

The tendency in treatment is towards a higher dosage of penicillin. Our case received a million units daily for 50 days.

PHILIP R. GRAVES, M.D., M.R.C.P.,  
Assistant Physician, Chester Royal Infirmary.  
I. J. BRODIE RUSSELL, M.B., Ch.B.,  
Lieutenant, R.A.M.C.; late House-physician,  
Chester Royal Infirmary.

#### REFERENCE

Paul, O., Bland, E. F., and White, P. D. (1947). *New Engl. J. Med.*, 237, 349.

## Skin Eruption in Newborn due to Bromism Derived from Mother's Milk

French states that "bromide and iodide eruptions have been recorded in infants at the breast when the mother has been taking the drug without presenting any cutaneous symptoms herself." In the following case the main point of interest is that the rash did not appear until 11 days after the mother had stopped taking the drug.

#### CASE REPORT

The patient was the third premature child of a mother who had had antenatal toxæmia during all her three pregnancies. She had had adequate antenatal care and a diet with a high vitamin content, and her general health had been normal before the appearance of the toxæmic symptoms. The Kahn test was negative. The expected date of confinement was March 27, 1949. On January 25, at about the 32nd week of pregnancy, she complained of headache and slight general oedema. Her blood pressure, which was 120/80 mm. Hg on January 4, rose to 165/105, and there was a trace of albumin in her urine.

On admission to hospital on January 26 she was kept in bed and put on a salt-free diet. Potassium bromide and chloral hydrate, each 20 gr. (1.3 g.), were given twice daily. Her symptoms began to abate and the daily urinary output was adequate. The resting blood urea on February 4 was 30 mg. per 100 ml. From February 2 potassium bromide and chloral, same dosage, was given only once every night, although the salt-free diet was continued. On February 11 she went into premature labour, resulting in the spontaneous delivery of a male baby, premature and rather blue. The mother appeared quite well after delivery, although her blood pressure was raised to 160/118. The last dose of potassium bromide and chloral was given that night. The blood pressure dropped to 126/94 the next day and urination was adequate. Normal diet was resumed on February 14. No cutaneous lesion appeared in the mother.

The baby's birth weight was 3 lb. 8 oz. (1.59 kg.). The usual treatment for premature babies was carried out. Half-strength normal saline was at first given and later quarter-strength expressed breast milk was added. When the mother's lactation was established all her milk was given to the baby. On the eighth day the baby received full-strength expressed breast milk, 2 fl. dr. (7 ml.) hourly, with the addition of half-strength saline. On the tenth day its body weight was 3 lb. 10½ oz. (1.65 kg.).

On February 21, 10 days after birth, two white spots were noticed on the baby's gums. These disappeared after painting with 1% gentian violet solution.

On February 22 discrete vesicles 1-2 mm. in diameter appeared on the forehead. Their base was pinkish and the content was clear. They were painted with gentian violet. Next day they became pustules, and more were noticed on the cheeks, chin, neck, and chest, with a few on the back, abdomen, and extremities. There was no sign of systemic disturbance or of irritation. Penicillin was given intramuscularly in doses of 5,000 units four-hourly. On February 24 more vesicles and pustules appeared. The child's general condition was the same. Penicillin was increased to 10,000 units four-hourly. No growth

was obtained from the aspirated pus. The accompanying photograph was taken on February 27.

By February 28 pustules were present all over the body. The new ones were discrete, of pin-head size, with redness around the base. The older ones increased in size and became confluent, forming pustules about 3-5 mm. in diameter. The biggest and most abundant were on the forehead. They spread from the cheeks to the eyelids. Lower down the body they were more discrete and fewer in number. There were one or two on the scrotum and on the palms and soles. These had no red base. There was still no sign of irritation and the baby seemed to be extraordinarily comfortable and quiet. His body temperature was normal and his weight had increased to 3 lb. 13 oz. (1.73 kg.). Penicillin seemed to have no effect at all on the rash.

One of the consultants, Dr. G. V. A. Griffiths, suggested that it might be a bromide rash derived from the mother's milk.

On February 26 a sample of the mother's milk was sent for analysis, and approximately 120 mg. of bromine per 100 ml. of milk was found. The mother's milk was therefore withheld, condensed milk being given instead. From then onwards no fresh eruption appeared, and those present began to dry up. The baby started to cry more. By March 7 all the rash had



Photograph taken six days after the eruption began.

dried up, and the lower parts of the face and the rest of the body were cleared. On March 9 he weighed 4 lb. 4½ oz. (1.94 kg.) and on March 11 mother and child were discharged from hospital, their condition being completely satisfactory.

Analysis of the mother's milk and urine on March 2 showed: milk, chloral absent; urine bromides equivalent to 6.3 mg. of bromine per 100 ml. On March 7 no significant quantity of bromides was present in the specimens submitted.

#### COMMENT

There is no doubt that the baby's skin eruption was due to bromide derived from the mother's milk, as the withholding of the latter resulted in rapid recovery. It is interesting to note the following points: (1) The rash did not appear until 11 days after delivery, although bromides were given to the mother before but not after delivery; this suggests that the drug was not passed to the foetus *in utero* but mainly through the milk. (2) Added salt in the baby's diet, in the form of half-strength saline, although very small in amount, did not prevent the accumulation of bromides. (3) The mother had no cutaneous manifestation. (4) Bromides were excreted in greater concentration in the milk than in the urine. (5) It took over 20 days for the mother to get rid of it all, although a salt-free diet was no longer given. The kidneys could not of course be regarded as 100% efficient.

GEO. T. C. YEUNG, M.B., B.S.  
Kowloon Hospital, Hong Kong.

A circular from the Ministry of Health states that some accounts in the Post Office Savings Bank have been opened on behalf of certified mental defectives who are incapable of understanding how to operate the accounts. Accounts of this kind should be opened only when the patient fully understands the nature of the transactions involved.