AOKI’s PUBLICATIONS

Journal Articles (96 accepted, 1 pending) *27 with UGs


C. Aoki, V. Mahadomrongkul, S Fujisawa, R Habersat* and T Shirao. 2007. Chemical and morphological alterations of spines within the hippocampus and entorhinal cortex precede the onset of Alzheimer’s disease pathology in double knock-in mice. J Comp. Neurol. 505: 352-362. DOI 10.1002/cne.21485 PMCID: PMC2844451


T.G. Chowdhury, G.S. Wable, N. A. Sabaliauskas and C. Aoki (2013) Adolescent female C57BL/6 mice with vulnerability to activity-based anorexia exhibit weak inhibitory input onto hippocampal CA1 pyramidal cells, Neuroscience 241: 250-267. PMID: 23523748. (PMCID: PMC3954564)


Geraldine T. Petr, Yan Sun, Natalie M. Frederick, Yun Zhou, Sameer C. Dhamne, Mustafa Q. Hameed, Clive Miranda, Edward A. Bedoya, Kathryn D. Fischer, Weneke Armsen, Niels C. Danbolt, Alexander Rotenberg, Chiye J. Aoki and Paul A. Rosenberg (2014) Conditional deletion of the glutamate transporter GLT-1 reveals that astrocytic GLT-1 protects against fatal epilepsy while neuronal GLT-1 contributes significantly to glutamate uptake into synaptosomes. Submitted in Oct 2014 to J. Neurosci

L. Shah*, Jie Shen and C. Aoki (submitted) Postsynaptic reduction of calcium/calmodulin-dependent protein kinase II (CaMKII) in mice with presenilin conditional double knockout, a model of Alzheimer’s disease, precedes hippocampal neurodegeneration. Submitted in May 2011, undergoing revision
Book Chapters


Abstracts


D. Soni, C. Aoki, M. Yang, PM Black, N Irwin and LI Benowitz. Inosine induces the growth of new corticospinal tract synapses in the injured rat spinal cord. Soc. Neurosci Abstr. 26, #325.9


PJ Shah, DE Goldberg, C Aoki and LI Benowitz. Inosine-enhanced sprouting of intact corticospinal tract (CST) axons into the denervated CST leads to enhanced synapse formation in the adjacent denervated neuropil. Soc Neurosci Abstr 27, #698.17

UV Berger, W Chen, C Aoki, NA Irwin, PA Rosenberg. Expression of mRNA for the glutamate transporter variants GLT-1A and GLT-1b in rat brain. Soc Neurosci Abstr 27 #607.5

R B Levy and C Aoki A possible role for the alpha 7 nicotinic acetylcholine receptor subunit in postsynaptic activation of ASilent@ excitatory synapses (Lacking AMPA receptors) in developing and adult rat S1 cortex. Soc Neurosci Abstr 27 #362.15

W Chen, C Aoki, M Brasch, N Irwin and PA Rosenberg. A variant form of the glutamate transporter GLT1 interacts with the PDZ protein PICK 1 in rat forebrain. Soc for Neurosci Abstract 27, #607.4

C.Aoki, S.Fujisawa (2003) Heterogeneity of synaptic NMDA receptor subunits across populations of neurons within individual layers and across layers of individual neuronal populations. Soc for Neurosci Abstract 28. # 267.8


A.A.Disney, C.Aoki (2003) Nicotinic, but not muscarinic, acetylcholine receptors are expressed by thalamic afferents and their terminals in layer ivc of macaque V1. Soc for Neurosci Abstract 28, # 701.16


C Aoki, Y Sekino, K Hanamura, S Fujisawa, V Mahadomrongkul, Y Ren and T Shirao. Drebrin A is a post-synaptic protein that localizes to the submembranous surface of dendritic growth cones in vivo, prior to the formation of excitatory synapses. Soc for Neuroscience Ann Mtg #612.1


Chiye Aoki, Sho Fujisawa, Nicole Sabaliauskas, Nobuhiko Kojima and T Shirao. 2007. Drebrin A KO results in reduction of APV-induced trafficking of NR2A subunits of NMDA receptors into spines of intact adult cortex Soc for Neuroscience 2007 Annual Meeting


N Sabaliauskas, H Shen, A Stelzer, C Aoki, S Smith and C Aoki 2009. Increased expression of α4 and δ GABA_{A} receptor subunits peri-synaptic to axo-spinous excitatory synapses on CA1 hippocampal pyramidal cells at puberty in female mice: effect on LTP induction. The 2009 Annual Meeting of the Society for Neuroscience. #614.9.

N Sabaliauskas, H Shen, A Stelzer, C Aoki, S Smith and C Aoki 2010. Learning changes across the estrus cycle:Role of GABA-A receptors. The 2010 Annual Meeting of the Society for Neuroscience

C. Aoki, Nicole Sabaliauskas and Sheryl Smith. A4bd GABAA receptor expression in the amygdala of pre-pubertal and pubertal brains of female rodents. The 2010 Annual Meeting of the Society for Neuroscience


G T Gomez, N M Frederick, G Corfas, C Aoki and P A Rosenberg. The contribution of the glutamate transporter GLT-1 expressed in neurons to synaptosomal uptake of glutamate. The 2011 Annual Meeting of the Society for Neuroscience
C. Aoki, N Sabaliauskas, T Chowdhury, J-y Min, AnnaRita Colacino, Kevin Laurino and Nicole S Barbarich-Marsteller. 2011. Pubertal female rats exhibiting activity-based anorexia express elevated levels of GABAA receptor α4 and δ subunits at the plasma membrane of CA1 pyramidal neurons’ dendritic spines. The 2011 Annual Meeting of the Society for Neuroscience #901.02


Mariel Rios, Tara Chowdhury, Nicole Barbarich-Marsteller, C. Aoki. Sholl analysis reveals hypertrophy and atrophy of developing CA1 pyramidal neurons in the hippocampus of pubertal female rats that exhibit activity-based anorexia following three days of food restriction. The 2012 Annual Meeting of the Society for Neuroscience. #774.04

Tara Chowdhury, Robert B. Levy, Nicole Sabaliauskas, Gauri Wable, C. Aoki. Adolescent female C57BL6J mice exhibit activity-based anorexia. The 2012 Annual Meeting of the Society for Neuroscience. #774.05

Gauri Wable, Tara Chowdhury, Nicole sabaliauskas, Nicole Barbarich-Marsteller and C. Aoki. Activity-based anorexia in female pubertal rats increases plasmalemmal expression of alpha4 subunits of GABAA receptors in the dendritic shafts of putative inhibitory neurons in the basolateral amygdala. The 2012 Annual Meeting of the Society for Neuroscience. #774.07

Chiye Aoki, Robert B Levy, and Tara G Chowdhury. Activity-based anorexia induction upon female adolescent rats increases GABA inhibition of CA1 hippocampal pyramidal cells. The 2012 Annual Meeting of the Society for Neuroscience #774.06

Kei Tateyama1, Hermina Nedelescu2,3, Tara Chowdhury4, Gauri Wable4, Gordon Arbuthnott2 and Chiye Aoki4 Noradrenergic fibers in the cerebellar cortex of adolescent female rats become more varicose following 7 days of voluntary wheel running. The 2013 Annual Meeting of the Society for Neuroscience. #543.xx

Chiye Aoki, Gauri Wable, Nicole Sabaliauskas, Tara Chowdhury, Alisa Liu and Nicole Barbarich-Marsteller. The rise of GABA terminals and α4βδ GABA_ARs in the hippocampus confer resilience to activity-based anorexia. The 2013 Annual Meeting of the Society for Neuroscience.


Chiye Aoki, Kei Tateyama, Irene Yu, Jia-Yi Wang, Miles Hsu, Tara G. Chowdhury, and Gauri Wable. Voluntary wheel running exercise by female adolescent rats reduces GABAergic synaptic coverage of the CA1 pyramidal cell bodies and dendrites but the same exercise maintains GABAergic synaptic coverage and increases alpha4-GABARs at spines, if also exposed to and is resilient to food restriction-stress while evoking no change to alpha1-GABARs. The 2014 Annual Meeting of the Society for Neuroscience.

Yi-Wen Chen, Gauri Satish Wable, Tara Gunkali Chowdhury, Chiye Aoki. Adolescent female mice exhibiting activity-based anorexia express elevated inhibitory input onto prefrontal cortical layer V pyramidal cells with axon terminal restructuring that is distinct for ventral versus dorsal subregions. The 2014 Annual Meeting of the Society for Neuroscience.
