

(e) Incidence of infection was nil as sulfa-thiazole was used for a preventive course.

(f) Scars with a tendency to form keloids were better treated with whole thickness skin grafts.

I wish to convey my sincerest thanks to Dr. H. Rahman, additional teacher of Clinical Surgery, and his staff for the co-operation I always received from them. I am grateful to Major E. H. Lossing, Superintendent, Campbell Hospital, for allowing me to publish the records of these cases.

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UNUSUAL TYPES OF FOREIGN BODIES IN THE GASTRO-INTESTINAL TRACT

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FOREIGN BODIES of various types in the gastro-intestinal tract have been reported. Textbooks on surgery commonly mention hair balls in stomach as a common example of foreign bodies among hysterical women. Clayton-Mitchell (1945) reported such a case in an African woman. Accidents among jugglers failing to get out what they had swallowed also are reported in literature. One such case was reported by de Soldenhoff (1937). Accidental swallowing of coins and lead pieces have been reported by Kini (1946). The psychological factors leading to swallowing of foreign bodies among soldiers have been discussed by Neustatter (1947) and Hallett (1947).

In recent times due to food shortage eating of dried fruits as substitutes has led to the causation of intestinal obstruction. Elliot (1932) reviewed 36 cases of foreign bodies causing obstruction during the previous 22 years. Jones and Davis (1945), Lyall (1945), Radclyffe (1945) and Ryan and Nagle (1945) have reported cases of ingested dried fruits causing intestinal obstruction.

Two cases are now reported of which one is interesting because a hysterical girl thought that she could commit suicide by swallowing broken bits of valet razor blades and glass bangles. The other case was an accidental swallowing of a broken bit of sewing needle and shows its progress in the gastro-intestinal tract without much damage to it.

Case 1.—A young hysterical girl, aged 20 years, while being examined for her general ailment in April 1946 asked by way of information whether swallowing of razor blades and broken bits of glass bangles would cause death. When questioned as to why she wanted this information she jokingly said that she had swallowed razor blades and broken bits of glass bangles. This information was not discredited knowing the mental make-up of the girl. A careful examination was made for any injury that might occur to the pharynx, gullet and gastro-intestinal tract. No sign of injury was detected on clinical examination and there was no evidence of colic, pain or tenderness in the abdomen. The possibility of her having swallowed the objects was still kept in mind and she was kept under strict observation with directions to the nurse to send information at once if any colic or pain was complained of.

The patient refused to take any food but drank copious draughts of water and she was given 4 oz. of Kaylenol at about 6 p.m., i.e. about 4 hours after the suspected swallowing of the blades. Eighteen hours afterwards an x-ray taken on mere suspicion, not on clinical evidence, showed broken bits of valet razor blades and broken bits of glass bangles in the large bowels. They had passed through the pylorus and the ileo-cæcal valve. In 48 hours all that she had swallowed passed out without any ill effects to the gastro-intestinal tract. It was difficult to imagine how she could have swallowed razor blades and broken sharp bits of glass bangles and also a pin without injuring her pharynx, œsophagus and the gastro-intestinal tract.

On careful enquiry the patient seems to have confessed later to her friend that she had swallowed the razor blades and bits of glass bangles by sandwiching them between slices of bread. It is interesting to observe that the glass bits and the razor blades passed through the gastro-intestinal canal without causing any injury to the mucous membrane or the walls especially while passing through the narrow channels in the pyloric and ileo-cæcal regions. There was no damage done to the anal orifice either when these bits with the sharp edges and ends were passed.

As she refused to take any food after swallowing the bits it is quite possible that she might have taken considerable quantity of bread while swallowing the foreign bodies. Ultimately these bits left the small intestine and got mixed up with the faecal matter already formed in the large intestine. The administration of Kaylenol helped in causing easy movement of the bits without any damage.

Case 2.—This case illustrates the course of an accidental swallowing of a broken bit of a sewing needle.

A Hindu girl, aged 15 years, was admitted for colic and bleeding per rectum with a history of having swallowed accidentally the broken bit of

a sewing needle which she had held between the teeth. This happened on 6th August, 1946, at 5 p.m. She ate some plantains, buns and rice at 7 p.m. On 7th August, 1946, at 7 a.m. she took castor oil about 1½ ounces. She had pain in the abdomen during defæcation and the same night passed bright red blood per rectum and developed colic. On 8th August, 1946, the third day of the accident, in the morning she again passed bright red blood per rectum for which she sought admission into the hospital at 10.30 a.m.

A plain x-ray was taken which showed the needle in the ascending colon with the sharp point directed upwards along the normal course of the current in the large bowel. In order to make certain that it remained in the bowel and not migrated into tissues and also to mix up and dislodge the needle with some heavy material, a barium enema was ordered at 2.30 p.m. At 3 p.m. after evacuation of the enema, x-ray showed no needle but it was not found in the evacuation. At 3.30 p.m. a rectal examination was made and the needle was found stuck horizontally in the rectum and was removed with the finger.

These two cases are reported for the following reasons :—

1. In the first case no ill consequence occurred after the swallowing of the razor blades and the broken bits of glass bangles for suicidal purposes. No operative interference was necessary to remove them and no discomfort or inconvenience was caused at the time of swallowing them, during their course in the gastro-intestinal tract, and during and after evacuation.

2. The second case was accidental swallowing of a needle which broke into two when held between the teeth. Unfortunately the sharp end of the broken needle was in the direction of the current of the gastro-intestinal tract and must have got stuck in the ascending colon to cause bright red bleeding. The barium meal enema helped to dislodge the needle and send it down the canal. Finally, it had to be removed by the finger from the lower part of the rectum.

List of illustrations (see plate XXVI)

1. X-ray picture taken 18 hours after swallowing of the razor blades and the glass bangles. The major portion of the blades have passed the ileo-cæcal valve shadows of which are seen.

Note the longitudinal shadow in the region of the rectum which is a pin shown in picture 3.

2. Photograph of the broken bits of glass bangles swallowed mounted in a glass bottle.

3. Photograph of the pin swallowed.

4. and 5. Photographs of the broken bits of valet razor blades swallowed.

6. X-ray picture taken 2 days after the swallowing.

7. X-ray of case no. 2 showing the broken sewing needle in the ascending colon.

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A STUDY OF WEIL-FELIX REACTION IN THE DIAGNOSIS OF TYPHUS FEVER IN BOMBAY*

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THE demonstration of causal rickettsia for early diagnosis of typhus fever is a time-consuming procedure and requires the use of a complicated technique as yolk-sac cultivation or inoculation of different laboratory animals. Serological tests such as the Weil-Felix reaction, complement fixation or rickettsial agglutination are much simpler to perform but the last two of these require specific rickettsial antigens; the preparation of these is not within the scope of an average small laboratory, so a laboratory worker has to continue to rely on the Weil-Felix reaction. Three serological varieties of *B. proteus* X, known as proteus X19, X2 and XK, are the only reagents by means of which the diagnosis of different varieties of typhus can be made.

As with many serological tests, the study of Weil-Felix reaction has brought to light certain anomalies and limitations that were not at first realized. Many workers have come to doubt its specificity on account of the reaction being positive during the course of other diseases. Factors such as standardization of technique, endemicity of infection, agglutinin level of local population, have to be reckoned with in the correct interpretation of this reaction. It is the purpose of this article to study the Weil-Felix reaction done on a large number of sera from pyrexial and apyrexial cases and to see how far some of

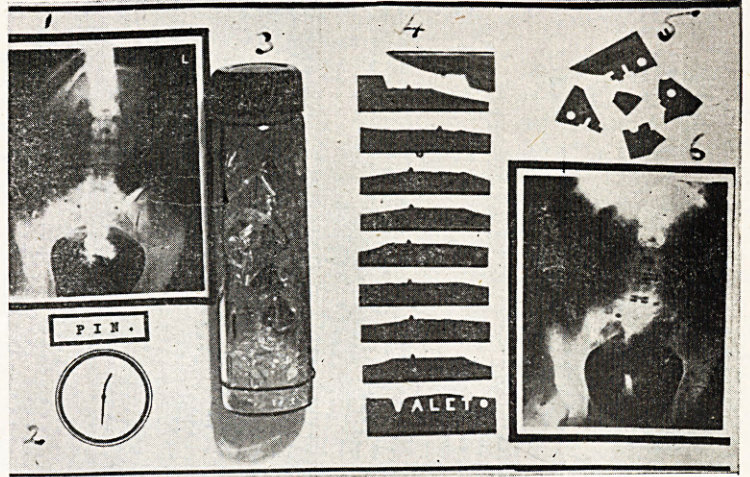
*This work has been carried out under the auspices of the Indian Research Fund Association.



Fig. 1.—Showing the papules coalesced in front of the knee joint.



Fig. 2.—Eruption on the sides of the finger and web between the fingers and in front of the knee joint.



Figs. 1 to 6.

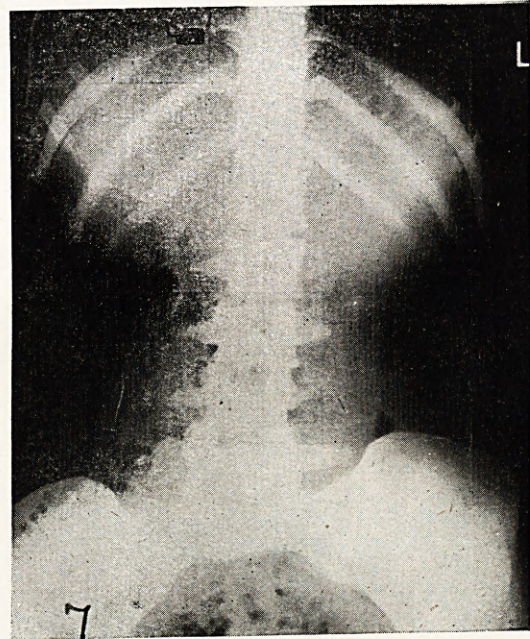


Fig. 7.



Fig. 3.—Photomicrograph—mag. $\times 40$. Section stained with sudan III. Fat granules and globules scattered all over the corium.