

# Acta Poloniae Pharmaceutica – Drug Research

Volume 70, Number 1

January/February 2013

## CONTENTS

### REVIEW

3. Ewelina Rutkowska, Karolina Pająk, Krzysztof Jóźwiak  
Lipophilicity – methods of determination and its role in medicinal chemistry.

### ANALYSIS

19. Krystyna Czerwińska, Elżbieta Wyszomirska, Aleksander P. Mazurek  
Identification and determination of selected histamine antagonists by densitometric method.
27. Mirosława Krauze-Baranowska, Loretta Pobłocka-Olech, Daniel Głów, Marian Wiwart, Jerzy Zieliński, Piotr Migas  
HPLC of flavanones and chalcones in different species of Salix.
35. Tomasz Baj, Agnieszka Ludwicka, Elwira Sieniawska, Krystyna Skalicka-Woźniak, Jarosław Widelski, Krzysztof Zięba, Kazimierz Głowiński  
GC-MS analysis of essential oils from *Salvia officinalis* L.: Comparison of extraction methods of the volatile components.
41. Elżbieta Huzar, Alicja Wodnicka  
Determination of ethanol content in medicated syrups by static headspace gas chromatography.
51. Wanda Białecka, Anna Kulik, Małgorzata Podolska, Barbara Kwiatkowska-Puchniarz, Aleksander Mazurek  
Purity determination of gynalgin bactericidal tablets with HPLC method.
59. Urszula Hubicka, Barbara Żuromska-Witek, Jan Krzek, Maria Walczak, Marek Żylewski  
Kinetic and thermodynamic studies of moxifloxacin hydrolysis in the presence and absence of metal ions in acidic solutions.

### DRUG BIOCHEMISTRY

71. Mirosław Krośniak, Renata Francik, Joanna Kowalska, Ryszard Gryboś, Magdalena Blusz, Wojciech M. Kwiatek  
Effects of vanadium complexes supplementation on V, Fe, Cu, Zn, Mn, Ca and K concentration in STZ diabetic rat's spleen.
79. Joanna Wawszczyk, Arkadiusz Orzech, Małgorzata Kapral, Ludmiła Węglarz  
Role of protein tyrosine kinase in the effect of IP6 on IL-8 secretion in intestinal epithelial cells.
87. Daniel Sypniewski, Ilona Bednarek, Sabina Gałka, Tomasz Loch, Daria Błaszczyk, Dagna Sołtysik  
Cytotoxicity of etoposide in cancer cell lines *in vitro* after *BCL-2* and *C-RAF* gene silencing with antisense nucleotides.

### DRUG SYNTHESIS

99. Nehal A. Hamdy, Waled M. El-Senousy  
Synthesis and antiviral evaluation of some novel pyrazoles and pyrazolo[3,4-d]pyridazines bearing 5,6,7,8-tetrahydronaphthalene.

### NATURAL DRUGS

111. Aleksandra Owczarek, Jan Gudej  
Investigation on biologically active constituents of *Geum rivale* L.
115. Abubakar B. Aliyu, Mohammed A. Ibrahim, Aliyu M. Musa, Aisha O. Musa, Joyce J. Kiplimo, Adebayo O. Oyewale  
Free radical scavenging and total antioxidant capacity of root extracts of *Anchomanes diffiformis* Engl. (Araceae).

### PHARMACEUTICAL TECHNOLOGY

123. S.K. Sahoo, Su. K. Sahoo, A. Behera, S.V. Patil, S. K. Panda  
Formulation, *in vitro* drug release study and anticancer activity of 5-fluorouracil loaded gellan gum microbeads.
129. Jitka Mužíková, Pavla Šináglová  
Comparison of properties of tablets and energy profile of compaction of two spray-dried lactoses.
137. Monika Muško, Małgorzata Sznitowska  
Stability of extemporaneous pediatric oral liquids compounded from tablets and drug substance: case of propranolol and theophylline.

## **PHARMACOLOGY**

145. Krzysztof Lukawski, Grażyna Świderska,  
Stanisław J. Czuczwar  
Effect of combined treatment with diuretics and gabapentin on  
convulsive threshold in mice.
151. Natalia Gurtowska, Tomasz Kłoskowski, Joanna Olkowska,  
Anna Bajek, Robert Dębski, Jowita Zielińska,  
Tomasz Drewna  
Carboplatin and sodium butyrate, separate – yes,  
but combined – never.

## **SHORT COMMUNICATION**

161. Andrzej Zięba, Robert D. Wojtyczka, Danuta Idzik,  
Małgorzata Kępa  
Synthesis and *in vitro* antimicrobial activity of  
1-methyl-3-sulfonylthio-4-aminoquinolinium chlorides.
167. Erratum