



# グローバル COE 特別セミナー



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演題：**P2X mediated transmission in neuronal-glia networks**

要旨：

The ATP, discovered in 1929 by Karl Lohman, Cyrus Hartwell Fiske and Yellagapada SubbaRow, acts as an important extracellular signalling molecule. Purinoreceptors, represented by ionotropic P2X and metabotropic P2Y receptors are arguably the most abundant receptors in living tissues and are expressed in neural cells in both peripheral and central nervous system. In the CNS, ATP can be released from synaptic terminals, either on its own or together with other neurotransmitters. Furthermore, ATP also acts as an important mediator in neuronal-glia communications, as glial cells are endowed with numerous ATP receptors, which trigger Ca<sup>2+</sup> signalling events and membrane currents in both macro- and microglia. In addition ATP can be released from astroglial cells thereby acting as a mediator of glial-glia and glial-neuronal signalling.

**Keywords:** Purinoreceptors, synaptic transmission, ATP, neuronal-glia interactions.

日時：平成21年7月23日（木）16:00～17:30

場所：東京大学医学部教育研究棟13階 第5セミナー室



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