

EHMA 2024

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Evaluation of Health, Social and Educational Needs of the Children Having Type 1 Diabetes: Challenges and Solutions

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Objective of the Research

The overall purpose of this study was to evaluate health, educational and social needs of the children with type 1 diabetes (CwD) living in Georgia. The specific objective was to identify existing gaps in the state programs and/or system arrangements that prevent CwD having access to the necessary services. The study also aimed to develop the specific benchmark indicators to be evaluated at the end of the project implementation (supported by World Diabetes Foundation) in order to determine how the situation has changed.

Methodology

A combination of mixed-research methods has been applied:

- Initially, qualitative study – focus group discussions (FGDs) and in-depth interviews were carried out
Three FGDs were held with parents of the children with diabetes (CwD) and 9 in-depth interviews conducted with various stakeholders (pediatric endocrinologists, representatives of Ministry of Health, field experts).
- At the final stage, quantitative survey was performed with parents/caregivers of CwD
170 parents/caregivers were interviewed using semi-structured questionnaires

Situational Analysis

- In 2022, there were about 8.75 (95% uncertainty interval 8.4–9.1) million individuals worldwide with type 1 diabetes: of these 1.52 million (17%) were younger than 20 years (IDF, 2022)
- The similar trend is indicated in Georgia, where type 1 diabetes is growing at 5.2% each year compared to 2% for type 2 diabetes
- Today, 1 in every 58 families are impacted, where it was only 1 in 143 families in 1990 and will be 1 in 19 families in 2040 (Type 1 Diabetes Index, 2023)
- Out of 4,483 cases of type 1 diabetes registered in Georgia, 1,239 are aged 1-19 years old (IDF, 2022)

Main Findings of Qualitative Research

- Parents and caregivers need to have access to updated information about Diabetes type 1 and its management
- Need for proper communication with them from doctors and medical personnel's side was highly accentuated
- Psychologists and nutritionists to be engaged in a multidisciplinary team
- Need for more accessible and appropriate format of education for parents and continuous update opportunities about newest treatment approaches.

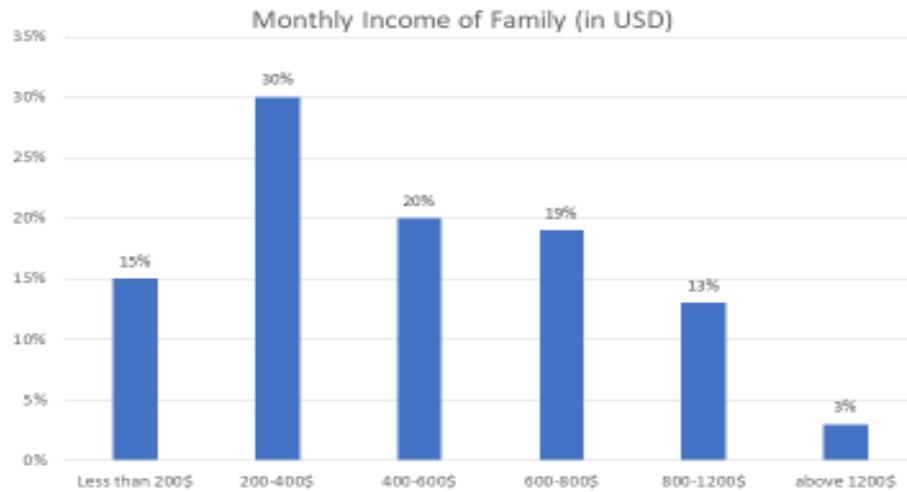
Main Findings of Qualitative Research

- Problems regarding accessibility to qualified children's endocrinologists in the regions
- Limited education rights of children with diabetes at schools and kindergartens
- Need for financing physical activity for the children with diabetes

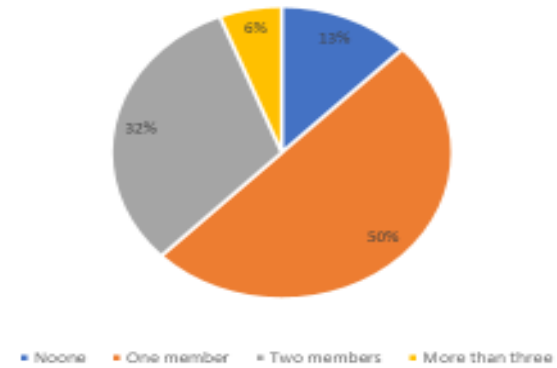
Main Findings of Quantitative Research

- 152 respondents – 77% mothers, 17% fathers and 6% close relatives
- 51% of the children were male and 49% female

Main Findings of Quantitative Research

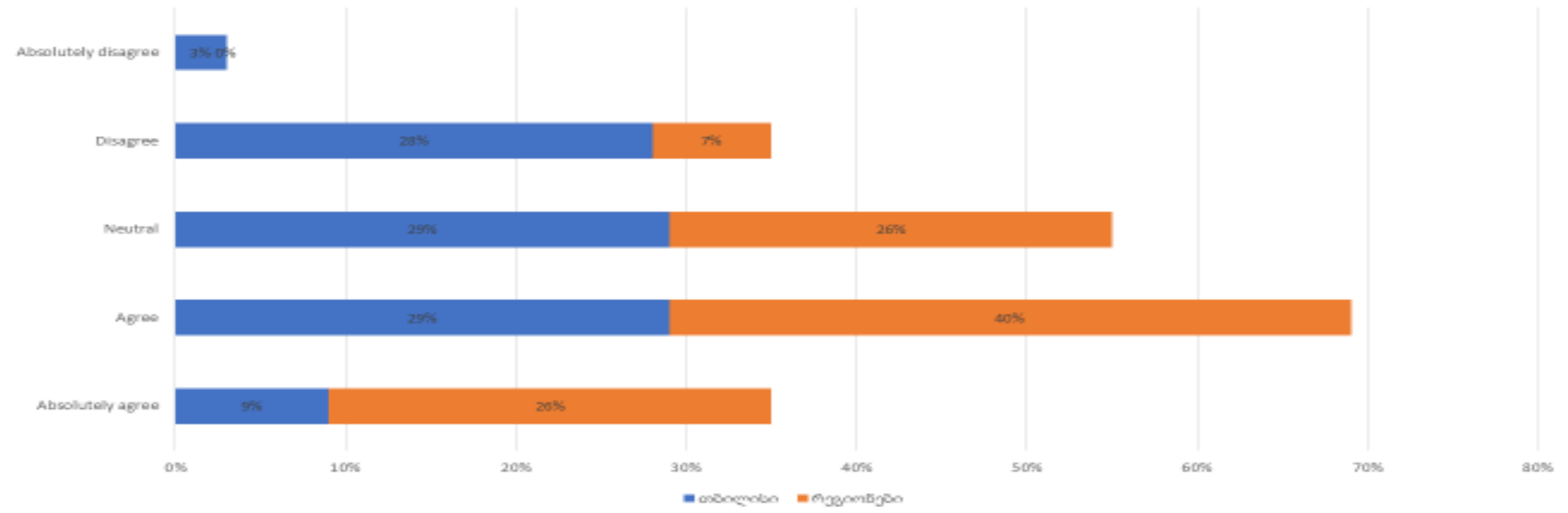


How many Members of the Family are Employed

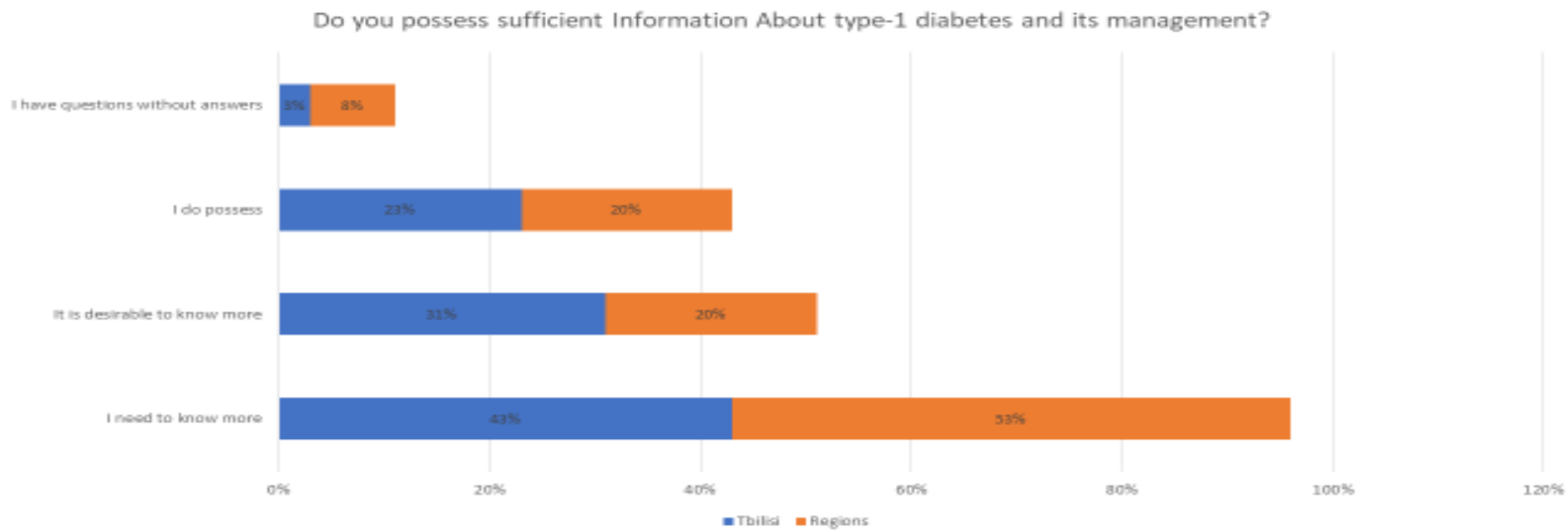


Main Findings of Quantitative Research

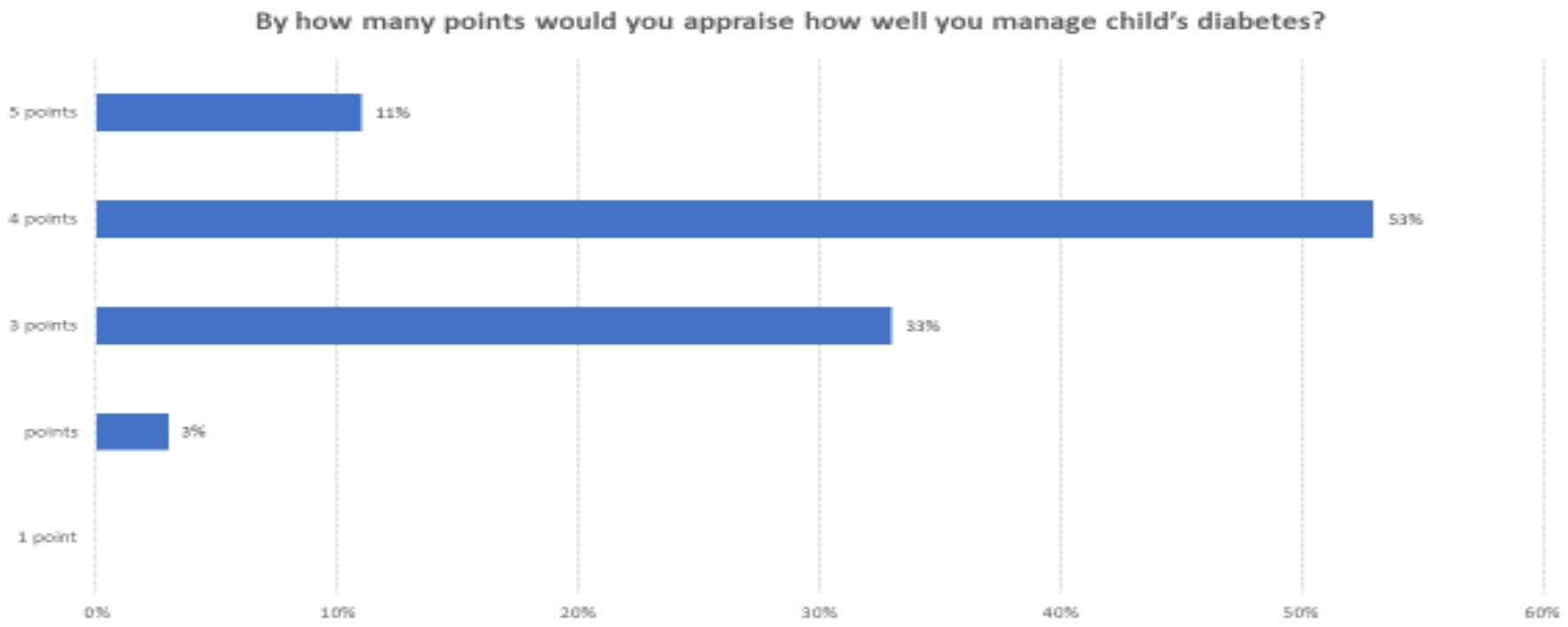
Does Medical Personnel Provide Sufficient Information about Diabetes and Its Management?



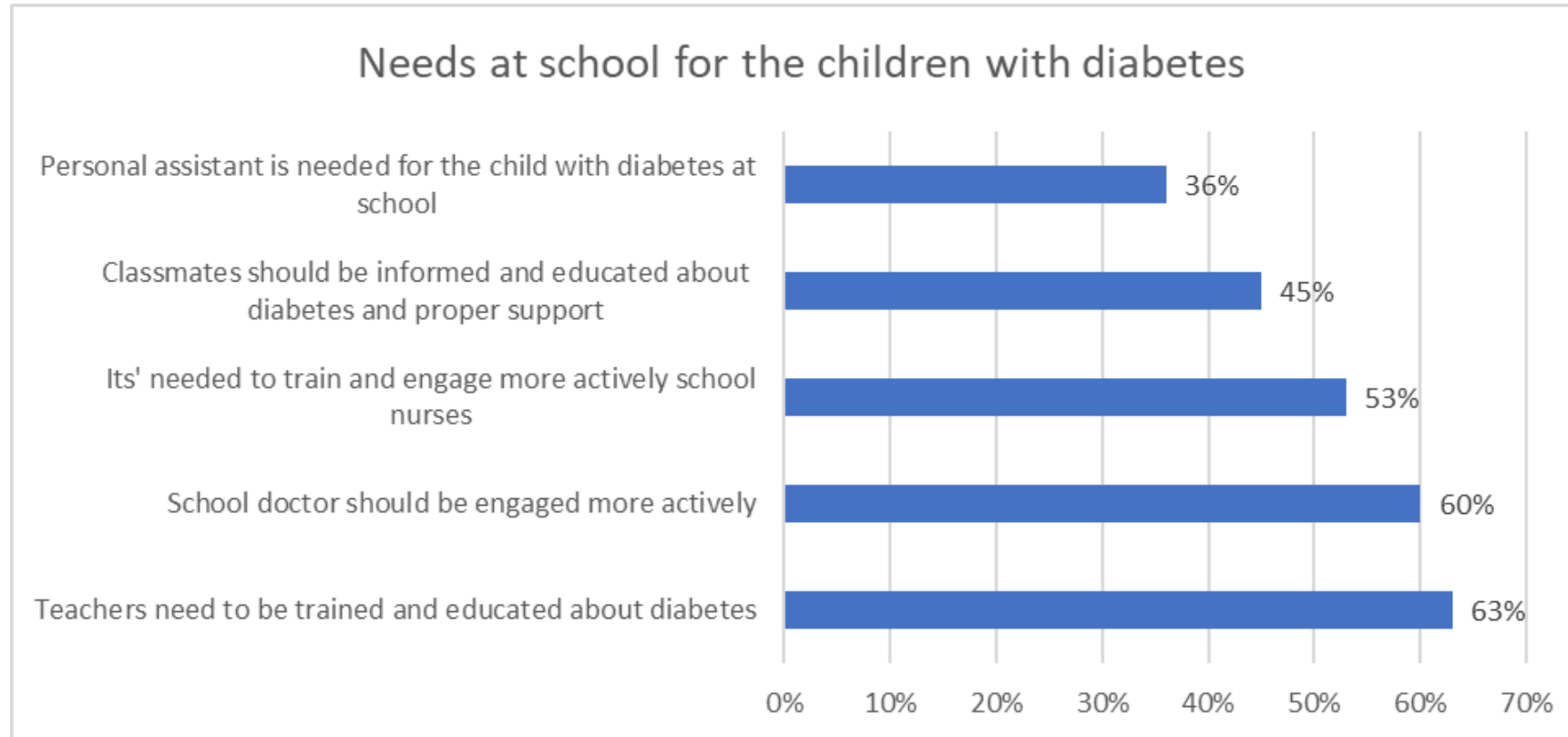
Main Findings of Quantitative Research



Main Findings of Quantitative Research

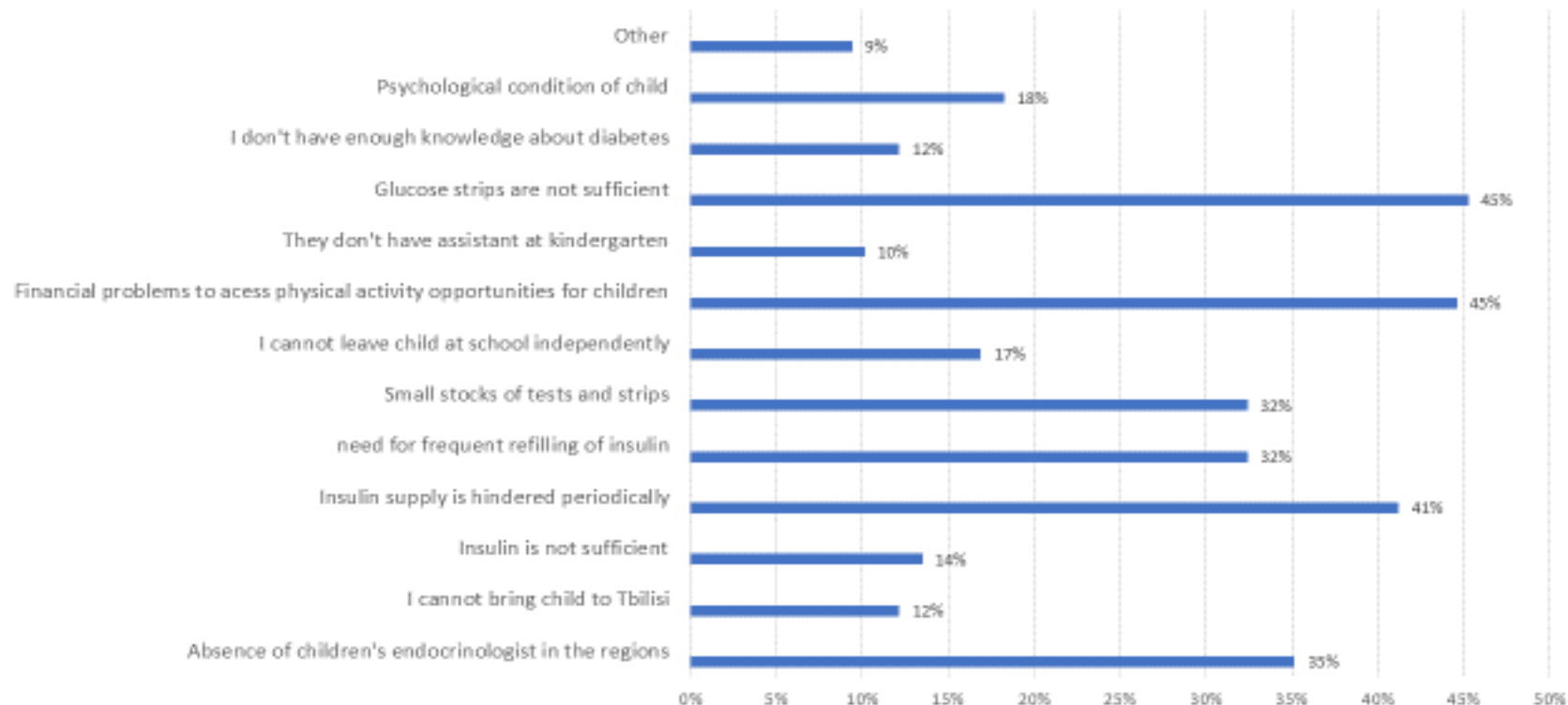


Main Findings of Quantitative Research



Main Findings of Quantitative Research

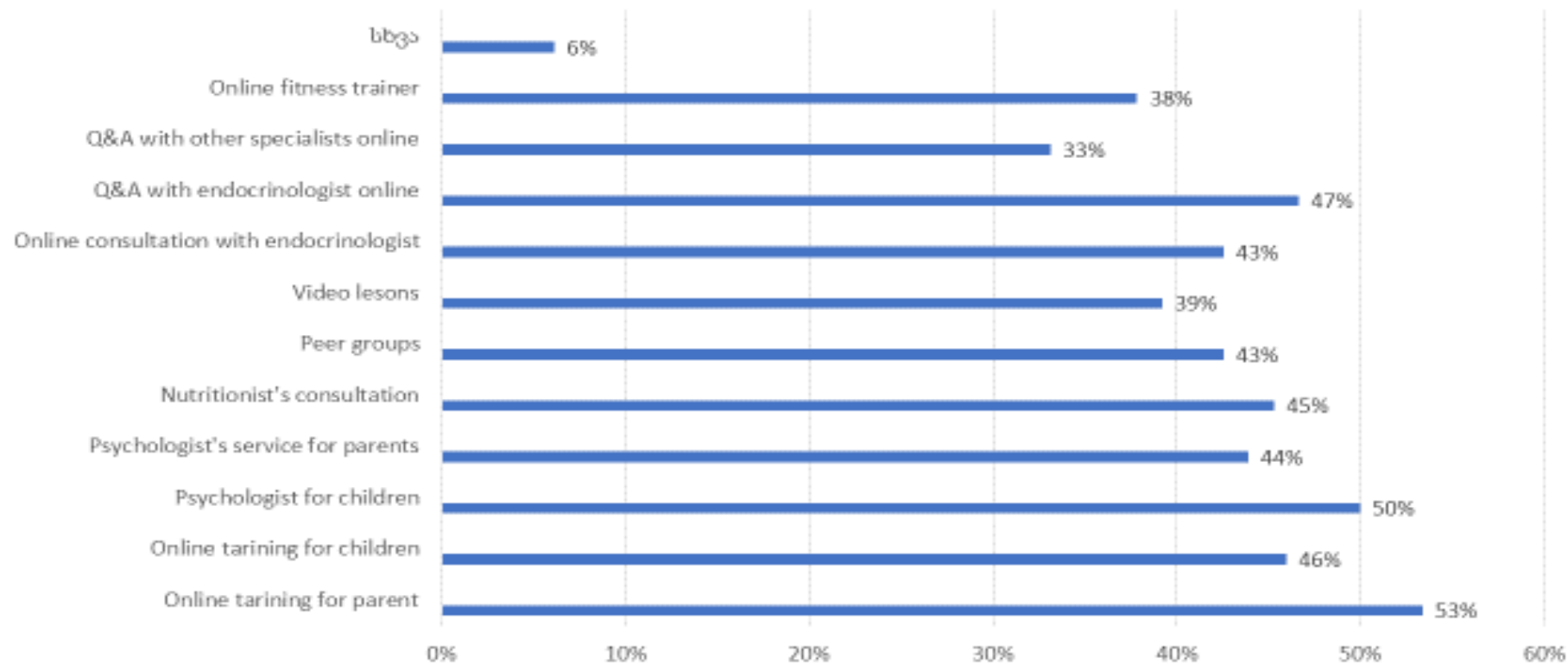
What represents the biggest problem for you regarding management of child's diabetes?



* Among the respondents living in the regions the biggest problem is, that they don't have children's endocrinologist. 61% stated this problem and 21%- every fifth parent couldn't bring child to Tbilisi for regular check ups

Main Findings of Quantitative Research

Which digital platform/services would help to manage child's diabetes better?



Conclusions and Recommendations

- According to the findings of the research it can be concluded, that significant number of the families with children having type-1 diabetes are faced with financial problems. Approximately half of the surveyed respondents indicated their family's monthly income as less than 1000 Gel (370\$)
- Half of surveyed families only one family member is employed
- Limited accessibility to qualified pediatric endocrinologists. This scarcity of specialists is especially problematic in case of the regions. It should be considered, that 61% of the parents living in the regions indicate this issue as the biggest problem for them in diabetes management
- One in five parents living in the regions say they cannot bring child with diabetes to the Capital of Georgia for regular checkups

Conclusions and Recommendations

- For the purpose of increasing accessibility to qualified specialists and endocrinologists digital technologies should be leveraged. More specifically, digital platform can be utilized for online consultations with endocrinologists, psychologists, nutritionists, as well as, for online trainings for the parents and children
 - Digital library of video lectures can be created and made accessible on the mentioned platform etc.
 - It is essential to offer educational programs for the personnel of schools and kindergartens. Printed and video educational materials should be developed and provided for this purpose as well
- Preparation of online versions of these materials could significantly increase accessibility for schools' and
- kindergartens' personnel and promote their awareness.

Conclusions and Recommendations

- To achieve multidisciplinary team approach, primary healthcare system should be strengthened and, on its basis, multidisciplinary teams - with all the necessary specialists – formed. According to the results of the research it is essential to add psychologist and nutritionist to the team in charge of the treatment
- Monitoring on execution of state funded diabetes program should be strengthened from the Ministry of Healthcare. For instance, greater attention should be paid to the conditions of insulin storage in pharmaceutical stores. Two of every five interviewed parent expressed concerns regarding quality of insulin. And more intense monitoring should be exerted on the conscientious fulfillment of the duties providers have, in scope of the state-funded diabetes program.

Conclusions and Recommendations

- Existence of the platform, programs for the socialization of the children with diabetes. This platform should be used for the information and education of the children regarding diabetes management, as well as, for increased engagement in the self-care
- Besides target groups – teachers, parents, nurses and other – whole society should be informed about diabetes. In particular, educational and awareness campaign should be carried in the society

According to the respondents, “their children need support instead of feeling sorry for them”. The main objective of this campaign should be to inform society what diabetes is and how to support properly children having diabetes.



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Thank you

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