

Enrico Bellino, *Production, Value and Distribution: A Classical-Keynesian Approach*

London and New York, Routledge 2022, pp. xx + 256

Economic theory is going through a phase of crisis. First, the huge availability of economic data – at both the aggregate and disaggregate level – along with the development of computer tools for processing them are determining a fast rise in econometric analysis. This has relegated theoretical analysis to the background, sometimes even giving the impression that we can dispense with it. Second, the neo-Walrasian approach – which currently dominates – led economic theory to a level of abstraction it had never had before. So much so that it is often perceived by many scholars as an intellectual game, devoid of relevance to the understanding of reality.

Nonetheless, economic phenomena present some regularities. If it were not so – as Pareto (1906, p.5) already observed – no sort of economic planning could ever make sense: we would not be able to make any reliable prediction about the effects of an economic measure or action. Hence, we must admit that there is a core of forces that are regularly and persistently operating within economic systems, and their study represented, for at least two centuries, the object of economic theory. In particular, the giants of this science – from Adam Smith to Paul Samuelson – devoted much of their work to the theoretical explanation of the determinants of commodity value and income distribution. Bellino's book *Production, Value and Income Distribution* openly refers to this tradition.

The book is organized in three parts – that includes 11 chapters – and has a mathematical appendix. Part II (Chapter 6-9) is the central section not only for its position. In fact, it represents the heart of Bellino's book: the linear production model and Sraffa's theory of prices. In Part I (Chapters 1-5) Bellino provides us with a brief reconstruction of the theoretical premises of Sraffa's analysis. They are the essential elements we need in order to understand why Sraffa's contribution can be considered as a revival of the classical approach, which had been 'submerged and forgotten' – as Sraffa (1960, p.v) wrote – because of the advent of the marginalist school. Part III (Chapters 10-11), by contrast, deals with some possible developments and implications of Sraffa's work, with specific reference to Pasinetti's lines of research: the post-Keynesian theory of growth and the structural dynamics.

In Chapters 1 and 2, Bellino addresses the conception of the system of production and consumption as a circular process. The first chapter provides a brief reconstruction of Quesnay's

Tableau Economique, where – according to Sraffa (1960, p.93) – we can find ‘the original picture’ of this idea. In the second there is a rationalization of the division of the national product into two parts: ‘necessary consumption’ and ‘net product’ or ‘surplus’. With production understood as a circular process, since commodities are produced by means of commodities of the same kind, a surplus emerges as the difference between the commodities obtained as outputs and those employed as inputs and for the subsistence of the workers. The distribution of income concerns the division of this surplus among the social classes in which the system is structured. The social classes are nobles, farmers and artisans in the precapitalistic society considered by Quesnay, and capitalists, workers and landowners in the capitalistic systems studied from Smith onwards.

This is the standpoint adopted by Ricardo and Marx in their analyses of income distribution (Chapters 3 and 4). As for Ricardo, Bellino considers both the *Essay on Profits* – in which the British economist argues that the rate of profits of the whole economy is determined in the agricultural sector – and the *Principles of Political Economy* – in which an inverse relationship between the wage rate and the rate of profits is obtained thanks to the adoption of the labour theory of value. Subsequently, distinguishing capital in two parts, namely ‘variable’ and ‘constant’,¹ Marx showed that relative commodity prices cannot correspond to the relative quantities of labour they embody because of the different organic composition of capital employed in different sectors.² Hence, there is the problem of transformation of the (labour) values into the prices of production, which Bellino retraces in Chapter 4.

Part I ends (Chapter 5) with a brief reconstruction of the mainstream approach to value and distribution, from Walras’s theory to the neo-Walrasian turning point operated by Hicks. Here Bellino introduces the reader to the difficulties related to the conception of capital in the marginalist theory. These problems concern both the supply and the demand side. Their emergence prompted Hicks, Samuelson and their followers to embark on a new approach – the neo-Walrasian one – in which the interest rate is no longer regarded as the price paid by firms for the use of a factor of production.³ Therefore, with the aim of avoiding those logical problems, the mainstream approach moved toward a new theoretical framework which, however, does not seem very useful for the

¹ As is known, in Marx’s terminology, ‘variable capital’ is the amount of value (embodied labour) invested in workers’ subsistence and ‘constant capital’ is the value of the means of production (capital goods) consumed in the process.

² The organic composition of capital (OCC) is the ratio of constant capital on variable capital. Since, in Marx’s analysis, the production of surplus-value is proportional to the employment of variable capital, then a redistribution of surplus-value from the sectors with a low OCC toward those with a high OCC is needed in order to achieve the uniformity of the profit rate. This is the role played by the prices of production.

³ In the traditional versions of the marginalist theory, the distribution variables were understood as the prices paid by firms for the employment of the factors of production: labour, land and capital. Accordingly, the interest rate was the price firms pay to households for the productive service of capital. Such a notion of interest rate is no longer there in the neo-Walrasian theory. Actually, once commodities are distinguished according to their delivery dates, the price vector allows the definition of a system of own rates of interest, one for each commodity and pair of delivery dates.

interpretation of the real world. Especially with regard to the analysis of the forces determining the division of the national income between workers and capitalists. In this respect, Sraffa's revival of the classical approach appears much more promising.

At the beginning of Part II, in Chapters 6 and 7, Bellino describes the representation of the production processes by means of input-output tables, and their reinterpretation in terms of techniques formed by linear methods of production.⁴ This analysis is propaedeutic for the study of Sraffa's theory of prices that Bellino addresses in Chapter 8 and, as far as the choice of techniques is concerned, in Chapter 9.

Notwithstanding Bellino deals with Sraffa's theory using the tools of linear algebra currently employed in this kind of literature, the analytical difficulty of his argument is at an intermediate level between that of Sraffa's book and the most advanced versions proposed, for instance, by Kurz and Salvadori (1995) and Bidard (2004). This feature can be surely included among the elements of originality of the book we are reviewing.

As for the topics considered, they correspond to those addressed by Sraffa in Chapters I, II, IV, VI and XII of *Production of Commodities by Means of Commodities*. More specifically, Bellino starts from the determination of commodity prices in a subsistence economy and then considers a system with a surplus. Hence, he introduces the Standard commodity⁵ and the linear relation between distribution variables – profit rate and wage rate. Finally, he addresses the study of the reduction of commodity prices to a series of 'dated' quantities of labour⁶ and, in a separate chapter, the choice between alternative techniques. The latter chapter ends with an appendix on Samuelson's attempt to build a differentiable production function $Y = F(K, L)$ starting from the choice of techniques in a model with heterogeneous capital goods. The discussion of this attempt was one of the central points of the capital theory debate between the two Cambridges.⁷

Finally, Part III refers to the Keynesian approach that is promised in the subtitle of the book. Chapter 10 focuses on the possible extension of the Keynesian principle of effective demand to the

⁴ According to the terminology introduced by Sraffa (1960, p. 3), a method of production is a relation between the physical quantities of inputs employed and the produced quantity of a certain commodity. Leaving aside the possibility of joint production, a technique is a set of methods, one for each commodity.

⁵ The Standard commodity is a composite commodity whose production employs labour and itself only. Referring to a system whose net product consists of this composite commodity, Sraffa was able to study the inverse relation between the wage rate and the profit rate referring to physical quantities, and hence separately from the determination of commodity prices.

⁶ By means of this mechanism, in chapter VI of *Production of Commodities by Means of Commodities*, Sraffa was able to prove that the relative price of two commodities that embody exactly the same quantity of labour varies as income distribution changes. In particular, it can very well be greater than 1 for certain levels of the profit rate and less than 1 for others.

⁷ As is well known, the publication of Robinson's article (1953-54) on the production function, and then of Sraffa's book, ignited a debate, in the 1960s, between economists who were at the University of Cambridge (UK) and others at the MIT, in Cambridge Massachusetts.

long run. The fundamental idea is that the amount of investments determines not only the current level of employment, but, in the long run, also the rate of (net) capital accumulation and, as a result, the growth rate of the productive capacity.⁸ Bellino links this literature to Sraffa's theory by means of the 'Cambridge equation': if accumulation comes from capitalists' savings, then a certain profit rate level is needed in order to achieve a given growth rate – possibly consistent with the natural growth rate of the labour force. Once the profit rate is known, Sraffa's equations are able to determine the corresponding levels of commodity prices and wage rate.⁹ Then, in the last chapter (11), Bellino goes back to the disaggregate analysis and provides us with an introduction to the model of structural economic dynamics developed by Pasinetti. This can be considered as an attempt to use the linear model of production described in Part II with the aim of addressing the change in the relative weights of different industrial sectors during a process of economic growth.

In conclusion, the book presents itself as a compact handbook on some of the fundamental elements of Sraffian and post-Keynesian economic theory. Although designed for master students, the book is also a useful reference for more mature scholars. Inevitably, in the interests of compactness, some topics were left out. For instance, there is no reference to joint production and fixed capital, and only very brief hints to land rent and to the mechanism of gravitation of actual prices around the theoretical ones (the 'natural' prices). Nonetheless, the selection of topics is sufficiently broad, and their treatment sufficiently thorough that the book provides the readers with a solid basis for further study of these and other topics related to the Classical-Keynesian approach.

References

- Bidard, C. (2004) *Prices, Reproduction, Scarcity*. Cambridge University Press: Cambridge.
- Garegnani, P. (1992) 'Some notes for an analysis of accumulation.' In: J. Halevi, D. Laibman and E.J. Nell (eds.) *Beyond the Steady State – A Revival of Growth Theory*. Macmillan: Basingstoke and London.
- Kurz, H.D. and Salvadori, N. (1995) *Theory of Production – A Long-Period Approach*. Cambridge University Press: Cambridge.

⁸ Consequently, the weakness of investments would have negative effects not only on the current level of income and employment, but also on those in the future.

⁹ Actually, this kind of use of Sraffa's equations is controversial, as Bellino himself quickly stresses (p.158). In particular, Garegnani (1992) argued that the profit rate determined by the Cambridge equation cannot have the same meaning as the profit rate appearing in Sraffa's equations. In fact, the latter requires the normal degree of utilization of productive capacity in each industry, and this condition is sufficient to determine capital accumulation independently of any other circumstance.

Pareto, V. (1906) *Manuale di Economia Politica*. Società Editrice Libreria: Milano.

Robinson, J. (1953-54) 'The production function and the theory of capital.' *Review of Economic Studies*, 21(2), pp.81-106.

Sraffa, P. (1960) *Production of Commodities by Means of Commodities – Prelude to a Critique of Economic Theory*. Cambridge University Press: Cambridge.

Saverio M. Fratini

Roma Tre University