

**Prof. Ihsan Gursel**, the Director of Izmir Biomedicine and Genome Center (IBG), spent more than thirty years of his career working in different research and government institutes. His research focus is on immunology, vaccinology, nanomedicine, and biomaterials. His research laboratory engaged in activities aiming to understand the immuno-modulatory properties of DNA on mammalian immune system and attempts to develop more effective treatment modalities to cancer, autoimmune, autoinflammatory diseases as well as infectious diseases with an interdisciplinary approach. He supervised more than 45 graduate thesis and published over 90 refereed articles and book chapters. He has received over 10650 citations (H-Factor: 43). He is a full-member of Turkish Academy of Sciences and president-elect of the Turkish Society of Immunology.



### **Seminar: Exosome Detection and Measurement**

The analyses of exosomes in health and disease provides alternative insight that might assist clinicians to develop alternative therapies against illnesses. We will focus on the methods of isolation, characterization and investigation of exosome populations obtained from different biological fluids. This seminar is of interest to both basic, applied and clinical immunologists and cell biologists.

### **Relevant Literature:**

1. S.H Bal, E. Sağdılek, M. Karaçay, M. A. Kızmaz, L. T. Kumaş, F. E. Can, M. Yildirim, T. Canavar-Yildirim, D.Koşay-Gülkaya, D. Yöyen-Ermiş, F. Budak, Y. Heper, **I. Gursel**, H. B. Oral. The Effect of Exosomes Released from Apheresis Platelet Concentrates Under the Impact of Gamma Irradiation and Storage Time upon the Platelet Aggregation and Hemostasis. *Blood Transfusion*, Aug 9. doi: 10.2450/2022.006-22., 2022.
2. Sérgio P Camões, O. Bulut, V. Yazar, M Gaspar, S. Simões, R. Ferreira, R. Vitorino, J M. Santos, **I. Gursel**, JP. Miranda, 3D-MSCs A151 ODN-Loaded Exosomes Are Immunomodulatory And Reveal A Proteomic Cargo That Sustains Wound Resolution, *J. Advanced Research*, (*in press*), 2022.
3. F. Eroglu, V. Yazar, U. Guler, M. Yıldırım, T. Yildirim, T. Gungor, E. Celikkaya, D. Karakaya, N. Turay, E. C. Dede, P. Korkusuz, B. Salih, M. Bulbul, **I. Gursel**, Extracellular vesicles of steroid sensitive nephrotic syndrome patients have higher RAC1 and induce recapitulation of phenotype in podocytes, *Am.J.Physiol-Renal Physiol.*, 321 (5), F659-F673, 2021.
4. M. Yildirim, T.C. Yildirim, N. Turay, T. Bildik, B. Ibibik, I. Evcili, P.G. Ersan, U.M. Tokat, O. Sahin, **I. Gursel**, TLR Ligand Loaded Exosome Mediated Immunotherapy of Established Mammary Tumor In Mice, *Immunol. Letts*, 239:32-41, 2021.

5. T. Kahraman, G. Gucluler, I. Simsek, F. C. Yagci, M. Yildirim, C. Ozen, A. Dinc, M. Gursel, L. Ikromzoda, T. Sutlu, S. Gay, **I. Gursel**, Circulating LL37 targets plasma extracellular vesicles to immune cells and intensifies Behçet's disease severity, *J. Extracellular Vesicles*, 6:1, 1284449, 2017.