

seen in painful conditions of the chest—*e.g.*, fractured ribs, pleurisy, pericarditis, pneumonia; in weakness of the chest muscles from any cause (rarely), such as progressive muscular atrophy or other central or peripheral nerve lesion affecting the thoracic muscles; in dyspnœa from any cause (see p. 125), when thoracic breathing is also exaggerated; in mechanical obstruction to thoracic breathing, such as pleural effusion, pneumothorax, a



FIG. 3.—TUMOUR OF THE LIVER WITH ASCITES.

- A, Position of apex-beat in fourth interspace; *iv, v, vi*, on the ribs of the same numbers. The shaded area is dull on percussion, owing to malignant disease of the liver with ascites.

flattened or otherwise imperfectly expansile chest. **Diminished abdominal breathing**, or, in other words, defective action of the diaphragm, is seen in painful conditions of the peritoneum or of the diaphragm. Thus it occurs in peritonitis from any cause, and in diaphragmatic pleurisy. It also results from weakness of