Second District "Country" Member Banks and the Federal Funds Market*

The national market for commercial bank balances at the Federal Reserve Banks—better known as "the Federal funds market"—has grown steadily in the past decade.[1] Available data suggest that the typical daily volume of sales in the market has more than tripled since late 1956, to perhaps as much as $3 billion in early 1966. Until the last two or three years, the bulk of market activity was accounted for by relatively few large banks. Since then, however, an increasing number of smaller banks appear to have entered the market. Inasmuch as these institutions hold the greater part of the banking system's excess reserves, their role has been most often as sellers, although to some extent they have also acted as purchasers. An over-all indication of the broadening participation in the Federal funds market by smaller banks—at least on the selling side—is suggested by the increase in the net sale of funds to the forty-six large banks included in the Federal Reserve Board's Federal funds series by the rest of the commercial banking system. On a daily average basis, these sales rose from about $250 million in late 1959 to some $500 million in 1962 and to over $1 billion in early 1966.[2] In addition, specific evidence of wider "country" bank participation in the Federal funds market can be found in studies and reports by several Federal Reserve Banks.[3]

A survey of country banks in the Second Federal Reserve District taken recently by this Bank indicates that the nationwide trend toward more widespread country bank participation has also been evident among banks in this District. This article summarizes the main findings of the survey.

INCREASED ENTRY OF COUNTRY BANKS INTO THE FEDERAL FUNDS MARKET

In November 1965, the Federal Reserve Bank of New York sent questionnaires to each of the nearly 400 country member banks in the Second Federal Reserve District requesting information on the extent of their participation in the Federal funds market, the trading channels used, the size of the trading unit, and the effects of participation on these banks' reserve adjustment practices. Responses were received from about 98 per cent of the District's country banks. In addition, interviews were held with officers responsible for managing the reserve positions in twenty respondent banks, selected at random.

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1 A distinguishing feature of Federal funds—and one which has largely accounted for their increasing use as a medium for settling financial transactions—is their immediate availability. That is to say, in contrast to clearing house funds which are credited to member banks' accounts at a Reserve Bank only after one business day, banks acquiring Federal funds from other banks receive an immediate credit. Transactions in the Federal funds market in effect consist of the borrowing or lending of these balances, for one business day, at a specified rate of interest. In market terminology, however, such transactions are generally referred to as "purchases" or "sales" of Federal funds. For detailed accounts of the structure and workings of the Federal funds market, see *The Federal Funds Market*, Board of Governors of the Federal Reserve System (May 1959); Dorothy M. Nichols, *Trading in Federal Funds*, Board of Governors of the Federal Reserve System (September 1965); and Parker B. Willis, *The Federal Funds Market*, Federal Reserve Bank of Boston (October 1964).

2 Net sales as used here are calculated as the differences between gross purchases and gross sales reported by the forty-six banks. The resulting amount represents funds that the reporting banks on balance obtained from the nonreporting banks. Data on these transactions are published regularly in the *Federal Reserve Bulletin*. For a detailed discussion of the series, see "New Series on Federal Funds", *Federal Reserve Bulletin* (August 1964).

3 For example, see Jack C. Rothwell, "Federal Funds and the Profits Squeeze—A New Awareness at Country Banks", *Business Review*, Federal Reserve Bank of Philadelphia (March 1965), pp. 3-11, and Dorothy M. Nichols, "Marketing Money: How 'Smaller' Banks Buy and Sell Federal Funds", *Business Conditions*, Federal Reserve Bank of Chicago (August 1965), pp. 8-12.

The survey clearly points to a substantial amount of participation in the Federal funds market by Second District country member banks, with nearly half of these banks reporting at least occasional trading in Federal funds as of late 1965 (see Table I).

As might be expected, the proportion of participating banks was much higher in the larger deposit size-groups. All responding banks in the $100 million and over deposit category participated in the market, as did four fifths of banks in the $25 million to $100 million category. Nevertheless, over 30 per cent of the respondent banks with deposits under $25 million reported some trading activity. Moreover—and perhaps most significantly—the entry of smaller banks into the market appears to have begun fairly recently and to be spreading rapidly (see Table II). While only three of the respondent banks which currently have less than $25 million in total deposits were participating in the market in 1960, the number reached seventy-nine by 1965, with the greatest part of the increase occurring in the last two years. All the participating banks with less than $5 million in deposits first traded Federal funds during 1965, and nearly all the institutions in the $5 million to $10 million deposit size-group entered the market in either 1964 or 1965. In contrast, three quarters of the participating banks presently in the over $100 million deposit group had participated in the market prior to 1960.

Second District country member banks as a group entered the Federal funds market more often as sellers than as buyers—a characteristic that is in accord with the fact that country banks are known to hold relatively high levels of excess reserves. Indeed, most of the participating banks in this District with less than $10 million in total deposits entered the market only as sellers (see Table III). The number of participating banks in the intermediate-size range, $10 million to $25 million in deposits, was divided fairly evenly between banks that just sold funds and banks that acted both as buyers and sellers, while most banks with deposits of $25 million or more traded at various times on both sides of the market. Even among the banks that both sold and purchased funds, however, the frequency of transactions on the selling side generally was substantially greater than on the purchasing side. On average, all participating banks sold funds nine days a month during 1965, and purchased funds only three days per month.

The banks were asked to indicate in which months of the year their most frequent participation in the market occurred. The replies tended to divide about equally among the twelve months. A few banks reported shifts from periods of daily funds sales to periods of continuous purchases, and vice versa.

Table I

DISTRIBUTION OF RESPONDENT BANKS BY SIZE AND PARTICIPATION IN THE FEDERAL FUNDS MARKET, 1965

Deposit size	Respondent banks		Banks participating in the market	
Millions of dollars	Number	Percentage of total	Number	Percentage of respondents
Under 5	84	22	14	17
5 to under 10	78	20	19	24
10 to under 25	99	26	46	46
25 to under 100	74	19	59	80
100 and over	51	13	51	100
Total	386	100	189	49

Table II

NUMBER OF BANKS PARTICIPATING IN THE FEDERAL FUNDS MARKET*

Deposit size	Years						
Millions of dollars	Prior to 1960	1960	1961	1962	1963	1964	1965
Under 5	—	—	—	—	—	—	14
5 to under 10	—	—	—	—	1	7	19
10 to under 25	2	3	7	10	19	35	46
25 to under 100	18	22	30	38	43	50	59
100 and over	39	43	44	48	50	50	51
Total	59	68	81	96	113	142	189

* Banks are included in the above table in the year of their initial entry into the market and for all subsequent years, whether or not they have participated in each of those years. Almost all banks, however, participated in every year following their initial entry.

Table III

DISTRIBUTION OF PARTICIPATING BANKS BY SIDE OF MARKET, 1965

Deposit size	Sellers only		Buyers only		Both buyers and sellers	
Millions of dollars	Number	Per cent	Number	Per cent	Number	Per cent
Under 5	9	64	2	14	3	21
5 to under 10	15	79	1	5	3	16
10 to under 25	22	48	4	9	20	43
25 to under 100	14	24	3	5	42	71
100 and over	2	4	—	—	49	96
Total	62	33	10	5	117	62

Note: Because of rounding, percentages may not add across to 100 per cent.

THE ROLE OF CORRESPONDENT RELATIONSHIPS

The forces underlying the increased participation by smaller banks in the Federal funds market have been present for some time. Perhaps most significant among these has been the generally rising trend of short-term interest rates over much of the postwar period. This development—combined with increasing banking costs—has prompted banks to keep nonearning excess reserves at a minimum, while at the same time inducing many of the larger city banks to increase borrowing in the funds market to facilitate the maintenance of positions in relatively high-yielding assets.

Until recently, however, these influences had only a limited impact on the smaller country banks' activity in the market. In many instances, insufficient knowledge of the opportunities presented by the Federal funds market inhibited their participation. Moreover, the magnitude of the usual unit of transaction—$1 million—largely precluded entrance into the market by the smaller banks. This is a larger amount than most of these banks would have available for sale in the market or, on the other hand, would require for temporary reserve adjustment. Some trading at times took place in lesser amounts but, until quite recently, the large money center banks and brokers in Federal funds that form the nucleus of the Federal funds market were not particularly anxious to deal in such amounts, and indeed seldom bothered with transactions of less than $500,000.[4]

In the more recent past, these impediments to country bank participation in the Federal funds market have been reduced by the efforts of the larger city banks to tap the excess reserves of these smaller institutions. With this end in view, the city banks—operating through their correspondent relationships—have spread information about the Federal funds market and enhanced the attractiveness of participation by providing the smaller banks with a convenient and relatively certain outlet or source for the sale and purchase of funds. Moreover, in order to accommodate their correspondents, they have been willing to trade funds in smaller units than in earlier years.

The part played by the larger banks in introducing their correspondents to the market emerged clearly in the interviews with the country bankers. According to these bankers, once a country bank began to trade in the market, individual funds transactions were almost invariably initiated by that bank; nevertheless, the first entry in the market was often the result of advice and encouragement on the part of a city correspondent.

TRADING CHANNELS AND UNIT SIZE OF TRANSACTIONS

The continuing role of the correspondent relationship was reflected both in the channels of trading used by Second District country banks and in the unit size of trading. The survey revealed that most of Second District country bank transactions in the Federal funds market—both on the sale and the purchase side—were conducted with their city correspondents (see Table IV). Interviewed bankers based their preference for trading with correspondents partly on the rapport existing between the country bank and its correspondent, resulting from years of satisfactory relations, as well as on the familiarity of the city bank with the smaller institution's financial resources and needs. The convenience to country banks, particularly the smallest institutions, of trading with correspondents appeared to be significantly enhanced by the willingness of the larger city banks to accommodate them on either the selling or buying side of the market as required, and without regard to the current reserve needs of the larger institutions themselves.

This desire on the part of the city correspondent banks to accommodate the trading needs of the country banks has also been reflected in the significant number of transactions that now take place in units involving less than

Table IV

DISTRIBUTION OF PARTICIPATING BANKS BY FEDERAL FUNDS TRADING CHANNELS, 1965

Deposit size	Number of banks	Trading channels*		
		Correspondents	Brokers	Others
Millions of dollars		Per cent		
Under 5	14	86	—	14
5 to under 10	19	95	5	—
10 to under 25	46	100	2	2
25 to under 100	59	97	8	2
100 and over	51	92	35	10
All participating banks	189	95	13	5

* Since some respondents used more than one type of intermediary, the totals across may exceed 100 per cent.

[4] See Howard D. Crosse, *Management Policies for Commercial Banks* (Englewood Cliffs: Prentice Hall Inc., 1962), p. 128.

$1 million (see Table V). Federal funds brokers, it may be noted, still prefer to deal in units of $1 million or more.

Most transactions in the funds market nevertheless do involve units of $200,000 or more. Some of the smaller banks are often able to sell such relatively large units at one time only by accumulating excess reserves up to the closing days of their biweekly reserve averaging period, and then drawing down the reserve balances, sometimes below their reserve requirements, with the resulting modest deficiency offsetting the previously accumulated excess. While this practice permits the profitable employment of potentially idle resources, it is subject to some constraint. Notably, a member bank is not permitted to overdraw its reserve balances at its Federal Reserve Bank, and should not deliberately incur large daily deficits.

EFFECTS ON RESERVE ADJUSTMENT PROCEDURES

Nearly all the surveyed banks participating in the market reported that their trading activity in Federal funds has been accompanied by a reduction in their average holdings of excess reserves—although the bankers that were interviewed generally could not estimate the magnitude of the decline traceable to participation in the market. One hundred and sixteen banks (over 60 per cent of the total participating) specified that a reduction in excess reserves has been the single most important effect of their activity in the Federal funds market on their reserve management practices (see Table VI). A majority of banks also indicated that trading in funds has reduced their reliance on purchases or sales of Treasury bills and other money market instruments as a means of reserve adjustment. Seventeen per cent of the respondent banks singled out this development as the most important result of their participation.[5]

In elaborating on the changes in reserve adjustment practices resulting from their Federal funds activity, most of the country bankers interviewed felt that purchases and sales of Treasury bills and similar instruments were inappropriate for putting idle resources to work for short periods—such as within the two-week settlement period —or for making up temporary reserve deficiencies. The reluctance to purchase or sell bills for short-term reserve adjustments was based primarily on the inconvenience to country banks of trading these instruments. Some concern was also expressed, however, over transfer costs and possible losses resulting from declines in market prices. According to several bankers, the reluctance to keep liquid reserves in the form of Treasury bills had previously led them to maintain excess reserves at a higher level than they have found desirable since they began to use the Federal funds market as a convenient and flexible outlet

Table V

SIZE OF FEDERAL FUNDS TRANSACTIONS*

Deposit size	Sales		Purchases	
	Median	Range	Median	Range
Millions of dollars	Thousands of dollars			
Under 5	225	50- 400	225	150- 750
5 to under 10	300	50- 1,100	675	350- 1,000
10 to under 25	600	60- 4,000	500	150- 1,000
25 to under 100	1,000	300- 5,000	1,000	400- 3,000
100 and over	3,000	500-20,000	3,000	300-15,000
All participating banks	1,000	50-20,000	1,250	150-15,000

* The respondent banks reported their average-transactions size during 1965. This table presents the medians and the ranges of these reported averages.

Table VI

EFFECTS OF FEDERAL FUNDS ACTIVITY ON RESERVE ADJUSTMENT PRACTICES

Type of effect	Number of participating banks according to their ranking of effects*				
	First	Second	Third	Fourth	Fifth
Reduction in excess reserves	116	42	10	2	0
Reduction in the use of Treasury bills and other short-term instruments	33	85	26	8	0
Reduction in borrowings from the Federal Reserve	28	27	38	8	0
Reduction in borrowings from other banks (other than Federal funds transactions)	1	6	19	16	0
Other	11	5	6	3	1

* Columns and rows may not add to 189, the total number of participating banks, since many banks ranked fewer than five effects.

[5] Among other effects of Federal funds activity noted by respondent banks were reduced borrowings from the Federal Reserve and borrowings from banks other than through the Federal funds market. These results, however, were generally considered by the banks to be of substantially less importance than the reduction in excess reserves or the use of Treasury bills.

for idle funds. Similarly, banks that did employ Treasury bills and other short-term instruments as secondary reserves have tended to substitute Federal funds sales for such short-term investments since their entry into this market.

The country banks thus clearly prefer Federal funds sales to holdings of Treasury bills as a short-term investment. This is particularly true for the smaller banks, which often indicated during the interviews that "moderate" differentials in interest rates in favor of Treasury bills would not induce them to substitute such instruments for Federal funds sales. Larger country banks also were reluctant to substitute bills for funds, although they expressed a greater sensitivity to rate differentials in choosing among short-term investment outlets.

CONCLUDING COMMENTS

The Federal funds market has filled an important gap in the array of money market instruments available for the investment of idle reserve balances. Its development reflects the increasing attention being given throughout the economy to the efficient utilization of financial resources—even for very short periods of time—resulting in good part from the relatively large loss of interest earnings involved in holding idle balances. For country banks in particular, access to the Federal funds market has enabled these banks to put otherwise idle funds to profitable use. It has also brought the country banks into closer touch with the centers of financial activity, thereby promoting a more integrated financial system.