Objectives: This study aims to address whether specific miRNAs in CD14 + monocytes and osteoclasts derived from them cause active osteoclastogenesis in PsA.
Methods: The monocyte activation related candidate miRNAs (miR-146a-5p, miR-146b-5p and miR-155-5p) were measured from circulatory CD14 + monocytes of PsA patients and normal controls (NCs). Osteoclasts were induced from CD14 + monocytes by TNF-α and RANKL. Osteoclast differentiation and bone resorption were measured by TRAP immunostaining and dentin slice resorption, respectively.
Results: The results showed that miR-146a-5p was selectively upregulated in CD14 + monocytes from PsA patients. Activation and bone resorption were enhanced in osteoclasts from PsA patients. More importantly, after successful treatment with biologics, the increased miR-146a-5p expression in CD14 + monocytes from PsA patients was abrogated. Collectively, our findings suggest that miR-146a-5p could be an early diagnostic potential biomarker for PsA.
Disclosure of Interest: None Declared.
Keywords: CD14 monocytes, Mir-146a, Osteoclasts in psoriatic arthritis

P058

Time until onset of action when treating psoriatic arthritis: systematic review and meta-analysis

A. Nast,* P.A. Pham, R.N. Werner, C. Dressler
Department of Dermatology, Charite Universitaetsmedizin Berlin, Berlin, Germany

Background: The rapidity of improvement under drug therapy is an important factor for patients. However, to date this factor has been rarely assessed in systematic reviews and guidelines on psoriatic arthritis. Psoriatic arthritis (PsA) is associated with progressive joint destruction and reduced quality of life. The time until a drug treatment starts to show an effect (TOA) is important for the prevention of joint destruction.
Objectives: Our aim was to assess the time until onset of action of different drugs when treating patients with psoriatic arthritis.
Methods: We conducted a systematic review following the recommendations by Cochrane. A protocol was published (PROSPERO CRD42017058782). We searched in four academic databases, one trial register and checked references lists. Outcomes of interest were: time until 25 % of patients (TOA) reached i) ≥ 20 % , ii) ≥ 50 % improvement in modified American College of Rheumatology response criteria (ACR), iii) ≥ 75 % reduction in Psoriasis Area and Severity Index (PASI). 95% confidence intervals were calculated extracting data from graphs using a novel method. Data was pooled using Stata SE. We appraised all included RCTs using the Risk of Bias 2.0 tool.
Results: The literature was searched until April 2018. We included 31 articles reporting 26 trials. For TOA-ACR20, two head-to-head trials show no difference between ixekizumab and adalimumab or adalimumab and tofacitinib. Infliximab combined with MTX was faster than MTX monotherapy. Pooled results from 32 study arms suggest an onset of action of (weeks [95%>CI]): *< 2 weeks*: infliximab (1.18 [0.72–1.65]), ixekizumab (1.04 [0.80–1.28]), tofacitinib (10 mg 1.56 [1.14–1.98]); *<=4 weeks*: adalimumab (1.95 [1.35–2.55]), secukinumab (75 mg: 1.89 [0.16–3.62], 150 mg: 2.13 [1.34–2.91], 300 mg: 2.26 [1.75–2.76]), tofacitinib (5 mg 2.20 [1.41–2.99]), *4 + weeks*: apremilast, ustekinumab. For time until onset of action ACR50, all pooled point estimates are > 4 weeks and for PASI75, varied between 2.24[1.65–2.84] for ixekizumab and 6.03[3.76–8.29] for adalimumab. For PASI75, ixekizumab had a faster onset than adalimumab. Fifteen RCTs were given an overall low risk of bias judgement. Most others raised some concerns. The results suggest a faster onset of infliximab, ixekizumab and tofacitinib compared to apremilast, methotrexate and ustekinumab for ACR20, but this was not the case for ACR50. For the time until onset of action based on PASI75, ixekizumab is faster than adalimumab. We used a novel method to extract data from graphs assuming a linear relationship between time points, however this data is not measured in trials and thus cannot be verified.
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Keywords: Psoriatic arthritis

P059

A strategy of multidisciplinary diagnosis of psoriatic arthritis

C. Rincón-Pérez,[1,*] R. Montes-Cruz,[2] L. Rodríguez-Jiménez,[3] O. Muñoz-Monroy,[4] B. Mota-Mondragón,[2] G. Aguilar,[5] M.L. Morales-Trujillo,[1] R. Rodríguez-Romo[1]
[1]Dermatology, Unidad de especialidades médicas, SEDENA; [2]Rheumatology, Hospital central militar (SEDENA); [3]Hospital central militar, SEDENA, Mexico City; [4]Rheumatology, Hospital central militar, SEDENA; [5]Radiology, Unidad de especialidades médicas (SEDENA), Mexico City, Mexico

Background: The psoriasis (PsO) is a skin disease associated with multiple coexisting comorbidities. The most prevalent is the Psoriatic arthritis (PsA) that develops in up to 30% of patients with PsO. The PsA is an inflammatory disease of the joints who affects importantly both the quality of life and functionality. In México there is not much data about the prevalence rate and clinical characteristics of Pso and PsA, it is largely due to a lack of a strategy that involve both the Dermatologist and Rheumatologist.
Objectives: So, the aim of this work was to develop and implement a diagnostic strategy searching PsA, performed by a multidisciplinary team: Dermatologist, Rheumatologist and Radiologist in a third level clinic of PsO.
Methods: Proof of concept study, performed in the third level clinic of PsO, SEDENA. There were included patients with the diagnosis of Pso who could go to the clinic during March to August 2018. The patients were evaluated once by the Dermatologist (D), who applied the CASPAR and PEST tests and also requesting paraclinical test: RF, anti-CCP, CRP and ESR such as specific x-rays of hands and feet such as Ultrasonography (US). After the visit with the D, the Rheumatologist (R) saw the patients with their tests and performed the clinical evaluation in order to diagnose Psoriatic arthritis.
Results: There were included 63 patients, average age: 51.3 ± 12.9 years old, male gender: 68.3%, the psoriasis lesions were mainly found in the hair: 25.4%, 66.7% had nail disease (pits); the average time with PsO was 19 years. 15 patients (23.8%) were diagnosed with PsA. 11/15 had a score of 3 or more in PEST, any patient had 3 or less score in CASPAR test, CRP: 6 (-0.5–18.9 mg/L), ESR: 14 (0–46 mm/h), all patients had arthritis in clinical examination, 2/15 had dactylitis, only 1 extraarticular manifestations, 9/15 (60%) had radiographic findings compatible with PsA, 4 (26.6%) had chronic findings of PsA by US. It is important to highlight that majority of patients were asymptomatic or without clinical findings that are key in the diagnosis of PsA. Searching statistical differences in the clinical, radiographical and biochemical variables between patients with PsO and PsA, only CRP was significant, may be this is due to the number of patients.
In patients with PsO it was not very clear if it was useful that Dermatologist did the screening and subsequently refer patients to Rheumatologist in order to diagnose PsA. The strategy proposed in this study proved to be a key tool using simple and clinical tools that can guide to the Dermatologist, achieving an early diagnosis of PsA in a population with PsO. The next step in this project will be to add the rest of patients of the clinic and to determine the best combination of clinical, biochemical and imaging tools that could diagnose with a high sensitivity to patients with PsA in a PsO population in a multidisciplinary strategy.
Disclosure of Interest: C. Rincón-Pérez is speaker bureau of: Sanofi, Abbvie, is consultant for: Sanofi, Abbvie, R. Montes-Cruz: None Declared, L. Rodríguez-Jiménez: None Declared, O. Muñoz-Monroy: None Declared, B. Mota-Mondragón: None Declared, G. Aguilar: None Declared, M. L. Morales-Trujillo: None Declared, R. Rodríguez-Romo is employee of: Novartis.

Keywords: Diagnosis, Management, Psoriatic arthritis

P060

Efficacy and safety of phototherapy in the era of targeted biological therapies

J.M. Ortiz Salvador,* M. Saneleuterio Temporal, J. Magdaleno Tapial, A. Pérez Ferriols
Dermatology, Hospital General, Valencia, Spain

Background: Phototherapy is a physical treatment based on ultraviolet light. Some of its advantages are its versatility, efficiency and an excellent safety profile.
Objectives: The objective of this work is to know the efficacy and safety of phototherapy, as well as the profile of patient candidate for phototherapy.
Methods: A unicentric prospective observational study was carried out. Patients treated with phototherapy between September 2016 and July 2017 at the Dermatology Service of the General University Hospital of Valencia were selected. Throughout the treatment, efficacy data and adverse effects were collected.
Results: 133 patients were studied, who received a total of 3625 treatment sessions. The modality used was UVB-BE in 77.2%, topical palmoplantar PUVA in 11.7% and oral PUVA in 11%. We treated 13 different diseases, psoriasis being the most frequently treated (plaque, palmoplantar and drops), vitiligo and atopic dermatitis. The response to treatment was complete in 22% of patients, almost complete in 25%, partial in 22%, no response in 28% and worsening in 3%. 30% of the patients did not complete the treatment correctly, being unassistance the most frequent cause the failure. The rate of adverse effects was 13.4% in patients treated with UVB-BE, 41.2% in patients treated with topical palmoplantar PUVA and 31.3% in patients treated with oral PUVA. In patients with plaque psoriasis, PASI-75 was achieved in 67% and PASI-90 in 50%.
Disclosure of Interest: None Declared.
Keywords: None.

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P061

Discontinuation rates for biologic therapies in moderate-to-severe chronic plaque psoriasis in a real-world Canadian patient cohort

S. Gulliver,[1] W. Gulliver,[12,*], S. Randell[1,2]
[1]*NewLab Clinical Research Inc.;* [2]*Medicine, Memorial University of Newfoundland, St. John's, Canada*

Background: Psoriasis is a chronic autoimmune disease which may manifest as extensive scaly plaques on the skin. Modern systemic therapies, such as biologic agents and PDE4 inhibitors, have been successful in controlling moderate-to-severe plaque psoriasis. Despite evidence for their efficacy, many patients discontinue treatment. This retrospective observational study of a cohort of psoriasis patients treated with modern systemic therapies investigated discontinuation of these therapies, including how discontinuation is influenced by patient demographics.
Objectives: To understand real-world data regarding biologic agent and PDE4 inhibitor discontinuation rates, the reasons for discontinuation of biologic agents and anti-PDE4s, and to study duration of biologic agent survival in a Canadian psoriasis patient cohort.
Methods: A review of patient medical charts was conducted in a private clinic of a single dermatologist to collect patient demographics, reasons for discontinuation of therapy with a biologic agent or PDE4 inhibitor, and the duration of treatment. Such data is available for these patients from 1998 to 2017. The reasons for discontinuation included Adverse Events (AE), Patient Choice, Primary Inefficacy (PI), Secondary Inefficacy (SI), Drug withdrawn from Market, and Coverage Issue. Treatments included in this study were efalizumab, alefacept, etanercept, adalimumab, infliximab, ustekinumab, secukinumab, golimumab, inflectra, and apremilast (PDE4 inhibitor).
Results: The cohort consisted of 459 individuals (189 female, 270 male) with 913 incidences of treatment. The mean age was 53.48 (SD = 12.6) and the mean duration of treatment was 37.21 months (SD = 39.35) with a mean of 2.63 biologic agents. The biologic agents with the highest utilization were adalimumab (225 incidences) and ustekinumab (224 incidences). In this cohort, 40% of patients remained on their first treatment, while 60% of patients discontinued treatment within the observation time. The main reasons for discontinuation were PI (28.5%), AE (26.4%), or SI (24.3%). Furthermore, 180 (39.2%) patients remained on their first biologic agent, 120 (67%) of which were male.
This study showed that discontinuation of biologic therapies may occur at higher rates in a real-world setting compared to clinical trials. In addition, treatment discontinuation in this patient cohort was mainly due to treatment failure (AE, PI, or SI) rather than patient choice, withdrawal of the drug from the market, or insurance coverage issues. The results from this study also indicated sex may be a factor in discontinuation of treatment with modern systemic therapies, since there was a trend in this cohort that men were more likely to remain on the first therapy. This real-world data can provide pivotal insight into discontinuation patterns of modern systemic therapies that was not available through clinical trial data.
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Keywords: Biologics, Psoriasis

P062

Evaluation of carcinogenic risk of PUVA versus RE-PUVA in psoriatic patients

H. Mashaly,[1,*] M. Fathy Hussein,[2] S. Hamdy,[1] O. Shaker[3]
[1]*Dermatology, Faculty of Medicine, Cairo University;* [2]*Dermatology, Faculty of Medicine, Cairo University;* [3]*Medical Biochemistry, Faculty Of Medicine, Cairo University, Cairo, Egypt*

Background: Photochemotherapy (PUVA) is one of the classic treatment modalities for psoriasis. Adding retinoids in the form of Re-PUVA is hypothesized to reduce the possible carcinogenic potential of PUVA. 8-Oxoguanine (8-oxoG) is among the most mutagenic oxidative DNA modifications that induce replication errors.
Objectives: To evaluate the possible carcinogenic protective effect of adding retinoids to PUVA in psoriatic patients.
Methods: A prospective, randomized, controlled study was conducted that included 20 patients with psoriasis who were randomly divided into two groups: group A received PUVA therapy and group B received Re-PUVA therapy. Each of the 20 patients received 30 sessions of PUVA photochemotherapy. Patients of group B received additional oral retinoids 2 weeks before the start of PUVA sessions, which continued until the end of the PUVA sessions. Serum samples were taken from each of the 20 patients before and after the last PUVA session and were used to measure the 8-oxoG level.