Contagion of Ethical Investing Norms Among Institutional Investors

Proposal for
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Abstract

This paper will investigate how ethical investing norms spread among institutional investors. It will employ machine learning techniques to (1) assign investors into groups according to their ethical investing preferences, (2) model changes to their ethical investing behavior over time, and (3) examine what mimicking behavior investors engage in with respect to ethical norms. The paper will also make use the of the GPFG's ethical exclusion announcements to examine how investors react the spread of emerging and established ethical investing norms.

1 Introduction

Institutional investors have been increasingly under pressure to take into account ethical considerations in their portfolio allocation decisions[1]. However, there is no consensus on the optimal way to invest responsibly. A main division of opinion is on the choice of negative portfolio screens ("exit") versus activism/engagement with companies ("voice"). Crucially, investors also need to make a decision on which firm behaviors they find objectionable. Ethical norms are inherently subjective and can depend heavily on current public opinion as well as individual preferences. Equally, when navigating the landscape of responsible investing, institutional investors can choose to either show leadership and be at the forefront of various campaigns or to be more cautious and follow the prevailing public opinion or mimic the actions of other investors.

In this project, I want to explore how institutional investors form and alter their ethical investing norms based on the behavior of their peers, the wider investment community, and public opinion. I believe that this can be achieved by employing a variety of machine learning techniques. To provide a quasi-natural experiment setting, I will also investigate how institutional investors react to Norway's Government Pension Fund Global (GPFG)'s ethical exclusion announcements and whether these serve to redefine ethical investing norms. I detail my research strategy below.

[1]For example, in the UK, the Department for Work and Pensions (2018) has proposed that from 1st October 2019, occupational pension schemes which produce a statement of investment purpose (SIP) would need to make sure that it includes information on "how they take account of financially material considerations, including (but not limited to) those arising from Environmental, Social and Governance considerations, including climate change", from 'Clarifying and strengthening trustees' investment duties' by Department for Work and Pensions (2018)

2 Research Strategy

I plan to use classification analysis (such as k-means) to cluster investors into broad groups based on their characteristics (size, location, type) and their responsible investing profile. The ethical investor credentials will consist of their portfolio holdings of firms and (publicly available) engagement behavior with firms. I intend to collect data on investor ownership of firms from 13Fs filings and Capital IQ and on voting records at shareholder meetings from the ISS database. The time variation in the data will allow me to examine how ethical investing clusters evolve over time. I will also investigate whether such new norms seem to proliferate across different investor clusters or only "infect" particular segments.

Second, I aim to identify which factors are associated with investor decisions to divest specific firms or sectors and to vote in support of ESG-related shareholder meeting initiatives. I will compare the explanatory and predictive power from using traditional econometric logit and probit models as well as machine learning models such as lasso, ridge, elastic nets, neural networks and regression tree algorithms (e.g. xgboost). Peer investor behavior as well as relevant news articles and sector performance indicators can be part of the suite of explanatory variables. I will use Natural Language Processing (NLP) techniques to extract and aggregate news article data into topics relevant to firm ethical behavior.

Finally, I propose to examine investor reactions to the ethical exclusion announcements of the GPFG[2]. As a large institutional investor, the GPFG can serve as the monitor of ethical norms for smaller investors who do not have the resources to perform ethical monitoring. In prior work[3] I have documented some mimicking behavior by pension funds and ethical mutual funds. In this project, I will investigate its role as an opinion leader of ethical norms in more granularity and across a broader range of investor groups. I will also examine the extent to which prominent news stories such as major climate change reports, activism campaigns and divestment campaign announcements by other high-profile investors can also influence investor ethical norms.

I intend to use Python as the primary data analysis software due to its extensive availability of machine learning packages (e.g. scikit-learn). However, I can also code in other packages such as Matlab, R, SQL Server, SAS and Stata and can make use of them in cases where they provide features which could be beneficial to the analysis.

Thank you for considering my proposal.

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[2] The GPFG is the largest sovereign wealth fund in the world and publicly excludes firms from its investment universe which it believes to violate certain ethical norms and be likely to continue to do so in the future

[3] "Corporate Ethical Behaviours and Firm Equity Value and Ownership: evidence from the GPFG's ethical exclusions", Working Paper, Vaska Atta-Darkua