

Combining nurse-led care with patient self-assessment could enhance tight control of rheumatoid arthritis and management of comorbidities

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Commentary on:

Dougados M, Soubrier M, Perrodeau E, et al. Impact of a nurse-led programme on comorbidity management and impact of a patient self-assessment of disease activity on the management of rheumatoid arthritis: results of a prospective, multicentre, randomised, controlled trial (COMEDRA). *Ann Rheum Dis* 2015;74:1725-33. www.doi.org/10.1136/annrheumdis-2013-204733

Implications for practice and research

- Patient self-monitoring of disease activity can improve tight control of rheumatoid arthritis (RA).
- Nurse-led care can be used in the monitoring and management of comorbidities associated with RA.
- Further research should assess wider acceptability, as well as the clinical and cost-effectiveness of a patient self-monitoring approach.

Context

Tight control' of rheumatoid arthritis (RA) is defined as the frequent assessment of disease activity and subsequent adjustments in medication in order to keep inflammation at a low level or ultimately in remission. This 'treat-to-target' approach is the current gold standard in treating RA and is associated with better outcomes for people with the condition.

The evidence of nurse-led care (NLC) effectiveness in RA management has been established in the UK, the Netherlands, Sweden, Denmark and Norway.¹⁻⁵ The COMEDRA trial in France, was the first large RCT to concurrently evaluate the efficacy of NLC and patient self-monitoring of disease activity using the 28-joint Disease Activity Score (DAS28).

Methods

COMEDRA was an unblinded RCT comprising two active interventions carried out in a self-monitoring group and a nurse-led comorbidities group; each acting as control of the other. In the self-monitoring group, patients were taught to assess their own disease activity through a DAS28 score and report this to their rheumatologist; who used this information to adjust treatment in a treat-to-target approach. In the nurse-led comorbidities group, nurses systematically assessed presence/risk of the comorbidities associated with RA; and incorporated this into patient education and/or referral to a physician for action.

Outcomes were assessed monthly, for 6 months, the primary outcomes being the percentage of patients who had their therapy adjusted as per treat-to-target approach and the number of measures taken to address comorbidities. Analyses were by intention-to-treat and mixed logistic-regression models were used to assess between-group differences.

Findings

Overall, treatment escalation occurred more in the self-monitoring group (17.2% of patients), suggesting a tighter control of RA than in the nurse-led comorbidities group (10.9% of patients); OR (95%CI) 1.70 (1.17 to 2.19), $p < 0.001$. The Nurse-led comorbidities group had more measures taken per patient, to address comorbidities (mean=4.54, SD=2.08) than the self-monitoring group (mean=2.65, SD=1.57); incidence rate ratio (95%CI) 1.78 (1.61 to 1.96), $p < 0.001$.

The results provide two key messages: (1) self-monitoring can enhance tight control of RA disease activity and (2) NLC can have the desired effect in managing comorbidities associated with RA.

Commentary

This was an explanatory RCT, assessing the efficacy of patient self-assessment, which was not routine practice. While the results are welcome, their applicability to practice is limited. Also, due to the nature of this study, the clinicians and the patients (who were also outcome assessors) were not blinded; therefore the risk of performance and/or detection bias cannot be excluded.

There is strong evidence to support the effectiveness of NLC in managing disease activity.²⁻⁵ The COMEDRA trial provided new evidence supporting self-monitoring as a viable model in managing disease activity. Recently, a systematic review of European studies⁶ has shown that nurses are involved in assessing and managing comorbidities in different settings. It is plausible to expect that combining NLC with self-monitoring can enhance tight control of RA and the management of comorbidities; improving the overall long-term outcomes in people with RA.

Further research is needed to evaluate the clinical and cost-effectiveness of self-monitoring approach before recommending a change in practice. A wider acceptability of this intervention will also need to be tested in different settings/countries in order to ensure its implementation.

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