FIXED INCOME SECURITY VALUATION
FINANCE 6545

Warrington College of Business
University of Florida

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Class:	Monday and Wednesday	9:35 – 11:30 AM	HGS 240
Office Hours:	Monday and Wednesday	8:30 – 9:30 AM	STZ 303G

Course Overview and Philosophy.

This course covers the valuation of fixed income securities. The course begins with a treatment of basic bond math and term structure theory concepts. The initial material provides the student with a strong background in the valuation of "plain vanilla" bonds. The remainder of the course considers the effects of attached options and default risk on the valuation of bonds.

The valuation of fixed income securities is done on a relative value basis. The idea is to determine the value of a security given the valuation(s) of other securities. If your valuation is higher (lower) than the market price of the security, then the security is "cheap" ("rich"). The relative value approach is common since so many investment managers are benchmarked against an index rather than on a total return basis.

Relative value investing translates the investor's views into portfolio strategies. There are three basic views an investor can have: the direction of future interest rate changes, the volatility of interest rates and the credit quality of the issuer.

Investors bet their views on the direction of future interest rate changes by the maturity mix of bonds in the portfolio. Investors bet their views on volatility of interest rates by the extent they hold bonds with embedded options. Investors bet their views on issuer credit quality by both the extent to which the portfolio contains corporate bonds and the specific names in the corporate bond portfolio.

The materials covered in this class naturally also provide insights into two related areas. First, the course is useful for thinking about the kinds of bonds an issuer might issue. The valuation problem from the standpoint of the investor is the mirror image of the issuer's problem. A good (bad) bond to buy is a bad (good) bond to issue. Second, the exposure of a portfolio to market factors can be easily quantified given the material learned in this course.

Students are expected to have read the assigned readings and lecture notes prior to class. The class will move along at a rapid pace and cover some very advanced topics. If you have trouble understanding any material, it is your responsibility to ask questions in class or seek outside help from the instructor. Absent any feedback from the class otherwise, I will assume that all students are comfortable with the material and the pace of the course.

Readings.

The required text for course is Bond Markets, Analysis and Strategies Sixth Edition by Frank J. Fabozzi. I have had a custom book prepared for this class that uses only chapters needed for this course in order to save costs. Supplemental readings, the lecture notes and the assignments are posted on the class web page. Interested students might find Fixed Income Markets and Their Derivatives, by Suresh Sundaresan and published by Southwestern, a good resource.

Grading.

Your course grade will depend on your score on four assignments and a final exam detailed below. All five graded exercises are individual work. *It is a violation of the University of Florida Honor Code to consult other students on these assignments.*

Assignment One Due on 9/7	10% of course grade
Assignment Two Due on 9/14	10% of course grade
Assignment Three Due on 9/26	10% of course grade
Assignment Four Due on 10/5	10% of course grade
Midterm Exam 9/19	20% of course grade
Final Exam 10/12	40% of course grade

Course Outline

8/22/16 - Basic Bond Calculations

Lecture Presentation	Technical Note(s)	Other Readings
Bonds and Interest Rates	Return Calculations	Fabozzi: Introduction
Expected Returns and Yields	Interest Rate Basics	Fabozzi: Pricing of Bonds
	Yields and Prices	Fabozzi: Measuring Yield
	Zero Coupon Bonds as Building Blocks: Pricing Securities	
	Zero Coupon Bonds as Building Blocks: Expected Returns and Yields	
	Excel Models for Fixed Income	

8/24/16 – Stripped Spreads

Lecture Presentation	Technical Note(s)	Other Readings
Stripped Spread	Stripped Spread	

8/29/16 – Relative Value Trades

Lecture Presentation	Technical Note(s)	Other Readings
Relative Value Investing	Relative Value Investing	Fabozzi: Factors Affecting Bond Yields and the Term Structure of Interest Rate

8/31/16 – Term Structure of Interest Rates

Lecture Presentation	Technical Note(s)	Other Readings
Term Structure	Forward Rate Basics	Fabozzi: Factors Affecting Bond Yields and the Term Structure of Interest Rate
Term Premiums	Term Structure	
	Term Premiums	

9/7/16 – Term Structure Innovations

Lecture Presentation	Technical Note(s)	Other Readings
Term Structure Innovations	Term Structure Innovations	

9/12/16 – Duration and Convexity

Lecture Presentation	Technical Note(s)	Other Readings
Duration and Convexity	Duration	Fabozzi: Bond Price Volatility
	Convexity	
	Duration Applications	

9/14/16 – Forward Rates and Maturity Selection

Lecture Presentation	Technical Note(s)	Other Readings
Forward Rates and Maturity Selection	Forward Rates and Maturity Selection	

9/19/16 – Midterm Quiz

9/21/16 – Forward Rates and Curve Strategies

Lecture Presentation	Technical Note(s)	Other Readings
Forward Rates and Curve Strategies	Forward Rates and Curve Strategies	

9/26/16 – Advanced Trade Hedging

Lecture Presentation	Technical Note(s)	Other Readings
Advanced Trade Hedging Strategies	Advanced Trade Hedging Strategies	

9/28/16 – Callable Bonds

Lecture Presentation	Technical Note(s)	Other Readings
Callable Bonds	Callable Bonds	Fabozzi: Analysis of Bonds with Embedded Options
	Effective Duration	

10/3/16 – MBS Mechanics and Valuation

Lecture Presentation	Technical Note(s)	Other Readings
MBS Valuation and Mechanics	MBS Valuation and Mechanics	Fabozzi: Analysis of Residential Mortgage-Backed Securities
		Fabozzi: Agency Mortgage Pass-Through Securities
		Fabozzi: CMOs and Stripped MBS

10/5/16 – Credit

Lecture Presentation	Technical Note(s)	Other Readings
Credit Risk Valuation	Credit Risk Valuation	

10/12/16 – Final Exam