

Measuring angles accurately with a protractor

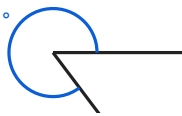
MODULE 7 · 2D SHAPE, 3D SHAPE AND ANGLES REVIEW

HOW TO ANSWER TODAY

- **Classify an angle.** Acute $< 90^\circ$ · right = 90° · obtuse $90^\circ - 180^\circ$ · straight = 180° · reflex $> 180^\circ$.
 $75^\circ \rightarrow$ acute · $120^\circ \rightarrow$ obtuse · $220^\circ \rightarrow$ reflex
- **Read a protractor.** Protractors have two scales. Pick the one that reads 0° on the side the angle's first arm sits on.
 First arm on outer $0^\circ \rightarrow$ use the outer scale to read the second arm

STRETCH PROBLEMS

1

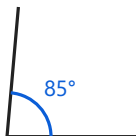


Aoife is pinning a tricolour streamer across the class door for Seachtain na Gaeilge. The streamer turns through an angle of 307° from its starting position. Is this angle acute, right, obtuse, straight or reflex?

- 2 Saoirse is measuring an angle on her kite frame at the after-school crafts club. The angle looks acute, but on her protractor one scale reads 84° and the other reads 96° . Which reading is the correct one?

- 3 Tadhg is measuring an angle on his model bridge frame for STEM week in 5th class. When he lines up his protractor, one scale reads 98° and the other scale reads 82° . The angle clearly looks obtuse. Which reading is the correct one?

4



Saoirse is painting a triangular pattern on a papier-mâché mask for the 5th class school play. One of the corners on her pattern measures 85° . Is this angle acute, right, obtuse, straight or reflex?

- 5 Saoirse is using a protractor to mark an angle on her scale drawing of the school yard for art class. One scale on the protractor reads 69° and the other reads 111° . If the angle looks acute, which reading is the correct one?