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Volume Title: Financing Inventory on Field Warehouse Receipts

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Volume Publisher: NBER

Volume ISBN: 0-870-14134-1

Volume URL: <http://www.nber.org/books/jaco44-1>

Publication Date: 1944

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Chapter URL: <http://www.nber.org/chapters/c4020>

Chapter pages in book: (p. 42 - 60)

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Bank Lending on Field Warehouse Receipts

IT HAS ALREADY BEEN OBSERVED that field warehouse receipts are chiefly used as collateral for loans made by commercial banks; banks lend against the receipts of nine out of every ten field warehouses.¹

How many of the 13,500 American commercial banks regularly make loans on this basis? How important are field warehouse receipt loans among all the loans of commercial banks? What kinds of banks—in terms of deposit size, geographical location and population of the center in which they are located—extend credit against the collateral security of field warehouse receipts? What are the financial characteristics of business enterprises borrowing from commercial banks on this basis?

Frequency of Bank Lending on Field Warehouse Receipts

About 13 percent of the 13,500 operating insured commercial banks in the United States regularly finance business concerns through loans secured by field warehouse receipts. At the middle of 1941 approximately 1,700 banks appear to have extended such credits. Field warehouse receipt financing is therefore not uncommon as a banking operation, but it is not employed as frequently as term lending to business, in which about 22 percent of all commercial banks are engaged. Neither is it used as frequently as accounts receivable financing, which is estimated to be a regular practice of about 25 percent of all commercial banks.² Yet it is probable that considerably more than 13 percent of all American

¹ This section is based upon an analysis of data collected through a questionnaire circulated about June 30, 1941 among a random sample of commercial banks. See Appendix A.

² See National Bureau of Economic Research (Financial Research Program), *Term Lending to Business*, by Neil H. Jacoby and R. J. Saulnier (1942) p. 33, and *Accounts Receivable Financing*, by R. J. Saulnier and Neil H. Jacoby (1943) p. 54.

commercial banks make *occasional* loans collaterally secured by field warehouse receipts.

Table 6 indicates that the relative frequency with which banks engage in field warehouse receipt financing increases steadily with the population of the center in which the bank is located. Only 10

Table 6—ESTIMATED NUMBER OF COMMERCIAL BANKS REGULARLY ENGAGING IN FIELD WAREHOUSE RECEIPT FINANCING, AT MID-1941, BY SIZE OF POPULATION CENTER ^a

Size of Center of Population ^b	Banks in Sample		Total Number of Commer- cial Banks ^c	Estimated Num- ber of Banks Engaged in Re- ceipt Financing
	Number	Regularly Engaged in Receipt Financing		
Less than 10,000	130	10.0%	10,991	1,099
10,000-50,000	80	16.3	1,520	248
50,000-100,000	41	29.3	292	86
100,000-500,000	85	42.4	479	203
500,000 and over	51	43.1	210	91
TOTAL	387	24.8%	13,492	1,727

^a Based upon data obtained from a sample of commercial banks. See Appendix A for a description of the sample.

^b Each size class is inclusive of the lower limit and exclusive of the upper.

^c Operating insured commercial banks listed by Federal Deposit Insurance Corporation as of June 29, 1940.

percent of banks in centers containing less than 10,000 population do such financing, while more than 43 percent of the banks in the largest cities (populations of 500,000 or more) make such loans.

Relative Importance of Field Warehouse Receipt Financing

It appears that at the middle of 1941 field warehouse receipt loans may have comprised about .8 percent of all loans and discounts held by American commercial banks. (See Table 7.) The aggregate outstanding amount of such loans is estimated at about \$130 million at mid-1941, based upon returns received from a sample of commercial banks of all deposit sizes, located in all geographical regions and in cities of different sizes.

Large banks tend to hold slightly larger amounts of field warehouse receipt loans in relation to their total loans than do smaller banks although there is a striking similarity in the relative impor-

Table 7—ESTIMATED FIELD WAREHOUSE RECEIPT LOANS HELD BY ALL INSURED COMMERCIAL BANKS, AT MID-1941, BY DEPOSIT SIZE OF BANK ^a (dollar figures in thousands)

Deposit Size of Bank ^b	Banks in Sample		All Insured Commercial Banks		
	Field Warehouse Receipt Loans Held	Total Loans and Discounts ^c	Warehouse Loans as a % of Total Loans and Discounts	Total Loans and Discounts ^d	Estimated Field Warehouse Receipt Loans
\$5,000 or less	\$1,274	\$37,320	.71%	\$4,827,719	\$34,277
5,000-10,000	677	35,068	.69	1,266,521	8,739
10,000-50,000	3,392	251,026	.77	2,661,226	20,491
Over 50,000	15,502	1,306,295	.80	8,281,876	66,255
TOTAL	\$20,845	\$1,629,709	.79%	\$17,037,342	\$129,762

^a Based upon data obtained from a sample of commercial banks. For a description of the sample, see Appendix A.

^b Each size class is inclusive of the lower limit and exclusive of the upper.

^c Reported to Federal Deposit Insurance Corporation as of December 31, 1940.

^d Book value of total loans and discounts reported to Federal Deposit Insurance Corporation as of end of 1940. From Federal Deposit Insurance Corporation, *Annual Report for 1940*, p. 171.

tance of such loans in banks of all sizes. For banks with total deposits of more than \$50 million, such loans composed .8 percent of total loans and discounts. The proportion between field warehouse receipt loans and total loans was somewhat smaller for banks of smaller size, down to very small institutions with deposits of under \$5 million. Field warehouse receipt loans were about $\frac{3}{4}$ of 1 percent of the loans of these smaller institutions.

It should be noted that while field warehouse receipt loans were estimated to comprise only .8 percent of total loans and discounts, they formed no less than 2 percent of "commercial and industrial" loans of all commercial banks. The latter classification of bank credit measures credit extended to business enterprises more closely than does "total loans and discounts" because it excludes real estate loans, personal loans, loans against securities, and other non-business credits. Field warehouse receipt loans thus ranked far below term loans in their importance among all bank loans to business, being only about one-fifteenth as large as the 12 percent recorded for term loans at mid-1941.³ It has previously been observed that these loans were also less important quantitatively than loans against the security of accounts receivable⁴ and that they were likewise less important than instalment equipment credits.⁵

Further light is shed on the place of field warehouse receipt loans in all commercial bank assets by the figures in Table 8. In this table the total number and amount of such loans reported have been distributed according to the percentage of field warehouse receipt loans to total loans and discounts. The data indicate that nearly two-thirds of the total amount of such loans were made by institutions in whose loan and discount portfolios they comprised from 1.5 to 4 percent. Only in a very small percentage of banks did field warehouse receipt credits amount to over 10 percent of loans and discounts, and in only about 15 percent of commercial banks did they comprise more than 5 percent. There is no evidence of any normal or maximum ratio that field warehouse receipt loans tend to bear to the total loans and discounts

³ See Jacoby and Saulnier, *Term Lending to Business*, p. 96.

⁴ See Saulnier and Jacoby, *Accounts Receivable Financing*, p. 56.

⁵ See National Bureau of Economic Research (Financial Research Program), *Financing Equipment for Commercial and Industrial Enterprise*, by R. J. Saulnier and Neil H. Jacoby (1943).

Table 8—FIELD WAREHOUSE RECEIPT LOANS HELD BY A SAMPLE OF COMMERCIAL BANKS, AT MID-1941, BY PERCENTAGE OF FIELD WAREHOUSE RECEIPT LOANS TO TOTAL LOANS AND DISCOUNTS^a

Classification of Banks by Ratio of FWR Loans to Total Loans & Discounts ^b	Banks Making FWR Loans		Field Warehouse Receipt Loans Held		Total Loans and Discounts of Reporting Banks	
	Number	Percent	Amount (000)	Percent	Amount (000)	Percent
Under .5%	17	18.1%	\$1,948	9.3%	\$771,822	47.5%
.5-1.0	16	17.0	951	4.6	136,875	8.4
1.0-1.5	8	8.5	820	3.9	71,419	4.4
1.5-2.0	10	10.7	3,170	15.3	204,040	12.5
2.0-2.5	6	6.4	2,529	12.1	113,019	6.9
2.5-3.0	8	8.5	3,218	15.5	121,134	7.4
3.0-4.0	11	11.7	4,883	23.4	148,935	9.1
4.0-5.0	5	5.3	1,594	7.6	35,879	2.2
5.0-10.0	10	10.6	1,377	6.6	23,962	1.5
10.0 and over	3	3.2	355	1.7	2,624	.1
TOTAL	94	100.0%	\$20,845	100.0%	\$1,629,709	100.0%

^a For a description of the sample, see Appendix A.

^b Each size class is inclusive of the lower limit and exclusive of the upper.

of commercial banks. It appears probable that a sufficiently large market for this type of business credit has not presented itself to commercial banks to cause them to set up, as a matter of policy, any limits on the aggregate amount of credit to be extended on this basis.

It should be observed that more than half of all loans and discounts in the sample under study were held by banks in which field warehousing credits were less than 1 percent of total loans and discounts.

Geographical Differences in Bank Lending on Field Warehouse Receipts

Data presented in Table 9 indicate that field warehouse receipt financing is done with specially high frequency by banks in the East South Central and Pacific regions, with average frequency in the New England, East North Central, West South Central and Mountain states, and with less than the average frequency in the Middle Atlantic, West North Central and South Atlantic states. These conclusions may be inferred from the percentages of all banks in these respective regions that reported regular making of business loans secured by field warehouse receipts. While these observations are based upon comparatively few banks, they find confirmation in the information previously presented on the geographical distribution of field warehouses, in the economic and industrial character of the major geographical divisions of the nation, and in the historical facts concerning the geographical development of field warehousing from west to east. The importance of the lumbering and canning industries in the Pacific states—both prolific sources of field warehouses—adequately explains the fact that over one-half of the commercial banks in this area indicated that they made loans collateralized by field warehouse receipts. The cotton and distilling industries are important sources of field warehousing in the East South Central region.

Banks in the Pacific states also lead in the number of business concerns financed per bank through the field warehouse device.⁶ Nevertheless, banks engaging in this business in the East North

⁶ Since there is state-wide branch banking in California and the schedules submitted covered all units of each institution, comparisons of banks in this state with unit banking states are not possible without qualification.

Table 9—FIELD WAREHOUSE RECEIPT LOANS HELD BY A SAMPLE OF COMMERCIAL BANKS, AT MID-1941, BY REGION ^a

Region	Banks Not Engaged in Receipt Financing		Banks Engaged in Receipt Financing		Number of Concerns Financed	Field Warehouse Receipt Loans Outstanding		Percentage Distribution of Total Loans and Discounts of All Insured Commercial Banks ^b
	Number	Percent	Number	Percent		Amount (000)	Percent	
New England	16		7	30.4%	14	\$803	3.8%	7.0%
Middle Atlantic	70		12	14.6	54	1,539	7.4	36.4
East North Central	70		29	29.3	185	7,605	36.5	16.8
West North Central	50		12	19.3	73	2,171	10.4	8.7
South Atlantic	40		10	20.0	65	2,626	12.6	8.0
East South Central	9		7	43.7	24	663	3.2	3.8
West South Central	20		6	23.1	26	810	3.9	5.2
Mountain	11		4	26.7	7	170	.8	1.9
Pacific	5		7	58.3	74	4,458	21.4	12.2
TOTAL	291		94	24.4%	522	\$20,845	100.0%	100.0%

^a For a description of the sample, see Appendix A.

^b Based on Federal Deposit Insurance Corporation, *Annual Report for 1940*, pp. 178-79.

Central region also tended to serve comparatively large numbers of customers per institution.

Table 9 indicates the importance of regional differences in field warehouse receipt lending. While possessing only 12 percent of the nation's total loans and discounts, reporting banks in the Pacific region accounted for over 21 percent of field warehouse receipt loans. Similarly, banks in the East North Central region possessed less than 17 percent of all loans and discounts in the United States, but reporting banks in that area accounted for more than 36 percent of field warehouse receipt loans. Banks in the New England and Middle Atlantic regions held far smaller total amounts of field warehouse receipt loans than the volume of their loans and discounts of all kinds would lead one to expect. It may be concluded that the ability of a commercial bank to develop field warehouse receipt financing depends to an important degree on the economic character of its territory.

Field Warehouse Receipt Financing by Banks of Different Sizes

Although great unevenness in the amount of deposits or assets held by individual institutions is a well-known characteristic of American commercial banking, there is an even greater degree of concentration of field warehouse receipt financing. The figures appearing in Table 10 confirm the inference to be drawn from Table 7 by indicating clearly that loans collateralized by field warehouse receipts are held predominantly by large banks. Moreover, large institutions tend much more frequently to engage in this type of financing than do small ones, and they possess, on the average, a much larger number of clients per bank receiving credit on this basis. (See also Chart 2.)

While something less than one out of each four commercial banks in the sample lent against field warehouse receipts, less than one out of every twenty institutions with deposits under \$500,000 did so. Nearly three out of each four banks with deposits of \$50 million or over were engaged in this type of financing. There is evident a steady increase in the frequency with which banks engaged in this business financing operation, from the smaller to the larger agencies. The banks that engage in such lending with average frequency fall in the \$2 million to \$10 million deposit size class. It may be said with some confidence that there is a

Table 10—FIELD WAREHOUSE RECEIPT LOANS HELD BY A SAMPLE OF COMMERCIAL BANKS, AT MID-1941, BY DEPOSIT SIZE OF BANK^a

Deposit Size of Bank ^b (000)	Banks Not Engaged in Receipt Financing		Banks Engaged in Receipt Financing		Number of Concerns Financed	Field Warehouse Receipt Loans Outstanding		Percentage Distribution of Total Loans and Dis- counts of All Insured Commercial Banks ^c
	Number	Percent	Number	Percent		Amount (000)	Percent	
\$500 or less	65		3	4.4%	3	\$43	.2%	4.8%
500-1,000	43		4	8.5	5	58	.3	5.9
1,000-2,000	50		9	15.3	21	334	1.6	7.5
2,000-5,000	61		18	22.8	52	839	4.0	10.1
5,000-10,000	30		11	26.8	25	677	3.2	7.4
10,000-50,000	33		25	43.1	96	3,392	16.3	15.6
Over \$50,000	9		24	72.7	320	15,502	74.4	48.7
TOTAL	291		94	24.4%	522	\$20,845	100.0%	100.0%

^a For a description of the sample, see Appendix A.

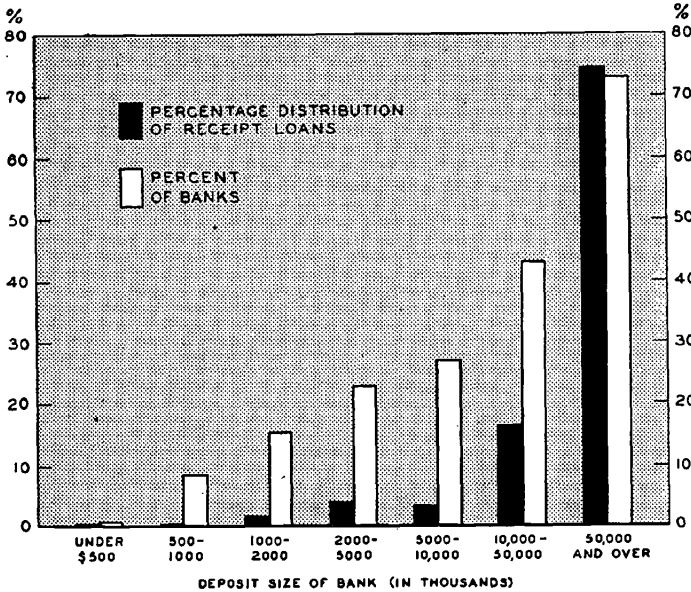
^b Each size class is inclusive of the lower limit and exclusive of the upper.

^c Based on Federal Deposit Insurance Corporation, *Annual Report for 1940*, pp. 170-71.

small probability that a bank with less than \$1 million deposits does this business, while there is a large probability that a bank with deposits of more than \$50 million engages in it.

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PERCENTAGE DISTRIBUTION OF FIELD WAREHOUSE RECEIPT LOANS BY SIZE OF BANK AND PERCENT OF BANKS IN EACH SIZE CLASS MAKING SUCH LOANS[ⓐ]



[ⓐ] BASED ON A SAMPLE STUDY. FOR DATA, SEE TABLE 10.

Another observation of interest is that the larger institutions possess, on the average, a much larger number of clients being financed by field warehouse receipt loans than do smaller banks. Banks in the \$50 million-and-over size class had on the average more than 13 clients each, those in the \$2-5 million class had an average of three clients, while those with deposits under \$500,000 had on the average only one business borrower financing inventories through field warehousing. These data serve to explain the general lack of separate departments in banks for the making of such loans. It is clear that even as many as thirteen business borrowers ordinarily constitute too small a number to warrant a

separate departmental organization for purposes of administration. It may well be, however, that separate departmental organization aids in the development of a larger volume of field warehouse receipt loans.

Great concentration of field warehouse receipt loans among the larger banks was evident from examination of the sample. Nearly three-quarters of the \$21 million of field warehouse receipt loans held by the sample of 385 banks were accounted for by banks in the \$50 million-or-over deposit class. Only a little more than 2 percent of receipt loans were accounted for by all banks with deposits under \$2 million. In contrast, banks in the largest size class accounted for 48.6 percent of total loans and discounts in the American banking system, while those with deposits under \$2 million accounted for more than 17 percent.

Field Warehouse Receipt Financing
By Banks Located in Centers of Different Sizes

The frequency with which commercial banks engage in field warehouse receipt financing increases with the population of the center in which they are located. Data presented in Table 11 reveal that the probability that a bank situated in a city of 500,000 or over will engage in this type of lending is almost five times as great as that a bank in a center having less than 10,000 population will do so. Superficially, it might appear that this observation is unnecessary, on the ground that large banks tend to be located in large centers, and it has already been pointed out that field warehouse receipt loans are preeminently a large bank activity. While there is a strong positive correlation between size of bank and size of city, taking the United States as a whole, there are also numerous small banks to be found in every large city. The fact that field warehouse receipt financing is more frequent in large cities—among small banks as well as large ones⁷—indicates the existence of broader markets for such credit service in the larger centers. Small institutions, in country or suburban centers, even though they are equal in size to many city banks, simply are not able to draw upon as large markets for field warehouse receipt

⁷ A distribution of banks engaged in field warehouse receipt financing by size of city and by size of bank reveals this fact, although such a tabulation is not presented herein.

Table 11—FIELD WAREHOUSE RECEIPT LOANS HELD BY A SAMPLE OF COMMERCIAL BANKS, AT MID-1941, BY SIZE OF CENTER OF POPULATION ^a

Size of Center of Population ^b	Banks Not Engaged in Receipt Financing		Banks Engaged in Receipt Financing		Number of Concerns Financed	Average Number of Concerns Financed per Bank	Field Warehouse Receipt Loans Outstanding	
	Number	Percent	Number	Percent			Amount (000)	Percent
Under 10,000	117		12	9.3%	17	1.4	\$218	1.0%
10,000-50,000	67		13	16.3	34	2.6	782	3.7
50,000-100,000	29		12	29.3	14	1.2	328	1.6
100,000-500,000	49		36	42.4	239	6.6	9,355	44.9
500,000 and over	29		21	42.0	218	10.4	10,162	48.8
TOTAL	291		94	24.4%	522	5.6	\$20,845	100.0%

^a For a description of the sample, see Appendix A.

^b Each size class is inclusive of the lower limit and exclusive of the upper.

loans. The explanation is clearly that business enterprises making use of field warehouses in their operations tend to be located in fairly large communities, or at least tend to form banking connections there. A contributing factor may be the presence of more active promotional activities by the field warehousing companies in the larger centers.

There appears to be a fairly sharp break between cities under, and cities over 100,000 population in regard to the frequency with which banks located within them lend on field warehouse receipts. The percentages of reporting banks that engage in the business do not increase after the 100,000 population level has been passed; but they are materially lower and decreasing as population of center falls below 100,000. This observation is likewise true of the percentages of all field warehouse receipt loans found in banks located in centers of different sizes. Nearly 88 percent of the number and 94 percent of the amount of field warehouse receipt loans held by banks in the sample represented credits granted by institutions located in cities of 100,000 and over. While comparable data covering the number and amount of all loans and discounts held by banks in centers of this size are unfortunately not readily available, it is almost certain that the concentration of *total* loans and discounts is of a much lesser degree in the larger cities.

*Average Bank Holdings of Field Warehouse
Loans and Average Loan per Client*

A number of additional facts concerning commercial bank lending on field warehouse receipts are provided by Table 12. Therein the average amount of field warehouse receipt loans held per bank engaging in this type of credit operation, and the average amount of such loans outstanding per business concern financed on this basis, are given by size of bank, by geographical region, and by population of center in which banks are located.

When the figures for banks of different sizes are examined, it is clear that the larger banks hold much larger amounts of field warehouse receipt loans, on the average, than do the small banks, and that the average amount of outstanding loans per business concern is also much larger. These facts confirm observations previously recorded. (See also Chart 3.)

It is significant that the smallest average loan (\$11,650) was held by banks possessing deposits of from \$500,000 to \$1 million, while the largest average loan (\$48,490) was held by banks with deposits of \$50 million or over, and was only about four times as

Table 12—AVERAGE AMOUNT OF FIELD WAREHOUSE RECEIPT LOANS HELD PER BANK AND PER BUSINESS CONCERN, BY A SAMPLE OF COMMERCIAL BANKS, AT MID-1941, BY DEPOSIT SIZE OF BANK, REGION, AND SIZE OF POPULATION CENTER ^a

	Average Amount of Field Warehouse Receipt Loans	
	Per Bank	Per Business
<i>Deposit Size of Bank^b</i>		
Under \$500,000	\$14,233	\$14,233
500,000-1,000,000	14,575	11,650
1,000,000-2,000,000	37,117	15,907
2,000,000-5,000,000	46,592	16,128
5,000,000-10,000,000	61,590	27,100
10,000,000-50,000,000	135,670	35,331
50,000,000 and over	645,911	48,443
<i>Region</i>		
New England	114,648	57,324
Middle Atlantic	128,246	28,499
East North Central	262,233	41,107
West North Central	180,935	29,743
South Atlantic	262,607	40,401
East South Central	94,732	27,630
West South Central	135,058	31,167
Mountain	42,611	24,349
Pacific	636,764	60,234
<i>Size of Center of Population^b</i>		
Under 10,000	18,183	12,835
10,000-50,000	60,124	22,989
50,000-100,000	27,302	23,402
100,000-500,000	259,870	39,144
500,000 and over	483,906	46,615
TOTAL	\$221,753	\$39,933

^a For a description of the sample, see Appendix A.

^b Each size class is inclusive of the lower limit and exclusive of the upper.

great. The differences in average amount of loans held by banks in the several geographical regions or by banks in centers of population of different sizes were even less. These facts suggest the existence of a "normal range" of amounts of field warehouse

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FIELD WAREHOUSE RECEIPT LOANS HELD PER BANK AND AVERAGE SIZE OF SUCH LOANS, BY CLASS OF BANK[ⓐ]

■ LOANS HELD PER BANK □ AVERAGE SIZE

DEPOSIT SIZE OF BANK
(IN THOUSANDS)

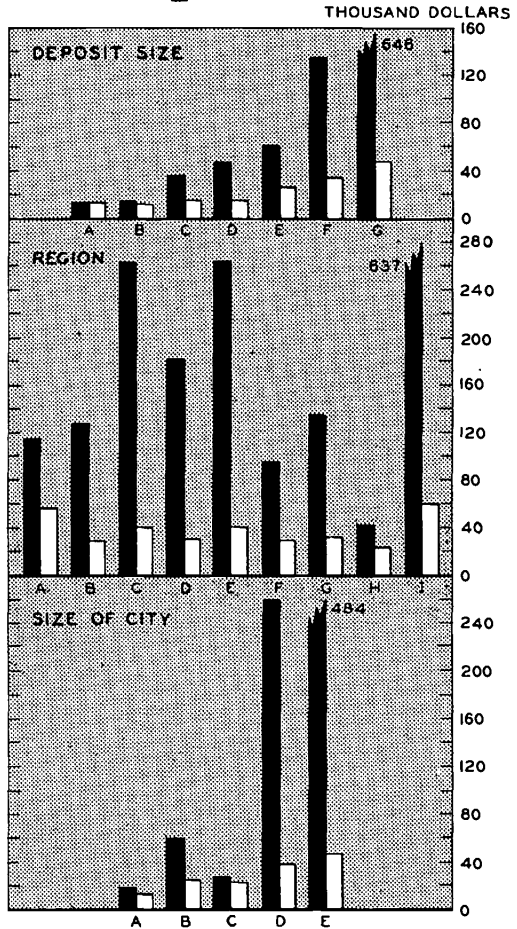
- A = UNDER \$500
- B = 500 - 1000
- C = 1000 - 2000
- D = 2000 - 5000
- E = 5000 - 10,000
- F = 10,000 - 50,000
- G = 50,000 AND OVER

REGION

- A = NEW ENGLAND
- B = MIDDLE ATLANTIC
- C = EAST NORTH CENTRAL
- D = WEST NORTH CENTRAL
- E = SOUTH ATLANTIC
- F = EAST SOUTH CENTRAL
- G = WEST SOUTH CENTRAL
- H = MOUNTAIN
- I = PACIFIC

SIZE OF CITY

- A = UNDER 10,000
- B = 10,000 - 50,000
- C = 50,000 - 100,000
- D = 100,000 - 500,000
- E = 500,000 AND OVER



[ⓐ] BASED ON A SAMPLE STUDY. FOR DATA, SEE TABLE 12.

receipt loans, within which any particular loan is very likely to fall. The minimum point in this normal range is reached with a loan of something over \$10,000, and is probably determined by the fixed costs of administering credits of this kind. Because of these fixed costs, the charge to a business concern for smaller amounts of money on this basis would be prohibitively high. The maximum point on the normal range probably lies somewhere around \$75,000, and is likely to be determined by the maximum size of business concerns that find it necessary or desirable to obtain bank credit through the establishment of field warehouses. A certain number of loans will of course lie outside the normal range.

Because there is a high degree of positive correlation between size of borrowing business and size of loans, it is possible to infer from the normal range of amounts of field warehouse receipt loans something concerning the typical size of enterprises using this basis of credit—a point on which little direct evidence is available. Assuming that the ratio between the maximum amount of a field warehouse receipt loan and the total assets of a borrowing concern will not usually be more than 1 to 2, the conclusion may be drawn that the majority of concerns financing through commercial banks on a field warehouse receipt basis have total assets of roughly between \$25,000 and \$200,000. This is merely a crude measure, to which there are many exceptions. Yet it indicates the size of concerns that are most likely to find field warehousing a useful technique. It is known that neither extremely small concerns nor the very large business enterprises make use of the field warehousing device.

There were surprising differences in the average amounts of loans held per bank and per business concern among the different geographical regions in which the lending institutions comprised by the sample were located. Apparently banks in the Pacific region, on the average, hold many times the amount of such loans held by banks in the Mountain or East South Central region, and the average amount of loan per business financed is more than twice as large. Banks in the New England region do not, on the average, hold especially large amounts of field warehouse receipt loans, but their average advance per business is comparatively large. All of these differences may be interpreted to reflect vari-

ations in the sizes of concerns using field warehouses as between the several major areas of the country, as well as variations in basic industrial characteristics.

There was a steady increase in the average advance per business against field warehouse receipts as the size of the center in which the banks were located increased. Average advances by banks in centers under 10,000 population were little more than one-fourth as large as average advances by banks in cities of 500,000 and over. This merely reflects a factor already observed, that the larger business concerns tend to be located in larger centers, or to negotiate their loans in the more important cities.

Characteristics of Borrowers

Unfortunately, little direct quantitative evidence is available on the characteristics of business concerns making use of field warehouse receipt financing. Their industrial character has already been described in detail and rough estimates of their size in terms of total assets have been presented. But precise measures of their financial structure, their credit strength, their balance sheet and profit-and-loss characteristics are lacking. Scattered information collected through personal interviews with a large number of loan officers of commercial banks, finance companies and field warehousing companies nevertheless provides a basis for some observations on these subjects.

It may be pointed out initially that no evidence has been found to support the view that business concerns making use of field warehouse receipt financing present, as a group, credit risks different from those of other concerns of like size and in similar industries that do not use field warehouses. It is by no means generally true that business concerns resort to field warehousing only when they are too weak financially to obtain unsecured bank credit.

Another erroneous view is that field warehouses are most frequently established in cases where concerns have become involved in difficulties in repaying previous unsecured loans, and are part of a "workout" arrangement made by an embarrassed concern with its bank. Unquestionably many field warehouse receipt financing arrangements do fall within this classification. But they are not the typical circumstances giving rise to the establishment of field warehouses.

houses do so only or mainly in order to obtain credit. And it is generally true that they would prefer to negotiate unsecured loans, if they could do so, because the costs of field warehousing would then be eliminated. (Instances are rare where concerns, able to borrow on an unsecured basis, in fact borrow against field warehouse receipts because they can thus obtain credit at less total cost.) It is their lack of adequate equity capital in proportion to their total requirements that moves them to finance through the creation of warehouse receipts. This want of equity capital may be traced to great seasonality in operations, rapid expansion, mediocre earning power or want of easy access to equity capital markets.

Some banks have, as a matter of policy, refused to engage in field warehouse receipt financing on the ground that any business concern whose financial position is inadequate to warrant the receipt of unsecured credit is not a good credit risk on any basis. There are enough exceptions to this rule to make such a point of view appear questionable. While a bank may with consistency limit its risks of loss to any desired level, it may well occur that there is *less* risk in lending to a rapidly expanding concern that has not had time to build up its equity than to a concern with a much stronger balance sheet that has only mediocre management and earning power. Notwithstanding, some bank loan officers state that they regard the establishment of a field warehouse by a business concern as a "distress signal." Other loan officers concede that there are many instances where a bank might properly lend on the security of field warehouse receipts, but argue that in some cases business concerns using field warehouses would be better off if they introduced more equity funds into the business. Still a third group of loan officers regard field warehousing loans as interim methods of financing, which may be used by concerns until they can build up larger working capital and later procure unsecured credit. Because there is evidence that the average life of a field warehouse lies between two and three years, it would appear that many concerns do make use of field warehousing as a temporary credit device. However, there are many other companies that, because of highly seasonal fluctuations in working capital needs, apparently use the technique permanently, even though the business is stable, profitable, and well managed.

The typical concern obtaining field warehouse receipt credit is one that has a high degree of seasonal fluctuation in its working capital requirements, and that finds it profitable to expand its working capital beyond the amount provided by the owners or borrowed on an unsecured basis by making "bankable" its inventories of raw materials, semi-processed, or finished products.⁸ Somewhat less frequent is the concern undergoing rapid expansion in the volume of its business operations. Such a business may possess a comparatively small equity in relation to the volume of business it is able to transact profitably. Although it is realizing a very satisfactory return on its invested capital, is growing vigorously, and possesses a superior management, its financial position, when gauged by traditional banking credit standards, may not permit it to procure the required funds without giving security. If its real property and equipment is highly specialized, financing agencies may not consider them desirable security. Moreover, the management itself may be averse to putting liens on these assets. Inventories, therefore, may well form the most acceptable class of security to both borrower and lender; they have the advantage, not present in loans made on other bases, that the amount of credit is automatically geared to the working capital need. As inventories are built up, working capital needs expand, and the loan balance is increased. As inventories are sold down, working capital requirements diminish, and the loan balance shrinks.

Still another factor may be given consideration in some instances in establishing a field warehouse—the desire of a business concern to obtain professional advice in improving its warehousing practices or to install more effective systems of recording inventory changes. These ancillary services are probably never the primary considerations in field warehouse receipt financing. The evidence indicates that such services do not play an important role in field warehousing, and are certainly less important than in accounts receivable and instalment equipment financing where credit rating, legal, accounting and collection services are often of primary importance.

The majority of business concerns that establish field ware-

⁸ The test of seasonality in working capital requirements is the ability of the borrowing business to make a seasonal "clean-up" of the loan and thus to demonstrate that credit is not required at all times, and the banker can withdraw without forcing a liquidation of the enterprise.