

The Past and Future of Exchange Control

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CHAPTER II

THE PAST AND FUTURE OF EXCHANGE CONTROL

THE PURPOSES OF EXCHANGE CONTROL

At the outset of this study, five types of exchange control were distinguished according to the degree of their divergence from a liberal or "free" system of international payments.¹ That which underlay this scheme was the contrasting organization, functioning, and economic epiphenomena of the various controls. It will be profitable, I believe, to renew acquaintance with the distinguishable types of control, but this time from the viewpoint of their purposes. Purposes also range from those which are harmonious with a liberal system to those quite incompatible with it, and there will be a rough parallel with the early classification. But the two are not identical. The original scheme, for example, distinguished (as types 3 and 4) between overvaluations of the monetary standard proceeding respectively from a flight of capital alone, and from relative inflation coupled with a flight. This difference is vital so far as concerns the economic earmarks and functioning of the two types of exchange control, but it corresponds to no necessary distinction as to the purpose for which control is maintained. From the angle of aims I distinguish seven categories:² (1) prevention of unregulated export of capital and depreciation of the currency; (2) temporary insulation to permit adjustment to international equilibrium; (3) increasing the total economic gain from foreign trade; (4) securing cheap foreign exchange for government purposes; (5) retaliation against foreign controls, quotas, tariffs, and the like; (6) protection of domestic production; (7) totalitarian economic and political control. Each of these purposes merits some elucidation.³

1. Cf. Part I (November, 1939), pp. 1-7.

2. In her book on World Trade (New York, 1939), p. 125, Ethel B. Dietrich also gives seven purposes of exchange control. Four of these (1, 2, 3, 5) fall under my first category of preventing capital export, viz., conserving the gold supply, providing devisen for foreign debt service, and stabilizing exchanges; and two others (4, 7) come under my caption of paternalistic or totalitarian aims, viz., securing "essential" imports and establishing a regulatory instrument of planned economy.

3. The purpose of mere stabilization against short up-and-down variations of exchange is omitted as not belonging to exchange control in the narrow sense understood in the present study; cf. Part I (November, 1939), p. 1.

(1) The prevention of unregulated capital export and unregulated currency depreciation is a universal purpose of exchange control, both for its introduction and for its retention. Capital export and currency depreciation are conjoined under one caption for the reason that an extensive amount of one almost inevitably ushers in the other, at least in the case of debtor countries. The League of Nations Report errs seriously, I believe, in maintaining that, beside the motive just named, "countries which resorted to this measure had *in all cases* suffered a worsening of their balance of trade, and controlled exchange with the deliberate intention of *checking imports.*"¹ After the depreciation of sterling on September 21, 1931, numbers of countries introduced exchange control because of an adverse turn in their balances of trade in competition with the devalued sterling *bloc*, it is true. After certain countries had introduced exchange control, it is also true that others were forced to a similar step by the impossibility of securing *devisen* payments for exports. But it is clear that neither the one nor the other circumstance was universal. Indeed, in direct opposition to the League Report, the first introductions of exchange control occurred in conjunction with a strongly *favorable* turn in the balance of trade, and this was frequently the case with later introductions. Austria, typically an import economy, showed smaller import balances in 1930 and 1931 than in 1929; Hungary's trade balance changed from unfavorable in 1929 to favorable in 1930 and 1931; Germany's export balance skyrocketed from 36 to 2,872 million Reichsmarks between 1929 and 1931.² Did it escape the authors of the Report that a flight of capital produces a favorable turn in a country's balance of trade? The throttling of imports was certainly not the concern of Austria, Hungary, and Germany when they introduced exchange control. It should have been stressed in this connection, furthermore, that exchange control is notoriously effective, through its artificially high rate of exchange, in producing *unfavorable* balances of trade.

Even in those cases in which the prime mover was a loss of central bank reserves through an import surplus, the threat of currency depreciation produced also the threat of capital flight. Thus Czechoslovakia, hedged against foreign withdrawals by an

1. League of Nations, Report on Exchange Control (Geneva, 1938), p. 26; *italics mine.*

2. Cf. Part I (November, 1939), pp. 61, 85, 107, 179; and p. 140 above.

equal amount of investments abroad on her own account, could nevertheless experience the danger of currency depreciation through a flight instituted by her own citizens as central bank reserves ebbed away. The same situation obtained with countries for which the freezing of export proceeds by foreign controls caused a steady shrinkage of gold and devisen stocks, whether trade balances were active or passive. It is not surprising that, in accord with the findings of the present inquiry,¹ the flight of capital is reported as the ubiquitous cause of the introduction of exchange control². In passing it is worthy of note that the various devices for carrying through a capital flight which attracted much attention after the early summer crisis of 1931 had been actively employed in Germany for a year or more previously.³

Moratorium, devaluation, and deflation did not present eligible alternative courses of action to meet the capital flight of 1931 in the cases of Germany, Austria, and Hungary⁴; and this conclusion can probably be extended to other countries.⁵ Moratorium would have prevented foreign withdrawals but not the export of capital by nationals; it is an extreme measure which might have increased the panic psychology, whereas exchange control, though less candid, preserved the appearance of something transitory; and finally moratorium at the very onset of difficulties would have outraged the creditor interests even more than it did upon its eventual and almost inevitable appearance. Devaluation, as we have seen, was precluded by the popular identification of this measure with inflation; and the argument that it would have increased the burden of foreign debts appears to be quite secondary on short-run considerations. In Austria the opposition of the socialists to devaluation,

1. Cf. Part I (November, 1939), pp. 27-37, 88-92; and pp. 9-20 above.

2. Bank for International Settlements, "Note on Certain Aspects of the Liquidity Crisis, 1931-1932," mimeographed (Basel, April, 1932), p. 10; Alexander Yovanovitch, *Mémoire sur le contrôle des changes en Yougoslavie*, mimeographed, Institut International de la Coopération Intellectuelle (Paris, 1939), p. 23; Jerzy Nowak, *Le contrôle des changes en Pologne*, Comité Central des Institutions Polonaises des Sciences Politiques (Warsaw, 1938), p. 7; Virgile Madgearu, *Le contrôle des changes en Roumanie*, Institut des Recherches Sociales de Roumanie (Bucharest, 1939), p. 7.

3. Melchior Palyi, "Gibt es eine Kapitalflucht aus Deutschland?" *Berliner Börsen-Courier*, December 9, 1930, p. 7.

4. Cf. Part I (November, 1939), pp. 7-13, 33-36, 90-91; and pp. 15-16, 32 above.

5. A. Basch, "Probleme der Devisenkontrolle," *Mitteilungen des Verbandes österreichischer Banken und Bankiers*, Vol. 14, No. 9-10, p. 224.

resting on the popular confusion of the idea with inflation, was politically conclusive; and in Germany the threat of the trades unions to enforce a wage scale based on foreign currencies turned the scales, for the measure would have annihilated most of the cost-reducing effect of exchange depreciation. So far as concerns deflation, its workings would have been too slow to be effective in a crisis; and furthermore, it would have entailed social costs of increased unemployment and further contraction and liquidation. Here again the opposition of organized labor was important, though the voice of the civil servants who would have been affected by budget reductions was also heard.

The fact that after 1931 western European countries labored under a state of "perpetual crisis"—not only in political and economic matters generally, but specifically also in the sphere of short-term capital movements—served partly as a reason and partly as a pretext for protracting exchange control. As time went on, other motives for the prevention of capital export assumed an importance frequently exceeding the original purpose of maintaining the parity of currencies. *De facto* and *sub rosa* devaluation transformed the official rate of exchange to a mere face-saving fiction. What exchange control actually meant in the long run for foreign debts differed significantly from one country to another, as we shall see in a subsequent section.

(2) After the most acute stage of capital flight, exchange control

"can indeed be justified as a transitional device for the purpose of accomplishing the reduction of the gold value of the monetary standard which is inevitable for its protection . . . or of carrying out the necessary deflation through lowering prices and incomes."¹

The year following the introduction of exchange control in Germany witnessed the fairly consistent prosecution of this policy under Brüning, save for the failure of the government to reduce cartel prices and raise interest rates.² Even from the angle of a general "reflationist" policy for combatting depression, it would not be clear that this policy was mistaken, for, as Poole maintains:

"the rigorous deflationary measures of 1931 were designed in part to make possible the subsequent expansive program, through the medium of first

1. Gottfried Haberler, *Liberale und planwirtschaftliche Handelspolitik* (Berlin, 1934), pp. 104-105.

2. Cf. pp. 18-20 above.

strengthening the foreign trade position in order that measures which would later weaken it might be pursued with impunity.”¹

The ministries of von Papen and von Schleicher during the balance of 1932 and early 1933 saw a gradual weakening of the deflation policy, and with Hitler it was abandoned.

Austria affords the unique example of exchange control which led finally to international equilibrium². Because of the downward course of world prices until 1933, Austria was able to prosecute a policy of cautious and piecemeal devaluation without experiencing a rise of domestic prices. The allocation of devisen for imports had largely disappeared by October, 1932, and transactions on current account in international trade progressed over the supervised but essentially free “private clearing” market. In March and April, 1933, devaluation was legally recognized for the interpretation of long-term contracts; and a year later the National Bank revalued its gold and devisen reserves in accord with a devaluation of the Schilling to 78.2 per cent of its former parity. Exchange control persisted only in unavoidable clearings and in the embargo on capital export.

Hungary represents something of a midway position between Germany and Austria. Without definitely forsaking international equilibrium for an “autonomous economic policy,” Hungary made slow progress toward the liberation of international payments, but did not consummate the process before the economic setback of 1938 and the ominous rumblings of approaching war. Prices in Hungary, as in Austria, did not decline appreciably in 1931, despite the sudden drop in effective gold prices on world markets, but from January, 1932, to September, 1933, there was a gradual decline. If exchange control had been regarded as a temporary device to secure the opportunity for international adjustment, Hungary could have devalued in 1934 or have restrained domestic prices in the teeth of rising agricultural prices on world markets to secure relative deflation. Neither alternative was taken, and despite the simplification of exchange control, the refunding of foreign debts, and the resumption of devisen payments on the debt service, the growth of autarkic sentiment prevented the final steps in the process.

1. Kenyon E. Poole, *German Financial Policies, 1932–1939* (Cambridge, Mass., 1939), p. 25.

2. Cf. Part I (November, 1939), Chapter II.

The histories of Germany after 1932 and Hungary after 1933 illustrate the point made by the League of Nations' Report, that exchange control can serve as a cover not only for the gradual process of achieving international equilibrium but also for a "policy of internal credit expansion which raises internal prices much above the world level."¹ Furthermore, unless the overvaluation of the currency is offset by other devices, exchange control actually works against the debtor nation through stimulating imports and thus postponing the day of equilibrium in the balance of payments. The maintenance of exchange control in Germany and her satellite countries delivered a body blow to economic coöperation and "peaceful change." In part extenuation of this course it deserves to be remarked for the reflection of the light-hearted advocates of free exchange rates that, as Professor Fanno concludes, the depreciation of currency in "a country which is an important economic center and is in addition a center for the financing of world trade" enforces depreciation elsewhere, and paralyzes the foreign trade and economic life of the world."²

(3) Exchange control has also been directed toward increasing the gain from international trade. This subject is reserved for fuller treatment in a later section; but it is clear that the theoretical possibility exists, in case the country enjoys a monopoly or monopsony in significant lines of export and import respectively, for changing not only the terms of trade but also the "total gain" in a favorable direction (terms multiplied by volume). The mere fact of transportation costs affords a certain monopoly or monopsony zone, and this margin may be increased by other obstacles to trade such as tariffs, quotas, and import and export prohibitions. "On paper" there would seem to be opportunity to exploit this margin, either by the enforcement of a unique rate of exchange above the competitive equilibrium level or by discriminatory rates. Throughout its pre-war exchange-control history Germany operated upon the basis of monopolistic discrimination, and Hungary followed suit until late in 1935, but in Austria the practice did not go beyond the narrow sphere of exporting against *Sperrsillings* at different discounts for a short interval. We shall recur to the experiences of Hungary and Germany, which were not crowned with success from

1. League of Nations, Report on Exchange Control, p. 28.

2. Marco Fanno, Normal and Abnormal International Capital Transfers (Minneapolis, Minn., 1939), p. 98.

an economic angle. Recently it has been urged that England raise the pound rate and even discriminate in the straits of war between various categories of exports to increase the gain of trade.¹ From the viewpoints of probable success and of adverse repercussions upon international trade, artificially high and discriminatory rates of exchange would seem to be more defensible in war than in a peace economy.²

(4) The Treasury is always able in an exchange-control country to procure foreign devisen at the low official rate for its own purposes. Undoubtedly the fiscal purpose of exchange control rarely supplies its chief justification. In Rumania, indeed, it is asserted that "the demand of the government for devisen nearly always exceeded that of private persons."³ But in any event the securing of a continuing supply of foreign exchange at bargain prices might explain the continuance of exchange control and a wholly fictitious official rate in situations where they had otherwise lost their *raisons d'être*.

(5) Once exchange control had been established by the important trading partners of a given country, the introduction of control for its own economy might be conceived as a "retaliatory measure" in a broad sense. "Retaliation" usually connotes the idea, however, of attempting to induce the cessation of the offensive action, and this could scarcely be imputed to all exchange control systems introduced after, say, October, 1931. In this narrower sense examples are not altogether lacking of retaliatory exchange-control systems, and *pro tanto* of exchange-control measures. Austria made extensive *de facto* departures but retained the entire legal structure of control, in order at any time to impose a retaliatory freezing of accounts in response to a similar foreign course. England threatened a compulsory clearing and the levying of a 20 per cent import tax upon German goods as a means of protesting against the Moratorium of July, 1934.⁴ On May 6, 1935, Germany promulgated a *devisenpolitischs Abfertigungsverbot*

1. Grenville Holden, "Rationing and Exchange Control in British War Finance," *Quarterly Journal of Economics*, Vol. 54, No. 2 (February, 1940), pp. 171-201; Thomas Balogh, "Foreign Exchange and Export Trade Policy," *Economic Journal*, Vol. 50, No. 197 (March, 1940), pp. 1-27. Balogh, but not Holden, recommends discriminatory rates.

2. Cf. p. 183, 210-212 below.

3. Madgearu, op. cit., p. 37; cf. also pp. 8-9, 21.

4. Cf. p. 44 above.

against France and Czechoslovakia, requiring special import certificates for the goods as an answer to alleged discriminations against Germany.¹

(6) Sooner or later virtually every exchange-control system has lost its original orientation toward the monetary standard and capital flight and has become an instrument for ulterior ends. Since exchange control ordinarily involves an overvalued currency unit, imports — though unusually profitable at the official exchange rate — stand to be reduced in quantity relatively to exports. Domestic lines of production which have to compete with imports are thus protected. In predominantly industrial countries, such as Austria and Germany, agriculture benefited; and in a predominantly agricultural country, such as Hungary, the relative gain accrued to industry. Protection in the old-fashioned sense appeared as a by-product of attempting to defend the currency, but it proved to be so welcome a by-product as certainly to become an end itself.

Yet protection in the traditional connotation of measures to increase the domestic market for home industries in a competitive regime falls sadly short of the "ulterior aims" of exchange control in its later phases. The nearest of kin, which is nonetheless an extension of the older concept of protection, is the effort to reach "full employment." Whether the unemployment is regarded as a cyclical or secular matter is a matter of indifference, for it is generally agreed that the German program of expansion had no discernible reference to cycle theory.² Though ulterior to monetary and financial aims, the purpose of reaching full employment would certainly be considered, on its face value at least, as an economic end. Guillebaud's book, both by the evidence of its title, "The Economic Recovery of Germany," and by its tenor throughout, regards the developments — rather naively in my judgment — from this angle. Through the years 1931 and 1932 the German governments were indeed primarily concerned with the relief and combatting of unemployment, though exchange control was not one of the weapons. From 1933 onward unemployment decreased and finally in 1938 and 1939 gave place to a labor shortage, and exchange control as a protectionist device undoubtedly aided the process. It is undoubtedly true, as A. G. B. Fisher declares, that

1. Cf. p. 65 above.

2. Cf. Poole, *op. cit.*, p. 75, and C. W. Guillebaud, *The Economic Recovery of Germany, 1933–1938* (London, 1939).

"the Germans believe that the same measures which insure their economic independence and make them impregnable in a military sense will also insure immunity against the virus of the trade-cycle. . . .¹ But which was the fundamental aim?

(7) Had the fundamental aim of totalitarian states actually been the furtherance of home industry, exchange control would have been abolished at the behest of the export interest, for it clearly preponderates in the German economy. Had the fundamental aim actually been the extension of employment, on the other hand, it would scarcely be conceivable that the standard of living should be treated in so stepmotherly a fashion. Furthermore, in order to promote home employment, exchange control would not have been permitted to decrease exports relatively to imports and hold them at this low level. It has been observed by more than one writer² that exchange control differs from Mercantilism in that exchange control sometimes seeks to expand exports with the avowed aim of increasing imports. But such an aim does not conform to a Keynesian program of increasing domestic employment through protection. Nor does the ideal of *autarchy* — the creation of an *international* self-sufficient unit dominated by the needs and aids of the totalitarian nation — conform to this program, as would *autarky, tout simple*.³

The aim of exchange control in Germany after the advent of the National Socialists was the furtherance of their economic and political power both abroad and at home. On the side of foreign trade and international relations, as a German writer has said, "regionalism, *Grossraumwirtschaft*, preference systems, imperialistic policy — these are the catchwords which must be named in this connection,"⁴ or as a French writer has more pointedly expressed the purpose, *une économie de guerre*.⁵ So much has been recognized. But there is some danger of neglecting the significance of exchange control in the domestic economy. Exchange control is indeed an effective device for regulating all items in the balance of

1. A. G. B. Fisher, *Economic Self-Sufficiency* (Oxford, 1939), p. 22.

2. H. R. Hormi, *Memorandum on the Exchange Clearing and Compensation System as Applied by Finland*, and André Piatier, *Exchange Control: A General Survey*, both works presently to be published by the International Institute of Intellectual Coöperation, Paris.

3. Cf. p. 33 above.

4. Hans Brockmann, "*Devisenloser*" *Zahlungsverkehr* (Hamburg, 1935), p. 127.

5. Piatier, *Le contrôle des devises*, p: 138:

payments, as Heuser concludes¹; it is furthermore, in Balogh's words, "the fulcrum of the central control of all important primary commodities"²; but it is finally a device by which a dictatorship achieves and continues to exercise control over the economic and political destinies of the populace.

FOREIGN DEBTS UNDER EXCHANGE CONTROL

Inasmuch as an original and continuing purpose of all exchange control has been the prevention of unregulated capital exports, it is significant in an appraisal of the institution to review its record concerning foreign debts. A comparison of the accomplishments of Germany, Hungary, and Austria will reflect, beside the general course of developments, the relative importance of certain other purposes of exchange control as set forth in the preceding section. The investigator encounters difficulties because of the different dates at which estimates of foreign indebtedness have been made for the several countries, but these discrepancies can be allowed for in interpreting the data. Estimates are lacking for Austria in 1931; and the comparison cannot extend beyond 1937 because of the absence of statistics for Hungary and because of Austria's disappearance as a separate state. Despite these limitations, certain contrasts are evident.

Compare first Germany with Austria: the former reduced her debts by 57.9 per cent and the latter by 55.7 per cent in the intervals given in the table on p. 169. But the interval is a year and a half longer for Germany than for Austria. During this interval sterling devaluation occurred: the windfall augments the German but not the Austrian total debt-reduction percentage as given in the table. But only 25.8 per cent of Austria's debt reduction was caused by foreign devaluations, whereas 43.5 per cent of Germany's came from this source. Germany's actual payments were therefore substantially lower than Austria's as a percentage of debts outstanding in mid-1931.

This record is the more striking in view of Germany's advantage in terms of trade by virtue of her more highly fabricated exports, in view of Austria's faltering *Lebensfähigkeit* in the eco-

1. Heinrich Heuser, *Control of International Trade* (London, 1939), p. 205.

2. Thomas Balogh, "The National Economy of Germany," *Economic Journal*, Vol. 48, p. 481.

REDUCTION OF FOREIGN DEBTS UNDER EXCHANGE CONTROL*

	Austria Million Schillings	Hungary Million Pengő	Germany Million Marks
1. Foreign debt	4,251 year-end 1932 1,881 year-end 1937	4,310 year-end 1931 2,500 July 1937	23,800 July 1931 10,000 February 1938
2. Amount reduced	<u>2,370</u>	<u>1,810</u>	<u>13,800</u>
3. Percentage reduced	55.7%	41.9%	57.9%
4. Amount of reduction due to foreign devaluations ..	610	1,376	6,000
5. 4 as percentage of 2	25.8%	76.0%	43.5%
6. Amount of reduction due to repatriations		350 to July 1937	781 to November 1933
7. 6 as percentage of 2			19.3% 95.3%
8. 4 and 6 as percentage of 2			5.6% 49.1%

* For data and sources, cf. Part I (November, 1939), pp. 54-55, 155, 157-159; pp. 74, 130-131 above.

nomic sphere, and in view of the achievement of full employment in Germany. Ohlin has pointed out that full service on German foreign debts would not have exceeded five dollars *per capita per annum*, and that this amounted to no more than one-fifth of the figure for New Zealand and Australia and one-third the figure for Argentina.¹ A further comparison, which does not appear from the figures in the table, may be drawn. In 1933 Austria and Germany stood upon approximately equal footing as to *per capita* foreign debt (476 and 487 Schillings) and also as to ratio of total foreign debt to total exports and imports (163 and 159 per cent);² and yet by April 22, 1933, Austria had converted her blocked accounts to free accounts, and by December 10, 1934, had completely liquidated the Standstill debt; whereas Germany even in September, 1938, was accumulating new categories of blocked accounts and had not completed the payment of the Standstill debts.

The debtor countries undoubtedly encountered severe difficulties not of their own making — the handicap to their exports through foreign devaluations, protective tariffs and quotas, and the willingness of creditor countries to sacrifice the volume of current trade to amortization quotas.³ But it remains to be shown that Germany suffered more in these respects than Austria. One might be disposed to conclude that the transfer capacity of a country which largely abandoned exchange control exceeds that of a country which maintains it. The deduction would probably not go far amiss; and yet the question remains why one nation relegates the control to relative desuetude whereas the other takes it as the key-stone of the economic system. Is it irrelevant that the Munich program of the National Socialist party proclaimed the liberation of the State from all debts contracted with the "capitalistic countries"?⁴ The ground for this policy was the conviction, which Schacht dinned in the ears of the world, that Germany's debts represented only a refunding of the Versailles "tribute."

1. Bertil G. Ohlin "International Economic Reconstruction," in the volume bearing the same title published by the International Chamber of Commerce (Paris, 1936), p. 89.

2. Gustav Wärmer, "Die Auslandsverschuldung Österreichs," Mitteilungen des Verbandes österreichischer Banken und Bankiers, Vol. 16, No. 10-11, pp. 290-291.

3. H. J. Tasca, World Trading Systems (Paris, 1939), pp. 83, 95, 122, *et passim*. The author dwells upon England's attitude as an example of the last obstacle named above.

4. Cf. Saint Jean, op. cit., p. 436.

The reduction of Hungarian foreign debt by 41.9 per cent, between one-fourth and one-fifth less than the figures for Austria and Germany, is probably adequately accounted for by the severity of agricultural depression and adverse developments in the Hungarian terms of trade.¹ So small were the actual repayments on Hungarian debts, however, that foreign devaluation accounts for 76 per cent of the total reduction, the repatriation of bonds (which does not represent repayment to persons desiring it) 19.6 per cent — together 95.3 per cent, whereas the German percentages are 43.5, 5.6, and 49.1 respectively.² The German figure for repatriations does not extend past November, 1933; but the process had nearly run its course by that time, and the relative share of debt reduction from this source (5.6 per cent) would not be substantially less than the ultimate figure. In view of her general economic situation it is not surprising to discover that Hungary repaid so small an amount of her foreign debts. It is little less than a scandal, however, that the differential between the foreign and domestic prices of Hungarian bonds should have been exploited by the State instead of accruing to private individuals within the country as a pure windfall. Had the exchange-control authorities not fallen victim to vested interests or inertia, the repatriations would have operated to improve instead of decreasing the Hungarian volume of trade.³ The most obvious result of a comparison of Germany and Hungary on the matter of foreign debt liquidation is the conclusion that if exchange control is to be, it must be thoroughgoing. The administration of the control forms the topic of the next section, but certain observations are still in point on the present subject.

Exchange control is beyond doubt justified in its prevention of capital exports at a more rapid rate than the financial and economic structure of the debtor country permits or the disposition or economic capacity of the creditor country to receive payment in goods allows. Against a sudden panicky rush of foreigners and nationals to transfer funds, as in the summer of 1931, it is necessary, as in the case of commercial banks, to defend central banks. For the longer period, after the quelling of the original revolt but during a continued restiveness on the part of foreign creditors and

1. Cf. Part I (November, 1939), p. 143.

2. Complete figures for repatriations in Austria have not appeared.

3. Cf. Part I (November, 1939), pp. 158-160.

domestic capitalists, it has sometimes been said that a depreciation of the currency would provide the necessary brake to withdrawals. I do not subscribe to this belief. Since foreign debts for most central European countries were incurred in foreign currencies, the depreciation of the debtor currency did not operate; depreciation may moreover add fire to the flame of capital withdrawals or flight; finally, even if a sufficient export surplus could be developed, the movements of flight capital, having no particular economic justification, would produce dislocations in world trade which subsequently would have to be undone.¹

For reasons of this sort, the systems of blocked accounts² in the various exchange-control countries, together with the transfer-accounts managed by the monetary authorities³—the Foreign Creditors' Fund in Austria, the Cash Office of Foreign Credits in Hungary, and the Golddiskontbank fund in Germany—had an economic rationale comparable to the fund managed by the Agent General for Reparation under the Dawes Plan. The device of liquidating these balances through “additional” exports had also a legitimate foundation. Furthermore, that these *Sperr* accounts should sell at a discount even below one which would reflect the real equilibrium value of the exchange-control country's currency has a certain justification in the lagging recognition on the side of creditors of the drastic fall in interest rates during depression. Interest reductions did indeed figure in the renewals of the Stand-stills⁴; but it is fair to assume that the fall of contractual interest did not keep abreast of market rates in the intervals between revisions.

This apology for the general treatment of debts under exchange control does not extend to its actual administration in all respects. The Agent General for Reparations may indeed have erred favor-

1. Cf. Bank for International Settlements, loc. cit., pp. 34–35; Herbert Gross, “Ausgangspunkte, Formen, und Wirkungen der Devisenbewirtschaftung,” Archiv für Sozialwissenschaften, Vol. 69, p. 54; Paul Einzig, Exchange Control (London, 1934), p. 108.

2. Cf. Part I (November, 1939), pp. 18, 50–51, 93, 145–154, 158–159; and pp. 21, 41–43, 79–84 above.

3. Cf. Part I (November, 1939), pp. 53–54, 109, 144–154, 158, 185; and pp. 41, 43 above.

4. Cf. League of Nations, Quarterly Reports on the Financial Position of Austria (Geneva, 1932–1936), *passim*, and Quarterly Reports on the Financial Position of Hungary (Geneva, 1932–1938), *passim*; and pp. 21, 41, 56, 57 above.

ably to creditors' interests, but he was clearly instructed to observe the debtors' interests and the effect of transfers upon the German domestic economy. The administration of the blocked accounts and Foreign Creditors' Funds was based upon no agreement with creditors,¹ and it cannot be exculpated from the charge of arbitrariness and even exploitation in suddenly changing and frequently narrowing the permissible uses of frozen accounts. It must furthermore be recorded that the concept of "additional exports" departed farther and farther from its origin in the utilization of blocked accounts and even the repatriation of securities; it came eventually, as we have seen,² to be indistinguishable from exports in general, for which, under the overvalued official exchange parity, *ad hoc* devaluation or subsidies had to be provided.

In concluding the analysis of foreign debts under exchange control let us advert to a theoretical question pertaining to treasury borrowings from the foreign creditors' funds. Objections were raised to this practice by certain economists³ on the grounds that it undid the very deflationary pressure which it was the purpose of the fund to cause in order that exports be stimulated and the real transfer be brought to pass. While this reasoning is partly correct, it misses the fact that the purpose of the fund was not merely to transmit private debt liquidation automatically into effective transfer; otherwise there would have been no purpose in Standstills, Moratoria, and capital-export embargoes. The purpose of the fund was rather to serve as a buffer between private and national repayments, to employ terms proposed by Varga.⁴ The Dawes Report, according to Varga's argument, missed the real point in distinguishing the national "raising" and the national transfer of funds for repaying debts: the real contrast should run between private "raising" (repayment, as into a fund) and national repayment. If a nation "raises" the money, it has sequestered a certain amount of purchasing power, and if so the transfer is ordinarily effected by the attendant price-level reduction. Varga's argument

1. The administration of these funds should not be confused with such matters as the Standstill agreements themselves, the Credit Anstalt liquidation, etc.

2. Cf. Part I (November, 1939), pp. 96-97, 146-157; and pp. 42, 43 above.

3. Cf. Part I (November, 1939), p. 145.

4. Stefan Varga, "Bemerkungen zu den Problemen von Aufbringung und Transfer," *Economic Essays in Honour of Gustav Cassel* (London, 1933), pp. 649-663.

is correct, I believe. The discharge of debt by an individual's payment into a State fund has no direct significance for transfer. And the fund itself has no significance for transfer in and of itself, but only as it forms a part of the general monetary situation. The amount of transfer will not exceed the accumulation in the special fund, if this exhausts the sums which can legally be remitted abroad. How far the actual transfer falls short of this limit depends solely upon the willingness or ability of the monetary authority to create a price-level differential between the home country and foreign countries, either by pressing deflation faster or restraining inflation. State borrowing from the fund represented a deliberate choice of limiting transfer, whatever private repayments might be. So too did the provisions for domestic utilization of *Sperrmarks*, including, as Brockmann observes, the *Effektensperrmark*, which could be used for the purchase of domestic securities.¹ In other words, if the State interposes exchange control and a foreign creditors' fund between debtor and creditor, transfers depend upon fiscal policy and no longer upon an impersonal mechanism.

ADMINISTRATIVE EXPERIENCE

The interest of the economist in exchange control does not center in its administration or in the mass of legal provisions and decisions under which it operates. A few essentials are, of course, indispensable to an understanding of the institution; but even to know what are essentials is difficult, because of the diverse aims of various national systems. The most widespread sort of exchange control is the fifth type identified in the introductory chapter, involving three main characteristics: (1) the maintenance of a (more or less) overvalued rate (or rates) of exchange; (2) the prohibition of capital export except under supervision; and (3) government regulation of imports. One does not speak wholly facetiously in saying that to enforce these principles the government must "prohibit everything." More specifically, "full" exchange control entails the following: state monopoly of devisen and precious metals, including the compulsory sale of existing stocks in private hands; fixing of official rates of exchange and prohibition of publication of non-official rates; the prohibition of exports of devisen, money, precious metals, and foreign securities; the requirement of

1. Brockmann, op. cit., p. 91.

guarantees that devisen proceeds will be forthcoming for exports of goods; the prohibition of capital exports in the form of loans to foreigners; the prohibition of depositing devisen to domestic accounts, of depositing domestic money to foreigners' accounts, of transferring funds between foreigners' accounts, or between foreigners' and residents' accounts, or *vice versa*; prohibition of imports of domestic money, of foreign securities — and of foreign goods without the permission of the import authority; registration and frequently the compulsory sale of foreign securities; the prohibition of export and import transactions with certain countries except through the clearing, and of barter dealings except under government auspices.¹

The animus of certain of these prohibitions is not always self-evident; hence they were lacking in the exchange control structures of some countries, with consequent evasions. Thus the existence of a free market in gold might seem innocuous, if the export of gold were effectively suppressed. The objections are, first, that the price of gold affords too painfully conspicuous and faithful an indicator of monetary depreciation, whereas exchange control is partly explicable as a Machiavellian device for veiling this fact from the populace; and second, that free dealings in gold make it easier for professional smugglers² to operate. The free gold market maintained by the Vienna mint operated throughout the Austrian experience, and it was not until March, 1935, that the market in Budapest was suppressed.³ The lesson that transfers between foreigners' accounts permit evasion is apparently not easily learned. Here again, if it were easy to prevent the transfer of

1. A number of countries maintain official or quasi-official digests of exchange control law and practice, such as Wilhelm Keding, *Devisenarchiv* (Berlin, March, 1936 to date), for Germany; K. M. Webr and J. Kozák, *Kommentar zu den Cechoslovakischen Devisenvorschriften*, together with periodical Supplements, for Czechoslovakia until its disappearance as a separate state; for Hungary, *Vereinigung der Sparkassen und Banken*, Budapest, *Devisenbewirtschaftung in Ungarn*. Cf. also *Bank for International Settlements, Foreign Exchange Regulations in the Different Countries* (Basle, 1931–1938); Bureau of Foreign and Domestic Commerce, *Foreign Financial News* (Washington).

For an excellent summary of legal problems in this connection, cf. Arthur Nussbaum, *Money in the Law* (Chicago, 1939), Ch. VIII, Debts under Exchange Control.

2. In the topsy-turvy world of exchange control, where debts are an economic fulcrum and where "devisen citizenship" is not a matter of birth, a smuggler conveys contraband *out* of the country.

3. Cf. Part I (November, 1939), pp. 64–65, 160.

funds or actual money from a foreigner's account to the account or possession of a resident, no harm could be done. Since the latter operation permits profitable export without devisen receipts and represents a flight of capital, and since transfer between foreigners facilitates transfers to residents, both must be prohibited. Austria permitted both kinds of transfer during the first few months of control, and even the reintroduction of full control under German sovereignty was attended with the same shortcoming.¹ The exchange control of Great Britain in the present war has also been criticized on this score.² A third illustration of superficially unnecessary measures is found in the prohibition of the reimportation of domestic money. In Hungary this was never prohibited; in Austria the President of the National Bank said that the measure would serve only to drive down the foreign value of the currency³; and in Germany the practice was prohibited only on December 6, 1935. President Kienböck's observation is correct, and if it were possible to prevent the export of money completely, it would actually be better to refrain from a prohibition of import. But if a considerable supply leaks out, the motive to exportation may be undermined by a sufficiently drastic limitation on importation to destroy the foreign price.

Ferreting out evasion absorbed a large share of the time of the exchange administration in every control country. Beyond peradventure it was not only the liberal disposition of the central bank management in Austria but also the notorious evasion of exchange-control regulations,⁴ especially through the purchase of foreign securities, which accounted for the short duration of the experience. Hungarian control was also incomplete, in this case most notably through the incapacity of the authorities to prevent the private repatriation of securities.⁵ By the testimony of all observers, Germany maintained the most effective control, although not without numerous revisions to cope with evasion.⁶ As late as December 15, 1936, it was thought worthwhile, in a decree imposing the death

1. Cf. Part I (November, 1939), pp. 40-43, 70.

2. Cf. Balogh, *Economic Journal*, Vol. 50 (March, 1940), p. 4.

3. Viktor Kienböck, "Die Durchführung der Devisenbeschränkungen und Ihr Einfluss auf die allgemeine Wirtschaftsbedingungen," address to the Bank for International Settlements, mimeographed (Basle, May, 1932), p. 10.

4. Cf. Part I (November, 1939), pp. 40-44, 65,

5. Cf. Part I (November, 1939), pp. 93, 155-161.

6. Cf. pp. 10, 18, 24-25, 47, 63 above.

penalty for "economic treason" (chiefly violations of the exchange-control laws) to provide an amnesty — the last of a series since 1931 — for those persons who revealed their hidden supplies of foreign devisen before January 31, 1937. Economists of liberal persuasion can derive no comfort, however, in the reflection that the system breaks down through evasions. Devices for evasion are indeed myriad, but the ubiquitous secret police of totalitarian regimes and extreme severity of punishment can be counted upon to extirpate all but a negligible amount of violation, except that condoned or practiced by the State itself.¹

Administration of exchange control has resulted in sophistication upon other matters than evasion. For one thing it has become apparent that the allocation of devisen necessitated by the high official rate on the home currency cannot ultimately be other than arbitrary. Germany does indeed afford an almost unique illustration of allocation according to an "objective" scheme from August, 1931, to the summer of 1934. But the basing of allocations upon foreign exchange requirements by firms during a previous period, even if rigorously adhered to, necessitates departures to permit the entry of new firms in place of those withdrawing from the market. Who shall be the new firm, and what objective justification is there for maintaining the continuing firms upon precisely their old standing relatively to one another? Inevitably this rule of thumb is abandoned for a more "reasonable" basis. A German apologist for exchange control declares that it secures stability in the monetary standard "through preserving the equilibrium of supply and demand."² If the equilibrium is not produced by the movement of price, it is achieved only by rationing on the basis of the most "necessary" imports. But what imports are more necessary, what basis of rationing is most reasonable? For what necessary, and to whom reasonable?

Another result of administrative experience is the discovery that official valuations upon currencies are very difficult to main-

1. The *London Economist*, Vol. 134 (February 4, 1939), p. 255 reported that large amounts of brand-new Reichsbank notes were flooding the London market. Presumably the German authorities themselves were the source of these notes. By violating the Devisen Law in exporting the notes and again in permitting a small inflow sufficient to support the foreign quotation, the authorities were able to command a certain amount of foreign devisen from foreigners gullible enough to hold the notes for speculation.

2. Carl-Hermann Müller, *Grundriss der Devisenbewirtschaftung*, 2d ed. (Berlin, 1939), p. 327.

tain. As in any sort of rationing, it is difficult — though not impossible — to prevent the joining of forces between those who would pay more rather than forego the purchase, and prospective sellers who would gladly receive a higher price. Of all elements in exchange control the official rate has been the element most frequently sacrificed. It is not necessary to review the gamut of devices — special frozen-currency rates, premia and surcharges, “additional export” rates, varying proportions of payment at the official and at special clearing and other devalued rates — encountered in the course of this study. The Hungarian and German experiences show a constant increase of trade under these devalued *ad hoc* currency units, until from 75 to 80 per cent of the total foreign trade was included. It should be noted that the successful functioning of clearing with another equally-devalued-currency country is no exception to the rule.

Finally, it appears clearly from the control histories that bilateralism in trade retains its essential characteristics despite permutations of form. Evidence to this effect appears not only in the ambiguity of such words as “compensation” and “payment agreement” in the technical literature, but also in the vogue enjoyed by such barter devices as Aski Marks and payment agreements,¹ and their subsequent engulfment in the general welter of clearings. It is generally recognized now that their essential character is the same.² The final sections of the present chapter disclose why this is true.

RATES OF EXCHANGE

To the degree to which authoritarian interference in international trade and payments becomes a matter of control of the composition of imports and exports, their source, destination, and quantity, *trade* control supplants *exchange* control. It is undoubtedly true that protection, autarky, and totalitarian control have gradually taken the ascendancy over the original, primarily monetary and financial aims of these interferences; and this ascendancy bids fair to persist in the future. It still remains true, however, that

1. Cf. pp. 56–59, 61–64 above.

2. For example by Margaret Gordon, *Barriers to World Trade: A Study of Commercial Policy* (in process of publication), Ch. VII; Tasca, op. cit., pp. 88–89; Müller, op. cit., p. 344; League of Nations, *World Economic Survey 1935–1936* (Geneva, 1936), p. 212; but apparently not by Dietrich, op. cit., pp. 139–140.

official and more or less artificial rates of exchange characterize the situation; they supply the main explanation of the introduction of exchange control; and through their metamorphosis into discriminating monopoly prices on an international scale, they may become commonplace in the future. Let us briefly review the results of the present investigation so far as concerns rates of exchange: measures of the overvaluation involved in official rates, departures from official parities, the relation of actual exchange rates to monetary equilibrium, and the pro's and con's of devaluation.¹

To conceive — and much less to measure — *the* overvaluation of a currency under exchange control as a unique phenomenon is not possible. The market for bills of exchange ceases to be a unit, not only because payments are forcibly separated into imperfectly communicating subdivisions, but also because trade itself is marked off into categories, e.g. by countries, by method of "balancing," according to whether the items are ordinary or "additional," transit or not, for current account or the liquidation of debts, for domestic consumption or for fabrication and reëxport, and the like. Consequently we discover a plurality of measures of overvaluation: purchasing power parity, export prices, the domestic price of gold bullion or foreign securities, quotations on domestic currency in a foreign market, quasi-official or official premia and surcharges on foreign devisen, the prices of *Sperr* accounts, and the percentage of subsidy per unit of exported goods. The eligibility of each of these measures differs considerably amongst national economies.

Purchasing power parity, deriving as it does from the relative movement of general wholesale indices from some base year representing approximate equilibrium, might be expected to afford a measure only over long periods when disturbances induced by capital movements and changes in reciprocal demand had run their course. Its usefulness is conditioned, furthermore, by the freedom of domestic prices to move under ordinary supply and demand forces. Over the two-year period from the middle of 1931 to the middle of 1933, when the Schilling reached its eventual depreciated level of 78.2 per cent, Austrian sensitive prices had moved about reciprocally to this index for the United States and Germany.²

1. The subject of multiple or discriminatory rates will be examined in the following section in connection with the "terms of trade."
2. In the present section and the two subsequent sections, references to

In the case of Hungary, we have been able to trace a rough parallel between the relationship of Hungarian to British wholesale prices, on the one hand, and other measures of pengö depreciation, on the other. The prevalence of price maxima in Germany would cause a computed index of purchasing power parity to underestimate the overvaluation of the Reichsmark; but in conjunction with other information this index shows approximately the overvaluation (50 to 75 per cent) relevant to a unitary devaluation to equilibrium in the last years before the war. Export prices cannot be employed in lieu of wholesale prices, if exports are subsidized or maintained by debtors' windfalls on frozen accounts.

The quotations on gold in Vienna throughout the Austrian experience and in Budapest to March, 1935, were subject to sharp short-term fluctuations not shared by commodity price indices; but in the long run they showed trends similar to purchasing power comparisons. For short-period movements again, the Austrian Business Cycle Research Institute made successful use of the Vienna quotations on Swiss railway bonds compared with the Zurich prices; but in Hungary and Germany the suppression of a free market in foreign securities prevented the resort to similar indicators. We have found that Zurich quotations on pengö notes, while subject to peculiar movements of their own, conformed to other indices over longer periods; but the rigor of German regulation of the traffic in notes over the border made the foreign prices on Mark notes insignificant for general comparisons.

Where a government itself modifies or tolerates deviations from the official parity in ordinary trade involving the national currency unit itself, these rates of exchange indicate how great the overvaluation has come to be at a minimum, but they seldom recognize its full extent. Austria did, indeed, arrive at an equilibrium value of the Schilling by permitting supervised dealings on the "private clearing" market; Hungary pursued a more halting course, permitting only officially established premia and surcharges, generally lagging behind actual depreciation; but Germany has never officially recognized depreciation in the Reichsmark itself. Concessions were occasionally made in clearing rates to prevent a revolt by Mark balance holders. Our investigations have shown supporting passages in the body of the monograph are not given, except occasionally, because of the great number which would be required. Relevant information can be found by consulting the index.

that the quotations on various categories of frozen accounts give no reliable measure of currency depreciation, being subject to a number of stronger variables than the behavior of domestic prices — most notably limitation on the uses of each category, changes in these prescriptions, and anticipations concerning the solvency and political future of the country. In the case of Germany, the percentage of subsidy per unit of export was found to cover most, but not all, of the margin between German and English wholesale prices, on the one hand, and German and English export prices, on the other. The remainder is explicable as the margin of overvaluation which Germany could cover by discriminatory rates of exchange in place of a uniform rate. Since the discrimination raised the "real value" of the Reichsmark somewhat,¹ the Mark overvaluation to foreign importers was still indicated by the export price comparison; the overvaluation for devaluation retaining discrimination, by a comparison of wholesale prices *minus* the German export subsidies; and the overvaluation for devaluation eliminating discrimination, by a comparison of wholesale prices.

While overvaluation has continued to characterize exchange control systems with few exceptions, the inevitable retarding of exports and acceleration of imports very shortly forced departures from the original official parities. Three of the seven potential measures of overvaluation described in the preceding paragraphs also represent methods of introducing devaluations without sacrificing the formal parity: premia and surcharges on foreign devisen, exporting against frozen accounts, and subsidies on exports. The last method includes, beside the forthright granting of State funds to exporters, a number of less direct devices, such as the Polish system of low freight-rates on export merchandise, and the German system of levies through which an entire industry supported its export branch. To these methods may be added *de facto* devalued rates permitted for certain clearing relationships, and occasionally for barter or compensation, as for example with the Aski Marks. The official rate is also surrendered when the State permits exporters to retain devisen to cover their imports of raw materials, as in the Austrian and Hungarian "certificate system"; or when the State requires varying proportions of exporters' devisen to be surrendered

1. The discrimination often rested upon non-economic bases — upon practices which would generally be considered unfair competition — hence "real value" has to be considered in a purely indicative sense.

at the official price, as in the Austrian "raw material quota." Finally, there comes the special exchange rate applied to "additional exports," which may embrace all or only a portion of a given export parcel. These devices are frequently combined for one transaction, the actual export yield is then an intricate computation, and the results, as in most other cases of deviations from official parity, remain confidential between trader and exchange-control authority.

The long and short of these various indirect, half concealed and *de facto* devaluations has been a strong tendency for a "real" or equilibrium rate of exchange to reassert itself, despite the paraphernalia of exchange control. The Austrian private clearing rates moved gradually into accord with the price of gold, with quotations on foreign securities, with "home determined" prices in comparison with prices determined abroad, and with the relative movement of domestic and foreign sensitive price indices. In Hungary, a one-third depreciation of the pengö by the end of 1931, as indicated by Hungarian and British wholesale (gold) price indices and by black bourse quotations on dollar exchange, was not incorporated fully into premia surcharges on foreign free currencies until late in 1935. Meantime the pengö had undergone, first, an appreciable strengthening and, during 1934, a deterioration by the evidence of the same indices, complemented by the behavior of the Budapest gold price and the quotation on pengö notes in Zurich. At its introduction in December, 1935, the premium and surcharge system established approximately correct rates for the free relations and for clearing with Germany, though overvaluing the pengö relatively to the Schilling. The pengö appears not to have been seriously overvalued by the continuation of these rates through the years of recovery (especially of agricultural prices) to 1937; thereafter the institution of a sweeping spending program led to price developments which made the old premia and surcharges inadequate. It does not appear desirable to review the more complex situation of the German rates, except to emphasize again for the present context that, in general, effective export rates had to fall sufficiently to absorb the overvaluation not covered by subsidy and monopolistic discrimination.

Why were the largely fictitious official exchange rates not abandoned? It has been the evidence of the present study that the rationale of the old gold parities became increasingly tenuous as time went on, and that increasingly auspicious occasions presented

themselves for devaluation. Central European countries were not able to follow the example of England in September, 1931, primarily because of the popular confusion of devaluation with inflation and the danger of a velocity inflation at home through a domestic flight from the currency; because of the opposition of strong political groups, including the Socialist or labor parties; and finally, because of an (undoubtedly exaggerated) regard for the real burden of foreign debts. The *de facto* devaluation of the Schilling during 1932 and 1933 could proceed despite these obstacles, because the continued fall of world prices permitted currency depreciation without an absolute rise of domestic prices: devaluation was not apparent to the masses of the populace, and the National Bank took care to recognize the depreciation by a series of cautious steps so as never to attract attention to the process.

In Germany, exchange control served from the late autumn of 1931 to the latter part of 1932 as a medium-term device to support the Reichsmark while a deflationary adjustment to world prices could be pressed forward. Dollar devaluation in 1933 offered an occasion for an adjustment of the Reichsmark, for Reparations had been virtually annulled in 1932, foreign debts had been substantially reduced, and the tendency of world prices was still downward. Had Germany taken the step, already virtually complete in Austria, the currencies of most Central and Southeastern European countries could also have been devalued and most of the exchange controls could have been removed. The gold *bloc* devaluations of 1936 offered another golden opportunity, for by that time the German economy was thoroughly controlled within, and the foreign debts reduced to half their magnitude in 1931. Since Germany did not move, it was difficult (though not impossible) for Hungary to institute a devaluation. The funding of the Hungarian debt and the resumption of effective *devisen transfer* in the summer of 1937 supplied another and, as it proved, a final opportunity for abolishing the fictitious gold pengö.

The possibility of monopoly gain through high and discriminatory rates supplies a genuinely economic motive to the persistence of official parities and incomplete *ad hoc* devaluations. Aside from this, the forces which prevailed against the readjustment of currency standards were more or less remote from a truly economic rationale: (1) exaggerated notions as to the increased real burden of foreign debts; (2) the pressure of protected industries; (3) inertia;

(4) the "face-saving" quality of the old parities; (5) belief in the adequacy of the trade and payment arrangements of exchange control to compete with the traditional liberal system of the creditor countries; (6) the complacency of totalitarian states with exchange rates which required extensive State interference in international trade and hence in private business generally. We may now proceed to review the consequences of exchange control, including overvalued exchanges and bilateralism, upon international trade.

INTERNATIONAL TRADE

No effect of exchange control surpasses in importance its reduction of the value of international trade. Observe first the outcome for exchange-control countries in the aggregate. The fall in their share of world trade from 27.19 to 22.53 per cent is sufficiently striking in itself; but as the League of Nations' economists pointed out, the actual fall would be much greater (1) if the overvaluations of exchange-control countries had not considerably

EXCHANGE-CONTROL COUNTRIES IN WORLD EXPORTS*

(Percentage share in total gold value of exports by groups of countries)

Countries	1929	1931	1935	1937
European exchange-control . . .	23.48	27.19	21.68	22.53
Gold bloc	14.53	15.86	13.94	12.08
Others	61.99	56.95	64.91	65.39
	100.00	100.00	100.00	100.00

* League of Nations, Report on Exchange Control (Geneva, 1938), p. 30; the trade of the United States is not included.

exaggerated the value of their trade, and (2) if their intra-group trade had not proceeded at prices above world market levels.¹ These important modifications must be borne in mind when we turn to the countries specifically studied in these pages, not only for Germany and Hungary, but also for Austria, which withdrew successfully from exchange control, inasmuch as the statistics *understate* the share of non-exchange control countries. During the quadrennium 1933 through 1936, Austrian exports maintained a level of about 40 per cent of their value (and volume) in 1929,

1. Cf. Part I (November, 1939), pp. 25-26, 140-144, and pp. 85-113 above.

whereas world exports for the four years ran at 35, 34, 35, and 37 per cent. This higher level was attained by Austria, moreover, despite the persistence of import and export prohibitions and quotas after the virtual disappearance of exchange control. By way of contrast, Hungarian total trade in 1937 and 1938 attained only to 94 and 81 per cent of its 1929 magnitude, while world trade in the two years reached 97 and 86 per cent respectively; German exports, which had accounted for 12 per cent of world exports in 1929, fell to 10 per cent in 1938, despite an extension of productive capacity over the decade.

A concluding section upon The Theory of Exchange Control will present a method for isolating the effects of bilateralism, overvalued rates, direct limitation of exports and imports, and other components of exchange control in actual practice. In the present connection these effects are mentioned briefly with especial reference to the volume of international trade of Germany and Hungary. Because *de facto* devaluations proceeded rather far in both cases, it would seem legitimate to ascribe a large measure of the shrinkage of trade to bilateralism rather than to overvaluation. In her relations with Southeastern European countries, Germany did indeed — by a variety of devices scarcely cognizable as economic competition — succeed in balancing some of these clearings upward. But, as we have seen, the outcome for her trade as a whole was still negative: the balance of trade in 1937 and 1938 was less than it had been in 1933, the volume of exports a smaller share of world exports, and the volume of imports only slightly increased. Had it not been for a strong and persisting favorable turn to the German terms of trade after 1929, export balances would not have appeared after 1931. The adverse developments of the foreign trade of Hungary were in general unrelieved by bargaining power and adroit strategy such as Germany's, and the change in terms of trade intensified, in place of offsetting, the difficulties as in the German case.

Bilateralism itself, even in the absence of wrong exchange rates, has a characteristic downward-balancing effect on bilateral exports and imports through narrowing the range of buyers' and sellers' choices, and decreasing the attractiveness of foreign as against domestic trade. Downward balancing tends also to propagate itself, as Ohlin has argued,¹ since if *A* reduces imports from *B*, *B* must reduce imports from *C*, and so on in a spiral. As in the case

1. Ohlin, op. cit., p. 95.

of most exchange-control countries, Germany and Hungary also suffered additional foreign trade reductions through the omission of transit trade and many services from the clearing process, and from a still further narrowing of buyers' and sellers' markets through the absence of important commercial countries, such as the United States, from the clearing network. Furthermore, the direct interference of authority in the items admissible to clearings such as characterized German trade under the *Überwachungsstellen* was bound to reduce its economic value.

In the case of Germany and Hungary, both natural export-surplus economies, the overvaluation of their currencies remaining after deductions for *de facto* devaluations engendered additional obstacles by reason of the inconsistency between rates of exchange and the quantities of exports and imports contemplated for the clearings. Typically some inflexible ratio of bilateral trade was established and the phenomenon of uncleared balances put in its appearance. Numerous examples of this situation have been encountered throughout the inquiry, but the result is always the same: interminable delays in payment, interest losses, risks, interruptions of current trade for the liquidation of old clearings and the negotiation of new agreements, and the shrinkage of foreign trade. It is noteworthy that in 1933, after the introduction of premia and surcharges which partly counteracted the overvalued pengö, and in 1936, after the drastic reduction of artificial discriminatory rates, Hungary experienced increases of her foreign trade far surpassing the contemporary improvement in world trade.¹ The evidence is impressive, even if allowance is made for the good harvest of these years.

Ideally, the constraining influence of clearings could be counterbalanced in large measure through the flexible prices of direct barter dealings, or through the flexible trade ratios contemplated in payment agreements. It cannot be gainsaid that barter occasionally permitted trade to proceed when clearing transactions had come to an absolute *impasse*, nor that certain conspicuously successful payment agreements functioned better than did the clearings as a whole. But in neither Germany nor Hungary were these mitigations of strict control permitted to go very far. Authorities always strove to curb compensation or barter, because it sapped some of the most promising trade away from the clearings, con-

1. Cf. Part I (November, 1939), p. 131.

tributed to their unbalance, and let down the bars as to effective rates of exchange. Furthermore, the prescription of uses for Aski Marks deprived their quotation of its free character. Hungary witnessed a sudden enthusiasm for payment agreements under the caption of *Devisenkompensation* in 1936, but there is no evidence of any real flexibility of agreed-upon trade ratios; and even the much praised Anglo-German payment agreement of 1934 required constant constraint upon imports by the German authorities to prevent departures from the desired 55:100 relation of the two countries' bilateral exports. As we have seen, the total trade of exchange-control countries lagged behind world trade, despite such imaginable offsets as barter and payment agreements. In concluding it may also be observed that "additional" exports, however great their usefulness in liquidating frozen accounts, have been found by our analysis to include many exports not additional in any but a legal sense of the term.

The reduction in value of international trade is the joint result of a deflection of trade from its most profitable channels and an alteration of its commodity composition. Under the first kind of change, the most notable result of exchange control is the growth of trade between exchange-control countries at the expense of others. The force of bilateralism causes this to be characteristic of both the exports and imports of exchange-control countries, but special circumstances may suspend or reverse the general movement on either side of the trade balance. Thus Austria, not herself a genuine exchange-control country after 1934-1935 and enjoying an essentially free rate of exchange, did not divert a larger share of her exports to exchange-control countries in 1937 than there had been three years earlier (77 per cent by volume in both cases); but she was able to secure a larger share of imports from clearing countries (81.4 against 63.9 per cent by volume). In Hungary the shares for neither exports nor imports changed very significantly, since the efforts of this country to divert exports toward the free-exchanges, while successful in other quarters, were largely, though not completely, offset by the increase of exports to Germany. German trade with exchange-control countries increased on both sides of the balance. The League of Nations summary for sixteen exchange-control countries in Europe¹ indicates that ten increased and six decreased the shares of their exports to countries outside

1. League of Nations, Report on Exchange Control, p. 53.

this group between 1934 and 1937; and that of the six, the five countries other than Germany experienced the decrease of exports yielding free devisen because their export share to Germany increased. Amongst European non-exchange-control countries, the evidence seems to be that some, as, for example, France, Italy, and Switzerland, increased their exports in bilateral clearings but not their imports (1931–1934)¹; whereas England, probably because of its more strategic commercial position, was able to reduce exports to exchange-control countries from 18.3 to 14.2 per cent (1929–1937).² Finally, it should be pointed out that extensive changes took place within the trade of exchange-control countries. Hungary's exports to Germany and Italy increased from 22.5 to 36.1 per cent of total exports between 1931 and 1938. Germany's program of bilateral balancing involved the sacrifice of her favorable balance with Western Europe, with which she had purchased raw materials from Latin America, and the vigorous expansion of exports in this quarter and a general trade drive in Southeastern Europe to compensate for the loss.

Nothing in the character of either bilateralism or artificially high rates of exchange produces other than random changes in the composition of international trade. Marked changes in the nature of exports and imports therefore reveal that exchange control has not been employed as a purely monetary and financial device. It has become the instrument or complement of protectionist or autarkic policy. In this capacity exchange control, because of its complete arbitrariness, does not lend itself to the analytical method of economics. So far as concerns its influence in the past, we observe one conspicuous result upon international trade — the drastic reduction of imports of finished goods and extension of imports of raw materials. This tendency requires the opposite change in the trade of other countries. If autarky becomes universal, it would seem to imply the virtual cessation of international trade in finished products and the reduction of trade in raw materials to the exchange of goods without close substitutes.

Aside from the opportunity it affords for State intervention in trade, aside from the embargo on exports of capital (enforceable

1. League of Nations, *Inquiry into Clearing Agreements*, pp. 38–40.
2. F. W. Paish, *The Effects of Foreign Exchange Control on British Trade*, mimeographed, International Institute of Intellectual Coöperation (Paris, 1939), p. 17.

in other ways), and aside from the "face-saving" quality of old parities, exchange control with its overvalued currency unit and the bilateralism thereby made necessary has no further *raison d'être* than a possible gain in terms and "total gain" of international trade. What has been the evidence of our inquiry as to this possibility in the cases of Hungary and Germany?¹

For both countries the evidence is fairly clear that the prices of goods bought and sold through bilateral channels were higher than world market prices. Statistics prepared by the League of Nations revealed that Hungary paid higher prices to exchange-control than to other countries in 1936 for wheat, flour, poultry, butter, eggs, malt, and rye; and these results for poultry, butter and flour have been proven to be characteristic of the control period. Data for coffee, coal, and cocoa beans, as samples of the import side, revealed higher prices to have been paid in the clearings than in the free relations.² For Germany, the Berlin Institute for Business Cycle Research compiled data for imports of wool, cotton, lumber, oil fruit and oil seed, petroleum and its derivatives, and copper, for the interval from 1933 to the last quarter of 1935. Prices were higher — in some cases very much higher — for imports through the clearings; and these results were confirmed by our investigations for cotton, wool, and copper over the decade 1929–1938. Information about the prices of specific export goods of Germany is lacking, but the investigation of German export prices in the clearing relations with Southeastern Europe revealed a general tendency for them to exceed the world level.

The explanation of these high import and export prices involves a number of factors analyzed in detail in the concluding section upon The Theory of Exchange Control; at present a brief statement must suffice. The overvalued exchange rates of Germany and Hungary in comparison with Western Europe account in large measure for high export prices received through the clearings. The overvaluation extended for both countries to certain Southeastern European countries; and in the case of Germany, it was fortified by monopoly and monopolistic discrimination, the exploitation of clearing indebtedness, and political pressure — all operating in the direction of high export prices. The high import prices, on the

1. The short duration of control prevented the instituting of a similar inquiry for Austria.

2. Cf. Part I (November, 1939), pp. 140–143.

other hand, run counter to expectations on the basis of overvalued exchange rates, which should lead to importing at bargain prices. But as the concluding section will show, the gain from the high rate on home currency stands against certain losses. Even if clearing arrangements extended to all countries, the range of importers' choice would be limited by the necessity of bilateral balance; but in addition, important countries remained outside the clearing network of both countries; and furthermore, the risks, formalities, and delays in payment for foreign exporters prompted them to add a price premium in sales to these countries. If the import price indices of Germany and Hungary are to be accepted at their face value, the cumulation of losses from causes such as these more than offset the influence of their high rates of exchange on the import side.

Whether the high import prices or the high export prices represented the stronger force should be discovered in the behavior of terms of trade. For Hungary the terms of trade fell under the influence of agricultural depression from 1925–1927 to 1934, and thereafter recovered to the 1925–1927 level only once, in 1935; by contraries, Germany enjoyed the advantage of industrial exports and high terms of trade throughout the 'thirties. We are thus confronted by a strong external variable which makes difficult the appraisal of the influence coming from exchange-control in isolation. To exclude this variable, as far as possible, we have compared Germany with England, another country of almost exclusively industrial exports.¹ This procedure revealed an excess of German over British terms of trade, small in comparison with the margin of overvaluation of the Reichsmark relatively to sterling, but enduring from 1931 through 1938. This margin has, however, to be discounted considerably for the concealed costs of trade through clearings, such as losses to exporters in delayed payments, and the technical costs of exchange control.

The final calculus must include not only terms but also volume of trade in order to reveal "total gain." In the case of Hungary the significant fact is the virtual surrender, in 1935, of attempts at monopoly exploitation and monopolistic discrimination through

1. A comparison of Hungary with Poland, the only country of comparable agricultural exports not under exchange control, was precluded by the heavy subsidies to exports prevailing there, and by the termination of free payments in the spring of 1936.

high and differential exchange rates, an action which must have signified the conviction of the authorities that the game was not worth the candle. Germany experienced her highest terms of trade as well as her most favorable export balances between 1930 and 1932, concomitantly with the heavy outflow of capital. If the "total gain" of trade was large in these years, it was transferred abroad for the most part to liquidate debts. After 1932 both the favorable terms and the volume of exports diminished. It is difficult to believe, if account is taken of the concealed costs of exchange control, that the high Reichsmark rate on balance actually netted any economic advantage in the international trade of Germany.

THE DOMESTIC ECONOMY

If the continuance of exchange control had its justification in political but not in economic terms, so far as concerned foreign trade, the total economic calculus becomes conclusively adverse if we include also the repercussions of the institution on economic life within the country. Exchange control in Austria and Germany protected the economically inferior agricultural lines of production, and in Hungary it fostered the economically weak industrial production. Amongst industries, there is clear evidence that larger producers and cartels gained at the expense of smaller producers and consumers. The allocation of devisen for imported raw materials, being a matter of administrative decision without possibility of legal redress on the part of entrepreneurs, fell under the influence of political and economic pressure, with the odds in favor of the largest firms and combinations. Trade under clearings and compensation required the services of skilled legal and commercial experts, which the small producer could ill afford. In compensation only large deals were economically possible.¹ Specific industries which enjoyed adventitious gains under exchange control in Hungary were cotton textiles, coal, lignite, firewood, petroleum, glass, leather, and paper.² For Germany it has not been possible to discover the separate influence of exchange control upon specific industries; economic policy embracing taxation, special levies,

1. These effects have been emphasized in the case of Germany by Brockmann, op. cit., p. 105 and Fischer, op. cit., p. 42; of Czechoslovakia, by Sourek, in Mayer, Horna, and Sourek, op. cit., p. 154; of Finland, by Hormi, op. cit., p. 16.

2. Cf. Part I (November, 1939), pp. 107, 120.

informal "voluntary" contributions, and the like merge inextricably with import and export regulations and the allocation of devisen. We have only the indirect evidence of profit ratios, as presented for example in the excellent study of Maxine Sweezy,¹ which reveals a relatively strong position of heavy industry, an intermediate position for light industries, and a disadvantageous situation for luxuries. The extent of cartelization is greatest in the first group.

To the reduction of the "social economic product" through the increase of monopoly are to be added, as costs of exchange control, the outlays of the State and entrepreneurs in maintaining the apparatus and carrying on business through its devious channels. These embrace not only the costs of technical advisers and the time and money expended by entrepreneurs in the "war of forms to be filled out," but also fees and bribes; to the State, the costs include the maintenance of the officialdom and clerical staff engaged in clearings, Control Offices and the like, and the expenses of negotiating agreements with foreign countries.² When clearings and barter arrangements are subjected to considerable changes, there is added the private and social costs of sudden alterations in direction of production.

It is sufficiently clear that the consumer, as Fisher writes, is the stepchild of exchange control.³ In Hungary real wages failed until 1938 to recover to the level even of the early years of depression, despite a notable increase in agricultural prices. For Germany, under an avowed policy of restraining consumption in favor of objectives ulterior to economic welfare, the standard of living — aside from the elimination of overt unemployment — seems to have declined. Wages were stabilized in general at their 1934 level, but the evasion of price maxima, the deterioration of quality, and the various deductions from money income combined to produce a lower real wage level.

THE THEORY OF EXCHANGE CONTROL

Exchange control in its most common form includes two main elements — the maintenance of more or less artificially high rates

1. Maxine Y. Sweezy, "German Corporate Profits: 1926-1938," *Quarterly Journal of Economics*, Vol. 54 (May, 1940), pp. 384-399.

2. Over the span of three years, for example, England concluded eighteen separate commercial and payment agreements with Rumania alone; cf. Paish, *op. cit.*, p. 19.

3. A. G. B. Fisher, *op. cit.*, p. 14.

of exchange, and, since this produces a "shortage of devisen" in the control country, the resort to systems of bilateral trade-balancing to dispense with the necessity of trade by devisen. Each of the two characteristics has taken on a great diversity of forms, and the possible combinations of these forms are legion. Some countries adhere to overvalued rates; some have admitted rates near equilibrium; some maintain a unique exchange rate; others resort to discriminating multiple rates; bilateralism includes part of the world, while a part is still multilateral; in some cases bilateralism is secured through barter, in others through clearing and through payment agreements; some countries engage in barter and clearing without themselves prohibiting capital exports, and without maintaining official exchange rates; multilateral clearings are not unknown, but their number is limited. We shall proceed most effectively if we start with somewhat simplified or "idealized" conditions and approach reality by degrees. It seems advisable to consider bilateralism first and overvalued exchange rates subsequently.

A. An Ideal World of Bilateral Trade

Let us begin by comparing a universal system of international trade by barter (or compensation) with a system of trade permitting free use of bills of exchange. This comparison can be carried forward in a realistic setting without resort to rarified abstractions by assuming that transportation costs, protective tariffs, quotas, and import and export prohibitions are in existence, but are not changed by the substitution of barter for trade by means of bills of exchange. Assume that exporters and importers were free within the limits of the State interferences mentioned to maximize their economic positions in view of the underlying cost and demand functions, and that the same freedom now exists under barter. If traders were permitted to "barter" not only goods for goods, but also goods for services, and goods and services against evidences of debt, and if, as we suppose, all countries are open to barter dealings, the difference from a system of multilateral trade by devisen would be simple but dramatic. It would be precisely analogous to the successful suppression of monetary exchange within a country, and the reduction of sellers' and buyers' economic positions would be measured by the material and psychic costs of arranging the "double coincidence" requisite to all barter. But as it is understood

in exchange-control countries today, "barter" or "compensation" does not admit the exchange of services or of capital, but only of commodities; bilateral trade which does include these items goes by other designations, such as clearing and payment agreements. Upon this more realistic interpretation, barter entails a reduction of economic product, not only by the costs of arranging "double coincidences," but also by the economic gains arising from the international purchase and sale of services and from borrowing and lending.

We proceed to the considerably more complicated devices of securing bilateral balance through clearings. These devices fall into two large groups, accordingly as State action to force bilateralism impinges upon the rate of exchange or upon the quantities of exports and imports which enter the clearings. A further subdivision depends upon whether capital movements are not or are provided for, that is, whether trade is forced to a 1:1 ratio, or whether some other ratio is adopted. The most simple system with which to begin is one achieving the bilateral balance through an authoritarian exchange rate, and which at the same time, while leaving the initiative as to exports and imports entirely to traders, does not provide for capital transfers. To secure a 1:1 ratio of exports (or imports) between the two countries, the exchange authorities must agree to lower the rates of foreign exchange in the favorable-balance country and raise them in the unfavorable-balance country. Pushed far enough, save for one case which can be neglected,¹ this device will achieve its aim. What are the economic consequences?

The method of inducing bilateral balance by means of the rate of exchange is adopted as the simpler and more nearly "ideal" for expository purposes,² not only because the change of the rate of exchange is a uniform and objective fact for all traders, but also because it limits the possibilities of changes in exports and imports which could ensue. As we have previously remarked, so far as concerns arithmetic, balancing might follow if both sides increased, the deficient side (exports or imports) increasing faster; if both sides decreased, the excessive side (exports or imports) decreasing faster;

1. Cf. p. 195, n. 1.

2. This method would also be simpler in *practice*, but States have usually resorted to direct operations upon the volume of exports and imports, because *inter alia* this affords the opportunity of regulating, not only the *quantity*, but also the *composition* and *direction* of trade.

if the deficient side rose to the (unchanged) excessive side, or the excessive side fell to the (unchanged) deficient side; or finally if the excessive side decreased and the deficient side increased. But if balancing is achieved through exchange-rate manipulation, the possibilities included in the first two of the foregoing series of conditional clauses are clearly eliminated. For the reduction of the rates of foreign exchange in the favorable-balance country does not make exporting *more* profitable, nor does the rise of rates in the unfavorable-balance country make exporting *less* profitable.¹ Consequently the rate adjustment necessary to work toward bilateral balancing cannot possibly increase bilateral exports and imports above the level of the larger of the two (for one country in a bilateral relation), nor by the same token reduce them below the level of the smaller. We are able, therefore, to put the question of effects in a somewhat narrow form, as long as we are dealing with bilateral balance obtained through the rate of exchange. Will the bilateral balancing be achieved by an upward or a downward balancing, i.e. will the exports of the former unfavorable-balance country rise to the level of the exports of the former favorable-balance country, or will the imports of the former unfavorable-balance country fall to the level of the former favorable balance country? For the balancing to be upward the demand for exports of the favorable-balance country in the clearing partner must not have *more* than unitary elasticity. If it did, the fall of the exchange rate in the favorable-balance country would reduce its total export value, and this is a movement in the direction of bilateral balancing downward.

In order to investigate the possibility of such a situation, however, it is necessary to know the trade situation of the unfavorable-balance country, not merely with one country, but with all its trading partners. It would merely postpone meeting the crucial

1. We need not be disconcerted by the theoretical possibility, mentioned in treatises on foreign trade, that elasticity of demand for exports as a whole might be *less* than unity. If such a demand existed, no decrease of the rate of exchange in the favorable-balance country could reduce its favorable balance, and no increase of the unfavorable-balance country could remove its unfavorable balance. But we may be almost certain in the case of an individual export that this would not be allowed to happen by the traders themselves — that a greater volume of exports should be marketed at a smaller aggregate yield — since the exporting firms, if not the domestic producers, are usually few and would exercise oligopolistic restriction. Furthermore, examples of such a demand for individual products are limited by reason of foreign competition; and the existence of an aggregate demand of less than unity seems never to have been observed in practice.

issue, if we did not assume at once that unfavorable balances are characteristic for our "unfavorable-balance" country's entire situation. In order to increase exports (in the particular bilateral relationship with which we began) to the level of the favorable-balance country, the unfavorable-balance country will have either (1) to deflect its exports from other countries or (2) to increase its total output of exported goods. The former course would *intensify* the necessity for downward balancing in its bilateral relations with all the "other" countries. The latter course will raise the cost of production of exports,¹ since it will be necessary to pay higher rates at home, or to import them at higher costs also. Because the yield of exporting is increased by the State revision of the exchange rate to induce bilateral balancing, the unfavorable-balance country will be able to incur higher production costs for exports and yet export more. As exports increase, marginal cost is forced upward, not only by higher costs of factors, but also by an underlying technical inefficiency, for it must not be forgotten that this is an "unfavorable-balance" country aside from the new bilateral rate of exchange, while the rise of costs in the unfavorable-balance country makes increasingly improbable the maintenance of unitary effective demand on its part for the favorable-balance country's exports. The rise of costs would normally tend to deflect some demand within the unfavorable-balance country to foreign markets; but under bilateralism this reaction is thwarted by the enforcement of sufficiently high foreign exchange rates within the country to discourage imports in the unfavorable-balance relations generally. Meanwhile developments in the latter are tending to reduce its demand for the other country's products, no matter what the demand elasticity may be: the increased demand for factors of production in the unfavorable-balance country tends to raise costs of production in the favorable-balance country and to decrease exports. Inasmuch as these restraining forces become the stronger the more is exported by the unfavorable-balance country, the *a priori* probabilities of a complete balancing are small. *Mutatis mutandis* it is demonstrable that a complete downward balancing is improbable, and that resistances to a decrease of exports by the favorable-balance country increase as this limit is approached.

The results of balancing at any point *between* the upper and

1. Unless there are unemployed factors at home, with which contingency we shall deal presently.

lower limits may be translated for each country as follows. For the favorable-balance country the increase of the foreign value of its money means a favorable change in the terms of trade, a decrease in exports and a smaller gain upon them; but imports are cheaper and larger, and the gain upon them is greater. For the unfavorable-balance country the decrease of the foreign value of its money means an unfavorable change in the terms of trade, a decrease in imports and a smaller gain upon them; but exports are cheaper and larger, and the gain upon them is greater.

Can no more be deduced than this? If not, we should be unable to say whether the "upward-balancing" or "downward-balancing" force of bilateralism is greater. We should similarly be unable to say whether the favorable-balance country's gain on imports does or does not exceed its loss on exports, or whether the unfavorable-balance country's loss on imports does or does not exceed its gain on exports. If the upward and downward balancing forces neutralize one another, the volume of world trade is not affected: exports (imports) in the aggregate remain at their former magnitude; a preponderance of the upward-balancing forces causes exports (imports) to increase, and a preponderance of the downward-balancing forces causes them to decrease.

The foregoing tedious and inconclusive description of possible behaviors of terms and of export and import magnitudes does indeed belong to the *modus operandi* of bilateralism, but has not answered the crucial question. The answers are, in fact, given by a simple calculus of utilities and costs: importers are no longer able to purchase in the countries with the lowest domestic costs of production, nor are exporters able to sell to the countries with the highest domestic demand. Importers purchase, of course, where it is *now* cheapest, and exporters sell where it is *now* dearest. Since the advantages of exporting and importing, on the whole, have been reduced, the volume of international trade will fall. The narrowing of the field of buyers' and sellers' choices entailed by bilateralism reduces the favorable turn which bilateral balance required of a favorable-balance country's terms of trade; and it makes still more unfavorable the unfavorable turn required of an unfavorable-balance country's terms. For a "typical" country, with neither favorable nor unfavorable balances, the terms of trade are less favorable and, with anything less than unitary elasticity of demand for its products, the total gain is also smaller.

Bilateralism inevitably balances downward, even in the case just treated, which involved no direct interference of authorities with *kinds* of exports and imports, and no reference to autarkic tendencies.

A sceptic of this conclusion is invited to contemplate the fact that the final ratio of exports to exports (or imports to imports) between the two countries involved in bilateralism is the result of an *entirely arbitrary* decision. If it could be shown, for example, that balancing of a ratio of 1:1 could by any stretch of the imagination produce a higher gain and volume of trade than the "natural" condition of unbalance between exports and imports, then it ought to be possible, by the same token, to make such a demonstration for a 1:10 ratio, or for 1:100, or 100:1. In other words, a position opposed to the one represented in the foregoing paragraphs would be tantamount to maintaining the thesis that any arbitrary decision as to the direction of international trade will increase the gain and volume. Such a thesis, indeed, would have to be maintained if bilateralism were defensible on economic grounds.

It must be made quite explicit, however, that the reduction of gain and volume is asserted for the "ideal world" as a whole, or for a *typical* country, not for *every* country. The shifting of reciprocal demand throughout the system as a consequence of the imposition of bilateralism is almost certain to shift the demand schedule as an entirety for the products of some countries to the right. A certain limited number of countries can experience an increase of total gain (and perhaps also of volume) from international trade. But it is not to be imagined that this occurs as a result of these countries' own efforts, nor *pro tanto* of their exchange control. The gain is a windfall.

Thus far we have carried on an analysis on the basis of a 1:1 ratio of bilateral trade, that is, with the elimination of capital movements. But does not the conclusion regarding downward balancing depend upon this very assumption? If under clearing a 2:3 ratio is set between the exports of one country and another, it means simply that the country with the unfavorable balance is accepting a certain fraction of the current inflow of the other country's exports as repayment on a past loan or as a new loan. The concept of a "tied loan," long familiar as an unusual case under *devisen* trade, describes *all* loans under bilateralism: the proceeds can only be "used" (they are indeed obtained) in the goods

of the lending country. Just as it would be open to the borrowing country under a tied loan to re-export the products of the lender to third countries in an effort to escape the limited range of choice imposed by the contract, so in bilateral trade a receiver of "capital" may re-export to third countries. The process diminishes losses to the borrower from having to take goods and services which he would not have taken or could have purchased more cheaply elsewhere. But some loss remains. For third countries, it may safely be assumed, have already had the opportunity of purchasing the lender's wares and will take more only if the price is reduced. This loss of a "tied loan" also characterizes the loss of a *repayment* under bilateral balancing, and indeed of *all trade*. It is apparent now that the reduction of "total gain" of international trade under a 1:1 clearing agreement has precisely the same character as the loss at any other ratio. In passing, it will not escape the reader that under bilateralism any movement of capital *must* be on the initiative of the State, which determines by means of the clearing rate of exchange (or otherwise) the volume of exports relatively to imports.

Thus far we have proceeded upon the assumption that the authorities secure bilateral balancing at the desired ratio by manipulating the rate of exchange, while leaving the quantities and kinds of exports and imports entirely to free choice. Now let us reverse the assumption: the State regulates exports and imports directly, leaving the rate of exchange to competitive forces.¹ Contrary to the case of bilateral balance secured through fixing the rate of exchange,² the State can undoubtedly, by a system of quotas, tariffs, bonuses, and penalties, either increase or decrease *both exports and imports* at the same time, and it can undoubtedly bring them to equality or to any ratio desired. A system of prohibitions, quotas, tariffs, subsidies and taxes can undoubtedly expand the physical volume of exports and imports. Pressed far enough with sufficient sacrifice of terms of trade, it can also expand the value of imports and exports, as Russia has done since the Revolution. But if producers and consumers have maximized their economic positions, all such devices must produce a shrinkage of value of output as a whole. Exception should be made, as in the rate-of-exchange device, for windfalls in the form of increased intensity of demand for the prod-

1. As a matter of fact, both tacks have usually been taken at once; but the possibility of *inconsistency* between the two precludes this case from consideration in an "ideal" world of bilateralism.

2. Cf. p. 194 above.

ucts of one or a few countries in a world where international trade is dislocated by quantitative interferences; but even this outcome is not the product of the country's own interferences. Finally it should be observed that, though direct interferences can increase the volume and value of exports and imports (albeit typically at a loss in output as a whole), the "optimum" interferences themselves are ideally based on a practical omniscience of demand and supply functions of particular goods in international trade and the repercussions of bilateralism on these functions. With human limitations, the authorities may be able to extend the value of trade only with a very heavy cost in general efficiency.

Obstacles to international trade are usually said to lower world market values. In a world of bilateralism no single currency could be used as a measure of international prices — indeed, truly international prices no longer exist. Resort might be had, however, to an index which embodied the price in each bilateral relation and weighted it according to the quantity sold in each relation. An index of this sort running back into the period of multilateral trade would certainly decline as bilateralism spread. Bilateral balance narrows the range of choice of both sellers and buyers; the former would, on the average, obtain lower prices, and the latter would, on the average, have to pay higher prices; but the fall of export prices would exceed the rise of import prices, because the attractiveness of foreign markets in comparison with domestic markets would be decreased for both exporters and importers by the limitation of bilateralism.

Three matters which might conceivably affect the outcome of the argument to this point have been passed over in a cavalier fashion and must now be scrutinized: unemployed resources, obstacles to trade, and money capital movements. Could not the existence of unemployed resources in a former unfavorable-balance country permit it to extend production so as to "balance upward" when bilateralism is imposed? An affirmative answer is clearly warranted: the rise of export costs would be held in check. But if the unemployment occurs, instead, in the favorable-balance country, the situation is reversed. Unemployment reveals the presence of downward wage-rate inflexibility. When exchange rates are lowered in the favorable-balance country to reduce its export balance, if costs are inflexible the reduction will not have to be large to reduce exports considerably. The unfavorable-balance country

obtains only a small bonus for its exports from the slight upward revision of exchange rates, and extends exports only slightly. The balancing is mostly downward. Since there is no presumption that unemployment is more extensive amongst unfavorable-balance than amongst favorable-balance countries (compare England and the United States), the conclusions regarding bilateralism are unaffected.

The imposition of bilateralism, by reasoning given earlier, acts as a protective tariff on unfavorable-balance countries and as a system of export tariffs on favorable-balance countries. If the favorable-balance countries in general occupied their position because of the importation of raw materials for fabrication and re-export, bilateralism would be accompanied by one change tending to offset its downward-balancing force. For the export of finished goods would be reduced, unfavorable-balance countries producing more for their own consumption; and, in general, tariffs, quotas, and import prohibitions are not as severe for raw materials as for finished goods. But favorable balances arise frequently from exporting raw materials, and here the factor mentioned works to intensify downward balancing.

A third point concerns movements of capital in money and goods. It was remarked in the paragraphs dealing with barter that if it admitted money and securities, "barter" in this sense would be identical with multiangular trade with *devisen*. The same is true of clearings. The earmark of both is the *exclusion* of these items. But clearing, unlike barter, can be conducted so as to transfer real capital. Thus far in history, clearing and payment agreements have been used most frequently to repay existing obligations, and clearings have served as the channel of "involuntary" lending and borrowing through the accumulation of uncleared balances. Neither class of capital movement can be regarded as "economic" in character, that is, as representing the response to interest-rate differentials. In any event, to be used to transfer capital, clearing and payment agreements require an authoritarian "fixing" of the exchange rate or direct regulation of exports and imports in order to develop a balance in the desired direction and a balance of the desired size. In a section describing the functioning of bilateralism in an "ideal world," we can appropriately observe merely that political authorities *may* direct the flow of capital internationally to its most productive applications.

In summary, we have discovered that bilateralism, even under the most ideal circumstances imaginable — without State interference in the items of international goods and services trade, without exchange rates incompatible with the ideal of bilateral balancing, and with the whole commercial world embraced in the scheme — in all events results either in downward balancing and the reduction of the total volume and gain of international trade or in an increase at the expense of total output. An individual country — not typical of all countries, however — can experience, as a pure windfall, an increase in the demand for its own products sufficient to offset any losses *to it* produced by bilateralism, and it might even gain on balance.

Barter presents the greatest reduction of gain in world trade¹; clearing without possibility of capital movement comes next; and clearing and payment agreements providing for capital movements, if they are used to transfer capital from lower to higher productivities, come next. All devices at their "best" sacrifice economic efficiency, and they are all discriminatory, for they do not operate to give the market to the most efficient seller and to the highest bidder, but to make exports equal imports for each pair of countries.

There is a categoric difference between all of these bilateral devices, on the one hand, and a system of multilateral trade, on the other, whether the latter is envisaged in its traditional free-devisen form or as a system of multilateral clearings. Referring to exchange control and bilateral trading, one author writes:

"But to the extent that a scheme of this sort is perfected — made flexible and inclusive, providing, for example, as its propounders have suggested, for a rise and fall in the value of the 'checks' on a certain country to bring demand and supply into equilibrium, and providing for loans and capital investments — it becomes more and more like the regular international money system, with the same advantages and the same trouble."²

As a matter of fact, however, there is an absolute limit reached to the process of becoming "more and more like the regular international money system," even if, as the foregoing paragraphs have demonstrated, the rate of exchange accords perfectly with the equilibrium of supply and demand desired under bilateralism, and even if capital is moved to points of highest productivity. The

1. There are occasional exceptions; cf. p. 186 above.

2. Eugene Staley, *World Economy in Transition* (New York, 1939), pp. 243-244.

capital is still a tied loan, and exports and imports are tied as to source and destination. To progress farther than this is to surrender *bilateralism* at *any* ratio of balances. *Multilateral* clearing is a horse of a different color. Where it has existed, as for example in the "Brocchi" system and otherwise,¹ it constitutes a small island of free payments, for the *ratios* of exports and imports do not have to be set in order that it may function: balances are for free disposal through the system, however large or small it may be. For this reason the enthusiasm once displayed by Einzig for a world (multi-lateral) clearing system is curious, for such an arrangement is simply a reconstitution of what Staley calls the "regular international money system" under slightly different auspices.² Let us not err; multilateralism is one thing, bilateralism another.

B. Actual Bilateral Trade

We must now take account of certain important institutional factors which reduce the gain of international trade under bilateralism even below the level of a "perfect" system. Actual bilateral trade is less efficient, in the first place, because of its incompleteness. The incompleteness narrows the market for both exporters and importers, and tends to make imports cost more and exports bring less. Furthermore, even within the areas covered by bilateral trade, certain marked shortcomings of bilateralism are caused by its not being the universal system. The two great shortcomings are its exclusion of transit trade and of many services. If all countries do not belong to the series of bilateral agreements of a given country, it is forced to exclude transit trade from all its clearings, in order to avoid their being used for trade which actually belongs by origin or ultimate destination to a non-clearing country. This result is quite properly stressed by the League of Nations' Enquiry and its Report. Indirectly the incompleteness also frequently results in the exclusion of many services, for "invisible" items to the customs house are almost equally "invisible" to the exchange-control authorities. Capital flight by means of fictitious deals through the clearing accounts would be difficult to apprehend; and the exchange

1. Cf. Part I (November, 1939), p. 16. Germany, Greece, and Japan had such an arrangement; cf. Brockmann, op. cit., p. 121. In most cases, however, the system labored under artificial rates.

2. Paul Einzig, *The Exchange Clearing System* (London, 1935), Chapters XX and XXI.

authorities usually make short shrift of the matter by excluding services except those easy to control, such as services to travellers, to regular business representatives, and insurance and bank commissions. The "downward balancing," through eliminating transit trade and many services, seriously reduces the volume of international trade.

Except for the possibility of monopolistic selling of exports (including monopolistic discrimination) and monopsonistic purchasing of imports, any departure of the composition and amount of exports and imports from their condition under competitive buying and selling produces economic loss. Bilateralism in itself, according to the argument of the preceding section, produces such a loss, even where the interference of the State does not go beyond the exchange-rate adjustment essential to bilateral balancing. But the fixation of an exchange rate is at least objective and, in comparison with other devices of securing the balance, less discriminatory amongst particular exports and particular imports. "Theoretically" it is, of course, possible to secure precisely the same penalty or bonus on each item of import and export as is produced by the movement of a unique exchange rate by a complicated system of specific import and export tariffs or of quotas, domestic price-fixing, consumption or use taxes, and export bonuses. All of these have been utilized in the 1930's, together with even cruder measures, such as import and export licenses, rule-of-thumb administration as to what is a "necessary" import, what an "indispensable" export, and even the mere arbitrary selection of tariff-schedule items such as to add up on the import and export sides to equality.¹ The point scarcely needs to be argued that even the more refined methods are too complicated to administer without discrimination against certain items of exports and imports, and with others no pretense is made to the contrary. The probability amounts to a practical certainty that such measures achieve bilateral balancing with a heavy cost, peculiar to themselves, in economic efficiency, on the selling and buying sides alike. Furthermore, they are often used in conjunction with a half-hearted adjustment of exchange rates intended to aid in the balancing.² But whether the price attack through the

1. Cf. Jacques Bataille, *Les offices de compensation: leur rôle dans la restauration du commerce extérieur* (Paris, 1934), Ch. VIII; Margaret Gordon, *op. cit.*, Ch. VI.

2. Cf. Part I (November, 1939), p. 98-99.

rate and the quantity attack through direct measures work in all cases in unison and after any discoverable rationale could not be known even by a Minister of the National Economy.

The gamut of contra-economic interferences in international trade connected with bilateral balancing is not complete until we have named protection, autarky, totalitarian control, and political skullduggery, both at home and in relations with other countries. These are admittedly not necessary parts of bilateralism; but it is well to bear them in mind in any attempt to appraise the results of the system in its actual operation. Finally it must be emphasized that the reductions in volume and gain of international trade imposed by the four "institutional" factors pointed out in the present section — absence of clearings with some countries, exclusion of transit trade and services, awkward and discriminatory direct regulations of the volume of exports and imports, and outright protection, autarky, and political maneuvering — all these losses are not only additive to the net loss in an "ideal world" of bilateral trade and to one another, but they are also cumulative.

C. Exchange Rates under Exchange Control

Save for such rare cases as Austria after 1935, where exchange control was attenuated to an embargo on capital exports, all systems have involved overvalued rates of exchange. The theory of exchange control must embrace generalizations concerning the meaning of overvaluation in this context, its effects upon trade, and upon prices.

At the outset it is necessary to distinguish nominal from real overvaluations. The nominal or official rate of exchange by no means lacks significance, for its preservation represents one of the primary aims of exchange control and necessitates the whole apparatus of bilateralism. Nevertheless, effects upon trade and goods are produced only by the exchange rate or rates over which goods are actually exported and imported; and consequently in the ensuing investigation of these effects, the word "overvaluation" must in all cases be understood to refer to real rates. Such real rates include rates of exchange given by the prices of frozen accounts applicable to exports, special categories of currency such as Aski Marks, and the effective rates employed in compensation, clearings, and payment agreements.

The concept of overvaluation applicable to relations between

non-exchange-control countries differs rather strikingly, at a superficial level at least, from that applicable to relations between exchange-control countries. Definitions of equilibrium rate under the former situation, such as those proposed by Cassel, Pigou, and others,¹ quite correctly run in terms of the prices of goods and services; but under exchange control, involving as it inevitably does the imposition of bilateral balancing, the equilibrium rate is that rate which causes exports to equal imports in trade with a *particular country* or to stand in some other fixed relation predetermined by authority. It is precisely this contrast which requires the authorities to use force, either upon the market rate of exchange or upon the quantities exported and imported. But while it is quite correct to regard the exchange rate necessary to effect bilateral balancing with a particular country at whatever ratio of exports to imports the State selects as the equilibrium rate for bilateralism,² nothing precludes the use of a more fundamental concept even for bilateralism. It is indeed indispensable from an economic angle to know whether the balancing rate itself does or does not conform to price equilibrium. In this event the traditional concepts, such as Cassel's and Pigou's, come into their own again as measures of the real or economic disequilibrium of a rate of exchange which authority has imposed upon the trade with a particular country.

It may be convenient to refer to these two equilibria as price (or economic) equilibrium and bilateral equilibrium. How essential such a distinction is, appears from a non-exchange-control country, such as England before the present war, which nevertheless was the clearing partner of exchange-control countries. So far as concerned other non-exchange-control countries, it would probably be correct to assume that market rates on sterling conformed to price (or economic) equilibrium. So far as concerned the pound rate in the currency of an exchange-control country, this was not always the case. The payment agreement between England and Germany contemplated a fixed relation of English to German exports in their mutual trade at a ratio of 55:100; but because English exports persistently outstripped this ratio, the German authorities had always to intervene with direct limitation of imports from England, to prevent the accumulation of uncleared

1. Cf. pp. 76-77 above.

2. This was the usage in the two preceding sections.

Mark credits to English account.¹ Sterling was undervalued from the angle of bilateral equilibrium. If we seek an explanation, we discover that the undervaluation did not arise because English prices lay below the level of free-payments countries, but because German prices exceeded it. Whatever terminology is used, the distinction between the two sorts of equilibrium has always been inevitable in analyzing the rates of exchange-control countries. Was the pengö overvalued or undervalued? According to the present terminology the answer would be: the pengö was overvalued on the basis of price equilibrium, but undervalued on the basis of bilateral equilibrium with Germany. These facts may be, and indeed have been in the course of the present study, set forth in the more laborious terminology of price-equilibrium throughout. Thus it would be necessary to explain that at the Hungarian official rates, even as modified by the surcharges and premia on free-currency countries, the pengö was overvalued on the basis of Hungarian and "world" prices; this *reduced* the Hungarian favorable balance to free-currency countries; but at the pengö-Mark clearing rate, the pengö was undervalued on the basis of Hungarian and German prices; Hungary experienced an accumulation of Mark balances from the *stimulation* of its exports to Germany. In a theoretical discussion it may be desirable to have a convenient shorthand for all this.

What, now, are the economic effects of the two sorts of overvaluation? As a preliminary observation, it may be said that only by accident does bilateral equilibrium coincide with price equilibrium. The establishment of such a ratio as 1.5:1 for Hungarian and Austrian exports in the clearing agreements of these countries, and of a 100:55 ratio for German and English exports in their payment agreement, was undoubtedly motivated by the desire to incorporate into the bilateral system something approximating the ratio of exports which had existed under free currencies and a price-equilibrium rate of exchange. But the preservation of the bare export ratio signified nothing in itself, for meanwhile the price-equilibrium changed entirely through disparate monetary developments in the two countries. By accident, the currency depreciations of Austria and Hungary between the summer of 1931 and June, 1935, were approximately equal, and the clearing operated without large one-sided balances. If a given bilateral ratio were

1. Cf. p. 58 above.

maintained with iron resolution for a very long time, it might be argued, and if factors of production moved rather freely from one country to another, the price or economic equilibrium would eventually be adjusted to the official bilateral equilibrium; their coincidence would then be more than accidental. The unreality of both the necessary postulates warrants neglecting this contingency entirely.

The literature of international trade and finance has set forth in sufficient detail the consequences of exchange rates higher than price equilibrium; and the main results, falling exports and rising imports, are not otherwise for exchange rates in excess of bilateral equilibrium, if we take the magnitude of exports and imports at bilateral equilibrium for the point of comparison. But for overvaluation relative to bilateral equilibrium very different results appear, *so far as concerns the aims of bilateralism*, from countries with export and with import surpluses. Following the argument of Section A, bilateral balancing in the direction of equality¹ of exports between the two countries requires a certain lowering of foreign exchange rates in a favorable-balance country. If the authorities enforce still lower rates, overvaluation exists relative to the desired bilateral equilibrium, and the former favorable-balance country now experiences an import surplus.² For a country which had an unfavorable balance, on the other hand, foreign exchange rates must rise to a certain level to produce bilateral balance. If the exchange rates are kept below this level, the resulting overvaluation tends to prevent the desired change; pressed far enough, it might leave trade altogether at its old balance or even intensify the former one-sided balance.

This reasoning explains what upon first consideration might appear to have been an anomalous situation. Central European countries chronically incurred *adverse* clearing balances with Western European countries, despite the fact that the trade of the former had regularly shown export surpluses resting upon non-capital items. With the institution of clearings, the overvaluations of the Central European countries changed their former bilateral export surpluses to import surpluses. Had the overvaluing coun-

1. The argument does not apply to *increasing* the disparity between two countries, but this is never an aim of bilateralism so long as its existence rests on a desire to conserve devisen.

2. In the absence, of course, of offsetting direct quantitative limitations upon imports.

tries formerly possessed unfavorable balances, their overvaluations would have permitted this condition to continue to a greater or less degree. Though the unfavorable clearing balances would have *appeared* to be less anomalous, in reality they would have been just as incompatible with the aim of bilateralism as they were in the first case.

A country with overvalued currency relative to bilateral equilibrium always accumulates debts in clearings, unless direct action is taken to interfere with the process. Thus the accumulation of clearing debts or balances exceeding a capital transfer contemplated in the terms of a payment agreement means *per se* that the debtor country's exchange is overvalued in this relation; but the absence of one-sided balances does not *per se* reveal that the exchange-rate conforms to bilateral equilibrium. Only if the exchange rate itself were the only instrument used in controlling trade would this be the case. Tariffs, quotas, import and export prohibitions, and licensing systems can be, and usually are, employed to supplement the exchange rate. If the entire apparatus does not avail to produce the desired forcing of trade away from the channels it takes under economic motives, there are four possible results. The official ratio may be revised to closer approximation to the actual movement of goods. Occasionally clearing agreements provide the steps for taking care of unliquidated balances.¹ Both these results obviously represent sacrificing the contemplated ratio of bilateral trade. The results most compatible with strict adherence to the letter of the law are: (1) the authorities simply close the clearing until the debtors (importers) have paid a levy sufficient to liquidate the balance; or (2) the authorities do nothing at all, and simply allow the interminable delays in payments to exporters to throttle off their efforts to sell. Frequently the central bank has assumed the risk and part of the interest burden of clearing debts, but this again represents a letting down of the bilateral bars. Interruption of trade, the uneconomic application of balances, and risk and interest costs are involved in all methods of coping with one-sided clearing balances. Overvaluation is thus always potentially and must frequently be in fact a net addition to the forces of bilateralism named at the conclusion of Section B as operating additively and cumulatively to decrease the volume and gain of international trade.

1. Cf. Margaret Gordon, op. cit., Ch. VI.

As we approach the concluding topic of this theoretical analysis, it is well to observe that overvaluation under exchange control promotes the growth of monopoly within the controlling country. Free payment countries, such as England, feel precisely the opposite effect from overvaluation: the stimulation of imports exposes domestic producers to more intense foreign competition and tends to disintegrate domestic monopolies. Why is the effect reversed by exchange control? The answer is to be found in the rationing of devisen. Foreign devisen are always "scarce" for an overvalued-currency country under exchange control, because demand exceeds supply at the official price. This gives rise to a margin between costs of importation and domestic prices of imported goods. Windfalls of this sort, as we have seen in the cases of Austria and Hungary, foster monopoly.¹ This fact assumes some significance in subsequent pages.

The argument of Section A on "An Ideal World of Bilateralism" admitted the possibility that the reshuffling of sources of supply and sellers' markets attending the introduction of bilateralism in large segments of the world's trade could increase the intensity of demand for one particular country's products, despite the general downward-balancing tendency of bilateralism as a whole. It is not inconceivable, though scarcely probable, that a particular country should be able to envisage the results of bilateralism upon the demand for its products with sufficient clarity and accuracy to prompt it to foster the spread of bilateralism precisely because of such a gain. In most cases the ramifications of the system would be too complex for such a calculus, and the gain, if it appeared, would come as a pure windfall. But this is a different matter from the possibility of exploiting *given* demand schedules in international trade through monopolistic restriction of supply, either by means of a high rate of exchange or by means of discrimination through a multiplicity of rates. These not only can be but actually have been the objects of rate policy under exchange control.

Let us turn first to a high rate without discrimination. For the sake of formal precision, it may be pointed out that if the high rate is really possible without reducing the total value of exports (price multiplied by volume), the rate is still compatible with price equilibrium. If the State by virtue of its monopoly power over the

1. Cf. Part I (November, 1939), pp. 57, 111, 118-121, 127, 167-168. In Germany, monopoly profits were closely limited by the State.

foreign exchanges under exchange control raises its rate *successfully* from its own angle — increases the total yield of exports — it is *not* overvaluing its currency, but simply obtaining the maximum value. Most writers have expressed the conviction that the elasticity of demand less than unity necessary to this operation is rarely or never found for a nation's exports as whole. In default of empiric verification of this opinion, we may accept it as an *a priori* probability. Statistical study of demand functions is still in its infancy and the complexities would be still greater for an international market. But the State export authorities may, by intuition and experiment, be able to discover elasticities of demand. For a country such as Germany, which exports highly fabricated and rather specialized manufactured products and imports raw materials, the maintenance of a rate above competitive price-equilibrium may be economically profitable from her own angle. The total volume of world trade, of course, shrinks; and, upon the basis of familiar reasoning, the gain to the monopolist will be less than the loss of others. The present state of information concerning international demand does not permit more than these observations.

Discriminating monopoly is another matter; for, whatever the elasticity, if the monopolist can carry through discrimination, he will increase his gains. Needless to say, the presence of a variety of *Sperr* currency categories and a multiplicity of clearings has already separated the buyers into different markets, and it is then only necessary to discover (1) whether the State in question enjoys monopoly advantages with some of these markets at least; and (2) whether intercommunication between the markets is sufficiently imperfect to permit differential prices. Export against émigrés' Marks by Germany clearly fulfills these conditions, and our analysis of German clearings with Southeastern Europe revealed instances of regional monopolies with successful monopoly discrimination.¹ Instances of monopsonistic exploitation were also not lacking; but, in general, monopsony is notably of less frequent occurrence than monopoly.

A sanguine view of the theoretical possibilities of discrimination is not tantamount to the conviction that it is practicable in many cases. To discover the necessary underlying conditions is difficult, and to administer the prices successfully is complicated and uncertain. A danger always exists that unscientific discrimi-

1. Cf. pp. 100-113 above.

nation — charging one particular segment of the market more or less than the optimum price — may end by yielding *less* than a uniform price. Furthermore, small States stand under the jeopardy of foreign retaliations against discriminatory tactics. Hungary very largely gave up the attempt at discrimination by the end of 1935; but discrimination persisted in Germany and nearly all other exchange-control countries in Europe. In many cases it is difficult to determine whether this was by design or by the accident of differing currency depreciations in neighboring countries.

In view of the costs and numerous opportunities for loss set forth in the section upon bilateralism in practice and in the chapters preceding, it would be difficult to assert that even a successful instance of discriminating monopoly through exchange rate has ever covered the economic losses of exchange control even for that country. If occasionally exchange control delivers monopoly gains into the hands of domestic monopolists, the national dividend, augmented from one source, is decreased from another. By a fortunate accident a successfully discriminating country might also experience the windfall gain of an increase in demand schedules for its products, in consequence of the revolution in trade channels when bilateralism makes its advent. Such a combination might outweigh the costs of bilateralism; but if so, it would need to offset the loss of transit trade, of nearly all international exchange of services, and of profitable capital movements, the delays of payment and interruption of trade due to improper clearing rates, the costs of the exchange-control apparatus to the State and to private firms, and finally the economic costs of autarky and totalitarian interference, so far as these institutions are served by exchange control. In all events, discrimination reduces the yield of foreign trade for the other countries. But if it is unsuccessfully managed, or provokes strong retaliations by other nations, it adds to the already formidable array of economic costs for the exchange-control country itself.

D. Exchange Control and Free Systems

1. Is Exchange Control an International Monetary and Trade "System"? Apologists for exchange control in the totalitarian countries confront economists of other lands with a paradox in proclaiming that the institution has created a system of "modern money," on the one hand, and that it discharges the same functions

as the traditional system of free payments, on the other. Certainly one would not be disposed to attempt resolving the paradox by denying the novelty of international payment and trade procedures under exchange control. But it is wise to examine the claim concerning the similarity of functions as it is put forward by these apologists themselves.

The following quotations show the progress of the argument as developed by Dr. Carl-Hermann Müller, Oberregierungsrat in the Reichswirtschaftsministerium, in his Outline of Exchange Control:

"'Free-payment exchange' is a bank clearing. . . . In a State clearing, the Clearing Office takes the place of the Reichsbank. . . . This procedure corresponds completely to the main features of the so-called 'free' international payments." (p. 335.)

"Through clearing the apparatus of international payments is only *technically* altered. . . ." (p. 337; Müller's italics.)

"The clearing Mark . . . cannot be used for third countries and can [be used] only for certain payments to the clearing partner." (p. 339.)

"The most important difference between clearings (including payment agreements) and the former free world trade consists in the fact that freedom of purchase on the cheapest market at any time has been changed to a compulsion to purchase on certain markets." (p. 345; author's italics omitted.)

"Most assuredly the world could arrive at a much higher level of material well-being, if it formed a world economy uniformly oriented to the viewpoint of the cheapest and best production." (p. 346.)

"The way forward leads . . . to new forms of the economic potentiality of trade, which are superior to those of the 'good old times' because they are capable of combining political direction of economic life with easier technical management." (p. 13.)¹

If marginalia may be dispensed with in the case of Müller's argument, they would seem to be unnecessary also for the remarks of the German representative to the Conference on Exchange Control in Geneva, May 12–13, 1939. The representative is reported as saying, in substance at least, if not *verbatim*:

"exchange controls represent a new type of monetary economy." (p. 5.)

"The real difference existing between the two systems is that in one there is the influence of the government in balancing the clearings and in the other the influence of the private entrepreneur in doing the same thing." (p. 9.)

"In a 'free' country, the entrepreneur himself discriminates as to price or other conditions. . . . The only difference really is that in Germany discrimination is official and in other countries it is private." (p. 8.)

1. C. H. Müller, *Grundriss der Devisenbewirtschaftung*, 2d ed. (Berlin, Vienna, 1939).

"it is impossible to make any sort of international cost calculations if the prices are established by the exchange control offices of two or more States. In these prices fixed by these offices it is impossible to separate the two essential elements of this calculation: (1) the price, and (2) the rate of exchange." (p. 4.)¹

In his extensive memorandum on exchange control written for the International Institute of Intellectual Coöperation, Dr. Fritz Meyer holds that a bilateral system, complemented by premia for "additional" exports and export subsidies, leads to the same international adjustments as the traditional gold standard.² And yet he ventures the cautious suggestion — for what reason it does not appear — that arrangements should be made for the multilateral settlement of clearing balances.³ He dwells upon the benefits accruing to foreigners from the "fact" that Germany exports in order to import, and contrasts the German policy with that of other countries which are anxious to export but lack the incentive of an "autonomous economic policy" to stimulate imports.⁴ He seems to forget that in 1937 German imports were only three per cent higher than in 1932 and were 59 per cent lower than in 1929.

Finally we may well consider the question whether exchange control does or does not permit trade to move in accord with comparative costs. Cabiati appears to answer this question affirmatively,⁵ and Tasca⁶ negatively; but in fact the answers accord perfectly. Cabiati is concerned with establishing, contrary to the pretenses of exchange-control apologists, that, within the limits imposed by bilateralism, trade still responds to a profit-and-loss calculus; that "economic law" is not wholly superseded by "modern monetary systems." Tasca, on the other hand, emphasizes the fact that the very existence of bilateralism relegates to the discard the previously existing system of comparative costs established by more or less free competition, substituting therefor a regime of

1. Geneva Research Centre, Provisional Record of the Conference on Exchange Control, Geneva, May 12–13, 1939, mimeographed (Geneva, May 22, 1939).

2. Fritz Meyer, "Devisenbewirtschaftung als neue Währungsform," *Weltwirtschaftliches Archiv*, Vol. 49, No. 1 (May, 1939), p. 466.

3. *Ibid.*, p. 468.

4. *Ibid.*, pp. 467–468.

5. Attilio Cabiati, *Fisiologia e Patologia Economica negli Scambi della Ricchezza fra gli Stati* (Turin, 1936). I am indebted to Dr. Gerschenkron for reading this book.

6. Tasca, *op. cit.*, pp. 159–160.

costs which have resulted from the arbitrary actions of authority. That exchange control is a "system" no one would deny. But is it in any sense of the word an economic "system"? Walking backward is undoubtedly a "system" of locomotion.

(2) Are Exchange-Control and Free Systems Compatible? As exchange-control and other forms of State interference have increased during the past decade,¹ this question has become more and more serious for economists outside the totalitarian countries. Some have inclined to greater optimism,² others to greater pessimism.³ The answer is really one of degree or preponderance: at either limit, the "other" system becomes impossible. In the case of exchange control this can be seen clearly by considering each one of its main elements in turn. If all the world but one (small) country places embargoes on the export and import of capital, the remaining country cannot maintain a free international capital market; but if only one (small) country decrees embargoes, the international capital market is essentially free. If all the world but one (small) country artificially raises exchange rates, the effects may largely cancel out amongst them, and the one (small) country is automatically a country of undervalued currency; but if one (small) country overvalues its currency, there is virtually no effect on the rest of the world. If all the world but one country imposes bilateral balancing, the remaining country's trade is bilaterally balanced; and one country's bilateralism in isolation cannot impose complete bilateralism upon any other country. If all the countries of the world but one regulate the composition and direction of their exports and imports, the remaining country has its foreign trade regulated for it; but the regulation of one (small) country affects the trade of the world as a whole but little. Between these limits, it is simply a matter of more and less.

While this way of envisaging the matter is unexceptionable, it

1. The percentage of imports covered by license or quota restrictions in 1937 for a number of countries follows: France, 58; Switzerland, 52; Netherlands, 26; Belgium, 24; Ireland, 17; Norway, 12; United Kingdom, 8; Sweden, 3; from League of Nations, *World Economic Survey, 1938-1939* (Geneva, 1939), p. 189.

2. E.g. Staley, *op. cit.*, Ch. X, "Problems of the 'Mixed' Economy."

3. E.g. Tasca, *op. cit.*, Ch. XIII, "Systems of Commercial Policy: The Problems of Rapprochement"; Haberler, *op. cit.*, Question III, "Is a Commercial System Economically and Legally Possible which shall guide Exchange between economically and politically predominantly Liberal and Interventionist States?"

may by implication present too favorable a view of the chances of free international payments for survival; for a small amount of regulation can overbalance a great deal of freedom. Thus if one country "freezes" the sums within its economy owing to foreigners, the governments of the creditors have no recourse — if there is to be any assurance of payment on *current* account — but to adopt a like measure. A very small country can force bilateral clearing for its mutual trade upon a very large country in just this fashion. A second reason for the superior force of regulation is its concentration in the hands of the State, whereas traders under the free system stand "naked and alone." Thirdly, as bilateralism spreads and foreign qualitative controls become more numerous, the economic data (costs, selling prices, foreign exchange rates) become less and less truly economic, and the ground is cut from beneath a system of free enterprise,¹ to a larger degree, it may be observed, than the mere loss of free-enterprise areas in a geographic sense.

For a number of years, and particularly in the most recent times, it has appeared that the question of compatibility is being resolved upon another plane than that of contrasting national economies. The growth of economic *blocs*, well confirmed statistically for international trade,² spells the perpetuation of exchange control and other forms of regulation between *blocs*, and very probably also the reduction of control between countries within each *bloc*. Whether the end effect upon the gain of international trade in these circumstances will be a rise or decline cannot be predicted, since it depends equally upon the severity of *inter-bloc* obstacles to trade and the liberality of treatment accorded to *intra-bloc* trade. There is furthermore the possibility of discriminatory measures as amongst *blocs*. If other *blocs* than that of the United States happen to be more or less *en rapport*, the observations made upon the rôle of a "small" country may be pertinent even to this large area.

1. Cf. Folke Hilgerdt, "The Approach to Bilateralism — A Change in the Structure of World Trade," *Index*, Vol. X:8, No. 116, pp. 175-188.

2. Cf. League of Nations, *op. cit.*, p. 186. Between 1929 and 1938 the trade of the British Empire within itself as a percentage of its total trade underwent the following changes: for imports, from 30 to 42 per cent; for exports, 44 to 50 per cent. Corresponding figures for certain other countries are: for France, imports from 21 to 27 per cent, exports from 19 to 27.5 per cent; for Japan (Korea, Formosa, Kwangtung, Manchuria), imports from 20 to 41 per cent, exports from 24 to 55 per cent; for Germany (six countries of South-eastern Europe), imports from 4.5 to 12 per cent, exports from five to 13 per cent.

As the term is generally understood, "economic" describes the processes involved in maximizing utility from available resources. Liberal economists and contemporary socialist economists agree that this maximization is reached by the *free* choice of consumers as to their outlays on final products and by the transmission of these choices to the use of resources through the *competitive* bidding of producers, whether or not the producers are also owners. Exchange control in its contemporary form cannot be described as conforming to this test of what is economic. It is undoubtedly an instrument of control. But there is one question, which, if it ever comes to be seriously considered by the populace of exchange-control countries and economic *blocs*, will terminate both exchange-control and economic *blocs*. The question is an old one: *Quis custodiet?*