DEEP PERINEURAL INJECTIONS OF BETA-EUCAIN SOLUTIONS IN SCIATICA

A. J. CAFFREY, M.D.
MILWAUKEE, WIS.

It is not my wish, in reporting these few cases, to claim any originality in the treatment of sciatica with beta-eucain solutions, as a complete report of similar cases has been made by D'Orsay Hecht.¹ Also J. Lange² reports marvelous results in eleven cases, and it was his method that I followed as closely as possible in the few cases that I have to report. The technic which was used in the first case reported below was used in all the following cases, so I shall avoid repetition.

CASE 1.—Jan. 10, 1906, I was called to J. D., an Austrian laborer, aged 28; he said he had been suffering from sciatica for about six months. When first seen he was unable to walk; he had been bedridden for two months. I had him removed to Trinity Hospital and, with Dr. Arthur Hoyer, who was then intern, injected 100 c.c. of a solution, made by dissolving 2½ gr. of beta-eucain in 100 c.c. of normal salt solution. The injection was made—after rendering the parts aseptic—at the gluteal fold, midway between the tuberosity of the ischium and the great trochanter, using a large 50 c.c. syringe and a good, stout needle about 3 inches in length. The needle was passed upward and slightly inward, and on depositing a few drops of the solution the parts became deadened to the pain of the needle on its way to the great sciatic nerve. As the point of the needle reached the nerve there was a distinct shudder or twitch of the leg, indicating that we were in the right path, also there was resistance to the point of the needle as it passed through the outer sheath of the nerve. Then we deposited slowly the contents of the syringe, after which we unscrewed the barrel from the needle and, leaving the needle *in situ*, refilled the barrel, attached it again to the needle and deposited the other 50 c.c.

The result was surprising; the patient, who had been in bed for two months, afraid to move for fear of the excruciating pain accompanying motion, rose from the operating table and walked in a sprightly manner from the fifth floor to the third floor of the hospital. He did not go back to bed again but walked around the ward with the other convalescent patients; but after three days he began to complain of pain in the calf of the leg again. Five days after the first treatment we repeated the treatment with the same good result. He left the hospital a few days after the last treatment and reported to me twice a week for nearly two months. I have seen him at different intervals since and he has had no return of his sciatica.

I have been able to get only five other patients to submit to the treatment, three of whom were cured, or have had no return of sciatica for a year following the treatment, nor up to the present, as far as I know. The two remaining patients were benefited at the time, but would not submit to a second injection. In all the cases here reported the patients had been suffering from one week to six months.

CASE 2.—Adam M., aged 29, tanner, suffering from sciatica for five weeks; two weeks in bed. Feb. 20, 1907, I injected 100 c.c. of beta-eucain, solution 1 to 1,000, into great sciatic nerve. Relief was instantaneous and patient got out of bed the same day; relapse set in about two weeks later. I repeated the treatment with resulting cure.

CASE 3.—W. T., colored waiter, aged 48. March 15, 1908, injected 100 c.c. of the solution, as described, into sciatic nerve. The patient was relieved of the pain instantaneously, but did not have the use of the left leg for about three days. After considerable massage he was able to move around. This case alarmed me for a while, as I thought the patient had developed paralysis after the injection. His pain returned

when he recovered the use of his leg. I repeated the treatment and while he complained for a time of being "weak" in the left leg, he had no return of the sciatica. I have seen him a number of times since and he has had no trouble with his legs.

CASE 4.—A. G., aged 42, laborer; lived in a very cold house; slept between two feather beds. I was called to this patient Feb. 20, 1910, and found him with an acute case of sciatica. I used the injection on him Feb. 21, and was obliged to repeat at weekly intervals four times before I got a cure. He would get relief for two or three days, but the pain would return. I also had to resort to the hypodermic several times in this case.

CASE 5.—H. H. brewery hand, aged about 40; called at my office, Nov. 20, 1910, with sciatica of two months' standing. I injected 100 c.c. solution beta-eucain; the patient stated that his pain was relieved instantly. He left the office and I have not seen him since; I do not know if he had any return or not.

CASE 6.—P. O., laborer, called at the office, March 16, 1911, suffering from sciatica. I used 100 c.c. beta-eucain solution. He obtained some relief, but returned March 21, saying that he was worse than ever. He refused a second injection and asked for medicine. I gave him aspirin and codein, but have not heard of him since.

I believe, with Dr. M. R. Barker, that sciatica is at first a neuralgia, but later becomes a neuritis, with adhesions between the nerve-sheath and the nerve-substance; this brings about a contraction and thickening of the nerve-sheath; so when a large quantity of solution is forced into the nerve there is an expansion of the sheath and a breaking up of the adhesions. In addition, we have the anesthetic effect of the beta-eucain.

A NEW TONSIL HEMOSTAT

A. M. CORWIN, M.D.
CHICAGO

The free hemorrhage that occurs in tonsillectomy under general anesthesia suggests the routine use of mechanical hemostasis, as logically indicated to prevent

needless loss of blood in all cases and to secure a nearly bloodless field while the second gland and the adenoid are excised.

The accompanying illustration shows a tonsil hemostat which I have devised and found most satisfactory in every respect after experimenting with several instruments already on the market. This contrivance is best used in pairs, though each instrument is applied on either side of the throat with equal facility. Several layers of gauze are attached to the bulbous extremity of the inner arm; the outside arm carries a disk for counter pressure. The spring ratchet makes adjustment easy for removal or for inserting the instrument, and when both hemostats are in place, excision of the adenoids is not interfered with because the arms are formed to follow the buccal curve. Removal of these instruments one at a time enables the operator to handle any persistent hemorrhage that may follow, by use of long hemostatic forceps for torsion or ligation when needful.

1. Hecht, D'Orsay: THE JOURNAL A. M. A., Feb. 6, 1909, p. 444.
2. Lange, J.: München. med. Wchnschr., Dec. 27, 1904