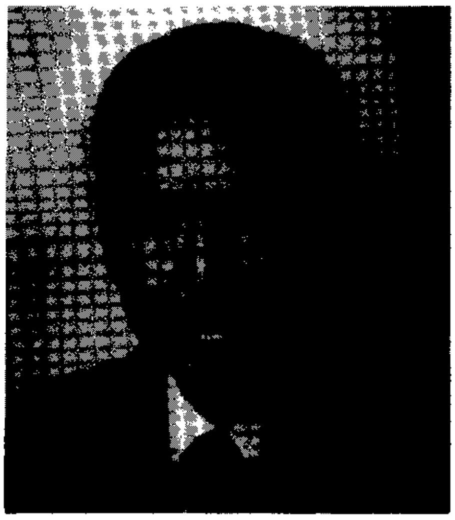
Dr. Hanford was Vice President for Research and Development for the Olin Mathieson Corporation. He received his BS and MS from the Philadelphia College of Pharmacy and Science and his Ph.D. from the University of Illinois. He has been the recipient of the Chemical Industry Medal and many distinguished honors during his career including the Ambassador's Award, State of Pennsylvania in 1955 and the Honor Scroll, New York Chapter, American Institute of Chemists in 1957. He now serves on the Executive Committee of the American Chemical Society, he is Chairman of the Finance Committee and a member of the Committee on Chemistry and Public Affairs and the Committee for Public, Professional, and Member Relations Committee of the American Chemical Society.



Frederic Hammesfahr

LICENSING — ATOOL FOR BUSINESS GROWTH

by
*Frederic Hammesfahr**

Licensing is big business. The license fees received by U.S. firms now amount to well over one and a half billion dollars, and fees paid by U.S. companies amount to the hundred of millions of dollars per year. There must be a reason for this two way flow of over two billion dollars. And of course there is. The companies involved are buying just one thing — growth.

Licensing has become a tool for business growth. It is more than just one of many. It is a uniquely effective tool. It has potential for letting one enter foreign markets; it can become the basis for highly profitable joint ventures; it has the potential for leap-frogging competition; it is a device for catching up on research. Any function with these multiple opportunities is a major tool for the general management planning its company's growth.

There are many reasons for the recent almost explosive growth of licensing. One most important has been the internationalization of business. For licensing is first and foremost an international business. Domestic producers are not licensed. One goes across the seas to get new technology or to enter a new market. But either way the international aspect is a primary factor.

The growth of licensing is also linked to the growth of corporate research. It is a startling fact that over 90% of all the trained engineers who have ever lived are today professionally active. Before World War II, there were few large corporate research groups in any given industry. So the company with a research capability had a good chance of being the one to discover the advances that interested it. No so today. A research center graces every company, and in every area, thousands of skilled professionals search. The chances that the development will show up first in a competitor's R&D program accordingly improve. And so what does one do. License.

More than that, R&D directed at major breakthroughs is a high risk investment that only few can afford. Licensing is a low risk route to the same objective. If the license fee is keyed to sales, the risk is even lower.

Perhaps the best illustration of the value of licensing is the experience of the Japanese. For about 3 billion dollars, invested in licenses, they bought the fruits of U.S. and European technolgoy, and revitalized and rebuilt their industry to its present impressive position. As bargains, this must out-rank even the famous pruchase of Manhattan for $24.

Licensing to be of value must be successful. I thought I might comment on some of the factors that seem to be common to major successful licensing projects.

The most successful of the licensing projects are those that bring to a company major new technology. They are also by far the most difficult of accomplishment. They have certain peculiar attributes.

In their early stages, the marketing problems tend to dominate corporate interest. This means that the licensing executive should be at home with market analyses, market considerations and market strategy. The involvement can frequently become quite complete. In one project with which I am familiar, the licensing team of an American company had to bring together their foreign distributor with the intended licensee and create a long term contractual relationship with joint venture overtones between these two foreign companies as part of the total license negotiations. While this may have been above and beyond the call of duty, it illustrates the point — the successful licensing executive must be concerned with the markets.

There are usually two markets. For every marketing problem the licensee sees in those early days, the licensor has an equal and opposite. The licensor is looking at that foreign market and wondering if he should export to it from his own domestic plant, or set up a local manufacturing subsidiary, license, or possibly seek a joint venture. All of these considerations are particularly pertinent when new technology is involved. Here it is almost certain that the owner of the new technology has not developed any good business plans for taking his new technology to a foreign market. Once again, it is the licensing executive who has a unique opportunity to participate in shaping this decision. And I urge grabbing this opportunity.

It is a rather unusual role in which the licensing executive is cast. Internally he will find himself involved — together with his company's sales department — in establishing the marketability of the product by his own company and its profitability to his company. At the same time, he can find himself involved in supplying data to the foreign company on their options in the American market. He will be involved in trying to persuade them that his company offers them the preferred route for taking profit from the American market. This is not quite playing both sides of the street, but it does have some of those aspects.

Another important facet in developing a successful licensing project is continuity in the negotiating team. For all practical purposes, it is impossible to draft a contract that will cover all the contingencies of the future. One draft contract I once became involved with ran to 40 pages. It attempted literally to foresee and deal with all the many unknowables of a 25-year period. After I had read it, I could only conclude the negotiators were very lucky that no one had suggested the second flood. If they had, I am sure there would have been clauses worked out covering the respective rights as the waters receded.

In this case, that lengthy draft contract really had its origin in high turnover among the negotiators. As a consequence no rapport had been established between principal negotiators, because the principals were forever changing. The objectives of the organizations had drifted apart without this divergence having become sufficient to break up the negotiations. The lawyers attempted to paper over the differences with even more clauses, and as a consequence, the only progress made was in weight of paper.

At the heart of negotiations is understanding of each other's objectives and limitations. This type understanding and the give and take that produces mutually satisfying solutions results, most commonly, when the principal negotiators have worked together long enough to develop personal rapport and to develop a feeling of confidence, each in the other, that they represented compatible organizations and similar lines of thought.

There is one last area of great concern in the acquisition of technology. The project will not be successful, and the company will not get the growth it expects unless the start-up is smooth. Indeed, there are few more painful experiences to a company, to a career, and to the concept of licensing than a prolonged, expensive start-up, followed by a dispute over product quality. Such situations become the lawyer's fair employment act.

When the licensee is seeking new specialized technology, particularly involving products specified by performance in their application, obtaining good warranties is difficult. What the licensee can really get in the way of a warranty will reflect the relative bargaining powers of the two parties, and there is no single right answer. I can only urge full and careful consideration by the licensing executive to all the facets of technology transfer. This certainly includes the contract terms relative to start-up and warranties. But broader consideration to other factors is needed. What department will be responsible for receiving the technology, and is their staffing adequate? What training procedures are required? Is the process to be transferred that actually practiced, or an improvement? This is one of the more commonly encountered sources of difficulty. Transfer the known process. Improve it later, when your own organization has acquired a feel for it. Can the licensor qualify your raw material sources? His raw material specifications will cover only those impurities encountered from his supply sources. Your raw material sources may have new impurities and as a result completely unexpected results.

Licensing exposes its practitioners to international trade, marketing strategies, joint ventures, with all of their questions of finance, corporate organization and legal questions. It requires skill in the sale of intangible concepts and it certainly helps to be a good negotiator. These are skills and experiences in high demand. So I would like to leave you with one final thought. Licensing is a tool for company growth. It can also be the crucible in which is forged personal growth. I can only hope that your endeavors prove equally successful — for your companies and for yourselves.

**About the Speaker: Mr. Fred Hammesfahr, Senior Executive Vice President of PVO International, Incorporated, Boonton, New Jersey, a diversified international food, chemical specialties and agricultural company headquartered in San Francisco. Mr. Hammesfahr directs the research, production and marketing facilities for the Chemical Specialties Division. Prior to joining PVO, Mr. Hammesfahr was associated with Allied Chemical Corporation as Corporate Director-Licensing. He is a graduate of the Massachusetts Institute of Technology and has served as Chairman of the Government Programs Committee for the American Institute of Chemical Engineers and is a member of the Government Liaison Committee, Engineers' Joint Council.*

PANEL DISCUSSION — "FORECASTS FOR THE FUTURE"

THE PANEL

Our panel today is most unusual. It consists of two distinguished members of the Industrial Research Institute, Dr. Milton Hollander and Jules H. Steinberg and Robert Goldscheider and Dudley Smith who will represent LES in our panel discussion. Mr. Steinberg is joining our panel as a replacement for Dr. Thomas Gibian of the W. R. Grace & Company who was originally scheduled to be with us, but unfortunately found an overseas conflict at this time.

DR. MILTON HOLLANDER

Dr. Hollander was born in Bayonne, New Jersey and graduated from Purdue University, with a Bachelor of Science in Engineering in 1951. He received his MS at M.I.T. in 1953 and his Ph.D. from Columbia in 1959. Dr. Hollander is currently Vice President of Technology for Gulf & Western Industries. He has published more than 25 technical papers and has been granted more than 50 U.S. Patents. He currently makes his home in Stamford, Connecticut. Dr. Hollander we are delighted to have you on our panel today.

JULES H. STEINBERG

Mr. Steinberg received his Bacehlor of Science degree in Chemical Engineering at Pennsylvania State University in 1948 and his law degree from George Washington University in 1952. He has been admitted to the D.C. Bar, New York State Bar and is registered to practice before the U.S. Patent Office. He is a member of the American Patent Law Association, the Licensing Executives Society, the New York Patent Law Association and the New York State Bar Association. He is currently Assistant Patent Counsel at the W. R. Grace & Company here in New York. Mr. Steinberg we are delighted to have you with us today.

DUDLEY SMITH

Dudley Smith is the Licensing Coordinator for Celanese Corporation. He holds BS, MS and JD degrees and is a daily commuter to New York City from Larchmont, N.Y., where he makes his home with his wife Esther and three children. In 1965, Dudley was the prime mover that gave concrete form to the idea of a society for licensing men that is today the Licensing Executives Society with 2,000 members worldwide and chapters in many of the major industrial countries throughout the world. For the past 15 years, Dudley's job has been licensing rather than patents for Celanese. Recognition and appreciation of Dudley's stature among his fellow licensing men resulted in the first gold medal awarded in October 1971 by the Licensing Executives Society to Dudley for his contributions to the licensing profession. Dudley, we are delighted that you could take time from your busy schedule to be with us today.