## **Summary**

Peritoneal adhesions are abnormal deposits of fibrous tissue that occur in the peritoneum. Peritoneal ischemia seems to play a central role in adhesions formation, as it interferes with peritoneal fibrinolysis by promoting the production of plasminogen activator inhibitors. Factors that compromise peritoneal blood supply may include: Rough manipulation, infection, dryness, thermal injuries, foreign bodies (talc powder & gauze swaps) and irradiation.

Postoperative peritoneal adhesions constitute a hidden heavy burden on health care providers as regards the workload it adds and additional costs. After laparotomy, almost 95% of patients are shown to have adhesions at subsequent surgeries. The morbidity spectrum of peritoneal adhesions may include: chronic abdominal pain, acute and subacute intestinal obstruction, secondary female infertility and increased risk of bowel injuries in every coming surgery.

As we understand the magnitude of the problem, the pathogenesis of adhesions and its causes, we must try to take steps aiming to decrease both incidence and density of post operative adhesions. To achieve this goal, we should minimize operative peritoneal trauma, use meticulous techniques and operative magnification whenever possible and enhance

replacement of the conventional laparotomy by laparoscopic procedures whenever available. Other preventive methods are very expensive and their efficacy still questionable to be used routinely in laparotomies.

Patients with adhesive obstruction may be diagnosed by:

- 1. History of previous laparotomy.
- 2. Cardinal signs of intestinal obstruction (abdominal pain, distension, vomiting and constipation).
- 3. Erect plain abdominal X-ray shows multiple air and fluid levels.

CT. and MRI help with the diagnosis and exclude other causes of obstruction.

Patients with acute intestinal obstruction should be observed closely, investigated thoroughly, take nothing orally, take empirical antibiotics, their general condition is to be corrected and abdominal decompression should be achieved either by nasogastric or nasointestinal suction.

Besides the therapeutic effect of gastrografin follow through it also predicts the outcome of the conservative treatment, if the dye reaches the caecum within 24 hours; conservative treatment may properly solve the problem, if not early surgery would be indicated.

## **Summary**

Surgery in the form of adhesiolysis either by laparotomy or laparoscopy has good reputation. Other techniques such as Noble's plication, Child-Phillip's operation or intestinal stenting by Baker's tube have less popularity.