

Financing 6th District Crude Oil Producers

Commercial Banks Becoming More Important Suppliers of Funds

Capital is essential for the development of natural resources and expansion of manufacturing. The Sixth Federal Reserve District, a low-income area for many years, often had difficulty securing sufficient capital for these purposes from its own savings and financial institutions and, therefore, had to depend heavily on outside investments. In more recent years, however, these handicaps have been slowly reduced, and capital investments have been gradually shifted toward industries using more capital in relation to labor.

A case in point is the petroleum industry, particularly the production phase, which includes the exploration, discovery, and extraction operations. Capital expenditures are probably greater for petroleum production than for the refining, transportation, or marketing branches. Financing of the early growth and development of this industry was supplied largely from sources outside the District, but more recently reinvested earnings, equity capital, and financial institutions within the District have become increasingly important as sources of funds.

The first producing oil well of any consequence in a Sixth District state was discovered in Louisiana in 1902. But development of petroleum production in District States was not exceedingly rapid until after 1939; since then it has outdistanced the relative increase in the nation. By 1953, Louisiana was the third largest oil producing state in the nation and was responsible for 11 percent of total output. Oil was not discovered in Mississippi until 1939, but by 1953 that state accounted for 2 percent of the country's petroleum and ranked ninth among producing states. Last year, however, Mississippi's annual output was slightly below the 1948 peak. Production in Alabama, Florida, and Tennessee is relatively insignificant, and deposits have not yet been discovered in Georgia, although serious efforts to locate oil have been made since 1938.

Economic Importance

Crude oil production is of substantial importance in the District when its direct contributions to employment and income are considered together with its influence on other segments of the economy. When considered alone, employment figures are not particularly striking. During 1953 about 32,000 persons in the five producing states were employed by the industry. The contribution to employment is greatest in Louisiana, where 4 percent of the nonfarm workers are engaged in this activity.

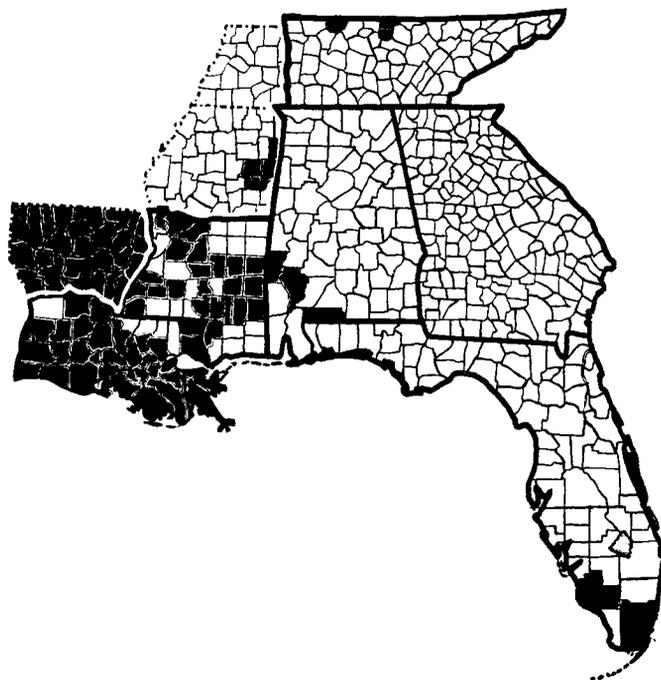
Petroleum production contributes considerably more to income than it does to employment. Although complete regional income data for this industry are not available, 8 percent of the total annual income in Louisiana comes from this activity, an estimate which may understate the actual amount and which does not include payments derived from other branches of the oil industry.

Most of the income arising from the production of petroleum in the District is probably in the form of wages and salaries, estimated at over 140 million dollars annually, with Louisiana responsible for about nine-tenths of the total. Wages are higher than those in most other major manufacturing and mining groups. Owners of the land on which oil is discovered receive royalties, frequently equivalent to one-eighth of the value of petroleum produced. Royalty payments come to an estimated 125 million dollars a year, and profits and dividends are additional sources of income.

Oil activity may directly affect an area in which oil has not yet been discovered, as some land is leased for eventual exploration or other purposes. Generally the minimum rent for a year is one dollar an acre, but the more desirable sections are considerably higher. The land owner is often paid a bonus for signing a lease. Over one-fourth of the total land area in the five producing states in the District at the beginning of 1954 was under oil and gas lease, according to the Independent Petroleum Association of America.

One way in which discovery of oil has indirectly influenced the region's economy is that it has attracted to the region many industries that depend on oil and gas, either as fuel or raw material. The oil refining and petrochemical industries, for example, owe their development largely to the discovery of these minerals. In 1953, total crude oil received by the 19 refineries in Louisiana, Alabama, and

**Oil and Gas Producing Counties, 1953
Sixth District States**



Mississippi was equivalent to about three-fourths of that area's petroleum production.

A variety of non-manufacturing activities has also been stimulated by oil production. Several major oil companies erected new office buildings in New Orleans in recent years undoubtedly because of discoveries on-shore and a sharpened interest in drilling off the Louisiana coast. Furthermore, oil is an important source of state revenue. In 1953, severance taxes on oil and gas furnished about one-fifth of Louisiana's tax income and a substantial but lesser share in Mississippi.

Structure of Industry

The production branch of the industry consists of many firms of all sizes. The overwhelming majority do nothing but produce oil, although several major companies also maintain their own pipelines, refineries, and marketing outlets. In District states in 1951, more than 400 establishments were producing crude petroleum and natural gas, and another 300 were engaged in field contract services, such as well-drilling and rig-repairing.

That the majority of firms employed less than eight people in 1951 is indicative of the relatively small size of many producers. A large staff is not essential because free lance specialists may be called upon to perform many vital functions. Geologists or geophysicists, for instance, recommend specific locations where wells should be drilled. These scientists may be independent consultants, employees of large oil companies, or producers in their own right.

Another specialist is the leaseman who secures permission from landowners for the producer to drill wells and to extract any oil or gas discovered. He is often a broker, an employee of a large oil company, or a representative of an independent operator. Actual drilling is also the work of specialists. Even the large companies may hire drilling contractors, who also do a considerable amount of drilling for themselves.

Although there are many oil producers, the large companies account for the principal proportion of output. Their relative importance to the total in the District is probably even greater than in the nation, where in 1951 the 31 largest firms were responsible for 61 percent of crude oil production, according to the Independent Petroleum Association. Indirect evidence is provided by data on production allowances by companies in the state of Louisiana for September 1954. Large companies predominate in southern Louisiana, an area responsible for four-fifths of the state's production. Small independents, whose financial resources are more limited, are less apt to concentrate their operations in areas where capital requirements are large. Near the Gulf Coast where wells must usually be very deep and are often in hard-to-get-to places, an average well may cost several hundred thousand dollars. In areas of relatively shallow drilling, such as northern Louisiana, costs are appreciably lower, and there the independents account for the greater share of total production. In Mississippi, drillings tend to be deeper than in northern Louisiana or the nation as a whole, but not as deep as in southern Louisiana.

Small operators generally play a heavier role in explo-

ration than in production. In 1953, minor oil companies and independents, according to the American Association of Petroleum Geologists, drilled and financed 70 percent of the nation's new-field wildcats—that is, new fields on structures or environments never before productive. These data probably reflect the situation in this District. Many well-known producing fields were first discovered by small operators and then developed by major companies.

Despite advances made in scientific methods, prospecting for oil is still speculative. In 1953, oil or gas was discovered in only 10 percent of new-field wildcats completed in District states, a slightly lower percentage than that for the nation. Individual states and regions showed wide variations. One out of every seven such tests in Louisiana proved successful, whereas all 76 new-field wildcats in Alabama were dry. Within areas of proven production, where most drilling activity takes place, the success ratio is better than for wildcats.

The search for oil is steadily increasing. Between 1947 and 1953, exploratory drilling in District states almost doubled, and at the beginning of 1954, about 22 percent of the nation's geophysical and core-drilling crews were concentrated here.

Financing Needs

Two reasons for the considerable amount of capital required by the industry stand out: Exploration is costly as well as risky, and proper development of oil fields necessitates large additional monetary expenditures. The need for local capital is especially great for the small independent operator. Usually, small firms do not have access to capital markets for long-term financial requirements and cannot fill their short-term needs by borrowing on an unsecured basis at commercial banks.

For many years District commercial banks provided virtually no credit to the oil industry. Until prorationing commenced and production became more stabilized and prices less fluctuating, production loans were considered too risky. But today the most important type of oil loan is the production loan, which provides operators with funds for further exploration and development.

Other explanations for the limited lending activity of District banks have been given, some of which are applicable today. The amounts requested are usually large and banks are limited by their capital funds in the amount of money which they may lend to any one borrower. Furthermore, banks lack experience with the highly technical aspects of this type of financing. Independent operators are practically nonexistent in some areas. And many banks are unwilling to compete with similar organizations for the business of producers who moved to this region but already had banking connections elsewhere.

Capital requirements for oil exploration and production are also being supplied from other sources, which consist mainly of personal savings, equity capital that is probably encouraged by favorable tax provisions, and various forms of material assistance provided by major companies. Since the budgets of even the largest petroleum firms are inadequate to permit investigation of every potential oil area, some majors reportedly make monetary contributions for

drilling in exchange for data on dry holes. Land is sometimes subleased by majors to independents in return for a share of any petroleum that may be produced. Another type of assistance is an agreement whereby a drilling contractor accepts a working interest as a portion of his compensation for drilling.

Bank Credit

Although some producers still complain that commercial banks pay little attention to and lack proper understanding of their needs, bankers in the District are showing a growing interest in production loans. Some of them supply funds to operators who own producing properties for further drilling and acquisition of additional property. This type of bank lending, however, is still on a small scale, compared with that elsewhere and with nonbank capital sources within the District. Even the most active District banks in this field have only a comparatively small proportion of their total loans in oil.

Of the several banks that do finance oil activities, at least eight make production loans. For the most part, these banks are the large ones, although several smaller ones located in oil producing centers also have made such loans. In these cases, credit was often extended on a participating basis with other banks, a practice sometimes followed by larger institutions but with banks outside the District. In isolated cases, District banks have arranged credit jointly with insurance companies, which, according to some observers, are active in this field.

In recent years, several banks have added petroleum engineers to their staffs and at least one has organized an oil and gas department. Where the volume of oil credit is deemed inadequate to warrant employment of specialists, bank officers have taken it upon themselves to become familiar with the technical aspects of oil production and to obtain additional advice from outside experts.

As banks have become more experienced in petroleum lending, financial arrangements have undergone marked changes. At one time, credit was extended chiefly for 60 or 90 days, on the strength of a financial statement. Although this practice still exists, virtually all production loans today are secured by a deed of trust or mortgage on producing properties and sometimes on equipment also. Before such a loan is made, production records, reserves, validity of title, and character of borrower are carefully investigated, and an assignment of oil-runs is usually given to the bank. Frequently, the pipeline company will remit the borrower's entire monetary income from production to the bank, which then deducts a stipulated amount, applies it to the loan, and credits the borrower with the balance. This practice enables banks to keep close check on the collateral. The actual amount lent is usually not more than one-third of the anticipated net income from the properties.

The nature and terms of such lending have been fitted to the special needs of the oil industry within the dictates of prudent banking. Some banks extend credit on demand, but most production loans are theoretically drawn up for repayment in two to five years, usually on an instalment basis, with the typical maturity falling nearer to two years. Instalment loans with a definite maturity are often refi-

nanced, as producers discover new wells and require additional funds. Individual loans vary widely in size and have exceeded 400,000 dollars, but the average loan outstanding is considerably smaller. Interest charges usually are 4½ to 5 percent. Larger banks lend mainly to concerns with assets of over 200,000 dollars, and the smaller ones to firms with assets of less than 50,000 dollars.

Experience with this type of lending has been excellent. Losses have been negligible partly because engineers' estimates of collateral have usually been conservative. Moreover, banks generally have not lent on less than two wells to any one borrower, thereby spreading the risk, and have made no loans against unproved production without other satisfactory security.

Banks also finance other oil activities. Some make short-term loans to drilling contractors, whose principal source of credit is probably oil supply companies. While this type of bank credit may be secured by a mortgage on equipment, some bankers consider such collateral undesirable and lend only on assigned contract payments.

Prospects

This region is gaining in importance as an oil-producing area and as a supplier of capital funds for the production of petroleum. Evidently, bank and nonbank institutions within the District will play increasingly important roles as incomes and oil activity continue to expand in the region. Many observers expect an intensive development of the tidelands despite the high costs of off-shore operations. Others see promise in recent discoveries made in Mississippi and regard prospects favorable to a varying degree in all District states. Although production has been cut back this year because of large stocks, such difficulties are unlikely to retard the long-term growth of petroleum production in this region or the growing interest of commercial banks in the development of this resource.

HARRY BRANDT

Bank Announcements

Additions to membership in the Federal Reserve System in November included the Florida National Bank & Trust Company at West Palm Beach, Florida, on November 15, through a conversion of the Florida Bank & Trust Company, a state nonmember bank. The President is J. L. McKinney; Vice Presidents are Ben W. Jackson and R. G. Riggle. John F. Lanigan is Vice President and Trust Officer. The Cashier is George O. McClung, Jr.; the Assistant Cashier is Susie J. Turner. Assistant Vice Presidents are E. L. Hutchens and William A. Setchel; and Trust Officer is David B. Alter, Jr. The bank has capital of \$100,000 and surplus, profits, and reserves of over \$1,100,000.

The First National Bank of Bay Minette, Bay Minette, Alabama, opened for business November 27 as a member of the Federal Reserve System. Frank Earle is President; J. C. Weldon, Jr., is Vice President; and Ray C. Stephens is Cashier. The capital stock amounts to \$100,000 and surplus to \$75,000.

The Central Bank of Mobile, Mobile, Alabama, a newly organized nonmember bank, opened for business November 19 and began remitting at par for checks drawn on it when received from the Federal Reserve Bank. Dwain G. Luce is President; and J. Tyler Turner is Cashier. The capital stock amounts to \$200,000 and surplus and undivided profits to \$70,000.