

3. That slight adhesions resulting from surgical operations and the disturbance of peristalsis brought about by lateral anastomosis do not often give rise to subjective symptoms.

4. That intestinal stasis is more common in persons who lead sedentary lives with much brain work than in those who live in the open air and take a great deal of physical exercise.

These data indicate that ileo-stasis due to atony alone or atony associated with organic obstruction, is common. This has an important bearing on the subject of my paper, because if organic obstruction of the ileum were present in a patient with an asthenic state of the neuro-muscular system, which is a very common disorder, the symptoms referred to the stomach caused by the organic obstruction would be associated with those caused by atony of the stomach and small intestine.

Regurgitation at the Ileo-cæcal Valve as a Cause of Ileo-stasis.
—From an anatomical and physiological standpoint the ileo-cæcal valve and mitral valves of the heart are somewhat similar. Both have the bicuspid structure. The mitral opening is closed by two cusps being forced together by the pressure of the blood in the left ventricle, and to a certain limit, the greater the pressure the more closely the valves are in apposition. The same is true of the ileo-cæcal valve, although contraction of the circular muscular fibres of the valve is a factor in the closing. I believe, however, that it is the intracæcal pressure which is the principal agent in closing the valve. In the normal individual, the contents of the ileum may pass into the cæcum, but the regurgitation of cæcal contents cannot occur. In persons who have suffered from appendicitis the condition is frequently different, for in such individuals more or less regurgitation at the valve is often present. One may be able to show this by radiographic examination after a barium enema. In the cadaver one can frequently demonstrate the condition by forcing the air out of the transverse and ascending colon into the cæcum; when in the normal, there will be no escape of gas into the ileum with moderate pressure, but in the presence of adhesions about the appendix or cæcum, the ileum in many cases becomes distended. In mitral regurgitation the heart may become competent again by hypertrophy of the left auricle and right ventricle. A similar change may result in ileo-cæcal regurgitation by hypertrophy of the small gut. The pressure in the small intestine itself may be a factor in preventing regurgitation. Later, if the muscles of the intestine become atonic either through psychic disturbance, general debility or enteritis, regur-