
Wolf-Henning Boehncke, Brian Kirby, and Diamant Thaci

ABSTRACT. The Group for Research and Assessment of Psoriasis and Psoriatic Arthritis (GRAPPA) organized its second Fellows Symposium adjacent to the European Academy of Dermatology and Venereology (EADV) congress in Istanbul in October 2013. Wolf-Henning Boehncke from Geneva, Brian Kirby from Dublin, and Diamant Thaci from Lübeck formed the faculty. The 9 best-ranked abstracts submitted to this symposium were presented and discussed in detail. Five abstracts focused on comorbidities in patients with psoriasis or psoriatic arthritis; summaries of all abstracts are included herein. (J Rheumatol 2014;41:1197–9; doi:10.3899/jrheum.140169)

Key Indexing Terms:
PSORIASIS PSORIATIC ARTHRITIS DEPRESSION
FATIGUE DYSLIPIDEMIA GENETICS

Following its successful initiation on the occasion of the spring meeting of the European Academy of Dermatology and Venereology (EADV)1, members of the Group for Research and Assessment of Psoriasis and Psoriatic Arthritis (GRAPPA) invited application for a similar meeting at the EADV 2013 Congress in Istanbul, Turkey. Of 27 abstracts that were received and ranked by an international jury, 9 abstracts with the best scores were selected for presentation. The abstracts are summarized below (Table 1).

Psoriasis/Psoriatic Arthritis and Associated Diseases
Dyslipidemia is a classic cardiovascular risk factor and an important comorbidity in psoriasis (PsO), but data are sparse for psoriatic arthritis (PsA). Shrestha, et al (Department of Rheumatology, Albert Einstein College of Medicine, New York, NY, USA) performed a cross-sectional analysis of 725 patients with PsA from the Consortium of Rheumatology Researchers of North America (CORRONA) Registry. Moderate to high disease activity was associated with higher odds of total cholesterol (> 200 mg/dl) and triglycerides (> 150 mg/dl), with no significant association with other lipid measures. The OR were 1.6 (1.1, 2.2, 95% CI, p = 0.01) and 1.6 (1.2, 2.3, 95% CI, p < 0.01). In a longitudinal analysis of 54 patients with paired measurements, higher PsA activity was associated with higher triglyceride levels (β = 3.85, p = 0.02) and lower high-density lipoprotein levels (β = -0.62, p < 0.01). The authors concluded that PsA disease activity correlates with total cholesterol and triglyceride levels. Because the pattern of dyslipidemia in PsA is similar to the pattern observed in obesity, they suggest a possible link between obesity, PsA, and cardiovascular disease.

Morgan and Walsh (Division of Rheumatology, University of Utah School of Medicine, Salt Lake City, UT, USA) explored the relationship between fatigue, work disability, and PsA activity. Of 107 participants, up to 60% were classified as having fatigue, based on different questionnaires. After adjustments for PsA activity, skin discomfort, and depression mood, work productivity loss (determined by the Work Limitations Questionnaire) was associated with fatigue. According to the authors, work disability was therefore associated with fatigue, and the association cannot entirely be explained by musculoskeletal, cutaneous, or psychiatric manifestations of PsA, thus requiring additional research.

A prospective cohort study on PsA and malignancy was presented by Aslanov, et al (Memorial University of Newfoundland, St. John’s, NL, Canada). Of 84 PsA patients with early and 112 with established disease who were recruited from a rheumatology clinic specializing in PsA, 5 patients with early and 14 patients with established PsA had a malignancy. The most frequently observed cancers were cervical, bowel, and lung, occurring in 9, 4, and 4 patients, respectively. Multivariate logistic regression adjusting for the age at PsO diagnosis showed that the incidence of malignancy was significantly different between these 2 cohorts [OR, established vs early, was 3.3 (95% CI...
Other variables, such as age, 28-joint Disease Activity Score (DAS28), or Psoriasis Area and Severity Index (PASI), were not significantly associated with an increased rate of malignancy.

The effect of obesity on treatment response in patients with PsA was investigated by Eder, et al (Centre for Prognosis Studies in the Rheumatic Diseases, University of Toronto, Toronto, ON, Canada). A total of 557 patients identified from a prospective cohort study database were stratified into normal (body mass index (BMI) < 25), overweight (BMI 25–30), and obese (BMI > 30), and the likelihood to achieve sustained minimal disease activity (MDA) was calculated. Overall, 66% achieved this goal, with patients in the higher BMI categories exhibiting a lower probability compared to normal weight patients after adjusting for potential confounding variables (BMI > 30: OR 0.52, p < 0.0001).

Burns, et al (Arthritis Research Centre of Canada, University of British Columbia, Richmond, BC, Canada) reported on a population-based cohort study on the effect of depression on myocardial infarction in psoriatic disease: a population-based cohort study. The analyses used linked administrative data from April 1991 to March 2006 for the entire adult population of British Columbia (4.1 million). Among 10,041 cases, 268 MI occurred. The incidence of depression in patients with PsO/PsA was 3.4 per 1000 patient-years. Individuals with psoriatic disease were more likely to have incident depression (adjusted OR 1.42) than controls. Incident depression increased the risk of incident MI by 75% in patients with psoriatic disease (95% CI 1.3–2.5). According to the authors, depression might therefore be an independent risk factor for MI in these patients.

**Other Topics**

To compare the PsA Impact of Disease (PsAID) with other outcome measures, Kilic and Kalyoncu (Division of Rheumatology, Hacettepe University Hospital, Ankara, Turkey) studied 61 patients with PsA. They found good correlations between the PsAID and numerous well-established instruments to assess outcome, including the Bath Ankylosing Spondylitis Disease Activity Index ($r = 0.64$), BAS Functional Index ($r = 0.70$), Health Assessment Questionnaire ($r = 0.70$), Dermatology Life Quality Index ($r = 0.62$), patient global visual analog scale ($r = 0.51$), and DAS28 C-reactive protein ($r = 0.49$).

Scaglioni, et al (Section of Rheumatology, Hospital Italiano de Buenos Aires, Argentina) studied remission criteria and activity indices in PsA and their relationship with skin involvement. They found that a comparison of psoriasis drug failure rates in biologics vs conventional systemic therapies and genetic variants of IL-6 and IL-12B might decrease risk of psoriasis.

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**Table 1. First authors, institutions, and titles of the 9 abstracts presented at the GRAPPA Fellows Symposium 2013.**

<table>
<thead>
<tr>
<th>First Author</th>
<th>Institution</th>
<th>Abstract Title</th>
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<tbody>
<tr>
<td>A. Shrestha</td>
<td>Department of Rheumatology, Albert Einstein College of Medicine, New York, NY, USA</td>
<td>Higher disease activity in psoriatic arthritis (PsA) is associated with elevated total cholesterol and triglycerides</td>
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<tr>
<td>M. Morgan</td>
<td>Division of Rheumatology, University of Utah School of Medicine, Salt Lake City, Utah, USA</td>
<td>Fatigue and work disability in PsA</td>
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<tr>
<td>R. Aslanov</td>
<td>Nexux Clinical Research, Memorial University of Newfoundland, St. John’s, NL, Canada</td>
<td>PsA and malignancy: a prospective cohort study</td>
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<tr>
<td>L. Eder</td>
<td>Centre for Prognosis Studies in the Rheumatic Diseases, University of Toronto, Toronto, ON, Canada</td>
<td>Obesity is associated with a lower probability of achieving sustained minimal disease activity state among patients with PsA</td>
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<tr>
<td>L. Burns</td>
<td>Arthritis Research Centre of Canada, University of British Columbia, Richmond, BC, Canada</td>
<td>The independent impact of depression on incident myocardial infarction in psoriatic disease: a population-based cohort study</td>
</tr>
<tr>
<td>L. Kilic</td>
<td>Division of Rheumatology, Hacettepe University Hospital, Ankara, Turkey</td>
<td>Patient-derived PsA Impact of Disease correlates with other outcome measures</td>
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<tr>
<td>V. Scaglioni</td>
<td>Division of Rheumatology, Hospital Italiano de Buenos Aires, Argentina</td>
<td>Remission criteria and activity indices in PsA and their relationship with skin involvement</td>
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<tr>
<td>S. Au</td>
<td>Tufts Medical Center, Boston, MA, USA</td>
<td>A comparison of psoriasis drug failure rates in biologics vs conventional systemic therapies and genetic variants of IL-6 and IL-12B</td>
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<tr>
<td>A. N. Boca</td>
<td>Department of Dermatology, Iuliu Hatieganu University of Medicine and Pharmacy, Cluj-Napoca, Romania</td>
<td>Genetic variants of IL-6 and IL-12B — decreased risk of psoriasis</td>
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IL: interleukin.
evaluated the performance of different remission criteria and activity indices in PsA and their relationship with skin involvement, determined by the PASI. Of 55 consecutive patients included in their study, the authors observed substantial differences with regard to the percentage of patients in remission, as classified by different criteria. In particular, DAS28 and MDA seemed to be less stringent in PsA than the Psoriatic Arthritis Screening and Evaluation, the Composite Psoriatic Disease Activity Index, or the Disease Activity Index for Psoriatic Arthritis. The PASI showed a poor correlation with joint disease activity, and very few patients were in remission with regard to both skin and joint assessments.

In a retrospective analysis on 162 patients with 370 courses of treatment, Au, et al (Tufts Medical Center, Boston, Massachusetts, USA) compared drug failure rates in PsO patients treated with biologics or conventional systemic therapies. They found that 49% of all biologics courses were terminated because of loss of efficacy after an average of 239 days, versus 57% of all conventional systemic courses after an average of 182 days. The authors conclude that biologics showed an improved drug survival in clinical practice as compared to conventional systemic therapies. The most common reason for failure was loss of efficacy, and time until failure was influenced by number of previous failures.

Interleukins 6 (IL-6), 12, and 23 play central roles in psoriatic inflammation. In a case-control study, Boca, et al (Department of Dermatology, Iuliu Hatieganu University, Cluj-Napoca, Romania, and University of Rome, Italy) assessed genetic variants of these interleukins. After genotyping 67 PsO patients and 69 healthy controls, they found a decreased risk of PsO for the minor allele homozygote carriers of IL-6 rs1800795 versus homozygous carriers of the major allele (OR = 0.072, p = 0.018). Regarding IL-12B single-nucleotide polymorphism rs6887695, cytosine cytosine carriers had a decreased risk compared to guanine guanine carriers (OR = 0.198, p = 0.025). The authors conclude that, if their findings are confirmed in larger studies, they might be helpful in counseling and prognosis to patients with family history of PsO.

This symposium featured high-quality presentations that covered numerous important topics in current PsO research. The participants appreciated that sufficient time was dedicated to discuss their projects in depth with a senior faculty. Thus, GRAPPA members are encouraged to continue this or other series of symposia adjacent to future major dermatology meetings.

REFERENCES