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“Breathe Easy and Follow Your Heart: Evidence-Based Clinical Pathways for COPD and CHF”

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Chronic obstructive pulmonary disease (COPD) and chronic heart failure (CHF) are leading causes of disability and mortality worldwide. Exacerbations and resultant high rates of rehospitalization burden patients, caregivers, and the health care system. Dyspnea, hypoxemia, weakness, and decreased physical function are symptoms of cardiopulmonary conditions that further contribute to decline in mobility, safety, and quality of life. Physical therapy interventions include aerobic exercise, progressive resistance exercise, neuromuscular electric stimulation (NMES), mobility training, dyspnea management, energy conservation techniques, pulmonary rehab, and patient/caregiver education. Numerous studies conclude that NMES, as part of a comprehensive clinical pathway, yields improved functional status and quality of life, while decreasing rehospitalization. Selection of specific physical therapy strategies that avoid stress to the heart and respiratory system, such as NMES, appear to be of particular value for patients with advanced COPD/CHF. The speakers will examine the use of NMES as an effective intervention for patients with COPD/CHF, for whom strength training is often a challenge, and summarize recent research findings, description of proper dosing parameters for NMES efficacy, and highlight field results using NMES as part of a comprehensive clinical pathway.