

## Oncology pharmacy in Croatia



Vesna Pavlica, M.Sc. Pharm.

**W**e live in a time when two significant changes are happening in our everyday lives and our working environments: developments in technology determine the way we work and research in genetics determines the targets of our examinations, as well as who we are.

Pharmacy is a multidisciplinary science to which recent findings in various fields of science, technology, economy, ecology, electronics, law and ethics, are quickly made available thanks to the rapid development of technology.



It has become very difficult to manage this huge amount of knowledge and data and the possibility of mistakes in work procedures of pharmacists, doctors and nurses has also increased. This is the reason for the sudden development of teamwork, of particular specialized areas of professional and scientific work and of standardization of all procedures in the process of medical treatment. All of this is fundamental to medical care, provided by pharmacists, doctors, and nurses, to meet the highest standards. The goal of such working procedures is to improve the safety of patients as well as the safety of the staff who are directly or indirectly involved in the process of medical treatment. By bringing together shared knowledge and experience with science, while at the same time taking into account the price of

the pharmaceuticals, we can give patients the best possible treatment.

Croatia has well-developed oncology treatment capabilities, in line with world standards, and the sub-speciality of oncological-haematological nurses is also well-developed; however, pharmaceutical oncology has been completely neglected. To take a responsible role in the treatment of oncology patients, pharmacists need to satisfy some basic conditions relating to the knowledge and preparation of antineoplastic therapy, especially in the handling of cytotoxic drugs, the suppor-

ting therapy, the avoidance of mistakes in administering drugs, and drug interactions. They also need to be computer literate. All of this directly influences their performance in providing medical care.

### Support from ESOP

Knowing it would be very difficult to develop this field of pharmacy in Croatia without a well-designed strategy, we have turned to professional associations of oncologists and oncological-haematological nurses for help and they have granted us absolute support.

One thing that needs to be especially emphasized is the help we have received from the European Society of Oncology Pharmacy – ESOP – and its president, Klaus Meier. Without his help, collaboration and

support, we would have been unable to make such progress in this area of pharmacy.

We also faced the fact that we first needed to present our work in Croatia at the level of professional associations of pharmacists, doctors and nurses. The result of this strategy was the first course

### Lecturers in the hospital-clinical section were :

1. K. Maier, *president of ESOP, Germany*: General and specific needs of oncology pharmacy for providing patients with best possible care
2. V. Pavlica, G. Knežević-Tometić *Pharmacy of the University Hospital for Tumours, Zagreb*: Pharmacy care for oncology patients
3. N. Kopjar, *Institute for Medical Research, Zagreb*: Handling cytotoxic drugs in medical institutions in Croatia – genotoxic effects and risks of professional exposure
4. B. Belev, D. Vrbanec, *Institute for Medical Oncology, University Hospital, Zagreb*: Basic principles of cancerogenesis
5. G. Knežević-Tometić, V. Pavlica, *Pharmacy of the University Hospital for Tumours, Zagreb*: Extravasation caused by cytotoxic drugs
6. A. Juretić, *Department of Radiotherapy, University Hospital, Zagreb*: Cancer cachexia – pathogenesis and treatment
7. M. Sonc, *Pharmacy of the Oncology Institute in Ljubljana*: Advice for patients after chemotherapy – answers to most frequent questions
8. V. Pavlica, *Pharmacy of the University Hospital for Tumours, Zagreb*: Immunohistochemical definition of MAGE-3 in papillary thyroid cancer
9. I. Samaržija, *Faculty of Pharmacy and Biochemistry, University of Zagreb*: Functioning mechanisms of nephrotoxic drugs

# Country Focus

## Croatia

for oncology pharmacists and oncological-haematological nurses with international participation, which was run in collaboration with ESOP, the Croatian Society of Radiotherapy and Oncology of the Croatian Medical Association and the Croatian Society of Medical Oncology of the Croatian Medical Association.

The topic "Handling cytotoxic drugs" was presented to all conference participants, as was promotional information about ESOP. Eminent experts and scientists in the field of oncology, pharmacy and nursing took part in the course.

At the meeting held in Hamburg in January 2005, ESOP delegates reached the decision to develop oncology pharmacy through workgroups of national pharmaceutical associations. On February 14, 2005, at the Executive Committee meeting of the Section for Hospital Pharmacy of the Croatian Pharmaceutical

Society, the decision was made to form a Workgroup for oncology pharmacy and Vesna Pavlica, M.Sc.Pharm was appointed as president.

### **Oncology – Main topic at the Third Croatian Congress of Pharmacy**

The Section for Hospital Pharmacy of the Croatian Pharmaceutical Society and the Faculty of Pharmacy and Biochemistry University of Zagreb recognized the importance of oncology and decided to make oncology pharmacy the main topic of hospital and clinical pharmacy at the Third Croatian Congress on Pharmacy with international participation that was held in Cavtat from April 27–30, 2005.

### **Workgroup: Cytotoxic drugs**

The Ministry of Health and Social Welfare also recognized the problem of handling cytotoxic drugs and, on the initiative of the Minister of Health, Dr. N. Ljubičić, the Ministry decided to form a workgroup that would

outline draft regulations for handling such drugs. The workgroup will analyze the questionnaire designed by ESOP that was filled in by every medical institution in Croatia. Results of the questionnaire are being processed and will be made public.

It was also decided to proceed with continuing education. On October 6, 2005, an annual meeting of the Society for Medical Oncology and the workgroup for oncology pharmacy was held in Osijek. The main topic of this meeting was drug interactions, and special attention was paid to interactions of antineoplastic drugs and the treatment of mucositis in oncology patients.

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