Taking Diabetes Self-Management Education to the Next Level

Preface

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When I started working for the Diabetes Control Program (DCP) in Maine almost 30 years ago, there were only three outpatient education programs in the state. Maine had one of the first state diabetes control programs that was funded by the Centers for Disease Control. The goal of the DCP was to make diabetes self-management education (DSME) programs available throughout the state. When I left Maine 3 years later, there were 36 DSME programs all using the same curriculum, which was designed by a statewide task force of nurses and dietitians.[1] That program continues today.

Many widely held assumptions about diabetes education at the time were, in retrospect, naive. For example, most health professionals assumed that content expertise was all that was required to be an effective diabetes educator. Because I was trained as an educational psychologist, I realized that there was more to being a successful diabetes educator than knowing about diabetes. Being a successful diabetes educator also requires educational and counseling skills related to, but separate from, diabetes content expertise. It is gratifying to see that this fact is now widely recognized by diabetes educators.[2]

Another assumption prevalent in those early years was that providing patients with the knowledge needed to take care of their diabetes would result in better self-management and glucose control. That assumption seemed so obvious at that time that it was seldom questioned. However, a study conducted in 1982[3] demonstrated that improved knowledge about diabetes was not enough to result in improved glucose control. The investigators suggested that the results meant that DSME was not effective.

This study stimulated discourse about what was needed for diabetes education to result in improved self-management and better glucose control.[4–9] Realizing that DSME must involve more than providing knowledge and technical skills, educators and behavioral researchers began trying to determine what combination of educational elements was necessary to result in better outcomes.[10]

Although this research continues today, we have learned much since the late 1970s and early '80s. For example, we now know that, to be effective, DSME needs to address psychosocial issues, provide problem-solving skills, and be based on a strong theoretical foundation.[7–10] Educational research also indicates that effective DSME must be tailored to the characteristics of the patients for whom it is intended (e.g., type of diabetes, age, or cultural group).[11]

Another finding that has become increasingly evident in recent years is that short-term DSME programs usually only result in short-term improvements.[12,13] In fact, Standard 8 of the most recent National Standards for Diabetes Self-Management Education now requires long-term follow-up after initial DSME.[14] The recognition that follow-up education is necessary has led to more programs offering two or three follow-up visits to their patients after they complete the initial DSME.

This approach, while better than no follow-up education, is limited by several factors. One constraint is that diabetes educators are usually required to design DSME programs based on kind and amount of reimbursement available for that

education.[15] Another constraint is the widespread prevalence of misconceptions about the purpose and nature of DSME. Diabetes education is still viewed by many as a process whereby patients learn how to self-manage their diabetes and apply what they have learned over the long term, with occasional follow-up visits. This is the "education-as-inoculation" paradigm, and follow-up visits are often referred to as "refresher" or "booster" sessions. Although it is not incorrect to assert that patient education provides patients with knowledge and skills they can apply over the long term, such an assertion represents an incomplete understanding of education that results in a flawed view of the purpose, amount, and structure of DSME and the follow-up needed for successful self-management.

Well-designed DSME, including follow-up, does more than provide knowledge and skills. It also provides ongoing emotional and psychosocial support and allows patients to obtain help from other group members to solve problems that arise throughout their lifetime of living with diabetes.[16,17]

Perhaps the least well-appreciated purpose of DMSE is its ongoing role in focusing patients' attention on diabetes. Because we all have a finite amount of time and energy, most of us live with competing priorities. We cannot do all the things we would like to do. As a result, we make choices and respond to one priority at the expense of another. Our priorities are constantly realigning themselves in response to our daily experiences. It is not unusual for patients' commitment to excellent diabetes self-management to diminish as they respond to demands placed on them by family, friends, work, church, civic organizations, and other aspects of their community. This is especially true because the consequences of poor blood glucose control may not be apparent for years, whereas other priorities in their lives may be concrete, vivid, and emotionally compelling. Participating in DSME and ongoing diabetes self-management support (DSMS) reminds patients that their diabetes is a serious disease and that their risk of developing complications can be increased or reduced by their self-management decisions. When diabetes education is done well, it helps patients realize that they will be unable to address the needs of their loved ones and community obligations if they do not take care of themselves.[16,17]

Behavioral and educational research to identify the most effective theories and methods to use with initial diabetes patient education will and should continue. However, it is now time to also devote substantial resources to developing and evaluating long-term DSMS programs that are based on an appreciation of the complex nature of patient education and human behavior. It is time to take DSME to the next level.

In this *Diabetes Spectrum* From Research to Practice section, we have focused on studies designed to provide long-term support for diabetes self-management, as well as long-term support for diabetes prevention. The first article, "Providing Long-Term Support for Lifestyle Changes: A Key to Success in Diabetes Prevention," by David G. Marrero, PhD, and Ronald T. Ackermann, MD, MPH (p. 205), addresses the need to develop community-based interventions to prevent diabetes among high-risk populations. It is followed by a discussion of "Clinic-Community Partnerships: A Foundation for Providing Community Supports for Diabetes Care and Self-Management" by Carol A. Brownson, MSPH; Mary L. O'Toole, PhD; Gowri Shetty, MS, MPH; Victoria V. Anwuri, MPH; and Edwin B. Fisher, PhD (p. 209). The theme of not depending entirely on the health care system for DSME is continued in an article titled, "Overview of Peer Support Models to Improve Diabetes Self-Management and Clinical Outcomes," by Michele Heisler, MD, MPA (p. 214). The section concludes with a discussion of the need to follow short-term DSME with long-term DSMS in an article titled, "From DSME to DSMS: Developing Empowerment-Based Diabetes Self-Management Support," by Martha Mitchell Funnell, MS, RN, CDE; Tricia S. Tang, PhD; and myself (p. 221).

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