

DOUBLE TROUBLE IN A FLOATING KNEE: CONCOMITANT PULMONARY EMBOLISM AND FAT EMBOLISM SYNDROME

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Introduction: Early intervention of long bone fractures reduced the incidence of FES to as low as 0.5%. However, we describe a coincidence of FES with concurrent PE post long bone fixation.

Discussion: A 22 years old lady(Figure 1) sustained a closed distal third femur with an open proximal tibia fracture following a road traffic accident. She underwent plating of the femur. However, postoperative, she developed shortness of breath with persistent tachycardia. CTPA showed left upper segmental branches pulmonary thrombosis. She was treated for Pulmonary Embolism and started on anticoagulant. A 16 years old boy(Figure 2) involved in a motorvehicle accident where he sustained a close right midshaft femur fracture. He underwent a plating of the right femur. On day one post-operation, he complained difficulty of breathing. Urgent CTPA done showed small right segmental descending pulmonary artery embolism and he was started on anticoagulant. A 20 years old guy(Figure 3), had open comminuted fracture of the left tibia. However, post debridement and external fixation of the left tibia, the patient has persistent tachycardia. He fulfill Gurd Criteria with 1 major , 4 minors with evidence of bilateral lungs infiltrates, geographical ground-glass opacities, with associated septal thickening and mosaic attenuation from his CTPA. The patient treated as possible fat embolism syndrome post-surgical intervention.

Conclusion: Despite low risk of developing FES post long bone fixation, High index of suspicion is needed to establish accurate diagnosis of the post-operative lung complications. Cases of concomitant FES and PE is very unusual occurrence. Accurate diagnosis vital to avoid morbidity and mortality. As such, clinician should be proactive to detect other pathology beside FES in view of persistent hypoxemia and tachycardia in patient despite good supportive oxygen therapy was initiated. Patient responded well with anticoagulant therapy and was discharged home after post operative day 11.