



Fund “Nauka” Project № 14009 Resume – Competition-based Session 2014:

“Creation of a tissue bank for genomic, transcriptomic and structural studies in the Medical University of Varna”

Project leader: Prof. Anton Bozhidarov Tonchev, MD, PhD, DSc

Project Goals: To build an infrastructure that will allow preservation and long term storage of tissues that will undergo genomic and transcriptomic analysis in four different bases of the MU-Varna

Results:

1. Purchase of storage freezers maintaining -80°C in four bases in MU-Varna (UMHAT “St. Marina” – Varna, SHOGAT “Prof. Dr. D. Stamatov”, Department of Ophthalmology and Visual Sciences, Department of anatomy and cell biology”)
2. Permission to store human tissues, namely brain corneas and internal organs, received after the signing of an informed consent was obtained from Ethics committee. Gathering and storage of the already gathered tissue is still ongoing.
3. Completed dissertations related to the project
 - ❖ Dr. Meglena Angelova – “Analysis of Progenitor Cells during the pallial development of in humans” obtained a PHD in 2015
4. Current doctorates making use the equipment purchased for the ongoing project (beginning 2015/2016)
 - ❖ Dr. Vesselina Mihaleva – “Quantity, distribution and phenotype of newly formed cells in the cerebellum of adult primates” (2015)
 - ❖ Dr. Marin Zhelezov – “Analysis of microglia during the development of the pallium in human primates” (2016)
 - ❖ Dr. Boyan Parvanov – “Localization and characterization of progenitor cells during the prenatal tooth development in humans” (2016)
 - ❖ Dr. Dimo Stoyanov – “The Role of the Transcription Factor Zbtb20 in the interneuron development of the murine neocortex” (2016)
 - ❖ Dr. Radoslav Spassov – “The Role of Transcription Factor Pax6 in the cerebellar development in mammals” (2016)
5. Publications related to the project:
 - ❖ Rostro-caudal gradient in the expression of transcriptional factor SOX2 in the fetal human brain. M Angelova, S Pavlov, V Mihaleva, V Goranova, A Tonchev Varna Medical Forum 4 (1), 10-14; 2015

- ❖ Cellular proliferation in the cortex of postischemic cerebellum by primates. V Mihaleva, V Goranova, M Angelova, S Pavlov, T Yamashima, A Tonchev. Varna Medical Forum 4 (1), 5-9; 2015
- ❖ Rusto-caudal gradient in the expression of transcription factor SOX2 in fetal brain in human. Angelova M, Pavlov S, Mihaleva V, Goranova V, Tonchev A. Varna Medical Forum 4 (1), 94-98; 2015
- ❖ Postischemic effects on adult cerebral cortex cells in primates. Mihaleva V, Goranova B, Angelova M, Pavlov S, Yamashima T, Tonchev A. Varna Medical Forum 4 (1), 89-93; 2015
- ❖ Expression of transcriptional factor COUP-TF1 (NR2F1) in developing occipital cortex in humans. Angelova M, Minkov R, Goranova V, Pavlov S, Michaleva V, Tonchev AB. Scr Sci Med 47 (1), 53-56; 2015
- ❖ Expression of Transcriptional Factor SOX2 in Populations of Cortical Progenitors in Human Fetal Telencephalon. M Angelova, V Goranova, D Marinova, S Pavlov, V Mihaleva, Tonchev AB. Варненски медицински форум (Varna Medical Forum) 3 (2), 5-9; 2014