## Original Article

# Content of Food Advertising for Young Adolescents on Television

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## ABSTRACT

**Background:** Food related advertisements on television may have a major influence on the dietary habits and obesity among young adolescents. **Objective:** To evaluate the frequency and typology of food advertisements on most popular television channels, watched by school-going young adolescents in Delhi. **Methodology:** Biphasic study to (a) identify the three television channels most frequently watched by administering a questionnaire to 400 school going young adolescents; and (b) view each of these channels for 2 hours per day for 6 days each, and observe the content of advertisements related to foods, beverages, and food outlets. **Results:** Four hundred and three food related advertisements were viewed over 36 hour on Discovery, MTV and Disney Channels. Among 235 food related advertisements 163 (69.3%) pertained to candies, chocolates and confectionary and 35 (14.8%) to salty snacks. Sugar sweetened soft drinks contributed 90 of 106 (85%) of beverage advertisements. Of 62 advertisements related to food outlets, 59 were of fast food joints. **Conclusion:** Majority of food advertising content on television most commonly watched by young adolescents is related to unhealthy foods and beverages, igh in energy and low in micronutrient content.

Keywords: food advertisement, India, television, young adolescents

## Introduction

Obesity has evolved into an epidemic in developing nations including India over the past few decades. Indian children have shown an increasing trend of obesity<sup>[1]</sup> with the overall prevalence of overweight children ranging from 9 to 27.5% and that of obesity ranging from 1 to 12.9%.<sup>[2-5]</sup> Obesity in children appears to increase the risk of subsequent morbidity and lifestyle diseases in adolescence as well as adulthood.<sup>[6]</sup>

Food related advertisements have been found to increase the incidence of obesity in adolescents by affecting their food preferences and influencing their dietary habits.<sup>[7]</sup> Television is a major source of exposure to



advertisements for fast food, high sugar foods and sugar-sweetened beverages that influences the choices of this vulnerable group.<sup>[8-11]</sup> In view of limited evidence regarding the content of food advertising on television in India, we evaluated the frequency and typology of food advertisements on most popular television channels, watched by school-going adolescents in Delhi.

#### **Materials and Methods**

The present study was conducted between April and August 2011, in two phases. In the first phase, school going young adolescents were approached to

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Cite this article as: Gupta S, Kalra S, Kaushik JS, Gupta P. Content of food advertising for young adolescents on television. Indian J Community Med 2017:42:43-5.

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Received: 17-11-15, Accepted: 15-07-16

identify the three most popularly watched channels on television. In the second phase, we watched these channels over a week to identify the content of foodrelated advertisements broadcast during that time. For the first phase, we approached all children in 7th to 8th Grades from a public school of Delhi catering to the affluent segment of population. Those consenting to participate and available on the day of survey were asked to name their three most favorite television channels and the most preferred time of viewing them. A consolidated list of three most popular channels was generated, based on responses of individual participants. These channels were viewed by the first author for 2h every day for six consecutive days (excluding Sunday), over a period of three consecutive weeks (only one channel was viewed per week), during a fixed viewing slot. Timing of the viewing slot was also based on the students' most frequent response regarding their favorite time slot for viewing television. Food advertisements appearing during this time were categorized as being related to food, beverages, or food establishment. The product being promoted and the kind of appeal (use of animation/celebrity endorsement/focus on immediate sale/direct appeal to buy their product) used to promote the product was also noted.

Weight and standing height of the participants were measured as per the reference standard techniques.<sup>[12]</sup> An inquiry was also made into their habits of eating a breakfast regularly before coming to school and frequency of eating out.

The study was approved by the Institutional Ethical Committee.

## Results

Four hundred young adolescents (236 boys, 164 girls; median age 13 years) participated in the first phase. The prevalence of overweight (BMI>85th to 95th percentile) and obesity (BMI>95th percentile) in the surveyed population was 15.2% and 1.5% respectively. Only 93 (23.3%) adolescents were eating breakfast regularly before coming to school and 363 (91%) were consuming fast food at least daily.

On the response of survey, Discovery Channel, MTV and Disney Channel were identified as the three most watched television channels by young adolescents. The most preferred time slot for viewing television was between 8 and 10 pm.

During the second phase, these three channels were viewed for six consecutive days each (Monday–Saturday) between 8 and 10 pm. The total viewing time was thus 36 h spread over three weeks. A total of 403 food related advertisements were recorded during the viewing time. Of these 235 (58.4%) were related to food items, 106 (26.7%)

pertained to beverages and the rest 62 (15.3%) advertised food outlets. Among food items, 163 (69.3%) were of candies, chocolates or confectionaries; 35(14.8%) salty snacks, 31 (13.2%) were related to dairy products, only six advertisements were related to cereals and none for fruits/ vegetables. Out of a total 106 beverage advertisements, 90 (85%) were of sugar sweetened beverages majority of which included soft drinks and rest were related to tea/ coffee. Out of food outlets, 59 were of fast food joints, with only three of advertisement being of family restaurants and none of grocery stores or supermarkets. Direct appeal was the most preferred form of attracting customers with 310 (77%) of advertisements using this genre. Around 40 (10%) advertisements utilized either animation or a celebrity to lure customers. None of the advertisements displayed or highlighted the nutritional content of the marketed food.

## Discussion

The results reveal that majority of food advertising content on television most commonly watched by young adolescents is related to foods and beverages high in energy and low in micronutrient content. Among these more than half are related to confectionaries, candies and sugar sweetened soft drinks. Direct appeal appears to be the most preferred form of attracting customers.

There are only a few Indian studies available for comparison. Maheshwar, et al., [13] used television rating points (TRP) to select two most commonly viewed television channels and analyzed 793 food related advertisements aired on them (Cartoon Network 405; Disney 388). Of these 340 (43%) were contributed by chocolates and sweets, followed by fast food (11.6%), health/energy drinks (10.5%), biscuits (10%), and rest others. Another study from Mangalore,<sup>[14]</sup> observed that more than 50% (142/281) advertisements on children's favourite channels were for calorigenic foods and also related television viewing with poor oral health in participants. Mazur, et al.<sup>[15]</sup> found that 71.4% of foods advertised on Polish television are high in fat and sugar; 14.3% of these are soft drinks, and only 14.3% of advertised products can be called healthy (reduced sugar drinks, bio-yogurts). Kunkel et al.[16] from USA also found that out of 354 food related advertisements displayed in children's television programmes in 2013, 80.5% were for poorest nutritional category products. Powell, et al.<sup>[17,18]</sup> conducted a study on US children in 2003-2004, and found that fast food joints constituted majority of food related advertisements which could be explained by the lack of branded fast food joints in India as compared to developed nations.<sup>[17]</sup> In another study, they found that 98% of food related advertisements seen by children two to eleven years of age and almost 90% of food related advertisements seen by teenagers are for products that are high in fat, sugar and low in nutritional content.<sup>[18]</sup>

Evidence suggests that marketing of food product has a powerful influence on children's diets and obesity levels.<sup>[19,20]</sup> Government of India has notified Food Safety and Standard Regulations (Packaging and Labelling) in 2011.<sup>[21]</sup> These rules aimed at encouraging food packaging and advertisements to focus less on taste and convenience, more on education and health. The regulations have clearly defined as to what constitutes the Health Claims and Nutrition Claims. Even after these rules and regulations, various food product manufacturing companies continue to advertise unhealthy food products to this vulnerable group despite their own pledges and commitments.<sup>[22]</sup> The Advertising Standards Council of India (ASCI) in collaboration with FSSAI Food Safety and Standards Authority of India are in process to keep a check on errant advertisers and to modify the advertisements based on prescribed guidelines. Professional bodies like Indian Academy of Pediatrics (IAP) and Indian Association of Preventive and Social Medicine (IAPSM) need to generate guidelines regarding the content of food advertisement that can be permitted to be displayed on mass media and other sources of exposure.

The strength of present study was that this was a unique and eye opener work in Indian scenario as we could get only one or two literature reviews to compare with our work. The limitation of our study was that only three channels were viewed because of time constraints. Other modes of exposure like internet, bill boards, radio, and so on etc.were not explored. We also did not look into the influence of family practices and peer group. Also, this study was among the adolescents coming from affluent families and hence their choice of television channels may differ from adolescents of other strata of the society. Despite these limitations, this preliminary data may trigger a much desired need for a change and policy on food advertising, especially for the vulnerable groups.

## Financial support and sponsorship

Nil

#### **Conflicts of interest**

There are no conflicts of interest.

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