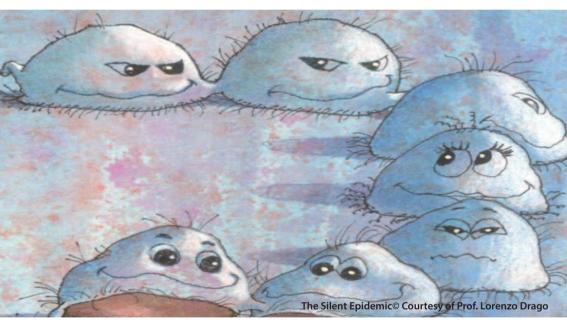


# World Association against Infection in Orthopaedics & Trauma

## 1st WAIOT CONGRESS

"...A global approach to the silent epidemic of the bone & joint infections..."



FREE Registration for WAIOT Members AUGUST 28, 2021 VIRTUAL

www.waiot2021.com

info@waiot2021.com

### A Global Approach to the Silent Epidemic of the Bone Joint Infections

### **Topics**

- ✓ Prevention, Diagnosis Management, Research
- ✓ Infections in Sickle Cell Disease
- ✓ Spine Infections

- ✓ Tuberculosis
- ✓ Antibiotics
- ✓ Bacterial Resistance
- ✓ Paediatric Infections

### Registration

#### Registration to the 1st WAIOT CONGRESS is FREE for WAIOT Members

In order to become WAIOT Member please visit:

https://www.waiot.world/registration and fill out the application form.

WAIOT Membership is FREE of charge and you can cancel it by simply sending an email to waiot@waiot world

ALL those who are Members of WAIOT will receive a link and a password to access the Congress few weeks before the event.

#### **Awards**

The best three Oral presentations will be selected to receive the "2021 WAIOT AWARD"

#### Time

The time of the Congress is Central European Time (CET)

### Language

English will be the official language of the Congress

For more information, please contact Congress Secretariat



ORGANIZING BUREAU C.T.M. International S.A.

Vas. Sofias Av. 131, 115 21 Athens, Greece Tel.: +30 210 3244932, Fax: +30 210 3250660 E-mail: info@waiot2021.gr, Site: www.ctmi.gr

WAIOT would like to thank the following Sponsors for their valued support

**WAIOT Platinum Sponsor:** 











#### **WELCOME MESSAGE**



Dear Members,

On behalf of WAIOT it is a great honor and privilege to warmly welcome all participants to our **First International Congress** on Saturday August 28<sup>th</sup>, 2021.

We decided to hold our 1<sup>st</sup> Congress virtual. Our decision, mainly based on health safety, will enable a great number of participants to join our nearly 1600 Members from 100 Countries.

We are eager and ready to share knowledge and exchange experience of prevention, diagnosis, management and research in matter of musculoskeletal infections. We also really appreciate your support and contribution.

It is worth noting we are offering Free Registration to our members for the Congress.

WAIOT will offer Awards/Scholarships to three young authors of the best presentations.

I would like to specially thank our faculty and Officers for their great and promising efforts in making our meeting successful. Our gratitude goes also to our sponsors hoping for a greater cooperation in the future!

With my warmest regards,

Thami Benzakour MD WAIOT President

#### **CONGRESS SCIENTIFIC COMMITTEE**

#### Chairmen



**Lorenzo Drago** Milano – **Italy** 



**Guenter Lob** Munich – **Germany** 

**Members** 



Alaaeldin Azmi Ahmad Asia, Palestine



Insa Bamba Africa, Ivory Coast



Joseph Benevenia North America, USA



Thami Benzakour Africa, Morocco



Svetlana Bozhkova Europe-Asia, Russia



Hernán Jose Del Sel South America, Argentina



Mohamed Fadel Africa, Egypt



Mahmoud Hafez Africa, Egypt



Ashok N. Johari Asia, India



Fatih Kucukdurmaz Europe-Asia, Turkey



Konstantinos N. Malizos Europe, Greece



Andreas Mavrogenis Europe, Greece



Hamish Simpson Europe, Great Britain



Mohsen Tavakoli Asia, Iran



Hiroyuki Tsuchiya Asia, Japan

#### **EXECUTIVE & ORGANIZING COMMITTEE**



**Thami Benzakour President**Casablanca – **Morocco** 



**Chingiz Alizade Deputy Treasurer**Baku – **Azerbaijan** 



Ashok N. Johari Past-President Mumbai – India



Guenter Lob Member at Large München – Germany



Hernán Jose Del Sel 1<sup>st</sup> Vice-President Buenos Aires – Argentina



**Andreas Tiemann Member at Large** Suhl – **Germany** 



Joseph Benevenia 2<sup>nd</sup> Vice-President Newark – USA



**Heinz Winkler Member at Large**Wien – **Austria** 



Carlo L. Romanò Secretary General Milano – Italy



llaria Morelli Auditor Milano – Italy



Hazem Al Khawashki Deputy Secretary General Riyadh – Saudi Arabia





**Lorenzo Drago Treasurer** Milano – **Italy** 

#### **WAIOT BOARD OF DIRECTORS**



Mohamed Fadel Director Africa El-Minia – Egypt



**Anil K. Jain Director Asia**Delhi – **India** 



Hemant K. Sharma Director Europe Hull – UK



Luiz Sérgio Marcelino Gomez Director South America MG – Brazil



Eric Gomez-Urena Director North America Minnesota – USA



Trisha Peel
Director Oceania
Melbourne – Australia



**Lorenzo Drago Chairman Scientific Committee**Milano – **Italy** 



Hazem Al Khawashki Chairman Humanitarian Committee Riyadh – Saudi Arabia



**Mahmoud Hafez Chairman Study Groups**Cairo – **Egypt** 



Insa Bamba Deputy Chairman Study Groups Abidjan – Cote d'Ivoire



**Kostantinos Malizos Chairman Certification Committee**Larissa – **Greece** 



Khaled M. Emara
Chairman Fellowship Committee
Cairo – Egypt



Vaibhav Bagaria Chairman Innovation/ Reaserch Committee Mumbai – India



Hitesh Gopalan
Chairman Online
Education Committee
Kerala – India



Fatih Kucukdurmaz Chairman Young Surgeons Committee Istanbul – Turkey



Amadou Ndiassé Kassé Dep. Chairman Young Surgeons Committee Dakar – Senegal



Andreas F. Mavrogenis
Chairman Editorial Committee
Athens – Greece

#### SCIENTIFIC PROGRAM 28 AUGUST 2021

08:50 Presidential Welcome, Thami Benzakour, Morocco

09:00-09:57 Symposium: A world Eye at Spinal Infection and Tuberculosis

Moderators: Thami Benzakour, Andreas Mavrogenis, Mohsen Tavakoli

**Surgical Site Infection Following Spine Surgery** 

Thami Benzakour, Morocco

Diagnosis of Musculoskeletal Tuberculosis - Perceptions and Practices in the Endemic and Non-Endemic Worlds Vikas Agashe, India

**Isolated Calcaneal Tuberculosis** 

Mohsen Tavakoli, Iran

**Pyogenic Infection of the Spine** 

Bahaa Ali Kornah, Egypt

The Problem of Deformity in Spinal Tuberculosis

Shanmuganathan Rajasekaran, India

Q&A

09:57-10:54 Symposium: MSI in Children

Moderators: Ashok N. Johari, Konstantinos N.Malizos, Alageldin Azmi Ahmad

Musculoskeletal Infections in Children - What's New?

Ashok N. Johari, India

Septic Hip and its Sequelae in Children

Muhammad Amin Chinoy, Pakistan

Bone Infection in Sickle Cell Anemia Children

Ahmad Bo-Eisa, Saudi Arabia

Planning for Consensus for Paediatric Spine Infection Control in LMIC

Alaaeldin Azmi Ahmad, Palestine

The Management of Megaprosthetic Infections in Pediatric Orthopaedic Oncology Patients

Bülent Erol, Turkey

O&A

11:04-11:53 Symposium: Viral, Post-Viral and Fungal Infection

Moderators: Chingiz Alizade, Lorenzo Drago, Hamish Simpson

Virus Infection of Bone and Joints? What is Known and Open Questions

Guenter Lob, Germany

**Fungal Bone and Joint Infection** 

Hazem Al Khawashki, Saudi Arabia

Peri Prosthetic Joint Infection in Patients with Positive Covid 19

Barredo Ramon, Ecuador

COVID-19, SARS-CoV-2 Encapsulated RNA Virus is Capable of Forming a Viral Biofilm

Augustin Tellez Duarte, Mexico

Q&A

11:53-12:42 Symposium: Understanding Biofilms and Their Role for

Implant-Related Infection Modern Prevention and Diagnosis

Moderators: Svetlana Bozhkova, Hiroyuki Tsuchiya, Insa Bamba

**Antimicrobial Implants for Orthopedic Surgery** 

Tsuchiya Hiroyuki, Japan

Understanding Biofilms and Formulating Strategies for Eradication in Prosthetic Joint Infections

Vaibhav Bagaria, India

Biofilms and Musculoskeletal Infections: What Surgeons Should Know

Carlo Luca Romanò, Italy

What's Old and What's New in Microbiological Diagnosis

Lorenzo Drago Italy

Q&A

#### SCIENTIFIC PROGRAM 28 AUGUST 2021

12:52-13:36 Symposium: Shortening Infection Treatment Duration

Moderators: Guenter Lob, Hazem Al Khawashki, Mohamed Fadel

Infected Nonunion, How to Shorten the Duration of Treatment

Khaled Emara, Egypt

**Update on Single Stage Treatment of Infected Non-Unions** 

Heinz Winkler, Austria

Can we Effectively Shorten Infection Treatment Duration?

Andreas Mavrogenis, Greece

Q&A

13:36-14:38 Symposium: Open Injuries and Large Bone Defects Management Moderators: Joseph Benevenia, Mahmoud Hafez

Musculoskeletal Infection: How Far Should We Go With Surgery?

Joseph Benevenia, United States of America

Bone Stabilization in Presence of Infection: Internal vs External Fixation

Hemant Sharma, United Kingdom

Orthoplastic Fibula Ilizarov Assisted Technique (fiat)

Mohamed Fadel, Egypt

**Limb Salvage** 

Mofakhkharul Bari, Bangladesh

Knee Extensor Mechanism Allograft for Salvage of Multi Operated Infected Knee Arthroplasty

Hernán del Sel, Argentina

**Periprosthetic Infections in Tumor Prosthesis** 

Kontogeorgakos Vasileios, Greece

Q&A

14:48-15:36 Symposium: From the World

Moderators: Hernán Del Sel, Ana Lucia Lei Munhoz Lima, Carlo Luca Romanò

Causes of Periprosthetic Joint Infection (PJI): A Model From a Developing Country

Mahmoud Hafez, Eavpt

**Epidemiology of Prosthetic Joint Infection in the Russian Federation** 

Svetlana Bozhkova, Russian Federation

Management of Septic Arthritis after Anterior Cruciate Ligament Reconstruction

Hantes Michael, Greece

Ilizarov Method in the Treatment of Septic Tibial Non Unions

Amadou Ndiassé Kassé, Senegal

0&A

15:56-18:16	From the World Free Papers
18:26	WAIOT General Assembly
19:26	Awards – Closing Remarks & Salutations
19:36	End of the 1st WAIOT Congress

**ROOM 1: RISK FACTORS, PREVENTION AND DIAGNOSIS OF** 

**MUSCULOSKELETAL INFECTION** 

Moderators: Vaibhav Bagaria, Andreas Mavrogenis

#### 0 01

## IS THERE AN ASSOCIATION BETWEEN CLIMATE AND ACUTE PROSTHETIC JOINT INFECTION?

<u>Stéfano Gaggiotti, Tamara Dainotto, Fernando Lopreite, Hernan Del Sel</u>

Orthopaedics & Trauma Department, British Hospital of Buenos Aires, Argentina

#### 002

## PATELLAR REPLACEMENT AS RISK FACTOR FOR INFECTION IN TOTAL KNEE ARTHROPLASTY

Alberto Delgado-Gonzalez, Juan Jose Morales-Viaji, <u>Guillermo Criado-Albillos</u>, Rodrigo Hidalgo-Bilbao, Eloy Benito-Sancho, Leticia Mendieta-Diaz, Tamara Fernandez-Ardura, Sergio Gonzalez-Gallego

Hospital Universitario de Burgos, Burgos, Spain

#### 0 03

## SINUS TRACT AS AN INDEPENDENT REINFECTION RISK FACTOR IN PATIENTS WITH PERIPROSTHETIC JOINT INFECTION AFTER PRIMARY TOTAL KNEE ARTHROPLASTY

<u>Petr Preobrazhensky</u>, Svetlana Bozhkova, Alexander Panteleev, Alexander Kazemirsky, Rashid Tikhilov

Russian Scientific Research Institute of Traumatology and Orthopedics named after R.R. Vreden

#### 0 04

## DO TRABECULAR METAL AND CANCELLOUS TITANIUM IMPLANTS REDUCE THE RISK OF LATE HAEMATOGENOUS INFECTION? AN EXPERIMENTAL STUDY IN RABBITS

<u>George Komnos</u><sup>1</sup>, Konstantinos Banios<sup>2</sup>, Konstantina Kolonia<sup>1</sup>, Dimitrios Deligeorgis<sup>1</sup>, Vasilios Amprazis<sup>1</sup>, Christos Rountas<sup>1</sup>, Styliani Sarrou<sup>1</sup>, Theofilos Karachalios<sup>1</sup>

<sup>1</sup>Orthopaedic Department, University Hospital of Larissa, Larissa, Greece

#### 0 05

PRE-SOAKING OF AUTOGRAFTS WITH VANCOMYCIN IS HIGHLY EFFECTIVE IN PEVENTING POSTOPERATIVE SEPTIC ARTHRITIS IN MALE PATIENTS UNDERGOING ACL RECONSTRUCTION WITH HAMSTRINGS HARVESTING. A RETROSPECTIVE STUDY OF 1835 PATIENTS

<u>George Komnos</u><sup>1</sup>, Konstantinos Banios<sup>2</sup>, George Halatsis<sup>1</sup>, George Bakagiannis<sup>1</sup>, George Kalifis<sup>1</sup>, Theofilos Karachalios<sup>1</sup>, Konstantinos N. Malizos<sup>1</sup>, Michael Hantes<sup>1</sup>

<sup>1</sup>Orthopaedic Department, University Hospital of Larissa, Larissa, Greece

<sup>&</sup>lt;sup>2</sup>Orthopaedic Department, General Hospital of Karditsa, Karditsa, Greece

<sup>&</sup>lt;sup>2</sup>Orthopaedic Department, General Hospital of Karditsa, Karditsa, Greece

#### 0 06

## IODINE-SUPPORTED TITANIUM IMPLANTS MAINTAIN THE ANTIMICROBIAL EFFECT FOR FOUR WEEKS

<u>Ken Ueoka</u>, Tamon Kabata, Yoshitomo Kajino , Daisuke Inoue, Takaaki Ohmori, Yuki Yamamuro, Atsushi Taninaka, Hiroyuki Tsuchiya

Department of Orthopedic Surgery, Kanazawa University, Kanazawa, Ishikawa, Japan

#### 0 07

## ANTIBACTERIAL EFFECT FOR IODINE-SUPPORTED TITANIUM IMPLANT IN TERMS OF BASIC RESEARCH

<u>Daisuke Inoue,</u> Tamon Kabata, Yoshitomo Kajino, Takaaki Ohmori, Ken Ueoka, Yuki Yamamuro, Atsushi Taninaka, Hiroyuki Tsuchiya

Department of Orthopaedic Surgery, Graduate School of Medical Science, Kanazawa University, Japan

#### 0 08

## PREVENTION OF STAPHYLOCOCCAL SURGICAL SITE INFECTIONS USING STAINLESS STEEL BIORESORBABLE ORGANIC COATING. A SYSTEMATIC REVIEW AND META-ANALYSIS OF ANIMAL MODEL STUDIES

<u>Konstantinos Sidiropoulos</u><sup>1</sup>, Konstantinos Tsikopoulos<sup>2</sup>, Dimitrios Kitridis<sup>3</sup>, Elizabeth Moulder<sup>4</sup>, Milad Ahmadi<sup>2</sup>, David Lavalette<sup>2</sup>, Lorenzo Drago<sup>5</sup>

<sup>1</sup>Orthopaedic Department, General Hospital of Serres, Serres, Greece

<sup>2</sup>Harrogate and District NHS Foundation Trust, Harrogate, UK

<sup>3</sup>1st Orthopaedic Department of Aristotle University, G. Papanikolaou General Hospital, Thessaloniki, Greece

<sup>4</sup>Hull Limb Reconstruction Unit, Hull Royal Infirmary, Hull, UK

<sup>s</sup>Laboratory of Clinical Microbiology. Department of Biochemical Sciences for Health, University of Milan, Milan, Italy

#### 0 09

## NAILS WITH THREE-COMPONENT ANTIBACTERIAL COATING CONSISTING OF A POLYMER, SILVER SALT NANOPARTICLES AND ANTIBIOTIC IN INFECTED FRACTURES AND NONUNIONS OF TIBIA AND FEMUR

Pavel Volotovski<sup>1</sup>, Alexandre Sitnik<sup>1</sup>, Dzmitry Tapalski<sup>2</sup>, Mikhail Gerasimenko<sup>1</sup>

<sup>1</sup>Republican Scientific and Practical Centre for Traumatology and Orthopedics, Minsk, Belarus <sup>2</sup>Gomel State Medical University, Minsk, Belarus

#### 010

## NEW METHOD OF CT FISTULOGRAPHY FOR IDENTIFICATION OF FISTULOUS PASSAGES AND SEQUESTRATION IN CHRONIC OSTEOMYELITIS

Alizade Chingiz<sup>1</sup>, Huseyn Aliyev<sup>2</sup>, Farhad Garayev<sup>3</sup>

<sup>1</sup>Baku Health Centre, Baku, Azerbaijan

<sup>2</sup>Scientific Research Institute of Traumatology and Orthopaedics, Baku, Azerbaijan

<sup>3</sup> Hayat Clinic, Baku, Azerbaijan

#### 011

## CENTRIFUGATION OF SYNOVIAL FLUID RESULTS IN A HIGH SENSITIVITY AND SPECIFICITY OF THE ALPHA-DEFENSIN LATERAL FLOW TEST FOR THE DIAGNOSIS OF PERIPROSTHETIC KNEE INFECTION

<u>Rodrigo Calil Teles Abdo</u><sup>1</sup>, Riccardo Gomes Gobbi<sup>1</sup>, Chilan Bou Ghosson Leite<sup>1</sup>, Sandra Gofinet Pasoto<sup>2</sup>, Elaine Pires Leon<sup>2</sup>, Ana Lucia Lei Munhoz Lima<sup>1</sup>, Eloisa Silva Dutra de Oliveira Bonfá<sup>2</sup>, José Ricardo Pécora<sup>1</sup>, Marco Kawamura Demange<sup>1</sup>

#### 012

## QUANTITATIVE ALPHA-DEFENSIN TESTING: IS SYNOVIAL FLUID DILUTION IMPORTANT?

Rodrigo Calil Teles Abdo<sup>1</sup>, Riccardo Gomes Gobbi<sup>1</sup>, <u>Chilan Bou Ghosson Leite</u><sup>1</sup>, Sandra Gofinet Pasoto<sup>2</sup>, Elaine Pires Leon<sup>2</sup>, Ana Lucia Lei Munhoz Lima<sup>1</sup>, Eloisa Silva Dutra de Oliveira Bonfá<sup>2</sup>, José Ricardo Pécora<sup>1</sup>, Marco Kawamura Demange<sup>1</sup>

#### 013

## HYPOALBUMINEMIA INCREASED THE LENGTH OF STAY IN THE TREATMENT OF POSTOPERATIVE SURGICAL SITE INFECTION IN SPINAL SURGERY

Yusuke Yamamoto¹, Hideki Shigematsu¹, Eiichiro Iwata², Hiroshi Nakajima³, Masato Tanaka¹, Akinori Okuda¹, Sachiko Kawasaki¹, Yuma Suga¹, Keisuke Masuda¹, Yasuhito Tanaka¹, Spyridon Sioutis⁴, Andreas F. Mavrogenis⁴, Shinji Tsukamoto¹

#### 014

## MANAGEMENT OF PATIENTS WITH HAND AND UPPER LIMB INFECTIONS-STUDY OF THE IMMUNE RESPONSE WITH IL-1BETA, IL-17A & IL-17F

Sophia A. Syngouna<sup>1</sup>, Andreas F. Mavrogenis<sup>3</sup>, <u>Spyridon Sioutis</u><sup>3</sup>, Sotirios Tsiodras<sup>4</sup>, Spyridon Pneumatikos<sup>2</sup>, Ekaterini Bavelou<sup>5</sup>, George Togias<sup>5</sup>, Zinon Kokkalis<sup>5</sup>, Emmanouil Fandridis<sup>1</sup>, Pantelis Mitsikostas<sup>1</sup>, Sarantis G. Spyridonos<sup>1</sup>

<sup>1</sup>Hand, Upper Limb & Microsurgery Department, KAT Hospital, Athens, Greece

<sup>&</sup>lt;sup>1</sup>Institute of Orthopedics and Traumatology, Hospital das Clínicas, Faculty of Medicine, University of São Paulo, São Paulo, Brazil

<sup>&</sup>lt;sup>2</sup>Division of Rheumatology, Faculty of Medicine, University of São Paulo, São Paulo, Brazil

<sup>&</sup>lt;sup>1</sup>Institute of Orthopedics and Traumatology, Hospital das Clínicas, Faculty of Medicine, University of São Paulo, São Paulo, Brazil

<sup>&</sup>lt;sup>2</sup>Division of Rheumatology, Faculty of Medicine, University of São Paulo, São Paulo, Brazil

<sup>&</sup>lt;sup>1</sup>Department of Orthopaedic Surgery, Nara Medical University, Japan

<sup>&</sup>lt;sup>2</sup>Department of Orthopaedic Surgery, Nara City Hospital

<sup>&</sup>lt;sup>3</sup>Department of Orthopaedic Surgery, Otemae Hospital, Osaka, Japan

<sup>&</sup>lt;sup>4</sup>First Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

<sup>&</sup>lt;sup>2</sup>Third Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

<sup>&</sup>lt;sup>3</sup>First Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

<sup>&</sup>lt;sup>4</sup>Fourth Department of Internal Medicine, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

<sup>&</sup>lt;sup>5</sup>Department of Orthopaedics, University Hospital of Patras, Patra, Greece

#### 015

#### THE ROLE OF PJI IN THE PAIN SYNDROME AFTER TKA

<u>Valeriy Murylev</u><sup>1,2</sup>, Semen Alexeev<sup>2</sup>, Grigorii Kukovenko<sup>1,2</sup>, Pavel Elizarov<sup>1,2</sup>, Alexey Muzychenkov<sup>1,2</sup>

<sup>1</sup>I.M.Sechenov First Moscow State Medical University, Moscow, Russian Federation

<sup>2</sup>S. P. Botkin Moscow City Clinical Hospital, Moscow, Russian Federation

#### 016

## LATE PERIPROSTHETIC HIP JOINT INFECTION. SHOULD RETROPERITONEUM INVOLVEMENT BE ROUTINELY EXCLUDED IN ADVANCE?

Efstratios Athanaselis, Fotios Papageorgiou, Nikolaos Stefanou, Dimitrios Deligeorgis, Christos Baltas, Theofilos Karachalios, Konstantinos N. Malizos, Sokratis Varitimidis

Department of Orthopaedic Surgery and Musculoskeletal Trauma, University Hospital of Larissa, Greece

#### 017

## METAL HYPERSENSITIVITY OR MISSED PERI-PROSTHETIC JOINT INFECTION DIAGNOSIS? A CRITICAL LITERATURE REVIEW

Antonino Giulio Battaglia<sup>1</sup>, Chingiz Alizade<sup>2</sup>, Lorenzo Monti <sup>3</sup>, Hazem Al Khawashki <sup>4</sup>, Heinz Winkler <sup>5</sup>, Herman del Sel<sup>6</sup>, Thami Benzakour<sup>7</sup>, Lorenzo Drago<sup>8</sup>, Carlo Luca Romanò<sup>9</sup>

<sup>1</sup>Orthopaedics Specialty School, University of Milan, Milano, Italy

#### 018

### PRIMARY PARASPINAL HYDATID CYST IN A PATIENT PRESENTING WITH LOW BACK PAIN: A CASE REPORT

<u>Vasileios Raoulis</u><sup>1,4</sup>, Vasileios Mitrousias<sup>1,4</sup>, Anastasios Stofas<sup>2</sup>, Apostolos Fyllos<sup>1,4</sup>, Alexandra Markou<sup>3</sup>, Konstantinos N. Malizos<sup>4</sup>

<sup>1</sup>Department of Orthopaedic Surgery, General Hospital of Karditsa, Greece

<sup>2</sup>First Department of Pathology, Medical School, National and Kapodistrian University of Athens, Greece

<sup>3</sup>Department of Oncology, University Hospital of Larissa, Greece

<sup>4</sup>Department of Orthopaedic Surgery, University Hospital of Larissa, Greece

Investigation performed at the Department of Orthopaedic Surgery, General Hospital of Karditsa, Karditsa, Greece

#### 0 19

#### **CASE REPORT: A UNIQUE CASE OF FEMORAL ABSCESS**

Ilias Tseronis, Vaios Goulas, Christos Tsaousis, <u>Ioanna Misaridi</u>, Stefanos Tsourvakas

Orthopaedic department, Trikala General Hospital, Trikala, Greece

<sup>&</sup>lt;sup>2</sup>Baku Health Center, Baku, Azerbaijan

<sup>&</sup>lt;sup>3</sup>Orthopaedics, Istituto Clinico Villa Aprica, Como, Italy

<sup>&</sup>lt;sup>4</sup>Advanced Medical Center - Riyadh, Saudi Arabia

<sup>&</sup>lt;sup>5</sup>Leiter des Osteitis-Zentrums in der Privatklinik Döbling, Wien, Austria

<sup>&</sup>lt;sup>6</sup>Department of Orthopaedics, British Hospital Buenos Aires, Buenos Aires, Argentina

<sup>&</sup>lt;sup>7</sup>Thami Benzakour - Zerktouni Orthopaedic Clinic - Casablanca, Morocco

<sup>&</sup>lt;sup>8</sup>Clinical Microbiology, University of Milan, Milano, Italy

<sup>&</sup>lt;sup>9</sup>Studio Medico Cecca-Romanò, Corso Venezia, Milano, Italy

#### 020

## TENOSYNOVITIS OF THE FINGERS MASKING TUBERCULOUS ORIGIN RICE GRAIN FORMATION: CASE REPORT AND LITERATURE REVIEW

Omar Lazrek<sup>1</sup>, Moncef Boufetta<sup>1,2</sup>, Rida Allah Bassir<sup>1,2</sup>, Moulay Omar Lamrani<sup>1</sup> Mohammed Kharmaz<sup>1</sup>, Mohamed Salah Berrada<sup>1</sup>

<sup>1</sup>Department of Traumatology and Orthopedic Surgery Hospital Ibn Sina, Rabat, Morocco,

#### ROOM 2: PJI AND OSTEOMYELITIS MANAGEMENT

Moderators: Ferdinando Da Rin de Lorenzo, Heinz Winkler

#### 021

## EPIDEMIOLOGY AND MICROBIOLOGY OF PERIPROSTHETIC HIP AND KNEE INFECTIONS: 15 YEARS OF EXPERIENCE OF A REFERENCE CENTER

Georgios Komnos, <u>Dimitrios Deligeorgis</u>, Athanasios Koutis, Fotios Papageorgiou, Michael Hantes, Varitimidis Socrates, Theofilos Karachalios, Konstantinos N. Malizos Department of Orthopaedic Surgery, Faculty of Medicine, School of Health Sciences, University of Hospital of Larissa, Larissa, Greece

#### 0 22

## CLASSIFICATION AND MANAGEMENT OPTIONS FOR PROSTHETIC JOINT INFECTION: A PRELIMINARY REPORT

Antonio Virgilio Pellegrini, Nicola Logoluso, Ilaria Morelli, Virginia Suardi, Delia Romano, Enzo Meani

Istituto Ortopedico R. Galeazzi - Milano, Italy

#### 023

## MANAGEMENT AND TREATMENT OF ENDOPROSTHETIC JOINT INFECTION WITH STABILIZED ANTIBIOTIC SPACERS AT THE HIP DURING TWO-STAGE REIMPLANTATION

<u>Joseph Ippolito</u>, Jennifer Thomson, Luis Guinand, Kathleen Beebe, Joseph Benevenia Department of Orthopaedic Surgery & Musculoskeletal Oncology, University Hospital, Rutgers – New Jersey Medical School Newark, New Jersey, USA

#### 024

OUTCOME OF DEBRIDEMENT, ANTIBIOTICS AND IMPLANT RETENTION (DAIR) FOR PERIPROSTHETIC JOINT INFECTION OF HIP OR KNEE IS NOT AFFECTED BY COMPLIANCE WITH INTERNATIONAL CONSENSUS RECOMMENDATIONS: AN AUDIT OF PRACTICE IN A DISTRICT GENERAL HOSPITAL

Sridhar Rao Sampalli, Lucy Walker, Isaac Okereke

Trauma and Orthopaedics Department, Salisbury NHS Foundation Trust, Salisbury, UK

<sup>&</sup>lt;sup>2</sup>Laboratory Of Anatomy, Faculty of Medicine Rabat, University Med V Rabat, Morocco

#### 025

## REVIEW OF ACUTE PROSTHETIC JOINT INFECTIONS FOLLOWING TOTAL HIP REPLACEMENTS FROM A DISTRICT GENERAL HOSPITAL: LESSONS LEARNT Sridhar Rao Sampalli, Rvan Hillier-Smith

Salisbury District Hospital, Odstock road, Salsibury, Wiltshire, UK

#### 026

## TWO-STAGE REVISION REMAINS THE GOLD STANDARD FOR THE TREATMENT OF PERIPROSTHETIC JOINT INFECTIONS FOLLOWING HIP AND KNEE REPLACEMENT

<u>Emmanouil Avramidis</u><sup>1</sup>, Nikolaos Stavropoulos<sup>1</sup>, Evangelos Tyrpenou<sup>1</sup>, Nikolaos Vergados<sup>1</sup>, Aikaterini Masgala<sup>2</sup>, George Babis<sup>1</sup>

<sup>1</sup>2<sup>nd</sup> Orthopaedic Department, Medical School, National and Kapodistrian University of Athens, Konstantopouleio General Hospital of Nea Ionia, Nea Ionia, Greece

<sup>2</sup>1st Department of Internal Medicine, Konstantopouleio General Hospital of Nea Ionia, Nea Ionia, Greece

#### 027

### TWO NEW MODIFICATION IN BONE CEMENT IMPREGNATED ANTIBIOTIC IN PJI TREATMENT

#### Zabih Hassanzadeh, Mohammadkazem Emami, Abbasali Imani

BMSU, Trauma Research Center, Tehran, Iran

#### 028

## CONVENTIONAL SYNOVECTOMY IN TKA MAYBE INCREASED PJI IN DIABETES MELLITUS

#### Zabih Hassanzadeh, Ali Nematy

BMSU, Trauma Research Center, Tehran, Iran

#### 029

## TREATMENT OF AN INFECTED PERI-PROSTHETIC FRACTURE FIXATION WITH EXCHANGE OF FIXATION PLATE: A CASE REPORT

Ryan Hillier-Smith, Guy Barham, Marios Nicolaou, Sridhar Rao Sampalli

Orthopaedic Department, Salisbury District Hospital, Salisbury UK

#### 030

## MORTALITY, FUNCTIONAL OUTCOMES AND QUALITY OF LIFE AFTER HIP FRACTURES COMPLICATED BY INFECTION

<u>Antonios Koutalos</u><sup>1</sup>, Christos Baltas<sup>1</sup>, Anna Ziogkou<sup>1</sup>, Christina Arnaoutoglou<sup>1</sup>, Konstantinos N. Malizos<sup>1,2</sup>

 $^1$ Department of Orthopaedic Surgery & Musculoskeletal Trauma, University General Hospital of Larissa

<sup>2</sup>Faculty of Medicine, School of health Sciences, University of Thessaly

#### 031

### MANAGEMENT OF CHRONIC MEGAPROSTHETIC INFECTION WITH MODULAR KNEE ARTHRODESIS IMPLANTS

Joseph Ippolito, Jennifer Thomson, Luis Guinand, Kathleen Beebe, Joseph Benevenia

Department of Orthopaedic Surgery & Musculoskeletal Oncology, University Hospital, Rutgers – New Jersey Medical School Newark, NJ, USA

#### 032

### LOCAL APPLICATION OF CALCIUM SULPHATE IMPREGNATED WITH VANCOMYCIN AND TOBRAMYCIN IN THE TREATMENT OF CHRONIC OSTEOMYELITIS

Ibrahim E. Abdellatif Abuomira

Orthopaedic Department, Al-Azhar University, Sahag, Egypt

#### 033

#### INFECTIONS OF THE FOREARM AND HAND: A REPORT OF 37 CASES

<u>Ekaterini Bavelou</u><sup>1</sup>, George Togias<sup>1</sup>, Sophia A. Syngouna<sup>2</sup>, Spyridon Sioutis<sup>3</sup>, Andreas F. Mavrogenis<sup>3</sup>, Zinon Kokkalis<sup>1</sup>

<sup>1</sup>Department of Orthopaedics, University Hospital of Patras, Patras, Greece

<sup>2</sup>Hand, Upper Limb & Microsurgery Department, KAT Hospital, Athens, Greece

 $^3$ First Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

#### 034

### "TAKE THE BULL BY THE HORN"— CONFRONTING CARBAPENEM RESISTANT OSTEOARTICULAR INFECTIONS

<u>Vikas Agashe</u>, Camilla Rodrigues, Rajeev Soman, Bimal Mody, Anjali Shetty, Sagar Raghuwanshi, Aditya Menon

Department of Orthopaedics, Hinduja Hospital, Mahim, Mumbai, India

#### 035

### NECROTIZING FASCIITIS DUE TO PANRESISTANT ACINETOBACTER BAUMANNII AFTER TIBIAL PLATEAU FIXATION IN A FEMALE DRUG ADDICT

Themistoklis Floros, Andreas Efstathiou, Evaggelos Zafeiris, Ioannis Skindilias, Panagiotis Mandrekas, Elisavet Mantzila, Antonis Sakas, Nikolaos Stamoulis, George Babis Orthopaedic Department, General Hospital Konstantopouleio, Nea Ionia, National and Kapodistrian University of Athens, Greece

#### 036

### INDICATIONS FOR MEDICAL AND SURGICAL TREATMENTS OF PONDYLODISCITIS: ANALYSIS OF 13 PATIENTS

<u>Spyridon Sioutis</u><sup>1</sup>, Achilles Bekos<sup>1</sup>, Panayiotis Gavriil<sup>1</sup>, Efthymia Giannitsioti<sup>2</sup>, Antonios Papadopoulos<sup>2</sup>, Konstantinos C. Soultanis<sup>1</sup>, Andreas F. Mavrogenis<sup>1</sup>

<sup>1</sup>First Department of Orthopaedics, and <sup>2</sup>Fourth Department of Internal Medicine, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

#### 037

## MANAGEMENT OF LARGE SEGMENTAL BONE DEFECTS AT THE KNEE WITH INTRAMEDULLARY STABILIZED ANTIBIOTIC SPACERS DURING TWO-STAGE TREATMENT OF ENDOPROSTHETIC JOINT INFECTION

Joseph Ippolito, Jennifer Thomson, Luis Guinand, Kathleen Beebe, Joseph Benevenia

Department of Orthopaedic Surgery & Musculoskeletal Oncology, University Hospital, Rutgers – New Jersey Medical School Newark, New Jersey, USA

ROOM 3: SEPTIC NON-UNION AND BONE LOSS MANAGEMENT

Moderators: Mofakhkharul Bari, Mohamed Fadel

#### 038

#### OSTEOMYELITIS BURNS IN THE FIRE OF REGENERATION

#### Mofakhkharul Bari

Bari-Ilizarov Orthopaedic Centre, Dhaka, Bangladesh

#### 039

### MANAGEMENT OF FOREARM BONE GAP NON-UNIONS BY ILIZAROV TECHNIQUE Mofakhkharul Bari

Bari-Ilizarov Orthopaedic Centre, Dhaka, Bangladesh

#### 0 40

### TREATMENT OF HUMERUS NONUNION USING G.A. ILIZAROV TECHNIQUE Mofakhkharul Bari

Bari-Ilizarov Orthopaedic Centre, Dhaka, Bangladesh

#### 041

IMPROVED HEALING OF GUSTILO TYPE IIIA AND IIIB OPEN LONG BONE FRACTURES TREATED WITH LOCAL BIODEGRADABLE PROLONGED RELEASE ANTIBIOTIC FORMULATED BONE GRAFT DURING THE FIRST SURGICAL INTERVENTION POST-INJURY: A PROSPECTIVE, RANDOMIZED CLINICAL TRIAL Noam Emanuel<sup>1</sup>, Doron Norman<sup>2</sup>, Moshe Salai<sup>3</sup>

<sup>1</sup>PolvPid Ltd. Israel

<sup>2</sup>Rambam Medical Center, Haifa, Israel

<sup>3</sup>Tel Aviv Sourasky Medical Center, Israel

#### 0 42

## ILIZAROV PRINCIPLES IN INFECTED NONUNION OF FEMORAL SHAFT FRACTURE Mohamed Fadel, Mohamed Laklouk

Department of Orthopedic Surgery, El-Minia University Hospital, El-Minia, Egypt

#### 043

#### THE USE OF TAYLOR SPATIAL FRAME IN LOWER LIMB INFECTION

Konstantinos N. Malizos<sup>1</sup>, Sokratis Varitimidis<sup>1</sup>, Christina Arnaoutoglou<sup>1</sup>, Ilias Tseronis<sup>2</sup>, Georgios Komnos<sup>1</sup>, <u>Georgios Varsanis<sup>1</sup></u>

<sup>1</sup>Orthopaedic Department, University Hospital of Larissa, Larissa, Greece

<sup>2</sup>Orthopaedic Department, General Hospital of Trikala, Greece

#### 044

## THE CHARACTERISTICS OF BONE TRANSPORT AND ACUTE SHORTENING FOR INFECTED TIBIAL NON-UNIONS WITH BONE DEFECTS, AND POSSIBILITY OF CONVERSION TECHNIQUE

Toshifumi Hikichi, Hidenori Matsubara, Kanu Shimokawa, Hiroyuki Tsuchiya

Orthopaedic Department, Kanazawa University Hospital, Kanazawa, Japan

#### 0 45

#### SEPTIC PROXIMAL TIBIAL NON-UNIONS TREATED WITH ILIZAROV METHOD

<u>Konstantinos Sidiropoulos</u>¹, Alexios Agapidis¹, Angelos Andriskos¹, Dimosthenis Mpimpilas¹, Alkis Saridis¹,²

<sup>1</sup>Orthopaedic Department, General Hospital of Serres, Serres, Greece

<sup>2</sup>Orthopaedic Department, General Hospital of Drama, Drama, Greece

#### 046

## RECONSTRUCTIVE APPROACHES FOR TRAUMATIC COMPOSITE BONE AND SOFT TISSUE LOSS OF THE LEG: ARE WE SPEAKING A COMMON LANGUAGE?

#### **Mahmoud El-Rosasy**

Orthopaedic Surgery Department, Tanta University, Tanta, Egypt

#### 047

## INTEGRATED PROTOCOL FOR MANAGEMENT OF INFECTED NONUNION OF THE TIBIA

#### **Mahmoud El-Rosasy**

Orthopaedic Surgery Department, Tanta University, Tanta, Egypt

#### 0 48

## ANTIBIOTIC- CEMENT COATED INTERLOCKING NAILS FOR INFECTED NON UNION OF THE LONG BONES

#### Abdullah Khaled, Mahmoud El-Rosasy

Orthopedic department, Tanta University, Egypt

#### 049

## IMMEDIATE AND LONG-TERM RESULTS OF A NEW METHOD FOR TIBIOCALCANEAL-NAVICULAR ARTHRODESIS

Chingiz Alizade<sup>1</sup>, Huseyn Aliyev<sup>2</sup>, Farhad Alizada<sup>3</sup>

<sup>1</sup>Baku Health Centre, Baku, Azerbaijan

<sup>2</sup>Scientific Research Institute of Traumatology and Orthopaedics, Baku, Azerbaijan

<sup>3</sup>Asklepios Klinik Seligenstadt, Germany

#### 050

## SIMILARITIES AND DIFFERENCES IN CHALLENGES AND OUTCOME MEASURES IN INFECTION AFTER OSTEOSYNTHESIS FOR CLOSED AND OPEN FRACTURES

<u>Vikas Agashe</u>, Camilla Rodrigues, Rajeev Soman, Bimal Mody, Anjali Shetty, Vikas Kuntwad, Ravi Bhadiyadra

P.D. Hinduja Hospital, Mahim, Mumbai, India

#### 051

## PIN SITE INFECTIONS IN PEDIATRIC POPULATION, MICROBIOLOGY, TREATMENT AND LONG-TERM FUNCTIONAL DISABILITY

A. Sophia Syngouna<sup>1</sup>, <u>Pantelis Mitsikostas</u><sup>1</sup>, Emmanouil Fandridis<sup>1</sup>, Ioannis Triantafyllopoulos<sup>2</sup>

<sup>1</sup>Hand, Upper Limb & Microsurgery Department, KAT Hospital, Athens, Greece

<sup>2</sup>Third Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, AthensGreece

#### 052

#### NEW TRENDS IN COMBATTING HOSPITAL INFECTIONS AT TIMES OF WAR

Mohamed F. AlAwlaqi

Orthopaedic Surgeon, Cairo, Egypt

#### 053

## POST-TRAUMATIC OSTEOMYELITIS IN YEMEN, WAR-WOUNDED CIVILIANS: RESISTANCE TO FIRST-LINE ANTIBIOTICS IN SELECTED BACTERIA OVER THE DECADE 2008–2018

Mohamed F. AlAwlaqi

Orthopaedic Surgeon, Cairo, Egypt

#### 054

## AN ORTHOPLASTICS APPROACH TO EXTREMITY RECONSTRUCTION FOLLOWING ONCOLOGIC RESECTION DECREASES NUMBER OF SURGICAL PROCEDURES

Joseph Ippolito, Jennifer Thomson, <u>Luis Guinand</u>, Kathleen Beebe, Joseph Benevenia
Department of Orthopaedic Surgery & Musculoskeletal Oncology, University Hospital, Rutgers – New Jersey Medical
School Newark, New Jersey, USA

#### FROM THE WORLD POSTERS

#### P 01

## MANAGEMENT OF MRSA TIBIAL OSTEOMYELITIS IN A SEPTIC PAEDIATRIC PATIENT. A CASE REPORT

<u>Georgios Bozonelos</u><sup>1</sup>, Panteleimon Zogakis<sup>1</sup>, Christos Papadakis<sup>2</sup>, Emmanouil Skotidis<sup>1</sup>, Lampros Metaxas<sup>1</sup>, Elefterios Stavridis<sup>1</sup>, Konstantinos Antonis<sup>1</sup>

<sup>1</sup> 1st Orthopaedic Department, Athens General Children's Hospital 'Aghia Sofia', Greece

<sup>2</sup>Orthopaedic Department, Athens General Hospital 'Evaggelismos', Greece

#### P 02

## CATASTROPHIC WEAR OF TIBIAL COMPONENT AND METALLOSIS OF TOTAL KNEE REPLACEMENT MIMICKING SEPTIC LOOSENING

<u>Ioannis Papaioannou</u><sup>1</sup>, Georgia Pantazidou<sup>2</sup>, Thomas Repantis<sup>1</sup>, Andreas Baikousis<sup>1</sup>, Panagiotis Korovessis<sup>1</sup>

<sup>1</sup>Orthopedic Department of General Hospital of Patras, Patras, Greece

<sup>2</sup>ENT Department of General Hospital of Patras, Patras, Greece

#### P 03

MANAGEMENT OF METHICILLIN RESISTANT PERIPROSTHETIC KNEE JOINT INFECTIONS WITH TWO-STAGE REVISION ARTHROPLASTY. A TEN-YEAR EXPERIENCE <u>Dimitrios Begkas</u><sup>1</sup>, Stamatios Chatzopoulos<sup>1</sup>, Andreas Papageorgiou<sup>1</sup>, Georgios Georgiades<sup>2</sup>, Andreas Giannakoupoulos<sup>1</sup>, Alexandros Pastroudis<sup>1</sup>

<sup>1</sup>6th Orthopaedic Department, Asclepieion Voulas General Hospital, Athens, Greece

<sup>2</sup>4<sup>th</sup> Orthopaedic Department, Asclepieion Voulas General Hospital, Athens, Greece

#### P 04

## INFECTION CONTROL RATE OF IRRIGATION, DEBRIDEMENT AND PROSTHESIS RETENTION FOR TOTAL HIP ARTHROPLASTY INFECTIONS

<u>Dimitrios Begkas</u><sup>1</sup>, Stamatios Chatzopoulos<sup>1</sup>, Andreas Papageorgiou<sup>1</sup>, Georgios Georgiades<sup>2</sup>, Andreas Giannakoupoulos<sup>1</sup>, Alexandros Pastroudis<sup>1</sup>

<sup>1</sup>6th Orthopaedic Department, Asclepieion Voulas General Hospital, Athens, Greece

<sup>2</sup>4th Orthopaedic Department, Asclepieion Voulas General Hospital, Athens, Greece

#### P 05

### ANKLE AND DISTAL TIBIAL OSTEOMYELITIS TREATED WITH EXTERNAL FIXATOR

Kanu Shimokawa, Hidenori Matsubara, Toshifumi Hikichi, Hiroyuki Tsuchiya

Department of Orthopaedic Surgery, Kanazawa University Hospital, Ishikawa, Japan

#### P 06

## THIGH NECROTIZING FASCIITIS TREATED WITH VACUUM-ASSISTED WOUND THERAPY

<u>Ioannis Papaioannou</u><sup>1</sup>, Georgia Pantazidou<sup>2</sup>, Christina Arachoviti<sup>1</sup>, Thomas Repantis<sup>1</sup>, Andreas Kargados<sup>1</sup>, Panagiotis Korovessis<sup>1</sup>

<sup>1</sup>Orthopedic Department of General Hospital of Patras, Patras, Greece

<sup>2</sup>ENT Department of General Hospital of Patras, Patras, Greece

#### FROM THE WORLD POSTERS

#### P 07

## INFECTED TOTAL KNEE ARTHROPLASTY IN A PATIENT WITH PMMA CEMENT ALLERGY

<u>Spyridon Sioutis</u>, Achilles Bekos, Ioannis Zafiris, Jim Georgoulis, Panayiotis Alevrogiannis, Dimitrios Raptopoulos, Andreas F. Mavrogenis

First Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens Greece

#### P 08

## CONTINUOUS SPONDYLITIS FROM INFECTED ENDOVASCULAR AORTIC GRAFTS: A REPORT OF 3 CASES

<u>Spyridon Sioutis</u><sup>1</sup>, Ioannis Zafiris<sup>1</sup>, Jim Georgoulis<sup>1</sup>, Panayiotis Gavriil<sup>1</sup>, Andreas Lazaris<sup>2</sup>, Andreas F. Mavrogenis<sup>1</sup>

<sup>1</sup>First Department of Orthopaedics & 2Department of Vascular Surgery, National and Kapodistrian University of Athens, School of Medicine, Attikon University Hospital, Athens, Greece

#### P 09

#### PSEUDOMONAS ORYZIHABITANS INFECTED TOTAL HIP ARTHROPLASTY Spyridon Sioutis<sup>1</sup>, Achilles Bekos<sup>1</sup>, Panayiotis Alevrogiannis<sup>1</sup>, Efthymia Giannitsioti<sup>2</sup>,

Dimitrios Koulalis<sup>1</sup>, Andreas F. Mavrogenis<sup>1</sup>, Vasilios Kontogeorgakos<sup>1</sup>

<sup>1</sup>First Department of Orthopaedics & 2Fourth Department of Internal Medicine, National and Kapodistrian University of Athens, School of Medicine, Athens, Greece

#### P 10

## THE ROLE OF SONICATION FOR THE DIAGNOSIS OF MEGAPROSTHETIC INFECTIONS Andrea Sambri<sup>1</sup>, Massimiliano De Paolis<sup>1</sup>, Alessandra Maso<sup>2</sup>, Elisa Storni<sup>2</sup>, <u>Spyridon Sioutis</u><sup>3</sup>, Achilles Bekos<sup>3</sup>, Andreas F. Mavrogenis<sup>3</sup>, Costantino Errani,<sup>2</sup> Giuseppe Bianchi<sup>2</sup>

<sup>1</sup>University Hospital Sant'Orsola-Malpighi, Bologna, Italy

#### P 11

## A RARE CASE OF MIGRATION OF A SEPTIC LOOSENED METAL-ON-METAL TOTAL HIP ARTHROPLASTY

<u>Ioannis Papaioannou</u>1, Georgia Pantazidou², Thomas Repantis1, Andreas Baikousis1, Panagiotis Korovessis1

<sup>1</sup>Orthopedic Department of General Hospital of Patras, Patras, Greece

#### P 12

## OSTEOMYELITIS OF A NEGLECTED TH10 B2/AO FRACTURE ACCOMPANIED WITH INCOMPLETE PARAPLEGIA IN A PREVIOUS IMMUNOCOMPETENT PATIENT WITH ANKYLOSING SPONDYLITIS

<u>Ioannis Papaioannou</u><sup>1</sup>, Georgia Pantazidou<sup>2</sup>, Stamatia Chatziperi<sup>1</sup>, Thomas Repantis<sup>1</sup>, Andreas Baikousis<sup>1</sup>, Panagiotis Korovessis<sup>1</sup>

<sup>1</sup>Orthopedic Department of General Hospital of Patras, Patras, Greece

<sup>&</sup>lt;sup>2</sup>Department of Orthopaedic Oncology and Laboratory of Microbiology, Istituto Ortopedico Rizzoli, Bologna, Italy <sup>3</sup>First Department of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, Athens, Greece

<sup>&</sup>lt;sup>2</sup>ENT Department of General Hospital of Patras, Patras, Greece

<sup>&</sup>lt;sup>2</sup>ENT Department of General Hospital of Patras, Patras, Greece



# World Association against Infection in Orthopaedics & Trauma

## WAIOT is the first and the largest worldwide scientific association, focused on bone, joints, biofilms- and implant-related infections.

#### The WAIOT Community

- · Scientific and humanitarian worldwide targets
- Comprehensive website platform based activity
  - Flexible networking structure
  - Inclusive and not exclusive perspective
    - Universal free and open access

1,600 Members from 100 Countries!

https://www.waiot.world/

#### SPEAKERS-MODERATORS

**Agashe Vikas,** Dr, Visiting Orthopedic Surgeon, P.D.Hinduja Hospital, Mahim, Mumbai, Dr. Agashe's Maternity & Surgical Nursing Home, Kurla, Mumbai, India

**Ahmad Alaaeldin Azmi,** Pediatric Orthopedic surgeon, Professor - Palestine Polytechnic University- Palestine, Adjunct professor - University of Toledo-USA, World Orthopedic Concern (WOC) - President-elect, Chair - SICOT spine committee, Palestine

**Al Khawashki Hazem,** Professor, Orthopaedic and Arthroplasty Consultant, Riyadh, Saudi Arabia

**Alizade Chingiz,** Professor, Dr., Dept. of Reconstructive Surgery Azerbaijan Scientific Research Institute of Traumatology & Orthopedics, Baku, Azerbaijan

**Bamba Insa,** Professor, Head of Orthopaedic Surgery Dept, Yopougon Teaching Hospital, Félix Houphouët-Boigny University, Abidjan - Ivory Coast

**Bagaria Vaibhav,** MBBS MS FCPS, Director - Dept Of Orthopedics, Sir HN Reliance Foundation Hospita, President & ND - SICOT Indial, Mumbai, India

**Barredo Ramon,** Head of Orthopaedic Surgery Department Omni Hospital, Guayaquil, Ecuador

**Bari Mofakhkharul,** Professor, Dr., MD, Chief consultant Bari-Ilizarov Orthopaedic Centre, Visiting & Honored Prof. of RISC, RTO

**Benevenia Joseph,** MD, Professor and Chair, Department of Orthopaedic Surgery, Rutgers, New Jersey Medical School, Newark, New Jersey, United States of America

**Benzakour Thami,** MD, Orthopedic Surgeon, Casablanca, WAIOT President, Morocco

**Bo-Eisa Ahmad,** Consultant Pediatric Orthopedic and Deformity Correction Surgeon, Orthopedic Training Program Director, King Fahad Hospital, Hofuf, Saudi Arabia

**Bozhkova Svetlana**, Dr.Med.Sci., Professor of the Department of Traumatology and Orthopedics, Head of the Department of Clinical Pharmacology and Research Department of Prophylaxis and Treatment of Wound Infection Vreden National Medical Research Center of Traumatology and Orthopedics, St. Petersburg, Russia

**Chinoy Muhammad Amin,** FRCS, Dept. Of Trauma and Orthopedics, The Indus Hospital and Health Network, Korangi Crossing, Karachi, Pakistan

**Da Rin de Lorenzo Ferdinando,** Professor, Codivilla - Putti Institutes, Cortina d'Ampezzo, Italy

#### SPEAKERS-MODERATORS

**Del Sel Hernán,** Professor, Dr., Head of Department of Orthopaedics, British Hospital Buenos Aires – Argentina

**Drago Lorenzo,** Professor, Dr., Clinical Microbiology, Dept. of Biomedical Sciences for Health, University of Milan, Milano, Waiot Executive Committee Treasurer, Italy

**Emara Khaled,** Chairman of the SICOT Bone Infection Committee, Professor of Orthopedic Surgery, Ain Shams University Cairo, Egypt

**Erol Bülent,** Professor, Dr., Division of Orthopaedic Surgery, Marmara University Hospital, İstanbul, Turkey

**Fadel Mohamed,** Professor, Dr., Limb Reconstructive Surgery and Correction of Deformity Center (LRS), Nasr City, Cairo, El-Minia University Hospital, Executive Board Member of EOA, ASAMI Egypt Board, Egypt

**Hafez Mahmoud,** MB BCh, MSc.Orth, Dip-SICOT, FRCS Ed, MD, PhD, Ex Co Member of CAOS, WAIOT and IFIA International Societies, Consultant Orthopaedic Surgeon (Locum), NHS, UK, Professor & Head of the Orthopaedic Dept, October 6 University, Cairo, Egypt

**Hantes Michael**, Professor of Orthopaedics, University of Thessaly, Larissa, ESSKA General Secretary, Greece

**Johari N. Ashok,** Director, Paediatric Orthopaedics, Nanavati Super Specialty Hospital, Mumbai, Past President of WAIOT, President of SICOT and Chief Editor of the Journal of Pediatric Orthopaedics, India

**Ndiassé Kassé Amadou,** Professor, Orthopedic Departement, University Cheikh Anta Diop, General Hospital Idrissa Pouye, Dakar, Sénégal

**Kontogeorgakos Vasileios,** MD, Associate Professor of Orthopaedic Surgery, National and Kapodistrian University of Athens, Greece

**Kornah Bahaa Ali,** Professor of Orthopedic Surgery & Traumatology, Al-Azhar University, Cairo, President of AROM Society, Elected Board member of EOA, Chairman of the Scientific Committees for Promotion at Al-Azhar University, Egypt

**Lob Guenter,** Professor, Dr. med. University of Munich, Munich, WAIOT Scientific Committee Chairman, Germany

#### SPEAKERS-MODERATORS

**Malizos N. Konstantinos,** Professor & Chairman Department of Orthopaedic Surgery and Musculoskeletal Trauma, University of Thessaly, Larissa, Greece

**Mavrogenis Andreas**, MD, PhD, Associate Professor of Orthopaedics, National and Kapodistrian University of Athens, School of Medicine, ATTIKON University Hospital, Athens, Greece

**Munhoz Lima Ana Lucia Lei,** Infectious Diseases Doctor, Professor Dr. University of São Paulo, Director of the infections Unit at Orthopaedic and Traumatology Institute of Hospital Das Clínicas - School of Medicine, University of São Paulo, Coordinator of Orthopaedic Infections Committee of Brazilian Infectious Diseases Society, Brazil

**Rajasekaran Shanmuganathan,** Ph.D., Professor Chairman - Department of Orthopaedics and Spine Surgery Ganga Hospital, Coimbatore, AOSpine International Board, Adjunct Professor, Tamilnadu Dr MGR Medical University, Tamil Nadu, India

**Romano Carlo,** Professor, Dr., Orthopaedic Surgeon, Studio Medico Associato, Milano, WAIOT Secretary General, Italy

**Sharma Hemant,** Professor, Dr. of Orthopaedics & Traumatology, Hull University Teaching Hospitals, NHS Trust - Hull, UK

**Simpson Hamish,** Professor of Orthopaedics and Trauma, University of Edinburgh, UK

**Tavakoli Mohsen,** Madani hospital, Alborz University Of Medical Science (ABZUMS), Karaj, President of POTA, Iran

**Tellez Duarte Augustin,** MD, MEBC, Orthopedic Surgeon, Cozumel Quintana Roo, Mexico

**Tsuchiya Hiroyuki,** Professor and Chairman, Department of Orthopedic Surgery, Kanazawa University, Japan

**Winkler Heinz,** Orthopedic Surgeon, Head of the Osteitis Center Döbling Private Clinic, Wien, Austria

#### A

Agapidis Alexios, 17 Agashe Vikas, 7, 15, 17, 22 Ahmadi Milad, 10 Ahmad Alaaeldin Azmi, 4, 7, 22 Al Khawashki Hazem, 5, 6, 7, 8, 12 AlAwlagi F. Mohamed, 18 Alevrogiannis Panayiotis, 20 Aliyev Huseyn, 10, 17 Alizada Farhad, 17 Alizade Chingiz, 5, 7, 10, 12, 17, 22 Amprazis Vasilios, 9 Andriskos Angelos, 17 Antonis Konstantinos, 19 Arachoviti Christina, 19 Arnaoutoglou Christina, 14, 16 Athanaselis Efstratios, 12 Avramidis Emmanouil, 14 Abuomira Ibrahim Elsayed Abdellatif, 15

#### В

Babis George, 14, 15 Bagaria Vaibhav, 6, 7, 9, 22 Baikousis Andreas, 19, 20 Bakagiannis George, 9 Baltas Christos, 12, 14 Bamba Insa, 4, 6, 7, 22 Banios Konstantinos, 9 Barredo Ramon, 7, 22 Barham Guy, 14 Bari Mofakhkharul, 8, 16, 22 Bassir RidaAllah, 13 Battaglia Giulio Antonino, 12 Bavelou Ekaterini, 11, 15 Beebe Kathleen, 13, 15, 18 Begkas Dimitrios, 19 Bekos Achilles, 15, 20 Benevenia Joseph, 4, 5, 8, 13, 15, 18, 22 Benito-Sancho Eloy, 9

Benzakour Thami, 3, 4, 5, 7, 12, 22 Bhadiyadra Ravi, 17 Bianchi Giuseppe, 20 Bo-Eisa Ahmad, 7, 22 Boufetta Moncef, 13 Bozhkova Svetlana, 4, 7, 8, 9, 22 Bozonelos Georgios, 19

#### C

Chatziperi Stamatia, 20 Chatzopoulos Stamatios, 19 Chinoy Muhammad Amin, 7, 22 Criado-Albillos Guillermo, 9

#### D

Da Rin de Lorenzo Ferdinando, 13, 22
Dainotto Tamara, 9
De Oliveira Bonfá Eloisa Silva Dutra, 11
De Paolis Massimiliano, 20
Del Sel Hernán, 4, 5, 8, 9, 12, 23
Delgado-Gonzalez Alberto, 9
Deligeorgis Dimitrios, 9, 12, 13
Drago Lorenzo, 4, 5, 6, 7, 10, 12

#### Ε

Efstathiou Andreas, 15
Elizarov Pavel, 12
El-Rosasy Mahmoud, 17
Emami Mohammadkazem, 14
Emanuel Noam, 16
Emara M. Khaled, 6, 8, 23
Erol Bülent, 7, 23
Errani Costantino, 20

#### F

Fadel Mohamed, 4, 6, 8, 16, 23
Fandridis Emmanouil, 11, 18
Fernandez-Ardura Tamara, 9
Fyllos Apostolos, 12

G Gaggiotti Stéfano. 9 Kabata Tamon, 10 Kajino Yoshitomo, 10 Garayev Farhad, 10 Gavriil Panaviotis, 15, 20 Kalifis George, 9 Georgiades Georgios, 19 Karachalios Theofilos, 9, 12, 13 Kargados Andreas, 19 Georgoulis Jim, 20 Kawamura Demange Marco, 11 Gerasimenko Mikhail. 10 Kawasaki Sachiko, 11 Giannakoupoulos Andreas, 19 Kazemirsky Alexander, 9 Giannitsioti Efthymia, 15, 20 Khaled Abdullah, 17 Gofinet Pasoto Sandra, 11 Kharmaz Mohammed, 13 Gomes Gobbi Riccardo, 11 Khawashki Hazem Al, 22 Gomez Luiz Sérgio Marcelino, 6 Kitridis Dimitrios, 10 Gomez-Urena Eric. 6 Kokkalis Zinon, 11, 15 Gonzalez-Gallego Sergio, 9 Kolonia Konstantina, 9 Gopalan Hitesh, 6 Komnos Georgios, 9, 13, 16 Goulas Vaios, 12 Kontogeorgakos Vasilios, 8, 20, 23 Guinand Luis, 13, 15, 18 Kornah Bahaa Ali, 7, 23 Н Korovessis Panagiotis, 19, 20 Hafez Mahmoud, 4, 6, 8, 23 Koulalis Dimitrios, 20 Koutalos Antonios, 14 Halatsis George, 9 Hantes Michael, 9, 13, 23 Koutis Athanasios, 13 Hassanzadeh Zabih, 14 Kucukdurmaz Fatih, 4, 6 Kukovenko Grigorii, 12 Hidalgo-Bilbao Rodrigo, 9 Kuntwad Vikas, 17 Hikichi Toshifumi, 17, 19 Hillier-Smith Ryan, 14 Laklouk Mohamed, 16 Lamrani Moulay Omar, 13 Imani Abbasali, 14 Lavalette David, 10 Inoue Daisuke, 10 Lazaris Andreas, 20 Ippolito Joseph, 13, 15, 18 Lazrek Omar. 13 Iwata Eiichiro, 11 Leite Chilan Bou Ghosson, 11 Lima Ana Lucia Lei Munhoz, 24 Jain K. Anil, 6 Lob Guenter, 4, 5, 7, 8 Johari N. Ashok, 4, 5, 7, 23 Logoluso Nicola, 13 Jose Morales-Viaji Juan, 9 Lopreite Fernando, 9

Metaxas Lampros, 19
Misaridi Ioanna, 12
Mitrousias Vasileios, 12
Mitsikostas Pantelis, 11, 18
Mody Bimal, 15, 17
Monti Lorenzo, 12
Morelli Ilaria, 5
Moulder Elizabeth, 10
Mpimpilas Dimosthenis, 17
Munhoz Lima Ana Lucia Lei , 8, 11, 24
Murylev Valeriy, 12
Muzychenkov Alexey, 12

#### Ν

Nakajima Hiroshi, 11 Ndiassé Kassé Amadou, 6, 8, 23 Nematy Ali, 14 Nicolaou Marios, 14 Norman Doron, 16

#### 0

Ohmori Takaaki, 10 Okereke Isaac, 13 Okuda Akinori, 11

#### P

Pantazidou Georgia, 19, 20
Panteleev Alexander, 9
Papadakis Christos, 19
Papadopoulos Antonios, 15
Papageorgiou Andreas, 19
Papageorgiou Fotios, 12, 13
Papaioannou Ioannis, 19, 20
Pastroudis Alexandros, 19
Pécora José Ricardo, 11
Pellegrini Antonio Virgilio, 13
Peel Trisha, 6
Pires Leon Elaine, 11
Pneumatikos Spyridon, 11
Preobrazhensky Petr, 9

#### R

Raghuwanshi Sagar, 15
Rajasekaran Shanmuganathan, 7, 24
Raoulis Vasileios, 12
Raptopoulos Dimitrios, 20
Repantis Thomas, 19, 20
Rodrigues Camilla, 15, 17
Romano Delia, 13
Romanò L. Carlo, 5, 7, 8, 12, 24
Rountas Christos, 9

#### c

Salah Berrada Mohamed, 13
Salai Moshe, 16
Sambri Andrea, 20
Sampalli Sridhar Rao, 13, 14
Saridis Alkis, 17
Sarrou Styliani, 9
Scarponi Sara, 5
Semen Alexeev, 12
Sharma K. Hemant, 6, 8
Shetty Anjali, 15, 17

Sakas Antonis, 15

#### **INDEX**

Shigematsu Hideki, 11 Shimokawa Kanu, 17, 19 Sidiropoulos Konstantinos, 10, 17 Simpson Hamish, 4, 7, 24 Sioutis Spyridon, 11, 15, 20 Sitnik Alexandre, 10 Skindilias Ioannis, 15 Skotidis Emmanouil, 19 Soman Rajeev, 15, 17 Soultanis C. Konstantinos, 15 Spyridonos G. Sarantis, 11 Stamoulis Nikolaos, 15 Stavridis Elefterios, 19 Stavropoulos Nikolaos, 14 Stefanou Nikolaos, 12 Stofas Anastasios, 12 Storni Elisa, 20 Suardi Virginia, 13 Suga Yuma, 11 Syngouna A. Sophia, 11, 15, 18 Tanaka Masato, 11 Tanaka Yasuhito, 11 Taninaka Atsushi, 10 Tapalski Dzmitry, 10 Tavakoli Mohsen, 4, 7, 24 Tellez Duarte Augustin, 7, 24 Teles Abdo Rodrigo Calil, 11 Thomson Jennifer, 13, 15, 18 Tiemann Andreas, 5 Tikhilov Rashid, 9 Togias George, 11, 15 Triantafyllopoulos Ioannis, 18 Tsaousis Christos, 12 Tseronis Ilias, 12, 16 Tsikopoulos Konstantinos, 10 Tsiodras Sotirios, 11

Tsourvakas Stefanos, 12

Tsuchiya Hiroyuki, 4, 7, 10, 17, 19, 24 Tsukamoto Shinji, 11 Tyrpenou Evangelos, 14

#### U

Ueoka Ken, 10

#### V

Varitimidis Sokratis, 12, 13, 16 Varsanis Georgios, 16 Vergados Nikolaos, 14 Volotovski Pavel, 10

#### W

Walker Lucy, 13 Winkler Heinz, 5, 8, 12, 13, 24

#### γ

Yamamoto Yusuke, 11 Yamamuro Yuki, 10

#### Z

Zafeiris Evaggelos, 15 Zafiris Ioannis, 20 Ziogkou Anna, 14 Zogakis Panteleimon, 19