pole, and contribute to crescent formation. Recent studies support the second possibility [1–6]. It was reported that chemokines produced by proximal tubular cells promoted the infiltration [3,4]. Proximal tubular epithelial cells activate urinary complement proteins in situ and contribute to the mediation of tubulointerstitial injury [6]. The tubular epithelial cell is the major site of M-CSF production within the injured kidney; macrophage accumulation and local proliferation can occur in the tubulointerstitium in the absence of glomerular inflammation [2]. Proximal tubular cells also promote fibrogenesis by transforming growth factor-β1-mediated induction of peritubular myofibroblasts [1]. Most important is that recent studies performed on cultured cells and experimental nephropathies suggest the possibility of epithelial–mesenchymal transition of tubular epithelial cells, i.e. transdifferentiation. One study, done on a human renal biopsy, also suggested such a transdifferentiation [7]. Finally, it is possible that proximal tubular cells transdifferentiate and migrate towards the glomerular urinary pole and contribute to crescent formation?

Conflict of interest statement. None declared.

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Croatia is not spared from diabetic nephropathy

Sir,

In the article by Rutkowski [1], Croatia was pointed out as having a peculiarly low proportion of patients with diabetes
amongst the dialysed patients, and low age of patients on dialysis, in spite of well-developed dialysis treatment. The data on RRT in Croatia were at that time based on the compilation of group reports from dialysis centres. The Croatian Registry for RRT, based on individual patient data, was completed in the year 2001. All dialysis (40) and transplant (two) centres contributed individual data for all treated patients.

According to the 2001 Report of the Croatian Registry for RRT, prevalence of RRT was 657 p.m.p., with an annual increase of 5.7%. Distribution among haemodialysis, CAPD and transplantation treatment modalities was 79, 6 and 15%, respectively. The median age of dialysis patients was 59 years, while 38% of them were ≥65 years old. There were 18% of diabetics among the prevalent dialysis patients.

The incidence of RRT in 2001, from the first day of treatment, was 112 p.m.p. Median age of new patients was 62 years, and 43% were ≥65 years old. Diabetic nephropathy was the leading cause of renal failure in incident patients, accounting for 29%. In the additional 3% of incident patients diabetes was present as a co-morbid condition.

Participation of patients with diabetes in the dialysis program in Croatia is significant (32% of incident patients and 18% of prevalent patients). Improved quality of the Croatian Registry, achieved by collecting individual patient data, enabled correction of erroneous conclusions derived from group reports. Prevalence of diabetes in dialysis patients had been underestimated by almost half (9.5 instead of 18%), and percentage of dialysis patients aged 65 years or more by a third (25 instead of 38%).

Croatia is affected by general epidemiological trends, exemplified by increasing patients’ age and a growing participation of diabetics in dialysis, in accordance with the attained rate of RRT. Endemic nephropathy (4% of prevalent patients) does not modify substantially the epidemiological situation in Croatia. A positive correlation between dialysis prevalence and the percentage of diabetics among dialysed patients is invariably present, in the registry data from various European regions [2], and in longitudinal epidemiological data from the USA [3] and Australia [4].

Conflict of interest statement. None declared.

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Adult polycystic kidney disease in patients on haemodialysis in the south of Brazil

Sir,

About 5–10% of chronic dialysis patients have adult dominant polycystic kidney disease (ADPKD). Few epidemiological data on this disease are available in Brazil. The purpose of our investigation was to study the prevalence of ADPKD in Porto Alegre, a city in the south of Brazil.

Case. We studied patients in 15 haemodialysis centers, searching in particular for patients who had a family history and imaging findings compatible with the diagnosis of ADPKD. The control group was composed of patients who were also on dialysis but did not have evidence of this hereditary disease.

Of the 975 adult patients that composed the study population, 74 had ADPKD as the primary cause of chronic renal failure, corresponding to 7.6% of the total dialysis patient population in Porto Alegre (Table 1).

Table 1. General sample characteristics

<table>
<thead>
<tr>
<th></th>
<th>ADPKD patients (n = 74)</th>
<th>Controls (n = 901)</th>
<th>P-value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>53.8 ± 11.0</td>
<td>53.2 ± 16.1</td>
<td>0.77</td>
</tr>
<tr>
<td>Sex</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male (%)</td>
<td>39 (53)</td>
<td>517 (57.8)</td>
<td>0.44</td>
</tr>
<tr>
<td>Female (%)</td>
<td>35 (47)</td>
<td>384 (42.2)</td>
<td>0.44</td>
</tr>
<tr>
<td>Ethnic background</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>White (%)</td>
<td>51 (85.7)</td>
<td>578 (74.3)</td>
<td>0.44</td>
</tr>
<tr>
<td>Black (%)</td>
<td>23 (14.3)</td>
<td>320 (25.4)</td>
<td>0.44</td>
</tr>
</tbody>
</table>

Comment. In Brazil, epidemiological data about ADPKD have only been collected for the state of São Paulo, showing a prevalence rate of 3% in dialysis patients [1]. This prevalence is well below that found in our study and also those in American and European studies. This may be a consequence of either incomplete assessment or a different ethnic composition of the population in São Paulo.

Similar findings to ours have been published in other countries. In the USA, 8–10% of dialysis patients have this diagnosis [2]. In European studies, the prevalence of this pathology is about 10% [3]. As the majority of the Porto Alegre population is of European descent, we can state our data are compatible with data from other white populations. A lower prevalence is found in Asia, where only 2.5–3.2% of dialysis patients have ADPKD [4].

ADPKD affects both sexes similarly [4]. In our sample, there were more men (53%) than women (47%). This difference, though not significant, may be partially explained by the higher number of men than women in chronic dialysis programmes.

Conflict of interest statement. None declared.

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