EFFECTIVE DEMAND, SYSTEMATIC MOVEMENT AND LONG RUN POSITION OF THE ECONOMY: METHODOLOGICAL NOTES

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1. INTRODUCTION

The purpose of this paper is to examine the usefulness of the long period position category to develop a theory of output and employment based on the Keynesian principle of effective demand.

That category has played a prominent role in the history of economic thought and it is experiencing a controversial renaissance in the context of the analysis of output and prices of production based on the surplus - approach. (Eatwell, 1982; Garegnani, 1976, 1978, 1979; Milgate, 1982, Nell, 1982, 1983; Robinson, 1974, 1979).

The Post - Keynesian school, however, constitutes an important counterpart in this polemic by emphasizing that the theory of effective demand is grounded in an institutional framework and the role of expectations (Davidson, 1977- Davinson and Kregel, 1980, Kregel, 1984, Minsky, 1975).

Both schools agree in rejecting the orthodox theory of the simultaneous determination of prices and output but they have different reasons for doing that, while the Neo - Ricardians focus on the inability of the orthodox theory to de termine long period positions in the context of an inconsistent capital theory, the Post - Keynesians concentrate on uncertainty and the role of money. At the

first glance, it seems that both schools are not reconcilable, but by contrasting them we will find some theoretical issues which can be analysed in a common framework.

The category of the long run position has its origin in a general concept of a centre of gravitation towards which the market economy supposedly moves. In classical economics the «natural» prices play the role of centre of gravitation, while in Marxian economics the same role would be played - by prices of production. The supporting reason for this concept would be the existence of a force which has a persistent or systematic nature in the operation of the market. This force is thought to be competition which would dominate prices in the sense that it produces a tendency toward a uniform rate of profit, or reduces differing market rates of profit to the average rate.

For the surplus approach (Classical and Marxian theory) the centre of gravitation is constituted by a long rum supply price in the sense that it expresses the movement of capital among sectors. However, this concept presupposes a given technology, income distribution and productive capacity for the economy as a whole. (The income distribution must not only be related to the property relations of the system but also to the structure and conditions of production). It will then become clear that short rum variations in demand have no role in changing the long rum supply prices. Therefore, the only theory of output, related to the long run horizon must be a theory which considers the long rum changes in demand affecting long rum supply prices through the variations in general capacity levels.

As we will see, this introduces a problem to the Neo - Ricardian interpretation of the concept of the centre of gravity, because it cannot grasp the variation of capacity levels, that is to say, it cannot incorporate the theory of output into a theory of accumulation.

II. COMPETITION, PERSISTENCE AND EQUILIBRIUM POSITION

According to Lowe,

> «the central problem of capitalism has often been defined as the question of how order rather than chaos ensues from the undirected action of innumerable individuals» (Lowe, 1984, p. 115).

Since the capitalist system is a dynamic economy this question, raised by Lowe, implies that there must be certain inherent forces, which permit that changes are displayed in a regular manner. The object of the economic theory, therefore, must be related to the examination of these systematic forces.

Two preliminary conclusions can be derived from this reflection. First, the study of the operation of these forces must be the enquiry of the persistence of the capitalist economy from the point of view of the expanded reproduction of its basic conditions. Second, the explaining the law of operation of a capitalist system which grows spontaneously, given the independent behaviour of its agents, the regulating forces should bring about a tendency towards an equilibrium. The economy should create then in the midst of disequilibrium movements its own centre of gravity.[1] These two conclusions are related to the concept of capital movement and competition. The latter notion of competition is generally related to capital movement in the sense that given sectoral differences in the profit rate, it would ensure the gravitation of market prices toward prices of production. However, this is note enough, because it only captures one aspect of the dynamic character of competition.

According to Marx, compatition is a dynamic process which also creates disequilibrium in the sense that capitalists are always trying to improve the conditions of production as a way to displace (outrace) their rivals. With this dynamic notion the statement that capitals are oriented to the sector with the higher rate of profit acquires an appropriate dimension. But in the static point of view, mo-

1. The concept of equilibrium used here corresponds to the «balanced reproduction» category. We will see later that the sectoral proportionate growth has to be associated with a general rate of profit and the corresponding prices of production. At these prices, at any given time, a manufacturing business would be able to sell only what the market will take. Then, the short run analysis can be carried out in terms of an equilibrium of prices, but not in terms of equilibrium of individual outputs. Clearly, this is not compatible with the Neoclassical definition of equilibrium which entails a balance between marginal revenue and marginal cost for each individual business. In the context of our analysis , output and activity, in general, depend upon the demand for the corresponding products. The aggregate demand does not accomodate itself to the aggregate supply prices. So, in each moment of time, there will be a unique value of the aggregate demand «which becomes effective because, taken in conjunction with the conditions of supply, it coresponds to the level of employment which maximizes the entrepreneur's expectation of profits» (Keynes, 1964, p. 65). Consequently, in each moment of time, prices of production and insuficient effective demand are totaly compatible.

vements of capital would be from advenced to backward sectors, because the second ones would have the highest rate of profit (Nell, 1983). In a dynamic point of view, the movement of capital can be understood as investment in a twofold sense : On the one hand, investment is a process which generates a dynamic movement creating better technological conditions of production and making the corresponding capital more efficient and profitable. On the other hand, investment generates a movement from backward to advanced capital to equilibrate the rate of profit. These two related elements express the nature and the direction of capitalist accumulation.

For the foregoing reasons the process of investment must always be understood as a factor which changes the capacity level in the economy as a whole. This is what J. Robinson calls the long period aspect of investment. (Robinson, 1979, p. 179). Given a specific capacity level, differences in quantities supplied in relation to the normal utilization of capacity would give rise to deviations of market prices from normal prices. However, because of the difference in quantities is associated with the nature of changes in the aggregate demand, two possible movements can be identified. First, a change in capacity utilization to catch up the short - run variations in demand. Second, the differences in the rate of profit associated with long rum variations in aggregate demand can generate changes in the capacity level through net investment.

The first movement becomes useless to analyse the determinants of investment because capitalists can respond to discrepancies in quantities due to short rum variations in demand by only changing the utilization of capacity. Prices will remain unchanged despite the variations in output. Since the growth of a capitalist business is limited fundamentaly by its market, when prices and cost are given, it will stick to its «pricing policy» to face short rum variations in demand. Investment, the autonomous variable and the main component of the aggregate demand will determine the actual level of output and employment.

The second one becomes theoretically more important in that respect because it is associated with the process of capital accumulation. If the change in demand is maintained, it will influence the economic growth through changes in he investment. Therefore, due to its mentioned characteristics, investment will generate long run dynamic positions in the economy. For this long run positions to reflect systematic regularities of the economy, capital movements have to be associated not only with an equal rate of profit over sectors but also with balanced growth. However, investment which reflects the behaviour of the capita-

lists and comes about through competition, will not necessarilly correspond to that long rum positions.

As Marx points out :

> «Under capitalist production, the general law acts as the prevailing tendency only in a very complicated and approximate manner, as a never ascertainable average of ceaseless fluctuations» (Marx, 1967, Vol. III. p. 161).

Competition involves the rivalrous process between the individual capitals. It generates a struggle for a greater share of the market and higher rate of profit in the intra - and inter - industry context. This rivalrous process generates distabilizing movements in the system. Expanded reproduction itself will mean reproduction of these discrepancies, creation of cycles and crisis, which, in turn, due to the compensating movements inherent to the capital flows, will create a balancing tendency as an average dynamic result of competition. Therefore, the centre of gravity will only express the forces which give stability and a persistent nature to the capitalist system. The center of gravity cannot be associated with a resting equilibrium position as in the neoclassical notion of long run equilibrium. Moreover this stability can only be understood in the sense that the behaviour of capitalists is grounded in a particular institutional framework which not only assures the reproduction of class relations but also provides the possibility to produce and accumulate (and in times might even create conditions of overcoming crisis). In relation to this latter point the credit and monetary system becomes crucial in the analysis of the role of investment.

III. NEO - RICARDIANS AND POST - KEYNESIANS : A LACK IN THE NOTION OF COMPETITION

According to the Neo - Ricardians, the long period method of economic analysis implies that its object should be the long term position of the economy because it represents the persistent regularity of the system. They support this idea claiming that competition which is considered to be a systematic and persistent force and has a stabilizing effect on the movement of capital, ensures that the mentioned long rum position is achieved through the equalization of the rate of profit among different industries.

According to their account of the history of economic thought, especially o the break from classical to neoclassical economics, they also state that the Neoclassical framework has the same method and object but different explanation of the manner in which prices, the wage rate and the general rate of profit together with output and employment are determined in the long run conditions. For them, therefore the theories are different, because they exhibit a different notion of competition.

Neoclassical theory requires prices and the stock of capital given, to explain the short run equilibrium of firms. This implies that the short run equilibrium of the industry is based on the assumption that all firms are price takers. If the price taking behaviour were not considered it would not be possible to aggregate individual's behaviour into market demand and supply schedules. This modified notion of competition (or this particular notion of behaviour) is also necessary for the long run equilibrium. In this sense, according to the Neo - Ricardians, Neoclassical long run normal prices hybridize the long period method. Given consumers' taste, technology and initial endowments of factors and/or commodities, the Walrasian equilibrium is determined when there is no possibility of improving the allocation of ressources and/or commodities by whatever coalition. This means the prices are determined as a limit in the sense that the core of the economy shrinks as the number of traders increases. At this point the price is given and the traders have to be price takers. (Varian, 1978, pp. 179 - 83). This notion of perfect competition is crucial for the supply and demand theory of prices : if for all markets of the economy the individual demands and supplies could not be aggregated, it would not be possible to get the equilibriium prices.

Two conclusions can be drawn from this exposition of the Neoclassical approach : First, the notion of competition is not any more linked to the mobility of capital and its effects on the rate of profit. Second, the related behavioral analysis of this notion of competition is deprived of the structural and institutional framework present in the capitalist economy. The Neo - Ricardians criticise this empty concept of competition introducing and overemphasizing, in a static framework, the concept of competition linked to the capital movement. According to Milgate :

> «the competitive t e n d e n c y towards uniformity of profit rates is all that is required for the application of long- period normal conditions as the object of analysis. While it is quite possible for natural or long - period normal conditions to refer to stationary or steady - state economies (when the 'tendency' is realised in actuality), it is equaly possible for them to refer to non - stationary economies. It is, of course, assumed that the fectors affecting the

forces which determine long - period normal values change slowly ...» (Milgate, 1982, pp. 30).

This is so, because they do not take into consideration the fact that competition as a dynamic process entails the behavior of the capitalist class. However, it must be mentioned that they implicitly consider the class sttruggle only with respect to the distribution of surplus. But because they ignore the role played by the capitalist decision makers, they state that the method and the object of economic analysis was the same for the Classics and the Neoclassics.

The Neo - Ricardian argument leads to three theoretical issues :

First, they leave the field of behavioral analysis to the limited stimulus/response treatment of it by the Neoclassicals, thereby implicitly supporting their monopoly in this field. Second, Neo - Ricardians also run into problems with the separation of method and theory, which cannot be reasonably maintained if one considers the behavior of capitalists as investors. Third, they reject this subjective aspect of the decision makers because they assume that it only entails the short run position of the economy and does not tell anything about the longe run.

Certainly, Nell is correct when he claims that the shift from classical to marginalist schools was from the structural analysis (related to the reproduction of the economy) to behavioral analysis (related to the determination of market clearing prices). Hence, method and theory was changed (Nell, 1984). However, as we will see later, the behavioral theory derived from the margimnalist revolution has nothing to do with the Keynesian behavioral analysis which is inserted in the very social and institutional nature of the capitalist system. This kind of behavioral analysis is a complement of the structural analysis. As Foley points out :

«the study of the formal structural espects of commodity production can take us only a limited distance ; to go further we must propose behavioral regularities for agents that flow from their specific positions in a historically determined mode of production» (Foley, 1983, p. 12).

The Post - Keynesians, on the other hand, have stretched the state of uncertainty in a monetary - production economy and the role of the general state of expectation as an explicit independent variable which colours all the functional relationships in the system. However, they recognize that the disruptive force

of this expectational behavior occurs within a particular institutional framework which characterizes the economic system. Without the institutional element, the economy would be totally unpredictable. Therefore, for Post - Keynesians, the regularity of the system must be based, first, on the property of money and contracting institutions; and second, on the role of the financial sector and the state as stabilising variables. As Carvalho says :

> Institutions «enforce constraints on actions and events because they orient, constrain and direct the behavior of individuals (—). Institutions are a datum to each individual: they cannot originate from his solitary deliberations» (Carvalho, 1984, p. 271).

Whereas for Neo - Ricardians competition is the stabilizing factor, for Post Keynesians the disequilibrating aspect of it, is implicit in the subjective element of expectations of investing decision makers :

> «If. .. the state of expectation can and does change as the system moves irreversibly along the calendar time axis, (then) there is nothing in the logic of the dynamic theory which rules out violent instability» (Davidson and Kregel, 1980, p. 142).

Therefore, only because there are institutions the system moves, for Post-Keynesians, with relative stability by preventing violent alterations in the state of expectations.

Certainly, in both schools there is a lack in the notion of competition process. For Neo - Ricardians the existence of a centre of gravity as a stable pattern over time implies that the distabilizing aspect of expectations does not affect the level and composition of demand. This is the reason why for Neo e Ricardians the method is exactly the same as that for Neoclassicals : «the search for gravity centres».

For determining this centre of gravity, Neo - Ricardians have to assume not only that technology and distribution of income are given, but also that the size, and composition of output is fixed. (Eatwell, 1977, pp. 62 - 63). On the other hand once the centre of gravity is determined, the long period analysis of output and employment based on the principle of effective demand, has to take them as given (Eatwell, 1983, p. 215).

However, when the technology and distribution of income are given, the very notion of change and the long run influence of effective demand on the accumula-

tion cannot be grasped. Neo - Ricardians, because of this, disregard any possible influence of effective demand on the structure of the system. Here, the disassociation of the equilibrating process from changes in the economy is striking. Given the centre of gravity there would be a correspondent unique level and composition of demand. Clearly, this centre of gravity notion is timeless and the assosiation of demand. Clearly, this centre of gravity notion is timeless and the associated notion of competition loses its dynamic aspect.

For Post - Keynesians, since the production takes time, the existence of money and uncertainty makes it possible to move the purchasing power through time. If expectations gemerate the possibility of change it must be possible to associate it with the struggle of capitalists haggling in the market place by creating better conditions of production, i.e. by introducing technical innovations. But, because they concentrate on institutions as the sole stabillizing factor, the role of the tendency of the rate of profit to equalize is not developed. For the same token, the notion of capital movement associated with the dynamic notion of competition is also lost. Competition is not linked to expectations.

There is a tendency in the Neo - Ricardian literature to put the Post - Keynesian emphasis on expectations and uncertainty down with the argument that its analysis was as old as Neoclassical economics. Therefore, Keynes' and the Post - Keynesians' contribution to this would lose its aura of novelty. It is our contention that is a misrepresentation of the Post - Keynesian approach because it neglects the differences between their concept of expectations and that of the Neoclassicals. Expectations in the marginalist theory are usually linked to the analysis of pure exchange and does not directly relate it to production. When expectations appear in the Neoclassical theory it is usually treated in a perfect competition world, where there is an infinite number of traders and infinitestimally small firms. Then, because each economic agent has to be a price taker, expectations only make sense if they are 'rational' i.e., when their average actual expectation coincide with its mathematical expression. No dynamic element is related to the expectation of the utility and pfofit maximizers, because the «kaleidic» aspect of time does not play any role. As R. Bausor says with regard to the latest Neoclassical fad, «rational expectation» :

> «Constraining the current expected value to the future actual equilibrium value is equivalent to attributing knowledge of that equilibrium value. Such knowledge of future phenomena contradicts the basic epistemic asymetry governing the structure of time; the future is not uncertain. Furthermore, since the mean of the forecast errors must aqual zero, the currently expected equi-

librium value, and the actual future long - run equilibrium value are logically equivalent. Thus the new orthodoxy's vision of rationality denies the logical antecendence of current expectation to future actualisation. This logical dependence of the present on the future is the only guarantor that the future distribution will validate today's rationality. Yet precisely such dependence violates the most fundamental aspects of the epistemic foundations of time, rupture the intertemporal structure of time, and destroys the aparent flow of time from its forward progress» (Bausor, 1983, p. 8).

Post - Keynesians, on the other hand, concentrate exactly on the issue of uncertainty and connect expectations with the role they play for capitalists as investors. This transcends the pure behavioral analysis of the traditional theory and opens the door to the role played by expectations of the capitalist class, since investment is the prime mover in determining the level of output and amployment. Clearly, the use of expectations in a dynanic perspective can be associated with the class struggle and the competitive process in the economic system. Once expectations are linked to the capitalist class it should be analysed in relation to competition in the sense that investment not only reflects the expectations about the future yield of capital goods, but also the economic purpose of each competitor in relation to the profit levels and the rate of growth.

There is amother crucial theoretical point when expectations are not linked to competition. If the theory should be the theory of the long run positions of the economy as Neo -Ricardians argue-, the long run theory of output and employment can be built up without any behavioral analysis, i.e. without taking into consideration the capitalists' struggle for markets through their investment decisions. The institutional nature of income distribution would be enough. However, this leaves outside the analysis of the effects of competition among investors on the level and composition of productive capacity of the economy.

If investment is linked to competitive expectations the behavior of the capitalist class becomes important as a «movens agens» with interesting implications for the concept of the centre of gravity. At each point of time, the expectational behavior of the capitalist class as a whole crystalizes in specific investment decisions which give rise to definite levels of demand and growth as a result of the competitive process. In this context, the centre of gravity is not perceived as a resting point around which the economy oscillates ; but is itself moving over time creating in this process specific coordinates in which the level of output and employment finds its place in the long run. To have a long run theory of output by in-

corporating the principle of effective demand, time must be included in the analysis. In the long run, investment will create its own saving only through changes in the level of capacity and this will occur as a result of the corresponding changes in the conditions of production and also in the pattern of income distribution between social classes.

Therefore, for having a meaningful concept of the centre of gravity, it must be a category which makes it possible to apprehend the moving regularity of the system, i.e. it must give an idea about how the changing levels of demand and growth are to be pictured in the context of a persistent regularity of the economy. The determinants of this moving centre cannot be invariant to the equilibrating process itself. Whatever systematic forces exist in the capitalist system it will imply not only a tendency of equalizing the rate of profit but also a tendency towards a balanced growth path[2]. Not only definite levels of demand and growth over time can be envisaged as a result of the competitive process, but also the direction of accumulation and composition of demand. In each point of time investment only will reflect the level of utilization of capacity in relation to what is considered to ba its normal level; and the effect of investment on the level of capacity will be a matter of the path of the economy. Since investment responds to the capitalist behavior, there will not be any reason to expect a unique relationship between the level of output, on the one hand, and the one rate of economic growth and the growth rate of the labor force, on the other.

IV. AN ATTEMPT OF SYNTHESIS

a) The centre of gravity

According to Garegnani the Cabridge critique of capital theory is sufficien

2. Marx qualifies this process in the following way : «The different spheres of production . . . . . constantly tend to an equilibrium : for, on the one hand, while each producer of a commodity is bound to produce a use - value, to satisfy a particular social want, and while the extend of these wants differs quantitatively, still there exists an inner relation which settles their proport tions into a regular system, and that system one of spontaneous growth; and, on the other hand, the law of the value of commodities ultimately determines how much of its disposable working - time society can expend on each particular class of commodities. But this constant tendency to equilibrium, of the various spheres of production, is exercised, only in the shape of a reaction against the constant upsetting of this equilibrium» (Marx, 1967, Vol. I, pp. 355 - 356).

to reject the argument about the long run tendency of full employment of labor, since it invalidated the Neoclassical theory of distribution of the product between wages and profits. Therefore, the door would be opened to develop a long run theory of output based on the surplus approach to distribution. Once the orthodox characterization of the operation of the market mechanism is rejected, there is no longer a theoretical basis for arguing that equilibrium prices and output imply or are associated with full - employment labor force. By the same token, there are no forces of supply and demand which determine an equilibrium rate of profit and full - employment of capital's productive capacity. Garegnani says :

> «I believe that (the basic weakness of marginalist theory) lie in the very notion of substitutability between factors of production, from which the idea of the «opposed forces» of demand and supply was derived». «It appears that the significance of the notion of equilibrium essentially depends on the existence; ...., of forces capable of bringing the economy towards the equilibrium position. (...) Thus to deny . . . the existence of any general tendency to equilibrium would seem to entail the rejection of that notion and, together with it, the rejection of the marginalist doctrine of demand and supply forces whose equilibrium would explain distribution, prices and outputs». Then he puts forward the motion that «the task confronting the theoretician would then seem to be that of ascertaining the true central levels around which actual prices and outputs gravitate : the task, that is, of developing an alternative theory of distribution, prices and outputs, with the corresponding notion of long period position, alternative to the marginalist 'equilibrium' of demand and supply» Garegnani, 1980, pp. 10, 11, 18).

In the short run, when the available capital cannot «change its physical shape», there will be no tendency to full - utilization of capacity and the question of whether this capacity is to be sufficient or not to employ the entire labor force, would remain. For Keynes, in the short period

> «it is not the rate of interest, but the level of income which ensures equality between savings and investment» (Keynes, 1937, p. 250).

Therefore the later variable (investment) can be considered, in each short period, as an independent variable or given.

Recently Garegnani has taken up his own task to bring the principle of effective demand to long period analysis for developing a long period theory of output.

In this horizon there would be no tendency towards full employment of labor and the aggregate demand would influence the pace of accumulation (Garegnani, 1981, pp. 11 -12). For him a satisfactory theory of output would not require much more than

> «a) an analysis of how investment determines saving through changes in the level of productive capacity (and not only through changes in the level of utilization of productive capacity) ; b) a study of the factors affecting the long run levels of investment; (and) c) a study of the relation between consumption expenditure and aggregate income». He adds, «theoretical and applied studies have already prepared much material in the last two fields» (Garegnani, 1981, p. 12).

Clearly, Garegnani's position that investment determines its own saving through changes in the level of productive capacity introduces a significant theoretical shift in the sense that it necessitates a balanced growth path associated with prices of production as a centre of gravity. His long run theory of output therefore implies the introduction of a second centre of gravity, i.e. the balanced growth path, since this is what the equal rate of profit in this context calls for.

Let us assume that the rate of growth of the industry i, is defined by :

$$(1) \qquad g_i = a_i \; r_i$$

where

g_i reflects the existence of net investment different from zero, in order to have a proper representation of changes in the productive capacity level.

a_i *ratio of investment* (I_i) *or saving* (S_i) *to profits* (P_i)

r_i rate of profit

i industry i (i = 1,2,3 . . . . . , n)

Assuming now that the general rate of profit is :

(2) $$r = r_i$$

then, from (1), we will have :

(3) $$\frac{g_1}{a_1} = \frac{g_2}{a_2} = \ldots\ldots = \frac{g_n}{a_n} = r$$

If the propensity to save out of profits of capitalists is the same, that is, if $a_1 = a_2 = \ldots\ldots \; a_n$, then

(4) $$g_1 = g_2 = \ldots\ldots - g_n$$

which means that all industries must grow at the same rate. Moreover, this equation implies that the rate of growth in each industry must be equal to the rate of growth of the economy as a whole.

The general rate of growth has to be a weighted average rate :

(5) $$g = \sum_{i}^{n} \frac{K_i}{K} g_i$$

where

K_i stock of capital of industry i

K stock of capital in the whole economy

Since $g_1 \quad g_2 = \ldots\ldots \quad g_n$ and $\sum_{i}^{n} K_1 = K$, it follows

that

$$g = g_i' \tag{6}$$

In other words, since changes in the capacity level imply that there must be net investment greater than zero (or $g > 0$), the sole concentration ion prices or production as a centre of gravity is not enough. Balanced growth path, therefore, is associated with equal rates of profit and proportionate growth.

Certainly, in the context of accumulation, profit rate equalization occurs in different way from that which was explained by Neo - Ricardians. As E. Nell points out :

> «Suppose the economy is expanding in a given technique. Over the long period no industry can expand at a rate faster than the lowest ratio of the investible net output to amount consumed as means of production among the lowest growing basic. Hence a balanced growth path will tend to form. (...). Now if firms add a mark up to their costs which will be just sufficient to generate the profit required for their investment, the resulting prices will produce a uniform rate of profit, since they are based on a uniform rate of growth. The crucial point here is the equalization of the rate of profit requires that there first be a balanced growth rate, which in turn depends not only on the technology, but also on the movement of household consumption patterns as income per capita rises (...). Perhaps even more important, however, the rate of profit, in this view, is a d e r i v a t i v e notion. The fundamental concept is the rate of accumulation. This, of course, was also Marx' v i e w.(....). What the systematic and persistent forces determine, then, is the rate of accumulation : competitive mark - ups will then establish a rate of profit» (Nell, 1983 pp. 15-16).

But this balanced growth path is also insufficient to explain the dynamic movement of the capitalist system, since technology and income distribution is assumed to be given 3. This implicit assumption in this new «centre of gravity» is

3. Here we must mention Andrew's contribution to the analysis of price - determination in long run conditions for competitive industries (Andrews' 1949, 1951, 1964). He argues that average direct costs of production for the normal range of output and the gross profit margin are

that capitalists be have in such a way that they undertake investment in an appropriate level to reproduce the system without affecting its mentioned parameters. Once the long run theory of output is claimed under the idea that investment determines savings through variations in the level of productive capacity, there is no way to escape from the task of explaining what determines the level and composition of investment. This latter variable cannot remain unexplained since it itself is accumulation. Therefore, the long run theory of output would have to be a derivative proposition from a more comprehensive of accumulation process with income distribution and technology chanhging along historical time.

Since decisions concerning investment and production are undertaken by capitalists in an anarchical fashion, one must take into consideration the dynamic notion of competition and expectations of this ruling class. Therefore, the long run balanced position of the economy can only be interpreted as a servies of compensating errors in as much as there is no plan which coordinates the activities of individual capitalists. For this reason, the long run position can only play the role of being a theoretical setting to analyse the direction of the accumulation process and the possibility of changing it at each moment of time.

b) Long **run** expectations as determinants of the investment level

Recently John Eatwell's work showed a remarkable shift away from earlier Neo - Ricardian positions. Here also this shift appeared as an attempt to move away from the sole criticism of the Neoclassical theory. This is surprising not because it finally started to address the suggestion of developing a positive theory of long run employment, but because it inherited the notion of long run expecta-

the significant elements of price quotations by established businеses in a stable or growing market. The gross profit margin that a business can get, is, according to him , limited by competition which is actually or potentially present in the market. Therefore, the normal costing - margin adopted by the business will give the highest level of price that they can expect to maintain against competition in the long run. He considers long run as a «sufficient time being presumed to allow the entry into an «industry» of any businesses whose founders consider this likely to the possible» (Andrews, 1951, p. 141). However, he makes the following warning : «In the case of a given business it seems a natural procedure to take things as they are and work out the implications in terms of the business's long run capacity to compete and to survive, assuming other relevant factor to remain unchanged. But it is impossible to do this without being will aware just how dangerous it is to take for granted the relative level of efficiency which exists at a particular time (Andrews, 1951, p. 171).

tions from Keynes which had been broadly neglected if not criticized by Neo - Ricardians as individualistic and therefore to erratic to say anything about the «systematic and persistent forces» of the economic system.

Athough the critical strategic context in which Eatwell puts forth his suggestion is to break Keynes' oeuvre from intertemporal equilibrium interpretation and to rediscover its long run elements, it is remarkable in the sense that he uses long run expectations as a strategic starting point for a positive long run theory [4]. While so far for Neo - Ricardians long rum effective demand or investment played a pivotal role, it is now long run, expectations. By looking for support in Keynes" General Theory Eatwell says :

> «The solution may be found in Keynes' own analysis of long period employment ; it is not investment which is the independent variable, it is the «state of long term expectations» (Eatwell, 1983a, p. 282).

This is interesting because it seems to indicate an approximation to the Post - Keynesian analysis of expectations. Another recent study - this time by the Post -

4. It is not necessarily so for Keynes that long run expectations are used in the same strategic context. On the contrary the treatment of the relationship of short and long run expectations to the problem of persistence and stability seems to the tackled from a different angle than Eatwelfs, Kenyes distinguishes between two approaches. The first is a static model, where «dissappointment - induced shifts» are removed, i. e. a state of expectation is «definite and constant and has lasted long enough for there to be no hangover from a previous state of expectation» (Kenyes, 1973, p. 105). This model is used by Keynes, according to Davidson and Kregel as a «logical exercise» in order to «give full scope to the role played by effective demand» (Davidson and Kregel, 1980, p. 139). Eatwell's interpretation of Keynes' consept of long run expectations refers to this case only and transforms the «logical exercise» into a basis for a theory. But he does not see that for Keynes long and short run expectations are closely interconnected in the sense that there is some causal relationship going from short to long run. In the above case long run expectations are stable only because short run expectation are «always fulfilled» (Keynes, 1973, Vol. XIV, p. 181). If they are not fulfilled» and if this frustration as persistent, the possibility of changes in long run expectations exists, which leads to Keynes' second approach. In this, expectational propensities shift over time (not necessarily due to the frustration of past expectations - here the causal relationship is multidimensional), inducing equilibrium to shift also over time. In the second approach, Keynes, as Davidson and Kregel point out, «envisioned his real world model as one of shifting equilibrium, a world in continuous movement without the necessity for plans of economic against to ever be reconsiled» (Davidson and Kregel, 1980, p. 140 - 141). That in this dynamic context of changing states of expectation violent instability is not ruled out, is self evident. The point to be made here is that Earwell's emphasizes Keynes' first approach only, because he is in his search for a gravity centre, only interested in the discovery of stability metaphors, which induces him to reglect Keynes' second approach.

Keynesians Davidson and Kregel - gives hints that Keynes himself used expectations only in a pedagogical context to make his theory of effective demand more acceptable. They say :

> «In order to develop his most fundamental contribution - the theory of effective demand - Keynes chose ... to elaborate on a model where it was assumed that once the state of expectations is given, it would continue for a sufficient length of time for the effect on employment to have worked itself (out...). This static Keynes model permitted the specifications of simple, stable functional relationships that a dynamic or shifting expectational model would have rendered impossible (Davidson and Kregel, 1980, p. 138).

However, their interpretative emphasis is more centred around the disequilibrating aspects of expectations which would make it necessary to analyse the role of institutions as the role stabilizing element in the modern capitalist system.

Eatwell on the other hand takes Keynes remarks on this issue (long run expectations) quite literally and interprets it in the same manner he interprets competition, namely, from the perspective of his search for a gravity centre, as a stabilizing element of the economy. Since he starts from the notion of long run supply prices, when he adds the behavioral element of expectations, he has to introduce a notion of the «stability of the institutional environment» which would counteract and stabilize the erratic individualistic actions (Eatwell, 1983a, p. 283). All discruptive elements for the Neo - Ricardian centre of gravity argument must be avoided. What this means with respect to the long term level of employment, Eatwell has put in the following way :

> «There will be a level of capacity (embodying the socially necessary technique) corresponding to any given level of long term expectations. If existing capacity is above or below this level then the prospect of profil will induce investment to change the level of capacity to that appropiate to the state of expectations. The process may overshoot, as Keynes points out (...), but so long as the state of expectation may be supposed to be given then competition will tend to push the level of capacity toward that wich is appropriate to sustain the long term level of employment (or, in a dynamic setting will push the rate of growth of capacity toward that rate compatible with the rate of growth of output implicit in the state of long term expectation. (...). There is no reason to suppose that this will be a smooth process,

but the usual oscillations and instabilities of multiplier - accelerator models will be damped by the fixed level of demand associated with the state of long term expectation» (Eatwell, 1983a, p. 283).

This is a truly remarkable because it explicitly keeps apart the analysis of expectations from the analysis of competition. But even though these are separated Eatwell reintroduces a notion by Joan Robinson which has been locked out so far by the Neo - Ricardian body of thought : «The concrete analysis of accumulation and the study of historical processes» (Eatwell, 1983a, p. 283).

To interpret Eatwell's exposition in a more dynamic sense, one could say that the long run setting at each point of time - given all the structural parameters, like long run expectation -, corresponds to a level of investment which is considered to be normal. But something truly is missing here and the missing element can easily be grasped as soon as one asks the question : Do not the level of long run expectation change ? and what changes it ?. So far we have only a representation of the adjustment process of the level of capacity to a specific level of expectations. The concept of competition this implies is again that it is a stabilizing force which operates outside the very behavioral nature of capitalist's expectations. But it also implies a subordinated concept of competition because this only enters the picture as soon as the level of long term expectation is already given. Only then the forces of competition work themselves out through the system, creating a centre of gravity, i.e. a tendency tow ards a uniform rate of profit and a tendency of the growth rate of capacity towards the state of long run output which would correspond to a specific level of long run expectation.

c) **Short run theory of** effective demand **in** a **long run** setting

So far as the long run position of the economy is concerned it will be clear that it has to be characterized as an average result of the short run movements of the economy. What happens in the economy at each historical moment of time determine a moving long run pattern. Therefore it is neither the main theoretical object of a comprehensive economic theory nor a particular invariant position towards which the economy tends. Moreover, this very notion of a moving long term position has to incorporate the interrelationship between the behavior of social classes and the institutional structure of the systems.

Institutions provide the conditions for the possibility that a certain pattern of material allocation can be restored, enabling the system to reproduce itself. The regularity of its movements is explained by the forces which operate in the midst of the noncordinated behavior of the ruling class. Bounded up by the institutions capitalists through a competition process change the existing parameters of the structural system at each point of time creating in this away a moving long run position. This also means that at each point of time, a s p e c i f i c long run pattern can be envisaged, in correspondence to a definite technology and income distribution. This specific long run pattern only reflects the conditions required for the balanced growth of the economy with the mentioned parameters given, and it is a changing result of the actual reproduction of the economy (Nell, 1984).

Given distribution, one could argue that the level of investment corresponding to the normal level of capacity utilization entails the long term expectation of capitalists. Eatwell's new argument seems to imply this. On the one hand long term expectation would have to explain a certain level of the expected rate of return from capital assets and, on the other hand, the structural model would have to explain the general rate of profit corresponding to the balanced growth path. These two rates, for validating the long run position, must be forcibly equal, but in this case, the role of expectation would be theoretically useless.

The usefulness of expectations becomes only clear for understanding the moving long run position if it is linked to competition through its effect on the level of productivity and real wages. Only by this link, the ambiguity of the relationship between short and long run movements is eliminated : the long is a result of the short run historical time.

That link of expectations with competition also eliminates Keyne's assymetric treatment of these two categories (long run and short run) in relation to the actual generation of profits. «Having imputed to long - term surplus to durable capital goods only, Keynes opens the door to the ambiguous 'Neoclassical synthesis'» (Sylos-Labini, 1984, p. 162). Certainly, Keynes' argument about the extreme' precariousness' of long term expectations, and about the instability that they generate, as Sylos - Labini points out, is valid, but it does not solve the contradiction between his short run and long concept of profit. On the one hand, he argues that

> «the excess of the value of the resulting output over the sum of its factor cost and its user cost is the profit or,..., the income of enterpreneurs»(...). The entrepeneur's profit thus defined is, as it should be, the quantity,

which he endeavours to maximise when he is deciding what amount of employment to offer» (Keynes, 1964, pp. 23 - 24).

This is necessarily a short run concept. But on the other hand he introduces his notion of marginal efficiency of capital which must be inversely related to the quantity of the corresponding capital good (Keynes, 1064, chapter 17). Clearly, in this context, short run and long run concepts of profit are not coherently analysed in a common theoretical basis (Sylos - Labini, 1984).

But the most important point is that the incorporation of historical time into the analysis assigns to the long run position, at each p r e s e n t time, the sole role of being a setting for a short run analysis. Uhereas the rate of exploitation (and, thus, the level of real wages and productivity of real labor) together with the balance between sectors are matters of long run considerations, the actual level of employment and the principle of effective demand correspond to the short run analysis.

With regard to these Nell points out :

> «Short run is a moment of historical rime ; at the point when the period begins,.. ., there will exist a well defined level of productivity capacity». In other words, «at whatever moment of historical time ... the short period in question begins, it always has a well defined long period position functions as a benchmark or guide ; it is what is expected to hold in the future, and present investments were made because in the past these wagues, prices and profits were anticipated. But such bechnmark earnings are an. average ; they are not expected to hold every minutes. As with any form, fluctations around it can be expected In the short run therefore, deviations will take place (Nell, 1982, pp. 9, 10, 12).

It is clear that the long period position could function as a guide but only in relation to the short run fluctuations of demand. If long run variations in final demand, due to changes in the parameters through competition, create a moving long run position, that guide or benchmark must not be expected to hold all the time and short run variations in investment can also modify it. This possibility is theoretically justified, once the separation between the structural and behavioral analysis is eliminated by incorporating historical time.

Two conclusions can be derived from the foregoing theoretical reasoning :

(i) The theory of effective demand should be a theory of causes and consequenses of varying utilization of existing productive capacity, and

(ii) The analysis of the influence of demand on accumulation should be linked to the analysis of how the basic parameters of the economy change. The explanation of this change, in each short period for the following corresponding long run setting, should be thought as being condensated in the level and composition of final demand through the level of real wages and the possibility of technological innovations.

d) Policy conclusions

For a short development of the policy implication of the analysis, we have to be aware that the structural setting and the behavioral pattern in the economy are closely linked via their common variable, namely, investment. It is neither sufficient to neglect one or the other nor separate them with the implication that the behavior of the agents accomodate only to a structural system. In the contrary, we have developed a notion of structurally generated behavior, in which the purpose of the competitive railing class becomes an important determinant for the dynamic movement of key parameters in the economy. In this context we have introduced the concept of a second centre of gravity which moves over time and represents a structural setting only because its temporal location is thought to be a guide for the short run analysis.

This means that the object of economy analysis has to transcend the pure reconstruction of the structural setting and to introduce at each short period a discussion of the actual investment level as the catalyst for changes in the long term growth path. It is also clear that there is no reason to assume that this long term growth path will coincide with the long term growth of the labor force. Not only the level of long term demand but also the direction and composition of accumulation will not guarantee that the economy will be at a full employment level of labor if the stock of capital is fully utilised.

Given the high probability that social unemployment, in the short run and in the long run, will accompany the economic growth path, it becomes necessary for the state to intervene not only with respect to the maintainance of the produ-

ction and exchange conditions of the economy, but also with respect to the basic parameters of investment, namely, real wages and technology.

With respect to the first point the state provides a legallized institutional setting which counteract the erratic individualism of the behavior of the economie agents so as to smoother the effects of uncertainty on the decision horizon of the investors.

Concerning the last point the state must have roon to intervene into the structure of income distribution to affect via changes in consumption the level of investment. The direct influence of real wages through consumption on the investment level gives more theoretical sense to the Principle of effective demand (Nell, 1984a). The state has to intervene also into the development and the character of technological innovations to influence the direction and composition of accumulation and to soften technologically generated unemployment.

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