

# European Respiratory Society Annual Congress 2012

**Abstract Number:** 2005

**Publication Number:** P2613

**Abstract Group:** 10.2. Tuberculosis

**Keyword 1:** Tuberculosis - diagnosis **Keyword 2:** Tuberculosis - management **Keyword 3:** No keyword

**Title:** Culture-positive pulmonary tuberculosis with a normal chest x-ray in the absence of HIV co-infection

Dr. James 15456 Brown jamesbrown@doctors.org.uk MD <sup>1</sup> and Prof. Graham 15457 Bothamley Graham.Bothamley@homerton.nhs.uk MD <sup>1</sup>. <sup>1</sup> Respiratory Medicine, Homerton Hospital, London, United Kingdom, E9 0SR .

**Body:** Aims: Normal chest x-rays (CXR) have been found in those with culture-positive pulmonary tuberculosis, even without HIV co-infection. We wished to know how frequently this occurs, how frequently such patients are smear-positive and therefore infectious, whether contacts of these patients had evidence of tuberculosis and whether the site of disease can be identified by CT scan. Methods: Records from the tuberculosis clinic at the Homerton Hospital, London, were reviewed for the period 2003-January 2012. All cases of culture positive pulmonary tuberculosis were reviewed and for those with a reported normal CXR the case notes were reviewed. Results: 13 of 364 cases of culture positive pulmonary tuberculosis had a normal CXR. This included 6 of 34 (18%) with HIV co-infection. The frequency of a normal CXR was 3 of 233 (1.3%) with a negative HIV test. Data from one case without an HIV test and another with ++ smear but no culture are included:

Table 1

Code	Reason for investigation	CT	Sputum smear	Days to culture	HIV test	Contacts	Outcome
4.090	cough; weight loss	nd	3 -	13	negative	5	Mother MLN
6.047	Haemoptysis	Normal	3 -	7	nd	4	All DNA
6.073	Cough, haemoptysis, weight loss	nd.	++, 2 -	no culture	nd	1	mother: miliary TB
6.064	Refugee; QFT 2.6 IU/L	nd	3 -	24	negative	2	Case worker QFT +
12.009	Contact; PPD 23mm, QFT 0.38 IU/L cough 2m after 1st seen	normal	1 -	25	negative	refused	

nd= not done; MLN= mediastinal lymphadenopathy; QFN= Quantiferon Gold in tube

**Conclusions:** Although 3 sputum samples were usually sent, often only one proved culture-positive. CT scans may not reveal active disease. Two with a positive smear had contacts who had forms of TB

suggesting recent infection.