Perceived support from family and friends among adults with type 2 diabetes

Summary

The aim of this study was to describe how adults with type 2 diabetes perceive support provided by family and friends and how such support can influence their diabetes management. Diabetes management behaviours have been described as challenging, and many individuals with type 2 diabetes fail to attain optimal glycaemic control. It has therefore been suggested that support from family and friends is critical for effective diabetes management. However, there is little empirical evidence from a patient perspective of how support provided by family and friends is perceived and how support can influence patients' diabetes management.

The study was comprised of a descriptive qualitative design that included three focus groups, which were used to collect data. The sample consisted of 19 adults with type 2 diabetes, and the data was analysed using qualitative content analysis. The findings revealed three themes reflecting perceived support from family and friends: mixed practical support; non-constructive emotional support, and intrusive informational support. Furthermore, the findings indicated that participants' perceived mixed practical support, eg diet and exercise, from family and friends, as helpful and valuable. Thus, this kind of practical support stimulates effective diabetes management. However, many participants reported that they did not receive such support, which in turn, reduced their diabetes regulation efforts. Emotional support was perceived as non-constructive and appears to demotivate participants' diabetes management. Finally, the findings indicated that informational support was perceived as intrusive and did not meet their needs for support in diabetes management.

Key words

type 2 diabetes; focus groups; self-management; social support; family and friends

Introduction

The fact that type 2 diabetes is a self-management disease means that its treatment is largely a combination of peoples' daily decisions and behaviours concerning healthy diet, physical activity, blood glucose testing, foot care, and medications.[1] The demands of these daily behaviours have been described as challenging and many individuals fail to adhere to diabetes management.[2]

Effective diabetes management behaviours are hard to achieve and even harder to maintain, which suggests that people with type 2 diabetes are in need of support. Family and friends are often a part of the patient's everyday life; thus, it is expected that they play a central role in supporting people with diabetes management and they may influence the extent to which people with type 2 diabetes adhere to diabetes management.[3] Informal support, received from family and friends, has been emphasised to be critical for diabetes management, although such support has been less studied compared to formal support (received from professionals or formal groups).[4]

Recent studies have suggested that support from family and friends can impact positively upon health outcomes. For instance, several studies on diabetes have found that support from family and friends can motivate people with type 2 diabetes to engage in glucose monitoring, healthier eating habits and increased physical activity.[5–12] In addition, studies have demonstrated that higher levels of family and friends support may be associated with better diabetes management.[11,13] Although most diabetes research has assumed that social support is constructive, there are considerable challenges in the research about social support from family and friends and its influence on self-management in type 2 diabetes.

A recent systematic review found that there are considerable gaps and inconsistencies in the research about social support and its effects on diabetes management.[14] For example, some researchers have pointed out that not all support is aimed at fostering healthy behaviours.[14,15] Nagging, critical comments, and overprotection from family members have been found to have negative effects on self-management.[11,16–18] Studies have also revealed that family members are a source of stress and can act as barriers to self-management.[5,19] Another review article found that there is a lack of consensus regarding gender differences in the association between informal social support and diabetes management.[4]

Findings indicated that family support was associated with reduced HbA1c in males, but increased HbA1c in females, while no significant association between family support and HbA1c was found in other studies.[4] In addition, the review article showed that males received more support from their spouses, and females received more support from their friends.[4] Due to the gaps and inconsistencies in the research about support from family and friends, more research in this field is needed.

In addition, surprisingly few studies have investigated what people with type 2 diabetes perceive as constructive or non-constructive support from family and friends, and how such support can influence their diabetes management. It is suggested that better understanding of social support in diabetes management could help people obtain adequate diabetes management and reduce the daily burden of living with diabetes.[14]

The study

Aim

The aim of this study was to describe how adults with type 2 diabetes perceive support provided by family and friends and how such support can influence their diabetes management.

Methods

Design

The research had a descriptive qualitative design. The data were collected by means of focus group interviews.

Sample

The participants consisted of adults with type 2 diabetes living in the southwest of Norway. A purposive sample was recruited from three separate sources: the Coping and Learning Centre at a university hospital, a local Diabetes Association, and general practitioners (GP). The inclusion criteria were 30 to 65 years of age, disease duration of at least one year, and the ability to speak Norwegian. Thirty people were invited by the leader of the Coping and Learning Centre and nine by the nurse working with the GPs. In addition, the local leader of the local Diabetes Association recruited three people. A total of 21 people agreed to participate: 12 from the Coping and Learning Centre, 6 from the GPs, and three from the local Diabetes Association. On the day before the scheduled focus group meeting, the participants received a reminder phone call. Prior to the start of the focus groups, two participants dropped out of the study due to work engagements and illness.

Table 1. Clinical and demographic characteristics of the sample

	Focus group 1	**Focus group 2**	**Focus group 3**
Gender			
Male	5	3	4
Female	2	2	3
Age (median)	57	52	42
Marital status			
Married	6	3	5
Single	1	2	2
Educational level			
University	5	3	1
High school	2	1	6
Primary and secondary school		1	
Employment status			
Working full time	4	2	4
Working part time	2	1	3
Unemployed	1	2	
Duration of diabetes (median)	8	9	2
Diabetes treatment			
Diet	1	1	2
Tablets	2	3	1
Insulin	4	1	4
Clinical parameter			
HbA1c (mean)	7.1	7.5	6.5

Data collection

Qualitative data were collected by means of three focus group interviews. Every group included both sexes and consisted of five to seven people.

The interviews took place at the university and included two meetings: each limited to two hours. Two meetings were selected, because several sessions can lead to a deeper understanding of an issue.[20,21] Immediately prior to the focus groups, demographic and biomedical information was gathered via questionnaires. Afterwards, the moderator reviewed the process with the participants, for example, expressing that all opinions are welcome even if the participants disagree with each other. The researcher moderated the discussion by means of a semi-structured interview guide and began with a general question ('Can you tell us a little about yourself, for instance, your name and the duration of your type 2 diabetes?'), and progressed to questions specific to the research objectives (*eg* 'How do you experience support from family and friends about your diabetes?').

Ethical considerations

The study was approved by the Norwegian Regional Committee for Medical and Health Research Ethics (No. 060.07) and the Norwegian Social Science Data services (NSD) (No. 16664). All respondents were invited by letter to take part in the study, and all provided their informed written consent prior to the focus groups.

Data analysis

The data were analysed through qualitative content analysis described by Graneheim and Lundman.[22] The analysis was performed in several steps, and both the manifest and the latent content were highlighted using the NVivo7 programme (QSR International Pty Ltd). Firstly, the transcribed text about participants' perceptions of support from family and friends was read several times by the analyst to achieve a sense of the whole material. Secondly, the text was divided into meaning units and condensed, while retaining their core meaning. The condensed meaning units were then labelled with codes (*eg* 'bombarded with information'). The different codes were compared on the basis of similarities and differences and consolidated into tentative sub-themes (*eg* 'overwhelming information'). Thirdly, the preliminary themes were identified and formulated by the author, after being presented and discussed with other researchers.

Table 2. Themes and sub-themes

Themes	Sub-themes
Mixed practical support	Constructive practical support Non-constructive practical support
Non-constructive emotional support	Overwrought response Negative attitudes
Intrusive informational support	Overwhelming information Irrelevant information

Results

The analysis resulted in the identification of three themes and six subthemes related to participants′ perceptions of support provided by family and friends.

Mixed practical support

This theme is based on the discussions of how practical support, in terms of diet and exercise, is perceived as constructive for some participants, while other participants perceived such support as non-constructive. In the focus groups, some participants shared how their wives were interested in diet and how they liked to prepare new foods and adjust foods for them, which they perceived as helpful in balancing their diet and achieving adequate blood glucose levels.

‘Following my diagnosis, we made some changes to basic foods [in our daily diet]. My wife enjoys cooking from the recipes in the journal for diabetics, which makes it easier to adopt a healthy diet.’

Moreover, it emerged from the discussions that diet and exercise support from family and friends was perceived as very important and helpful for participants' diabetes management, as exemplified in the following comment:

‘I receive incredible amounts of support, especially from friends helping me getting started exercising, for example by [their] joining me for walks and getting me to the gym.’

However, it appeared from the discussions that most participants rarely received constructive practical support. They felt that family and friends did not provide practical support, especially in terms of diet, and therefore they struggle to incorporate diet into their daily diabetes management. Consequently, these participants reduced their diabetes regulation efforts.

‘I struggle sticking to the required diet. Since I do most of the cooking at home, I constantly have to consider their dietary wishes versus my restrictions, and it overwhelms me to the degree that I simply can't manage sticking to the required diet. Therefore, I have to increase my insulin doses.’

As the quotations above demonstrated, changes in established diet patterns were reported as difficult, and some expressed frustration because they did not know how to handle this situation.

‘When the family is used to a diet, and then you try changing it… For example, if we were not to have any sauce, they'll complain that ‘sauce is so good.’ How are you to manage [changing that diet]?’

On the other hand, it appeared from the discussions that some participants commented that family and friends made special food for them, but they perceived this as more annoying than helpful for diabetes management, as exemplified in the following comment:

‘Right after I was diagnosed with diabetes, I went to someone's 50th birthday party, where the guests had just learnt that I had diabetes. It annoyed me intensely when they told me which food was prepared for me and what the others were having. They were overly careful about my diet, so I had to tell them that I can eat other things as well.”

Non-constructive emotional support

This theme, which occurred throughout the discussions, emphasised that many participants received overwrought response and negative attitudes from family and friends about their type 2 diabetes. It emerged from the discussions that some participants rarely spoke about diabetes, especially in a family context, because of the family members' overwrought reactions.

'I have chosen to reveal as little as possible about my health, especially to my mum and sister, because they overreact if I mention my diabetes. If I tell them nothing, I can lead a quiet life dealing with my own worries instead of having to take their [exaggerated] worries into account. Even though I can talk a bit more with my dad, it has become a habit not to share things with my family. I can discuss the situation with my friends somewhat more [easily], but it is too sensitive for my family.'

Another topic discussed in the focus groups was friends' and family members' negative attitudes regarding people with type 2 diabetes. The participants emphasised that family and friends did not say it directly, but their attitudes expressed that diabetes is the fault of those who are diagnosed with it.

'People [family and friends] can barely see eye to eye [with me] and acknowledge my diagnosis, because they really see it as my own fault, they are just not brave enough to say it out loud.' When participants notice that friends and family have negative attitudes, they avoid saying something about diabetes, as expressed by the following quotation:

'You know, there is that conviction that "you are what you eat." I feel there are similar attitudes concerning type 2 diabetes that make me keep quiet about it [the diagnosis].'

In addition, being stigmatised because of diabetes was a recurrent topic in the focus groups. For instance, participants described how they were treated differently among family and friends. *'Well, you notice their attitude: "No, you cannot eat that." You feel a bit isolated and treated differently in a way.'*

As the quotation above reflected, many expressed their need not to be socially stigmatised. Consequently, participants were afraid to behave in a way that generates stigmatisation.

Another form of negative attitudes, as discussed in the groups, was nagging and how nagging demotivated diabetes management behaviours. *'I know personally that nagging demotivates me and makes me completely introverted.'* To avoid nagging and arguments about diabetes behaviours, one participant used the following strategy: *'If they start nagging, I say that I've taken an extra pill for the occasion, just to calm them and to avoid constant nagging (reminders about what not to eat).'*

Intrusive informational support

This theme reflects that support, related to information about diabetes, was perceived as intrusive, and it appeared from the discussions that many participants experienced such support as overwhelming and irrelevant. Many participants reported that they got a lot of information from family and friends about diabetes. However, they agreed that family and friends did not meet their needs for support either because family and friends lacked knowledge about diabetes: *'Yes, my husband knows of my diabetes, but he knows nothing of what it entails'*, or because they just repeated information about diabetes that the participants already knew as demonstrated by the following quotation:

'It's fair enough that family and friends tell you once, but when they keep repeating themselves you get bored with it. After all, you do know some things for yourself. The others don't know more than you do. So it all gets mixed up into a repetition of stuff you already know. So, that kind of support can be exasperating.'

Another participant commented: *'It's just that this support can be annoying sometimes, for example, when you are at a party and you are referred to special food.'*

As the quotations above demonstrated, some participants perceived such informational support as frustrating and annoying. Consequently, some of them experienced difficulty in a social context because they used a lot of energy to avoid irrelevant information about diabetes, or to avoid more information support than they wanted. Therefore, some hid the fact that they have diabetes because, as one participant said: *'I keep my type 2 diabetes diagnosis to myself, because I can't stand the know-it-all's.'*

One participant concluded that, *'I have to look after myself – be strong enough to manage diabetes by myself.'* Another participant stated that he did not need support from family and friends to manage diabetes, but *'We need supporters in life, but not specifically for diabetes.'*

Discussion

The aim of this study was to describe how adults with type 2 diabetes perceived the support provided by family and friends, and how such support can influence their diabetes management. The findings showed that participants perceived three dominant attributes of support from family and friends: mixed practical support, non-constructive emotional support, and intrusive informational support. Interestingly, this study indicates that most participants perceived the support from their family and friends as non-constructive. These findings are in contrast to a Norwegian quantitative study (n=386), which found that the majority of adults with type 2 diabetes, reported that they never or seldom received non-constructive support from family and friends.[23] The contrasting results could be related to the fact that the quantitative study measured overall social support and did not measure specific attributes of support. Malecki and Demaray[24] pointed out that the use of overall measures as an indicator of support is potentially problematic because of missing interesting and clinically important information that breaks down social support attributes. The present study, addressing the perspective of non-constructive support, is therefore important, because many studies have not taken into account that social support can be counter-productive and impact negatively upon disease management.[4]

The first theme focuses on the practical support from family and friends as essential for participants to perform their daily diabetes management. However, many participants reported that they did not receive such support, which in turn reduced their diabetes regulation efforts. Thus, the findings are in accordance with previous studies which have demonstrated that there is a significant tendency for practical support from family and friends to be associated with better diabetes management, whereas non- practical support is associated with poorer diabetes management.[11,23] Moreover, some previous studies have found gender differences in association between social support and diabetes management.[4] In the current study, some male participants mentioned their wives, especially in relation to constructive practical support. However, there are no clear patterns supporting previous studies about gender difference and social support.

The second theme showed that many participants experienced non-constructive emotional support from family and friends, such as negative attitudes and overwrought emotional reactions. Negative attitudes from family and friends generated a detrimental impact on health behaviour, such as demotivation and insufficient diabetes management. In addition, many participants attempted to distance themselves or

avoid situations in which they feel stigmatised. Research on stigma in diabetes is limited,[25] but it is suggested that such attitudes may lead people with type 2 diabetes to feel guilt and blame for their diabetes. As a result, people with type 2 diabetes may shy away from opportunities for support to avoid such stigma and prejudice, which can potentially act as a barrier to diabetes management.[26] Moreover, the findings reflected that diabetes is a sensitive issue because of the overwrought reactions, especially from some family members. These findings indicated that such response might be more demanding than helpful, and therefore cause more emotional stress than support. It is also worth noting that even though participants discussed overwrought response mainly in a family context, the findings also indicated that participants experienced such reactions among friends. Yet, these topics need to be explored in greater depth in literature and clinical practice.

Thirdly, the results indicated that many participants felt that informational support, about type 2 diabetes, received from family and friends was intrusive. Similar findings are also documented in other studies.[27,28] Mayberry and Osborn found that overly solicitous behaviours are associated with lower self-reported diabetes, lower self-efficacy, and less physical activity.[28] There is no evidence in the present study that intrusive informational support contributed to poorer diabetes management. However, participants devoted a lot of energy to avoiding more informational support about diabetes than they wanted, and they tried to hide the fact that they had diabetes. They also faced circumstances under which many friends and family members had insufficient knowledge about diabetes management. Consequently, they found their information to be unhelpful. These findings support another study, which has highlighted the need to provide family and friends with appropriate information about diabetes.[29] Interestingly, a few participants stated that they did not need any support for diabetes management. It is possible that the reason for this statement could be related to the fact that the majority of the participants in the current study have HbA_{1c} levels within the acceptable range. This interpretation is supported in another study with similar findings.[30] However, this finding reminds us that support may not be perceived as universally helpful; its attributes may depend at least partially on context and the complexity of the diabetes regime.

Methodological discussion

To strengthen the credibility of the research, the interview guide was pre-tested with three individuals with type 2 diabetes who were not included in the study. Based on their recommendations, some of the questions were revised. Summarising the group discussions, and attaining feedback regarding these summaries from the participants also achieved improved credibility. The participants confirmed that theses summaries were in line with the group discussions. The dependability of the research was ensured through the use of the same interview guide with each group. In addition, the interviews were audio recorded and transcribed verbatim. The transferability of the findings to another context was enhanced through the provision of descriptions of appropriate quotations, as well as of the participants and the data collection.

There were, however, some limitations in this research. The participants were mainly people with acceptable levels of HbA1c. It is possible that adults who struggle to attain adequate glycaemic control might have identified other dimensions of support, such as affirmational support. It is also unknown whether these attributes of support would change if the participants had been interviewed individually or when they were newly diagnosed.

Conclusion

The findings in this study indicate that practical support, in terms of diet and exercise support, from family and friends, was perceived as helpful and valuable and may stimulate diabetes management. However, many participants reported that they did not perceive such support, which in turn reduced their diabetes regulation efforts. Emotional support from family and friends is perceived as non-constructive and appears to dissuade them from including family and friends in their diabetes management. Finally, the findings indicate that informational support was perceived as intrusive and did not meet participants′ need for support. These findings may have important implications for nursing practice and research. It is important for nurses to identify people with type 2 diabetes who may be at risk of insufficient support and counsel them to manage their non-supportive interactions. Moreover, it is also important for nurses to help people with type 2 diabetes to clearly communicate the type, amount, and timing of support they desire and do not desire from family and friends. Family and friends also need to be provided with a better understanding and the skills needed to foster adequate support for people with type 2 diabetes. Interventions aimed at investigating the relationship between perceived support from family and friends and diabetes management are required.

KEY POINTS

- Practical support from family and friends was perceived as valuable for people with type 2 diabetes
- Emotional support from family and friends appears to demotivate diabetes management
- Informational support from family and friends did not meet their needs for support in diabetes management

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