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Kalecki and the Stucturalist View of Economic Development

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ABSTRACT

This paper commemorates the 70th anniversary of Kalecki's seminal lecture in Mexico on financing economic development. The first part of this paper outlines the theoretical model underlying Kalecki's view of development financing. A second part of the paper summarizes the foundations of structuralist development economics in the Prebisch-Singer approach to international trade and import-substitution development strategies. A third part of the paper examines the confrontation between Kalecki's view of economic development strategy, and the structuralist approach, in the case of Cuba, highlighting the differences between the two

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This paper draws on my entry on 'Kalecki' for David Clarke's *Elgar Companion to Development Studies* and my biography of Kalecki (Toporowski 2006, 2013). I am grateful to Malcolm Sawyer, Julia Juarez Garcia and Manuel Valencia and other participants in the Conference on Financing Economic Development and Growth Constraints 70 Years of Michał Kalecki's influence on structuralism at UNAM, Mexico City. Key issues in the paper had been earlier discussed with Noemi Levy and Arturo O'Connell, and subsequently with Joseph Halevi, Arturo O'Connell and Noemi Levy. Their positive contribution to my understanding of Kalecki's development economics leaves me with sole responsibility for remaining errors.

approaches. A fourth part concludes with some reflections on the relevance today of structuralism and Kalecki's view of economic development.

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Introduction

The Polish economist Michał Kalecki is best known for having worked out essential features of Keynes's *General Theory* prior to the publication of that work. Although the significance of that book, and Kalecki's own anticipation of it, remain matters of some debate, there is little in the *General Theory*, or in Keynes's writings, apart from general issues of financial and commodity price stabilization, that would be applicable to developing countries. Kalecki, however, did devote a significant part of his work to the problems of developing countries, and he continues to have an important following among development economists. This makes the commemoration of his seminal lecture in Mexico on the financing of economic development a timely opportunity to reflect on this legacy, and on its significance today.

Kalecki was made aware of the political economy of development during his formative years as an economist, in the 1920s. His earliest writings in economics were analyses of commodity markets and industrial development in Poland. These were rooted in the political debates in Poland at that time around the works of Rudolf Hilferding and Rosa Luxemburg who accorded an important role in their analyses of capitalism to the export of capital to developing countries. In his decade of work at the United Nations, from 1945 to 1955, Kalecki examined in detail the problems of developing countries. After his return to Poland in 1955, Kalecki organized seminars and research projects on developing countries and advised the governments of India and Cuba. Since the 1990s, Kalecki's writings on developing countries have been available to English readers as part of his *Collected Works* (Kalecki 1993).

Kalecki's first published intervention in development economics was a review of Mihail Manoilescu's *Die Nationalen Produktivkrafte und der Aussenhandel* (published in English as *The Theory of Protection and International Trade,* 1931). Manoilescu had put forward an early version of the import-substitution argument in favor of developing country protectionism. Because developing country productivity in industry is higher than in agriculture, even if that industrial productivity may be lower than in industrialized countries, improvements in efficiency can be obtained by expanding industry behind protective tariff barriers. The resulting overall improvement in productivity may result in a higher output available to an economy than might have been obtained from relying on low productivity agricultural exports to pay for industrial imports.

Kalecki criticized one possible neo-classical objection to this theory, namely that developing countries experience capital scarcity, and that market forces would tend 'naturally' to equalize the marginal productivity of capital or labor in industry or agriculture. According to Kalecki, such capital scarcity was not binding in agricultural countries, since rural unemployment or under-employment allowed investment to be undertaken unconstrained by 'the supply of new saving' up to the point of full employment. At the same time, he criticized the notion that protection for new industries was a sufficient condition for economic development: 'To represent free trade as the *only* obstacle to the economic progress of backward countries is to divert attention from such urgent social problems as land reform and others.' (Kalecki, 1938).

In his post-War studies, Kalecki continued to stress the need for land reform. Land reform was critical because upon it depended the ability of the agricultural sector to supply food to a growing industrial sector whose workers still had a large income elasticity of demand for foodstuffs, on account of low wages and high urban unemployment. Otherwise, real wages fell, or food imports rose, alleviated perhaps by food grants from the agricultural surpluses of the industrialized countries. Without land reform, the financial accumulation from higher agricultural production or prices would be absorbed by rural debt service or rents, which would then finance luxury consumption rather than being invested in the expansion of agricultural production. This focus on the inelastic supply of basic essentials came to play a key part in his consideration about the financing of investment.

Foreign exchange constraints (Kalecki and Sachs 1966) and domestic considerations made Kalecki skeptical of the benefits of installing the most capital-intensive (labor-productive) variants of particular investment projects. Such capital-intensive ventures are often favored by the possibility of skipping stages of technological innovation to install the most advanced technologies used in countries where skilled labor have emerged. They had been advocated by Maurice Dobb and Amartya Sen, subject to a constraint of maintaining the level of real wages. In Kalecki's view, the choice of different variants in particular industries was not wide, while inflating capital requirements increased demand for wage good necessities or imports at a time when such demand was already likely to be high (Kalecki, 1972, chapter 10).

1. The problem of financing investment

On the 12 October 1952, the Director of the Centro de Estudios Monetarios Latinoamericanos (CEMLA) in Mexico City, Javier Marquez, wrote to Kalecki inviting him to come to CEMLA to give one of a series of lectures. The other lecturers were to be the Cuban economist Felipe Pazos, who would lecture on problems in the balance of payments, Paul Rosenstein-Rodan, then in between work at the World Bank and a chair at the Massachusetts Institute of Technology, who would lecture on the impact of investments on the balance of payments, and D. Larsen, who would lecture on the optimizing investment. (Osiatyński 1993)[1]

Kalecki arrived in Mexico City at the end of August 1953. His lectures, subsequently revised were published in the following year in a Spanish translation as 'El problema del financiamiento del desarollo económico' in *El trimestre Económico* (Kalecki 1954), and in English in the *Indian Economic Review* in the following year (Kalecki 1955). 'The Problem of Financing Economic Development' started with a closed two sector economy, producing consumption and investment goods respectively, in a society consisting of three social classes, namely capitalists, workers, and small proprietors. This last group took in poorer peasants, artisans, small shop-keepers, etc. The two sectors are assumed to be vertically-integrated, i.e., producing their own inputs. As in the schemes for expanded reproduction of Marx, the surplus of consumption goods produced by that sector is sold to workers and capitalists in the sector producing investment goods. In such a system total investment in the economy always equals saving in that economy.

"This equation shows that, in a sense, investment finances itself. Indeed, imagine that investment in the course of its execution is financed by banking credit or out of the liquid reserves of firms; it will be seen that investment as it is carried out creates its counterpart in saving." The saving in the two sectors "accrue to entrepreneurs who profited from the demand generated by higher investment, accumulate as deposits. If investment is financed out of liquid reserves of the entrepreneurs concerned, the process will result in a shift of deposits from those entrepreneurs to other capitalists. If investment is financed by short-term bank

[1] Javier Marquez, a Spanish economist who trained in Madrid, Paris and the London School of Economics, fled Spain and took refuge in Mexico in 1939, where he worked at the Banco de Mexico, before persuading his employer to establish CEMLA (see Turrent 2015). Mention of Kalecki's lectures to CEMLA is notably absent from Turrent's commemorative volume on the history of CEMLA.

credit, the savings accruing in the form of deposits will be available for absorption of the issue of debentures and shares by the investing entrepreneurs. Thus, the latter are able to repay the bank credits involved. Finally, if investment is financed by long-term bank credit, the saving, being the counterpart of the higher investment, will swell the deposits or will be used for repayment of bank credits… There are no financial limits, in the formal sense, to the volume of investment. The real problem is whether this financing of investment does, or does not, create inflationary pressures." (Kalecki 1954).

Kalecki called the inflation process due to the shifting balance of supply and demand in the two sectors 'primary inflation.' In the situation described, two 'extreme cases' are two possibilities. One possibility is that there is excess capacity in the production of consumption goods. In these circumstances, the supply of consumption goods rises to accommodate the increased demand from capitalists and workers in the investment goods sector. The other possibility is that there is no spare capacity for the production of more consumption goods. In that case, prices of consumption goods will rise up to the point where the saving in the consumption goods sector is equal to the additional expenditure on investment so that real wages will fall. "This is the case which is sometimes called in economic writings 'forced savings'". The reaction of workers to the reduction in real wages will be a demand for higher money wages, and thus a wage-price spiral will be initiated.' (ibid.)

Kalecki went on to consider the possibility of public investment, fully financed by loans. "Public investment, if financed by loans, will … generate, just as private investment does, its counterpart in saving. Let us assume that the government finances [its] investment initially by loans from the banking system. The disbursement of the respective sums will generate an equal amount of liquid saving, which will then be available for taking up government securities and thus will make possible the funding of the loan. If, however, such securities are not issued, this saving will swell the deposits or will be used for repayment of private bank credits. Here again the problem of inflationary pressure will depend merely on the conditions of supply of consumption goods."

Kalecki pointed that "the problem of investment" may not arise at all because private investment tends to be at a low level. "Investment may be limited not because of the difficulties of financing its increase without causing inflation, but by the unwillingness of entrepreneurs to expand their capital expenditures. In such a situation, public investment acquires a crucial importance for the process of rapid economic development and the fact that its repercussions, even when financed by loans, do not generate higher inflationary pressures than private investment is highly significant."

Kalecki pointed out that cases of excess capacity in the production of consumption goods, and complete inelasticity of supply, were too extreme. In fact, he argued, some goods are elastic in supply, and others are less elastic. This is particularly true of food supplies. "… under the conditions prevailing in underdeveloped countries food production expands in response to demand less than in developed countries." He doubted that migration from rural to urban employment will leave behind an "extra surplus of food which will find its way to the urban markets." Much of this "extra surplus" will be consumed in the rural areas, and in any case the standard of living of urban workers is higher than that of rural workers. While it is possible to expand production of industrially produced consumer goods, the same is not true of food production. "In some instances, the rigidity of the supply of food may lead to the under-utilization of productive facilities in non-food consumption goods." If the farmers obtain a higher income from the increase in food prices, then they may buy more manufactured consumptions goods. "However, if the benefits of higher food prices accrue to landlords, merchants, or moneylenders, then the reduction in real wages due to the increase in food prices will not have as a counterpart an increased demand for mass consumption goods… [in] the countryside; for increased profits will not be spent at all, or will be spent on luxuries." This, high demand due to large-scale investment will fail to create a market for mass consumption goods because the inelastic supply of food contributes to a fall in real wages, and the higher food prices benefit not "small proprietors" but capitalists.

Kalecki concluded that the answer to the problem of economic development, while avoiding inflation, lay in expanding agricultural production in the short term. This could be done by land reform, inexpensive loans to farmers to improve production techniques, small-scale irrigation, and cheap fertilizers. In a footnote, Kalecki observed the relationship between food prices and prices of manufactured goods: "if the rise in food prices involves a shift in the distribution of income towards big landowners, moneylenders, or merchants, the prevention of such a price rise will tend to increase the demand for industrial mass consumption goods. This is a special case of an economic law: the elimination of scarcity prices in one sector, through a higher supply, increases the probability of the appearance of scarcity prices in another sector." The growth of labor productivity will tend to reduce the inflationary pressures, but would also diminish any fall in the "disguised unemployment" of the mass of the under-employed labor force that is a common feature of developing countries (see Robinson 1936; Toporowski 2013 p. 86).

If industrial development is accompanied by foreign direct investment and rising concentration in industry, there will be a tendency for prices to rise in relation to wages, and this will reduce capacity utilization in industry. "The final result will be a shift in the distribution of income from wages and agricultural incomes to industrial profits. The case shows some similarity to that considered above, where real wages fell because of the increases in food prices while the benefits of those increases accrued to merchants, landlords, or moneylenders. In both cases, the process tends to keep down the demand for industrial mass consumption goods as a result of a shift to profits in the distribution of income. However, in the present case, it is the monopolistic industrialists who will reap the benefit."

Kalecki then moved onto consideration of how all this would work in a developing economy with foreign trade. Here economic development tends towards a rapid increase in imports, because investment goods need to be purchased from abroad, industrial production will require increased imports of raw materials and semi-manufactured goods from abroad, and food imports may be required to make up for an inelasticity of food production at home. Expanding exports to cover the cost of the additional imports will use up capital resources and so will slow development orientated towards the internal market. At the same time, entry into foreign markets on any significant scale may not be possible without a deterioration in terms of trade, reducing export prices in relation to import costs.

In a simple model of balance-of-payments-constrained growth, Kalecki showed how, given a certain level of investment, foreign capital will tend to relieve the inflationary pressures, because it allows for a faster expansion of productive capacity and alleviates the pressure on foreign exchange. Against this has to be set any burden of future servicing of the resulting financial obligations to the suppliers of foreign capital. Foreign capital comes in three forms: grants, loans and direct investment. Grants are obviously to be preferred but usually come with political conditions. Loans usually involve inflexible interest commitments, and, in the case of the most flexible loans, these are granted on a commercial basis with much higher rates of interest.

Foreign direct investment offers more flexible repayment schedules but is often in branches of industry, such as raw materials, that "may not be in line with a reasonable plan for the development of the resources of a country." This, and the political influence of the "big concerns engaged in this investment", can easily corrupt the process of economic development. Kalecki thought that foreign direct investment, providing capital equipment, repaid by the proceeds from the sale of goods produced by that equipment, can secure expansion of productive capacity while alleviating the shortages of foreign currency. Blocking of transfers of profits abroad may also help to save on foreign currency. But it may, Kalecki admitted, discourage direct investment. In his view this argument is weaker once proper account is taken of the disadvantages of foreign direct investment. In any case, foreign capital could be obtained with stronger controls to prevent capital flight from developing countries and the abuse of "transfer pricing" by international business. This last is perhaps the first mention of transfer pricing in the economics literature.

On the fiscal side, Kalecki recommended that public investment be financed through the taxation of capitalists and capitalists' consumption in particular, because this limits domestic inflationary pressure, the demand for imported luxuries, and accumulations of liquid assets that stimulate speculative hoarding. Inflationary pressures can be further reduced by credit restrictions and licensing of private investment. He commended, too, indexation of bank credit and gave the example of the People's Republic of China in its early years, when it stopped the hyperinflation inherited from the previous regime by linking the nominal value of bank deposits, credit and government bonds to the index of prices of goods. "This prevents a tendency to convert money and other liquid assets into commodities, and at the same time discourages borrowing for speculative purposes". In a footnote, Kalecki noted that this measure would bring about a collapse in the values of private securities, which would not be index-linked. However, this is "in fact common to all monetary measures against the hoarding of commodities. In fact, credit restrictions would cause a fall in the value of both government and private securities."

Kalecki concluded: "Neither this method nor selective credit restrictions can, of course, cope with what we described as 'primary' inflation. Their only purpose is to prevent the aggravation of this primary inflation by speculative hoarding. The primary inflation pressure experienced in the course of rapid economic development is, as shown above, the result of basic disproportions in productive relations. Thus, these pressures cannot be prevented by purely financial devices. The solution of the problem must be based on economic policies embracing the whole process of development." (Kalecki 1954).

Notable for its absence from a paper on development finance is any mention of foreign credits, in particularly the concessionary aid (mixed grants and loans, and credits with extended grace periods and subsidized rate of interest) that are now a feature of development finance. This lacuna gives Kalecki's 1954 paper a distinctive character: the 'problem of financing economic development' turns out to be a fiscal problem, rather than the difficulty of finding sources of finance that is the *alpha* and *omega* of development finance discussions in the twenty-first century. Only later did Kalecki put his thoughts on the question of development credits, in a joint paper written with Ignacy Sachs on 'Forms of Foreign Aid: An Economic Analysis' (Kalecki and Sachs 1966). Kalecki and Sachs did not consider foreign currency loans to be effective in development finance, since this requires governments to earn by exporting more the foreign currency to service the debt, refinance the debt, or reduce imports: "…a loan does not solve the problems of foreign trade, but merely postpones them. Without a lasting solution in the sphere of foreign trade, the only economically – but by no means politically – viable alternative is that of a continuous inflow of grants!". Kalecki and Sachs argued in favor of loans repayable in local currency. But best of all they thought were loans repayable in goods produced by the recipient developing country, a system then common in what was the socialist bloc of Communist countries (Kalecki and Sachs 1966).

2. Kalecki and the limits of structuralist economic development

Kalecki's lectures in Mexico were published in 1954, just as W. Arthur Lewis published his seminal paper on "Economic development with unlimited supplies of labor". Lewis proclaimed this as a 'classical' model, in other words one where there is no aggregate demand or foreign trade constraint, or finance, so that economic development consists in transferring the surplus labor force from low or zero productivity activities to higher productivity employment in industry (Lewis 1954). In its way, the Lewis model boosted the analytical case for capital-intensive economic development that came to be associated with the Dobb-Sen industrialization strategies for socialist economies, that Kalecki also criticized on grounds similar to his criticism of structuralist development strategies.

Structuralist economic development strategies rest on an analysis of the place of developing countries in the world economy. The analysis rests on two fundamental elements. The first of these is the dominance of global trade and investment by the capitalist industrialized countries of North America and Europe (and possibly also East Asia). These countries dominate international financial and money markets and use the poorer geographical regions of Africa, Asia and Latin America and the Caribbean principally as sources raw materials.

This brings in the second element of the analysis, the Prebisch-Singer hypothesis that the prices of raw materials that the developing countries export to the industrialized countries rise more slowly than prices of the manufactured goods that industrialized countries export (Toye and Toye 2003). Financial resources for investment therefore accumulate more slowly in the developing countries, by comparison with the rate at which they accumulate in industrialized countries, where monopolies and imperfect competition benefits producers. Developing countries have difficulty in breaking into the markets controlled by manufacturers in the industrialized countries, and the efforts of poor countries to develop their industry or just expand domestic demand rapidly runs up against foreign trade constraints (Thirlwall 2003).

In such circumstances, the solution offered by structuralist economic thinkers is the strategy of import-substitution: expanding domestic demand behind protective tariff barriers that will keep out manufactured goods from the industrialized countries. As demand rises, domestic producers will expand production making use of the large surplus labor force in developing countries. At the same time, structuralists argued for capital controls to allow governments of developing countries to set the exchange rate and ration foreign exchange resources. More recent versions of structuralism argue strongly for industrial planning and the direction of credit to modernizing industrial sectors (Ocampo. Rada and Taylor 2009). Even before the Washington Consensus came to dominate the policy of the Bretton Woods institutions, the World Bank and the International Monetary Fund had been constitutionally committed to free trade, and they readily criticized strategies of import-substitution and industrial policies as inefficient and leading to corruption and technological backwardness (e.g., Cherif and Hasanov 2024).

From its beginnings, in the work of Raúl Prebisch, structuralists emphasized the need for policy autonomy in order to allow fiscal and monetary policy to operate effectively in achieving the goals of industrialization. Prebisch had in mind principally monetary policy autonomy (Prebisch 1944). As Keynes's work came to be better known, later structuralists added an element of 'hydraulic' Keynesianism to the policy autonomy mix. According to this, production employing large labor reserves can accommodate increases in domestic demand with minimal impact on nominal wages, and therefore with little effect on inflation.

For Kalecki, policy autonomy was not enough, or rather, its effectiveness was conditioned by the class structure of the developing economy as it emerges from the domination of traditional ruling classes; by the way in which the money released into markets by industrial investment circulates in the economy and accumulates in the pockets of either traditional merchants, landowners and money-lenders, or in the accounts of foreign companies; and by the impact of this on real wages because of the inelasticity of supply of basic necessities.

Even with constant nominal wages, any increase in employment raises the total wage bill in the economy, and therefore total spending on basic necessities. If supplies of such goods (in developing countries these are largely food and housing) cannot expand proportionately, then their prices rise, and real wages fall. The increase in money in circulation is then absorbed in higher rents rather than in the financial resources of producers. With inflation in domestic markets, money accumulated through higher rents finds its way into the foreign exchange market, and capital flight arises, formally or informally, to undermine the exchange rate, or into the demand for imported luxury goods. For this reason, Kalecki favored heavy taxation on wealthy classes, and land reform to ensure that higher food prices stimulated agricultural improvements, rather than higher rents.

In private correspondence, Joseph Halevi has pointed out that the non-Andean countries of the Southern Cone of Latin America, most notably Argentina, never had the kind of food constraint that Kalecki had in mind as giving rise to higher food prices, lowering real wages as employment expanded. In this region of the Americas, agriculture was and largely remains organized in large agricultural estates. With low wages in rural and urban economies holding back domestic consumption, this model of agricultural production orientated itself to export markets in the industrialized countries in Europe. However, this export orientation was unable to form a stable basis for industrialization in Latin America because agricultural export prices were themselves volatile, and the countries of Latin America could not control the exchange rate at which they exported. This lay behind Prebisch's early insistence on monetary policy autonomy for developing countries (Prebisch 1944; Pérez Caldentey and Vernengo 2022). More broadly, this agricultural export-dependence reinforced the structuralist development economists in their conviction that industrialization on the basis of the expansion of the domestic market is the only consistent way forward for economic development (e.g., Furtado 1963).

However, agricultural export-dependence had a further *political* consequence in reinforcing the influence on government policy of land-owning oligarchs with little interest in industrial development and an inclination to use their rents from foreign and domestic trade to buy luxury imports. Their crucial position in the export trades gave them a stranglehold over proposals for land reform and any attempt to depart from the low wage *hacienda* economy from which they drew their incomes. Kalecki recognized this in his socio-political analysis of 'intermediate regimes', representing the interests of the lower middle class and government employees against the interests of "foreign capital and feudal landowners". But his laconic observation that "feudal landowners are generally deprived of their significance by land reform" seriously understates the possibilities of breaking up the estates of the settler landowners of the Americas (Kalecki 1964). The issue of food supplies and concentration of agricultural land ownership remains an issue today, most vividly in Zimbabwe and South Africa.

3. The confrontation over Cuba

The structuralist approach to economic development matured after the dispersal of Kalecki's research group on developing countries and his death in 1970. There was therefore no fundamental comparative re-evaluation of the two approaches to economic development. Rather, theorists continued to combine elements of both approaches, according to the controversies being addressed: the critique of the Washington Consensus in the 1980s, and sustainable economic growth from the 1990s (Ocampo, Rada and Taylor 2009). The contrast between the two approaches, at least in respect of their impact on wages, was put on display in the politically and economically unusual case of Cuba in 1960.

The Cuban revolution attracted support from all over Latin America, in particular from the United Nations Economic Commission for Latin America (ECLA), to which the new Cuban government appealed for assistance. The choice of ECLA was significant. Its leader, the Argentine Raúl Prebisch, was advocating international co-operation in Latin America to assist economic development. His more radical followers were promoting 'import-substitution' to allow rapid growth of the domestic market, unconstrained by the shortage of foreign exchange that usually brings economic expansion in developing countries to an end. ECLA economists threw themselves with vigor into the cause of Cuban economic development. Chief among them was the Economy Minister, Regino Boti, who was placed in charge of the Central Planning Board (*Juceplan*). Other ECLA economists occupied senior positions in the *Banco Nacional de Cuba* (the predecessor of today's *Banco Central de Cuba*) and the key Ministries of Foreign Trade, Industry and the Economy. Excited at last to have the prospect of directing a Latin American show-case of economic development without dependence on US markets or investment, the economic radicals took their inspiration and enthusiasm from the new head of the central bank, Ernesto 'Ché' Guevara. In July 1960, Regino Boti, sent a formal invitation, in general terms, to Kalecki to visit Cuba 'as an official guest' to prepare a report on economic development in Cuba.

Kalecki called his report a "Hypothetical Outline of the Five Year Plan 1961-1965 for the Cuban Economy" (Kalecki 1960). It was "hypothetical" because of Kalecki's own doubts as to the reliability of the economic statistics that he had been given. The report is therefore less notable for the accuracy of its data or predictions, about a country that was entering a serious political crisis, than for how Kalecki identified priorities in socialist economic development:

"In these circumstances, the purpose of the present enquiry is merely to substantiate the feasibility, under certain conditions, of a high rate of increase in output and consumption, which will lead to the elimination of existing unemployment in the five-year period considered and to indicate the changes in the economic structure involved."

Full employment was to be achieved after five years in 1965. The employment of women was to increase to secure their economic independence. Agricultural incomes were to rise. As a result, household consumption would increase by 30%. But he pointed out that this was to be achieved "by abolishing unemployment which politically is by no means equivalent to a straight increase of real wages by 30%". The rise in consumption could be accommodated to some extent by economizing on investment through repairing and making more efficient use of existing capacity, with significant investment in housing, schools and roads.

A particular bottleneck to economic expansion lay in agriculture. Guevara was actively campaigning for land reform in the countryside, including taking over large agricultural estates ("latifundios") and converting them into state farms ("Granjas del Pueblo"). Kalecki considered that not much improvement in productivity could be expected of the estates because of a shortage of technical expertise in their management and among their workers. In any case, their main crop was sugar cane, whose largest market was in the United States. But he also opposed the distribution of the land to the local peasants, whom he considered even less capable of producing marketable surpluses. For this reason, Kalecki considered it inappropriate for the Cuban government to attempt rapid industrialization. With low levels of consumption widespread throughout the economy, any substantial increase in employment that was not matched with a supply of food would rapidly result in inflation and falling real wages.

Despite his critical outlook, Kalecki also seems to have been oblivious to the discussion among economists in Cuba and the way in which that discussion was being driven by the Cuba's deteriorating international position. Kalecki made no mention of the takeover of American businesses by the revolutionaries and Guevara's nationalization of American banks operating in Cuba. The suppression of US business was raising tensions across the Straits of Florida. In November 1960 the American government imposed an economic blockade on the island, crippling the economy by separating Cuba from the chief market for its sugar and from its main sources of raw materials as well as manufactured goods. The political emergency engulfed Cuba when the US government broke off diplomatic relations with Cuba, on the 3 January 1961. Coincidentally, this was the day when Kalecki's plan was due to be discussed by the Cuban Planning Board. As news came through of the arming of the Cuban emigrés in Guatemala and Nicaragua, Guevara left Havana to organize local militias to repulse any attack. It is perhaps difficult to imagine any head of a central bank organizing territorial troops in this way. But then Guevara was no ordinary central banker, and the predicted invasion on the Bay of Pigs by the Cuban exiles came on the 17 April. Kalecki's plan was not formally discussed.

The political tension inflamed the economic discussion on the island. Visiting the island the distinguished development economist, Dudley Seers, who shared Kalecki's doubts about the priority accorded to industry, described the atmosphere in the Planning Board and the Ministries as "euphoric planning". At the center of the euphoria was Regino Boti, who declared in August 1961, as food was starting to become scarce, that the economy would soon reach a growth rate of 10 per cent. "Cuba in ten years time... shall achieve the highest level of living in Latin America by an ample margin, a standard of living as high as almost any country in Europe." (Seers 1964 pp. 46 and 395, quoted in Gott 2004, p. 187). But by March 1962 the revolutionary government had to introduce rationing. Dudley Seers followed Kalecki in arguing that agriculture is a crucial bottleneck in economic development. But there was also another implication of this bottleneck for the government expenditure multiplier. In the early 1960s, at the Central Bank of Argentina Arturo O'Connell argued against Prebisch that the food bottleneck gave rise to a much higher multiplier than estimated by Prebisch[2].

Conclusion

Kalecki shared with structuralism an ideal of economic development that would raise living standards among the mass of the people and raise labor productivity through industrialization. He shared structuralism's skepticism about the potential for economic development within an international monetary and financial system dominated by the industrialized capitalist economies, and the foreign exchange constraint on economic growth in poor economies. However, he rejected the 'hydraulic' Keynesian view of many structuralists that overlooks the fundamental difference between industrialized economies, characterized by excess capacity in industry, and developing countries, with very little capital equipment (Kalecki 1966) and treats aggregate demand abstracted from monetary circulation between social classes. In pre-industrial economies, such circulation concentrates (money) capital accumulation in traditional wealthy classes, merchants, landowners and money-lenders, and in international businesses, at the expense of local farmers and producers. In addition to the foreign exchange constraint on economic growth, Kalecki identified a further constraint on increasing employment, in the form of the supply of basic necessities such as food and housing, which may not expand with rising wage income. The inflationary consequence of economic growth in excess of the increase in supplies of those basic necessities has important distributional consequences in reducing real wages, even as employment rises.

Kalecki's views on economic development remain relevant today. The main change that has taken place since he died has been the huge increase in international credit, bringing with it periodic debt-crises as cyclical movements in the international prices of raw materials (the commodity price super-cycle) interact with the international monetary cycle (Toporowski 2024). However, as far as economic development in poorer, less developed, countries is concerned, this expansion of portfolio capital flows has brought little developmental benefit. In this respect, Kalecki's focus on the domestic financing of economic development, and that financing as a fiscal rather than a credit problem, remains valid.

[2] Private communication of Arturo O'Connell to the author.

Another change has been the adoption of ambitious sustainable development goals since the turn of the century. This has greatly increased the number of useful investment projects in developing countries, while doing little to overcome the bottleneck in the supply of basic necessities in those countries. The financing of such projects may alleviate some of the chronic foreign exchange constraints on economic growth. But, as with aid projects in general, they have done little to make to make economic development self-sustaining in the sense of being independent of growth in the industrialized economies. In this sense, as argued by the structuralists and Kalecki, the structures of the international economy remain biased against developing countries.

At the time of writing, wars, deflationary pressures and protectionism threaten to squeeze what limited opportunities remain for developing countries. Kalecki's writings on the financing of economic development are a reminder that the squeeze will fall most heavily on the workers, employed and unemployed, and their families in those countries.

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References

Cherif, R., and Hasanov, F. (2024) ‘The Pitfalls of Protectionism: Import-Substitution vs. Export-Oriented Industrial Policy’ *Working Paper* No. 2024/086, Washington: International Monetary Fund.

Furtado, C.M., (1963) *The Economic Growth of Brazil: A Survey from Colonial to Modern Times* Los Angeles: University of California Press.

Gott, R. (2004) *Cuba A New History* New Haven: Yale University Press.

Kalecki, M. (1938), ‘Foreign Trade and the National Forces of Production,’ *Economic Journal*, Vol. 48, No. 4, pp. 708-711.

Kalecki, M. (1954) ‘El problema del financiamiento del desarollo económico’ *El trimestre Económico*, 21/4, pp. 381-401.

Kalecki, M. (1955) ‘The Problem of Financing Economic Development’ *Indian Economic Review* 2/3, pp. 1-22; reprinted in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies*, Oxford: Clarendon Press, 1993 pp. 23-44.

Kalecki, M. (1960) ‘Hypothetical outline of the Five-Year Plan 1961-1965 for the Cuban Economy’ in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies*, Oxford: Clarendon Press, 1993.

Kalecki, M. (1964) ‘Observations on Social and Economic Aspects of “Intermediate Regimes”’ in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies*, Oxford: Clarendon Press, 1993.

Kalecki, M. (1966) ‘The Difference between Crucial Economic Problems of Developed and Underdeveloped Non-Socialist Economies in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies*, Oxford: Clarendon Press, 1993.

Kalecki, M. and Sachs, I. (1966), ‘Forms of Foreign Aid: An Economic Analysis’ in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies* Oxford: Clarendon Press, 1993.

Kalecki, M. (1972), *Selected Essays on the Economic Growth of the Socialist and the Mixed Economy*, Cambridge UK: Cambridge University Press.

Kalecki, M. (1993) *Collected Works of Michał Kalecki Volume V: Developing Economies* Oxford: Clarendon Press.

Lewis, W.A. (1954) ‘Economic Development with Unlimited Supplies of Labour’ *The Manchester School* Vol. 22, pp. 139-191.

Manoilescu, M. (1931), *The Theory of Protection and International Trade*, London: P.S. King & Son.

Ocampo, J.A., Rada, C, and Taylor, L. (2009) *Growth and Policy in Developing Countries: A Structuralist Approach* New York: Columbia University Press.

Osiatyński, J. (1993) 'Editorial Notes' in Jerzy Osiatyński (ed.) *Collected Works of Michał Kalecki Volume V: Developing Economies*, Oxford: Clarendon Press 1993.

Pérez-Caldentey, E., and Vernengo, M. (2022) 'Prebisch's Critique of Bretton Woods Plans: Its Relation to Kalecki's and Williams' Ideas' in J. Osiatyński and J. Toporowski (eds.) *International Equilibrium and Bretton Woods Kalecki's Critique of Bretton Woods and its Consequences* Oxford: Oxford University Press 2022.

Prebisch, R. (1944) 'La Política Monetaria Nacional y Los Planes Monetarios Internacionales' in R. Prebisch *Obras 1919-1949 Vol. III* Buenos Aires: Fundación Raúl Prebisch, pp. 88-122.

Robinson, J.V. (1936) 'Disguised Unemployment' *Economic Journal* Vol. 46, pp. 225-237 in *Collected Economic Papers Volume Four* Oxford, Basil Blackwell 1973, pp. 199-211.

Seers, D. (ed.) (1964) *Cuba: The Economic and Social Revolution* Chapel Hill: University of North Carolina Press quoted in Gott *Cuba a New History* 2004, p. 187.

Thirlwall, A.P. (2003) *Trade, The Balance of Payments and Exchange Rate Policy in Developing Countries* Cheltenham: Edward Elgar 2003.

Toporowski, J. (2006) 'Kalecki' in D.A. Clark (ed.) *The Elgar Companion to Development Studies* 2006.

Toporowski, J. (2013) *Michał Kalecki An Intellectual Biography Volume I Rendezvous in Cambridge 1899-1939* Basingstoke: Palgrave.

Toporowski, J. (2024) 'La Reconstrucción del capital financiero internacional. Visiones teóricas del dinero y las finanzas internacionales' in Noemi Levy Orlik, Jorge Bustamante Torres and Paloma Sánchez (eds.) *Reestructuración del capitalism en la periferia: El paper de la inversion extranjera y de las grandes corporaciones* Ciudad de México: Facultad de Economía, Universidad Nacional Autónoma de México, 2024, pp. 31-46.

Toye, J., and Toye, R. (2003) 'The origins and interpretation of the Prebisch-Singer thesis' *History of Political Economy* vol. 35 no. 3, pp. 437-467.