LETTERS TO THE EDITOR

suggestive of a SAPHO syndrome. The latter was defined as an attempt to include a number of skin lesions associated with joint disease distinct from the varied cutaneous manifestations of psoriatic arthritis. We suggest that the nosographic limits of SAPHO syndrome could be extended by including Sneddon–Wilkinson syndrome among its cutaneous manifestations.

R. Scarpa, E. Lubrano, R. Cozzi, P. R. J. Ames, C. Bondi Oriente, P. Oriente
Rheumatology Unit, Medical School, Federico II University, Naples, Dermatology Unit, Azienda Ospedaliera A. Cardarelli, Naples, Italy and Lupus Research Unit, The Rayne Institute, St Thomas’ Hospital, London
Accepted 28 February 1996
Correspondence to: R. Scarpa, Rheumatology Unit, 2nd Medical School, Universita Federico II Napoli, Via S. Pansini 5, 80131 Napoli, Italy.


Supra-acetabular Insufficiency Fractures: Role of Fluoride Treatment and Vitamin D Deficiency?

SIR—Supra-acetabular insufficiency (SAI) fractures have been reported only sporadically [1–7] since their initial description by Cooper et al. [1] in 1985. However, this particular localization of insufficiency fractures is possibly still underdiagnosed. We report an eight case series of SAI fractures which illustrate the diagnostic difficulties and the factors predisposing to this localization.

All patients (seven women and one man, aged 49–91 yr) were hospitalized in our unit between 1985 and 1995 (Table I). They all complained of groin or hip pain without radiological evidence of hip fracture. At the time of hospitalization, Tc99 bone scan showed in all cases, except patient no. 3 (who had an associated homolateral femoral head fracture), a supra-acetabular arciform-shaped focus of increased uptake (Fig. 1). Bone scan also detected associated insufficiency fractures in five patients (Table I). CT scan failed to show the SAI fracture in 4/6 patients. For these latter patients, the fracture was always confirmed by MRI which demonstrated a band of low signal intensity parallel to the roof of the acetabulum on T1-weighted images (Fig. 2). Medullary oedema, surrounding the fracture line, was indicated on T1-weighted images by an area of intermediate signal, enhanced after i.v. injection of gadolinium and by a high signal on T2-weighted images.

The diagnosis of SAI fracture must be envisaged in osteoporotic patients complaining of pain in the hip, without radiological evidence of hip fracture. Bone scan enables early diagnosis to be made by revealing a
characteristic focus of increased uptake that is highly characteristic of the diagnosis [2–4], and detects other associated fractures. This diagnosis can be confirmed by MRI whereas CT scan, which is known to demonstrate pubis or sacrum fractures particularly well [2, 3, 5], seems less helpful. For one patient (case no. 7), the SAI fracture line extended to the iliac wing at the time of MRI, in accordance with the idea that SAI fractures are only a subgroup of iliac wing fractures [1, 4].

Most of our patients were post-menopausal women with severe osteoporosis. Other factors predisposing to insufficiency fractures were also present: general osseous fragility linked to age and any type of osteoporosis sometimes associated with biomechanical disorders (contralateral arthroplasty). Attention was drawn to the low concentration of 25 OH vitamin D in three patients (cases 6, 7 and 8). This has been shown to be a predictive factor of hip fracture in elderly women [8]. Otherwise, fluoride therapy may generally favour lower limb fractures rather than pelvic fractures in osteoporotic patients [9]. However, previous fluoride treatment was a possible predisposing factor to SAI fractures in two of our patients (cases 1 and 3), as suggested by some other observations [9, 10]. This might represent a distinctive feature from the more common varieties of insufficiency pelvic fractures.

If the basic aetiological condition of SAI fractures is osteoporosis, vitamin D deficiency, which can be corrected, is worth investigating. The role of fluoride treatment may be questioned and requires further investigation.

### TABLE I

Characteristics of patients with supra-acetabular insufficiency fractures

<table>
<thead>
<tr>
<th>Case</th>
<th>Sex</th>
<th>Age (yr)</th>
<th>Predisposing factors*</th>
<th>Duration of signs</th>
<th>Associated fractures</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>F</td>
<td>63</td>
<td>fluoride treatment</td>
<td>5 months</td>
<td>sacral, parasymphysisal, vertebral compression</td>
</tr>
<tr>
<td>2</td>
<td>F</td>
<td>80</td>
<td></td>
<td>6 weeks</td>
<td>pubic rami, femoral neck</td>
</tr>
<tr>
<td>3</td>
<td>F</td>
<td>75</td>
<td>fluoride treatment</td>
<td>15 days</td>
<td>femoral head, femoral condyle</td>
</tr>
<tr>
<td>4</td>
<td>F</td>
<td>82</td>
<td>contralateral THA†</td>
<td>8 days</td>
<td>vertebral compression</td>
</tr>
<tr>
<td>5</td>
<td>F</td>
<td>91</td>
<td></td>
<td>2 days</td>
<td>none</td>
</tr>
<tr>
<td>6</td>
<td>F</td>
<td>87</td>
<td>vitamin D deficiency</td>
<td>3 weeks</td>
<td>none</td>
</tr>
<tr>
<td>7</td>
<td>F</td>
<td>49</td>
<td>vitamin D deficiency</td>
<td>2 months</td>
<td>none</td>
</tr>
<tr>
<td>8</td>
<td>M</td>
<td>90</td>
<td>vitamin D deficiency</td>
<td>6 weeks</td>
<td>sacral</td>
</tr>
</tbody>
</table>

*All patients had severe osteoporosis.
†THA, total hip arthroplasty.
Infertility May Sometimes be Associated with Non-steroidal Anti-inflammatory Drug Consumption

Sir—Akil et al. [1] recently reported on NSAID-induced luteinized unruptured follicle syndrome. The inhibition of prostanooid synthesis by the cyclooxygenase pathway could be an explanation for this phenomenon, since prostanooids participate in the ovulation process. Prostanoids are involved in the phenomenon, since prostanoids participate in the


Cauda Equina Tumour Presenting as Atypical Sciatica

Sir—Low back pain with or without sciatica is one of the most common rheumatic complaints in a general medical practice. The very high incidence of spondylo-


