case may come out. After the use of a caustic, and the slough of a part, the resulting wound is to be treated as a simple ulcer.

Starvation.—Starvation is still another method of treating the erectile growths. This consists simply in finding the vessel or vessels of supply, and cutting off the circulation by ligation; this mode has many advocates, and is certainly a good one where the arteries are in a position to be surely recognized and conveniently operated upon.

Seton.—The seton is still another mode. This is introduced by threading a needle with tape or other material, and passing it beneath the growth. The seton, whatever the material used, is to be as large as the needle which carries it, preferably larger; thus, by the pressure secured, guarding against hemorrhage.

In considering the treatment of nævi, it is not to be forgotten that there are cases which, if left to themselves long enough, might effect self-cure. Young children afflicted with nævus are hurried to the surgeon, under an impression that the disease must necessarily spread, and that therefore the sooner an operation is done the better. Such haste is not always found necessary, nor even prudent. For a short time after birth a nævus may continue to grow,—for several weeks, perhaps; then it may cease to enlarge. If it be of a simple cutaneous variety, it may become the seat of ulceration; this may spread, but it will destroy the nævus. In other instances, a nævus, after growing to a considerable size, will become the seat of atrophy,—will dwindle, shrink, and degenerate, until little or nothing of it is left.

Electrolysis.—Treatment of the vascular nævi by the galvano-cauterant is at present in much esteem. Dr. Maas, of Breslau, has collected in the *Archiv für Klinische Chirurgie* (vol. xii.) the histories of one hundred and twelve cases of nævi treated by this method. The results were as follows: *Capillary nævus*—cured, 32; improved, 1; result unknown, 1. *Cavernous or venous nævus*—cured, 72; improved, 8; result unknown, 1; died, 3. *Arterial or racemose nævus*—cured, 2; improved, 1. *Nævus combined with other tumors*—cured, 6; improved, 1; result unknown, 2. This surgeon deduces from the examination of his cases the conclusion that the galvanic cautery is followed by the best results, and is much safer than the injection of perchloride of iron or other coagulating fluid. It would, however, be wrong to say positively that the remedy is indicated in all cases of nævi. As Virchow has well remarked, the physician is to take the circumstances of each lesion into consideration. The battery used in the cases referred to was that of Middeldorpf.

In the use of the means of electrolysis, a difficulty encountered arises out of the experience that occlusion of one venule or other radicle seems to have but little influence on its neighbors, thus necessitating repeated operations until the electrolytic action has directly influenced almost each individual vessel. Moreover, since galvano-puncture thus cauterizes the tissues as well as coagulates the blood, it is evident that a slough must ensue, provided the superficial portion be much affected; and if such an occurrence must take place, with its consequent cicatrix, it is preferable to have it occasioned by the more speedy action of a ligature. The slough of galvano-puncture is, however, perfectly devoid of hemorrhage, since it is tardy in its separation, and remarkable for its extreme dryness.

These objections to the use of this means apply only to cases which are superficial, or where the skin is implicated. In subcutaneous nævi the operation possesses the advantage of being safer and more certain than injection, and in cases where no slough is necessitated the scar of an excision or ligation is avoided,—that is, provided insulated needles are employed. A Bunsen or other battery may be used, the number of needles varying with the size of the tumor; but in all cases care is to be taken not to carry the action beyond the whitish hue indicative of cauterization. In regard to the introduction of gas into the circulation by this method, little danger is to be apprehended, notwithstanding the opinions of Rutherford and other able writers on electro-therapeutics. In cases of huge nævi or vascular tumors, the practice is to be pursued with advantage, especially when excision is hazardous.*

Tearing.—A method of treating nævi practised and highly commended by certain English surgeons is that of "piecemeal" removal; *i.e.*, tearing the mass away fragment by fragment, the object being to prevent hemorrhage, on the same principle as in torsion of arteries.

The repeated use of a needle, heated to redness by means of an alcohol-lamp, thrust a sufficient number of times and on a sufficient number of

* "ELECTROLYSIS.—Drs. Beard and Rockwell, in the *Medical Record* for July 15, 1872, publish some of their results in the use of electricity in surgery:

"In the treatment of erectile or vascular tumors, they claim for electrolysis the following advantages over the knife or other methods: there is no hemorrhage; there is no scar; by proper management, the effect produced is solely upon the blood in the tumor; the operation is easily performed.

"In proof of this, they adduce cases.

"1. A child aged eight months, with an erectile tumor in the cheek. Four needles introduced for eight minutes. A clot was produced, which was wholly absorbed in four months.

"2. A large tumor in the back, in a weakly child aged one year. Same operation. Result unsatisfactory, as some ulceration followed, and the tumor remained.

"3. A child aged fifteen months, with a tumor near the angle of the mouth. Four needles introduced for ten minutes. In four months the tumor had disappeared, and no scar was left.

"4. A subcutaneous erectile tumor at the inner angle of the eye, in a child aged sixteen months. Three needles introduced for twenty minutes. Some sloughing occurred afterwards, and deformity was left. The authors think too strong a current was used, and for too long a time.

"5. A child aged eight weeks, with a nævus on the neck, just below the chin. One needle introduced and a sponge electrode applied externally for four minutes. Two and a half months afterwards there were signs of reappearance of the growth.

"6. Bronchocele of four years' standing, in a girl aged fourteen years. External galvanization twice a week for two months failed. Needles introduced; in four months, after about twenty applications, a great decrease in size in the tumor."

occasions into a nævus is a means that has yielded great satisfaction in the practice of the author. This applies particularly to nævi involving the skin under circumstances not permitting excision of the parts. The case of the white baby with nævus of lower lip and cheek, alluded to on page 683, furnishes an example. In that case heated needles were used each one, two, or three weeks for some four months, the child being etherized on each occasion. Cure of a complete type has resulted, and little trouble was experenced either by child, operator, or nurse.

Port-wine nævi are treated by ligation of supplying vessels, by the formation of points of issue, or by cross-sections. In a case of nævus of this character, involving a whole cheek, a second and isolated mark being related with the scalp of the temporal region, cure of both resulted from an inflammation provoked in the latter. The cross-sections proposed by Squire consist of a series of obliquely-directed cuts crossing each other at right angles, so as to divide a surface into many small squares; the operation to be repeated in one or two weeks if found necessary.

MEDIATE AFFECTIONS.

Scrofuloderma.—All facial skin affections traceable to scrofulosis are, clinically, to be denominated scrofulodermata. These affections vary in characteristics and find in the classifications of the dermatologists arrangement after different order. Treatment being, however, of a common expression, the disease is proved thereby individual.

Diagnostic features in the scrofulodermata relate with history and certain common features. Out of lymphatic stasis, and a consequent arrestation in tissue metamorphosis, arise all scrofulous manifestations let the forms be what they may. The disease may be inherited or acquired. Inheritance is more common than acquirement. Causes related with inheritance are syphilis, intermarriage of near blood-relations, impoverishment of tissue. Conditions pertaining to acquirement are insufficient or bad blood, lack of proper cleanliness, want of protection against atmospheric changes, malarial influences, living in sunless and damp rooms, depressing associations.

Accepting a common type of local manifestation for description we consider an indolent swelling, much in general appearance like the syphilitic gumma, which shows itself upon the face, remaining for a long time stationary, breaking down, not unlikely, eventually into an ulcer. The meaning of the process from beginning to ending is in tissue stasis, by which is meant, repeating for emphasis our definition, interference with, and arrestation of, nutritional activity.

The commonest expression of scrofuloderma is that so frequently met with upon the sides of the neck and beneath the chin. Here the condition of stasis is most appreciable, the organs primarily involved being the lymphatic glands. The breaking down of a gland, and of its overlying tissue, is a direct phase of the lesion.

A scrofulous ulcer is usually of uneven, undermined, ragged edge, has a bottom covered with a flaky deposit among which indolent granulations of a palish red show themselves, gives off a curdy pus, is not unlikely found incrusted with scabs, and is painless. Diagnostic concomitants are coryza, otorrhœa, palpebral conjunctivitis.

Treatment.—Cure of the scrofulodermata lies in a medication directed to the lymphatic system. Toward this end nothing in the estimation and experience of the author equals "roughing it,"—salt baths taken as directed at page 106, deep breathing induced by running up-hill, the temporary drinking of alcohol, working in a horse-stable or in a butcher's yard, arousing the system to vigorous action and feeding it with pure air as found among mountains or by the sea-shore. Medicines used are iron, iodine, arsenic, nux vomica, cod-liver oil. Local applications are benzoated zinc ointment, tincture of calendula, tar cerate, solutions of iodine, mercurial preparations.

Syphiloderma.—By the syphilodermata are meant all skin manifestations arising out of the syphilitic vice. These are met with in the forms of macules, papules, pustules, tubercles. The forms succeed one another, or, what is more likely, are met with upon the same surface at the same time.

Like the scrofulodermata the syphilodermata find diagnosis in history and in local peculiarities. The syphilides are always preceded by a primary stage of the disease. Appearing upon the face the form is almost constantly that of erythematosum. The blush is persistently copper-color. No pain, itching, or other subjective symptoms are present, except at times when the patient finds himself over-warm in bed.

Facial syphilitic tuberculosis, a condition allied with tertiary manifestations, consists of one or several prominences varying in size from a split pea to a finger-point, hard and resisting to the touch, rounded and conical in form, copper-colored, usually of smooth and glistening surface. Progress in development is slow, several weeks commonly elapsing between time of appearance and suppuration. A resulting ulcer is differentiated from one of scrofulous nature in not being undermined nor ragged.

Gumma is markedly peculiar to the forehead as the facial region is concerned; two, seldom over three are found together. A gumma is in shape and size not unlike the dorsum of the middle phalanx of a finger; more rounded perhaps. Cases, however, are recorded where the size of a hen-egg has obtained. The skin is more or less involved, is of a coppery purple, and looks apparently toward pointing. Consistence of tumor is that of tough dough; at times it is quite elastic, sometimes markedly fluctuating.

A gumma tends to break down; skin, cellular tissue, and deeper structures giving way before it. The ulcer resulting is of perpendicular edges and abrupt as related with associate parts. In place of disintegrating a gumma may disappear by absorption.

Other forms of the syphilodermata are the papular, large, small, and lenticular, these being of dry and moist varieties; the vesicular; the pigmental;

the pustular, these being of the acuminated and miliary kinds; last, those pertaining to hæreditarium infantile.

TREATMENT.—All syphilitic manifestations are prescribed for on the principle of specificness: the antidote is mercury. A recipe directed toward the constitutional condition most frequently used in the practice of the author is as follows:

℞.—Hydrargyri bichloridi, gr. ij;
Potassii iodidi, ℥ij;
Extracti fluidi sarsaparillæ, ℥viij. M.
Dose, tablespoonful three times a day.

If judiciously directed, this combination may be continued over a period of weeks, if found necessary, without touching the gums. In sickly subjects it is well to combine with it a bark tonic. (See *Treatment of Syphilis of Tongue.*) Locally, a syphilitic ulcer is to be treated in consideration of whatever may be the peculiar indications. Much benefit generally ensues from touches of caustic application, chloride of zinc, acid nitrate of mercury, London paste, and iodine, being valuable remedies in this direction. It is a habit with the writer to apply the cauterant and afterward to keep the part packed with absorbent cotton or, preferably, lint, saturated with a solution, made to meet indications, of tar-water, glycerine, and carbolic acid.

A syphilitic tubercle, papule or gumma, met with in the non-ulcerous stage commands effort for its cure by absorption. The recipe given above is almost surely curative.

Parasites.—Certain skin affections exist in the presence of parasites; of such parasites there are two general forms, animal and vegetable. The animal parasites are acarus scabiei, or itch-mite; pediculus capitis, or louse; acarus folliculorum, or gland insect; the pilex irritans, or common flea; the cimex lectularius, or bedbug; the pulex penetrans, or sand-flea; the filaria medinensis, or Guinea-worm; and others of unimportant relation.

FIG. 453.

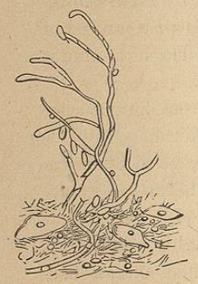


Illustration of a parasitic growth, oïdium albicans.

Vegetable parasites are achorion Schönleinii, the fungus giving rise to tinea favosa; the trichophyton, out of which arise three diseases, namely, tinea circinata, tinea tonsurans, and tinea sycosis; the microsporon furfur, the fungus of tinea versicolor. Tineæ is a generic term, signifying vegetable fungoid disease.

The origin of parasitic diseases is accident or want of cleanliness. All of them are contagious. The course is chronic. Medication lies in the employment of parasiticides. Cure is assurable.

Parasitic diseases met with upon the face, named in the order of their frequency, are tinea sycosis, tinea circinata.

Tinea Sycosis.—This is the familiar "barber's itch." It commences as a reddish, slightly scaly patch, followed in a week or two by desquamation and induration. The hairs of the part involved grow dry, loose, and brittle, showing points of pustulation about the follicles. From this condition the course of the disease is rapid, the skin becoming nodulated, and the deeper parts indurated. The surface, which has assumed a deep reddish color, becomes pustular, scabs of offensive appearance forming over the parts. A crust removed, the sore beneath shows a granulated face not unlike that of a broken fig: whence the name sycosis. The lesion generally involves the whole of the region of the lower jaw.

(Some dozen cases of a disease appearing upon the face met with by the author which is to be classified with the tinea, possess the following clinical features. There appears first an induration about the size of an almond; this, after a time, turns a purplish red and softens; affording fluctuation, it yet yields no pus when opened, but is seen to be composed of a watermelon-like stroma. Still later the original tumor lessens, but in proportion as it diminishes a second arises to take its place. The history of this second is that of the first, and so one after another come and go indefinitely. Relation of the hairs with the condition is that of tinea in every particular. The author has found these tumors invariably respond either to creasote daily brushed lightly over them, or a solution of corrosive sublimate, two grains to the ounce of water. The latter to be applied several times a day.)

TREATMENT.—The cause lying in the trichophyton fungus, the seat of which is the hair-follicles, treatment is necessarily specific. The practitioner, distinguishing the condition from that of sycosis non-parasitica, a matter not difficult, as this latter confines itself markedly to the hair-follicles, implicating the surrounding skin but comparatively triflingly, remedies known as parasiticides are selected. An application destructive of the particular fungus considered is the yellow sulphate of mercury, an ointment being used composed of fifteen grains to an ounce of simple cerate or of cosmoline. The bichloride is another mercurial of great value; one to two grains to the ounce of water as indicated. Still another remedy, one much employed, is sulphurous acid, one part to three of water.

A point is the manner of application: crusts are to be removed by means of poulticing. Hairs at all loose are pulled away. Shaving is to be practised to all the extent possible. Absolute cleanliness is to be preserved. Using an ointment, the medicine is to be gently but thoroughly rubbed into the parts. Employing a lotion, contact is to be continued for at least half an hour. Cure is slow; relapse frequent: treatment is to be persevered in for a long time.

Tinea Circinata.—Ringworm is a not unfamiliar condition. Its characteristics are one or several circular patches of varying size, commonly not larger than a twenty-cent piece, occasionally the size of a hand, appearing upon any part of the body.

The commencement of the disease about the face, as in other regions, is as a small red spot, which enlarges until the ordinary dimension and circularity are attained, the skin becoming, in the mean time, hyperæmic and desquamative.

A vesicular association is not uncommon, this arising out of a more than common irritability of the parts. The course of the disease is variable. In the child it is more amenable to treatment than in the adult. Cold favors cure; heat retards it. The affection is contagious. It is most frequently met with among the poor and ill nourished. Improvement is from the centre outward.

TREATMENT.—A domestic remedy that frequently proves successful consists in binding over the part a copper penny, which has been immersed in vinegar. Duhring commends an ointment composed of ten grains of ammoniated mercury to an ounce of simple ointment. Common black ink is a popular remedy. Goa-powder ointment is highly prized; this is an Indian remedy, consisting of the pith of a leguminous tree found in Brazil, rubbed up in a five-per-cent. admixture with cerate.

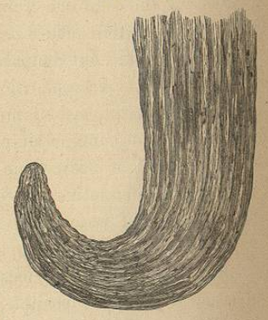
The general principle of cure, it is to be recognized, lies in detaching the scurf, and with it the superficial epidermic scales among which the parasite vegetates.

FIG. 454.

Horns growing from the nose and face.

(See page 668.)

FIG. 455.



Section of a horn, showing its laminæ.

CHAPTER XLIV.

LUPUS.

THERE are two general expressions of lupus: One of these, seen most commonly in the adult, is known as lupus erythematosus; the other, met with more frequently in the young, is designated lupus vulgaris.

Lupus Erythematosus.—The characteristic of this condition is an irregular, yet more or less roundish dry sore, appearing upon the face, having its situation most commonly either about the bridge or ala of the nose, or over the location of the infraorbital foramen, the surface being covered with adherent scales. Lupus presenting itself in this form is commonly of most chronic condition; if untreated, not being irritated through caustic applica-

FIG. 456.

Lupus erythematosus.

tion nor by scratching or picking off the scabs, it may remain a lifetime in the state described.

This expression of lupus begins in one of two ways: first, and most commonly, as a dry patch toward which attention is directed by the formation of scales; second, as several unepitheliated, isolated, patches which later enlarge and coalesce, forming in this way one large patch, or, it may be, two or three.

The scales of lupus erythematosus show in their abundance that the disease is a cellular new growth; also, out of a grayish or yellowish aspect sometimes pertaining to them, that it is associated with the sebaceous glands.