NATIONAL INSTITUTE FOR HEALTH AND CARE EXCELLENCE

Guideline scope

Faltering growth in children: recognition and management

Topic

The Department of Health in England has asked NICE to develop a clinical guideline on the identification and management of failure to thrive, also known as faltering growth. Following discussion with stakeholders, the title has been changed to refer to 'faltering growth'.

For more information about why this guideline is being developed, and how the guideline will fit into current practice, see the context section.

Who the guideline is for

- Parents and carers of children with faltering growth and the public
- Healthcare professionals
- Providers of children's services
- Commissioners of children's services.

NICE guidelines cover health and care in England. Decisions on how they apply in other UK countries are made by ministers in the Welsh Government, Scottish Government and Northern Ireland Executive.

Equality considerations

NICE has carried out an equality impact assessment [add hyperlink in final version] during scoping. The assessment:

- lists equality issues identified and how they have been addressed
- explains why any groups are excluded from the scope, if this was done.

26 # 1 What the guideline is about

27 ## *1.1 Who is the focus?*

28 **Groups that will be covered**

29 - Infants and preschool children in whom growth concerns have been raised,
30 through either routine monitoring (defined in recommendation 17 of the
31 NICE guideline on maternal and child nutrition) or professional or parental
32 concern.
33 - The following subgroups have been identified as needing specific
34 consideration:
35 - preterm infants and preschool children who develop faltering
36 growth
37 - infants and preschool children with intrauterine growth restriction
38 and faltering growth
39 - infants and preschool children with a specific disorder known to
40 cause faltering growth, including only the recognition of faltering
41 growth.

42 ## *1.2 Settings*

43 **Settings that will be covered**

44 - All settings in which support and services to infants and preschool children
45 are provided.

46 ## *1.3 Activities, services or aspects of care*

47 **Key areas that will be covered**

48 1 Recognition of faltering growth, including defining thresholds for concern
49 2 Identification of risk factors for faltering growth
50 3 Assessment of infants and preschool children with faltering growth,
51 including identifying possible causes in infants and preschool children
52 who present with faltering growth and no other symptoms or signs in
53 order to decide on appropriate investigations

4 Monitoring of infants and preschool children with suspected or confirmed faltering growth
5 Referral to secondary care
6 Interventions to manage faltering growth, including:
   – breastfeeding support
   – support for other types of feeding
   – dietary advice and supplementation
   – family support
7 Design of services for the management of faltering growth
8 Information and support for parents and carers of infants and preschool children with suspected or confirmed faltering growth.

Areas that will not be covered

1 Specialist management of specific disorders causing faltering growth, for example coeliac disease.

1.4 Economic aspects

We will take economic aspects into account when making recommendations. We will develop an economic plan that states for each review question (or key area in the scope) whether economic considerations are relevant, and if so whether this is an area that should be prioritised for economic modelling and analysis. We will review the economic evidence and carry out economic analyses using an NHS and personal social services (PSS) perspective.

1.5 Key issues and questions

While writing this scope, we have identified the following key issues, and key questions related to them:

1 Recognising faltering growth
   – What are the thresholds for concern and the defining criteria for faltering growth in infants and preschool children?
2 Identifying the risk factors for faltering growth
   – What are the risk factors for faltering growth that could inform recognition and management?

84 3 Assessing infants and preschool children with faltering growth

85 – What is the prevalence of specific conditions in infants and preschool
86 children who present with faltering growth and no other symptoms or
87 signs, to help determine appropriate investigations?

88 4 Monitoring infants and preschool children with suspected or confirmed
89 faltering growth

90 – What growth monitoring should be carried out in infants and preschool
91 children with suspected or confirmed faltering growth?

92 5 Referring to secondary care

93 – What factors determine the need for referral to secondary care for
94 infants and preschool children with suspected or confirmed faltering
95 growth?

96 6 Providing interventions to manage faltering growth

97 – What interventions related to breastfeeding are effective in the
98 management of faltering growth?

99 – What interventions related to feeding practices other than
100 breastfeeding are effective in the management of faltering growth?

101 – What interventions related to dietary advice or supplementation are
102 effective in the management of faltering growth?

103 – What family support interventions are effective in the management of
104 faltering growth?

105 7 Designing services for the management of faltering growth

106 – What service configurations are effective for the management of
107 faltering growth in infants and preschool children?

108 8 Providing information and support to parents and carers

109 – What information and support should be provided for parents and
110 carers of infants and preschool children with suspected or confirmed
111 faltering growth?

112 The key questions may be used to develop more detailed review questions,
113 which guide the systematic review of the literature.

114 ### *1.6 Main outcomes*

115 The main outcomes that will be considered when searching for and assessing
116 the evidence are:

117 1 measurements of nutritional status (weight, length or height, head
118 circumference, mid-arm circumference)
119 2 continued breastfeeding
120 3 evidence of improved feeding
121 4 health-related quality of life
122 5 parent or carer satisfaction
123 6 adherence to interventions
124 7 adverse effects of interventions.

125 ## 2 Links with other NICE guidance, NICE quality
126 standards and NICE Pathways

127 ### *2.1 NICE guidance*

128 **NICE guidance in development that is closely related to this guideline**

129 NICE is currently developing the following guidance that is closely related to
130 this guideline:

131 • Maternal and child nutrition - improving nutritional status NICE quality
132 standard. Publication expected July 2015
133 • Developmental follow-up of preterm babies NICE guideline. Publication
134 expected August 2017
135 • Child abuse and neglect NICE guideline. Publication expected September
136 2017.

137 ### *2.2 NICE Pathways*

138 When this guideline is published, the recommendations will be added to NICE
139 Pathways. NICE Pathways bring together all related NICE guidance and
140 associated products on a topic in an interactive topic-based flow chart.

Other relevant NICE guidance will also be added to the NICE Pathway, including:

- Postnatal care (2014) NICE guideline CG37
- Maternal and child nutrition (2008) NICE guideline PH11
- Vitamin D (2014) NICE guideline PH56

3 Context

3.1 Key facts and figures

The term 'faltering growth' is widely used in relation to infants and young children whose weight gain occurs more slowly than expected for their age and sex. In the past this was often described as a ‘failure to thrive’ but this is no longer the preferred term, partly because ‘failure’ could be perceived as pejorative, but also because lesser degrees of faltering growth may not necessarily indicate a significant problem but merely represent variation from the usual pattern. Estimates of the prevalence of faltering growth in the UK vary widely, depending on the definition used.

The World Health Organization (WHO) has produced growth standards, based on longitudinal studies of healthy breastfed infants. These standards, along with UK full-term and preterm infant growth data, have been incorporated into UK-WHO growth charts for monitoring children’s growth in the UK. A child’s weight, length or height, and head circumference can be plotted to provide a visual representation of their growth over time. Epidemiological studies have shown that healthy children usually progress relatively consistently along a growth centile.

Faltering growth can occur when a child’s nutritional intake does not meet their specific energy requirements. Undernutrition may underlie relatively slow weight gain and movement across weight centiles on a growth chart. Faltering growth in early childhood may be associated with persisting problems with appetite and feeding.

169 Certain health conditions predispose children to faltering growth (for example,
170 cystic fibrosis or coeliac disease). Specific treatment for these conditions can
171 improve or restore normal weight gain. In children with no specific cause for
172 faltering growth, simple interventions (such as extra calories and protein for
173 infantans and children with cystic fibrosis and a gluten free diet for infants and
174 children with coeliac disease) may be effective in increasing nutritional intake
175 to support weight gain.

176 The causes of faltering growth in the absence of an underlying condition are
177 likely to be complex and have a variety of causes. In the past, child neglect or
178 socioeconomic and educational disadvantage were often considered to be
179 likely contributors. While neglected children may be undernourished, neglect
180 is now thought to be an uncommon explanation for faltering growth. Similarly,
181 socioeconomic and educational factors have not emerged as important
182 associations in more recent research.

183 *3.2 Current practice*

184 Infants and preschool children with faltering growth are often identified by
185 routine growth monitoring. Others may be identified through concern
186 expressed by parents or healthcare professionals. Initial management is often
187 community based and involves providing support and advice to increase
188 calorie intake and manage challenging feeding behaviour. Some children are
189 referred to paediatric dietitians or paediatricians for further assessment and
190 support.

191 There is variation in practice across the UK in how infants, preschool children
192 and families are supported, referred and investigated where concerns are
193 raised about faltering growth. There is cultural and socioeconomic variation in
194 the rates of initiation and maintenance of breastfeeding, approaches to
195 weaning and choices of weaning foods. Expectations and behaviour at
196 mealtimes, for example whether families eat together, may also be relevant to
197 the risk of infants developing challenging feeding behaviour. These may also
198 influence how readily parents accept feeding support and advice.

199 ### *3.3 Policy, legislation, regulation and commissioning*

200 **Policy**

201 The National service framework for children, young people and maternity
202 services aims for long-term and sustained improvement in children's health,
203 and sets standards for health and social care services for children, young
204 people and pregnant women.

205 The UK National Screening Committee advises on evidence-based whole
206 population screening for conditions which may cause faltering growth,
207 including congenital heart disease and cystic fibrosis.

208 The Healthy Child Programme describes standards of care for screening and
209 providing advice during pregnancy and the first 5 years of life. It includes
210 broad recommendations on monitoring growth in infants and children.

211 The NICE guideline will give more specific guidance on when and how to
212 monitor children when growth concerns arise and when referral is appropriate.

213 **Legislation, regulation and guidance**

214 The NICE guideline on maternal and child nutrition makes the following
215 recommendation for growth monitoring in infants and children: 'as a minimum,
216 ensure babies are weighed at birth and in the first week, as part of an overall
217 assessment of feeding. Thereafter, healthy babies should usually be weighed
218 at 8, 12 and 16 weeks and at 1 year, at the time of routine immunisations. If
219 there is concern, weigh more often, but no more than once a month up to 6
220 months of age, once every 2 months from 6–12 months of age and once
221 every 3 months over the age of 1 year.' In addition, the NICE quality standard
222 on postnatal care includes the quality statement 'babies have a complete 6–8
223 week physical examination' which includes measuring and plotting weight.
224 However, in practice additional measurements are frequently taken at a
225 variety of intervals and there is uncertainty as to the clinical value of such
226 additional measurements.

227

4 Further information

This is the draft scope for consultation with registered stakeholders. The consultation dates are 13 July to 10 August 2015.

The guideline is expected to be published in October 2017.

You can follow progress of the guideline.

Our website has information about how NICE guidelines are developed.

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