

Nurse-Led Acceptance-Based Healthy Lifestyles Program for Community-Dwelling Patients with Pneumoconiosis: A Waitlist Pilot Randomized Controlled Trial

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Objectives:

The research project aims to investigate the effects and feasibility of an acceptance-based educational programme among patients with pneumoconiosis through a 2-arm waitlist pilot randomized controlled trial.

Background:

Symptoms, such as cough and shortness of breath, are common among patients with pneumoconiosis. The symptoms can elicit depression and anxiety, while avoidance of daily activities is believed to reduce the trigger of symptoms. Lung function then declines, and the risks of having stroke and heart failure would increase.

Methodology:

80 participants were recruited from community centres and randomly assigned to either an intervention group or a waitlist control group (1:1). A 6-week, group-based educational programme was delivered to the intervention group first and subsequently to the waitlist control group. The programme comprised 4 sessions integrating acceptance-based components and pneumoconiosis care. Psychological health, healthy lifestyle behaviours, and cardiometabolic profiles were assessed at baseline and at weeks 6 and 14. Data were analysed using a statistical software package. The programme feasibility was evaluated through interviews.

Impact:

The findings can inform the integration of acceptance-based intervention into pneumoconiosis management in Hong Kong, and future studies on chronic progressive lung diseases.

Results and Conclusion:

1. Results from 80 patients showed that participants in the intervention group demonstrated,
 - A significantly greater reduction in psychological inflexibility (with an average of 5.83 units) than the waitlist control group, suggesting improvement in psychological health.
 - Greater improvement in exercise self-efficacy (with an average of 11.68 units) than the waitlist control group.
 - Greater reduction in body weight (with an average of 1.09 kg) than the waitlist control group.
2. All participants were satisfied with the programme content and rated it as easy to understand, which also raised their awareness of mental health and fostered a more positive attitude toward the disease.