

E-FAST

E-FAST is a limited trauma ultrasound that only aims to detect:

1. Intra abdominal free fluid

2. Pericardial effusion

3. Major haemothorax

Patient details

4. Pneumothorax A normal E-FAST does not exclude signficant intra abdominal injury Mechanism of Trauma Pulse BP RR Sats **Examination Findings Probe Position Views** Notes **Findings Optional Information** < 2mm maximal depth **RUQ** RUQ **Right Upper** Normal Inadequate Positive 2 - 10mm maximal depth Fluid collects in Morison's Pouch Quadrant Look above diaphragm for HTX > 10 mm maximal depth 5° head down tilt will increase RUQ fluid **Right Haemothorax** Normal Inadequate Positive LUQ LUQ Fluid can collect around the entire spleen Look above the diaphragm for HTX < 2mm maximal depth Left Upper 2 - 10mm maximal depth Inadequate Positive Normal Subcostal Quadrant Subcostal Tamponade is a clinical diagnosis > 10 mm maximal depth Look for fluid in the pericardial space Intra-abdominal fluid above the liver can simulate fluid in front of the right ventricle - although it is on the other side of the diaphragm Pericardial fat pads may give the appearance of pericardial fluid **Left Haemothorax** Normal Inadequate Positive Fluid must have a depth of >5mm; traces of pericardial fluid are normal Female **Pelvis** LS Subcostal Normal Inadequate Positive Maximal depth **Pelvis** Look for free fluid behind and above the bladder 5 In the female, fluid collects initially in the Pouch of Douglas A small amount of pelvis free fluid is normal in women < 2mm maximal depth Male **Pelvis Pelvis** Normal Inadequate Positive 2-10mm maximal depth TS > 10 mm maximal depth Detected anteriorly 6 & 7 **Right Lung** Normal Inadequate Positive Lung Lung **Pneumothorax** Anteriorly and laterally Sliding sign and comet tail artefact are normal; loss of these indicate LS Detected anteriorly Pleuradhesis, large bullae, COPD and non-ventilation (eg endobronchial **Left Lung** Positive intubation) can simulate PTX Normal Inadequate **Pneumothorax Copyright Rippey and Ercleve 2009** Anteriorly and laterally **Conclusions** (Note: E-FAST findings must be consistent with clinical suspicion; integrate history, examination, investigations and EFAST findings to reach a conclusion)