

VOL. 610 NO. 1 MARCH 18, 1992

Bibliography Section

JOURNAL OF

CHROMATOGRAPHY

INCLUDING ELECTROPHORESIS AND OTHER SEPARATION METHODS

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Biography
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JOURNAL OF CHROMATOGRAPHY

INCLUDING ELECTROPHORESIS AND OTHER SEPARATION METHODS

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Submission of Papers. Manuscripts (in English; four copies are required) should be submitted to: Editorial Office of *Journal of Chromatography*, P.O. Box 681, 1000 AR Amsterdam, Netherlands, Telefax (+31-20) 5862 304, or to: The Editor of *Journal of Chromatography, Biomedical Applications*, P.O. Box 681, 1000 AR Amsterdam, Netherlands. Review articles are invited or proposed by letter to the Editors. An outline of the proposed review should first be forwarded to the Editors for preliminary discussion prior to preparation. Submission of an article is understood to imply that the article is original and unpublished and is not being considered for publication elsewhere. For copyright regulations, see below.

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VOL. 610 (1992)

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The *Bibliography Section* 1992 will be published in two volumes (610 and 611) of two issues each. Combined indexes to both volumes will appear in the last issue of the year, Vol. 611, No. 2.

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Editorial

Last year we have pointed out that development is inherent to any evolving system and, consequently, also our Bibliography Section must undergo some changes. This year the changes are quite apparent and they emerge from the altered lay-out of the whole Journal: we have now also a two-column system in our Bibliography Section. We hope that our readers will like it.

As last year also in 1992 the Bibliography Section will be published in two volumes (610 and 611) with the Indexes attached to Vol. 611. This year we are not changing the classification scheme which is the same as for 1991; nevertheless for convenience (as promised last year) it is attached to the first issue of this year (No. 1, Vol. 610).

Regarding the subject of Bibliography itself, we have cut now cross-referencing in some highly populated entries, so that the cross-references refer now to the substantial papers only and routine applications are skipped. This holds for two items: GC-MS cross-referencing in the subsection on Gas Chromatography and cross-referencing to Affinity Chromatography in the subsection on LC.

Prague, January 1992
Brno, January 1992

Z. Deyl, V. Schwarz
J. Janák

CLASSIFICATION SCHEME FOR THE BIBLIOGRAPHY SECTION

Note, please, that there are considerable differences in subsections 1-4 in different techniques as these subsections deal with theory and technical aspects. Subsections 5 and beyond are identical for all different techniques.

LIQUID CHROMATOGRAPHY (LC)

1. Reviews and books
2. Fundamentals, theory and general
 - 2a. General
 - 2b. Thermodynamics and theoretical relationships
 - 2c. Relationship between structure and chromatographic behaviour
 - 2d. Measurement of physico-chemical and related values
3. General techniques
 - 3a. Apparatus and accessories
 - 3b. Detectors and detection reagents
 - 3c. Sorbents and columns, packing procedures
 - 3d. Quantitative analysis
 - 3e. Preparative scale chromatography
 - 3f. Programmed temperature, pressure, vapors, gradients
4. Special techniques
 - 4a. Automation
 - 4b. Computerization and modelling
 - 4c. Combination with other physico-chemical techniques (MS, IR etc.)
 - 4d. Affinity chromatography (advances)
 - 4e. Functional analysis
 - 4f. Trace analysis and preseparation techniques
 - 4g. Enantiomers, separation
 - 4h. Other special techniques

GAS`CHROMATOGRAPHY (GC)

1. Reviews and books
2. Fundamentals, theory and general
 - 2a. General
 - 2b. Thermodynamics and theoretical relationships
 - 2c. Relationship between structure and chromatographic behaviour
 - 2d. Measurement of physico-chemical and related values
3. General techniques
 - 3a. Apparatus and accessories
 - 3b. Detectors and detection reagents
 - 3c. Sorbents and columns, packing procedures
 - 3d. Quantitative analysis
 - 3e. Preparative scale chromatography
 - 3f. Programmed temperature, pressure, vapors, gradients
4. Special techniques
 - 4a. Automation
 - 4b. Computerization and modelling
 - 4c. Combination with other physico-chemical techniques (MS, IR etc.)
 - 4d. Affinity chromatography (advances)
 - 4e. Functional analysis
 - 4f. Trace analysis and preseparation techniques
 - 4g. Enantiomers, separation
 - 4h. Other special techniques
 - 4i. Supercritical fluid chromatography

PLANAR CHROMATOGRAPHY (PC)

1. Reviews and books
2. Fundamentals, theory and general
 - 2a. General
 - 2b. Thermodynamics and theoretical relationships
 - 2c. Relationship between structure and chromatographic behaviour
 - 2d. Measurement of physico-chemical and related values
3. General techniques
 - 3a. Apparatus and accessories
 - 3b. Detectors and detection reagents
 - 3c. Sorbents and columns, packing procedures
 - 3d. Quantitative analysis
 - 3e. Preparative scale chromatography
 - 3f. Programmed temperature, pressure, vapors, gradients
 - 3g. High performance procedures
4. Special techniques
 - 4a. Automation
 - 4b. Computerization and modelling
 - 4c. Combination with other physico-chemical techniques (MS, IR etc.)
 - 4d. Affinity chromatography (advances)
 - 4e. Functional analysis
 - 4f. Trace analysis and preseparation techniques
 - 4g. Enantiomers, separation
 - 4h. other special techniques

ELECTROPHORESIS SECTION (ELPHO)

1. Reviews and books
2. Fundamentals, theory and general
 - 2a. General
 - 2b. Thermodynamics and theoretical relationships
 - 2c. Relationship between structure and electrophoretic behaviour
 - 2d. Measurement of physico-chemical and related values
3. General techniques
 - 3a. Apparatus and accessories
 - 3b. Detectors and detection procedures
 - 3c. Stabilization media for electrophoresis
 - 3d. Quantitative analysis
 - 3e. Preparative scale electrophoresis
 - 3f. Programmed voltage and buffer gradients
4. Special techniques
 - 4a. Automation
 - 4b. Computerization and modelling
 - 4c. Combination with other physicochemical techniques, (MS, IR etc.)
 - 4d. Affinity electrophoresis
 - 4e. Capillary zone electrophoresis and electrokinetic chromatography
 - 4f. Isotachophoresis
 - 4g. Enantiomers, separation
 - 4h. Two dimensional electrophoresis
 - 4i. Other special techniques

SECTIONS COMMON TO ALL TECHNIQUES (LC, GC, PC and ELPHO)

For classification to sections 1-4 see individual techniques

5. Hydrocarbons and halogen derivatives
 - 5a. Aliphatic hydrocarbons
 - 5b. Cyclic hydrocarbons
 - 5c. Halogen derivatives
 - 5d. Complex hydrocarbon mixtures (incl. analysis of tars, bitumens and mineral oils)
6. Alcohols
7. Phenols
8. Substances containing heterocyclic oxygen
 - 8a. Flavonoids
 - 8b. Aflatoxins and other mycotoxins
 - 8c. Other compounds with heterocyclic oxygen (incl. tannins)
9. Oxo compounds, ethers, epoxides and quinones
10. Carbohydrates
 - 10a. Mono and oligosaccharides. Structural studies
 - 10b. Polysaccharides, mucopolysaccharides, lipopolysaccharides
 - 10c. Glycoproteins and their constituents
11. Organic acids and lipids
 - 11a. Organic acids and simple esters
 - 11b. Prostaglandins
 - 11c. Lipids and their constituents
 - 11d. Lipoproteins and their constituents
12. Organic peroxides
13. Steroids
 - 13a. General techniques
 - 13b. Pregnan and androstane derivatives
 - 13c. Estrogens
 - 13d. Sterols
 - 13e. Bile acids and alcohols
 - 13f. Ecdysones and other insect steroid hormones
 - 13g. Other steroids
14. Steroid glycosides and saponins
15. Terpenes and other volatile aromatic compounds
 - 15a. Terpenes
 - 15b. Essential oils
 - 15c. Bitter substances
16. Nitro and nitroso compounds
17. Amines, amides and related nitrogen compounds
 - 17a. Amines and polyamines
 - 17b. Catecholamines and their metabolites
 - 17c. Urea and guanidine derivatives
 - 17d. Other amine derivatives and amides (excl. peptides)
18. Amino acids and peptides; chemical structure of proteins
 - 18a. Amino acids and their derivatives
 - 18b. Peptides, peptidic and proteinous hormones, growth factors
 - 18c. Elucidation of structure of proteins and enzymes
19. Proteins
 - 19a. General techniques
 - 19b. Proteins of cells, viruses and subcellular particles
 - 19c. Proteins synthesized by genetic manipulation, monoclonal antibodies
 - 19d. Microbial and plant proteins
 - 19e. Proteins of blood, serum and blood cells
 - 19f. Structural and muscle proteins
 - 19g. Protamines, histones and other nuclear proteins
 - 19h. Chromoproteins and metalloproteins

- 19i. Proteins of glands, gland products, various zymogens (incl. milk proteins)
- 19j. Proteins of brain, cerebrospinal fluid and eye
- 19k. Proteins of neoplastic tissue and transformed cells
- 19l. Specific binding and receptor proteins
- 19m. Urinary proteins
- 19n. Other proteins (incl. proteinous inhibitors of enzymic activity)
- 20. Enzymes and enzyme activity estimation
 - 20a. Oxidoreductases
 - 20b. Transferases (excl. E.C. 2.7.---)
 - 20c. Transferases transferring phosphorus containing groups (E.C. 2.7.---)
 - 20d. Hydrolases, acting on ester bonds (E.C. 3.1.---)
 - 20e. Hydrolases, acting on glycosyl compounds (E.C. 3.2.---)
 - 20f. Other hydrolases
 - 20g. Lyases
 - 20h. Isomerases
 - 20i. Ligases
 - 20j. Complex mixtures and incompletely identified enzymes
- 21. Purines, pyrimidines, nucleic acids and their constituents
 - 21a. Purines, pyrimidines, nucleosides, nucleotides
 - 21b. Nucleic acids, RNA
 - 21c. Nucleic acids, DNA
 - 21d. Structural studies on RNA and RNA mapping
 - 21e. Structural studies on DNA and DNA mapping
 - 21f. Complex mixtures of nucleic acids and their fragments
- 22. Alkaloids
- 23. Other substances containing heterocyclic nitrogen
 - 23a. Porphyrins and other pyrroles
 - 23b. Bile pigments
 - 23c. Indole derivatives and plant hormones (gibberellins)
 - 23d. Pyridine derivatives
 - 23e. Other N-heterocyclic compounds
- 24. Organic sulphur compounds (incl. glucosinolates)
- 25. Organic phosphorus compounds (incl. sugar phosphates)
- 26. Organometallic and related compounds
 - 26a. Organometallic compounds
 - 26b. Boranes, silanes and related non-metallic compounds
 - 26c. Coordination compounds
- 27. Vitamins and various animal growth factors (non-peptidic)
- 28. Antibiotics
- 29. Insecticides, pesticides and other agrochemicals
 - 29a. General techniques
 - 29b. Chlorinated insecticides
 - 29c. Phosphorus insecticides
 - 29d. Carbamates
 - 29e. Herbicides
 - 29f. Fungicides
 - 29g. Other types of pesticides and various agrochemicals
- 30. Synthetic and natural dyes
 - 30a. Synthetic dyes
 - 30b. Chloroplast and other natural pigments
- 31. Plastics and their intermediates
- 32. Drug analysis
 - 32a. Drug analysis, general techniques
 - 32b. Antirheumatics and antiinflammatory drugs
 - 32c. Autonomic and cardiovascular drugs
 - 32d. Central nervous system drugs
 - 32e. Chemotherapeutics (exc. cytostatics and antibiotics)
 - 32f. Cytostatics

- 32g. other drug categories
- 32h. Toxicological and forensic applications
- 32i. Plant extracts
- 33. Clinico-chemical applications
 - 33a. General papers and reviews
 - 33b. Complex mixtures and profiling (single compounds by cross-reference only)
- 34. Food analysis
 - 34a. General papers and reviews
 - 34b. Complex mixtures (single compounds by cross-reference only)
 - 34c. Organoleptically important compounds (flavors, odors, volatiles)
- 35. Environmental analysis
 - 35a. General papers and reviews
 - 35b. Air pollution (complex mixtures; single compounds by cross-reference only)
 - 35c. Water pollution (complex mixtures; single compounds by cross-reference only)
 - 35d. Soil pollution (complex mixtures; single compounds by cross-reference only)
- 36. Some technical products and complex mixtures
 - 36a. Surfactants
 - 36b. Antioxidants and preservatives
 - 36c. Complex mixtures, technical products and unidentified compounds
- 37. Cells, cellular particles and supramolecular structures
- 38. Inorganic compounds
 - 38a. Cations
 - 38b. Anions
 - 38c. Permanent and rare gases
 - 38d. Volatile inorganic compounds
- 39. Radioactive and other isotope compounds

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Liquid Column Chromatography

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21. PURINES, PYRIMIDINES, NUCLEIC ACIDS AND THEIR CONSTITUENTS

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33. CLINICO-CHEMICAL APPLICATIONS

33b. Complex mixtures and profiling (single compounds by cross-reference only)

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34c. organoleptically important compounds (flavors, odors, volatiles)

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36c. *Complex mixtures, technical products and unidentified compounds*

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5. HYDROCARBONS AND HALOGEN DERIVATIVES

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21c. Nucleic acids, DNA

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37. CELLS, CELLULAR PARTICLES AND SUPRAMOLECULAR STRUCTURES
- See 401, 418, 434, 456, 788, 792, 883, 896, 901.
38. INORGANIC COMPOUNDS
- 38b. Anions
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4f. Isotachophoresis

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20. ENZYMES AND ENZYME ACTIVITY ESTIMATION

See 346.

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21. PURINES, PYRIMIDINES, NUCLEIC ACIDS AND THEIR CONSTITUENTS

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- See 36.
25. ORGANIC PHOSPHORUS COMPOUNDS (INCL. SUGAR PHOSPHATES)
- See 187, 188, 192, 194, 627.
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31. PLASTICS AND THEIR INTERMEDIATES
- See 32.
32. DRUG ANALYSIS
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32h. Toxicological and forensic applications

See 339, 482.

33. CLINICO-CHEMICAL APPLICATIONS

33a. General papers and reviews

See 54, 339, 394.

33b. Complex mixtures and profiling (single compounds by cross-reference only)

See 138, 154, 155, 156, 158, 159, 161, 162, 175, 210, 247, 322, 338, 340, 344, 348, 367, 477, 478, 479, 563, 587, 606.

34. FOOD ANALYSIS

34b. Complex mixtures (single compounds by cross-reference only)

See 170, 368.

35. ENVIRONMENTAL ANALYSIS

35c. Water pollution (complex mixtures; single compounds by cross-reference only)

See 760.

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edited by I.S. Krull, *The Barnett Institute, Northeastern University,
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