

Cystic Fibrosis Research News

Title:

Impact of guideline-recommended dietitian assessments on weight gain in infants with cystic fibrosis

Lay Title:

The role of CF dietitians to help infants meet nutrition goals

Authors:

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What was your research question?

What benefits, if any, are there for babies with cystic fibrosis (CF) to have frequent visits with a specialized dietitian in CF clinic?

Why is this important?

Growth as a baby with CF especially in the first years of life is related to better health outcomes that may last to adulthood. An important health goal for babies with CF is to gain weight and grow similar to the general population. Measuring weight at each visit is expected as part of CF care to watch growth and find ways to help meet health goals. The role and responsibility of dietetic care to pursue ideal weight gain in infants has not previously been studied.



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What did you do?

This work used detailed nutrition information from babies who participated from many CF centres across the U.S.A. We investigated how frequently dietitians met with babies, how babies grew between visits, and what changes were seen in calories (energy amount), enzyme dosing (for treatment), and follow up as part of common recommendations from infant guidelines of care. We also compared if infants at centres with very frequent dietitian visits met nutrition goals similar to infants at centres with less frequent visits.

What did you find?

Some CF centres had dietitians assess infants at almost all clinic visits, but others at less than 60%. Babies in a third of all visits did not gain weight as the general population would. Changes in calories, enzyme dosing, or returning to clinic sooner did not always occur despite less weight gain. Centres with frequent dietitian assessments would more commonly adjust calories and see babies back in clinic sooner than centres with less frequent assessments. On average, infants at centres with the most frequent dietetic care met nutrition goals more often than infants at centres without frequent dietitian presence.

What does this mean and reasons for caution?

Across multiple CF centres, babies with CF had less than expected weight gain in a third of visits, meaning it is important to check weight regularly with families. This study supports the merits of regular dietetic care and follow up in early life. CF-specialized dietitians have an important role to identify ways to help babies achieve health goals. We did not study every nutrition support possibility and had incomplete data for babies over 1 year of age. However, we found multiple areas recommended by guidelines that could improve and may help clinics support CF-specialized dietitians to promote infant nutritional care.

What's next?

The information presented here provides CF clinics with tangible opportunities to improve nutrition and health outcomes for babies with CF. Future studies should test ways to connect with families for more frequent dietetic care such as by telehealth (via internet) and assess for and reduce barriers to more frequent dietitian reviews.

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