Injured: 2 November 1943 (probably) by air hose or blunt instrument in anal canal.

Admitted: 3 November 1943 from ship.

Died: 7 November 1943 of paralytic ileus due to his injury.

Patient awoke and had usual cup of tea, 0730 hours, 3 November 1943, and while lying on bunk at 0900 hours, he had a sudden, sharp, cramp-like, pain across mid-abdomen which gradually got worse during the day and did not give him any relief except for short while following hypno aboard ship at 1200 hours. When seen by M.D. on ship at 1200 hours, abdomen was rigid, temperature, 98 degrees F., pulse 90-100. At 1600 hours, abdomen still rigid, pulse 100, and temperature, 100 degrees F. No past ulcer symptoms or upper respiratory infection. Bowels moved regular, three times, 2 November 1943. Patient not nauseated upon admission nor had he vomited, but he had not desired food all day. Examination at 2200 hours: Temperature, 101.2 degrees F. pulse 110, respiration 22. Talks revealed intense pain and patient only comfortable in sitting or semi-sitting position. Entire abdomen tender and rigid with exquisite tenderness over right upper quadrant. Marked rebound tenderness. Peristalsis active. Dullness over right lower chest, posteriorly and laterally, with diminution of breath sounds and tactile fremitus over same area. WBC 17,750. Xray revealed a small, dark, line, under diaphragm, bilaterally, and small region of pleural reaction and compression atelectasis in base of right lung. A tentative diagnosis of perforated peptic ulcer was made. Submitted immediately to leperotomy. A generalized purulent peritonitis was found. The serosal surfaces were generally inflammed. Deep in the lower abdomen and extending into abdomen, the bowel was coated with a thin, fibrinous exudate, which partially walled off a longitudinal tear in the anterior recto-sigmoid which was approximately 12 inches in length, extending from 2 inches below the lacerated pelvic peritoneal floor to 10 inches superior to it. Free, thin, fecal fluid surrounded the lacerated bowel. Laceration was closed to about one inch below pelvic floor, the pelvic floor was closed and a left lower quadrant, sigmoid, double-barreled colostomy, prepared. The patient was then rolled on his side revealing an area of contusion approximately 2 inches in diameter, surrounding the anus and several small radial lacerations in the dilated anal ring. A vertical incision was made from right side of sacro-coccygeal joint to right side of anus and the retro-rectal space laid open and drained. A small laceration of posterior wall of rectum, two inches superior to anus, was revealed by the incision. 3 gms. sulfanilamide powder in abdominal cavity and 5 gms in perineal wound. Latter wound loosely packed open with vaseline gauze. On the morning following surgery, patient felt quite comfortable, temperature, 98.6 degrees F., pulse, 100, and respiration, 22. On second day following surgery patient began to show more toxicity, and pulse gradually climbed. Wagenstein suction started, oxygen at 6L/minute, and sulfadiazine 0.3 gm/kg/12 hours. Patient became progressively more toxic but remained conscious until about 3 hour previous to death which occurred, 7 November 1943, 1045 hours.

Significant Autopsy findings were:

A. The abdomen is quite distended and markedly tympanitc. The anterior abdominal wall is thin, but no masses are palpable as such. The external genitalia are those of an adult male.
B. There is a recent midline abdominal incision. There is a colostomy stoma in the left lower quadrant from which a quantity of fluid fecal material is oozing. There is a recent operative wound posteriorly between the anus and sacrum. It contains a vaseline pack which, upon removal, is stained with fecal material. There are several minor lacerations about the anus.
C. The usual median "Y" incision is used. The small and large bowel loops are markedly distended with gas and fluid, and both
C. (cont.) Leaves of the diaphragm are shoved up considerably on both sides. The peritoneal surfaces are smooth and shining, save for occasional scanty fibrin adhesions between the small bowel loops and a moderate plastic peritonitis of the true pelvis, involving primarily the ascending colon about the cecum, and the entire pelvic colon. There is an estimated 400cc of serous fluid in the pelvis. The double-barrelled colostomy can be seen quite nicely as it leaves the abdomen through a simple muscle-splitting incision.

D. The entire gastrointestinal tract is opened and examined throughout. There is a marked acute gastric dilation, and estimated 1500cc of fluid being found in the stomach alone. The small bowel contains an estimated total of 3000 more cc of fluid, and about 2000 are found in the large bowel.

E. There is a surgically sutured linear tear in the anterior surface of the recto-sigmoid colon, extending from ten inches above the pelvic peritoneal floor to a distance of one inch beneath it. Removal of the rectum and anus demonstrates a gangrenous ulceration 2 cm in diameter on the anterior surface of the rectum about two inches below the pelvic peritoneal floor. This ulcer perforates the bowel and leads directly into the operative wound made extra-peritoneally between the posterior rectal wall and the sacrum. There are two lacerations of the anal skin proper.

Diagnoses:

**CLINICAL DIAGNOSIS**

(1) Wound, lacerated, severe, of recto-sigmoid, extending from 2 inches below pelvic floor to 10 inches above it, along anterior surface of the bowel, incurred approximately 12 to 24 hours prior to admission to hospital, mechanism unknown.

(2) Wound, contusion, with minor laceration, radially, located around anus, incurred as in No. 1.

(3) Peritonitis, acute, diffuse, severe, due to No. 1., organism predominating B. Coli.


**PATHOLOGIC DIAGNOSES**

(1) Respiratory system: Atelectasis, bilateral, massive, of both lower lung lobes; focal atelectasis; right middle lobe; anthracosis, marked.

(2) Spleen & hematopoietic tissues: Acute and chronic passive congestion of spleen.

(3) Liver: Chronic passive congestion, moderate; fatty degeneration, mild.

(4) Genitourinary system: Cloudy swelling of the kidneys

(5) Gastrointestinal system: Paralytic ileus, marked; ulceration and necrosis of extra-peritoneal portion of rectum, with perforation and extension to peri-rectal fat; recently sutured tear in intra-abdominal portion of rectum and first part of sigmoid colon; moderate pelvic peritonitis, fibrinous-plastic. Perianal lacerations; colostomy, recent.

(6) Miscellaneous: Ascites; recent lacerotomy wound; malnutrition; Hippocratic facies.