

*Editorial*

## II TOXRUN International Congress 2023 | No Boundaries for Toxicology: One Health, One Society, One Planet

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Welcome to the II TOXRUN INTERNATIONAL CONGRESS, 2023 entitled “No Boundaries For Toxicology: One Health, One Society, One Planet. We intend that this event constitutes a space for approximation between professionals who work in life and health sciences and who see Toxicology as a privileged stage for the understanding that there is only “One Health”, as well as an opportunity for technical-scientific updating and debate. Therefore, this welcome Editorial also emphasizes the application of the “One Health” concept to Toxicology and highlights the Mission of TOXRUN for society development.

The interdisciplinary disruptive perspective of modern Toxicology and Pharmacology offers advanced and novel knowledge focused on safety and health risks and on the prevention and mitigation of damages from social- to environment-related pressures on health and wellbeing. A collaborative approach, breaking the virtual illogical boundaries between animal, human, and environmental health, is needed to develop plans for response and control. Particularly, One Health Toxicology, a branch of toxicology, takes a holistic approach to study the effects of toxins and toxics on human, animal, and environmental health following a multidisciplinary methodology [1]. It recognizes that humans, animals, and the environment are all interconnected and that xenobiotics can have a mutual cascading effect on all three. Particularly, TOXRUN is rapidly evolving in the context of a dynamic scientific environment, with strongly committed researchers endowed with a vast research experience as measured for example by their h-indexes and high rate of publication in prestigious peer-reviewed journals, and with very favorable institutional conditions at all levels of the required administrative/organizational/financial processes. In the One Health perspective, TOXRUN intends to encompass the pharmacological and toxicological study of xenobiotics and endobiotics (e.g., pharmaceuticals, pesticides, psychoactive substances) in a fully integrated perspective, from their genesis to their end, but also opening the door to everything that is deleterious to life and sometimes considered far apart, such as psychological conditions involving stress or anxiety, genetic conditions, nutritional/ lifestyle behaviors, environmental factors, among many others. This integrative perspective maximizes all the different scientific backgrounds of our members and the potential for interesting and disruptive research, which often only occurs in the presence of multidisciplinary teams. To reinforce this idea, 4 research lines were outlined with the main objective of having a real and effective impact in decision making at different levels of the society: TL1 – Biomarkers, Drugs Research and Diagnostics; TL2 – Biopsychosocial Risk Factors and Resilience; TL3 – Toxicological, Food and Environmental Safety; TL4 – Real World Data & Evidence and Decision Making.

The II TOXRUN International Congress 2023 aims to provide an enjoyable and successful environment for professionals working in Toxicology and all biomedical- and environmental-related areas to debate technical-scientific updates and share experiences and reflections. This year's Congress is under the theme “NO BOUNDARIES FOR TOXICOLOGY: ONE HEALTH, ONE SOCIETY, ONE PLANET”. A set of

topics that we consider to be timely and of the greatest relevance will be addressed by prestigious personalities who will share their knowledge and research clearly demonstrating the position of Toxicology towards the One Health umbrella. This is a concept that TOXRUN aims to cultivate and obtain scientific outputs. A particularly relevant moment will be the presentation of Poster and Oral Communications on different topics of Toxicology and related areas. After the I TOXRUN International Congress, organized together with Portuguese Association of Forensic Sciences in 2022, this year we decided to jump for the maturity and promote an individual meeting. As proof of TOXRUN vitality, we received 89 submissions, 68 of them were accepted for poster communications and 20 were selected for oral presentations. Our objective was to bring attention to the interdisciplinary perspective of modern Toxicology and to promote awareness and initiatives to build resilient communities and a circular economy. Innovative research directly related to Toxicology (e.g., ecotoxicology, education in toxicology, food toxicology, environmental toxicology, analytical toxicology, clinical toxicology, forensic toxicology, veterinary toxicology, occupational toxicology, toxinology, regulatory toxicology) but also at interface of Biomedical, Biochemistry and Environmental Sciences (e.g., Medicine, Nutrition, Veterinary Medicine, Pharmaceutical Sciences and Forensic Sciences) with cross-cutting issues within the Sustainable Development Goals are within our main focus to increase the strength and recognition of TOXRUN.

In this 2023 congress, we wish to give the first push and discuss Toxicology in a unifying approach to balance and optimize the health of people, animals, and the environment. Finally, and most importantly, I would like to acknowledge the Organizing and Scientific committees for their outstanding collaboration and commitment to organizing a scientific congress with prestigious researchers. I also acknowledge Professor João Soares Carrola for the kind gift in preparing the logo of the congress. My last words go to the Scientific Letters editorial staff for their fruitful collaboration in preparing the book of abstracts.

On 2 and 3 May 2024 we expect to be organizing the III TOXRUN INTERNATIONAL CONGRESS, perusing the objectives of having Toxicology and One Health join to achieve societal impact. All authors with relevant work and sharing the same spirit of this holistic One Health vision for Toxicology will be welcome.

I wish you a pleasant congress,

Cordial greetings

Ricardo Jorge Dinis-Oliveira

*President of the Organizing Committee*

### Further Reading

1. Dinis-Oliveira, R.J. No Boundaries for Toxicology in Clinical Medicine: One Health, One Society and One Planet for All of Us. *J. Clin. Med.* **2023**, *12*, 2808.



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