC DISHONESTY WILL BE TOLERATED ... WHATSOEVER.

The consequences to anyone found plagiarizing, copying, or taking false credit for attendance or someone else's work (**this includes homework and case studies**) will be severe. There will be no "warnings", "probations" or "second chances". This policy extends also to anyone who allows their work to be copied or plagiarized or participates in any way with the fraudulent acts of others. To protect yourself from any appearances of complicity you should immediately advise me of any suspicions of impropriety around you. Some thoughts to keep in mind:

- **SINCE ALL TESTING IN THIS COURSE IS BASED ON A "CURVE" ... ANYONE WHO CHEATS RAISES HIS / HER OWN GRADE AT THE EXPENSE OF EVERY OTHER STUDENT IN THE CLASS.**
- Since most graded work in this course is based on a multiple-choice Scantron format, it is relatively easy to copy others' work. But, because of this same computer assisted grading system, **IT IS ALSO VERY EASY TO SPOT THE PATTERNS OF COPYING AND CHEATING.**
- **Copying or reliance on work from ONLINE SITES is also easy to spot ... and is also cheating since it is not your work.** Many of the solutions are worked "uniquely" and often incorrectly, and the graders are instructed to look for these patterns. Ignore at your peril.
- The consequences for any participation with cheating will be two-fold. From an academic perspective it will result in failure (a grade of "zero") ... at a bare minimum ... on the test or work involved, but more likely for the entire course. Second, the incident(s) may be reported to the USC Administration for disciplinary action. **One of the disciplinary options from such an investigation is expulsion from USC.** The University can ill-afford to have its reputation tarnished by graduating potential business managers and leaders who resort to dishonesty to advance their personal ambitions. And you can ill-afford the lifetime stigma on your permanent record.
- Collaboration on individual assignments (discussing general solution "concepts") is quite distinct from replication of someone else's work / answers ... which is cheating. This can create a slippery slope. **If you choose to "collaborate", make sure that you are 100% certain of this "bright line" distinction before proceeding. The excuse, "I misunderstood," won't even be considered.**
 - If your intended "collaboration" extends to **verbally** comparing / sharing actual answers with another student, then you have **likely** crossed the line.
 - If your intended "collaboration" involves **physically** comparing / sharing a copy of your work or your answers then you have **definitely** crossed the line.
- **The consequence to you of someone found copying your work will be the appearance of complicity.** The burden will then be on you to show otherwise. Shield your test work, don't share your homework, and advise if you think that you are being compromised.

Disabilities:

If you have a documented disability or special needs, be your own best advocate and ask for help. Reasonable accommodations are available for students with a documented disability. Any documented student who wishes to take advantage of additional testing time or alternative testing locations (proctoring etc.) **MUST SEE ME PERSONALLY** at least one class period prior to the exam date. If you do not, then in all likelihood you will have to settle for a makeup exam on a later date (see above).

Final Exam Exemption :

I will provide the opportunity for final exam exemption based upon your earning a combined point total (individual grade and team grade) of **360 points** or above on the Cartwright Case. If you choose to exempt based on Cartwright you'll be assigned a final grade based upon your overall points **prior** to the final exam. The two separate grade ranges shown at the top of the Grade Point Computation chart (on Blackboard) are intended to allow the eligible student to decide whether or not to opt for final exam exemption. **In order to qualify for such exemption (besides earning the prerequisite Cartwright points) you must also have submitted ALL written homework projects on time and not have missed more than two days of class per the signed rosters.** And remember, except for a varsity athlete's absence (with a coach's permission for class absence) there are no other exemption exceptions ... **so please don't ask.** Also, until an exam exemption notice is physically confirmed **by me in writing to you**, there is no exemption. So please don't even dream about "assuming" you are exempt and not showing ... it **WOULD** be fatal!

Summary:

The above pages are merely the ground rules to play and compete for academic achievement.

Your real goal is to learn about one of the most fascinating, profitable, risky, creative, and entrepreneurial careers and fields of study in America ...

AND TO HAVE SOME FUN DOING SO.

And that is my challenge to you !