Background: Nurse-led care in early RA is not well defined in the literature and the current recommendations.

Objectives: This study aimed to develop an understanding of what comprises nurse-led care in early RA from the perspective of rheumatology nurse specialists.

Methods: This was a qualitative study using semi-structured telephone interviews with rheumatology nurse specialists in England (Summer 2020). Interviews were audio-recorded, transcribed verbatim and analysed using inductive thematic analysis.[1]

Results: Sixteen nurses were recruited and interviews lasted between 30 to 60 minutes. Seven themes were identified.

Early disease management

Care was characterised by evidence-based RA management provided by experienced nurse specialists with a high degree of autonomy, in the context of a rheumatology multidisciplinary team. The aims of care were to: start treatment, keep in treatment, educate and support.

'So treat to target...escalating treatment as necessary, and addressing any concerns that the patients might have' (CNS14)

Addressing psychosocial needs

Patients with early RA experience shock, fear, anger, grief and denial while feeling unwell with pain and fatigue. Nurses use a holistic, person-centred and empathetic approach to address psychosocial needs, building a working relationship, listening and creating trust.

'Because it all relates, and if they're stressed because they're not coping at work, then their arthritis isn't going to be so good. So everything relates to one another really' (CNS06)

Monitoring treatment, disease impact and patient outcomes

Nurses monitor disease activity and disease impact using validated outcome measures and by asking questions during the consultation. Good outcomes are disease control, managing disease impact, medication and side effects, wellbeing and keeping in work.

'When you get them stable, when you get them into remission, when they're happy, when they're feeling well, I think there's lots of ways you can measure that'... (CNS13)

Coordinating care, referring and signposting

Nurses coordinate care, refer to other health professionals and signpost patients to relevant services and charities. Lack of access to psychology expertise was highlighted.

'And whilst most of us have got some degree of understanding of...self management, or psychology...we're not psychologists' (CNS02)

Providing a 'lifeline'

Nurse-led telephone advice services provide a 'lifeline' for patients. If patients struggle, they can call and speak with a specialist who knows them and their RA well.

'The advice line has been a lifeline to them, to be able to speak to someone, to be able to get a response quickly to their questions, they feel very well supported, they know that they can always call us' (CNS16)

Service evaluation and auditing

The individual clinics are reviewed regularly. Patients are asked for feedback on their experience of appointments, if their needs were met and about changes to the service.

...It's really important to ask them initially what they expect to have from the consultation...We've always had really good feedback in general'... (CNS02)

COVID-19 challenges and opportunities

The pandemic caused major disruptions to the services, prohibiting most face-to-face consultations which was an essential aspect of clinical assessments. Despite the challenges imposed by the pandemic, the services adapted fast, using telephone, video clinics and digital solutions, which streamlined procedures and improved documentation and communication.

'I do have to rely on them telling me what's going on, because I can't see it at the moment' (CNS14)

'With Covid we're doing it over the telephone, and we're getting them to watch the video [injection tutorial] before we have the appointment with them' (CNS04)

Conclusion: Nurse-led care in early arthritis is a specialist service, addressing complex needs of patients, using evidence based and person-centred approaches. Innovation and service improvement are seen as part of the role.

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POS0159-HPR IMPACT OF SLEEP DISTURBANCES ON ELDERLY PATIENTS WITH RHEUMATOID ARTHRITIS

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Background: Sleep disturbances have been reported in various rheumatic diseases especially in the elderly. It may be caused by pain and depressive mood. However, reports on the impact of sleep problems in rheumatoid arthritis (RA) activity and functional status were limited.

Objectives: To assess sleep quality in elderly patients with RA and its impact on disease activity and functional status.

Methods: This cross-sectional study included 70 RA patients aged ≥ 65 years fulfilling the ACR/EULAR criteria. Sociodemographic data were collected. RA activity was assessed with the Disease Activity Score (DAS₂₈) and functional status with the Health Assessment Questionnaire (HAQ). Sleep quality was assessed using Arabic translated versions of two indexes: the Insomnia Severity Index (ISI) and the Pittsburgh Sleep Quality Index (PSQI). An ISI score of [8-14], [15-21], and [22-28] determined respectively mild, moderate, and severe insomnia. A PSQI score > 5 determined poor sleep quality. ANOVA test was used to assess the relationship between DAS₂₈, erythrocyte sedimentation rate (ESR), HAQ, and sleep quality indexes.

Results: This study included 52 females and 18 males with a mean age of 68.3 ± 25 years [65-81]. Seventy percent of patients were married, 27% were widowed and 2% were divorced. Seventy-one percent of patients were illiterate, 18% had primary education and 11% had secondary education. Eighteen percent of patients were employed whereas 34.7% were retired. A history of depression was noted in 16.5% of patients. The mean duration of RA was 17.4 ± 5.2 years. Eighty-five percent of patients were on conventional synthetic DMARD whereas 15% were treated with biologic treatment. The mean patient's global assessment of disease activity was 5.2 ± 1.3 . The mean tender joint count and mean swollen joint count were 8 ± 1.5 and 5 ± 1 respectively. The mean DAS₂₈ ESR was 4.7 ± 0.9 . The mean HAQ was 2.4 ± 0.45 . Poor sleep quality was detected in 84% of cases according to the PSQI score. Mild insomnia was detected in 46% of cases, moderate insomnia in 34% of cases, and severe insomnia in 12% of cases. RA activity was higher in patients with poor sleep quality: the mean DAS₂₈ ESR was 5.2 in patients with severe insomnia, 4.82 in moderate insomnia, and 4.13 in mild insomnia; $p = 0.00$ respectively. The mean ESR was 31.5 mm in patients with severe insomnia, 22.1 mm in moderate insomnia, and 10.6 mm in mild insomnia; $p = 0.01$ respectively. Furthermore, the higher the PSQI was, the higher the DAS₂₈ ESR is ($p = 0.01$). However, no association was found between poor sleep quality and joint count, swollen joint count, CRP, and HAQ.

Conclusion: Disease activity was a major contributor to poor sleep quality in elderly patients with RA. Functional status however wasn't associated with insomnia. Physicians should include sleep in the clinical assessment of RA patients to improve their quality of life.

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POS0160-HPR THE CARE PROCESS OF HIP AND KNEE OSTEOARTHRITIS: GIVING AN ACCOUNT OF PATIENTS' EXPERIENCE

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Background: The care process is often a complex and intimate process experienced by patients. Osteoarthritis (OA) care is usually characterised by multimodal interventions that consider the broader array of symptoms and functional limitations and often require a high level of patients' compliance. Despite efforts to improve the quality of care of patients suffering from OA, and the publication of state-of-the-art clinical practice guidelines [1], the quality of the care process, as experienced by patients, seems to be suboptimal [2]. Hence, it is essential to investigate how patients experience this process to highlight potential elements that can enhance or spoil it to optimise the care quality.

Objectives: To explore the patients' experience of the received OA care process.

Methods: Qualitative study, 10 semi-structured interviews were performed. The interview guide was created by a pool of healthcare professionals (physiotherapists, psychologists, nurses) and expert patients. It investigated the emotional experience, beliefs, expectations, perceived barriers and facilitators towards conservative treatments perceived by patients suffering from OA. The interviews lasted approximately one hour, were transcribed verbatim and analysed independently by two authors, who labelled their core parts to find categories and subcategories. A theme-based analysis was performed following an ecological paradigm, naturalistic epistemology, philosophy of phenomenological research.

Results: Our analysis revealed 7 main categories with several subcategories (Fig. 1). 1) *Uncertainty* as some patients perceived treatment choice not to be

based on medical evidence “there is an almost religious way of thinking on how to deal with the pathology. It is not an exact science when you choose the physicians you choose the treatment.” 2) *Relationship with the self and the others* as some patients did not feel understood or even shameful and hopeless about their condition. 3) *Patients' and Health Professionals' beliefs about the pathology management* where common thoughts were the perceived (ab)use of passive therapies, the movement as something dangerous and that OA is “something that you try to resist to, but (surgery) is your destiny.” 4) *facilitators* and 5) *barriers of the adherence to therapeutic exercise* that revolve around the cost of the therapy, the time needed and the willingness to change life habits. 6) *Patients' attitudes towards pathology* in which the oldest patients perceive OA as “something I have to accept since I am getting old” and the youngest as “Something I have to fight.” 7) *Relationship with food* in which diet is seen as something that “you force yourself to follow” which is useful only to lose weight and not to preserve a high health status and where overeating is used “to eat your feelings”.

Conclusion: Patients suffering from hip and knee OA seem to experience an uncertain care process. The lack of clear explanations and the attitude towards conservative treatment, which is considered as “a pastime while waiting for surgery,” fosters the importance of providing patients with adequate information about the treatment, to shift their beliefs and improve their awareness. This will enhance a patient-centred and shared decision-making treatments.

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Figure 1. Categories and Subcategories stemmed from the analysis of the patients' interviews

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POS0161-HPR

BARRIERS AND FACILITATORS RELATED TO SELF-MANAGEMENT OF SHOULDER PAIN: A SYSTEMATIC REVIEW AND QUALITATIVE SYNTHESIS

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Background: Shoulder pain is a significant cause of pain and disability in the general population.¹ Current research suggests that shoulder pain can be resistant to treatment and is often recurrent.² Systematic review-level evidence shows modest short-term benefits for most current treatments.³ Effective self-management strategies that equip patients with the necessary tools to self-manage their condition are urgently required. However, engagement with self-management is poor, potentially compromising treatment outcomes and contributing to ongoing disability.⁴

Objectives: The objectives of this review were to:

- Systematically identify and appraise relevant qualitative evidence on barriers and facilitators relating to self-management from the perspectives of people with shoulder pain and healthcare professionals.
- Collate and synthesise this evidence, to gain an understanding of factors that influence self-management of shoulder pain.
- Develop evidence-based recommendations to inform the implementation and delivery of self-management programmes for shoulder pain.

Methods: A meta-aggregative approach to the synthesis of qualitative evidence was used. Twelve databases were searched, from inception to 13 July 2020, to identify studies exploring barriers and facilitators related to self-management of shoulder pain from the perspectives of people with shoulder pain and clinicians involved in the care of such patients. Two independent reviewers identified eligible articles, extracted the data and conducted critical appraisal. Two reviewers independently identified and developed categories, with validation by two further researchers. Categories were discussed among the wider research team and a comprehensive set of synthesized findings was derived.

Results: Sixteen studies were included in the review, exploring several shoulder conditions: shoulder instability; rotator cuff-related pain; dysfunction post rotator cuff surgery; and degenerative rotator cuff tears. From the perspective of patients, three synthesized findings were identified that influenced self-management: (1) support for self-management, including subthemes related to patient-centred support, knowledge, time, access to equipment, and patient digital literacy; (2) personal factors, including patient beliefs, patient expectations, patient motivation, pain, and therapeutic response; and (3) external factors, including influence of the clinician and therapeutic approach. From the perspective of clinicians, two synthesized findings were identified that influenced adherence to self-management: (1) support for self-management, including education, patient-centred support, patient empowerment, time, and clinician digital literacy; and (2) preferred management approach, including clinician beliefs, expectations, motivation, therapeutic approach, and therapeutic response.

Conclusion: Patients and clinicians identified several barriers and facilitators that influenced self-management of shoulder pain. Clinicians' awareness of these factors could positively influence patient management, enhance patients' ability to self-manage, and improve treatment outcomes.

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Metabolic bone disease / Osteoporosis

POS0162

PREDICTIVE FACTORS OF A NEW FRAGILITY FRACTURE AFTER WRIST FRAGILITY FRACTURE

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Background: Fragility fractures (FF) are fractures that result from mechanical forces that would not ordinarily result in fracture, known as low-level (or 'low energy') trauma.¹ Studies have shown that history of wrist fracture increases the risk for subsequent FF.²

Objectives: To assess predictive factors of FF occurring after a wrist fracture.

Methods: Retrospective monocentric study that included patients with a wrist FF observed at the emergency department (ED) in a tertiary center, between 1st January 2017 and 31st December 2018. Wrist fractures were identified through the 10th International Classification of Diseases and FF were identified after revision of the clinical record. Patients with relevant missing data were excluded. Seven hundred thirty-three wrist FF were identified. After calculating a representative sample (90% confidence interval), 188 patients were included. Their clinical records until 31th December 2020 (2 to 3 years after FF) were reviewed. SPSS was used for statistical analysis and significance level was defined as 2-sided p<0.05. In multivariate analysis we included variables with a significant association in univariate analysis and those with clinical relevance (reported in others studies).

Results: Wrist fractures represented 44.3% of the FF observed at the ED.