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Media Capture by Banks[*]

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Abstract

Do banks exploit lending relationships with media companies to promote favorable news coverage? To test this hypothesis we map the connections between banks and the top newspapers in several European countries and study how they affect news coverage of two important financial issues. First we look at bank earnings announcements and find that newspapers are significantly more likely to cover announcements by their lenders, relative to other banks, when they report profits than when they report losses. Such pro-lender bias applies to both general-interest and financial newspapers, and is stronger for newspapers and banks that are more financially vulnerable. Second, we look at a broader public interest issue: the Eurozone Sovereign Debt Crisis. We find that newspapers connected to banks more exposed to stressed sovereign bonds are more likely to promote a narrative of the crisis favorable to banks and to oppose debt-restructuring measures detrimental to creditors.

Keywords: Media bias, Banks, Newspapers, Earnings reports, Eurobond crisis
JEL codes: G21, L82

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1. INTRODUCTION

Mass media play a crucial role in informing citizens and in keeping both government and corporate interests accountable (Snyder and Strömberg, 2010; Dyck et al., 2008). Media's ability to influence public opinion, however, creates an incentive for government and firms alike to "capture" the media to promote friendly coverage and/or deter hostile reporting (Besley and Prat, 2006; Szeidl and Szucs, forthcoming). Influence on the media can be exerted in various ways: through direct government control (Durante and Knight, 2012), private ownership (Gilens and Hertzman, 2000; Martin and McCrain, 2019), or advertising spending (Reuter and Zitzewitz, 2006; Di Tella and Franceschelli, 2011; Beattie et al., 2020).[1]

One aspect that the literature on media capture has largely overlooked concerns the relationship between media and banks, and its possible implications for media freedom. This question is potentially relevant for at least two reasons.

First, the banking sector depends heavily on the confidence of depositors and investors (Diamond and Dybvig, 1983), but is also one of the most opaque industries (Morgan, 2002); hence news coverage of bank (mis)conduct can have significant consequences for the reputation of a bank, when not on the industry as a whole.

Second, unlike other firms, banks can also exploit their lending connections to media companies to influence editorial content. This possibility is especially relevant in recent years as, due to competition from online platforms and shrinking advertising revenues, traditional media have become less profitable and more dependent on creditors (McChesney and Nichols, 2011; Seamans and Zhu, 2014). For example, Figure 1 shows the evolution over the past decade of capitalization and profitability for the newspapers in our sample. It is clear that, while capital as a share of total assets has shrunk, all papers experienced losses in all years but one.

There are indeed concerns that the increased dependence of media companies on banks may be detrimental to editorial independence. For example, in a 2015 article on Spain, the New York Times warned about this risk, voicing the worries by some veteran Spanish journalists that "newspapers are in the hands of creditors" and that this is hurting both their reputation and their "independence when it comes to talking about big companies, especially banks".[2]

Beyond anecdotes and generic concerns, however, no systematic evidence exists on how the connection between banks and media affects news coverage, and of whether financially distressed media are more vulnerable to the pressures of creditors. This paper aims to fill this

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[1] As documented by Szeidl and Szucs (forthcoming) in the context of Hungary, in certain cases media bias can also result from favor exchange between the government and private media owners.

[2] The full text of the article, published on November 5, 2015 and titled "Spain's News Media Are Squeezed by Government and Debt", is available at: https://www.nytimes.com/2015/11/06/world/europe/as-spains-media-industry-changes-rapidly-some-worry-about-objectivity.html

gap by mapping the connections between banks and the top newspapers in several European countries, and by examining empirically how these affect news coverage of different financial events that are relevant to banks, either directly or indirectly.

From an empirical standpoint estimating the causal effect of banks' influence on news coverage is challenging due to the difficulty of disentangling whether media outlets bias content to conform to the interests of connected banks or to the preferences of their readers, which may correlate with each other. This would be the case, for example, if a bank is more likely to lend to outlets whose readers are more sympathetic to business interests, in general, and to the financial sector, in particular. Yet, though readers of an outlet may be more or less sympathetic of the financial sector as a whole, they are unlikely to have a preference for a specific bank; and even if this was the case, this preference is unlikely to change abruptly over time. Hence, one way to overcome this issue is to focus on a situation in which either the preferences of different banks are not perfectly aligned with each other, or in which the preferences of a single bank vary over time.

Following this approach, we focus on situations in which one of these conditions is met. First, we look at how newspapers report about bank-specific events such as quarterly earnings reports, and examine whether they favor their lenders relative to other banks by highlighting positive results and/or downplaying negative ones. In this case, our identification strategy exploits variation in lending relationships and news coverage across newspaper-bank pairs, and, for the same newspaper-bank pair, between quarters characterized by positive or negative earnings results. We then examine how media-bank connections influence news coverage of key public interest and policy-relevant issues. Specifically, we consider the Eurozone Sovereign Debt Crisis (ESDC) and examine whether newspapers connected to banks more exposed to stressed sovereign bonds promoted a narrative of the crisis more favorable to the financial sector and endorsed crisis-management strategies less detrimental to creditors. In this case, we exploit variation across newspapers in lending relationships with banks and variation across banks in exposure to stressed sovereign bonds.

For the analysis of earning reports, we focus on the top general-interest and financial newspapers in four European countries (France, Germany, Spain, and UK) for a total of 20 newspapers. For the analysis of the ESDC, we use data collected by a group of international media scholars (Picard, 2015) on articles published on 23 newspapers in seven countries (the above-mentioned four plus Italy, Netherlands and Poland).

With regard to the mapping of bank-media connections, for each newspaper we identify its main banker(s) as well as the main banker(s) of the parent company (i.e., direct and indirect lending relations). Though our main focus is on connection through lending, we also collect information on ownership relations between banks and media companies or their groups,

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which we use as control in our empirical analysis.

Regarding news coverage of earning announcements, the sample consists of all quarterly earning reports issued between 2009 and 2018 by all publicly traded banks present in the I/B/E/S database. Using keyword searches, we identify every relevant article published on the same day or on the day after a bank's announcement. We use filters and a supervised machine learning procedure to minimize the incidence of false positives. We also distinguish articles focusing on a single bank from those about multiple banks. Our final sample includes 10,508 articles, 4,508 of which focus on a single bank and 6,000 on multiple ones. For the news coverage of the ESDC, the data include information on all articles published around several key junctures of the crisis between 2011 and 2012, which were hand-coded by the researchers. For each article, the data include various qualitative measures of its content and tone, including the article's position regarding the causes and responsibilities of the crisis as well as the possible solutions.

Our results indicate that newspapers tend to slant news in a way that is favorable to their lenders. First, looking at coverage of earning announcements, we find that newspapers are significantly more likely to talk about the earnings reports issued by their lenders - relative to other banks - when they announce profits than when they announce losses. Furthermore, they are more likely to write longer articles about the story, and to treat it separately from stories about other banks. These findings are robust to including newspaper-bank and bank-quarter fixed effects, to controlling flexibly for newspapers' higher tendency to lend from and report about banks from the same country, and to a battery of other tests. The estimated effect is sizable: on average, a newspaper is 10 percentage points (p.p.) more likely to cover a profit by its lender(s) than by other banks. This corresponds to a 60% increase relative to the average probability for any other bank, and a 25% increase relative to the probability for any other bank of the same country.

We find evidence of pro-lender bias for both general-interest and financial newspapers. However, while for the first group lending connections affect the likelihood that an earning announcement is covered, for the second group it affects the amount and placement of the coverage. This may be due to the fact that, given their specialization, financial newspapers cannot ignore earning announcements altogether, but may still favor their lenders when deciding how extensively and prominently to cover them.

We also explore to what extent pro-lender bias depends on the financial solidity of both newspapers and banks. We find that highly leveraged newspapers, that are more dependent on their lenders, are more likely to slant content in their favor. This result is consistent with previous evidence of the influence of lenders on the corporate governance of highly indebted borrowing companies (Nini et al., 2012), and supports the concern that financial distress can

put media companies' editorial independence at risk. Along the same lines, we find that pro-lender bias is more likely the more leveraged the lender is, arguably because more fragile banks have greater incentive to use their connections to try to reduce news coverage of their losses.[3]

Pro-lender bias is not limited to news coverage of earning reports, but also shapes the way newspapers talk about important financial events of more general interest such as the Eurobond crisis. Indeed, our analysis indicates that newspapers connected to banks more heavily exposed to the sovereign debt of troubled southern European countries are significantly less likely to portrait banks as being responsible for the crisis and to support debt-restructuring measures that are costly for creditors (e.g., orderly default, haircut). Once again, the effect is quantitatively important: a one standard deviation increase in connected banks' exposure to GIIPS's bonds is associated with a 17 p.p. decrease in the probability of mentioning the banking sector as responsible for the crisis (-40% of baseline), and a 12.5 p.p. decrease in the probability of supporting some form of debt restructuring (-31% of baseline). Taken together, our findings provide the first systematic evidence that connections between banks and media through lending can undermine editorial independence and influence news coverage of key financial events with potentially important ramifications for the formation of public opinion on such crucial and policy-relevant issues.

Our paper relates to various streams of literature. First it contributes to the growing body of work on media capture by government and corporate actors mentioned above. While previous contributions have studied the importance of direct government control, private ownership, or advertising spending, the novelty of our research is that it investigates the possible capture of media by banks and the role of lending as an additional channel of influence. In this regard, to the best of our knowledge, the contribution most related to ours is a blog post by Zingales (2016) documenting differences in news coverage of two reforms of the Italian banking system between newspapers with higher vs. lower leverage ratio. The advantage of our empirical approach is two-fold. On the one hand, we explicitly identify the connections between each media outlet and specific banks (rather than to the banking sector as a whole). On the other hand, we specifically focus on situations in which the stakes differ across banks or for the same bank over time.

Second, our paper relates to previous work on the link between media and bank performance. Specifically, several contributions have documented how the presence of a free and competitive media is associated with lower levels of bank corruption, less fraudulent behavior, and less incidence of preferential lending to politically connected firms (Houston et al., 2011; Ho

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[3] In line with this view, we find that news coverage of the earnings reports of a bank affects its stock returns in the days after the announcement, but that this effect is only significant for banks with lower capitalization (i.e., below-median Tier 1 capital ratio).

et al., 2016; Yang et al., 2014).[4] None of these contributions, however, considered the possibility that banks may attempt to capture the media to minimize hostile coverage, an aspect that our paper explicitly investigates.

Third, our paper contributes to the literature on the influence of lenders on firms' management (Gilson, 1990; Nini et al., 2012; Denis and Wang, 2014). While previous work has looked at how creditors' pressure can affect firms' decisions related to investments, acquisitions, and even CEO appointments, our paper documents that lenders' influence can impact other key areas of a firm's activity such as a media company's editorial policy.

Finally, our paper relates to the large literature on the impact of media on financial markets (Engelberg and Parsons, 2011; Dougal et al., 2012; Solomon, 2012; Ahern and Sosyura, 2014; Fang et al., 2014; Hillert et al., 2014; Solomon et al., 2014). These contributions document how corporate news affect stock prices. Instead, we focus on how firms, particularly banks, may actively try to influence news content and on the implications such behavior may have on the stock market.

The remainder of the paper is organized as follows. In section 2 we describe the data used in our analysis. In section 3 and 4 we present the empirical strategy and the results for the analysis of news coverage of banks' earnings announcements and news coverage of the Eurobond crisis, respectively. Section 5 concludes.

2. DATA

In this section, we describe the data we employ in our empirical analysis. First, we present the data on news coverage of both banks' earnings announcements and the Eurozone Sovereign Debt Crisis. We then describe the data on the connections between media and banks through both lending and shareholding, and finally the data on balance sheet variables for both banks and newspapers.

2.1. MEDIA COVERAGE

2.1.1. NEWS COVERAGE OF BANKS' QUARTERLY EARNINGS ANNOUNCEMENTS

The analysis of the quarterly earnings announcements involves 36 banks listed in European markets over the period 2009-2018, and 20 top newspapers from four European countries, namely France, Germany, Spain and the UK. Our sample includes all financial intermediaries listed in any European stock exchange for which earnings announcements data are available from the Thomson Reuters I/B/E/S dataset. The final list of banks is in Panel A of Table A1 in the Appendix.

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[4] These findings, specific to the banking sector, dovetail nicely with previous evidence on the positive impact of media monitoring on firm behavior including work by Dyck et al. (2008) and Kuhnen and Niessen (2012).

To define the sample of newspapers, we employ the following procedure. First, for each country, we consider the four general-interest newspapers with the highest circulation, plus (at least) one top financial newspaper. We then exclude all newspapers that are not available from the Dow Jones Factiva database, our primary source of news content.[5] In the case of Spain, given the presence of two equally important financial newspapers, *Expansión* and *El Economista*, we include both in our sample. Finally, for the UK, since the circulation metric favors tabloids disproportionately, we also consider the two main national general interest newspapers, i.e. *The Guardian* and *The Times*. The Appendix Table A1 lists the 20 newspapers in our final sample.

For each earnings announcement of each bank in our sample, we download from the Factiva database all relevant articles published either on the day of the announcement or on the following day. To identify the articles about the earnings announcement we use the following two-step procedure. First, we consider all articles containing the bank's official name (or an acronym) *and* any of a wide range of keywords associated with earnings announcements (e.g., earning, result, profit, loss, etc.).[6,7] Based on these procedure we identified over 20,000 articles. A large number of these, however, were false positive, meaning that they are either totally unrelated to banking,[8] or do indeed talk about the bank of interest but in a different context than earnings announcements. To address this issue we apply a novel supervised machine learning model called BERT (Bidirectional Encoder Representations from Transformers; Devlin et al., 2018).

In practice, we select 10% of the articles in each language and have human analysts read and code them as relevant or irrelevant depending on whether they actually mention a bank's earnings reports or not. We then select a random subsample of these articles (the "training set") which is used to make the algorithm "learn" how to distinguish relevant articles from irrelevant ones. We then take the remaining hand-coded articles (the "validation set"), let the algorithm classify them, and compare the outcome with that produced by coders to assess the accuracy the automated predictions. We find that the procedure grants an accuracy level

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[5] This is the case for three French newspapers (*Le Monde*, *Libération* and *Aujourd'Hui*) and a German one (*Frankfurter Allgemeine Zeitung*).

[6] Appendix Table A2 reports the list of keywords in each of the four languages of the newspapers in our sample.

[7] An alternative approach would be to first select all articles over the period of interest containing the name (or an acronym) of a bank and then select only the articles related to earnings announcements using a topic-selection model. However, anti-data-scraping download restrictions in the Factiva database make such an option unfeasible.

[8] For instance, the UK Premier League (i.e. the main national soccer league) is sponsored by Barclays, one of the banks in our sample. As a result, the combination of filters containing the words "Barclays" and "loss" will select articles reporting summaries of soccer matches. Similarly, banks' analysts are often interviewed to comment economic policies and/or other developments in financial markets. Hence, the same combination of words may select articles whereby a Barclays' analyst delivers his/her opinion over e.g. the exchange rate losses of the British Pound against the US dollar.

of 90% or more in each of the four languages, and dominates other viable alternatives.[9] Our final sample consists of 10,508 articles, 4,508 of which mention just one bank (mono-bank) and 6,000 which mention more than one (multi-bank). Our analysis will primarily focus on mono-bank articles, since they arguably represent a more precise measure of news coverage of a bank's announcement. However, we will also consider multi-bank articles both for purpose of robustness and to test the hypotheses that newspaper may "conceal" negative news for their lenders by presenting it alongside information about other companies rather than in a stand-alone article.

We collapse the data by newspaper*bank*year-quarter, and construct several measures of news coverage, which we describe in Table 1.[10] First, we create a quarterly dummy variable for whether a given newspaper publishes at least one mono-bank article about a bank's earnings announcement, which happens 16.8% of the cases, and a dummy for whether it publishes at least one article of any kind (mono- or multi-bank), which happens 27.7% of the cases. To look at the intensive margin, we also measure the (log of the) number of mono-bank and total articles published by a newspaper, conditional on at least one article of either kind being published. On average, conditional on covering an earning announcement, a newspaper devotes 1.29 mono-bank articles to it. Both the first and second quartile of the distribution are equal to 1, which indicates that most of the action takes place on the extensive margin. The average length of a mono-bank articles is 814 words. Last, mono-bank articles represent 46.1% of the articles in our sample, and account for 65% of the total text of all earnings-related news.

2.1.2. MEDIA COVERAGE OF THE EUROZONE SOVEREIGN DEBT CRISIS (ESDC)

For the analysis of the news coverage of the ESDC we use data collected by a group of international media scholars led by Robert Picard (2015), who hand-coded a large number of articles published on various prominent European newspapers around key events of the crisis. We focus on eight such events, occurred between 2011 and 2012, two years for which we have comprehensive data on banks' exposure to sovereign bonds (see section 2.3). A description of the relevant events is provided in Appendix Table A3. The data cover all articles published in the 10 to 14 days after each event. We focus on 23 newspapers (listed in Appendix Table A4) from France, Germany, Italy, Netherlands, Poland, Spain and the UK, for which we also have data on lending connections from Orbis. Overall, our sample

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[9] For example, we tried applying the Factiva built-in filters to select a specific topic, but this resulted in too many articles, including many relevant ones, being dropped. We also tried applying alternative machine-learning topic-selection models but all performed worst than the BERT.

[10] We exclude all newspaper*bank pairs for which the newspaper never writes about the bank's earnings announcements at any point in our sample period.

includes 4,622 articles. For each article, the data report a series of qualitative variables about the content which were hand-coded by the researchers based on a questionnaire. Our analysis focuses on certain dimensions of news content that most clearly relate to the activity, responsibilities, and interests of connected banks. Specifically, we look at the following three questions:

1. *What does the article indicate is the main fundamental root or cause of the crisis?*

2. *Who does the article indicate should bear the main responsibility to solve the problem?*

3. *What does the article indicate should be the main (short-term) response to the crisis?*

For questions 1 and 2, we classify each article according to whether it mentions "Banks" as root of the crisis or responsible for its solution, respectively.[11] For question 3, we classify each article according to whether it mentions as (short-term) response to the crisis "Abatement of existing loan provisions (extension, reduced rates, haircut)".[12] We collapse the article data by newspaper*period, and use them to construct various measures of news coverage (summary statistics are in Table 2). First, we create three dummy variables equal to 1 if a newspaper in a given period publishes at least one article containing an answer of interest to each of the three questions mentioned above.

In about 50% of the newspaper*period pairs in our sample, at least one article depicts banks as the main root of the crisis. The share is 20% when it comes to indicating that banks should bear the costs of the crisis, and 40% when it comes to supporting some kind of debt restructuring measure. Finally, for each question we also compute the number of relevant articles published by a newspaper in a given period, both in absolute value and as a share of the total articles about the crisis.

2.2. NEWSPAPER-BANK CONNECTIONS

Banks and newspapers can be connected through lending or through shareholding. Though our main focus is on lending connections, we collect information on both types of linkages. Our main source is the Orbis database, available from Bureau Van Dijk.

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[11] Alternative answers to the question on which is the main root of the crisis include: starting conditions and structure of the Euro system; national industrial policies and development; national fiscal and social policies; political roots; Maastricht Treaty; the ECB and general economic roots. Alternative answers to the question on who should be held responsible for the crisis include: countries with or without sovereign debt problems; Eurozone members as a group; the European Union; the ECB; the IMF and/or the World Bank; Other. In both cases, an article may also not provide an answer at all to the question (answer: none).

[12] Other short-term solutions may be indicated as: loans from other countries with or without Troika supervision; ECB loans and bond purchases; fiscal austerity; fiscal stimulus; growth policies; other. The article may also not indicate any short-term solution (none).

For shareholding connections, we download annual data on newspapers' ownership structure for the years between 2009 and 2018. For each newspaper in our sample we construct a yearly ownership tree, following a standard procedure employed, for example, by Cage et al. (2017). In practice, we track the newspaper's shareholding companies, then their respective shareholders, and so on until we encounter a physical person or no further information is available in the database. We define a dummy variable $Shareholder_{b,n,t}$ equal to 1 for any bank b that owns shares of a newspaper n, either directly or indirectly through shareholding companies, at the end of year $t-1$.[13]

To identify lending connections, we rely on information about a newspaper's banker(s) as reported in Orbis.[14] The variable captures the existence of a prominent banking/lending relationship between the media company, or one of its parent companies, and one or more banks.[15] Based on this information, for each newspaper we code a variable $Banker$ which equals 1 for any bank reported as lender of the media company or of any of its majority stakeholders (throughout the entire ownership tree). To further distinguish between direct and indirect connections, we code two additional variables: $Banker(Direct)$, if the bank is lender of the media company itself, and $Banker(Indirect)$ if the connection is through one of its parent companies.

Our data presents two caveats. First, the Orbis database includes information on the existence of the lending relationship but not on the intensity of such relationship. Indeed no data is available about loan size, or about what share of a company's outstanding loans a given bank may account for. Another issue is that the variable is not time-varying, as it refers to the 2018 vintage of the Orbis database, the only one we have access to. Hence, following previous contributions using the same data (see, among others, Ongena et al., 2016), we impute the identity of a newspaper's banker(s) to previous years, under the empirically grounded assumption that lending relationships are sticky and do not vary much over time (Petersen and Rajan, 1995). To the extent that this assumption is likely to generate measurement error, our estimates should be interpreted as a lower bound of the true effect of lending connections on media content. Nevertheless, we try to address this limitation in two ways.

First, we cross-validate the information from Orbis with older data for 2008 from another widely used dataset, Kompass, which is, in fact, the original source of the bankers' information reported in Orbis. Looking at a subset of five German newspapers for which data are

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[13] Only a couple of banks in our sample directly own shares of newspapers. Hence, we do not further distinguish between direct vs. indirect and/or large vs. small shareholders as this would leave too little variation.

[14] Specifically, we refer to the variable $Advisor$ and we retain only those entries for which the $Advisor\,Type$ is $Banker$.

[15] In 60% of the cases in our sample, only one bank is recorded as $Banker$ of a newspaper, three banks in 30% of the cases and four in 10% of the cases. When also considering indirect banking relations, i.e., through parent company, the percentage of newspapers with just one lending relationship goes down to 40%

available in both datasets, we find an almost perfect overlap between the bankers reported in Kompass in 2008 and those reported in Orbis ten years later.

Second, and perhaps more importantly, to confirm that lending connections persist over time, and that imputing them backwards is a reasonable approach, we compare the information reported in Orbis for 2008 with data on actual (syndicated) loans available from the Thomson Reuters Dealscan database for previous years. In Dealscan we find information for a subset of 14 newspapers from France, Germany, Spain and UK borrowing in the syndicated loan market between 2000 to 2014. For nearly all newspapers, we focus on loans issued prior to 2009, so as to map connections existing prior to our sample period for the analysis of earning announcements.[16] The results of the validation exercise, reported in Appendix Table A5, are very reassuring. For the 14 papers in the sample, we identify 48 lending connections in Orbis, 27 of which are direct. We find that 81% of the direct connections are confirmed in the Dealscan data for the pre-2009 period. Furthermore, in most cases, direct bankers appear in the loan syndicate with a leading role such as book-runner, mandated lead arranger or mandated arranger, which confirms the importance of their connection to the media company. The results for indirect lending connections, reported in the same table, are very similar.

Overall, these findings alleviate the possible concerns related to our approach. To further reassure that our findings are not driven by connections that were imputed backwards, for both the analysis of banks' earnings announcements and of the Eurobond crisis we also test that our results are robust to restricting the sample to newspapers whose connections are validated with the Dealscan data. Summary statistics for the all the connections variables are reported in Table 1.

2.3. BALANCE SHEET DATA FOR NEWSPAPER AND BANKS

We collect yearly balance sheet data for the newspapers in our sample from Orbis. In particular, we collect information on newspapers' own capital, defined as shareholder funds as a share of total assets. The summary statistics, reported in Table 1, depicts a large degree of heterogeneity across newspapers. Indeed, while the average capital ratio is close to 40%, some newspapers display negative values - i.e., total liabilities exceed total assets - which reflects a situation of severe financial distress and low profitability.

We also collect information on banks' balance sheet variables from various sources. First, we get data on bank (Tier-1) capital ratio and loan losses provisions (rescaled by total assets) and on log assets size from Fitch Connect. The information on earnings reports is, instead, from Thomson Reuters I/B/E/S (summary statistics in Table 1). One important point concerns the relative frequency of positive vs. negative earning results. Indeed, in the banking sector

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[16] The only exception is the Spanish newspaper *ABC* for which Dealscan reports one loan in 2014.

profits appear to be much more frequent than losses which are reported in only 13% of the cases in our sample and which, as a consequence, are arguably more newsworthy events.

For the analysis of the ESDC we are interested in measuring the exposure of connected banks to stressed sovereign bonds, i.e. bonds issued by the governments of Greece, Ireland, Italy, Portugal and Spain (GIIPS hereafter). To this end, we use public data available from the European Banking Authority (EBA), specifically those from the 2011 Stress Tests and the 2012 Capital Exercise.[17] For each newspaper in each period we compute the variable *GIIPS* as the average exposure of all its direct lenders to GIIPS' sovereign bonds as per the year before (as a share of total assets). This measure is meant to capture how, on average, the direct lenders of a newspaper are exposed to risky sovereign bonds. Presumably, larger exposure to stressed sovereign bonds implies greater banks' discontent with a news-coverage of the crisis hostile to the banking sector and, more importantly, calling for debt restructuring measures which would entail losses proportional to the exposure itself.[18] Summary statistics for these variables are reported in Table 2. On average, newspapers' lenders invest 6% of their assets in GIIPS bonds. This is a relatively large number, corresponding to roughly 60% of the mean bank Tier-1 capital. There is also substantial heterogeneity across newspapers; for instance, a one interquartile variation in exposure to GIIPS bonds equals 7 p.p., or, in other terms, 70% of the average bank Tier-1 capital. Finally, we also collect (again from EBA publicly available information) data on the average size and Tier-1 capital ratio of all direct lenders, which we use as control.

3. LENDING CONNECTIONS AND NEWS COVERAGE OF EARNINGS ANNOUNCEMENTS

In this section we test to what extent bank-media lending connections influence news coverage of banks' quarterly earnings announcements. We first illustrate our empirical strategy, then describe our baseline findings and a battery of robustness tests. Exploiting heterogeneity across both newspapers and banks, we then try to shed light on the possible mechanisms at work. Finally, we explore how biased coverage may affect banks' stock returns in the aftermath of earnings announcements.

3.1. EMPIRICAL STRATEGY

We start by looking at the extensive margin of news coverage, that is how lending connections affect whether a certain newspaper reports at all about a bank's earning announcement depending on whether it records a profit or a loss. The following equation summarizes our

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[17] These data can be accessed at the website: https://eba.europa.eu/risk-analysis-and-data.

[18] We use lagged exposure to GIIPS bonds because, ideally, we are interested in gauging the stakes of connected banks before newspapers start writing about the crisis. As a consequence, since data on banks' exposure to sovereign bond are not available for 2009, we cannot use the data on news coverage of the ESDC for 2010.

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empirical strategy:

$$Any\_article_{n,b,yq} = \beta_1 Gain_{b,yq} + \beta_2 Banker_{n,b,yq} + \beta_3 Gain_{b,yq} * Banker_{n,b,yq} + FE + X_{n,b,yq} + \varepsilon_{n,b,yq}$$

(1)

$Any\_article_{n,b,yq}$ is a dummy variable for whether newspaper n publishes at least one article about the earning announcement issued by bank b in year-quarter yq. In our baseline analysis we focus on mono-bank articles, though we show results with multi-banks articles as well. On the right-hand-side, $Gain_{b,yq}$ is a dummy variable for whether bank b announces positive profits in year-quarter yq, $Banker_{n,b,yq}$ captures whether bank b and newspaper n are connected through lending, and $Gain_{b,yq} * Banker_{n,b,yq}$ is the interaction of the two. We progressively saturate the model with a vector of fixed effects FE. In the most demanding specification this vector includes: i) *Newspaper*Bank fixed effects*, which capture all observable and unobservable time-invariant characteristics of the relationship between a newspaper and a bank; ii) *Bank*year-quarter fixed effects*, which absorbs any idiosyncratic factors that may generally affect the news coverage of a given bank in a given period; iii) *Newspaper*Bank-Country*year-quarter fixed effects*, which captures the fact that a given newspaper in a given period may decide to cover more banks from a given country.[19] To control flexibly for the effect of ownership relations on content, in all specifications we also include the vector $X_{n,b,yq}$ which represents the interaction between the variables $Shareholder_{n,b,yq}$ and $Gain_{b,yq}$. Finally, $\varepsilon_{n,b,yq}$ is an error term.

The main coefficient of interest is β_3 which captures the degree to which a newspaper covers its lenders more, relatively to other banks, when they report profits than when they report losses. Hence, a positive value of β_3 indicates the existence of a pro-lender bias through selective reporting.

We then consider the intensive margin of news coverage using an analogous specification but restricting the focus to newspaper*bank*year-quarter combinations with at least one article. This restriction reduces the sample size considerably, from roughly 19,000 observations to 3,000. In light of this, and in order to preserve estimates' power while granting reasonable identification, we employ a somewhat less demanding set of fixed effects which includes: *Newspaper*year-quarter*, *Bank*year-quarter*, and *Same-Country*year-quarter*Gain* fixed effects. The first two sets of fixed effects capture time-varying bank- and newspaper-specific shocks in news coverage of earning reports (e.g., if in a given quarter the performance of a

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[19] For example, around the time of the Brexit referendum the situation of UK banks may have attracted more interest from all or some newspapers. Similarly, in the key moments of the Eurobond crisis, press coverage of Spanish or Italian banks may have increased. Crucially, our granular fixed effects also control for the possibility that a country's banks may become more newsworthy for some newspapers - e.g. Italian papers, or financial newspapers - than for others.

bank attracts more attention by all newspapers, or if a given newspaper covers the earning reports of all banks more extensively). Finally, the third set of fixed effects controls for the possibility that home-bias in news coverage of earning announcements varies over time or depending on banks' performance (e.g., if Spanish papers tend to cover Spanish banks more than other banks in a given quarter or when the banks report profits).

For the dependent variable we use different measures of the intensity of news coverage including the (log) number of articles and the (log) total length of articles. Regarding standard errors, we cluster them by newspaper*bank, since our identification exploits variation over time at this level. This choice is also motivated by the fact that, since our sample includes 36 banks and 20 newspapers, clustering by bank or newspaper would result in too few clusters (Cameron and Miller, 2015). In any case, in what follows we also show that our findings are robust to alternative clustering choices.

3.2. BASELINE RESULTS

3.2.1. EXTENSIVE MARGIN

We first look at the extensive margin of news coverage, focusing, in particular, on the occurrence of mono-bank articles, i.e., those entirely devoted to discussing a bank and its quarterly performance.

Figure 2 plots the average probability that a newspaper publishes at least one mono-bank article about an earning announcement (with the corresponding 5% confidence interval) separately for its lenders vs. for other banks, and in case of profits vs. in case of losses. In the left panel we consider all banks and newspapers from any country in our sample. Two patterns emerge: first, newspapers are generally more likely to cover their lenders than other banks (13.72% vs. 47.47%); second, while they are more likely to report about non-connected banks when they announce losses, they devote more coverage to lenders in case of profits. In both cases the difference is statistically significant at the 5% level.

One important aspect that may partly explain this pattern is that, except for a few cases, most newspapers in our samples tend to lend from banks from the same country. Hence, the differential coverage of lenders may simply reflect a stronger focus on domestic banks than on foreign ones (i.e., home bias), which, however, would apply to positive results but not to negative ones. To mitigate this concern, in the right panel of Figure 2 we replicate the same exercise only for bank-newspaper pairs from the same country. While the difference in the unconditional probability of covering lenders vs. other banks disappears, the differential treatment of lenders in case of profits vs. losses is even starker. Indeed, while the average probability that a loss is reported is 40% for both lenders and unconnected banks from the same country, the probability that a profit gets covered is 50% for lenders against 30% for

unconnected banks.

To test these patterns more systematically, in Table 3 we estimate various versions of equa-
tion 1. The specification in column 1 includes no fixed effects. In column 2 we include
bank, newspaper, and year-quarter fixed effects, and in column 3 bank*year-quarter and
newspaper*year-quarter fixed effects. To account for home bias, in column 4 we include a
same-country dummy, which equals one for all newspaper-bank pairs from the same country.
When doing so, the baseline coefficient on banker becomes small and insignificant, which
indicates that losses by connected banks (within the same country) are not more likely to
get covered than those by unconnected banks.[20] Yet, the coefficient on the interaction term
Gain ∗ Banker remains positive and very stable around 10%, confirming a strong tendency
of newspapers to report good news for their lenders disproportionately. Crucially, the coef-
ficient is not only statistically significant, but also reflects an economically sizable impact
of lending connections on the probability that positive earning announcement are featured in
the news. Indeed, a 10 percentage points increase in the likelihood that a profit gets covered
by a newspaper represents a 60% increase relative to any other bank, and a 25% increase
relative to other banks of the same country.[21]

In column 8 we explore whether the effect is driven by direct lending connections (i.e.,
between the bank and the newspaper company) or indirect ones (i.e., between the bank and
the newspaper's parent companies). We find that only the interaction *Banker(Direct) ∗ Gain*
displays a positive, significant and sizeable coefficient, which supports the hypothesis that
pro-lender bias may only result from strong connections, not indirect ones.

Finally, we find no evidence that ownership connections affects news coverage of earning
announcements. Indeed, once home bias is controlled for (columns 4-8), the coefficient
on the dummy *Shareholder* becomes very small and statistically insignificant. This result
may be due to the broad criterion we use to define the shareholder variable, which captures
any link of the bank with the media company or its group. However, using a more restrictive
definition of shareholder would further reduce the relevant variation, which is already limited
given that very few banks appear to be involved in ownership of media companies in the

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[20] Note that, when controlling for newspaper*bank fixed effects and for newspaper*time and bank*time fixed
effects (column 5), the coefficient on *Banker* turns negative, and even becomes statistically significant in
column 7, in the most saturated version of the model. In principle, this result - that newspapers are less likely
to cover losses of connected banks relative to other banks - provides further support for the media capture
hypothesis. That said, we prefer not to put too much emphasis on this finding since, once we control for
newspaper*bank fixed effects, the coefficient is only identified out of variation over time within newspaper-
bank pairs connected through lending, which is very limited. Indeed, data on lending connections are static so
that, for the same newspaper-bank pair, the variable *Banker* only varies due to changes in the identity of the
newspaper' majority owners which can lead to a change in the newspaper's indirect lenders. Such changes,
however, are rare in our sample.

[21] In the summary statistics in Table 1, we just report unconditional distributions. Conditional summary statistics
are available upon request.

countries we study.

3.2.2. ROBUSTNESS

To verify the robustness of the findings presented so far we perform a series of additional tests.

First, we address the possibility that our results may be driven by selection on unobservables. In this regard, we notice that our coefficient of interest in Table 3 is remarkably stable despite the R-squared increasing sharply as more controls are added, i.e., from 8.1% in column 1 to 61.1% in column 7. In line with Altonji et al. (2005), this suggests that it is unlikely that our estimates are driven by selection on unobservables. To test this argument more formally, we perform the test proposed by Oster (2019). Specifically, we estimate the coefficient of proportionality, δ, under both the conventional hypothesis that the maximum R-squared (after controlling for all relevant heterogeneity) is 1.3 times that observed in the baseline regressions, and under the stricter one that it is equal to 1. As shown in Appendix Table A6, in both cases we find that δ is strictly larger than 1, which further confirms that selection on unobservable is not a major concern.

Next, we address the potential concerns associated with imputing lending connections from 2018 backwards, discussed in section 2.2. To do so, we re-estimate our baseline regressions on the subsample of 14 papers for which information on syndicated loans for previous years is available from Dealscan. The results are presented in Table 4. In the first two columns we use the information on lending connections from Orbis, whereas in the following two we only consider lending connections validated in both datasets. Although the number of observations shrinks considerably relative to the baseline sample used in Table 3, the coefficients of interest remain largely unchanged.

To further confirm that the effect we find is driven by lending connections and not by other confounds, we perform a placebo test. Specifically, we randomly assign a number of fictitious lending connections, with the same distribution as that observed in our data,[22] to newspaper/bank pairs that are, in reality, unconnected. We then estimate our most demanding specification either using fictitious connections as the regressor of interest, or horse-racing real connections against fictitious ones. The purpose of the test is two-fold: i) assess whether fictitious connections have a significant impact on news coverage, ii) test to what extent the effect of real lending connections is robust to controlling for fictitious ones. We repeat the procedure 10,000 times and save the point estimates of interest for the *Banker* * *Gain* interaction and the corresponding t-stats which we plot in Figures 3 and 4. In Figure 3, we see

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[22] Specifically, we target the first and second moment of the distribution of the variable Banker, summarized in Table 1.

that the coefficients for the fictitious connections are centered around 0 and tend to have a very low t-stat, and that the true coefficient (i.e. from column 7 of Table 3) clearly represents an outlier in terms of both magnitude and significance. Figure 4, which reports the results of the horse-race regressions, shows that the coefficients on fictitious connections are again centered around zero, while those on true connections are centered around our original estimate.

As discussed above, newspapers are much more likely to lend from banks from the same country and to report about these banks than about foreign ones. By including the *Same country* dummy and its interaction with time fixed effects, our baseline specification controls flexibly for "home bias". Yet, another possibility is that the intensity of the home bias may depend on banks' performance. This would be the case, for example, if Spanish newspapers covered Spanish banks more than foreign banks *especially* when they record profits than when they record losses. To control for this possibility, in Table A7 in the Appendix we augment our baseline specification to include the interaction between the dummies *Same country* and *Gain* (column 2). When doing so, our coefficient of interest drops somewhat but still remains significant at the 5% level. In column 3 we include the triple interaction between *Same country*, *Gain* and year-quarter fixed effects, thus also allowing the relationship between home bias and banks' performance to vary over time. The coefficient decreases some more and its significance declines to 10% level. In column 4 we implement the most demanding approach including the quadruple interaction between newspaper fixed effects, country of the bank fixed effects, the *Gain* dummy, and year-quarter fixed effects. In this case, we are allowing each newspaper to have a differential bias towards banks of each country, and this bias also to vary both over time and depending on the banks' result. When doing so the coefficient on *Gain* ∗ *Banker* becomes small and insignificant. However, as shown in column 6-8, even with the more demanding specification the coefficient remains large and significant (5% level) when focusing on direct lending connections, those that were driving the effect in Table 3. These results provide strong reassurance that pro-lender bias is not driven by home bias, or any subtler version of it.

Our main result indicates that newspapers are more likely to cover connected banks relative to others when they experience profits rather than losses. However, earning announcements may include information on other aspects of the bank's situation - e.g., financial variables - which could attract the interest of connected newspapers more than unconnected ones. To confirm that the profit-loss dimension is the most relevant one for pro-lender bias, in Appendix Table A8 we include as additional controls the interaction between the *Banker* dummy and the following variables: i) banks' total assets (in logs), ii) Tier-1 Capital ratio, and iii) loan losses provision (as a share of total assets). The sample size shrinks somewhat

because these variables are not available for some banks in some years. However, the results remain largely unchanged relative to baseline. We also control for whether the analyst median surprise and the annual growth of net income are positive or not. Again the inclusion of these controls does not affect our results.

We then test the robustness of our findings to alternative ways of clustering standard errors. In particular, in Appendix Table A9, we report our results clustering standard errors by bank, bank*time, and implementing two-way clustering at the bank and newspaper level. In all cases, the significance of the coefficients of interest remains largely unchanged.

In Appendix Tables A10, A11 and A12, we check that the results are robust to using alternative measures of news coverage. First, in Table A10, we show results using as outcome variable a dummy for whether a newspaper devotes at least one article of any kind - multi- or mono-bank - to an earning announcement issued by a bank. We find qualitatively similar results, although the size of the effect is smaller. In Table A11 we replicate the analysis ignoring multi-bank articles, hence comparing only cases in which a newspaper devotes at least one full article to a bank's earning announcement or no article at all. Again, results are qualitatively and quantitatively similar to those in Table 3. In Table A12, we consider articles published in different time windows after an announcement, i.e., from 1 to 7 days after (always including the day of the announcement). Considering longer periods does not affect the results, arguably because most articles on earning announcements are published in the immediate vicinity of the event.

Finally, we confirm that our results are not driven by outliers. In Appendix Figures 1 and 2 we plot the coefficients of our baseline regression excluding one newspaper at the time and one bank at the time respectively. In both cases, the coefficient of interest remains largely unchanged relative to the regression with the full sample.[23] Moreover, we verify in Appendix Table A13 that our results are not sensitive to the exclusion of tabloids,[24] which is comforting since these outlets are generally not focused on financial news.

3.2.3. INTENSIVE MARGIN

We then analyse whether pro-lender bias operates on the intensive margin, that is how extensively newspapers cover connected banks' earning announcements, relative to other banks', when they do. Hence, we restrict the analysis to those observations for which at least one mono-bank article was published.

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[23] Excluding individual newspaper*bank pairs does also not impact the coefficient of interest; indeed, such exclusion reduces the sample even less than dropping all pairs including a bank or a newspaper. The results, not shown, are available upon request.

[24] Namely, the tabloids in our sample of newspapers are: Bild, Daily Mail, Daily Mirror, Daily Star and The Sun.

The left panel of Figure 5 reports the average (log) number of mono-bank articles devoted respectively to connected and unconnected banks separately for reports announcing profits and losses. The right panel reports, instead, the average (log) length of the articles. The graphs indicate that newspapers tend to devote more and longer articles to the losses of banks with which they have no lending connections than to their profits, while the opposite holds for their lenders.

We then examine whether newspapers favor their lenders by placing information about their results strategically. For example, a newspaper may devote an entire article to a positive earning announcement by their lender, but report news about negative earnings in articles which also discuss the situation of other companies, so as to make it less prominent and salient. To this end, in Figure 6, we plot the share of mono-bank articles over total articles separately for profits vs. losses and for lenders vs. other banks. In the right panel we do the same for the length of mono-bank articles as a share of the length of all articles. The graph indicates that, conditional on covering an earnings announcement, newspapers are significantly more likely to devote a full article to non-connected banks in case of a loss than in case of a profit. The same however, does not apply to their lenders, for which the difference is insignificant and, if anything, goes in the opposite way.

To further test this hypothesis, in Table 5 we estimate our baseline specification including the set of fixed effects described in section 3.1. We find that that, as for the extensive margin, the effect is driven by direct lending connections between newspapers and banks. The effect is again sizable: the number of mono-bank articles devoted by newspapers to banks' profits - relative to losses - is 29 p.p. higher for direct lenders than for other banks. The difference is even larger, close to 48 p.p., when considering the length of mono-bank articles. Similar results emerge when looking at the strategic placement of news: the difference between the share of mono-bank articles (mono-bank text) devoted to gains as opposed to losses is 21 (12) p.p. larger for direct bankers than for other banks.

Finally, in Appendix Table A14 we report, for each of the intensive margin outcome variables, a table with increasingly saturated specifications, and find that all coefficients of interest remain quite stable across them.

3.3. HETEROGENEITY

To shed light on the possible mechanism behind the results described above, we examine how the effect of lending connections on content varies for different types of newspapers and banks.

First, we consider the difference between general-interest newspapers, on the one hand, and

financial and business-oriented ones, on the other hand.[25] Newspapers in the first group include, among others, *The Guardian*, *Le Figaro*, *El Mundo*, and *Sueddeutsche Zeitung*, while the second group includes the *Financial Times*, *Les Echos*, *El Economista*, *Expansión* and *Handelsblatt*. In Table 6, we estimate our baseline regressions for all newspapers and then separately for general-interest and financial newspapers. In Panel A we look at the extensive margin, while in Panels B and C we focus on the intensive margin, specifically on the number and length of the mono-bank articles, respectively.

The results clearly indicate that, for the extensive margin, the effect is primarily driven by general-interest newspapers which display a larger and very significant effect. The coefficient of interest is still positive but smaller and imprecisely estimated for financial newspapers. One interpretation is that general-interest newspapers - which are less focused on financial issues and firms' performance - may have more discretion then financial newspapers when deciding what events and what banks to cover, and may use this discretion to favor their lenders. Given their specialization and target audience, financial newspapers may have less of a choice as to *whether* to report about earning announcements. They would, nonetheless, have some discretion as to how much space and prominence to give them. This conjecture is confirmed by the results in Panels B and C which show that, on the intensive margin, the effect is mainly driven by financial newspapers while the estimated coefficient for general-interest newspapers, though still positive, is much smaller and statistically insignificant.[26] These findings are interesting in that they suggest that the form that pro-lender bias takes depends on the specific incentives and constraints faced by each media outlet.

We then examine how pro-lender bias depends on the financial situation of both newspapers and banks. Two questions are relevant in this regard. The first is whether newspapers in financial distress are more vulnerable to the pressures of their lenders.[27] The second is whether banks that face financial difficulties are more likely to pressure connected media so as to minimize news coverage of their losses.

We first test whether pro-lenders bias is more pronounced for highly leveraged newspapers. To this end, in the first two columns of Table 7, we augment our baseline specifications to include an interaction between our regressor of interest, *Gain* ∗ *Banker*, and a measure of newspaper's capitalization given by the (standardized) ratio between shareholders' funds

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[25] Previous findings on the influence of advertisers on news content (Reuter and Zitzewitz, 2006) suggest that more specialized outlets may be more vulnerable to outside pressures than general-interest ones. However, in that case, the relevant comparison group was personal finance publications.

[26] In Appendix Table A15 we repeat the same exercise with the share of mono-bank articles and the share of mono-bank text as dependent variables (Panel A and B, respectively). For the former, there is no statistical difference between pro-lender bias across the two groups of newspapers, as both contribute similarly to it. For the latter, we find again that financial newspapers drive the results.

[27] This hypothesis is consistent with evidence from Nini et al. (2012) that creditors pro-actively influence the corporate governance of borrowing companies in financial distress.

and total assets. The coefficient on the interaction is positive and significant which indicates that newspapers that are more financially solid and less dependent on creditors are less likely to slant content in their favor. Once again, the effect is stronger for direct lending relationships which have a large influence on the extent of pro-lender bias. Looking at the results for direct lending (column 2), the bias amounts to 12.1 p.p. for a newspaper with average capitalization, and up to 20.7 p.p. for newspapers with own capital one standard-deviation below average.

In the next two columns, we look at how bank's financial situation affects our baseline effect. We replicate the same analysis as in columns 1 and 2 but interacting $Gain * Banker$ with bank's capitalization proxied by the lagged annual Tier-1 capital ratio (which we standardize to favor the comparison with the results for newspapers capitalization). The negative coefficient on the interaction term indicates that newspapers are less likely to bias content in favor of connected banks that are more financially solid, though the effect is only statistically significant for direct lending connections. The effect is again sizable: while bias in favor of a bank with average capitalization is 11.4 p.p., it almost doubles when banks' capitalization decreases by one standard deviation. One interpretation is that for poorly capitalized banks even temporary losses - and the news coverage they attract - may represent a serious concern since their loss-absorbing capacity is lower. As a consequence, these banks would have a bigger incentive to use their connections to minimize detrimental coverage.

3.4. COVERAGE OF EARNINGS ANNOUNCEMENTS AND BANKS' STOCK RETURNS

To conclude our analysis of earnings announcements, we investigate whether news coverage of these events has tangible consequences on banks' market value as reflected in their stock prices.

Specifically, we look at how stock returns evolve in the days after an earning announcement is issued depending on how much coverage it received. We estimate the following empirical model:

$$\Delta Log\ Price_{b,t+h} = \beta_{1,h} Gain_{b,yq} + \beta_{2,h} Coverage_{b,yq} + \beta_{3,h} Gain_{b,yq} * Coverage_{b,yq} + \mu_{b,h} + \mu_{yq,h} + X_{b,yq} + \varepsilon_{b,t+h} \tag{2}$$

The outcome variable, $\Delta LogPrice_{b,t+h}$, measures the percent variation in the cumulative stock price of bank b in the h days following the earning announcement issued on day t, with h between 1 an 5.[28] $Coverage_{b,yq}$ represents the total number of articles published on

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[28] Earnings announcements are issued when markets are closed. Hence, they cannot affect stock prices on the same day they are issued, but only in the following days.

any newspaper about the earning announcement issued by bank b in the year-quarter yq, and $Gain_{b,yq} * Coverage_{b,yq}$ its interaction with a dummy for whether the bank announced a profit. Hence, $\beta_{3,h}$ captures the effect of more extensive coverage of a bank's positive earnings announcement (compared to one that reports losses) on its cumulative h-day stock return.

We also include a vector of bank-level controls ($X_{b,yq}$) which includes the Tier-1 ratio, size and loan losses provisions, and other relevant information about the earnings announcement, including a dummy for whether net income year-over-year growth is positive, and one for whether it beats the median analysts' expectations. All bank controls are interacted with the variable $Coverage_{b,yq}$. All regressions also include bank fixed effects ($\mu_{b,h}$), and year-quarter fixed effects ($\mu_{yq,h}$). Finally, we cluster standard errors by bank-country times year-quarter. This insures we have a sufficient number of clusters (i.e., 236) and allows for arbitrary correlation for banks of the same country in the same quarter.[29]

One possibility, discussed above, is that news about earnings reports may have a larger effect on the evaluation of banks that are less financially solid, which would explain why they have a higher incentive to capture connected media. To explore this aspect, in an augmented version of equation 2, we include a triple interaction between news coverage, the profit dummy, and a proxy for bank capitalization. Specifically, we code a dummy for whether the bank Tier-1 ratio is below the median value in the sample (*Low Capital*$_{b,yq}$).[30]

Results are reported in Table 8. We find that, on average, news coverage of earnings reports does not have a significant effect on banks' stock return in the days immediately after the announcement, both in the case of profits and losses. Interestingly, however, banks with lower capitalization (below-median Tier 1 ratio) appear to benefit significantly from the coverage of their profits. The effect is statistically significant and tends to persist for up to three days after the announcement. The magnitude of the effect is also meaningful. Following a positive earnings announcement, a one-standard deviation increase in news coverage of the results boosts stock returns of low capitalized banks by 1.46 p.p., on the first day, and by 1.95 p.p. on the third day, when the effect reaches its peak. These effects correspond to 54% and 49% of the standard deviation of stock returns in the respective trading days.[31]

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[29] We alternatively implement a two-way clustering by bank and year-quarter and obtain similar results. However, in this case, the number of resulting clusters (27) is lower than the conventional threshold (Cameron and Miller, 2015).

[30] In this case we further interact *Low Capital*$_{b,yq}$ with the full vector of bank-level controls ($X_{b,yq}$).

[31] The summary statistics for the variables used in this exercise are reported in Appendix Table A16.

4. LENDING CONNECTIONS AND NEWS COVERAGE OF THE EUROBOND CRISIS

We then examine how bank-newspaper lending connections affect news coverage of a public interest issue such as the Eurozone Sovereign Debt Crisis (ESDC). We first describe the empirical strategy and then discuss the results.

4.1. EMPIRICAL STRATEGY

We look at news coverage around eight salient events of the crisis occurred in 2011 and 2012 (see Appendix Table A3 for details). Unlike for the analysis of earnings announcements, the unit of interest in this case is not a newspaper-bank pair but a newspaper since news coverage of the crisis is not bank-specific.

Hence, we exploit differences in news coverage between newspapers, indexed by n, around different events, indexed by t. The following equations summarizes our econometric strategy:

$$Y_{n,t} = \beta_1 GIIPS_{n,t-1} + \gamma X_{n,t-1} + \mu_{n(country),t} + \varepsilon_{n,t} \tag{3}$$

$Y_{n,t}$ is one of the measures of news coverage of the crisis by newspaper n in period t. For the extensive margin analysis, we construct three dummy variables equal to 1 if a newspaper in a given period publishes at least one article satisfying one of these conditions: i) supporting sovereign debt haircut as a solution to the crisis (*Solution=Haircut*, ii) mentioning banks as the institutions that should bear the cost of the crisis (*Bear=Banks*), and iii) mentioning banks as the root of the crisis (*Root=Banks*). For the intensive margin analysis, instead, we consider the (log of the) total number of articles satisfying each condition, as well as their share of all articles on the crisis published by the same newspaper in the same period.

The main regressor of interest is $GIIPS_{n,t-1}$ which represents the average (1-year lagged) exposure to sovereign bonds issued by GIIPS countries across all the banks connected to newspaper through direct lending relationships. Hence, the coefficient β captures the extent to which a newspaper promotes a narrative of the crisis that serves the interests of its lenders, and opposes debt-restructuring measures detrimental to them.

Our baseline specification also includes $X_{n,t-1}$, the average Tier-1 capital ratio at time t of all the banks connected to newspaper n, which controls for their size and capitalization. Also, and most crucially, it includes a vector of newspaper country*period fixed effects, which capture the average news coverage of the crisis of all newspapers in a given country at a given time. Hence, the identification of the effect is based on comparing the coverage of the crisis of different newspapers *in the same country*, whose lenders are more or less exposed to GIIPS bonds. This allows to control not only for the fact that media in certain countries

may be generally more or less supportive of debt-restructuring measures (e.g., Germany vs. Italy), but also for the possibility that these attitudes may change over time. Finally, we double-cluster standard errors by newspaper and period.

4.2. RESULTS

We present the results of the analysis in Table 9. For each of three dimensions of content we report a regression using each of the three outcome variables: dummy for any article (columns 1, 4, 7), number of articles (columns 2, 5, 8), and the share of articles over total articles on the crisis (columns 3, 6, 9).

In the first three columns we explore whether newspapers connected to banks more exposed to GIIPS bonds are less likely than other newspapers to state that banks should bear the cost of the crisis. While two of the three coefficients have the expected sign, all three are highly insignificant. A different pictures emerges when looking at whether newspapers mention banks as one of the roots of the crisis. In this case, all coefficients are negative and statistically significant, at the 5% or 10% level. This indicates that pro-lender bias affects the way newspapers depict the causes of the crisis to their readers. The effect is sizable: a one-standard-deviation increase in GIIPS exposure of connected banks reduces the probability of publishing at least one article presenting banks as the main cause of the crisis by 17 percentage points (i.e., a 85% increase relative to the unconditional mean), and reduces the number of such articles by 35 percentage points.

Crucially, higher exposure of lenders to stressed sovereign bonds also affects the way newspapers talk about the possible solutions to the crisis. Indeed, in columns 7 to 9, the variable GIIPS significantly reduces the probability that a newspaper publishes at least one articles supporting debt restructuring measures, such as haircut, which would result in losses for exposed lenders. Again, the effect is economically significant. Increasing GIIPS-exposure by one standard deviation (i.e., 5 p.p.) leads to a 12.5 p.p. decline in the likelihood of publishing an article endorsing a haircut (a 33% increase relative to baseline), and to a decline of 37 p.p. in the number of such articles.

As for earnings announcements, we verify that these results do not depend on lending relations being imputed backwards. To this end, in Appendix Table A17 we restrict our focus to newspaper-bank connections validated with data on pre-existing syndicated loans recorded on Dealscan. Although this choice reduces the sample considerably, the results on the extensive margin for both the roots and solutions to the crisis continue to be significant, as well as

the result on the share of total articles for the latter.[32]

5. CONCLUSIONS

We investigate empirically to what extent lending relationships between banks and media companies influence news coverage of financial issues. Looking at several European countries, we first map lending connections between banks and the main national newspapers. We then test whether newspapers bias content in favor of their lenders by looking at how they cover two set of issues: banks' earning announcements and the Eurobond Sovereign Debt crisis.

The first analysis reveals that newspapers tend to cover earning announcements by their lenders more, relative to those by other banks, in case of profits than in case of losses. Pro-lender bias through selective coverage is sizeable and applies to both general-interest and financial news-papers, though it operates on the extensive margin, for the former, and on the intensive margin, for the latter. Moreover, pro-lender bias is relatively stronger among newspapers in financial distress, which are more dependent on their creditors. It also operates more markedly in favor of banks with lower capitalization, which, given their minor loss-absorbing capacity, have greater incentives to avoid an extensive coverage of their losses.

Bank-media connections also appear to shape the way newspapers report about more general public-interest issues like the Eurobond crisis. In this regard, our findings indicate that newspapers connected to banks more heavily exposed to stressed sovereign bonds were less likely to promote a narrative of the crisis critical of banks and to endorse debt-restructuring measures potentially costly to creditors.

Taken together, our results provide the first systematic evidence that links between media companies and the banking sector through credit can have a first-order effect on news content, and threaten media editorial independence when it comes to reporting on financial issues. As our findings indicate, the connections with banks do not merely affect the way newspapers report about bank-specific events, but can have broader ramifications for the public debate on more general and policy-relevant issues. Future research should shed light on the implications of this process for the formation of public opinion and, ultimately, for policy-making.

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[32] The coefficient for GIIPS in the regression on the total log number of articles for debt restructuring remains unchanged compared to the regression with the full sample, though precision is very much affected arguably due to the loss of power associated with the drop in sample size.

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FIGURE 1: NEWSPAPERS MEDIAN CAPITALIZATION AND PROFITABILITY
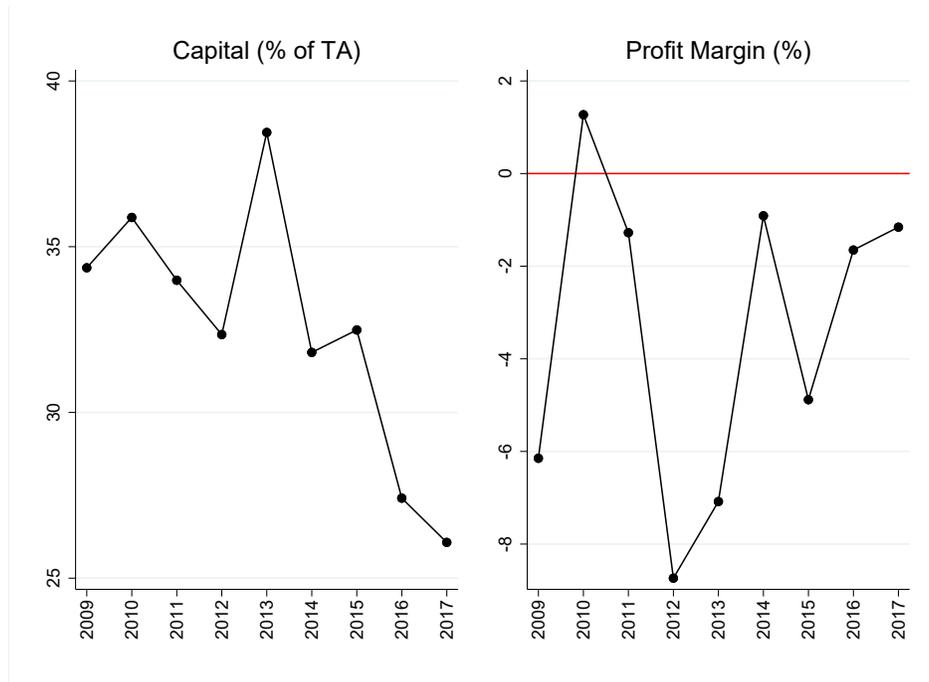
This chart depicts the trend for the median value of capitalization and profitability across top-newspapers from France, Germany, Italy, Spain and the UK from 2009 to 2017. Capital is defined as shareholders funds over total assets. Profit Margin is computed as profits before taxes over operating revenue. Both variables are expressed in percentage terms. Source: our computations on Amadeus firm-level data.
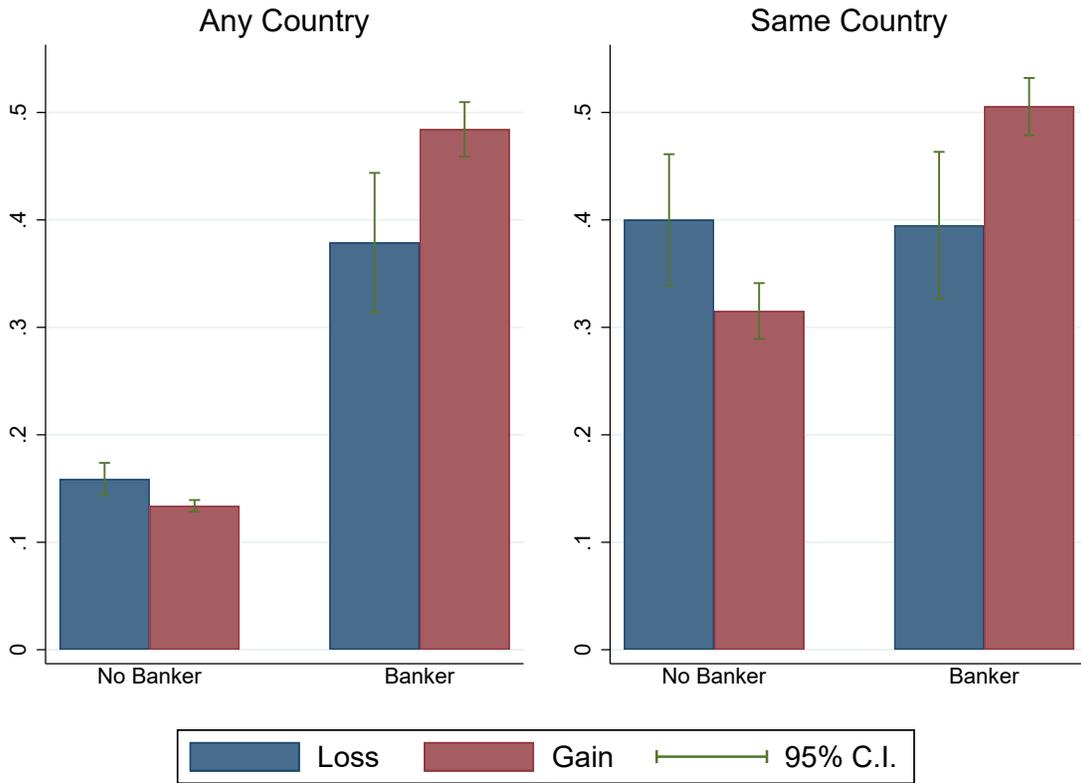
This chart reports the average of the variable $1(\geq 1$ mono-bank article), conditional on whether a paper*bank couple is linked by a Banker connection and on whether the bank discloses a gain or a loss in its quarterly earning announcement. In the left hand side panel, all paper*bank couples in our sample our considered. In the right hand side panel, we just include paper*bank couples from the same country.

FIGURE 3: COEFFICIENTS AND T-STATS FROM PLACEBO TEST
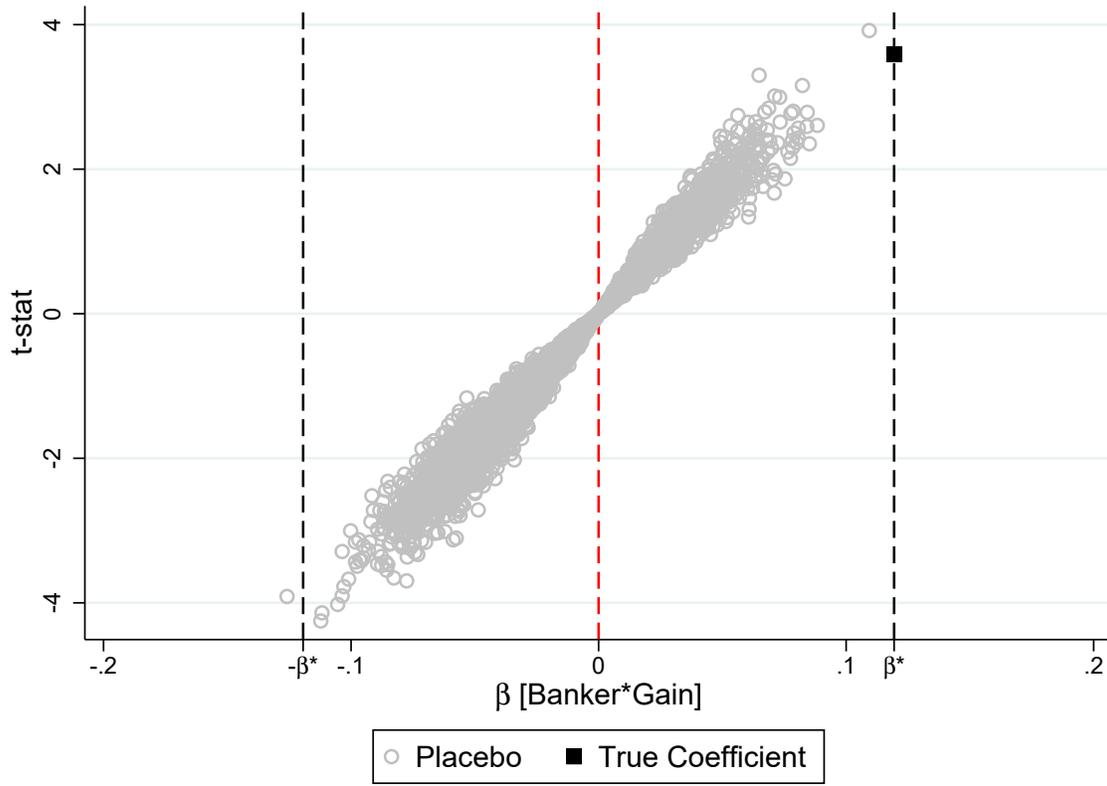
This chart plots the coefficients (on the x-axis) and t-stats (on the y-axis) from a placebo test where we run 10,000 regressions of $1(\geq 1$ mono-bank article) against a fictitious, randomly generated Banker variable, fully interacted with the Gain dummy. The model is further augmented with the full interaction of the true Shareholder dummy variable with Gain and with paper*bank, paper*bank(country)*time and bank*time fixed effects. Note: $\beta^{\star}$ is the value of the coefficient for Banker*Gain from our regression in column 7 of Table 3. Standard errors are clustered at the paper*bank level.

kernel = epanechnikov, bandwidth = 0.0040

This chart plots the distribution of coefficients from a placebo test where we run 10,000 regressions of $1(\geq 1$ mono-bank article) against a fictitious, randomly generated Banker variable (fully interacted with the Gain dummy), horse-raced against the true coefficient of interest. The model is further augmented with the full interaction of the true Shareholder dummy variable with Gain and with paper*bank, paper*bank(country)*time and bank*time fixed effects. Note: $\beta^\star$ is the value of the coefficient for Banker*Gain from our regression in column 7 of Table 3. The red and grey line draws, respectively, the kernel density distributions of the horse-raced true and fictitious coefficient for the interaction between Banker and Gain. The blue line draws the distribution of the coefficients for randomly generated interactions from a simple placebo tests where we do not perform the horse-race.

FIGURE 5: AVERAGE NUMBER AND LENGTH OF ARTICLES

Newspapers and Banks from same country
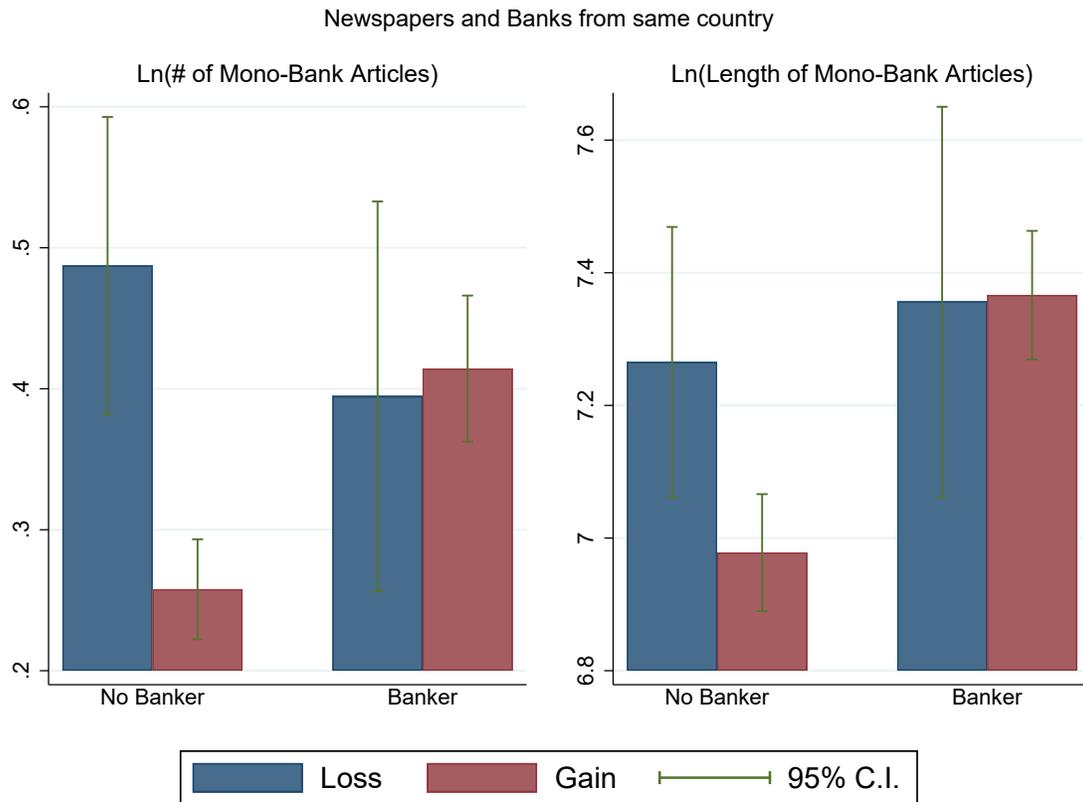
This chart reports the average (log) numbes of mono-bank articles and the average (log) length of mono-bank articles - respectively in the left and right panel - depending on the existence of lending connections and on banks' disclosure of profits or losses in the quarterly announcements. The averages are computed over paper*bank couples from the same country.

FIGURE 6: AVERAGE SHARE OF MONO-BANK ARTICLES AND TEXT

Newspapers and Banks from same country
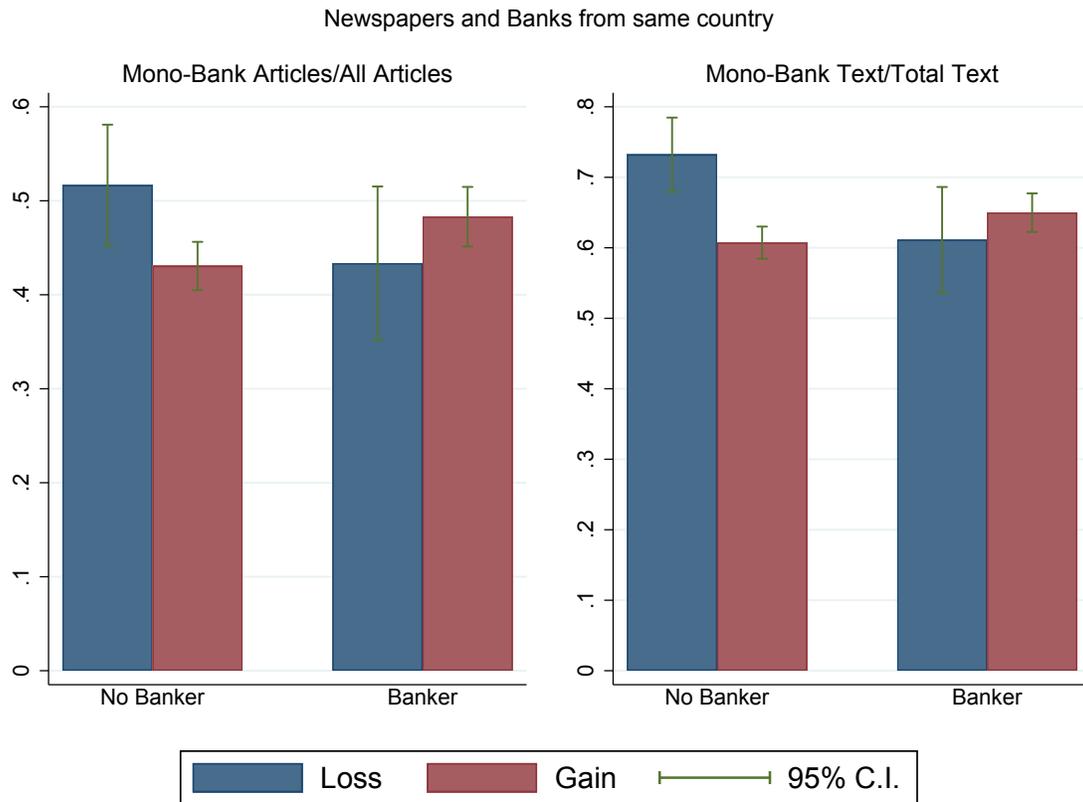
This chart reports the average % of mono-bank articles and the average % of mono-bank text - respectively in the left and right panel - depending on the existence of lending connections and on banks' disclosure of profits or losses in the quarterly announcements. The averages are computed over paper*bank couples from the same country.

TABLES

TABLE 1: SUMMARY STATISTICS - ANALYSIS OF BANKS' EARNINGS REPORTS

	Level	Frequency	N	Mean	p25	p50	p75	St.Dev.
Media Coverage								
1($\geq$ 1 mono-bank article)	Paper-bank	Quarterly	18,960	0.168	0	0	0	0.373
1($\geq$ 1 article)	Paper-bank	Quarterly	18,960	0.277	0	0	1	0.448
Ln(# of mono-bank articles)	Paper-bank	Quarterly	2,857	0.255	0	0	0.693	0.430
Ln(length of mono-bank articles)	Paper-bank	Quarterly	2,857	6.702	5.922	6.802	7.550	1.164
% mono-bank articles	Paper-bank	Quarterly	5,045	0.461	0	0.500	1	0.433
% Length mono-bank articles	Paper-bank	Quarterly	5,045	0.651	0.361	0.773	1	0.381
Paper-Bank Connections								
Banker	Paper-bank	Annual (lagged)	18,960	0.0899	0	0	0	0.286
Banker(Direct)	Paper-bank	Time-invariant	18,960	0.0518	0	0	0	0.222
Banker(Indirect)	Paper-bank	Annual (lagged)	18,960	0.0380	0	0	0	0.191
Shareholder	Paper-bank	Annual (lagged)	18,960	0.159	0	0	0	0.366
Newspapers' Balance sheet								
Capital	Paper	Annual (lagged)	17,361	41.24	16.89	40.87	68.72	33.38
Banks' Balance sheet								
Gain	Bank	Quarterly	18,960	0.869	1	1	1	0.337
Capital	Bank	Annual (lagged)	15,420	12.73	11.1	12.5	14.27	2.70
Size	Bank	Annual (lagged)	15,420	13.26	12.73	13.50	14.10	1.09
Provisions	Bank	Annual (lagged)	15,420	0.53	0.17	0.39	0.79	0.44

Definition of the variables. **Media-Coverage**. 1($\geq$ 1 mono-bank article) is a dummy variable equal to 1 if newspaper p devotes at least one mono-bank article to bank b's earnings announcement in a given year-quarter yq, and equal to 0 otherwise. 1($\geq$ 1 article) is a dummy variable with value 1 if newspaper p devotes at least one article (either mono-bank or multi-bank) to bank b's earnings announcement in a given year-quarter yq, and 0 otherwise. Ln(# of mono-bank articles) is computed as the log of the total number of mono-bank articles published by newspaper p about a bank b in year-quarter yq. Ln(Length of mono-bank articles) is defined as the log of the sum of the length - i.e. number of words - of all mono-bank articles devoted by newspaper p to bank b's earning announcement in year-quarter yq; lengths is defined as number of words per article. % mono-bank articles is the ratio between the number of mono-bank articles and the number of total articles by newspaper p on bank b's earning announcement in year-quarter yq. % Length of mono-bank articles is the ratio between the total number of words in mono-bank articles and the total number of words in any article by newspaper p on bank b's earning announcement in year-quarter yq. **Paper-Bank Connections**. Banker is a dummy variable with value 1 if a newspaper p borrows from bank b either directly or indirectly (i.e. through controlling shareholders), and with value 0 otherwise. Banker(Direct) has value 1 if newspaper p borrows directly from bank b, and value 0 otherwise. Banker(Indirect) takes value 1 if newspaper p borrows from bank b only indirectly, and value 0 otherwise. Shareholder is a dummy variable with value 1 if bank b holds any share of newspaper p in year $y-1$ and with value 0 otherwise. **Newspapers' Balance sheet**. Capital is given by the ratio between shareholders' funds and total assets of newspaper p in year $y-1$. **Banks' Balance sheet**. Gain is a dummy variable with value 1 if bank b discloses positive profits in year-quarter yq and with value 0 of it discloses losses. Capital is bank b Tier-1 Capital over total assets as of year $y-1$. Size is bank b log total assets size as of year $y-1$. Provision defines bank b b provisions over total assets in year $y-1$.

TABLE 2: SUMMARY STATISTICS - ANALYSIS OF THE EUROZONE SOVEREIGN DEBT CRISIS

	Level	Frequency	N	Mean	p25	p50	p75	St.Dev.
Media Coverage								
Bear=Banks								
1($\geq$ 1 article)	Paper	Period	184	0.20	0	0	0	0.40
% of Article	Paper	Period	184	0.01	0	0	0	0.02
Ln(# of Article)	Paper	Period	36	0.26	0	0	0.69	0.39
Root=Banks								
1($\geq$ 1 article)	Paper	Period	184	0.50	0	0.50	1	0.50
% of Article	Paper	Period	184	0.05	0	0	0.09	0.49
Ln(# of Article)	Paper	Period	92	0.76	0	0.69	1.39	0.78
Solution=Haircut								
1($\geq$ 1 article)	Paper	Period	184	0.41	0	0	1	0.49
% of Article	Paper	Period	184	0.03	0	0.05	0.05	0.06
Ln(# of Article)	Paper	Period	75	0.55	0	0.69	1.10	0.65
Newspapers' Exposures								
GIIPS	Paper	Annual (lagged)	184	0.06	0.01	0.04	0.08	0.05
Bank Size	Paper	Annual (lagged)	184	12.88	12.64	12.78	12.87	0.54
Bank Tier-1	Paper	Annual (lagged)	184	0.10	0.09	0.10	0.11	0.01

Definition of the variables. **Media-Coverage**. For more details on the periods, see Appendix Table A3. For constructing the variables, we retain information on three questions. i) Who does the article indicate should bear the main responsibility to solve the problem? ii) What does the article indicate is the main fundamental root or cause of the crisis? iii) What does the article indicate should be the main (short-term) response to the crisis? For questions i) and ii), the dimension of interest is whether the respondent answers "Banks" vs any other answer (*Bear=Banks* and *Root=Banks*). For question iii), we focus on the answer: "Abatement of existing loan provisions (extension, reduced rates, haircut)" vs any other answer (*Solution=Haircut*). For the three questions, we gather info on: whether newspaper p publishes at least one article with the answer of interest in period t (1($\geq$ 1 article)); the share of such articles over all articles related to the Eurozone Sovereign Debt Crisis (% of Articles) and their total log number (Ln(# of Articles)). **Newspapers' Exposures**. The variables are computed as newspaper-level averages across the corresponding values of their Banker(Directs) banks. GIIPS is the average holding of Greek, Irish, Italian, Portoguese and Spanish sovereign bonds by the Banker(Direct) banks of newspaper p as of year $y-1$; Size is the average Banker(Direct) size and Capital is the average Banker(Direct) Tier-1 capital, rescaled by total assets.

TABLE 3: BANKS' EARNINGS ANNOUNCEMENT - EXTENSIVE MARGIN

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Dep. variable: $1(\geq 1$ mono-bank article$)$							
Banker	0.207***	0.243***	0.263***	0.005	-0.065	-0.107	-0.159**	
	(0.045)	(0.036)	(0.038)	(0.040)	(0.066)	(0.066)	(0.074)	
Shareholder	0.169***	0.075**	0.067**	0.026	0.003	0.002	0.004	0.001
	(0.041)	(0.030)	(0.032)	(0.031)	(0.028)	(0.028)	(0.032)	(0.032)
Gain	-0.023*	-0.029***						
	(0.012)	(0.009)						
Gain*Banker	0.124***	0.112***	0.094***	0.102***	0.067**	0.115***	0.115***	
	(0.039)	(0.035)	(0.034)	(0.032)	(0.030)	(0.031)	(0.033)	
Gain*Shareholder	-0.048	-0.025	-0.015	0.010	0.005	0.010	0.006	0.010
	(0.037)	(0.030)	(0.030)	(0.029)	(0.028)	(0.028)	(0.032)	(0.032)
Gain*Banker(Direct)								0.142***
								(0.044)
Gain*Banker(Indirect)								0.066
								(0.053)
Observations	18,960	18,960	18,960	18,960	18,960	18,960	18,960	18,960
R-squared	0.081	0.223	0.329	0.371	0.475	0.482	0.611	0.611
Bank FE	No	Yes	-	-	-	-	-	-
Paper FE	No	Yes	-	-	-	-	-	-
Time FE	No	Yes	-	-	-	-	-	-
Paper*Time FE	No	No	Yes	Yes	Yes	Yes	-	-
Bank*Time FE	No	No	Yes	Yes	Yes	Yes	Yes	Yes
Same country FE	No	No	No	Yes	-	-	-	-
Paper*Bank FE	No	No	No	No	Yes	Yes	Yes	Yes
Same country*Time FE	No	No	No	No	No	Yes	-	-
Paper*Bank-Country*Time FE	No	No	No	No	No	No	Yes	Yes

In all regressions, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** $p<0.01$, ** $p<0.05$, * $p<0.1$.

	(1)	(2)	(3)	(4)
VARIABLES	1($\geq$1 mono-bank article)			
Gain*Banker	0.105***		0.105***	
	(0.040)		(0.040)	
Gain*Banker(Direct)		0.131**		0.119**
		(0.054)		(0.050)
Gain*Banker(Indirect)		0.065		0.084
		(0.062)		(0.063)
Observations	11,424	11,424	11,424	11,424
R-squared	0.635	0.635	0.635	0.635
Data	ORBIS	ORBIS	Dealscan	Dealscan
Gain*Shareholder	Yes	Yes	Yes	Yes
Paper*Bank FE	Yes	Yes	Yes	Yes
Bank*Time FE	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	Yes

In all regressions, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. In columns 1 and 2, we limit the sample to the newspapers for which Dealscan data are available, but still use the information on lending-relationships from Orbis. In columns 3 and 4, we only maintain the Orbis lending-relationships that are validated in Dealscan. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect lending relationships, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. *** p<0.01, ** p<0.05, * p<0.1.

TABLE 5: BANKS' EARNINGS ANNOUNCEMENT - INTENSIVE MARGIN

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	# of mono-bank articles		Length of mono-bank articles		% mono-bank articles		% Length of mono-bank articles	
Banker	-0.101		0.000		-0.229***		-0.217	
	(0.137)		(0.279)		(0.088)		(0.143)	
Gain*Banker	0.131		0.182		0.173**		0.071	
	(0.116)		(0.211)		(0.072)		(0.066)	
Gain*Banker(Direct)		0.290*		0.485**		0.218**		0.122^a
		(0.157)		(0.238)		(0.084)		(0.074)
Gain*Banker(Indirect)		-0.001		-0.069		0.129		0.019
		(0.107)		(0.223)		(0.093)		(0.092)
Observations	2,857	2,857	2,857	2,857	5,045	5,045	5,045	5,045
R-squared	0.470	0.472	0.638	0.639	0.300	0.300	0.333	0.333
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Same country*Year-Quarter*Gain FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Year FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Year FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Gain*Shareholder FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Number of FE dummies	704	704	704	704	818	818	818	818

In columns 1 and 2, the dependent variable is Ln(# of Mono-Bank Articles) and in column 3 and 4 is Ln(Length Mono-Bank Articles). Moreover, in columns 5 and 6, the dependent variable is % mono-bank Articles and in columns 7 and 8 is % Length mono-bank Articles. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. *** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$, ^{a} $p < 0.125$.

TABLE 6: EARNINGS ANNOUNCEMENT - GENERAL INTEREST VS FINANCIAL NEWSPAPERS

Panel A: Extensive Margin

	(1)	(2)	(3)	(4)	(5)	(6)
	All Newspapers	General interest	Financial	All Newspapers	General interest	Financial
Banker	-0.159**	-0.065	-0.177			
	(0.074)	(0.104)	(0.111)			
Gain*Banker	0.115***	0.144***	0.065			
	(0.033)	(0.039)	(0.065)			
Gain*Banker(Direct)				0.142***	0.163***	0.112
				(0.044)	(0.049)	(0.107)
Gain*Banker(Indirect)				0.066	0.097	0.027
				(0.053)	(0.075)	(0.070)
Observations	18,960	14,220	4,740	18,960	14,220	4,740
R-squared	0.611	0.602	0.669	0.611	0.602	0.669
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Time FE	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	Yes	Yes	Yes
Gain*Shareholder	Yes	Yes	Yes	Yes	Yes	Yes

Panel B: Intensive Margin - # of Articles

	(1)	(2)	(3)	(4)	(5)	(6)
	All Newspapers	General interest	Financial	All Newspapers	General interest	Financial
Banker	-0.118	-0.106	0.115			
	(0.145)	(0.188)	(0.208)			
Gain*Banker	0.151	0.185	0.096			
	(0.122)	(0.215)	(0.170)			
Gain*Banker(Direct)				0.343*	0.224	0.522**
				(0.180)	(0.252)	(0.235)
Gain*Banker(Indirect)				0.012	0.119	-0.050
				(0.112)	(0.205)	(0.161)
Observations	2,812	1,556	1,256	2,812	1,556	1,256
R-squared	0.473	0.526	0.516	0.475	0.526	0.519

Panel C: Intensive Margin - Length of Articles

	(1)	(2)	(3)	(4)	(5)	(6)
	All Newspapers	General interest	Financial	All Newspapers	General interest	Financial
Banker	-0.057	-0.522	0.003			
	(0.287)	(0.529)	(0.416)			
Gain*Banker	0.180	0.254	0.294			
	(0.219)	(0.391)	(0.305)			
Gain*Banker(Direct)				0.636**	0.562	1.150***
				(0.267)	(0.463)	(0.351)
Gain*Banker(Indirect)				-0.149	-0.258	0.002
				(0.229)	(0.467)	(0.304)
Observations	2,812	1,556	1,256	2,812	1,556	1,256
R-squared	0.638	0.640	0.682	0.639	0.641	0.683
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes
Same country*Year-Quarter*Gain FE	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Year FE	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Year FE	Yes	Yes	Yes	Yes	Yes	Yes
Gain*Shareholder	Yes	Yes	Yes	Yes	Yes	Yes

In Panel A, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. In Panel B, the dependent variable is Ln(# of Mono-Bank Articles) and in Panel C is Ln(Length Mono-Bank Articles). The regressions in Panel B are augmented with

same controls and fixed effects as those in Panel C, though for brevity we report them just in the latter. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. *** p<0.01, ** p<0.05, * p<0.1.

TABLE 7: FINANCIAL SOLIDITY & MEDIA CAPTURE

	(1)	(2)	(3)	(4)
	Dep. Variable: $1(\geq 1$ mono-bank article)
	Newspaper Capital		**Bank Capital**	
Banker	-0.140*		-0.133	
	(0.071)		(0.088)	
Banker*Capital	0.047		0.016	
	(0.055)		(0.045)	
Gain*Capitall	-0.011			
	(0.010)			
Gain*Banker	0.083**		0.101**	
	(0.036)		(0.040)	
Gain*Banker*Capital	-0.072**		-0.026	
	(0.033)		(0.046)	
Gain*Banker(Direct)		0.121***		0.114***
		(0.035)		(0.032)
Gain*Banker(Direct)*Capital		-0.086*		-0.101**
		(0.050)		(0.049)
Observations	17,448	17,448	15,420	15,420
R-squared	0.612	0.612	0.636	0.637
Paper*Bank FE	Yes	Yes	Yes	Yes
Bank*Time FE	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	Yes
Shareholder*Gain*Capital	Yes	Yes	Yes	Yes
Banker(Indirect)*Gain*Capital	No	Yes	No	Yes

The dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. The dummies Banker and Banker(Direct) equal 1 if a newspaper and a bank are connected through any type of lending connections or through a direct lending connection, respectively, and 0 otherwise. The dummy Gain equals 1 if a bank announces a profit in a given year-quarter and 0 otherwise. In columns 1 and 2, the terms Gain*Banker (or Gain*Banker(Direct)) are interacted with newspaper's capitalization, defined as 100*Shareholders Funds/Total Assets. In columns 3 and 4, it is interacted with bank's capitalization defined as 100*Tier-1 Capital/Total Assets. Both capitalization variables are standardized. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

	1st Day		2nd Day		3rd Day		4th Day		5th Day	
	Dependent Variable: $\Delta LogPrice_{b,t+h}$									
Coverage	0.002	0.008	-0.004	0.003	-0.005	-0.002	0.000	-0.010	0.003	0.001
	(0.006)	(0.008)	(0.008)	(0.013)	(0.009)	(0.015)	(0.010)	(0.015)	(0.011)	(0.019)
Coverage*Low Capital		-0.006		-0.010		-0.004		0.016		0.002
		(0.009)		(0.014)		(0.017)		(0.017)		(0.019)
Gain	0.007	0.019***	0.006	0.019*	0.009	0.020	0.006	0.017	0.007	0.022
	(0.006)	(0.006)	(0.008)	(0.010)	(0.010)	(0.013)	(0.011)	(0.013)	(0.010)	(0.017)
Gain*Coverage	-0.001	-0.002***	-0.000	-0.002	-0.000	-0.002	-0.001	-0.002	-0.001	-0.002
	(0.001)	(0.001)	(0.001)	(0.001)	(0.001)	(0.001)	(0.001)	(0.001)	(0.001)	(0.002)
Gain*Coverage*Low Capital		0.003**		0.003*		0.004**		0.004		0.003
		(0.001)		(0.002)		(0.002)		(0.002)		(0.002)
Observations	692	692	692	692	692	692	692	692	692	692
R-squared	0.144	0.175	0.148	0.175	0.169	0.198	0.200	0.226	0.243	0.264
Bank FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Year-Quarter FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Controls	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

The dependent variable is bank cumulative stock returns h days after the earning announcement. The day is reported in the column titles. Coverage is the total number of articles devoted by all newspapers in our sample to a bank's earning announcement. The dummy Gain equals 1 if a bank announces a profit and 0 otherwise. Low Capital is a dummy with value 1 if a bank has below-median (lagged) Tier-1 Capital to Total Assets ratio in a given year-quarter. Controls include lagged bank (log assets) size and loss provisions (over total assets) as well as two dummies for whether the bank's net income beats the median analyst expectation and for whether its annual growth is positive. All controls are fully interacted with Coverage. Standard errors are double-clustered at the bank and year-quarter level. *** p<0.01, ** p<0.05, * p<0.1.

TABLE 9: COVERAGE OF THE EUROZONE SOVEREIGN DEBT CRISIS

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
	Bear=Banks			*Root=Banks*			*Solution=Haircut*		
GIIPS	-1.693	-0.048	0.142	-3.583**	-0.308**	-6.996*	-2.548***	-0.236**	-7.411*
	(1.689)	(0.034)	(1.686)	(1.492)	(0.104)	(3.642)	(0.675)	(0.088)	(3.465)
Observations	184	184	36	184	184	92	184	184	75
R-squared	0.260	0.235	0.309	0.248	0.225	0.326	0.261	0.328	0.395
Country News FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Period FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Controls	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

This table shows the influence of lending relationships on the coverage of the Eurozone Sovereign Debt Crisis. The dependent variables in columns 1, 4 and 7 is a dummy for whether a newspaper in a given period publishes at least one article respectively: indicating banks as the institutions which should bear the cost of the Crisis; pointing to banks as the main root of the Crisis; endorsing sovereign debt haircuts as a short-term solution to the Crisis. In columns 2, 5 and 7, the dependent variable is the share of such articles over the total number of articles devoted by a newspaper to the Crisis; in columns 3, 6 and 9 the dependent variable is their log number. GIIPS is the average holding of Greek, Irish, Italian, Portuguese and Spanish sovereign bonds by the Banker(Direct) banks of newspaper p as of year $y-1$. Controls include Size and Capital. Size is the average Banker(Direct) size and Capital is the average Banker(Direct) Tier-1 capital, rescaled by risk-weighted assets. Standard errors are double-clustered at the Paper and Period level. *** p<0.01, ** p<0.05, * p<0.1

FIGURE 1: SENSITIVITY OF COEFFICIENT TO THE EXCLUSION OF ONE NEWSPAPER
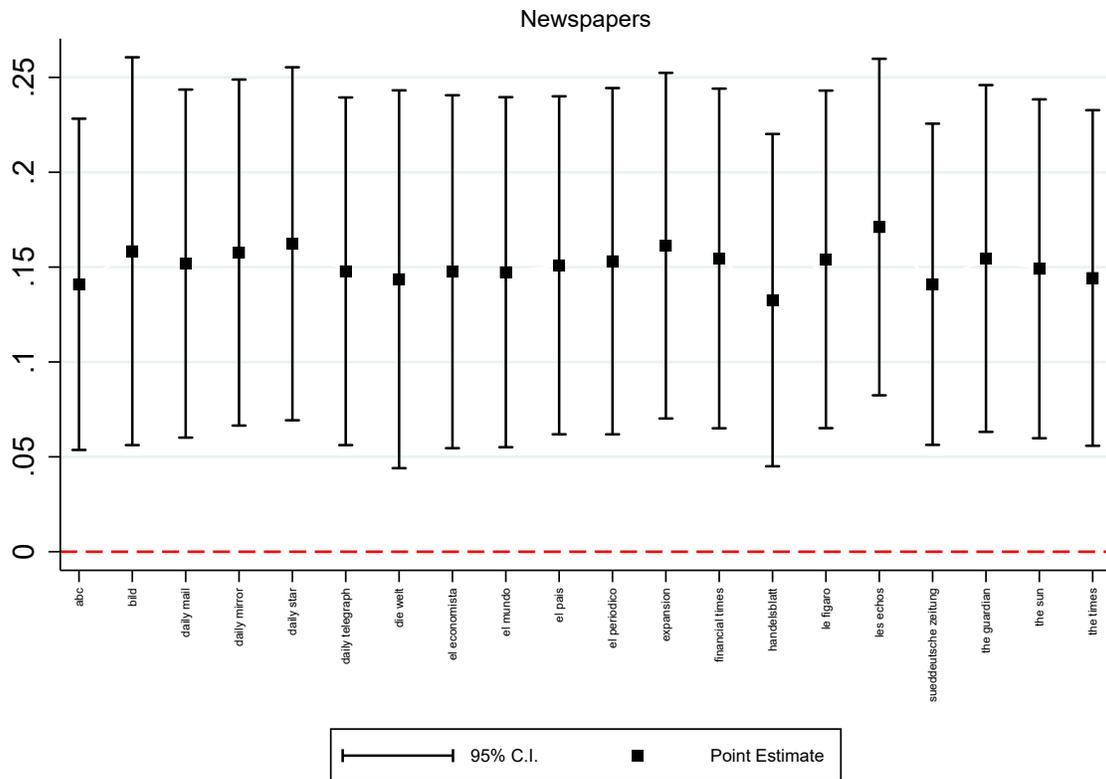
This chart plots the coefficients obtained estimating the model in column 7 of Table 3 after excluding one newspaper at the time. The name of the excluded newspaper is reported on the x-axis.

FIGURE 2: SENSITIVITY OF COEFFICIENT TO THE EXCLUSION OF ONE BANK
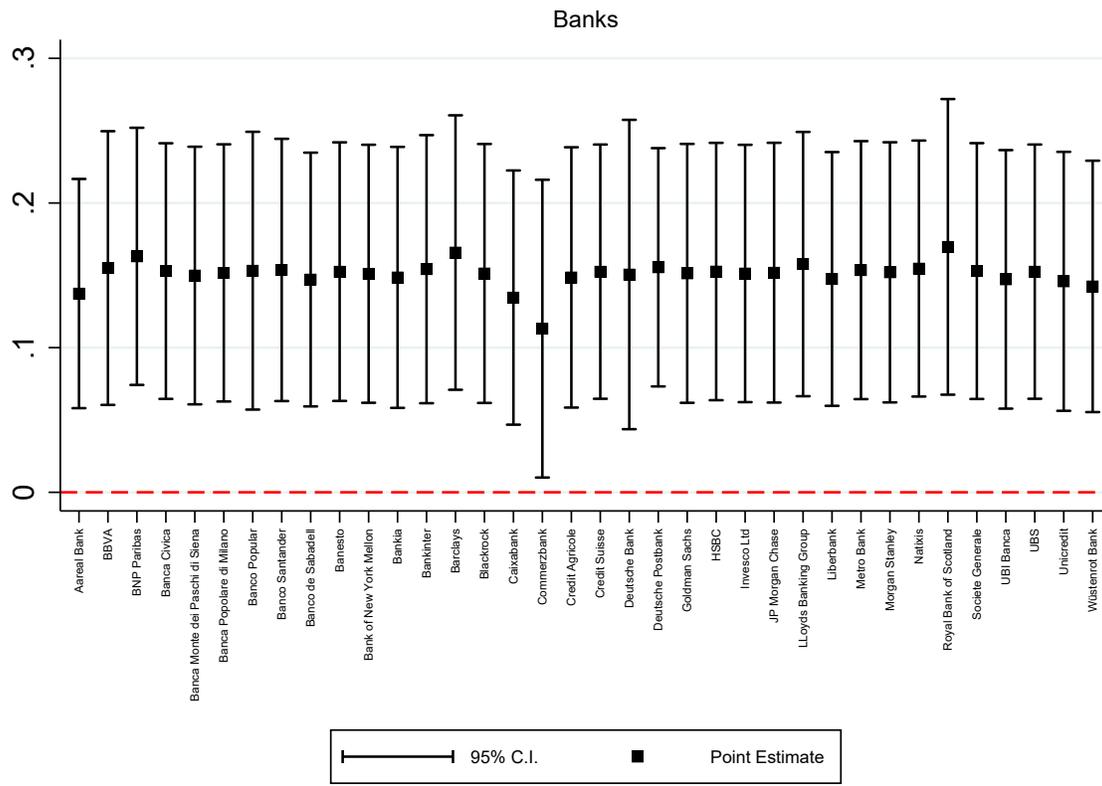
This chart plots the coefficients obtained estimating the model in column 7 of Table 3 after excluding one bank at the time. The name of the excluded bank is reported on the x-axis.

TABLES

TABLE A1: LIST OF NEWSPAPERS & BANKS IN THE ANALYSIS OF EARNINGS ANNOUNCEMENTS

Newspapers	Banks
ABC Bild Daily Mail Daily Mirror Daily Star Daily Telegraph Die Welt El Economista El Mundo El País El Periódico Expansión Financial Times Handelsblatt Le Figaro Les Echos Sueddeutsche Zeitung The Guardian The Sun The Times	Aareal Bank BBVA BNP Paribas Banca Civica Banca Monte dei Paschi di Siena Banca Popolare di Milano Banco Popular Banco Santander Banco de Sabadell Banesto Bank of New York Mellon Bankia Bankinter Barclays Blackrock Caixabank Commerzbank Credit Agricole Credit Suisse Deutsche Bank Deutsche Postbank Goldman Sachs HSBC Invesco Ltd JP Morgan Chase LLoyds Banking Group Liberbank Metro Bank Morgan Stanley Natixis Royal Bank of Scotland Societe Generale UBI Banca UBS Unicredit Wüstenrot Bank

Language	Filter
English	Profit* or loss* or result* or earning* or net income or operating income or payout or dividend*
French	Revenus or benefice or résultat*
German	Gewinn* or Betriebs* or ergebni* or Geschäftsergebnis* or Rekordgewinn* or Quartalsbericht orQuartalsergebni* or Handelsergebnis or quartalsgewin* or Quartalsberichte or Quartalszahlen or Dividend*
Spanish	Beneficio* or analist* or Perdida* or resultado* or dividend*

This table reports the filters we apply in Dow Jones Factiva to identify articles related to earnings announcements. The "*" applied at the end of a given expression means that the filter selects all articles containing words beginning with such expression. The filters are used together with a condition on a date (the day of the announcement and the day after) and the name and nicknames of the bank announcing their quarterly results in that date.

TABLE A3: SELECTED PERIODS OF ANALYSIS OF THE EUROZONE SDC

Period Dates	Description
25/07/11 -18/08/11	ECB pressures Italy for more austerity measures.
28/09/11 - 12/10/11	Greek general strike against austerity measures.
19/10/11 - 02/11/11	EU summit for stability fund.
05/11/11 - 19/11/11	Berlusconi resigns and Monti appointed. French austerity measures.
19/11/11 - 30/11/11	EC Green Paper on stability bonds and EC control of national budgets.
16/05/12 - 05/06/12	EU summit to boost growth and balance austerity. Attention on Spain.
18/06/12 - 05/07/12	Spain requests assistance. EU summit on the crisis.
08/07/12 - 22/07/12	Merkel affirms need for budgetary targets and European monitoring.

This table describes the different periods we use for the analysis of the news coverage of the European Sovereign Debt Crisis (drawn from Picard (2015)).

ABC
Bild
Corriere della Sera
De Telegraaf
De Volkskrant
El Mundo
El País
El Periódico
Expansión
Fakt
Financial Times
Frankfurter Allgemeine
Gazeta Wyborcza
Handelsblad
Handelsblatt
Het Financieele Dagblad
La Repubblica
Le Figaro
Les Echos
Rzeczpospolita
Sueddeutsche Zeitung
The Guardian
The Sun
The Times

TABLE A5: CROSS-VALIDATION OF ORBIS BANKER-DATA WITH DEALSCAN INFO ON SYNDICATED LOANS

	% BR / MLA / MA	% LA	% Others	Total
Banker(Direct)	56%	7%	18%	81%
Banker(Indirect)	48%	5%	33%	86%

The data refer to 48 paper-bank lending connections from 14 newspapers. We sort lending relationships by the role of the Orbis banker in the loan syndicate. BR stands for Bookrunner, MLA for Mandated Lead Arranger, MA for Mandated Arranger and LA for Lead Arranger. The values represent the share of Orbis 2018 lending relationships present in Dealscan over the period 2000-2009. The only exception is the Spanish newspaper ABC, for which we extend the sample to 2014 to retrieve at least a syndicated loan.

	(1) $\tilde{R}^2_{max}=0.79$	(2) $R^2_{max}=1$
δ	3.05	1.43

δ is the coefficient of proportionality from the Oster (2019)'s test for selection along unobservables. In column 1, tδ is computed under the assumption that $\tilde{R}^2_{max}$ equals 1.3 times the R-squared we observe in column (7) of Table 3, which yields $\tilde{R}^2_{max} = 0.79$. In column 2, we fix $\tilde{R}^2_{max} = 1$.

TABLE A7: BANKS' EARNINGS ANNOUNCEMENTS - HIGHER ORDER FIXED EFFECTS

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
VARIABLES				1($\geq$1 mono-bank article)				
Gain*Banker	0.119***	0.097**	0.073*	0.051				
	(0.033)	(0.042)	(0.042)	(0.060)				
Gain*Banker(Direct)					0.151***	0.131**	0.115**	0.129**
					(0.045)	(0.053)	(0.054)	(0.065)
Gain*Banker(Indirect)					0.064	0.048	0.021	-0.073
					(0.053)	(0.056)	(0.055)	(0.098)
Observations	19,040	19,040	19,040	17,220	19,040	19,040	19,040	17,220
R-squared	0.610	0.610	0.612	0.622	0.610	0.610	0.613	0.622
Bank*Time FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	-	Yes	Yes	Yes	-
Same Country*Gain	No	Yes	-	-	No	Yes	-	-
Same Country*Gain*Time	No	No	Yes	-	No	No	Yes	-
Paper*Bank-Country*Gain*Time FE	No	No	No	Yes	No	No	No	Yes

The dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect lending relationshi's, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures ndirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

TABLE A8: EXTENSIVE MARGIN - ROBUSTNESS: INCLUDING BANK CONTROLS

VARIABLES	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
				$1(\geq 1$ mono-bank article)				
Gain*Banker	0.123***	0.100***	0.073**	0.069**	0.058*	0.111***	0.111***	
	(0.038)	(0.035)	(0.034)	(0.034)	(0.032)	(0.033)	(0.038)	
Gain*Banker(Direct)								0.150***
								(0.049)
Gain*Banker(Indirect)								0.042
								(0.064)
Observations	15,420	15,420	15,420	15,420	15,420	15,420	15,420	15,420
R-squared	0.082	0.233	0.345	0.383	0.487	0.495	0.636	0.637
Bank FE	No	Yes	-	-	-	-	-	-
Paper FE	No	Yes	-	-	-	-	-	-
Time FE	No	Yes	-	-	-	-	-	-
Paper*Time FE	No	No	Yes	Yes	Yes	Yes	-	-
Bank*Time FE	No	No	Yes	Yes	Yes	Yes	Yes	Yes
Same country FE	No	No	No	Yes	-	-	-	-
Paper*Bank FE	No	No	No	No	Yes	Yes	Yes	Yes
Same country*Time FE	No	No	No	No	No	Yes	-	-
Paper*Bank-Country*Time FE	No	No	No	No	No	No	Yes	Yes
Bank Controls*Shareholder	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Bank Controls*Banker	Yes	Yes	Yes	Yes	Yes	Yes	Yes	-
Bank Controls*Banker Direct	No	No	No	No	No	No	No	Yes
Bank Controls*Banker Indirect	No	No	No	No	No	No	No	Yes

In all columns, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least a mono-bank articles. Bank Controls include: size (i.e. log assets), Tier-1 capital and loan losses provisions (both rescaled by total assets). All bank controls are lagged by one year. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

	(1)	(2)	(3)	(4)	(5)	(6)
VARIABLES			1($\geq$1 mono-bank article)			
Gain*Banker	0.119***		0.119***		0.119***	
	(0.024)		(0.040)		(0.027)	
Gain*Banker(Direct)		0.151***		0.151***		0.151***
		(0.026)		(0.049)		(0.036)
Gain*Banker(Indirect)		0.064		0.064		0.064
		(0.046)		(0.071)		(0.052)
Observations	19,040	19,040	19,040	19,040	19,040	19,040
R-squared	0.610	0.610	0.610	0.610	0.610	0.610
Cluster-level	Paper & Bank	Paper & Bank	Bank*Time	Bank*Time	Bank	Bank
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Time FE	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	Yes	Yes	Yes

In columns 1 and 2, s.e. are double-clustered at the paper and bank level. In columns 3 and 4, s.e. are clustered at the bank*year-quarter level, whereas in columns 5 and 6 at the bank level. In all columns, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least one mono-bank article. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

TABLE A10: EXTENSIVE MARGIN - ROBUSTNESS: ALTERNATIVE DEPENDENT
VARIABLE I: ANY ARTICLE

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
VARIABLES				$1(\geq 1$ any article)			
Banker(Direct)	0.288***	0.347***	0.335***	-0.087			
	(0.074)	(0.055)	(0.061)	(0.062)			
Banker(Indirect)	0.241***	0.298***	0.345***	0.016	-0.008	0.001	-0.041
	(0.086)	(0.082)	(0.062)	(0.072)	(0.057)	(0.061)	(0.060)
Gain	-0.022	-0.042***					
	(0.015)	(0.011)					
Gain*Banker(Direct)	0.173***	0.084*	0.096*	0.111**	0.054	0.082**	0.063**
	(0.057)	(0.050)	(0.054)	(0.051)	(0.036)	(0.036)	(0.030)
Gain*Banker(Indirect)	0.159**	0.198***	0.157***	0.138**	0.058	0.055	0.051
	(0.079)	(0.073)	(0.052)	(0.060)	(0.040)	(0.038)	(0.042)
Observations	18,960	18,960	18,960	18,960	18,960	18,960	18,960
R-squared	0.100	0.331	0.430	0.497	0.641	0.645	0.747
Bank FE	No	Yes	-	-	-	-	-
Paper FE	No	Yes	-	-	-	-	-
Time FE	No	Yes	-	-	-	-	-
Paper*Time FE	No	No	Yes	Yes	Yes	Yes	-
Bank*Time FE	No	No	Yes	Yes	Yes	Yes	Yes
Same country FE	No	No	No	Yes	-	-	-
Paper*Bank FE	No	No	No	No	Yes	Yes	Yes
Same country*Time FE	No	No	No	No	No	Yes	-
Paper*Bank-Country*Time FE	No	No	No	No	No	No	Yes

In all columns, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least an article, either mono-bank or multi-bank. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

TABLE A11: EXTENSIVE MARGIN - ROBUSTNESS: ALTERNATIVE DEPENDENT VARIABLE II: EXCLUDING MULTI-BANK ARTICLES

VARIABLES	(1)	(2)	(3)	(4)	(5)	(6)	(7)
				$1(\geq 1$ mono-bank article$)$			
Banker(Direct)	0.293***	0.322***	0.315***	-0.047			
	(0.076)	(0.058)	(0.064)	(0.064)			
Banker(Indirect)	0.207***	0.249***	0.328***	0.046	-0.043	-0.046	-0.107
	(0.079)	(0.070)	(0.060)	(0.068)	(0.066)	(0.068)	(0.070)
Gain	-0.024*	-0.037***					
	(0.013)	(0.010)					
Gain*Banker(Direct)	0.193***	0.122**	0.125**	0.135**	0.065	0.115***	0.096***
	(0.060)	(0.053)	(0.055)	(0.053)	(0.040)	(0.041)	(0.034)
Gain*Banker(Indirect)	0.173**	0.199***	0.116**	0.102*	0.060	0.068*	0.070
	(0.068)	(0.060)	(0.046)	(0.054)	(0.039)	(0.041)	(0.046)
Observations	17,305	17,305	17,305	17,305	17,246	17,246	16,577
R-squared	0.118	0.314	0.422	0.478	0.645	0.650	0.759
Bank FE	No	Yes	-	-	-	-	-
Paper FE	No	Yes	-	-	-	-	-
Time FE	No	Yes	-	-	-	-	-
Paper*Time FE	No	No	Yes	Yes	Yes	Yes	-
Bank*Time FE	No	No	Yes	Yes	Yes	Yes	Yes
Same country FE	No	No	No	Yes	-	-	-
Paper*Bank FE	No	No	No	No	Yes	Yes	Yes
Same country*Time FE	No	No	No	No	No	Yes	-
Paper*Bank-Country*Time FE	No	No	No	No	No	No	Yes

In all columns, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least a mono-bank articles. Articles about multiple banks are excluded from the sample. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

TABLE A12: EXTENSIVE MARGIN - ROBUSTNESS: EXPANDING TIME-WINDOW FOR ARTICLES COLLECTION (J DAYS AFTER EARNINGS REPORT

j=	(1)	(2)	(3)	(4)	(5)	(6)	(7)
				$1(\geq 1$ mono-bank article)			
Gain*Banker(Direct)	0.142***	0.140***	0.132***	0.131***	0.131***	0.131***	0.130***
	(0.044)	(0.044)	(0.044)	(0.044)	(0.044)	(0.044)	(0.044)
Observations	18,960	18,960	18,960	18,960	18,960	18,960	18,960
R-squared	0.611	0.611	0.611	0.611	0.611	0.612	0.613
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Time FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes

In column j, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least a mono-bank articles in a time-window starting from the day of the announcement to j days after, j=1,2,3,4,5,6,7. Articles about multiple banks are excluded from the sample. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** p<0.01, ** p<0.05, * p<0.1.

VARIABLES	(1)	(2)
	$1(\geq 1$ mono-bank article)	
Gain*Banker	0.072**	
	(0.030)	
Gain*Banker(Direct)		0.091**
		(0.038)
Gain*Banker(Indirect)		0.046
		(0.042)
Observations	15,232	15,232
R-squared	0.740	0.740
Gain*Shareholder	Yes	Yes
Paper*Bank FE	Yes	Yes
Bank*Time FE	Yes	Yes
Paper*Bank-Country*Time FE	Yes	Yes

Relatively to the baseline estimation sample in Table 3 we exclude newspapers labelled as tabloids, namely Bild, Daily Mail, Daily Mirror, Daily Star and The Sun. In all columns, the dependent variable is a dummy variable for whether a newspaper covers a bank quarterly earning announcement with at least a mono-bank articles. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** $p<0.01$, ** $p<0.05$, * $p<0.1$.

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	Dep. Variable: Log(Number of Mono-Bank Articles)						
Gain*Banker(Direct)	0.093	0.161*	0.177**	0.255***	0.323***	0.352***	0.290*
	(0.137)	(0.070)	(0.090)	(0.092)	(0.087)	(0.131)	(0.073)
Observations	2,857	2,857	2,857	2,857	2,857	2,857	2,857
R-squared	0.036	0.199	0.251	0.323	0.344	0.358	0.472
	Dep. Variable: Log(Length of Mono-Bank Articles)						
Gain*Banker(Direct)	0.148	0.171	0.224	0.425***	0.442***	0.313	0.485**
	(0.234)	(0.152)	(0.139)	(0.127)	(0.126)	(0.193)	(0.238)
Observations	2,857	2,857	2,857	2,857	2,857	2,857	2,857
R-squared	0.084	0.353	0.437	0.515	0.529	0.535	0.639
	Dep. Variable: % of Mono-Bank Articles						
Gain*Banker(Direct)	0.112**	0.148***	0.147***	0.180***	0.226***	0.255***	0.218**
	(0.048)	(0.046)	(0.046)	(0.054)	(0.053)	(0.078)	(0.084)
Observations	5,045	5,045	5,045	5,045	5,045	5,045	5,045
R-squared	0.004	0.111	0.111	0.185	0.197	0.211	0.300
	Dep. Variable: % of Mono-Bank Text						
Gain*Banker(Direct)	0.101**	0.109**	0.111**	0.136**	0.155***	0.168**	0.122[a]
	(0.048)	(0.046)	(0.046)	(0.053)	(0.053)	(0.068)	(0.074)
Observations	5,045	5,045	5,045	5,045	5,045	5,045	5,045
R-squared	0.009	0.130	0.131	0.220	0.232	0.245	0.333
Bank FE	No	Yes	Yes	-	-	-	-
Paper FE	No	Yes	Yes	-	-	-	-
Year-Quarter FE	No	Yes	Yes	Yes	-	-	-
Same country FE	No	No	Yes	-	-	-	-
Paper*Bank FE	No	No	No	Yes	Yes	Yes	Yes
Same country*Year-Quarter FE	No	No	No	No	Yes	-	-
Same country*Year-Quarter*Gain FE	No	No	No	No	No	Yes	Yes
Paper*Year FE	No	No	No	No	No	No	Yes
Bank*Year FE	No	No	No	No	No	No	Yes

The dependent variable is indicated on top of the regression output. The set of employed fixed effects indicated in the bottom of the table applies to all the four groups of regressions. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. In the legend, the symbol "-" refers to controls and/or fixed effects which are spanned out by the application of other controls and/or fixed effects. Standard errors are clustered at the Paper*Bank level. *** $p<0.01$, ** $p<0.05$, * $p<0.1$. Standard errors are clustered at the Paper*Bank level. *** $p<0.01$, ** $p<0.05$, * $p<0.1$, [a] $p<0.101$.

Panel A: % of mono-bank articles

	(1)	(2)	(3)	(4)	(5)	(6)
	All Newspapers	General interest	Financial	All Newspapers	General interest	Financial
Gain*Banker	0.186**	0.252**	0.031			
	(0.072)	(0.125)	(0.102)			
Gain*Banker(Direct)				0.241***	0.254*	0.203[a]
				(0.084)	(0.133)	(0.126)
Gain*Banker(Indirect)				0.134	0.250	-0.064
				(0.094)	(0.166)	(0.140)
Observations	5,008	2,774	2,234	5,008	2,774	2,234
R-squared	0.301	0.343	0.320	0.301	0.343	0.320

Panel B: Intensive Margin - % Length of mono-bank articles

	(1)	(2)	(3)	(4)	(5)	(6)
	All Newspapers	General interest	Financial	All Newspapers	General interest	Financial
Gain*Banker	0.081	0.107	-0.010			
	(0.067)	(0.086)	(0.095)			
Gain*Banker(Direct)				0.144*	0.111	0.195[a]
				(0.076)	(0.094)	(0.126)
Gain*Banker(Indirect)				0.021	0.102	-0.124
				(0.091)	(0.138)	(0.089)
Observations	2,812	1,556	1,256	2,812	1,556	1,256
R-squared	0.638	0.640	0.682	0.639	0.641	0.683
Paper*Bank FE	Yes	Yes	Yes	Yes	Yes	Yes
Same country*Year-Quarter*Gain FE	Yes	Yes	Yes	Yes	Yes	Yes
Paper*Year FE	Yes	Yes	Yes	Yes	Yes	Yes
Bank*Year FE	Yes	Yes	Yes	Yes	Yes	Yes
Gain*Shareholder	Yes	Yes	Yes	Yes	Yes	Yes

In Panel A, the dependent variable is the % of mono-bank articles over the total number of articles that a newspaper devotes to a bank's earnings announcements. In Panel B, the dependent variable is the % length of mono-bank articles. The regressions in Panel A are augmented with same controls and fixed effects as those in Panel B, though for brevity we report them just in the latter. Banker is a dummy variable with value 1 if a paper and a bank are connected through direct or indirect (i.e. through controlling shareholders') lending connections, and with value 0 otherwise. Shareholder is a dummy variable with value 1 if a bank holds any (direct or indirect) ownership share in a given newspaper, and with value 0 otherwise. Gain is a dummy variable with value 1 (0) if a bank discloses gains (losses) in a given year-quarter. Banker(Direct) is a dummy variable with value 1 if a newspaper directly borrows from a given bank, whereas Banker(Indirect) captures newspaper-bank indirect lending connections. *** p<0.01, ** p<0.05, * p<0.1, [a] pp<0.15.

TABLE A16: SUMMARY STATISTICS FOR THE ANALYSIS OF STOCK RETURNS

VARIABLES	(1) N	(2) mean	(3) p25	(4) p50	(5) p75	(6) sd
Stock Returns						
$\Delta Log\ Price_{b,t+1}$	692	-0.00229	-0.0143	-0.00154	0.00892	0.0270
$\Delta Log\ Price_{b,t+2}$	692	-0.00276	-0.0220	-0.00263	0.0126	0.0354
$\Delta Log\ Price_{b,t+3}$	692	-0.00306	-0.0279	-0.00326	0.0170	0.0400
$\Delta Log\ Price_{b,t+4}$	692	-0.00463	-0.0303	-0.00572	0.0202	0.0437
$\Delta Log\ Price_{b,t+5}$	692	-0.00641	-0.0311	-0.00654	0.0204	0.0483
Earnings Results						
Gain	692	0.890	1	1	1	0.313
Earnings Growth	692	0.474	0	0	1	0.500
Earnings Surprise	692	0.632	0	1	1	0.483
Coverage						
Coverage	692	5.120	1	4	8	4.867

Definition of the variables. **Stock Returns**. $\Delta Log\ Price_{b,t+j}$ is the cumulative stock return during a window going from the trading day of the announcement to j trading days after, $j = 1,2,3,4,5$. **Earnings Results**. Gain is a dummy with value 1 if a bank discloses positive net income in the current year-quarter earnings announcements, and with value 0 otherwise. Earnings Growth is a dummy with value 1 if the year-over-year growth of net income in the current year-quarter announcements is positive, and 0 otherwise. Earnings Surprise is a dummy variable with value 1 if a bank discloses net income in the current year-quarter earnings announcements above the median analysts' expectations, and 0 otherwise. **Coverage**. Coverage is the total number of articles that newspapers in our sample devote to a bank's earning announcements.

TABLE A17: COVERAGE OF THE EUROZONE SOVEREIGN DEBT CRISIS WITH
DEALSCAN DATA

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
	Bear=Banks			*Root=Banks*			*Solution=Haircut*		
GIIPS	-1.008	0.006	0.790	-5.416**	0.159	4.384	-6.584**	-0.696**	-7.424
	(2.258)	(0.121)	(5.746)	(1.942)	(0.175)	(4.944)	(2.781)	(0.222)	(10.621)
Observations	112	112	26	112	112	65	112	112	49
R-squared	0.284	0.293	0.333	0.180	0.206	0.557	0.327	0.390	0.482
Country News FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Period FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Controls	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

In all columns, we include only those newspapers for which lending relationships in Orbis are validated with ex-ante information on syndicated loans from Dealscan. The dependent variables in columns 1, 4 and 7 is a dummy for whether a newspaper in a given period publishes at least one article respectively: indicating banks as the institutions which should bear the cost of the Crisis; pointing to banks as the main root of the Crisis; endorsing sovereign debt haircuts as a short-term solution to the Crisis. In columns 2, 5 and 7, the dependent variable is the share of such articles over the total number of articles devoted by a newspaper to the Crisis; in columns 3, 6 and 9 the dependent variable is their log number. GIIPS is the average holding of Greek, Irish, Italian, Portuguese and Spanish sovereign bonds by the Banker(Direct) banks of newspaper p as of year $y-1$. Controls include Size and Capital. Size is the average Banker(Direct) size and Capital is the average Banker(Direct) Tier-1 capital, rescaled by risk-weighted assets. Standard errors are double-clustered at the Paper and Period level. *** p<0.01, ** p<0.05, * p<0.1