AMERICAN PETROLEUM INSTITUTE 50 WEST FIFTIETH STREET NEW YORK 20, N.Y.

ADDRESSES

DELIVERED AT

SIXTEENTH MID-YEAR MEETING DIVISION OF REFINING

TULSA, OKLA.

April 30 to May 3, 1951

Note.—Statements contained herein, although prepared for use in publications of the American Petroleum Institute, represent the expressed opinions of the authors.

TABLE OF CONTENTS

SIXTEENTH MID-YEAR MEETING OF THE DIVISION OF REFINING

TOTA OF REFINING
Refining Sessions Pag
Open Dinner Session
Laws, Morals, and Manners, W. L. Stewart, Jr
Analytical Research
Abstracts of Papers at Symposium on Analytical Research. Safe Laboratory Practices, B. L. MacKusick
Refinery Waste Water
Safety in Handling Wastes, S. L. Rankin. Chemical Treating Plant for Refinery Waste Water, H. Schindler Dissolved-Air Flotation Separates Oil from Waste Water, Nicholas A. D'Arcy, Jr. The Fundamentals and Performance of Gravity Separation—A Literature Review, Alfred C. Ingersoll. Hydraulic Characteristics of Gravity-Type Oil-Water Separators, Gerard A. Rohlich.
Corrosion
Use of Aluminum in Petroleum Refinery Equipment, E. E. Kerns and W. E. Baker
Electrical Equipment No. 1 M. Goldsmith
Opening Remarks of the Chairman to the Group Session on Electrical Equipment, L. M. Goldsmith Electrical Hazards, Henry W. Boggess Control and Switchgear for the Oil Industry, B. M. Mills Explosion-proof Motors—Design and Application to the Petroleum Industry, J. Z. Linsenmeyer and C. R. Olso
Training Technical Men
Industry Practice in Training Technical Personnel, H. G. Vesper and D. H. Industry Practice in Training Technical Personnel, H. G. Cutting Industry Practice in Training Technical Personnel, H. G. Vesper and D. H. Industry Indus
Fuel Utilization
Fuel Utilization Fuel Utilization Frepared Discussion by: W. S. Carthaus.

PROCEEDINGS

SIXTEENTH MID-YEAR MEETING

DIVISION OF REFINING

MAYO HOTEL, TULSA, OKLA., APRIL 30 TO MAY 3, 1951

Tulsa, the world's oil capital, in 1951 for the first time was the locale of the mid-year meeting Tuisa, the Institute's Division of Refining. With 8 technical sessions and an open dinner meeting, of the 16th mid-year meeting was held in the Mayo Hotel, April 30 through May 3. More than 30 the 16th mid-year and subcommittees were in the refining committees and subcommittees were in session during the 4-day meeting, which was held remines with a mid-year meeting of the Institute's safety and fire-protection committees.

Official registration was 840—indicating attendance in excess of 1,000 throughout the meeting, because it is known that many local refiners failed to register. Registered attendance topped by

about 250 registration at the Cleveland meeting in 1950.

W. L. Stewart, Jr., vice president for refining, presided at the annual dinner. In his address entitled "Laws, Morals, and Manners," he referred to the latest report by Stanford Research Institute on smog in the Los Angeles Basin, and said that the problem which has vexed millions of people who reside in southern California could easily develop in Tulsa or other growing centers of population. He called upon the petroleum industry to solve the problem before the arrival of the "policeman," and recommended that the Institute sponsor a group for a comprehensive study of all phases of air pollution and its alleviation. At a conference the previous day with members of the daily and weekly press, with radio commentators and representatives of oil trade journals, Mr. Stewart spoke at length on the same subject, as well as on problems with respect to the refining industry's required expansion for defense purposes.

API Certificate of Appreciation

Also at the dinner session G. G. Oberfell, retired vice president of Phillips Petroleum Company, Bartlesville, was awarded an API "certificate of appreciation" for his outstanding services to the American Petroleum Institute in the fields of automotive research and conservation of natural resources. A nationally recognized authority on petroleum research—especially in the fields of natural gasoline, natural gas, and the lighter hydrocarbons—Mr. Oberfell becomes the sixth recipient of this coveted award in the Division of Refining, and joins such illustrious names as Thomas G. Delbridge, Kenneth G. Mackenzie, Walter Samans, Robert E. Wilson, and Wilson Brégy Hart. Pre-Sentation of the award was by C. E. Davis, vice chairman of the General Committee of the Division of Refining.

The citation to Mr. Oberfell reads as follows:

"His dedication of effort to the improvement of automotive vehicles and to the conservation of natural re-Sources has been outstanding and constant throughout his career which began before the Division of Refining was Organized. He has contributed generously of his time and resources for the establishment and maintenance of cooperation 1. eration between the petroleum and automotive industries, for the henefit of the consuming public. ment of the best combinations of fuels, lubricants, and equipment for the benefit of the consuming public.

"His steadfast devotion to this cause has made him worthy of this award."

Stewart Harral, director of public relations for the University of Oklahoma, at Norman, en

tertained the dinner guests with an informal talk on "The Lost Art of Laziness." Sixteen papers featured the all-day session on analytical research the first day of the meeting to which some 30 authors and co-authors contributed. At this session Dr. Frances Lamb of Eth

LAWS, MORALS, AND MANNERS

W. L. Stewart, Jr.*

happy to be here tonight and proud-very be presiding. Bill Gunn said I would I am napped Bill Gunn said I would have to proud—to be presiding. Bill Gunn said I would have to proud—to be presiding; it would be expected of me proud—to be I would be expected of me—and I said your program chairman has complimed. Your program chairman has complimented me would your part tonight as an "- " I would. To my part tonight as an "address." I by referring to my part tonight I say as a say as by referring that you regard what I say as some ideas would prefer that you regard what I say as some ideas Tould pictor as some ideas and observations of my own about air pollution. They and observations And all of you may noith and opser. And all of you may neither agree with may not be new. But in the interest Nay not say. But in the interest of better oilpol line public relations, I offer them to you.

Let us call the discussion "Laws, Morals, and

A year ago I had the privilege of relating to many of you, at a luncheon meeting in Cleveland, the Los Angeles refiners' smog experience. I represented the Committee on Smoke and Fumes of the Western Oil and Gas Association. By instruction, my remarks were "off the record," even though we had nothing to conceal. The purpose of my talk that day was to warn you that what was happening in Los Angeles could happen in Bayway, in Port Arthur, in Chicago, or even right here Tulsa. Frankly, I told you then that we, the Los Angeles refiners, felt considerably put upon. We were being persecuted; we were being attacked; we were on the defensive, and we didn't seem able to get out of the corner.

Tonight, a year has passed, and I am not under wraps. There is practically a quorum of the Western Oil and Gas Association Committee on Smoke and Fumes in the audience, but they don't know what I am going to say. They gave me permission to speak as Bill Stewart instead of as chairman of the committee.

When I was born, Los Angeles was a sleepy little pueblo of less than 75,000 people. Yes, I was really born in Southern California—and, confidentially, most of the exaggerated stories about our climate, etc., do not come from "native sons." They come from the enthusiastic people from all over the country—in fact, all over the world—who quickly adopt California as home and today constitute the majority of our cheering section. And just between us, we have too many people there now! They are using up our air too fast. From 1900 to 1940 the area grew rapidly, until we had a population of 2,000,000. During the war and since, the growth has been even more rapid. There are now well over 4,000,000 people in the area—with their automobiles, their homes, their trash burners, their industries, and their desire for a climate they remembered back when or the climate they think they remember.

With that growth came air pollution which taxed the hatural air-conditioning machinery of the area beyond

Chion Oil Co. of California, Los Angeles, Calif.

its limits. More and more people became conscious of lowered visibility, eye smarting, and unusual odors. And they started complaining.

There's Always A Law

Well, as is usually the case when the public starts complaining, the first thing everyone thinks of is a law. So we got a law. It set up the Los Angeles Air Pollution Control District, with authority to grant permits, prosecute air-pollution offenders, etc. There were many who sighed with relief when the bill was passed by the state legislature. Now we would be rid of smog!

It didn't work that way—as you and I knew it wouldn't. It takes more than a law to cure a problem as complex as the Los Angeles smog problem.

To begin with, of course, there was lots of sound and fury. The first director of the Los Angeles Air Pollution Control District went to work—with a big stick on visible smoke and on sulfur compounds. Up to that time, of course, most of the world's air-pollution problems had sprung from these two sources. So he started off on the same track. With the help of one newspaper in particular, he set out to whip up public opinion against one industry, then another—until very soon he landed on the petroleum refiners. After this antirefinery campaign had been going on for a few months, the rest of the press began to take it for gospel. Finally things got to a point where an oil man was afraid to open his morning paper.

(Editor's note: Mr. Stewart showed samples of newspaper clippings.)

The Next Step

The upshot of all this activity was that those of us in the Los Angeles Basin who had not already done so put in a lot of equipment to remove H2S from refinery operations. By the time these installations were completed, our first air-pollution control director had also pretty well eliminated all the visible smoke from every source except home incinerators—an institution peculiar to Southern California where, in all but a few municipalities such as Beverly Hills, our people burn their own trash, paper, grass clippings, weeds, etc., in backyard incinerators.

Inasmuch as the backyard incinerator is a hot political potato, the first director of the Air Pollution Control District announced that, with the elimination of visible smoke and sulfur compounds, his task was accomplished. So he turned over the details of winding up the assignment to his assistant, and resigned.

As you may have guessed by now, that was two years ago, and we still have smog—only it's a little worse!

The second (and present) director of the Los Angeles Air Pollution Control District, Colonel Gordon P. Larson, took a different approach to the problem. He sought the cooperation of industry, sponsored research, and continuously exchanged information with us and with other industries in the area so that everyone could be kept up to date with developments. But, in spite of the very intelligent manner in which he has administered the law, the problem hasn't been solved.

Practically every activity in the Los Angeles Basin covered by the regulations of the air-pollution control bill is now operating well within the legal limits of the law. But the smog is still there. So, as far as most of us in the industry are concerned, this is sufficient evidence to confirm our original conviction that laws alone can never solve the problem.

What Can Do It?

If laws can't do it, what can?

Can morals and manners?

While all this policing activity which I have just described was going on, we in the industry were not idle. On the very first day that an air view of one of our more prominent and up-to-date refineries—belching forth alleged smoke—appeared on the front page of a local paper, the Committee on Smoke and Fumes was formed. (You all know the members of that congenial, august, but somewhat harassed body: George Davidson, B. O'Connor, P. S. Magruder, Herschel Hyde, David Day, B. D. O'Neill, and R. W. McOmie.)

The committee went about its assignment methodically—as any good pipefitter would: first to define our purpose; then to analyze the problem; seek the facts. We felt—and still do feel—that no one was going to make a dent in this problem until he found out by scientific research what smog is, and then where it comes from. Therefore, our program was blocked out as follows:

A Program Starts

Our industry would pay for the kind of research which was needed, diagnose the patient's illness, tell the community whose tonsils to take out, and hand the completed job to the people as a public service. In this way we would win the gratitude of the community and, at the same time, warn ourselves in advance if there was something in our operations which contributed to smog so that we could correct it before the authorities and the newspapers were at our throats again. Things didn't quite work out that way—for a number of reasons; but that's the way we started.

We engaged Stanford Research Institute. We practically gave them a blank check. We told them there were no holds barred—let the chips fall where they may! The institute cautioned us that the assignment could well be a three-year task. That was 1947.

Instead of three years, it has taken us four to reach

a point where we think we can finally begin to see the other end of the tunnel. We don't know all the answers yet, but we do know some of them. I shall not attempt to tell you what we think we know, but I have the Stanford Research Institute Third Interim Report on you who have not seen it.

But, of the more than 50 pollutants identified by the scientists, traces or more of all of them come from our refineries. This isn't surprising when you take into consideration the fact that practically all of the pollutants are products of combustion.

We don't know yet what one pollutant, or combination of pollutants, is the principal contributor to the nuisance. Neither do we know whether or not an innocent pollutant may become a particularly obnoxious irritant after it has floated around in the air and sun for awhile.

Certainly we're not the only contributors to smog. As far as the products of combustion are concerned, Stanford Research Institute estimates that 60 per cent of the pollutants from this source come from the activities of the general public—automobile exhausts, space heating of homes and offices, and backyard rubbish burning.

But even though our industry contributes only 25 per cent of these pollutants (as Stanford Research Institute now estimates); even though each refinery in the basin operates well within the limits of the law; if our combined total makes a significant contribution to the problem, I believe we are faced with a serious decision. That decision is simply this:

A Choice in Decision

We can either sit back and obey the letter of the law, and continue to be the target of politicians who don't know how to solve the problem; or we can accept the moral responsibility of doing more than we can be legally forced to do. This latter course is the one I am suggesting to you gentlemen this evening.

I believe in these enlightened days that it is not enough just to be economically efficient and live within the law. To be right, we must have the confidence and respect of the people—the people who are our employees, our owners, our customers, and our neighbors.

We are doing a better and better job with reports to stockholders. No longer does a balance sheet and operating statement suffice. We are tending more and more to tell stockholders all our problems, our successes, our failures, our plans and ambitions. I believe it pays. The management which talks it over with the owners gains their confidence.

We no longer lock the gates on the county or city fire department when we have a refinery fire. The plant firemen and the public firemen team up and do a job.

Some of us no longer throw out the press and their photographers when we have a fire.

Generally, we are doing many things, and not doing many things, which make the people—our employees

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our stockholders, our customers, our nextdoor neighbors-like us better.

What I should like to propose tonight is a project which would add one more facet to our industry publicrelations program.

Since 1928 the American Petroleum Institute has had a very able Committee on Disposal of Refinery Wastes. That committee, and the whole industry, have done a magnificent job. I really believe that our industry housekeeping standards in this field are the highest which exist.

But smog is basically a problem of too much pollution. And we do contribute trace amounts which, when added to the trace quantities of our neighbors, make tons per day of substances which aren't good to breathe; and certainly, as good citizens, we have a responsibility.

The Challenge

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Consequently, I'd like to propose that we form a national API Committee on Smoke and Fumes, with enough money and scientific talent behind it to find the answers to all our air-pollution problems—and I mean the communities' problems.

It's all well and good to say that, at this date, air pollution is a factor only in Los Angeles; but each year our refineries everywhere are doing more and more work on more and more barrels of petroleum. I think it would be very wise to know more about our problem, as well as the overall problem of air pollution, than the policeman—because he is coming, believe me!

If we tackle this air-pollution problem as it should be tackled; if we accept our moral responsibilities and adopt the manners of constructive citizenship; if we assert our leadership by sponsoring research, by broadcasting the knowledge we already have, by letting the public know we are doing something-voluntarilyabout the problem, I am satisfied we shall gain the everlasting respect and gratitude of the people.

It means new standards. I am not kidding myself or you. It will be expensive, and I am thinking in terms of lots of money—millions of dollars for the oil industry.

But it seems good sense for an industry which wants to be liked to accept the leadership for handling this problem, which is bound to become worse before it will be better—a problem which affects us all.

To me, it is also smart to be leaders, to be good neighbors, to play fair, to practice the golden rule; but, above all, to be the sort of Americans we should like America to be made up of.

Let's accept this challenge, and really go to work!

