

The Need to Define Musculoskeletal Inflammation: A Report from the GRAPPA 2010 Annual Meeting

AMIT GARG, DAFNA D. GLADMAN, and PHILIP J. MEASE

ABSTRACT. Psoriatic arthritis (PsA) is a form of spondyloarthritis, a group of conditions that share a spectrum of components including arthritis, enthesitis, dactylitis, and spine inflammation. In PsA, however, the unpredictable, heterogeneous, and often insidious involvement of joints or juxtaarticular tendons and ligaments can sometimes make clinical recognition of the disease a challenge. Underrecognition of PsA may be due to the absence of a single sensitive and specific diagnostic measure. Although the Classification of Psoriatic Arthritis (CASPAR) criteria introduced in 2006 have improved disease classification, they are designed to be applied to cases already diagnosed with inflammatory arthritis. Therefore, in order for these criteria to be applied, the clinician is required to recognize the presence of inflammatory arthritis, enthesitis, or spondylitis. At the 2010 annual meeting of GRAPPA (Group for Research and Assessment of Psoriasis and Psoriatic Arthritis), the need to define inflammatory arthritis, enthesitis, dactylitis, and spondylitis, especially for nonrheumatologists, was discussed. Conclusions from breakout group discussions are summarized. (J Rheumatol 2012;39:413-4; doi:10.3899/jrheum.111236)

Key Indexing Terms:

ENTHESITIS DACTYLITIS EROSIIVE ARTHROPATHY CASPAR CRITERIA

Psoriatic arthritis (PsA) is classified as a form of spondyloarthritis, which, in addition to inflammatory arthritis, can manifest as enthesitis, dactylitis, and spondylitis. Once described as a disease with mild prognosis^{1,2}, PsA is now understood to have potential for joint damage with disability outcomes similar to rheumatoid arthritis (RA)^{3,4,5,6}. Up to 57% of patients with PsA have erosive arthritis^{3,7}, and functional disability occurs in 11% to 19% of patients^{3,7,8,9}. PsA patients also have increased mortality relative to the general population¹⁰.

Nonetheless, a significant proportion of patients with psoriasis have joint involvement without a diagnosis of PsA¹¹. The unpredictable, heterogeneous, and often insidious involvement of joints or juxtaarticular tendons and ligaments makes clinical recognition of PsA and distinction from other types of arthritis a challenge. In addition, underrecognition of PsA is likely related to the absence of a single sensitive and specific diagnostic measure. With the absence of such a measure, the gold standard for diagnosis and monitoring of PsA remains the performance of reliable clinical assessment.

From the Department of Dermatology, Boston University School of Medicine, Boston, Massachusetts, USA; University of Toronto, Toronto Western Research Institute, Toronto, Ontario, Canada; and Swedish Medical Center and University of Washington, Seattle, Washington, USA.

A. Garg, MD, Department of Dermatology, Boston University School of Medicine; D.D. Gladman, MD, FRCPC, Professor of Medicine, University of Toronto, Senior Scientist, Toronto Western Research Institute; P.J. Mease, MD, Swedish Medical Center and University of Washington.

Address correspondence to Dr. A. Garg, Department of Dermatology, Boston Medical Center, Boston University School of Medicine, 609 Albany Street, J207, Boston, MA 02118. E-mail: agarg@bu.edu

Members of the Group for Research and Assessment of Psoriasis and Psoriatic Arthritis (GRAPPA) contributed to the development of a validated and highly sensitive and specific classification tool for PsA known as the Classification of Psoriatic Arthritis (CASPAR)¹². Although developed as classification criteria, they do have the potential to be applied as a diagnostic measure in the clinical setting by clinicians screening for PsA. However, the presence of musculoskeletal inflammation is essential for application of the CASPAR criteria, just as the presence of inflammatory arthritis (synovitis) is required for the application of the combined American College of Rheumatology and European League Against Rheumatism revision of the classification criteria for RA¹³. Therefore, a potential limitation in applying CASPAR lies in the ascertainment of its core criterion: recognizing the presence of inflammatory musculoskeletal disease. While inflammation is often characterized by such features as erythema, warmth, and swelling, prominent morning and rest stiffness, pain involving joints, spine and/or enthesium, and supportive laboratory or imaging abnormalities, the specific application of these features to the core CASPAR criterion has not been clearly defined and is left to the judgment of the clinician. Although accurate identification of inflammatory features may be intuitive to clinicians such as rheumatologists, it may not be as intuitive for other types of clinicians, including dermatologists, who are in a key position to identify PsA arising in a patient with psoriasis. For example, the features that distinguish osteoarthritis involving distal and proximal interphalangeal joints from PsA, or degenerative Achilles tendonitis from PsA Achilles enthesitis, may not be instinctual to the untrained clinician.

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At the 2010 GRAPPA annual meeting, members discussed approaches to developing a definition of inflammatory musculoskeletal disease that could be applied to CASPAR criteria. In breakout group discussions, most agreed that primary symptoms would include pain, swelling, and the presence of prolonged morning stiffness. Members agreed with using the Ankylosing Spondylitis Assessment International Group (ASAS) definition for defining inflammatory back pain. However, because patients with PsA have less pain than patients with ankylosing spondylitis, the ASAS definition may underestimate the presence of inflammatory spinal disease among patients with psoriasis. Consensus was reached among members that defining enthesitis would be the most challenging component of the definition.

GRAPPA felt it would be helpful for clinicians to undergo an exercise providing practical definitions of inflammatory arthritis, enthesitis, dactylitis, and spondylitis in order to improve their application of the core CASPAR criterion. Examples of inflammation features include location and number of swollen or tender joints, warmth, swelling, erythema, duration of involvement, duration of morning stiffness, pain, constitutional symptoms, and acute-phase reactant and imaging results. By establishing consensus, face, and construct validity for the definition of inflammatory arthritis, enthesitis, dactylitis, and spondylitis, we can help clinicians recognize inflammatory musculoskeletal disease, then classification criteria such as CASPAR can be applied. Further, these definitions may also be helpful for clinicians applying current and future measures of PsA disease severity.

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