

The age at onset of symptoms influence the clinical expression of the disease in patients with ankylosing spondylitis

N Zamora, F.A. Sommerfleck, E.E. Schneeberger, L.A Cayetti, G. Citera. Sección Reumatología, Instituto de Rehabilitación Psicofísica. Buenos Aires. Argentina

The onset of symptoms before 10 years and after 40 years is uncommon in patients with ankylosing spondylitis (AS). Some authors have found specific characteristics in patients with late-onset AS. **Objective:** To evaluate demographic and clinical characteristics in patients with conventional and late onset AS. **Methods:** Consecutive patients with AS (ASAS 2009 criteria) were included. Age at onset of symptoms, demographic and clinical characteristics were recollected. Presence of comorbidities, as well as specific questionnaires to determine disease activity (BASDAI), functional capacity (BASFI), quality of life (ASQoL) and metrology (BASMI) were assessed. Cervical, lumbar and pelvic X-rays were performed yearly and read by a single, blinded observer, according to BASRI. Descriptive statistics was used, the study population was dichotomized into two age groups in terms of symptom's onset: ≤ 40 years and > 40 years. Categorical variables were compared by Chi2 or Fisher exact test and continued variables by T test and ANOVA. Logistic regression analysis using the two age groups as dependent variable was performed to determine associations and to adjust for covariates. **Results:** One hundred and forty seven patients were included, 111 (75.5%) were male, with a median age of 46 years (IQR 32-56), median age of onset of symptoms 25 years (IQR 16-23) and median disease duration of 16 years (IQR 8-25). 18 (12.2%) patients had associated psoriasis, 18 were juvenile onset AS, 8 had inflammatory bowel disease associated (IBD), 5 were undifferentiated and the rest 98 (66.7%) had pure AS. 127 (86.4%) of patients had started the disease ≤ 40 years and 20 (13.6%) > 40 years. The group of patients with late onset AS were most often women [11 (45%) vs 27 (21%)], and patients with early onset had longer disease duration 19.4 vs 11.4 yrs $p=0.01$. After adjusting for these variables, patients in group > 40 showed a higher frequency of psoriasis (45% vs 11.3%), higher disease activity (BASDAI: 5.9 vs 4.4), worse functional capacity (BASFI:5.6 vs 4.1), and quality of life (ASQoL:11.4 vs. 7.2), but less radiological damage (BASRI:6.75 vs 9.27), p values <0.05 for all comparisons. **Conclusions:** Patients with late onset AS are more frequently women with psoriasis and have worse indices of disease activity, functional capacity and quality of life. The presence of less radiological damage in this group deserves further investigation.