Growing-up milk products intended for children between one and three years of age are increasingly be used in the diet of young children. The question raised about their indication needs clarifications.

Beyond one year of age there are particular nutrition requirements to fulfill the physical and cognitive development of the human being. Of particular interest are the Iron and vitamin D intake during early childhood. There is no doubt that iron deficiency is associated with an impaired cognitive outcome if not adequately treated and insufficient vitamin D intake could alter several physiological system mainly the immune system, the musculo skeletal development, the cardiovascular system and the calcium homeostasis.

Feeding young infants is strictly correlated to the family behavior and knowledge on nutrition. A very elegant study conducted in France in 2005 on children between 1 and 36 months of age showed a low intake of essential fatty acids, iron, zinc, vitamins C, D and E in children fed cow’s milk compared to those fed follow up Formulas or Growing up milk, although the dietary intake (out of milk) in the two groups did not differ significantly. Furthermore, a high protein intake was noted in cow’s milk fed infants, a pattern associated with late onset obesity and metabolic syndrome. The conclusion is that even in developed countries, complementary feedings of infant may not meet nutritional macro and micro nutrients requirements(1,2,3)

The rationale behind replacing whole cow’s milk by growing up milk in the diet of young children is still debatable. However, the more inappropriate the family diet the more useful growing up formula will become. In that sense the latter formulas will become convenient product, ready to eat, which can bypass the knowledge of nutrition or cooking skills. On the contrary, a disadvantage will be the lack of interest of parents and caregivers to introduce family foods into the diet of young children.
The other question raised concerns the efficacy of follow on or Growing up formulas. In the observational Avon Longitudinal study of Parents and Children (ALSPAC), the incidence of anemia and low ferritin levels at the age of 8 and 12 months was associated with the type of milk feeding at 8 months and was significantly higher in infant fed cow’s milk or breastfed than in those consuming formula with enriched iron. In a double blind randomized trial on 100 infants, it could be shown that the consumption of iron fortified formula instead of cow’s milk at the age of 8 months resulted at 18 months in reducing the incidence of iron deficiency and improvement in Griffiths Scale for cognitive development. Many other studies reported same conclusions regarding the beneficial effect of iron fortified formulas (4,5).

Recently the KiMi interventional study conducted in Germany to investigate whether fortification of growing up formulas with vitamin D could be an effective and safe way to improve vitamin D status. There is a striking evidence that daily consumption of growing up milk fortified by vitamin D improved significantly 25OHD levels during winter time in the intervention group compared to cow’s milk fed infants. Comparable results were also shown in a study conducted in New Zealand (6,7).

In Conclusion, there is certainly a benefit replacing cow’s milk by follow up or growing up formula whenever breast feeding is lacking. The addition of micronutrients as Iron and Vitamin D and the appropriate protein intake as well as the fat quality of growing up formulas will certainly improve the physical and cerebral development in infants not breast fed and on whole cow’s milk.

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