BACKGROUND: Health information and access to it are available in various forms, most recently through the Internet and health related web-sites. The difficulty in accessing and being able to navigate these resources is commonly referred to as a ‘digital divide’. Numerous public health issues are addressed via the Internet including physical activity (PA). The Internet may offer a means of large-scale PA assessment. The web-based, Women’s Injury Study (WIN) utilizes the Internet in tracking PA. While validity of self-reported (SR) PA is of utmost importance, it must be verified that access to and use of the website is not compromised by age, computer skills, education, income, or race.

PURPOSE: To determine if an individual’s level of Internet usage skills and demographic variables are related to percentage of (SR) PA Internet logging.

METHODS: For this observational study, 902 women completed weekly, Internet-based PA logs and reported steps accumulated via a pedometer and any musculoskeletal injuries incurred. Variables (age, race, education, income, and computer skills) were analyzed to determine relations to participants reporting ≥ 75%, or 3 out of 4 weeks, of logging per month. Bivariate correlations and logistic regressions (LR) were used to analyze relations between demographic variables and computer skills for logging adherence.

RESULTS: Bivariate correlations, while statistically significant for computer skills, income, and race, individually accounted for less than 4% of variation in Internet logging percentage. Logistic regressions with all variables in the model indicated that age (OR=1.02, 95%CI = 1.01-1.03), computer skills (OR=1.82, 95%CI =1.05-3.17; Good M = 92% ±11; Not-Good M = 86% ±22), and race (OR=.64, 95%CI = .46-.90; White M = 92% ±12; Non-White M = 87% ±16) were related to higher PA logging. Thus, older individuals, those with better computer skills, and Whites were more likely to log their PA behaviors online.

CONCLUSIONS: It is important to consider a digital divide when PA behaviors are obtained via the Internet. While correlations are relatively low, collectively, these confounders could influence the ability to have randomly representative samples of PA variables.

Sponsored by NIH Grant R01 AR052459-04