Telenursing and its Effect on Knowledge and Adherence to Proper Diet and Physical Activity among Overweight College Students

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ABSTRACT

Introduction

This study aims to develop and implement a telenursing intervention program to increase the knowledge and adherence to proper diet and physical activity for the prevention of weight-related diseases such as Hypertension, Type II *Diabetes mellitus*, and cardiovascular diseases among overweight college students aged 18-25 years old.

Methods

The DeFIT it! Program was designed for the subjects to acquire knowledge on proper diet and physical activity. The sample consisted of 24 students with a body mass index (BMI) between 25.00-25.99 kg/m². Subjects in the experimental group were subjected to telenursing by receiving 4 daily short messaging services (SMS) for 21 days regarding health education on proper diet and physical activity, and reminders to follow the DeFIT it! Program. Both the experimental and control group were administered with a pretest and a posttest knowledge evaluation questionnaire before and after the implementation of the study, underwent a weekly body mass index assessment, and were given a DeFIT it! Booklet and DeFIT it! Diary during the initial contact with the respondents. The DeFIT it! Diary which the respondents utilized to record their food intake has the following scoring: 0 – if they did not eat the recommended diet; 1 – if they ate less than the recommended amount of diet; 2 - if they ate the recommended amount of diet; 3 - if they ate more than the recommended amount of diet

Results

There is a significant increase in the knowledge of telenursing users before and after the study. The mean posttest score of the telenursing and non telenursing users group is 15 and 16 respectively. There is no significant difference on the physical activity and diet adherence scores of telenursing users when compared to non telenursing users. There is a significant decrease in the BMI of the non telenursing users group which may be attributed to their low diet adherence scores (their average scores revealed that they ate less than the recommended amount of diet).

Conclusions

Telenursing with the use of SMS is effective in increasing the subjects' knowledge regarding proper diet and physical activity. However, telenursing does not have a significant difference to a subject's adherence to the DeFIT it! Program.

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