Case Study

You are an analyst estimating the optimal allocation to the following asset classes in your firm portfolio:

- 1. Global Equities
- 2. Global Hedge Funds
- 3. Alternative Risk Premia factors
- 4. Trend Following strategy

You are provided with monthly returns for the above asset classes and risk free returns.

Write a Python code which performs the following steps:

- 1. Reads the above data.
- 2. Creates a portfolio which allocates equal dollars to the above asset classes with quarterly rebalancing.
- 3. Computes portfolio statistics.
- 4. Computes and compares performance contribution of the underlying asset classes to the portfolio return for 2020 YTD, last 1 year and last 3 years.

Write a note which describes the portfolio and its characteristics. Describe how you would improve the portfolio construction process.