A CASE
OF
ACTINOMYCOSIS OF THE FACE AND
NECK.

OPERATION. CURE.

BY
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J. J—, æt. 29, was admitted into the General Hospital, Nottingham, on February 26th, 1890. He worked on a farm, and was employed in taking care of sheep. He stated that for months before admission he had no association either with horses or cattle. The man himself and his master, who was interviewed, both stated positively that there had been no disease of any kind (to their knowledge) either amongst the sheep which he tended or amongst the other cattle on the farm.

Patient stated that he remembered on several occasions eating raw ears of corn, both in the fields and when it was being threshed in the barn. He could not remember any particular occasion on which he had done so, but has no doubt it occurred many times.

He stated that the complaint from which he suffered began twelve weeks before admission with a painless

swelling of the left side of the face, first noticed over the horizontal ramus of the lower jaw near the angle. From thence it gradually spread up towards the eye and down into the neck. It did not incommode him much, and he was able to work, sleep, and eat (for a time) as usual. After the swelling had been in progress for six weeks he consulted Dr. Wright of Bottesford, who found a collection of pus over the angle of the jaw, which he opened.

The swelling was poulticed, but increased rather than diminished in size, and shortly afterwards another collection was opened, and as no improvement took place he was sent to the hospital.

On admission the whole of the left side of the face and neck was much swollen, and the eye almost closed. Scattered over the face and side of the neck, between the

margin of the orbit above and the clavicle below, were eight openings, all discharging pus, through each of which a mass of firm material resembling granulation tissue exuberantly fungated.

On passing a probe, bare, roughened bone could be felt through all the openings situated over the face. The skin for a considerable distance round the seat of disease was bright red in colour, much thickened, and had a firm brawny feel—especially on the face, where this condition extended well up into the temporal region. His teeth were very irregular, and on the left side there were carious teeth in both upper and lower jaws.

He did not feel ill, but complained chiefly of not being able to open his mouth or to masticate solid food, for which he had an appetite. He took fluid food well. There was no rise of temperature.

The various openings discharged pus freely, which contained numbers of the pale yellow granules characteristic of the disease, and which were proved by microscopic examination to be actinomycetes.

An examination of the heart and lungs revealed nothing abnormal, and there were no symptoms indicative of disease of any of the other viscera.

On March 4th, after consultation with my colleagues, I decided to remove the disease, or as much of it as I could, and performed the following operation.

Chloroform having been given, an incision was made through the diseased tissues along the lower border of the horizontal ramus of the lower jaw to the angle, then upwards to the zygoma, and inwards along the lower margin of the orbit. The quadrilateral flap of skin thus formed was rapidly dissected up towards the middle line, when the seat and extent of the facial portion of the disease could be well seen.

The facial artery was divided in the first incision and secured, and the oozing of blood from the rest of the cheek, which was at first free, was checked by the ligation of a few small vessels and the pressure of sponges.

A quantity of the fungating growth lying round and protruding through the openings was scraped away thoroughly, and portions of both the upper and lower jaws and the malar bone, which were found rough and bare, but not otherwise affected, were similarly treated.

A mass of the disease was found extending beneath the malar bone into the zygomatic fossa; this was also scraped out until, as far as could be judged, all had been removed. The masseter muscle, which was obviously affected, and which had been perforated by the disease, was in great part cut away. An incision was then made in the neck along the line of the disease, extending from the ramus of the jaw nearly to the clavicle. The fungating growths were treated in the same manner, and scraped out as rapidly as possible. The operation here was of a simpler nature than in the face, as the disease had not passed beneath the deep fascia.

The facial nerve was not recognised, but was no doubt injured during the operation. The skin was brought together here and there with wire and horsehair sutures, and a dressing of mercurial wool applied.

On March 7th, three days after operation, the following note was made:—"He is doing well. The wounds are healing; there is a free purulent discharge in which the small bodies, which were before present, are not noticeable. The dressings to-day were shaken and washed in a basin of water and the deposit examined carefully, both with the naked eye and with the microscope, but no actinomycetes were found. Thus, although it cannot be said with certainty that they are absent, yet it is evident that they have at any rate become scarce. His temperature has remained normal since the operation."

From this date he made an uninterrupted recovery; the facial wound healed in parts quickly and in others by granulation, that in the neck almost wholly by granulation. No actinomycetes were again found in the discharge, although they were repeatedly and carefully looked for. The brawny swelling and angry redness of the skin

gradually subsided, but did not completely disappear for months afterwards.

He was discharged on May 21st, two and a half months after operation, being then well, except for two superficial granulating patches which had not healed.

Within a month of his discharge he returned with these wounds healed, and expressed himself as being quite well.

He now (April, 1891) says that his health is perfectly good. He is engaged as an agricultural labourer, and is as well able to do a day's work as ever he was.

One of the chief features of interest in the foregoing case is the fact that the operation proved so readily successful in spite of the wide area involved.

The interesting question at the time from a clinical point of view was, whether the area of chronically inflamed and indurated skin which surrounded and spread away from the fungating sinuses was itself affected with the disease. If so, it was clearly impossible to perform an operation which would completely remove the whole of the affected parts. I believed, however, that even if they were so affected, the fungus if present would probably be sparsely scattered through the surrounding skin, and that if the bulk of the malady were removed the remainder might cease to multiply, and die a natural death.

I removed at the time of operation several portions of the red and thickened skin near the parts undoubtedly diseased for the purpose of determining this point; and Dr. Ransom, who has examined them microscopically, reports that he has failed to find any actinomycetes in them. It was interesting to note how the integument gradually cleared up and resumed a healthy aspect.

The result in this case is such, I think, as to encourage the undertaking of extensive operations for the relief of this disease in accessible parts of the body, even though the operator may foresee his inability to remove the whole of the apparently affected parts.

(For report of the discussion on this paper, see 'Proceedings of the Royal Medical and Chirurgical Society,' Third Series, vol. iv, p. 16.)