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**Oral: Active8! Technology-based intervention to promote physical activity in healthcare employees: a randomised controlled trial**

Holly Blake, L. Suzanne Suggs, Lucia Aquirre, Rebekah Tennyson, Dingyuan Zhou, Mark. E Batt

Background: Public health policy advocates physical activity promotion, particularly in healthcare workplaces.

Objectives: (i) test whether a technology-based health communications intervention can increase physical activity in hospital employees, (ii) compare channels for message delivery via mobile-phone text messaging (SMS) or email.

Methods: Randomised controlled trial (n=296 employees, 19-67 years; mean=38.78; SD=10.25); 12- week motivational messaging intervention designed to promote physical activity. Messages were 160 characters, tailored using Theory of Planned Behaviour and delivered twice per week via SMS (n=148) or email (n=148). Data were collected online at baseline, six weeks, 12 weeks and 16 weeks on standardised measures of physical activity behaviour and health-related quality of life.

Results: Active travel (cycling or walking for transport) significantly increased in frequency during the intervention (mean days/week = 5.64), at immediate follow-up (5.35 days) and one month later (5.25 days) compared with baseline (4.83 days). Participants spent significantly more time per day on active travel during the intervention (mean=1.57 hours), at immediate follow-up (2.90 hours), and one month later (1.27 hours) compared with baseline (mean = 0.60 hour). Decreases in sedentary behaviour were observed during and immediately after intervention. No improvements were observed in health-related quality of life. No significant differences in outcomes were observed between email and SMS groups.

Conclusions: Technology-based motivational messaging can increase the frequency and duration of active travel in healthcare employees which is sustained once intervention ends. Short-term reductions in sedentary behaviour can be observed. SMS and emails appear to be equally effective as channels of health communication.