

# Single Suture (non syndromic) craniosynostosis

## Types of single suture craniosynostosis

Most non-syndromic craniosynostosis can be subdivided into four different types, according to which suture (gap) is affected. The underlying suture involved will also generally determine the type of treatment and surgery required.

### **Sagittal synostosis**

This is the most common form of non-syndromic craniosynostosis, affecting around 1 in 5,000 births. It occurs when the sagittal suture – the growth line running along the top of the skull from front to back - fuses too early. The result is a characteristic head shape where the length of the skull is increased and the width reduced (said to be like the shape of a boat). It is traditionally referred to as 'scaphocephaly'.

### **Metopic synostosis**

Metopic craniosynostosis is also known as 'trigonocephaly', from the Greek for 'triangleshaped head'. It occurs when the metopic suture - which runs from the front fontanelle (soft spot) through the forehead to the top of the nose - fuses too early. The head viewed from above is sometimes pointed in a triangular shape to the front and top of the skull. In some cases, the eyes may appear slightly misaligned.

### **Coronal synostosis**

Coronal – and especially bicoronal – craniosynostosis is much more frequently associated with syndromic than non-syndromic craniosynostosis.

**Unicoronal synostosis** is where one coronal suture is involved and there isn't enough growth on the side of the fused suture, making the forehead and eye socket on one side flatter, whilst the opposite side of the forehead grows forward to compensate. In some cases, the eyes may be slightly misaligned. It's also known as known as 'plagiocephaly' or 'oblique skull'.

**Bicoronal synostosis** is when both coronal sutures are involved. , The skull becomes excessively wide and short from front to back. There may be excessive growth at the upper part of the forehead and both eyebrows are pulled up and are flattened. This short front to back appearance of the skull has given rise to the name 'brachycephaly' or 'short skull'.

### **Lambdoid synostosis**

This is a very rare type of craniosynostosis , affecting less than around 1 in 100,000 births. It occurs when one of the lambdoid sutures at the back of the head fuses prematurely, leading to an asymmetric skull shape flattened at the back.

## For further information:

- To receive further information on this condition please [join Headlines](#) – membership is free
- [Download our leaflet on Non-Syndromic Craniosynostosis](#)
- [Download our leaflet on Sagittal Craniosynostosis](#)

- Call our helpline on 07541 106816 or email [helpline@headlines.org.uk](mailto:helpline@headlines.org.uk)
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