Spontaneous rib fractures

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INTRODUCTION: Other than trauma, rib fracture can occur in patients spontaneously due to a severe cough or sneeze. In this study, patients with spontaneous rib fracture were analyzed according to age, sex, underlying pathology, treatment and complications. MATERIALS AND METHODS: 12 patients who presented between February 2009 and February 2011 with spontaneous rib fracture were analyzed retrospectively. The patients were evaluated according to anamnesis, physical examination and chest X-rays. RESULTS: 7 patients (58.4%) were male. The age of the patients ranged from 34 to 77 years (mean ± SD, 55.91 ± 12.20). All patients had severe cough and chest pain. Multiple rib fractures were detected in five patients (41.7%). The fracture were detected most frequently between 4th and 9th ribs. 8 (66.66%) patients had COPD, 2 (16.66%) patients had bronchial asthma and 2 (16.66%) patients had osteoporosis as well. The patients with COPD and bronchial asthma were treated with high dose steroids for over a year. Bone densitometry revealed high risk of bone fracture in all patients. CONCLUSION: Spontaneous rib fracture due to severe cough may occur in patients with osteoporosis or with COPD and bronchial asthma receiving long-term steroid therapy. If these patients have severe chest pain, chest radiography should be evaluated for bone lesions particularly.