



**IFCC-WorldLab**  
ISTANBUL 22-26 JUNE 2014



# **IFCC WORLDLAB ISTANBUL 2014**

**22<sup>nd</sup> International Congress of Clinical Chemistry  
and Laboratory Medicine (IFCC Worldlab 2014)**

**22<sup>nd</sup> Balkan Clinical Laboratory Federation  
Meeting (BCLF 2014)**

**26<sup>th</sup> National Congress of the Turkish Biochemical  
Society (TBS 2014)**

**22-26 June 2014**

**ISTANBUL, TURKEY**

**ISTANBUL CONGRESS CENTER**



*Final Program*

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*The Final Program has been released on June 6<sup>th</sup>, 2014*



# POSTERS

The Poster Area is located on Level B5 and it is properly signposted.

Poster are arranged by topics and must be on display from 23 to 25 June according to the following timetable:

<input type="checkbox"/> setup	from 10:00	June 23 <sup>rd</sup>
<input type="checkbox"/> display	10:00-17:30	June 23 <sup>rd</sup> , 24 <sup>th</sup> and 25 <sup>th</sup>
<input type="checkbox"/> withdrawal	17:30-18:00	June 25 <sup>th</sup>

The Organizing Secretariat takes no responsibility for posters left on display afterwards.

Each poster is numbered and the poster board number corresponding to its poster code is shown on the board.

In order to encourage discussions about posters, the presenting author must be at the assigned poster panel from 13:00 to 14:00.

## TOPICS DISPLAYED

Advanced technology	ISO 15189 and accreditation in laboratory medicine
Ageing	Kidney disease
Allergy	Laboratory errors and patient safety
Atherosclerosis and vascular markers	Laboratory medicine practice guidelines
Autoimmune disease	Laboratory safety
Bioinformatics	Laboratory statistics/Biostatistics
Biological variation	Lipids and lipoproteins
Blood gases	Liver and gastrointestinal diseases
Bone metabolism and osteoporosis	Mass spectrometry
Cancer and tumor markers	Metabolic disorders
Cardiovascular disease	Miscellaneous
Clinical microbiology	Molecular diagnostics
Critical care/Emergency Lab	Neurological/Neurodegenerative diseases
Data generation - Data mining and information technology	New biomarker discovery
Decision making	Obesity
Diabetes mellitus and metabolic syndrome	Oxidative stress
Distance education/e-learning	Paediatric laboratory medicine
Education and training in laboratory medicine	Patient and laboratory management
Endocrinology	Pharmacogenetics/pharmacogenomics/ Personalized medicine
Environment and Health	Point-of-care testing
Epigenetics	Prenatal and postnatal testing
Evidence based laboratory medicine	Quality assessment
Flow cytometry	Reference ranges and decision levels
Genetic testing	Standardisation, accreditation and harmonisation
Haematology	Toxicology and therapeutic drug monitoring
Haemostasis	Trace elements
Herbal medicine	Vitamins and nutrition
Infectious disease	
Inflammation	
Inherited disorders	

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**0593**

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*P. Purohit, P. Sharma*

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*C. Milzycynski, J. Schiettecatte, M. Oktem, A. Thies, M. Cohen-Bacrie, E. Anckaert, C. Müller, D. Topcu, A. Gröning, S. Engelmann*

**0601**

THE RELATIONSHIP BETWEEN LEPTIN AND PCOS

*E. Sharif*

**0602**

CORONARY RISK FACTORS-HOMA-IR, HS-CRP AND FIBRINOGEN IN PRE-MENOPAUSAL WOMEN WITH POLY CYSTIC OVARIAN SYNDROME (PCOS)

*P. Sharma, P. Purohit*

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Cod: 0605

## **EFFECTS OF HYPERTHERMIC STRESS IN DIFERENT DEVELOPMENTAL STAGES IN WHITE RAT ON THE TABLE**

V. Spasova<sup>1</sup>, M. Spasov<sup>2</sup>, V. Dejanova<sup>1</sup>

<sup>1</sup>*Clinical Hospital, Shtip, R.Macedonia*

<sup>2</sup>*Faculty of Medical Science, University Goce Delcev, Shtip, R.Macedonia*

**BACKGROUND:** High environmental temperature of 40°C, applied in different developmental stages in White laboratory

rat, is a stress on the body that load the adrenal glands. In terms of hyperthermic stress adrenal glands work faster, producing increased amounts of adrenaline, noradrenaline and cortisol. In terms of long-term stress, and load of the glands are entering a phase of temporary hypofunction.

**METHODS:** We were examined the effect of hyperthermic stress in the White laboratory rat strain Wistar, the temperature

of 40°C, applied for two hours daily. The animals were divided into five groups: control, which resides at room temperature, exposed during pregnancy, exposed during lactation in exposed after the period of lactation and exposed

continuously from pregnancy until the 50th day of life. After the sacrifice of young animals examined were the mass, total protein, content of DNA, and RNA content of the adrenal glands .

**RESULTS:** Hyperthermic stress applied during pregnancy is not or has little effect on the parameters examined, because

of the protective effect of the placenta. During lactation hyperthermic stress causes the adrenal gland hyperplasia, that is why it comes to increasing the value of all tested parameters. Hyperthermic stress applied after the period of lactation doesn't cause special effects on the examined parameters, because the body is recovering and the values are

almost back to those values in the control group of animals. Continued hyperthermic stress (animals exposed from pregnancy until the 50th day of life) causes a significant increased values of all examined parameters, because of the increased levels of ACTH and cortisol in serum.

**CONCLUSIONS:** During pregnancy hyperthermic stress has a small effect, but it is much higher during lactation. This is

due to hyperplasia and adrenal hyperfunction. Due to continuous hyperthermic stress applied during the entire experimental

period comes to a significant increase in all parameters examined for irreversible impairment of the function of the adrenal glands (chronic hypofunction).