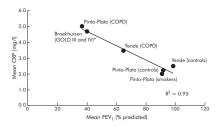


Wisia Wedzicha, Editor in Chief

# LINKING SYSTEMIC INFLAMMATION WITH COPD

It is now recognised that, in addition to progressive lung inflammation, COPD is also associated with systemic inflammation that may account for some of the morbidity and mortality (especially cardiovascular) associated with this condition. In this issue of *Thorax* we publish three papers on the subject of systemic inflammatory markers in COPD. Yende and colleagues show that plasma interleukin-6 is raised in COPD and is related inversely to quadriceps strength and poor exercise performance. Broekhuizen and colleagues show that raised C-reactive protein (CRP) is associated with reduced exercise capacity and poor health status. Pinto-Plata and colleagues also show that CRP levels are raised in COPD independently of clinically significant cardiac disease and related to 6 minutes walking time, but they found in addition that the CRP level was lower in patients treated with inhaled corticosteroids. In the accompanying editorial, Sin and Man show the relationship between FEV1 and CRP for the three studies (figure) and suggest that systemic inflammation may be the "missing link" between the lung and the extrapulmonary manifestations COPD. However, the authors do warn us of the complexities of the inflammatory pathways in COPD and advise that treating systemic inflammation may not necessarily improve all the important health outcomes in this condition.

See pages 1, 10, 17 and 23



Relationship between mean C-reactive protein (CRP) levels and mean forced expiratory volume in 1 second (FEV<sub>1</sub>) in the three studies.  $R^2$  of the line is 0.95.

## LUNG CANCER SCREENING

Lung cancer is the most common cancer in the world, but the majority of patients present with advanced inoperable disease. There has therefore been considerable interest in screening for early lung cancer. In this issue of *Thorax* MacRedmond and colleagues report a study using low dose chest CT scanning (LDCCT) followed for 2 years. They show that LDCCT is useful in detecting early peripheral non-small cell lung cancers but that its role is limited by low specificity and poor sensitivity for central tumours. In the accompanying editorial Gleeson describes the current evidence for the use of LDCCT and concludes that more evidence is required on screening in lung cancer and that the results of large randomised controlled trials are awaited.

See pages 5 and 54

### HRT, BMI, MENOPAUSE AND ASTHMA

Hormone replacement therapy (HRT) has been reported to increase the risk of asthma, although studies have also shown that HRT intake may lead to improvement in asthma or lung function. In this month's *Thorax* Gomez Real and colleagues describe a study in which a postal questionnaire was sent to 2206 women aged 46–54 years, 540 of whom were using HRT. They found that HRT was associated with an increased risk of asthma, wheeze, and hay fever, and that the associations were stronger in women with a BMI in the lower tertile than in heavier women. Higher BMI was associated with more asthma in those women not on HRT. Menopause had no effect on asthma. The authors conclude that HRT increases the risk of asthma in lean women to the same level as that observed in obese women. **See page 34** 

#### **BRONCHIECTASIS SCORES IN CF**

Although lung function tests are the gold standard for monitoring patients with cystic fibrosis (CF), structural changes on CT scanning can precede functional changes. De Jong and colleagues describe a study in this month's journal which evaluated the monitoring of progression of the disease in children and adults with CF. Although the CT score and pulmonary function tests showed similar rates of deterioration in adults and children, the peripheral bronchiectasis score worsened faster and more frequently than lung function. In almost half of the patients the change in the CT score was discordant from the change in lung function. The authors suggest that CT bronchiectasis scores are important in monitoring patients with CF and will become an important outcome in clinical studies.

See page 80

## **USING HRCT IN ASTHMA**

HRCT scanning is an accurate and reproducible method for evaluating the small airways, and in this issue of *Thorax* Park and colleagues describe a radiological study which compared patients with asthma with those with eosinophilic bronchitis (EB), where large airway inflammation is similar but, unlike asthma, airway responsiveness is normal. The results show that large airway wall thickness is greater in asthmatics than in patients with EB, while centrilobular prominence and air trapping are similar. These findings suggest that airway wall thickness is implicated in the airway hyperresponsiveness characteristic of asthma.

See page 41