

The Value of Money and imperialism: a commentary on Patnaik's theory of imperialism

INTRODUCTION

This paper aims to analyze Patnaik's theory of imperialism and its relation to economic theory. According to Patnaik a cogent economic theory that seeks to understand the laws of capitalism necessarily stems from a coherent theory of money due to the central place money plays in a capitalist mode of production. Hence, the purpose of his scientific endeavor is to examine the underlying social arrangement behind the determination of the value of money. Consequently, the conceptual framework Patnaik establishes starts with the following question: *what does determine the value of money?*

There has been a traditional *great divide* in economics - since its establishment as a scientific discipline - that separated two traditions on the central issue of income distribution between the capitalists and the workers: (1) the classical political economy paradigm ("Smith-Ricardo-Marx") regarded income distribution as dependent on the conditions of production - namely, income distribution is *socially* determined and as a result the price system is based on this outcome (this theoretical deduction came from the assumption distinguishing between "natural prices" and "market prices"). (2) Whereas the "Marginalist" theory (or neoclassical, "Menger-Jevons-Walras") stated that prices in all markets - factor prices included - are determined by the law of supply and

demand. This distinction is illustrated by Marx's analysis of the sphere of production by opposition to the sphere of circulation the "vulgar economists" privileged. Nevertheless, both traditions believed in *Say's law* (except Marx): supply creates its own demand. Thus, they considered capitalism as a system functioning at full capacity and ruled out demand-constraint crises.

As a matter of fact, this theoretical distinction hindered the significant contribution of the Keynesian and Kaleckian revolution that put demand constraint as the major issue of the capitalist system. For this reason, Patnaik questions the legitimacy of this theoretical schism and brings us back to the initial question he's enquiring. To him, the theoretical differences mentioned above are simply a "derivation" from a more fundamental analytical dichotomy pertaining to the monetary theory each clan provides – namely, what determines the value of money. According to this distinction, we can separate two strands: (1) the monetarist tradition and (2) the *propertyist* tradition.

The monetarist tradition (represented by Ricardo and Walras) states that the value of money is determined by supply and demand as any other commodity (only market prices exist). The economy is supply determined, functions under a beneficent equilibrium system and market forces perfectly clear. The sole property of money under this framework is to be a neutral means of payment. However this conception is "logically flawed" as it does not incorporate the hoarding role of money (neither the inherited payments obligations) and assumes the economy to function at full employment. Thus, the economy is never demand constrained. Indeed, this proposition has been since falsified by the successive crises capitalism underwent. By opposition, the *propertyist*

tradition considers money as a form of wealth holding - besides its other properties - and its value is determined outside the realm of supply and demand. The core of *propertyism* relies on three propositions: (1) *the value of money is determined outside the law of supply and demand*. Here we can distinguish two trends: (a) Marx who considers the value of money to be determined by the conditions of production (or labor theory of value) and (b) Keynes/Kalecki who consider the value of money to be fixed vis-à-vis one commodity, *labor-power* (money wage rate in Keynesian terminology). (2) *Money is a form of wealth holding and constitutes a store of value*. Agents – whether they are capitalists or workers – do not spend all of their income and as a consequence save. (3) *Because of this property money embodies, there is a possibility of overproduction (in Marxian jargon) and involuntary unemployment (in Keynesian terms)*. Hence, *capitalism is subject to demand constraint crises and does not operate at full capacity*. As Patnaik argues, *propertyism* is theoretically superior to monetarism to explain capitalism since it is able to shed lights on the inherent capacities of the capitalist system to generate crises. Therefore, if one wants to understand the laws of capitalism, one should start from the *propertyist* theoretical point of view.

Despite this superiority, Patnaik argues that *propertyism* remains incomplete for it theoretically conceived capitalism as a closed system that does not interact with its surroundings. The reason behind this incompleteness lies in the lack of a satisfactory framework within this paradigm to explain the sustainability of capitalism: if capitalism is a demand-constrained system, how could it remain viable and maintain an adequate rate of profit for capitalist accumulation? The explanations generally offered by this literature stress the importance of two exogenous stimuli: (1) technical innovation and (2) state expenditure. Yet, both elements are either endogenous

(innovation depends on the expected growth of demand) or not part of the spontaneous order of capitalism (in the case of state expenditure). Hence, this theory remains trapped in a dilemma: capitalism as an isolated system lacks a real exogenous stimuli to maintain its existence. Since it has been sustainable so far, where do these exogenous stimuli come from?

It is at this moment that Patnaik operates his analytical *tour de force* and states his thesis: capitalism is a mode of production (metropolis) that can never maintain its existence without entering into a structural coercive relationship with its precapitalist surroundings (periphery). Peripheral markets are exogenous stimuli because they constitute “reserve markets” and a pool of a vast reserve army of labor: the metropolis needs raw material products to ensure its wealth accumulation and thus exchange with the periphery; this increasing demand from the metropolis gives birth to inflationary processes that threaten the value of money (through NAIRU); therefore the periphery must loose in the terms of trade with the metropolis to cope with this threat in the metropolis. This phenomenon creates (i) deindustrialization and (ii) unemployment in the periphery (i.e. a reduction in overall employment through a replacement of domestic output by imports). As a result, pauperization emerges in the periphery which creates a distant reserve army of labor for the metropolis: this reserve army plays the role of a disciplining device in preventing the wage rate to go up in the periphery and forces the workers to be *price-takers*. They hence play the role of a shock absorber of the capitalist system: they prevent the advent of an accelerating inflation, which maintains the stability of the monetary system in the capitalist sector, and they maintain the possibility of a minimum acceptable rate of profit.

We can notice from this thesis how Patnaik evaluates the underlying social arrangement that determines the value of money: the modern monetary economy – in order to maintain its stability – is necessarily coercive and unequal toward the periphery. Patnaik calls this phenomenon *imperialism*. His thesis is indeed theoretically dense and incorporates many concepts debated in economics. It also begs some important empirical questions: how does his theory fit in the international monetary system? What role has the state been playing during and after the colonial era? According to which criteria does Patnaik draw the limit between precapitalist and capitalist sectors?

Given the scope and purpose of this paper, I decided to develop my commentary in four sections. (1) The first part of this paper will focus on *propertyism*, its theoretical framework and its dilemmas¹. I will present Marxian as well Keynesian theories of money and show how Patnaik draws from this tradition – particularly Keynes – to develop his theory of imperialism. (2) In the second section I will elaborate on Patnaik’s theoretical response to the “incompleteness” of *propertyism* and explain how the concept of imperialism is a cogent attempt to solve propertyist’s dilemma. This will also be the occasion to put Patnaik’s argument in contrast and perspective with some of the ideas of the *dependency* theory school. (3) The third section of this paper will focus on some questions and critiques I think Patnaik does not directly deal with: (a) was the role of the state regarding demand-management within the *capitalist* world as limited as Patnaik claims? And (b) to what extent can we qualify the periphery as a precapitalist mode of production? In such case, which regions would represent this periphery? (4) The last section concludes this paper.

¹ In *The Value of Money*, Patnaik begins by presenting and exposing the limits of monetarism. Given the aim

I. Marx, Keynes and demand-constraint crises

The concept of Money

Before moving forward into my analysis, it is important to clarify the analytical framework under which Patnaik's argument is developed. In the introduction, I mentioned the value of money without expanding on the definition of both terms – namely, *value* and *money*. The monetarists as well as the propertyists cope with these concepts in trying to answer the following questions: (1) what determines the value of money relative to nonmoney commodities at any time? And (2) why does money have a positive and finite value?

Hence the definition of *value* is a result of the theoretical response to the origin of its determination; and the theoretical response relies on the conception one has of *money* and its properties. The main difference between the monetarist and the propertyist is that the latter considers money as a form of wealth – a characterization that cannot be incorporated into the monetarist theoretical framework because it considers money as a mere means of payment which value depends on the supply and demand in the goods and services markets. In other words, the demand for money increases if agents' demand for goods transaction increases as well and vice versa. In such a case the *price* of money is related to the *prices* of goods. The price (value) of money is an inverse function of the price of goods: the monetarist (and the quantity theory) view claims that the quantity of money available in the market determines the level of prices for nonmoney commodities.

In the propertyist tradition Marx and Keynes agree on the property money has: it is a form of wealth. Yet, Marx viewed the monetary system as commodity money (money is a produced commodity) while Keynes talked of fiat money (currency backed by the state). Despite this distinction they both come to a similar conclusion with regard to the analytical characterization of money and the determination of its value as Patnaik summarizes: “money is that good, the excess demand for which cannot be eliminated through price adjustments alone and give rise, *ceteris paribus*, to an excess supply of *all* produced commodities”². In other words, since money constitutes a form of wealth it is subject to an excess demand – this excess demand for money reduces the demand for nonmoney commodities (since agents increase their savings and decrease their spending) which creates an excess supply of nonmoney commodities because an excess demand in any market must be matched by an excess supply in another market. This characterization engenders the possibility of an overproduction crisis. The “price adjustment”(i.e Walrasian equilibrium) alone suggested by the monetarists does not solve the excess demand for money under this analytical framework.

A brief note on monetarism and Ricardo

The fundamental characteristic of monetarism is the following: in the short run the price of money depends on the demand and supply for it. This assertion relies on a set of assumptions: the economy functions at full employment and under the framework of a Walrasian equilibrium. Through price adjustment, the economy attains an equilibrium point where supply equals demand

² Patnaik, P. *The value of money*. Columbia University Press, New York, 2009. P.10.

in all markets since agents are *price-takers* and make decisions based on their rational expectations. Prices in all markets are perfectly flexible and reflect perfect information (therefore there is a perfect substitutability between inputs in the production process and real wages in the labor market are flexible to allow for adjustment). To make its theory functional, the monetarists necessarily assume a *constant k*:

$$\frac{\text{money income}}{\text{demand for money}}$$

Therefore, for a constant k , we have the following:

$$m = \pi + \beta + n$$

Where, m is the rate of growth of money supply, π is the rate of growth of prices, β is the rate of growth of labor productivity and n is the rate of growth of the labor force. The money supply is exogenously determined in the monetarist framework (either by the central bank in the neoclassical theory or by the domestic production of the money commodity in Ricardo). It follows that in the steady state, the price level or inflation rate π is equal to the rate of growth of money supply minus the “natural rate of growth” of the economy³. In equilibrium, we obtain the following:

$$M_0 + \Delta M = k \cdot p \cdot Q^*$$

³ *Ibid*, p.19.

Where M_0 is the initial money stock, ΔM is the additional money supply, p is the level of prices and Q^* is the full employment output.

This proposition is illustrated in another form of *the equation of exchange* used in *the quantity of money theory of price* Hume and Ricardo apply:

$$P \cdot \bar{Y} = M \cdot \bar{V}$$

$$P = \frac{M \cdot \bar{V}}{\bar{Y}}$$

Where P is the price index, in this case gold prices of commodities, Y is the quantity index or the volume of commodities sold in a year (in one country), M is the stock of gold needed to fulfill the transactions, and V is the velocity of money – namely, the number of times each coin of gold was involved in a transaction. V and Y are considered to be relatively constant since there is little change of their level in a short period of time.

Patnaik's association of Ricardo with the monetarists is surprising from a methodological point of view. The monetarist theory does not differentiate between market prices and production prices, and relies on methodological individualism. The Walrasian equilibrium is an expression of these beliefs since it states a *fallacy of composition* – i.e. the view that what happens in society is the coincidence between the intentions of agents' individual actions and the outcome of these actions. Whereas Ricardo differentiates between prices of production (due to his theory of labor value) and market prices and also believes in the concept of *statistical equilibrium* – where

market prices gravitate around natural prices (i.e. emergent properties of complex systems). Yet, Ricardo is a monetarist in the short run since he considers the determination of the price level by the quantity of money available in circulation. Inversely, the value of money is an inverse function (exclusively) of the price level of goods.

Consequently, the monetarist view is a supply-side theory (*Say's law*) where demand-constraint problems are precluded (since all market clear through price adjustment) because money is conceived as a mere instrument of payment which value (price) depends on the supply and demand for it. This position is not tenable once we introduce (a) expectations about the future and (b) payments inherited from the past (a concept of historical time) as Patnaik notes (add a note with quote). As a result, the monetarist theory becomes logically flawed and false as soon as we introduce more realistic assumptions regarding the legacy of commitments and inconsistency between the intention of individuals' intentions and the outcome of their action in a given society. Furthermore, as I discussed the monetarist theory is fundamentally based on Walrasian equilibrium – a concept that is incompatible with capitalism. The latter is a social mode of production that relies on certain coercive monitoring devices to discipline the workers in the sphere of production. However, this disciplining device is none existent if the economy runs on full employment. In fact, there is a necessity for the industrial reserve army of labor as Marx argue (a certain level of unemployment) to ensure the ongoing process of capital accumulation for two main reasons: (a) to drag wages down and ensure an adequately high rate of profit for the capitalists and (b) discipline the workers to perform their tasks in the most productive way. Hence, if this device ceases to exist – as it is supposed under Walrasian equilibrium – it is hard to conceive how a capitalist mode of production would remain sustainable.

Marx and overproduction crises

Unlike the monetarist theory, the propertyist tradition considers money as a store of value – namely, agents (capitalists as well as workers or households) seek money for its capacity to store or accumulate wealth. Patnaik argues that it is impossible to have money as a mere instrument of payment if it was not also a form of wealth essentially because market transactions do not happen *immediately*: there is always a time lag between the purchase and sale of a commodity when the agents hold money before consuming it. This would not have been possible if money was not a form of wealth as well. This property of money provokes the phenomenon of hoarding (in Marx) and liquidity trap (in Keynes) that is not eliminated through market prices adjustment but rather creates an overproduction crisis. Therefore, the value of money is determined vis-à-vis a certain type of fixed commodity and it ensures its stability – which could explain why agents hold on to it. Both Marx and Keynes conceived money as being different from other commodities.

Marx's theory of money has been subject to many debates and for this reason I will not expand on the specific details of its aspects. Nevertheless, in order to put Patnaik's theory of imperialism it is worth posing the theoretical framework under which Marx and Keynes operated.

Marx studied money through the lens of the monetary system of his time – a money commodity system where money is a produced commodity, i.e. gold. The explanation he offers regarding the emergence of money is what he refers to as the *general equivalent theory*: a commodity emerges as the general equivalent that expresses the value of all commodities⁴. For instance, if we look at

⁴ Foley, "On Marx's theory of Money".

gold it is a concrete and particular commodity with its own conditions of production. In such a case, we will talk of *the value of money commodity* (determined by the amount of labor-time embodied in each ounce of gold). However, gold was also the expression of value separate from other commodities. In this case, it functioned as *money* and expressed the value of each other commodity in its own quantity. In such a case, we will talk of *the value of money*. According to Marx, the value of money was the ratio of the amount of social labor time expressed on average by a unit of money (*total value added/total labor time*). Therefore, the value of money - according to Marx - depends on the conditions of exchange between the general equivalent (gold) and other commodities at the point of production of the general equivalent commodity. Furthermore, to Marx, the total money stock in the economy consists of two elements: (1) the part that is used for the purpose of circulation and (2) the part that remained in the form of “idle balances” - namely, hoard. The hoarding part consists of (a) the *unconsumed surplus value*, (b) the “*reserve fund*” (money to pay and contract debt obligations) and (c) a *terminal asset*.

The possibility of idle balances leads the way to an eventual overproduction crisis: the capitalists do not convert the unconsumed surplus value produced into productive capital to produce new commodities. This unconsumed surplus value is hence held as an asset - over and above the requirement for the purpose of circulation - that must be different from other commodities. This *ex ante* demand for money is not matched by an increase in the production of money commodity (since this latter is determined independently), which creates an asymmetry between demand for money and the commodity prices and output (since an increase in the demand for money does not have an impact on prices or the output of nonmoney commodities according to Marx). The overproduction crisis happens then for the nonmoney commodities.

Yet, Patnaik argues that Marx did not study the economy under disequilibrium⁵ and did not frame a theory explaining “the actual contours of an overproduction crisis”, which ultimately put Marx in a dilemma: if there is a possibility of overproduction and quantity adjustment, there is no such thing as a long-run “center-of gravity” equilibrium (i.e. a contradiction between his labor theory of value and prices, and his theory of money). Either one accepts monetarism and *Say’s* law if one wants to remain under the long-run equilibrium framework or one accepts the fact that the economy remains in a permanent state of overproduction. Marx considered capitalism as a closed economy and hence could not imagine the possibility of exogenous stimuli that could maintain an adequate rate of profit for capitalist accumulation almost *ad vitam aeternam*.

Keynes and involuntary unemployment

Keynes operated a conceptual revolution in economics in pointing out the importance of aggregate demand in capitalist economies. As Marx, he thought that money is a form of wealth and agents have preferences regarding hoarding liquidity – which ultimately impact goods markets and create what he calls “involuntary unemployment”. Also, to him the value of money is determined outside the realm of supply and demand, and is fixed vis-à-vis money wages. He clearly writes: “that money wages are more stable than real wages is a condition of the system possessing inherent stability” (Keynes : 1949). Keynes postulates a world of fiat and credit money where the value of money is *institutionally* determined: it is the exchange ratio between a unit of money and a unit of labor power (in Marxian terms). Money wages are sticky – i.e. they

⁵ Patnaik, P. *The value of money*. Columbia University Press, New York, 2009. P.109.

slowly change (and hardly go down below a certain limit) due to the bargaining position of the workers that always bargain according to the money wage (and not real wage). Three aspects determine the level of employment in equilibrium: (1) the level of aggregate supply, (2) the propensity to consume, and (3) the volume of investment⁶. Overproduction crises or involuntary unemployment happen when there is an insufficient demand for produced commodities that cannot be adjusted through price mechanism (due to the rigidity of the labor market). The economy does operate at full capacity utilization and for a given equilibrium wage, workers are willing to work but cannot find a job. Hence the economy operates below the full capacity utilization, which creates a contraction in the aggregate demand and creates an overproduction crisis. According to him, money wages rigidity is not the cause of involuntary unemployment (as the monetarist claim) but is a necessity for the economy to remain at a steady state.

The excess demand for money (idle balances for a given interest rate being high) causes an excess supply in the produced commodities. In fact, in an economy where inherited payment obligations exist (unlike under the Walrasian equilibrium framework), a reduction in prices increases the real burden of payment obligation, which augments the likelihood of insolvency problems among firms. This situation changes the liquidity preference among agents (from money-bonds to money) and causes a decrease in the money wage rate – which ultimately increases the demand for money balances (at a given interest rate).

The stability of money wages is of fundamental importance: it gives a double threshold for the good functioning of an economy. If the money wages were not sticky and go below a certain

⁶ Keynes, Johan Maynard. *The General theory of Employment, Interest, and Money*. Hartcourt Inc, London, 1964. P.26.

level, there would be a tendency for accelerating deflation. On the other hand, if money wages go up too rapidly due to a stronger bargaining power and low level of unemployment, the economy would go over the “inflationary Barrier”⁷ since prices would keep growing in parallel with wages and create an accelerating inflation – which indeed threatens the value of the currency and the rate of profit as well. Stabilizing money wages is a necessity for the good functioning of capitalist economies. This latter characteristic is used by Patnaik to develop later on his theory of imperialism (the stability of money wages in the periphery is a necessity for the stability of the overall monetary system).

However, like Marx, Keynes did not explain what could allow the economy to remain within the range of these two thresholds given the fact that it is under overproduction crises. This weakness is not overcome in Keynes either. Patnaik adds another similarity between Marx and Keynes: both actually talk of money commodity. Even if Keynes refers to fiat and credit money, the fact that the value of money is fixed via money wage, it becomes money commodity because money wage is nothing else but labor power – i.e a commodity (a given unit of money is exchange against another given unit or quantum of another commodity – labor power).

⁷ From the first it was obvious that if we ever reached and maintained a low level of unemployment, with the same institutions of free wage bargaining and the same code of proper behavior for trade unions that then obtained, the vicious spiral of rising prices, wages, prices would become chronic”. Joan Robinson (1966, 88).

II. The incompleteness of propertyism or a theory of imperialism

In the previous section, I showed how Patnaik demonstrates the superiority of the propertyist tradition over the monetarist theory in explaining why capitalism undergoes crises: overproduction and involuntary unemployment are fundamentally linked to the wealth property of money. At the same time, despite its superiority Patnaik exposed the limits of the propertyist theory in not being able to frame a satisfactory explanation about the viability of capitalism.

On the one hand, the propertyist paradigm sees the capitalist economy as a demand constrained economy where the level of demand (dependent upon the level of investment) can potentially take any value – namely, the economy can “settle anywhere”. Thus, the viability of such a system is not guaranteed. On the other hand, if we accept the fact that demand is fluctuating within a given range – as the inflationary barrier or NAIRU suggest – then the economy remains confined to this given range. In such a case, Patnaik argues that we need a theory of “self correction” that maintains the level of demand within this range. Such a theory does not exist because it *cannot* exist under the framework of a closed economy. This is the “incompleteness” of propertyism. Patnaik explains this incompleteness in the following way: there is a lower and an upper threshold to the level of activity of the economy. On the one hand, if the economy goes below the lower threshold then the rate of profit becomes too low to maintain capitalist accumulation. On the other hand, if the economy reached the upper threshold – the inflation barrier – the wage unit is not stable anymore (i.e. keeps increasing) and threatens the value of money and the rate of

profit as well. Hence, the question becomes: how can we keep the level of economy between these two thresholds to assure the viability of capitalism?

Marx, Keynes and Kalecki conceived capitalism as a closed economy subject to demand constraint crises that need exogenous stimuli. Within this framework, four exogenous stimuli have been discussed so far but according to Patnaik, they remain fundamentally endogenous and do not solve the problem of the viability of capitalism: (1) *technical innovation* (it remains yet endogenous as it depends on the level of demand within an economy), (2) *the existence of an autonomous consumption and investment* (also depend on the rate of growth), and (3) *state expenditure for demand management* (it has not been the norm though in the history of advanced capitalist countries according to Patnaik). The fourth one is the *incursion into precapitalist markets*. This latter option supposes however an open economy – an option theoretically ruled out by Marx, Keynes and Kalecki. Therefore, from a theoretical perspective we remain puzzled by the fact that despite demand constraint problems – accurately detected by the propertyist tradition – capitalism has functioned quite smoothly for a long period of time. How is that possible?

Solution to propertyism's dilemma: an open economy model

Patnaik suggests the abandonment of the closed-economy model in economic theory and replaces it with a specific type of open economy: the interaction between capitalism and precapitalist markets. This position is also defensible from an empirical point of view as he points out:

“Capitalism, even though it has been theorized from the very beginning as a self contained and closed system, has always been a system integrally linked to its surrounding precapitalist formations. It has never been a closed system, and yet its description in all theoretical models attempting to explain its *modus operandi*, has been that of a closed system”⁸.

In other words, Patnaik’s argument is foremost theoretical before being historical or strictly empirical. He claims that there is an analytical flawed logic within the theoretical corpus of propertyism (despite its superiority on monetarism) that needs to be overcome in order to explain the sustainability of capitalism. Once we introduce the precapitalist markets surrounding the capitalist economies from a theoretical perspective – and hence adopt an open economy model – we are able to explain how and why capitalism has been sustainable so far despite its recurrent demand crises.

His explanation goes as follows. To begin with the incursion into precapitalist markets constitutes an exogenous stimuli. Unlike what Rosa Luxemburg argues (Luxemburg : 1913), Patnaik considers the *qualitative* aspect of these markets rather than their quantitative aspect: the existence of the precapitalist sector as “reserve markets” keeps investment within the capitalist sector going (not the locus of the realization and consumption of surplus value as Luxemburg argued). Even if the recourse to this market is or remains negligible, its simple existence is a theoretical solution to explain why the capitalist sector could remain viable: it could always make inroads into these markets whenever there is a downturn in the capitalist sector – which could explain how the level of demand would remain within a certain range that ensures the stability of

⁸ Patnaik, P. *The value of money*. Columbia University Press, New York, 2009. P.178

the system. This first argument constitutes a theoretical possibility and not a historical/empirical necessity.

Secondly, the encroachment in the precapitalist surroundings creates a pauperized mass of people due to deindustrialization (because of the displacement of local production), which gives birth to a distant *reserve army of labor*. This reserve army of labor plays a crucial part for two main reasons: (1) it is a vast pool of directly available labor, which the capitalist sector can use, and (2) it is a core element that ensures the stability of the value of money.

This second element brings us back to the initial question asked: what does determine the value of money and how is its stability ensured? So far we followed Patnaik's argument in answering this question: the value of money is fixed vis-à-vis one commodity – money wage – in a fiat money monetary system. This commodity must remain fixed (moving slowly) to ensure the stability of money, but under demand constraint crises the economy could reach an inflationary barrier that would ultimately threatens the value of money (since wages could keep increasing). The availability of a distant reserve army of labor in precapitalist markets – created through the interaction between the capitalist and the precapitalist sector – prevents the rate of unemployment to fall below the “inflation barrier” or the *non accelerating inflation rate of unemployment* (NAIRU) in the following way:

- (1) The capitalist sector imports primary products from the precapitalist sector against which it exchanges its own products.

- (2) There are therefore three agents claiming the capitalist sector's product (factors of production): (i) the *capitalists* (profits), (ii) the *workers* (wages) directly employed, and (iii) the *precapitalist sector* that indirectly service their needs (primary products).
- (3) There is a corresponding NAIRU for any given level of the terms of trade between the capitalist and the precapitalist sector.
- (4) If the terms of trade can be turned to the disadvantage of the precapitalist produces, it reduces the real wages of the workers who produce primary commodities (or real income of petty producers) in the precapitalist sector.
- (5) Hence, if the share of the precapitalist workers could be shrunk vis-à-vis the wages of the workers in the capitalist sector and the profits of the capitalists in the capitalist sector, then the NAIRU can arbitrarily be lowered without destabilizing the wage-unit in the capitalist sector – i.e. the value of money.
- (6) The bargaining position of the workers within the precapitalist sector is weak due to the existence of the vast reserve army of labor - created by deindustrialization (because of the displacement of local production) – they are hence *price-takers* and do not have any minimum *ex ante* real wage claim given the anticipated rate of inflation. As a matter of fact, workers in the precapitalist sector, become the “*shock-absorber*” of the capitalist system to keep the viability and sustainability of the value of money.

The assumption behind this model is the non-acceptance of the workers in the capitalist sector of low wages below a certain minimum given the expected inflation rate. The outcome of income

distribution between the capitalists (profits) and workers (wages) cannot be perfectly flexible: due to trade unions, wages are not likely to go down easily. Hence, there is a tendency to reach the inflationary barrier and threatens the value of money. We can formalize this model in the following manner:

Suppose the workers in the capitalist sector, obtain a money wage rate at the expected rate of inflation and their wage share is an inverse function of the unemployment rate. Labor is the only input and the price level is a markup. We have:

$$p(t) = p^e(t) \cdot w(u)(1 + m) \text{ and } w' < 0 \quad (\text{i})$$

Where p is the price, p^e the expected price, w the wage share, u the unemployment rate, and m the markup.

We take adaptive expectations, i.e. the expected inflation of the current period is similar to the actual inflation of the previous period:

$$p^e(t) = p(t-1) \cdot \frac{p(t-1)}{p(t-2)} \quad (\text{ii})$$

Therefore, from the above we can infer that there can be one rate of unemployment u^* where the inflation rate is steady. Hence, at $u < u^*$, we have an accelerating inflation rate and at $u > u^*$, we have a decelerating inflation. And u^* is given by the following:

$$u^* = w^{-1}\left(\frac{1}{1+m}\right)$$

Now, suppose we introduce the precapitalist sector. We have the following:

$$p(t) = [p^e(t).w(u) + a.\pi(t)](1+m) \text{ and } w' < 0 \quad (i')$$

Where a is the physical amount of primary products produced in the precapitalist sector and π is the price per unit of the primary product in terms of the capitalist sector's money. The primary products price is a kind of markup over the unit wage cost and the markup factor is $(1+h)$. Because of the reserve army of labor, the workers are poorly unionized and we can assume that they obtained a similar share in the capitalist sector's commodity in the current period's expected price than the previous period. Given their position as *price-takers*, the previous period's share for them is what remains after the capitalists and the workers in the capitalist sector have taken their shares, hence: $[1/(1+m) - w(t-1)] / (1+h)$. We then have:

$$a.\pi(t) = [p^e(t). \frac{\left\{\frac{1}{1+m}w(t-1)\right\}}{1+h}](1+h) \quad (iii)$$

From (i'), (ii) and (iii), we obtain the following:

$$\frac{p(t)}{p^e(t)} = 1 + (1+m)[w(u) - w(t-1)]$$

Since $p(t) / p^e(t) = w(u) / w(t)$, we can write the following:

$$w(u) - w(t) = w(t)(1 + m)[w(u) - w(t - 1)] \quad (\text{iv})$$

We can infer from the above model that the capitalist sector can have a steady inflation and indeed maintain any level of activity without being subject to the inflationary barrier or NAIRU, as long as it is surrounded by a precapitalist sector that has an vast reserve army of labor. We know that $w(u) > w(t)$ for all t and $w(t) (1 + m) < 1$ for all t , if the price of primary commodities remains positive. We can thus infer from (iv) that for any u maintained over time, the share of the workers in the capitalist sector would tend to $w(u)$. Therefore with an open economy model of this type, it becomes theoretically possible to explain the viability and sustainability of the capitalist system via its necessary relation with its precapitalist surroundings.

Money world economy and imperialism

The model presented above demonstrated the theoretical necessity to conceive capitalism as an open system that enters in a structural relation with its surroundings to keep the value of money stable. As the model suggests, this structural relation is violent and coercive toward the precapitalist sector. However, as Patnaik suggests, this model is not sufficient if the capitalist is not a unified entity. In a diverse capitalist sector where wages and currencies diverge, fixing the value of money to money wages does not make that much sense. A leading country needs to be the core element of the capitalist sector whose currency is fixed with its money wage and is “as

good as gold” so the rest of the capitalist world fixes its currency according to this core country. Indeed the value of money still needs to be stabilized – as all the international exchanges happen in the currency of this core country.

Prior to WWII, the monetary system operated under a British gold standard that fixed some rigidity regarding the value of money. Furthermore, the fear of inflationary barrier was not really existent as the primary commodities came from precapitalist *colonized* regions. The colonial apparatus allowed the capitalist colonizer to prevent any inflationary process coming from the colonized region through the taxation mechanism: the people of the colonies were heavily taxed (a substantial amount of the economic surplus) but these taxes were used by the colonizer to pay local producers of goods comprising the export surplus⁹. In fact, the commodities exported from the precapitalist region to the core region were obtained *quasi* freely. The British Empire and its colonies – especially India – is a very illustrative example; a veritable “drain” of food and riches happened in India (Bagchi : 2005). In fact, the existence of the gold standard relied on this coercive mechanism to ensure the stability of the value of money.

After the Second World War, most of the previous colonies obtained their independence and the political atmosphere in these newly independent countries was prone to national dirigisme following the *Bandung project* (Amin : 1976). This situation coincided with the implementation of a new international monetary system – the Bretton Woods system – where the dollar became the world money commodity backed by gold. Such a system did not last long due to the incapacity of the leading capitalist country – the United States – to control inflationary processes:

⁹ Patnaik, Prabhat and Utsa. *A theory of imperialism*. Columbia University Press, New York, 2016. P.126.

any coercive mechanism was ruled out to turn the terms of trade against the precapitalist sector and these latter did not serve their role of shock absorber anymore. Hence, once the United States started to wage war against Vietnam – creating an increase of its demand for raw material products and an outflow of gold – the inflationary process started. The value of the dollar was declining and since no mechanism could stop this inflationary process, wealth holders started to demand gold instead of dollars – which resulted in the incapacity of the US to furnish gold for the rest of the world (its currency would have been depreciated even more and its gold reserves would have shrunk deeper). De Gaulle demanding gold instead of dollars is the very illustration of this phenomenon. As a consequence, the Bretton Woods system ended in 1971.

The neoliberal revolution took over and international institutions such as the IMF, the World Bank and the GATT (nowadays WTO) have been used by the capitalist sector to turn the terms of trade against the precapitalist sector via the mechanism of “sound finance” (price stabilization, privatization and liberalization). In other words, raw material exporter countries were imposed a *de facto* “income deflation” by reducing the domestic purchasing power of its people (in reducing the unit labor cost for instance). Thus, a coercive mechanism similar to the colonial period has been restored to ensure the stability of the value of money – this system (sound or neoliberal macroeconomics) ensure the international division of labor where precapitalist regions specialize in exporting raw materials and services. The value added in these spheres is indeed limited and an increase in productivity is not as high as in the manufactured sector (a fact already known to Adam Smith). Interestingly, Prebisch already framed a similar hypothesis explaining the importance of technical progress in determining the terms of trade: raw material exporter countries lose in the terms of trade since prices for manufactured goods are not as volatile as the

latter and these prices do not decrease despite an increase of productivity (Prebisch : 1950). The reason behind this mechanism is the growing income within the capitalist sector (where workers' wages do not go down either because of a strong unionization) and the declining (or not as rapidly growing) income in the periphery. An argument very much similar to Patnaik's, but Prebisch made a historical argument that was not concerned with the stability of the metropolis – his main concern regarded the internal development of developing countries (especially in Latin America) and his focus was on technical progress and human capital.

Therefore, Patnaik's argument becomes very unique as he imposes imperialism as a theoretical necessity for capitalism as a mode of production and as an empirical explanation of the impoverishment of the precapitalist surroundings. To clarify: capitalism is not a planned system and this theory of imperialism fits in the spontaneity of capitalism. The capitalist sector in order to accumulate wealth imports products that are not produced in the metropolis. This increasing demand creates an increasing supply price for peripheral commodities. This increasing supply price threatens the value of money. The threat is erased by the imposition of income deflation on peripheral countries. Indeed, Patnaik comes up with considerable historical and statistical evidence one cannot dismiss easily – yet, this aspect goes beyond the purpose of this paper.

After all, what is imperialism? A general definition the humanities literature gives is that imperialism “means the practice, the theory, and the attitudes of a dominating metropolitan center ruling a distant territory” (Said : 1993). This definition is very much accurate and incorporates many aspects described by Patnaik. Yet, he rightly points out that imperialism is essentially an economic phenomenon where the plunder of land (or income) remains the objective. Hence a

theoretical framework from an economic perspective is urgently needed. Patnaik's attempt to define imperialism as an economic phenomenon is indeed remarkable: as I mentioned, it poses itself as a necessary theoretical component to explain the laws of capitalism and overcome the demand-constraint dilemma pointed out by the propertyist tradition. It also adds to the theoretical component and practical aspect related to coercion and power given the international monetary system. As he writes, "*imperialism, in short, is a coercive relationship exercised by the capitalist sector on the "outside" world to ensure, first, that it obtains the products that it needs from this "outside" world and second, that it does so at non-increasing prices*"¹⁰.

III. Conclusion: the incompleteness of the incompleteness?

Through this paper I tried to clearly elucidate and closely follow Patnaik's argument about the value of money and a theory of imperialism. The first section focused on the survey Patnaik does on the different monetary theories in economics and their explanatory framework for the laws of capitalism. Propertyism is intellectually superior to monetarism since it conceives money as a form of wealth, which raises the possibility of an overproduction crisis for Marx and involuntary unemployment for Keynes. For the latter, aggregate demand plays a major role for the good functioning of an economy and the stickiness of money wages is a necessary condition for the stability of money since it prevents the economy to either enter an accelerating deflation or an

¹⁰ Patnaik, Prabhat and Utsa. *A theory of imperialism*. Columbia University Press, New York, 2016. P.86.

accelerating inflation. However, given the demand-constraint problems, what could prevent the economy from entering either of the spirals? In the second section of this paper, I tried to answer this question by commenting on Patnaik's proposal. According to Patnaik, only a theory that incorporates an open economy model where precapitalist markets play the role of shock absorber (through the stabilization of money wages in the periphery), could explain why the capitalist economy remains viable and stable. This process is coercive, violent and oppressive toward the precapitalist sector as it causes income deflation and pauperization in the periphery. This necessary process is what Patnaik refers to as *imperialism*.

Patnaik's argument is very convincing and appealing. However, I would like to raise two points he deliberately or involuntarily ignores: (1) according to him, the state has played a minor role in demand management within capitalist countries and as a matter of fact did not constitute an exogenous stimulus. From an institutionalist and historical perspective, this proposition seems problematic – especially given the active role of the state for the early development of capitalism but also during its crises. One can think of Polanyi's work and how the role of the state is detrimental for the good functioning of any market economy. (2) Patnaik keeps referring to precapitalist surroundings – a concept that remains quite vague given the recent development of these regions (developing countries): (a) most of these countries have become capitalist in their modes of production (despite them not necessarily exporting manufactured goods) and (b) most these economies have become services economies where raw materials and primary products play less and less significant role. Therefore, how does Patnaik's theory fits in these new development within the developing countries and – as a consequence – where does he put the threshold of what is a precapitalist region subject to imperialism? These two aspects are

fundamental to Patnaik's overall theoretical approach and if addressed might reveal the incompleteness of his critique of propertyism. However, the scope and the aim of this paper limit my enterprise to enquire deeper on these issues.

Bibliography

Amin, Samir. *Unequal Development*. Monthly Review Press. New York, 1976.

Bagchi, Amiya Kumar. *Perilous Passage: Mankind and the Global Ascendancy of Capital*. Rowman & Littlefield publishers, INC. Maryland, 2005.

De Burnoff, S. (1976), *Marx on Money*. Urizen Books, New York, 1976.

Foley, Duncan. *Understanding capital: Marx's economic theory*. Harvard University Press, Boston, 1986.

_____. *Adam's fallacy: a treaty on economic theology*. Harvard University Press. 2008.

_____. "On Marx's theory of Money"

_____. "Marx's theory of Money in historical perspective"

Keynes, Johan Maynard. *The General theory of Employment, Interest, and Money*. Hartcourt Inc, London, 1964.

Lapavitsas, C. *Profiting without producing: how finance exploits us all*. Verso, London, 2013.

Marx, Karl. *Capital, Volume I*. Penguin Classics. London. 1993.

Marx, K. 1894. *Capital, Vol. III*, Harmondsworth, Penguin Books, 1981

_____. *Grundrisse*. Penguin Classics. London. 1993.

_____. *A contribution to the critique of Political Economy*. Penguin Classics. London. 1993.

Patnaik, Prabhat and Utsa. *A theory of imperialism*. Columbia University Press, New York, 2016.

Patnaik, P. *The value of money*. Columbia University Press, New York, 2009.

Polanyi, Karl, *The Great Transformation*. Beacon Press, Boston, 1957.

Prebisch, R. (1950). *The economic development of Latin America and its principal problems*, New York: United Nations.

Shaikh, A. *Capitalism: competition, conflict, crises*. Oxford University Press, New York, 2016.

Said, Edward. *Culture and Imperialism*. Vintage Books, New York, 1993.

Smith, Adam. *The Wealth of Nations*. Random House, INC. New York. 1937.