ABSTRACT

Background

Truck drivers face many health problems related to obesity because of the sedentary nature of their job. Additionally, drivers have limited access to healthy food and places to exercise. The purpose of the Worksite Health Eating, and Exercising for the Long-haul (WHEEL) pilot study was to see a 10% weight reduction among drivers in 12 weeks through the use of weekly health coaching, educational nutrition and exercise materials, and exercise equipment.

Methods

We included currently employed long-haul commercial trucker drivers with a BMI ≥30 kg/m² and age ≥21 years. The 12 week intervention consisted of two in-person visits (baseline and week 12). During both visits, drivers completed a lifestyle questionnaire, a 24 hour diet recall, anthropometric measurements, and a lipid panel. At baseline, drivers established three health goals for the 12 weeks using the SMART (Specific, Measurable, Attainable, Relevant, and Timely) principle for goal setting. For each SMART goal the driver also listed three steps to help him achieve the goal. Drivers were given health materials, including dietary information, physical activity examples, and exercise equipment to use throughout the study. Weekly telephone coaching sessions were conducted by a health coach. Discussion focused on successes and barriers with healthy eating and physical activity. The health coach refocused the drivers on their health goals and reassessed steps to achieve them. The drivers were interviewed for feedback on the study at the exit visit. Data were analyzed using SAS 9.3 to obtain frequencies, means, and the Wilcoxon rank sum test. The study is ongoing with nine drivers currently enrolled and four who have completed the study.

Results

A total of 13 male truck drivers were enrolled in the study. At baseline the mean age was 45.9 (SD=11.0) years, the mean years as a professional truck driver was 14.6 (SD=12.3) years, mean total cholesterol was 191.8 (SD=48.2) mg/dl, and mean weight was 130.5 (SD=25.7) kg. Mean weight at week 4 for all 13 drivers was 127.3 (SD=25.3) kg, a difference of 3.2 (SD=3.0) kg from baseline, p=0.3.

Mean weight for the first four drivers was: 117.2 (SD=29.3) kg at baseline, 111.1 (SD=33.1) kg at week 8, and 112.2 (SD=34.1) kg at week 12. The mean change in weight for these four drivers from baseline to week eight was 6.2 (SD=4.1) kg, p=0.3 and baseline to week 12 was 5.1 (SD=5.0) kg, p=0.3.

Conclusion

There appears to be a meaningful weight loss among drivers over the 12 week period, although statistical significance is not the goal of this pilot study.