
Explaining the transition from forced to free labour in colonial Angola's diamond mines

● LEO DOLAN

Universidad Carlos III de Madrid

ldolan@clio.uc3m.es | ORCID 0009-0004-2554-7827

ABSTRACT

This paper examines the evolution of coercive labour institutions in Portuguese Africa through a detailed case study of Companhia de Diamantes de Angola (Diamang), one of the region's most significant colonial enterprises. Utilising a theoretical economic model, the study delves into the persistence of these extractive practices and their eventual transformation into more inclusive, market-driven systems. By charting Diamang's historical trajectory, the paper explores how this deeply entrenched system transitioned from coercive labour to a free-market system, catalysed by significant socio-political changes such as the abrupt independence of neighbouring countries, domestic unrest and international pressures. The model provides new insights into the historical dominance of coercive labour institutions and reveals how external shocks can precipitate rapid institutional change. Ultimately, this study enhances our understanding of colonial labour market dynamics and highlights the evolving nature of extractive practices within economic history, with specific reference to the understudied case of the Portuguese colonial empire.

KEYWORDS: Angola, monopsony power, coercive labour, colonialism.

JEL CODES: J47, J42, N37, F54.

1. Introduction

A growing body of literature has highlighted the long-term harmful effects of forced labour, as an extractive institution that has played a central role in shaping economies (Abad and Maurer 2024). However, major works on this topic predominantly focus on the decline of institutional slavery (Hopkins 1973; Cooper 1980; Lovejoy 1983; Austin 2005). Less attention has been given by scholars to the reshaping and demise of state-sanctioned forced labour regimes during the 20th-century period of colonial rule (Van Waijenburg 2018; Archibong and Obikili 2023). This paper combines an in-depth case study approach with a simple economic model to unearth the mechanisms that drive

Received: 31 October 2023 – Fecha de recepción: 31 octubre 2023

Accepted: 3 September 2024 – Fecha de aceptación: 3 septiembre 2024

Published online: 15 November 2024 – Publicado online: 15 noviembre 2024

Revista de Historia Industrial–Industrial History Review, vol. XXXIII, no. 92, November 2024. 161-198.

ISSN: 1132-7200 (Print) - 2385-3247 (Online) | <https://doi.org/10.1344/rhihr.44588>

the use of forced labour, whilst also showing what forces can help in the transformation to a non-coercive equilibrium.

The chosen case to explore colonial forced labour is the *Companhia de Diamantes de Angola*, commonly known (and hereafter referred to) as *Diamang*. This entity stands out as one of the most substantial, profitable and largest employers within the Portuguese colonial empire (Cleveland 2005). Operating within an institutional environment that tolerated forced labour for a prolonged period, it possibly represents one of the last-known instances of large-scale forced labour being openly employed by a modern capitalist firm over an extended duration.

The distinctiveness of *Diamang's* labour practices compared to other companies operating in colonial Africa arises from an unusual blend of economic and institutional circumstances. This company operated within a distinctly Lusophone framework of coercive indigenous labour market institutions, which appeared largely resistant to international reformative pressures (Newitt 1981; Keese 2012). This environment enabled the company to resort to coercive measures to meet the escalating demand for workers. As a result, *Diamang* continued to function well into the second half of the 20th century, maintaining a workforce that was largely coerced into service and compensated far below "free market" wage rates. This created an environment of notably low living standards among *Diamang* workers, in comparison to other mining regions of Africa during the same period (Dolan 2023).

However, an unforeseen and surprising divergence from its established trajectory occurred after 1960. Over a span of 15 years, miners' wages increased fourfold and labour recruitment shifted to an entirely free market approach, ending the long-standing practice of coercion. This major shift was provoked by rapid external socio-political changes across the African continent, including burgeoning domestic independence movements and the swift decolonization of neighbouring countries.

This paper takes a novel approach to studying the persistence and dissolution of forced labour in colonial Africa by introducing a simple monopsonistic model, to explain how, given certain assumptions about the institutional setup of the labour market, a coercive equilibrium will be reached and maintained. It then expands upon this model by illustrating how extractive industries, despite their vulnerability to exploitative labour policies, can under certain conditions evolve towards more inclusive and developmentally oriented institutional environments. The model adds to the historical debate on why coercive institutions have often dominated labour markets throughout history, but also why, after certain shocks to such systems, they have collapsed, allowing a transition to free wage labour.

This study also further contributes to the relatively small but expanding research area within the field of economic history that employs a quantita-

tive approach to studying the Portuguese colonial empire (Havik, Keese and Santos 2015; Alexopoulou and Juif 2017; Jones and Gibbon 2024; Goulart 2024; Carvalho and Palma 2024; Denton-Schneider 2024). This body of work, utilising measurable and comparative methodologies, increasingly highlights the distinct trajectory of this empire, relative to other European powers. Due to the Portuguese empire's unique approach to colonialism, particularly with respect to the use of forced labour, as well as its late departure from Africa, it provides a valuable historical context for understanding labour market institutions and their impact on long-term development patterns, particularly under extractive regimes.

Section 2 of this paper provides context by giving an overview of the use of forced labour by companies in British, French and Belgian colonial Africa. Section 3 then turns to the Portuguese empire in Africa, with a particular focus on Diamang, and relates its historiography on forced labour to that of non-Lusophone African empires. Sections 4 and 5 explain the model and Section 6 concludes.

2. Forced labour for profit in colonial Africa

It is well established that involuntary labour was common across Africa during the pre-colonial period, as noted by scholars such as Austin (2005), Patterson (2018) and Stilwell (2014). The persistence of this practice under various forms of forced labour systems, following European formal colonisation, contrasts starkly with one of the stated motivations for colonisation, which was the abolition of internal slavery prevalent across the continent. The discrepancy between the stated aims of the colonial powers and their subsequent actions has been critically examined by Van Waijenburg (2018), Gardner (2023) and Cooper (1996), among others, who highlight the complexities and contradictions inherent in the colonial motives.

The shift away from using forced labour for private gain by colonial powers was primarily driven by increasing international pressure. This largely stemmed from initiatives like the 1930 International Labour Organization (hereafter ILO) convention, which explicitly demanded the immediate cessation of forced labour benefiting private entities, including individuals, companies, or associations (ILO 1930). This specific directive aimed to abruptly curtail the use of forced labour for direct profit-making activities, differentiating it from labour employed for public works projects (where the timeline to reduce these practices was less specific). However, the implementation of this provision faced significant challenges due to the entrenched interests within colonial Africa, which favoured maintaining forced labour due to its positive impact on profitability.

Despite the persistence of forced labour in various forms throughout the colonial period, a practice that arguably continued well into the post-colonial period (Freund 1984; Gardner 2023), a closer examination of its use by firms in Africa reveals a notable decline within the British, French and Belgian empires over the interwar period. This decline resulted from a shift in the consensus that forced labour could no longer be deemed acceptable when its benefits flowed solely to private capital, rather than serving the broader public good.

2.1. British colonial Africa

Britain was the only colonial power to endorse the 1930 Forced Labour Convention, a decision seemingly informed by the belief that Britain had nearly eliminated the use of forced labour (Orde-Brown 1933; Cooper 1996). This stance sets Britain somewhat apart from its contemporaries by demonstrating an earlier commitment to reforming such practices. A constant dilemma faced by British colonial officials in the interwar period was the nuanced distinction between forced labour for public good versus private benefit and the complex ethics of defining forced labour, especially when framed as contributing to community development. Elisabeth McMahan encapsulates this issue in a thought-provoking query:

At what moment was labour “coerced”? If the government told villagers to build a school for their children, was this a form of forced labour? If a government told a community to build roads so they could bring their clove crops to market more efficiently, was this coerced labour? (McMahan 2017, as cited in Gardner 2023)

Thus, whilst forced labour in British Africa persisted up to and during World War II, it was relatively rare, from an earlier stage, for African workers to be utilised for the profit of capitalistic employers. This is exemplified by the case of the infamous Nigerian tin mines, studied by Bill Freund. Although conditions were undoubtedly poor, this case study demonstrates that by the early 20th century, even though firms operating there clearly “aspired above all to a system of intensely coerced labour within a limited zone”, colonial administrators were increasingly reluctant to facilitate this. By the early 1920s, the labour debate had been settled in favour of an exclusively voluntary labour service (Freund 1981, p. 75; Falola 1987, p. 102).

Another notable instance, which illustrates the British cessation of tolerance for forced labour by commercial interests, can be seen in the infamous mines of Southern Rhodesia, where forced labour was endemic from the beginning of the 20th century until 1912 (Van Onselen 1980). However, after

this particularly coercive period, market forces were somewhat progressively allowed to play a dominant role in ensuring that the demand of employers was met by a free workforce. From this period onwards, there is a continuous decrease in the number of workers being forcefully recruited, until eventually in 1933, the authority tasked with forceful recruitment, the Rhodesian Native Labour Bureau, was disbanded, as its services of forceful recruiting labour were no longer deemed to be necessary to meet mining labour demand.

The portrayal of these mines tells a depressing story, as wages were not only low, but declined over time due to various labour market interventions by the Southern Rhodesian government, following pressure from the mining industry (Mosley 1984, Van Onselen 1980). Although the British colonial administration changed to a more progressive stance earlier than other African colonies, barring corporations from relying heavily on forced labour within its territories, Britain still applied taxes and other indirect methods to induce men to work in tough jobs in poor conditions.

In summary, as has been noted in Cooper's seminal work on labour practices in British and French Africa, British officials occasionally turned to "a hefty dose of forced labour" in response to labour shortages during the inter-war period (Cooper 1996, p. 46). However, Cooper also argues convincingly that British labour policy underwent a significant transformation throughout the 20th century. Initially marked by the brutality and coercion seen in other European countries' colonies, British labour practices transitioned more rapidly to a reliance on waged labour, often drawn from impoverished hinterlands. However, it is important to acknowledge that this transition did not eliminate the benefits to British subjects or the British Exchequer from continued forced labour in Africa. As discussed below, British capital still profited primarily through participation in companies operating in other African colonies.

2.2. *French colonial Africa*

In the case of French colonial tolerance to forced labour for colonial enterprises, a significant distinction arises as a result of the geographical expanse of the French empire, which stretched from West to Central Africa and included parts of the East African coast. This vast territorial range necessitated varied administrative strategies and led to different attitudes toward the use of forced labour, depending on the specific colonial context. Such diversity must be carefully considered when discussing labour practices within French colonial domains.

The French *corvée* system that obliged African males to work a set number of days per year was applied differently across the French colonies (Van Waijenburg 2018). This coercive method of labour recruitment for unpaid

work on local public works projects declined more rapidly in wealthier colonial states, whereas poorer colonies tended to rely more heavily on forced labour until later in the colonial period. Van Waijenburg's research further shows that the 1930 ILO convention did not significantly alter the recruitment practices under the *corvée* system, as it was classified as a system to recruit "communal labour"—a classification that exempted it from the ban on forced labour due to its perceived benefit to the wider public. This distinction was crucial, as the ILO's primary restrictions targeted the coercion of labour when utilised by private enterprises. Consequently, companies operating within French Africa found their longstanding practices of profiting directly from forced labour subjected to intensified international scrutiny. This scrutiny compelled them to either reform these practices or disguise them more effectively from the global community's view.

Fall (2017) highlights these evolving conditions by first showing the prevalence of forced labour in French West Africa (hereafter FWA) up to 1930. The colonial administration readily facilitated the provision of inexpensive labour to private enterprises, often under inhumane conditions. As in other regions, this system was rationalised by what was termed "the mentality of natives", a justification widely used to exploit local populations under the guise of inherent African cultural traits of idleness (Fall 2017, p. 7). However, in the 1930s, he argues, a significant shift in forced labour practices is seen. This change became particularly evident after 1936 when the Popular Front came to power in France, initiating colonial reforms. Among these, the introduction of the *rachat* policy in 1937 was particularly notable (Fall 2017, p. 914). This policy allowed Africans to buy their way out of forced labour, marking a pivotal change in labour administration within French colonies.

Evidence of the impact of changes to forced labour policies is seen at Société Anonyme des Cultures de Diakandapé (hereafter SACD) in Mali. After 1930, the French government continued to permit forced recruitment for private enterprises when a labour shortage could significantly affect business operations. However, as Rodet (2014) highlights, the situation at SACD began to change rapidly post-1937 as workers became more aware of their new employment rights. This awareness led to demands for better treatment and higher wages. The *rachat* policy, in particular, allowing workers to buy their way out of forced labour, began to influence behaviour, with workers threatening to execute such an option if better wages were not paid.

The diminution in the direct application of coercive labour methods is further demonstrated by the labour practices of the Société des Salins du Sine-Saloum Kaolack. From the early 1940s, acting on directives from the Governor General, who feared a backlash from workers if aggressive forced labour systems were widely utilised, the company turned instead to employing more convict labour. As highlighted by Archibong and Obikili (2023), colonial eco-

conomic motivations for forced labour often influenced the rate of African imprisonment, indirectly increasing the supply of individuals available for involuntary labour. Therefore, one should not immediately assume that this is a less coercive system than typical methods of forced labour. However, as the following section will show, the need to rely on convict labour, due to the government's hesitancy to provide involuntary labour, was a constraint entirely alien to Portuguese employers at the time. During this period and for several decades after, they had an abundant supply of forced labour readily available through open collaboration with the colonial state.

The French formally abolished the use of forced labour in its colonies in 1946, however, as the above has highlighted the beginning of the cessation of forced African labour by companies in FWA started further back in time, in 1937, or even earlier in some instances.

2.3. *Belgian colonial Africa*

Despite the brutal reputation of the Belgian Congo, particularly the infamous “red rubber” period whilst under the direct control of King Leopold II (Lowe and Montero 2021), it was the first colonial territory in Africa to ban forced labour for private enterprises, a policy instituted with the *Charte Coloniale* of 1908. This legislative shift, influenced by the controversy around King Leopold's rule, aimed to establish models more closely resembling European methods of salaried employment as the standard for organising labour in the Congo (Seibert 2011, p. 371). However, a few years after World War I, as the global demand for Congolese exports, crops and minerals surged, the Governor General, Maurice Lippens, formally exerted direct pressure on colonial government administrators to ensure a steady supply of workers to the colonies' plantations and mines (Marchal 2017).

The fact that the colonial governor felt the need to formally pressure administrators highlights a tension that resulted from a distinct change in attitudes among Belgian colonial authorities that occurred over the interwar years (Seibert 2011, p. 371). There was a significant shift in the thinking among Belgian Congo administrators away from the misguided belief that African workers had fundamentally different incentives towards work as a result of their race. This shift acknowledged that labour could be successfully stimulated through the motivational force of wages and other forms of compensation.

Examining two colossi of the Belgian Congo economy during this period, Union Minière du Haut-Katanga (hereafter UMHK) and the Lever Brothers subsidiary, Les Huileries du Congo Belge (hereafter HCB), reveals how colonial Belgian attitudes towards engaging forced labour for profit evolved in the 1920s and early 1930s in the colony. Marchal (2017) explores the ex-

exploitative practices of HCB during this period and highlights the strategic preference of British entrepreneurs for the Belgian Congo over British Nigeria—then the largest palm oil producer—citing reluctance by Nigeria's colonial government to use forced labour to generate agricultural surpluses for private concessions (Marchal 2017, p. 147). In 1922, Max Horn, the HCB government commissioner and principal liaison with Lever Brothers in Europe, praised Governor General Lippens' forced labour policies for their role in significantly boosting palm oil production and profits for the company.

However, in 1923, a year after the resumption of forced labour for capitalist firms, Dr Emile Lejeune, the chief medical officer of the Congo-Kasai province, published a critical report on the operations of HCB in the region. This report condemned the company for its unfair and sometimes inhumane labour policies and received serious consideration from senior colonial authorities as evidenced by a correspondence excerpt between the office of the governor-general and the colonial minister:

Bosses in Africa persist in blaming their failure to recruit workers on the indolence of the blacks, when the real cause is to be sought in the fashion in which they treat those in their employ. It is crucial that the board of the Huileries du Congo Belga at last realise the real situation in its enterprises in the Kwilu. (Marchal 2017, p. 38)

This report sparked a significant dispute between HCB and the Congo administration, intensifying pressure on the company to create an environment where labour was genuinely willing to engage in work. This example of Belgian colonial administrators openly challenging HCB's use of forced labour is notable. This challenge countered the spurious theory that African workers had primitive attitudes. This stance by the Belgian colonial administration, which sparked a dispute with the HCB, contrasts sharply with the situation in Portuguese Africa during the same period, where compelling African labour due to its perceived "indolence" remained a cornerstone of labour recruitment policy until the early 1960s (Mendes, 1958; Diamang Report of the indigenous labour section, 1938)

A 1931 report by civil servant and future Governor General of the Congo, Pierre Ryckmans, on HCB's labour practices, suggested that reliance on labour supplied by tribal chiefs was dwindling and authoritarian methods were becoming unnecessary as recruitment increasingly shifted to voluntary. While Jules Marchal rightly questions the authenticity of these findings and caution is always advised when relying on colonial sources, Ryckmans' findings warrant further scrutiny, especially in the light of similar shifts described in UMHK during the late 1920s to early 1930s. Supported by the detailed quantitative analysis by Juif and Frankema (2018), this period clearly marked a

shift toward more humane recruitment policies, alongside significant increases in real wages. Notably, by 1935 unskilled workers on the Congolese Copperbelt were earning between 50 percent and up to over 100 percent more than their counterparts in the free urban labour markets of Nairobi, Freetown and Kampala—a disparity that only widened as the colonial period progressed.

As the following section of this paper will illustrate, the specific case of Diamang reveals a stark contrast to the positive labour trends observed in Belgian, French and British colonies as outlined above. In Portuguese Africa, no such improvements can be discerned. Instead, both the interwar period and the post-World War II era were characterised by a persistent and increasing reliance by both the state and the corporate sector on the coercive utilisation of African labour.

3. Coercive labour in Portuguese colonial Africa: the case of Diamang

3.1. Labour policies and corporations in Portuguese colonial Africa

This section will examine the specific labour policies implemented by Diamang and how these policies illuminate the broader labour dynamics within the Portuguese empire. It will detail how Diamang's labour strategies, characterised by their reliance on coercive practices, contrasted increasingly with labour policies in other parts of colonial Africa, where such methods were being phased out in favour of more humane approaches. Naturally, drawing assumptions on the wider institutional environment of the Portuguese empire by focusing on one firm—even one as large and with as important a place in colonial history as Diamang—is potentially a flawed strategy. It is therefore worth noting some scholarly works that describe other Portuguese colonial employers, where conditions similar to those pertaining in Diamang are described.

An example of firms operating employment systems heavily rooted in forced labour include the classic account of labour conditions on The Mozambique Company's plantations by Eric Allina. Based on sources taken from previously unexplored colonial archives and enriched by oral testimonies from more than a hundred Mozambican elders, Allina (2012) offers a counterpoint to the official colonial accounts and illustrates the brutal reality of the labour conditions imposed by The Mozambique Company throughout the first half of the 20th century. This book shows how Portugal, through the company, operated a deceptive forced labour system, camouflaged under the guise of a civilizing mission.

More recent work describing the Sena Sugar Plantation by Jones and Gibbon (2024) explores the significant role of forced labour in the operations of

the Sena Sugar Estates in colonial Mozambique. It analyses how the firm capitalised on coercive labour practices to maintain profitability, revealing that forced labour was more significant than initially believed. Reconstructing annual financial records, the study shows that Sena Sugar Estates' stable returns were mainly due to the low cost of coerced labour rather than operational efficiency or innovation.

Looking to Portuguese Angola, Ball (2015) examines exploitative labour practices at Cassequel Sugar Plantation. Drawing on oral histories and previously inaccessible company archives, Ball exposes how these practices generated significant profits for one of Angola's largest agro-industrial enterprises. He highlights stark contradictions between official portrayals of labour conditions and the harsh realities experienced by Angolan labourers. This study, in line with findings by Jones and Gibbon at Sena Sugar, reveals that systematic exploitation of labour was central to the plantation's operation. Ball's work illustrates how forced labour was not an isolated practice, but a fundamental component of the colonial economic system in Angola.

Existing historical studies on Diamang have significantly deepened our understanding of its labour policies (Cleveland 2015; Varanda and Cleveland 2014). Compared to many other firms in Africa during this period, Diamang invested far more in certain types of social service provision. With regards to health services, it was notably more favourable as an employer, relative to the Rand mines of South Africa, where health issues, crime and vice were notoriously rampant (Crush et al. 1991; Van Onselen 2021). The distinctions between Diamang and other large mining enterprises, such as UMHK or the competing Sierra Leone Selection Trust diamond mines, are likely not as pronounced (Greenhalgh 1985).

Questions still remain as to why Diamang persisted in using forced labour for so much longer than other large employers in other African colonial contexts and why it abruptly shifted away from this corporate strategy at the beginning of the 1960s. Answers to these questions will increase the knowledge about forced labour systems. Before introducing a monopsony model to answer these two questions, Diamang's specific labour regime will be described, which will help in understanding the assumptions underlying this theoretical approach.

3.2. Diamang: a case study

In 1921, the Portuguese colonial government granted Diamang an exclusive diamond concessionary mandate over an area of 1,020,000 square kilometres and a smaller area primarily in the northeastern Lunda province, designated as an exclusive labour reservoir for Diamang's labour-intensive alluvial diamond mining operations. Initially, corporate reports depicted a sanguine

outlook regarding the availability of indigenous labour (Dolan 2023). However, Diamang consistently struggled to recruit workers, reflecting a broader issue faced by many companies during this period, which was the difficulty of attracting workers from the traditional subsistence sector to the modern capitalist sector.

This enduring resistance among locals confounded company management and fostered an erroneous perception of indolence—common among many capitalist firms employing African indigenous labour during the colonial period (Miracle and Fetter 1970; Rönnbäck 2014). To address the worker shortage, Diamang utilised a government-sanctioned indigenous tax aimed at encouraging employment within the formal economy. This tax, imposed on indigenous people, forced them to seek wage-paying jobs to avoid penalties, including asset confiscation and imprisonment. Nevertheless, as the following quote illustrates, this measure was inadequate to meet Diamang’s growing labour needs, driven by continuous diamond discoveries:

The labour situation has been pretty thoroughly gone into and it has been decided that in order to ensure a steady production, we must have enough contract labour to carry on the direct mining work, if, as at the present time, volunteer workmen decide to desert the company. In line with our decision, the company will require a regular and steady supply of 250 men per month, beginning at the earliest possible moment and until further notice.¹

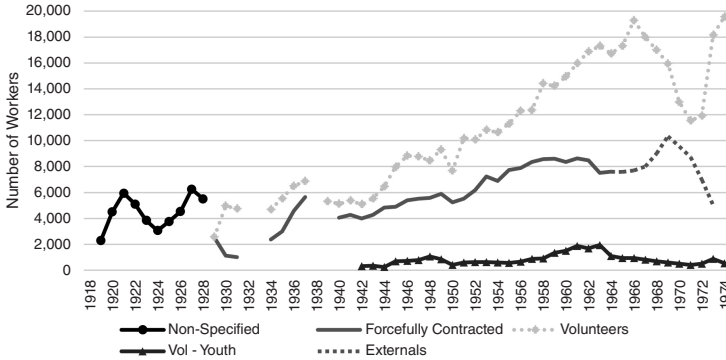
Consequently, the company augmented its workforce by forcibly conscripting labourers. These labourers were procured through recruitment agents who collaborated with regional colonial administrators. The agents had the dual role of coercing labour to work for the company and capturing those who fled either en route to the mine or during their contracted period of forced labour. They also bore the responsibility of administering punishments to escapees and if not possible, to their tribal chiefs and villages.

Despite the associated costs of recruitment, repatriation and accommodation, forced conscription guaranteed a reliable supply of labour for the arduous, perilous tasks inherent in diamond extraction. As Figure 1 shows, forcefully conscripted workers were almost as numerous as “volunteer” labourers for several years, although many volunteers were probably motivat-

1 Letter from managing engineer at Diamang to senior management. (1926) Internal memos between indigenous labour section and general governor of Angola’s office, Companhia de diamantes de Angola (1917–1974). 1926 Report of the indigenous labour section. Companhia de diamantes de Angola—General director of Lunda. Note: In this letter Diamang Management refers to forcefully contracted labour as simply “contract labour”. Throughout this paper the adverb “forcefully” has been intentionally used to clarify the distinctive characteristics of this specific labour force, to aid the reader’s comprehension.

ed by the desire to avoid conscription and the even more despised jobs associated with it.

FIGURE 1 - *Indigenous labour force at Diamang, 1918–1974*



Source: Dolan (2023).

Note: From 1964 onward, those previously categorised as “contracted” were now referred to as “Externals”, which is represented by the corresponding labour force line turning from solid to dotted.

The entrenched reliance on coercive labour within the institutional framework of colonial Angola is possibly partly attributed to the interplay between Portugal’s limited economic scale, its domestic political vulnerabilities and the considerable economic influence of major corporate entities operating within its colonial territories. This is starkly exemplified by Diamang, especially during the early 1920s. The instability and constrained economic capacity of Portugal, compared to other colonial powers, meant that substantial firms like Diamang played a critical role in underpinning the financial stability of colonial Angola. This distinctive state-corporate nexus is highlighted by Diamang’s commitment to remit 50 percent of its profits and thus provide a crucial line of affordable credit to the Portuguese state, underscoring the disproportionate influence such corporations wielded in shaping the economic and labour policies within Portuguese colonies (Diamang annual reports and accounts 1917–1919).

Access to credit was crucial for the colony, as it had accumulated substantial debt in the 1910s due to efforts to subdue the interior of the country (Alexopoulou 2018, p. 122). However, international lenders were increasingly sceptical of Lisbon’s ability to repay these mounting debts. The sister colony of Mozambique faced similar challenges and was excluded from international credit markets during this period (Vail and White 1978). Financial pressure intensified following the appointment of Governor Norton de Matos as High Commissioner of Angola in 1921, as his perceived lack of budgetary responsibility led to a spike in interest rates on debt (Alexopoulou 2018, p. 52). Heavy

indebtedness and the resulting desperation of the Portuguese state likely played a significant role in Governor Norton's decision to grant extensive powers to Diamang, ensuring that labour shortages would not hinder the needed rapid expansion of diamond output.

In the first two decades of the 20th century the use of forced labour for capitalist enterprises within the Portuguese colonial administration was not markedly different from practices in other colonial territories. But possibly, as a result of the relative financial weakness of the Portuguese state, from the 1920s and early 1930s, a divergence began to emerge between Portuguese Africa and non-Lusophone colonial powers. This divergence is apparent in the steady or even increasing willingness of Portuguese colonial authorities to provide forced labour to firms, whilst at the same time, as has been discussed above, this practice was becoming increasingly uncommon elsewhere in colonial Africa (Vail and White 1978, p. 251).

Qualitative historical literature emphasises the anachronistic and coercive nature of the forceful recruitment system in place during the mid-20th century in Portuguese Africa. A particularly strong condemnation of this system, (certainly free from accusations of "presentism"), comes from Henrique Galvão, during his tenure as the Colonial High Inspector of Angola. Despite the potential influence of his political background and ambitions, Galvão's scathing critique, as documented in his 1947 report, cited by Bender (1978), underscores the profound inhumanity embedded within the forced labour practices of the Portuguese empire.

To cover the deficit, the most shameful outrages are committed, including forced labour of independent self-employed workers, of women, of children, of the sick, of decrepit old men, etc. Only the dead are really exempt from forced labour.²

4. A model of stability: institutional structure and labour coercion at Diamang before 1960

4.1. Free and monopsonistic labour markets

This section offers a hypothesis about the labour practices described above, explaining the mechanisms behind the genesis and persistence of such coercive labour systems in the Diamang diamond mines, which continued for decades after similar practices had ended in other colonial territories. I pos-

² His presentation of his report on native labour systems to a closed session of parliament did not in fact lead to reform of this system but to his political downfall and eventual arrest in 1952.

tulate that the initial specific economic conditions underpinning this system culminated in the stagnation of living standards, discernible from 15 years prior to and continuing up to 15 years after World War II. This leads to a broader observation that the economic factors at hand are primary determinants of the level of “coercion” a company imposes on its labour force. While this conclusion is derived from the specific case study of Diamang, it is likely also be applicable to the many other firms operating in Portuguese colonial Africa.

The following analysis is greatly informed by the work of Suresh Naidu, which in turn builds on the renowned Fleisig (1976) model to elucidate the slave labour market systems of the antebellum Southern United States. This model suggests that slavery became the prevailing labour institution in the Southern United States due to the region's particular economic conditions, providing deeper insights into why businesses highly valued such coercive labour markets (Naidu 2020). Recently adding to this discussion, Rönnbäck (2024) explores the persistence of slavery as a labour institution, using the theory of reservation wages to propose that slavery often becomes the institution of choice in contexts where free workers' reservation wages are prohibitively high.

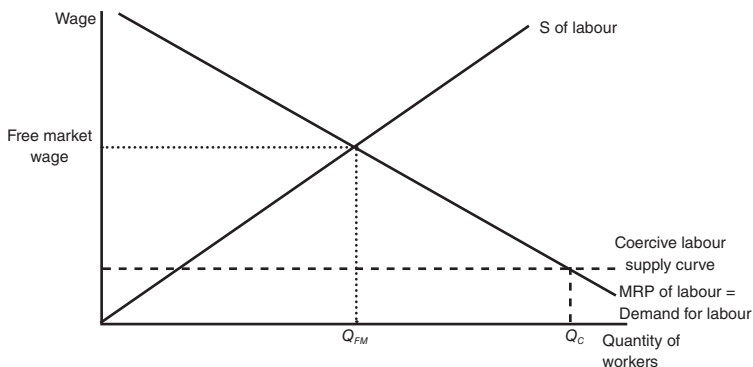
Although workers at Diamang did not experience slavery as it existed in the antebellum Southern United States, economic forces similar to those witnessed in that specific historical context also led to the extensive use of forced labour at Diamang. Inspired by these theoretical models, this paper applies an economic model to dissect specific economic forces behind the institutional evolution within the case of colonial Angola. By doing so, it not only builds upon prior research but also offers a methodological bridge that further advances the understanding of colonial institutions and how they interacted with and affected the livelihoods of those subjected to the challenging conditions of Portuguese colonial rule. Moreover, I provide insight into why the labour organisation methods used at Diamang persisted for so long relative to similar companies operating in other colonial territories.

To comprehend Diamang's situation, it is essential to first detail the labour market conditions facing a large employer within a local labour market. An emerging body of literature reveals that monopsony power is remarkably prevalent in contemporary labour markets in developed economies (Manning 2011; Dube et al. 2018; Méndez-Chacón and Van Patten 2022). Delabastita and Rubens (2022) and Paker, Stephenson and Wallis (2024) have also shown that this is not merely a modern phenomenon, but that monopsony power was significant in many historical labour markets. Diamang, given the scale of its operations and its exclusive access to labour employment in this part of Northern Angola, clearly wielded substantial monopsony power. This meant that the labour market in which Diamang operated diverged from a typical

competitive labour market model, so that Diamang as an employer could probably set average wages lower level than would have prevailed in a competitive market, due to workers having few or no alternative employment options.

In addition, because it was a large monopsonistic firm, Diamang could not simply match the prevailing market wage and anticipate an unlimited labour supply. Instead, if it had operated in a free labour market, it would have had to perpetually increase wages for new and then for existing workers if it wanted to attract more labour, making the marginal cost of hiring labour constantly increasing as employment expanded. This effect, which faces large employers of labour, is known as the “firm-size wage” effect, where employees performing similar jobs receive higher wages at larger firms compared to smaller ones (Brown and Medoff 1989). However, a further addition to the standard monopsonist model needs to be included when discussing the case of Diamang due to the coercive institutional environment in which it operated within colonial Portuguese Africa. In this example, workers not only experience a large economic power imbalance due to extreme monopsony power, but the institutional environment of colonial Portuguese Africa also leads to non-economic/political power imbalances. These are manifested in the ability of employers to use forced labour, thus creating a landscape that strays far from what could be deemed even remotely equal on either the economic or political fronts.

FIGURE 2 • A labour market in which the firm is a monopsony employer of labour



Note: MRP = Marginal Revenue Product of labour.

As such, this basic monopsonist model—in which the firm’s labour supply curve equals the market labour supply curve, resulting in the firm having to offer higher wages to attract additional quantities of labour, as seen in Figure 2—must be expanded to better reflect the coercive methods of recruitment

available to employers.³ This can be represented on the traditional free labour market model by a horizontal line showing the coercive labour supply curve. This line signifies two critical economic conditions of forced labour.

First, forced labour still involves costs to the employer, for instance, food, accommodation, transport and, critically, the cost of coercively “forcing” labour—all of which the employer bears. These can be seen in Figure 2 as the horizontal line equal to the monetary costs equivalent to wage costs, thus highlighting the opportunity cost of using coercive labour.⁴

Second, there is no longer just an upward-sloping “monopsonistic” labour supply curve but, instead, also a coercive labour supply curve that is flat. This means that the marginal cost of employing the first worker equals the cost of employing the worker. Therefore, assuming a plentiful pool of people to coerce, the employer does not face the constant increase in the marginal cost of labour experienced when coercion of workers is not an option.

4.2. The labour demand curve

The model also helps understand the factors increasing the likelihood of coercion. The first determinant of the incentive to coerce is the height and slope of the marginal product of labour curve relative to the cost of using coercive labour. The labour demand curve can vary substantially, depending on the company's type, size and industry. A company with a low marginal revenue product (MRP) of labour, where diminishing returns to the product of labour set in swiftly, may find that the wage paid to its small workforce differs marginally or is even lower than the cost of coercively creating a non-voluntary workforce.

This situation contrasts greatly with the alternative equilibrium of a company that operates in an industry where labour's marginal product is very high and is not so prone to diminishing returns and so will naturally want to employ large amounts of labour. As Figure 2 illustrates, in the case of a high MRP of labour curve, the point at which it is still profitable to hire labour and thus the total amount of labour employed, vary greatly between the two possible equilibriums, denoted by the large distance between equilibrium Q_{FM} and Q_C . This creates a strong incentive to use and preserve the ability to draw on coerced labour. Once significant numbers of employees have

3 Whilst possibly “those demanding labour” might be a more correct term, the word employer will continue to be used. However, in cases of forced labour and other forms of slavery, those labouring can hardly be described as employees in the modern sense of the word.

4 Assuming economies or diseconomies of scale to expanding amounts of forced labour utilised, one may see an upwards or downwards or possibly U-shaped coercive labour supply curve. To facilitate ease of understanding, I have assumed a constant marginal cost of coercive recruitment.

been hired in a coercive equilibrium, a shift to a free-market equilibrium would necessitate much higher wages paid to a large workforce, resulting in a considerable reduction in profits, due to the combined increase in labour cost for continued employment and the decrease in output that would result from the higher wages rendering many of its former employees unprofitable to employ.

4.3. The labour supply curve

The second determinant of the incentive to coerce pertains to the labour supply curve. As previously observed, one assumes the coercive labour supply to be perfectly elastic—horizontal—due to no wage increase requirement for additional coerced labour. This contrasts starkly with the steep labour supply curve faced by many monopsonist employers, such as Diamang's operations in rural Angola.

As seen in Figure 2, the assumption is made in this model that a steep (inelastic) supply curve exists both at Diamang and for other concessionary companies operating in rural Africa. Key among these is the increased cost to the employee when migration outside their tribal and climatic region becomes necessary, as well as having to perform jobs with a high risk of accident or even death, thereby necessitating higher compensation due to job-type disutility.

This explanation sheds light on the fact that Diamang operated with a dual labour force model, comprising both voluntary and forced labour, for the majority of its existence. While labour reports from this period do not explicitly state this, evidence suggests that the work assigned to forcibly contracted labour was typically the most perilous within the mining production process, such as excavation and prospecting with explosives. Conversely, those categorised as volunteers were generally engaged in support services, including hygiene provision and maintenance. This distinction is starkly evident in the labour reports, which contain detailed records of workplace incapacity and fatalities among forcibly contracted workers; notably, no equivalent section exists for volunteer workers (Table 1 below).

Further evidence of the profound dislike that forced workers had for their contracted roles and hence the inelastic nature of this labour supply in a counterfactual free market, is the consistently high rate of desertion among the forcibly contracted segment of the workforce. This phenomenon is only documented in the sections of the labour reports pertaining to these forcibly contracted workers, underscoring the significant disutility derived from such demanding and dangerous work, particularly given its location far from their tribal villages.

TABLE 1 - *Desertion, mortality and incapacity: incidents among forcefully contracted workers, 1934–1955*

Year	No. of deserters	Percentage of deserters	No. of deceased	Percentage of deceased	Physical incidents	Percentage of physical incidents
1934	63	1.5	119	2.8	133	3.1
1935	294	5	234	4	352	6
1936	373	4.5	234	2.8	414	5
1937	301	2.8	310	2.9	276	2.6
1938	225	2.4	179	1.9	283	3
1939	390	4	171	1.7	335	3.5
1940	271	3.3	101	1.2	294	3.6
1941	161	2.4	86	1.3	133	1.9
1942	NA	NA	NA	NA	NA	NA
1943	NA	NA	NA	NA	NA	NA
1944	NA	NA	NA	NA	NA	NA
1945	NA	NA	NA	NA	NA	NA
1946	62	0.7	109	1.3	48	0.6
1947	74	0.8	81	0.9	107	1.1
1948	69	0.7	58	0.6	97	1
1949	54	0.5	95	1	113	1.1
1950	28	0.3	62	0.7	50	0.6
1951	70	0.7	85	0.9	17	0.2
1952	27	0.2	62	0.5	89	0.7
1953	71	0.5	94	0.7	49	0.4
1954	81	0.5	89	0.6	29	0.2
1955	86	0.6	78	0.5	41	0.3

Source: from the *Report of the Indigenous Labour Section*, Companhia de Diamantes de Angola—General Directorate of Lunda (1941, 1955). Note: This report is accompanied by a management annotation regarding declining death rates. Note: The percentage of deaths is the lowest in the period (on a par with 1952).

An inelastic labour supply further explains why a large monopsonistic employer would favour a coerced labour force, due to the very high wages that would need to be offered under free market conditions. As Figure 2 illustrates, this noticeably steep supply curve means that transitioning from low-wage coerced labour to the high wages required under free wage equilibrium becomes increasingly costly as the labour force expands. This escalation in costs significantly increases management's inertia and their reluctance to move away from using a forced labour system, as this style of labour system grows in scale.

To summarise the preceding analysis, two key labour market economic fundamentals combine to incentivise a company to utilise forced labour, if available:

- 1) A high marginal product of labour curve with minimal diminishing marginal returns.
- 2) A free labour market with a highly inelastic labour supply curve relative to wage.

A large mining firm is likely to benefit from a coerced labour force, since its advanced industrial mode of production creates highly valuable marginal products of labour. Diamang serves as an almost perfect example, mining valuable gemstone-quality diamonds at an industrial level in an area with few willing workers, providing the conditions that incentivise firms to use forced labour: low wages and high employment equilibrium. This circumstance led to a unique situation for Diamang during this period, characterised by:

- I. A very low wage being offered. The supply of those who readily volunteer their labour at this low wage is quickly met, so any additional labour is then employed using the now more cost-effective “non-monetary” coercive channel.
- II. The disparity between an additional labour unit’s marginal revenue and marginal employment cost means equilibrium will not occur where these values align. Instead, employment stops when the available labour pool is exhausted, prompting the company to utilise any additional labour sources, however low-productive it is.
- III. Combined economic fundamentals and coercion ability create a highly labour-dependent production mode with minimal capital investment incentive due to the dilution across the labour pool. Cheap labour employment becomes more rational than investing in productivity through labour-saving technology. Once the labour constraints manifest themselves, there is a shift towards increasing each labour unit’s output through more intensive and coercive work practices rather than improving average labour productivity.
- IV. The detachment of wage from the marginal labour product means increased labourer output value does not result in higher wages. Instead, the rising output value translates into increased company and shareholder profits.

Once this extractive system is established and permitted to be utilised for further labour recruitment, it becomes self-reinforcing in its value to the firm and thus increasingly persistent. Transitioning away from this recruitment system, such as by offering even marginally higher real wages to currently employed labour, imposes substantial upfront costs on the company. The coer-

cive nature of this institution creates an environment where there are no tangible output benefits from wage increases, making management highly resistant to modifying this cost-effective labour arrangement.

4.4. A coercive labour equilibrium at Diamang

The previously discussed model helps us understand the broader pattern of persistent corporate use of forced labour within the Portuguese African empire, exemplified by Diamang. Two effects of this persistent use of a forced labour system in the context of Diamang will now be highlighted.

As shown in Dolan (2023), living standards at Diamang at the dawn of 1960 were no better than those in 1930, as a result of Diamang's policy of consistently paying very low wages. This result is staggering when put into an international comparative perspective by examining changes in living standards of workers at other mines on the continent during this period. This can be done by constructing welfare ratios, which indicate whether wages are sufficient for workers to meet basic subsistence levels, thereby providing a useful benchmark to assess and compare living standards over extended periods (Allen 2001; 2013).⁵

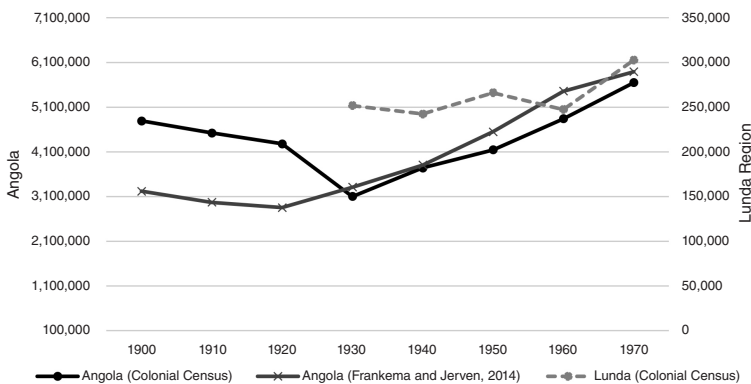
In the case of the Witwatersrand mines in South Africa, workers experienced little wage growth and wages even periodically decreased over the colonial period. Yet, these wages still allowed welfare ratios to remain higher than those seen at Diamang by a factor of 2 or more (Dolan 2023). In the nearby mines of Central Africa, real wages were initially similar to those at Diamang in the 1920s. Thereafter, wages successively increased over the decades, so that by 1960, mines in the Central African Copperbelt, Botswana and Southern Rhodesia were paying workers between 2.5 and 7 times as much as Diamang (Juif and Frankema 2018; Dolan 2023). This highlights the severely negative impact the continued existence of forced labour had both on forcefully contracted workers' wages and indirectly, due to imposing a wage ceiling, on volunteers' living standards during this period.

An effect of the involuntary and low-paid nature of mining work at Diamang appears to be an exodus of workers and the general population from the region of its operations. This is evidenced by the recorded demographic data from this period presented below in Figure 3. To somewhat mitigate the issue of colonial bias inherent in colonial population data, I include both de-

5 Welfare ratios are calculated by dividing a male adult's wage by the cost of a "basket" containing essential items necessary for a family to maintain a living standard above subsistence. This ratio provides insights into the adequacy of a male breadwinner's income in supporting his family. A ratio below 1 indicates a standard of living below subsistence, while a ratio of 1 represents barebones subsistence or absolute poverty. An increase in the ratio above 1 signifies an improvement in living standards above subsistence for the family unit.

demographic data provided by colonial officials and re-estimated population values provided by economic historians.⁶ By utilising comparative growth rates from other tropical regions, particularly Southeast Asia, to estimate population trends, these historians aim to provide a more accurate long-term series of African population data (Manning 2010; Frankema and Jerven 2014). The data reveal a stagnating population level pre-1960 in Lunda compared to significant growth at the national level. A population decline would be unexpected given that, in general, European colonisation and subsequent investment in health care, including campaigns to prevent sleeping sickness, malaria and smallpox, resulted in declining mortality rates over the colonial period (Prados de la Escosura 2011; Tilley 2016). Diamang invested heavily in inoculation services to reduce sleeping sickness in the region, which makes the stagnating population growth of this region even more telling.

FIGURE 3 • *Population of Angola and the Lunda Region, 1900–1970*



Source: National census data were sourced from the Central Department of General Statistics (1933–1973) through their Statistical Yearbook.

Notes: The re-estimated population figures for Angola were drawn from Frankema and Jerven (2014). It is important to note that no colonial censuses were conducted in Angola before 1940. The 1930 survey was a basic assessment of the indigenous population, while earlier figures were based on backward projections made during the 1930s (Coghe 2022).

The lack of population growth due to worker exodus aligns with both contemporary reports and recent academic research, which highlights high levels of Angolan economic migration to better-paying labour areas in other colo-

6 One must always be cautious when considering African colonial population surveys, especially in Angola. Coghe (2022) provides a comprehensive analysis of demographic practices in colonial Angola, focusing on the problematic aspects of population measurement. The study offers an intricate overlay highlighting how local colonial interests and international public health initiatives created a complex scenario where health and demographic policies were deeply intertwined with the political and economic objectives of the colonial state. Consequently, the book wisely calls for a cautious approach when interpreting historical demographic data from colonial contexts.

nial territories. This was notably highlighted by Portuguese colonial minister Marcello Caetano, who, after a four-month tour of Angola and Mozambique in the mid-1940s, blamed the depopulation of Angola's interior on "(a) the blind selfishness of the Portuguese employers and (b) the system of forced labour" (Caetano 1946, p. 72 as referenced in Bender 1978, p. 110). In line with this, the United Nations Sub-committee on the Situation in Angola found that by 1954, more than 500,000 Angolans were living outside the territory after migrating to find better economic conditions in the Republic of South Africa, Northern and Southern Rhodesia and the Congo (UN Sub-Committee on the Situation in Angola 1962, p. 38).⁷ Labour reports from the mines in these territories do highlight recruitment of Angolans; in marked contrast, at Diamang, no mention of labour coming from non-Portuguese colonial territories is ever recorded (Crush, Williams and Peberdy 2005).

Heywood concurs with this view of mass emigration from Angola due to workers' desire to find better working conditions and higher wages. By World War II, an estimated 300,000 Angolans, referred to locally as *Wawikos*, had settled in Northern Rhodesia (Heywood 2000, p. 78). This figure continued to rise in the post-war period, most notably to the mining centres of Katanga, Rhodesia and South Africa, driven by the desire to avoid the forced labour system of Angola. This dramatic demographic shift underscores the severity of the conditions of forced labour in Angola under the Portuguese colonial regime.

This second impact of the persistent use of forced labour in Diamang may be called "the vicious cycle of labour coercion". This cycle sees an escalating reliance on coercive production methods without monetary incentives, culminating in a stagnant or even diminishing labour supply due to worker exodus. Constrained supply necessitates additional forced labour measures to extract increased output from the existing labour pool. Consequently, any inward labour migration is discouraged and thus, labour productivity potentially declines due to over-exertion of the fixed labour stock, further discouraging any wage increases. This downward spiral precipitated an increasingly stark divergence between the lives of Diamang's workers and their counterparts in larger African companies in non-lusophone Africa.

British consular and missionary reports describe the labour situation by the 1950s, illustrating the societal impact of this institutional divergence. They show that by the 1950s, with males away as labour migrants, officials turned to women and children to build and maintain roads and bridges for the expanding white settler population. These reports provide vivid pictures of preg-

⁷ 'Report of the Sub-Committee on the Situation in Angola'. In *General Assembly Official Records: Sixteenth Session, Supplement No. 16 (A/4978)*. New York.

nant women, many with babies strapped to their backs and children as young as six, who performed roadwork in many parts of the highlands (Heywood 2000, p. 79).

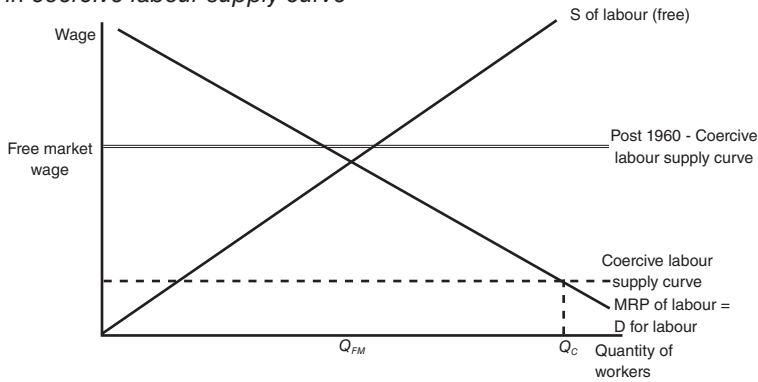
By 1960, Diamang had traversed a path—shaped by the economic and institutional forces at play—whereby its ability to maintain sufficient diamond out-production relied on thousands of forced labourers. Hence, its increasing usage of such workers made it increasingly unlikely that Diamang’s management would reduce its dependence on low-paid forced labour. As the diagram in Figure 2 illustrates, surging labour demand, in parallel with an ever-more inelastic labour supply, continued to widen the chasm between the marginal cost of coercion and wages that would be required in a free labour market. Therefore, mounting societal and humanitarian pressure from international bodies was largely ignored and strenuously resisted by Diamang’s corporate enclave. A legacy of harsh coercive labour propelled by Diamang’s monopsonistic control over diamond mining, bred a business model rooted in cheap forced labour.

5. Deciphering the transition: post-1960 evolution at Diamang

The era between 1917 and 1960 at Diamang is best characterised as an apparent inertia, with meagre living conditions and standards for its labour force. However, post-1960, a contrasting trend began to emerge. By 1974, the last year of Portuguese colonisation, average welfare ratios for both volunteers and forcibly contracted workers had surged from a mere 0.8, observed at the close of the 1950s, to just under 4, marking a fivefold increase in this indicator of living standards, a clear testament to a swift improvement in the working environment (Dolan 2023). This rate of increase is striking even when compared to the scale of welfare improvements observed at the Katanga copper mines, where a fourfold increase in welfare ratios took a thirty-year period to achieve (Juif and Frankema 2018).

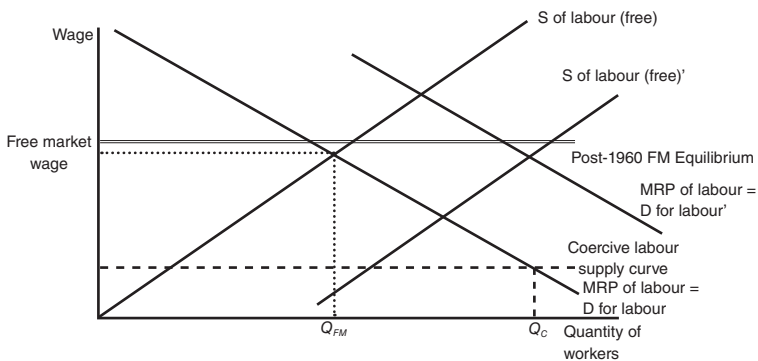
In the monopsony model, as illustrated in Figure 4, this is visually represented by a shift from the coercive equilibrium to a free market equilibrium, where the wage offered now equals the marginal product of labour. Essentially, some of the economic rent previously classified as profit was reallocated from the company to the workers in the form of higher wages. The reason for this switch can be further understood by changing the assumption that the coercive labour supply curve is far below what would have resulted if workers were being paid the wages of a free market equilibrium. As will be detailed below, the post-1960 Portuguese colonial period saw a combination of forces that made recruitment of labour by coercion increasingly costly.

FIGURE 4 - Monopsonistic labour market model after shift upward in coercive labour supply curve



An immediate question arising from this dramatic transition is how Diamang was able to radically alter its labour policy without experiencing a significant drop in the number of workers employed and consequently, in output and profits. Further analysis of the monopsony model provides an explanation for this phenomenon. A new equilibrium of higher wages and sustained employment levels can be achieved if one assumes that both the marginal revenue product curve and the labour supply curve shift outward also. As depicted in Figure 5, these shifts can occur if labour in a free-market environment experiences productivity increases greater than those in a coercive labour market and if more workers are willing to supply their labour in a non-coercive institutional environment.

FIGURE 5 - Monopsonistic labour model after outward shift of both (free) supply of labour curve and MRP of labour curve



While the examination of labour response elasticity and productivity levels at Diamang post-1960 presents an intriguing topic, it falls outside the

scope of this paper. However, reports on indigenous labour from this period lend credence to these changing aspects of the labour market. Notably, Diamang management observed a significant increase in motivation among workers and a rise in those seeking work at Diamang after 1960 (Report of the Indigenous Labour Section 1961, 1962).

The emergence of such drastic improvements in worker welfare from 1960 onward warrants further analysis. What were the key changes that caused a coercive institution so ingrained in the company's production processes to suddenly disappear? It is posited that this transition can be attributed to the confluence of three key factors that formed a critical juncture, which was sufficient to nudge Diamang away from its entrenched coercive labour system, toward an approach that was considerably more inclusive and beneficial for workers. These forces were threefold. Firstly, the abrupt independence of the neighbouring Democratic Republic of Congo in 1960; secondly, the violent civil unrest in areas of Angola close to the Lunda province in early 1961; and finally, the delivery of an official complaint by the newly independent state of Ghana's representative to the ILO in 1961, accusing the Portuguese government of non-compliance with its obligations under Convention No. 105 of the Abolition of Forced Labour Convention.

The triangulation of these forces compelled Diamang to swiftly overhaul its labour market practices, improving the freedom and fairness experienced by tens of thousands of its employees.

5.1. Congolese independence

It remains somewhat of a historical footnote that when Patrice Lumumba and Mobutu Sese Seko convened in Brussels in January 1960 to discuss independence with the Belgian government, the anticipated timeline for Belgian withdrawal was several decades away, with a common projection being 20 years. Nevertheless, the Belgian departure was expedited during the conference, being truncated from decades to mere months, with June 30th, 1960, set as the date for Congolese independence (Kenyon 2018). This seismic geopolitical event blindsided both the Angolan colonial government and Diamang.

The disruption caused by this unexpected event is vividly encapsulated in a quote from Diamang's Chief of Indigenous Labour, taken from the introduction section of the *1960 Indigenous Labour Report*. Speaking about the newly independent Congo, which shared borders with a significant portion of Diamang's exclusive operating territory, he underscored the urgency for change:

We must therefore try, as far as possible, to accompany the progress which may be made in the Congo and even to take the lead, so that the situation of our workers,

as regards wages and other benefits, is not inferior to that of the Congolese, since this is the only way to avoid disturbances, one of the most foreseeable and most damaging of which will be the emigration of workers to lands where living conditions are better.⁸

This was followed by a belated revelation from Diamang's management regarding the precarious nature of their labour strategy. The strategy, which was heavily reliant on forced contract labour for critical but hard and dangerous production activities, combined with meagre wages for such contract workers, was suddenly deemed high-risk:

The contracted labour constitutes a very important part of our workforce because it practically carries out all the service of blasting and removing sterile rock and gravel by shovel, a service which, despite the mechanisation in progress, will possibly always be the basis of all the Company's activity. This is because the indigenous people [Volunteers] of the region, due to a habit that has become ingrained and generalised, do not currently accept that work, as well as certain others, especially in [rock] exploitation, which, for some reason, they decided that this would be the work of contractors. Therefore, if we were to be short of contract workers, without having first found a solution to this anomaly, as we must, i.e., finding non-contract workers for these services, the progress of our work would be seriously affected.⁹

The unexpected Congolese independence, with the anticipated loss of coerced contracted workforce, allied with the predicted inability to replace them with local volunteers, thus led to a fear of a rapid decrease in revenue. The swift response of Diamang's management to this threat was to initiate a dramatic improvement in working conditions, especially for those engaged in the strenuous tasks of blasting and removing rocks. This initiative precipitated significant changes in welfare for workers and their families. It began with an unprecedented increase in minimum wages for contracted workers, from 120 Escudos to 150 Escudos a month, which was then further elevated to 200 Escudos a month within the same year. This upward trend continued, improving salaries to such an extent that a worker in 1974 earned in two months what would have taken a year to earn in 1959 (*Diamang Annual Labour Report 1960*). These sudden initiatives were not solely monetary, as improvements were made in the workers' physical conditions as well. Notably, the 1961 Diamang annual company report proudly declares the extension of electricity and sewage facilities to Angolan personnel, paternalistically asserting that sudden-

8 *Annual indigenous labour report*, 1960 p. 2.

9 *Annual indigenous work report*, 1960 p. 10.

ly post-1960 they “have acquired, or are acquiring, habits that justify this important improvement in their living conditions” (*Diamang Annual Shareholder Report 1961*, p. 14).

5.2. *The impact of violent domestic unrest on colonial government policy*

Whilst Congolese independence forced Diamang management to reassess its worker compensation policies, anti-colonial conflict in other regions of Angola was a concurrent catalyst in driving transformative changes in labour institutions. The *Baixa de Cassanje* uprising of January 1961, at Cotonang, the Portuguese-Belgian-owned cotton company, albeit over 1,000 km away, undoubtedly caught Diamang management’s attention.

Diamang’s initial response, though, was not to improve working conditions, but instead to enhance security around its operations, with the creation of an employee militia and investment in an aeroplane in order to better monitor the indigenous population (*Diamang Annual Shareholder Report 1961–1962*). However, the Angolan colonial state took these violent protests by Africans working in European-owned firms far more seriously and abruptly moved to labour policies much more closely aligned with other colonial powers and thus more developmental in their outlook.

The most significant break with the past in Angola came with the termination of the forced labour system in 1961, which had enabled both private and public work under the *indigenato*. First codified in 1899, this system allowed the state to forcibly recruit Africans deemed not to be working and it had barely evolved since its brutal inception. Often referred to as “slavery by any other name”, this persistent institution was abolished decades after similar systems had ended in other European empires (Allina 2012). Although it took another year for this termination to take effect at Diamang, it undoubtedly marked a radical change in labour conditions.

Another notable policy shift, most likely initiated by the realisation that poor working conditions precipitated the *Baixa de Cassanje*, was the introduction of mandatory minimum wages for nearly all indigenous labour occupations. A 1963 report on the revision of worker salary scales documents years of cordial communication between the Governor General of Angola and Diamang’s management. However, this began to change as the company’s agenda became misaligned with shifting government policy. As the quote below shows, 1963 marks a new era in the company’s history, where for the first time we see significant government intervention in Diamang’s wage-setting policies. Understandably, Diamang’s management opposed this interference, yet eventually succumbed to the policies, which were designed to enhance the wages of the lowest-paid indigenous workers.

Representatives inform us that the Governor-General has approved our wage scale with the condition that only minors can be designated as apprentices and the classification of general practitioners transitioning to specialists to whom we must attribute the minimum monthly salary of 600 escudos. We believe that the best way forward to avoid classification problems with the Labour Institute in the future is to consider as unqualified rural workers any worker who makes less than 20 escudos per day.¹⁰

An intriguing illustration of enhanced state intervention to bolster workers' livelihoods is the apparent new policy of deploying government-appointed health inspectors and administrators, who expressed genuine concern for the health of Diamang's workforce. The excerpt below highlights a radical departure from the past, underscoring the nascent combative relationship between Diamang and state-appointed medical inspectors. The evident ire within this passage underscores the shock and dislike Diamang management felt towards this worker-centric policy:

The repatriation operations of the contracted workers took place normally. The fact that the Health Delegate of Saurimo continued this year to show the greatest ill will towards the Company, in every way possible, led to some altercations. Such was the doctor's desire to create complications that he even tried to meddle in matters which had no connection whatsoever with any connection with his profession... since the health delegate had said, without however proving or demonstrating, that some of the repatriated contracted workers were malnourished, we decided, given that the fact of giving raw food to these indigenous during their stay in Lundo would not allow them to be fed properly, to start supplying them with a cooked lunch and dinner in Lundo.¹¹

Perusing reports over the course of the preceding thirty years, the consistently amicable relationship between local administrators and Diamang management is noticeable. The newfound concern for workers' welfare and willingness to confront the company on such matters of worker living standards and health, represents a significant shift from previous cordial relations.

5.3. *Ghana and the International Labour Organisation (ILO)*

The final force driving changes at Diamang was the escalating international pressure, particularly from organizations such as the ILO, directed towards the Portuguese colonial government. Ghana's formal complaint to the

10 *Report of the indigenous labour section: revision of salary scales*, 1963, p. 31.

11 *Annual indigenous work report*, 1960, pp. 22-23.

ILO in 1961 was especially significant, detailing harsh accusations against Portugal. This complaint, although not the first made by Ghana, was at its most stark in its accusations of treatment of Africans by the Portuguese colonial state. It also came at a pivotal moment in a world transformed since the late 1950s, marked by a significant number of newly independent African nations and the progressive stance of the newly inaugurated Kennedy administration in the United States (Monteiro 2022).

These complaints about the coercive nature of Portuguese labour practices, not only reignited international pressure, but also prompted the initiation of ILO investigations within Angola. While these planned investigations did not overly perturb Diamang officials, they served as a reminder that their labour system might soon need substantial improvements or complete overhaul, due to heightened international scrutiny.

[Regarding the system of forcefully conscripted labour], ideally, we should be able to dispense with it altogether, not only because of its high costs (\$363.99 against \$191.29 per man per month), but also because of its now much-criticised service regime and [now referring to volunteer labour] the region's labour reserve would be sufficient for all needs.¹²

In this quote above a common axiom in business is illustrated, wherein entities understand the possibility for positive change but often refrain from initiating difficult transitions until profitability is actually at stake. This was indeed the case with Diamang, as mounting costs associated with forceful labour conscription necessitated a shift to a more favourable institution, notwithstanding the initial difficulties and costs associated with this transition. However, internal pressures are often insufficient to stimulate significant change. The emergence of external forces often acts as a catalyst, reorienting the perspectives of those responsible for the institution and triggering a swift institutional transformation. In Diamang's case, these changes comprised further wage increases for labourers and a complete move away from their policy of forcefully contracted labour from 1963 onward.

Undoubtedly, far more could be written here as to why these factors influenced Diamang and why the colonial government enacted rapid labour policy reforms, as well as the effects on labour productivity, health outcomes, human capital formation and the broader relationship between workers, management and Lunda society. Moreover, the convergence of post-1960 liberalisation at Diamang and what could be termed a golden period for Diamang, both in terms of revenue and output, calls for further exploration. Specifically, the relationship between labour policies and the company's success during

12 *Annual indigenous work report*, 1960, p. 62.

this period represents a promising research direction. The findings suggest that once the costs of coercion exceeded a certain threshold, there was a rapid transition from coercive tactics to equitable compensation for employees, facilitating significant developmental progress. Whether this shift from coercion would have proven profitable for Diamang at an earlier stage constitutes an intriguing research question.¹³

6. Conclusion

The study of Diamang provides a useful lens through which to understand the persistence and transformation of coercive labour markets, within the Portuguese colonial empire. The study situates Diamang within a broader colonial framework, underscoring how Portuguese labour policies diverged from those in mining companies of neighbouring British, French and Belgian colonies. Unlike these counterparts, who gradually phased out forced labour for commercial gain due to international pressure in the 1930s and 1940s, Diamang was able to continue with such practices for much longer, due to Portugal's reluctance to follow suit.

Whilst an Angolan diamond mine operating during the late Portuguese colonial era may seem far removed from contemporary reality, pertinent insights can still be gleaned from this economic case study. It presents one of the last known instances of large-scale forced labour openly employed by a modern capitalist firm for an extended duration, revealing that coercive labour systems can be highly profitable and tempting to employers under the right economic conditions. Management decisions were driven more by perceived economic necessity than by malevolence, resulting in the "tyranny of the balance sheet", which resisted reform until faced with significant opposing external pressures.

While this perspective might convey a somewhat defeatist view of labour institutions, characterizing them as profitable yet stubborn systems, that often operate at the expense of the workforce, this paper offers a more optimistic perspective. It demonstrates that the same economic conditions that foster coercion, when met with sufficient external pressure, can also facilitate rapid transitions to more inclusive relationships between capital and labour.

13 Thus, also confirming the declaration made by Adam Smith, in *The Wealth of Nations*, on the economic irrationality of slavery, due to it in fact being the most expensive of all labour, resulting from the need for more and more forced labour "to execute the same quantity of work than in those carried out by free men". Clarence-Smith's 1990 study on São Tomé and Príncipe demonstrates similar findings, revealing that despite low direct wages, the hidden costs of forced labour—such as extensive supervision and poor worker health—contribute to its overall inefficiency.

This study contributes to the broader literature on extractive institutions by illustrating how specific economic and institutional structures can intertwine to uphold coercive labour practices but demonstrates that they are not immutable; with sufficient external pressure, they can swiftly transition from coercive systems to free-market models that significantly enhance worker welfare.

Acknowledgements

I would like to express my sincere thanks to all participants at the Makromackan meeting in Lund (2022) and the RHI–IHR “New Perspectives on African Economic History” online workshop (2022). I am deeply grateful to my PhD mentors, Dácil Juif and Klas Rönnbäck, for their unwavering guidance and support. I also extend my thanks to the two anonymous referees for their invaluable comments, and to guest editors Felix Meier zu Selhausen and Katharine Frederick for their thoughtful and constructive additional feedback. Additionally, I appreciate the early draft insights provided by Faustine Perrin and Jakob Molinder. Finally, I acknowledge the financial support from the PIPF UC3M 01-2324 predoctoral training grant and the EHA early-stage dissertation grant.

References

- ABAD, Leticia Arroyo, and Noel MAURER. 2024. ‘Does time heal all wounds? The rise, decline and long-term impact of forced labour in Spanish America’, *Explorations in Economic History*, 93: 101580.
- ALEXOPOULOU, Kleoniki. 2018. ‘An anatomy of colonial states and fiscal regimes in Portuguese Africa: Long-term transformations in Angola and Mozambique, 1850s–1970s’. PhD Thesis. Wageningen: Wageningen University and Research.
- ALEXOPOULOU, Kleoniki, and Dácil JUIF. 2017. ‘Colonial State Formation Without Integration: Tax Capacity and Labour Regimes in Portuguese Mozambique (1890s–1970s)’, *International Review of Social History*, 62 (2): 215–252.
- ALLEN, Robert C. 2001. ‘The Great Divergence in European Wages and Prices from the Middle Ages to the First World War’, *Explorations in Economic History*, 38 (4): 411–447.
- ALLEN, Robert C. 2009. *The British Industrial Revolution in global perspective*. Cambridge: Cambridge University Press.
- ALLEN, Robert C. 2013. ‘Poverty lines in history, theory and current international practice’. Working Paper 685, Department of Economics Discussion Paper Series. University of Oxford.

- ALLINA, Eric. 2012. *Slavery by Any Other Name: African life under company rule in colonial Mozambique*. Charlottesville, Virginia: University of Virginia Press.
- ARCHIBONG, Belinda, and Nonso OBIKILI. 2023. 'Prison labour: The price of prisons and the lasting effects of incarceration'. Working Paper 31637, National Bureau of Economic Research.
- AUSTIN, Gareth. 2005. *Labour, Land and capital in Ghana: from slavery to free labour in Asante, 1807–1956*. Suffolk: Boydell and Brewer.
- BALL, Jeremy. 2015. *Angola's colossal lie: forced labour on a sugar plantation, 1913–1977*. Leiden: Brill.
- BANCO DE ANGOLA (1926–1978). *Relatórios e contas do Banco de Angola*. Luanda: Banco de Angola [*Reports and accounts of the Bank of Angola*. Luanda: Bank of Angola (1926–1978)]. <https://www.bportugal.pt/arquivo/details?id=18287>
- BENDER, Gerald J. 1978. *Angola under the Portuguese: The myth and the reality*. Oakland: University of California Press.
- BROWN, Charles, and James L. MEDOFF. 1989. 'The employer size-wage effect', *Journal of Political Economy*, 97 (5): 1027–1059.
- CARVALHAL, Hélder, and Nuno PALMA. 2024. 'Living Standards in Angola, 1760–1975'. AEHN Working Paper No. 75, African Economic History Network.
- CLEVELAND, Todd. 2015. *Diamonds in the Rough: corporate paternalism and African professionalism on the mines of colonial Angola, 1917–1975*. Athens, Ohio: Ohio University Press.
- COGHE, Samuel. 2022. *Population politics in the tropics: demography, health and transimperialism in colonial Angola*. Cambridge: Cambridge University Press.
- COLONIA DE ANGOLA, REPARTIÇÃO CENTRAL DE ESTATÍSTICA GERAL (1933–1973). *Anuário Estatístico*. Luanda: Imprensa Nacional [COLONY OF ANGOLA, CENTRAL DEPARTMENT OF GENERAL STATISTICS (1933–1973). *Statistical Yearbook*. Luanda: National Press].
- COLONIA DE MOÇAMBIQUE, REPARTIÇÃO CENTRAL DE ESTATÍSTICA GERAL (1926–1973). *Anuário Estatístico*. Lourenço Marques: Imprensa Nacional [COLONY OF MOZAMBIQUE, CENTRAL DEPARTMENT OF GENERAL STATISTICS (1926–1973). *Statistical Yearbook*. Lourenço Marques: National Press].
- COOPER, Frederick. 1980. *From Slaves to Squatters: Plantation Labor and Agriculture in Zanzibar and Coastal Kenya, 1890–1925*. New Haven, Connecticut: Yale University Press.
- COOPER, Frederick. 1996. *Decolonization and African society: The labour question in French and British Africa*. Cambridge: Cambridge University Press.
- CRUSH, Jonathan, Alan JEEVES, and David YUDELMAN. 1991. *South Africa's labour empire: A history of black migrancy to the gold mines*. Boulder, Colorado: Westview Press.
- CRUSH, Johnathan, Vincent WILLIAMS, and Sally PEBERDY. 2005. 'Migration in Southern Africa'. Policy analysis and research programme of the Global Commission on International Migration. *IMISCOE Research Series 2022*.
- DELABASTITA, Vincent, and Michael RUBENS. 2022. 'Monopsony and industrialization', Social Science Research Network.

- DENTON-SCHNEIDER, Jon. 2024. 'Circular Migration, Marriage Markets and HIV: Long-Run Evidence from Mozambique'. AEHN Working Paper No. 76, African Economic History Network.
- DOLAN, Leo. 2023. 'Welfare Experiences of Portuguese Angolan Miners: A Longitudinal Comparative Study'. AEHN Working Paper No. 73, African Economic History Network.
- DUBE, Arindrajit, Jeff JACOBS, Suresh NAIDU, and Siddharth SURI. 2018. 'Monopsony Power in Crowdsourcing Markets'. Unpublished manuscript.
- FALL, Babacar. 2002. *Social history in French West Africa: forced labour, labour market, women and politics*. Calcutta: South-South Exchange Programme for Research on the History of Development (SEPHIS) and the Centre for Studies in Social Sciences (CSSSC).
- FALOLA, Toyin. 1987. *Britain and Nigeria: exploitation or development?* London: Zed Books.
- FLEISIG, Heywood. 1976. 'Slavery, the Supply of Agricultural Labour and the Industrialization of the South', *The Journal of Economic History*, 36 (3): 572–597.
- FRANKEMA, Ewout, and Morten JERVEN. 2014. 'Writing history backwards or sideways: towards a consensus on African population, 1850–2010', *The Economic History Review*, 67 (4): 907–931.
- FRANKEMA, Ewout, and Marlouis VAN WAJENBURG. 2012. 'Structural impediments to African growth? New evidence from real wages in British Africa, 1880–1965', *The Journal of Economic History*, 72 (4): 895–926.
- FREUND, Bill. 1981. *Capital and labour in the Nigerian tin mines*. London: Longman.
- GARDNER, Leigh. 2023. 'Slavery, coercion and economic development in Sub-Saharan Africa', *Business History Review*, 97 (2): 199–223.
- GOULART, Pedro Veiga Vaz da Silva. 2024. 'Child Labour, Africa's Colonial System and Coercion: The Case of the Portuguese Colonies, 1870–1975', *Economic History of Developing Regions*, 39 (1): 82–104.
- GREENHALGH, Peter. 1985. *West African Diamonds, 1919–1983: An Economic History*. Manchester: Manchester University Press.
- HAVIK, Philip J., Alexander KEESE, and Maciel SANTOS. 2015. *Administration and taxation in former Portuguese Africa: 1900–1945*. Newcastle upon Tyne: Cambridge Scholars Publishing.
- HEYWOOD Linda. 2000. *Contested Power in Angola, 1840s to the Present*. Suffolk: University of Rochester Press.
- HILLBOM, Ellen, and Jutta BOLT. 2018. *Botswana – A modern economic history: An African diamond in the rough*. New York City, New York: Springer.
- HOPKINS, Antony G. 1973. *An economic history of West Africa*. Milton Park, Abingdon-Thames: Routledge.
- HOPKINS, Antony G. 2009. 'The new economic history of Africa', *The Journal of African History*, 50 (2): 155–177.
- INTERNATIONAL LABOUR ORGANIZATION. 1930. Forced Labour Convention (No. 29).

- JONES, Sam, and Peter GIBBON. 2024. 'Firm profitability and forced wage labour in Portuguese Africa: Evidence from the Sena Sugar Estates, 1920–74', *The Economic History Review*, forthcoming.
- JUIF, Dácil, and Ewout FRANKEMA. 2018. 'From coercion to compensation: institutional responses to labour scarcity in the Central African Copperbelt', *Journal of Institutional Economics*, 14 (2): 313–343.
- KEESE, Alexander. 2012. 'The Constraints of Late Colonial Reform Policy: Forced Labour Scandals in the Portuguese Congo (Angola) and the Limits of Reform under Authoritarian Colonial Rule, 1955–1961', *Portuguese Studies*, 28 (2): 186–200.
- KENYON, Paul. 2018. *Dictatorland: The men who stole Africa*. London: Bloomsbury Publishing.
- LOVEJOY, Paul E. 1983. *Transformations in slavery: a history of slavery in Africa*. Cambridge: Cambridge University Press.
- LOWES, Sara, and Eduardo MONTERO. 2021. 'Concessions, violence and indirect rule: Evidence from the Congo free state', *The Quarterly Journal of Economics*, 136 (4): 2047–2091.
- MARCHAL, Jules. 2017. *Lord Leverhulme's ghosts: colonial exploitation in Congo*. London: Verso Books.
- MANNING, Alan. 2011. 'Imperfect Competition in the Labour Market', *The Handbook of Labour Economics*, Volume 4, Part B, edited by Ashenfelter, Orley, and David Card, 973–1041. Amsterdam: Elsevier.
- MANNING, Patrick. 2010. 'African population: projections, 1851–1961'. In *The demographics of empire: The colonial order and the creation of knowledge*, edited by Karl Ittmann, Dennis D. Cordell, and Gregory H. Maddox, 245–275. Athens, Ohio: Ohio University Press.
- MCMAHON, Elisabeth. 2017. 'Developing Workers: Coerced and "Voluntary" Labour in Zanzibar, 1909–1970', *International Labour and Working-Class History*, 92: 114–133.
- MENDES, Afonso. 1958. *Huíla and Moçâmedes: considerations on indigenous work* (Vol. 12), Ultramar Investigation Board, Center for Political and Social Studies.
- MÉNDEZ-CHACÓN, Esteban, and Diana VAN PATTEN. 2022. 'Multinationals, monopsony and local development: Evidence from the united fruit company', *Econometrica*, 90 (6): 2685–2721.
- MIRACLE, Marvin P., and Bruce FETTER. 1970. 'Backward-sloping labour-supply functions and African economic behavior', *Economic Development and Cultural Change*, 18 (2): 240–251.
- MONTEIRO, Jose P. 2022. 'Ghana's Complaint Against the Portuguese Empire at the ILO (1961–1962)'. In *The Internationalisation of the 'Native Labour' Question in Portuguese Late Colonialism, 1945–1962*, 159–201. London: Palgrave Macmillan.
- MOSLEY, Paul. 1984. *The Settler Economies: Studies in the Economic History of Kenya and Southern Rhodesia 1900–1963*. Cambridge: Cambridge University Press.
- MOSLEY, Paul. 2018. 'Why has export diversification been so hard to achieve in Africa?', *The World Economy*, 41 (4): 1025–1044.

- NAIDU, Suresh. 2020. 'American slavery and labour market power', *Economic History of Developing Regions*, 35 (1): 3–22.
- NEWITT, Malyn D. 1981. *Portugal in Africa: The last hundred years*. London: Longman Publishing Group.
- ORDE-BROWNE, Granville St. John. 1933. 'The African Labourer', *Africa*, 3 (1):13–30.
- PAKER, Meredith M., Judy Z. STEPHENSON, and Patrick WALLIS. 2024. 'Nominal wage patterns, monopsony and labour market power in early modern England', *The Economic History Review*, forthcoming.
- PATTERSON, Orlando. 2018. *Slavery and social death: A comparative study, with a new preface*. New Haven, Connecticut: Harvard University Press.
- PRADOS DE LA ESCOSURA, Leandro. 2013. 'Human development in Africa: A long-run perspective', *Explorations in Economic History*, 50 (2): 179–204. RODET, Marie. 2014. 'Forced Labour, Resistance and Masculinities in Kayes, French Sudan, 1919–1946', *International Labour and Working-Class History*, 86: 107–123.
- RÖNNBÄCK, Klas. 2014. 'The Men Seldom Suffer a Woman to Sit Down': The Historical Development of the Stereotype of the 'Lazy African', *African Studies*, 73 (2): 211–227.
- RÖNNBÄCK, Klas. 2024. 'Free or enslaved labour: a theoretical comparative model', *Journal of Global Slavery*, 9 (3), forthcoming.
- SEIBERT, Julia. 2011. 'More continuity than change? New forms of unfree labour in the Belgian Congo, 1908–1930'. In *Humanitarian Intervention and Changing Labour Relations*, edited by M. Van der Linden, 369–386. Leiden: Brill.
- TILLEY, Helen. 2016. 'Medicine, empires and ethics in colonial Africa', *AMA Journal of Ethics*, 18 (7): 743–753.
- UN SUB-COMMITTEE ON THE SITUATION IN ANGOLA. 1962. 'Report of the Sub-Committee on the Situation in Angola'. In *General Assembly Official Records: Sixteenth Session, Supplement No. 16 (A/4978)*. New York City: New York.
- VAIL, Leroy, and Landeg White. 1978. 'Plantation protest: the history of a Mozambican song', *Journal of Southern African Studies*, 5 (1): 1–25.
- VAN ONSELEN, Charles. 1980. *Chibaro: African mine labour in southern Rhodesia, 1900–1933*. London: Pluto Press.
- VAN ONSELEN, Charles. 2021. *The Night Trains: Moving Mozambican Miners to and from the Witwatersrand Mines, 1902–1955*. Oxford: Oxford University Press.
- VAN WAJENBURG, Marlous. 2018. 'Financing the African Colonial State: The Revenue Imperative and Forced Labour', *The Journal of Economic History*, 78 (1): 40–80.
- VARANDA, Jorge, and Todd CLEVELAND. 2014. '(Un) healthy relationships: African labourers, profits and health services in Angola's colonial-era diamond mines, 1917–1975', *Medical History*, 58 (1): 87–105.

Appendix A – *Published Archival Data Sources*

Colony of Angola, Central Department of General Statistics (1933-1973). Statistical Yearbook. Luanda: National Press – Colonia de Angola, Repartição Central de Estatística Geral (1933-1973). Anuário Estatístico. Luanda: Imprensa Nacional.

Colony of Mozambique, Central Department of General Statistics (1926-1973). Statistical Yearbook. Lourenço Marques: National Press. -- Colonia de Moçambique, Repartição Central de Estatística Geral (1926-1973). Anuário Estatístico. Lourenço Marques: Imprensa Nacional.

Reports and accounts of the bank of Angola. Bank of Angola. (1926 – 1978). Relatórios e contas do Banco de Angola. Banco de Angola. (1926 – 1978). <https://www.bpportugal.pt/arquivo/details?id=18287>.

Appendix B – Unpublished Archival Data Sources

Diamang annual reports and accounts (1917-1972) - Relatórios e contas anuais da Diamang (1917-1972). Life Science Department Archives, University of Coimbra, Portugal.

Diamang annual shareholder report. (1960-1965) - Relatório Anual dos Acionistas da Diamang. (1960-1965). Life Science Department Archives, University of Coimbra, Portugal.

Internal memos between indigenous labour section and general governor of Angola's office, Companhia de diamantes de Angola. (1917-1974) - Memorandos Internos entre a Seção de Mão de Obra Indígena e o Gabinete do Governador General de Angola, Companhia de Diamantes de Angola. (1917-1974). - Life Science Department Archives, University of Coimbra, Portugal.

Indigenous workforce legislation (86c2), Companhia de diamantes de Angola. General director of Lunda. (1914-1928) - Legislação da Mão de Obra Indígena (86c2), Companhia de Diamantes de Angola. Director Geral de Lunda. (1914-1928). - Life Science Department Archives, University of Coimbra, Portugal.



Explicant la transició del treball forçat al treball lliure a les mines de diamants de l'Angola colonial

RESUM

Aquest article examina l'evolució de les institucions laborals coercitives a l'Àfrica portuguesa a partir d'un detallat estudi de cas sobre la Companhia de Diamantes de Angola (Diamang), una de les empreses colonials més importants de la regió. Utilitzant un model econòmic teòric, l'estudi aprofundeix en la persistència d'aquestes pràctiques extractives i la seva eventual transformació en sistemes més inclusius, impulsats pel mercat. En dibuixar la trajectòria històrica de Diamang, l'article explora com aquest sistema, profundament arrelat, va passar del treball coercitiu a un sistema de lliure mercat, una transformació que va ser impulsada per canvis sociopolítics significatius, com ara la independència brusca dels països veïns, els disturbis interns i les pressions internacionals. El model proporciona noves perspectives sobre el domini històric de les institucions laborals coercitives i revela com els impactes externs poden precipitar un canvi institucional ràpid. En definitiva, aquest estudi millora la nostra comprensió de la dinàmica del mercat laboral colonial i destaca la naturalesa evolutiva de les pràctiques extractives dins de la història econòmica, amb una referència específica al cas poc estudiat de l'imperi colonial portuguès.

PARAULES CLAU: Angola, poder monopsonic, treball coercitiu, colonialisme.

CODIS JEL: J47, J42, N37, F54.



Explicando la transición del trabajo forzado al trabajo libre en las minas de diamantes de la Angola colonial

RESUMEN

Este artículo examina la evolución de las instituciones laborales coercitivas en el África portuguesa a través de un estudio de caso detallado de la Companhia de Diamantes de Angola (Diamang), una de las empresas coloniales más importantes de la región. Utilizando un modelo económico teórico, el estudio profundiza en la persistencia de estas prácticas extractivas y su eventual transformación en sistemas más inclusivos y orientados al mercado. Al trazar la trayectoria histórica de Diamang, el artículo explora cómo este sistema profundamente arraigado pasó del trabajo coercitivo a un sistema de libre mercado, transformación que fue impulsada por importantes cambios sociopolíticos, como la abrupta independencia de los países vecinos, los disturbios internos y las presiones internacionales. El modelo ofrece nuevas perspectivas sobre el predominio histórico de las instituciones laborales coercitivas y revela cómo los impactos externos pueden precipitar un rápido cambio institucional. En definitiva, este estudio mejora nuestra comprensión de la dinámica del mercado de trabajo colonial y pone de relieve la naturaleza evolutiva de las prácticas extractivas dentro de la historia económica, con referencia específica al poco estudiado caso del imperio colonial portugués.

PALABRAS CLAVE: Angola, poder de monopsonio, trabajo coercitivo, colonialismo.

CÓDIGOS JEL: J47, J42, N37, F54.

