Book of Abstracts

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Researchers, physicians, patients - dont be Lost in Translation

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Over the last decades, scientific research on the pharmacokinetics and pharmacodynamics of antimicrobial agents has increased. Unfortunately, definitions and expressions used by various authors differ in their meaning and various authors use different expressions to indicate the same meaning, so the comparison of the results of various experiments becomes more difficult. Efforts and progress were done on proper use and expression of commonly used expressions in pharmacokinetic and pharmacodynamic research (1). Another recognized problem on drugs and diseases terminology is translation from one language to another and usage among patients and healthcare practitioners (2,3).

The aim of this work is to present HRANAFINA project as a part of STRUNA database of Croatian Special Field Terminology. It was officially inaugurated on the web in February 2012 as open-acces database with the aim to gradually make available to the public the standardized Croatian terminology for all professional domains. HRANAFINA project is working on the Croatian terminology in fields of human anatomy and physiology including terms used in pharmacology as well, and grouped in sections like drugs, cell, therapy, receptor, protein, membrane, channel, enzyme. All terms with their definitions will include their equivalents in English and will be developed following the recommendations of the The Institute of Croatian Language and Linguistics as National Coordinator for Development of Croatian Special Field Terminology. The project is funded by the Croatian Science Foundation and supports two basic areas of the National Strategy for Science Development – development of information technology and sociocultural transition.

The project will gradually improve the circulation of knowledge and information in the Croatian language as well as in the broader multilingual environment, facilitate the involvement of Croatian scientists, health care providers and medical students in international projects and become helpful official multi-language tool for international students coming to Croatian universities. In addition, offering medical terminology in the Croatian language, this open-acces database will facilitate physician-patient communication and provide user-friendly manual for informing people with no medical training. Read more on http://hranafina.sfzg.hr/

Keywords antimicrobials; pharmacology; nomenclature; linguistics; terminology

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Severe Lymphopenia: Clinical Significance in Critically Ill Patients

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Background: The epidemiological variables associated to the development of lymphopenia as well as its role as risk factor for mortality, were studied.

Methods: Observational, cohort, prospective and controlled study. The development of lymphopenia in patients admitted to ICU (Intensive Care Unit) with a stay >3 days was recorded. Lymphopenia was considered to exist if lymphocyte count <1.000/µl for 3 or more days; it was deemed severe, if <200/µl.

The following variables were analysed: comorbidity, cause and APACHE II (Acute Physiology and Chronic Health Evaluation II) score on admission to ICU, duration and intensity of the lymphopenia, and variables related to conditions developed later on such as infections, ARDS (Acute respiratory distress syndrome), MODS (Multiple organ dysfunction syndrome) and mortality. A back-to-back comparison between groups with and without lymphopenia was carried out for each of these variables by means of T and Chi^2 tests. Their association with different levels of lymphopenia was also investigated by Chi^2 test and multiple logistic regression.

Results: the study involved 53 patients: 29 (55%) in the "lymphopenic group" and 24 (45%) in the "control group". Lymphopenic group: + 69% lymphopenia developed in the first 24 hours; + 69% had count values between 1000-200/µl during 3-7 days, and 31% (9 patients) had count values <200/µl. There were no statistically significant differences between the variables studied in both groups. Severe lymphopenia (<200/µl) was associated with increased prevalence of MODS (78 vs 43%, p 0.059) and higher mortality (44 vs 15%, p 0.03). The best predictive equation of mortality included severe lymphopenia as independent risk factor for mortality (OR 4.85, 95% CI 0.82 to 26.9, p 0.02).

Conclusions: 1) Lymphopenia, <1000/µl x ≥ 3 days: a) presented a high incidence (55%); b) appeared early (70% in first 24 h); c) with predominant intensity 1000-200/µl; and d) duration 3 to 7 days. 2) Severe lymphopenia, <200/µl x ≥ 3 days: a) presented an incidence of 17%; b) was associated with increased prevalence of MODS and mortality, and was included as an independent risk factor for mortality -OR 4.85- in the best predictive equation of mortality.