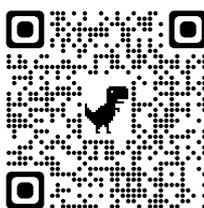


CURRENT RESEARCH TOPICS IN PHARMACY: *Microbiology Debates*

December 14th, 2022 14.00 PM ISTANBUL

FOR REGISTRATION:



First Session- Moderator: Büşra ERTAŞ 14.00-15.45 PM

Welcome- Assoc.Prof.Esra TATAR

Bacteriotherapy – Dr. Zahraa AMER HASHIM
Mosul University, Mosul, Iraq

Antibiotic resistance – Assist.Prof. Pervin RAYAMAN
Marmara University, Istanbul, Turkey

The vaccination in Albania : An assessment of the level of knowledge and behaviour of the population regarding vaccines.- Assoc.Prof. Mirela MIRAÇI
University of Medicine, Tirana, Albania

Chicken contamination with thermotolerant Campylobacter in Tunisia: Antibiotic resistance and virulence profiling –Dr.Awatef BEJAOU
Institut Pasteur de Tunis, Tunis, Tunisia

Second Session- Moderator: Esra TATAR 16.00-17.45 PM

Plant phenolics and their synthetic derivatives as inhibitors of *Helicobacter pylori* : Suggestion for a new mechanism of action -
Assoc.Prof. Simone CARRADORI
"G. d'Annunzio" University of Chieti-Pescara University, Chieti Italy

Pomegranate rind extract with Zn (II) combination as a new therapeutic agent for oral care products- Dr.Vildan ÇELİKSOY
Cardiff University, Cardiff, UK

The antimicrobial effects of honey and other bee-derived products- Dr.Saira KHAN
Cardiff University, Cardiff, UK

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Vice Chairs

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THE ANTIMICROBIAL EFFECTS OF HONEY AND OTHER BEE-DERIVED PRODUCTS

Saira KHAN 

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Honey is a complex, natural substance produced by honeybees (*Apis mellifera*) from the nectar of flowers. Its characteristics vary depending on botanical origin and geographical location.

Honey has been established as an effective antimicrobial and antioxidant for millennia and used for the treatment of surface wounds, burns and inflammation. The initial interest in honey as an antimicrobial therapy decreased upon the discovery and implementation of antibiotics but there is renewed interest due to the alarming rise in the prevalence of antimicrobial-resistant (AMR) organisms.

Propolis is another bee-derived substance produced by honeybees from tree resins, beeswax and pollen. Together with their own salivary secretions, a sticky, solid product is created and used as a coating for beehives. Like honey, the chemical composition of propolis is subjected to the geographical location, botanical origin, and bee species, and both have antibacterial, antiviral, antifungal and anti-inflammatory properties.

In addition to honey and propolis, honeybees produce other products of interest to researchers. These are royal jelly, bee venom, beeswax and bee bread. Bee-derived products can be developed in to alternative antibacterial agents with promising therapeutic potential in the medical setting and their potential as innovative treatments should not be overlooked.

Keywords: Honey, propolis, bee-derived products antimicrobial-resistant (AMR) organisms