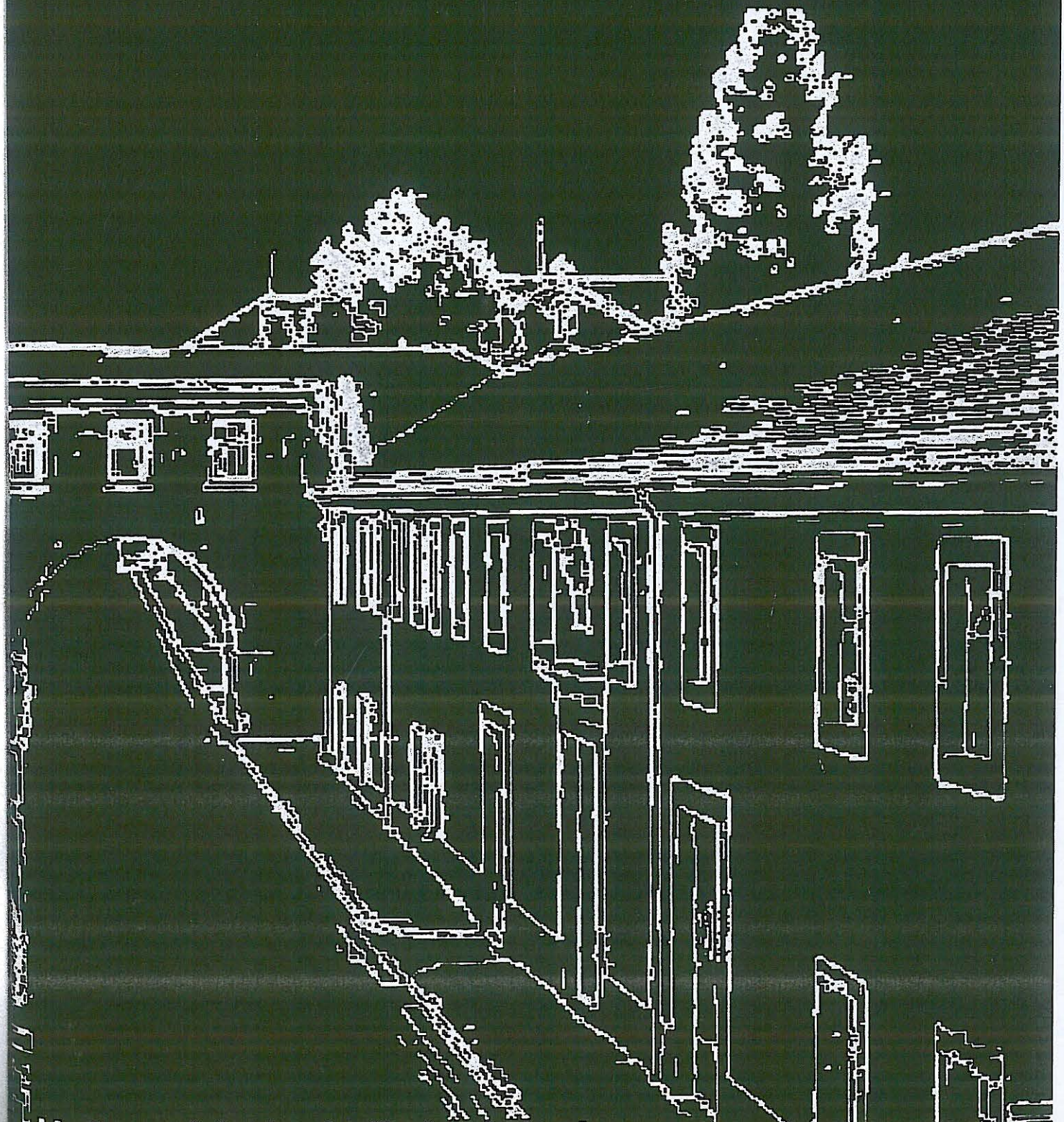
3º Encontro Nacional de QUÍMICA ORGÂNICA



Universidade da Beira Interior

Covilhã, 23-26 de Junho de 1999

Sociedade Portuguesa de Química

P18

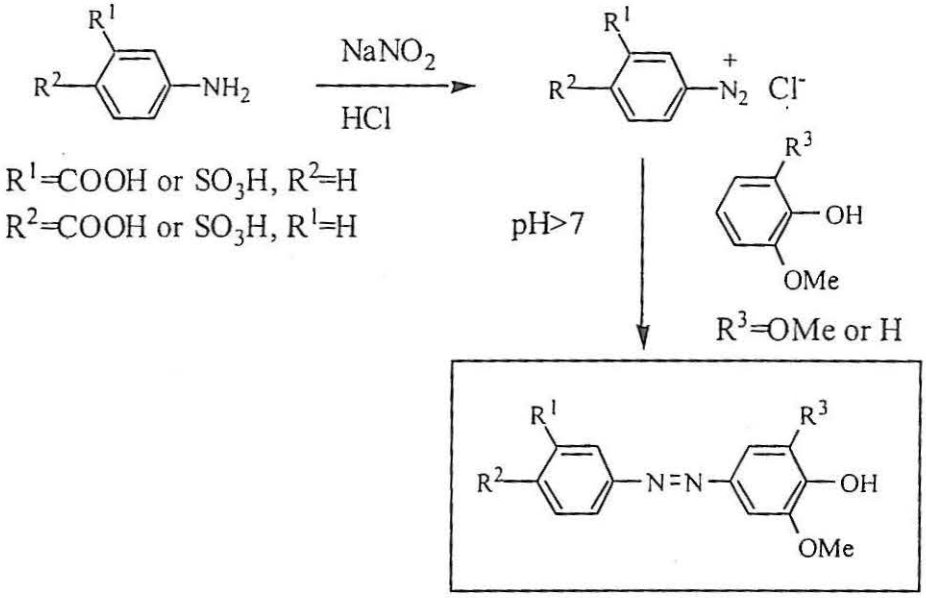
SYNTHESIS AND CHARACTERIZATION OF TEXTILE AZO DYES DERIVATIVES OF METHOXYPHENOLS

Isabel C.F. Ferreira and Maria João R.P. Queiroz

Dept. de Química, Univ. do Minho, Campus de Gualtar, 4700-320 Braga, Portugal
Email:mjrpq@ci.uminho.pt

Azo dyes are used extensively in the textile and dyestuff industries and effluents from these industrial processes are usually resistant to biological treatment.

Textile azo dyes with bioaccessible groups such as guaiacol (2-methoxyphenol) and 2,6--dimethoxyphenol, for lignin-degrading fungus were synthesized using aminobenzoic and aminosulfonic acids as diazocomponents.



The eight azo dyes obtained were fully characterized by ^{1}H-NMR using spin-spin decoupling technique, UV-Vis spectroscopy and low and high resolution mass spectrometry.

These dyes were submitted to biodegradation studies [1].

Thanks are due to IBQF-UM (Praxis XXI) and to Praxis 2/2.1/Qui/44/94 for financial support.

References:

[1]- I.C.Ferreira, I.M.Santos, Mª J.Queiroz and Nelson Lima, "Biodegradation of Textile Azo Dyes by *Phanerochaete chrysosporium*". I Ibero-American Meeting on Biotechnology, BIOTEC'98, Guimarães, July **1998.**