Practically the same state of affairs might result from the sudden dilatation of organs like the stomach, habitually carried in the thorax and causing but little inconvenience in their ordinary condition. As Lacher puts it: "A sudden distention, either by gas or fluid, of any of the organs lying in the thoracic cavity may cause a sudden fatal termination, apparently from paralysis of the heart, resulting from the sudden pressure."

This supposition seems to offer the simplest explanation of the course of the short illness of our own patient. The sudden distention of the stomach and the large intestine within the thorax, aided by the upward thrust of the diaphragm from the inflation of the small intestines remaining in the abdomen, probably caused so much disturbance of the conditions in the thorax as to bring about the patient's death.

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A CASE OF MYCOSIS FUNGOIDES SYMPTOMATICALLY CURED BY MEANS OF X-RAYS.

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J. F. PAYNE, writing in Allbutt's *System*, says of mycosis fungoides: "The disease is probably always fatal." If, therefore, it can be proved that an undoubted case of this disease has yielded promptly and completely to the use of the X-rays, it constitutes a distinct step forward in our treatment of the condition and incidentally constitutes another victory for X-ray therapy.

From the pictures herewith presented and the description of the case about to be given, I take it that no one will doubt the diagnosis, and yet, should the identity of the disease be questioned, it must be admitted that the effect of the rays upon the growths has been truly remarkable.

For the guidance of workers in X-ray therapy I have been careful to give every step of the technique used and a detail of every treatment employed. This is especially necessary at this time, as there are a goodly number of men throughout the country who are just taking up X-ray work and need every possible guidance in order that they may intelligently apply this great therapeutical force. As much skill, of its own kind, is needed to properly run an X-ray generating outfit as is required to properly perform abdominal operations; and the reason why certain surgeons get no aid from either their X-ray examinations or treatments is because they do not know how to operate their own outfit, or those to whom they trust that part of their work are inexperienced and ignorant. Those who have an idea that X-rays can be turned on like water from a faucet, by anyone, and good results obtained, belong to the same category as those who expect to carry themselves around their rooms by lifting upon the straps of their own boots. The time is here when in surgery X-ray diagnosis and therapy takes its place beside general anæsthesia and aseptic technique, and it behooves all operative surgeons to thoroughly understand the subject, even if they do not personally operate an outfit.

The case herewith reported was an out-patient, and I have to regret that no blood examinations were made. No section from the growth was taken, first, from cosmetic reasons; and, second, because I have come to feel that even the cutting into malignant growths for the removal of specimens of tissue for microscopic examination is frequently harmful, as it opens up new lines for absorption into the general system and hastens metastases. In this case no treatment, neither internal nor external, was used, excepting the X-rays.

On September 22, 1902, Mrs. C. L. was referred to me by Dr. H. C. Gordinier, of Troy, N. Y., with the diagnosis of mycosis fungoides, the disease affecting the back of the patient's neck, nose, and upper lip. The following facts are taken from my case book:

This patient is sixty years of age, and a housewife by occupation.

Patient's father died at seventy-seven, of some disease of the kidneys, and her mother at the age of eighty-two, of asthma. Patient has no living brothers, but three who are dead, one having been drowned and the other two of causes not known. Patient has five living sisters, all of whom are well, and no sisters dead.

She never had any severe sickness, and is the mother of eight children.

The patient complains of three distinct growths (which are described below): one in the back of the neck and not shown in the picture, one on the nose, and one on the upper lip.

Cross-examination shows that patient has no headache, but has frequent attacks of dizziness; that she can see, smell, taste, and hear in a normal manner; that there is neither cough nor dyspnœa, pain in chest, nor palpitation of the heart; that the appetite is good, neither dyspep-

tic symptoms nor constipation; that there has been no tendency to diarrhœa or loss of flesh; that there has been neither insomnia nor enlargement of the lymphatics.

Fig. 1.

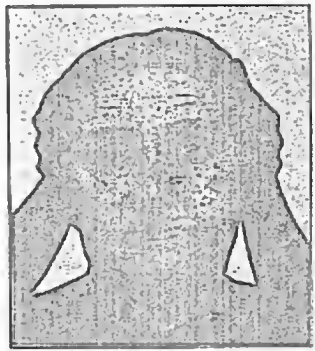
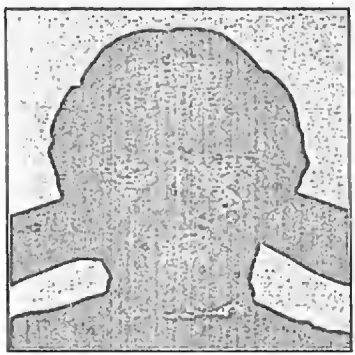


Fig. 2.



The patient's present illness began about ten years ago by the appearance on the back of her neck of a small red point, which gradu-

ally enlarged in all directions until it became a large red patch about two inches in diameter. This area of diseased skin itched to quite a degree, and after having existed for about four years small, raised, hard lumps appeared in the margin thereof. These last-mentioned lumps or papules increased in size until lately, when they coalesced into a hard, raised margin. At present the area affected is two inches by one and one-half inches in diameter, and the above-described margin is raised one-half inch above the surface of the skin. This margin is hard, and at points is covered by a black, fluffy exudate. The centre of this patch is on a level with the skin and is covered by thin, white scales of epidermis. The margin of this as well as of all three growths is sharply defined. Along the upper edge of the margin of this growth a process of ulceration is in progress. About three years ago the same process began at a point on the left side of the nose, and shown in Fig. 1, which has gradually enlarged until it has now the appearance shown in the figure. This patch measures one and one-half inches by one inch, and is raised at its highest point three-quarters of an inch above the normal surface of the skin. It is red in color and very nodular. It is quite hard, and at points there are small areas of ulceration. Projecting from the centre of this growth, and well shown in the photograph, is a bluish-red, cystic-looking outgrowth which looks exactly like a distended hemorrhoid. About six months ago the same process appeared on the upper lip, but here the process took on a distinctly ulcerative action, as we find a sharply defined ulcer, with a raised margin, and which goes so deeply as to nearly penetrate the entire thickness of the lip. This ulcer is one-half inch in diameter and is well shown in the first photograph, and the healed scar of it in the second.

The treatments were given from a Queen 12-inch coil and a Sayen tube, and are detailed below.

ABBREVIATIONS: = 3 inches means the length of spark backed up at the coil terminals when the tube was in operation.

D means the distance of the nearest point of the surface of the tube from the nearest point of the growth.

T means the length of the exposure in minutes.

In all cases the healthy parts were protected by two thicknesses of T; lead-foil.

September 23.	= 3 inches.	D 5 inches.	T 10 minutes.	On nose and lip.
24.	= 3 "	D 5 "	T 10 "	On nose and lip.
24.	= 3 "	D 5 "	T 10 "	On back of neck.
26.	= 3 "	D 5 "	T 10 "	On nose.
26.	= 3 "	D 10 "	T 10 "	On neck.
29.	= 3 "	D 8 "	T 10 "	On lip.
29.	= 3 "	D 8 "	T 10 "	On neck.
October 1.	= 4 "	D 7 "	T 10 "	On lip.
1.	= 4 "	D 7 "	T 10 "	On nose.
3.	= 3 "	D 6 "	T 10 "	On lip.
3.	= 3 "	D 10 "	T 10 "	On nose.
6.	= 4 "	D 7 "	T 10 "	On lip.
6.	= 4 "	D 7 "	T 10 "	On nose.
8.	= 3 "	D 8 "	T 10 "	On lip.
8.	= 3 "	D 8 "	T 10 "	On nose.
10.	= 3 "	D 10 "	T 10 "	On lip.

The lip is now apparently entirely well.

October 10.	= 3 inches.	D 10 inches.	T 10 minutes.	On nose.
13.	= 3 "	D 12 "	T 10 "	On nose.
13.	= 3 "	D 12 "	T 10 "	On neck.
15.	= 3 "	D 10 "	T 10 "	On nose.
15.	= 3 "	D 10 "	T 10 "	On neck.
17.	= 3 "	D 10 "	T 10 "	On nose.
17.	= 3 "	D 10 "	T 10 "	On neck.
22.	= 3 "	D 10 "	T 10 "	On nose.
22.	= 3 "	D 14 "	T 10 "	On neck.
24.	= 3 "	D 10 "	T 10 "	On nose.
24.	= 3 "	D 10 "	T 10 "	On neck.
27.	= 3 "	D 10 "	T 10 "	On nose.
27.	= 3 "	D 10 "	T 10 "	On neck.
29.	= 3 "	D 10 "	T 10 "	On nose.
29.	= 3 "	D 10 "	T 10 "	On neck.
31.	= 3 "	D 10 "	T 10 "	On nose.
31.	= 3 "	D 10 "	T 10 "	On neck.
November 3.	= 3 "	D 10 "	T 10 "	On nose.
3.	= 3 "	D 8 "	T 10 "	On neck.
7.	= 3 "	D 3 "	T 10 "	On nose.
7.	= 3 "	D 3 "	T 10 "	On neck.
10.	= 4 "	D 10 "	T 10 "	On nose.
10.	= 4 "	D 10 "	T 10 "	On neck.
12.	= 3 "	D 4 "	T 15 "	On nose
12.	= 3 "	D 8 "	T 10 "	On neck.
14.	= 3 "	D 5 "	T 15 "	On nose.
14.	= 3 "	D 6 "	T 10 "	On neck.
19.	= 3 "	D 4 "	T 10 "	On nose.
19.	= 3 "	D 4 "	T 10 "	On neck.
21.	= 2 "	D 2½ "	T 10 "	On nose.
21.	= 2 "	D 5 "	T 10 "	On neck.
24.	= 3 "	D 3 "	T 10 "	On nose.
24.	= 3 "	D 5 "	T 10 "	On neck.
25.	= 3 "	D 3 "	T 10 "	On nose.
25.	= 3 "	D 5 "	T 10 "	On neck.

Mild dermatitis appearing on nose and neck, the scabs are pulled off now as far as possible before beginning each treatment.

December 1.	= 5 inches.	D 10 inches.	T 10 minutes.	On nose.
1.	= 5 "	D 10 "	T 10 "	On neck.
5.	= 5 "	D 4 "	T 10 "	On nose.
5.	= 5 "	D 5 "	T 10 "	On neck.
22.	= 2 "	D 4 "	T 10 "	On nose.
22.	= 2 "	D 4 "	T 10 "	On neck.
31.	= 2 "	D 1½ "	T 10 "	On nose.
31.	= 2 "	D 1 "	T 10 "	On neck.

The parts in question are now symptomatically well, all that can now he seen heing a slight hyperæmia of the skin.