Malignant Melanoma

A malignant tumour arising from melanocytes. Some melanomas arise from pigmented skin (moles), others arise from normal skin.
Malignant Melanoma

- If melanoma is not detected early, it can be fatal.
- Most patients can be cured with minor surgery if detected early enough.
- Malignant melanomas are divided into 4 categories
  - Lentigo melanoma
  - Superficial Spreading Melanoma
  - Acral Lentiginous Melanoma
  - Nodular Melanoma
Lentigo Malignant Melanoma

- Occurs in older people with skin that has been damaged by the sun.
- Occurs in areas such as face & hands.
- Resembles a light brown or black freckle with a central nodule.
Superficial Spreading Melanoma

- Extends across the skin horizontally before invading the body.
- May present as an irregular patch of skin in shades of black, grey, red, tan, blue or white.
Acral Lentiginous Melanoma

- Least common form
- Appears as a black discolouration on fingers, palms, soles and toes
- African-Americans and Asians are more likely to develop this form of tumour
Nodular Melanoma

- Dome shaped bumps that can occur anywhere on the body
- They can be red, black, dark brown or blue
- They can have a shint or scaly texture
- These tumours rapidly infiltrate the body
- They have the lowest cure rate
- 10-15% of all melanomas are nodular
Differentiating between moles and melanomas

- REMEMBER THE ‘ABCD’ RULE
  - Asymmetry
  - Border
  - Colour
  - Diameter
Asymmetry

- Most moles are symmetrical
- Melanomas are asymmetric

Border

- Most moles have distinct borders
- The border of a melanoma is likely to be notched, irregular or indistinct
Colour

• Moles can be light or dark but they tend to be one colour throughout
• Melanomas are more likely to be uneven in colour and a mix of different hues

Diameter

• Once a melanoma has acquired it’s A, B & C characteristics, it is likely to be more than 6mm in diameter
Causes & Risk Factors

- Moles – 20% of all malignant melanomas begin as moles and early stage tumours may look identical to harmless growths.
- Sun Exposure – A history of blistering sunburn, especially as a child increases the risk of melanomas. Cumulative damage from years of exposure is also a hazard.
Causes & Risk Factors

• Ethnic Origin – Caucasians are 10 times more likely to develop melanomas than Africans. People with the fairest skin are at the highest risk

• Heredity – 1 in 20 cases may be the result of genetic factors. History of melanoma in the immediate family increases predisposition to the development of this condition
Symptoms

• Most people have between 10 & 30 moles on their body. Most are harmless.
• Any change in moles, should warrant further attention.
• Changes may be included within the ABCD.
• Other changes may include;
  – Scaling
  – Oozing
  – Bleeding
  – Texture
Symptoms

• Changes to moles may also include;
  – Increasing hardness
  – Lumpy appearance
  – Itchy
  – Swollen
  – Tender
Malignant Melanoma

- In men, they occur most commonly on the trunk
- In women, they most commonly occur on the arms & legs
- African-Americans are most likely to develop them on the palms of the hand and sole of the feet
Diagnosis

• Diagnosis is suspected on clinical grounds
• Biopsy will confirm the presence of malignant tumour cells
• Diagnosis also includes staging the tumour which is dependent upon the thickness of the tumour and it’s penetration into the skin
• Also, whether the tumour has metastasised.
Treatment

- Melanomas that have not penetrated the Dermis nor metastasised can usually be excised with the optimum chance of cure.
- In some cases, spread to local lymph nodes occurs but can also be successfully treated in most cases.
- Treatment for melanomas that have metastasised is usually unsatisfactory.
Treatment

• Any treatment required is dependent upon the stage of the tumour, it’s location, the age of the patient and their general health.

• Surgical treatment is the most common form of treatment for malignant melanoma. If the tumour is thin and has not spread, it is usually curable with this form of treatment alone.
Treatment

- Chemotherapy – this may be used in patients who have had a tumour surgically removed but who are at risk of recurrence. Chemotherapy is used to destroy undetectable cancer cells that remain in the body after the tumour has been removed.
Treatment

• Biological therapy is used to enhance or alter the body's own immune responses to the tumour. These changes increase the likelihood of remission.

• Biological therapy either acts to enhance our own immune defences or makes the tumour cells more sensitive to destruction from the patient's immune system.
Prognosis

• Prognosis is dependent upon the stage of the disease and response to treatment.
• The presence of tumour cells in lymph nodes or metastases significantly worsens the prognosis.
• Metastases may occur in the:
  – Lung
  – G. I. Tract
  – Bone
  – Rarely, Brain
Subungal Melanoma
Brown Flat Lesion
Superficial Spread