

## Fall of 1st year (16 s.h.)

|  |      |
|--|------|
| FIN:9400 or BAIS:9400 Professional Development and Business Acumen | 1 sh |
| MBA:8140:0800 Corporate Financial Reporting                        | 3    |
| MBA:8180:0800 Managerial Finance                                   | 3    |
| BAIS:6050:0700 or 800 Data Man. & Visual Analytics                 | 3    |
| BAIS:6040:0700 Data Programming in Python                          | 3    |
| BAIS:9100:0700 or 0800 Data and Decisions                          | 3    |

## Spring of 1st year (16 s.h.)

|   |      |
|---|------|
| FIN:9400 or BAIS:9400 Professional Development and Business Acumen (repeated) | 1 sh |
| FIN:8130 or BAIS:8130 Business Communication                                  | 1    |
| FIN:9150:0800 Financial Modeling and Firm Valuation                           | 2    |
| FIN:9200:0800 Portfolio Management  | 3    |
| BAIS:6070 Data Science  | 3    |
| BAIS:9110 Advanced Analytics  | 3    |
| Elective or FIN experiential course (see below)                               | 3    |

## Fall of 2nd year (16 s.h.)

|   |   |
|---|---|
| FIN:8130 or BAIS:8130 Business Communication        | 1 |
| MBA:8170:0800 International Environment of the Firm | 3 |
| FIN:9210 Derivatives and Risk Management            | 3 |
| FIN:9220 Fixed Income                               | 3 |
| BAIS:6120 Analytics Experience                      | 3 |
| Elective  | 3 |

## Spring of 2nd year (15 s.h.)

|  |   |
|--|---|
| FIN:9300:0800 Corporate Investment and Financing     | 3 |
| FIN experiential course if not yet taken or Elective | 3 |
| Elective   | 3 |
| Elective   | 3 |
| Elective   | 3 |

**TOTAL: 63 semester hours**

### Finance experiential elective requirement options:

|   |
|---|
| FIN:9390 Applied Financial Analysis—Industry Project (Fall)   |
| FIN:9225 Applied Fixed Income Analysis (Fall or Spring)   |
| FIN:9250 and FIN:9260 Applied Securities Analysis—Henry Fund (spring and fall enrollment required, 3 sh each) |
| FIN:9391 Thesis in Business (any semester, individually arranged with a faculty member)                       |

## Course waivers

Waiver of a course does not reduce credit hours; the waived course is replaced by an additional elective. To receive a waiver, contact your advisor prior to the start of the first semester. Waivers may be available as follows:

- MBA:8180 Managerial Finance: finance majors with a minimum 3.3 major GPA or with CFA level 1.
- MBA:8140 Corporate Financial Reporting: accounting or finance majors with a minimum 3.3 major GPA or CPA or CFA level 1.
- MBA:8170 International Environment of the Firm: undergraduate economics majors with a minimum 3.3 major GPA.
- BAIS:9100 Data and Decisions:
  - Tippie undergraduate: the student received a grade of B or better in one of the following courses and an A– or better in at least one:
    - ⇒ BAIS:2800 Business Analytics or ECON:2800 AND
    - ⇒ Another class that uses Excel and statistics, including MKTG:3100 Marketing Research, ACCT:4100 Auditing, BAIS:3500 Data Mining, BAIS:3800 Optimization and Simulation Modeling, or ECON:3355 Econ and Business Forecasting. Request approval for additional coursework from advisor.
  - Students from other colleges or majors, please contact your advisor to inquire about a possible waiver.

Tippie Business Analytics and Information Systems (BAIS) undergraduate majors may be able to waive the following:

- BAIS:3200 Database Management (minimum grade A-) waives BAIS:6050 Data Management & Visual Analytics
- BAIS:3250 Data Wrangling (minimum grade A-) waives BAIS:6060 Data Programming in R
- BAIS:3500 Data Mining (minimum grade A-) waives BAIS:6070 Data Science

Finance undergraduate majors:

One waiver from the following is allowed if you had an A– or better in the following Tippie undergrad course:

- FIN:4210 Futures and Options waives FIN:9210 Derivatives
- FIN:4220 Fixed Income Securities waives FIN:9220
- FIN:4250 Applied Equity Valuation waives FIN:9150 if taken in the previous academic year

For non-Tippie students, a similar waiver may be possible if review of a submitted syllabus demonstrates a comparable course and an A-or better was received.



# M.S. in Finance

## Pre-approved electives

### Approved Electives

*Consult MyUI to see if a course is offered in any given semester, check that you meet pre-requisites and that electives do not conflict with required course timing. Courses and timing are subject to change.*

ACCT:9120 Design and Use of Cost Management Systems  
 ACCT:9130 Financial Reporting: Theory and Practice  
 ACCT:9030 Financial Accounting Standards & Analysis  
 ACCT:9050 Taxes and Business Strategy  
 ACCT:9170 Advanced Accounting Analytics  
 BAIS:6040 Data Programming in Python  
 BAIS:6050 Data Management and Visual Analytics  
 BAIS:6060 Data Programming in R  
 BAIS:6070 Data Science  
 BAIS:6140 Information Visualization  
 BAIS:9110 Advanced Analytics  
 BAIS:9210 Intro to Modeling with VBA  
 CS:4400 Database Systems  
 CS:5110 Introduction to Informatics  
 ECON:4800 Econometric Analysis  
 ECON:5800 Econometrics  
 FIN:4030 Securities Industry Essentials Exam Prep  
 FIN:9140 Enterprise Risk Management  
 FIN:9160 Quantitative Finance and Deep Learning  
 FIN:9230 Real Estate Finance and Investments  
 FIN:9240 International Finance  
 FIN:9290 Alternative Investments Port Strategies  
 FIN:9310 Corporate Financial Strategy  
 FIN:9330 Investment Banking  
 FIN:9350 Wealth Management  
 ISE:6760 Pattern Recognition for Financial Data  
 ISE:6780 Financial Engineering and Optimization  
 STAT:4100 Mathematical Statistics I  
 STAT:4101 Mathematical Statistics II

*To request that another course not on this list count toward your MFin coursework, please contact your advisor. Note that courses considered for elective hours must be quant/tech courses (i.e. math, stats, accounting, analytics, computer science, physics, engineering, etc.).*

### Concentrations

*Concentrations do not appear on transcripts, but may be listed on resumes. It may be possible to complete more than one concentration.*

#### Corporate Finance

- Experiential course: FIN:9390 Applied Financial Analysis—Industry Project (fall)
- FIN:9330 Investment Banking (fall or spring)
- 3 electives of your choice

#### Investments

- Experiential course: FIN:9225 Applied Fixed Income Analysis (fall or spring) or FIN:9250/FIN:9260 Applied Securities Analysis—Henry Fund (spring and fall enrollment required, 3 sh each)
- FIN:9240 International Finance (fall)
- FIN:9350 Wealth Management (spring)
- 2 electives of your choice (unless in Henry Fund, then 1 elective). Recommended: FIN:4030 Securities Industry Exam Prep (spring/fall, 1sh)

#### Risk Management

- Experiential course: Any
- FIN:9140 Corporate and Financial Risk Management (fall)
- FIN:9240 International Finance (fall)
- 2 electives of your choice (unless in Henry Fund, then 1 elective)

#### Open/no concentration

- Experiential course: Any
- Electives from pre-approved list

**Registering:** Log into MyUI (<https://myui.uiowa.edu/my-ui/home.page>) with your HawkID and password. Click on *Courses/Registration* in the yellow bar at the top and search for courses. Click the *Enroll* button to register.

**Schedule Advising Meeting:** MyUI / Student Information / My Appointments / Select Advisor and Choose a Time

**Electives choices:** MFin/MSBA joint degree students can select from any of the pre-approved electives from either master's list to fulfill the elective courses required.



# M.S. in Business Analytics (Career)

Consult MyUI for current course offerings and timing for a given semester, to check restrictions and pre-requisites, and for course descriptions: <https://myui.uiowa.edu/my-ui/courses/dashboard.page>

To request that a course not on this list be approved for elective credit, contact your advisor at least two weeks prior to the start of the semester; a syllabus will likely be requested for review. **Courses in BOLD are strongly recommended. Note that not all BAIS courses are offered every year. \*If not taken as a core course**

## Approved Electives

|   |  |
|---|--|
| BAIS:4280 Data Security   | GEOG:3540 Intro to Geographic Visualization  |
| <b>BAIS:6040 Data Programming in Python*</b>                          | GEOG:4150 Health and Environment: GIS Applications   |
| <b>BAIS:6060 Data Programming in R*</b>                               | GEOG:4580 Intro to Geographic Databases  |
| <b>BAIS:6100 Text Analytics</b>                                       | GEOG/IGPI:5055 Geospatial Programming  |
| <b>BAIS:6105 Social Analytics</b>                                     | GEOG/IGPI:5540 Geographic Visualization  |
| <b>BAIS:6110 Big Data Management and Analytics</b>                    | ISE:3600/STAT:3620 Quality Control   |
| <b>BAIS:6130 Applied Optimization</b>                                 | ISE:4172 Big Data Analytics  |
| <b>BAIS:6140 Information Visualization</b>                            | JMC:3640 Data Journalism   |
| <b>BAIS:6150 Financial Analytics</b>                                  | MATH:4250 Intro to Financial Mathematics   |
| <b>BAIS:6170 Directed Readings</b>                                    | ME:4150 Artificial Intelligence in Engineering   |
| <b>BAIS:6180 Healthcare Analytics</b>                                 | MKTG:9165 Digital Marketing Analytics  |
| <b>BAIS:6190: Forecasting</b>   | MKTG:9310 Marketing Analytics  |
| <b>BAIS:6210 Data Leadership and Management</b>                       | POLI:3001 Hawkeye Poll   |
| <b>BAIS:9210 Intro to Modeling with VBA</b>                           | PSQF:6209 Survey Research and Design   |
| ACCT:9170 Advanced Accounting Analytics                               | PSQF:6243 Intermediate Statistical Methods   |
| BIOS:5120/STAT:5610 Regression Modeling & ANOVA<br>in Health Sciences | PSQF:6246 Design of Experiments  |
| BIOS:5310/STAT:5810 Research Data Management                          | PSQF:6250 Computer Packages for Statistical Analysis<br>(do not recommend if completed MSCI/BAIS:6060) |
| CS:3210 Programming Languages and Tools                               | STAT:4100 Mathematical Statistics I  |
| CS:4420 Artificial Intelligence                                       | STAT:4101 Mathematical Statistics II   |
| CS:4470 Health Data Analytics   | STAT:4200 Statistical Methods and Computing  |
| CS:5110 Intro to Informatics  | STAT:4540 Statistical Learning   |
| ECE:5490 Multi-Dimensional Image Analysis Tools                       | STAT:4560 Statistics for Risk Modeling   |
| ECON:4800 Econometric Analysis  | STAT:5100 Statistical Inference I  |
| ECON:5800 Econometrics  | STAT:5200 Applied Statistics I   |
| EPID:5200 Principles of Public Health Informatics                     | STAT:5400 Computing in Statistics  |
| FIN:9160 Quantitative Finance and Deep Learning                       | URP:6200/PBAF:6200 Analytic Methods in Planning I  |
| GEOG:3520 GIS for Environmental Studies                               | URP:6225 Applied GIS for Planners  |



# M.S. in Business Analytics (Career)

## Research/PhD oriented

CS:5430 Machine Learning  
CS:5980 Deep Learning  
ECE:5450 Machine Learning  
ECON:5805 Statistics for Economics  
ISE:6380 Deep Learning  
ISE:6720 Nonlinear Optimization  
ISE:6760 Pattern Recognition for Financial Data  
ISE:6780 Financial Engineering and Optimization  
ME:4111 Scientific Computing and Machine Learning  
STAT:6560 Applied Time Series Analysis  
STAT:7400 Computer Intensive Statistics

## Business Courses

MSBA Career students may take up to 6 hours of electives from the following list of approved non-analytics business electives. Additional electives in Finance are available for those that complete MBA:8180 or have an undergraduate finance degree with a 3.33 major GPA; contact your advisor.

### ***No pre-requisites***

ENTR:9800 Entrepren: Advanced Business Planning  
MBA:8140 Corporate Financial Reporting (Fall)  
MBA:8170 International Environment of the Firm (Fall)  
MBA:8180 Managerial Finance (Fall)  
MGMT:3200 Individuals, Teams and Organizations  
MGMT:9150 Nonprofit Organizational Effectiveness I  
MGMT:9160 Nonprofit Org Effectiveness II  
PSQF:5165 Intro to Program and Project Evaluation