In one year, the Berkeley MFE Program will prepare you with the knowledge and skills necessary to propel you to the cutting-edge of finance and data science.
The Berkeley MFE Program has been ranked #1 by the TFE Times and named one of the top 10 quant schools by Advanced Trading magazine.

**Coursework**
- One-year master’s degree program
- Top faculty (ladder faculty and industry professionals)
- Designed exclusively for MFE students
- 95% of the work is team-based
- Independent study projects within quantitative finance and data science
- Financial Practice Seminars for enhanced learning and networking with industry

**Internship**
- Three-month paid internship
- A 100% placement record for the past several years
- A very strong connection to Wall Street and beyond
Proven Track Record of Successfully Launching Careers

- Highly personalized career services
- Strong internship and full-time placement program
- Highest salaries compared to any similar program in the world

Class of 2020 Mean First Year Total Compensation: $173,655

Class of 2020 Mean First Year Base Compensation: $113,554

- See our website for more info: https://mfe.haas.berkeley.edu/careers/career-paths
Career Services

- Recognized experts who work with you and for you
- MFE resume book & job posting website
- Financial Practice Seminars
- MFE alumni network, Haas alumni and broader UC Berkeley community
- Mock interviews
- Workshops
- Job fairs
- UC Berkeley Career Center
Career Opportunities

Broad Range of Opportunities

- Investment Banks
- Hedge Funds
- Commercial Banks
- Consulting Firms
- Fintech
- Asset Management Firms
- Trading Firms
- Rating Agencies
- Start-Ups
- Tech

Wide Variety of Functions

- Portfolio Management
- Financial Modeling, Research & Analysis
- Corporate Finance / Treasury Department
- Financial Programming
- Quantitative Analysis
- Sales & Trading
- Risk Management
- Derivatives Pricing / Structuring
- Strats
- Data Scientist
Aude Barthelemy  
MFE 13  
Vice President  
Goldman Sachs  
New York, NY  
**Prior Degree:**  
BS, Applied Math, Statistics  
ENSAE ParisTech, France

Zhiping Chen  
MFE 16  
Co-Founder  
Lumoto LLC  
New York, NY  
**Prior Degrees:**  
BS, Physics  
Peking University, PRC  
Ph.D., Physics, UCLA

Won Tai Cho  
MFE 15  
VP – SPG Strats  
Morgan Stanley  
New York, NY  
**Prior Degree:**  
BS, Electrical Engineering  
Stanford University

Daron Golden  
MFE 16  
Vice President  
BlackRock  
San Francisco  
**Prior Degrees:**  
BS, Actuarial Science  
University of Cape Town, South Africa
Rajat Agarwal
MFE 11
Senior Director, Investor Group
Capital Markets
Lending Club
San Francisco, California
Prior Degree:
BS, Electrical Engineering
IIT Delhi, India

Sophia Chami
MFE 12
Sr. Quantitative Researcher
Man AHL
London, United Kingdom
Prior Degree:
M.Eng., Mathematics and Computer Science
Ecole des Ponts ParisTech

Dieter Dijkstra
MFE 14
Trader
XR Trading
London, UK
Prior Degrees:
BS + MS, Mathematics and Computer Science
Oxford, UK

Craig Dana
MFE 16
VP – Data Science
Barclays, New York, New York
Prior Degree:
BS, Chemical Engineering
Rutgers University
Ph.D., Chemical Engineering
UC Berkeley
Admissions Info and Deadlines

Admissions

- Undergraduate degree (comparable to US 4-yr degree)
- GMAT or GRE exam
  - We only look at percentiles
- TOEFL/IELTS for select international students
  - 90 IBT or 7 overall band
- Two letters of recommendation
- Interview (by invitation only)

Deadlines

- 4 deadlines: Jan, Mar, June, Oct
- Rolling admission
- Applications received after Oct deadline will be reviewed on a space available basis
We Look For:

- Strong quantitative skills
- Strong programming skills
  - Python, C++, KDB+, Q
- Machine Learning & Artificial Intelligence coursework
- Strong communication skills
  - Ability to explain complex concepts in layman’s terms
- Strong intuition and logic

For more information on prerequisites: https://mfe.haas.berkeley.edu/admissions/prerequisites
<table>
<thead>
<tr>
<th>Strong Quantitative Background</th>
<th>Strong Finance Background</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Calculus</td>
<td>• Corporate Finance</td>
</tr>
<tr>
<td>• Linear Algebra</td>
<td>• Macroeconomics</td>
</tr>
<tr>
<td>• Partial Differential Equations</td>
<td>• Investments</td>
</tr>
<tr>
<td>• Numerical Analysis</td>
<td>• CFA exams</td>
</tr>
<tr>
<td>• Advanced Statistics and Probability</td>
<td>(2-3 courses total in finance/economics)</td>
</tr>
<tr>
<td>• Econometrics*</td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Computer Programming</th>
<th>Other Skills</th>
</tr>
</thead>
<tbody>
<tr>
<td>• C++</td>
<td>• Writing</td>
</tr>
<tr>
<td>• Python</td>
<td>• Communication</td>
</tr>
<tr>
<td>• Machine Learning</td>
<td>• Presentation</td>
</tr>
</tbody>
</table>

Prerequisites
# Student Profile
## Class of 2020-21 (graduating in 2021)

<table>
<thead>
<tr>
<th>Question</th>
<th>Answer</th>
</tr>
</thead>
<tbody>
<tr>
<td>What types of <strong>backgrounds</strong> do applicants commonly have?</td>
<td>Math, Statistics, Engineering, Finance, Natural Sciences, Economics, Computer Science, and related fields</td>
</tr>
</tbody>
</table>
| What **degree levels** have they attained prior to the program?          | Bachelor: 57%  
Master: 38%  
PhD: 5%                                                                                             |
| Is there **basic biographical info** on the current class?               | Average age: 26  
Men: 73%  
Women: 27%                                                                                     |
| What is the **average GMAT/GRE score**?                                  | Quantitative: 94%ile  
Verbal: 77%ile                                                                                   |
| Which **countries** do MFE students come from?                           | The United States, China, India, Europe, Hong Kong, Canada, Australia, Russia, South Africa, Morocco, Peru, Armenia, Israel, Philippines, S. Korea, Taiwan, and Singapore |
Information for International Students

Loans/Funding

• Loan available up to $60,000
• Two different loan options; rates and fees are slightly different
• 20-25 year repayment options, no pre-payment penalties
• Internship can offset the cost of tuition
• More info: https://haas.berkeley.edu/financial-aid/master-of-financial-engineering/
<table>
<thead>
<tr>
<th>Spring Term (Mar-May)</th>
<th>Summer Term (Jun-Aug)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Investments and Derivatives</td>
<td>Derivatives: Quantitative Methods</td>
</tr>
<tr>
<td>Empirical Methods in Finance</td>
<td>Fixed Income Markets</td>
</tr>
<tr>
<td>Stochastic Calculus with Asset Pricing Applications</td>
<td>Financial Data Science</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Fall Term (Aug-Oct)</th>
<th>Internship Period (Oct - Jan)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Required: Financial Risk Measurement and Management</td>
<td>- 10-12 weeks</td>
</tr>
<tr>
<td>Electives:</td>
<td>- Often leads to a full-time offer</td>
</tr>
<tr>
<td>- Asset Backed Security Markets</td>
<td>- CPT for International Students</td>
</tr>
<tr>
<td>- International Equity &amp; Currency Markets</td>
<td></td>
</tr>
<tr>
<td>- High-Frequency Finance</td>
<td></td>
</tr>
<tr>
<td>- Topics in Financial Engineering</td>
<td></td>
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<tr>
<td>- Intro to Deep learning</td>
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<tr>
<td>- Deep Learning for Financial Time-Series</td>
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<tr>
<td>- Independent Study</td>
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</table>

<table>
<thead>
<tr>
<th>Winter Term (Jan-Mar)</th>
<th></th>
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</thead>
<tbody>
<tr>
<td>Required: Applied Finance Project</td>
<td></td>
</tr>
<tr>
<td>Electives:</td>
<td></td>
</tr>
<tr>
<td>- Dynamic Asset Management</td>
<td>- Financial Innovation with Data Science Applications</td>
</tr>
<tr>
<td>- Behavioral Finance</td>
<td></td>
</tr>
<tr>
<td>- Ethics and Regulation in Finance</td>
<td></td>
</tr>
</tbody>
</table>

**Student Services | Curriculum**
Student Services

• Orientation Week
• Teamwork
• FESA: The Financial Engineering Students Association
• Activities and Events
• Building a network that will last a lifetime

Student Life
The Berkeley MFE Program offers students access to a variety of state-of-the-art computing resources.
The Berkeley MFE Program offers students access to a variety of financial databases, statistical and analytical software packages, and the highest quality financial data available direct from the exchanges.
### Finance/Programming Prep
- Coursework at any accredited institution
- CFA Program
- UC Berkeley Extension
- Coursera, edX, Udacity

### Math/Statistics Prep
- Any accredited institution
- Online resources:
  - Columbia Video Network
  - Applied Math Online at University of Washington
  - Netmath at UIUC
  - Harvard Extension School
  - Stanford School of Continuing and Professional Studies
  - University of Athabasca (must achieve 80% or better)
- MFE pre-program courses (offered Jan – Mar)

### Recommended Reading
- *Heard on the Street: Quantitative Questions from Wall Street Job Interviews* by Timothy Crack
- *A Practical Guide to Quantitative Finance Interviews* by Xinfeng Zhou
- *Options, Futures, and Other Derivatives* by John Hull
- *Principles of Corporate Finance* by Brealey, Myers, and Allen
- *Macroeconomics* by Charles Jones
- *The Wall Street Journal, the Financial Times, and the Economist*

### MFE Office Contact Info
- **Website**
  - mfe.berkeley.edu
- **Email**
  - mfe@haas.berkeley.edu
- **Phone**
  - 1-510-642-4417 or 1-510-642-6983

FOR COMPLETE RESOURCE LIST: [https://haas.org/3fc6yWL](https://haas.org/3fc6yWL)