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A NUTRITION GUIDE FOR EARLY CHILDHOOD ACTIVE STAKEHOLDERS

Abstract

In this study, it is intended to describe the process of forming "Nutrition Guide" which was the product of the partnership project carried out under the Leonardo Da Vinci Project "A Nutrition Guide for Early Childhood Active Stakeholders". Nutrition guide has been developed as result of two-year cooperation between faculties of different fields of expertise who took part in the project from Turkey and four European countries. As a result of the study which was carried out at the beginning of the project using stakeholder analysis to determine the main stakeholder in nutrition education in early childhood, it was determined that pre-school teachers are the main stakeholders for children aged between three and six. In other words, they were determined as the target users of nutrition guide. With an aim to determine the needs of teacher with regard to this issue and the content of the guidebook, needs analysis was performed. According to the results of the needs analysis, nutrition education, the importance of nutrition for children's health, current situation in the participating countries, attitudes of teachers to nutrition education, best practices, sample nutrition education activities and hints were emphasized in nutrition guide. The application-oriented guidebook established in this project and implemented in different programs/strategies should be evaluated in near future to show how the proposed interventions reach the target groups and to consider what size of effect is possible.

Keywords: Early childhood, nutrition education, guidebook

ERKEN ÇOCUKLUK DÖNEMİ AKTİF PAYDAŞLARI İÇİN BİR BESLENME REHBERİ

Özet

Bu çalışmada, Leonardo Da Vinci projesi kapsamında yürütülen "Erken Çocukluk Dönemi Aktif Paydaşları için Bir Beslenme Rehberi" ortaklık projesi ürünü olan "Beslenme Rehberinin" oluşturulma sürecini açıklamak amaçlanmaktadır. Beslenme rehberi, Türkiye ve dört Avrupa ülkesinden farklı uzmanlık alanlarına sahip akademisyenler arasında yürütülen iki yıllık işbirliğinin sonucuda oluşturulmuştur. Erken çocukluk döneminde beslenme eğitiminin ana paydaşı, paydaş analizi yöntemi

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kullanılarak belirlenmiştir. Araştırmanın sonucunda, okul öncesi öğretmenleri üç-altı yaş çocukları için ana paydaş, diğer bir ifadeyle, beslenme rehberinin hedef kullanıcısı olarak belirlenmiştir. Öğretmenlerin konu ile ilgili gereksinmelerini ve rehberin içeriğini oluşturmak amacıyla ihtiyaç analizi yapılmıştır. İhtiyaç analizi sonuçlarına göre, beslenme rehberinde, beslenme eğitimi, beslenmenin çocuk sağlığı açısından önemi, katılımcı ülkelerdeki mevcut durum, öğretmenlerin beslenme eğitimine yönelik tutumları, iyi uygulamalar, beslenme eğitimi etkinlik örneklerine ve ipuçlarına yer verilmiştir. Bu projede oluşturulan ve farklı programlarda/statejilerde kullanılabilen, uygulama odaklı beslenme rehberinin hedef gruplara nasıl ulaştığı ve ne kadar etkileyebildiği değerlendirilmelidir.

Anahtar Kelimeler: Erken çocukluk, beslenme eğitimi, rehber kitap

INTRODUCTION

Nutrition – what people eat – is known to be one of the key factors influencing health at every stage of the life course, beginning with the mother's pre-conception nutritional status, extending through pregnancy to early infant feeding and weaning, and continuing with diet and activity throughout childhood and into adult life (Dixey, Heindl, Loureiro, Pérez-Rodrigo, Snel and Warnkin, 2006; Center on the Developing Child at Harvard University, 2010). Consumption of a healthy diet is essential to provide normal growth and development and to prevent a variety of nutrition-related health problems, such as anaemia, growth retardation, malnutrition, compromised cognitive achievement, obesity, dental caries, and chronic diseases in later life (Contento, Balch, Bronner, Lytle, Maloney, Olson and Swadener, 1995). As the relationship among diet, health and disease prevention have become clearer, nutrition education and the promotion of healthy eating behaviors and lifestyles continue to receive increased attention (Food and Nutrition Service, 2010).

Nutrition education is such an intervention. It provides people with the knowledge, skills and motivation to make wise dietary and lifestyle choices, building thus a strong basis for a healthy and active life (FAO, 2005). Eating habits and food preferences are established during childhood have the potential to last a lifetime, it is important for children to learn about the benefits of good nutrition (Briley and Mcallaster, 2011; Celebuski and Farris, 1996). Creating a culture of healthy eating and helping children to develop healthy behaviours related to food choices called as nutrition education (Leaity, 2008). Therefore, the environment where children learn these habits must provide an ideal template for development (Briley and Mcallaster, 2011). Families and early childhood education services act as an important sphere for living and learning healthy eating behaviour in early life (Wagner, Meusel and Kirch, 2005).

As the number of children in early childhood services increase, early childhood education services to reach children about eating healthy have gained a vital role. Because as mentioned above eating habits are developed from a young age and messages about healthy lifestyles need to be delivered in a clear and consistent manner (Ofsted, 2004). Schools provide the most effective and efficient way to reach a large segment of the population, including young people, school staff, families and community members (Pérez-Rodrigo, Klepp, Yngve, Sjöstrom, Stockley and Aranceta, 2001). The school setting provides a valuable opportunity to influence health through policy measures, education and food provision. When we taking into consideration the importance of school setting, the teacher's role become more significant. In

early childhood education services within the scope of nutrition education, teachers can encourage children to eat nutritious foods and to try new foods. Preparing fresh, attractive foods will help ensure that the children eat well while in school and encouraging families to do the same when they send lunches from home. A variety of positive food experiences and activities can help develop good eating habits and food preferences. The teachers should also be a good role model because they interact directly with the target group (National Food Service Management Institute, 2001; Eliassen, 2011; Hosmer, Dwyer and Villaroel, 1997).

Whereas an effective school health curriculum is one way to address these patterns among youth, teachers face many barriers to the inclusion of nutrition education that will need to be addressed to meet the goal of sequential nutrition education. One of the common barriers to effective instruction is lack of proper training and necessary instructional resources for teachers (Fahlman, McCaughtry, Martin andShen 2011; Jones and Zidenberg-Cherr, 2015).

This paper represents guides one of the instructional resources to be used in nutrition education by teachers. The main aim in the development, and update of food and nutrition guides is to improve healthy nutrition by providing people guidelines to choose healthy food and to take all food at adequate and balanced amounts for growth, development and for the prevention of nutrition related health problems (Aktaş, 2011). Guides are intended to be used in developing educational materials and aiding policymakers in designing and carrying out nutrition-related programs, including nutrition assistance and education programs. Guides also serve as the basis for nutrition messages and consumer materials developed by nutrition educators and health professionals for the public and specific audiences, such as children (U.S. Department of Health and Human Services, 2010).

In this study, it is intended to describe the process of forming "Nutrition Guide" which was the product of the partnership project of lifelong learning program carried out under the Leonardo Da Vinci project "A Nutrition Guide for Early Childhood Active Stakeholders" (2010-1-TR1-LEO04-15852).

This study was intended to explain the process of forming "Nutrition Guide" which was the product of the Lifelong Learning Partnership (LLP) Project program performed under Leonardo da Vinci (LDV) project "A Nutrition Guide for Early Childhood Active Stakeholders" (2010-1-TR1-LEO04-15852).

PROCESS OF FORMING "NUTRITION GUIDE"

The developed nutrition guidebook is the result of two-year collaboration between numerous academics from different professions (nutritionists, home economists, paediatricians, education scientists, health psychologists) across five countries. The close collaboration of Fulda University of Applied Sciences in Germany, Latvia University of Agriculture in Latvia, Selcuk University in Turkey, The West University of Timisoara in Romania, and the University of Vienna in Austria took place in the process of forming "Nutrition Guide".

The guidebook focuses on nutrition education in early childhood, importance of diet in children's health, current situation, differences and problems in participating countries, teacher attitude towards nutrition education in kindergarten, best practices for nutrition in early childhood in participating countries and nutrition activities for teachers to reach parents and children in the kindergarten setting from the age of three until the age of primary school entry.

In the development process of the guidebook, which is prepared in line with the aims of the project, project partners held meetings to achieve active cooperation and information exchange. To determine the content of the meetings and the guidebook, the work schedule stipulated in the project application form was followed.

Forming process of the guide began with the opening meeting. Because of an interdisciplinary and multinational planned working process, the process started with the sharing and analysis on the nutrition states and nutrition education during preschool period in countriesin order togain an impression about current situation. Also, a basic situational analysis on nutritional status (biochemical data, body composition data inc. Body Mass Index, food frequency questionnaire) was done in every country for three to six year old children. Through this, specific needs of this population group are detected and common problems and strengthens within the participating countries are recognised. At the same time, health promotion projects for children in each country were examined, and important and evidence-based approaches, stakeholders, and tools were analyzed. Similarities and differences between all countries were discussed and it was decided that common outcomes to be added to the guidebook. To determine the masses that the guidebook can address, interview method was used and needs analysis and shareholder analysis were made.

First of all, the researchers decided to administer needs assessment of preschool teachers in relation to nutrition education in kindergarten/preschool survey to shed light on the content of the guidebook. The semi-structured interview contains of five obligatory central questions: description of kindergarten (daily routine, pedagogical focus), the nutrition issue in kindergarten, the importanceof nutrition for children and parents, teacher training about nutritional education, and needs of change in kindergarten. The form was prepared in English (the common language of the participants of the project) and then each partner country translated it into their national language and the interview form was prepared. The data were analyzed using Mayring content analysis method. The results displayed the role of nutrition education in the preschool. It also revealed the problems of nutrition education and what preschool teachers wish to be improved. According to the results of these need analysis similarities and differences between all partnercountries are detected. All ongoing activities, experiences, and knowledge about the target group are presented and discussed.

Under the light of the findings of the needs analysis study with pre-school education teachers and a stakeholder analysis was performed in each country according to Hughes and Margetts (2011) to identify the main stakeholders. When the stakeholders in pre-school education period are considered, pre-school education teachers, school administrators, parents and cooks were included in the sample group because of different needs and variety of education levels. Structured interview forms which were developed separately for each partner were used as data collection tool. The interview forms included question to determine the needs about nutrition education and questions to determine the content of the guidebook. To analyze data, MAXQDA, qualitative data analysis software was used.

Considering the results obtained from stakeholder analysis, because of their central role early childhood teachers were identified as the partner that the guide will address to. They are a role model for children, a person of trust for children and parents, are often responsible for daily nutrition and nutrition education in kindergarten and are in contact to the caterer.

At this stage of the project, the topics that the guidebook will focus on and fundamental topics that early childhood teachers could need with regard to nutrition and early childhood nutrition education activities were decided.

CONTENT OF THE GUIDE

The guidebook provides scientific based information (importance of diet in children's health, current situation, differences and problems of nutrition education in participating countries, teacher attitude towards nutrition education in kindergarten in participating countries) and methodologies for kindergarten teachers to reach children and parents. Early childhood nutrition education activities, nutrition education activity tips, also best practices examples of early childhood nutrition in participating countries included in the guidebook.

The chapter 5 of the guidebook discusses the issue of the methodology for teachers to reach parents and children. In this chapter, there are two sections under two headings: parent involvement activities and early childhood activities. Parent involvement activities, parent needs recognition form, (sample form was prepared), board of education, posters, booklets, trip booklets, activity booklets, recipe books, personal booklets, journals-newspapers, photos, correspondence, newsletters, participation in classroom activities, conferences headings and for each one of the activities effective and practical examples which are in line with the aims of the project were given. In the early childhood activities part of the guidebook, there are sample activities for nutrition education. In planning stage and to determine the key concepts several studies were used (Swadener, 1994;Ofsted, 2004; FAO, 2005;Contento, 2011). The key concepts for nutrition education activities are as follows:

- a. Food groups and their peculiarities
- b. Foods in food groups and their peculiarities
- c. Where does food come from?
- d. Eat variety of food and food choice.

For each key concept the following is provided;

- a. Learning objectives
- b. Classroom activities (art, play, drama, science, mathematics, kitchen work etc.).

The learning objectives were expressed as behavioral change not only as changes at knowledge level. For example, the learning objectives for eat variety of food and food choice key concept were determined as talking about foods they like and dislike with reasons, understanding that we eat different food depending on the time of the day, occasion and lifestyle, explaining the importance of eating a variety of foods from all of the food groups. Within scope of the project, early childhood nutrition education activities can be accomplished with tips. Tips based on range of hands on and interactive activities for early childhood period. Nutrition activity tips consist of "you will need" and "idea" titles. Totally 36 nutrition activity tips are in the guidebook associated with key concepts.

CONCLUSION

As a result of researches carried out under this project show, nutrition education in early childhood period has vital importance for public health. Therefore, the potential of nutrition education should be used more intensively in early childhood period. However, research findings carried out during project demonstrate that the subject "nutrition" is to less present in the curricula of kindergarten teachers – the most important multipliers - in all participating countries. The strength of this project is the cooperation of participants of countries who had already developed clear strategies and already started to implement effective food and nutrition education programs and countries who are at the beginning of this process. It is of especially value that due to intensive exchange and deep discussions from different perspectives, learned from each other. The participation of stakeholders in all different project phases is characteristic and is a key point of success. Thus, various stakeholders within the setting kindergarten have been considered in each country. To reflect the results of the project to the stakeholders a comprehensive nutrition guidebook for early childhood active stakeholders has been developed. The application-oriented guidebook established in this project and implemented in different programs/strategies should be evaluated in near future to show how the proposed interventions reach the target groups and to consider what size of effect is possible. Therefore, the next step should be to learn from the implementation of the programs. Further studies should evaluate the impact of the nutrition guidebook in the setting kindergarten. Within a major sample it has to be examined if the established nutrition guidebook is helpful for stakeholders and if the implementation of the nutrition guidebook contributes to a sustainable nutrition education in early childhood which is outstanding for future health.

REFERENCES

- Aktaş, N. (2011). Food guides: Visual aids in nutrition education. *Selçuk Üniversitesi Sosyal Bilimler Enstitüsü Dergisi*, 25, 11-16.
- Briley, M., McAllaster, M. (2011). Nutrition and the child-cares. Journal of the American Dietetic Association, 111 (9), 1298-1300. doi: 10.1016/j.jada.2011.06.012
- Celebuski, C., & Farris, E. (1996). Nutrition education in public elementary and secondary schools. US Department of Education Office of Educational Research and Improvement NCES 96-852. Retrieved from https://nces.ed.gov/pubs/96852.pdf.
- Center on the Developing Child at Harvard University (2010). The foundations of lifelong health are built in early childhood. Retrieved from http://www.developingchild.harvard.edu.
- Contento, R. I. (2011). *Nutrition education linking research, theory and practice*. Massachusetts: Jones and Bartlett Publishers.
- Contento, I., Balch, G. I., Bronner, Y. L., Lytle, L. A., Maloney, S. K, Olson, C. M., Swadener, S. S. (1995). The effectiveness of nutrition education and implications for nutrition education policy, programs, and research: a review of research. *Journal of Nutrition Education*, 27(6), 277-418.

- Dixey, R., Heindl, I., Loureiro, I., Pérez-Rodrigo, C., Snel, J., Warnkin, P. (2006). Healthy eating for young people in Europe, A school-based nutrition education guide. Retrieved from http://www.euro.who.int/__data/assets/pdf_file/0005/119921/E69846.pdf.
- Eliassen, E. K. (2011). The impact of teachers and families on young children's eating behaviors. *Young Children*. Retrieved from https://www.naeyc.org/files/naeyc/Eliassen_0.pdf.
- Fahlman, M., McCaughtry, N., Martin, J., & Shen, B. (2011). Efficacy, intent to teach, and implementation of nutrition education increases after training for health educators.
 American Journal of Health Education, 42 (3), 181-190. doi: 10.1080/19325037.2011.10599185
- FAO (2005). Nutrition education in primary schools. Retrieved from http://www.fao.org/3/a-a0333e.pdf.
- Food and Nutrition Service (2010). Nutrition education and promotion: The role of FNS in helping low-income families make healthier eating and lifestyle choices. Retrieved from http://www.fns.usda.gov/sites/default/files/NutritionEdRTC.pdf.
- Hosmer, C., Dwyer, J. T., & Villaroel, A. (1997). Training needs for nutrition education: guidelinesfor in-service training of nutrition educators. In: Nutrition education for the public.Discussion papers of the FAO Expert Consultation FAO Food and Nutrition Paper 62.Rome: Food and Agriculture Organization of the United Nations. Retrieved from www.fao.org/docrep/W3733E/w3733e05.htm.
- Hughes, R., Margetts, B. (2011). *Practical public health nutrition*. United Kingdom: Blackwell Publishing Ltd.
- Jones, A. M., Zidenberg, C. S. (2015). Exploring nutrition education resources and barriers, and nutrition knowledge in teachers in California. *Journal of Nutrition Education and Behavior*, 47 (2), 162-169.doi:10.1016/j.jneb.2014.06.011.
- Leaity, K. (2008). Food for under 5's. Retrieved from http://www.arphs.govt.nz/Portals/0/Health%20Information/HealthyEnvironments/Early%20childhood%20education%20centres/ECEC%20Food%20for%20under%205s/Food%20for%20under%205s/Food%20For%20Under%205%27s%20ECE%20resource%20Final%20June%202008-1.pdf
- National Food Service Management Institute (2001). Nutrition and cognitive development. http://www.nfsmi.org/documentlibraryfiles/pdf/20080612091850.pdf
- Ofsted (2004). Starting early: Food and nutrition education of young children. Retrieved from http://dera.ioe.ac.uk/4966/1/ofstedearly.pdf.
- Pérez-Rodrigo, C., Klepp, K. I, Yngve, A., Sjöstrom, M., Stockley, L., Aranceta, J. (2001). The school setting: an opportunity for the implementation of dietary guidelines. *Public Health Nutrition*, 4,717–724.doi:10.1079/PHN2001162.
- Swadener, S. S. (1994). Nutrition education for preschool age children: A review of research. U.S. Department of Agriculture Food and Consumer Service, Alexandria, VA.

- U.S. Department of Health and Human Services (2010). Dietary Guidelines for Americans. Retrieved fromhttp://health.gov/dietaryguidelines/dga2010/DietaryGuidelines2010.pdf
- Wagner, N., Meusel, D., Kirch, W. (2005). Nutrition education for children-results and perspectives. *Journal of Public Health*, 13, 102-110. doi 10.1007/s10389-004-0091-9.