ORIGINAL ARTICLES.

RELATION OF HERPES GESTATIONIS AND CERTAIN OTHER FORMS OF DISEASE TO DERMATITIS HERPETIFORMIS.

By Louis A. Duhring, M.D.,
Professor of Skin Diseases in The University of Pennsylvania.

In my original communication on Dermatitis Herpetiformis, read before the American Medical Association, that disease was described, and its symptoms and several varieties given. It was there stated that the peculiar variety of the manifestation of the affection described by Hebra as "impetigo herpetiformis." This latter subject has more recently been elaborated by me in a paper read before this Association at its last meeting.

On the same occasion I presented a "Preliminary Note on the Relation of Dermatitis Herpetiformis to Herpes Gestationis and Other Similar Forms of Disease," which communication embodied the results of considerable research into literature bearing upon the subject. It was there stated, as had been intimated in my previous articles, that so-called herpes gestationis, as well as certain other similar forms of eruption, reported with various titles, are all instances of one process, namely, dermatitis herpetiformis, as I had defined this disease.

The remarks about to be made must be regarded as supplementary to the preliminary note referred to, since presenting which I have been able to investigate further and collate the notes of some of these cases, which I desire now to bring forward in substantiation of my statement. It will be observed that the clinical features of the cases bear a strong resemblance to one another. It will not be necessary, however, for my purpose to quote all the cases in extenso.

The object of this communication will be to show:

1. The identity of so-called herpes gestationis with the vesicular variety of dermatitis herpetiformis.
2. That certain other forms of so-called herpes reported with various titles are likewise manifestations of the same variety of this disease.
3. That certain cases reported as "peculiar forms of pemphigus" must also be viewed as examples of the vesicular or bullous varieties of this disease.
4. That instances of dermatitis herpetiformis are also to be found in literature under the title "hydroa" and under divers other captions.

In view of the fact that the general features of dermatitis herpetiformis have been so fully described by me, and, moreover, that numerous examples of the disease portraying the more important varieties of the process have been reported during the past year, it will not be necessary to reconsider the disease on the present occasion beyond pointing out the principal features of the two varieties which concern this paper, namely, the vesicular and bullous. The following is an abstract of the original description of the vesicular variety.

It is characterized by variously sized, varying from a pin-head to a pea, flat or raised, irregularly shaped or stellate, glistening, pale-yellowish or pearly, usually firm or densely distended vesicles, as a rule, unaccompanied by areola. In their early stages they can be seen only with difficulty, and are liable to be overlooked in the examination. Sometimes they can only be detected or seen to advantage in an oblique light. In size they vary extremely, large and small being formed side by side, and in this respect they differ from the vesicles of eczema. Here and there papules, papulo-vesicles, vesicopustules, and small blebs will sometimes be encountered. The eruption as a whole is disseminated, the lesions existing scattered more or less profusely over a given region, as, for example, the neck or the back, but they are not the most part aggregated in the form of small clusters or groups of two, three or more; or there may be patches here and there as large as a silver dollar, upon which a number will be seated. When in close proximity they incline to coalesce, as in herpes zoster, forming multilocular vesicles or small blebs. Where this occurs they are generally slightly raised and are surrounded with a pale or reddish areola, which shows forth the irregular, angular or stellate outline of the lesion. At this stage, moreover, the little cluster will generally present a "puckered" or "drawn up" appearance, indicative of herpetiform nature. The eruption is usually profuse, sometimes to the extent of the upper extremities, trunk and thighs being well covered. It may attack any region, but the neck, chest, back, abdomen, upper extremities and thighs are especially liable to invasion.

The most striking symptom is the itching. Not infrequently burning is also complained of. Itching, however, predominates, and is violent or intense. It is altogether disproportionately in excess of the amount of eruption. It is, moreover, a persistent itching, causing the sufferer to scratch constantly. It generally precedes the outbreak, and does not abate until the lesions have been ruptured. From my observation I should say that it is usually more severe and more lasting than

1 Notes of a Case of Dermatitis Herpetiformis Extending over Eleven Years. Illustrating the Several Varieties of the Disease. Philadelphia Medical Times, July 12, 1884.
2 Case of Dermatitis Herpetiformis (Multiformis) Aggravated by Pregnancy and Irregular Menstruation. THE MEDICAL NEWS, July 19, 1884.
5 Notes of a Case of Dermatitis Herpetiformis During Thirteen Years. The N. Y. Med. Jour., Nov. 15, 1884.
6 Case of Dermatitis Herpetiformis, with Peculiar Gelatinous Lesions. THE MEDICAL NEWS, March 7, 1885.
in vesicular eczema. The vesicles generally make their appearance slowly, so that several days or a week may be required for their complete development. Notwithstanding the fact that scratching is indulged in in the early stages of the disease, excoriations are not prominent, owing to the fact that the lesions do not readily rupture, and, also, that they incline to refill immediately on being evacuated.

If we look into the subject of herpes gestationis, it will be found that the term was introduced by Milton in 1872. Previous to this date, in 1867, Erasmus Wilson¹ gave brief notes of two examples of a disease which he designated "herpes circinatus bullous," considering them in a chapter devoted to the "chronic forms of herpes." In both cases the disease was associated with pregnancy, beginning with conception and ending with the completion of parturition. Mr. Wilson describes them as follows: "Both cases were remarkable for perpetual irritation and intense pruritic suffering. The bullae were of the flat and foliaceous kind, some filled with limpid serum and others with a mucous viscid fluid, and were associated with moist excoriations, thin crusts, papules, and pruritus. In one patient the cutaneous disease was the first intimation of pregnancy; the disease continued during the whole period, accompanied four or five pregnancies in succession, and completely exhausted her strength and health. In other respects, and in the intervals of being pregnant, she was a strong and healthy woman. The other patient was a woman aged thirty-six, the mother of nine children. The eruption made its appearance with the fourth pregnancy, and has accompanied every pregnancy since. When parturition was over the eruption ceased; but on the last occasion, nine months ago, it remained, and has now assumed a permanent character. In both cases the eruption was accompanied with sympathetic gastric disturbance and with a dulness and cachexia of the skin." It is evident that the cases illustrate the "herpes gestationis" of certain more recent writers, and, as I have stated elsewhere, that the disease is the same as described later by Hebra under the titles "herpes impetiginiformis" and "impetigo herpetiformis." It must be remarked, however, that Wilson gives no special account of the lesions, nor of the peculiarities of the disease, and it is doubtful for this reason that the attention of dermatologists was not fairly directed to the subject until Milton's report of a case in the Journal of Cutaneous Medicine, Vol. 1, No. 3, the paper being designated "on certain unusual forms of vesicular eruption," and the disease classed as an example of the "herpes circinatus bullous" of Wilson. In Milton's work on the "pathology and treatment of skin diseases," published a few years later, this case is again brought forward, on this occasion with the name "herpes gestationis."

The disease occurred in a woman aged forty-five, who was in the fourth month of her eighth pregnancy. It began with intense itching, smarting, and heat of the skin of the arms and forearms, upon which parts a vesicular and bullous eruption soon developed. The lesions were the size of a small pea, and generally in groups of two to four. They were mostly prominent and pointed in shape, but some were oblong with the ends apparently communicating. The disease developed rapidly, so that in a few days the greater part of the body was involved. There was constitutional disturbance, and the local irritation was most distressing. Two weeks after delivery she was on the road to recovery. She had had similar attacks twice previously, with her first and fifth pregnancies.

We next meet with Bulkley's case,¹ which he, likewise, designated "herpes gestationis," adopting the name proposed by Milton. The case was that of a married woman, thirty-two years of age, who was confined with her first child. The cutaneous manifestations appeared two months previous to her delivery, on the hands and feet, and subsequently involving the greater part of the general surface. It began in the form of papules, which rapidly passed into vesicles, and later blebs developed. The vesicles, which were generally in groups, varied in size from very minute elevations to large blebs. After they had ruptured a brownish stain remained. There was at no time any resemblance to vesicular eczema, nor did the lesions pass into pustules. The eruption was attended with intense itching, and later with much prostration and considerable fever.

The disease disappeared after delivery, but recurred with her second pregnancy. If we look into the four cases just quoted, it will be seen that they resemble one another closely in their clinical features, and that the cause (pregnancy) in all was the same, from which fact both Milton and Bulkley concluded that the term herpes gestationis was expressive and appropriate. This name, as is well known, has since been employed by other observers reporting like cases, and would not be criticised were it not for the fact that the affection is also encountered in men,—an observation which my articles and several of my published cases show; also that it may occur associated with other primary lesions than vesicles, thus rendering the name herpes inappropriate and misleading. The name proposed by Mr. Wilson is even more descriptive than herpes gestationis, and has the advantage of being non-committal as to the etiology of the process. But the term is not sufficiently comprehensive to include other known manifestations of the same extensive pathological process which cannot be regarded either as varieties of herpes (as this term is understood by dermatologists) nor as having either circinate characteristics or blebs. Thus, we note that while the titles proposed by these observers answered the purpose provisionally, recent studies have demonstrated that this form of disease is but one variety of an extended multiform cutaneous process.

Several other cases, some of them possessing peculiarities, may be cited.

Beverhout Thompson gives brief notes of a case² of "herpes gestationis," following Milton and Bulkley, which must be looked upon as the mildest expression of the disease. The patient was a woman, aged

² London, 1872.
twenty, in the eighth month of pregnancy, the eruption consisting of grouped vesicles and blebs, which were confined to the fingers, toes, backs of hand and wrists, and feet and ankles. The attack was an acute one, recovery taking place after delivery, which occurred three weeks after the beginning of the cutaneous manifestations.

With the title "clinical remarks on a case of herpes gestationis," Livingstone reports a case that had been under his observation in Middlesex Hospital occurring in a woman thirty-seven years of age. The principal features may be briefly cited. The third day after delivery "a copious eruption of scattered solid papules and discrete vesicles appeared; the latter quickly developed into blebs of various sizes. . . . The bullae had a tendency to form groups, but were all discrete, the skin in the neighborhood being more or less covered with scattered solid papules as large as good-sized shot. The itching was intense." Here there was present a marked papular element, the disease being characterized by papules, vesicles, and blebs, and the use of the term herpes, it must be noted, is altogether inappropriate and fails to convey an idea of the clinical picture.

Cottle's paper on "herpes gestationis," in which a case is given, which illustrates more particularly the multiform variety of dermatitis herpetiformis. The patient was a woman, thirty-eight years of age, the cutaneous manifestation in the first attack, in the first pregnancy, being urticarial in form—in "bumps," to quote the author. In the second attack it was of the same character, but in the third it occurred in the form of relapsing blebs and vesicles. In the same paper mention is made of another similar case, where the lesions were hard papules which later developed into small blisters.

Gale's two cases ("herpes gestationis") may also be referred to briefly. The first was that of a woman, aged thirty-nine, who had suffered on six occasions, usually four days previous to her confinement. It is stated that the disease began like "erythema papulorum," later blebs appearing, and that there was no pigmentation or grouping of the lesions. The second case occurred in a woman thirty-four years of age, the disease having appeared no less than eight times in a period of eleven years, accompanying her pregnancies.

Walter G. Smith, with the heading "herpes (or hydroa) gestationis," gives the notes of a remarkable case, showing the multiform variety of dermatitis herpetiformis. The patient, aged thirty-five, had been married thirteen years, during which time she had experienced two miscarriages and seven full-term pregnancies. Five years before while pregnant with her third child, in about the sixth month, an eruption, similar to that for which she sought advice, appeared like "ringworm" around the umbilicus, spreading rapidly over the body and limbs. It persisted during gestation and for two months subsequently, and was accompanied by intense irritation, itching, and burning. She remained perfectly free from any cutaneous disease until three months pregnant with the seventh child, the eruption appearing around the umbilicus in exactly the same way as in the first attack, namely, as a cluster of papules or vesicles. Within the first week after parturition the eruption underwent a great aggravation. "Large vesicles and blebs formed, and when punctured clear fluid spurted out with force." When the child was three months old the affection had nearly disappeared, but subsequently a relapse occurred.

The following is an abstract of Dr. Smith's description of the disease at the date of observation. Numerous irregular clusters and groups of papulo-vesicles, and pigmented stains of the vesicles on the arms; clusters of pimples on the thighs and knees, disseminate lesions down the legs, and blebs on the soles of the feet. Later, there were still to be found a few papules and imperfect vesicles, which looked and felt like the first stage of a variolous eruption. . . . After each delivery that was preceded by the eruption the nails fell off the hands and feet. At present all the nails are marked with transverse furrows. The eruption came out in successive crops, and each outburst was preceded by a feeling of itching and heat.

The case brings to mind that reported by Barengrun sprung with the name "herpes cirsinatus," and depicted in his Atlas of Skin Diseases. Hebra regarded this case as illustrating his "impetigo herpetiformis," an observation to which I have elsewhere directed attention.

French writers, with some exceptions, do not seem to have recognized herpes gestationis. M. Barthélemy, however, in his translation of my Treatise on Diseases of the Skin, in a note states that "it is the same disease as that which Hebra calls impetigo herpetiformis of pregnant women." Among the recent German authors, Kaposi makes no allusion to herpes gestationis. Behrend only incidentally refers to it (quoting Bulkley) in considering the etiology of pemphigus. Nor do we find more than the briefest reference to the subject in a recent volume on skin diseases by Malcolm Morris. He says "herpes gestationis occurs in pregnant or parturient women, but is rarely seen in England." No mention whatever is made of impetigo herpetiformis (Hebra). In this country the latest author, Robinson, makes herpes gestationis a variety of herpes, placing it between the varieties "progenitalis" and "zoster," and stating that it may be regarded as belonging to the herpetic or pemphigus group of cutaneous diseases, and that he has observed two cases. A separate chapter is devoted to impetigo herpetiformis (Hebra).

Other forms of so-called herpes, such as "herpes pemphigoide," "herpes vegetans," "herpes pyamidicus," and "herpes phlyctænodes" may here be referred to. The first of these, described by Devergie, will be considered later in connection with pemphigoid eruptions. Herpes vegetans was employed by Auspitz to designate a case subsequently reported and called by Hebra impetigo herpeto-
formis, the case being one of the group of Hebra's cases. Neumann, in his Hand-book of Skin Diseases, 3d edition, briefly alludes to the same disease, but regards the term herpes pyemicus as more expressive of the condition.

Gibert describes a case representing an unusual form of disease under the name "herpes phlyctenodes," as follows: The patient was a woman twenty-seven years of age, who was in 1834 for the first time attacked with a "phlyctenoid eruption," the origin of which she attributed to a severe fright, which she experienced on the invasion of France by the allied troops. Ever since, she has been subject to an anomalous eruption of small vesicular elevations, appearing sometimes on the trunk, sometimes on the face, sometimes on the limbs, and by a bright redness of the skin, and intense itching and smarting. Three years later she had more frequent and violent returns of the cutaneous disease; the cutaneous periods became painful, and the discharge scanty. Two years afterwards she entered the hospital St. Louis. The dorsal aspect of the hands and forearms was red, swollen, hot, inflamed, and extremely painful to the touch, covered with a number of small vesicles, most of them miliairy, others the size of a pin's head, others even that of a small pea. These elevations, first noticed in the form of small red points, became more sensitive as they enlarged. At first they were colorless and transparent, afterwards turbid and opaque, resting on an inflamed base, most of them distinct, some blended and grouped together, discharging a considerable quantity of fluid on bursting. Violent itching, burning heat, and severe smarting accompanied the eruption, producing restlessness, and causing intense suffering to the patient.

The case without doubt, it seems to me, was an example of the vesicular and bullous varieties of dermatitis herpetiformis, and calls to mind, in its similarity as concerns the etiology, the case of Captain K., reported by me with the title "A Case of Dermatitis Herpetiformis Caused by Nervous Shock."

I come now to the consideration of a series of cases which have been grouped by the reporters under the head of "pemphigus," usually with various adjectival qualifications, which are clearly examples not of true pemphigus, but of that multiform and protean process under discussion. That these cases were not regarded as ordinary pemphigus is manifest from the statement of the reporters that they possessed peculiar characters. The titles indicate that the writers (for the most part well-known dermatologists) were at a loss to classify them, such names as "pemphigus herptiforme," "pemphigus variegatus," "pemphigus phlyctenodes," "pemphigus aigu pruriginoso," and "pemphigus circinatus," showing a varied and uncertain nomenclature.

I shall cite some of these cases, before doing which, however, a brief description of the bullous variety of dermatitis herpetiformis may be presented, the account being an abstract from my original communication.

It is characterized by more or less typical blebs, tense or flaccid, rounded or flat, usually the former, filled with a clear or cloudy fluid, seated upon a non-inflammatory or indurated base, varying in size from a pea to a bean, and mostly irregular or angular in outline. They incline to group in clusters of two or three, the skin between them being reddish and more or less puckered. Sometimes in immediate proximity will exist one, two or three or a part of a circle of small, pin-head sized, flat, whitish pustules. Vesicles, small or large, flat or raised, are also generally found near by or disseminated over the affected surface. As in the other varieties of the disease any region may be attacked, but more especially the trunk, upper extremities, and thighs. The lesions are generally soon ruptured, crusting with yellowish, brownish or greenish crusts. They are accompanied by burning or itching, which may prove severe. They must be distinguished from the lesions of pemphigus, with which of course they may be readily confounded, but they are herpetic in character. They differ in that they incline to group, and have a more inflammatory, herpetic aspect, the type of which appearance is seen in herpes zoster. Moreover, around and near the bleb will usually be found vesicles and often pustules, the latter frequently in close proximity.

Looking into the earlier French literature we find Rayer speaking of pemphigus "circinatus" as a variety of this disease; and stating, moreover, that he was the first to notice it. He gives a case, to quote his words, of "acute pemphigus, with simultaneous eruption of bullae on the right forearm; annular erythema; herpes phlyctenodes." The patient was an unmarried woman, twenty-three years of age, with regular menstruation. The disease began with itching and the appearance of small red spots which were succeeded by small blebs closely crowded together, which gradually became large and increased in number. Here and there they ran together. As a rule, they were without areole. Some of them were opaque. Crusts were also present. Annular patches of erythema were also observed.

Another case, reported by Rayer, is that of "chronic pemphigus; bullae arranged in bands; complication with herpes circinatus." I shall not give the notes of this case because of their unusual length, but it may be stated that, in my opinion, the disease was one of dermatitis herpetiformis; the peculiar erythematous patches, herpetic groups of vesicles, blebs, the excoriations and the crusting, the itching, the severity of the attack, and lastly, the duration of the disease, all pointing to this disease rather than to any other affection.

Still another case is recorded by Rayer, as one of "chronic pemphigus, presenting isolated bullae, and clusters of an eruption similar to that of herpes phlyctenodes; amenorrhoea; recovery." The woman was forty-two years of age. There were constitutional disturbance, severe itching, and a copious diffuse eruption of groups of variously shaped and sized blebs, which appeared in successive crops.

Chausit describes at length two cases, both occurring in women, with the title "pemphigus aigu pruriginosus," which likewise are to be viewed as examples of dermatitis herpetiformis. One of these cases may

1 A Practical treatise on the special diseases of the skin. Translation from the French, London, 1845, p. 118.

be quoted. A woman, aged 23, of robust constitution and good general health, was delivered of her first child six weeks before full term. At the fifth month of gestation itching and an eruption of numerous minute solid papules upon the body and limbs manifested themselves, the itching increasing in severity as pregnancy advanced. On the fifth day after delivery she experienced even greater itching and general burning, together with fever and some delirium. The following day the whole surface was covered with a confluent efflorescence of large elevated red papules, resembling in some respects those of erythema papulosum. The skin presented the same appearance for two days, and on the third there were noted on the arms a few disseminated transparent blebs varying in size from a haricot-bean to a hazel-nut. The blebs increased in number until on the eleventh day the whole surface, including the face, was invaded, the burning and itching by this date having ceased. The papules disappeared, new blebs, starting as such, coming out from day to day until the seventeenth day when they disappeared leaving brownish stains. A month after there was slight itching over the general surface together with a few groups of papules, but no more blebs formed.

The popular manifestation preceding and following the blebs would in itself be sufficient to differentiate the disease from true pemphigus, the affection with which it might be confounded.

In considering pemphigus, Devergie, 1 under the heading, "pemphigus composit," gives a case with the title, "herpes pemphigoide," as follows: "The patient was a woman, fifty years of age, who had ceased menstruating five years before. The disease began with itching, followed by an inflammatory patch covered with large vesicles, which rapidly passed into blebs. Soon various regions were invaded, until the whole surface was well covered with eruption. Large red patches, more marked on their periphery than at the centre, surrounded by one or two rings of blebs, crust in the centre, formed from time to time. The itching was especially marked on the periphery of the patches. The patient recovered.

As in Chausé's case quoted, the multiform erythematous patches here were marked features in the manifestation; also the subsequent evolution of the lesions, all suggesting a peculiar process. This might be compared to an exaggerated erythema multiforme, showing the several varieties of the disease, especially the bullous, rather than to pemphigus. Indeed, I may here state that dermatitis herpetiformis in some cases manifests itself with many of the clinical features of erythema multiforme. Its relation to this disease is a question in my mind already ripe for discussion.

Devergie also alludes very briefly to "pemphigus herpetiforme," which, he states, he has frequently seen invade the whole body, the patient succumbing to the disease as in other forms of pemphigus.

Hardy 2 divides pemphigus into acute and chronic; under the latter he makes three varieties; first, le pemphigus bulleux successif; second, le pemphigus follicul; third, le pemphigus pruriginex. The last variety, which he illustrates with a case, should it seems to me be regarded as an example of the combined vesicular and bullous varieties of dermatitis herpetiformis. The patient was a woman thirty-five years of age, who had already had nine children, and was at the date of observation at the close of the last month of her tenth pregnancy. Since her second pregnancy she had suffered, coming on some weeks after conception, from an itching eruption, involving the whole general surface, characterized by blebs the size of a walnut. At the same time the skin became brown, and the seat of a viscid secretion. The symptoms were augmented up to the time of delivery, after which they subsided insensibly.

Under the title of "pemphigus," Klein 3 gives the notes of a case which some writers (Milton and Bulkley) on herpes gestationis have regarded as an example of that disease, but which, if my views be adopted, must be looked upon as another instance of the combined vesicular and bullous varieties of dermatitis herpetiformis. The case was that of a woman thirty-two years of age, the disease beginning in the seventh month of pregnancy, characterized at first by millet-seed sized vesicles, which subsequently developed into blebs as large as a hen's egg, with contents at first clear but later becoming turbid. At the same time severe pains were present, and the strength of the patient declined. The disease disappeared shortly after delivery.

I have next to observe that, under that vague term "hydroa" some cases are found in literature which, I think, might more properly be regarded as examples of dermatitis herpetiformis. Thus, Bulkley 4 gives the notes of "two cases of hydroa," which were read before the New York Dermatological Society, and which it seems should be regarded as examples of that disease. The first case was a married lady, 40 years of age, "who presented a very anomalous eruption, which was then composed largely of bullæ." Three months previously, while in Europe, the disease had been diagnosed eczema by several dermatologists, and was there treated, but with little success. The description given by Dr. Bulkley, especially as relates to the bullæ; the "moist exuding portions of surface;" the "almost unbearable itching;" the constitutional disturbance; the wide extent of the eruption; and the course of the disease, are peculiar and unusual. The case, I think, should rather be classed as an instance of dermatitis herpetiformis than as one of so-called hydroa, the existence of which latter disease, viewed as a distinct process, I am not willing to admit.

In the second case occurring in a married lady aged 26, the first outbreak consisted of erythematous patches, which burned and smarted, and passed away in a few days. Six weeks later there was an attack of

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4 Archives of Dermatology, April, 1877.
blebs, preceded by considerable itching; later there was irritation of the skin, red erythematous patches, and blebs, occupying both arms and forearms, left shoulder and back, left leg and face. In both cases there were marked neurotic elements.

I shall only allude to two other cases. In an article bearing the title "Über die coincidenz von Erkrankungen der Haut und der grauen Achse des Rückenmarkes," Jarisch gives the particulars of an unusual case, upon which his observations on the spinal cord were based, with the diagnosis "herpes iris," to which I must refer. The patient was a married woman sixty-one years of age. In 1874 she is said to have had disseminated blebs upon her face and on the arms, which disappeared spontaneously. In 1879 she was admitted to the Vienna General Hospital with an abundant, symmetrically disposed, vesicular, bullous and purulent eruption confined almost exclusively to the upper half of the body, including the upper extremities and head. The face and scalp were much swollen, reddened, and covered with crusts or with isolated and grouped blebs seated on a dark bluish-red base. Both arms and forearms showed a large number, for the most part grouped, of pin-head sized papules and vesicles, with hazel-nut sized blebs or epidermis elevations the size of a dollar seated upon inflamed skin. Upon both surfaces of the thorax the epidermis in patches the size of a hand was loose or detached. In addition, over the whole diseased surface, superficial, crowded, millet-seed sized papules with bright-red areola existed. Upon the abdomen, dark bluish-red, slightly scaly papules occurred in groups. The epidermis of both soles of the feet was raised in the form of a hemorrhagic bleb. The mucous membrane of the tongue was dried, the rest of the mouth swollen, reddened, and in places excoriated. There was considerable fever, and the patient was very weak and debilitated. Some days later the eruption disappeared in great part, and was followed by scaling, crustling and brownish pigmentation. In the course of the next month the patient suffered new eruptions of vesicles, bedsores, abscess, and died; the autopsy disclosed Bright's disease of the kidney in the third stage and lobular pneumonia, with changes in the spinal cord extending from the third cervical to the eighth dorsal vertebra. The disease of the skin, it will be remembered, extended from the vertex to the region of the navel. In the report nothing is said of the subjective symptoms. I have referred to the case because it has sufficient points in common with dermatitis herpetiformis to warrant its being classed here rather than elsewhere.

Another peculiar case worthy of record here is that reported by Dr. P. Meyer, 2 of Strassburg, with the title "a fatal pemphigus-like dermatitis with changes in the nervous system," occurring in a previously healthy and well-nourished man sixty-five years of age. The disease began as a diffuse "eczema," showing the varieties "papulousum," "vesiculousum," and "rubrum," unaccompanied, at first, by constitutional symptoms. Up to this time it seemed to be a simple eczema. About the fourth week irregularly scattered large blebs appeared on the buttocks and lower extremities, with sudden loss of appetite, increased frequency of pulse, higher temperature, and other signs of constitutional disturbance. The patient began to fail rapidly, the disease now taking on the form of a malignant pemphigus foliaceous, and died; the whole disease ran a rapid course of seven weeks. The case presents certain cutaneous symptoms common to dermatitis herpetiformis, and is entitled to mention in this connection because of the great multi-formity of the lesions that may occur with skin diseases of this nature, that is, those depending upon disturbance of or changes in the nervous system.

REPORT OF TWO CASES OF PERFORATION OF THE MASTOID CELLS FOR SUPPURATION OF THE MIDDLE EAR.

BY J. D. STRAWBRIDGE, M.D.,

OF DANVILLE, PA.

In December last, while visiting with Dr. George Strawbridge, the Philadelphia Dispensary for Diseases of the Eye and Ear, at the corner of Thirteenth and Chestnut Streets, a child was presented with a large abscess of the mastoid. The abscess was opened, and in the conversation which followed, I was asked by Dr. Strawbridge, "How do you open the mastoid cells?" I answered, "I have done it with a gimlet!" The expression of incredulity which passed over the countenances of several gentlemen present, is the motive, and must be my excuse for reporting the following cases, the first almost entirely from memory. The facts are as indelibly fixed in my mind as if it had occurred but yesterday. The date has been fixed from the recollection of several persons then residents in the vicinity, who saw the patient during his illness, and knew of the operation.

CASE I.—G. R., Englishman, puller, while at work in a rolling mill, was taken with pain in his right ear. Was attended by an irregular practitioner for over six weeks. While visiting in an adjoining house, I was called in haste to see this man, who was thought to be dying. I found him propped up in bed, in a stupor, with low muttering delirium from which he could not be roused, the whole left side of his head was one enormous abscess, the scalp was raised up from more than half the cranium, the swelling extended nearly across the forehead, around and beneath the eye, closing it. Over nearly the whole side of the face, and down the neck, both in front and behind the sterno-mastoid muscle, the auricle was doubled up, nearly covered by the swelling, and the meatus could not be seen. In fact, looking on the distorted mass from that side alone, it could scarcely be recognized as a human head. Without the least expectation of saving life, I determined to evacuate the abscess and await results. I made a free incision behind the ear down to the bone, a second over the anterior inferior angle of the parietal bone, and a third in the face in front of the ear; from these three openings more than half a pint of horribly offensive pus discharged during my presence.

1 Viertelj. für Derm. u. Syph., 2 u. 3 Hefte, 1880, p. 195.