

# Real Estate Course Number: 33:851:470 Course Title: Commercial Debt Markets

#### COURSE DESCRIPTION

This course offers an introduction to the various forms of debt and debt-like instruments used for finance and investment within the capital markets for real estate. The initial emphasis in the course will be on standard commercial mortgages and the underwriting undertaken by lenders. We will then move on to the characterization and analysis of more complicated debt-like claims used in structured financing arrangements such partnerships and joint ventures. In the third section of the course, we will evaluate indirect investment in real estate. These investment vehicles include mortgage-backed securities, financial assets based on the cash flows from underlying mortgages, and Real Estate Investment Trusts (REITs). Finally, the course provides extensive training and certification in ARGUS, a real estate industry-standard software package used for entering lease information and analyzing risk and return in property markets.

### **COURSE MATERIALS**

There is no required textbook for this course. Readings will consist of a collection of cases that can be purchased directly from Harvard Business School Publishing.

Slides, announcements and supplemental materials will be posted on Canvas (<u>canvas.rutgers.edu</u>), which will serve as central location for all information concerning the course. It is expected that you will check the course page on Canvas on a daily basis for updated information and announcements.

A laptop computer and proficiency with Excel is required for this course. Much of the work done in and out of the classroom will be performed using Excel. A guide offering an overview of the use of Excel to model cash flows in real estate will be posted on Canvas. You will also be provided an academic license for ARGUS Enterprise. You should have ARGUS installed and running on your computer no later. Installing and running ARGUS Enterprise requires a computer with at least 2GB of memory and capable of running Windows 7, 8 or 10. Most PCs and Macs of recent vintage, 2015 or newer, will work. If you do not have access to a laptop computer meeting this requirement, you will need to purchase a laptop to be able to perform the course work relating to ARGUS. A new laptop computer capable of running Windows and ARGUS can be purchased for less than \$250. Windows 10, Word and Excel can all be acquired at no cost from Rutgers.

You are also required to have a financial calculator. A good, and relatively inexpensive financial calculator is the HP 10bII. On the other hand, if you plan on a career in finance or real estate you may want to spend the extra money and get the HP 12c Platinum. A scientific calculator is fine, but will not

generally offer the same programs used in financial calculations. A guide to use with examples will be posted on Canvas.

Recommended texts. There are two textbooks that offer in-depth coverage of the material serving as the course prerequisites. The first is *Real Estate Finance and Investments* by Brueggeman and Fisher, 17<sup>th</sup> edition (ISBN 1260734307). Some readings during the course of the semester will refer to the Brueggeman and Fisher text. The second is *Commercial Real Estate Analysis and Investments* by Geltner and Miller, 2<sup>nd</sup> edition (ISBN 9780324305487). Both books also contain material that will be covered in this course. Frankly, if you are planning on a career in real estate, at least one of these two books should be in your home library. New or used copies of either text can be purchased from Amazon, ABEBooks, or other online booksellers. Finally, *Liar's Poker* by Michael Lewis (ISBN 9780393246100). In addition to offering a rather entertaining look at workplace culture in investment banks during the 1980s, Lewis also provides content and color relating to the early days of the mortgage-backed securities market.

#### LEARNING GOALS AND OBJECTIVES

This course is designed to help students (1) develop skills and knowledge in applied corporate finance and (2) demonstrate their ability to use portfolio theory to analyze the risk and return associated with investment in commercial property markets and derivative securities.

In this course, students will:

- ...develop and evaluate various structures used to finance the acquisition of income-producing property (1).
- ...become proficient in the use of ARGUS, an industry-standard software package. (1)
- ...identify and characterize the various types of debt instruments available to investors in property markets and identify the costs and benefits associated with each type (1).
- ...perform underwriting from the perspective of the supplier of funds for investment (1), (2).
- ...understand the nature of risk specific to debt instruments and structured mortgage-backed investments (2)
- ...format, structure and price investments based on the underlying cash flows from mortgages (2).
- ...understand the defining characteristics of Real Estate Investment Trusts (REITs) and the tradeoffs associated with the range financing alternatives available to them (1), (2).

Students will develop these skills and knowledge through homework assignments, the analysis of cases and exams. Homework assignments will serve as the basis for the developing the basic skills and concepts that are at the core of applied corporate finance and exams will provide an opportunity for students to demonstrate this knowledge. Written case assignments offer an opportunity for students to use and synthesize their knowledge by assessing trade-offs between risk and return in applications taken from real world investment opportunities.

# **PREREQUISITES**

The formal prerequisite for this course is satisfied by completing either Real Estate Finance & Mortgage-Backed Securities (33:390:435) or Essentials of Real Estate Finance (33:851:380). A quick review of mortgage basics and cash flow projections will take place during the first week of the course in order to provide a common foundation for the material that will follow.

### **ACADEMIC INTEGRITY**

*I do* NOT *tolerate cheating*. Students are responsible for understanding the RU Academic Integrity Policy (http://academicintegrity.rutgers.edu/)

I will strongly enforce this Policy and pursue *all* violations. On all examinations and assignments, students must sign the RU Honor Pledge, which states, "On my honor, I have neither received nor given any unauthorized assistance on this examination or assignment." I will screen all written assignments through *SafeAssign* or *Turnitin*, plagiarism detection services that compare the work against a large database of past work. Don't let cheating destroy your hard-earned opportunity to learn. See <a href="mailto:business.rutgers.edu/ai">business.rutgers.edu/ai</a> for more details.

#### ATTENDANCE AND CLASSROOM POLICY

Regular attendance is vital to success in this course. If you must miss a class, it is your responsibility to find out what material was covered in class during which you were absent and to understand that material prior to the next lecture.

The use of cellphones and laptops are not allowed in class at any time except when students are instructed to work on a specific problem or case requiring a computer. Students may leave the room to take an emergency phone call. Otherwise, students observed to be texting or looking at their phone will receive a 0 for class participation for the day.

If I am to be absent, my department chair or I will send you notice via email and Canvas as far in advance as possible. For weather emergencies, consult the campus home page.

### **EXAM DATES AND POLICIES**

There are 2 exams in this course:

Midterm Exam 1: (), in-class, closed book.

Midterm Exam 2: Date/time according to official Rutgers final examination schedule

The following rules apply during exams:

- If you have a disability that influences testing procedures, provide me an official letter from the Office of Disability Services at the start of the semester.
- No cell phones or other electronics are allowed in the testing room unless stated otherwise.
- Your exam will not be accepted unless you sign the Honor Pledge.

#### **GRADING POLICY**

The letter grade you receive in the course will be based on a curve relative to the rest of the students in your section and determined by your performance on in-class work, exams and case assignments. If you believe that your exam or case has been graded incorrectly, please bring it to my attention as soon as possible. Finally, in the interest of fairness, please do not ask for opportunities or exceptions that have not been granted to all others in the class.

- **Homework:** There will be six homework assignments, which will account for 30% of your grade in total. Some of assignments will be based on the assigned HBS cases and ask that you use information presented in the cases to construct and evaluate possible solutions to problems posed. Class discussion will be based on the case assignment on days when the assignments are due.
- Exams: There will be two exams during the course of the semester, each exam accounting for 25% of your grade. The first midterm will correspond to the material covered from the beginning of the course through week 8. The second, from week 8 until the end of the semester. If you must miss an exam, notify me as soon as possible before the time of the exam either by phone or email. Anyone missing an exam without such notification will receive no credit for the exam and will not be given a make-up.
- **Argus:** You will work through the Argus manual throughout the semester with the objective of taking the certification exam no later than. Certification will account for 15% of your course grade. If you pass the certification exam, you will receive 15/15. If you do not pass the certification exam, you will receive a score corresponding to the overall percentage score you received on the exam.
- **Class participation:** Regular attendance and active participation is expected and will account for 5% of your course grade.

#### **COURSE SCHEDULE**

BF denotes Brueggeman & Fisher, *Real Estate Finance and Investments* L denotes Lewis. *Liar's Poker* 

### Week 1

Course introduction and overview	HW #1 assigned	Notes
Review: 1) Mortgage structure and yield, 2)	-	BF 3, 4, 10, 11
Income-producing property and the cash		
flows to equity		

## Week 2

WCCK Z				
		No class		

Review: Income-producing property and the		Notes
cash flows to equity		BF 10, 11
Commercial mortgages		
Week 4		
Commercial mortgage underwriting	HW #1 due	Notes
	HW #2 assigned	
	Argus installation	
Week 5		
Argus		Notes/Recording
Commercial mortgage underwriting		
Week 6		
Guest speaker: Jimmy Hanson, Hampshire	HW #2 due	
Properties Properties	HW #3 assigned	
Mezzanine debt		
Week 7	XXXX #0. 1	
Joint ventures and partnerships	HW #3 due	Notes
	HW #4 assigned	BF 18
Week 8	T	T = -
Guest speaker: TBD	HW #4 due	Notes
Joint ventures and partnerships		BF 18
Week 9		
Mortgage markets: History and overview	Midterm examination	
Week 10		
Mortgage pass-through securities	HW #5 assigned	Notes
		BF 19; L
Week 11		
RMBS – CMOs, STRIPS and floaters		BF 20; L
Turibb Civios, STAITS and Houses		B1 20, E
Week 12		
RMBS – CMOs, STRIPS and floaters	HW #5 due	BF 20; L
CMBS	HW #6 assigned	
Wash 12		
Week 13 No class		
140 ciass		
Week 14		
CMBS (cont.)	Argus certification	BF 20
	deadline	
Guest speaker: TBD	HW #6 due	BF 21

REITs				
Week 15				
		BF 21		
REITs (cont.) Summary and review				

Midterm 2: Date/time according to official Rutgers final examination schedule

### SUPPORT SERVICES

If you need accommodation for a *disability*, obtain a Letter of Accommodation from the Office of Disability Services. The Office of Disability Services at Rutgers, The State University of New Jersey, provides student-centered and student-inclusive programming in compliance with the Americans with Disabilities Act of 1990, the Americans with Disabilities Act Amendments of 2008, Section 504 of the Rehabilitation Act of 1973, Section 508 of the Rehabilitation Act of 1998, and the New Jersey Law Against Discrimination. More information can be found at <u>ods.rutgers.edu</u>.

[Rutgers University-New Brunswick ODS phone (848)445-6800 or email dsoffice@echo.rutgers.edu]

[Rutgers University-Newark ODS phone (973)353-5375 or email ods@newark.rutgers.edu]

If you are *pregnant*, the Office of Title IX and ADA Compliance is available to assist with any concerns or potential accommodations related to pregnancy.

[Rutgers University-New Brunswick Title IX Coordinator phone (848)932-8200 or email <u>jackie.moran@rutgers.edu</u>]

[Rutgers University-Newark Office of Title IX and ADA Compliance phone (973)353-1906 or email TitleIX@newark.rutgers.edu]

If you seek *religious accommodations*, the Office of the Dean of Students is available to verify absences for religious observance, as needed.

[Rutgers University-New Brunswick Dean of Students phone (848)932-2300 or email <a href="mailto:deanofstudents@echo.rutgers.edu">deanofstudents@echo.rutgers.edu</a>]

[Rutgers University-Newark Dean of Students phone (973)353-5063 or email DeanofStudents@newark.rutgers.edu]

If you have experienced any form of *gender or sex-based discrimination or harassment*, including sexual assault, sexual harassment, relationship violence, or stalking, the Office for Violence Prevention

and Victim Assistance provides help and support. More information can be found at <a href="http://vpva.rutgers.edu/">http://vpva.rutgers.edu/</a>.

[Rutgers University-New Brunswick incident report link: <a href="http://studentconduct.rutgers.edu/concern/">http://studentconduct.rutgers.edu/concern/</a>. You may contact the Office for Violence Prevention and Victim Assistance at (848)932-1181]

[Rutgers University-Newark incident report link:

https://cm.maxient.com/reportingform.php?RutgersUniv&layout\_id=7 . You may also contact the Office of Title IX and ADA Compliance at (973)353-1906 or email at <a href="TitleIX@newark.rutgers.edu">TitleIX@newark.rutgers.edu</a>. If you wish to speak with a staff member who is confidential and does **not** have a reporting responsibility, you may contact the Office for Violence Prevention and Victim Assistance at (973)353-1918 or email run.vpva@rutgers.edu]

If students who have experienced a temporary condition or injury that is adversely affecting their ability to fully participate, you should submit a request via <a href="https://temporaryconditions.rutgers.edu">https://temporaryconditions.rutgers.edu</a>.

If you are a military *veteran* or are on active military duty, you can obtain support through the Office of Veteran and Military Programs and Services. <a href="http://veterans.rutgers.edu/">http://veterans.rutgers.edu/</a>

If you are in need of *mental health* services, please use our readily available services.

[Rutgers University-Newark Counseling Center: http://counseling.newark.rutgers.edu/]

[Rutgers Counseling and Psychological Services—New Brunswick: http://rhscaps.rutgers.edu/]

If you are in need of *physical health* services, please use our readily available services.

[Rutgers Health Services – Newark: http://health.newark.rutgers.edu/]

[Rutgers Health Services – New Brunswick: <a href="http://health.rutgers.edu/">http://health.rutgers.edu/</a>]

If you are in need of *legal* services, please use our readily available services: <a href="http://rusls.rutgers.edu/">http://rusls.rutgers.edu/</a>

Students experiencing difficulty in courses due to *English as a second language (ESL)* should contact the Program in American Language Studies for supports.

[Rutgers–Newark: PALS@newark.rutgers.edu]

[Rutgers-New Brunswick: <a href="mailto:eslpals@english.rutgers.edu">eslpals@english.rutgers.edu</a>]

If you are in need of additional *academic assistance*, please use our readily available services.

[Rutgers University-Newark Learning Center: <a href="http://www.ncas.rutgers.edu/rlc">http://www.ncas.rutgers.edu/rlc</a>

[Rutgers University-Newark Writing Center: <a href="http://www.ncas.rutgers.edu/writingcenter">http://www.ncas.rutgers.edu/writingcenter</a>]

[Rutgers University-New Brunswick Learning Center: <a href="https://rlc.rutgers.edu/">https://rlc.rutgers.edu/</a>]

[Optional items that many faculty include:

- Students must sign, date, and return a statement declaring that they understand the RU Academic Integrity Policy.
- Students must sign, date, and return a statement declaring that they understand this syllabus.]