CASE
OF
VACCINE DISEASE AND MEASLES,
EXISTING
AT THE SAME TIME IN THE SAME INDIVIDUAL.

By S. GILDER, Esq.

ASSISTANT SURGEON TO THE COLDSTREAM GUARDS.

COMMUNICATED

By MR. HUNTER.

Read April 30, 1822.

A FEMALE infant was vaccinated by me with two punctures in each arm, from a very healthy child fourteen months old, on the 27th of December, 1821. On the following day, the brother of the infant had a distinct eruption of measles, which covered the whole body, and exhibited a most perfect case of rubeola vulgaris. On the 30th of December, the infant vaccinated on the 27th, was seized also with symptoms of measles, which increased on the second day; and on the third, the eruption of measles was general, resembling, in its appearance, that of the child first attacked. A third and a fourth child successively became infected; in them also the disease went through its na-

tural progress. Dec. 31st, the fourth day from that on which the infant was vaccinated, the usual appearance was exhibited in both arms. Jan. 3d, the eighth day, a considerable accumulation of lymph had taken place in the four vesicles ; the areola of which were not so distinct as they ordinarily are in consequence of the more prevailing and darker eruption of the measles, which disease had continued with regularity and severity. With matter procured from one of the vesicles, I vaccinated on this day (the 8th) another healthy child, aged two months, in an opposite part of the town, with a single puncture in each arm ; that in the left only succeeded, and its progress was perfect.

On Jan. 6th, the eruption of the measles had quite faded, the four vesicles were large and perfect.

During its illness, the infant had much cough and difficulty of breathing. I applied four leeches to the chest, which bled very profusely ; the child in consequence became extremely debilitated ; with the assistance, however, of mild nourishing diet, it had, by the 10th, gradually recovered from the effects of the depletion. At this period, the vesicles had not dried, not having been exposed to the air. On the 15th, the infant, in all respects, surpassed my most sanguine expectations in her recovery. Perfect scabs came away from both arms, and are now in my possession, as well as one from the child of two months old, which had been vaccinated from it.

The foregoing statement will, I presume, go to prove that two hitherto accounted distinct diseases may exist and proceed uninterruptedly in the same constitution at the same time, without any apparent deviation from the regularity which each disease would exhibit per se. Such an assertion certainly, in a great degree, tends to subvert the theory of John Hunter, who says, in his 'Animal Economy,' "It may be admitted as an axiom that two processes cannot go on at the same time in the same part of any substance." This observation, however, is somewhat foreign to the present question; but he again says, in his 'Treatise on the Blood,' &c., "As I reckon every operation in the body, an action, whether universal or partial, it appears to me, beyond a doubt, that no two actions can take place in the same constitution, nor in the same part at one and the same time." He adds, "for instance, a person is inoculated, and the puncture does not inflame for fourteen days, cases of which I have seen; is not this deviation from the natural progress of the disease to be attributed to another disease in the constitution at the time of inoculation?" He then relates a case where the usual progress of inoculation performed by himself, was suspended, in consequence of the appearance of the measles; on the disappearance of which last complaint, the small-pox again came forward, went through its usual course, and terminated favourably: see page 9, Vol. I. Treatise on the Blood. Now this is a case in point, and differ-

ing only from mine, in this being cow-pox and that small-pox; in what this distinction consists in so far as the constitution is concerned in regard to its capacity for receiving the infection of the matter of the cow-pox, and not of the small-pox, whilst evidently labouring under a specific disease, is a question I shall leave for more able reasoners to discuss. All that I wish to shew is, that the patient in question was without a doubt under the immediate influence of the infectious effluvia of the measles when it was vaccinated; that this general derangement of the system did not incapacitate the vaccine virus taking effect, and proceeding with all due regularity, appears most evident by the lymph taken on the eighth day, during the time that the eruption of measles was apparent, having been inserted into the arm of another infant, and producing the regular appearances and stages of vaccination.