

INFORMATION FOR UNDERGRADUATE STUDENTS: 2020-21

FINANCE ELECTIVES AND CAREER CHOICES

Revised February, 2020

What is Finance about?

The DeGroote School's offerings in Finance are intended to help students make informed financial decisions. Basically, there are three major financial decisions that companies and investors have to make. They are:

- *How to invest* – Companies and investors have to decide which assets (projects and securities) they should invest in and at what prices. This decision requires an understanding of investment objectives, risk-return characteristics of various assets (e.g., stocks, bonds, derivatives, and hybrid securities), asset valuation (e.g., capital budgeting and various asset pricing models), and portfolio construction.
- *How to finance and manage investments* – Companies and investors have to choose the best ways to raise funds for the investment, and to control the risk of their investments. This decision requires an understanding of how capital markets work, the benefits and costs of various sources of funds (e.g., debt vs. equity), dividend policy, and what financial tools (i.e., derivatives and insurance) can be used to control risks.
- *How to manage day-to-day working capital* – Companies and investors have to manage their liquidity. This decision requires an understanding of the benefits and costs of holding liquid assets such as cash, inventories and receivables.

The Finance and Business Economics Area's Objectives and Teaching Approach

The objectives of our Area are twofold. First, we aim to equip students with the knowledge of numerous finance topics, and how they are linked together. Secondly, and more importantly, our courses will encourage you to develop your thinking skills and analytical skills.

The teaching approach in our courses is a mix of theory and applications. We believe that theory is important because it provides a framework in which to think when solving problems. In other words, theory is an important foundation on which you can build coherent thinking skills and analytical skills. These skills and knowledge can then be applied to real-life problems.

Career Paths and Job Prospects

Commerce graduates specializing in Finance can look forward to a variety of exciting and satisfying careers. Some of you may be interested in working in the investment management industry (e.g., mutual fund companies, insurance companies, pension funds and investment advisors). Some may want to become investment bankers, financial analysts, or traders. Others may want to work as the treasurer or controller of a non-financial firm. You can choose from our wide range of offerings to suit your personal interests and career goals. Students should also note that the Finance and Business Economics Area works with the CFA Exam Syllabus to ensure that as much of the syllabus as possible is covered by courses offered in the Commerce program. Presently the coverage is estimated to be about ninety percent.

Courses to be Offered in 2020-21

The Finance and Economics Area Area offers a broad selection of third and fourth-year elective courses to prepare students for a wide variety of possible career roles in the financial world. In 2020-20, the Area will offer the following electives:

- 3FB3 - Security Analysis
- 3FC3 - International Finance
- 3FD3 - Financial Modelling
- 3FE3 - Financial Management of Health Care Organizations
- 3FH3 - Alternative Investments and Portfolio Management
- 3FI3 - Market Trading with Options, Futures and Forwards
- 3FJ3 – Intermediate Corporate Finance
- 3FK3 – Sustainable and Social Finance
- 4FA3 - Applied Corporate Finance
- 4FB3 - Valuation for Finance Professionals
- 4FC3 - Ethics and Professional Practice
- 4FD3 - Financial Institutions
- 4FE3 - Options and Futures
- 4FF3 - Portfolio Theory and Management
- 4FG3 - Financial Theory
- 4FH3 - Mergers, Acquisitions and Corporate Control
- 4FJ3 – Fixed Income Analysis
- 4FK3 - Financial Statement Analysis
- 4FL3 - Personal Financial Management (some sections taught on-line)¹
- 4FM3 - Personal Financial Planning and Advising
- 4FN3 - Financial Risk Management
- 4FO3 - Small Business/Entrepreneurial Finance¹
- 4FP3 - Personal Finance²
- 4FQ3 - Working Capital Management

¹ For non-Commerce/Engineering-Management students, the Area offers Commerce 4FP3: Personal Finance and Commerce 4FW3: Finance for Entrepreneurs. Commerce and Engineering-Management students and students in the Minor in Finance must take Commerce 4FL3: Personal Financial Management and/or Commerce 4F03: Small Business/Entrepreneurial Finance.

² Not open to students in Commerce/Engineering-Management or the Minor in Finance.

4FR3 - Insurance and Risk Management
4FS3 - Pension, Retirement and Estate Planning
4FT3 - Real Estate Finance and Investment
4FU3 - Behavioural Finance
4FW3 - Finance for Entrepreneurs²
4FX3 - Special Topics in Finance: The History of Finance
4FY3 - Introduction to FinTech

More information about these courses can be found in the Undergraduate Calendar or on the Faculty Webpage (click on “Registered Students” in the left hand column)

Students in the Honours B.Com program may take two Level III or Level IV Commerce electives in third year and up to five Level III or Level IV Commerce electives in fourth year. Students in the B.Com program may take up to two Level III or Level IV Commerce electives in fourth year.

The above courses, with the exception of Commerce 4FP3 and Commerce 4FW3, may also be taken as Commerce electives by students in the Engineering-Management programs. All but Commerce 4FP3 and Commerce 4FW3 may also be taken towards the Minor in Finance.

Suggested Areas of Specialization

1. Investment Management

This area of specialization will prepare you for careers in the investment management industry. Our objective is to equip you with an understanding of available securities, investment strategies, investors’ objectives, and how the three are related.

For this specialization, we recommend that you consider the following courses:

3FB3 - Security Analysis
3FH3 - Alternative Investments and Portfolio Management
3FI3 - Market Trading with Options, Futures and Forwards
3FK3 – Sustainable and Social Finance
4FB3 - Valuation for Finance Professionals
4FC3 - Ethics and Professional Practice
4FE3 - Options and Futures
4FF3 - Portfolio Theory and Management
4FJ3 - Fixed Income Analysis
4FL3 - Personal Financial Management
4FM3 - Personal Financial Planning and Advising
4FN3 - Financial Risk Management
4FR3 - Insurance and Risk Management
4FS3 - Pension, Retirement and Estate Planning
4FU3 - Behavioural Finance
4FX3 - Special Topics in Finance: Sustainable and Social Finance
4FY3 - Introduction to Fintech

These courses are designed to provide you with an in-depth understanding of the risk-return characteristics of various securities, how they are valued, how they should be combined into portfolios, and how the risks of the portfolios should be managed. Commerce 4FL3, 4FM3, 4FR3 and 4FS3 examine individuals' financial goals and how to achieve those goals. While Commerce 4FL3 is recommended for all students, these four courses should be of interest to people who want to have a career in personal financial management.

2. *Corporate Finance and Investment Banking*

This area of specialization will prepare you for careers in investment banking. It will also lead to careers in non-financial corporations. While the two career paths may appear to be quite different from each other, they require the same set of knowledge and skills. For example, a corporate treasurer needs to understand capital structure, dividend policies and capital budgeting in order to decide which investment projects to take and how to finance them. The same understanding is required by investment bankers when they advise clients on financing and merger and acquisition activities.

For this specialization, we recommend that you consider the following courses:

- 3FC3 - International Finance
- 3FD3 - Financial Modelling
- 3FJ3 – Intermediate Corporate Finance
- 4FA3 - Applied Corporate Finance
- 4FB3 - Valuation for Finance Professionals
- 4FC3 - Ethics and Professional Practice
- 4FD3 - Financial Institutions
- 4FH3 - Mergers, Acquisitions and Corporate Control
- 4FJ3 - Fixed Income Analysis
- 4FK3 - Financial Statement Analysis
- 4FN3 - Financial Risk Management
- 4FQ3 - Working Capital Management
- 4FY3 - Introduction to Fintech

In addition, you may wish to broaden your understanding of corporate finance by considering Commerce 4FE3 - Options and Futures

3. *Elective Choices and Personal Interest Courses*

If you do not yet have a preference for a particular career path, you may wish to choose electives that range over several disciplines. If you decide to include Finance courses in your program, and this is highly recommended, personal interests and career plans should be paramount. All students will be required to make personal financial decisions in their lives and careers, and may wish to start their own businesses or join small businesses, including family-owned firms. The Finance and Business

Economics Area tries to address these interests and possible career paths from a Finance perspective.

Courses of interest for personal financial management or small business management are as follows:

- 4FL3 - Personal Financial Management
- 4FM3 - Personal Financial Planning and Advising
- 4FO3 - Small Business/Entrepreneurial Finance
- 4FQ3 - Working Capital Management
- 4FP3 - Personal Finance (non-Commerce/Engineering and Management students)
- 4FR3 - Insurance and Risk Management
- 4FS3 - Pension, Retirement and Estate Planning
- 4FW3 - Finance for Entrepreneurs (non-Commerce/Engineering and Management students)

Courses with a broad focus and multiple applications include:

- 3FB3 - Security Analysis
- 3FC3 - International Finance
- 4FB3 - Valuation for Finance Professionals

Less technical courses include:

- 4FA3 - Applied Corporate Finance
- 4FC3 - Ethics and Professional Practice
- 4FD3 - Financial Institutions
- 4FL3 - Personal Financial Management
- 4FM3 - Personal Financial Planning and Advising
- 4FO3 - Small Business/Entrepreneurial Finance
- 4FQ3 - Working Capital Management
- 4FP3 - Personal Finance (non-Commerce/Engineering and Management students)
- 4FR3 - Insurance and Risk Management
- 4FS3 - Pension, Retirement and Estate Planning
- 4FT3 - Real Estate Finance and Investment
- 4FW3 - Finance for Entrepreneurs (non-Commerce/Engineering and Management students)
- 4FX3 - Special Topics in Finance: History of Finance
- 4FY3 - Introduction to Fintech

Finally, 3FD3 - Financial Modelling, Commerce 4FK3 - Financial Statement Analysis and 4FB3 - Valuation for Finance Professionals focus on the development of analytical skills.

Students considering graduate study in Finance or Financial Economics (MFin, MA, MSc, PhD) are encouraged to take:

- 3FB3 - Security Analysis

4FE3 - Options and Futures
4FG3 - Financial Theory
4FJ3 - Fixed Income Analysis
4FF3 - Portfolio Theory and Management

These courses will be particularly useful to students who intend to go on to our Master of Finance Program

4. *Professional Designations and Opportunities*

Students considering a career in Finance, whether in corporate finance or in the financial services industry, often seek professional recognition. An “entry level” program for students contemplating a career in the financial services industry is the Canadian Securities Course (CSC), offered by the Canadian Securities Institute (CSI). According to the CSI website, the CSC is “the only Canadian investment course that qualifies graduates to sell mutual funds and also leads to registration to deal in stocks, bonds and other securities”. Many McMaster students complete the CSC even though there is significant overlap with topics covered in Commerce 2FA3, 3FA3 and 3FB3.

The CSI offers a number of other courses, including the Professional Financial Planning course, which, together with the CSC, prepares people for undertaking the Certified Financial Planner (CFP) exams. More information about the offerings of the Canadian Securities Institute can be obtained from its website:

https://www.csi.ca/student/en_ca/courses/financial/csc.xhtml

Information about the Financial Planners Standards Council and the CFP designation can be obtained from the Council’s website:

<http://www.cfp-ca.org/default.asp>

Students considering a career in financial planning are advised to take the following courses:

3FB3 - Security Analysis
4FL3 - Personal Financial Management
4FM3 - Personal Financial Planning and Advising
4FR3 - Insurance and Risk Management
4FS3 - Pension, Retirement and Estate Planning

These courses are **STRONGLY RECOMMENDED** for students planning to seek the CFP designation.

The premier internationally recognized designation for people seeking a career in corporate finance or financial services is the CFA (Chartered Financial Analyst) designation, awarded by the CFA Institute. Originating in the United States, the CFA designation is now pursued and recognized around the world. It began to enjoy recognition in Canada about fifteen years ago, and is supplanting the CPA (accounting)

designation as the professional qualification of choice for anyone not planning a career in auditing or taxation.

Obtaining the CFA designation is a rigorous process, including both relevant employment and the completion of three exams. There are no specific courses required to undertake for the exams, but the CFA Institute provides a detailed syllabus to prepare for them. Information about both can be obtained from the CFA Institute's website:

<http://www.cfainstitute.org/>

For students wishing to prepare for the CFA exams, course selection is important. Though a variety of review materials and exam preparation courses are offered by numerous providers, we have been advised by CFA Institute representatives that a proper grounding in the syllabus content is the best preparation. Faculty members within the Finance and Business Economics Area at McMaster have reviewed the CFA syllabus carefully and benchmarked their own courses against the syllabus. In some cases, we have modified our courses to incorporate material on the CFA syllabus. Our judgment is that students intending to pursue the CFA designation can cover up to ninety percent of the syllabus through the appropriate choice of courses. Beyond the required course(s) in Finance, Accounting, Statistics and Economics, we advise students to take as many as possible of the following courses. (Seven is the maximum number of Commerce electives allowed for Honours Bachelor of Commerce degree credit in Levels III and IV):

- 3FB3 - Security Analysis*
- 3FC3 - International Finance
- 3FH3 - Alternative Investments and Portfolio Management *
- 3FJ3 – Intermediate Corporate Finance
- 4FA3 - Applied Corporate Finance
- 4FB3 - Valuation for Finance Professionals
- 4FC3 - Ethics and Professional Practice *
- 4FD3 - Financial Institutions
- 4FE3 - Options and Futures
- 4FH3 - Mergers, Acquisitions and Corporate Control
- 4FJ3 - Fixed Income Analysis*
- 4FK3 - Financial Statement Analysis*
- 4FN3 - Financial Risk Management

*Essential for students pursuing the CFA designation

COM 4FX3: Special Topics in Finance: The History of Finance

From the invention of writing to manage agricultural surpluses through modern pensions and computerized markets, the financial systems used to coordinate our resources have been essential to the rise of civilization and the long-term success of nations. This course explores the emergence, evolution, and future of the tools and organizations that made it possible. By studying the history of debt, banking, corporations, stock markets, pension, insurance companies, and investment funds students will learn why such institutions are organized as they are today and how we might design better versions to tackle the challenges of the 21st century. Though the history of finance is global, this course also considers the unique economic history of Canada to help students better navigate the constraints, opportunities, policies, and relationships that shape the modern business environment.

Prerequisite: Com 2FA3 or equivalent.