

## FOR SHORT ANSWERS

See p 985

## FOR LONG ANSWERS

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# ENDGAMES

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## STATISTICAL QUESTION

### Outcome measures in case-control studies

A case-control study was carried out using general practice records to investigate whether a low fibre diet is a risk factor for irritable bowel disease. One hundred new cases of irritable bowel disease and 200 randomly selected controls were found through a search of practice records, and the patients were then approached to be interviewed. Which of the following, if any, could be estimated from this study?

- The prevalence of smoking in the practice population
- The hazard ratio of a low fibre diet for irritable bowel syndrome
- The odds ratio of a low fibre diet for irritable bowel syndrome
- The prevalence of irritable bowel disease in the practice population

Submitted by John Fletcher

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## ON EXAMINATION QUIZ

### Painful joints and osteoarthritis

The answer to this question, and more questions on this topic, are available from [www.onexamination.com/endgames](http://www.onexamination.com/endgames) until midnight on Wednesday.

This week's quiz is on painful joints and osteoarthritis and is taken from the MRCGP examination.

Select the most appropriate diagnosis from the list of options below that would best explain the three presentations that follow.

Select the diagnosis from the list that would best explain the three cases that follow.

- Osteoarthritis
- Gout
- Ankylosing spondylitis
- Still's disease
- Systemic lupus erythematosus
- Reiter's syndrome
- Haemarthrosis
- Rheumatoid arthritis
- Psoriatic arthropathy

A 27 year old man presented with morning stiffness and backache. He was positive for HLA-B27 antigen.

A 22 year old woman presented with stiffness, swelling, and pain in the joints of her hands. On examination, she had radial deviation of her right wrist and nodules on her left elbow.

A 66 year old man presented with pain in the knees and hips, which was relieved by rest. Examination of the knee joint revealed crepitus, mild effusion, and restricted movement. He also had nodules over the distal interphalangeal joints of his fingers.

## PICTURE QUIZ

### A man with Wegener's granulomatosis and haemoptysis

A 60 year old man with Wegener's granulomatosis who was clinically stable on methotrexate presented with a two day history of haemoptysis. On examination he was febrile, with bibasal crepitations and bronchial breath sounds in the left upper zone. Pulse oximetry showed an oxygen saturation of 96% on air. A full blood count showed that his haemoglobin was 134 g/l, white blood cells were  $18.4 \times 10^9/l$  (neutrophils  $15.3 \times 10^9/l$ ), and serum creatinine was  $74 \mu\text{mol/l}$ . He had a titre of 1:160 on recent serological testing for cytoplasmic staining antineutrophil cytoplasmic antibodies. Urinalysis detected trace amounts of protein and blood, but he had no dysmorphic red cells or casts on urine microscopy. He underwent computed tomography of the chest and chest radiography (figs 1 and 2).



Fig 1 Chest radiograph

- What are the likely causes of haemoptysis in this patient?
- How would you investigate this man further?
- What is this condition and how should it be treated?

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Fig 2 Computed tomography of the chest