Drug Designing: Open Access
ISSN: 2169-0138

Tutar, Drug Des 2016, 5:3
DOI: 10.4172/2169-0138.1000e132

Editor's Note Open Access

Editor's Note

Yusuf Tutar*

Department of Basic Sciences, Biochemistry Division, Cumhuriyet University, Turkey

Drug design is important to improve drugs on the market and to develop innovative compounds. This first paper summarizes current efforts on Heat Shock Proteins. This protein family involves in key metabolic processes and inhibition of them perturbs survival of cancer cells. In this regard, current efforts on Heat Shock Family on designing new inhibitor compounds are discussed [1].

Second paper of the issue discusses Zika Virus. The virus caused a healthcare crisis worldwide. And several groups are working on to solve the molecular mechanism. However, details are elusive and computational drug discovery techniques provide promising approaches for the molecular mechanism. The authors propose docking and molecular dynamic simulation studies as starting point [2]. An interdisciplinary work over the points originated by computational methods will be helpful to determine key pathways.

Effective drug delivery is an important aspect when delivery innovative compounds to their target site. Dr. Thomas group overviews biopolymers based on nanomaterials and hydrogels. Biopolymers biodegradable and biocompatible properties make them convenient to use in living cells and they may not cause reactions due to inflammation or immunological reasons. Nanoparticles have small size and may penetrate host cells easily. Further, the particles circulate in the body. Biopolymer based nanoparticles therefore are great interest for drug carrier purposes. Modification of nanoparticles augments biopolymers efficiency. Hydrogels are another material for drug delivery and the paper provides a brief review on nanoparticles modified biopolymers and hydrogels grafted biomaterials in drug delivery systems [3].

Mediators commonly used in pharmacology and active compounds can be scavenged from the medium by coupling reactions. Laccase function enhancement was mediated by cyanide-bridged Cu(II)-Fe(III) bimetallic complexes and the process was well described by Ogikubo and Akitsu [4].

Kahouli et al. discussed a unique treatment model for colorectal cancer (CRC). Since diet and lifestyle are two key factors in CRC, probiotic regimens have been proposed to be useful for cancer treatment. Therefore, the group isolated *L. reuteri* NCIMB 701359 fatty acid content and short chain fatty acids were found to be effective for anti-cancer activity [5].

Bayesian approach for evaluation of reproducible results in clinical research was elaborated by Chow and Fuyu. Validity and reliability of the data sound if it is reproducible. Valid science is based on assessed reproducibility and the manuscript described a method for this purpose [6].

Last article of the issue covered an imaging technique and its potential employment in cancer treatment. Deep learning application on histopathological images may help breast cancer prognosis and the method is a step to personalized treatment [7].

References

1. Tutar L, Coskun AK, Tutar Y (2016) Structure based drug design for heat shock proteins. Drug Des 5: e130.
2. Cerón-Carrasco JP, Coronado-Parra T, Imbernón-Tudela B, Banegas-Luna AJ, Ghasemi F, et al (2016) Application of computational drug discovery techniques for designing new drugs against zika virus. Drug Des 5: e131.
3. Gopi S, Amalraj A, Thomas S (2016) Effective drug delivery system of biopolymers based on nanomaterials and hydrogels. Drug Des 5: 129.
4. Ogikubo Y, Akitsu T (2016) Enhancing medical or biological functions of laccase by cyanide-bridged Cu(II)-Fe(III) bimetallic complexes madiators. Drug Des 5: 130.
5. Kahouli I, Handiri NR, Malhotra M, Riahi A, Alaoui-Jamali M, et al. (2016) Characterization of *L. reuteri* NCIMB 701359 probiotic features for potential use as a colorectal cancer biotherapeutic by ıdentifying fatty acid profile and anti-proliferative action against colorectal cancer cells. Drug Des 5: 131.
6. Chow SC, Fuyu S (2016) Reproducible clinical research. Drug Des 5: 132.
7. Vaz RJ (2016) Fingerprints, facial recognition and cancer. Drug Des 5: 133.

***Corresponding author:** Yusuf Tutar, Department of Basic Sciences, Biochemistry Division, Cumhuriyet University, Turkey, Tel: +90 346 219 10 10, Ext 3907; E-mail: ytutar@outlook.com

Received September 01, 2016; **Accepted** September 02, 2016; **Published** September 08, 2016

Citation: Tutar Y (2016) Editor's Note. Drug Des 5 : E132. doi:10.4172/2169-0138.1000e132