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Figure 1. Meta-analysis describing the odds ratios of Black people using NSAIDs and Narcotic Analgesics compared to white people

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POS1098

PREVALENT COMORBIDITIES ASSOCIATED WITH CLINICALLY DIAGNOSED OSTEOARTHRITIS: A CASE-CONTROL ANALYSIS INCLUDING 1,936,792 PEOPLE

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Background: Osteoarthritis (OA) is the most common form of arthritis and a major cause of pain and disability worldwide. Individuals with OA have increased cardiovascular morbidity and mortality, and other comorbidities are also more common amongst them than in the general population. In this study, we examined the prevalence and timing of the diagnosis of co-morbidities prior to the clinical diagnosis of OA.

Objectives: To determine the odds of comorbidities in newly diagnosed OA cases versus matched controls in the up to 10 years prior to diagnosis.

Methods: Case-control study of people registered in the Information System for Research in Primary Care (SIDIAP). SIDIAP includes primary care records covering over 80% of the population of Catalonia, Spain.

Participants with an incident diagnosis of OA, based on ICD-10-CM disease codes, were matched to up to 4 controls by age (within 2 years), gender and primary care practice. The first diagnosis date of OA used the index date, with matched controls using the same index date, to retrospectively review for comorbidities. Patients were required to have at least 3 years continuous registration

prior to the index date. A total of 57 comorbidities were considered, based on prior knowledge and clinical consensus.

Descriptive statistics were used to obtain the demographic information about cases and controls. Counts of any comorbidity were calculated, and univariable and multivariable logistic regression were used to calculate odds ratios (ORs) and 95% confidence intervals (CIs) of individual comorbidities adjusted for age, gender and socio-economic status.

Results: In total, there were 455,494 OA cases and 1,481,298 matched controls. The cases and controls were similar with regards to age, gender and deprivation level.

The incident diagnosis of any comorbidity at any time prior to index date was 77% (n= 350,913) in cases versus 61% (n= 909,497) in controls.

The results from the multivariable analysis [Table 1] showed that OA patients had higher prevalence of many comorbidities up to 1 year prior to their diagnosis of OA compared to up to 10 years prior to diagnosis. They were most likely to be diagnosed with another musculoskeletal condition followed by neuro-psychiatric and metabolic and cardiovascular conditions. Conversely, patients with OA were less likely to be diagnosed with cancer up to 10 years prior to index date than matched controls.

Conclusion: Patients with OA have multiple chronic conditions. Our results found that the diagnosis of these other co-morbidities (particularly musculoskeletal and neuro-psychiatric conditions) were more likely to occur in the 1-year prior to their diagnosis of OA, compared to in the 10-year prior, except for lymphoma and solid malignancy. These results help us to further understand the relationship and timing of the development of multiple co-morbidities in patients with OA.

Table 1. Multivariable analysis at 1 year and 10 year prior to index date

Co-morbidity	Multivariable analysis 1-year prior (OR, 95% CI)	Multivariable analysis 10-year prior (OR, 95% CI)
Musculoskeletal conditions		
Ankylosing Spondylitis	3.12 (2.41, 4.05)	1.27 (1.12, 1.43)
Fibromyalgia	4.24 (3.96, 4.54)	1.85 (1.80, 1.91)
Rheumatoid Arthritis	2.67 (2.40, 2.97)	1.27 (1.20, 1.34)
Back/ neck pain	2.41 (2.38, 2.45)	1.76 (1.75, 1.78)
Neuro-psychiatric		
Anxiety	1.69 (1.65, 1.73)	1.23 (1.22, 1.24)
Depression	1.87 (1.81, 1.93)	1.25 (1.24, 1.27)
Irritable Bowel Syndrome	1.90 (1.71, 2.11)	1.28 (1.22, 1.34)
Migraine	1.81 (1.69, 1.94)	1.23 (1.20, 1.27)
Cancer		
Leukaemia	1.07 (0.88, 1.30)	0.91 (0.82, 1.00)
Lymphoma	0.84 (0.68, 1.03)	0.90 (0.82, 0.99)
Solid malignancy	0.95 (0.91, 0.99)	0.95 (0.93, 0.97)
Other medical conditions		
Stroke	1.15 (1.10, 1.20)	0.95 (0.93, 0.97)
Hypertension	1.70 (1.68, 1.74)	1.26 (1.25, 1.28)
Diabetes	1.34 (1.30, 1.38)	1.07 (1.06, 1.09)
Obesity	1.96 (1.92, 2.01)	1.60 (1.58, 1.62)

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POS1099

EFFICACY OF INTRA-ARTICULAR CORTICOSTEROID INJECTIONS IN KNEE OSTEOARTHRITIS: A SYSTEMATIC REVIEW AND META-ANALYSIS OF RANDOMIZED CONTROLLED TRIALS

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Background: Knee osteoarthritis (OA) is a frequent degenerative disease representing an important health and economic burden. Symptomatic medical treatments available include intra-articular (IA) injections of corticosteroids (GC) but