## Trend or disease? - gluten-free diet

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#### Abstract

Introduction and purpose of work: Over the past few years, the topic of gluten-free diets has become very popular. In the past, it was understood only in the context of a specific medical indication, implemented in the event of a disease, e.g. celiac disease, as part of the patient's treatment. Today, the concept has changed a bit. The abatement of the concept of a gluten-free diet is attributed to social media, which, in a way, suggests recipients to use it on a daily basis, clearly emphasizing the harmful effects of gluten on the human body. better mood".

Purpose: The aim of the study is to analyze the awareness of the society on the use of a gluten-free diet. Material and method: The results of the study were obtained on the basis of an online survey. Results: 213 respondents took part in the survey, $36.2 \%$ of the respondents were women and $63.8 \%$ men, $88.7 \%$ of the surveyed respondents correctly answered the question what gluten is, but $65.7 \%$ are associated with the presence of gluten in products food industry with the development of this industry, $42.3 \%$ of respondents believe that consumption of gluten should be avoided.


Only $8.9 \%$ of people on a gluten-free diet heard from a doctor for the first time, over $36 \%$ from the media. As many as $78.4 \%$ of respondents are not aware of about the need to balance this diet, but still uses it.
Conclusions: The study shows that the society is not fully educated on the use of a glutenfree diet. It can be concluded that the approval of the society is not based on the merits, but rather an expression of a trend. The dissemination of this concept is due to the media.

Key words: gluten, gluten-free diet, trend, revaluation

Introduction: Gluten is a complex of proteins, mainly gliadins and glutenins, stored in the embryo of wheat grains, but also other grains, such as secalins in rye, hordein in barley and avenins in oats [1]. Gluten ensures the appropriate consistency of the dough, its flexibility and viscosity, and shortens the fermentation time, which is widely used in the baking and confectionery industry [2].The gluten-free diet, touted by celebrities for weight loss and athletes for improved performance, is virtually impossible to avoid hearing about. Between 2004 and 2011, the market for gluten-free products grew at an annual rate of $28 \%$, with an estimated $\$ 2.6$ billion in sales in 2012 that is expected to reach $\$ 6.6$ billion by 2017. A 2013 survey from NPD (formerly National Purchase Diary, a market research group) found that $30 \%$ of Americans showed interest in avoiding gluten. Also in 2013, the US Food and Drug Administration (FDA) issued the final rule on gluten-free food labeling, effective in August 2014, making the gluten-free label a more common sight in the grocery store [3].
Purpose: The aim of the study is to analyze the awareness of the society on the use of a gluten-free diet. The results of the study were obtained on the basis of an online survey.
Materials and methods: 213 respondents took part in the survey. $36.2 \%$ of the respondents were women, while $63.8 \%$ were men. 112 people (over $52 \%$ ) have higher education, almost $47 \%$ - secondary.
Sex
213 replies



- above 45

Results: Despite the very high popularity of the gluten-free diet, as many as $12 \%$ of respondents do not know what gluten really is - $9 \%$ believe that it is a chemical substance added to food to improve its quality, almost $5 \%$ that it is a preservative, the other respondents identify gluten with GMO products. $65.7 \%$ of people think that gluten sensitivity has increased as a result of the advances in the food industry.

Do you think population sensitivity to gluten has increased as a result of the food industry?
213 replies


Where did you first hear about the gluten free diet?
213 replies


- Friends
- TV
Network
- Advertisement
- From Doctor
- From trainer

Less than a half ( $46.5 \%$ ) of the respondents admit that they heard about the gluten-free diet for the first time on social media. Based on the above data, there is a clear tendency to perceive this diet as a trend rather than a medical indication, as only $8.9 \%$ of respondents obtained this knowledge from a doctor. Only seven respondents learned about the said diet from people professionally involved in sports.


How long should a gluten-free diet due to medical indications last?
213 replies

$42.7 \%$ of people believe that you should avoid or at least limit your consumption of glutencontaining products. However, $5 \%$ of them emphasize the harmfulness of gluten. ONLY $44.6 \%$ are aware that the use of this diet for medical indications should last a lifetime! $78.4 \%$ of respondents DO NOT KNOW that a gluten-free diet belongs to a deficient diet.

Is a gluten-free diet a deficient diet?
213 replies


Can a gluten-free diet have a negative effect on health?
213 replies


132 people ( $63.8 \%$ ) are not aware that an improperly used gluten-free diet may have negative health consequences.

Discussion:


Based on the answers obtained, it can be concluded that people do not know what foods contain gluten. However, almost everyone ( $96.7 \%$ ) knows that it is found in cereals. The respondents mistakenly selected answers such as meat, fruit and vegetables, buckwheat flour, sweets, and dairy products. Society is not educated on this issue, and yet decides to follow a gluten-free diet without consulting a nutritionist. It should also be mentioned that people who do not know about the presence of gluten in certain food products very often fall victim to marketing gimmicks by buying food labeled as special under the gluten-free name, which in fact has this trait inherently.

Conclusions: An improperly balanced diet can lead to various nutritional deficiencies [3]. People who do not have medical indications for its use are not recommended to give up products containing gluten. It can be said that the approval of the public is not based on the merits, but rather is an expression of a trend. The popularity of this concept is due to the media. There is a clear need to make the public aware of the negative effects of excluding food groups containing gluten from their daily diet, despite the lack of medical indications. When analyzing the presented results of the survey, one can clearly notice a difference in the approach and perception of the concept of gluten-free diet by the society. In the past, the person on it undoubtedly needed it, it was an essential element of the healing process.

## References

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