Financiers of the Global Coal Exit List

Finance research methodology

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Note on our Research

Introduction

This note provides an overview of the methodology applied in this research and is organised as follows: section 1 describes the types of financial relationships that were researched; section 2 describes the data sources that were used for this research; section 3 explains the estimation method used to calculate financial institutions' contributions to deals when necessary; section 4 stipulates the time scope of the research.

1 Types of finance

This section describes the types of finance included in the research. Financial institutions can invest in companies through a number of modalities. Financial institutions can provide credit to a company. This includes providing loans and the underwriting of share and bond issuances. Financial institutions can also invest in the equity and debt of a company by holding shares and bonds. This section outlines the different types of financing, how they were researched and the implications for the study.

1.1 Corporate loans

The easiest way to obtain debt is to borrow money. In most cases, money is borrowed from commercial banks. Loans can be either short-term or long-term in nature. Short-term loans (including trade credits, current accounts, leasing agreements, et cetera) have a maturity of less than a year. They are mostly used as working capital for day-to-day operations. Short-term debts are often provided by a single commercial bank, which does not ask for substantial guarantees from the company.

A long-term loan has a maturity of at least one year, but generally of three to ten years. Long-term corporate loans are in particular useful to finance expansion plans, which only generate rewards after some period of time. The proceeds of corporate loans can be used for all activities of the company. Often long-term loans are extended by a loan syndicate, which is a group of banks brought together by one or more arranging banks. The loan syndicate will only undersign the loan agreement if the company can provide certain guarantees that interest and repayments on the loan will be fulfilled.

1.1.1 Project finance

One specific form of corporate loan is project finance. This is a loan that is earmarked for a specific project.

1.1.2 General corporate purposes / working capital

Often a company will receive a loan for general corporate purposes or for working capital. On occasion while the use of proceeds is reported as general corporate purposes, it is in fact earmarked for a certain project. This is difficult to ascertain.

1.1.3 Green Financing

Loans labelled as pure green financing are not taken into account for the analysis, even if the green finance label is highly contested. However, these deals are available in the underlying deals dataset.

1.2 Share issuances

Issuing shares on the stock exchange gives a company the opportunity to increase its equity by attracting a large number of new shareholders or increase the equity from its existing shareholders.

When a company offers its shares on the stock exchange for first time, this is called an Initial Public Offering (IPO). When a company's shares are already traded on the stock exchange, this is called a secondary offering of additional shares.

To arrange an IPO or a secondary offering, a company needs the assistance of one or more (investment) banks, which will promote the shares and find shareholders. The role of investment banks in this process therefore is very important.

The role of the investment bank is temporary. The investment bank purchases the shares initially and then promotes the shares and finds shareholders. When all issued shares that the financial institution has underwritten are sold, they are no longer included in the balance sheet or the portfolio of the financial institution. However, the assistance provided by financial institutions to companies in share issuances is crucial. They provide the company with access to capital markets, and provide a guarantee that shares will be bought at a pre-determined minimum price.

1.3 Bond issuances

Issuing bonds can best be described as cutting a large loan into small pieces, and selling each piece separately. Bonds are issued on a large scale by governments, but also by corporations. Like shares, bonds are traded on the stock exchange. To issue bonds, a company needs the assistance of one or more (investment) banks which underwrite a certain amount of the bonds. Underwriting is in effect buying with the intention of selling to investors. Still, in case the investment bank fails to sell all bonds it has underwritten, it will end up owning the bonds.

1.4 (Managing) shareholdings

Banks can, through the funds they are managing, buy shares of a certain company making them part-owners of the company. This gives the bank a direct influence on the company's strategy. The magnitude of this influence depends on the size of the shareholding.

As financial institutions actively decide in which sectors and companies to invest, and are able to influence the company's business strategy, this research will investigate the shareholdings of financial institutions of the selected companies. Shareholdings are only relevant for stock listed companies. Not all companies in the study are listed on a stock exchange. The company selection has tried to take this into account by including the major companies in the relevant sectors. However, some ownership forms may dominate in certain sectors under analysis. Additionally, some ownership forms are more prominent in some countries.

Shareholdings have a number of peculiarities that have implications for the research strategy. Firstly, shares can be bought and sold on the stock exchange from one moment to the next. Financial databases keep track of shareholdings through snapshots, or filings. This means that when a particular shareholding is recorded in the financial database, the actual holding, or a portion of it, might have been sold, or more shares purchased. Secondly, share prices vary from one moment to the next.

1.5 (Managing) investments in bonds

Banks can also buy bonds of a certain company. The main difference between owning shares and bonds is that owner of a bond is not a co-owner of the issuing company; the owner is a creditor of the company. The buyer of each bond is entitled to repayment after a certain number of years, and to a certain interest during each of these years.

2 Data sources

This research relied on primarily on financial databases Bloomberg and Refinitiv), as well as project finance data from IJGlobal. Moreover, for a selection of pension funds, data on investments in bonds and shares were collected from the pension fund disclosures. Data from the following pension funds directly were included in the research:

- California State Teachers' Retirement System (CalSTRS)
- New York State Common Retirement Fund
- Pensioenfonds Zorg en Welzijn (PFZW)
- Pensioenfonds Vervoer
- Pensioenfonds Horeca & Catering (PH&C)
- Pensioenfonds Metaal en Techniek (PMT)
- Pensioenfonds van de Metalelektro (PME)
- BPL Pensioen
- Pensioenfonds Detailhandel
- Algemeen Burgerlijk Pensioenfonds (ABP)
- Bedrijfstakpensioenfonds voor de Bouwnijverheid (BpfBOUW)
- California Public Employees' Retirement System (CalPERS)
- Government Pension Investment Fund (GPIF)
- Government Pension Fund Global
- National Pension Service
- Första AP-Fonden (AP-1)
- Andra AP-Fonden (AP-2)
- Tredje AP-fonden (AP-3)

- Fjärde AP-fonden (AP-4)
- Sjunde AP-fonden (AP-7)
- Arbejdsmarkedets Tillægspension (ATP)
- PFA Pension
- PenSam

Data from these pension funds were included due to the relative size of the pension funds, and the availability of data.

3 Financial institution financing contributions

During the financial data collection process, this research utilized financial databases (Bloomberg, Refinitiv and IJGlobal). Corporate loans, credit and underwriting facilities provided to the selected companies was researched for the period 2016-2020 (October). Investments in bonds and shares of the selected companies were identified through Refinitiv, Thomson EMAXX and Bloomberg at the most recently available filing date in January 2021.

Financial databases often record loans and issuance underwriting when these are provided by a syndicate of financial institutions. These financial databases do not report bilateral loans, where a company borrows money from only one bank, rather than from a group of lenders. A significant portion of commercial banks' lending, namely all bilateral loans to companies featured on the GCEL, is therefore not captured by our data.

The level of detail per deal often varies. Some sources may omit the maturity date or term of the loan, the use of proceeds, or even the exact issue date. Financial databases often do not report on the proportions of a given deal that can be attributed to the participants in deal. In such instances, this research calculated an estimated contribution based on the rules of thumb described below.

Our data also has limitations on the investor side as many pension funds and insurers do not report on their holdings. While shareholding data is generally more complete, our research probably captures less than 1/3 of the bonds institutional investors hold in coal companies. It is therefore likely that the numbers for commercial banks' lending to the coal industry and institutional investors' bond holdings in the coal industry are significantly higher than our research shows.

3.1 Loans & underwriting services

Individual bank contributions to syndicated loans and underwriting (bond & share issuance underwriting) were recorded to the largest extent possible where these details were included in financial database, or company or media publications.

In many cases, the total value of a loan or issuance is known as are the banks that participate in this loan or issuance. However, often the amount that each individual bank commits to the loan or issuance has to be estimated.

In the first instance, this research attempted to calculate each individual bank's commitment on the basis of the fee they received as a proportion of the total fees received by all financial institutions. This proportion (e.g. Bank A received 10% of all fees) was then applied to the known total deal value (e.g. 10% x US$ 10 million = US$ 1 million for Bank A).

Where deal fee data was missing or incomplete, this research used the bookratio. The bookratio (see formula below) is used to determine the spread over bookrunners and other managers.

$$\text{Bookratio: } \frac{number\ of\ participants - number\ of\ bookrunners}{number\ of\ bookrunners}$$

Table 1 shows the commitment assigned to bookrunner groups with our estimation method. When the number of total participants in relation to the number of bookrunners increases, the share that is attributed to bookrunners decreases. This prevents very large differences in amounts attributed to bookrunners and other participants.

Table 1 Commitment to assigned bookrunner groups

Bookratio	Loans	Issuances
> 1/3	75%	75%
> 2/3	60%	75%
> 1.5	40%	75%
> 3.0	< 40%*	< 75%*

* In case of deals with a bookratio of more than 3.0, we use a formula which gradually lowers the commitment assigned to the bookrunners as the bookratio increases. The formula used for this:

$$\frac{\frac{1}{\sqrt{bookratio}}}{1.443375673}$$

The number in the denominator is used to let the formula start at 40% in case of a bookratio of 3.0. As the bookratio increases the formula will go down from 40%. In case of issuances the number in the denominator is 0.769800358.

Profundo can present the underlying deals dataset for verification of deals and contributions upon request. This dataset includes data sources and dates of access.

3.2 Shareholding

The number and values of shares held by individual financial institutions are reported in financial databases.

3.3 Bondholding

The number and values of bonds held by individual financial institutions are reported in financial databases.

4 Timeframe

Corporate loans, bond and share issuances are considered credit activities. The scope of this research for credit activities is January 2016 to October 2020.

Bondholdings and shareholdings were analysed at the most recent filing dates in January 2021.

5 Company Scope

The Research covers all 935 companies and their subsidiaries from urgewald’s Global Coal Exit List (GCEL) 2020, retrievable at coalexit.org. The GCEL lists coal companies and their coal or finance related subsidiaries and joint ventures. Only deals for subsidiaries or parent companies of the 935 firms that are listed on the Global Coal Exit List are in the scope of the financial analysis. However, these non-coal related deals are available in the underlying deals dataset.

6 Note on Adjusters

In contrast to other rankings, we do not use any adjusters. This means that we take into account the full sum a bank is providing to a coal company or the full investment an investor has in a coal company. In the case of large, diversified companies, it is likely that not all financing we take into account will be used for the coal part of the business. However, we cannot to a degree of absolute certainly asses which share of the financing is used for companies’ coal operations, especially if they are still developing new coal assets. Therefore, using only a share of the financing, for example based on a company's coal share of revenue, would bear a risk of understating the amount of financing that could potentially go towards coal infrastructure.