

Corporate green bonds

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Literature review

- Companies issue green bonds for three reasons:
 - 1. signaling argument (e.g., Lyon and Maxwell, 2011; Lyon and Montgomery, 2015)
 - 2. Green washing argument
 - 3. Cost of capital argument

Contributions

- First, it contributes to the growing literature that studies the green bond market (e.g., Baker et al., 2018; Karpf and Mandel, 2017; Zerbib, 2019).
- Complete (Tang and Zhang, 2020)

- Second, this study contributes to the growing literature on impact investing (e.g., Barber et al., 2021; Geczy et al., 2020).

- Third, this paper indicates that corporate green bonds help attract an investor clientele that values the long term and the environment. This finding contributes to the literature showing that better environmental, social, and governance (ESG) performance improves access to finance (e.g., Cheng et al., 2014; El Ghoul et al., 2011) as well as the emerging literature that studies investors' preferences for ESG (e.g., Barber, 2007; Dimson et al., 2015; Dyck et al., 2019; Ilhan et al., 2020; Krueger et al., 2020; Starks et al., 2018).

- Finally, the results add to the body of evidence that points to a positive link between companies' environmental responsibility and stock market performance (e.g., Flammer, 2013; Hamilton, 1995; Klassen and McLaughlin, 1996) as well as the broader literature that shows a positive relation between corporate social responsibility (CSR) and stock market performance (e.g., Edmans, 2011, 2012; Edmans et al., 2017; Flammer, 2015; Krueger, 2015).

Empirical analysis

- A set of corporate green bonds from Bloomberg's fixed income database. The dataset covers corporate green bonds issued by both public and private companies worldwide from the inception of the green bond market in 2013 to 2018.

- Through descriptive statistical analysis, the author draws the following conclusions:
- 1. Corporate green bonds are growing in popularity
- 2. Corporate green bonds are more prevalent in industries where the natural environment is financially material to the Companies' operations (e.g., energy).
- 3. Corporate green bonds are particularly popular in China, the United States and Europe

- Event study method
- Positive -- the CAR was 0.49% in the short window before and after the green bond announcement, significantly different from zero at the 5% level.
- Moreover, CARs are larger for green bonds that are certified by independent third parties and first-time issuers of green bonds.

- Matching
- Green bond issuers improve their environmental performance post issuance—specifically, an increase in the company's environmental rating and ii) a decrease in CO2 emissions.

- The authors also examine the evolution of equity after the issuance of green bonds.
- The ownership of green bond issuers (compared to other similar bond issuers) increased by i) long-term investors and ii) post-issue green investors.

- Taken together, the findings of this study suggest that corporate green bonds serve as a credible signal of companies' commitment toward the environment. As this commitment materializes, companies reduce their CO2 emissions, achieve higher environmental ratings, and become attractive for an investor clientele—such as long-term and green investors—that values the environment.

My plan

- The topic I plan to study is "What is the relation between firm's ESG performance and stock returns?". More specific, I want to explore whether issuing green bonds is good for the share price of the company. This key paper is for my reference in terms of designing research ideas and data collection methods. I plan to use the event study method in my dissertation.