

(Un)healthy Relationships: African Labourers, Profits and Health Services in Angola's Colonial-Era Diamond Mines, 1917–75

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Abstract: The Companhia de Diamantes de Angola, or Diamang, mined for diamonds in colonial Angola from 1917 until independence in 1975. The enterprise's Health Services Division (SSD) was responsible for supplying mine managers with an African labour force comprised of healthy, and therefore productive, employees. In practice, though, this otherwise 'healthy' system did not always work. While SSD personnel attempted to fulfil their charge by implementing a series of screening measures, production targets and a scarcely-populated regional labour pool regularly prompted senior officials to compel the SSD to clear recruits who were otherwise unfit for mine service. Drawing upon interviews with former SSD staff and African labourers, as well as company and colonial archival sources, this article focuses on the interplay over time between the SSD, the company's production demands and these labourers.

Keywords: Angola, Occupational Health, Colonialism, Forced Labour, Diamonds, Diamang

Introduction

At first glance, a colonial-era concessionary company that cared for the health of its African workers appears to be oxymoronic. However, the *Companhia de Diamantes de Angola*, or Diamang, professed to be this possibly unique entity, from the commencement of mining in 1917 to Angolan independence in 1975. Yet, upon closer examination, a

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much more complex scenario is revealed. In theory, the diamond enterprise's *Serviços de Saúde da Diamang*, or SSD (Health Services Division), was responsible for supplying mine managers with an African labour force comprised of healthy workers, that is workers capable of carrying out the manual tasks they would be assigned. In practice, though, the system did not always work this way. While SSD personnel dutifully attempted to fulfil their charge by implementing a series of screening measures at both the point of recruitment in 'the bush' and at Diamang's headquarters in Dundo, production targets and the small labour pool in the scarcely populated region regularly prompted senior company officials to compel the SSD to clear physically suspect recruits for mine service. In this position, the SSD played a mediative role between the company's profits-driven directors and the enormous African work force, which was comprised of both voluntary (*voluntários*) and coerced labourers (*contratados*).

Drawing upon corporate and colonial archival sources, as well as interviews conducted with former Diamang employees, this article focuses on the interplay over time between the SSD, the company's operational demands and these labourers. We contend that because of both labour shortages and Diamang's decision to only gradually and fitfully mechanise its operations, medical staff were pressured to clear physically questionable recruits, and mine managers to deny medical absences even to ailing or injured labourers, as part of the company's relentless drive for profits. In response, otherwise largely compliant African employees identified and creatively exploited cracks in Diamang's health/medical system, for example, by trading for much-needed food en route to the mines and, once there, by feigning illness, and both self-inflicting and neglecting wounds. These rather extreme strategies and the on-going pressure on the SSD to generate the maximum number of bodies for mine labour rendered the environment for African labourers throughout Diamang's operational existence decidedly unfavourable, or 'unhealthy'.

The Historical and Historiographical Uniqueness of Diamang

Diamang was unique among mining enterprises in southern Africa for a number of important reasons. The state-ceded autonomy it enjoyed within its expansive concessionary area was exceptional, rendering the enterprise 'a state within the state' in the popular imaginations of both the resident European and African populations. The provision of health services was an important component of this perception. Unlike mining operations elsewhere in colonial Africa, to compensate for the Angolan state's lack of human and material resources, Diamang was contractually responsible for providing health care free of charge not only to its employees, but to the entire regional population of Lunda, including residents otherwise unaffiliated with the enterprise. Moreover, this coverage area was not inconsiderable, growing over time from 20,000 to 50,000 square kilometres. Regardless, the company took this 'colonialism by proxy' charge quite seriously. It constantly invested in new facilities, personnel and equipment; sought innovative treatments and drugs; and began manufacturing its own pharmaceuticals deep in the hinterland of Angola. To physically deliver its health services to both its employees and to these regional residents, Diamang established a network of hospitals, dispensaries, and health posts, trained African health auxiliaries, nurses and dressers, and organised mobile health teams that periodically canvassed rural areas.¹ Diamang was venturing out

¹ For more information on the SSD and the relevance of the anti-trypanosomiasis campaigns for the establishment of the provision of health care in rural areas, see Jorge Varanda 'Um Cavalo de Tróia na Colónia? Missões de Profilaxia Contra a Doença do Sono da Diamang', in Luis Silva Pereira and Chiara Pussetti (eds), *Os Saberes da Cura, Antropologia da Doença e Práticas Terapêuticas* (Lisbon: ISPA/CEAS, 2009, 80–110).

well beyond the 'gates' of its operational enclave, in sharp contrast to the array of other commercial enterprises operating in the colony, as well as to the vast majority of mining companies operating elsewhere in Africa.²

Reflecting Diamang's active regional presence, this study commences its analysis of the 'health process' at the point of recruitment, and then follows recruits as they travelled to the company's mines – an undertaking that could take weeks, or even months, to complete (until the late 1940s when Diamang introduced truck transport to expedite this process) – toiled in the mines, and eventually returned to their home villages.³ Consequently, this study expands the site or sites of analysis beyond the housing compounds, and contiguous housing and urban areas that feature so centrally in the literature on health and labour on colonial-era mines in Africa.⁴ From a corporate mining perspective, the study builds upon literature that examines the significant health problems associated with these operations, but also highlights Diamang's exceptionally durable advocacy and utilisation of both medical and anthropological science in its daily operations.⁵ For example, although the SSD's screening methods resembled those utilised in South Africa and Rhodesia, in that they each resulted in the rejection of significant numbers of potential recruits, the SSD systematically and persistently utilised anthropometric measurements in an attempt to predict individual recruits' future levels of productivity.⁶ These measurements often proved more influential than empiricism for company officials engaged in predicting perceived labour utility – perceptions which often fell along ethnic lines.⁷

This study is also both informed by and builds upon research that examines health and labour within colonial Angola. Studies by Ball, Heywood and Esteves that consider African labour – both forced and voluntary – in a variety of settings in twentieth-century Angola offers valuable comparative material and collectively demonstrates that, as at Diamang, harsh recruitment and exploitative conditions elsewhere in the colony deleteriously affected indigenous workers' health, regardless of the particular industry with which they were engaged. Yet, this literature also underscores the uniqueness of Diamang. The diamond enterprise's robust health services division and its array of health-related endeavours dwarfed similar entities and practices in the settings that these authors examine, including the Casseque Sugar Company, other agricultural enterprises that

² The utilisation of the term 'enclave' here refers to Arnold's notion of a medical enclave, which is highly relevant in this case despite the geographical and temporal discrepancies. See Randall Packard, *White Plague, Black Labour – Tuberculosis and the Political Economy of Health and Disease in South Africa* (Berkeley, CA: University of California Press, 1989); Elaine Katz, *The White Death: Silicosis on the Witwatersrand Gold Mines, 1886–1910* (Johannesburg: Witwatersrand University Press, 1995); Peter Carstens, *In the Company of Diamonds: De Beers, Kleinsee, and the Control of a Town* (Athens, OH: Ohio University Press, 2001).

³ See, for example, Packard, *op.cit.* (note 2); Alexander Butchart, *The Anatomy of Power: European Constructions of the African Body* (London and New York: Zed Books, 1998); Julie Livingston, 'Physical Fitness and Economic Opportunity in the Bechuanaland Protectorate in the 1930s and 1940s', *Journal of Southern Africa Studies*, 27 (2001), 793–811.

⁴ See, for example, Charles Van Onselen, *Chibaro: African Mine Labour in Southern Rhodesia, 1900–1933* (Johannesburg, Ravan Press, 1976); Packard, *op.cit.* (note 2); Butchart, *op.cit.* (note 3); Carstens, *op.cit.* (note 2).

⁵ Raymond Dumett, 'Africa's Strategic Minerals during the Second World War', *The Journal of African History*, 26 (1985), 381–408; Stephen Addae, *History of Western Medicine in Ghana, 1880–1960* (Edinburgh: Durham Academic Press, 1996); and Carstens, *op.cit.* (note 2), for the Copperbelt, Ghanaian and Namibian contexts, respectively.

⁶ Packard, *op.cit.* (note 2); Butchart, *op.cit.* (note 3).

⁷ For an example of this type of application of (pseudo-)science in colonial Africa, see, for example: Daniel Headrick, *The Tools of Empire: Technology and European Imperialism in the Nineteenth Century* (New York: Oxford University Press, 1981); Heather Bell, *Frontiers of Medicine in the Anglo-Egyptian Sudan, 1899–1940* (Oxford: Oxford University Press, 1991), 20–65.

utilised labourers from Angola's central highlands and the Benguela Railroad.⁸ While these authors' arguments regarding the exploitation of indigenous labourers complement well our examination of the arduous existence of workers at Diamang's mines, the type of corporate reciprocation – in the form of both preventative and curative health services – that significantly shaped labour–management relations at Diamang are absent in these studies.

Shapiro's work on the use of medicine across the far-flung Portuguese Empire is also instructive.⁹ His examination of how tropical medicine policy was delivered to, and applied in, the colonies affords important insights into the ways that Lisbon attempted to manage this health provision, but also how it was mediated by different actors in the field. Shapiro's consideration of front-line actors informed an understanding of the myriad challenges that Diamang's health services personnel faced, though his study elides the types of tensions that existed between different entities on the ground at Diamang. Instead, Shapiro treats the provision of health in a more linear fashion – emanating from the metropole before ultimately being applied to various, global indigenous populations. Also absent in his otherwise excellent study are comparisons of the quality of health services in different settings and, more importantly, indigenous perceptions of and responses to this 'top down' provision.

Moving beyond the lusophone orbit, Packard's examination of the history of tuberculosis in South Africa provides a useful parallel, as his study similarly considers labourers' health in a colonial-era mining context. Yet, while both Angola and South Africa featured mining settings that exploited indigenous workers, the structural differences between these milieus serve to highlight Diamang's commanding position in its relations with the Angolan colonial administration vis-à-vis mining operations and their dealings with a variety of states elsewhere on the continent. While Packard adroitly traces health in South Africa's burgeoning industrial economy, the effects of Diamang's labour and mining monopolies, its geographical isolation and its massive infusion of wealth into the colony's coffers insulated it from interference by Portugal's otherwise domineering, though economically weak, dictatorial *Estado Novo* (New State) regime. Indeed, while in South Africa the Chamber of Mines had to navigate a 'sea' of governmental and white South African societal interests, Diamang experienced no such hindrances, completely controlling both local labour and the production of the discourse associated with it.¹⁰ The scarcity of the colonial apparatus in Lunda enabled Diamang to hegemonically produce discourses predicated on and allegedly sanctioned by scientific medicine. Consequently, the Angolan diamond enterprise adopted a more creative, even experimental, approach to workers' health, largely unconcerned with the sentiments of the colonial administration.

The most directly comparable case would be that of Forminière, which had commenced mining in the neighbouring (Belgian) Congo roughly five years before Diamang began

⁸ Emmanuel Esteves, 'O Caminho de Ferro de Benguela e o impacto econômico, social e cultural nas suas zonas de influência 1902–52' (unpublished PhD thesis, Universidade do Porto, Portugal 1999); Jeremy Ball, 'The Colossal Lie: The Sociedade Agrícola do Casseque and Portuguese Colonial Labour Policy in Angola, 1899–1977' (unpublished PhD thesis, University of California, Los Angeles, 2003); Linda Heywood, 'Contested Power in Angola, 1840's to the Present' (Rochester, NY: University of Rochester Press, 2000).

⁹ Martin F. Shapiro, 'Medicine in the Service of Colonialism: Medical Care in Portuguese Africa, 1885–1974' (unpublished PhD thesis, University of California, Los Angeles, 1983).

¹⁰ Randall Packard, 'Tuberculosis and the Development of Industrial Health Policies on the Witwatersrand, 1902–1932', *Journal of Southern African Studies*, 13 (1987), 187–209; Packard, *op.cit.* (note 2); Megan Vaughan, *Curing their Ills: Colonial Power and African Illness* (Palo Alto, CA: Stanford University Press, 1991); Randall Packard, 'The Invention of the Tropical Worker: Medical Research and the Quest for Central African Labour on the South African Gold Mines, 1903–36', *The Journal of African History*, 34 (1993), 271–92.

operations.¹¹ Forminière's assistance to Diamang during the company's tenuous early days included the provision of vital technical and administrative support, safe and efficient supply lines and even help in repressing the regional commerce in illicit diamonds. Going forward, Forminière and Diamang cooperated on a number of fronts, but by the late 1930s, buoyed by escalating profits, the younger enterprise had already assumed the senior position in this relationship.¹² Like Diamang, Forminière's approach to its African employees' health was virtually unrivalled within its respective territory. Forminière achieved food security reasonably quickly through a mixture of creative and coercive agricultural policies, while the company's medical personnel also contributed to the overall improvement in health of its African workforce. By 1925, in part spurred on by colonial legislation that mandated health care for African employees of colonial companies, but also because Forminière recognised the financial benefits of maintaining a healthy labour force, the enterprise had a small group of doctors and health auxiliaries on staff, as well as a training program for male nurses. Yet, as stated above, the Angolan enterprise quickly outpaced Forminière's operations. Diamang was able to expand its health services staff, facilities and area of coverage in ways that its junior partner to the north could not. If similarities existed between the approaches Forminière and Diamang adopted, the significantly greater capacities of the latter render the scale and scope of health-related practices at the two companies experientially dissimilar and, thus, analytically divergent.

Ultimately, this article attempts to unpack, and thus render more complex, commercial enterprises operating in colonial Africa by highlighting the SSD and its relationships with both senior company officials and local state administrators. It also considers how this web of competing agendas and power relations shaped the health of the company's African staff, while also exploring these workers' responses to Diamang's health-related practices. This examination of the relevant actors 'on the ground' and the ways that their interaction influenced the health of Diamang's African recruits-cum-labourers provides a finer level of detail than that typically offered by studies that apply a political economy of health approach to investigations of colonial Africa.¹³

The Birth and Growth of a Leviathan

On the morning of 4 November 1912, prospectors working for Forminière, a diamond concessionary company located in the Belgian Congo, found diamonds in the Lunda region of the adjacent Portuguese colony of Angola. (See map in Figure 1).¹⁴ Less than five years later, on 16 October 1917, Portuguese, French, American and Belgian investors

¹¹ See, for example, Richard Derksen, 'Forminière in the Kasai, 1906–1939', *African Economic History*, 12 (1983), 49–65; Jean-Luc Vellut, 'Mining in the Belgian Congo', in David Birmingham and Phyllis M. Martin (eds), *History of Central Africa, Vol. 2* (London and New York: Longman, 1983).

¹² By 1929, Diamang had already virtually matched Forminière's output, before permanently surpassing it in 1937.

¹³ For examples of relevant scholarly work that feature a political economy of health approach, see Lesley Doyal and Imogen Pennell, *The Political Economy of Health* (London: Pluto Press, 1979); Vicente Navarro (ed.), *Imperialism, Health and Medicine* (London, Pluto Press, 1982); Packard, *op.cit.* (note 2).

¹⁴ In the ensuing year, Portuguese, Belgian, American and French investors formed PEMA (Companhia de Pesquisas Mineiras de Angola), or the Mining Research Company of Angola, to prospect for diamonds. Encouraging discoveries, however, necessitated the creation of a larger, better-funded enterprise, which led to the formation of Diamang. In turn, Diamang inherited many of PEMA's most important personnel. Regarding the relation between Diamang and Forminière, see Jorge Varanda, 'Crossing colonies and empires: The health services of the diamond company of Angola', in Anne Digby, Walter Ernst and Projit Muhkarji (eds), *Crossing Colonial Historiographies: Histories of Colonial and Indigenous Medicines in Transnational Perspective* (Newcastle upon Tyne: Cambridge Scholars Publishing, 2010), 165–84.

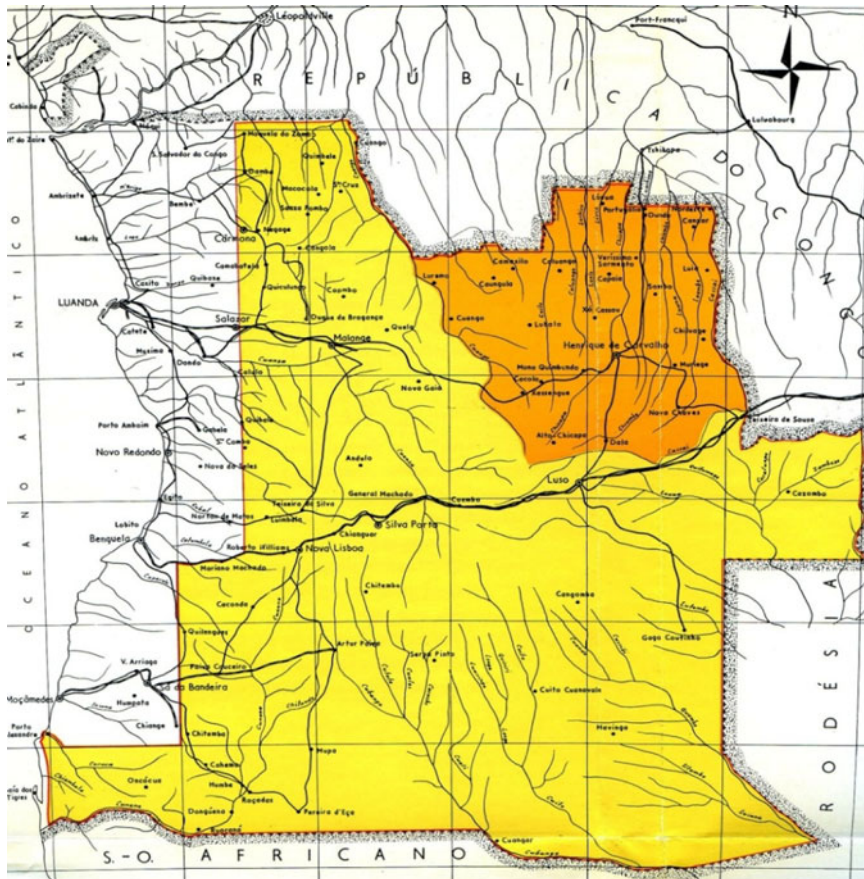


Figure 1: Map of Angola, including Diamang's concessionary area (the extensive, lightly shaded area) and the company's exclusive labour procurement and operational area (the smaller, dark-shaded area). Dundo, the company's headquarters can be seen in the upper right corner of the latter area. Source: Diamang. Breve Notícia sobre a sua actividade em Angola. Lisboa: Tip. Silvas, Lda, 1963.

formed Diamang in order to exploit the alluvial diamond deposits that had been identified in the interim. The company operated continuously, from 1917 to 1975, in the northeastern corner of Angola, in the Lunda district, which was then circumscribed by the Lóvuá and Kasai rivers, Northern Rhodesia (Zambia) and the (Belgian)

Congo. In 1921, the Portuguese colonial government granted Diamang exclusive mining and labour procurement rights over vast concessionary areas and, going forward, an unusual degree of liberty in the management and provision of health care in these areas. Using these monopolies, Diamang became the colony's largest commercial operator and also its leading revenue generator.

This wealth was generated on the backs of the African labour force. In order to staff its expanding operations, Diamang required an ever greater supply of African men and women, both adults and minors.¹⁵ From the company's inception to the culmination of

¹⁵ For more information regarding the recruitment of young workers, see: Todd Cleveland, 'Minors in Name Only: Child Labourers on the Diamond Mines of the Companhia de Diamantes de Angola (Diamang), 1917–1975', *Journal of Family History*, 35 (2010), 91–110.

operations, average annual workforce sizes grew dramatically, from approximately 500 to over 27,000, roughly 35% of whom, over time, arrived under coercion. Given the perceived correlation between the number of workers and production levels, that is profits, company directors rarely bridled the expansion of Diamang's labour force, even when this policy drove down the quality of incoming recruits and increased the numbers of inexperienced workers. While mechanisation would have obviated the need for such a large labour force, the company consistently demonstrated a preference for inexpensive manpower over more costly machinery, in great part due to the fact that the alluvial mining process required little, if any, expertise. Unlike the blasting and other technical tasks associated with underground mining, Diamang only required that its African labourers have the ability to use a shovel to remove the superficial layers of dirt and gravel in which the Angolan diamonds were embedded.

Diamang's medical services division was no exception to the enterprise's emphasis on manpower. The SSD outdistanced, for most of its existence, both the Angolan colonial state's skeletal medical staff, as well as those of other large concessionary companies operating in Angola, such as the Benguela Railroad (CFB) or the Casseque Sugar Company.¹⁶ From the 1920s until 1973, the SSD grew its staff exponentially, from three physicians, ten nurses and a small number of African auxiliaries in the mid-1920s, to a force of 15 physicians, 37 European nurses, and roughly 1200 African nurses and auxiliaries trained in the company's 'nursing' schools by the 1970s. From the SSD's initial rudimentary operations, it also grew into a complex and robust entity, offering both preventive and curative medical care, as well as an array of health-related services. So impressive was this outfit that as Portugal increasingly came under international pressure for its colonial practices from the 1950s onwards, the government regularly cited Diamang's medical services – rather than its own meagre offerings – as an example of its alleged capacity and concern for the colonised population.¹⁷

Initial Encounters: Screening Recruits in the Field

Upon the commencement of Diamang's operations in 1917, most local residents simply ignored the company's presence. However, a far-reaching agreement in 1921 between Diamang and the colonial state, which required local colonial administrators, or *chefes do posto*, to actively procure labourers for the company rendered indifference increasingly less viable.¹⁸ For regional residents, this system became a daily feature of life for roughly the next forty years until the state dismantled it in the mid-1960s.

For these forcibly contracted labourers, or *contratados*, the engagement process began when their *sobas*, or headmen, offered them to African police, known as *cipaios*, who scoured regional villages seeking to meet recruitment quotas jointly set by colonial officials and Diamang. These enforcers would then lead ever-accumulating convoys of recruits from villages to regional colonial administration outposts, or *postos*. At the *postos*, recruits were obliged to enter into contracts with Diamang, thereby legalising the

¹⁶ For a detailed account, see Jorge Varanda, 'Filhos, enteados e apadrinhados: Discursos, políticas e práticas dos serviços de saúde da Diamang', *Antropologia Portuguesa*, 29 (2012), 141–66.

¹⁷ For more information on the SSD, see Jorge Varanda, 'A Bem da Nação: Medical Science in a Diamond Company in Twentieth-Century Colonial Angola' (unpublished PhD thesis, University of London, 2007).

¹⁸ The agreement also called for the company to grant to the colony 40% of its net profits, 100,000 shares of Diamang stock, and a series of loans at very favourable repayment rates. Moreover, the pact formally exempted Diamang from all current and future tax obligations on profits, imports, and all of its diamond exports – an arrangement not even enjoyed by missionaries operating in the colony.

engagement. Many of these recruits were also accompanied by wives and/or children, as company officials displayed great enthusiasm for the relocation of families – or partial families for men with multiple wives – to its mines.¹⁹ Company administrators determined that workers accompanied by family members deserted less frequently, were generally more ‘stable’, and were more likely to remain on after they had fulfilled their contracts.

It was also at these posts where recruits were first exposed to Diamang’s health practices and procedures via a preliminary screening examination. By law, state physicians were obliged to examine these coerced recruits. However, due to the dire financial situation of the Portuguese state, the colonial apparatus lacked the necessary human resources. Therefore, more often than not, doctors, European nurses or even African auxiliaries were unavailable for examinations and, instead, they were carried out by local colonial administrators who had no medical training at all.²⁰

With this screening measure, Diamang hoped to avoid paying for ‘unsatisfactory’ recruits’ trips to Dundo, the company’s headquarters in Lunda, through which recruits were funnelled before proceeding on to the mines. However, these examinations, which Diamang first introduced in the late 1920s, were, over time, administered only sporadically and cursorily, and thus they were largely ineffective in filtering out workers who were physically incapable of enduring the demanding conditions in the mines. As such, these unproductive examinations at least partially replicated the South African model, in which hundreds of male recruits were ‘examined’ in a single afternoon by a lone physician.²¹

By the late 1920s, following high rates of disease and hospitalisation among African workers and too many physically suspect recruits being approved for work, Diamang implemented an anthropometric measurement tool – the Pignet index (Pi) – designed to assess individual recruits’ physical fitness levels.²² The decision to adopt the Pignet index was most likely prompted by SSD staff members’ contact with Drs Gillet and Mottouille, Belgian physicians who were already utilising the index in the Congo at Forminière’s mines.²³ Further south, South African mining companies had been employing the Pignet index since 1907, while it was also in use in other colonial territories, such as the Bechuanaland Protectorate.²⁴

The index itself ‘translated’ the anthropometric relationship between height (T), weight (P) and thoracic perimeter (pt) into a single number, thereby enabling Diamang (and others) to quantify the screening process. Table 1 illustrates that the lower the Pignet value, the higher the (alleged) fitness level of the individual:

If a recruit’s Pignet score exceeded a number pre-determined by the company, the recruit was, at least theoretically, supposed to be rejected for mine service as ‘physically

¹⁹ Only on the Copperbelt that stretched across Zambia (Northern Rhodesia) and the (Belgian) Congo did companies similarly encourage male labourers to bring wives and children with them to the mines.

²⁰ Although these practices were not legally condoned, they were widely accepted. MAUC – Folder MOI 86B-1°; Carlos Borges Sousa, ‘Confidential Letter-report’ (31 March 1951).

²¹ Packard argues that these quick examinations were consequently only able to pinpoint ‘visible’ ailments. Packard, *op.cit.* (note 2), 72.

²² Maurice-Charles-Joseph Pignet was a French army doctor who created the Pignet index in 1900 to help determine recruits’ fitness levels.

²³ For a reflection on Diamang’s unorthodox web of networks from which knowledge, information and goods flowed see, Varanda, *op. cit.* (note 14). Although European employees underwent medical screening in Lisbon prior to departure, they did not undergo anthropometrical examinations.

²⁴ George Turner, *Report on the Alleged Prevalence of Pulmonary Tuberculosis and on Some of the Principal Diseases Existing in the Kraals of the Natives, Portuguese East African Territories, South of Latitude 22°* (Johannesburg: Hayne and Gibson, 1907), Packard, *op.cit.* (note 2); Butchart, *op.cit.* (note 3); Livingston, *op.cit.* (note 3).

Pi lower than 10	Very strongly built
Pi from 11 to 15	Strongly built
Pi from 16 to 20	Well built
Pi from 21 to 30	Reasonably built
Pi from 31 to 35	Weakly built
Pi superior to 36	Very weakly built

Table 1: Pignet index values and corresponding descriptions. Source: MAUC — Folder 86 38o Diamang, Mão d' Obra de December 1, 1938 to March 31, 1939.

incapable'. The index was, thus, expected to improve the quality of recruits, thereby decreasing hospitalisation rates among the African labour force and simultaneously increasing productivity. In this sense, the index was intended to benefit the SSD by reducing the man-hours that staff spent tending to hospitalised workers; the mine managers, who were now to receive only the 'better built' recruits; and senior management and shareholders by increasing the company's profits.

In the early days of screening at the colonial administrative posts, state health officials or local administrators (*chefes de posto*) were supposed to follow the instructions circulated by the SSD that explained how to measure the requisite physical characteristics. However, most of these governmental employees remained unfamiliar with the measurement procedures and/or lacked the appropriate equipment due to the state's fiscal precariousness. Subsequently, Diamang was obligated to furnish the scales and anthropometric measuring instruments necessary to properly determine recruits' Pignet indexes. By 1938, the head physician of the SSD, Dr Vasques de Carvalho, acknowledged that there was a lack of rigour among colonial officials in administering the Pignet examination, in part due to the high turnover rate of colonial administrative staff. Drs Carvalho and Mottouille (who also consulted for Diamang in the 1930s and 1940s) also noted that recruits were often forced to divert from the shortest route as they trekked to Dundo. In these cases, recruits walked up to dozens of kilometres off course in order to be examined by one of the few state physicians (or nurses) in the region, which, the SSD's doctors warned, had considerable consequences for recruits' health.²⁵

By the mid-1950s, SSD officials were still complaining about the implementation of the Pignet examination in the field, namely because *chefes* were allowing (extremely) weak recruits to proceed to Dundo. Therefore company health officials regularly circulated letters to these local colonial administrators reminding them of the minimum requirements (which often shifted), such as the following from the early 1950s: 'Recruits should have a maximum Pignet index of 34, weigh no less than 48kg and have a thoracic perimeter greater than 80cm'.²⁶

Although Angolan recruits were never privy to this type of state-company interaction, their testimony sheds light on the problematic nature of the examination procedure. Indeed, few informants reported that they had undergone a medical examination, or even any type of physical scrutiny at the *postos*, suggesting that by the 1950s these procedures were regularly neglected (the vast majority of our African informants first travelled to

²⁵ MAUC – Folder 86D-1°, Dr Mottouille, 'Hygiène Générale et Politique Indigène de la Diamang au District de Lunda, 1936' (1936).

²⁶ Arquivo Histórico Nacional de Angola (hereafter, AHN) – AHN – Box 1281, Letter 'Mendonça' (9 August 1951); AHN – Box 321, Letter from José to Chefe do Posto (28 April 1952).

Diamang for work in the 1950s, 60s or 70s). For example, Fernando Tximvula, who first transitioned through a *posto* in 1967, declared that

‘There was a *posto* . . . where I grew up. Basically, you went there – there was no medical examination – and then waited for a *capita* (African overseer) with the trucks to show up and take you to Dundo. No matter what, you would be sent to Dundo – unless you were blind!’²⁷ Even when a medical examination was administered, the lack of diligence and concern was obvious. Filipe Saucauene, who reported undergoing medical screening at a *posto* in 1966, recalled that ‘Potential workers were weighed and then chosen based upon their weight and their overall physical appearance. Even small and weak men would eventually be chosen if they returned a number of times’.²⁸

Saucauene’s experience suggests that individuals who actively sought employment with Diamang effectively learned to negotiate the labour recruitment system in order to realise their objective.²⁹

Getting to Work: From the Posto to Dundo

Prior to departing from the colonial outposts, coerced *contratados*, received rations for the journey to Diamang’s headquarters in Dundo. Provisions typically weighed over 25kg, although they were still often insufficient for the long trek ahead, which could range up to 1100km.³⁰ This combination of inadequate, yet still cumbersome, rations severely drained these recruits as they journeyed to Dundo, thereby prejudicing their scores on the Pignet index upon which Diamang, at least ostensibly, placed so much emphasis.

A 1928 journey undertaken by *contratados* from Bailundo, over 1000km away from Dundo, highlights the type of ordeal that recruits could endure until Diamang introduced mechanical transport to the mines in 1948. In this case, the trekking party consisted of 550 adults and 142 children, including 250 families, plus one company official, Francisco Abreu. During the first half of the trip, each member of the group – including Abreu – had been granted thirty days of rations, while they were only able to cover this distance in forty-five. The second half of the trip totalled another twenty-three days, before the party stumbled into Dundo on 16 June 1928. In Abreu’s account, he admonished the company for failing to understand that the ‘realities of the trip’, which included eleven days of crossing rivers alone – an endeavour that at times required two days – should not be considered as ‘delays’, but rather anticipated and compensated for in the provisioning of rations.³¹ While the embarrassment that this episode generated prompted company officials to increase food allotments to subsequently, during the next two decades trekking parties still occasionally arrived in Dundo complaining of hunger.

Faced with challenges of this nature, African recruits actively and creatively responded. Some traded their company-issued clothes or blankets with residents of the communities they passed in exchange for food, even if this barter violated instructions received from *chefes de posto*.³² For recruits, the possibility of corporal punishment was understandably preferable to starvation. At other times, recruits delayed their arrival in Dundo by either

²⁷ Interview, Fernando Tximvula, Lunda (Angola), 19 August 2005.

²⁸ Interview, Filipe Saucauene, Lunda (Angola), 18 November 2005.

²⁹ This experiential understanding parallels the scenario in the Bechuanaland Protectorate that Livingston has reconstructed. See Livingston, *op.cit.* (note 3).

³⁰ In 1923, a company report indicated that recruits who were carrying less than thirty kilograms would be ‘topped off’ with company supplies, thereby turning recruits into porters. MAUC – Folder 86 2° (1923).

³¹ MAUC – Folder 86 12°, Francisco Moreira da Fonseca Abreu, Relatório ao Snr. Representante da Diamang (16 June 1928). Only slightly more than half of these recruits ultimately fulfilled their contracts.

³² The company was concerned about the illicit trade in diamonds in the region and was worried that these stones might be bartered for clothes.

intentionally proceeding slowly or making unsanctioned detours in hopes of securing additional food for the journey. For example, in 1926, Diamang officials accused a group of trekking *contratados* of taking a great deal longer – ninety days – to reach Dundo and consequently threatened that the best way to tackle this behaviour was ‘to guarantee recruits rations for only 30–35 days of the journey’.³³

By the early 1930s, Diamang was sufficiently aware of the negative impact its frugality was having upon recruits’ health to begin to make improvements, albeit sporadically and in limited fashion, associated with this portion of the recruitment process. For example, the company began to construct shelters along some of the more well-travelled routes to Dundo at intervals of roughly 100km at which recruits were to replenish their supplies. Even if these shelters were unevenly spaced, often in disrepair, lacked sufficient space and privacy and, at times, were insufficiently stocked with food, they *still* constituted an improvement, however marginal.³⁴

To prevent workers from deserting, avoid delays in their reaching Dundo, and ensure that they arrived healthy and ready for the work that lay ahead, Diamang phased in mechanical transport to company headquarters in 1948. Despite significant obstacles, including logistical and scheduling difficulties, truck transport to the mines greatly alleviated the health burden of this segment of the journey. Subsequently, recruits and their family members typically reached Dundo in a matter of days, rather than months.³⁵

Secondary Screening in Dundo

Because Diamang mechanised its operations only minimally and gradually, it depended on vast numbers of manual labourers throughout its operational existence. In turn, these labour requirements forced the company to accept recruits unfit for mine work, many of whom proved to be of limited productive value. Company directors subsequently looked to the SSD to do the seemingly impossible: screen incoming recruits in order to weed out those who would make only limited contributions (including those with communicable diseases) and simultaneously facilitate an increase in the overall number of labourers. Yet, because these senior company officials privileged the latter over the former – often in spite of protestations from health staff, as well as from individual mine managers – the SSD was pressured to clear many recruits who should have been rejected, at least according to the company’s supposed minimum standards.

It was upon recruits’ initial arrival in Dundo that SSD personnel began to attempt to fulfil their charge by first administering screening examinations. In the late 1920s, the SSD screened both incoming male recruits and the wives who accompanied them, for smallpox and, later, for typhoid and intestinal parasites, as well. By the 1950s, physicians continued to watch for visible ailments, including hernias, physical deformities, bone problems and goitres, but they also watched for contagious or problematic afflictions, such as intestinal ailments, sleeping sickness, venereal diseases and yellow fever, as well as administering BCG vaccinations for tuberculosis.³⁶

³³ MAUC – Folder 86 5°, Letter from Antonio Brandão de Mello to Sr Antonio Cyrne (10 April 1926). During the first decade of *chibalo* (forced labour) approximately 10%–25% of recruits deserted after being registered in the *postos* as they often travelled to the mines without an escort. By the end of the 1930s, the company reduced desertions en route to Dundo to less than 5% of all recruits.

³⁴ During the rainy season, inadequate shelter also exacerbated respiratory ailments.

³⁵ The recruits’ most consistent health-related complaint following the adoption of truck transport was the inadequate shelter that the trucks offered during the rainy season.

³⁶ MAUC – Folder 126B, 9–10°, Dr Picoto, ‘AHR 1951’ (1951).

The other major objective of the screening examination was, of course, the exclusion of recruits ill-prepared for mine labour. As early as 1922, for example, Health Services personnel were turning away recruits from Malange, who were considered as ‘very poor ... and absolutely useless insofar as any kind of labour is concerned’.³⁷ In this case, the SSD went so far as to recommend the cessation of recruitment in that area, but the company’s production priorities muted their concerns. Into the 1920s and 1930s, company doctors Baptista and Almeida e Souza alerted company officials that high levels of sleeping sickness were evident within particular groups of recruits, but senior officials continued to override or simply ignore from recommendations from medical staff, citing a need for manpower to fuel the rapidly expanding operations.³⁸

Mine managers who received these medically cleared *contratados* were often displeased when examining these ‘inadequate’ workers on their arrival. An irate correspondence from the supervisor of the Luaco mine group in 1928 provides an example of the discontent that this type of scenario could generate:

We received here at Luaco today a group of 67 *contratados*. On going over these men carefully I find them to be of absolutely the most miserable types ever delivered to this (mine) group. ... I find that only 36 of the 67 are fit to perform a regular task at our mines. Thirty-one of these men are so small and weak they would be only an impediment to others. These 31 men have been placed in a lot by themselves. Since they have been passed by the SSD in Dundo, they have no current illnesses and the Company would probably be wiser to return them at once to their homes.³⁹

Reacting to complaints of this nature, the SSD revised its screening measures in Dundo, by implementing the Pignet index, just as it had in the field, in order to minimise the subjectivity that had characterised earlier examinations. Senior company officials, however, still could – and routinely did – ignore the results of this new measure.

In order to try to eliminate the discrepancy between company ideals and manpower exigencies, SSD physicians demanded after a while that a Pignet number be established that would eliminate truly incapable recruits but only minimally reduce the overall number of recruits sent to the mines. In other words, they sought to strike a balance.⁴⁰

In response, Diamang officials set the formal acceptance/rejection threshold in the early 1930s at ‘33’ and the SSD began tracking the results. By way of comparison, at this time the maximum Pignet value of recruits accepted at mines in several regions of the Congo varied from 30 to 35, while on the Katangan Copperbelt the Belgian administration had set the limit at 34. Meanwhile, in certain colonial companies in Madagascar, individuals with Pignet indexes of more than 30 were refused employment.⁴¹

After the passage of time allowed for an analysis of incoming recruits’ performance as correlated to their Pignet scores – and perhaps due to pressure from senior company officials – Dr Carvalho of the SSD recommended in 1933 that recruits with Pignet indexes of 36 or above be given time to improve their scores before being re-subjected to examination or ultimately rejected outright. ‘We have performed a small study with the purpose of determining the correct index figure that would produce the best working conditions and settled upon 36. Above this index, the native is poorly conditioned for mine work.’⁴² The persistence of manual procedures and tasks at Diamang’s mines, however,

³⁷ MAUC – Folder 84K3 2°, Letter from W. Rettie to Diamang in Luanda (14 June 1923), 1.

³⁸ MAUC – Folder MPDS 126B, 5-1°.

³⁹ MAUC – Folder 86 12°, Letter from E.S. Lane to the Representante da Diamang (21 August 1928).

⁴⁰ MAUC – Folder DA-RA, Dr Vasques Carvalho, ‘AHR 1932’ (1932), 11.

⁴¹ MAUC – Folder DA-RA, Dr Vasques Carvalho, ‘AHR 1934’ (1934), 2.

⁴² MAUC – Folder DA-RA, Dr Vasques Carvalho, ‘HR 1934’ (1934).

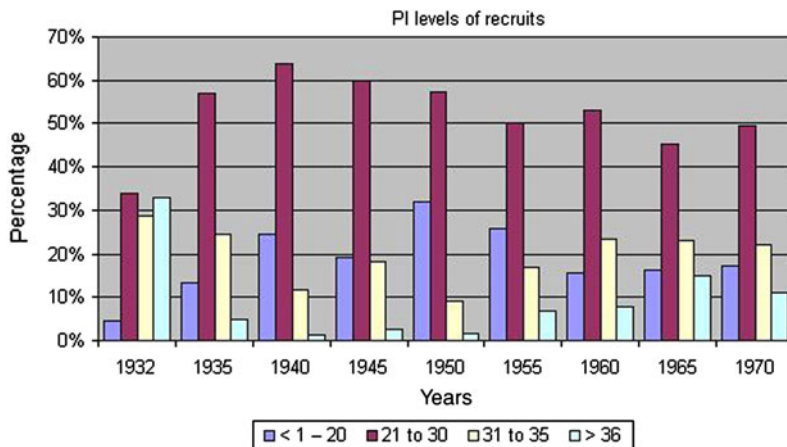


Figure 2: Pignet levels of African recruits.⁴³

meant that the company never tempered its demand for African labourers. Consequently, Diamang continually recruited Africans physically unsuited for mine work to try to meet labour demands, as measured by the sheer number of bodies available. Thus, the percentage of recruits labelled as ‘weak’ or ‘very weak’ in 1935 was almost 30%, dropping to its lowest point of 10.7% in 1950 (see graph in Figure 2).

However, just a mere five years later, faced with a labour shortage due to the opening of new mines and attendant increased production demands, Diamang increased its intake of ‘unhealthy’ recruits to almost 25%.⁴⁴ This percentage then climbed slightly during the 1960s and 70s as the company continued to expand its operations, increasing to roughly a third of all workers.⁴⁵

Diamang officials gradually adjusted the Pignet threshold – most often upwards – in order to officially sanction the acceptance of an ever greater number of recruits, even if many of the previously ‘weakly built’ recruits would have found their way to the mines anyway.⁴⁶ The situation became so dire that, in 1947, local administrators requested the cessation of the Pignet index, arguing that virtually every male from the region who was physically capable of mine labour was already employed by the company, leaving these recruiters with a less-than-ideal resident population from which to continue to try to meet Diamang’s relentless demand for more bodies.⁴⁷

Rather than abandoning the Pignet index, though, Diamang chose instead to try to elevate the general health of residents in Lunda – not coincidentally, its primary and

⁴³ MAUC – Folder DA-RA, Dr V. Carvalho, ‘AHR 1932; 1935’ (1935); MAUC – Folder DA-RA, Dr Picoto, ‘AHR 1940; 1945; 1950; 1955’ (1955); MAUC – Folder DA-RA, Dr David ‘AHR 1960; 1965; 1970’ (1970).

⁴⁴ R. Pinhão and M. Pires, *Preambulo e Proposta de um novo critério de apreciação do estado sanitário da mão-de-obra contratada* (Dundo, Angola: Serviço de Saúde, 1955). Documents provided for the authors by Dr Rui Pinhão on 3 May 2004.

⁴⁵ The accuracy of these numbers is, however, questionable. For example, in the document *Proposta, op.cit.* (note 44) Drs Pinhão and Pires pointed out problems in the recording of workers’ weights during inspections. Secondly, Dr David asserted that in 1962 he could label ‘50% of the recruits arriving as “weak” or “very weak”’. MAUC – Folder ‘Saúde’, Letter from Dr David to Odónel Moniz (29 November 1962).

⁴⁶ MAUC – Acta da 182ª Sessão do Conselho de Administração, Folder 86-45°, 1/7/44 – 31/3/45 (19 March 1945).

⁴⁷ Varand, *ibid.*

exclusive labour pool. In practice, though, Diamang's implementation of this rural health system was rather gradual. By the early 1930s, roughly two decades after the company's inception, its regional health infrastructure consisted of only a skeletal network of health posts. By the end of that decade, however, the introduction of trypanosomiasis, or 'sleeping sickness', campaigns that traversed the area had significantly expanded Diamang's rural health coverage. The consequent presence of Diamang health personnel deep in the Lunda bush paved the way for further health-related endeavours in these rural spaces. By the 1950s, for example, the company had developed a complex and reasonably thorough rural health system. Curative medicine was provided in an array of hospitals, dispensaries and health posts by European physicians and nurses, as well as by African nurses, health auxiliaries and dressers. Meanwhile, mobile health teams were providing vaccination, deparasitisation services, and leprosy and tuberculosis screenings for rural men, women and children, with the most problematic health cases being redirected to regional hospitals or dispensaries.⁴⁸ This extension of the company's health services beyond the mining installations and the European population was a positive initiative, for both regional residents, and, concomitantly, for Diamang's bottom line.

The implementation of this rural health system did not conclude the company's actions aimed at generating (healthy) bodies for the mines, however. From the 1950s onward, Diamang regularly manipulated the Pignet acceptance/rejection threshold, while the presence of increasingly advanced medical facilities and personnel in Dundo further reduced rejection rates.⁴⁹ Moreover, the SSD's ongoing research on recruits' health during their contracts in relation to their incoming Pignet numbers afforded it increased insight into anthropometric indexes. Consequently, in the 1960s, the SSD implemented a new anthropometric system, the weight/height correlation, which replaced the Pignet index, to assess recruits' physiques and, thereby, more accurately assess their suitability for mine labour.⁵⁰ In practice, the weight/height charts were easier for recruiting agents and *chefes de posto* to understand and the examinations easier to administer than the Pignet index. Most beneficially for all of the entities involved in recruiting – except, of course, the recruits themselves – was that the new index enabled an ever-increasing number of (allegedly) 'physically fit' recruits to be cleared for mine service.⁵¹ Company reports corroborate this oral testimony, revealing rejection rates of less than two per cent in the 1960s.⁵² Thus, for *contratados*, over time merely arriving in Dundo virtually assured them a place in the company's service.

The absorption of ever-greater numbers of workers – both 'strong' and 'weak' – paralleled the increasing amount of: gravel scrutinised for diamonds; and therefore carat production; and, by extension, profits. This positive correlation in the eyes of both company officials and stockholders reinforced the notion that African bodies equalled revenue and, thus, the SSD was charged with facilitating rather than impeding the growth

⁴⁸ Varanda, *op. cit.* (note 14).

⁴⁹ Interestingly, after Diamang came under investigation by the ILO, the rejection figures it offered were much higher, typically around 12%–13%. Diamang therefore knew that it was contravening international standards, or at least the spirit of the international labour conventions Portugal had agreed to uphold in its colonies, and thus concealed the true nature of its screening process, offering spurious figures as cover. See International Labour Organization, Official Bulletin, no. 45 (XLV) 1962. Suppl. II, No. 2, Geneva: ILO, 196.

⁵⁰ Pinhão and Pires, *op. cit.* (note 44).

⁵¹ MAUC – Dr David, 'AHR, 1960' (1960).

⁵² MAUC – Folder 86B, 6a 4°, 'Relações de Trabalhadores Rurais Elaborados em 1963' (1964); Torre do Tombo Arquivo (hereafter, TT) – Folder AOS/CO/UL-8A3 (Cont. 2) – Relatório No. 26 (nova série). Apresentado ao Administrador-delegado, Volume 1 (15 October 1966), 60.

of the labour force.⁵³ Although Diamang regularly cited its superb medical services division, which was incontrovertibly unrivalled in Angola, ultimately the enterprise's *raison d'être* was profit and, thus, its operational behaviour and priorities were only rarely consistent with its health-related rhetoric.

Preparing to Work ... by Working

Whether recruits reached company headquarters in Dundo on foot or by truck, they were immediately put to work. The high number of rejections, which in the initial years of Diamang's operations reached as high as 20% of all incoming recruits, led the SSD to implement a *período de preparação* (preparation period). This time would enable weak(er) recruits to gain weight and, thereby, lower their Pignet indexes, while also preparing all recruits for the work regimen and general pace of the mines. Therefore, after enduring the various screening examinations described above, recruits were assigned 'acclimatising labour' in and around Dundo.

In the company's early years, preparation periods lasted from ten to fifteen days, reached one month by the 1930s and expanded to almost two months by the end of the colonial era. During this time, the recruit and any accompanying family members stayed in company-built villages, while the enterprise supplied both food and medical care. Occupational training was also provided as part of this acclimatisation process.

For less robust recruits who had index numbers just beyond the acceptable range, the company also developed a diet specifically designed to increase their weight and, thus, improve their index rating so that they could then be 'officially' cleared for mine work. According to one SSD doctor,

We would carry out inspections (...) and men rejected for mine work could instead be allocated to plantations, for road work, etc. The recruits who were the last to be refused (and, thus, the closest to being accepted) could then be engaged in any type of work following 15–20 days of rest and a proper diet.⁵⁴

Testimony from Domingos Cazeweque, a *contratado* who arrived in Dundo in the late 1950s, reflects the company's desire to reduce rejection rates, seemingly irrespective of the costs: 'the second day after we arrived in Dundo, we received a medical examination. No one was rejected; even if you had a hernia they would perform an operation on you and then you would go to the mines after you had healed. It was the same with injuries and illnesses'.⁵⁵ Other informants echoed this testimony, indicating that it was not a matter of *if* a recruit would be able to proceed to the mines or not, but simply *when*.

The anthropometric information collected before and after this preparatory period also allowed the SSD to organise data related to the physical characteristics of recruits according to their place of origin, as well as statistics regarding any losses or injuries incurred during the journey to Dundo. Following an analysis of the number of desertions and recruits deemed unfit for mine work, both according to provenance, Diamang would correspondingly concentrate its recruitment efforts on what were considered to be more favourable areas. For example, in 1950, company officials deemed that recruits from the Songo region were more likely to complete their contracts than workers from the Camaxilo area.⁵⁶ Because the company only strove to invest (food, clothing and transport) in those

⁵³ The number of mines in operation increased from 24 in 1937, 34 in 1949, 38 in 1963 to 42 in 1971. On average, in each mine there were 100 to 200 workers, a figure that changed little over the years due to the company's limited mechanisation of operations.

⁵⁴ MAUC – 1961.

⁵⁵ Interview, Domingos Cazeweque, Lunda (Angola) (18 November 2005).

⁵⁶ MAUC – Folder 86C, 2-1°, A. Borges, 'RSTI' (1950).

	Registered accidents	Accidents/ 1000 workers	Fatal accidents	Fatal accidents/ 1000 workers
1951	124	4.33	8	0.40
1955	123	3.30	5	0.10
1960	142	3.41	8	0.20
1967	501	8.32	6	0.10
1970	593	12.59	15	0.32

Table 2: 1970 Mão de Obra: All accidents per year. at times, fatalities (Table 2).⁵⁸ at times, fatalities (Table 2).⁵⁸ Source: MAUC: Folder *Mão de Obra*, 1970.

recruits who were most likely to reach the mines and contribute once there, expenses could be reduced by foregoing ‘problem areas’, such as Camaxilo. Thus, although the SSD was not on the front lines of the recruitment process, it nonetheless played a pivotal role by producing data that other sections of the company, namely the indigenous labour division, could use to determine ideal recruiting areas and thereby reduce overall operating costs.⁵⁷

Mine Encounters: Health Services and African Labourers at the Worksite

Once at the mines, workers most often interacted with SSD personnel following worksite accidents that resulted in an array of injuries, or, at times, fatalities (Table 2).⁵⁸ The point of access to health services from the 1930s onward was almost always the *posto de socorro*, or first aid post. These posts were manned by poorly-trained African health auxiliaries who were capable of treating basic injuries, typically simple lacerations or sprains, but who would pass along more demanding cases to Diamang’s dispensaries or hospitals at which nurses or, if necessary, Portuguese doctors would attend to patients.

Despite the relatively early introduction of these posts in the company’s history, many former mineworkers indicated that even into the 1970s certain mines still lacked these facilities. Furthermore, during the company’s early years only forcibly contracted labourers, or *contratados*, could access them. However, over time, this policy proved impractical because the posts were primarily intended to address medical issues (i.e. injuries) that required immediate attention, and thus Diamang eventually extended access to *voluntários* as well. At other times, though, unsympathetic mine bosses simply blocked workers’ access to them. For example, Felipe Leo Muatxissupa, who began at Poné mine in 1966, explained that ‘There was a medical post on the mine; people would go there to receive treatments for accidents, etc. It was somewhat difficult to visit the post, though, because they (the mine bosses or African overseers) generally discouraged it. You had to have a serious injury’.⁵⁹

If workers could not always access health services when faced with legitimate medical issues, they often sought to access them spuriously. In particular, *contratado* labourers, whose contracts ran for a fixed amount of time and who, unlike *voluntários*, were paid whether they worked or not, employed a range of creative health-related strategies to

⁵⁷ Company officials developed sentiments about particular regions based on these criteria that they then conflated with ethnicity. As Vaughan has argued, biomedical discourses were often constitutive of African ethnic groups. See Vaughan, *op.cit.* (note 10).

⁵⁹ Interview, Felipe Leo Muatxissupa, Lunda (Angola) (15 August 2005).

minimise the total number of days they toiled.⁶⁰ Over time, these workers garnered approved medical absences by feigning illnesses, self-inflicting injuries or intentionally neglecting initially minor injuries. While mine managers generally displayed scepticism towards labourers who they perceived to be employing this strategy, health services personnel encouraged these mine managers to accept that at least some of the workers' claims were genuine. *Contratados* still pursued this strategy at great risk, though, because just as health services personnel were gradually better able to diagnose illnesses and their symptoms, they were also better able to detect insincere claims. Furthermore, zealous mine overseers often remained the 'gate-keepers', making determinations – accurately or otherwise – regarding the legitimacy of workers' claims.

The first mention in Diamang's records of a worker feigning illness was related to a 1927 incident that involved an attack by a mine overseer, Sr Weatherby, on a worker named Maseca after the latter had issued a complaint. In a subsequent letter, Weatherby rebutted Maseca's account of the incident and accused him of feigning illness, claiming that only after a doctor had determined the dubiousness of his alleged ailment did Maseca then go to a colonial administrative post to complain, rather than to the mine where the doctor had directed him to proceed.⁶¹ This insubordination served as Weatherby's justification for the abuse, which he deemed commensurate with an offence of this nature.

In the initial decades of Diamang's operations, company officials also credited *contratados* with seeking medical absences in a variety of creative, if self-damaging, ways, with the latter's ultimate 'prize' being repatriation (a return to one's home village) on medical grounds. For example, in 1930, the SSD head, Dr Almeida e Souza, accused *contratados* of 'hiding cuts and ulcers until they got so bad that when they finally reported them they knew that they would not have to work or that they might even be repatriated'.⁶² As evidence, he pointed out that as the number of *contratados* rose, so too did instances of untreated injuries. Indeed, company records confirm that *contratados* visited the hospital three to four times as frequently as *voluntários*, underscoring the frequency with which the former resorted to these creative strategies.

It appears that sentiments emanating from the mines, such as those held by Dr Almeida e Souza, were cogent enough to convince Diamang's General Director, Ernesto de Vilhena, that *contratados* were, indeed, pursuing this strategy in order to avoid work. Consequently, in 1929, the company chief asserted that:

The *voluntário* not only works more and with greater will, but cares for himself, does not frequent the infirmary, avoids everything that can damage him physically; the opposite of the *contratado* who injures himself on the job – even intentionally – or infects the wounds and ulcers to which the natives are very susceptible, with the intent of being hospitalised and, thus, to completing his contractual period with the least effort possible.⁶³

In fact, Diamang officials were so positive that *contratados* were willing to deliberately sustain injuries in order to avoid work that they investigated for any evidence of intentionality – even in the 1929 case of a worker who had to have his right hand amputated after an accident on the job.⁶⁴ While determinations of intention were also required

⁶⁰ As most *voluntários* were paid only if they worked, this strategy was primarily pursued by *contratados*.

⁶¹ MAUC – Folder 86 8°, Unsigned letter attached to: Letter from Victor Hugo Antunes, O Chefe da Circunscrição (Fronteira do Chitato), to Snr. Engenheiro Sub-Director da Diamang (16 November 1927).

⁶² MAUC – Folder 86 21°, A.A. de Almeida e Souza, Relatório Medico (20 September 1930), 3.

⁶³ MAUC – Folder 86 18°, Letter from Ernesto de Vilhena to Vasco Alves (14 December 1929), 6.

⁶⁴ MAUC – Folder 86 17°, Vasco José de Oliveira, Relatório (28 October 1929).

for compensation and pension purposes, senior company officials' pervasive scepticism suggests that they were concerned with more than just minimising potential pay-outs.

Decades later, informants indicated that although feigning illness remained a strategic option, it still carried the same risks. Alberto Rosa, a former *capataz* (foreman), explained that '*Contratados* would often feign illness; if they were discovered to be lying, they would then be beaten and sent back to complete their original task'.⁶⁵ Bernardo Montaubuleno, who worked at Diamang from 1951 to 1975, echoed this affirmation, recalling that

If the company was suspicious of an attempt to feign illness, the worker would be taken to the cafeteria in order to confirm or deny it, and if he actually was ill, he would then be sent to the hospital so the doctor could perform a more thorough examination. If he was found not to be ill ... he would be struck.⁶⁶

Although Diamang could do little to prevent workers who were determined to injure themselves from doing so, it did try to reduce the number of workers who consciously allowed minor injuries to worsen in the hopes of securing a medical absence. A company document from 1971 spelled out both the problem and Diamang's solution:

Some ailments that cause long stays in the hospital were originally only small injuries. These are attributable to the carelessness and short-sightedness of some workers, who minimise these injuries and at times even try to hide them(...). At lunch time, the mine boss and nurse will inspect all the workers, registering in a book the presence of those with injuries. All those with injuries will be placed in a separate formation and will receive a number, corresponding to the number written in the register of injuries. Only after this will he be served the meal. All workers with injuries will go to the first aid post to receive treatment ... Before leaving the mine, the boss will verify if all those requiring treatment received it.⁶⁷

Final Encounters: 'Repatriation'

The first stop for most *contratados* returning home, or undergoing 'repatriation', as the company referred to this journey back, was Dundo. Unlike when they first passed through the company's headquarters, departing workers rarely performed tasks while there. Instead, they simply waited to collect rations for the journey and set out on foot or on company trucks.

While gathered in Dundo, workers also underwent a medical examination administered by SSD personnel that was meant to screen for the usual battery of afflictions with which Diamang was concerned, but also to measure any changes in weight experienced by workers over the course of their contracts. In turn, the company employed the largely favourable data generated as evidence to rebut the international claims that increasingly began to materialise in the 1960s and 1970s that workers in Portugal's colonies were undernourished and/or overworked. If Diamang's figures are, in fact, accurate, they confirm that most workers were, at the very least, consuming a sufficient number of calories to more or less sustain their overall body weight during their contractual periods in the mines.

Once workers had been 'processed', the repatriation trip home began. For approximately the first two decades of Diamang's operations, workers and family members completed this journey on foot. By the 1930s, however, the company had introduced mechanised transport for these repatriation journeys, roughly a decade earlier than it did for trips to the mines. Repatriating healthy workers by truck was meant to demonstrate to

⁶⁵ Interview, Alberto Rosa, Lunda (Angola) (16 November 2004). Rosa added that, at times, a lighter task or work load may have been the original goal and that workers also feigned injuries to achieve this end.

⁶⁶ Interview, Bernardo Montaubuleno, Lunda (Angola) (20 November 2004).

⁶⁷ A. Botelho, *Diamang, Guia do Empregado da Mina* (Lisbon: Diamang, 1971), 73.

regional residents the company's concerns for the health of its African labour force and thereby promote its image.

Conclusion

The health of Diamang's African labour force was undoubtedly of primary concern to the company's senior management. A healthy labour force was a more productive labour force and, ultimately, a more profitable one. These sentiments helped to propel the company's significant investment in its health services – a division that eventually dwarfed its public and private counterparts in colonial Angola. However, even after assembling and funding this impressive unit, Diamang's directors often disregarded recommendations made by its constituent personnel. Indeed, because the company elected not to invest heavily in machinery for its operations, it required an ever-greater number of manual labourers – a business strategy that was irreconcilable with the desire to construct and maintain a labour force exclusively comprised of healthy, durable individuals derived from such a limited recruitment pool. And, while it is hard to argue with the data that reveals a strong correlation between the sheer number of workers and the number of carats produced, it is also possible that by heeding the SSD's suggestions the company could have minimised health-related expenses while still enjoying escalating profits.

This article has attempted to highlight the three major entities that both shaped and were affected by the health-related policies and practices at Diamang's mines: the company's senior management; the enterprise's SSD unit; and the African labourers who were often at the centre of intra-company health debates. This tripartite examination is intended to prompt scholars examining commercial enterprises elsewhere in colonial Africa to consider the complex ways that these companies may have engaged in a range of both rhetorical and actual 'healthy' and 'unhealthy', that is physically and epidemiologically favourable and unfavourable, practices regarding their respective African work forces and how, over time, these approaches and policies shaped the health – and, thus, the lives – of these labourers. Ultimately, we propose that health services on Angola's colonial-era diamond mines be considered a site of significant struggle – not only between the 'coloniser and the colonised', but also between different 'colonising' entities – and, thus, potentially serve as an instructive model for scholars exploring similar contexts elsewhere in colonial Africa.