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4

International Economics and Domestic Politics: Notes on the 1920s

BARRY EICHENGREEN AND BETH SIMMONS

International Economics

research on the inter-war years points to the importance of inter-
al economic policies for the macroeconomics of the 1920s and 1930s.
apters, in the second section of this volume are no exception. Tarmo
o and Lars Jonung show how the deflation associated with Sweden's
o its pre-war gold parity in 1922 was associated with a severe
ion of output, but how Finland escaped those costs by accepting as
nt the depreciation of its currency. Isabelle Cassiers shows for
and France how the decision to remain on the gold standard
the depth and duration of the Great Depression in both countries,
Belgium's abandonment of convertibility in March 1935, a year
alf in advance of France, accounts for the precocious recovery (by
tandards) of its exports and production. Jean-Charles Asselain and
lessis compare France not with its northern European neighbour,
but with its hot-blooded Mediterranean rival, Italy. While the very
structures of the French and Italian economies render the compar-
blematic, once again international monetary policies emerge as key
erstanding the course of the Depression. Both France and Italy
initially due to their allegiance to gold and their defence of
ngly overvalued exchange rates. Recovery commenced earlier in
an in France due to Mussolini's initiation of expansionary monetary
under the cover of exchange controls. Perhaps the better compar-
Italy is Germany, as the chapter by Theo Balderston shows: in
ny, as in Italy, the inception of recovery coincided with the inaugur-
expansionary policies (or at least the termination of contractionary
gain under the protection afforded by exchange controls, although

pter began as a comment on the chapters in this volume by Asselain and Plessis,
on, Cassiers and Haavisto and Jonung. We thank Charles Feinstein for encouraging us
nd it into the present chapter. The work described here reports early findings from an
project, the full results of which will be presented elsewhere.

more radical reflationary stimulus was ruled out by fears of inflation rooted in the experience of the 1920s.[1]

These and the other European experiences considered in this volume can be seen as special cases of a general pattern linking domestic economic performance to international economic policies. These links have been emphasized by, among others, Choudri and Kochin (1981), Temin (1989), Eichengreen (1992), and Bernanke and James (1992).[2] In the 1920s, these authors argue, the course and contours of recovery and readjustment were conditioned by the decision of whether or not to return to gold at the pre-war parity.[3] Countries like Britain and Sweden returning to gold at pre-war rates of exchange had to engineer a reduction of wages and prices sufficient to reverse the wartime inflation, or at least to reduce prices to the levels that US prices had scaled. Other countries, like France, Belgium, and Italy, which ultimately returned to gold at parities below those prevailing before the war, were unable to prevent inflation from persisting into the mid-1920s.

The inflationary and deflationary consequences of these international economic policies exercised a powerful influence over economic recovery in the 1920s. Countries that accommodated moderate inflation by abandoning their pre-war gold parities surmounted the disruptive after-effects of the First World War more quickly than did countries which subjected themselves to radical deflation in order to restore gold convertibility at pre-war rates.[4]

The mechanisms linking inflation and economic activity were the one emphasized by Keynes in his *Tract on Monetary Reform* (1923). Inflation stimulated output and employment by reducing real wages and real interest rates. Keynes's assertion that it is a 'commonplace' of economics textbooks that wages tend to lag behind prices in periods of inflation and deflation has been a subject of debate among economists ever since. Whatever the validity of the generalization, the fact is that wages did exhibit such a tendency in the special circumstances of the 1920s, except where explosive hyperinflation led workers and employers to jettison existing wage contracts and contractions. The reason was obvious enough: it was costly to throw out contracts before they expired and to supersede prevailing labour-market conventions.

[1] Eichengreen (1991) emphasized the tendency for countries imposing exchange controls, which were often the same ones that had experienced high inflation a decade before, to capitalize on their newfound freedom by dramatically expanding their money supplies.

[2] Two surveys of the relevant literature are Eichengreen (1992*b*) and Temin (1993).

[3] This paragraph draws on and summarizes the argument of Eichengreen (1986).

[4] This leaves aside countries where price-level increases degenerated into hyperinflation with pronounced negative consequences. This stratification raises the question, of course, of how long moderate inflation can remain moderate without degenerating into an explosive inflationary spiral.

So long as it was still possible that price increases might be reversed and the pre-war parity restored after all, inflation and real wage reductions might prove temporary; this in turn minimized the incentive to recontract. It followed that output recovered more quickly in countries like France and Belgium where employers enjoyed an inflation-induced reduction in labour costs during the critical phases of post-war reconstruction, and that in countries like Britain and Sweden the deflation associated with restoring the pre-war parity heightened labour cost disadvantages.

Besides raising real labour costs, deflation increased the burden of business debts. Keynes emphasized the capital gains and losses accruing to business as a result of changes in the price level. Inflation not reflected in a commensurate increase in interest rates reduced the value of corporate liabilities by inflating away a portion of outstanding debts. The entrepreneur, his burden lightened, was willing to borrow more in order to expand the volume of production. Deflation that failed to lower interest rates similarly increased the weight of debt burdens, discouraging new borrowing to finance investment and production.

Critical to the operation of this mechanism was that inflationary trends be unanticipated, for otherwise they would have been incorporated into interest rates. That the permanence of inflationary trends was imperfectly anticipated was surely the case in the early 1920s, when there remained widespread confidence in governments' commitment to restoring pre-war parities and in their ability ultimately to do so. This was the dominant assumption even of German prospects as late as 1920–1.[5]

Where inflation and deflation slowed and currencies were stabilized, either at pre-war parities or at depreciated levels, the real wage and output changes of the preceding period were reversed. If wages had lagged behind rising prices during the inflation, trade unions used the lull following stabilization to make up lost ground. If real wages had risen as a result of the tendency for money wages to lag behind falling prices, employers now insisted that wages rise less quickly than productivity. In the immediate post-stabilization period, as a consequence, the cost of production generally fell in countries that had succeeded in restoring pre-war parities and rose in countries that had failed—the opposite of the pattern that had prevailed prior to stabilization.

To document these regularities, we reproduce a pair of tables from Eichengreen (1986), estimated on data for a cross-section of countries. These relate first real wages and then output on current and lagged inflation.[6] The

[5] This point is documented by Holtfrerich (1986), among many others. For an analysis of the political conditions that undermined this confidence, see Simmons (1994).

[6] Table 4.1 utilizes data for the UK, France, Norway, Sweden, Belgium, Italy, Denmark, Germany, Finland, Switzerland, Canada, USA, Australia, and Japan. Table 4.2 drops Finland and Switzerland for lack of data.

results show the tendency for current inflation to erode real wages and stimulate output, and for lagged inflation to induce an offsetting catch-up effect.

TABLE 4.1. *Cycles of inflation and real-wage growth*, 1921–1927

Equation	Sample period		Constant	π	π_{-1}	R^2	n
1.	Dependent variable	1921–7	1.35	−0.24	0.001	.33	14
			(12.06)	(2.28)	(0.58)		
	π:	1921–7					
	π_{-1}:	1920–1					
2.	Dependent variable	1922–7	0.93	−0.28	0.54	.54	14
			(3.33)	(3.58)	(1.60)		
	π:	1922–7					
	π_{-1}:	1921–2					
3.	Dependent variable	1923–7	1.33	−0.46	0.28	.48	14
			(0.57)	(2.56)	(1.03)		
	π:	1923–7					
	π_{-1}:	1921–3					
4.	Dependent variable	1924–7	1.55	−0.86	0.42	.76	14
			(15.66)	(5.32)	(2.67)		
	π:	1924–7					
	π_{-1}:	1921–4					
5.	Dependent variable	1925–7	1.42	−0.51	0.19	.74	14
			(16.89)	(3.84)	(1.85)		
	π:	1925–7					
	π_{-1}:	1921–5					

Note: *t*-statistics in parentheses. Dependent variable is the ratio of real wages at the end and the start of the period. π is the change in wholesale prices.

Source: Eichengreen (1986).

The offset is only partial, however. The coefficient on lagged inflation, in other words, is consistently (and significantly) smaller than that on current inflation. This may reflect the need for more time than that encompassed by these regressions for catch-up to be completed, that is, for the downward-sloping short-run Phillips curve to rotate to its vertical long-run position. Alternatively, it may indicate that the long-run Phillips curve was not vertical in this period. The latter is not a view to which most economists would subscribe, although it is necessarily one that must be adopted by those who would insist that national decisions to go back to the gold standard at 'wrong' exchange rates caused persistent economic problems throughout the post-stabilization period.

Once the Great Depression struck, these same mechanisms again came into play.[7] All countries suffered a deflationary shock to the price level,

[7] Here we draw on and summarize the analysis of Eichengreen and Sachs (1985).

which raised real wages and increased the weight of debt burdens, through both channels placing downward pressure on production. In 1931, however, the industrial world bifurcated into two monetary blocs that subsequently followed very different macroeconomic paths. One set of countries, led by France and including Belgium, Switzerland, the Netherlands, Czechoslovakia, and initially the USA, clung to their gold-standard parities, deflating as necessary for their currencies' defence. Others, led by Britain and including Scandinavia and the members of the British Commonwealth and Empire other than South Africa, abandoned the gold standard, either voluntarily or under duress. This removed the imperative of pursuing deflationary policies, allowing monetary and fiscal stringency to be relaxed. These policy shifts ameliorated the severity of the slump in countries with

TABLE 4.2. *Cycles of inflation and economic growth*, 1921–1927

Equation	Sample period		Constant	π	π_{-1}:	Start/ 1913	R^2	n
1.	Dependent variable	1921–5	0.24	1.52	−0.003	−0.44	.91	12
			(0.64)	(4.92)	(1.76)	(4.46)		
	π:	1923–5						
	π_{-1}:	1920–3						
2.	Dependent variable	1921–5	−0.83	2.15	−0.002		.69	12
			(1.62)	(4.14)	(0.58)			
	π:	1923–5						
	π_{-1}:	1920–3						
3.	Dependent variable	1921–6	0.88	0.99	−0.006	−0.42	.88	12
			(3.27)	(5.30)	(1.98)	(2.92)		
	π:	1923–6						
	π_{-1}:	1920–3						
4.	Dependent variable	1921–6	0.29	1.19	−0.005		.75	12
			(1.20)	(5.00)	(1.36)			
	π:	1923–6						
	π_{-1}:	1920–3						
5.	Dependent variable	1921–7	1.37	0.81	−0.18	−0.52	.72	12
			(4.68)	(2.48)	(0.52)	(3.29)		
	π:	1924–7						
	π_{-1}:	1920–4						
6.	Dependent variable	1921–7	0.93	1.00	−0.50		.34	12
			(2.50)	(2.17)	(1.04)			
	π:	1924–7						
	π_{-1}:	1920–4						

Note: *t*-statistics in parentheses. Dependent variable is the ratio of industrial production at the end and the start of the period. π: is the change in wholesale prices.

Source: Eichengreen (1986).

newly depreciated currencies relative to its continued intensity in the countries of the gold bloc.

The mechanisms through which these different exchange-rate regimes and the associated monetary and fiscal policies transmitted their effects were the same as in the 1920s. On the supply side, countries which abandoned the gold standard, for whatever reason, and allowed their currencies to depreciate, reduced real wages and enhanced the profitability of manufacturing production. Regression analysis based on data for a cross-section of countries suggests that the depreciation of sterling (which reduced the gold content of the pound by about 40 per cent) lowered real wages in Britain by about 10 per cent relative to the level which would have prevailed in 1935 had the country clung to the gold standard with the tenacity of Holland and France. If wages had been 10 per cent higher, industrial production would have been 5 per cent lower, *ceteris paribus*.[8] On the demand side, countries that depreciated their currencies succeeded in improving the competitiveness of their exports and enhancing the incentive to invest.

The question raised by these observations is why countries pursued such very different policies. If the benefits of currency depreciation and inflation were clear to see, then why were some countries so inclined to close their eyes to their advantages? Why were others more willing to meet the recessionary shock with depreciation and reflation?

Countries' historical experiences with inflation and deflation in the 1920s may have been the single most important proximate determinant of the policies pursued in the 1930s.[9] Those nations which had succeeded in restoring their pre-war parities in the 1920s were least hesitant to devalue in the 1930s. Conversely, those which had suffered persistent, socially divisive inflations less than a decade before were least inclined to risk a repetition. Ultimately, then, as with many questions in inter-war economic history, one is drawn back to the immediate post-First World War years.

2. Domestic Politics

The international economic policy choices of the early 1920s—choices that, according to the preceding argument, had such powerful and enduring effects—were political choices. It was a political decision to pursue the policies needed to deflate and restore the pre-war gold-standard parity, or to refuse to implement the needed policies and to allow inflationary tendencies to persist. International economic policy choices in the first half

[8] These elasticities can be read off figures 2 and 3 of Eichengreen and Sachs (1985).
[9] See Eichengreen (1992*a*), esp. ch. 1.

of the 1920s were thus profoundly shaped by partisan struggles, political instabilities, and governmental institutions.[10]

An immense literature describes the politics of the 1920s and their implications for policy.[11] Yet economic historians have made little progress—indeed, they have invested surprisingly little effort—in systematically incorporating political factors into the analysis of post-First World War economic policies. The reason for this reticence is not hard to find. The literature on post-First World War politics is a literature dominated by powerful individuals, national idiosyncrasies, and chance events. It is written in terms of the personalities of Winston Churchill and Raymond Poincaré and the attitudes of Montagu Norman and Benjamin Strong. This material resists efforts to identify systematic determinants of economic policy outcomes. Social scientists seek regularities driven by stable structural determinants. These, to put the point mildly, are not clearly visible in the literature on post-First World War politics.

One place to start in attempting to systematize these connections is the new political economy. Work flying under this banner (surveyed and extended by Grilli *et al.*, 1991) shows how cross-country patterns in inflation rates, budget deficits, and public-debt levels bear a seemingly stable and predictable relationship to a small number of political variables such as the political orientation of the government and its longevity. This, at least, is the conclusion that seems to emerge from the analysis of data for recent decades. Contributors to this literature suggest further that the ability of governments to translate their preferences into policy have depended on a small number of well-defined factors such as the size of the government's majority and the statutory independence enjoyed by policy-making institutions such as the central bank.

It is possible to pursue a parallel analysis for the 1920s. We focus here on the political determinants of the rate of currency depreciation in the first half of the decade. In Table 4.3 we report regressions of the percentage rate of currency depreciation in a given country in a given year on various proxies for political conditions.[12] The exchange rate is defined as US dollars per unit of domestic currency. Four political variables are considered. One is a measure of government instability: the number of times each year in which there was 50 per cent turnover of cabinet members or a significant change in prime minister.[13] The sign of this variable should be negative if government instability is conducive to depreciation. (Recall that the

[10] See Simmons (1994) for a detailed discussion.
[11] The single richest introduction to this literature is Maier (1975).
[12] Data on exchange rates are taken from Federal Reserve Board (1944).
[13] Our data on cabinet turnover are constructed from Banks (1971). There exist previous studies of patterns of governmental instability in inter-war Europe. See Zimmermann (1988).

exchange rate is defined as dollars per domestic currency unit, so a change in the negative direction indicates a depreciation.) The logic is that ephemeral governments should be less willing to pursue policies of short-term sacrifice in order to reap the long-term gains associated with stabilization.

The second variable is an index of central bank independence.[14] This is constructed as the average of four sub-indices: one which measures the government's capacity to appoint or otherwise influence the choice of the central bank head and governing board; one which indicates the severity of any prohibitions on central bank advances to the government; one which measures whether the executive or parliament may participate or otherwise intervene in the central bank's decision-making process; and one which indicates the extent to which the central bank is publicly or privately owned. The sign on this index should be positive if central bank independence enhances the ability of the monetary authorities to resist financing government budget deficits and otherwise bowing to inflationary pressures.

The third political variable is the size of the governing majority, proxied for by the percentage of seats in parliament held by parties included in the governing coalition.[15] Its sign should be positive if larger majorities are better able to implement the painful policies required for stabilization, while smaller ones are susceptible to political fragmentation and deadlock.

The final political variable is the percentage of seats in Parliament or Congress held by left-wing parties, defined as Social Democrats, Socialists, Communists, and other working-class parties.[16] US Democrats and Canadian Liberals are debatably included in this category. The sign of this variable is ambiguous *a priori*. Where labour contracts were structured such that wages were able to keep pace with inflation, workers should have been insulated from many of its costs, producing a positive association between left-wing representation and inflation. Conversely, where wages lagged behind price increases but renters were able to insulate themselves from their effects by altering the term structure of their assets toward Treasury bills and other financial instruments with short terms to maturity, the association is likely to be negative. In so far as the results of the previous section suggest the existence of considerable nominal inertia in labour markets, we are inclined to anticipate a negative sign on this variable.[17]

[14] This variable is constructed on the basis of data in Kirsch and Elkin (1928).
[15] Our measures are constructed from Flora (1983) and McHale (1983).
[16] This variable was constructed from the same sources as the size of the governing majority.
[17] A more sophisticated treatment would allow the preferences of left- and right-wing parties to vary over the business cycle, as in Simmons (1994); e.g. parties of the left might be less concerned about inflation-associated reductions in real wages during periods of high unemployment, on the grounds that policies of demand stimulus that produced inflation also reduced unemployment.

Information on these variables was assembled for nineteen European countries, the USA, Canada, and Japan. Regressions were run on pooled data for 1921–6. Given the nature of the argument, we excluded observations for countries with non-democratic governments in particular years. The number of observations differs across regressions because of missing data. Fixed effects for countries and years were included but not reported. Along with the four political variables we consider one measure of economic performance: the lagged rate of economic growth. Our prior is that governments in rapidly growing economies where the size of the distributional pie was expanding should have found it easier to push through the painful compromises required for stabilization.[18]

TABLE 4.3. *Political determinants of rate of exchange-rate depreciation*, 1921–26
(Dependent variable is % change in domestic currency units per dollar)

Explanatory variable	(1)	(2)	(3)
Constant	−0.97	−1.11	2.04
	(4.36)	(4.59)	(5.00)
Government instability	−0.07	−0.07	−0.10
	(2.12)	(1.85)	(2.58)
Central bank independence	0.12	0.12	0.15
	(5.22)	(5.31)	(5.94)
Governing majority		0.01	0.01
		(1.13)	(0.67)
Per cent left-wing			0.02
			(2.52)
Lagged output growth			0.30
			(1.90)
n	103	93	76
Standard error	0.199	0.196	0.184

Note: t-statistics in parentheses. All equations include country and year dummy variables.

With one exception, the political variables enter with their expected signs. Countries with independent central banks, more stable governments, and larger governing majorities appear to have been better able to resist exchange-rate depreciation in the 1920s. The first two of these variables are statistically significant at standard confidence levels.[19] As expected, countries

[18] Eichengreen and Casella (1993) have analysed a war-of-attrition model to identify the precise conditions under which an increase in national income will in fact accelerate the termination of a distributional conflict.
[19] That not all three variables are significant follows from the degree of multicolinearity between governmental instability and the size of the majority, a pattern emphasized previously by Zimmermann (1988).

in which recovery had been proceeding rapidly (as proxied by lagged output growth) were better able to resist exchange-rate depreciation.[20]

The coefficient on the percentage of representatives with a left-wing affiliation also enters significantly, though not with the predicted sign. According to these regressions, left-wing governments were more rather than less likely to resist exchange-rate depreciation in the 1920s. This is not due to the coding of American and Canadian parties, for the result is the same when the observations for these countries are dropped.

This finding is surprising given the historical association of left-wing governments with inflation.[21] The Belgian and French inflations were both presided over by left-wing governments, and stabilization in both countries coincided with a political consolidation that brought centrist prime ministers to power. (In Belgium, the Government of National Union was a three-party coalition with a significantly more centrist cast than its predecessor. It was led by Henri Jaspar, a member of the Catholic Party, and dominated by the financially conservative Emile Francqui as minister without portfolio. In France, depreciation was halted and stabilization took hold only when the conservative Raymond Poincaré replaced the left-leaning Edouard Herriot as head of government.) It could be that membership in social democratic, socialist, communist, and other working-class parties is not a sufficiently precise measure of distributional preferences for the 1920s. Alternatively, it may be that this association between left-wing governments and currency depreciation in post-First World War Europe was less general than previously thought.

These results clearly point to an agenda for research. In addition to the left-wing paradox, the sources of governmental instability and majority–minority status remain to be explained. While it is clear that both of these variables had a causal association with exchange-rate policy outcomes, we still need to know what was responsible for governmental instability and minority status themselves, a task which would involve exploring the possibility of reverse causation running back from exchange-rate instability to political outcomes.

Much of the literature on post-First World War politics appeals to the turbulence of the political environment—to the entry into the political arena of new political parties and, in defeated countries, to the discrediting of long-standing ones. In many countries the war had led to a broadening of the franchise; it was no longer possible to send workers off to war and yet to deny them the vote. These factors predictably strengthened the position

[20] This variable is lagged to minimize simultaneity bias. Readers still concerned about simultaneity bias should note that the argument of the preceding section, that depreciation should stimulate output growth, predicts a negative correlation between the two variables rather than the positive one reported in the Table.

[21] See once again Maier (1975).

of labour, socialist, and communist parties and weakened those of parties that had traditionally been dominated by landowners and industrialists. A larger electorate and a more powerful popular media promoted the growth of splinter parties representing narrow special-interest groups.

All this was a recipe for political instability. The proliferation of parties led to parliamentary fragmentation, unstable coalitions, minority governments, and inexperienced leadership. The exchange-rate instability of the 1920s was the predictable consequence.

There is a sense, however, in which such generalizations fail to get us very far. Some countries were clearly more susceptible than others to potential sources of political disarray. Despite functioning in the same turbulent international environment, the USA and the UK had relatively few significant changes in government between 1920 and 1926 (two and five, respectively, by the measure utilized in this chapter), whereas France and Germany were much more prone to governmental instability (the comparable statistic for both was eight). The USA and UK tended to have majority governments (1924 in the UK was an exception, but the share of seats commanded by the governing party averaged 63 per cent in the UK and 58 per cent in the USA), but not so France (where the Government commanded just 47 per cent of seats on average) or Germany (where the comparable figure was only 48 per cent).

Why this difference? One potential explanation is cross-country differences in electoral institutions. Historians are sympathetic by inclination to the notion that institutions play a role in shaping historical outcomes. Why should political institutions and political outcomes be an exception?

Electoral systems differ along many dimensions; the one we highlight here is the distinction between majority and proportional representation. In a pure proportional system, each party's representation in parliament is proportional to its share of the vote.[22] If a party receives 2 per cent of votes nation-wide, it receives 2 per cent of parliamentary seats. Such outcomes are most likely in systems with large electoral districts, party lists, and two ballots, although they also tend to obtain in a variety of similar institutional settings.

In a majoritarian system, in contrast, the individual candidate receiving the largest number of votes in a given district (a plurality or, if a majority is required, as a result of a second run-off ballot) gains the seat, and parties receiving smaller shares of the vote remain unrepresented. Electors are discouraged from casting their ballots for minority parties, since such votes are unlikely to affect the outcome of the election. Hence, majority representation systems are likely to result in the electoral and parliamentary dominance of a few (often two) large parties. This result is most likely in

[22] A good introduction to the various electoral systems is Lijphart (1977). The definitive recent analysis from a political science vantage-point is Taagepera and Shugart (1989).

single-member district-plurality systems, although it can also obtain in a variety of similar settings.

The notion that majority representation favours two-party systems while proportional representation encourages multipartism is a stylized fact of political science known as 'Duverger's Law'.[23] The inter-war period provides clear illustrations of its operation. In Britain, a country with a majoritarian system, the 1920s saw the rise of the Labour Party and the decline of the Liberals. While the Liberals continued to garner a substantial fraction of the popular vote, they (and their potential supporters among the electorate) quickly found themselves severely underrepresented in Parliament. Although various governments, notably those of Labour, required Liberal support, Britain's traditional two-party system of Liberals and Conservatives was able to transform itself with a minimum of fragmentation and political deadlock into what was essentially a new two-party configuration of Labourites and Conservatives.

Germany is the obvious contrast. There a system of exceptionally pure proportionality encouraged the entry of small parties, rewarding them for generating a small share of the vote with a commensurate share of parliamentary seats. Given the proliferation of political parties, Weimar governments were necessarily coalition governments, coalitions which often succeeded in commanding only minority support. This political weakness was a recipe for governmental instability, which in turn encouraged governments to adopt short horizons when formulating economic policy. The incoherence of the resulting policies then fed back negatively on the political environment, inducing further fragmentation and chaos. F. A. Hermens, a leading critic of Weimar's electoral system, concluded that proportional representation 'was an essential factor in the breakdown of German democracy'.[24]

Whatever the ultimate political consequences of proportional representation in Germany, there is a striking correlation across European countries between its presence and short-run economic policy outcomes. Austria, Belgium, France, Italy, and Poland, as well as Germany, all employed forms of proportional representation in the 1920s and suffered inflation and currency depreciation. In contrast, countries like the UK and the USA, whose electoral systems were based on majority representation, were able to take the hard policy decisions needed to effect the restoration of their pre-war parities.

The spread of proportional representation was yet another change wrought by the First World War. When fighting erupted, there were doubts about whether the working classes would enlist in a conflict pitting rival

[23] See Duverger (1954: 217, 226 and *passim*).

[24] Hermens (1941: 293). Subsequent authors have been critical of his conclusion; see e.g. Lipjhart (1977).

capitalist economies against one another. Workers could hardly be expected to rush to the defence of institutions in which they had little voice. Hence the franchise was extended and wealth and property tests were relaxed or eliminated in virtually all the belligerent countries. Proportional representation became the risk-averse strategy for the old governing élites, who feared that the rise of labour and socialist parties might otherwise result in their complete loss of power. A further implication drawn from a war that first flared up at the fringes of the Austro-Hungarian Empire was the importance of giving voice to ethnic, religious, and national minorities. Proportional representation was a means to this end.

In a situation like that of the 1920s, when stabilization required painful distributional sacrifices, proportional representation could be a significant obstacle to the formulation and implementation of coherent policies. Inflation and depreciation in the first half of the 1920s were symptomatic of the failure of countries and their elected representatives to achieve a consensus on how to balance government budgets and to remove the need for central bank monetization of deficits. The war had transformed the distribution of incomes and tax obligations and challenged long-standing conventions underlying public discussion of these matters. The question of whose taxes to raise and whose favoured public programmes to cut was consequently up for grabs.

Proportional representation could make it that much more difficult to achieve a consensus on such matters. Governments were often minority governments and almost always multi-party coalitions. Coalition partners were willing to bring down the government, repeatedly if necessary, to prevent the adoption of policies with undesirable distributional consequences. This was a recipe for deadlock. And deadlock over the budget guaranteed inflation and exchange-rate depreciation.

The political consequences could be devastating, and not only in Germany. Austria suffered through no fewer than twenty governments under ten different chancellors in the fifteen years of proportional representation brought to a close in 1934 by the abolition of parliamentary government. In Poland, an extended political deadlock was broken only by General Pilsudski's seizure of extra-parliamentary powers in 1926. In Italy, four years of proportional representation saw the formation of no fewer than eight cabinets under five prime ministers. Between 1897 and 1919, Italian parliaments, elected under a majoritarian system, had an average duration of more than four years; the first post-war parliaments, elected by proportional representation, had an average life-span barely 25 per cent as long. Given the deadlocked parliament's inability to reach decisions, laws in many cases had to be enacted by royal decree, a practice which had been exceedingly unusual in earlier years. Economic stabilization was completed only after Mussolini seized dictatorial powers. Even in France there were calls, with

the deterioration of the economic and political climate in 1925–6, to suspend Parliament's powers and install an autocratic leader to impose unilaterally the policy changes necessary for stabilization.

The plausibility of this argument is buttressed by the subsequent decisions in many countries to reform the political system so as to reduce the degree of proportionality. In the Netherlands, where unfettered proportionality led to a proliferation of political parties, the electoral system was already modified in the early 1920s to raise the threshold share of the national vote which parties had to garner before receiving parliamentary representation. France's system of proportional representation was abandoned once it became clear how much power it vested in fringe parties, particularly on the left; thus, the elections of 1928, 1932, and 1936 were held under the old system of single-member constituencies with two ballots.[25]

This hypothesis of an association between proportional representation and the incoherence of policy is not universally accepted. Lipjhart (1977) argues that the implications for policy of alternative electoral systems depend on the social, political, and economic context in which they are embedded. Katzenstein (1985) suggests that a number of small European countries succeeded in using proportional representation as an effective strategy of power-sharing and political compromise after the Second World War. Rogowski (1987) lauds proportional representation for being conducive to political stability and coherent policy in recent decades.

While it is hard to dispute the conclusions of any of these authors, neither are their views necessarily incompatible with the preceding characterization of the effects of proportional representation in the 1920s. No one has disputed that the low entry barriers facing small political parties in proportional representation systems are conducive to coalition government. Any one of a number of small parties can in principle defect from the coalition and topple the government. But the parties involved presumably weigh the benefits of defecting against the costs of shattering the coalition, aggravating the climate of political instability, and acquiring a reputation as an unreliable coalition partner. When the distributional stakes are high, in the sense that different policies have very different implications for income distribution, the benefits of blocking the adoption of an undesirable policy are likely to dominate the costs associated with bringing down the government. When the distributional stakes are low, on the other hand, the costs attached to bringing down the government provide an incentive for compromise conducive to stability. Thus, the effects of an electoral system should depend on

[25] The French system had always been particularly complicated. Under the law governing the 1919 and 1924 elections, if a party or group of parties obtained a majority in a particular district, it received all the seats; otherwise, seats were distributed according to proportional representation. Thus, the French system was at most a diluted form of proportional representation.

the policy environment—or to put it another way, on the political, social, and economic context within which that system operates.

In many European countries, the 1920s was a period of unparalleled political polarization, when distributional conflict was intense and the distributional consequences of policy choices were profound. In such circumstances, coalition partners were willing to bring down governments, repeatedly if necessary, to prevent the adoption of policies with undesirable distributional implications. Proportional representation was therefore a recipe for political deadlock, which meant the perpetuation of budget deficits and the persistence of inflation and currency depreciation.

The Netherlands and the Scandinavian countries can be invoked as exceptions that prove the rule. While these countries were among those adopting systems of proportional representation, they did not experience persistent inflation and currency depreciation. But as wartime neutrals they had not experienced the same degree of fiscal turbulence. Existing fiscal conventions had not been overturned as a result of hostilities. They did not emerge from the second decade of the century with large public debts and deficits in desperate need of finance. Since the distributional stakes were lower, the costs of acquiring a reputation as an unreliable coalition partner were an effective deterrent preventing fringe parties from repeatedly bringing down the government. Proportional representation may still have created a bias in favour of maintaining the fiscal and distributional *status quo*, but in the Netherlands and Scandinavia, unlike France, Belgium, Italy, and Poland, that did not necessarily imply inflation and exchange-rate depreciation.

3. Implications for Research

Much of economic history, like economics, is a search for plausible identifying restrictions. But in the richness of history, many of the standard identifying assumptions of economics lose their appeal. Economists frequently attempt to identify the effects of economic policies by assuming that policy initiatives can be taken as exogenous with respect to their consequences.[26] But in the underlying general equilibrium model historians have in mind, not just the effects of policy initiatives but the decision to take them must be treated as being determined within the model.

From this fact emanates the search for deeper historical structures with the capacity to influence both the policy decisions and their outcomes. In this note we have suggested that political institutions comprise one such set

[26] A particularly sensitive attempt to implement this approach is Romer and Romer (1989).

of structures. In truth, all we have done is to provide this suggestion. Much research remains to be done to establish the nature and robustness of the link running from electoral institutions in particular, and political institutions in general, to economic policy decisions and outcomes.

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