

ION Publication List

(2013.01-2013.12)

1. Peng, Y., Hou, Z., and **Yu, X.*** (2013) The kinase activity of EphA4 mediates homeostatic scaling-down of synaptic strength via activation of Cdk5. *Neuropharmacology* 65: 232-243.
2. Miao, S., Chen, R., Ye, J., Tan, G., Li, S., Zhang, J., Jiang, Y., and **Xiong, Z.*** (2013) The angelman syndrome protein Ube3a is required for polarized dendrite morphogenesis in pyramidal neurons. *J. Neurosci.* 33: 327-333.
3. Chen, M., Liu, Y., Wei, L., and **Zhang, M.*** (2013) Parietal cortical neuronal activity is selective for express saccades. *J. Neurosci.* 33: 814-823.
4. Hou, Z., and **Yu, X.*** (2013) Activity-regulated somatostatin expression reduces dendritic spine density and lowers excitatory synaptic transmission via post-synaptic somatostatin receptor 4. *J. Biol. Chem.* 288: 2501-2509.
5. Zhu, Y., and **Yao, H.*** (2013) Modification of visual cortical receptive field induced by natural stimuli. *Cereb. Cortex.* 23: 1923-1932.
6. Shao, W., Zhang, S., Tang, M., Zhang, X., Zhou, Z., Yin, Y., Zhou, Q., Huang, Y., Liu, Y., Wawrousek, E., Chen, T., Li, S., Xu, M., Zhou, J., Hu, G., and **Zhou, J.*** (2013) Suppression of neuroinflammation by astrocytic dopamine D2 receptors via α B-crystallin. *Nature* 494: 90-94.
7. Wang, X., Li, W., Yu, Y., Xiao, X., Cheng, J., Zeng, W., Peng, Z., Zhu, M., and Xu, T.* (2013) Serotonin facilitates peripheral pain sensitivity in a manner that depends on the nonproton ligand sensing domain of ASIC3 channel. *J. Neurosci.* 33: 4265-4279.
8. Zeng, W., Liu, D., Duan, B., Song, X., Wang, X., Wei, D., Jiang, W., Zhu, M., Li, Y., and Xu, T.* (2013) Molecular mechanism of constitutive endocytosis of acid-sensing ion channel 1a and its protective function in acidosis-induced neuronal death. *J. Neurosci.* 33: 7066-7078.
9. Li, P., Zhu, S., Chen, M., Han, C., Xu, H., Hu, J., Fang, Y., and **Lu, H.*** (2013) A motion direction preference map in monkey V4. *Neuron* 78: 376-388.
10. Rasch, M.*, Chen, M., Wu, S., Lu, H., and Roe, A. (2013) Quantitative inference of population response properties across eccentricity from motion-induced maps in macaque V1. *J. Neurophysiol.* 109: 1233-1249.
11. Yang, X., and **Guo, A.*** (2013) Distinct acute zones for visual stimuli in different visual tasks in Drosophila. *PLoS One* 8: e61313.
12. Li, Y., Du, X., and **Du, J.*** (2013) Resting microglia respond to and regulate neuronal activity

in vivo. *Commun. Integr. Biol.* 6: e24493.

13. Zhu, Y., Li, D., Wang, L., Lu, B., Zheng, J., Zhao, S., Zeng, R., and **Xiong, Z.*** (2013) Palmitoylation-dependent CDKL5–PSD-95 interaction regulates synaptic targeting of CDKL5 and dendritic spine development. *Proc. Natl. Acad. Sci. USA.* 110: 9118-9123.
14. Huang, T., Hu, J., Wang, B., Nie, Y., Geng, J., and **Cheng, L.*** (2013) Tlx3 controls cholinergic transmitter and peptide phenotypes in a subset of prenatal sympathetic neurons. *J. Neurosci.* 33: 10667-10675.
15. Liu, P., **Du, J.***, and He, C.* (2013) Developmental pruning of early-stage myelin segments during CNS myelination in vivo. *Cell Res.* 23: 962-964.
16. Gong, J., Wang, Q., and **Wang, Z.*** (2013) NOMPC is likely a key component of Drosophila mechanotransduction channels. *Eur. J. Neurosci.* 38: 2057-2064.
17. Yang, J., Ye, M., Tian, C., Yang, M., Wang, Y., and **Shu, Y.*** (2013) Dopaminergic modulation of axonal potassium channel and action potential waveform in pyramidal neurons of prefrontal cortex. *J. Physiol.* 591: 3233-3251.
18. Liu, Y., Xu, X., Chen, Q., Wang, T., Deng, C., Song, B., Du, J., and **Luo, Z.*** (2013) Myosin Vb controls biogenesis of post-Golgi Rab10 carriers during axon development. *Nat. Commun.* 4: 2005.
19. Feng, S., Li, H., Tai, Y., Huang, J., Su, Y., Abramowitz, J., Zhu, M., Birnbaumer, L.*, and **Wang, Y.*** (2013) Canonical transient receptor potential 3 channels regulate mitochondrial calcium uptake. *Proc. Natl. Acad. Sci. USA.* 110: 11011-11016.
20. Zhou, J., Wen, Y., She, L., Sui, Y., Liu, L., Richards, L., and **Poo, M.*** (2013) Axon position within the corpus callosum determines contralateral cortical projection. *Proc. Natl. Acad. Sci. USA.* 110: E2714-E2723.
21. Li, H., Li, Y., Lei, Z., Wang, K., and **Guo, A.*** (2013) Transformation of odor selectivity from projection neurons to single mushroom body neurons mapped with dual-color calcium imaging. *Proc. Natl. Acad. Sci. USA.* 110: 12084-12089.
22. Zhang, R.*, Zhang, S., and **Du, J.*** (2013) KCC2-dependent subcellular ECl difference of ON-OFF retinal ganglion cells in larval zebrafish. *Front. Neural Circuits* 7: 103.
23. Lei, Z., Chen, K., Li, H., Liu, H., and **Guo, A.*** (2013) The GABA system regulates the sparse coding of odors in the mushroom bodies of Drosophila. *Biochem. Biophys. Res. Commun.* 436: 35-40.
24. Lv, J., Xin, Y., Zhou, W.*, and **Qiu, Z.*** (2013) The epigenetic switches for neural development and psychiatric disorders. *J. Genet. Genomics* 40: 339-346.
25. Huang, J., Ma, P., Ji, S., Zhao, X., Tan, J., Sun, X.*, and Huang, F.* (2013) Age-dependent alterations in the presynaptic active zone in a Drosophila model of Alzheimer's disease.

Neurobiol. Dis. 51: 161-167.

26. Yu, Z., Fang, Q., Xiao, X., Wang, Y., Cai, Y., Cao, H., Hu, G., Chen, Z., Fei, J., **Gong, N.***, and Xu, T.* (2013) GABA transporter-1 deficiency confers schizophrenia-like behavioral phenotypes. *PLoS One* 8: e69883.
27. Wen, J., Yang, H., Zhou, B., Lou, H., and Duan, S.* (2013) β -Catenin is critical for cerebellar foliation and lamination. *PLoS One* 8: e64451.
28. Chen, J., Tan, Z., Zeng, L., Zhang, X., He, Y., Gao, W., Wu, X., Li, Y., Bu, B., Wang, W., and Duan, S.* (2013) Heterosynaptic long-term depression mediated by ATP released from astrocytes. *Glia* 61: 178-191.
29. Li, K., Zhou, T., Liao, L., Yang, Z., Wong, C., Henn, F., Malinow, R., Yates, J., and **Hu, H.*** (2013) β CaMKII in lateral habenula mediates core symptoms of depression. *Science* 341: 1016-1020.
30. Xiao, X., Zhu, M., and Xu, T.* (2013) 2-Guanidine-4-methylquinazoline acts as a novel competitive antagonist of A type γ -aminobutyric acid receptors. *Neuropharmacology* 75: 126-137.
31. Yang, H., Liu, Z., Ma, Y., Zhong, C., Yin, Q., Zhou, C., Shi, L., Cai, Y., Zhao, H., Wang, H., Tang, F., Wang, Y., Zhang, C., Liu, X., Lai, D., Jin, Y.*, **Sun, Q.***, and Li, J.* (2013) Generation of haploid embryonic stem cells from Macaca fascicularis monkey parthenotes. *Cell Res.* 23: 1187-1200.
32. Guijarro, P.*., Wang, Y., Ying, Y., Yao, Y., Jieyi, X., and Yuan, X. (2013) In vivo knock-down of ckit impairs neuronal migration and axonal extension in the cerebral cortex. *Dev. Neurobiol.* 73: 871-887.
33. Xiao, L., Zhang, M., Xing, D., Liang, P.*., and Wu, S.* (2013) Shifted encoding strategy in retinal luminance adaptation: from firing rate to neural correlation. *J. Neurophysiol.* 110: 1793-1803.
34. Lu, T., Chen, R.*., Cox, T., Moldrich, R., Kurniawan, N., Tan, G., Perry, J., Ashworth, A., Bartlett, P., Xu, L., Zhang, J., Lu, B., Wu, M., Shen, Q., Liu, Y., Richards, L., and **Xiong, Z.*** (2013) X-linked microtubule-associated protein, Mid1, regulates axon development. *Proc. Natl. Acad. Sci. USA.* 110: 19131-19136.
35. Li, H., Chen, C., Dou, Y., Wu, H., Liu, Y., Lou, H., Zhang, J., Li, X., Wang, H., and Duan, S.* (2013) P2Y4 receptor-mediated pinocytosis contributes to amyloid beta-induced self-uptake by microglia. *Mol. Cell Biol.* 33: 4282-4293.
36. **Xu, X.*** (2013) Modular genetic control of innate behaviors. *Bioessays* 35: 421-424. (Review)

*** Corresponding Authors**