# 1 Introduction: why post-Keynesian economics and who were its Cambridge pioneers?

Maynard Keynes, Richard Kahn, Richard Goodwin, Nicholas Kaldor, Luigi Pasinetti, Joan Robinson and Piero Sraffa all started initially, at least in some degree, within the mainstream of their time. They all moved well and truly outside it, attempting to create either a revolutionary alternative or to rehabilitate the classical–Marxian tradition, in most cases in the light of the Keynesian revolution. The one exception is Michal Kalecki, whose personal history and independent mind combined to place him virtually always outside the mainstream. This volume, though, is not principally concerned with why and how the discontents that led them to change their minds arose. Rather, its principal object is to set out the structures of their alternative approaches in order to suggest modes of thinking about theoretical and policy issues in political economy.[1]

The structures presented here are based on over forty years of teaching and researching under the rubric of what is now called post-Keynesian economics. I certainly was not aware that it was so called when I started on this track in the 1950s. In fact, I have much sympathy with the stance of my old friend, the late Athanasios (Tom) Asimakopulos, who declined an invitation to be included in the first edition of Philip Arestis and Malcolm Sawyer's admirable *A Biographical Dictionary of Dissenting Economists* (1992), because he regarded his views and contributions as belonging fully within the tradition of economics proper, not in a dissenting stream. It was only in order to provide a suitable tribute to his influential contributions and splendid personal example as a teacher and human being that his widow, Marika, allowed the entry on Tom to be included in the second edition of Arestis and Sawyer (see Harcourt 2000). However, it must be admitted that at the time of writing (August 2004), though something of a backlash/comeback may be discerned (see

[1] Some of the reasons for their discontent are given in the appendixes to the volume: these contain short intellectual biographies of the main contributors (appendix 1, pp. 158–76) and a sketch of some of their principal arguments (appendix 2, pp. 177–84).

Harcourt 2001a for reasons why), the views and approaches taken in this volume still continue to be regarded by the bulk of the profession as those of dissenters.

The most succinct definition of post-Keynesian economics comes from Joan Robinson (1978; *CEP*, vol. V, 1979b, 210)[2]:

> To me, the expression *post-Keynesian* has a definite meaning; it applies to an economic theory or method of analysis which takes account of the difference between the future and the past. (emphasis in the original).

I obviously have no quarrel with this; but, as I try to be ever-mindful of historical developments, I also wish to stress that the approaches to political economy which reflect post-Keynesian thought are there partly for historical reasons and partly because of logical associations. Post-Keynesianism is an extremely broad church. The overlaps at each end of a long spectrum of views are marginal (*sic*), often reflecting little more than a shared hostility towards mainstream neoclassical economics and methodology, *IS/LM* Keynesianism and the 'fix-price' Keynesianism of the 'New Keynesians' and certain French economists. Some post-Keynesians are working actively towards a synthesis of the principal strands.[3] Others regard the search for a synthesis, for a general all-embracing structure, as a profound mistake: to quote Joan Robinson (1974; *CEP*, vol. V, 1979b, 119), a founding mother, a misguided attempt to replace 'one box of tricks' by another. Post-Keynesianism should be a situation-and-issue-specific method of doing political economy, a 'horses for courses' approach, itself an all-embracing structure at the methodological level (see Harcourt 2001a, Essay 19).

The principal object of analysis is the advanced capitalist economies of the twentieth and twenty-first centuries. The central aim is to provide a framework within which to understand and explain their macroeconomic and/or microeconomic processes over time. It must be admitted that the tradition within which they are presented objects vigorously to the microeconomic/macroeconomic dichotomy of mainstream economics (see Joan Robinson 1977b; *CEP*, vol. V, 1979b, 4–5 for a typically

[2] The Convention in this book is to separate by a semicolon the date of the cited work from the date of the collected work(s) where it is reprinted. 1978 here is therefore the publication date of Joan Robinson's 'Keynes and Ricardo', which is reprinted in vol. V of her *Collected Economic Papers* (*CEP*) in 1979 (*CW* is the siglum for Keynes' *Collected Writings*).'

[3] The deepest and most profound example of the attempts to provide a coherent synthesis is the splendid monograph by Heinrich Bortis, *Institutions, Behaviour and Economic Theory: A Contribution to Classical–Keynesian Political Economy* (1997). Reading successive drafts of Henry's book taught me so much. If I were ever to be persuaded that a synthesis were possible, it would be because of his arguments.

forceful argument why). Basically, neither individual nor group/class behaviour may be understood without making explicit the economy-wide structures and relationships that provide the backdrop to their behaviour. Similarly, economy-wide structures and relationships not only influence but also are influenced by individual and group/class motivations and behaviour. Thus the microeconomic foundations of macroeconomics must always be complemented with – indeed, it could be argued, dominated by – the macroeconomic foundations of microeconomics, see Crotty (1980).

The particular subsets of the mainstream literature that this happy band became increasingly dissatisfied with were the theory of distribution, especially the marginal productivity theory in its aggregative form (but also the supply and demand approach in general, see Bharadwaj 1978); the theory of pricing at the level of the firm and the industry, principally as it came down from Marshall and Pigou; the theory of investment behaviour and expenditure that is implied in Marshall and Pigou and, and more explicitly, in the writings of Irving Fisher; and the theory of growth, to which is allied the theory of the trade cycle (the business cycle to our North American cousins), as it has been developed in the post-war period by leading neoclassical economists (some of whom, such as James Meade, Robert Solow, and Trevor Swan were/are also leading Keynesians). In doing so, they were inspired and stimulated – even irritated – by Roy Harrod's and Evsey Domar's seminal contributions in the late pre-war and early post-war years. The final objective of the volume is to show how the alternative theories of the post-Keynesians under each of these heads may be combined into an overarching general framework that may then be applied in explanations of post-war happenings in the advanced capitalist world. This same framework, together with its constituent parts, may be used to rationalise various policy proposals which tackled, or should have been used to tackle, some of the major malfunctions of these economies in the same period.

An equally important aim of the volume is to rescue the pioneering contributions of this first generation from the benign neglect and misunderstandings that are starting to occur as the time from their respective deaths lengthens. It is important to have recorded for posterity the background and the nuances to the making of the theories by people who knew these pioneers personally and who were present for at least part of the time when the ideas were developed, not only to restore them to their correct place in the narrative but also to correct the misconceptions and often neglect they suffer or experience as the third and even fourth generation of post-Keynesians increasingly come to constitute the post-Keynesian literature and canon. I do not mean to denigrate the contributions of the latter groups; but I would like to restore to their rightful place the fundamental pioneering contributions of the first contributors.[4]

The structure of the volume is as follows: In chapter 2 I discuss post-Keynesian macroeconomic theories of distribution. I start with Kaldor's 1955–6 paper, as it is the best known. I use it and its characteristics as the backdrop to discussions of Kalecki's earlier contributions, including his review of Keynes' *General Theory*, Joan Robinson's eclectic approach and Frank Hahn's macro theory of employment and distribution which was initially developed in his PhD dissertation at the LSE in the later 1940s and early 1950s.

Post-Keynesian theories of the determination of the size of the mark-up are discussed in chapter 3. Adrian Wood's 'Golden Age' model is taken as the benchmark against which are assessed the 'historical time' model developed by Peter Kenyon and myself and the choice of technique in the investment decision in both the orthodox and the post-Keynesian approach. The chapter closes with a discussion of why internal finance is usually preferred to other forms of finance of investment expenditure. Kalecki's principle of increasing risk is taken as the most insightful explanation.

Chapter 4 is concerned with macroeconomic theories of accumulation. It starts with a critique of the details of Keynes' theory in *The General Theory* and after. The critique stems from the writings of Kalecki, Joan Robinson and Asimakopulos. All the ingredients involved in it come together in Joan Robinson's well-known banana diagram, an exposition of which ends the chapter.

Chapter 5 contains a brief discussion of money and finance – whether they are exogenous or endogenous in theory and real life. In chapter 6 all the previous developments are brought together in an explanation of post-war inflationary episodes, drawing on the conflict inflation models of Steve Marglin (1984a, 1984b) and Bob Rowthorn (1977).

Theories of growth from Adam Smith to 'modern' endogenous growth theory are discussed in chapter 7. We start with Smith and Ricardo's theories, move on to Marx and then to Harrod's theory. The reaction to Harrod's findings and problems by Solow and Swan, on

[4] Paul Davidson (2003–4) has written a most idiosyncratic review article of John King's history of post-Keynesian economics since 1936 (King 2002). It was entitled 'Setting the record straight. . . '. I was tempted to write a reply with Luigi Pasinetti entitled '*Really* setting the record straight' but desisted after I read the courteous but powerful replies to Davidson by Marc Lavoie and King himself.

the one hand, and Kaldor and Joan Robinson, on the other, are then discussed together with Richard Goodwin's eclectic theories and Pasinetti's grand synthesis. The chapter closes with discussions of Kaldor's later views in which he scraps many of his earlier ideas, and of endogenous growth theory, emphasising how it relates to previous discussions from Smith on.

The concluding chapter 8 uses the approaches developed in earlier chapters to examine their application to policy issues. It discusses how 'vision', approach and method interrelate with policy recommendations. It closes with a proposed 'package deal' solution to a crucial dilemma raised by Kalecki in his classic 1943 paper on the political aspects of full employment, especially how it may be permanently sustained as opposed to attained from a deep slump.

The volume ends with two appendixes: biographical sketches of the pioneers and an account of the conceptual core of the post-Keynesian discontent with the orthodox theories of value, distribution and growth.

# 2 Post-Keynesian macroeconomic theories of distribution

## Kaldor's 'Keynesian' theory

We start with Nicky Kaldor's 'Keynesian' macro theory of distribution (Kaldor 1955–6), not because it was the first – that honour belongs to Kalecki in the late 1930s and even earlier, as Kaldor argued, to Keynes in 1930 – but because it is the most well known. It is, moreover, a good reference point because it has some idiosyncratic features, not least that it is a long-period, full-employment model, seemingly a most strange work to come from the pen of such an eminent Keynesian economist as Kaldor. This even led Paul Samuelson to dub him 'Jean Baptiste Kaldor' (Samuelson 1964, 345). The model itself comes at the end of a long article which reviews theories of distribution from Ricardo on, and which finds most of them either out of date or severely wanting. The starting point of Ricardo is significant because Ricardo's theory emphasised the distribution of the surplus of production after the *necessaries* of production – the (subsistence) wages of the wage-earners and the replacement of the means of production – had been taken into account. Ricardo's theory reflects the early years of the British industrial revolution when real wages were still very low (in Ricardo's model due to the workings of the Malthusian theory of population and the classical theory of rent) and relatively constant, at least in the long-term sense, so that as technical advances, mechanisation and industrialisation occurred, the surplus to be distributed grew both absolutely and relatively. In Ricardo's view – it should be remembered he was himself a member of the landed gentry by then – the rising share of rent in the distribution of the surplus was a 'waste', for it was only the agricultural and industrial (and commercial?) capitalists who reinvested the major part of their share (profits). The landowners consumed most of theirs. (Ricardo's friend, Thomas Robert Malthus, thought this a good thing because it kept at bay contractionary and deflationary forces that otherwise would operate, a not very well explained source of autonomous expenditure – hence Keynes' view that Malthus was 'the first of the Cambridge economists' (Keynes 1933; *CW*, vol. X, (1972, 71), that is to say, the first to think like Keynes.)

By the time we get to the mid-1950s when the 'Golden Age of Capitalism' was already in full swing, the advanced capitalist economies were experiencing full employment and growth, real wages were far above subsistence and so it was possible in Kaldor's view to make an 180° turn and allow the profit-receiving capitalist class to have first bite of the cherry, as it were, leaving wage-earners to receive the residual after profits, accumulation (and rentier consumption) had been accounted for. (Arthur Lewis 1980, 257 told a not dissimilar story but used a neoclassical approach to analyse the distribution of income between profits and wages in the phase of development when there were no longer unlimited supplies of labour.)

Despite arguing that only a fully employed economy could continue to grow over the long term, Kaldor nevertheless called his theory 'Keynesian', for at least three reasons. First, he located the origins of his theory in Keynes' analogy of the widow's cruse in *A Treatise on Money* (1930; *CW*, vol. V, 1971, 125), whereby the more profit-receivers spent, the more profits they received:

> If entrepreneurs choose to spend a portion of their profits on consumption . . ., the effect is to *increase* the profit on the sale of liquid consumption goods by an amount exactly equal to the amount of profits which have been thus expended . . . Thus, however much of their profits entrepreneurs expend on consumption, the increment of wealth belonging to entrepreneurs remains the same as before. Thus profits, as a source of capital increment for entrepreneurs, are a widow's cruse which remains undepleted however much of them may be devoted to riotous living. When . . . entrepreneurs are making losses . . . by saving more, the cruse becomes a Danaid jar which can never be filled up.
>
> (emphasis in original)

Secondly, Kaldor took the Keynesian view that (planned) investment led and saving, determined by income and its distribution, responded. Thirdly, he argued that the Keynesian multiplier was a short-period concept in *The General Theory* model, with changes in income needed to bring planned investment and planned saving into equality, because money-wages and prices were sticky in the short period. In the long period, however, the multiplier applied to the distribution of long-period, full-employment income, principally because, in the long period, prices were relatively more flexible than money-wages, and the marginal propensity to save out of profits was greater than the marginal propensity to save out of wages.

We should also see Kaldor's contribution within a context of the development of the peculiarly Cambridge (England) contributions to growth theory, stimulated by Harrod's 1939 article and 1948 book and by the awakening of interest in the post-war period in development itself. This meant that Kaldor, in tackling the problem of Harrod instability (see chapter 7, pp. 102–9 for a discussion of Harrod's model and problem) and the processes by which the warranted rate of growth, $g_w$, and the natural rate of growth, $g_n$, were equalised, assumed for his theory of distribution that planned investment, if realised, was such as to give the economy over the long term the necessary capacity to allow it to grow at $g_n$. This required forces at work which took $g_w$ to equality with $g_n$ and allowed planned investment to become actual investment.

The value of the share of investment in long-period, full-employment national income was therefore predetermined in Kaldor's model. In later models he attempted, not ever successfully, to show *why* the economy should be at full employment and the share of investment in national expenditure should be endogenously determined at the share consistent with producing $g_n$ over time.

Kaldor assumed that the long-period equilibrium position of a growing capitalist economy is a full-employment one, $Y_f$. He assumed simple proportional saving functions with $s_\pi > s_w \geq 0$, where $s_\pi$ is the marginal propensity to save (*mps*) of profit-receivers and $s_w$ is the *mps* of wage-earners. Let $\Pi$ be total profits, $W$ be total wages.[1] Then Keynes' saving–investment equilibrium condition determines the *distribution* of $Y_f$ rather than the level of actiivty and income.

Thus:

$$S = s_\pi \Pi + s_w W = \bar{I} \tag{2.1}$$

where $\bar{I}$ is given, autonomous:

$$s_\pi \Pi + s_w \left(Y_f - \Pi\right) = \bar{I}$$

i.e.

$$\Pi = \frac{\bar{I}}{s_\pi - s_w} - \frac{s_w}{s_\pi - s_w} Y_f$$

and

$$\frac{\Pi}{Y_f} = \left\{\frac{1}{s_\pi - s_w}\right\} \frac{\bar{I}}{Y_f} - \frac{s_w}{s_\pi - s_w} \tag{2.2a}$$

[1] Subsequently, the distinction between saving from different classes of income – profits, wages – and by different classes of persons – profit-receivers, wage-earners who save – was analysed explicitly by Pasinetti (1962) and followed up by Kaldor (in, for example, Kaldor 1966a). See also Harcourt (1972, chapter 5).

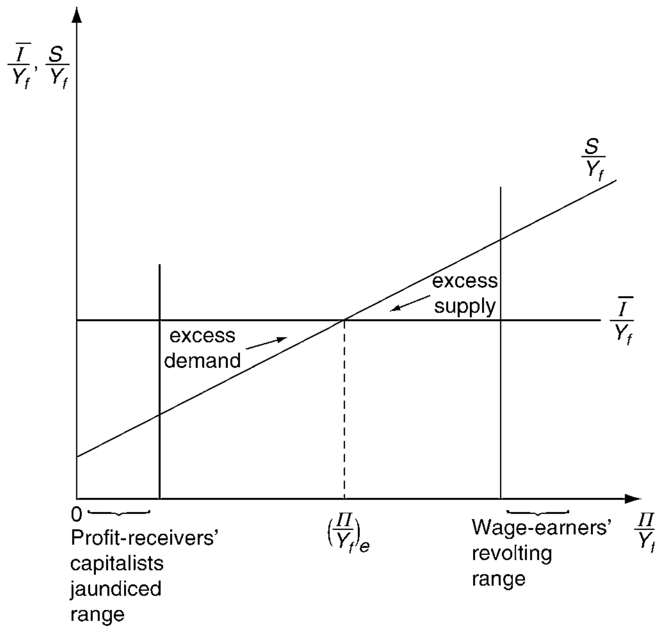


Figure 2.1. Kaldor's 'Keynesian' theory of distribution.

As

$$s_w \to 0, \frac{\Pi}{Y_f} \to \frac{1}{s_\pi}\frac{\bar{I}}{Y_f} \tag{2.2b}$$

clearly the Keynesian multiplier relationship.

We now use a simple diagram (see figure 2.1), to illustrate Kaldor's arguments.[2] (In lectures, I have always tried to use words for the poets, algebra for the mathematically inclined and geometry for the in-betweens.)

On the vertical axis is measured the share of (given or autonomous) investment, $\bar{I}$, in long-period, full-employment national income, $Y_f$, and the share of (planned) saving, $S$, in $Y_f$. On the horizontal axis is measured the share of profits ($\Pi$) in $Y_f$. Because $s_\pi > s_w$ and prices are more flexible than money-wages in the long term, if the economy is not initially at the distribution of $Y_f$ where planned saving and planned investment are equalised

[2] The diagram was suggested to me by the late Hugh Hudson, who edited the first two volumes of Kaldor's collected papers.

$$\left(\frac{\Pi}{Y_f}\right)_e$$

there are zones of excess demand to the left of the intersection of $\frac{S}{Y_f}$ and $\frac{\bar{I}}{Y_f}$, and of excess supply to the right. These impact on prices relatively to money-wages and redistribute the *given* level of $Y_f$ so as to raise (to the left) or reduce (to the right) the share of profits, thus changing the share of saving appropriately.

$$\left(\frac{\Pi}{Y_f}\right)_e$$

is therefore a stable equilibrium position, for if the economy is not initially there, appropriate signals and processes will take it there. At that point the value of

$$\frac{S}{Y_f}(= s)$$

is such as to make

$$g_w\left(= \frac{s}{q}\right)$$

(where $q$ is the desired incremental capital–output ratio) equal to $g_n$. The economy thus has the desired amount of investment expenditure and capacity creation to allow it to grow at $g_n$, realising its full-employment potential by employing all its labour force and the expanding capacity of its stock of capital goods over time.

Kaldor provides two provisos: the share of profits must not be so low as to make the profit-receiving capitalists feel that accumulation and profit-making are not worth the candle (this is shown in figure 2.1 as the profit-receivers' capitalists' jaundiced range. It corresponds to Ricardo's argument that there must be at least some minimum rate of profit received to keep capitalism going.) Correspondingly, the share of profits must not be so high as to entail a share of wages and a level of real wages that are unacceptable to the wage-earners, who are assumed passively to accept whatever residual of national income is left for them after the profit-receivers have received their share. In this situation, the wage-earners no longer passively accept the residual but respond by causing a wage–price and wage–wage inflationary spiral and the distribution of income will no longer be determined by the Kaldor process. This range is designated as the wage-earners' revolting range in figure 2.1.