MEDICINE

Study Medical Hypnosis

➤ HYPNOSIS and its effects and limitations should be taught in medical and dental schools under the auspices of reliable medical authorities, a psychiatrist warns.

His statement followed closely on the heels of the American Medical Association's recent endorsement of hypnosis as a practical medical tool. The psychiatrist, Dr. Zigmond M. Lebensohn of Washington, D. C., was an early member of the AMA's council on mental health, the committee that reported the results of a two-year study on the usefulness of hypnosis in medical fields. The council also condemned the use of hypnosis for entertainment purposes.

Dentists were found to use hypnosis more than physicians, mainly to reduce the pain and anxiety associated with tooth extraction, Dr. Lebensohn told Science Service. But danger lies in the temptation of the dentist to explore the psychiatric life of the patient, a field outside of the dentist's competence, he said.

It is not unusual for doctors and dentists to take a quick course in hypnosis from a traveling teacher who breezes into town and sets up shop in a hotel room, he pointed out. Since the art of hypnotizing is relatively simple, the student is usually satisfied with his new-found powers. Courses have been offered to doctors and dentists on the basis of a five- or ten-lesson correspondence course. But if hypnosis were taught in legitimate schools, it would become less dramatic and its fascination would die down, the psychiatrist said.

Therefore, in agreement with the reporting council, Dr. Lebensohn stressed that all those who use hypnosis need to be aware

of the complex nature of the phenomena involved. Teaching related to hypnosis, he said, should be under responsible medical or dental direction and integrated teaching programs should include not only the techniques of induction but also the indications and limitations for its use within the specific area involved.

The American Dental Association reported, in response to an inquiry, that while it did not endorse the use of hypnosis, many dentists were receiving instructions at post-graduate or "brush-up" levels.

In 1955, the *Journal of the American Medical Association* carried reports on the favorable use of hypnosis in pregnancy and labor; in 1957, for a Cesarean section and hysterectomy; and as recently as this past June, a report on the successful use of hypnosis during heart surgery was presented at the annual meeting of the AMA in San Francisco.

Science News Letter, October 4, 1958

CONSERVATION

Science Changes Conservation Picture

➤ "WE ARE approaching the point where all our wheat product will be needed for our own uses, and we shall cease to be an exporter of grain."

This prediction, which today seems to be wishful thinking, was made just 50 years ago when many eminent scientists, engineers and Government officials saw only shortages and scarcity facing the nation. J. J. Hill's statement, one of several equally gloomy

predictions made by the well-known railroad man and others, led to a conservation movement based on fear.

Today, Dr. Thomas B. Nolan, director of the U.S. Geological Survey, reports, the movement is based on "wise use of presently used resources."

Science and technology have changed the conservation movement, Dr. Nolan points out in *Science* (Sept. 19), by creating new materials faster than consumers can exhaust present resources.

Even our nonrenewable resources, minerals and fuels, present an optimistic picture. Better techniques make possible more efficient and economic development of these resources. We have found unknown and unsuspected supplies of petroleum and important minerals, Dr. Nolan says. He also points to "our research-derived capacity to produce synthetic fuels" and to our ability to "invent or produce out of abundant materials, new substances that have predictable, specific desired properties."

The geologist is also optimistic about the nation's water resources. Dr. Nolan explains that we are now solving water problems by regulation and using our knowledge of the water cycle. Current studies in water evaporation control, underground water and in salt water conversion promise to increase the amount of available water.

"We probably need to fear, not the exhaustion of physical resources, but the dangers of inadequate or belated utilization of our intellectual resources," he says. "I hope we are currently rediscovering the need to practice this kind of conservation."

Science News Letter, October 4, 1958

PHYSIOLOGY

Canines Studied for Air Pollution Effects

➤ SMOG CONDITIONS in Los Angeles County do not worry the local dogs.

A study of some dogs raised in the smog area of Los Angeles County revealed that none of them suffered the expected respiratory tract illnesses.

Fifty-one canines were examined to compare their respiratory tract changes with dogs that had changes induced by exposure to a synthetic smog in inhalation chambers, Dr. Earl J. Catcott, of the California State Department of Public Health, and Drs. Charles J. McCammon and Paul Kotin, of the University of Southern California School of Medicine, report in the Journal of the American Veterinary Medical Association (Sept. 15).

The dogs studied had been exposed to natural air pollution as it occurs in the Los Angeles area for periods varying from four months to 18 years.

Unpublished studies by Drs. Kotin and McCammon have demonstrated that dogs exposed to smog in inhalation chambers experience a definite morphological change. The synthetic smog consisted of gasoline vapor plus ozone and ultraviolet light, the scientists say. The changes found in the dogs were not found in those dogs that had been exposed to naturally occurring smog during their lifetime.

Science News Letter, October 4, 1958



GLASS WORKER—An ancient art, glass blowing, is combined with modern technical skills to produce complicated scientific glassware. Earl Sexton, employed at the Indiana University chemistry department, works at a glass-turning lathe equipped with a multi-jet gas flame.