MEDICINE

Stop Tic Douloureux Pain

Synthetic chemical, stilbamidine, banishes pain of trigeninal neuralgia. Its discovery was almost accidental, American College of Surgeons heard.

➤ A 70-YEAR-OLD man who suffered attacks of excruciating painful tic douloureux every two months for 17 years has been free of these attacks for 20 months, thanks to a new treatment announced at the meeting of the American College of Surgeons in Atlantic City.

The treatment consists of doses of a synthetic chemical called stilbamidine. Its ability to banish the pain of tic, or trigeminal neuralgia as it is also called, was discovered almost accidentally by Drs. George W. Smith and Joseph M. Miller of the Johns Hopkins Hospital, Baltimore, and the Veterans Administration Hospital, Fort Howard, Md.

They had been using the chemical to treat certain rare diseases such as leishmaniasis and blastomycosis. These patients after a few weeks complained of facial numbness. They had lost the winking reflex and could not taste or feel food in their mouths. After some time more, these sensations disappeared.

Apparently the stilbamidine had hit the fifth nerve as streptomycin hits the eighth nerve. Since the fifth nerve is the one involved in tic, the doctors decided to try stilbamidine as a remedy for the painful ailment.

The first patient, an 82-year-old woman, has had complete relief of her tic pain for 30 months. In all, some 40 patients have been treated. They had, many of them, had previous standard treatments such as alcohol injection into the nerve to deaden it, injections of vitamin B 12 and operations in which the nerve was partially cut.

None of these had given relief for more than a few months, but with stilbamidine they get complete and apparently long-lasting relief. Only permanent relief heretofore available for these patients has been an operation in which the fifth nerve was completely cut.

The numbness and other strange sensation effects of stilbamidine wear off after a few weeks but the pain relief remains. Why is not known. The drug was at first given by injection into a vein every day for 14 days, but now the W. S. Merrill Co. of Cincinnati is making it for Drs. Smith and Miller in capsule form. Patients swallow one of these capsules every day for two weeks.

Stilbamidine's ability to check blastomycosis was itself an almost accidental discovery of Dr. Miller's as reported by SCIENCE SERVICE. (See SNL, Aug. 11, 1951, p. 83.) A Cherokee Indian had been sent to the

A Cherokee Indian had been sent to the Fort Howard VA Hospital with the diagnosis of cancer of the esophagus. Actually, he had been sent there for "terminal care,"

since he was not expected to live, but at Fort Howard it was discovered that he did not have cancer. Instead, he had the rare fungus infection, blastomycosis.

Discussing the case with scientific friends in Baltimore, Dr. Miller learned of a chemical that cleared fungi from culture plates much as penicillin cleared staph. germs from culture plates. This chemical could not be given to humans safely, but Dr. Miller learned of the safe, related chemical, stilbamidine. So he tried that and the blastomycosis patient was cured.

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• RADIO

Saturday, Dec. 4, 1954, 3:15-3:30 p.m. EST

"Adventures in Science" with Watson Davis, director of Science Service, over the CBS Radio Network. Check your local CBS station.

Dr. Linus Pauling, chairman of the division of chemistry and chemical engineering at the California Institute of Technology, will discuss "The Nature of the Chemical Bond."

INVENTION

Pocket Ash Tray Receives Patent

➤ LEONARD L. BLOCK JR. of Buffalo, N.Y., won patent No. 2,694,400 for a cigarette butter and pocket ash tray that guillotines the lighted end into a metal container. The rest of the butt is then dropped into the metal case, the top closed and the entire container put into the smoker's pocket.

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ARCHAEOLOGY

Vanished Arctic People

➤ AN ARCTIC seashore village occupied by the vanished Dorset people for at least 2,000 years before the coming of the Thule Eskimos about 1,000 years ago has been explored.

The village contained 208 houses built in terraced rows, overlooking northern Foxe Basin. It is at Alarnerk on the northern tip of Melville Peninsula in Canada, north of Hudson Bay, more than 300 miles above the Arctic Circle.

The village, which is the largest archaeological site yet found in the eastern Arctic, was explored by a joint expedition of the University Museum of the University of Pennsylvania, the National Museum of Denmark and the Arctic Institute of North America.

The Dorset houses were rectangular and quite large, 20 by 45 feet, in contrast to the small round huts that housed their Eskimo successors.

The houses were heated by stone indoor fireplaces and were lighted by small lamps. Although the Dorset people apparently had no boats, they liked to live close to the shore and, when the water's edge receded with the passing years, they built another row of houses on lower ground.

The band of rows is 1,900 feet wide and the tools, weapons and art work found in the various rows indicate about seven different eras. In the houses nearest the present water's edge, the Dorset implements were found mixed with material from the later Thule people.

When the lowest row was built, the water was only 24 feet higher than it is now. During the time the village was occupied by the Dorset people, the sea level dropped about 56 feet.

That is the distance between the highest

row of houses and the one nearest the present beach.

Although the sea probably did not recede at a constant rate, it would have taken about 2,000 years for it to go down 56 feet, estimates Dr. Jorgen Meldgaard of the National Museum of Denmark, leader of the expedition.

This gives a rough dating of the settlement at from 1,000 to 3,000 years ago. To provide a check on this estimate, organic materials have been brought back to the University Museum for dating by the carbon 14 method.

The Dorset people lacked the bow and arrow, and hunted with spears, harpoons and lances. They were probably walrushunters, the scientists believe, rather than whale-hunters like their boat-building successors, the Thule Eskimos.

Among the nearly 3,000 implements recovered from the site were tools, weapons and artwork made from flint, slate and walrus ivory and also remains of a few wooden implements.

The Dorset people were civilized enough to bury their dead, the expedition found, but the Dorset used gravel mounds unlike the piles of huge stone boulders under which the Thule Eskimos buried their dead.

The expedition also explored some typical Thule houses built from large stones and whalebone, which were found about a mile and a half from Alarnerk. Under one house was found a store of frozen meat which was put down to freeze, by a Thule family several hundred years ago.

Dr. Meldgaard was accompanied by Dr. Richard G. Emerick of the University Museum, and Rev. Guy Marie-Rousellier, ethnologist of Churchill, Manitoba, Canada.

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