

Special Issue

Signaling and Cell Migration in Cerebral Cortex Development

Message from the Guest Editor

The six-layered structure of the cerebral cortex consists of neurons born in the ventricular zone, arranged in orderly layers according to the time of their birth date. An accurate understanding of the mechanisms of neuronal migration is fundamental to understanding the development of the neocortex and the pathogenesis of developmental neurological disorders. New neurons are generated in the ventricular zone in the developing cerebrum and then migrate to their final destination to function. Abnormalities in the migration of neurons during development cause abnormalities in the structure and function of the neocortex, leading to a variety of disorders such as epilepsy and developmental disorders. During migration, neurons sense various extracellular environmental signals, including biochemical and mechanical cues, and behave in response to these signals. Gene networks and signaling pathways involved in neuronal migration have been identified using various methods. More recently, it has been shown that the earliest-born subplate neurons in the subplate layer facilitate migration mode conversion in radial neuronal migration.

Guest Editor

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Deadline for manuscript submissions

closed (15 September 2022)



Cells

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Cells has become a solid international scientific journal that is now indexed on SCIE and in other databases. We have successfully introduced a special issues format so that these issues serve as mini-forums in specific areas of cell science. *Cells* encourages researchers to suggest new special issues, serve as special issues editors, and volunteer to be reviewers. Our main focus will remain on cell anatomy and physiology, the structure and function of organelles, cell adhesion and motility, and the regulation of intracellular signaling, growth, differentiation, and aging. We are open to both original research papers and reviews.

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