# Group Project: Start-up Hedge Fund

The University of Hong Kong
FINA3327 Hedge Funds: Strategies, Business Management, and Institutions
Spring 2023

#### **Project Description**

The group project is to design a trading strategy and prepare a presentation to raise capital for your start-up hedge fund. You are the entrepreneurs, and you have to convince sophisticated institutional investors to let you manage their money.

As a group, discuss potential hedge fund strategies. Once you have decided on your investment philosophy, collect the data needed to build a historical portfolio for back testing.

This backtest portfolio should be as long as possible. Use quantitative and qualitative analysis to study the returns, sources of returns, and the risks of your strategy. Finally, discuss major risks that your strategy faces that are not captured by the scope of the backtest analysis.

Your analysis should cover the following basic items,

- Identify a profitable investment strategy, and explain the logic behind this strategy,
  - O Why does this strategy work?
- Build a trading strategy that takes advantage of your key insight. Collect necessary data and build a time-series of portfolio returns,
  - This can be done in Excel, but for systematic strategies you may need to rely on a more sophisticated programming language.
- Analyze the returns, sources of returns, and risk characteristics,
  - Consider benchmarking your strategy against a comparable strategy,
  - o Why does your fund outperform other similarly risky investment opportunities?
- Identify the major risks that your fund faces,
  - These may include political risks, market risk, capacity constraints etc. that are not captured by the back test.
  - Sometimes it will be impossible to eliminate or hedge these risks, but it is important to let your investors know you are aware of these risks.

## **Group Formation**

Please work with the same group as your group homework assignment. Please email the instructor and TA if you have any special circumstances.

### **Group Presentation Details**

The presentations will take place on April 24th, our last scheduled class. Presentations will take place in person. Each group will present their proposal for 15 minutes, and each group member is expected to participate in the presentation. The group will then participate in a Q&A session for 4-5 minutes. The group will be assessed both on their presentation and how they respond to questions.

Each group is required to submit:

- 1) A digital copy of their slides to the TA and instructor two days before their presentation.
- 2) A list with the names and student numbers of the presenters, in the order in which you present.

Teams may sign up for presentation times on a first-come first-serve basis. Sign up will be available on Moodle at a future point in time.

You have one week to submit a written report in .pdf format and data files after the presentation. Given the time constraints, the report may include a deeper analysis and more details than what is covered in the in-class presentation.

### **Project Grading**

The project will be graded by both the instructor and the TA based on the quality of the analysis in the slides and the presentation performance. The project is worth **30%** of your final grade, and the project grade will be broken down as follows:

Grading Rubric	Percent of Project Grade
Clearly and concisely describe the logic of your investment strategy.	20%
Design a trading strategy that turns the investment idea into a time-	20%
series of returns. Discuss the sources of any data needed.	
Quantitatively and qualitatively analyze the past returns, sources of	20%
returns, and risk characteristics.	
Discuss the major risks that face your strategy, and identify potential	20%
solutions.	
Clearly and concisely communicating the ideas in both the slides and	15%
the verbal presentation. This component will be graded individually.	
Peer evaluation of group member contribution.	5%