

# Small for Gestational Age Without Catch-Up Growth

## SGA Overview



Children born small for gestational age have a birth weight and/or length below -2 SDS for their gestational age<sup>1-3</sup>

Clinical manifestations may vary across newborn period, infancy, and childhood, reflecting age-related differences in energy stores, growth patterns, and physiological development<sup>2</sup>

### Neonates<sup>2</sup>

- Hypothermia
- Hypoglycemia

### Children<sup>2</sup>

- Insulin resistance

### Infants<sup>2</sup>

- Reduced total fat mass
- Altered fat distribution
- Rapid catch-up weight associated with long-term metabolic risk

## SGA Without Catch-Up Growth Overview

### Background and Diagnosis

- Children born SGA with persistent short stature below -2.5 SDS at age 2 years or below -2 SDS around 3-4 years of age without signs of catch-up growth during the previous 6 months should be referred to a pediatric endocrinologist for diagnostic work-up<sup>1-3</sup>
  - Ninety percent of children born SGA show catch-up growth to a height within the range of the general population<sup>2</sup>

### Management

- Clinical management of children born SGA without catch-up growth involves optimal nutrition and GH treatment<sup>1-3</sup>
- International consensus guidelines recommend GH treatment for children born SGA without catch-up growth at age 3-4 years after excluding other causes of short stature<sup>2</sup>

**Abbreviations:** GH, growth hormone; SDS, standard deviation score; SGA, small for gestational age.

**References:** 1. Clayton PE, et al. *J Clin Endocrinol Metab.* 2007;92(3):804-810. 2. Hokken-Koelega ACS, et al. *Endocr Rev.* 2023;44(3):539-565. 3. Lee PA, et al. *Pediatrics.* 2003;111(6 Pt 1):1253-1261.