# **How To Approach Clinical Examinations In Medicine**

This document is based on the handout from the "Medicine for Finals" course. The notes provided here summarise key aspects, focusing on areas that are relevant to clinical examinations. They will complement more detailed descriptions and are not intended to be comprehensive.

There are several different examination formats, including OSCEs (objective, structured clinical examinations), long cases and short cases. Whatever the format, it is important to present yourself well, being particularly careful to be courteous to patients, introducing yourself at the start, asking permission and later thanking them for allowing you to examine them.

The examiners are testing a number of aspects of your professional performance. They value honesty and integrity, so if you don't know something, there may be significant advantages in saying "I don't know" rather than clamming up. The examiners will usually try to help by tackling the question from a different angle or else will move on to something else, realising that not everyone knows everything. The key point is not to lose confidence or panic, because that will impair your performance on whatever follows. There are three fundamental areas tested by most clinical exams.

# Three important qualities

- Safety (emergencies)
- Professionalism
- Competence (to take a history and examine)

### OSCE's and short cases

You won't fail for missing a physical sign if your technique is good

In other words, it doesn't matter if you don't feel a spleen, so long as you demonstrate the correct examination technique. Of course, if you miss every physical sign in the whole OSCE, your mark may not be the best! But don't despair if you feel you haven't done particularly well on one or two stations: move on to the next station and try to keep your composure.

## Do not..

- Make jokes
- Dress imaginatively
- Forget the social history
- Leave the patient injured or undressed
- Argue with the examiner

It is human nature to try to defuse a tense situation and a socially useful way of doing this is to make a joke. This does not go down well in clinical examinations however.

## Presenting the history: avoid

- Investigations
- Abbreviations
- Medical terms

The history should be a summary of the patient's narrative, concentrating on the main symptoms, not a list of investigations. Nothing irritates examiners more than abbreviations. So if you really want to upset them, try something like "He was admitted from A and E with a three day history of PND. After his LVF was treated, he went on to have a catheter which showed disease in the LAD."

If you are asked to present a history, a good start is a single sentence introducing the person.

### Mr Jones is

- A single
- 68 year old
- Retired plumber
- Who lives alone

The next stage is to signpost for the examiners where the history is going by presenting a "summary of the plot". About 30% of students miss this bit out. If you include it, the examiner will be instantly on your side.

## He has the following symptoms:

Breathlessness on exertion
Chest pain on exertion
Severe breathlessness
Frothy blood stained sputum
for 2 years for 1 year for 1 day
for 2 hours

After taking a history, try to allow yourself a few minutes to predict what questions the examiners will ask. There are two useful triads.

## **Summary triad**

- Disease
- Aetiology
- Complications

### Management triad

- Explanation (to the patient or relatives)
- Investigation
- Treatment

In life, most practitioners multitask with a mixture of investigations, treatment and discussion with patient and relatives all intermingled. You might for example be explaining the need for admission, while putting up a drip, taking bloods and giving intravenous diuretics to a patient with heart failure. In examination though, it seems much more professional to separate these three components, particularly investigations and treatment. Explanation to patients is essential and you will gain credit if you can give a clear rationale for the plan of action using plain English.

## Long case CNS

- Walking, moving all four limbs
- Fundi
- Ankle jerks
- Plantars

A full neurological examination can take some time. If there are no symptoms relevant to the nervous system, a brief neurological screening examination can be useful. Asking the patient to stretch out their hands in supination (palms up) can give a quick check that there are no early signs of an upper motor neurone lesion (which would cause pronation drift) and can also give reassurance that there are no major cerebellar signs (ataxia; worse with eyes closed and if a slight downward tap is given to the outstretched arms, causing a higher amplitude oscillation than normal, due to loss of corrective mechanisms). Similarly getting the patient to take a few steps can be a useful screen of the lower limbs. A quick check of the ankles and feet can exclude peripheral neuropathy (where loss of ankle jerks is usual) and exclude upper motor neurone lesions (extensor plantar response- one of the "long tract signs"). All patients should have their fundi checked.

#### Fundi

- Worth having your own ophthalmoscope- familiarity helps when you are nervous
- Medium and large instruments are MUCH easier to use
- Particularly if you have a dominant eye
- Fits snuggly against bridge of nose
- Instructions are the key

#### Instructions

- Introduction and ask permission
- Choose a spot in the distance
- Keep looking towards it even if my head gets in the way a little
- Don't hold your breath- keep breathing normally

#### OSCE's and short cases

- Introduce yourself
- "Let me know if I cause you any discomfort"
- Don't take a history unless asked specifically
- Examine normal side first
- Examine one side then the other

If you are asked to "ask this patient some questions", this is usually because there is an abnormality of speech, such as dysphasia, cerebellar dysarthria or the low, slow, gruff voice of hypothyroidism. You may be specifically asked to take a history as part of a history taking station or even to explain something to a patient or simulated patient. Very often the examiners will want you to examine a particular system, in which case try to avoid getting bogged down in history taking. Patients often come expecting that the young doctors will want to know their story. If you start with "Does it hurt?" this may trigger a narrative. If you do not want a history, "Let me know if I cause you any discomfort" or "Is there a particularly tender area?" may be better.

### Hands

- ? rheumatological
- · ? neurological
- ? general

"Examine the hands" can cover a multitude of different problems, ranging from arteriovenous fistula for dialysis, through Dupuytren's contracture, arthritis, sclerodactyly, median, ulna and radial palsies to acromegaly. Whatever the abnormality, it is useful to do a check of hand function.

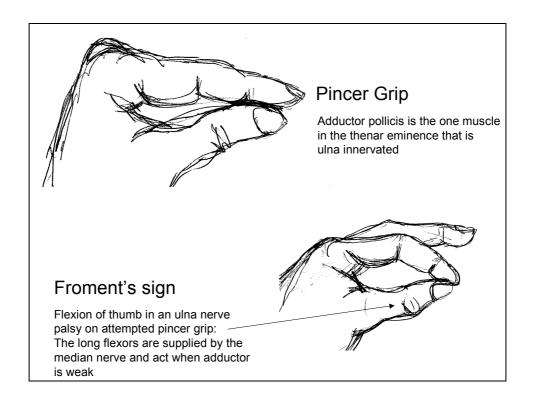
## **Function**

- grip
- prayer sign
- pincer grip
- fine movement ("pyramidal piano playing")

Grip is not much use for localising a neurological lesion as it is supplied by multiple nerve roots (mainly C8 with some C8 and some T1), but it is useful for hand function- will the patient be able to hold a kettle?

The prayer sign is where you ask the patient to put their two palms together, with wrists extended. It can pick up restriction of movement at one wrist and can also demonstrate fixed flexion of the fingers- see below.

Pincer grip is used for many fine movements- for example holding a pen. It is mediated by adductor pollicis, the only muscle in the thenar eminence to be supplied by the ulna nerve.



# Positive prayer sign

- Rheumatoid arthritis
- Scleroderma
- Diabetes (cheiro-arthropathy)
- Ulna nerve palsy (partial claw hand)
- T1 palsy (complete claw hand)
- Dupuytren's contracture
- Arthritis of wrist

# Check if a running commentary required; if not

- Write your own as you go along (in your head!)
- Helps if you have a standard short paragraph for a few of the main conditions
- Tailor your presentation to the specific findings
- Acceptable variation- so long as your system looks fluent...