POST-COVID-19 AND PHYSIOTHERAPY: RAPID REVIEW

Review completed by the Implementation Science Team
Research, Innovation & Discovery
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Review Overview
This rapid review update summarizes jurisdictional and academic literature on physiotherapy care for Post-COVID-19. The literature search was conducted between June 29th and July 8th, 2022. The search was limited to articles published in June 2021 or later. The search identified four academic sources for inclusion in this review.

Exercise for Post-COVID Patients
Post-COVID Syndrome is associated with symptoms of fatigue, dyspnea, and impairments in musculoskeletal function, cognition, and mental health. There is evidence to suggest that exercise may help improve the symptoms of Post-COVID Syndrome (see figure 1). Jimeno-Almazán et al. (2021) explain that exercise has shown to be helpful in many pathologies which Post-COVID Syndrome shares symptoms and mechanisms with. Exercise has potential to improve Post-COVID Syndrome symptoms in a variety of ways including improving immune function. Weight training has been used in a variety of chronic illnesses where combating frailty and weakness is of interest. Endurance and weight training can both be helpful in individuals suffering from Post-COVID Syndrome. Weight training should be done in low loads, volume, and intensity should be monitored (Jimeno-Almazán et al., 2021).
A systematic review by Fugazzaro et al. (2022) describes rehabilitation interventions for Post-COVID Syndrome. The study reviewed five randomized controlled trials (RCTs), three of which compared rehabilitation interventions with no or minimal rehabilitation, and two of which compared two active rehabilitation interventions. The interventions included activities such as aerobic and resistance training, breathing exercises, and yoga. The exposure to these activities ranged from 120 minutes to 48 hours, delivered over six to eight weeks. The rehabilitation interventions seemed to improve symptoms of anxiety, dyspnea, and kinesiophobia (fear of movement). Improvements were also seen in walking capacity, muscle strength, sit-to-stand performance, and quality of life. While a more comprehensive review of the studies is needed, these findings highlight the benefits of rehabilitation interventions for people with Post-COVID Syndrome (Fugazzaro et al., 2022).
Resumption of Exercise
Salman et. al., (2021) recommended that patients should be asymptomatic before returning to exercise, and if symptoms linger they should consult with local COVID rehabilitation resources. Salman et al. (2021) described a phased approach that allows patients to build back up to their exercise routines. The current research suggests that exercise can be beneficial in improving Post-COVID-Syndrome, however, individuals may vary and therefore should consult with their doctor or local COVID rehabilitation resources.

Exercise Interventions Following COVID Recovery
Udina et. al., (2021) assessed an exercise program in individuals following acute infection with COVID-19. Most of the patients suffered pneumonia from their infection. The program combined walking, endurance and strength training and was performed for 30 minutes daily. Following the intervention, physical performance measures (cognition, frailty, gait speed, balance, etc.) all significantly improved. While more research in this area is needed, their study points towards the usefulness of exercise interventions when recovering from COVID-19 or potentially dealing with Post-COVID Syndrome.
References


