

Instructions to Candidates – Aim for 8 minutes

You are a Foundation doctor working in a GP surgery.

Your next patient is Ms Abby Freeman, a 67-year-old lady who has come in complaining about pain in her legs.

Please take a history and formulate your differential diagnoses.

At 6 minutes the examiner will ask you some questions.

Name: Abby Freeman

Age 67, PC: Pain in legs

HOPC:

You are normally a healthy lady but for the past 6 months, you find yourself having trouble walking. Your right knee hurts all the time, it's getting difficult to carry out your usual daily routines. It feels like you have a dull ache in your knee, worse when you walk or carry out any movements. It has been getting worse over the last few months, especially in the evening. You don't like taking any more medicines than needed and have been "powering through". There is some swelling around your knee but no skin changes. It is not stiff.

No other joints seem to be affected, no radiation, no weakness below the knee, no fever, systemically well. No trauma prior, no recent infection. You have gained a couple of stones since switching to a desk job nearing retirement.

PMH: Hypertension, hypercholesterolaemia

DH: Amlodipine 5mg OD, Atorvastatin 80mg OD

Allergy: Peanuts

FH:

Father died of heart attack. No siblings. Mom alive and well.

SH (LOST):

Living situation:

Lives at home with your son, has stairs. Walking up and down the stairs hurts your knee.

Occupation:

Retired but carries out part time cleaning services for extra income. You had to cut back on the part time jobs as your knee is "killing" you. Before retiring, you were a firewoman. Serviced at the frontline then worked behind a desk in the last few years before retirement.

Social: Smoking, Alcohol, Recreational drugs, Exercise

Ex-smoker, stopped in your 30s. Drinks occasionally. No recreational drug use. You usually exercise every day, going to the park for walks. On weekends, you like to hike. Sadly, you are now unable to hike anymore. In fact, you can only manage half the distance you usually walk in the park. **(only if asked)** when you were younger, you used to be a professional athlete. You love running and have finished many full marathons.

Travels: N/A

I: You think this could be accumulations of all the manual work you've done when you were younger.

C: You hope that you will not need any major surgery for this.

E: Hope the doctor can find a solution for this pain.

Questions:

1. What are your differential diagnosis?

Osteoarthritis, Rheumatoid arthritis, bursitis

2. How will you manage this patient?

Conservative- weight loss, muscle strengthening exercises/physio.

Medical- topical NSAIDs, oral analgesia

Surgical- Total knee replacement

Answer sheet:

Area	Clear Fail	Fail	Satisfactory	Good	Excellent
C/O & HOPC					
PMH					
DH					
SH					
FH					
ICE					
Differential dx					
Investigations					
Rapport/ Comm skill					
Overall					

Feedback

Osteoarthritis (OA) is a common condition, often thought to be due to 'wear and tear' when in fact there are many factors that contributes to the development of OA.

Types of OA

Primary: usually affecting joints in the hands – the classic Heberden's nodes, Bouchard's nodes.

Secondary: Due to previous injury – usually in weight bearing joints.

Risk factors

- Increasing age
- Female sex
- Obesity (on weight-bearing joints)
- Joint issues – injuries, laxity, malalignment, exercise and occupational stress
- Genetics

Diagnosis is usually clinical. However, you can carry out other tests to rule out other differentials.

Taking an X-ray looking out for LOSS: Loss of joint space, Osteophytes, Subchondral sclerosis, Subchondral cyst can suggest OA.

Management:

Conservative: weight loss, muscle strengthening exercises, advise on appropriate footwear.

Medication:

Simple analgesia for symptom relief –

- Topical NSAIDs

- Paracetamol

Oral analgesia –

- NSAIDs (ibuprofen) + Gastric cover (PPI), stop topical NSAID if you're prescribing oral NSAID

- Opioids (codeine)

Others -

- Topical capsaicin

- intra-articular steroid injections

Surgical:

If pain is unmanageable + impacting quality of life, refer to orthopaedics who will consider surgical treatments.

Consider other referrals as appropriate, e.g.: Pain clinic (uncontrollable pain), Physiotherapist (muscle strengthening exercise), Occupational therapist (assistive devices for daily activities eg walking stick + aids)

This lady is particularly upset that she is not at her baseline anymore, unable to carry out the activities that she likes. Offer psychological support if there is any stress, anxiety, or depression.

References (accessed June 2020):

<https://bestpractice.bmj.com/topics/en-gb/192/>

<https://cks.nice.org.uk/osteoarthritis#!scenario>