THE OIL, lumber, and iron industries of northwestern Pennsylvania formed the central theme for the fifth annual historical tour sponsored jointly by the Historical Society of Western Pennsylvania and the summer session of the University of Pittsburgh. The earlier tours had successively centered about the themes of Washington's journey to Fort Le Beuf in 1753, the Whiskey Insurrection, the Forbes expedition of 1758, and the Pennsylvania Canal and Allegheny Portage Railroad. The 1936 expedition, conducted through Butler, Armstrong, Venango, and Clarion counties on July 17 and 18, was the first to emphasize the industrial history of the region, and judging from the opinions expressed by those who made the trip, that emphasis is not inferior in interest to others with more obviously romantic implications.

Twenty-five cars, each sporting a red, white, and blue streamer, were in line when the motorcade left the Historical Building under police escort at 1:30 p.m., Friday, July 17. Equipped with mimeographed guide sheets, the tourists were forewarned as to the route they were to take and as to the significance, historical or otherwise, of the sights they would see. Heading down Bigelow Boulevard, the motorcade made its way across the Bloomfield Bridge and down Liberty Avenue and Fortieth Street past the old Allegheny Arsenal. It continued over the Washington Crossing
Bridge, located approximately where Washington and Gist crossed the Allegheny in 1753, then turned northeastward and proceeded through the boroughs of Millvale and Etna, past Isabella Furnace, built in 1872 and now owned by the Carnegie-Illinois Steel Company, and past the Spang Chalfant pipe mill, started in 1828 by H. S. Spang. After reaching the open country beyond Etna, the motorcade sped along the broad concrete road to Butler, there to halt and disgorge its passengers in front of the courthouse for the first stop of the tour.

When the tourists had assembled in the main court room on the second floor of the courthouse, Thomas S. Greer, Esq., president of the Butler County Historical Society, made the welcoming address, and Judge Robert M. Ewing, former president of the Historical Society of Western Pennsylvania, gave assurance of the travelers' pleasure in being there. The latter refrained, however, from extolling Butler County, lest, as he said, the partisans of Indiana County who were present might protest. Mr. Greer then told of the rescue of Butler County records some years ago when over-energetic persons cleaned out the courthouse and dumped a great quantity of the records on the lawn, preparatory to having them hauled away as scrap paper. Fortunately, Mr. Greer happened along and in cooperation with others had the records removed to a safe place. Examples of early land warrants and other documents thus salvaged were exhibited to the visitors; among other interesting items was displayed the first plan of lots for the town of Butler, drawn up by John Cunningham, a civil engineer of Philadelphia. Dr. C. Hale Sipe, author of a number of well-known books on western Pennsylvania history, then demonstrated drum rolls, knowledge of which had been passed down to him, father to son, from a Revolutionary ancestor. He demonstrated the beat that Brodhead's drummers used on the expedition up the Allegheny in August, 1779; the roll used by the Americans at Saratoga; the noisy and stirring charge beat of the Revolution; the reveille, a long roll, the most difficult of all to execute; and the muffled beat, used when soldiers were being borne to their graves. Dr. Sipe's exhibition of drumming was one of the high spots of the tour.

From Butler the road led northward into the oil country. Following
Route 68, the tourists soon became aware of the oil wells that dot the landscape of northern Butler County, most of them long since defunct, a few of them still listlessly pumping. Twelve miles from Butler the travelers passed through Chicora, a town that boasted a population of about eight thousand in the early seventies and in 1930 had but one thousand. Three miles beyond Kaylor, in Armstrong County, the remains of an old iron furnace erected in 1840 by the Great Western Iron Works were a mute reminder that other industries had also contributed to the industrial wealth of the section.

The expedition had now reached the valley of the upper Allegheny. The cars crossed that historic river at East Brady and wound up the hill to the Narrows, a high neck of land less than a mile wide between the two sides of a great loop made by the river as it sweeps around the high hill. The tourists spent a pleasant half hour here, partaking of refreshments, enjoying the view of the great bends in the river and speculating as to whether Céloron and the other French explorers knew how many unnecessary miles they were traveling in following the course of the erratic Allegheny. Doubling back through East Brady and then through Brady’s Bend and Queenstown, all iron towns, the motorcade soon found itself once more in a region dominated by the oil industry. It passed through Petrolia, a town that in its heyday had a population of about fifty thousand and that now has less than five hundred, and through Parker City, the approximate population of which has fallen from fifteen thousand to nine hundred. As the motorcade made its way through Bruin and Emlenton the tourists noted the refineries that give employment to the residents of those towns.

At Oil City the tourists assembled in the air-cooled dining room of the Arlington Hotel for dinner. About eighty persons from Oil City and the vicinity joined the group for the occasion, which was the largest meeting of the tour. An active and energetic local committee, headed by Mr. Joseph E. Moorhead, executive secretary of the Pennsylvania Grade Crude Oil Association, had made complete arrangements. Flowers provided by the local chapter of the Daughters of the American Revolution decorated the tables, and music was furnished by two members of the Oil
City High School orchestra. Dr. A. B. McCormick, pastor of the Second Presbyterian Church of Oil City, was present to deliver the invocation and the benediction.

To anyone previously unaware of the importance of oil to mankind or of the preëminence of the Pennsylvania oil fields, the papers and addresses delivered that evening must have been something of an education. Mr. Moorhead presided with efficiency and good humor. The Honorable John G. Payne, introduced as a third-term mayor whose people were still proud of him, welcomed the visitors and briefly emphasized the importance of the oil industry. In response, former Governor John S. Fisher, president of the Historical Society of Western Pennsylvania, recalled with pleasure his friendship and acquaintance with men who had been prominent in the industry. Mr. Charles L. Suhr, chairman of the board of the Pennzoil Company and president of the National Petroleum Association, then delivered an address on "The Birth and Growth of the Oil Industry." Emphasizing the phase of the industry in which he is most interested—the refining process—Mr. Suhr pointed out that oil had been refined from coal in England as early as 1850 and in New York by 1854, and that by 1859 there were fifty-six refineries in the United States making oil from coal. In 1855, after considerable experimentation, Samuel M. Kier built a refinery on Seventh Avenue near Grant Street, Pittsburgh, for processing crude petroleum, and when the Drake well was drilled in 1859 he became one of Drake's first customers. Most of the refining in the early days of the oil boom was done in stills near the wells; but the advantages of having the refineries in commercial centers was soon realized, and by 1865 or 1866 there were thirty refineries in Cleveland, thirty in Erie, sixty in Pittsburgh, and twenty on the Atlantic seaboard. With the development of transportation facilities it became feasible to have refineries in the oil country, and by 1874 there were eleven large refineries in Titusville and three in Oil City. Consolidations had meanwhile taken place and there were but 101 refineries in the entire country, with Pittsburgh still in the lead with twenty-two. In 1876 the first refinery at a great distance from the fields was built in California, with two Titusville men supervising its establishment. Today Oil City continues in the
front rank of the refining industry, with six refineries in the city or in adjacent towns, all established by 1888. Mr. Suhr also touched upon the oil-transportation problem, describing the competition between rival carriers who “fought with all the vigor and ferocity of present-day gangster-racketeers.” In closing he paid a tribute to the excellent quality of the Pennsylvania oilmen and predicted that the industry would flourish for many more years—that if members of the historical society should decide to visit Oil City again one hundred years hence, there would be men of the oil industry there to greet them.

The Honorable William M. Parker, associate judge of the superior court of Pennsylvania, in his address on “Historical Personages in the Oil Fields,” cited the various types that had contributed to the growth and development of the oil industry. There were, for instance, the speculators, the men who played the market and made the stock exchange of Oil City rival that of New York in activity; men whose sense of fair play is illustrated by the action of the man who bought up a million barrels of oil but in order to avert a panic carefully refrained from putting the whole quantity on the market at once. Another type was the scout, the man who went out to get advance information on activity in the fields, information that he transferred to the “oil ring” and that made possible the piling up of fortunes overnight. There were such men as Henry H. Rogers and John D. Archbold, each of whom became vice president and virtually directing head of the Standard Oil Company. Another type is illustrated by “Coal Oil Johnny,” the romantic figure around whom legend has arisen. Those who became experts on the legal aspects of the oil industry constitute another important type. Two of the most prominent in this field were J. W. Lee and Samuel C. T. Dodd, who were law partners in Franklin; Lee later became counsel for the independent companies and Dodd for Standard Oil. C. M. Spear, Martin Carey, and Judge John Trunkey were other men in this group. Judge Parker closed his address with a plea for the continuation in America of the spirit that had guided these pioneers of the oil industry.

Mr. Harry Botsford of Titusville then spoke on “Oil—The Typical American Industry.” He characterized the oil industry as the one all-
American industry "as American as the buckwheat pancake." In its seventy-seven years it has never been in a static condition but has been constantly changing, developing, shifting. In all four phases of the industry—production, transportation, refining, and marketing—American oilmen have experimented, sometimes defying engineering theory, sometimes following it, but always working out a method for meeting a problem at hand: methods for analyzing the sand to determine the probable production of a well have been worked out; the oilmen defied the advice of engineers and finally succeeded in solving the transportation problem with practicable pipe lines; and later they, not the railroad men, developed the tank car; experimentation in refining is constant and each year sees better oil made and more by-products segregated. Imagination was necessary to do this, according to Mr. Botsford, but the stress of competition has demanded that it be a balanced imagination. The area within eighty miles of Oil City, said he, has been the laboratory of the entire oil industry. There are numerous cases where several generations of a family have been in the oil business. The reason for the great progress that has been made, the speaker concluded, is that men in the industry have worked with their heads as well as with their hands.

Mr. S. Y. Ramage, one of the founders of the Wolverine refineries, was the final speaker. Discarding a speech he had prepared, because of the lateness of the hour, Mr. Ramage made an eloquent plea for the purification of the Clarion River and urged his hearers to write to the governor of Pennsylvania to press the idea upon him. At the conclusion of the speeches Mr. Moorhead called upon Mr. Franklin F. Holbrook, director of the Historical Society of Western Pennsylvania, who expressed the appreciation of the tourists for the reception that had been accorded them.

The motorcade got off promptly on Saturday morning via the Oil City-Plumer road. At Grand View Sanatorium, three and a half miles beyond Oil City, it turned onto a dirt road and wound its way for a mile to a precipice overlooking another of the great bends in the Allegheny River. Back on the paved road, the caravan soon turned onto the Plumer-Rouseville road which follows the course of Cherry Run for about three miles. Ev-
dences of the oil industry were to be seen on every side, with derricks, pumping jacks, and rod lines in profusion. At Beer’s Camp along this road is a well that has been pumping since 1861, and there is also to be seen a replica of the Drake well. The valley of Cherry Run was the scene of an oil boom in 1864–65, and the land in the region sold at fabulous prices. On their arrival at Rouseville the tourists parked their cars in front of the Pennzoil Refinery and were divided into groups of twenty-five for a trip through the plant.

Although the would-be students of refining were of varying degrees of receptivity in scientific matters, all were able to comprehend the basic principles of the very involved processes explained to them. They learned that the various products of crude oil all have different boiling points, and that it is this that makes possible the fractionation of the crude oil into the products. Because some of the component parts of the crude oil would suffer physical or chemical change if brought to their respective boiling points, various devices have been evolved for extracting them, such as heating in a vacuum and chilling. The tourists saw the tall “bubble towers” in which, under ordinary atmospheric pressure, heat is applied to the crude oil: when the heat is first applied gasoline vapors mixed with kerosene arise and are passed into the apparatus in which the process of making the gasoline is completed; as the heat is increased in the towers naphtha vapors are distilled, and then kerosene, and then gas oil; each of these products is given special treatment to complete its preparation, after which it is passed into storage tanks. A second series of towers, in which vacuums have been established, receive the residuum from the first towers, and other products are distilled. Other towers, operating under still other conditions fractionate still other products. The tourists also inspected the chilling coils and the devices for sweating, pressing, and filtering by which petrolatum and various wax products are prepared. An increased respect for the research and experimentation that has made possible the refining of crude oil into a multiplicity of products was engendered in all who made this trip.

At Drake Well Memorial Park, twelve miles from Rouseville, the motorcade once more came to a halt. The park, including the museum, was
planned and developed by the American Petroleum Institute assisted by funds raised by subscription for the purchase of the land; and it was presented to the state on August 27, 1934, at the time of the celebration of the diamond jubilee of oil. Here the tourists admired the monument to Drake, a great piece of natural rock placed in 1914 on the site of Drake’s well by the Canadohta chapter of the Daughters of the American Revolution. They strolled into the adjoining picnic grounds, rested in the shade of the trees, and watched Oil Creek flow serenely by. The chief attraction, however, was the very fine museum, in which has been assembled a collection of pictures, mostly of scenes of the early oil industry, and of tools that were used in the oil fields. Here are also displayed record books of early companies, the minute book of the first oil exchange, 1871–81, the register of the Bonta House at Pithole, maps of the region, models of early wells, and mementos of Colonel Edwin L. Drake—his chair, his spectacles, his toothbrush. Here also is displayed the extensive Boyle collection of lamps. In the library at one end of the building are books, pamphlets, manuscript materials, and newspapers dealing with the oil industry and the oil region.

From the park the motorcade proceeded to Titusville, founded in 1818 and brought to sudden prosperity years later by the discovery of oil. After passing along the broad shady streets to Woodlawn Cemetery, the cars turned in and circled the graves of Colonel and Mrs. Drake, and the monument erected in their memory by Henry H. Rogers. The tourists then proceeded to the Titusville Country Club, where, as at Oil City, a large company of townspeople joined them. After luncheon, which was served on the broad shady porches, everyone assembled in the lounge for the meeting. Mrs. Charles T. Evans, president of the newly organized Titusville Historical Society, presided and told of the interest that had been aroused by the prospective visit of the members of the historical society in Pittsburgh. She then introduced Mayor Luther D. Fulton of Titusville, who extended to the tourists a warm welcome. Mr. C. Stanton Belfour, assistant director of the summer session of the University of Pittsburgh, responded with an appreciative word for the fine coöperation
in planning the tour that the Titusville local committee had given. Dr. Paul H. Giddens, assistant professor of history at Allegheny College, then delivered an address on "The Seneca Oil Company."

Dr. Giddens traced briefly the early attempts to collect oil on Oil Creek; the project launched in 1853 for developing oil springs on the farm owned by Brewer, Watson and Company; and the organization of the Pennsylvania Rock Oil Company of New York in 1853 and of the Pennsylvania Rock Oil Company of Connecticut in 1854 for the further development of the lands. The idea of boring for oil was actively considered by the latter company after the summer of 1856, and some months later Colonel Drake was sent to Titusville to investigate the possibilities. In December, 1857, the Seneca Oil Company was organized and Drake became chairman of its board. Later he was designated as the general agent of the company and was sent to Titusville in May, 1858, to supervise operations. Dr. Giddens gave attention to the difficulties that Drake encountered—the lack of experience on the part of every one, the need for machinery and tools, the ridicule exhibited by those living in the region, and his two unsuccessful trips to Pittsburgh to secure a driller. Finally in the spring of 1859 William A. (Uncle Billy) Smith and his two sons of Tarentum were persuaded to go to Titusville to undertake the work. On Saturday afternoon, August 27, when the drillers were sixty-nine and a half feet down, oil was struck. At first the daily production was eight or nine barrels; it later increased to about twenty-five barrels but dropped to fifteen barrels by the end of the year. The drilling of the first well was of great significance because it opened the way for the quantitative production of oil and indicated the location of great unlocked deposits. The news caused wild excitement in Titusville and there was a great rush to purchase or lease lands along Oil Creek. In New Haven, the directors were fearful that the supply would soon be exhausted, and the newspapers paid but scant attention to the important discovery until October 24. The Seneca Oil Company did not prosper, however, in spite of this success: because of surplus production and the lack of demand, the price went down to a dollar a barrel. By the following spring dissension
was tearing the company, and the resignation of Drake was demanded. Finally in March, 1864, the company sold its property to George W. Steele for ten thousand dollars, paid its debts, and disbanded.

After luncheon the motorcade made its way southeastward from Titusville through Pleasantville, a few miles to the south of which, as the guide sheets informed the tourists, is the site of Pithole. In the boom days Pithole had a population of sixteen thousand and now there is nothing there save the foundation stones of the Methodist church. Continuing through Tionesta, the site of the famous Indian town of Goshgoshing, then through Tylersburg and Leeper, the motorcade came to a halt at the lodge at the entrance to Cook Forest. Led by Dr. O. E. Jennings, head of the department of biology of the University of Pittsburgh, the tourists walked a short distance up the Rhododendron Trail, the upper part of which passes through a section of primeval forest. Dr. Jennings called attention to the fact that the trees were chiefly hemlock and white pine and that most of the young growth was hemlock, since young pine will not grow in the shade.

From Cook Forest the motorcade proceeded to Clarion, passing on the way the town of Helen Furnace, where can be seen the remains of the iron furnace of that name, built in 1845 and recently cleaned out and partially restored. The tourists crossed the Clarion River and dutifully noted its inky color, as they had been admonished to do by Mr. Ramage the evening before, and were soon in Clarion. Here they assembled in Becht Hall of the Clarion State Teachers College for dinner and the final meeting of the tour. A large number of people from Clarion and its vicinity joined the group for this event. Dr. G. C. L. Reimer, president of the college, welcomed the tourists and then called upon Judge Ambrose B. Reid, vice president of the Historical Society of Western Pennsylvania. Judge Reid's father, Major Bernard J. Reid, was one of Clarion County's pioneer lawyers, had an important rôle in the founding of the teachers college, and served for many years on its board of trustees. Judge Reid recalled boyhood memories and paid tribute to several men prominent in Clarion County history. Father George J. Reid, Judge Reid's brother,
now of Clarksville, Texas, was also a member of the tour party and was present at the dinner and spoke a few words to the company.

Dr. Reimer introduced the honorable Theodore L. Wilson, former president judge of the Clarion County court, who read a paper on "The History of the Iron Industry of Clarion County." He gave brief attention to the early history of iron, both in Europe and in America, and traced the history of the industry in Clarion County from the erection of the first furnace in 1828 by Christian Myers and Henry Bear until the last of the county's thirty-one furnaces went out of blast in 1883. The methods used by these furnaces were described and the problems of fuel and transportation were discussed. The first check on the prosperity of the industry in the county, which was long known as "the iron county," came with the repeal in 1846 of the protective tariff. Other factors contributed to the decline and eventual death of the industry: the fall in price due to the competition of the large coke and anthracite stacks, the depletion of cheap timber that could be utilized for charcoal, the increased cost of ore, and the competition with the lake ores.

The Reverend Daniel A. Platt next spoke on "Lumbering on Local Streams." As a boy fifty-four years ago Dr. Platt rode his first raft, and he talked pleasantly of his experiences. He described the rafts and the way in which they were made and told of the difficulties and dangers encountered by lumbermen. The first raft on the Clarion River, he said, was that piloted by John Laughlin in 1810; from that time on for nearly a century, rafting was an important activity in the region.

After the speeches Dr. Reimer introduced prominent persons who were present, including Judge Harry M. Rimer, who had been very active in making arrangements for the Clarion meeting, and Mr. Holbrook, director of the historical society. The latter in turn introduced the two men responsible for managing the tour, Mr. Belfour, representing the university, and Mr. John W. Harpster, representing the historical society. Although the hour was late, many of the tourists made the return trip to Pittsburgh after the meeting.

On none of the earlier tours had local residents exhibited as much in-
terest as on this one. Of the two hundred and fifty persons who registered at the three meetings, only about one-third had made the trip from Pittsburgh. Residents of thirty-one Pennsylvania municipalities other than Pittsburgh and of six states other than Pennsylvania participated. The group, moreover, was a distinguished one: included in the personnel were an ex-governor of the state, the mayors of two cities, a Pittsburgh councilman, a college president, twelve college professors, three librarians, two clergymen, a distinguished musician, four judges, and a number of business executives. The number of cars in line varied from twenty-five to thirty-two. The weather was perfect, the food excellent, the hosts cordial. That everyone enjoyed himself was obvious; and there can be no doubt but that the tour served well its purpose of stimulating interest in the history of western Pennsylvania.