

Acromegaly Assessment

This condition results from hyperpituitarism, which is an oversecretion of growth hormone due to a pituitary tumor or tissue hyperplasia. The onset of the condition is very gradual and manifests with significant changes to the body leading to coarse facial features, deepening of the voice, enlargement of lips, nose, hands, and feet, joint enlargement and pain. An increase in stature does not occur as the epiphyseal plates are closed in the adult patient. The hyperpituitarism condition affecting pediatric patients is called gigantism.



PLAY PICMONIC

Mechanism

Excess Growth Hormone (GH)

Giant with Excess Harmonicas

Acromegaly is a rare condition characterized by an overproduction of growth hormone (GH). The excessive secretion of GH results in an overgrowth of soft tissues and bones in the hands, feet, and face. The changes that occur as a result of excess GH can occur over a number of years and may go unnoticed for quite some time.

Signs and Symptoms

Protruding Jaw

Protuding Jaw

A protruding jaw is common in those with acromegaly.

Large Lips and Nose

Large Lips and Nose

Thickening and enlargement of the bony and soft tissues on the face may occur. This often includes the appearance of large lips and nose. Lips also appear thickened with enlargement of the tongue resulting in speech difficulties.

Hearing Loss

Headphones

Hearing loss is common in patient with acromegaly due to excess GH.

Enlargement of Hands and Feet

Large Hand and Foot

A classic sign of acromegaly is enlargement of the hands and feet with joint pain that ranges from mild to crippling. One may also see hypertrophy and thickening of the skin, especially on the top of the feet, making it difficult to wear shoes.

Vision Changes and Headache

Delta Eyes and Head-egg lump

Vision changes may occur due to pressure on the optic nerve. Headaches are common.

Joint Pain

Joint Pain-bolt

Joint pain ranging from mild to crippling is experienced in patients with acromegaly.

Peripheral Neuropathy

Purple-wavy Neuron-extremities

Patients with acromegaly may experience peripheral neuropathy.



Hyperglycemia

Hiker-glue-bottle

Hyperglycemia occurs because GH antagonizes the action of insulin. This can result in glucose intolerance and manifestations of diabetes mellitus such as polydipsia and polyuria.