**The theory of the monetary circuit and economic policy in Augusto Graziani.
An assessment from an early Italian circuitist perspective,
and a first comparison with Alain Parguez**

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Introduction

The contribution of Augusto Graziani to economic theory cannot be confined only to the theory of the monetary circuit. To understand Graziani's approach to the monetary theory of production – for which he is most known in the international literature – it is important to look at the early years of Italian circuitism. The constitution of Italian circuitism was in a dialectical relation with the other currents of heterodoxy, so that it is misleading to range it among the Post-Keynesian theories without serious qualifications. I would even go so far as saying that the criticism towards heterodoxy, at the time, was much more important than the break with mainstreams – something that it is almost impossible to understand for the younger generation, though it is crucial. I am also convinced that one does not understand very much of Graziani's original developments since mid-1970s if theoretical studies are separated from his interpretation of contemporary capitalism (especially of the development and crisis of the Italian economy), and from his criticism of economic policy.

In this paper I will try to sketch: (i) the theory of the monetary circuit as a part of a larger intellectual horizon in Graziani; (ii) his personal vision of circuitism as a macro-class monetary theory of capitalist production; (iii) some elements of his criticism towards other heterodox streams, and of his difference relative to other monetary approaches; (iv) the consequences in terms of economic policy.

A distinctive feature of Graziani was his structural approach, and this will be the theme of the very short first section covering his first writings, already characterised by an implicit but strong criticism of Neoclassical theory. The second and third sections will deal with Italian circuitism, privileging the early years (at the end of the 1970s and then the early 1980s: the years when Graziani held a regular Seminar on Monetary Theory in Naples, a Seminar to which I participated since its beginning). This period embedded not only a criticism of monetarism and new classical macroeconomics, but also a critique of Neoricardianism, traditional Marxism, Postkeynesianism, which is in my opinion essential to get Graziani's message. In the fourth section I will present the partially complementary, partially alternative perspective of Alain Parguez, and I'll give a quick look at some of the alleged points of difference between Graziani's and Parguez's circuitisms. In the fifth section I'll show how Graziani's discourse on economic policy ensued from his theoretical vision and model, and something similar will be done for Parguez. In the conclusions I will touch on Graziani's methodological contribution as part of a specific Italian tradition in political economy.

Graziani leaves no heirs but a legacy, which we have to accept going beyond Graziani, not retrogressing before him. Graziani's thought was 'untimely' in Nietzsche's meaning of the word: his thinking "counter[ed] his own time, thereby acting on it, hopefully, for the benefit of a time to come". That is exactly the reason why he will be an essential intellectual (and even a

moral) reference for those willing to take up again the difficult task of furthering a critical political economy, staying far away from the simplifications, the reductionism, the superficial criticism, and even the opting out from critical thinking which marked the last few decades.

1. *The early Graziani as a non-Neoclassical economist*

Among all the many economists involved in the development of an alternative approach to neoclassical economics, both in terms of theory and policy, the name of Augusto Graziani stands out among all others. Although perhaps not in a fully conscious way in the beginning, Graziani's writings on theory and policy show a departure from the canons of orthodoxy. Trained in Naples, he graduated in 1955 with Giuseppe Di Nardi. Graziani then travelled abroad to continue his schooling. Soon after, he did postdoctoral studies at the London School of Economics where he met Lionel Robbins, and then went to the United States, to Harvard University, where he was exposed to the influence of Wassili Leontief and Paul Rosenstein-Rodan. His long collaboration with Manlio Rossi-Doria at the *Centro di Specializzazione di Portici* must also be mentioned.

Graziani's works can be described as both theoretical and applied. From the very beginning, his work showed a distinctive style and approach. To wit, consider his 1965 book, *Equilibrio Generale ed Equilibrio Macroeconomico* (*General Equilibrium and Macroeconomic Equilibrium*). Readers may recall that these were the years when neoclassical theory was being assailed on theoretical grounds for its internal inconsistencies with respect to the theory of capital and distribution. As such, the fallacy according to which the distributive shares of the various factors of production were paid according to their marginal contribution to production was exposed. This was a crucial blow, because without respect for these conditions, the system's natural equilibrium collapses.

Graziani, however, always preferred to take a somewhat different path. In fact, in his 1965 book, Graziani defends the Walrasian (instantaneous) general equilibrium system because it was considered a better representation of how the market works, and a superior explanation to the (then in vogue) 'proportional' macro-models of growth. Rather, Graziani challenges the basic assumptions of orthodox theory by rejecting the initial definition of the economic and social world as being populated by identical individuals, where consumers are sovereign, technology is exogenous and money is neutral. Large social or 'macro' groups matter, and corporate power is essential in a world of permanent imbalances and conflicts.

These fundamental ideas are at the core of his approach, even in works related to the study of Italian economic development. For instance, in 1969, Graziani published *Lo Sviluppo di una Economia Aperta* (*The Development of an Open Economy*), in which he argues that the competitiveness of an economy depends neither on factor endowments nor on comparative advantages. It is, rather, the choice of entering the world market that imposes the adoption of the necessary technologies, which in turn determines the dynamics of productivity and the labour force to employ, where workers can enjoy relatively high wages. The remaining workforce will have to find employment in sectors that produce goods and services that are not traded externally, in a circle of low productivity and low wages. The development and imbalances of the Italian economy are seen, in short, as inseparable aspects of a unique mechanism. This 'dualism' is exacerbated by an export-led growth strategy, which is a bearer of consequences both positive and negative.

The 1970s witnessed a radicalization of Graziani's views. The author did not hesitate to confront the divide between orthodoxy and heterodoxy, and shifted the focus away from the usual ground of the theory of value – 'subjectivism', of the Walrasian or Marshallian kind, versus 'objectivism', following Ricardo – to a less explored topic: the essentiality of the role of money in a capitalist economy. This went well beyond the particular case of the 'crisis' defended by Keynesians with their emphasis on money as a store of value. From this radicalization, in the mid-to-late 1970s Graziani published a totally renewed version of his influential textbook, *Teoria Economica* (*Economic Theory*), originally published in 1967. In this revision, Volume 1 dealt with prices and distribution (rather than microeconomics), while Volume 2 covered macroeconomics (by 2000, the books were in their 5th edition; the radical revision was in 1976 for the macro book, and in 1979 for the price and distribution book), which traced the uneasy coexistence of the 'compatibilist' and 'conflictualist' visions, with a special focus on the latter for the monetary heterodox strand of thought.

2. *Graziani and Italian circuitism*

2.1 *The beginnings*

Augusto Graziani was, with Bernard Schmitt and Alain Parguez, one of the founders of the contemporary version of the circuit theory of money (in the following CTM). As later it happened with Parguez, he has been (together with Claudio Napoleoni and Hyman P. Minsky) one of the authors who deeply influenced my way of thinking about economic theory, and also about the interpretation of the capitalist economy. His writings are characterised by a profundity and coherence together with conceptual innovations and intellectual integrity. His attitude was not that of a *bricoleur*, adding together contradictory pieces of the heterodox traditions, nor he had the usual vice in the tribe of alternative ekons of dreaming to become the adviser of a new Prince. He was, first of all, a critical economist.

I participated practically since the beginning to one of the formative experiences of Italian circuitism: the CNR Seminar Graziani organised in Naples, with monthly meetings, since 1981, until mid-1980s. But I already had a close knowledge of the former years, building his circuitist outlook, since 1977. Graziani, always very generous towards young scholars, even included an article of mine, summarising my reading of Rosa Luxemburg as a monetary circuitist as expressed in my dissertation, in a review article on Italian Economic Theory of the 1970s. As I shall show later, there is a parallelism between Graziani's development and Parguez's writings, but also differences. If my memory serves me well, it is thanks to Graziani that I met Alain at a conference in Nice organised by Augusto together with Richard Arena and Jan Kregel, whose proceedings have been published in France. Graziani's introduction is fundamental to get what really was the Italian approach to the (capitalist) monetary circuit.

This peculiar temporal window, which makes me a kind of dinosaur, i.e. an early Italian circuitist, makes me appreciate our approach very differently than the younger generation of Italian, and may be not only Italian, circuitists. Not so much, as it has been said, a particular branch of Postkeynesianism, nor as a theoretical scheme whose original purpose was to fight the Neoclassical Keynesians, Monetarism, New Classical Macroeconomics. Graziani rather taught us, together with a respect for true Neoclassicals, a structural Keynesianism embedding a Schumpeterian vision, behind which it was clear the Marxian base of the reasoning. But more than that – and it is this, probably, the dividing line with other

interpretations, I see Graziani and Italian circuitism as a critique first of all of the heterodox streams of thought, trying to find a way out of the blind alleys were the criticism of Neoclassicism has led the competing alternative economic theories.

The basic idea is that the capitalist process runs as a monetary process, that is as a sequence of concatenated phases: the flux and the reflux of money is the condition of real (re)production. Graziani knew very well this was an old idea in economic thought, which goes back to Quesnay and Malthus (as he wrote between 1977 and 1980 in two important introductions to books by Roberto Convenevole and Lilia Costabile). Even if we disregard the ghost of Karl Marx, the idea was taken up again by the great heretics within Neoclassicisms: Wicksell, Schumpeter, Robertson, and the Keynes of the *Treatise on Money*.

When the circuit approach resurfaced? The interest on this outlook rose again in the second half of the 1970s. Traditional Keynsianism was attacked, so to speak, from the right (Monetarism and New Neoclassical Macro), and from the left (the Neoricardian .surplus approach and the resurgent Marxism). These last two currents were particularly strong in Italy during the 1960s and the 1970s. The Italian young generation was also exposed to the influence of Postkeynesianism in the English variant (my reference here is mainly to the close circle of Keynes' younger friends, Joan Robinson, Kaldo, Kahn) or the US variant (Sydney Weintraub, Davidson; we may locate here, with qualifications, also Minsky and Kregel)

In my opinion, Italian circuitism did not develop as part of this heterodox galaxy – personally, I must confess, I am more and more uneasy with the same term heterodoxy; a diffidence I share with Parguez and Toporowski. Graziani rather chose to explore a different theoretical path, alternative - though not inimical - to the Postkeynesian vision, Neoricardianism and traditional Marxism. In the following, I then deal with three questions: the critique towards Postkeynesianism, and the same Keynes; the judgement towards the Italian debate in the 1960s and the 1970s; the original way a divide was built between mainstream and critical political economy.

2.2 *A critique of the heterodoxies, and not only a criticism of the mainstream(s)*

About the first issue, we need to remember that most affirmed that Keynes contribution was to be considered revolutionary only since *The General Theory* because only in that book the notion of involuntary unemployment equilibrium is discovered. The historical condition for this theoretical breakthrough was, of course, the Great Crash of the 1930s. The dominant version of Keynesianism, however, ended reading Keynes through Walras: involuntary unemployment was reduced to a disequilibrium occurrence, and theoretically at least market forces should re-establish sooner or later a general economic equilibrium of simultaneous exhanges. Another route was to put Keynes into Walras: something which is also destructive because with the auctioneer there is no room for transactive balances, and there is no reason why in what is a an economy where money is inessential there should be demand for speculative balances. This is the starting point of some non-walrasian approaches: for Grziani they suffer a radical weakness: while they insist on cash constraints to expenditure, they never venture to explain how money enters the economic system (through the financing of production); even less they bother to consider how this intrinsically monetary economy is at the same time a class economy, that is a capitalist economy (they do not clarify why the access to financing discriminates between capitalist-entrepreneurs and wage workers).

How Keynes fits in here? The point is that in the 1936 book the argument about "crisis", mass unemployment, poverty amidst plenty, fall on rentier's demand for liquid balances and liquidity preference and its effect on the rate of interest (together with fundamental uncertainty and the consequent violent fluctuactions in long-term expectactions affecting firm investment demand). So money matters, but only in the "particular", though crucial, situation of the crisis: not in the normal functioning of the market. Reading Krugman and Stiglitz in their most radical writings one ends up with a similar impression. The link between money, capital accumulation, and distribution has vanished. Bye bye "general" theory.

Let us go to the second topic. The Neoricardian and Marxist heterodoxies, though very much in contrast, shared (and the more so in Italy), a common vision of the evolution of economic theories: Ricardo and Marx were both theoreticians of the class division and of the surplus; they were followed by the Marginalist counter-revolution based on methodological individualism and marginal productivity. Sraffa with *Production of commodities* marked a reprise of the Classical economics paradigm, amended from the analytical limits due to the adherence to a now obsolete labour theory of value. The Neoricardian approach could profit from the demonstration of some logical errors in Marginalism, paramount among them the aggregate notion of capital as source of profits/interests. The clash between Neoricardianism and Marxism revolved on the Ricardo/Marx relationship, and then on Sraffa's position between the two ancestors: continuity, according to the Neoricardians; discontinuity, according to the Marxists. Both lost in the transformation problem, the two schools did not realise that their criticisms had been either circumvented or emptied by a mainstream which was able to transmogrify – so much so that it became dual. A reason for this had been the circumstance that money was not explicitely present in Sraffa's outlook of an economic theory, and that the monetary aspects of the Marxian system had been silenced by the same Marxists (with very few exceptions).

The third point: Italian circuitism thought that the demarcation within economic theory should not be seen in chronological terms. The true alternative ground for economic theory was in those authors underlying the class macro-monetary theory of present society. In Graziani's CTM money must be understood first of all as a power device for the class of capitalist-entrepreneurs: the aim was that of providing a rigorous analytical reconstruction of the sequential process of creation, circulation, and destruction of money. This meant to get rid off of the idea – still present in the same *General Theory* – that the stock of money, being "given", was also exogenous. A circuit of this kind was very different from the one described in the opening pages of almost any (macro-)economic textbook, the only exception probably being the one by Erich Schneider, where you see only households (instead of workers) and firms (instead of capitalist-entrepreneurs) but no separate banking sector. Indeed, the system of banks has a key role in the monetary circuit. Capitalist firms produce commodities (thanks to the hiring of labour-power, and then to the advance payment of a money wage bill), but they do not produce (credit-)money. Banks create money (in the forms of loans financing all production processes), but they do not produce commodities.

Money is not just a receipt voucher for a production which has already being accomplished, but it also something more of a claim ticket to enter into the market. It is the necessary monetary means which only allows the accumulation of capital to begin and go on. It is essential and non-neutral even in a capitalism not experiencing crises, since it is this prior access to purchasing power before any production being done which helps to determine not only the level but also the composition of output, and as a consequence the (income and wealth) distribution. Behind Graziani's distinction between the firm sector as a whole and the

banking sector as a whole we hint the separation(-in-unity) between "industrial" capital (all the production branches from which gross profits emerge) and "financial" capital (interest bearing capital). The novelty is that, seemingly against the original presentation of Marx, money is not essentially a commodity. Rather, as in the forementioned Wicksell, Schumpeter, Robertson, or Keynes' *Treatise on Money*, money is a sign and is credit. To understand its nature we have to refer to a "third" intermediary (nowadays, a bank) marking as "final" the payment by the buyer to the seller. What Graziani had in mind was typically the buying and selling of labour-power: with the banking sector (the "intermediary") financing the firms (the buyers) hiring workers (the sellers). The payment by the firms to the workers pass the money to the latter, so that, though the payment is final, firms remain debtors and workers become creditors to the banks. When workers buy consumption goods or financial instruments from the firm sectors, the situation is reversed and the initial finance is (totally or partially) cancelled as a consequence of this final finance. Money creation turns into money destruction.

The contribution to this approach given by Wicksell was the indispensable idea that the banking system may create money *ex nihilo* through the finance of production, without any need (better, without even the possibility) of the existence of saving as prior money holdings. Loans comes logically before deposits. Later Schumpeter stressed finance of innovation, and clarified that inflation, more than a uniform increase of prices leading to an upward trend in the general price level, should be looked at as a relative price variation favouring some subjects at the expense of the others (and, most crucially, one fraction of industrial capital against another). Building on Wicksell and Schumpeter, Robertson and Keynes proceeded arguing that the capitalist firms' real decisions about investment demand and the qualitative division of output were independent relative to wage workers' and households monetary decisions relative to the allotment of their income between consumption and savings. The same conclusions could have been reached from starting from Marx and Luxemburg, as Kalecki did. The "autonomous" capitalists' expenses for investment and consumption fixed the amount of their profits; their market power (expressed in their profit margin) defines the profit share on income; from here it is possible to know the level of output, and then production and employment.

From here it is easy to understand the how and why of the judgement of the early Italian circuitism relative to Postkeynesianism. The Cambridge tradition had the merit to extend the *Treatise on Money* view on the theory of growth. The conclusions about output composition and distribution were similar, but without addressing very much the monetary analysis (a similar complaint was raised towards Kalecki): there were exceptions, like a chapter in Joan Robinson's *Accumultion of capital*. Kaldor repeatedly stressed the endogenity of money, but too often this went along attributing the nature of money to the bilateral debt-credit instruments created inside the firm sector.

The US PostKeynesianism was more developed in his monetary approach. But in the end it too stopped at stressing the role of money as store of value, not seeing the more fundamental one of claim ticket to access the market, and hence as the key instrument to finance capitalist production and accumulation. Minsky contribution could not be completely identified with US PostKeynesianism, and indeed this author very much preferred the label Financial Keynesian. In a sense, Minsky was the more interesting, connecting investments, finance and business cycles, with Schumpeterian evocations and some flavour of the Treatise on Money on the background. It was however difficult to agree with him that in prosperity there was a necessary increase in leverage for the private firms sector, leading mechanicaly to financial instability.

3. *The basic theoretical scheme in Graziani*

3.1 *The abstraction of a "pure" capitalist economy with only private agents*

From here it easy to build the basic circuitist scheme in Graziani. As a first approximation, it considers only private agent: the banking sector (it is possible to include in it the Central Bank, as bank of the banks), the firm sector (the production is divided in consumption goods, available to workers, and new capital goods, not available to workers), the workers (allotted in the two sectors: hence, part of them spend "necessary labour", the labour time contained in the commodities bought by workers; and part of them spend a surplus labour, the labour time contained in the surplus).

The creation and destruction of (bank-)money is strictly endogenous: there is no creation of money from banks if there is not a demand for finance to banks. The supply of money may be controlled, but only if demand is over the potential supply, and there is a queue of unsatisfied borrowers (credit rationing). This perspective is, of course, opposite to the idea that the stock of money is a multiple of an exogenous base money, refurbished by financements of government deficits on the open market.

In its basic scheme Graziani's CTM does not consider the State. The reason is very simple: it helps asking how money can flow into the capitalist sequence abstracting from budget deficits; and it demarcates from traditional Keynesianism (a simple look at how money is treated in any macro textbook would clarify why). The payments are regulated as in pure credit system, without cash but through banks' *virements*. The bank sector as a whole is like a single bank, and has unlimited capacity to create money. There are no "technical" (but only institutional) constraints to potential money supply. The same result follows if we consider multiple banks, which however expands together at the same pace and maintain their share in the market for deposits. As the same Mises wrote, a pure credit system is the proper abstraction for the inquiry of a true monetary economy.

Wicksell insisted that in this setting waves of cumulative inflation would not face any automatic readjustment mechanism. Mises first, and then the same Hayek, thought this conclusion to be perfectly valid for the monetary side of the scheme, so to speak (it should be modified in a mixed system, cash and credit, where inflation, through internal and/or external convertibility, determines a compression of reserves and hence of money supply). For them, however, a readjustment mechanism exists, but on the real side: the changes in relative prices and consumer sovereignty would force an abrupt stop at excessive investment pushed up by a rate of money interest which is "too low". As a policy measure, it is appropriate to
Constrain banking money creation to saving deposits (something which is impossible for the CTM, since deposits follows loans), or going back to a *gold standard* with full convertibility (a local approximation is the euro system as it is idealised in the present structure), or introducing *free banking* (the late Hayek accepted this view, and Mrs. Thatcher too in her refusal to the single currency). Italian circuitism was more on the side of Neisser for whom in a pure credit system and with *free banking* the push for inflation could become irresistible, since banks have the incentive to expand credit together acting like a single bank, without any risk to lose their clientele. This is exactly one of the reasons why a Central Bank has a rationale, introducing an institutional constraint like a compulsory reserve rato.

What's for sure, the early Italian circuitism saw in inflation not only (and, may be, not even principally) the result of a distributional conflict or of a cost-push, like Neoricardians or PostKeynesians, but something crucial to give way to capital accumulation, through something akin to "forced saving" at the expense of the consumers and in favour of firms (like in Robertson, or in Keynes's *Treatise on Money*), and/or a compression of the purchasing power of traditional producers in favour of innovative entrepreneurs (like in Schumpeter). Hayek and Austrians remarks about the consumer as the sovereign were seen as ideological phantasies: from this point of view, Graziani sides with Sraffa remarks against Hayek in 1932.

However, Graziani's CTM considers that even outside a pure credit system money can almost always be reduced to debt arising from a triangular relation. In a mixed money system, where there are banknotes of the Central Bank, this latter is a bank of the banks: one of the way money is created and enters the system is when (commercial) go into debt with the Central Bank. Until now we have considered that all money is inside money (i.e., internal to the private sector). Things do not change if we introduce the State and consider outside money. The outside money financing public debt is nothing but a debt of the Government towards the Central Bank – that is actually how Central Banks had their historical origin, Central Banks as bankers of the sovereigns.

If money is endogenous, the rate of interest is exogenous: this point relates the CTM with PostKeynesian horizontalism. Truth to be told, some Italian circuitists had sympathies for some version of "structuralism" and a money supply rising with the rate of interest. We also find something like that in the first Minsky. In fact, however, we are talking in a point in time. If we adopt a Schumpeterian view, more appropriate for Graziani's vision, we then could argue that both the supply and the demand for bank credit money shift procyclically, so that the end result is exactly the same as in horizontalism.

3.2 *The unfolding of the circuit*

Let us go back to the simpler circuitist basic scheme. Money flow into the capitalist economic system to activate the production of commodities: this initial finance to production is needed to produce consumption goods as well as investment goods. It is this power over money which allows to the joint action of bankers and entrepreneurs to determine what happens in the real production process and to fix the distribution of income: what, how much and for whom to produce. Systemically this result is unconscious an unplanned: but it depends on the class structure of the system (and indeed the Kalecki profit equation point to the same theoretical result).

As it is well known, the circuit is composed by three phases. At the opening, the banking system creates money *ex nihilo*, allowing firms to cover their aggregate production costs. In a closed economy without the State, this can be reduced to the money wage bill. If we consider the internal intra-firms payments, we should add the money necessary to finance those exchanges. Graziani, because of the nature rigorously macroeconomic of his scheme, prefer to cancel the money financing internal exchanges within a macro-agent. In this initial first step of the monetary circuit, on the labour market, firms and workers fix the money wage and employment, while simultaneously, on the monetary market, banks and firms, fix the short-term rate of interest and the amount of financing. In a more sophisticated model credit rationing could be added.

Next step, capitalist firms translate into actions their decisions about real production, which have been monetarily ante-validated by banks, concerning level and allocation of employment and which correspond to level and division of output. Once production is closed, households' choices relative to the division of their money income between consumption and saving are taken. For Graziani's CTM the price of consumption goods comes out on the consumption market from the confrontation between a given real supply (consequent to capitalist-entrepreneurs' decisions over production, which are in real terms, as in Keynes' *Treatise on Money*) and a monetary demand from consumers (consequent to households-workers' decisions over their income, which are in money terms, as in Keynes' *Treatise on Money*). Since the money wage has been fixed at the beginning of the circuit, the real wage corresponding to that money wage is dependent on the prices of consumption goods, hence depends indirectly from producers' sovereignty. The determination of the price of capital goods is (against Hayek, and following Keynes) completely independent: it relies on the (future, hence uncertain and subject to firms' long-term expectations) flows of net profits expected from the acquisition of new capital goods, and the rate of interest.

Money saving can be channelled on the financial market to buy securities issued by firms: if they are bonds, they gain a long-term interest rate; or saving may be held as liquid balances. It is then possible that the entire amount of initial finance goes back to firms thanks because final finance is the same as finance to production. But it is also possible that part of initial finance goes to increment deposits, and the circuit does not "close". The firm sector results indebted towards the banking sector, and there is a residual stock of money corresponding to households' credit.

It is clear that the CTM's perspective is that the financial market has not the function to finance investment demand: rather it overcome the nuisance for the firm sector originated by the leakage constituted by saving, and to get back as much as possible of initial finance. It is also crystal clear that - if we follow Schumpeter's way of thinking these processes *ab ovo* and if we abandon the Classical/Wicksellian assumption that today's investment (identified as the real wage bill) correspond to yesterdays real saving and accept Keynes on the conceptualisation on the wage - without the initial debt with banks capitalist production just could not start, the accumulation of capital would be an illusion. Banks simply cannot get prior money savings from the ciruit since they are not there yet, before their loans. The finance of investment demand is ultimately given by real saving, but this latter cannot be reduced to voluntary thrift and must include forced saving (i.e., firms non-disributed profits); it is of course possible, in an effort of "realism", to add a monetary financement of investment, but this would remain internal to the firm sector, hence it is simultaneously given back by the firm sector to the banking sector.

A quite radical conclusion by Graziani is that households' financial wealth does not correspond, for the working class, to true wealth – though this may be true for the individual (a key point of the CTM is that the macro logic subverts the micro logic, and hence that the methodological standpoint should be one of providing macro-foundations to microeconomics, not the other way around). The workers as a whole cannot get more real goods than offered by capitalist firms "liquidating" their total savings at the same time: an increase of real consumption after a reduction of saving propensity depends entirely on an autonomous decision from the firm sector to increase the supply of wage goods. This is true not only for the money wage bill (the real counterpart depends on firms' choices), but also for the money interest bill: for example, the interests accruing to household from their bonds can be spent on the consumption goods market, or on the financial market, or be held as a liquid balance in

bank accounts, exactly as for money wages. Long-term interests are not, therefore, a true burden for capitalist firms. Even shares represent a fictitious ownership, for the wage earners, as long as decisions over real production escape the control of workers – as it is inevitable in capitalism (Graziani thinks that the influence of workers on firms or government decisions pass through non-market actions, either conflict in production or struggles in society or political interventions: a point not far from many writings by Kalecki). The interest paid to banks are instead a share of gross profits, as in Schumpeter (or, Marx would say, a detraction to surplus value).

A contested argument by Graziani is that in his circuitism gross profits are earned as if "in kind" by capitalist entrepreneurs. It is not possible to get from the circuit more money that it has been injected. As I said, we can be less rigorous and admit an inflow of fresh money to finance temporarily the demand of new capital goods, which will be injected and destroyed simultaneously. This wuld mean a monetary realisation of surplus value. Note, however, that Graziani would argue that the more rigorous approach do not depart from Marx, since the latter distinguished *Geld* (*argent*, *denaro*, *money*) from *Münze* (*monnaie*, *moneta*, *currency*). *Geld* is abstract wealth, and here it would correspond to the new capital goods produced and exchanged, as long as they promise in the future an adequate surplus value, that is to act as "capital" in Marx's own definition (if these expectations are not maintained, likely the capitalist process would be interrupted by a crisis, manifested by a decision not to start a new circuit). The M-C-M circuit going to the initial finance to final finance deals with something else, with *Münze*, so it has not to do, properly speaking, with money but with currency. More serious is to understand how capitalist firms can pay interest as a monetary amount to banks. Beyond the technical details, the point is to understand how "financial" capital can get a share of the surplus product coming from "industrial" capital.

3.3 *Opening the circuit*

Other approaches have been proposed (not alternative to this prior abstract theorisation, but as more appropriate concretisation). One is is to imagine that, in an open economy, a new inflow of money comes from abroad: the reference is to the net exports of the capitalist area towards the non-capitalist area (as Rosa Luxemburg somehow suggested in her economic writings). This would "displace" the problem of realising in money both the surplus value and the interest (the difference between them being the profit of enterprise). Another complementary approach is to imagine some domestic (or internal) net exports: the reference is to government budget deficits financed with an inflow of new money from the banking sector, which, as we know, includes the Central Bank; and the latter, of course, may directly or indirectly provide the new finance (Kalecki, in the Thirties, generalised Luxemburg reaching similar, but more interesting, conclusions than Keynes). Here, as with the argument about the Central Bank, Graziani's CTM shows to be flexible enough to introduce the crucial role fo the State in a true monetary economy, even though the basic and pure abstraction on which the scheme is built is - as it has to be – a pure capitalist economy with only "private" agents.

In a closed economy with the State is it possible to have a surplus of the private sector only if the public sector is in deficit. When we deal with an open economy an excess of saving over investment must be identical to the sum of fiscal deficit and trade surplus. This a point which comes directly from Kalecki but it has been developed and incorporated in Wynne Godley approach. As Jan Toporowski, has noticed the scheme may be qualified considering Steindl's amendments. Steindl disaggregate private saving, distinguishing households' savings and firms' saving (i.e., retained earning). An increase in households' saving lead to a fall of of

capitalist firms profits, while a decrease (like the one induced by indepted consumption) is good for profits, unless there is an increase (decrease) of net exports, o an increase (decrease) in government budget deficit.

4. *French Circuitism*

When Graziani presented his own version the CTM was already alive and kicking in the French debate. An ancestor was Jacques Le Bourva: probably the first full-grown instance of circuitism was Bernard Schmitt (and then his pupils Alvaro Cencini and Sergio Rossi): this author however later qualified themselves differently their own approach as the theory of money emissions (or quantum economics). I have no time here todealt with this line of thought.

The other founder of circuitism properly speaking, as Graziani, was Alain Parguez, who was very influential (for example, on Marc Lavoir, Mario Seccareccia, and Louis-Philippe Rochon). I see an undeniable parallelism in the evolution of Graziani and Parguez, and also in their theoretical references (e.g., Marx, Keynes, Kalecki).

4.1 *The early writings of Alain Parguez*

In 1975 Parguez published *Monnaie et Macroeconomie: Theorie de la monnaie en désequilibre*. There he confronted and criticised the attempt to broke with the Neoclassical Synthesis and traditional Keynesianism through a disequilibrium macroeconomics, and offered a first version of the economic processa as a circuit. Together with an essential temporal dimension within the single period, Parguez presented two main theses. First, that the buying of new capital goods required a specific finance from banks (which allows to avoid the so called profit paradox relative to its monetary realisation). Second, that there is no natural "scarcity" of money since it is created *ex nihilo* by the banking system. From here it follows naturally his battle since the early 1980s to affirm the principle that wealth creation is mortified by austerity policies.

According to the first point, profits should not be seen as the money excess between money withdrawn from the circuit and money injected in the circuit, but rather that between money receipts from sales and the initial buying and selling of labour-power: the influx of money goes beyond the money wage bill, because at the opening of the monetary sequence firms who wishes to order new capital goods from firms producing them will take a loan from banks. The necessary identity between the influx and reflux does not contradict the presence of a money profit.

About the second point, we can add that the attempt to control the money supply materialises in high interest rates, favouring rentiers at the expense of the productive sectors of the economy. The blind pursuit of government surpluses is inevitably disappointed because of the consequent recessionary effects on public investment and consumption, and this cannot but backfire on private investment, employment, the wage bill, and the prospects for future growth. The outcome is that the interest burden increases, income decreases, and bad" deficits accumulates, without any upsurge in citizens' authentic welfare.

In more recent years Parguez came nearer to so-called Neo-Chartalism (NC) and Modern Monetary Theory (MMT): Randall Wray, Warren Mosler, Stephanie Bell Kelton, Matthew Forstater, among others. The points of contact are on the definition of the nature of money,

that those approaches see as a creature of the State; on including in the circuit from the beginning the presence of the State; on challenging the view that taxes finance public spending, while the truth is the other way around. If I understand well, this is what Parguez calls a "generalisation" of the CTM.

Let us go a bit deeper on the theme of taxes. Exactly as firms inject in the economic system the money from which income is generated, and hence finance logically precede saving, so the State through the government expenditure inject the money which can be later recovered by the State throught taxes. The principle is the same in both cases. Influx/reflux in the circuit: the idea that government, always and ever, first finance expenditures on its own budget and afterwards collett taxes is logically equivalent to the circuitist principle that loans make deposits, and not viceversa. This point is not a "concession" to NC or MMT: it was rooted in circuitism (and in Graziani's version) from the beginning.

4.2 *The later developments of Parguezian circuitism and the essential rôle of the State*

The basic idea in Parguez seems to be that, while money is created ex nihilo from banks, this happens because they finance subjects that increase the expected value of real wealth. Only after the expenditure the real wealth will be formed, and then it will be possible to give back the money lent. Money as finance has (real value) only as long as it produces wealth: and this, in its turn, strictly depend on a demand-driven process of production. Any money held as a store of value at the end of the circuit, is without value: it will get it back only as long as it is redirected to the circle expenditure-production.

The agents which need to be finance are firms, households, the State. Firms need finance to produce consumption and investment goods; this latter will be financed according to the expectaions that they are profitable, and capable to pay interest to banks. Households needs finance to by houses of durable goods: this is a kind of consumption that, on the one hand, originates profits for firms, but that also, on the other hand, on workers' future income, hence exactly on wage increases that firms could grant on the basis of the expected profits. The Government needs finance to activate an expenditure providing society with a desired amount of public goods, which is possible only if the State is able to get a certain share of labour-power and resources (inclusing capital goods) from the economy.

The key point is that private investment expenditure is surrounded by a radical uncertainty: it is because of this that the State is crucial. Only government deficit spending has that degree of "autonomy" which can reassure firms, so that anxiety does not lead them into a trap, leading to a stationary economy, if not worse. The way out provided by household debt is very limited unless there is a substantial rise in private investment, but then, mediately, by State deficit spending. The long-term horizon of firms is too uncertain for assume that they confidently launch themselves into an acquisition of new productive capacity through net investment demand; nor they can create money like banks, which however depends on demand for bank credit. When the State "retrenches" firms are scared: their reaction is to reduce, if not halting, spending, to increase their profit margin, to squeeze the wage bill: the road to austerity and depression. The same banks depend on a kind of implicit guarantee of the State: and the Central Bank is in fact nothing but the banking branch of the government.

Money is therefore not just sign-money, as a debt of banks towards themselves. There is more. Banks need that these liabilities are somehow "guaranteed" by the State, and this is granted by the convertibility of them into Central Bank money as agent of the State. Banks' liabilities

are as good as legal tender. It is "as if" all money is nothing but fiat money, even when it is not issued directly by the Treasury. It is clear that in this world the only sensible constraint to money creation should lie in the formation of wealth, since this latter is the true aim of the former. Money emerges to generate new production, either for direct consumption, either for indirect consumption.

4.3 *Ex ante good deficits versus ex post bad deficits*

A circuit peopled only with private agents doesn't avoid the circle of scarcity which is typical of a command economy. The last goal of the State in a true monetary circuit economy is to provide wealth to citizens, thanks to direct employment or direct production of material and immaterial goods. At first, deficit government spending occurs in the same way as firms' spending: in an-ante deficit: the State deficit has to be directly financed by the Central Bank as a branch of the Treasury, just like the private investment has to be initially financed by commercial banks. Just like bank loans are not based upon a prior collection of money deposits, so public spending is not built on a prior collection of taxes.

This means that we have to distinguish carefuly ex-ante planned deficits (ex-ante equal to total government expenditure) from ex-post deficits (an accountancy notion, detached from the former, and consequent to the amount of taxes the government decide to extract from the economy). State deficits are sources of profits for firms: not only directly (the government itself buying products from firm, or its employees or recipient of subsidees); but also mediately, because of the reduction of uncertainty and the establishment of a safer long-term horizon (this raises private investments which turns into profits). When the government issue State securities, it allows banks to buy them: the effect is to block a fall in the rate of interest because of excess reserves (when the State is spending), and to refurnish them with safe assets (since a sovereign State cannot go bankrupt). This is another positive effect of a deficit spending policy, together with providing also households with sound financial assets.

Money is not, primarily, unit of account or store of value. It is instead a means of getting hold of real resources. Even if households are allowed to access bank financing, firms and the State have a privile

5. *Internal debates: are the differences substantial?*

Alain Parguez put forward some criticisms to early circuitisms: they involve not only Graziani but part of his own original theorisation. Today he characterises as surprising the limitation of the basic model to only private agents, which leads to discard the essential rôle of the State. Second, it is doubtful to reduce the initial finance in the aggregate to the wage advances. Third, and as a consequence, the mistery of the non-monetary realisation of the surplus, something equally shocking.

By and large, I must confess, I do not agree with this charges against Graziani and his own early thinking. In the following I try to explain the reasons of my disagreements. These reasons are however hidden in my exposition of some key points of Graziani's CTM.

5.1 *Some of Parguez' criticisms towards Graziani*

It is of course true that Graziani (like Wicksell and Schumpeter, actually; and also Marx, for what is worth) starts from a basic abstraction where there are only 3 macro-agents: industrial capital (i.e., capitalist firms as a whole), financial capital (i.e., the banking sector), the working class. The motivation, however, is very simple, and no trivial at all. Graziani's circuitism has only one object of knowledge, capitalist market economies: the world we live in. That world is intersected by a class divide between capitalists-entrepreneurs and wage workers (or anyhow, workers dependent on capital whatever their status). Firms need finance, and so it is argued that industrial capital cannot exist without financial capital. Actually, the same ownership of the means of production by capitalist firms is more a result of their privileged access to finance than a presupposition due to some original capital (if we stay safely on a logical way of thinking, and avoid going into history at a too immediate stage of the argument).

Nature and function of money need to be argued as essential and determinant in this analytical context: and the same is true for the non-neutrality of money "out of crisis", even with so-called full employment: Graziani titled one of his most famous essays "Moneta senza crisi". As should be clear by the argument I gave in prior paragraphs, this does not entail that Graziani or most circuitist authors have ever dreamt that a pure capitalist world of only private agents could ever exist. It is the other way round: only thanks to that basic abstraction is it possible to understand the true fundamental import of the economic role of the government(s), and to see how the State cannot be expelled from the inquiry about capitalist economies.

Graziani's CTM shows very well that the State has nowadays the exclusive (direct or indirect) command over the emission of banknotes, and it is crucial in forcing the acceptance of something as money. Moreover, the State is seen as the only agent which can extract *seigniorage*, i.e. which is capable to get real resources paying with a simple IOU (bilateral debt-credit instruments): this should be excluded in exchanges among private agents. Moreover, the unlimited credit potential of the banking system can be deduced from the circumstance that the latter – as what it is, a whole: a system – is just a clearing house at the heart of the payment system. It is like a single bank covering the entire markets of deposits. And this can be reasonably argued before introducing the State. The visibility of the distinction between banking sector and firm sector has to be argued before introducing the State or a fractioning of the economic space to see that the aggregate "macro" analysis cannot be pursued reducing the subjects to 2: "households" and "firms". Once the agents are 3, having introduced the banking sector, there is no difficulty in considering the presence of the State.

Summing up, for now: an abstraction is exactly that, an abstraction. It has nothing to do with a (too immediate) realism, or an historical reconstruction (very often the historical sequence is opposite to the logical sequence), or an institutionalist representation of capitalism (taking too much for granted). It is rather from that abstraction that a *histoire raisonée* can be built, and that gradually the logical and historical conditions allowing for reproduction and crisis can be put up together.

Let us pass to the second and third criticism of Parguez towards early circuitisms. They are intimately connected. In a closed economy without the State it is not possible to recover more money than injected: hence, if initial finance is restricted to the money wage bill, there is no monetary realisation for gross profits, or possibility to pay interest to banks as a monetary magnitude.

In my view, the logical schemes in Parguez and in Graziani are almost the same. The true difference has to do with the degree of aggregation. Parguez underlines a very important point. I am referring to the fact that the system of firms is competitive, that is we deal with plural producers. This is one of the reasons why in Parguez there is a different definition of the initial financing. But if we begin from a higher aggregation, and the firm sector is like one integrated firm, that single firm has no need of external financing from banks since any non-labour input is internally provided.

As I argued before, there is however no difficulty in modifying the scheme and allowing for a bank financement of intermediate goods, or of capital goods (at the moment of the order, that is at the beginning of the circuit; or at the moment of delivery, that is at the end of the circuit). This money circulates within the sector (Luxemburg would have call it an internal business), and it is simultaneously created and cancelled. Interests paid to the banks on the initial finance they provided corresponds to a real partition of the surlus between industrial and financial capital: it is only a technical issue to see how to give monetary garb to this. On my side, at a lower level of abstraction, I see in the Luxemburghian/Kaleckian stress on net exports and/or on domestic net exports the way these problem are "practically" unravelled.

5.2 *Much ado about nothing?*

The truly interesting question is another one, in my opinion. What is the fundamenta reason why Graziani demarcates financing to production (of consumption plus investment goods), reducing it only to the money wage bill advanced to workers, and financement of investment (demand)? The answer is not very difficult or strange, I think. Reading financing to production to the buying and selling of labour power shows that the unique external "commodity" which capitalist firms need to start production is labour power, which is attached to workers as their bearers, who also provide living labour. Assuming that the demand for new capital goods does not, rigourously speaking, require the injection of a new bank financing, stresses that here we are talking of a merely internal business among individual firms within the aggregate of industrial capital.

The way the argument is proposed reveales, under the Keynesian/PostKeynesian language, the presence of an hidden Marxian stance. The consequences are not difficult to draw. The "valorisation" of capital – its ability to get more abstract wealth: to get a surplus to be shared between industrial and financial capital – can be attributed only to a macro-social "exchange" between capitalist firms and workers as living bearers of labour-power. Individual exchanges between capitalist firms have nothing to do valorisation as such, but on how what is extracted from workers (who just get a given class real wage fixed by firms, and conditioned by class conflict) is shared between them and with banks. Behind gross profits (i.e., surlus value) you have surplus value. A conclusion on which Parguez fully concurs.

That is why Graziani wrote in 1983 an article on Marx whose title is self-explanatory: "Riabilitiamo la teoria del valore" (Let's rehabilitate the theory of value), where Marx is read as a macrosocial theorist of class exploitation, and where it is affirmed that the transformation problem is secondary and irrelevant.

If we want to find a substantial difference between Graziani and the late Parguez, between early circuitism and a generalised theory of the monetary circuit, we have to look elsewhere. Graziani's have always proposed a positive analysis of the role of money in shaping capitalist accumulation and class conflict. The late Parguez seems more interested in stressing the

normative aspect of a redefined CTM, showing how a "true" circuitist monetary economy may escape the scarcity trap where austerity lead us. Put in this way, the two visions may perhaps appear complementary, rather than in contrast. The question remains if the monetary production economy Parguez is talking about is a capitalist economy, or not; and if yes, if it is a viable capitalist economy in the long term. May be that if the answers is yes also to the second question the contrast turns out not to be on the analytics of the circuit, but on the vision behind the different presentations.

6. *The Circuit Theory of Money and the economic policy debate*

This latter argument may be clarified if we look at some of the uses that Graziani has done of his CTM in addressing and criticising Italian economic policies since the 1970s. What's for sure is that the conclusions were significantly heretic, then as now even in alternative economics circles. Suffice to say that an edited book on Graziani's economic policy view by a prominent circuitist in the late 1970s-early 1980s does completely cancel them. Even among younger Italian circuitists these positions seems totally forgotten: rather the focus seems to find something more akin to traditional PostKeynesian positions.

6.1 *Graziani's circuitism on economic policy*

In the long 1970s, during the Stagflation crisis episode, Graziani clarified how price increases allowed not just a redistribution from the wages to gross profits, but also a jump in the share of bank interests at the expenses of firms, reducing their net profits. Indeed, as long as firms need to refinance themselves from banks, the latter are automatically indexed to price-and-wage inflation, because it translates in higher demand for financement. If, following the so-called Fisher effect, nominal the bank rate of interests is raised following the rate of change of prices, what is going on is a vicous double indexing. Actually, what was going on was a redistribution from industrial capital to (bank) financial capital: what looked like a compression of surplus value was instrumental to launch a dramatic capitalist restructuring in the production arena and in society as a whole.

In the 1980s, when State deficits exploded, Graziani gave a similar unconventional interpretation, all over the map of economic theory. State deficits helped firms to get money "as if" for free, reducing if not cancelling the obligation to get the initial finance (charged with interest) from banks. Firms' balance sheets ameliorated, while at the same time the psychological terrorism about public finance accelerated the attack on labour (both the compression of the wage and the rationalisation of the labour processes).

In the 1990s Graziani showed how both the policies of fixed exchange rates in regional areas (like the European Monetary System: 1980-1992, especially 1987-1992) or the devaluations (like, in Italy, in 1973-1979, and then 1992-1995) were set against workers' interests, since they were isolated from structural interventions, industrial and credit policies, qualification of the content of the public expenditure. No intervention on the exchange rate, one way or the other, was resolutive. Economic policy should build better real conditions for producers (making industry competitive on quality and not on the wage cost) and providing better welfare for citizens in kind rather than through monetary subsidies.

Coherently with his theoretical scheme, Graziani suggested that the growing household indebtedness was in truth an indirect, but effective, substitute of initial finance for firms: it is

only one step to argue that in this way a new kind of autonomous demand (indebted consumption) is introduced in the system, and that a further pressure on workers is constructed. It is not to hard to imagine that this reality has to be coordinated to the capital market inflation of the last decades to get a more convincing picture of contemporary capitalism (so-called Neoliberalism) and its crisis.

Graziani taught us that behind debt-credit relationships are hidden power relationships. The list of Graziani's position I reminded is dramatically short: but it suffices to show that we have always dealt with policies, dependent on State interventions: which makes quite doubutful the charge of neglecting the State in his circuitist perspective. What Graziani does is instead looking at how the State actually shape class relations, how it influences the relative positions of fractions of capital, how it affects nations and areas.

6.2 *Alain Parguez and the good management of public finance*

Parguez's reasoning is developed on two lines: the criticism of austerity policies, at least since Mitterand; the heroic attempt to show a different way out. I am probably too influenced by Marx and Schumpeter to find totally palatable the polarisation that Parguez proposes between a Malthusian society and a "good" monetary circuit economy. I do not think that Neoliberalism has been truly stagnationist. But for sure Parguez's alternative economic outlook to me sound quite "socialist", and I applaud it. So, I am reclaiming Graziani as positive analyst of capitalism and Parguez as proponent of a better society.

Let me extract a long quote from a chapter Parguez published in a book edited by Giovanna Vertova and me. There he asks what are the conditions of existence of a well-managed State and of a sound public finance:

> The answer is straightforward: through its fiscal policy the State must be the anchor of a true long- run growth bestowing a rising welfare on society as awhole. Since true increasing welfare requires true full employment, which means the inexistence of income rationing for the majority of the people, the sine qua non of true sound fiscal policy is that it generates permanently that true full employment.
>
> The State deficit can be the ultimate foundation of a true stable growth generating genuine full employment. Since State expenditures contribute to the generation of national income while taxes have the inverse impact, it is a pure national accounts identity that the ex post State deficit is identical to a net creation of income for the private sector as a whole, residents and non- residents. It is tantamount to another pure accounting identity: the State deficit generates an equal surplus or net savings for the private sector as a whole (household and corporations, residents and non- residents). Assuming a balanced budget, net new savings of the private sector are zero. It is worse if the State decides to run a surplus to pay back its debt: the surplus or net new savings of the private sector becomes negative.

It is here fundamental the already mentioned distinction between good and bad deficits:

> Deficits must be deemed Bad when they are not the outcome of a long- run policy targeting the creation of a useful and productive stock of capital, either tangible (all kinds of infrastructure, for instance, and equipment that will never be created by the private sector because it is beyond its ability to bet on an unknowable future) or non- tangible (recruiting people working in advanced research, health, teaching: sectors where real capital is labour). Bad deficits may happen in two interwined scenarios:
>
> ● the shock- therapy scenario, the like of which has been imposed on Greece: the collapse of the economy because the cuts in expenditures generate such a fall in tax revenue that deficits appear again and could rise;
>
> ● the long-run policies of deflation scenario: whatever the effort to get rid of public employment and cuts in public investment, the government cannot stop the collapse of tax revenue and abolish its deficit. Bad deficits do not reflect the growth of the stock of social capital. Private agents expect more cuts, more poverty, so they

abstain from consuming or investing.

Good Productive deficits reflect a long- run policy of accumulation of social capital. They are planned. Their long-run impact is always positive, and they generate accelerating positive expectations for all private agents, residents and non- residents. They are the last resort driving force of growth. Good deficits are backed by the issue of a public debt that can be self- financing, while being a gift to the future. National income is generated by previous expenditures. Like households and corporations, the State is obliged to spend before getting its tax revenue. Income- generating initial expenditures are to be financed by money creation and pre- existing net savings. These net savings have been created by previous State deficits, as will be explained. Since a State cannot save out of a surplus or net public saving, it is obliged to fund all its expenditures out of money creation by the banking system.

It cannot be said in a better way. I agree, and I am convinced Graziani himslef would agree. These quotes are a kind of summary of many things reviewed in this paper. And the economic policy perspective is not far from Minsky's way of reconciling Keynes and Roosevelt, a Keynesian New Deal through an authentic socialisation of investment. We may wonder, however, if these proposals are compatible with capitalism as we know it. I would rather say that these proposals, though being fundamental to answer the social and economic crisis we are currently living, goes against the existential nature and existential conditions of capitalism: they more look like transitional policies to a democratic socialism.

[***Conclusions***: to be written]