

Emerging evidence for nurse-led interventions in patients with systemic lupus erythematosus and systemic sclerosis

Commentary on: Wojeck RK, Arcoleo K, Hathaway EC, Somers TJ. Nurse-led interventions in systemic autoimmune rheumatic diseases: a systematic review. *BMC Nurs.* 2023 Jul 4;22(1):232. doi: 10.1186/s12912-023-01393-8..

Commentary

Implications for practice and research

- Nurse-led interventions *may* improve patient outcomes in systemic lupus erythematosus and systemic sclerosis.
- More high-quality nurse-led intervention studies with both clinical and patient-reported outcomes are needed to confirm and generalise these findings.

Context

Over the last two decades, rheumatology nurse-led care has evolved to become a specialist service providing comprehensive and personalised care to patients with inflammatory arthritis and systemic autoimmune rheumatic diseases such as systemic lupus erythematosus (SLE), systemic sclerosis (SSc) and other rare autoimmune rheumatic diseases.¹⁻³ In inflammatory arthritis nurse-led care has been shown to improve clinical and patient-reported outcomes, and lower healthcare costs.^{2,4} However, little is known about the effectiveness of nurse-led interventions in patients with SLE and SSc, and this was the objective of the study by Wojeck *et al.*³

Methods

This was a systematic review of effectiveness of nurse led interventions with a pre-registered protocol (CRD42022363271). Information sources were PubMed, CINAHL, PsycINFO, and EMBASE databases. Screening for eligibility, quality assessment and data extraction were performed independently by two reviewers and resolving issues by a consensus.

Findings

Five randomized controlled trials conducted in China, Italy, Taiwan, Turkey, and the United States of America were included, with a total of 466 patients with SLE and SSc. All the studies had a predominantly female patients with only one reporting race and ethnicity. Most interventions comprised educational sessions with follow-up counselling by a nurse. The most common patient-reported outcomes were health-related quality of life, fatigue, mental health, and self-efficacy. All studies showed significant improvements in their primary outcomes, especially fatigue or sleep quality and mental health. Limitations of this review are (i) small sample sizes in the included studies, (ii) clinical heterogeneity in terms of types of interventions, contexts and outcomes, making it difficult to compare or pool data across studies, (iii) limited diversity of patients, reducing the ability of the findings to be applied to other populations and (iv) including only patient-reported outcomes, leaving out clinical outcomes.

Commentary

The European recommendations for the role of the nurse in rheumatology² focused on inflammatory arthritis, as the evidence for other autoimmune rheumatic diseases was lacking. The current review³ provides evidence for nurse-led interventions in SLE and SSc, but only for patient-reported outcomes. Educational and self-management support are recommended in the management of SLE and SSc and can be delivered by any trained healthcare professionals in rheumatology.⁵

All the interventions included in the review were delivered by nurses who had specialised training and education. This suggests that it is important to have the specialist knowledge and competences to perform these extended roles. However, these are complex interventions therefore qualitative studies are required to better understand the mechanisms underpinning them in order to inform education and implementation. Also, nursing education, specialist training and professional roles vary from country to country, therefore there is a need to contextualise these findings before implementing into practice or training.

In the United Kingdom, the Royal College of Nursing has developed a competency framework for rheumatology nurses, which identifies the key skills and knowledge that rheumatology nurses need to have in order to provide high-quality care to patients.⁶ Similar frameworks may need to be developed in different countries where nurse-led care is implemented, to help incorporate new evidence into practice.

This review is important for rheumatology, as nurse-led care is increasingly implemented to meet the global shortage of rheumatologists and an increased need for monitoring and supporting self-management. While this review is limited in scope and the findings are inconclusive, it suggests that nurse-led interventions in SLE and SSc have the potential to improve patient outcomes. More high quality nurse-led intervention studies with both clinical and patient-reported outcomes are needed to confirm and generalise these findings.

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Competing interests none