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Does Foreign Aid Raise Awareness of Corruption? Evidence from Chinese Aid in 30 African States

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Abstract

Does foreign aid raise awareness of political corruption among local recipients? Why and how do local aid projects increase individuals' perceptions of corruption in recipient communities? Using a geocoded dataset of Chinese official finance flows along with Afrobarometer survey data, I explore the effects of Chinese aid on corruption perceptions among citizens in African states. The main results indicate that exposure to Chinese assistance increases the perceived level of corruption of government officials and political leaders, while World Bank aid does not. I also examine whether the types and targeted sectors of aid have differential impacts on individual perceptions of political corruption. The results indicate that grants have a more consistent impact on corruption perceptions than do other types of aid, suggesting that grants may provide rents more easily to politicians. Besides, developmental projects for social infrastructure raise respondents' reports of dishonesty among public officials more than other sectors. It is because those projects substitute essential public services, thus lowering the accountability of local governments. Moreover, when Chinese agencies implement projects by themselves, the impact of Chinese aid on corruption perceptions increases substantially. The findings suggest that Chinese aid may increase the awareness of political corruption in local African communities, due primarily to suspicions regarding interactions between China and local people in African states.

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1 Introduction

Do citizens update their beliefs about the effectiveness of their governments based on foreign aid inflows? Does foreign aid increase political corruption in local communities? While a growing literature examines the political effects of foreign aid, only a few studies examine how and to what extent foreign aid affects the relationship between citizens and governments. In a globalized world, however, people living even in small towns often interact with others from outside their community, and sometimes exposure to foreigners affects and modifies existing relationships within the society. In this sense, “the China shock” has not only affected the United States and the United Kingdom (Autor, Dorn, and Hanson, 2016), but has also reached Africa as the Chinese have brought immense investment, development funds and projects to the continent. The rise of China has been eye-opening for the international community as well as for African leaders and citizens (Nymalm, 2019; Benabdallah, 2019). However, the impact of foreign aid in the region remains murky, and the effects of Chinese aid in particular merit closer examination.

This paper explores the impacts of Chinese aid on perceived levels of political corruption in 30 African states. The presence of China in Africa is a salient issue (Brautigam, 2011); its development fund amounts to more than one hundred billion dollars from the early 2000s to 2014. In addition to its scope, the unique properties of Chinese aid provide scholars with an opportunity to test the political effects of foreign aid. China provides the simplest form of foreign aid as its aid does not attach any conditions in keeping with the “non-interference” doctrine. Compared to conventional donor countries that typically impose numerous conditions to enhance the effectiveness of foreign aid, China’s development funds allow researchers to test the influence of foreign aid itself. Admittedly, there may be some disagreements over the actual leverage of Chinese authorities in Africa. Nevertheless, the effects of foreign aid can be more clearly confirmed when the governments of the recipient

countries are allowed to use the aid at their own discretion.

While the literature on foreign aid focuses primarily on the economic growth of recipient countries and the relationships between donors and recipients (Alesina and Dollar, 2000; Wright and Winters, 2010), this paper aims to examine the effects of foreign aid on political corruption. On the one hand, perceived dishonesty among political leaders and officials undermines citizens' trust in their governments, and in turn, may harm the legitimacy and stability of the regimes (Brautigam and Knack, 2004; Asongu, 2012; Briggs, 2018). On the other hand, foreign aid can help recipient governments to weed out corruption by enhancing their institutions in order to prevent the wrongdoing of officials (Tavares, 2003).

I empirically examine the effects of foreign aid on the perceived level of corruption by examining individual-level survey data, together with the geo-coded data on Chinese aid projects implemented between 2000 and 2014. To identify individual-level responses to Chinese aid projects, I employ geographically referenced datasets from the AidData and the Afrobarometer and then match aid recipient localities and survey respondents. The geocoded data has micro-level information on the number of Chinese aid projects implemented within a close distance to each survey respondent. One's exposure to foreign aid projects can change one's perceptions, not just about the aid donors but also about their government officials who interact with the donors. I intend to capture such "updating of beliefs" through respondents' experience with access to foreign aid. As this paper aims to examine the impact of Chinese aid in a comparative perspective, I also control for World Bank aid projects. In order to address potential issues of endogeneity, the analysis includes a placebo test on Chinese projects that were planned but not yet implemented as of the survey dates.

The results demonstrate that people living close to aid projects implemented by China report higher levels of corruption among their local government officials and members of parliament (MPs). Meanwhile, World Bank aid projects and projects not yet implemented

do not have any significant impact on individual perceptions of political corruption. Tests of the mechanisms further examine whether the specific type of aid, the targeted sector, and the nationality of the implementing agency affect the perceived level of corruption.

This paper contributes to the literature in three ways. First, it sheds light on the political consequences of foreign aid in domestic contexts, focusing specifically on Chinese aid, which has been soaring recently in African countries. Second, the study examines individual-level reactions to foreign interactions, which can advance explanations regarding foreign direct investment and immigration. The method of geographical matching to examine these individual-level perceptions is also applicable to other subjects related to globalization. Lastly, the paper identifies the mechanisms that link foreign aid and perceived political corruption. Using precise data on a specific donor, China, and a beneficiary, African citizens, the study is able to identify the effects of various characteristics of Chinese aid.

This study will add to recent research on Chinese global capital flows by extending the examination to the issue of corruption (Dreher et al., 2016, 2018). The paper is closely related to Isaksson and Kotsadam (2018), which finds that petty economic corruption increases in areas around Chinese aid projects. As a rise in economic activity does not drive the impact of Chinese aid on petty corruption, the authors suggest that the presence of China influences social norms and practices in local communities. I intend to test the channels that previous research has proposed and to pinpoint the specific conditions under which foreign aid aggravates political corruption in African developing countries.

The remainder of the paper proceeds as follows. The next sections present literature reviews on studies of foreign aid and corruption and recent work on China's engagement in Africa. I then provide a theoretical framework for the main argument, and I present three mechanisms to explain how the impact of Chinese aid occurs. The main empirical analyses follow. I then address the causality for Chinese assistance using additional empirical strategies, and I offer some simple empirical tests to check the mechanisms. In the final

section, I discuss the implications of the findings.

2 Aid and Corruption

While a voluminous literature has examined the distribution and effectiveness of foreign aid and its impacts on governance and state legitimacy (Alesina and Weder, 2002; Brautigam and Knack, 2004; Asongu, 2012; Guiteras and Mobarak, 2016; Baldwin and Winters, 2018), existing studies have paid less attention to analyzing the impacts of foreign aid on corruption. Yet, the issue of corruption has long been associated with aid effectiveness, often resulting in weaker support for development projects from citizens. In fact, several scholars have examined how corruption might influence aid effectiveness in developing countries (Boone, 1996; Petrikova, 2016), noting a vicious cycle between foreign assistance and economic development (Svensson, 2000; Knack, 2001; Moyo, 2009).

Even so, the relationship between aid and corruption remains underexplored. While some studies identify benign effects of foreign aid in reducing corruption (Tavares, 2003; Okada and Samreth, 2012; Mohamed et al., 2015; Menard and Weill, 2016), others suggest that foreign aid aggravates corruption in developing countries (Svensson, 2000; Knack, 2001). Such mixed findings may be due in part to the difficulty of identifying the causal effects of foreign aid on corruption. Specifically, earlier studies on the topic are typically based on country-level data and subject to concerns about reverse causality and endogeneity problems, as it can be difficult with such data to determine whether aid goes to corrupt recipients or whether aid makes them corrupt.

Given these mixed findings, the literature may benefit from further examination of the mechanisms that link foreign aid to corruption. Existing theories argue that foreign assistance discourages local governments from solving problems on their own, consequently failing to improve governance (Brautigam and Knack, 2004). Specifically, Svensson (2000) and Knack (2001) argue that massive inflows of foreign funds might increase the size of

resources to be fought over by interest groups and factions, thereby weakening accountability, encouraging rent-seekers and crippling the rule of law. Moreover, Dunning (2004) and Mattesini and Isopi (2008) bring attention to a moral hazard problem, whereby the effects of development assistance do not necessarily run parallel to donors' motives and may thus fail to curb corruption in recipient countries.

On the contrary, some scholars have used advanced methods to suggest that aid decreases corruption or has an insignificant effect. Tavares (2003) uses geographical and cultural distances as an instrumental variable and offers two possible mechanisms; one a "conditionality effect" through which donors demand better institutions as a requirement, and the other a "liquidity effect" in which aid alleviates budget shortages, thus diminishing the demand for bribes. In addition, Okada and Samreth (2012) and Mohamed et al. (2015) use quantile regression to show that the results vary from donor to donor.

Recent studies focus on variation among donors, emphasizing the distinct characteristics of the donors themselves and the forms of aid they employ. These studies note, respectively, that the motivation for aid, corruption levels, and the transparency of donors can shape the impact of foreign aid on corruption (Mattesini and Isopi, 2008; Schudel, 2008; Christensen et al., 2011). In keeping with that approach, this paper recognizes differences among specific donors and tests several hypotheses from the existing literature using new geo-referenced data.

To evaluate the relationship between aid and corruption, studies typically use country-level datasets, including the World Development Indicators (WDI) and the Corruption Perceptions Index (CPI), provided by World Bank and Transparency International (TI), respectively. These indexes offer helpful information on national corruption levels through elaborate survey and interview methods. It is beyond the scope of those datasets, however, to evaluate individual responses to specific events. Otherwise stated, those datasets do not allow researchers to pinpoint short-term changes in corruption caused by aid projects or to

distinguish the effects of aid from other incidents or contextual factors (Alesina and Weder, 2002). This paper intends to overcome that limitation using individual-level responses to events, thus advancing the literature of foreign aid and corruption.

3 Chinese Aid into Africa

Since the early 2000s, the increasing prominence of China in Africa has raised new questions about the role of Chinese aid to African states (Dreher et al., 2016, 2018; Brazys and Vadlamannati, 2018; Isaksson and Kotsadam, 2018; Blair and Roessler, 2018). China is pouring an impressive amount of development funds into Africa, notably with no strings attached (Tseng and Krog, 2016). AidData, a research lab that tracks the flow of Chinese official aid into Africa, announced that development finance from China reached approximately 121 billion dollars during the period between 2000 and 2014 and that China has contributed about 12 billion dollars per year since 2010 (Humphrey and Michaelowa, 2019). Given the creation of the Asian Infrastructure Investment Bank and the New Development Bank of the BRICS, China’s international aid is likely to continue increasing (Dreher et al., 2018).

Many critics have looked askance at China’s role in Africa. In 2007, an article from *Foreign Policy* severely criticized Chinese aid as “non-democratic, non-transparent, rogue and toxic”, putting its national interests before the recipient’s need (Naim, 2007). That argument was reinforced when US Presidential candidate Hillary Clinton publicly criticized Chinese aid (Dreher and Fuchs, 2011). On the other hand, some have praised China’s responsiveness to recipients’ needs and the fact that China does not place heavy administrative burdens on African states (Brautigam and Knack, 2004; Dreher et al., 2016). The debate persists in the literature on China’s foreign policy toward Africa.

That literature examines the effects of Chinese aid in several respects. Recent research shows that Chinese aid has resulted in an unequal distribution along ethnic lines (Dreher et al., 2016) and intense competition with other donors (Dreher et al., 2018). Further, schol-

ars have distinguished the patterns in Chinese aid from those of other traditional donors (Dreher et al., 2016, 2018). A recent study from Dreher et al. (2018) suggests that political and commercial interests are not the primary motivations and that only foreign policy interests correlate significantly with aid allocation. They also find that control of corruption and polity scores do not appear to affect China’s decisions. In other words, China neither fights corruption nor discourages authoritarian regimes via its distribution of aid (Dreher et al., 2018). Those findings are important, but they still leave unexplored the actual impact of Chinese aid; the outcomes lose statistical significance with the inclusion of country fixed effects, suggesting limits to these national-level examinations. Moreover, Chinese-funded aid projects frequently do not go to recipient central governments but rather to local regions directly. Hence, it is imperative to examine sub-national data to establish adequate internal validity.

Only a few recent studies take steps to evaluate the effects of Chinese aid using geocoded data. Isaksson and Kotsadam (2018) finds that citizens in close proximity to Chinese aid projects report higher perceptions of corruption, more bribing by police, and greater permissibility of bribes. Blair and Roessler (2018) uses survey experiments and behavior games to examine the impact of Chinese aid on state legitimacy in Liberia, yet could not find consistent evidence of an effect on perceptions of government or tax compliance. Several working papers also explore the effects of Chinese aid in Africa, underscoring the salience of the phenomenon (Gehring, Kaplan, and Wong, 2019; Brazys and Vadlamannati, 2018; Humphrey and Michaelowa, 2019; Blair and Roessler, 2018; Vera Z. Eichenauer, 2018; Dreher et al., 2018), and this paper further adds to this literature.

4 Theoretical Framework

This study argues that Chinese aid is more likely to increase perceived levels of corruption relative to other donors in the region. Not only do numerous scholars and experts blame foreign

assistance for undermining institutions and governance in developing countries (Boone, 1996; Moyo, 2009), but China has received a particular share of criticism (Naim, 2007; Alden and Soares de Oliveira, 2008). Moreover, media reports increasingly accuse Chinese companies of wrongdoing in African and Asian countries, where Chinese investment and cooperation are heaviest. For instance, Kenyan workers on a Chinese-Kenyan joint project claimed that Chinese agencies engaged in racism and discrimination in their places of work (Goldstein, 2018). Experts also maintain that corrupt Chinese business practices harm ordinary Africans and weaken the institutions of African local governments (Meservey, 2018).

The primary reason for the criticisms is China's "non-interference doctrine." The non-interference principle articulates that the Chinese government does not require any political or institutional changes from recipient governments (Tseng and Krog, 2016). Meanwhile, other donors, specifically in the OECD DAC group, have been working on initiatives to combat corruption and promote integrity (Petrikova, 2016). In contrast, China demonstrates little commitment to enhancing the capacity of recipient governments. In particular, a recent paper argues that China does not take into account the level of corruption in recipient states (Dreher et al., 2018). A separate study finds that people who live near Chinese aid projects are more likely to bribe the police and to take bribes from other (Isaksson and Kotsadam, 2018).

This study differs in that its focus is on the relationship between citizens and their governments. Anticipating the distributional effect of foreign aid on ordinary people, one can conjecture that individuals reward their government officials for getting development assistance projects for their people. However, if the individuals do not recognize benefits from those projects but instead note their adverse effects, politicians will be unable to claim credit for their work in securing the aid. It is thus critical to determine whether people appreciate their officials securing development projects before examining the mechanisms. Further, examining the effects of Chinese aid on political corruption can help elucidate the

incentives and constraints of local governments in African states. Building on these claims, hypothesis 1 outlines the general impact of Chinese aid in African communities.

Hypothesis 1: Chinese aid increases perceived corruption in the regions where the aid projects are located.

I propose three mechanisms regarding why and how Chinese aid raises awareness of corruption in recipient regions. The mechanisms help to explain both why officials and politicians may be more likely to cheat and also why people perceive their politicians to be more corrupt in the proximity of Chinese aid assistance.

First, Chinese aid may facilitate the rent-seeking incentives of government officials and political leaders. Foreign aid constitutes a large pool of financial resources, which may stimulate bribery and extortion in recipient regions. Moreover, as China does not impose much conditionality, the development funds given to local governments may function as a honey jar for politicians. This would be more likely in the case of grants than other types of aid, as grant aid requires less stringent monitoring and evaluation, and even the tracking of its final destination can be obscured. Loans, on the other hand, require repayment and thus usually involve greater supervision and control. If analyses confirm that citizens who live in proximity to grant projects report higher levels of corruption, this would support the claim that foreign aid increases political corruption by encouraging officials to seek rents through Chinese aid projects. Hypothesis 2 thus follows:

Hypothesis 2: Among the types of aid, grants facilitate the rent-seeking incentives of government officials, thereby increasing political corruption.

Next, Chinese aid may lower the accountability of government officials and political leaders. Foreign aid provides resources for public goods, which citizens may reasonably expect their governments to offer as a consequence (Knack, 2001). In this regard, development

assistance from donors can serve as a substitute form of welfare services, such as elementary education and public health service. Those services are good for citizens but may simultaneously undermine the basic principal-agent model of democracy (Mattesini and Isopi, 2008). Individuals receive essential welfare goods not from their local governments but from foreign donors, and they then may find that their governments are failing to perform. Consistent with this assumption, a few studies note that foreign aid weakens state legitimacy through “the substitution effect” (Guiteras and Mobarak, 2016; Blair and Roessler, 2018).

When foreign aid replaces essential public services, governments can shirk their responsibilities, escape the vigilance of the public, and divert their attention to private gains. Welfare services are categorized into social and economic sectors of aid for the purposes of classification in the Creditor Reporting System (CRS) of OECD DAC. Assistance for economic infrastructure and production and manufacturing do not necessarily replace the public goods, thereby avoiding the erosion of accountability that may come with social infrastructure aid. Therefore, if tests indicate that people feel their politicians are more corrupt when the sector of aid they gain access to is social infrastructure, this would confirm that foreign aid boosts corruption by lowering the accountability of local governments.

Hypothesis 3: Among the sectors of aid, social infrastructure assistance undermines the accountability of recipient governments, thereby increasing political corruption.

Finally, Chinese aid may increase perceived levels of corruption by transmitting the culture of “Guan xi (关系)” to recipient regions (Leung and Wong, 2001).¹ When aid projects are implemented in local areas, foreign agencies working on the projects move into the region and may influence the local society (Björkdahl and Gusic, 2015; Gross, 2015). People can easily become familiar with a foreign culture, especially when the aid activities are salient to the local community. Conventional wisdom has pointed out that when a donor is corrupt, it is more interested in private gains and thus does not bother to control corruption in recipient

regions (Schudel, 2008).

Traditional donor countries, who created and are members of the International Aid Transparency Initiative (IATI), are less likely to spread bad practices. On the contrary, emerging donors such as China and Russia do not provide information on their aid projects, which in turn lowers the transparency of their assistance. In particular, China is renowned for the norm of ‘Guan xi’, prioritizing informal relationships when it makes a business deal. Simply put, China may thus be more likely to offer a kickback for local officials. Prior research similarly blames Chinese aid for employing corrupt practices to win contracts and gain favorable conditions (Brautigam, 2011). Thus, the nationality of implementing agencies can affect perceived corruption among local citizens. I argue that when an aid project is implemented by a Chinese agency, people in the local area may report more corruption among their local officials.

Hypothesis 4: Among the aid implementing agencies, Chinese agencies transmit their norms and unjust practices to recipient regions, thereby increasing political corruption.

5 Data and Estimation Strategy

To determine the effects of Chinese aid on perceived corruption among individuals in Africa, I geographically match a dataset on China’s official finance flows to Africa over the period from 2000-2014 to survey data from the Afrobarometer in 30 African countries collected from 2011-2013 (BenYishay, 2017).² As the datasets include locational information on project sites and survey locations, respectively, I measure the distance between aid projects and respondents and count the number of projects implemented within 25 km of each respondent’s locus.

5.1 Global Chinese Official Finance Dataset

I use the “Global Chinese Official Finance Dataset (version 1.1.1)” published in September 2018 by AidData as the primary dataset (Bluhm et al., 2018; AidData, 2017*b*). The dataset covers 15 years from 2000 to 2014, tracking the known universe of overseas Chinese official finance in 138 countries and 6,190 locations, capturing 3,485 project records that total 273.6 billion dollars (Humphrey and Michaelowa, 2019). As China does not provide official data, the database relies on information available through open sources (Dreher et al., 2018). For this reason, it is impossible to measure Chinese aid according to the strict OECD definition of Official Development Assistance (ODA). Instead, the database uses a second-best definition of “ODA-like flows,” which consists of all projects provided with development intent and which have a concessional element higher than 25%.

Using this geocoded data on Chinese aid, I applied several standards to narrow down the dataset to relevant projects and accurate location points. The number of Chinese aid projects subject to analysis is 1,036 in the 30 African countries for which both the aid data and Afrobarometer data are available. I then restricted the aid data to the period from 2007 to 2014 - four years before the survey and one year after – to match the aid recipients and the survey respondents. In addition, the examination only includes the projects of precision codes 1 to 4.³ To test the hypotheses on the mechanisms, I consider additional details on the cases covered by the data. The types of Chinese assistance consist of 43% grants, 33% loans, 21% technical assistance, and 21% scholarships and training. The sectors of the projects include 53% devoted to social infrastructure, 36% economic infrastructure, 5% production and manufacturing, and the remaining 6% gender and environment-related sectors.

5.2 Afrobarometer Survey Data and Distance Estimation

The other dataset employed in this paper is the Afrobarometer, “a pan-African series of national public attitude surveys on democracy, governance, and society”, which also includes geo-references for respondents. The Afrobarometer surveys cover the period from 1999 to 2018 and include six rounds (Round 7 covering 2017-2018 is forthcoming). I focus on Round 5 from 2011 to 2013, in order to best match the timing of Chinese aid data. The number of respondents in Round 5 is 45587 across 30 countries. The primary strategy of this paper is to link aid projects to local survey respondents in the Afrobarometer, geolocating and clustering coordinates in a manner consistent with Knutsen et al. (2016) and Isaksson and Kotsadam (2018).

» Figure 1 here «

With precise geographic point coordinates, I match the coordinates of surveyed individuals to aid project sites, to determine whether or not the respondent was within a close distance of at least one project site. While existing studies use a 50 km buffer zone, I employ a 25 km distance on the logic that individuals should witness or gain experience from a new foreign assistance project in order for it to affect their daily surroundings. One might cover 25 km in an average of 30 minutes by vehicle, a distance that many citizens might make routinely, and which might allow them to see a new school or hospital built with Chinese funds, or to hear news about a Chinese loan aid offered to their local governments. This study assumes that people obtain information about foreign assistance in their village, and I advance this assumption to identify disparities between respondents who are in those circles and outside of them. In Figure 1, the buffers capture the effects of Chinese aid projects on individual perceptions of their governments.

Dependent Variable The Afrobarometer survey rounds offer an unprecedented opportunity to study individual-level reactions to important events such as aid projects and the

development of mining sites (Knutsen et al., 2016; Isaksson and Kotsadam, 2018). Specifically, the main dependent variable in this study, corruption perceptions, is best studied from this individual-level perspective. A broad definition of corruption is “the abuse of entrusted power for private gains,” often measured using surveys of individual evaluations of corrupt practices. Studies that rely on country-level aggregations of corruption scores, however, have difficulty capturing the effects of each donor’s aid practices. In turn, they cannot easily identify definite results on the impact of specific aid projects or pinpoint the mechanisms that lead to certain perceptions.

The Afrobarometer data opens a new channel for researchers to identify individuals’ views regarding corruption. It provides detailed questions on the perceived level of corruption in government. The question I employ here asks about respondents’ views of public servants, including government officials, local councilors, members of parliament, and the president. The exact question asks, “How many of the following people do you think are involved in corruption?” The dependent variable has ordinal values ranging between 0 and 3, capturing the response categories ‘None of them (0)’, ‘Some of them (1)’, ‘Most of them (2)’, and ‘All of them (3)’. For example, regarding the corruption of government officials, among all 45587 respondents, 8% answered ‘None of them’, 44% ‘Some’, 27% ‘Most’, 9% ‘All’, and 11% answered ‘don’t know’.

Corruption itself is an essential subject of study, yet the wrongdoings of public officials and elected politicians have broader implications in political science. Dishonesty of elected officials undermines the legitimacy of government by breaking the underlying contract between states and citizens, specifically in democracies. In other words, corruption among the ruling class leads to a loss of confidence in the government and further undermines the state’s legitimacy. Thus, the survey question used in this paper is central to well-functioning government. However, this indicator has inherent drawbacks; it may suffer from bias due to incomplete information, and it is hard to identify the level of corruption before an event

happens. To address those problems, I adopt several strategies in the estimation process, which help to clarify the effects of Chinese aid on African citizens' perceptions of corruption among their governments.

Independent Variable 'Aid projects by China' is the independent variable; it measures the number of Chinese aid projects to which a respondent has access. Though the impact may vary from a direct beneficiary to an indirect audience, this measure serves as a count of opportunities, since respondents are coded according to their presence inside a sphere of influence of Chinese aid projects. The values of the independent variable range from 0 to 30, encompassing those who have never experienced a Chinese aid project and those within 25 km of up to 30 different Chinese aid projects from 2007 to 2014. Among all 45,587 respondents, 14,204 have had contact with more than one project, approximately 60% have had access to fewer than five projects, and 25% have been in proximity to more than 10 projects. The average is 6.8 for respondents with access to one or more projects. Considering the highly skewed nature of the independent variable, I also code it as a dummy variable and use its logged value, neither of which significantly changes the results. Moreover, to evaluate the mechanisms, I add characteristics of aid projects, including the type and targeted sector.

Estimation Strategy As previous studies note, the distribution of aid projects is not random across countries or within a country, causing severe endogeneity problems. For example, China may target regions with high corruption for some reason, or a corrupt country may have a greater chance of getting more assistance from China. Moreover, there may be some confounding variables that both attract Chinese aid to a region and simultaneously affect perceptions of corruption. Such spurious correlations could be driven by variables such as population density, economic activity, and infrastructure access, all of which can affect both corruption and the allocation of aid projects. It may thus be unreliable to estimate the causal effects of aid on corruption by directly testing the correlation between the number of aid projects and perceived levels of political corruption.

To address this potential problem of endogeneity, I employ a set of inferential strategies. First, I compare the effects of implemented versus planned Chinese aid projects. This can serve as a placebo test in that the planned projects should not appear associated with the perceived level of corruption if individuals update their beliefs about government officials through observation of the actual implementation process of the Chinese aid projects.

Second, the regression analysis controls for the number of aid projects by the World Bank in order to address the effects of assistance from other donors and to capture the unique effects of Chinese aid. In the data, 23,221 respondents have had access to World Bank aid, which is almost double the number exposed to Chinese aid (AidData, 2017a). I chose the World Bank since it covers most countries in Africa and is relatively neutral and transparent as a multilateral agency. If the control variable of World Bank aid projects has a positive and statistically significant coefficient, this would imply the aid itself has a corruption-inducing effect and that Chinese aid is not distinguishable in this regard.

Lastly, the estimation includes country-fixed effects that control for national-level variation and that help to identify within-country variation. This strategy holds country-level factors such as regime type, size of the economy, governance, and rules and norms constant, as these factors are often cited as key determinants of corruption in the literature. Using these strategies, I estimate the following regression model:

$$\begin{aligned} \textit{Corruption}_i &= \alpha + \beta_1 \textit{Chinese Aid}_i \\ &+ \beta_2 \textit{Planned Aid}_i + \beta_3 \textit{World Bank Aid}_i + \mathbf{X}_i \gamma + \mu_i + \epsilon_i \end{aligned}$$

where the dependent variable *Corruption* for individual i is regressed on a continuous variable *Chinese Aid* that captures the number of Chinese development projects within one's area (defined as a circle of radius 25km from the respondent's location). *Planned Aid* is a control variable, working as a placebo test to address the concern of selection bias. *World Bank aid* is another control for the effects of aid projects from another donor. To control for

variation in average corruption levels across space and to allow for variation in individual experiences with corruption, the regression includes a vector of country-fixed effects μ_i and demographic controls \mathbf{X}_i , including age, its squared term, gender, urban/rural, education levels and employment status.

6 Main Results

Table 1 presents the results from the estimation, summarizing the outcomes of six regression models. The dependent variable is the perceived level of corruption of government officials in Models (1)-(3) and that of members of parliament in Models (4)-(6). I begin by estimating the models without demographic controls in Model (1) and (4). I then add demographic controls in Models (2) and (5) and additionally control for the number of aid projects funded by the World Bank in Models (3) and (6).

Across all estimated models, the coefficients for *Aid Projects by China* turn out to be positive and statistically significant at the conventional level. Meanwhile, the coefficients for *Aid Projects planned by China* are statistically indistinguishable from zero in all models. This finding suggests that China does not necessarily select into more corrupted areas, but it is instead the implementation of Chinese aid projects that drives the results. The second control variable for *Aid Projects by World Bank* does not seem to exercise influence on perceptions of corruption. Besides, the country-fixed effects and baseline controls do not substantially change the coefficients. Overall, the findings are consistent with hypothesis 1.

» Table 1 here «

Substantively, one Chinese aid project in one's village raises awareness of corruption by approximately 0.005 on the scale from 0 to 3. This is admittedly small-scale variation in spite of its high statistical significance. Nevertheless, considering the difficulty of bringing about a change in perceptions, such effects from Chinese aid should not be considered negligible. To

be specific, respondents who have had any access to Chinese aid have been exposed to 6.8 projects on average. This suggests that people in regions where Chinese aid projects have been carried out are more likely to answer that ‘some or most of their government officials and members of parliament are corrupt.’ Moreover, as people share their experiences, the perceptions can spread through regions, thus amplifying the outcome.

7 Mechanisms

Additional analyses provide some evidence of the mechanisms linking Chinese foreign aid to perceived levels of political corruption. The results indicate that the specific type of aid, the targeted sector of development projects, and the nationality of implementing agencies have disparate effects on how residents perceive corruption in recipient regions. These analyses highlight how and why Chinese aid has changed African citizens’ beliefs about corruption among their political leaders and government officials.

7.1 Rent-Seeking Mechanism

To test hypothesis 2, I estimate the effects of the type of aid flows. Table 2 presents the estimation of six models in which the independent variables represent the number of each flow type implemented in Chinese aid projects. The dependent variable is the perceived level of corruption of local councilors in Model (1)-(2), that of members of parliament in Model (3)-(4), and that of Presidents in Model (5)-(6). Across Models (1)-(6), the coefficients for “Grant” are positive and statistically significant at a modest level, and the coefficients for “Technical Assistance” are also positive and significant, excepting Model (6) on the corruption of Presidents. The coefficients for “Loan” are positive though not statistically significant. These findings generally confirm the hypothesis that grants rather than loans facilitate rent-seeking behavior. Whether citizens are aware of the type of aid projects or not, the lived experience related to each aid flow type must be sufficiently different to alter

respondents' perceptions of corruption.

For instance, in Mozambique, Exim Bank of China loaned 416.5 million USD for road rehabilitation, and China offered a grant for the construction of an agro-technology demonstration center (total commitments of the project is estimated to be 11.8 million USD) (Bluhm et al., 2018). Of course, there are conceivable differences in practices associated with loans and grants; one possibility is that the loan was conditioned and monitored by other actors from the central government while the grant was provided directly at a local level and was not under strict monitoring. This argument would support the rent-seeking mechanism that grants are more likely to be a source of private gains for authorities, resulting in higher corruption. On the other hand, another possibility is that loan aid represents a flow of money only while grants involve the flow of people, material, and money. In this case, the norm diffusion mechanism might better explain the results. Hence, more analysis is required to clarify the dominant mechanism.

» Table 2 here «

7.2 Accountability Mechanism

To test hypothesis 3, I estimate the effects of particular sectors of aid projects. Table 3 presents the estimation of six models in which the independent variables are the number of each sector represented in the Chinese aid projects. Models (1)-(2) focus on the corruption of local councilors, Models (3)-(4) on the corruption of members of parliament, and Models (5)-(6) on the corruption of Presidents. Across Models (1)-(6), the coefficients for “Social Infrastructure” are positive and statistically significant. However, the coefficients for “Economic Infrastructure”, “Production and Manufacture”, and “Other sectors” are not consistent across the Models. “Economic Infrastructure” has positive coefficients but is statistically significant only in Models (1) and (5). “Production and Manufacture” have negative

coefficients for Models (1) to (4), indicating that aid for the agriculture and manufacturing industries do not evoke perceptions of corruption.

» Table 3 here «

The findings are consistent with hypothesis 3: social infrastructure assistance undermines the accountability of officials by substituting for the government's provision of public goods. The aid projects classified into the social infrastructure sector are mostly essential public services like 'elementary education', 'health services', and 'water supply and sanitation'. Social infrastructure aid can be a signal of low capacity if the local government is perceived as not working effectively to provide such necessary services. In other words, when people witness that China supplies those services, they may not expect their own government to do it or may not perceive their government as capable of doing it. As governments become less accountable to their populations in this way, corruption may worsen, as expected by the theory.

On the other hand, economic infrastructure assistance has a distinct effect. Such aid includes examples like the Exim Bank of China offering a loan of 416.5 million USD for the Beira-Machipanda road rehabilitation in Mozambique and the provision of 100 buses to Sudan for transport enhancement. These cases, intuitively, are not substituting for local public services, so neither likely undermines the accountability of the authorities or signals low governmental capacity to the public. Thus, whereas aid in the social infrastructure sector induces perceptions of higher corruption, aid in other sectors do not necessarily have this adverse effect.

7.3 Norm Diffusion Mechanism

To test hypothesis 4, I estimate the effects of the implementing agency of aid projects. Table 4 shows the estimation of six models that include a dummy variable indicating whether or

not a Chinese company implemented the aid projects. The data indicate that among the 14,204 respondents within the range of a recorded aid project, 3,443 saw a Chinese agency implement the project, and 2,109 saw an African or international agency implementing the project. Again, Models (1)-(2) focus on the corruption of local councilors, Models (3)-(4) on the corruption of Members of Parliament, and Models (5)-(6) on the corruption of Presidents. Across Models (1)-(6), the coefficients for “Chinese Implementing Agency” are positive and statistically significant, while the coefficients for “African or International Implementing Agency” are not significant across the estimations. Further, the coefficients for Chinese agency are relatively large, which implies that the presence of a Chinese aid project has a substantively important effect on perceptions of corruption.

These findings are consistent with hypothesis 4 on norm diffusion. Presumably, when a Chinese company works in an aid location, there will be a higher chance of interaction between the Chinese and the African citizens. According to TI, China ranks 87 out of 180 countries and scores 39 out of 100, which represents a relatively poor record of transparency. Though some African states may be better or worse than China in this regard, traditional donors and multilateral aid organizations are much less corrupt. For example, the US ranks 22, the UK and Germany rank 11, and Japan ranks 18. Therefore, China is more likely to diffuse norms of favoritism, cronyism, corruption or simply not caring corruption relative to other donors. This finding is strengthened by news articles that accuse Chinese companies of corrupt labor practices and pervasive materialism(Goldstein, 2018). Consequently, when Chinese companies implement aid projects, people are more likely to adapt to these Chinese norms, so they perceive higher political corruption.

» Table 4 here «

8 Conclusion

Despite insufficient attention in the literature, political corruption represents a crucial subject in the study of foreign aid. It harms institutional development and governance, and it is known to aggravate poverty, wreck domestic programs for basic needs, distort fair competition, and affect the distribution of resources and the process of economic growth (Schudel, 2008). Nevertheless, due to measurement difficulties, studies that evaluate the determinants of perceived corruption with quantitative evidence have been limited. Thanks to the new dataset from AidData and the sustained and widespread data collection efforts from Afrobarometer, scholars are now able to examine the effects of foreign funds and projects on the views of Africans.

This paper aimed to provide systematic evidence of Chinese foreign aid's effect on perceptions of corruption among African governments. It confirms that Chinese aid may undermine people's trust in the transparency of their governments. While numerous studies have considered potential differences between Chinese aid and aid from other donors in terms of its effect on recipient communities, only a few studies have hinted at a clear impact, and often with somewhat mixed results. In a contribution to this literature, I show the adverse effects of Chinese aid projects in African recipients' perceptions of local corruption, and I underscore plausible channels explaining why the people living near the aid sites would experience and perceive more corruption. Estimations show that the specific characteristics of aid projects exert an important influence on perceived corruption, with grants rather than other types, the social infrastructure sector rather than other sectors, and Chinese agencies rather than African or international ones leading to higher levels of perceived political corruption. These findings imply that Chinese aid may provoke rent-seeking behaviors among government officials, undermine the accountability of authority, and diffuse a norm of corruption or weak control of corruption.

Despite the precise nature of the results, additional empirical tests could improve the robustness of the examination. First, region fixed effects could be added; though I employ several identification strategies, the risk of endogeneity remains high since regions may have inherent characteristics that correlate with corruption. In addition, to evaluate variation over time in citizens' perceptions of corruption, future studies might adopt a difference-in-differences estimation approach. Unfortunately, due to data limitations, I do not have access to panel data and valid regional measures for this study.

Furthermore, the mechanisms I propose merit further examination. An inevitable limitation of studies of corruption is that they are rarely able to capture actual evidence of corruption and instead must rely on perceptions measured by a survey. Nevertheless, corruption remains a critical issue, especially in governance and aid efficiency, so continued efforts to identify causal channels are essential. Additional studies on the potential causal mechanisms linking aid to corruption would add importantly to the literature, as well.

The findings offer several important policy implications. First, for developing countries, getting more Chinese aid is not always desirable. If Chinese aid harms the relationship between governments and citizens, it may further undermine state legitimacy and weaken governance. Second, for China, leaders might reconsider their aid practices, since the result indicates that people under-appreciate not only their own governments but also the donor, China itself. If China intends to gain a positive image and influential clout among African citizens, it might aim to counter the negative effects of its aid and build up a more healthy relationship as a donor. Mutual understandings matter critically when it comes to the effectiveness and efficiency of aid projects. Lastly, for other donors, as Chinese expands its role in Africa, they might find ways to improve aid practices for better governance and higher effectiveness and to address corruption problems in developing countries. Since China is not a member of OECD DAC or TI, it could be an effective strategy to draw China into this international or multilateral environment to reform its aid practices.

References

- AidData. 2017a. “WorldBank Geocoded Research Release Level1 v1.4.2 geocoded dataset.”
Williamsburg, VA and Washington, DC: AidData .
URL: *Accessed on [May 14, 2019]. <http://aiddata.org/research-datasets>*
- AidData, Research & Evaluation Unit. 2017b. “Geocoding Methodology, Version 2.0.”
Williamsburg, VA: AidData at William & Mary .
URL: *<https://www.aiddata.org/publications/geocoding-methodology-version-2-0>*
- Alden, Chris, and Ricardo Soares de Oliveira. 2008. “China Returns to Africa: Anatomy of an Expansive Engagement.”
- Alesina, Alberto, and Beatrice Weder. 2002. “Do Corrupt Governments Receive Less Foreign Aid?” *American Economic Review* 92 (4): 1126–1137.
- Alesina, Alberto, and David Dollar. 2000. “Who gives foreign aid to whom and why?”
Journal of economic growth 5 (1): 33–63.
- Asongu, Simplice A. 2012. “On the Effect of Foreign Aid on Corruption.” *SSRN Electronic Journal* .
- Autor, David H., David Dorn, and Gordon H. Hanson. 2016. “The China Shock: Learning from Labor-Market Adjustment to Large Changes in Trade.” *Annual Review of Economics* 8 (1): 205–240.
- Baldwin, Kate, and Matthew S Winters. 2018. Bypass Aid and Perceptions of Local Government Performance and Legitimacy. Technical report AidData Working Paper.
- Benabdallah, Lina. 2019. “Explaining attractiveness: Knowledge production and power pro-

- jection in China's policy for Africa." *Journal of International Relations and Development* 22 (2): 495–514.
- BenYishay, A., Rotberg R. Wells J. Lv Z. Goodman S. Kovacevic L. Runfolo D. 2017. "Geocoding Afrobarometer Rounds 1 - 6: Methodology & Data Quality." *Williamsburg, VA. AidData* .
- Björkdahl, Annika, and Ivan Gusic. 2015. "'Global' norms and 'local' agency: frictional peacebuilding in Kosovo." *Journal of International Relations and Development* 18 (3): 265–287.
- Blair, Robert A., and Philip Roessler. 2018. "The Effects of Chinese Aid on State Legitimacy in Africa: Cross-National and Sub-National Evidence from Surveys, Survey Experiments, and Behavioral Games."
- Bluhm, Richard, Axel Dreher, Andreas Fuchs, Bradley Parks, Austin Strange, and Michael Tierney. 2018. "Connective Financing: Chinese Infrastructure Projects and the Diffusion of Economic Activity in Developing Countries." *AidData Working Paper (#64)*.
- Boone, Peter. 1996. "Politics and the effectiveness of foreign aid." *European Economic Review* 40 (2): 289–329.
- Brautigam, Deborah. 2011. *The dragon's gift: the real story of China in Africa*. OUP Oxford.
- Brautigam, Deborah A., and Stephen Knack. 2004. "Foreign Aid, Institutions, and Governance in Sub-Saharan Africa." *Economic Development and Cultural Change* 52 (2): 255–285.
- Brazys, Samuel, and Krishna Chaitanya Vadlamannati. 2018. "Curse with Chinese Characteristics? Chinese Development Flows and Economic Reforms." *AidData Working Paper* 52.

- Briggs, Ryan C. 2018. "Receiving Foreign Aid Can Reduce Support for Incumbent Presidents." *Political Research Quarterly* p. 106591291879848.
- Christensen, Zachary, Richard Nielsen, Daniel Nielson, and Michael Tierney. 2011. Transparency Squared: The Effects of Donor Transparency on Aid Recipients' Corruption Levels. In *Meeting of the International Political Economy Society, Cambridge, Massachusetts*. pp. 12–13.
- Dreher, Axel, and Andreas Fuchs. 2011. Rogue Aid? The Determinants of China's Aid Allocation.
- Dreher, Axel, Andreas Fuchs, Brad Parks, Austin M Strange, and Michael J Tierney. 2018. "Apples and Dragon Fruits: The Determinants of Aid and Other Forms of State Financing from China to Africa." *International Studies Quarterly* 62 (1): 182–194.
- Dreher, Axel, Andreas Fuchs, Roland Hodler, Bradley C. Parks, Paul A. Raschky, and Michael J. Tierney. 2016. Aid on Demand: African Leaders and the Geography of China's Foreign Assistance.
- Dunning, Thad. 2004. "Conditioning the Effects of Aid: Cold War Politics, Donor Credibility, and Democracy in Africa." *International Organization* 58 (02).
- Gehring, Kai, Lennart Kaplan, and Melvin H. L. Wong. 2019. "Aid and Conflict at the Sub-National Level: Evidence from World Bank and Chinese Development Projects in Africa."
- Goldstein, Joseph. 2018. "Kenyans Say Chinese Investment Brings Racism and Discrimination."
- URL:** <https://nyti.ms/2AaHvCa>

- Gross, Lisa. 2015. "The journey from global to local: norm promotion, contestation and localisation in post-war Kosovo." *Journal of International Relations and Development* 18 (3): 311–336.
- Guiteras, Raymond P., and Ahmed Mushfiq Mobarak. 2016. "Does Development Aid Undermine Political Accountability? Leader and Constituent Responses to a Large-Scale Intervention."
- Humphrey, Chris, and Katharina Michaelowa. 2019. "China in Africa: Competition for traditional development finance institutions?" *World Development* 120: 15–28.
- Isaksson, Ann-Sofie, and Andreas Kotsadam. 2018. "Chinese aid and local corruption." *Journal of Public Economics* 159: 146–159.
- Knack, Stephen. 2001. "Aid Dependence and the Quality of Governance: Cross-Country Empirical Tests." *Southern Economic Journal* 68 (2): 310.
- Knutsen, Carl Henrik, Andreas Kotsadam, Eivind Hammersmark Olsen, and Tore Wig. 2016. "Mining and Local Corruption in Africa." *American Journal of Political Science* 61 (2): 320–334.
- Leung, T.K.P., and Y.H. Wong. 2001. "The ethics and positioning of guanxi in China." *Marketing Intelligence & Planning* 19 (1): 55–64.
- Mattesini, Fabrizio, and Alessia Chiara Isopi. 2008. "Aid and Corruption: Do Donors Use Development Assistance to Provide the 'Right' Incentives?" *SSRN Electronic Journal* .
- Menard, Audrey-Rose, and Laurent Weill. 2016. "Understanding the link between aid and corruption: A causality analysis." *Economic Systems* 40 (2): 260–272.
- Meservey, Joshua. 2018. Chinese Corruption in Africa Undermines Beijing's Rhetoric About Friendship with the Continent. Technical report REPORT Global Politics.

- Mohamed, Masoud Rashid, Shivee Ranjane Kaliappan, Normaz Wana Ismail, and W.N.W Azman-Saini. 2015. "Effect of foreign aid on corruption: evidence from Sub-Saharan African countries." *International Journal of Social Economics* 42 (1): 47–63.
- Moyo, Dambisa. 2009. *Dead aid: Why aid is not working and how there is a better way for Africa*. Macmillan.
- Naim, Moises. 2007. "Rogue aid." *Foreign policy* (159): 96.
- Nymalm, Nicola. 2019. "The economics of identity: is China the new 'Japan problem' for the United States?" *Journal of International Relations and Development* 22 (4): 909–933.
- Okada, Keisuke, and Sovannroeun Samreth. 2012. "The effect of foreign aid on corruption: A quantile regression approach." *Economics Letters* 115 (2): 240–243.
- Petrikova, Ivica. 2016. "Promoting 'good behaviour' through aid: do 'new' donors differ from the 'old' ones?" *Journal of International Relations and Development* 19 (1): 153–192.
- Schudel, Carl Jan Willem. 2008. "Corruption and Bilateral Aid." *Journal of Conflict Resolution* 52 (4): 507–526.
- Svensson, Jakob. 2000. "Foreign aid and rent-seeking." *Journal of International Economics* 51 (2): 437–461.
- Tavares, José. 2003. "Does foreign aid corrupt?" *Economics Letters* 79 (1): 99–106.
- Tseng, Huan-Kai, and Ryan Krog. 2016. *No Strings Attached : Chinese Foreign Aid and Regime Stability in Resource-Rich Recipient Countries*.
- Vera Z. Eichenauer, Andreas Fuchs, Lutz Brückner. 2018. "The Effects of Trade, Aid, and Investment on China's Image in Developing Countries.". AidData at William & Mary.

Wright, Joseph, and Matthew Winters. 2010. "The Politics of Effective Foreign Aid." *Annual Review of Political Science* 13 (1): 61–80.

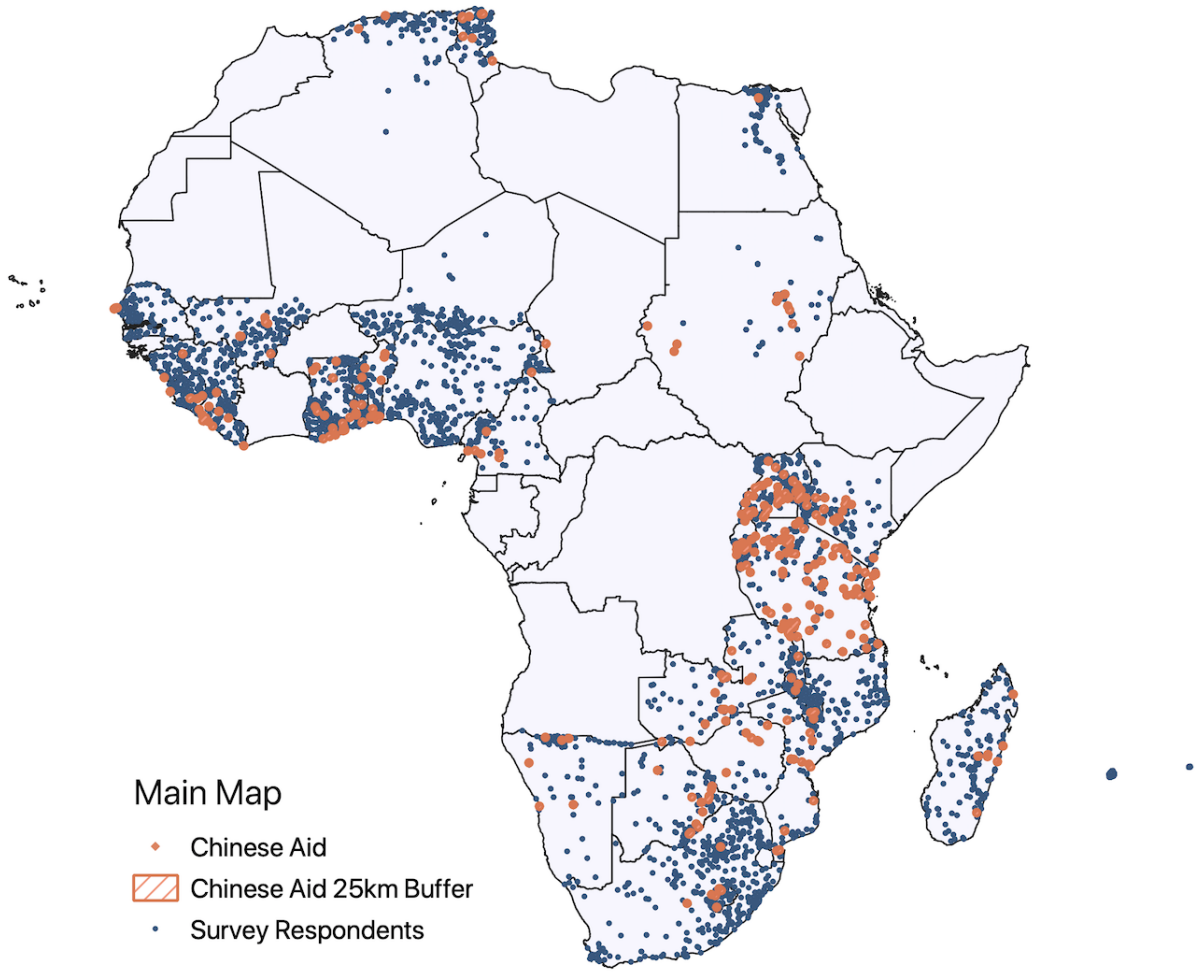


Figure 1: Location of Chinese aid project sites and Afrobarometer survey clusters

Table 1: The Impacts of Chinese Aid on Corruption Perceived by Individuals

	(1)	(2)	(3)	(4)	(5)	(6)
	Government Officials			MPs		
Aid Projects by China	0.0056** (0.001)	0.0026** (0.001)	0.0021* (0.001)	0.0073** (0.001)	0.0046** (0.001)	0.0047** (0.001)
Aid Projects Planned by China	-0.0206 (0.027)	-0.0236 (0.027)	-0.0240 (0.027)	-0.0310 (0.027)	-0.0344 (0.027)	-0.0343 (0.027)
Aid Projects by World Bank			0.0005 (0.001)			-0.0000 (0.001)
Baseline Controls	No	Yes	Yes	No	Yes	Yes
Country FE	Yes	Yes	Yes	Yes	Yes	Yes
Observations	40523	40073	40073	38741	38312	38312

Standard errors in parentheses

+ $p < 0.10$, * $p < 0.05$, ** $p < 0.01$

Table 2: The Impacts of Chinese Aid on Corruption by Flow Type

	(1)	(2)	(3)	(4)	(5)	(6)
	Local Councilors		MPs		President	
Grant	0.0064** (0.002)	0.0045* (0.002)	0.0062** (0.002)	0.0039+ (0.002)	0.0071** (0.002)	0.0043* (0.002)
Loan	0.0086** (0.003)	0.0046 (0.003)	0.0033 (0.003)	0.0004 (0.003)	0.0029 (0.003)	-0.0007 (0.003)
Technical Assistance	0.0156** (0.004)	0.0110** (0.004)	0.0119** (0.004)	0.0070+ (0.004)	0.0116** (0.004)	0.0054 (0.004)
Scholarship and Training	0.0378* (0.018)	0.0383* (0.018)	0.0196 (0.018)	0.0288 (0.018)	-0.0006 (0.019)	0.0120 (0.019)
Baseline Controls	No	Yes	No	Yes	No	Yes
Country FE	Yes	Yes	Yes	Yes	Yes	Yes
Observations	37808	37390	38741	38312	38649	38220

Standard errors in parentheses

+ $p < 0.10$, * $p < 0.05$, ** $p < 0.01$

Table 3: The Impacts of Chinese Aid on Corruption by Purpose Sector

	(1)	(2)	(3)	(4)	(5)	(6)
	Local Councilors		MPs		President	
Aid Projects for Social Infrastructure	0.0138** (0.001)	0.0105** (0.002)	0.0074** (0.001)	0.0045** (0.001)	0.0061** (0.002)	0.0029+ (0.002)
Aid Projects for Economic Infrastructure	0.0059+ (0.003)	0.0028 (0.003)	0.0034 (0.003)	0.0008 (0.003)	0.0064* (0.003)	0.0032 (0.003)
Aid Projects for Production / Manufacture	-0.0200+ (0.012)	-0.0201+ (0.012)	-0.0088 (0.011)	-0.0134 (0.011)	0.0325** (0.012)	0.0242* (0.012)
Aid Projects for Other sectors	-0.0091 (0.010)	-0.0071 (0.010)	0.0325** (0.010)	0.0331** (0.010)	0.0058 (0.011)	0.0057 (0.011)
Baseline Controls	No	Yes	No	Yes	No	Yes
Country FE	Yes	Yes	Yes	Yes	Yes	Yes
Observations	37808	37390	38741	38312	38649	38220

Standard errors in parentheses

+ $p < 0.10$, * $p < 0.05$, ** $p < 0.01$

Table 4: The Impacts of Chinese Aid on Corruption by Implementing Agency

	(1)	(2)	(3)	(4)	(5)	(6)
	Local Councilors		MPs		President	
Chinese Agency	0.1548** (0.017)	0.1217** (0.017)	0.1199** (0.016)	0.0886** (0.016)	0.1259** (0.017)	0.0888** (0.017)
African/International Agency	0.0386+ (0.022)	0.0149 (0.022)	0.0283 (0.022)	0.0051 (0.022)	0.0557* (0.023)	0.0334 (0.023)
Baseline Controls	No	Yes	No	Yes	No	Yes
Country FE	Yes	Yes	Yes	Yes	Yes	Yes
Observations	37808	37390	38741	38312	38649	38220

Standard errors in parentheses

+ $p < 0.10$, * $p < 0.05$, ** $p < 0.01$

Notes

¹Guan xi (关系) is a Chinese term meaning relationship or connection; it is a Chinese cultural feature that underscores personal relationships and that also affects Chinese business practices. In English, it is often translated as favoritism or cronyism.

²Those countries are Algeria, Benin, Botswana, Burundi, Cameroon, Egypt, Ghana, Guinea, Kenya, Lesotho, Liberia, Madagascar, Malawi, Mali, Mauritius, Morocco, Mozambique, Namibia, Niger, Nigeria, Senegal, Sierra Leone, South Africa, Sudan, Tanzania, Togo, Tunisia, Uganda, Zambia, Zimbabwe

³The precision code is an eight-point, ordinal scale that captures how precisely a record has been geocoded, where 1 is the highest level of spatial precision and 8 is the lowest level of spatial precision. Precision code 1 is for an exact location, such as a populated place or a physical structure. Code 4 indicates a first-order administrative division, such as a province or state. Among the 1036 projects, 58% are coded 1, and only 15% are coded 4.