

THE SHORTCOMINGS OF KEYNESIANISM: The confusion between the rate of interest and profit

By

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Abstract

This paper is an endeavour to shed some light to the gaps and contradictions in the Theory that Keynes put forward. The Theory, far from being revolutionary, reiterated the neo-classical views on a number of issues, portrayed a distinct lack of an analysis of phenomena of profound significance such as Credit and put overwhelming emphasis on the rate of interest. Based on such a singularity, Keynes, using one Theory (that of the rate of interest), attempted to explain, both the rate of interest as well as profit, the driving force in capitalism. As a consequence, a great deal between the two was missing. (JEL: E21,22/D50, B20, 25).

1. Introduction

Can Economic Theory withstand the scrutiny of History? Did the Keynesian Theory in the 1930's really uncovered the reasons that render the capitalist system unstable, or did it simply recommend some "pain relief remedies to help the system survive one of its deepest crisis? We will attempt to answer these questions in this article.

One point we would like to make clear straightaway is that we will be referring to what Keynes himself actually wrote and said; not to the various 'interpretations', 'mis-interpretations' and 'improvements' to his Theory that his innumerable followers have put forward in the course of their careers between the 1930s and the 1960s. The irony, of course, is that after all the improvements and adjustments made to the original Keynesian Theory of the 1930s during the following thirty years or so, and when the Keynesians perhaps thought that they might have perfected the ideas of the 'master', Keynesianism ('improved' or otherwise) broke down completely in the late 1960s - early 1970s, not able to explain, for example, the co-existence of recession and inflation (i.e. rising unemployment and rising prices). By

re-examining the original Theory we will attempt to show that the flaw has always been there, related once more to the culprit that has always bedeviled the capitalist economies and economists: 'money' and its role in economic developments (or to speak more accurately, Money Capital and the role it plays in the economy). Another point to stress is that, contrary to popular belief, the so-called "...Keynesianism was virtually unknown in the interwar period..."¹ as Sweezy points out, especially in the countries where public expenditure and relief programmes were actually applied in large scale at the time, e.g. in the U.S. and Germany, as will be seen in detail later. The fact that Keynesianism became the undisputed champion of all Economic Theories by the 1950s, largely due to the war devastation, does not mean that this was also the case before the war. As Galbraith puts it, "...Keynesian Economics and policies before and after 1936 were not an act of Economic wisdom, but a... rationalisation of something politically inescapable... In anticipation of Keynes, his central prescription of Government Expenditure finance by borrowing and substantial deficits... were applied in the U.S.A. for 3 years of the New Deal... before the publication of the 'General Theory...'.²

In short, it is historically inaccurate to talk about a 'revolution' in Economics (and Politics) at that time, which was supposed to have been initiated in Cambridge by one person, as all text books assert. It would be more appropriate to consider State intervention in the economy as the product of a necessity of the times; as an attempt of the establishment in Economics and Politics, of which Keynes was certainly a prominent figure,³ to patch up the damage of 1929 and keep capitalism going. The History of the 1930s, from the U.S. to Nazi Germany clearly shows that unprecedented State intervention (only later called 'Keynesianism') had taken place before, or without the Keynesian Theory. In this sense, it was not the 'Theory that gave birth to the 'practice' as all modern sources suggest, but that the 'practice' was already there and in that sense it gave birth to the 'Theory'. Something that reinforces this view is the very fact, as will be seen in detail later, that 'Keynesianism' was not put into practice in Britain in the 1930s at all; where it was applied, e.g. in America and especially in Germany, the Keynesian Theory was unknown. The very fact, however, that Keynes was a major pillar of the capitalist establishment, openly committed to saving capitalism, soon caused him to be looked upon as a kind of worldwide godfather figure of State intervention; thus, something which in the first place was an outcome of economic and political necessity in World History,

was presented to future generations as being merely the result of the personal opinion of one individual.

1. The Rate of Interest

According to Keynes, one of the decisive factors that ultimately plays the role of creating equilibrium within the economic system is the interest rate. Some of his contemporaries were so impressed by this rediscovery of the interest/discount rate in Economics, that they went back to the 19th century literature and praised the writers who noted, possible connections between the interest rate and other economic variables. Morgan, for example, writing in 1942, found out that... "Tooke never made the step to show any connections between the quantity of money and the level of incomes... through the rate of interest and so he never comes as near to the modern view on this point as does Overstone..."⁴

Despite all the prestige surrounding the (re)discovery of the rate of interest, however, Keynes, was not quite clear about it from the start, as he acknowledges himself. To start with, in the *Treatise on Money* he is very enthusiastic about the (neoclassical) rate of interest put forward by Wicksell, the 'natural' rate of interest, which is supposed to equalize Savings and Investment and drive the system to equilibrium, where the 'natural' rate is equal to the market rate.⁵ Apparently, Wicksell attempted to 'rationalise' or 'theorise' about the distinct discrepancy between the Bank rate and the market rate that appeared in the second half of the 19th century". This discrepancy (which seems to be mystified in the *History of Economics* by the use of terms like 'natural', 'neutral' or 'equilibrium' interest rate by the neo-classical economists) was due to an inherent contradiction embodied in the discount rate. The monetary authorities after the 1844 Bank Act expected the interest rate to play two distinct and often (e.g. during the occurrence of 'external' or 'internal' drains) contradictory roles: to regulate the value of the pound in foreign exchanges, since it was tied to the gold bullion of the Bank and, at the same time, to regulate the demand for and supply of Money Capital through the volume of discounts in the internal market.

Keynes simply repeats Wicksell's view about the 'disequilibrium' between the 'natural' and the market rate, and asserts that the Central Bank should attempt to equate the two, "...although we have to concede that this is not always practicable over short periods, because the natural rate sometimes

fluctuates to an extreme degree."⁶ In short, Keynes retained the idea of his predecessors about the existence of two different rates of interest, without being able to explain their divergence and the reasons that make the 'natural' rate fluctuate 'to an extreme degree'; an indeterminacy that has been criticized by modern writers.⁷ As we will find out later, the reason that he was not in a position to explain the sharp ups and downs in the interest rate(s), was the fact that he overlooked the profound effects that a crisis and the ups and downs of the cycle have had on the economy.

Six years after the *Treatise*, when unemployment became the issue of the day in the advanced capitalist countries, Keynes asserted in the *General Theory* that he has changed his mind. "In my *Treatise on Money* I defined what purported to be a unique rate of interest, which I called the 'natural rate'... I am no longer of the opinion that the concept of a 'natural' rate of interest, which previously seemed to me a most promising idea, has anything very useful or significant to contribute to our analysis. If there is any such rate of interest which is unique and significant it must be the rate that we might term the 'neutral' rate of interest, namely the 'natural' rate in the above sense which is consistent with full employment, ...though this rate might be better described, perhaps, as the 'optimum' rate..."⁸

This plethora of basically neo-classical terms about the interest rate, modified and used by Keynes, seems to imply in the final analysis, one basic premise common in both Schools of Thought: that there is an 'ideal' interest rate which, automatically (in the case of the neo-classical Economics), or through a wise monetary policy (in the case of the Keynesian Economics) would drive the economy towards full employment, i.e. an interest rate which is 'compatible with full employment equilibrium'. Otherwise, as Keynes put it, "... the rate of interest may fluctuate for decades about a level which is chronically too high for full employment..."⁹ The superficiality of speaking on such terms, which conceal instead of revealing the real forces involved, has been repeatedly demonstrated during and after the crises in capitalism, including the 1930s depression: there is no such 'optimum' level of interest rate which can have any significant effect, or drag capitalism out of a recession, let alone help the system achieve full employment, simply because the recovery (e.g. the recovery of investment) is not related to the rate of interest, as these traditional Theories suggest. The persistence of very low interest rates all the way through the 1930s with no positive repercussions on the economy was eventually acknowledged by Keynes himself when he witnessed, along with a number of his contemporaries,¹⁰ the impossibility

of achieving a recovery through manipulation of the interest rate (which, in fact, was at its lowest, as it has always been after a crisis). Keynes: "...as seems unlikely that the influence of banking policy on the rate of interest will be sufficient by itself to determine the optimum rate of investment... For my own part I am now somewhat sceptical of the success of a mere monetary policy directed towards influencing the rate of interest..."¹¹.

In fact, History strikingly shows that the capitalist borrowed heavily and were happy to pay the high interest rate during the boom, but did not borrow when the rate of interest was very low during long recessions. In this sense History seems to demonstrate that the rate of interest itself was not of primary importance to decisions about expansion or contraction of investment; or, in other words, the rate of interest itself tells us little about the inner workings of the capitalist system. This was true not only in the long run, but in the short run too, since, for example, decisions to expand during the boom were taken on the basis of months rather than years. Thus, it should not come as a surprise to our readers, when Government Committees, like the Radcliffe Committee of 1959, "...was content with the view of big industrialists that of all the factors that influenced their decision to spend [i.e. invest], the rate of interest was the least important..."¹². In short, it seems that one has to move away from the interest rate and consider profit (something incidentally which is created in the sphere (process) of production, not in the sphere of 'money'), as the exclusive factor that drives the system forward; then the situation becomes clear: in the former case (high interest rate) the capitalist wants to pay it, despite the fact that it is high, precisely because he thinks that he will receive a high return (profit) from his Capital; in the latter case (during a recession), despite the fact that the interest rate is low, he cannot afford it, since most of the businesses contract or go bankrupt and profit is low or non-existent.

But there is a more important aspect of the 'Theory of interest of the neoclassical and Keynesian Schools that concerns us here. Keynes seems to have continued the neo-classical tradition of taking the interest rate as being equal to the return of Productive Capital. This is in contrast, of course, to the classical Theory that appropriately considers the rate of profit as the return of Capital. Smith, Ricardo, J.S. Mill and others clearly distinguished between the rate of interest, the return of Money Capital, and the rate of profit - the return of Capital proper considering the former as part of the latter. As few modern writers point out, "...when the classical approach was abandoned at the end of the 19th century with the development of the

neo-classical Theory, it was argued that the rate of interest was determined by the same real forces as the rate of profit... The two were considered equal,... therefore the analysis of the relations between the two rates gradually lost its importance...".¹³

In fact Keynes quotes the definitions that many leading neo-classical authors give to the interest rate being the return of Capital, in order to show that they are similar to his definition; he also uses another very neo-classical concept, the marginal efficiency of Capital: "...Take for example the following passage from A. Marshall's Principles: Interest, being the price paid for the use of capital in any market, tends towards a equilibrium level such that the aggregate demand for capital in that market at that rate of interest, is equal to the aggregate stock forthcoming at that rate... Professor Carver's Distribution of Wealth clearly envisages interest as the factor which brings into equilibrium the marginal disutility of waiting with the marginal productivity... Professor Taussing states that the rate of interest settles at a point where the marginal productivity of capital suffices to bring out the marginal instalment of saving... [Also] the definition I have given [on the 'marginal efficiency of capital'] is fairly close to what Marshall... means by 'marginal net efficiency' of a factor of production; or alternatively, the 'marginal utility of capital'. [And] Professor Irving Fisher has given in his *Theory of interest* (1930) a definition... which is identical with my definition... Nor is there any material difference, relevant in this context between my schedule of marginal efficiency of capital contemplated by some of the classical [he means neoclassical] writers who have been quoted above... All these points of agreement can be summed up in the proposition... that the current rate of interest must lie at the point where the demand curve for capital... cuts the curve of the amounts saved out of the given income... The significant conclusion is that the output of new investment will be pushed to the point at which the marginal efficiency of capital becomes equal to the rate of interest...".¹⁴

This idea of the rate of interest being equal to the return of Capital, which has been criticised by a few of his contemporaries,¹⁵ sounds remarkably similar to the view expressed by the theorists of the 'Currency School'. Keen to identify the return on money with that on Capital, the 19th century Quantity Theory supporters devised what seems to have become the longest lasting confusion in the History of Economic Theory: the identification of the rate of interest with the return of Capital, based on the narrow-minded banking perception of Capital in Economics. This equalisation became a

myth that was perpetuated by the neo-classical Theory all the way through the later part of the 19th century and as we can see Keynes unduly repeats this confusion, which today as then flies in the face of two centuries of History. The discovery that interest should be separated from profit was made by Mussey and subsequently by Hume, not accidentally in the middle of the 18th century, i.e. a time in History when interest bearing Capital assumed an independence against industrial Capital; this is "...the best proof that interest is just one part in the gross profit and that such a discovery was actually needed..." at that time, as Marx puts it, arguing against the vulgar Economics of Overstone and Co.¹⁶

The important thing to notice, as far as Keynesian Economics is concerned, is that Keynes did not break but kept the long 'Classical' tradition on this matter by asserting that, at the end of the day, the return of Capital, i.e. the marginal efficiency of Capital, would be equal to the rate of interest.¹⁷ Such an assertion inevitably put him on a tightrope of past History that eventually forced him to go as far as arguing that profit is actually zero: "...an equilibrium, therefore, when investment = savings, aggregate profits must be zero..."¹⁸ This is not only happening in 'Theory', as one might think. Not at all: "...It is important for the reader to appreciate that the essential characteristic of profit in that its having zero value is the usual condition in the actual world of today for the equilibrium of the purchasing power of Money..."¹⁹ Despite the popularly held belief about the sophistication of the Economics of Keynes, his Theory simply bans profit in capitalism. The interest rate in Japan, for example, which is one of the most dynamic capitalist economies, has always been very low; in the 1990s, in fact, interest rates in Japan have been virtually zero. Capitalism would not have been able to survive, let alone flourish, under such conditions. Generally speaking it seems ironic and contradictory that the cream of capitalist economists in the 19th and 20th centuries, from D. Ricardo to A. Marshall and J.M. Keynes, focused so much on the rate of interest²⁰ and ignored profit that has always been the essence of capitalism, a system which they were supposed to have analysed and explained.

But there are some more controversial ideas about the past and the future, if one bothers to critically re-examine the General Theory and question the validity of 'capitalist' Economics, as it has been portrayed by perhaps the greatest capitalist economist Keynes actually predicts the disappearance of the money capitalist in Britain: "...interest today rewards no genuine sacrifice, any more that does the rent of land. The owner of the

Capital can obtain interest because Capital is scarce. But whilst there may be intrinsic reasons for the scarcity of land, there are no intrinsic reasons for the scarcity of Capital.... I see, therefore, the rentier aspect of capitalism as a traditional phase which will disappear when it has done its work through the quiding influence of the state. It will be nothing sudden in Great Britain and will need no revolution. Thus we might aim in practice (there being nothing in this which is unattainable) at an increase in the volume of Capital until it ceases to be scarce, so that the functionless investor will no longer receive a bonus... I conceive, therefore, that a somewhat comprehensive socialisation of investment will prove the only means of securing an approximation to full employment. But beyond this, no obvious case is made out for a system of state socialism which would embrace most of the economic life of the community... Above all, individualism, if it can be purged of its defects and its abuses, is the best safeguard of personal liberty in the sense that, compared with any other system, it greatly widens the field for the exercise of personal choice..."²¹

He also praises an unknown writer, Silvio Gesell, who happens to agree with him on most of the above issues and not least because he happens to be antimarxist; as people like Joan Robinson point out, Keynes was distinctly biased against Marx.²² That is why, perhaps, Keynes pays a great tribute to "...the unduly neglected prophet Silvio Gesell (1862-1930), a successful German Merchant, whose work contains flashes of deep insight... The purpose of his book as a whole may be described as the establishment of an anti-marxism socialism... built on theoretical foundations totally unlike those of Marx, in being based on a repudiation, instead of on an acceptance of the classical hypotheses, and on unfettering of competition instead of its abolition. I believe that the future will learn more from the spirit of Gesell, than from that of Marx... Gesell points out that the rate of interest is a purely monetary phenomenon and that the peculiarity of money, from which flows the significance of the money rate of interest, lies in the fact that its ownership involves the holder of negligible carrying charges... He argues that the growth of real Capital is held back by the money rate of interest and that if this brake were removed, the growth of real Capital would be, in the modern world, so rapid, that a zero Money rate of interest would probably be justified... within a comparatively short period of time..."²³

As all Keynesians would probably testify today, no such annihilation of the role of interest and no disappearance of money capitalists has occurred; on the contrary, most contemporary Keynesians would probably argue that

banks and financial institutions are more powerful now than they were 60 years ago. In any case, one would be entitled to comment on the above rather far fetched predictions by arguing that Keynes seems to be the first great 'Utopian capitalist' of the modern era, someone who would like to abolish only certain 'bad' (but indispensable) aspects of capitalism, but, at the same time, preserve the capitalist system itself. His idea, in this respect, reminds us of the view expressed by another great Utopian author: it sounds like the mirror image of the ideas of Proudhon, who wanted to abolish the capitalist system by simply abolishing the money capitalist.²⁴

2. Savings = Investment

We will examine a few more aspects of the Theory of interest and see how they fit in with the rest of the Keynesian system, e.g. the speculative demand for Money, later, discussing the role of money and Credit. At this stage we would like to comment on the celebrated equality between savings and investment, which has been taken for granted by both the neo-classical and Keynesian Theories.

In the neo-classical 'model', the equalisation between savings and investment is done automatically, since investment is the demand, savings the supply of 'Capital': the forces of demand and supply assure equilibrium and determine the interest rate, the return of 'Capital'. Beyond that, as some modern writers point out, "...the neo-classical authors rarely conducted a detailed analysis of the process by which savings are turned to... investment; they derived this from their general idea that prices of productive services are determined by equilibrium between Demand and Supply..."²⁵ Keynes idea in the General Theory is basically similar, although he makes an attempt to explain why savings should equal investment over a period of time, basically a year: "...Whilst, therefore, the amount of saving [the supply of 'Capital'] is the outcome of the collective behaviour of individual consumers and the amount of investment [demand for 'Capital'] is the outcome of the collective behaviour of the entrepreneurs, these two amounts are necessarily equal, since each of them is equal to the excess of income over consumption... in short, $\text{income} = \text{consumption} + \text{investment}$, $\text{savings} = \text{income} - \text{consumption}$, therefore, $\text{savings} = \text{investment}$... Experience shows that there are habits of psychological response which allow an equilibrium to be reached at which point the readiness to buy [demand] becomes equal to the readiness to sell [supply]. That there should be such a thing as a market value for output is, at the same time, a necessary condition for money-income

to possess a definite value and a sufficient condition for the aggregate amount which saving individuals decide to save to be equal to the aggregate amount which investing individuals decide to invest..."²⁶

At the end of the day though, the equalisation is achieved through the automatic and inexplicable tendency that underlines the neo-classical Theory. In a few words, the $S=I$ equation seems to be an axiom which is taken for granted by Keynes as well.²⁷ In fact, he strongly criticises authors like Robertson, who suggested inequality between savings and investment: "...Mr. Robertson's auster view... flows from the belief that in a boom, investment tends to outrun savings and higher rate of interest will restore equilibrium by cheking investment on the one hand and stimulating savings on the other. This implies that saving and investment can be unequal and has, therefore, no meaning..."²⁸ He also criticises people such as Professor Hayek who, through the idea of 'forced savings', implied that savings and investment are not equal: "...The prevalence of the idea that Savings and investment, taken in their straightforward sense, can differ from one another, is to be explained, I think by an optical illusion... It is supposed that... the banking system can make it possible for investment to occur, to which no savings corresponds... If it is the banking system which parts with an asset, someone must be parting with cash. It follows that the aggregate saving of the first individual and of others taken together must necessarily be equal to the amount of current new investment... The above harmonises the liberty that every individual possesses to change the amount of money that he holds with the necessity for the total amount of money to be exactly equal to the amount of cash which the banking system has created... This indeed is the fundamental proposition monetary theory..."²⁹

This is, of course, a very unrealistic view of History that ignores the role and significance of Credit and it rules out the possibility of what is called 'Credit creation' ever occurring in capitalism. But in actual fact the experience of all major crises ever since the end of the 18th century illustrates the exact opposite: due to the dubious role of 'paper Credit' operating through the banking institutions, there has regularly been an imbalance between savings and 'money' lent to business. In the upper cycle, lending always increased disproportionately to the amount of savings possessed by the banks, through an inflation of Credit, This was forced into the open during a crisis when a panic 'resort' to cash occurred, with the realisation that the money savings were not enough to face the Credit obligations undertaken by the banking institutions, hence the cumulative wave of bank

failures. This was apparently the reason that several of Keynes', contemporaries (e.g. Professor Ohlin, Hicks and others) pointed out to him that he completely ignored the role of Credit/finance in his Theory. Thus, two years after the *General Theory*, in an article in the *Economic Journal*, Keynes acknowledges the criticism and he seems to argue to opposition to what he says in the *General Theory*. "...'Finance' and 'commitment to finance' are mere credit and debit book entries for the bank, which allow the entrepreneurs to go ahead with assurance... Credit in the sense of finance looks after a flow of investment, it is a revolving fund which can be used over and over again. The same 'finance' can tackle one investment after another... I have no objection to admit that Demand for Credit is one of the factors influencing the rate of interest..."³⁰

We will deal with the 'demand for Credit' below, because such a late admission fundamentally alters the forces which are supposed to determine the rate of interest in conjunction with the 'speculative demand' for money in the Keynesian Theory. At this stage we would like to conclude on the above by pointing out that it is precisely this 'revolving fund' that swells investment in the upper cycle (when profits are high and accumulation proceeds at an accelerated pace), thus 1) making investment disproportionate to savings and 2) making the entire system 'inflated' and potentially unstable. Therefore, the alleged equality of savings with investment, which lies at the heart of both the neo-classical and Keynesian systems (and in that sense, again, Keynes tends to perpetuate the ideas of his predecessors), seems to be another legendary myth, a Pandora's box in the History of Economics: during the boom, investment is higher than savings and during a slump, when social savings stagnate in the hands of banking institutions, savings are higher than investment. In short, as Joan Robinson point out, '...Marx showed that it is not logically impossible to conceive of steady accumulation taking place [i.e. $S=I$] but held that in the crude conditions of capitalist production, it would do so only by accident...'"³¹

Indeed, the experience of the capitalist economies since the last century shows that such a steady accumulation, whereby all the social surplus automatically finds its way to productive investment (so $S=I$) is highly unlikely. Over long periods of time, as the case of British capitalism in the 19th century and the Japanese in the 20th century showed, savings exceed investment and the excess gradually gravitates in the hands of the banking and financial institutions. This excess 'hoard' of the economy as a whole, something that the Keynesian Theory would consider a drawback and cannot

account for, is the gradual augmentation to interest bearing Capital that accumulates, in parallel with the real accumulation of Productive Capital and makes savings exceed investment ($S>I$).

If we attempt to see the workings of the: system in terms of the overall Keynesian logic, however, the equalisation of savings and investment is indeed inevitable. It follows from the others erroneous assertion of the Keynesian Theory that we have studied above, Keynes asserts that interest (r) which is the return of savings, is ultimately equal to the marginal efficiency of Capital (MEC), the return of investment. In other words, the return of savings is equated to the return of investment:

$$r = MEC$$

$$(S) \quad (I)$$

Thus, if the two returns of the 'factors' are ultimately equal, it seems 'logical' to assume that the two factors themselves are equal-hence $S=I$. In short, the equality between the 'factors' can be deduced from and goes hand in hand with the alleged equality between their returns. The problem, as we will see in more detail later, is that instead of having two separate Theories, Keynes has one Theory that attempts to explain two different things 'money' (by that, sometimes he means cash and sometimes Money Capital) and Capital proper.

3. (Absence of) Theory of Crises in Keynes

Before we come to the discussion of money and Credit we will refer to the Theory of crises in the Keynesian system, since his Theory has appeared during and it was always associated with the greatest crisis in the history of capitalism, the 1929 crisis and the Depression that followed.

Contrary to the commonly held view, Keynes says very little about the Theory of crises in general and about the 1929 crisis in particular. It may sound remarkable, but those who bothered to study Keynes closely, soon realised that in his works he tends to ignore the severe repercussions of the 1929 crisis, which are supposed to have been eliminated by the application of his Theory. Only in the very last part of the *General Theory*, and only in one Chapter (Chapter 22), in a Section that looks like an Appendix, Keynes says a few things on the subject. (The Section is called 'Short Notes suggested by the G.T.'). He does not even talk, in fact, in terms of a crisis

(the word crisis appears only a few times and it is always in inverted commas). Keynes prefers to talk in terms of 'fluctuations in the M.E.C. and the marginal propensity to consume'.³² In short, he makes a conscious effort, unlike most of his contemporaries to underrate the importance of the 1929 crisis and the upheaval it caused in capitalism worldwide in the 1930s. He even denies a possible occurrence of over-production/over-investment in the late 1920s. This is summary of his views:

"...Let us recur to what happens at the crisis. So long as the boom was continuing, much of the investment showed a not unsatisfactory current yield. The disillusion comes because doubts suddenly arise concerning the reliability of the prospective yield... If current costs of production are thought to be higher than they will be later one, that will be a further reason for a fall in the marginal efficiency of Capital. Once doubt begins, it spreads rapidly... The interval of time which will have to elapse before the shortage of Capital through use, decay and obsolescence causes a sufficiently obvious scarcity to increase the marginal efficiency... Unfortunately a serious fall in the latter also tends to affect adversely the propensity to consume. For it involves a severe decline in the market value of stock exchange investments, especially if they are employing borrowed funds... With a 'stock-minded' public as in the U.S. today, a rising stock market may be an almost essential condition of a satisfactory propensity to consume; and this circumstance, generally overlooked until lately, obviously serves to aggravate still further the depressing effect of a decline in the M.E.C... The preceding analysis may appear to be in conformity with the view of those that hold that over-investment is a characteristic of the boom [and] that the avoidance of this over-investment is only possible remedy for the ensuing slump... To infer these conditions from above, would, however, misinterpret my analysis; and would, according to my way of thinking, involve serious error... According to my analysis the boom can be said to be characterised by... investment made in conditions which are unstable and cannot endure, because it is prompted by expectations which are destined to disappointment... The boom leads, that is to say, to misdirected [his italics] investment... Thus the remedy for the boom is not a higher rate of interest, as some suggest, but a lower rate of interest! [his exclamation mark]. For that may enable the so-called boom to last. The right remedy for the trade cycle is not to be found in abolishing booms and thus keeping us permanently in a semi-slump, but in abolishing slumps and thus keeping us in a quasi-boom..."³³

In the Treatise, his view of the 1929 U.S. crisis is equally questionable: "...Thus I attribute the slump primarily to the deferred effects on investment of the long period of dear money which preceded the stock-market collapse..."³⁴ No wonder that even some Keynesians acknowledged that "...Keynes virtually ignored the historical impulse itself..."³⁵

One wonders how Keynes, with the rather one-sided views like the above, can be considered to be the most prominent Depression analyst of all times. His analysis, or rather lack of analysis of the crisis, is probably a consequence of his simplistic view of the past: "...During the 19th century, the growth of population and of invention, the opening-up of new lands, the state of confidence and the frequency of war over the average of (say) each decade seem to have been sufficient to establish a schedule of the marginal efficiency of capital, which allowed a reasonable satisfactory average level of employment to be comparable with a rate of interest high enough to be psychologically acceptable to wealth-owners. There is evidence that for a period of almost 100 years the long run [?] typical [?] [our question marks] rate of interest was about 5%... (3% for gilts) and that these rates of interest were modest enough to encourage a rate of investment consistent with an average of employment which was not intolerably low... Today and presumably for the future the schedule of the marginal efficiency of Capital is, for a variety of reasons, much lower than it was in the 19th century..."³⁶

It is views like the above that made a few writers point to the fact that "...Keynes was quite a Historical³⁷ in his outlook as a scholar..."³⁸ Even some of his staunchest contemporary supporters in Cambridge lately, apparently concerned with the lack of a successful analysis of crises by Keynes acknowledge that "...it may be argued that Keynes was not concerned with crises theory at all..."³⁹ Generally speaking, as Joan Robinson pointed out, all traditional Theories seem to be unable to explain the subsequent phases of depression and recovery: "...In these theories I have the impression that the weakest Chapter is always the one which treats the revival from the depression... It seems to me that the most plausible theory of the revival is Mr. Micawber's: given time, something will turn up..."⁴⁰

But let us try to understand why Keynes did not want to admit the obvious concerning over-accumulation and over-production in the U.S. in the 1920s, which was distinctly noticed by the majority of his contemporaries. The reason was that, according to his Theory, over-investment/over-production is related to full employment; i.e. it cannot occur unless and until the

economy reaches full employment, another rather neo-classical idea. "...In the United States, employment was very satisfactory in 1928-9 on normal standards; but I have no evidence of a shortage of labour. Some bottlenecks were reached, but output as a whole was still capable of further expansion. Nor was there over-investment in the sense that the standard and equipment of housing was so high that everyone, assuming full employment, had all he wanted; and that the transport, public services and agricultural improvements had been carried to a point where further additions would not reasonably be expected to yield even their replacement cost. Quite to the contrary. It would be absurd to assert of the U.S. in 1929 the existence of over-investment in the strict sense..."⁴¹

That is, the denial of over-production and the attempt to underrate the importance of the 1929 crisis, all boil down to the fact that the Keynesian Theory would not allow a crisis due to over-production to occur before 'full employment' is reached, since over-production would have meant an 'over-full employment equilibrium'. However, as many years of experience demonstrate that over-production did occur in all previous crises which interrupted a boom, long before 'full employment' was reached. As Marx concludes on one of the mid-19th century crises, "...the self-interested blindness of the industrialists and merchants, who were resolved not to notice any over-production - this was all nonsense and an impossibility, said the vulgar economists! - all this finally brought about the mental confusion that allowed the Currency school to translate their dogma into practice on a national scale..."⁴²

There is, however, another aspect related to the Keynesian Theory of crises. Keynes is very keen to stress the importance of 'under-consumption' in the economy which may lead to crises. In fact, the only authors that he praises are those few who, over the years (or indeed over the centuries), mentioned thrift or under-consumption, as a possible source of a disturbance, e.g. "...Bernard Mandeville gave great offence by this book (Fable of the Bees), a book convicted as a nuisance by the Grand Jury of Middlesex in 1723, ...in which a cynical system of morality was made attractive by ingenious paradoxes... His doctrine that prosperity was increased by expenditure rather than by saving, fell in with many current Economic fallacies not yet extinct..."⁴³ He, inevitably, praises Malthus for his studies of under-consumption and also Hobson for his *Physiology of Industry* in 1889, "...the first and most significant of many volumes in which for nearly fifty years Mr. Hobson has flung himself with unflinching, but almost unavailing, ardour and courage against

the ranks of orthodoxy. Though it is so completely forgotten today, the publication of this book marks, in a sense, an epoch in Economic Thought..."⁴⁴ Keynes, however, does not accept Hobson's Theory in its entirety, because apparently Hobson makes the 'mistake' of incorporating 'overinvestment' into his system: "...Nevertheless, his Theory failed of completeness essentially on account... that Mr. Hobson laid too much emphasis (especially in his later books) on under-consumption leading to over-investment..."⁴⁵

But this is precisely one of the points on which the Keynesian Theory seems to fail on completeness: the notion of 'under-consumption', i.e. the imbalance between consumption and production, makes sense only if it is seen in the context of, and in reference to over-investment/over-production. But Keynes, especially in the case of the 1929 crisis, seems to focus exclusively on under-consumption and overlook the undeniable over-production aspect of the 1929 disturbance. In any case, it seems very unfair to treat 'Marxists' (of all kinds) and 'Keynesians' with two completely different sets of rules: when the Marxists mention a possible imbalance between consumption and production in the sense of a shortage of consumption, they are quickly dismissed as 'under-consumptionists'. When the Keynesian Theory mentions the same, it becomes the single biggest contribution to the History of Economic Thought. In this sense, Schumpeter was completely wrong when he called Rosa Luxemburg 'the Queen of the underconsumptionists'; he should have reserved that comment for Keynes.

4 (Absence of) Theory of Credit and Capital in Keynes

Credit has been either ignored or considered a benevolent force in capitalism by Keynes, although most of his predecessors and contemporaries did notice the destabilising influence that Credit has had on the developments. Alfred Marshall, for example, saw the "...sole effective remedy for unemployment due to depression as lying in the greatest possible restriction of reckless inflations of credit which were the chief cause of all economic malaise..."⁴⁶ Also Robertson pointed out that "...Credit is guilty of disastrous excesses and grave crimes..."⁴⁷, and suggested that attempts should be made to check Credit for the sake of economic stability. Such views, irrespective of whether or not they could have been implemented, are dismissed by Keynes outright: "...I conclude that the stability that Mr. Robertson suggests should not be given preference to the oscillations of the Credit cycle... New borrowers should at times be given an opportunity of resources by the community... if progress is to proceed..."⁴⁸

This kind of view, expressed in the 1930s in the *Treatise* and coming at a time when the abuse of Credit in the speculative Stock Exchange crash in the U.S. and its repercussions were universally acknowledged, did not apparently go down well and revived an interest in the role of Credit.

Let us consider first the reason that made Keynes leave Credit, an important 'monetary factor' as he calls it, out of his Theory. It seems that he has ignored Credit right from the outset because, as he claims, it is a factor unlike money, which cannot be 'controlled': "...Experience under war finance and during the post-war monetary inflations [1920-1]... has led everyone today to lay a more equal stress on the relative importance of the other monetary factors. Nevertheless the total quantity of Money remains, if not an overruling factor, at least in the long run a dominant one - and of exceptional practical significance, because it is the most *controllable factor* [his italics]. Let us therefore, proceed to a determination of the causes governing the total quantity of Money..."⁴⁹ It is not surprising therefore, as we shall argue below, that following this path Keynes ended up with a Theory of money which was ultimately based on the 'Quantity Theory'.

No wonder that his contemporaries pointed out to him that the role of business finance is completely missing in his Theory. Thus, in the article in the *Economic Journal* we referred to earlier, he finally refers to 'finance' or the 'commitment to finance' and implicitly acknowledges that individuals, and especially businesses, do not operate in a creditless world: "...Credit in the sense of finance looks after a flow of investment. It is a revolving fund which can be used over and over again... (and not only once as Professor Ohlin suggests)... and have no objection to admit that demand for credit/finance is one of the factors determining the rate of interest. For finance constitutes an additional demand for liquid cash... It is in a literary sense a demand for Money..."⁵⁰ Even this late admission of the obvious, however, is not quite accurate. The last sentence would have been more accurate if it had read: "... it is in a literal sense *the demand* for Money..." From the days of the *Treatise on Money*, Keynes has used all the latest (1920s) information, statistics, and tables in order to show that actual cash ('State money' as he calls it) is only a small fraction of the overall 'Current money', because the majority is composed of 'Bank money' based on deposits. In the U.S. for example, according to his statistics, bank deposits in the mid-1920s amounted \$25,257 million as opposed to \$3,777 million of cash/State money ('circulation'). Thus, "...if we include time-deposits, we find that State money held by the public in the U.S. is less than 10% of Current money..."

In Britain, if we include fixed deposits, money held by the public in less than 10%, as in the U.S...."⁵¹

This clearly illustrates that ever since the 19th century, all kinds of Economic Theories seem to have misplaced the importance of economic phenomena by exclusively focusing on the 10% (the 'State money' and ignoring the importance of the rest 90% of 'Current money' as Keynes calls it, the 'Bank money', i.e. the Bank Credit. An additional factor that made Bank Credit more, not less, important in the 20th century was the fact that time deposits had been increasing at the expense of demand deposits. In the U.S., for example, time deposits from 23% in 1918 reached 42% in 1928; as Keynes himself notices, "...the growth of time deposits in the Federal Reserve Systems... made possible the great increase in the loans and investments of the Member Banks... The upward tendency of the ratio of time to demand deposits has been more or less the same in direction and in amount in the U.S. as in Great Britain..."⁵²

The admission by Keynes that he would not object that the demand for Credit should be a part of the overall demand for money came too late, it seems, to alter the backbone of his Theory. Indeed, in his famous 'liquidity preference' Theory, the total demand for money is exclusively composed of the various motives for holding cash, with no reference to 'Credit money' whatsoever. The transactions and precautionary motives of individuals are certainly referring to holding cash.⁵³ Even more strangely, there is no mention of Credit in the world of business: "...The Business motive: similarly, cash is held to bridge the interval between the time of incurring business costs and that of receipt of the sale proceeds; cash held by dealers to bridge the gap between purchases and realisation being included under this heading. The strength of this demand will chiefly depend on the value of currency output..."⁵⁴ It is striking that Keynes completely ignores what has always been pointed out since the times of Henry Thornton and Thomas Tooke: that the vast majority of business transactions are carried through Bank Credit, not money/cash. Also the last, so-called 'speculative motive', which is mainly referring to the purchasing of securities on the stock market, is erroneously considered as being part of the 'demand for cash'. But this, once more, does not square with all the evidence of the time. It was mainly borrowed money through inflated Credit, not cash, that produced the speculative bubble in 1929.

In short, the entire 'liquidity preference Theory' in its wisdom is referring exclusively to 'cash', i.e. to 'State money' or 'circulation' which then was only 10% of the total 'Current money'; the role of the remaining 90%, i.e. 'Bank money' - Bank Credit, is missing in the Keynesian Theory. Despite the popular view that Keynes was the first to construct a complete Theory of money, he seems to have ignored the largest part of the 'demand for money' (the way he defines money), that is, the part that has to do with the demand for money for business.

An important consequence of such a gap in the 'liquidity preference' Theory, is that the rate of interest is exclusively fixed by the strength of the demand for cash ('circulation') for the above motives, something that takes Keynes back to the old Quantity Theory. A more objective approach, however, as we pointed out in our previous work,⁵⁵ should distinguish between cash, which is part of circulation of money- and Money Capital, which is part of the circulation of overall Capital. Overwhelming historical experience shows that the rate of interest does not have much to do with money/cash, but it is determined by the demand for and the supply of 'Bank' or 'interest bearing' Capital. The latter includes all the Money Capital that businesses borrow from Banks through Credit and also and forms of Money Capital invested in private or public securities. In Keynes Theory, the only part which is related to 'Bank' Capital through the interest rate, is the part of money/cash which is channelled towards speculation through the 'speculative motive'. So, even if one attempts to argue that the liquidity preference Theory does take into account what we called 'interest bearing' Capital, the point is that a large part of the latter is unaccounted for in the Keynesian scheme: the part, which is in fact the largest part, that corresponds to Money Capital borrowed by business from Banks through Credit, the 'legitimate part', (although it is clear that the rate of interest is determined by the influence that both parts, the 'legitimate' and the 'speculative', exert on the so called 'money market'). In other words, it seems that there is only room for speculation in the Keynesian Theory, which nevertheless is 'harmless', precisely because it takes place exclusively through cash, not Credit.

To conclude: In the Keynesian scheme, as in the case of various monetarists' Theories, the overwhelming emphasis is once more put on cash/money; although this is done in a 'sophisticated' (or rather complicated) way, the implications and the outcome, in terms of the determination of the interest rate, for example, are the same: "...My theory of the rate of

interest might be expressed that the interest rate serves to equate the demand and supply of hoards, i.e. it must be sufficiently high to offset increase in propensity to hoard relatively to supply of idle balances... An increased propensity to hoard increases the rate of interest...."⁵⁶ Or more clearly, "...the rate of interest and the price of bonds have to be fixed at the level at which the desire on the part of certain individuals to hold cash (because at that level they feel 'bearish' of the future of bonds) is exactly equal to the amount of cash available for the speculative motive..."⁵⁷ The only time that he comes near to including 'Bank money' (or Bank Credit/Capital in our terms) in his liquidity Theory, is through the 'speculative motive', which nevertheless involves only a small part of the overall Bank Capital, the part channelled to speculation on securities.

In short, Keynes 'liquidity Theory' seems to put together different things instead of separating them: under the heading of 'demand for money', his Theory means cash, i.e. money proper, in the cases of the first three motives, but (Bank) Capital in the case of the 'speculative motive'. At the same time his Theory of 'money' separates when it should relate: investment in bonds is only part of the overall business investment to which the 'demand for money' is related; his Theory of 'money' is connected to the former kind of investment, but ignores the significance of the more important Business Investment.

In the final analysis, all this is apparently happening because Keynes has only one Theory on which he puts all his hopes, attempting to explain two different things: part of his 'liquidity preference' Theory belongs to money and part of it belongs to Money Capital, with a great deal missing between the two. Or to put it in another way; Keynes' Theory seems to confuse the role and the functions of money with those of (Money) Capital. Thus the Theory of 'demand for money' sounds like a vague generalisation and is used as a blanket term which attempts to describe all "monetary" factors under the heading of money, a legacy of the early decision by Keynes to leave out other 'monetary' factors like Credit and deal only with one 'controllable' (and safe) factor- money. In this sense, Keynesianism coincides with the Quantity Theory of money and ultimately acknowledges that the latter constitutes the corner-stone of traditional Economic Theory. This is the reason why we tend to imply in this study that, in the final analysis, the Quantity Theory has rendered Economics an endless tautology.

Notes

1. "Keynesians and Government Policy 1933-9". Cited in Bernstein *The Great Depression*, 1987, p. 226.
2. For details see "History of Economics", 1982, p. 226.
3. Kindlerberger C.P., "The World in Depression 1929-1933" (1973), seems to stress the significance that Keynes' personality as top civil servant and acquaintance with the Prime Ministers Lloyd George and Ramsay MacDonald and the Chancellor Winston Churchill has had in the success of his Theory (op. cit., pp. 18,23, 29-30 and 126). Galbraith also points out that "...had the General Theory come from someone who lacked Keynes background and reputation, it might well have sunk without trace..." p. 228).
4. E.V. Morgan "The Theory and Practice of Central Banking 1797-1913", p. 123.
5. See Vol. 1, pp. 207-8.
6. op. cit, p. 159.
7. P. Samuelson in his "Economics" points out that Keynes has been criticised on the question of why and how the "expected" interest rate diverges from the market rate. See also P. Garegnani in "Keynes' Economics" and the Theory of Value and Distribution in "Keynes' Economics", edited by M. Milgate, p. 53 and A.H.A. Hansen, "Guide to Keynes", pp. 140 and 55.
8. "General Theory", pp. 242-3.
9. op.cit, p. 204.
10. The limited influence of a "cheap" money policy in the 1930s Depression is noted by Hodson, p. 307; Arndt, p. 42; Einzig, pp. 99-103; Hawtrey "A hundred Years of the Bank Rate", p. 400 etc.
11. op. cit, pp. 378 and 164.
12. See "Money in Britain 1959-1969", p. 40.
13. See Carlo Panico, in Milgate (ed.), "Keynes Economics", op. cit, p. 167.
14. For all these quotations, with which we attempted to summarise Chapter 14 of the "General Theory" and to incorporate the definition of "marginal efficiency of Capital", see pp. 175-6, 178 and 184; also pp. 139-40.
15. See M. Kalecki, who questions this unrealistic (as he argues) view, in "A New Approach to the Problem of Business Cycle" in the "Preview of Economic Studies", pp. 57-64.
16. See "Capital", Vol. 3, (Penguin), pp. 499-500. Also for a critique against Overstone, see Ch. 26.
17. One aspect of this is related to the long debate, the arguments and counterarguments that have been put forward by economists like Hicks, Hansen, Modigliani etc., on how sensitive (elastic) Investment (Capital) is to the rate of interest. The debate, by suggesting that the validity of the Keynesian model relies on the degree that Investment/Capital depends

upon the interest rate, seems to have missed the wood from the trees, since Investment does not depend upon interest, contrary to what the traditional theories suggest.

18. "Treatise on Money", Vol. 1, p. as2.

19. op. cit, p. as6.

20. Lately, some Keynesians realised the undue emphasis that Keynes put on the rate of interest and made a concerted effort to underplay its importance in the Keynesian system. They argue that "...the criticism of the classical theory of interest is the negative aspect of the General Theory, ...while the liquidity preference theory [which we will examine below] should be placed in the positive part of Keynes work...". (See Milgate, op. cit., p. 88).

21. op. cit., pp. 376-8 and 380.

22. See "Essays in Honour of M. Kalecki", p. 338 and Feiwel, "M. Kalecki", p. 53.

23. op. cit, pp. 382-3.

24. Marx seems to have provided a coherent argument against this kind of eclectic Utopian view, by pointing out that one cannot selectively abolish one aspect of an economic system only (in this case "money"). If one disentangles the puzzle and goes behind the smoke screen of money, the deeper contradictions of capitalism emerge, e.g. the contradiction between use value and exchange value in the system of social production. As he puts it: "...the way to overcome this: abolish prices. And how? By doing away with exchange value. But this problem arises: exchange value corresponds to the bourgeois organisation of society. Hence one last problem: to revolutionise bourgeois society economically. It would then have been self-evident from the outset that the evil of bourgeois society is not remedied by "transforming" the banks or by founding a rational "money system..." [See "Grundrisse", p. 134 (Pelican)].

25. See P. Garegnani in Milgate (ed), op. cit., p. 38.

26. See pp. 63-4.

27. In his earlier work though, he acknowledge that in some periods in Great Britain "...the rate of savings was considerable in excess of the rate of investment (e.g. in 1891-6) to the extent of say some £50 million per annum..." ("Treatise on Money", Vol. 2., p. 168).

28. "General Theory", pp. 327-8.

29. This is a summary of pp. 81-5 of the "General Theory".

30. See the 1937 issue, pp. 246-8.

31. "The Generalisation of the General Theory", p. 25.

32. See opening remarks on p. 313.

33. op. cit., pp. 317-22.

34. See Vol. 2, p. 196.

35. See P. Temin, "Lessons from the Great Depression", p. 7.

36. op. cit., pp. 307-8.

37. As students of Economic History this certainly seems to us to be true. For example, Keynes supported "... the 1844 Act which was compounded of one sound principle, for the stress laid on the quantity of money..." ("Treatise", Vol. 1, p. 17). He seems to have completely ignored the criticism that many made against the Act as being restrictive on economic activity, something that Keynes should be the first to point out. He also supported the "monetarist" views of Ricardo, who kept demanding a reduction of Bank of England notes, something which according to Keynes, should be an unwise "monetary" policy, especially during a recession. He also completely failed to praise the views of Attwood, who 100 years before Keynes, was a staunch "Keynesian" in the sense that he strongly advocated expansionary policies to overcome the recessions of the first 20 years of the 19th century.

38. G. Feiwel, "The Intellectual Capital of M. Kalecki", p. 48.

39. P. Kenway in Milgate (ed) op. cit., p. 151. In fact this writer makes a rather farfetched attempt to argue that the under-consumption in the Marxist scheme between Departments 1 and 2, 1) shows that Keynes is right and 2) Keynes goes further than Marx, attempting to close this gap; according to P. Kenway this can be done by "...an injection to Demand by the capitalists..." themselves, (op. cit., p. 164). Apparently P. Kenway 1) does not even resort to the assistance of the State in this matter, as Keynes would. 2) He makes a grave problem sound so easy and he does not realise that if it was that simple, all the major crises and especially the 1929 crisis would never have happened in the first place. The competition between capitalists and the discrepancy between what the producers produced and what the consumers would buy, would have given way to cooperation, social planning and co-ordination between social needs and social production; this is the main idea underlined behind Marx's critique of capitalism in the second Volume of "Capital" in terms of the "imbalance" between production and consumption.

40. "The Generalisation of The General Theory", p. 76.

41. op. cit, p. 323.

42. "Capital", Vol 3, p. 688.

43. "General Theory", p. 359.

44. op. cit, pp. 364-5.

45. op. cit., p. 370.

46. "Selective Works", Vol VI, 13, 10, quoted by P. Garegnani in Milgate (ed), op. cit, p. 43.

47. Quoted in the "Treatise", Vol. 1, p. 293.

48. op. cit, pp. 296-7.

49. "Treatise", Vol\ 2, p. 49.

50. See 1937, p. 248.

51. "Treatise", Vol 1, pp. 31-2.

52. "Treatise", Vol. 2, pp. 14-15.

53. "General Theory", pp. 195 and 170.

54. op. cit, pp. 195-6.

55. See P. Ayianoglou "The Fallacies of Monetarism", The Edwin Mellen Press 1993.
 56. "Economic Journal", 1937, pp. 250-1.
 57. "General Theory", p. 171.

References

- Amdt H.W. "The economic Lessons of the 1930s", (1944).
 Ayianoglou P. "Transition from Feudalism to Capitalism in Greece", (1982).
 Ayianoglou P. "The Fallacies of Monetarism" (1993).
 Bernstein M.A. "The Great Depression", (1987)
 Cairncross A.K. "Home and Foreign Investments 1870-1982", (1985).
 Clapham S.H. "An Economic History of Modern Britain", (1929).
 Coope A. "The International Consequences of the Great Crisis" in Wee (ed.),
 "The Great Depression Revisited", (1976).
 Einzig P. "The World Economic Crisis 1929-39", (1933).
 Fearon P. "The Origins of the Great Depression", (1979).
 Fisher I. "The Stock Market Crash - and After" (1930).
 Galbraith J.K. - "The Great Crash of 1929", (1953).
 - "History of Economics", (1982).
 Garegnani P. "Notes on Consumption Investment and Effective Demand" in M. Millgate
 (ed.), "Keynes Economics", (1983) .
 Hansen A. - "Fiscal Policy and Business Cycles".
 Hawtrey R.G. "The Art of Central Banking", (1933).
 Hodson H.V. "Slump and Recovery", (1938).
 Kalecki M. "Studies in Economic Dynamics", (1943).
 Keynes J.M. - "A Treatise on Money", (2 vols.) (1930).
 - "The General Theory of Employment, Interest and Money", (1936).
 - "Alternative Theories of the Rate of Interest" in the "Economic Journal", (1937).
 Kindlerberger C.P. - "The World in Depression 1929 - 1933", (1973).
 - "Keynesianism versus Monetarism", (1981).
 Locke J. "The Works of", (1823).
 Marshall A. "Principles of Political Economy", (1890).
 Marx K - "Capital", (Penguin, 1981).

- "Grundrisse", (Pelican, 1972).
- "A contribution to the Critique of Political Economy", (Lawrence and Wishart, 1971).
- Milgate M. "Keynes on the Classical Theory of Interest" in M. Milgate (ed.)
"Keynes' Economics", (1983).
- Mill J. S. "The currency question" in the "Westminster Review", XLI, (1844)
- Morgan E.V. "The Theory and Practice of Central Banking 1797-1913", (1943).
- Panico C. "Marx's Analysis Between the Rate Interest and the Rate of Profit" in Milgate
(ed.), "Keynes' Economics" (1983).
- Radcliff Report, "Money in Britain 1959-1969", edited by D.R. Croome and H.G. Johnson,
(1970).
- Ricardo D. - "High price of bullion", (1821).
- "Principles of Political Economy", (1821).
- Robinson L. "The Great Depression", (1935).
- Samuelson P.A "Myths and Realities about the Crash and the Depression" in the "Journal
of Portfolio Management", 6.
- Schumpeter J.A. - "Business Cycles: A Theoretical, Historical and Statistical Analysis of the
Capitalist Process", (1939).
- Sweezy P.M. "The Theory of Capitalist Development", (1968).
- Temin P. "Did Monetary Forces Cause the Great Depression?", (1976).
- Thornton H. "An enquiry into the nature and effects of the paper credit", (1802).
- Tooke Th. and Newmarch W., "A History of Prices and the State of Circulation", 6 Vols.,
(1839-1856).
- Wicksell K. "Lectures on Political Economy", (1934), (English translation).