

Colonial Patterns in the Growing Africa and China Interaction: Dependency and Trade Intensity Perspectives

by

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Abstract

The present paper presents a hypothetical endeavour on the claim that China is a particularly rapacious neocolonialist in its interactions with individual African countries. Taking a trade-dependency perspective and using trade composition and relative trade intensity analysis, the most salient finding is that ten African countries (Angola, the Sudan, the D.R. Congo, the Republic of the Congo, Gabon, Chad, Zambia, Mauritania, the Central African Republic, and Equatorial Guinea) have a high relative trade intensity index with respect to China, implying that they are now locked into a relationship of dependency on China. Given the lack of a commonly accepted or an entirely consistent definition of colonialism, this trade dependency could be seen by some critics as reminiscence of the colonial interactions. Taking to the extreme and in an analogy to the Berlin Conference of 1885 that set African borders, these results suggest that these ten countries are becoming what could be termed “Chinese zones of influence.” Although our interpretation is by no means proof of China’s alleged colonialism in Africa, it does provide some empirical relevance in regard to economic developments that tend to be associated—rightly or wrongly—with allegations of colonialism in modern Africa.

Key Words: Trade Intensity, Trade Dependence, Colonialism, China, Africa

Introduction

Underlying the European motives for colonial expansion into Africa was the pursuit of mineral wealth and territorial conquest. The conference at Berlin (1885) provided the ground rules for such territorial scramble: States claiming territory would have to produce proof of economic and infrastructure development in the region claimed. Clearly, from the outset of the colonization of Africa, the drawing of borders was associated with mineral exploitation and infrastructure development.

Not surprisingly, China's thirst for African minerals and the concomitant infrastructure development, exacerbated by the heavy and growing reliance of Africa on China for financing of its infrastructure needs, have been painted as being nothing but a new form of colonialism^a. For instance, during a tour of Africa in 2012, then-U.S. Secretary of State Hillary Clinton denounced China for displaying traits of "new colonialism" in Africa (quoted in Krause-Jackson 2011). Other more extreme assertions in this regard point out that as China pledged to development massive infrastructure projects in Africa, "the continent has now become de facto Chinese territory" (Durden, 2012). Moreover, influential African policymakers have recently been echoing similar concerns. These include Lamido Sanusi, the governor of Nigeria's central bank, who points out that the Chinese practice of importing Africa's unprocessed primary commodities and exporting manufactured products to Africa is the "essence of colonialism" (Sanusi 2013).

It should be noted that the above observation by Sanusi (2013) clearly refers to China's alleged neocolonialism in Africa within economic and trade structures and does not stem from a territorial-settlement or state-centric view. Because of this departure from the traditional state-centric analytical framework, dependency theory (Prebisch 1959) is arguably in a privileged position to offer valuable insights in that it focuses on "aspects of power that are linked with economic structures, rather than with state-centric interpretations of sovereignty" (Worth and Kuhling 2004: 32).

Based on insights from the trade-dependency literature, the present paper seeks to determine whether China is a particularly rapacious neocolonialist^b in its interactions with individual African countries. We postulate that, besides trade structure, what makes bilateral trade interactions look particularly colonial is the existence of exceptionally higher trade flows between Africa and China than would otherwise be expected. Relative trade intensity analysis is the most suitable analytical tool for this perspective and is thus used in this study. Indeed, the findings show that there are ten African countries in which an asymmetric trade relationship with China not only exists but is exacerbated by the growing dependence on China for financing of their infrastructure needs. In view of this ongoing debate, this paper is timely and is expected to contribute to a better understanding of the purported colonial expansion of China into Africa and of the nature of Africa's dependence on China.

The rest of this paper is organized as follows: The second provides an overview of the relevant literature and trade facts while the third section presents theoretical and analytical considerations. The fourth section presents empirical results and discusses their implications for the alleged colonialism, and the last section summarizes the conclusions of the study.

Literature and Factual Overview

To assess whether China is actually involved in some form of colonialism in Africa, and what that means, we need a firm grasp of what is meant by colonialism. In general, the concept of colonialism and its derivatives is multifaceted and thus contentious (Lange et al. 2006). Generally, the literature on colonialism or its variants (e.g., neocolonialism) overwhelmingly focuses on political domination, territorial occupation, and economic exploitation, and the concept of colonialism has often been approached from these three dimensions. In what follows, a brief review of these three aspects is presented, along with a discussion of trade dependence from the globalization perspective.

In the literature on political economics, colonial relationships are assumed to be intrinsically coercive, though the diversity of forms and intensity of such coercion is taken into account (Gottheil 1977). Underlying this view is a tacit understanding that colonialism should be seen as a form of occupation and control of territories by a colonial metropolis. Historically, the colonial state imposed territoriality, especially in Africa, and created political boundaries (Osterhammel 1997). Yet even though colonialism in Africa has been intrinsically associated with borders, colonization can occur without the creation of colonies per se. This is the case for the variant concept of “neocolonialism,” which is used to mean a system of domination (Osterhammel 1997; Amstutz 1999) or of extending influence over another territory. Furthermore, it is generally, if not universally, agreed that neocolonialism is a form of asymmetric power relation which is exploited for purposes of economic advantage (Horvath 1972).

It is worth noting that such an asymmetric power relation “may become established simply by exercising economic power, for example, as a primary creditor, or a source of investment funds, or source of economic aid, or a primary market for exportables” (Gottheil 1977, p. 85). In this connection, the Marxist theory of imperialism argues that the main motive for colonization of capital-poor countries is that metropolises need colonies for the purpose of recycling their capital surplus (Baran 1973; Amin 1976, 1977; Frank 1979). Despite its intellectual appeal, the Marxist perspective focuses on capital/financial aspects of the ties between imperial powers and their colonies, without regard for structural aspects of trade and technology. Stated another way, Marxist theory focuses on developed countries and explains the reasons why imperialism occurs (Brewer 1990; Green 1998), leaving unexplained the effects of imperialism on the process of development per se.

Another strand of the colonialism literature, known as dependency theory, concentrates on the impact of imperialism on the developing world. Dependency theory contends that the world economy is structured to ensure that the poor, developing countries (the “periphery”) are burdened with trade and foreign direct investment dependence on the affluent countries (the “centre”). In this view, countries in the periphery specialize in the exploitation of exports of primary commodities, aided and abetted by their colonial and neocolonial masters and their rules of international trade and investment (Singer 1950; Prebisch 1959). Taken as a broad form of structural domination, colonialism is thus associated with a relationship in which processed goods and raw materials are exchanged between core and peripheral countries (Weber 2005). Such trade structure is presumed to lock dependent countries into industrial specialization based on unskilled labour and natural resource endowments, thereby preventing a dependent country from upgrading its industrial sector and from accessing the higher-level knowledge that drives long-run economic growth.

There is controversy surrounding the effects of colonialism on both the theoretical and empirical levels^c. This is the case for critics of dependency theory (such as Duchesne 2006) that contends that trade between colonies and metropolises “does not block development in the periphery, but rather stimulates it.” This argument is based on the idea that despite the occurrence of certain forms of exploitation, positive development impulses come from the metropolis. That is, integration into the world economic system pushes a modernization process which secures growth prospects for the colonies. While this argument may have some currency, the problem with it is at least threefold.

First, the “relation of interdependence between two or more economies, and between these and world trade, assumes the form of dependence when some countries (the dominant ones) can expand and be self-sustaining, while other countries (the dependent ones) can do this only as a reflection of this expansion”, which can have either a positive or a negative effect on their immediate development (dos Santos 1970: 231). As it appears, the attempt here is to highlight the singular importance of external forces to the economic activities within colonies.

Second, the main result of development in Africa during the colonial era was expansion of trade that went unaccompanied by structural change. As a result, African countries were relegated to the status of producers and exporters of primary unprocessed commodities, which they exchanged for manufactured consumer goods from the metropolises (Hoogvelt 2001). While it could be argued from the theory of comparative advantage that such trade specialization was an inevitable outcome of that system, it was actually a consequence of deliberately “distortive” policies (such as the Lomé Convention, Sysmin, and Stabex) and thus of the presence of “privileged” trading partnerships (Rauch 1999).

Third, one of the main thrusts in the literature on colonialism is the possibility that trade asymmetries occur by design of the metropolis. However, trade dependence may actually be a *de facto* condition. In this perspective, the colonialism pattern of trade is simply an unintended consequence of growing trade links in the presence of a significant technology gap, as in the case of China and Africa.

Theoretically, the gains expected from international trade derive from the assumption of homogenous technology at home and abroad—an assumption that was inherent in the original Heckscher–Ohlin model. In the absence of levels of technological capability that are nearly identical, the gains from international trade may be quite uneven (Markusen 1983). The uneven outcome would result from the fact that a country with high technology and a high value of labour productivity would not necessarily import a large volume of products and services from a country with low technology and a low value of labour productivity.

Other critics of dependency theory have contended that in a world where one trade partner can easily be substituted for another, globalization reduces the bilateral economic dependence of any given pair of countries. Despite the logical appeal of this argument, however, it fails to recognize the limits on the bilateral trade preferences of a small developing country. In this regard, Lavalley and Lochard (2011) note that after the severing of colonial ties in Africa in the 1960s, independence did not radically change relations between France and its former colonies. On the contrary, until at least the mid-1990s, the metropolis and its former colonies retained the very close, stable relationship known as *Françafrique*. Thus the official termination of a colonial arrangement does not necessarily lead to the dissipation of asymmetric core–periphery relations, nor does it necessarily provide former colonies with some meaningful degree of control on the destinations of their exports.

Another thread in the colonialism debate is the notion that the emergence of globalization has brought about interdependence between countries that engage in a bilateral trade relationship, hence that any previously observed dominance has diminished or become irrelevant. A serious weakness with this argument is that it ignores the fact that the concept of interdependence implies “mutual and symmetric relations” or some form of symmetric interconnection. This definition of interdependence differentiates it from the notion of dependence generally, which does not exclude the possibility of a state of asymmetry in a bilateral trade link. Indeed, in a colonial system the asymmetry in the trading partnership is the very source and pattern of power (Changsen and Xiong 2010). Another shortcoming of the view that globalization leads to interdependence is that it overlooks another important aspect of asymmetric international relationships, namely, foreign aid. This feature of economic subservience, which by its very nature entails a master–servant relationship between a donor nation and its recipient countries, persists in spite of globalization.

While some scholars see China's growing interaction with the third world, especially Africa, as a positive development model for the latter (Alden, 2005), other scholars look more critically at China's behaviour on the continent and see its parallels to Africa's colonial past (De Lorenzo, 2007)—or at least question whether China's involvement in Africa is truly a new avenue for south–south cooperation or just a case of neocolonialism (Girouard 2008). Notably, Sanusi (2013) points out that the Chinese practice of importing unprocessed primary commodities from Africa and exporting manufactured products to Africa is the “essence of colonialism,” and that Africa risked “opening itself up to a new form of imperialism” in that such a trade structure (see Table 1) is likely to prevent African economies from upgrading their industrial sector. If that argument is valid, perpetuation of colonial trade patterns and de-industrialization would be expected.

Establishing evidence for the political and territorial aspects of colonialism is straightforward, and much of the literature has done just that. In contrast, direct establishment of empirical evidence for the exercise of economic colonialism by China in Africa is tricky. However, this can be done indirectly by pointing to the lingering effects of African countries' status as former European colonies, including the large volume of trade between the former colonies and their former rulers in Western Europe. Intuitively, the existence of a relative trade intensity of a given African country with China at a level which is higher than that with its former European colonial metropolis would suggest that, *ceteris paribus*, China has a greater influence on that country than did the former colonial master. In other words, it would suggest that such an African country is actually in a state of trade dependency. In this respect, relative trade intensity could be used as a “trade dependence index,” because it reflects “the degree to which a country depends on trade with a specific partner, or the degree to which a country would be jeopardized by a trade embargo on the part of a particular trading partner” (Goto and Hamada 1994: 372).

Table 1. African exports to China by commodity groups

PRODUCT	Share of total			
	1995	2000	2005	2010
Primary commodities (1)	80.3	90.8	94.0	93.0
Primary commodities (SITC 0 + 1 + 2 + 3 + 4 + 68)	77.0	89.1	92.6	92.3
Primary commodities, excluding fuels (SITC 0 + 1 + 2 + 4 + 68)	50.0	18.3	19.4	27.2
All food items (SITC 0 + 1 + 22 + 4)	5.0	2.6	1.6	1.4
Agricultural raw materials (SITC 2 less 22, 27 and 28)	26.7	7.2	6.5	3.4
Ores and metals (SITC 27 + 28 + 68)	18.3	8.5	11.3	22.4
Fuels (SITC 3)	27.1	70.8	73.2	65.1
Pearls, precious stones and non-monetary gold (SITC 667 + 971)	3.2	1.7	1.4	0.7
Manufactured goods (SITC 5 to 8 less 667 and 68)	19.7	5.6	4.7	4.3
Chemical products (SITC 5)	12.2	1.3	1.3	1.0
Machinery and transport equipment (SITC 7)	2.2	1.4	0.9	0.4
Other manufactured goods (SITC 6 + 8 less 667 and 68)	5.4	2.9	2.5	2.8
Iron and steel (SITC 67)	4.1	2.1	2.0	1.8
Textile fibres, yarn, fabrics and clothing (SITC 26 + 65 + 84)	11.5	0.8	3.7	1.5
Total all products	100	100	100	100

Notes:

(1): Primary commodities include (SITC 0 + 1 + 2 + 3 + 4 + 68 + 667+ 971)

Sources: UNCTAD (2012), COMTRADE Database (2012), Author's calculations.

Analytical Considerations

Since the late 1990s, trade flows between Asia and Africa have been growing rapidly. China is the largest proponent of establishing these dramatic economic shifts. Just in 2011, bilateral trade between African countries and China rose to US\$166.3 billion, up 83% from 2009 (UN COMTRADE, 2012). Because of the importance of securing supplies of African mineral resources, Chinese investment in Africa is mainly concentrated in the mining sector (see Table 1), which has resulted in African exports to China being increasingly dominated by primary commodities. African economies export mineral fuels and metals to China and import cheap consumer and capital goods, with little trade in intermediate goods. This observation leads directly to the perception that the earlier relationships of economic dependence between Africa and Europe are being repeated between Africa and China. This has resulted in the recent assertions of colonial patterns of trade. As the validity of such assertions cannot be assessed directly, the question that arises is how to do so indirectly.

One useful approach is to measure trade dependency through the share of the dependent country's total exports that are shipped to the centre-country or the colonial power (Kleiman 1976). Pascha (2002) and Petri (2006) use double-relative trade intensity to assess this aspect of trade. As in Petri (2006), let x_{ij} represent exports from country i to country j , and let the subscript * (in place of i or j) represent summation across all i or j .

Thus x_{i^*} represents the total exports from country i , x_{*j} the total imports to country j , and x_{**} total world trade. In this notation, the three commonly used measures of interdependence are defined as follows:

- (a) The absolute measure of trade intensity deflates a particular bilateral (or intraregional) trade flow with overall world trade.

$$A = x_{ij} / x_{**}$$

- (b) The relative measure of trade intensity deflates the absolute measure with either the share of the exporting country on world exports or the share of the importing country in world imports.

$$B = A / (x_{i^*} / x_{**}) = x_{ij} / x_{i^*} \text{ or } B' = A / (x_{*j} / x_{**}) = x_{ij} / x_{*j}$$

The double relative measure of trade intensity (sometimes called the gravity measure) deflates the absolute measure with *both* the worldwide export share of the exporting country and the worldwide import share of the importing country.

$$C = A / [(x_{i^*} / x_{**})(x_{*j} / x_{**})] = x_{ij} x_{**} / (x_{i^*} x_{*j})$$

Of these three measures, A relates the scale of a particular bilateral (or intraregional) trade flow to worldwide trade flows, B compares it to the overall trade flows of one or the other of the partners participating in the relationship, and C compares it to the overall trade flows of both partners. These measures could evolve differently over time.

For example, exports from X to Y could grow rapidly compared to world trade (a rising A measure), but could still fail to keep pace with the growth of X 's overall exports (a declining B measure) and/or Y 's overall imports (a declining B' measure). Thus, even fast-growing trade flows can “shrink” relative to the exports of the exporter and the imports of the importer. The C measure corrects for this; therefore, it is a true measure of intensity that increases only if the trade grows faster than would be justified by the general growth of the exports and imports of the trading partners. In contrast to the double relative measure of trade intensity, the interpretation of the relative trade intensity index is straightforward: If the value of the relative trade index is larger than 1, the actual level of trade is larger than expected (i.e., more trade takes place than would be expected from the trade patterns of the two economies concerned). If the value is smaller than 1, there is less trade than might be expected.

Although by no means a direct measure of “colonialism,” the relative trade index is still considered the best measure of “trade dependence” and the resulting political influence. For example, when bargaining over market access or negotiating the politics of international trade, it remains an acceptable indicator for an assessment of trade interdependence (Hilpert and Kecker 2008).

Relative Trade Index Results and Discussion

The trade dataset was constructed from raw trade data in the UN COMTRADE Database (UN COMTRADE 2012). Specifically, the data include exports of individual countries to the entire world, regional aggregate exports from Africa to China, African intra-regional exports, and exports of individual countries to China, all of which are for the year 2010.

Table 2 presents the values of the relative trade index. There are ten African countries with a relative trade index (RTI) larger than 1 (Angola, the Central African Republic, Chad, the Republic of the Congo, the D.R. Congo, Equatorial Guinea, Gabon, Mauritania, the Sudan, and Zambia), indicating that abnormally high export flows are taking place between each of these countries and China. The most surprising result is that South Africa (the largest trading partner of China in Africa) has a smaller RTI index than any of these ten countries. The same is true of Nigeria, which is China's second-largest trading partner in Africa. Another important finding is that the RTI index for the Sudan^d is extremely high (46.4). Also, after eliminating the economic weights of the individual African countries at the international level, there was a noticeable decline in the relative coefficient of bilateral trade intensity between South Africa and China, as well as that between Nigeria and China. What this shows is that despite the volumes and shares of exports from South Africa and Nigeria to China, their relationships with China are not of a dependence type.

Table 2. **Double relative trade intensity index (trade with China), 2010**

Country	RTI index	Country	RTI index
Angola	9.6843	Malawi	0.1190
Benin	0.4411	Mali	0.1474
Botswana	0.0535	Mauritania	1.7178
Burkina Faso	0.5304	Mauritius	0.0244
Burundi	0.0913	Mozambique	0.1669
Cameroon	0.5546	Namibia	0.1949
Central African R.	1.3257	Niger	0.0571
Chad	9.0908	Nigeria	0.1070
Congo Republic	6.3922	Rwanda	0.1621
Cote d'Ivoire	0.0251	Senegal	0.0308
D.R. Congo	1.6064	Seychelles	0.0003
Equatorial Guinea	3.0356	Sierra Leone	0.8530
Ethiopia	0.4274	South Africa	0.7671
Gabon	3.0715	Sudan	46.415
Gambia	0.2895	Swaziland	0.0240
Ghana	0.1250	Tanzania	0.5059
Guinea	0.7665	Togo	0.0569
Kenya	0.0157	Uganda	0.0184
Liberia	0.8878	Zambia	1.3234
Madagascar	0.9064	Zimbabwe	0.2258

Source: Author's calculation; raw data from UN COMTRADE (2012).

Among the aforementioned ten African countries, all but the Central African Republic had higher relative trade index indices with respect to China in 2010 than they had with respect to their former colonial powers in that year (see Table 3). Furthermore, Angola, Chad, Equatorial Guinea, and the Sudan had much higher relative trade index indices relative to China in 2010 than they had relative to their colonial powers in 1995 (see Table 3), meaning that these four countries may have become economically more dependent on China by 2010 than they were on their colonial powers in 1995. These observations suggest that there is more to the relative trade index than just privileged trading partnerships.

Table 3. **Double relative trade intensity index (trade with colonial power), 1995, 2010**

Country	Colonial master	RTI index	
		1995	2010
Angola	Portugal	8.27	3.01
Central African Republic	France	5.43	2.13
Chad	France	3.13	1.31
Congo Republic	France	9.49	4.13
D.R. Congo	Belgium	11.66	1.07
Equatorial Guinea	Spain	2.04	6.03
Gabon	France	14.23	2.28
Mauritania	France	3.21	0.56
Sudan	UK	6.02	0.59
Zambia	UK	3.44	0.26

Source: Author's calculation

The relative trade index indices for the ten African economies in which more trade with China has been recorded than would be expected from their overall export patterns are mapped geographically in Figure 1, which gives a sense of what the outcomes of a hypothetical “Beijing Conference” (Durden 2012) on African borders would be, by analogy to those of the 1885 Berlin Conference. In practice, this geographical configuration could lead to significant economic integration and could have important territorial implications.

Figure 1. **Mapping of African countries' economic dependence on China (based on the RTI index)**



As the relative trade index can also be thought of as a measure of trade proximity, the high levels of trade proximity between China and the ten African countries denotes a *de facto* participation in the same FTA (free trade agreement) or the absence of strong legal barriers to trade (see Armstrong and Drysdale 2009). This is most clearly evident when considering that, thus far, bilateral Sino-African trade has involved significant preferential measures such as zero tariffs for an expanded range of African products (up to 97% of African exports to China are to be duty free by 2015).

Although a trade preference such as an FTA (*de jure* or *de facto* FTA) is a common feature of a metropolis-colony relationship, there is a significant contrast between China's approach to trade with Africa and that of colonial Europe. In fact, the effort to restrict territorial access was the primary preoccupation of the European metropolis from the onset of their African conquest in 1885. As a result, the centrality of territorial competition and acquisition worked against the development of intra-regional trade. However, China's agenda in the 21st century, which aims for an ever-increasing integration of economies across territorial borders of certain African countries, is quite the opposite. According to official accounts, under China's influence African borders are expected to depart from their colonially inherited role as economic barriers and fortified territories to become increasingly open and to serve as bridges for trade flows. Further evidence of this development can be seen in the latest infrastructure commitment by China in Africa.

On January 27th, 2015, the Chinese government signed a Memorandum of Understanding (MOU) with the African Union (AU) on an ambitious plan to develop infrastructures such as road, rail and air transport routes linking major national cities across Africa (*The Journal of Pan African Studies*, 2015]. The MoU is within the framework of AU's Agenda 2063 with a view to accelerating continental integration of Africa. At completion, major African cities from Addis-Ababa and Nairobi in the east to Johannesburg in the south and Abuja in the west will be connected by highways, high speed railways, and new international airports. This deal was hailed by the chairperson of the African Union (AU) Commission, Dr Nkosazana Dlamini-Zuma as the "most substantive project the AU has ever signed with a partner."

In addition to 2015 AU-China MOU, several agreements targeting infrastructure development have been or are being signed between China and its African partners. For instance, in July 2015, SADC countries took their multi-billion-dollar infrastructure development plan to potential funders in China. The priority transport projects to be implemented by 2017 include those targeting the expansion, rehabilitation and modernization of Durban and Walvis Bay ports; new road links connecting Angola and the Democratic Republic of Congo (DRC); and the introduction of a one-stop border post at Beitbridge between South Africa and Zimbabwe (Sikuka, 2015).

More important still, according to Sun (2015), some Chinese experts have called for further including Africa in China's own infrastructure development agenda such as China's "One Belt, One Road" framework (making it "One Belt, One Road, One Continent").

While it is not yet officially stated, the signing of MOU between China and the African Union is thought to be the first step in this direction. Chinese experts argue that the strategy would have two main applications in Africa. The first is the infrastructure development of the continent, which is closely associated with China's need to boost exports, utilize its excess capacity in construction industries, and stimulate China's slowing economic growth (Sun, 2015). Clearly, China's infrastructure development in Africa extends the former's own interests.

China's interests and its trade intensity with African countries aside, it may be misleading to take the seemingly logical next step and conclude that China has actually set in motion a colonization of Africa. Granted, the perspective taken in this paper does not allow us to empirically address the colonialism allegation per se, nor can we directly conclude that this allegation is false. Nevertheless, while the dependence of certain African countries on China is growing, and the structure and composition of the trade flows are changing, it is an indisputable fact that China is far from resorting to most of the tools that could be considered objective indicators of actual neocolonialism, namely, "unfair trade practices, establishment of military bases and blocs, various types of intervention in the internal affairs of the developing countries, the fanning of armed conflicts and 'local' wars, and attempts to use international and regional organizations in the interests of neocolonialist policy" (Athreya 1989). While the absence of these facts may moderate fears of colonialism, the debate remains open on the possible emergence of certain features of neocolonial ties between specific African countries and China.

Concluding Remarks

The aim of this paper was to look into the claim that China is a particularly rapacious neocolonialist in its dealings with individual African countries. Taking a centre-periphery perspective and using relative trade intensity analysis, the most salient finding was that ten African countries (Angola, the Sudan, the D.R. Congo, the Republic of the Congo, Gabon, Chad, Zambia, Mauritania, the Central African Republic, and Equatorial Guinea) have a high relative trade intensity (RTI) index with respect to China, implying that they are now locked into a relationship of dependency on China or that they are falling into the category of growing "Chinese zone of influence." Viewed on a map, these findings explain some Chinese preferences for cross-border rail and road infrastructure development in Africa, and with it the role of China in sub-regional integration that involves most of the ten countries with high trade dependence. All of these growing role of China in Africa's trade and infrastructure development are consistent with the recent proposal by some Chinese experts for further including Africa in the "One Belt, One Road" framework, which is China's own development agenda. Interestingly, our conclusions also suggest some emerging asymmetries. At least one of the impacts of Africa's interactions with China is a shift away from its Euro-colonial trade pattern and into new forms of trade dependency.

Contrary to this departure from colonial pattern of trade, the fact that African countries have continued to be relegated to the status of producers and exporters of primary unprocessed commodities in exchange for manufactured consumer goods, especially from China, suggests that African countries are likely to remain as dependent on China for manufactured good as they have been vis-à-vis their former European colonizers. Granted, to date there is no direct evidence that this state of affairs vis-à-vis China has come about by design, as it is possible that, more than anything else, it is an unintended consequence of the current international economic order.

As China is set to become the largest export destination for most African countries in the future, research into the growing economic links between Africa and China is not only crucial for development reasons; it also provides greater insight into certain forms of de facto regional integration and infrastructure development in Africa as led by China in recent years. In light of the data collected, this paper gives insights into aspects of the Africa–China relationship that need to be further explored. Hence, further study is needed to fully grasp the nature of the changes that are taking place. One direction for further study that could be of benefit to African economies is investigation of steps that could be taken to ensure that the result of China’s legitimate pursuit of mineral wealth in Africa ends up being different from the exploitative outcomes predicted by neocolonialist and dependency theories.

References

- Amin, Samir (1976) *Unequal Development*, Hassocks: Harvester Press, New York: Monthly Review Press; first published in French 1973.
- Amin, Samir (1977) *Imperialism and Unequal Development*, Hassocks: Harvester Press, and New York: Monthly Review Press; first published in French 1976.
- Armstrong, Shiro and Peter Drysdale (2009) ‘The influence of economics and politics on the structure of world trade and investment flows’, *Paper for presentation to 33rd Pacific Trade and Development Conference, The Politics and the Economics of Integration in Asia and the Pacific, 6-8 October, Taipei, Taiwan.*
- Amstutz, Mark R. (1999) *International Conflict and cooperation: an introduction to world politics*, New York: McGraw-Hill.
- Athreya, Venkatesh (1989) Perestroika and the Third World: The Changing Status of the Concept of 'Neocolonialism'; *Social Scientist* 17 (7/8): 28-36.
- Baran, Paul (1973) *The Political Economy of Growth*, Harmondsworth: Penguin; first published 1957.

- Brewer, Anthony (1990) *Marxist Theories of Imperialism*, 2nd ed. (London: Routledge)
- De Lorenzo, Mauro (2007) 'African Perspective on China', American Enterprise Institute for Public Policy Research, Wed. October 3, 2007.
- dos Santos, Theotonio (1970) 'The Structure of Dependence', *The American Economic Review* 60 (2): 231-236.
- Duchesne, Ricardo (2006) 'Globalization, the industrialization of Puerto Rico and the limits of dependency theory', *Journal fur Entwicklungspolitik* 22 (1): 55 – 83.
- Durden, Tyler (2012) 'The Beijing Conference': See How China Quietly Took Over Africa, retrieved from <http://www.zerohedge.com/news/beijing-conference-see-how-china-quietly-took-over-africa>, (18 September, 2012).
- Hilpert, Hanns G. and Klaus-Jochem Kecker (2008) 'Governance, Asian-Europe Relations and Trade Facilitation', in Ruland, Gunter Schubert, Gunter Schucher, Cornelia Storz, eds., *Asian-European Relations Building Blocks for Global Governance?*, London, Routledge.
- Horvath, Ronald J. (1972) 'A definition of colonialism', *Current Anthropology* 13 (1): 45-57.
- Gottheil, Fred (1977) 'On an economic theory of colonialism', *Journal of Economic Issues* 11 (1): 83-102.
- Goto, Junichi and Koichi Hamada (1994) 'Economic Preconditions for Asian Regional Integration', in Ito, Takashi and Anne Krueger, eds., *Macroeconomic Linkage*, The University of Chicago Press.
- Green, Joseph (1998) 'Dependency theory-where did it go wrong', *Communist Voice* 16 (4).
- Hoogvelt, Ankie (2001) 'Neocolonialism, modernization and dependency', in *Globalization and the postcolonial world* (2nd ed.), Baltimore: Johns Hopkins University Press: 29-42.
- Kleiman, Ephraim (1976) 'Trade and the Decline of Colonialism', *Economic Journal* 86: 459-80.
- Krause-Jackson, Flavia (2011) Clinton Chastises China on Internet, African 'New Colonialism', Bloomberg, retrieved from <http://www.bloomberg.com/news/2011-06-11/clinton-chastises-china-on-internet-african-new-colonialism-.html>, (18 July, 2011).

- Lange, Matthew, James Mahoney, and Matthias vom Hau. (2006) 'Colonialism and Development: A Comparative Analysis of British and Spanish Colonies', *American Journal of Sociology* 111 (5): 1412-1462.
- Osterhammel, Jurgen (1997) '*Colonialism: A Theoretical Overview*', Princeton, N.J.: Markus Wiener Publishers.
- Pascha, Werner (2002) 'Economic relations between Germany and Japan: An analysis of recent data', Duisburger Arbeitspapiere zur Ostasienwirtschaft, No. 61.
- Prebisch, Raul (1950) '*The Economic Development of Latin America and its Principal problems*', Lake Success, New York: United Nations Department of Economic Affairs.
- Petri, Peter A. (2006) 'Is East Asia Becoming more Interdependent?', *Journal of Asian Economics* 17 (3): 381-394.
- Rosenberg, Justin (1994) *The Empire of Civil Society*, London, Verso.
- Sanderson, Steven E. (1992) *The Politics of Trade in Latin American Development*, Stanford, CA: Stanford University Press.
- Sanusi, Lamido (2013) Africa must get real about Chinese ties, retrieved from <http://www.ft.com/intl/cms/s/0/562692b0-898c-11e2-ad3f-00144feabdc0.html#axzz2icnCpBl0>, (11 March, 2013).
- Singer, Hans (1950) 'The Distribution of Gains between Investing and Borrowing Countries', *American Economic Review* 40: 377-382.
- Stanford Encyclopedia of Philosophy (2012), Retrieved, January 2013, from <http://plato.stanford.edu/entries/colonialism/>
- Sun, Yun. (2015), Inserting Africa into China's One Belt, One Road strategy: A new opportunity for jobs and infrastructure? Africa in Focus, March 2, 2015, retrieved August 28th, 2015. www.brookings.edu
- The Journal of Pan African Studies* (2015), vol. 7, no. 8, March 2015.
- Weber, Sebastian (2005) 'Do international trade relations between the third world and the first world represent neo-colonial tendencies', GRIN Verlag Essay Document Nr. V43056.
- United Nations COMTRADE. (2012). COMTRADE Database, Data retrieved August 18, 2012, from <http://comtrade.un.org/>

UNCTAD (2012). UNCTAD Statistics Database, Data retrieved August 20, 2012, from <http://unctadstat.unctad.org/>

Worth, Owen and Carmen Kuhling. "Counter-Hegemony, Anti-Globalisation and Culture in International Political Economy." *Capital & Class* 84 (2004): 31(12).

Endnotes

^a Because where the infrastructure spending has taken place, next follow strategic sovereign investments, and other modernization pathways, until gradually Africa is nothing but an annexed territory for Beijing, full to the brim with critical raw materials, resources and supplies."

^b Readers are warned that there is no commonly accepted or an entirely consistent definition of colonialism. The difficulty of defining colonialism stems from the fact that the concept has changed over time and has been used to describe dependencies that are directly governed by a foreign nation and contrast this with imperialism, which involves indirect forms of domination." (Stanford Encyclopedia of Philosophy. 2012, p. 1). Given the difficulty of consistently distinguishing between the colonialism and its variants, this paper interchangeably uses colonialism or neocolonialism as a generic term that refers to economic and trade domination-dependence relationships (Section 2 provides further discussions).

^c Some have argue that colonialism and its inherent wealth-seeking activities resulted in wealth-creation, expansion of trade, education, the spread of ideas, infrastructure development and industrialization within certain colonies. In contrast, other critics of colonialism reject these perceived positive impacts by highlighting the dire legacy of colonialism in terms of economic, political and cultural domination (a comprehensive review of the literature on trade dependence and neocolonial manifestations can be found in Hoogvelt 2001).

^d The relative trade index for Sudan does not take into account the process of separation of South Sudan that occurred in 2011. This separation should have some impact on the value of the relative trade index from 2011 onward; hence Sudan's relative trade index should be interpreted with caution.