Journal of the History of Economic Thought,
Volume 25, Number 3, September 2003

Routledge
Taylor & Francis Group

KJELD PHILIP AND HIS VIEWS ON FISCAL POLICY

BY

NIELS-HENRIK TOPP

I. INTRODUCTION

The developments in macroeconomic theory in the 1930s had far-reaching theoretical implications for the attitude towards fiscal policy. In the following decades numerous articles and books analyzed the effects of fiscal policy on the economic activity. The analyses were often closely related to the Keynesian macroeconomic framework and the multiplier. The object of this paper is to draw attention to a book which analyzed fiscal policy from a different perspective.

In 1942 the Danish economist Kjeld Philip (1912–1989) published a thesis on fiscal policy.[1] Philip's book deserves credit for being the first comprehensive Danish exposition of the new ideas on fiscal policy and demand management that can be found scattered in the international debate of the 1930s. At publication, Philip's book was praised as an important contribution to the theory of fiscal policy, and in a direct comparison with Alvin H. Hansen's book, which was published almost simultaneously, Philip's book was singled out as the most in-depth study of the subject (Jørgen Pedersen 1942, pp. 258).

Philip's work was part of the "Keynesian revolution" in Denmark, and the basic line of arguments in the book coincides with the principles of "functional finance" later formulated by Abba P. Lerner (1943). The book served as an advanced textbook until the 1950s in Denmark, as well as at some universities abroad, and as such Philip influenced the minds of a generation of economists who entered the government departments in the early post-war period. Philip, however, must not be labelled a genuine Keynesian. Though he was generally in line with Keynesian economics and its implications for fiscal policy, Philip diverged both with regard to his policy conclusions and his analytical approach.

His policy conclusions were far less optimistic than the opinions normally advanced by contemporary economists of Keynesian views. He was rather pessimistic regarding the ability of fiscal policy to stabilize short-term economic

Department of Political Science, University of Copenhagen, Rosenborggade 15 DK-1130, Copenhagen, Denmark.

[1] Kjeld Philip. *Bidrag til Læren om Forbindelsen mellem det Offentliges Finanspolitik og den Økonomiske Aktivitet* (*Contributions to the Theory of the Interaction between Fiscal Policy and Economic Activity*), Copenhagen, 1942.

ISSN 1042-7716 print; ISSN 1469-9656 online/03/030303-23 © 2003 The History of Economics Society
DOI: 10.1080/1042771032000114746

fluctuations, and he argued that the monetary implications of fiscal policy were just as important as the effects on incomes and demand. Similarly, Philip pointed out the difficulty of maintaining a policy of full employment because the politicians would face a choice between price stability and unemployment. In this respect, some of Philip's general conclusions will be more readily identifiable in the last twenty to twenty-five years' understanding of fiscal policy than in the Keynesian intervention paradigm that existed until the 1970s.

Apart from the policy conclusions, the main reason for taking an interest in Philip's work is his analytical approach. The thesis is interesting because it represents the transition phase before the Keynesian school of thought seriously monopolized the macroeconomic debate of the 1950s. Philip was influenced more by the methodology of the Stockholm School than the macroeconomic analytical methods of the contemporary Keynesians. Philip acknowledged the importance of J. M. Keynes's theoretical contribution in the *The General Theory*, but he did not adopt the Keynesian model and did not believe the multiplier to be an adequate tool for analyzing the effects of economic policy. In order to get a more detailed description of the processes taking place, Philip employed the general dynamic method of the Stockholm School.[2] A unique feature of the thesis was that Philip argued that it would be convenient to analyze financial political measures by initially examining their impact on the balance between individual households' demand for cash and their actual stock of reserves. The crux of the analyses then became to investigate how the households would adjust their plans in order to re-establish an equilibrium position, and how the changed plans affected other individuals leading to a change in the state of the economy.

Though Philip had an influence on the teaching and public debate on fiscal policy in post-war Denmark, the analytical framework he had put forward received less attention than he had hoped. The paper points out that Philip's analytical method and the importance he ascribed to analysing the "cash-balances" left few marks in the Danish theoretical debate on fiscal policy. One could argue that Philip's "cash-balances" approach was problematic, but while the reaction was indeed mixed in Denmark, it was somewhat more positive abroad. On the other hand one might have expected that the thesis had served as a starting point for further investigations of the interrelation between monetary and fiscal policy. The Danish economic profession, however, accommodated to the Keynesian orthodoxy in the 1950s. The limitations regarding the use of fiscal policy recognized by Philip were only reintroduced in the Danish debate in the 1970s and then without acknowledgment of Philip's earlier contributions.

[2] Jonung (1991, p. 12):

> The Stockholm School did not coalesce around one commonly accepted model. The unifying feature was rather the study of change, that is, dynamic processes … The Swedes wanted to replace the prevailing timeless static equilibrium theory by introducing anticipations, risk, and uncertainty. From this followed the conceptual devices of the Stockholm School: plan, period, and expectations, and the key concepts of *ex ante-ex post*, stressing the difference between expected and realized outcomes.

II. KJELD PHILIP'S BACKGROUND

Kjeld Philip studied at the University of Copenhagen between 1931 and 1937. The period of his studies coincided with a time of great development in macroeconomic theory. However, the general impression is that, by and large, Danish university economists observed this debate from the sidelines but with a lot of sympathy for the Swedish point of view. Myrdal (1972, pp. 4–5) suggested that the Keynesian revolution was primarily a British and American event and that in Sweden *The General Theory* was perceived as an important contribution within a well-known school of thought, rather than an epoch-making breakthrough. This is an attitude that can also be found in the Danish reaction to the Keynesian ideas.

Danish commentators considered the *The General Theory* to be an important contribution, but in the light of the Scandinavian debate they found it difficult to accept that the book was as path breaking as Keynes suggested (Thorkil Kristensen 1936 and H. Winding Pedersen 1936). It was young economists like Kristensen and Winding Pedersen who investigated Keynes's theory in the 1930s, while the professors at the university were conspicuous in their absence from the debate.[3] Nor were the theoretical developments and the debate between the Stockholm School and Keynes evident in the teaching at the University of Copenhagen.[4] Philip writes in his memoirs, "at any rate it didn't change the course content. Warming saw vaguely that something was about to happen. Otherwise life within the walls was not influenced by what happened outside the walls. A few of us read Keynes, certainly not at the request of our professors, and we scarcely understood how important all this would become." Similar descriptions can be found in the memoirs of other Danish economists from this period.[5]

The attitude of the Faculty can also be seen from a collection of papers from student workshops and M.Ec. theses. Quite a number of students wrote papers on Keynes's ideas. However, a presentation of his theory was never given alone but always included a comparison with the Stockholm School and a description of the Swedish criticism of Keynes.

Although Keynes's ideas failed to make much impression on the formal teaching in Copenhagen, we can see the impact of *The General Theory* on young Danish economists in the late 1930s from the substantial number of references in books and articles. The list of young economists publishing comments on Keynes's theory at that time includes well-known names like P. Nyboe Andersen, Hans Brems, Ester Boserup, Jørgen Gelting, Isi Grünbaum, Kjeld Philip, and later Bent Hansen.[6]

[3] It has always seemed odd that neither Professor Jørgen Pedersen nor Professor Jens Warming, who, in the 1930s, both developed macroeconomic opinions that had more in common with Keynes than with the Stockholm School, at any point related their work explicitly to Keynes's new theory (Garside and Topp 2001). Jørgen Pedersen's textbook from 1944 can, however, be described as an indirect endorsement of Keynes, but there was never any such endorsement from Warming.

[4] In the last half of the 1930s the teaching staff at the University of Copenhagen consisted of Axel Nielsen (monetary economics), Fr. Zeuthen (welfare economics), Carl Iversen (international economics), H. Winding Pedersen (monopolistic competition and business economics) and Jens Warming, who taught Danish economic statistics.

[5] Philip (1985, p. 181). See also Andersen (1987, pp. 273–74) and Schmidt (1993, pp. 150–54).

[6] Topp (1987). A contemporary survey of Danish economists in the 1940s can be found in Brems (1956).

The situation apparently didn't change much in the first half of the 1940s. An examination of the 1941 reading list from the Economics Department in Copenhagen shows that Cassel's *Theory of Social Economics*, Marshall's *Principles*, Harberler's *Prosperity and Depression*, and Wicksell's *Lectures* continued to account for the most important foreign textbooks at the graduate level. The reading list for monetary theory and policy, which made up the macroeconomic theory course at that time, consisted of professor Aksel Nielsen's own textbook in monetary policy supplemented with either Hawtrey's *Currency and Credit*, Lindahl's *Studies*, or Wicksell's *Lectures*. The basic texts for the teaching of financial policy were traditional books by Professor L.V. Birck (1925) and Oskar Jæger (1930), a Norwegian, supplemented with a chapter from Myrdal's (1934) book on the effects of financial policy.

Keynes's *A Treatise on Money* appeared on the list of suggested supplementary readings, but one looks in vain for any suggestion that it would have been a good idea to include the *The General Theory* on this list. All in all, one gets the impression that while the Stockholm School ideas had quickly gained a permanent place within the teaching, in 1941 it was still too early to let Keynes in. It was not until 1943, when Jørgen Gelting was appointed as a part time lecturer, that the Keynesian model was integrated into the teaching of fiscal policy. It was also Gelting who introduced Nicholas Kaldor and Michael Kalecki into the Danish economic debate in the middle of the 1940s (Andersen 1994, Andersen and Topp 1982).

At the University of Aarhus the situation was different. Teaching in economics was established in 1936 and the three professors, Jørgen Pedersen, Thorkil Kristensen, and the German Erik Schneider, were undoubtedly more positive towards Keynes's ideas than their colleagues in Copenhagen. In the 1930s, Jørgen Pedersen developed views on macroeconomic theory in accordance with the Keynesian perspective, particularly with regard to using fiscal policy and the public sector as a means of stabilizing economic fluctuations. Jørgen Pedersen had challenged the orthodoxy of the balanced budget, which scarred the Danish political debate in the 1930s. Throughout the 1930s he had insisted that fiscal policy must be regarded as an integrated part of economic policy. He had scorned the political inclination toward balanced budgets in many newspaper and journal articles. In 1937 Jørgen Pedersen summarized his new insight in an article which forestalled Abba Lerner's principles of "functional finance." The article was first published in German, but soon after extracts were presented in English in Alvin Hansen's *Fiscal Policy and Business Cycles* (1941, pp. 140–44). Brems (1956, p. 358) has pointed out that the impact of Jørgen Pedersen in Denmark paralleled the one Alvin Hansen exercised in America, and it is quite obvious that the new Danish contributions to the theory of fiscal policy became closely linked to the University of Aarhus.

Both Gelting and Philip obtained positions as part-time lecturers at the University of Aarhus after taking their degrees in economics at the University of Copenhagen. Philip, together with the Norwegian Trygve Haavelmo, joined the Faculty in the fall of 1938, while Gelting obtained his position six months later. In 1943, Philip was appointed full Professor of Social and Fiscal Policy at Aarhus, while Gelting returned to Copenhagen as a part time lecturer in fiscal policy.

The influence of Jørgen Pedersen at Aarhus University became important to both Gelting and Philip, who started to publish articles on fiscal policy in the journal of the Danish Economic Association in 1941. Though neither of them disputed Jørgen Pedersen's general views on fiscal policy, their macroeconomic foundation differed significantly. Gelting's contributions to the development of the Keynesian model led to his work being closely associated with that school of thought.[7] On the other hand, Philip's approach to fiscal policy was more in line with the Swedish tradition, and he dismissed the Keynesian model and the multiplier analysis as an inapplicable basis for analyzing the impact of economic policy.

III. PHILIP'S THESIS ON FISCAL POLICY AND ECONOMIC ACTIVITY, 1942

March 17, 1942, was a special day for the University of Aarhus. On this day the Copenhagen monopoly of awarding the highest recognition for scientific works was broken when the first economic thesis was defended.[8] The event demonstrated that after just six years of operation the Economics Department in Aarhus had reached a standard that could rival that of Copenhagen.

Philip's thesis was the first comprehensive analysis based on the assumption that fiscal policy was an important, integrated part of a full employment policy. Philip, like Jørgen Pedersen (1937), maintained that it was the impact on the economic activity that ought to determine the link between the public sector's revenues and expenses, not any bookkeeping principle of balanced budgets. Though he was influenced by the method of the Stockholm School, his view on fiscal policy was far more radical than the views endorsed by Swedish economists in the 1930s. Philip dismissed not only the demand for a balanced budget each year but also the principle of balancing the budget over the business cycle, which Myrdal (1934) had recommended. According to Philip, the idea of long-term budget balance was closely related to the perception that the business cycle made employment fluctuate around the full employment level. Myrdal's fiscal policy only aimed at reducing the fluctuations, not at increasing the average level of employment to full employment. The differences between the two perspectives are striking if one compares Philip's thesis with Myrdal (1939).

[7] As noted for example by Brems, who wrote in 1956:

> Most impressive, perhaps, among the younger Danish Keynesians is Jørgen Gelting who, in *Nationaløkonomisk Tidsskrift* (1941), formulated the balanced-budget theorem, later to become so famous in the hands of Somers, Samuelson, Hansen and Haavelmo. Also 1948, Gelting presented an ambitious estimation of the structural parameters of the Danish economy, worked out single-handedly within a Keynesian framework (Brems 1956, p. 358).

[8] Just as in the German universities at that time, the Danish universities awarded doctorate degrees in recognition of major, independent scientific contributions, normally published as monographs. From the start in 1902 to 1976 the total number of Danish economic theses was forty-six. Less than twenty doctorate degrees have been awarded since 1976. It was only in the 1970s that Ph.D. degrees were introduced in Denmark as a supplement to the doctorate degree.

Myrdal's article, written only three years before Philip's work, still endorsed the principle of balancing the budget in the long run. Compared to this, Philip represented what was to become known as the Keynesian "functional finance" approach, arguing in accordance with Jørgen Pedersen that the public debt did not constitute a problem in itself. For the first time, a thoughtful investigation of the principle of fiscal policy based on this new point of view was carried out. In this respect Philip's book was regarded as highly stimulating and innovative at the time of its publication. In the introduction Philip himself described the book as:

> a macroeconomic investigation of a fiscal policy topic, not least because the methods and terminology employed place it within macroeconomics. It builds on modern economic theory and is strongly influenced by authors such as *Keynes* and *Föhl*, while it builds only to a small extent on public finance authors, primarily because they have not worked with this book's subject matter at all . . . the only pure, public finance works which have influenced this thesis are written by authors such as *Myrdal* and *Jørgen Pedersen*, who are otherwise characterized by having worked with subjects within macroeconomics (Philip 1942, pp. 9–10).

By highlighting the impact of fiscal policy on the economy, Philip distanced himself from the traditional public finance theory. In Philip's opinion, this theory had as its foundations the classical theory's atomistic assumptions that the quantity of output was technically determined by the factors of production. The distribution of income therefore became central to the traditional analysis of public finance, but one was cut off from investigating how changes in fiscal policy influenced production, which was the main aim of Philip's analysis.

Even though he emphasized J. M. Keynes and Carl Föhl as important sources of inspiration, it was not the Keynesian static macroeconomic model that was to form the foundations of Philip's research.[9] Philip stressed that a discretionary fiscal policy affected households' behavior over a certain period, which would further affect the behavior of other groups of households. In this way, the effect of the policy would exhaust itself only after a certain time. "In the study of such a course it will be appropriate to decompose it into a sequence, whereby each period's economic data *ex post* are determined by the households' economic behaviour *ex ante* in the same period" (Philip 1942, p.16).

Similarly, Philip toned down the general macroeconomic aspect of his account and focused on the single agent's reaction since every public expenditure or receipt affected the individual household's cash-balances. Thus the fiscal policy was analyzed in the light of how households reacted in order to counteract this change in cash-balances, and how they would attempt to restore a stock of cash, corresponding to their demand for cash. When Philip chose this basis and didn't

[9] Carl Föhl (1937) applied a circular flow approach that was in many ways like Keynes's *General Theory*. From the close of the 1930s one can trace a certain influence from German economists on the Danish fiscal policy debate. It was presumably Eric Schneider, who had a thorough knowledge of the German theoretical debate, who brought it to the Danish economists. In addition to Philip, these influences can also be seen in Gelting's 1948 thesis. A survey of Föhl's contributions can be found in Rothschild (1964).

employ aggregate data such as income, consumption, wealth, and investment, the reason he gave for it was that a more fundamental analysis unit was involved:

> It cannot be denied that by working with the more complex concepts one uses a very appropriate means of economic analysis; but at the same time it must be emphasized that central to the analysis must be the transactions themselves, as they are the only objective observations, and as it is they which lie behind the other concepts. It is natural then to assign cash-balances a relatively central role in the analysis of economic interactions, not because cash-balances in themselves are anything especially important for economic life, one could well imagine a cashless society, but because the individual cash-balance as the balance between all payments and receipts must be affected by every economic transaction between the individual transactor and the rest of the world. The description of the state of cash-balances and change thus becomes a short, unifying expression for all the changes that can occur in the steady stream of expenditure and receipts (Philip 1942, p. 27).

Philip refers to the German Hans Neisser (1928) as one of his sources of inspiration for the idea to carry out the analysis on the assumption that "the agents would always strive to adjust the cash balance to their cash demand" (Philip 1942, pp. 23). Philip's account of the preceding theoretical discussion is, however, short, and the number of references is small. Apart from Neisser he refers only in a footnote to M. W. Holtrop (1933) and Carl Föhl (1937) for general accounts of the institutional and technical causes of cash holdings. These three authors are contrasted with Keynes (1936), who had drawn attention to the motive of speculation. It is somewhat surprising that Philip does not relate his short discussion to Erik Lundberg (1937), who had given a far more elaborate account of Holtrop and Neisser's works on the demand for money. Neither does the book contain any references that compare his own views with the ones found in the works of British economists like R. G. Hawtrey and D. H. Robertson.[10] The reason for Philip's lack of a detailed examination of the current debate on the subject must be ascribed to the prime object of the thesis, which is to generate new insights with regard to fiscal policy, not to make a contribution to basic economic theory. With regard to economic theory, Philip can be said to explore the insights into macroeconomic theory of Keynes and Föhl by means of the general framework developed by the Stockholm School supplemented with his own "cash-balance"—approach.

The simplest way to describe Philip's way of reasoning is to compare it with the Keynesian model. Philip analyzed the economy by turning the model upside down. Instead of making the market for goods and services the centerpiece, he starts by analyzing the money market, emphasizing that the public expenditures, taxes, and loans affect the supply of money. This perspective naturally gives Philip's exposition a flavor of the quantity theory and the concept of the velocity

[10] It is evident that he was influenced by Hicks, but the references only point to the general techniques employed by Hicks and no discussion of Hicks theoretical contributions take place in the book. The book contains nine references to Hicks's *Value and Capital* (1939), and to Hicks and Allan "A Reconsideration of the Theory of Value" (*Econometrica* 1934). This makes Hicks, together with Föhl, the most-quoted author in the book, followed closely by Jørgen Pedersen, Keynes, Gunnar Myrdal, and Erik Lindahl.

of money. However, this is not Philip's intention; he wishes only to establish a common framework for analyzing all movements in the public budget, and he is quite explicit in stating that his discussion of the money market is influenced by Keynes's theory of liquidity preference (Philip 1942, p. 103). The bulk of the analysis relates to the effects of public spending and taxes on the goods market. In this analysis Philip only partly followed Keynes. Like many Scandinavian economists he had reservations about the Keynesian model and the static multiplier. When dealing with the goods market and the changes in incomes, Philip was more influenced by the Stockholm School's account of the dynamic processes.

The interest Philip took in the cash balances is not unique for him but can be found as well in Lindahl (1939), who also took his point of departure from the cash equation or cash-balances of a private individual. However, while Lindahl's (1939, p. 79, 235–38) theoretical investigation left out the holding of cash as an unnecessary complication and only gave a short comment on the problem later in the book, Philip kept the cash balances as his focal point for analyzing the effects of fiscal policy. As indicated in the quotation, he found that it was a convenient way to summarize in one concept all possible ways to react to a change in economic policy.

In the first part of the thesis, Philip investigates how discretionary fiscal policy affects the behavior of private individuals. A discretionary fiscal policy, like a tax-increase, will affect the balance between individual households' demand for cash-balances and their actual stock of cash. The unexpected reduction in the stock reserves will lead to changes in the household's behavior (*ex ante* plans) and, Philip emphasizes, to a long series of transactions before the individual is again in equilibrium. The revised plans imply that the individual can either alter his portfolio and acquire more cash by withdrawing from bank deposits and so reduce financial assets or incur debt, or alternatively the individual can change his economic behavior in order to reach the desired level of cash reserves. This could involve an increased supply of goods and labor services in order to maintain living standards and restore the desired level of cash-balances, or a reduction in the demand for goods and labor and the sale of stocks. Not all of these possibilities are available to the individual and Philip describes the concept of active and passive negotiating positions. Under normal conditions the individual farmer or tradesman is in an active negotiating position and will be able to react to a fall in cash reserves by increasing his supply of goods or labor services. This possibility, however, is not necessarily available to a wage earner in a situation of unemployment.

Philip points out that the outcome of a planned reaction, which at first might seem feasible to an individual household, can be influenced by the simultaneous reaction of other individuals. A single farmer might wish to regain his equilibrium position by expanding his production, but if all farmers react in the same way, the prices of agricultural products will change. Philip, therefore, goes on to examine how the revised individual plans will affect the economy *ex post*, and how the economy will adjust to reach a new equilibrium when there are discrepancies between each household's plans. This process is analyzed in accordance with the Swedish dynamic method. The adjustment path is dependent upon whether the economy consists of price-adjusters or quantity-adjusters, or a combination of the two types. The Keynesian perspective in Philip's way of thinking can be seen from the importance he assigns to the case where a fiscal intervention leads to a quantitative adjustment process and creates unemployment or improves employment. On the other hand, Philip also considers in great detail the case where only prices change, lowering the nominal incomes, while the production and employment are unaltered, and the combination of the two cases where price-adjustments take place in some parts of the economy and quantity-adjustments in other parts, depending on the actual state of the business cycle and the restraints on the agents in the different sectors of the economy. By allowing for effects on both incomes and employment, as well as on prices, Philip seeks to demonstrate that the outcome of a fiscal tightening is by no means unambiguous, and that one has to take into account the actual state of the economy. This insight made Philip less inclined to subscribe to fiscal policy as the final solution to all problems relating to the stabilization of incomes and production. He acknowledges that fiscal policy is an important new instrument in the conduct of economic policy, but he does not share the overly optimistic views on demand management that could be found among contemporary Keynesians.

The advantage of starting with the point between the desired and the actual cash-balances seems first and foremost to be that it gives Philip the possibility of displaying the problems of the balanced budget doctrine. A balanced budget only ensures that the public sector does not influence the supply of money. Since the effects on total demand of different fiscal interventions are not the same, even a balanced budget must influence incomes and employment. Thus a balanced budget does not imply that the fiscal policy is neutral and does not affect the economy. This leads to the conclusion that fiscal policy cannot be governed by some fixed budgetary rules but has to be adjusted according to the budget's effects on the economy as a whole. Secondly, the cash-balance approach allows Philip to link directly the Central Bank's monetary policy to the evaluation of the effectiveness of discretionary fiscal policy. The first chapters of Philip's book analyze the discretionary fiscal policy under the assumption that the Central Bank remains passive. The question of the interaction between fiscal and monetary policy is dealt with in a separate chapter, where he reaches the conclusion that the degree to which the Central Bank neutralizes the liquidity effects of fiscal policy is crucial for the outcome. When the government undertakes a fiscal operation, it affects households' cash-balances. In order to restore the desired position, households will change consumption patterns or reallocate their portfolios. Normally it will affect consumption, but if a tax increase is met by the public with their selling of bonds to the Central Bank, the effects are nullified. Similarly, if the government raises a loan, it has no effect on the economy if the Central Bank independently pursues a policy of a stable rate of interest and neutralizes the effects on money supply by open-market operations. Thus, the Central Bank's policy would have a crucial influence on the effectiveness of fiscal policy:

> In this way, every fiscal operation serves to reduce the cash-balances of individuals . . . However, at the same time any such policy will put increased

> pressure on the Central Bank to increase the money supply … Dependent upon the degree to which the Central Bank accommodates this demand, cash-balances will increase. It then becomes of great interest to investigate how strong this demand pressure becomes as this … will modify the effects of the discretionary fiscal policy as regards the reduction of cash-balances. A very essential part of the difference between the effects of the different fiscal policies (e.g., tax and debt management) is due to the strength of the aforementioned demand (Philip 1942, p. 24).

It is a basic feature of Philip's cash-balance approach that one has to take account of various possible responses of individuals to a tax increase and not just rely on the unreflective responses implied by a constant multiplier. As a consequence of this view, Philip emphasizes the parallelism between households' responses to discretionary fiscal policy and to money market operations (Philip 1942, p. 24). This leads to the conclusion that just as monetary policy instruments have lost their effectiveness, so too will tax policy gradually become ineffectual as a short-term economic instrument. This is because households gradually learn to counteract tax changes and to build up reserves to counter fiscal policy operations:

> Imagine that individuals have become accustomed to an income tax between sixteen and twenty percent. When making consumption and savings decisions, individuals will then count on a tax of about eighteen percent. They will adjust their consumption patterns to a tax of that size and allow the difference to accrue to, or be covered by savings that they have to counterbalance such "random" fluctuations … To reach this conclusion it is not necessary to imagine that individuals take such a rational approach to their planning. Most individuals have, without special conscious planning, a consumption pattern determined by their income and environment, and over a long period of time, by how many savings they find judicious. Irregularities in consumption or extraordinary expenditures that only arise in occasional years, for example foreign travel or the birth of a child, do not influence that year's consumption but are covered by savings (Philip 1942, p. 229).

This way of thinking resembles Friedman's "permanent income hypothesis," but Philip didn't completely write off fiscal policy as an economic policy instrument. Even though it could be foreseen that taxes would become less useful in regulating the economy, Philip still expected that government spending could be utilized to influence economic activity, for example through public works. In the event that one wanted to utilize tax policy to regulate economic activity, it would be an advantage if it contained an element of surprise that could limit the possibilities for individuals to moderate the effects of the measures intended to reduce consumption.

During the public defense of the thesis in March 1942, the fundamental doubts that Philip raised about the effectiveness of fiscal policy were commented on by Jørgen Pedersen (1942, p. 290), who pointed out that it must "cool the enthusiasm of those who believe they have, in fiscal policy, found a means to fine-tune the economy; and it certainly has a lot of truth in it." However, in Jørgen Pedersen's opinion, the result needed to be modified, because there were households that had no possibility of building up any wealth, and because it was assumed that the Central Bank was willing to adjust the money supply to meet the cash requirements. If the Central Bank refused to adjust the money supply, then, following Philip's line of thought, economic activity must consequently fall in order to ensure an adjustment of the demand for cash to the supply of cash.

Jørgen Pedersen's remark suggests that the reaction to Philip's framework was not entirely positive. While the choice of the Swedish framework as a method of analysis didn't draw specific comment from the official discussants of the thesis (Jørgen Pedersen and Thorkil Kristensen), it is evident from Jørgen Pedersen's assessment of the thesis defense that Eric Schneider, as an unofficial discussant, made critical remarks about Philip's definition of equilibrium. Philip's use of the Stockholm School methods was recognized in the review by the Swede, Harald Dickson, although he had some reservations about Philip's application of the methods. Dickson (1943, p. 173) writes that the exposition of the Swedish tradition was "by and large excellent ... unfortunately the application is not always equally complete. To exemplify it, at least for my part I have been unable to be convinced by the sequence analyses on pp. 73–76 and pp. 219–221."[11]

The reaction to Philip's cash-balance approach was, however, much clearer. Jørgen Pedersen (1942, p. 293) was strongly skeptical of the idea and thought that it would have been more practical to analyze the effects of taxes on incomes. This opinion was shared by Bent Hansen, who in his very short discussion of Philip concluded that:

> It is immediately obvious that it is not possible for Philip to assess the effects of a change in the households' cash-balances that arises from a change in the public finance, without pinpointing which type of payment—to or from the government—has caused the change in balances. This cash-balance approach therefore stands out as unnecessarily complicated (1955, p. 72).

Hansen's argument mirrors a critical comment Gelting previously had put forward in his own highly Keynes/Föhl-inspired thesis on fiscal policy (Gelting 1948, p. 224). However, it is interesting that Gelting's views changed over the years. In his survey of Danish economic research he included Philip's thesis, pointing out that:

> earlier Philip ... had made a highly original attempt to base the analysis of activity effects of fiscal policy on the change produced in the cash position of the private sector. Although this approach may have induced, to some extent, an underestimation of the differences between various types of fiscal intervention, it was not necessarily a consequence of the method adopted (Gelting 1964, p. 70).

While Philip's analytical framework was met with reservation, it was acknowledged that his general account of the impact of fiscal policy on the economy was an important step forward, as indicated by Jørgen Pedersen. Though the presentation of the theory was colored by Philip's specific approach, the fundamental line of thought was in accordance with a Keynesian perspective. The thesis contributed to an understanding of how fiscal policy functioned by

[11] However, Dickson's comment is hardly representative of the general attitude among Swedish economists, as the thesis later became the main argument for offering Philip a professorship at Stockholm University in 1949 (see section V).

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

not only spelling out the implications of the new basic ideas in general but by also including a thorough investigation of the impact of the various fiscal instruments according to the actual state of the economy. Thus it was not just a presentation of the new ideas but also a warning. The general heading for the thesis was that the conduct of fiscal policy was far more intricate than normally presumed by its proponents. Philip expected that fiscal policy would become an important policy instrument in the near future and welcomed this trend, but on the other hand he did not see fiscal policy as any miraculous remedy to the fluctuations in the business cycle (Philip 1942, p. 277).

IV. PHILIP'S REJECTION OF A MULTIPLIER ANALYSIS

It has been mentioned briefly how Philip acknowledged being influenced by Keynes and yet rejected the formalized multiplier as a useful tool in the analysis of the effects of fiscal policy. To appreciate Philip's position on the multiplier one has to first remember his close attachment to the Stockholm School. Lundberg and Ohlin had been rather critical towards Keynes's *General Theory* regarding the stability of the multiplier and the consumption function, and they had argued for the need to apply a dynamic approach to analyze how the adjustments took place.[12] Philip agreed with this point of view. He stated that though a large part of the issues investigated by him would normally be treated under the heading of "multiplier-problems," he had deliberately avoided using this notion because he wanted to demarcate his own exposition from the traditional multiplier views employed by Kahn and others (Philip 1942, p. 138). It was the idea of a constant static multiplier, which implied simple solutions for the conduct of economic policy, that annoyed Philip. From the very outset of the thesis he had emphasized his desire to give a dynamic description of the adjustment process. To achieve this aim it was natural for him to apply the concepts of the Stockholm School. In his sequence analysis Philip did in fact come close to a verbal presentation of the dynamic multiplier sequence without actually using this concept. This becomes evident when he discusses Gelting's "balanced budget theorem," where he clearly employs a description of the multiplying effects of a change in fiscal policy (Philip 1942, p. 175). However, these analyses were only part of a more detailed description of the effects of discretionary fiscal policy. When analyzing the impact of fiscal policy in a particular situation, one had to take into account the specific reactions of the individuals that could influence both consumption and investment.

The criticisms of the multiplier concept that can be found in the thesis can essentially be traced to an article Philip had published already in 1939. One of the criticisms was that in certain situations special institutional conditions could exist which might invalidate the multiplier analysis. As an example, Philip mentioned the close connection between import and export that existed with the Danish-German trade agreement, where the level of exports to Germany was decided by the level of Danish imports in the previous quarters. In Philip's

[12] Lundberg (1937, pp. 35–38) and Ohlin (1937, pp. 235–40). See Laidler (1999, pp. 290–92).

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

opinion, under such circumstances it would be difficult to consider an increase in imports as reducing demand in the circular flow. Similarly, one could not always assume that increased demand for domestic goods would necessarily lead to an increase in income, as the demand could be satisfied by transferring goods from the export to the domestic market. An obvious example was agricultural goods where supply was fixed in the short term (see Philip 1939, p. 245; 1942, p. 140). Thus, it could be difficult to estimate the size of the multiplier. Furthermore, the time span which the secondary effects took to work through the economy would vary depending on the consumers' and the firms' expectations.

Philip's other main objection to the multiplier theory was the assumption of a close relationship between the income and employment multipliers. Keynes had solved the problem by measuring income in "wage-units," in order that the two multipliers would be comparable. Philip emphasized that in practice a part of the increase in income would result in higher incomes to those already employed. This was likely to occur, in particular, in agriculture, retailing, and the skilled trades. Presumably, for the manufacturing industry, which only constituted a fraction of the Danish economy, there would be greater accordance between the two multipliers as long as unemployment remained sufficiently high to restrain trade union wage demands. However, the closer the economy came to full employment, the smaller the employment multiplier could be expected to be.

The mention of the negative relationship between prices and unemployment was later commented on by Hans Brems who said, "I see here, 16 years before Phillips, a Kjeld Philip-'Phillips curve'" (1987, p. 294). However, this statement gives Philip too much credit. First of all, Philip was not the first to refer to the link between prices and unemployment.[13] Secondly, the relationship Philip discussed was between the level of prices and unemployment and not between the inflation and unemployment. On the other hand, Philip's discussion deserves a mention, because it questions the ability to achieve full employment by means of demand management, and it stresses that the politicians face a choice between monetary stability and full employment. In this respect Philips' views have a resemblance to the debate on the application of the Phillips curve of the 1960s.

Philip examines the possibility of eliminating unemployment with the help of discretionary fiscal policy in situations where there is only unemployment in some sectors of the economy and where the mobility of labor between the sectors is limited. The problem is analyzed on the basis of figure 1 (1942, fig. 60) in which unemployment (Arbejdsløshed) is measured along the vertical axis, while the horizontal axis measures the total demand per unit of time (E/T.E.). The dotted line, therefore, indicates a negative relationship between unemployment and total demand.

Philip also uses the diagram to illustrate the changes in prices by the arrows along the horizontal axis. The slope of the arrows indicates how fast the change

[13] Humphrey (1985) has detected ten predecessors of the Phillips' curve. Some of the names date back to classical economics while others are from the 1950s, but two of the contributions are from the interwar period. Irving Fisher (1926) had pointed out the high correlation between unemployment and price-changes in the U.S. between 1915–1925, and Jan Tinbergen (1936) estimated a wage relation that included employment and the lagged prices as the exogenous variables.

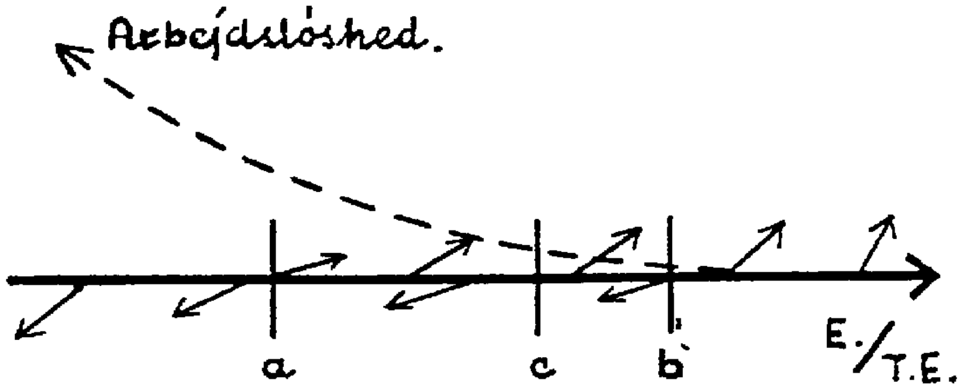

Figure 1. The Unemployment, the Total Demand and the Changes in Prices (Philip 1942, fig. 60).

in prices takes place. If the level of demand is below "a," there will be a general tendency for prices to decrease, just as all prices will rise if total demand exceeds the level of full employment output indicated by "b."

In the interval between a and b some prices will have a tendency to rise while prices in other areas may still have a tendency to fall. Philip's (1942, p. 214) own account reads: "The arrows show the tendency to change in prices. Owing to the lack of mobility of the factors, one finds that there are simultaneous movements in the opposite direction and that unemployment is only completely eliminated at the point where the factors of production become sensitive to prices." If one summarizes the price movements illustrated by the arrows in a single index, we will get the price level as an increasing function of total demand.

The central idea in Philip's analysis is that "it becomes a political task to decide the size of E [the total demand]. It may be agreed that E should lie between a and b, but the actual position may be difficult to decide on" (Philip 1942, p. 214). The politicians always have to make a choice because it will not be possible to obtain both objects by demand management alone, as an increase in total demand and incomes makes prices and unemployment move in opposite directions. Philip briefly discusses the possibilities for remedying the problem by conducting a selective policy that directs the demand toward the areas and trades with idle factors of production, but he is evidently aware that this cannot solve the problem. His suggestion is that in general it must be desirable to choose a position closer to "b" than "a," corresponding to a moderate rise in prices, since it is easier to get an adjustment in the labor market—completely in the spirit of Keynes.

Philip does not go into a more detailed analysis of whether the conflict of objectives could be settled within the general framework of the figure. Instead he discusses the trade-off between unemployment and inflation in a somewhat less interesting and simplified version of the figure, beginning with a prevailing price stability until the full employment level is reached. This, however, assumes a perfectly competitive economy. If there are trade unions in the economy, the point where wage increases set in could shift, so that an increase in total demand above

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

this level does not increase employment but merely lead to inflation. In this simplified situation, the State is therefore confronted with a choice. It either has to accept a rising price level or unemployment; unless it is possible to get the unions and employer organizations to change their policies or to directly remove their influence. The latter case is purely a question of power politics, and Philip refers to how the effectiveness of the German fight against unemployment in the 1930s had been dependent on wage increases being kept in check (Philip 1942, p. 216).

It is quite evident that Philip attaches importance to problems of demand management due to the inherent conflict between obtaining a reasonable level of employment and price stability. This can be seen from the fact that the arguments and figures of the thesis are replicated in Philip's foreign surveys of his work. A presentation close to the original one can be found in his German survey (Philip 1943), while a somewhat more elaborated version can be found in his Norwegian lecture notes from 1947. In the latter Philip (1947c, p. 41) states explicitly, "it is not possible to obtain full employment only by means of fiscal policy." Philip's line of thought was in accordance with the views put forward by his colleague from Aarhus University, Jørgen Pedersen (1944), who argued that collective bargaining on wages somehow had to be integrated in economic policy in order that a policy of high employment should not lead to inflation. It is notable that the problem of price stability was raised by prominent proponents of demand management like Pedersen and Philip and not just by economists in opposition to the new ideas of fiscal policy. It points to the fact that the Danish introduction of fiscal policy in the 1940s was quite balanced. The enthusiasm towards demand management was not allowed to overshadow the problems involved. However, by the 1950s, when the Keynesian influence on teaching and research became more manifest, these reservations were toned down.

V. THE INFLUENCE OF THE THESIS ON ECONOMIC DEBATE

Kjeld Philip's thesis was a theoretical work that largely built on ideas found in the fiscal policy debate of the late 1930s. The merit of the book was that it presented a systematic examination of these ideas. It was therefore only natural that Jørgen Pedersen (1942, p. 288) compared Philip's work with Myrdal's book from 1934, which could also be characterized as a summarizing and formalizing of the fiscal policy ideas of that time. Compared with Myrdal, the main new contribution was that Philip built on the theory of functional fiscal policy as it had been formulated by Pedersen (1937).

In his introductory remarks at the public defense of the thesis in March 1942, Pedersen pointed out that Philip's thesis would undoubtedly become a standard work on fiscal theory within the Nordic countries and that the book would draw considerable attention internationally if it was published in a world language (Pedersen 1942, p. 287). The language barrier was partly overcome when Philip (1943) published a rather long survey of his thesis in *Weltwirtschaftliches Archiv*, a journal which was closely related to the Scandinavian economists. In addition, the German-speaking audience was introduced to Philip's works in reviews and references to the book.

Two German scholars who were able to read the Scandinavian languages made

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

direct comments on Philip's Danish book. Erik Schneider's 1944 article contains several references to Philip (1942), and he described it as an important book for the further development of the theory of fiscal policy.[14] Günter Schmölders (1943) was the second German economist who drew attention to Philip's book. Schmölders's review in *Finanzarchiv* was quite favorable. He had some reservation with regard to Philip's extensive use of mathematical symbols and diagrams, which made the book difficult to read. But he also stated that Philip's investigation meant a large step forward and was a valuable contribution to the investigation of the fundamental problems which fiscal policy currently had to address. It was Schmölders's wish that the book be translated and brought to the attention to a larger audience. The same hope was expressed by the Swede Carsten Welinder (1944) in his review in *Weltwirtschaftliches Archiv*. The review was mostly a comprehensive summary of the book with some critical remarks, primarily regarding the inclusion of well-known material at the expense of a more thoughtful analysis of the original ideas. However, according to Welinder, a translation of the book would stimulate the development of new ideas in the research area of fiscal policy.

At the time of the publication of Welinder's review, Philip (1943) had already published the main results of his research in a rather long article in *Weltwirtschaftliches Archiv*, which served as a substitute for a translation of the entire book to the German audience. In 1947, a substantial Norwegian summary was published as lecture notes from the University of Oslo, and in 1949 the book was translated into Spanish.[15] The Spanish edition was part of "Biblioteca de ciencias económicas, políticas y sociales" (Library of economic, political and social sciences), a project undertaken by Professor Manuel de Torres and the publisher Aguilar (Madrid) that came to include translations of more than forty books, primarily by British and American economists. The list of authors, however, also included five Swedes: Gustav Cassel, Erik Lindahl, Gunnar Myrdal, Bertil Ohlin, and Knut Wicksell, and three Danes: P. Nyboe Andersen, Jørgen Pedersen, and Kjeld Philip.[16]

The Spanish edition was an almost direct translation of the Danish text, though some modifications were made: Some direct references to Danish affairs were excluded, whereas some references to the theoretical development which had taken place during the seven years since the first publication was added by Philip. Two major changes, however, had been incorporated. First, the appendix,

[14] "einem für die weitere Entwicklung der Finanzwissenschaft bedeutsamen Buche" (Schneider 1944, p. 282).

[15] Philip (1947c) and Philip (1949). Philip held fifteen guest lectures on "the modern fiscal policy" in the fall semester 1946 at the University of Oslo. The Norwegian summary was reprinted in 1952.

[16] The story of how the translation came about is quite fascinating. The author has been informed by Professor Juan Angel Zabalza Arbizu, University of Alicante, that:

> Simón Cano, one of Manuel de Torres' students, had studied in Stockholm during the war. Some days before Cano returned to Spain, Bertil Ohlin gave him a copy of one of his works. On the first page Ohlin wrote a list of books which were recommended to Cano. When Simón Cano came back to Valencia, Torres read the list of books. Years later Torres was appointed as Director of Aguilar Publishing, and he decided to publish not only Jørgen Pedersen's book on *Monetary Policy and Theory* from 1944 but also other works by Danish economists such as P. Nyboe Andersen's *Bilateral Exchange Clearing Policy* from 1948 and Philip's thesis.

which contained Philip's critique of the multiplier, was omitted. Secondly, the chapter on the money market had been rewritten, which made the presentation of Keynes's liquidity preference theory much more explicit. Both changes can be taken as an indication of the impact of the "Keynesian Revolution." The multiplier had become a standard tool in the presentation of the effects of fiscal policy by the late 1940s, and though Philip did not incorporate this tool in his own investigation, he toned down his critique.

In his preface to the Spanish edition, Manuel de Torres described the work of Philip as a key contribution to the development of fiscal policy. According to Torres, the merits of Philip's book were his integration of fiscal and monetary policy and the fact that his exposition covered a broad array of analytical and practical problems. For the first time we find a more detailed comparison between Philip and other authors. In his evaluation of the preceding achievements in the analysis of fiscal policy Torres stated that:

> Of all these contributions, the most important, apart from the already mentioned one by Schumacher, are Fiscal Policy, the well-known book of Alvin Hansen, and the work of Kjeld Philip. However, while Schumacher, due to the nature of his study focuses on a concrete problem of application, and Hansen, influenced by the surrounding atmosphere of the Rooseveltian experiment, dilutes his analysis with observations on economic life that give too great part of his book an anecdotal character, Philip, on the contrary, raises the problem inside the austere, succinct and rigorous limits of the pure investigation (Torres 1949, pp. XVI)[17]

An equally positive assessment of Philip's work can be found in a report from Stockholm University. In 1949, Stockholm University offered Gösta Bagge's chair of economics to Philip as invitational recruitment. The decision to appoint Philip without competition was supported unanimously by the staff of the economics department on the basis of the report of an appointment committee, which included Erik Lindahl (Uppsala), Frederik Zeuthen (Copenhagen), and Gösta Bagge (Stockholm). The report stated that Philip's penetrating theoretical analysis of fiscal and monetary policy had given rise to unstinted praise [*mycket ampla lovord*] and that his subsequent publication had demonstrated prolific research within the subject. On the basis of the review of the thesis and Philip's other publications, the committee stated that Philip deserved to be offered the professorship in fiscal and social policy in advance of any Swede who might be considered for the position.[18]

[17] Torres is referring to E. F. Schumacher's "Public Finance—Its Relation to Full Employment" (1944).

Philip's book was republished in Spanish in 1955, which indicates that the book must have been used for some time at Spanish universities. Both the edition 1949 and 1955 edition can be found in the online catalogs of several Spanish university libraries as well as at university libraries in South America.

[18] Erik Lindahl, Frederik Zeuthen, and Gösta Bagge: Report on Kjeld Philip to Humanistiska Fakulteten vid Stockholms Högskola, December 1948. Stockholm. The letter from the staff of the Department, supporting the committee's recommendation, was signed by among others Erik Lundberg, Ingvar Svennilson, and Gösta Bagge. The information on the appointment of Philip has kindly been supplied by Professor Rolf Henriksen, Stockholm University.

The positive assessments indicate that Philip's book was far from neglected. Both in Denmark and abroad the thesis was regarded as a major contribution to the theory of fiscal policy, and Philip gained a position as one of the leading Danish experts in the field. However, Philip's analytical method was not carried on by other Danish economists. On the one hand, Philip's method might be well-suited to uncover the complexity of discretionary fiscal policy depending on the reaction of the private sector. On the other hand, the approach was not directly open to further theoretical development or practical use. David Laidler has pointed out that besides the language barrier and the isolation during the war, the most important reason for the success of the Keynesian economics compared to the Stockholm School was:

> a factor intrinsic to the economics of the Stockholm School, its ... reluctance (or inability) to come to sharp, easily grasped, and definite conclusions about specific problems. The contrast between the simplicity of the Keynesian message ... and the complexity of the exercises whereby Lundberg, say, demonstrated that almost anything could be the outcome of a dynamic sequence, is a telling one (Laidler 1991, pp. 316–17).

The same argument could be used to explain Philip's lack of success. Philip lacked a connection between the theoretical framework and the data contained in, for instance, national accounts, as well as a formalization of economic behavior. The Keynesian macroeconomic theory was considerably more useful for analyzing the effects of economic policy, as pointed out by Blaug: "In retrospect, *the* Keynesian Revolution was the stimulus which the *General Theory* gave to the construction of testable models of economic behaviour" (1977, p. 663).

In a later article from 1944, Philip considered more closely the problem of quantifying the effects of fiscal policy and presented a method whereby the ideas in his thesis could be used in practice. One of the central elements in the thesis was the analysis of how the ability to influence economic activity by a specific tax was dependent on the degree to which households attempted to maintain their consumption by using their savings. The idea that the different taxes, to varying degrees, must be expected to be "paid" through a reduction in consumption or by the use of savings was not a new idea and can, for example, be found in Myrdal (1934, pp. 241–46). Philip, however, attempted to formalize the relationship by advancing the concepts of goods market equilibrium and money market equilibrium to measure fiscal policy effects.

The determination of the effects of fiscal policy consisted of determining equilibrium in the goods market on the one side, which involved having an account for government income and an account for government expenditure, and examining how consumption would be affected by changes in these accounts. On the other side was the money market equilibrium that showed how much and in which direction public revenue and expenditure would influence the interest rate (Philip 1944, p. 137). The ability to control economic activity was achieved through changes in revenue or expenditure that enabled the public authorities to design an economic policy that had the desired positive, neutral or negative effect on the goods market and on the money market:

> If [the government] starts by determining the requested goods market equilibrium by combining the various kinds of taxes and altering their magnitude, the authorities can subsequently obtain the desired money market equilibrium by public borrowing or by means of taxes that have no impact on the goods market equilibrium but only affect the money market (Philip 1944, p. 140).

Philip's 1944 article was later published in Spanish and part of it in the Norwegian summary of his thesis (Philip 1947b, 1947c). However, Philip's suggestions for how the ideas in his thesis could be used to evaluate the effects of economic policies were still presented in general terms. A comparison with Gelting's 1948 thesis on fiscal policy is useful, as Gelting, with his basis in the static aggregated Keynesian model, clearly commanded more "tools" that could be directly applied to economic analysis. Gelting was able to calculate a vast number of multipliers, which enabled him to assess the effects of different kinds of fiscal policy. Furthermore, the parameters had an empirical foundation, as Gelting estimated the model on the basis of the national account for the 1930s (Andersen and Topp 1982).

If a further development on the basis of Philip's analytical methods was to have taken place, it might have been in relation to his appointment in Stockholm in 1949. The offer from the university was not only a great honor to Philip, but at the same time it seemed to be an opportunity to get into closer contact with the economists who had laid the foundation to the "Stockholm-School." However, P. Nyboe Andersen (1990, p. 139) states that this move certainly did not live up to Philip's expectations, as the research environment had to bid farewell to many of its leading figures who had jointed international organizations and economic research institutes. Though Philip published some articles and reviews in Swedish journals, the main body of his publications was still in Danish or in the main foreign languages, which became increasingly important after the war. Compared with his Danish colleagues, Philip published a considerable portion of his articles in foreign languages. In the period 1945–1954, about twenty five percent of the publications were in English or German and about fifty percent were published in foreign languages.[19]

As mentioned earlier, Philip's analytical methods didn't leave a great mark on the subsequent Danish economic debate. Nor, in fact, on his own later work, which may have been due to recognition that it was easier to proceed by using other, more fruitful methods. Philip shifted direction toward the Keynesian

[19] Philip's approach bears some resemblance with the one used by Patinkin (1956). Both Patinkin (1956) and Philip (1942) set out to establish a micro-foundation for analyzing the individual excess demand for money, and both related their exposition to the works to J. R. Hicks and Wicksellian/Swedish tradition. Furthermore both had an aversion to the "instantaneous" multiplier of comparative statics analysis. Philip's views agree with Patinkin's statement that "Strictly speaking … this multiplier has no place in our model. It is part and parcel of the Keynesian 'diagional-cross' analysis that we have already rejected" (Patinkin 1956, p. 242). On the other hand, there are distinct differences as well. Unlike Patinkin, Philip does not integrate the real money balances in the demand functions. His aim is only to establish a framework that allows him to investigate the impact of fiscal policy on both the goods market and the money market.

The resemblance might have served as a stepping stone for gaining support for Philip's ideas. Yet it seems to have been rather unsuccessful. There are no references found either in Patinkin (1956) or in the subsequent debate that indicate any awareness of Philip's contributions.

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

framework, and later he published empirical analyses on liquidity preference functions (Philip 1949–50, 1951). It was left to another Dane, Bent Hansen, (1955) to become known for analyzing fiscal policy within the framework of the Stockholm School. Though the topic is the same, the two books are quite distinct. Hansen's approach involved the use of highly formal models, while Philip's exposition was primarily verbal and with much emphasis on investigating how the institutional setting of the economy influenced the fiscal policy.[20]

In 1951, Philip returned to Denmark to take up a professorship at the University of Copenhagen. He continued to publish articles on fiscal and monetary policy, and his rank as an influential economist was underlined by his appointment to give the opening address to the Nordic Economic Association in 1952. After his return to Copenhagen, Philip shifted his research interests away from fiscal policy and macroeconomic topics over to public finance with an emphasis on the microeconomic effects of the public sector. The areas which became particularly central to this later work were welfare economics and the relationship between the national and the local public sector. Already in 1946, Philip had prepared a proposal to replace the existing Danish reimbursement and equalization arrangements with local government block grants. This research area was pursued further during a period of study leave in the USA in 1947, and over the next few years a series of pioneering works on fiscal federalism were published in English.[21]

His return to Denmark as a university economist was short-lived. Philip had a close association with the Social-Liberal Party, and in 1957 this led to him being appointed Minister of Trade in the new Danish government.[22]

VI. CONCLUSION

Even though later generations have been reserved in their response to Kjeld Philip's analytical method, his 1942 thesis and his article from 1944 deserve to be remembered as early contributions to bringing principles of functional finance from a more general theoretical stage to a stage where the discretionary fiscal policy effects were qualified to such a degree that fiscal policy could be used as an economic tool. In the long run, it was, of course, the Keynesian school of thought, which Gelting represented in Denmark, that marked the next decades' fiscal policy debate. There was, however, also loss connected with this development. Philip's thesis was an early warning of the weaknesses of fiscal policy as a tool for fine tuning the economy and of the problems associated with simultaneously maintaining high employment and price stability. This message was

[20] Philip wrote a sharp comment after the publication of Hansen (1955). He praised Hansen's book for the lucidity with which the analyses are carried out. In the fields of economics that aims at providing collections of models it was perhaps the finest in the borderland between economics and fiscal policy. However, he scorned Hansen for his contempt for inconvenient facts of this world that have so often tended to reduce the theory of economics to a kind of plaything (Philip 1957, pp. 75–78).

[21] Philip (1946, 1947a, 1954). Philip's contributions to fiscal federalism are discussed in Lotz (1998).

[22] In 1960 he was appointed Minister of Finance and the next year he became Minister of Economic Affairs. In 1964, at the age of 52, Philip left politics, and during the following years he devoted himself to a career as adviser and researcher in development economics.

toned town in the post-war economic optimism and did not appear again in the Danish debate until the middle of the 1970s, but this time emanating from the theoretical debate that took place abroad.

REFERENCES

Andersen, Ellen. 1994. "Jørgen Gelting og Københavns Universitet 1943–51 (Jørgen Gelting and the University of Copenhagen)." *Nationaløkonomisk Tidsskrift* 132 (2): 125–38.

Andersen, Ellen and Niels-Henrik Topp. 1982. "The First Danish Empirical Model." In Svend Andersen *et al.*, eds., *Economic Essays in Honour of Jørgen H. Gelting*. Copenhagen: Nationaløkonomisk Forening.

Andersen, P. Nyboe. 1987. "Danske økonomers møde med Keynes's General Theory (Danish Economists and Keynes's the General Theory)." *Nationaløkonomisk Tidsskrift* 125 (3): 272–76.

——. 1990. "Kjeld Philip." *Nationaløkonomisk Tidsskrift* 128 (2): 137–42.

Birck, L. V. 1925. *Europas Svøbe: Staternes Gæld. Beskrevet, forklaret og historisk belyst* (The Scourge of Europe: The Public Debt). Copenhagen: Martins.

Blaug, Mark. 1977. *Economic Theory in Retrospect*. London: Heinemann.

Brems, Hans. 1956. "The Scandinavian Countries." *American Economic Review* 46 (2): 352–59.

——. 1987. "En disputats om finanspolitiske ideer i Danmark 1930–1945 (Review of a Thesis on Danish Fiscal Policy 1930–45)." *Nationaløkonomisk Tidsskrift* 125 (3): 287–98.

Cassel, Gustav. 1934. *Teoretisk Socialekonomi* (Theory of Social Economics). Stockholm: Kooperativa förbundets bokförlag.

Dickson, Harald. 1943. "Anm. af Kjeld Philip: Det offentliges Finanspolitik og den økonomiske Aktivitet" (Review of Kjeld Philip's Thesis). *Ekonomisk Tidskrift* 45 (2):171–74.

Fisher, Irving. 1926. "A Statistical Relation between Unemployment and Price Changes." *International Labour Review* 13 (1/6): 785–92.

Föhl, Carl. 1937. *Geldschöpfung und Wirtschaftskreislauf*. München: Duncker & Humblot.

Garside, W. R. and N.-H. Topp. 2001. "The Fate of Nascent Keynesianism: Denmark in the 1930s." *History of Political Economy* 33 (4): 717–41.

Gelting, Jørgen H. 1941. "Nogle Bemærkninger om Finansieringen af offentlig Virksomhed (Some Observations on the Financing of Public Activity)." *Nationaløkonomisk Tidsskrift* 79 (5): 293–99.

——. 1948. *Finansprocessen i det økonomiske kredsløb* (Fiscal Policy and Economic Activity). Copenhagen: Videnskabelig litteratur.

——. 1964. " Recent Trends in Economic Thought in Denmark." *American Economic Review* 54 (4): 65–78.

Haberler, Gottfried von. 1939. *Prosperity and Depression*. Geneva: League of Nations.

Hansen, Alvin H. 1941. *Fiscal Policy and Business Cycles.* New York: Norton.

Hansen, Bent. 1955. *Finanspolitikens ekonomiska teori* (Economic Theory of Fiscal Policy). Stockholm: Finansdepartementet.

Hawtrey, R. G. 1928. *Currency and Credit*. London: Longmans.

Hicks, J. R. and R. G. D. Allen. 1934. "A Reconsideration of the Theory of Value." *Economica* 1 (1): 52–76.

Hicks, J. R. 1939. *Value and Capital*. Oxford: Clarendon Press.

Holtrop. M. W. 1933. "Die Umlaufgeschwindigkeit des Geldes." In. F. A. Hayek, ed., *Beiträge zur Geldtheorie Von Marco Fanno, Marius W. Holtrop, Johan G. Koopmans, Gunnar Myrdal und Knut Wicksell*. Wien: Springer

Humphrey, Thomas M. 1985. "The Early History of the Phillips Curve." Reprinted in Thomas M. Humphrey, *Money, Banking and Inflation: Essays in the History of Monetary Thought*. Aldershot: Elgar 1993.

Jonung, Lars. 1991. "Introduction and Summary." In Lars Jonung, ed., *The Stockholm School of Economics Revisited*. Cambridge: Cambridge University Press.

Jæger, Oskar. 1930. *Finanslære* (Public Finance). Oslo: Aschehoug.

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press

Kahn, R. F. 1931. "The Relation of Home Investment to Unemployment." *Economic Journal* 41 (162): 173–98.

Keynes, John Maynard. 1936. *The General Theory of Employment, Interest and Money.* London: Macmillan.

Kristensen, Thorkil. 1936. "En Teori om Beskæftigelsen (A Theory of Employment)." *Samfundets Krav* 36 (2):127–36

——. 1942. "En økonomisk Disputats (Review of Kjeld Philip's Thesis)." *Nationaløkonomisk Tidsskrift* 80 (5): 298–308.

Laidler, David. 1991. "The Austrians and the Stockholm School: Two Failures in the Development of Modern Macroeconomics?" In Lars Jonung, ed., *The Stockholm School of Economics Revisited.* Cambridge: Cambridge University Press.

——. 1999. *Fabricating the Keynesian Revolution: Studies of the Inter-war Literature on Money, the Cycle, and Unemployment*. New York and Cambridge: Cambridge University Press.

Lerner, A. P. 1943. "Functional Finance and the Federal Debt." *Social Research* 10 (1/4): 38–51.

Lindahl, Erik. 1939. *Studies in the Theory of Money and Capital*. London: Allen & Unwin.

Lotz, Jørgen. 1998. "Local Government Reforms in the Nordic Countries, Theory and Practice." In Jørgen Rattsø, ed., *Fiscal Federalism and State-local Finance*. Cheltenham: Elgar.

Lundberg. Erik. 1937. *Studies in the Theory of Economic Expansion*. London: Kings & Son.

Marshall, Alfred. 1922. *Principles of Economics.* London: Macmillan.

Myrdal, Gunnar. 1934. *Finanspolitikens ekonomiska verkningar* (The Economic Effects of Fiscal Policy). Stockholm: Finansdepartementet.

——. 1939. "Fiscal Policy in the Business Cycle." *American Economic Review* 29 (1): 183–93.

——. 1972. *Against the Stream: Critical Essays on Economics.* New York: Pantheon Books.

Neisser, Hans. 1928. *Der Tauschwert des Geldes.* Jena: Fischer.

Nielsen. Axel. 1930. *Bankpolitik* (The Theory of Banking). Copenhagen: Hagerup.

Ohlin, Bertil. 1937. "Some notes on the Stockholm Theory of Savings and Investment I." *The Economic Journal* 47 (186): 221–40.

Patinkin, Don. 1956. *Money, Interest, and Prices: An Integration of Monetary and Value Theory.* Evanston: Row, Peterson.

Pedersen, Jørgen. 1937. "Einige Probleme der Finanzwirtschaft." *Weltwirtschaftliches Archiv* 45: 467–92.

——. 1942. "En Økonomisk Disputats (Review of Kjeld Philip's Thesis)." *Nationaløkonomisk Tidsskrift* 80 (5): 287–97.

——. 1944. *Pengeteori og Pengepolitik* (Monetary Theory and Policy). Copenhagen: Busck.

Pedersen, H. Winding. 1936. "Anm. af J. M. Keynes: *The General Theory of Employment, Interest and Money* (Review)." *Nationaløkonomisk Tidsskrift* 74 (3): 233–36.

Philip, Kjeld. 1939. "Om Indkomstforplantning og Beskæftigelsesforplantning (On the Transmission of Adjustments in Income and Employment)." *Nationaløkonomisk Tidsskrift* 77 (4): 295–325.

——. 1942. *Bidrag til Læren om Forbindelsen mellem det Offentliges Finanspolitik og den økonomiske Aktivitet* (Contributions to the Theory of the Interaction between Fiscal Policy and Economic Activity). Copenhagen.

——. 1943. "Finanzpolitik und Wirtschaftliche Aktivität." *Weltwirtschaftliches Archiv* 57: 405–42.

——. 1944. "Finanspolitik og Rentepolitik (Fiscal and Monetary Policy)." *Nationaløkonomisk Tidsskrift* 82 (2): 121–42.

——. 1946 *Redegørelse for arbejdsdelingen mellem staten og kommunerne og for regler for statstilskud til kommuner i nogle andre lande.* København. English edition, *Division of Work Between the Central and Local Governments and Rules for Grants-in-aid to Local Governments in Norway, Sweden, England and Wales, and Holland.* Cambridge, MA: Harvard University, 1948.

——. 1947a *Forslag til indførelse af et statsfinansieret bloktilskud til kommunerne til erstatning af det mellemkommunale refusionsforbund og den fælleskommunale udligningsfond m. m.* København. English edition, *Proposals for the Introduction of a State Financed Block Grant to Municipalities Replacing Existent Forms of Inter-municipal Pools.* Cambridge, MA: Harvard University, 1948.

——. 1947b. "Politica financiera y politica del interes." *Anales de economia* 7 (25): 21–51.

——. 1947c. *Referat af Kjeld Philips forelesninger over moderne finansteori holdt ved Universitetet i Oslo høstsemstret 1946*. Oslo. Reprinted 1952.

——. 1949–50. "A Statistical Measurement of the Liquidity Preference of Private Banks." *Review of Economic Studies* 16 (2): 71–77.

——. 1949. *La política financiera y la actividad económica*. Madrid, Spain: Aguilar.
——. 1951. "Interest and Public Expenditure Financed by the Central Bank." *Review of Economics and Statistics* 33 (4): 297–303.
——. 1954. *Intergovernmental Fiscal Relations.* Copenhagen: Munksgaard.
——. 1957. "Model-Building and Reality: A Case in Point." *Kyklos* 10 (1): 75–78.
——. 1985. *Dengang i Pilestræde, et miljø fra 20'erne.* Copenhagen: Gyldendal.
Rothschild, K. W. 1964. "The Old and the New—Some Recent Trends in the Literature of German Economics." *American Economic Review* 54 (2): 1–33.
Schmidt, Erik Ib. 1993. *Fra psykopatklubben: Erindringer og optegnelser* (Memoirs). Copenhagen: Gyldendal.
Schumacher, E. F. 1944. "Public Finance: Its Relation to Full Employment." In *The Economics of Full Employment: Six Studies in Applied Economics.* Oxford: Blackwell.
Schmölders, Günter. 1943. "Öffentliche Finanzpolitik und volkswirtschaftliche Aktivität." Finanzarchiv n.s. 9 (3): 678–82.
Schneider, Erich, 1944. Zur Frage der Wirkung finanzpolitischer Maønahmen auf die wirtschaftliche Aktivität. *Finanzarchiv* n.s. 10 (2): 277–87.
Tinbergen, Jan. 1936. "An Economic Policy for 1936." Reprinted in L. Klaasen *et al*., eds., *Jan Tinbergen: Selected Papers.* Amsterdam: North-Holland 1959.
Topp, N.-H. 1987. *Udviklingen i de finanspolitiske ideer i Danmark 1930–1945* (New Ideas on Fiscal Policy in Denmark 1930–1945). Copenhagen: Jurist og Økonomforbundet.
Torres, Manuel de. 1949. "Introduccion a la edicion Española." In Kjeld Philip, *La política financiera y la actividad económica.* Madrid: Aguilar, 1949.
Welinder, Carsten. 1944. "Besprechung: Kjeld Philip, Bidrag til Læren om Forbindelse mellem den offentlige Finanspolitik og den økonomiske Aktivitet." *Weltwirtschaftliches Archiv* 57: 63*–67*.
Wicksell, Knut. 1929 og 1937. *Föreläsningar i nationalekonomi* (Lectures). Lund: Gleerup.

https://doi.org/10.1080/1042771032000114746 Published online by Cambridge University Press