

1. Nishida H., Matsuo M., Konishi S., Ohno N., Manni L., Onuma T.A. Germline development during embryogenesis of the larvacean, *Oikopleura dioica*. *Developmental Biology* (2022) DOI:10.1016/j.ydbio.2021.10.009
2. Uno K., Sugimoto N., Sato Y. N-aryl pyrido cyanine derivatives are nuclear and organelle DNA markers for two-photon and super-resolution imaging. *Nature Communications* (2021) DOI:10.1038/s41467-021-23019-w
3. Taki M., Kajiwara K., Yamaguchi E., Sato Y., Yamaguchi S. Fused Thiophene- S, S-dioxide-Based Super-Photostable Fluorescent Marker for Lipid Droplets. *ACS Materials Letters* (2021) DOI:10.1021/acsmaterialslett.0c00451
4. Takahashi T., Zhang H., Otomo K., Okamura Y., Nemoto T. Protocol for constructing an extensive cranial window utilizing a PEO-CYTOP nanosheet for in vivo wide-field imaging of the mouse brain. *STAR Protocols* (2021) DOI:10.1016/j.xpro.2021.100542
5. Song C., Satoh T., Sekiguchi T., Kato K., Murata K. Structural fluctuations of the human proteasome $\alpha 7$ homo-tetradecamer double ring imply the proteasomal α -ring assembly mechanism. *International Journal of Molecular Sciences* (2021) DOI:10.3390/ijms22094519
6. Shinozaki Y., Koizumi S. Potential roles of astrocytes and Müller cells in the pathogenesis of glaucoma. *Journal of Pharmacological Sciences* (2021) DOI:10.1016/j.jphs.2020.12.009
7. Shibata A.C.E., Ueda H.H., Eto K., Onda M., Sato A., Ohba T., Nabekura J., Murakoshi H. Photoactivatable CaMKII induces synaptic plasticity in single synapses. *Nature Communications* (2021) DOI:10.1038/s41467-021-21025-6
8. Oti T., Sakamoto T., Sakamoto H. Systemic effects of oxytocin on male sexual activity via the spinal ejaculation generator in rats. *Communicative and Integrative Biology* (2021) DOI:10.1080/19420889.2021.1902056
9. Nishimoto R., Derouiche S., Eto K., Devעי A., Kashio M., Kimori Y., Matsuoka Y., Morimatsu H., Nabekura J., Tominaga M. Thermosensitive TRPV4 channels mediate temperature-dependent microglia movement. *Proceedings of the National Academy of Sciences of the United States of America* (2021) DOI:10.1073/pnas.2012894118
10. Nagahara S., Takeuchi H., Higashiyama T. Polyspermy Block in the Central Cell During Double Fertilization of *Arabidopsis thaliana*. *Frontiers in Plant Science* (2021) DOI:10.3389/fpls.2020.588700
11. Murayama K., Tomiyama H., Tsuruta S., Ohono A., Kang M., Hasuzawa S., Mizobe T., Kato K., Togao O., Hiwatashi A., Nakao T. Aberrant Resting-State Cerebellar-Cerebral Functional Connectivity in Unmedicated Patients With Obsessive-Compulsive Disorder. *Frontiers in Psychiatry* (2021) DOI:10.3389/fpsy.2021.659616
12. Motomura K., Takeuchi H., Notaguchi M., Tsuchi H., Takeda A., Kinoshita T., Higashiyama T., Maruyama D. Persistent directional growth capability in *Arabidopsis thaliana* pollen tubes after nuclear elimination from the apex. *Nature Communications* (2021) DOI:10.1038/s41467-021-22661-8
13. Itoh M., Terada M., Sugimoto H. The zonula occludens protein family regulates the hepatic barrier system in the murine liver. *Biochimica et Biophysica Acta - Molecular Basis of Disease* (2021) DOI:10.1016/j.bbadis.2020.165994
14. Inoue M., Enomoto M., Yoshimura M., Mizowaki T. Pharmacological inhibition of sodium-calcium exchange activates NADPH oxidase and induces infection-independent NETotic cell death. *Redox Biology* (2021) DOI:10.1016/j.redox.2021.101983
15. Imanishi A., Ichise H., Fan C., Nakagawa Y., Kuwahara K., Sumiyama K., Matsuda M., Terai K. Visualization of Spatially-Controlled Vasospasm by Sympathetic Nerve-Mediated ROCK Activation. *American Journal of Pathology* (2021) DOI:10.1016/j.ajpath.2020.09.012

16. Ichijo R., Kabata M., Kidoya H., Muramatsu F., Ishibashi R., Abe K., Tsutsui K., Kubo H., Iizuka Y., Kitano S., Miyachi H., Kubota Y., Fujiwara H., Sada A., Yamamoto T., Toyoshima F. Vasculature-driven stem cell population coordinates tissue scaling in dynamic organs. *Science Advances* (2021) DOI:10.1126/sciadv.abd2575
17. Hirata E., Shirai K., Kawaoka T., Sato K., Kodama F., Suzuki K. Atg15 in *Saccharomyces cerevisiae* consists of two functionally distinct domains. *Molecular Biology of the Cell* (2021) DOI:10.1091/mbc.E20-07-0500
18. Aoyama-Ishiwatari S., Okazaki T., Iemura S.I., Natsume T., Okada Y., Gotoh Y. NUDT21 links mitochondrial IPS-1 to RLR-containing stress granules and activates host antiviral defense. *Journal of Immunology* (2021) DOI:10.4049/jimmunol.2000306
19. Aoki K., Harada S., Kawaji K., Matsuzawa K., Uchida S., Ikenouchi J. STIM-Orai1 signaling regulates fluidity of cytoplasm during membrane blebbing. *Nature Communications* (2021) DOI:10.1038/s41467-020-20826-5
20. Tanaka T., Ohno N., Osanai Y., Saitoh S., Thai T.Q., Nishimura K., Shinjo T., Takemura S., Tatsumi K., Wanaka A. Large-scale electron microscopic volume imaging of interfascicular oligodendrocytes in the mouse corpus callosum. *Glia* (2021) DOI:10.1002/glia.24055
21. Simankova A., Bizen N., Saitoh S., Shibata S., Ohno N., Abe M., Sakimura K., Takebayashi H. Ddx20, DEAD box helicase 20, is essential for the differentiation of oligodendrocyte and maintenance of myelin gene expression. *Glia* (2021) DOI:10.1002/glia.24058
22. Yamamoto S., Kashimoto R., Furukawa S., Sakamoto H., Satoh A. Nerve-mediated FGF-signaling in the early phase of various organ regeneration. *Journal of Experimental Zoology Part B: Molecular and Developmental Evolution* (2021) DOI:10.1002/jez.b.23093
23. Kohzuma K., Tamaki M., Hikosaka K. Corrected photochemical reflectance index (PRI) is an effective tool for detecting environmental stresses in agricultural crops under light conditions. *Journal of Plant Research* (2021) DOI:10.1007/s10265-021-01316-1
24. Yokote H., Okano K., Toru S. Theory of mind and its neuroanatomical correlates in people with multiple sclerosis. *Multiple Sclerosis and Related Disorders* (2021) DOI:10.1016/j.msard.2021.103156
25. Higashiyama Y., Hamada T., Saito A., Morihara K., Okamoto M., Kimura K., Joki H., Kishida H., Doi H., Ueda N., Takeuchi H., Tanaka F. Neural mechanisms of foreign accent syndrome: Lesion and network analysis. *NeuroImage: Clinical* (2021) DOI:10.1016/j.nicl.2021.102760
26. Sasabayashi D., Takayanagi Y., Takahashi T., Nishiyama S., Mizukami Y., Katagiri N., Tsujino N., Nemoto T., Sakuma A., Katsura M., Ohmuro N., Okada N., Tada M., Suga M., Maikusa N., Koike S., Furuichi A., Kido M., Noguchi K., Yamasue H., Matsumoto K., Mizuno M., Kasai K., Suzuki M. Reduced cortical thickness of the paracentral lobule in at-risk mental state individuals with poor 1-year functional outcomes. *Translational Psychiatry* (2021) DOI:10.1038/s41398-021-01516-2
27. Takanezawa S., Saitou T., Imamura T. Wide field light-sheet microscopy with lens-axicon controlled two-photon Bessel beam illumination. *Nature Communications* (2021) DOI:10.1038/s41467-021-23249-y
28. Hirooka A., Hamada M., Fujiyama D., Takanami K., Kobayashi Y., Oti T., Katayama Y., Sakamoto T., Sakamoto H. The gastrin-releasing peptide/bombesin system revisited by a reverse-evolutionary study considering *Xenopus*. *Scientific Reports* (2021) DOI:10.1038/s41598-021-92528-x

29. Ueba Y., Murakami T., Yamamoto T., Kuroe A., Yamasaki M., Kaneda D., Otani D., Kiyobayashi S., Ikeda K., Yabe D., Ogura M., Inagaki N. Voxel-based specific regional analysis system for Alzheimer's disease utility as a screening tool for unrecognized cognitive dysfunction of elderly patients in diabetes outpatient clinics: Multicenter retrospective exploratory study. *Journal of Diabetes Investigation* (2021) DOI:10.1111/jdi.13622
30. Yamashita A., Sakai Y., Yamada T., Yahata N., Kunimatsu A., Okada N., Itahashi T., Hashimoto R., Mizuta H., Ichikawa N., Takamura M., Okada G., Yamagata H., Harada K., Matsuo K., Tanaka S.C., Kawato M., Kasai K., Kato N., Takahashi H., Okamoto Y., Yamashita O., Imamizu H. Common Brain Networks Between Major Depressive-Disorder Diagnosis and Symptoms of Depression That Are Validated for Independent Cohorts. *Frontiers in Psychiatry* (2021) DOI:10.3389/fpsyt.2021.667881
31. Kimura T., Haga K., Nomura Y., Higaki T., Nakagami H., Sakai T. Phosphorylation of NONPHOTOTROPIC HYPOCOTYL3 Affects Photosensory Adaptation During the Phototropic Response. *Plant Physiology* (2021) DOI:10.1093/plphys/kiab281
32. Oti T., Ueda R., Kumagai R., Nagafuchi J., Ito T., Sakamoto T., Kondo Y., Sakamoto H. Sexual experience induces the expression of gastrin-releasing peptide and oxytocin receptors in the spinal ejaculation generator in rats. *International Journal of Molecular Sciences* (2021) DOI:10.3390/ijms221910362
33. Hamada T., Higashiyama Y., Saito A., Morihara K., Landin-Romero R., Okamoto M., Kimura K., Miyaji Y., Joki H., Kishida H., Doi H., Ueda N., Takeuchi H., Tanaka F. Qualitative Deficits in Verbal Fluency in Parkinson's Disease with Mild Cognitive Impairment: A Clinical and Neuroimaging Study. *Journal of Parkinsons Disease* (2021) DOI:10.3233/jpd-202473
34. Saito H., Matsukawa-Usami F., Fujimori T., Kimura T., Ide T., Yamamoto T., Shibata T., Onoue K., Okayama S., Yonemura S., Misaki K., Soba Y., Kakui Y., Sato M., Toya M., Takeichi M. Tracheal motile cilia in mice require CAMSAP3 for the formation of central microtubule pair and coordinated beating. *Molecular Biology of the Cell* (2021) DOI:10.1091/mbc.E21-06-0303
35. Ishii H., Otomo K., Takahashi T., Yamaguchi K., Nemoto T. Focusing new light on brain functions: multiphoton microscopy for deep and super-resolution imaging. *Neuroscience Research* (2021) DOI:10.1016/j.neures.2021.11.011
36. Ueda H.H., Nagasawa Y., Murakoshi H. Imaging intracellular protein interactions/activity in neurons using 2-photon fluorescence lifetime imaging microscopy. *Neuroscience Research* (2021) DOI:10.1016/j.neures.2021.10.004
37. Takazaki H., Kusumoto T., Ishibashi W., Yasunaga T., Sakamoto J. Extended supercomplex contains type-II NADH dehydrogenase, cytochrome bcc complex, and aa3 oxidase in the respiratory chain of *Corynebacterium glutamicum*. *Journal of Bioscience and Bioengineering* (2021) DOI:10.1016/j.jbiosc.2021.10.004
38. Takei N., Sato K., Takada Y., Iyyappan R., Susor A., Yamamoto T., Kotani T. Tdrd3 regulates the progression of meiosis II through translational control of Emi2 mRNA in mouse oocytes. *Current Research in Cell Biology* (2021) DOI:10.1016/j.crcbio.2021.100009
39. Hirata T., Tohsato Y., Itoga H., Shioi G., Kiyonari H., Oka S., Fujimori T., Onami S. NeuroGT: A brain atlas of neurogenic tagging CreER drivers for birthdate-based classification and manipulation of mouse neurons. *Cell Reports Methods* (2021) DOI:https://doi.org/10.1016/j.crmeth.2021.100012
40. Ogino Y., Kawamichi H., Takizawa D., Sugawara S.K., Hamano Y.H., Fukunaga M., Toyoda K., Watanabe Y., Abe O., Sadato N., Saito S., Furui S. Enhanced structural connectivity within the motor loop in professional boxers prior to a match. *Scientific Reports* (2021) DOI:10.1038/s41598-021-88368-4

41. Hasebe A., Saeki A., Shibata K.I. Lipoprotein Extraction from Microbial Membrane and Lipoprotein/Lipopeptide Transfection into Mammalian Cells. *Methods in Molecular Biology* (2021) DOI:10.1007/978-1-0716-0939-2_19
42. Shimizu T., Murakoshi H., Matsumoto H., Ichino K., Hattori A., Ueno S., Ishida A., Tajiri N., Hida H. Tension Sensor Based on Fluorescence Resonance Energy Transfer Reveals Fiber Diameter-Dependent Mechanical Factors During Myelination. *Frontiers in Cellular Neuroscience* (2021) DOI:10.3389/fncel.2021.685044
43. Matsumoto H., Kimata Y., Higaki T., Higashiyama T., Ueda M. Dynamic Rearrangement and Directional Migration of Tubular Vacuoles are Required for the Asymmetric Division of the Arabidopsis Zygote. *Plant and Cell Physiology* (2021) DOI:10.1093/pcp/pcab075
44. Mori Y., Takenaka K.I., Fukazawa Y., Takamori S. The endosomal Q-SNARE, Syntaxin 7, defines a rapidly replenishing synaptic vesicle recycling pool in hippocampal neurons. *Communications Biology* (2021) DOI:10.1038/s42003-021-02512-4
45. Yoshii T., Oki C., Watahiki R., Nakamura A., Tahara K., Kuwata K., Furuta T., Tsukiji S. Chemo-optogenetic Protein Translocation System Using a Photoactivatable Self-Localizing Ligand. *ACS Chemical Biology* (2021) DOI:10.1021/acscchembio.1c00416
46. Matsuo K., Tamaoki N. Rational design and development of a lit-active photoswitchable inhibitor targeting CENP-E. *Organic & Biomolecular Chemistry* (2021) DOI:10.1039/d1ob01332g
47. Kutomi O., Yamamoto R., Hirose K., Mizuno K., Nakagiri Y., Imai H., Noga A., Obbineni J.M., Zimmermann N., Nakajima M., Shibata D., Shibata M., Shiba K., Kita M., Kigoshi H., Tanaka Y., Yamasaki Y., Asahina Y., Song C., Nomura M., Nomura M., Nakajima A., Nakachi M., Yamada L., Nakazawa S., Sawada H., Murata K., Mitsuoka K., Ishikawa T., Wakabayashi K.I., Kon T., Inaba K. A dynein-associated photoreceptor protein prevents ciliary acclimation to blue light. *Science Advances* (2021) DOI:10.1126/sciadv.abf3621
48. Saito A.C., Higashi T., Fukazawa Y., Otani T., Tauchi M., Higashi A.Y., Furuse M., Chiba H. Occludin and tricellulin facilitate formation of anastomosing tight-junction strand network to improve barrier function. *Molecular Biology of the Cell* (2021) DOI:10.1091/mbc.E20-07-0464
49. Yuizumi N., Harada Y., Kuniya T., Sunabori T., Koike M., Wakabayashi M., Ishihama Y., Suzuki Y., Kawaguchi D., Gotoh Y. Maintenance of neural stem-progenitor cells by the lysosomal biosynthesis regulators TFEB and TFE3 in the embryonic mouse telencephalon. *Stem Cells* (2021) DOI:10.1002/stem.3359
50. Usami F.M., Arata M., Shi D., Oka S., Higuchi Y., Tissir F., Takeichi M., Fujimori T. Intercellular and intracellular cilia orientation is coordinated by CELSR1 and CAMSAP3 in oviduct multi-ciliated cells. *Journal of Cell Science* (2021) DOI:10.1242/jcs.257006

51. Group E.C.H.R.f.P.W., Jalbrzikowski M., Hayes R.A., Wood S.J., Nordholm D., Zhou J.H., Fusar-Poli P., Uhlhaas P.J., Takahashi T., Sugranyes G., Kwak Y.B., Mathalon D.H., Katagiri N., Hooker C.I., Smigielski L., Colibazzi T., Via E., Tang J., Koike S., Rasser P.E., Michel C., Lebedeva I., Hegelstad W.T.V., de la Fuente-Sandoval C., Waltz J.A., Mizrahi R., Corcoran C.M., Resch F., Tamnes C.K., Haas S.S., Lemmers-Jansen I.L.J., Agartz I., Allen P., Amminger G.P., Andreassen O.A., Atkinson K., Bachman P., Baeza I., Baldwin H., Bartholomeusz C.F., Borgwardt S., Catalano S., Chee M.W.L., Chen X., Cho K.I.K., Cooper R.E., Croypley V.L., Dolz M., Ebdrup B.H., Fortea A., Glenthøj L.B., Glenthøj B.Y., de Haan L., Hamilton H.K., Harris M.A., Haut K.M., He Y., Heekeren K., Heinz A., Hubl D., Hwang W.J., Kaess M., Kasai K., Kim M., Kindler J., Klaunig M.J., Koppel A., Kristensen T.D., Kwon J.S., Lawrie S.M., Lee J., Leon-Ortiz P., Lin A., Loewy R.L., Ma X., McGorry P., McGuire P., Mizuno M., Moller P., Moncada-Habib T., Munoz-Samons D., Nelson B., Nemoto T., Nordentoft M., Omelchenko M.A., Oppedal K., Ouyang L., Pantelis C., Pariente J.C., Raghava J.M., Reyes-Madrigal F., Roach B.J., Rossberg J.I., Rössler W., Salisbury D.F., Sasabayashi D., Schall U., Schiffman J., Schlagenhaut F., Schmidt A., Sorensen M.E., Suzuki M., Theodoridou A., Tomyshev A.S., Tor J., Vaernes T.G., Velakoulis D., Venegoni G.D., Vinogradov S., Wenneberg C., Westlye L.T., Yamasue H., Yuan L., Yung A.R., van Amelsvoort T., Turner J.A., van Erp T.G.M., Thompson P.M., Hernaus D. Association of Structural Magnetic Resonance Imaging Measures With Psychosis Onset in Individuals at Clinical High Risk for Developing Psychosis: An ENIGMA Working Group Mega-analysis. *JAMA Psychiatry* (2021) DOI:10.1001/jamapsychiatry.2021.0638
52. Suzuki T., Hayashi M., Komatsu T., Tanioka A., Nagasawa M., Tanimura-Inagaki K., Rahman M.S., Masuda S., Yusa K., Sakai J., Shibata H., Inagaki T. Measurement of the nuclear concentration of alpha-ketoglutarate during adipocyte differentiation by using a fluorescence resonance energy transfer-based biosensor with nuclear localization signals. *Endocrine Journal* (2021) DOI:10.1507/endocrj.EJ21-0255
53. Andica C., Kamagata K., Saito Y., Uchida W., Fujita S., Hagiwara A., Akashi T., Wada A., Ogawa T., Hatano T., Hattori N., Aoki S. Fiber-specific white matter alterations in early-stage tremor-dominant Parkinson's disease. *Npj Parkinsons Disease* (2021) DOI:10.1038/s41531-021-00197-4
54. Sugihara Y., Inai N., Taki M., Baumgartner T., Kawakami R., Saitou T., Imamura T., Yanai T., Yamaguchi S. Donor–acceptor–acceptor-type near-infrared fluorophores that contain dithienophosphole oxide and boryl groups: effect of the boryl group on the nonradiative decay. *Chemical Science* (2021) DOI:10.1039/D1SC00827G
55. Nishida H., Ohno N., Caicci F., Manni L. 3D reconstruction of structures of hatched larva and young juvenile of the larvacean *Oikopleura dioica* using SBF-SEM. *Scientific Reports* (2021) DOI:10.1038/s41598-021-83706-y
56. Takezaki M., Kawakami R., Onishi S., Suzuki Y., Kawamata J., Imamura T., Hadano S., Watanabe S., Niko Y. Integrated Fluorescent Nanoprobe Design for High-Speed In Vivo Two-Photon Microscopic Imaging of Deep-Brain Vasculature in Mice. *Advanced Functional Materials* (2021) DOI:10.1002/adfm.202010698
57. Vergara P., Kumar D., Srinivasan S., Koyanagi I., Naoi T., Singh S., Sakaguchi M. Remapping of Adult-Born Neuron Activity during Fear Memory Consolidation in Mice. *International Journal of Molecular Sciences* (2021) DOI:10.3390/ijms22062874
58. Ogawa T., Matsumura Y. Revealing 3D structure of gluten in wheat dough by optical clearing imaging. *Nature Communications* (2021) DOI:10.1038/s41467-021-22019-0
59. Murakami M., Kawakami R., Niko Y., Tsuda T., Yatsuzuka K., Mori H., Imamura T., Sayama K. New fluorescent three-dimensional and deep-imaging technique confirms a direct relationship between the acrosyringium and vesicles/pustules of palmoplantar pustulosis. *Journal of Dermatological Science* (2021) DOI:10.1016/j.jdermsci.2021.03.004

60. Carrier-Ruiz A., Sugaya Y., Kumar D., Vergara P., Koyanagi I., Srinivasan S., Naoi T., Kano M., Sakaguchi M. Calcium imaging of adult-born neurons in freely moving mice. *STAR Protoc* (2021) DOI:10.1016/j.xpro.2020.100238
61. Uta D., Oti T., Sakamoto T., Sakamoto H. In vivo electrophysiology of peptidergic neurons in deep layers of the lumbar spinal cord after optogenetic stimulation of hypothalamic paraventricular oxytocin neurons in rats. *International Journal of Molecular Sciences* (2021) DOI:10.3390/ijms22073400
62. Hoshikawa E., Sato T., Haga K., Suzuki A., Kobayashi R., Tabeta K., Izumi K. Cells/clony motion of oral keratinocytes determined by non-invasive and quantitative measurement using optical flow predicts epithelial regenerative capacity. *Scientific Reports* (2021) DOI:10.1038/s41598-021-89073-y
63. Kato T., Manabe R., Igarashi H., Kametani F., Hirokawa S., Sekine Y., Fujita N., Saito S., Kawashima Y., Hatano Y., Ando S., Nozaki H., Sugai A., Uemura M., Fukunaga M., Sato T., Koyama A., Saito R., Sugie A., Toyoshima Y., Kawata H., Murayama S., Matsumoto M., Kakita A., Hasegawa M., Ihara M., Kanazawa M., Nishizawa M., Tsuji S., Onodera O. Candesartan prevents arteriopathy progression in cerebral autosomal recessive arteriopathy with subcortical infarcts and model. *Journal of Clinical Investigation* (2021) DOI:10.1172/jci140555
64. Oda Y., Takahashi C., Harada S., Nakamura S., Sun D.X., Kiso K., Urata Y., Miyachi H., Fujiyoshi Y., Honigsmann A., Uchida S., Ishihama Y., Toyoshima F. Discovery of anti-inflammatory physiological peptides that promote tissue repair by reinforcing epithelial barrier formation. *Science Advances* (2021) DOI:10.1126/sciadv.abj6895
65. Hamada K., Shinozaki Y., Namekata K., Matsumoto M., Ohno N., Segawa T., Kashiwagi K., Harada T., Koizumi S. Loss of P2Y(1) receptors triggers glaucoma-like pathology in mice. *British Journal of Pharmacology* (2021) DOI:10.1111/bph.15637
66. Matsuo K., Thayyil S., Kawaguchi M., Nakagawa H., Tamaoki N. A visible light-controllable Rho kinase inhibitor based on a photochromic phenylazothiazole. *Chemical Communications* (2021) DOI:10.1039/d1cc04905d
67. Okada N., Yamamoto Y., Yahata N., Morita S., Koshiyama D., Morita K., Sawada K., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Koike S., Araki T., Kano Y., Endo K., Yamasaki S., Ando S., Nishida A., Hiraiwa-Hasegawa M., Yokoyama C., Kasai K. Birth order and prosociality in the early adolescent brain. *Scientific Reports* (2021) DOI:10.1038/s41598-021-01146-0
68. Maikusa N., Zhu Y.H., Uematsu A., Yamashita A., Saotome K., Okada N., Kasai K., Okanoya K., Yamashita O., Tanaka S.C., Koike S. Comparison of traveling-subject and ComBat harmonization methods for assessing structural brain characteristics. *Human Brain Mapping* (2021) DOI:10.1002/hbm.25615
69. Satrialdi, Takano Y., Hirata E., Ushijima N., Harashima H., Yamada Y. An effective in vivo mitochondria-targeting nanocarrier combined with a pi-extended porphyrin-type photosensitizer. *Nanoscale Advances* (2021) DOI:10.1039/d1na00427a
70. Kowada R., Kodani A., Ida H., Yamaguchi M., Lee I.S., Okada Y., Yoshida H. The function of Scox in glial cells is essential for locomotive ability in Drosophila. *Scientific Reports* (2021) DOI:10.1038/s41598-021-00663-2
71. Ageta-Ishihara N., Kinoshita M. Developmental and postdevelopmental roles of septins in the brain*. *Neuroscience Research* (2021) DOI:10.1016/j.neures.2020.08.006

72. Otubo A., Maejima S., Oti T., Satoh K., Ueda Y., Morris J.F., Sakamoto T., Sakamoto H. Immunolectron Microscopic Characterization of Vasopressin-Producing Neurons in the Hypothalamo-Pituitary Axis of Non-Human Primates by Use of Formaldehyde-Fixed Tissues Stored at -25 degrees C for Several Years. *International Journal of Molecular Sciences* (2021) DOI:10.3390/ijms22179180
73. He J.Z., Yamamoto M., Sumiyama K., Konagaya Y., Terai K., Matsuda M., Sato S. Two-photon AMPK and ATP imaging reveals the bias between rods and cones in glycolysis utility. *FASEB Journal* (2021) DOI:10.1096/fj.202101121R
74. Yoshimi Y., Hara K., Yoshimura M., Tanaka N., Higaki T., Tsumuraya Y., Kotake T. Expression of a fungal exo- β -1,3-galactanase in *Arabidopsis* reveals a role of type II arabinogalactans in the regulation of cell shape. *Journal of Experimental Botany* (2020) DOI:10.1093/jxb/eraa236
75. Yoshida T., Matsuda M., Hirashima T. Incoherent Feedforward Regulation via Sox9 and ERK Underpins Mouse Tracheal Cartilage Development. *Frontiers in Cell and Developmental Biology* (2020) DOI:10.3389/fcell.2020.585640
76. Yamamoto S., Yamamoto M., Nakamura J., Mii A., Yamamoto S., Takahashi M., Kaneko K., Uchino E., Sato Y., Fukuma S., Imamura H., Matsuda M., Yanagita M. Spatiotemporal ATP Dynamics during AKI Predict Renal Prognosis. *Journal of the American Society of Nephrology* (2020) DOI:10.1681/ASN.2020050580
77. Yagi-Utsumi M., Sikdar A., Song C., Park J., Inoue R., Watanabe H., Burton-Smith R.N., Kozai T., Suzuki T., Kodama A., Ishii K., Yagi H., Satoh T., Uchiyama S., Uchihashi T., Joo K., Lee J., Sugiyama M., Murata K., Kato K. Supramolecular tholos-like architecture constituted by archaeal proteins without functional annotation. *Scientific Reports* (2020) DOI:10.1038/s41598-020-58371-2
78. Yagi H., Yagi-Utsumi M., Honda R., Ohta Y., Saito T., Nishio M., Ninagawa S., Suzuki K., Anzai T., Kamiya Y., Aoki K., Nakanishi M., Satoh T., Kato K. Improved secretion of glycoproteins using an N-glycan-restricted passport sequence tag recognized by cargo receptor. *Nature Communications* (2020) DOI:10.1038/s41467-020-15192-1
79. Watabe T., Terai K., Sumiyama K., Matsuda M. Booster, a Red-Shifted Genetically Encoded Förster Resonance Energy Transfer (FRET) Biosensor Compatible with Cyan Fluorescent Protein/Yellow Fluorescent Protein-Based FRET Biosensors and Blue Light-Responsive Optogenetic Tools. *ACS Sensors* (2020) DOI:10.1021/acssensors.9b01941
80. Tokumoto S., Yabe D., Tatsuoka H., Usui R., Fauzi M., Botagarova A., Goto H., Herrera P.L., Ogura M., Inagaki N. Generation and characterization of a novel mouse model that allows spatiotemporal quantification of pancreatic β -cell proliferation. *Diabetes* (2020) DOI:10.2337/db20-0290
81. Tamura Y., Shimoji K., Ishikawa J., Tachibana A., Koder R., Oba K., Toyoshima K., Chiba Y., Tokumaru A.M., Araki A. Associations between sarcopenia and white matter alterations in older adults with diabetes mellitus: A diffusion tensor imaging study. *Journal of Diabetes Investigation* (2020) DOI:10.1111/jdi.13379
82. Takei N., Takada Y., Kawamura S., Sato K., Saitoh A., Bormann J., Yuen W.S., Carroll J., Kotani T. Changes in subcellular structures and states of pumilio 1 regulate the translation of target Mad2 and cyclin B1 mRNAs. *Journal of Cell Science* (2020) DOI:10.1242/jcs.249128
83. Takechi K., Nagase H., Furuya T., Hattori K., Sato Y., Miyajima K., Higuchi T., Matsuda R., Takio S., Tsukaya H., Takano H. Two atypical AUGUSTIFOLIA without a plant-specific C-terminus regulate gametophore and sporophyte shapes in the moss *Physcomitrium* (*Physcomitrella*) patens. *The Plant Journal* (2020) DOI:10.1111/tj.15121

84. Takahashi T., Zhang H., Kawakami R., Yarinome K., Agetsuma M., Nabekura J., Otomo K., Okamura Y., Nemoto T. PEO-CYTOP Fluoropolymer Nanosheets as a Novel Open-Skull Window for Imaging of the Living Mouse Brain. *iScience* (2020) DOI:10.1016/j.isci.2020.101579
85. Tachibana Y., Hagiwara A., Hori M., Kershaw J., Nakazawa M., Omatsu T., Kishimoto R., Yokoyama K., Hattori N., Aoki S., Higashi T., Obata T. The utility of a convolutional neural network for generating a myelin volume index map from rapid simultaneous relaxometry imaging. *Magnetic Resonance in Medical Sciences* (2020) DOI:10.2463/mrms.mp.2019-0075
86. Suzuki K., Elegheert J., Song I., Sasakura H., Senkov O., Matsuda K., Kakegawa W., Clayton A.J., Chang V.T., Ferrer-Ferrer M., Miura E., Kaushik R., Ikeno M., Morioka Y., Takeuchi Y., Shimada T., Otsuka S., Stoyanov S., Watanabe M., Takeuchi K., Dityatev A., Radu Aricescu A., Yuzaki M. A synthetic synaptic organizer protein restores glutamatergic neuronal circuits. *Science* (2020) DOI:10.1126/science.abb4853
87. Sato S., Yamashita T., Matsuda M. Rhodopsin-mediated light-off-induced protein kinase A activation in mouse rod photoreceptor cells. *Proceedings of the National Academy of Sciences of the United States of America* (2020) DOI:10.1073/pnas.2009164117
88. Sakano D., Inoue A., Enomoto T., Imasaka M., Okada S., Yokota M., Koike M., Araki K., Kume S. Insulin2 Q104del (Kuma) mutant mice develop diabetes with dominant inheritance. *Scientific Reports* (2020) DOI:10.1038/s41598-020-68987-z
89. Sakamoto Y., Sato M., Sato Y., Harada A., Suzuki T., Goto C., Tamura K., Toyooka K., Kimura H., Ohkawa Y., Hara-Nishimura I., Takagi S., Matsunaga S. Subnuclear gene positioning through lamina association affects copper tolerance. *Nature Communications* (2020) DOI:10.1038/s41467-020-19621-z
90. Saito J., Nemoto T., Katagiri N., Hori M., Tagata H., Funatogawa T., Yamaguchi T., Tsujino N., Mizuno M. Can reduced leftward asymmetry of white matter integrity be a marker of transition to psychosis in at-risk mental state? *Asian Journal of Psychiatry* (2020) DOI:10.1016/j.ajp.2020.102450
91. Saeki A., Tsuchiya K., Suda T., Into T., Hasebe A., Suzuki T., Shibata K.I. Gasdermin D-independent release of interleukin-1 β by living macrophages in response to mycoplasmal lipoproteins and lipopeptides. *Immunology* (2020) DOI:10.1111/imm.13230
92. Oti T., Satoh K., Uta D., Nagafuchi J., Tateishi S., Ueda R., Takanami K., Young L.J., Galione A., Morris J.F., Sakamoto T., Sakamoto H. Oxytocin Influences Male Sexual Activity via Non-synaptic Axonal Release in the Spinal Cord. *Current Biology* (2020) DOI:10.1016/j.cub.2020.09.089
93. Okada N., Yahata N., Koshiyama D., Morita K., Sawada K., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Koike S., Araki T., Kano Y., Endo K., Yamasaki S., Ando S., Nishida A., Hiraiwa-Hasegawa M., Kasai K. Smaller anterior subgenual cingulate volume mediates the effect of girls' early sexual maturation on negative psychobehavioral outcome. *NeuroImage* (2020) DOI:10.1016/j.neuroimage.2019.116478
94. Okada N., Yahata N., Koshiyama D., Morita K., Sawada K., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Koike S., Araki T., Kano Y., Endo K., Yamasaki S., Ando S., Nishida A., Hiraiwa-Hasegawa M., Edden R.A.E., Sawa A., Kasai K. Neurometabolic underpinning of the intergenerational transmission of prosociality. *NeuroImage* (2020) DOI:10.1016/j.neuroimage.2020.116965
95. Nagai M., Saitoh S., Takaki T., Ohbayashi T., Hotta O., Ohno N., Joh K. Glomerular Cellular Interactions Following Disruption of the Glomerular Basement Membrane in IgA Nephropathy: Ultrastructural Analyses by 3-Dimensional Serial Block-Face Scanning Electron Microscopy. *Kidney Medicine* (2020) DOI:10.1016/j.xkme.2019.11.003

96. Murakami M., Kawakami R., Niko Y., Tsuda T., Mori H., Yatsuzuka K., Imamura T., Sayama K. High-quality Fluorescence Imaging of the Human Acrosyringium Using a Transparency: Enhancing Technique and an Improved, Fluorescent Solvatochromic Pyrene Probe. *Acta Histochemica et Cytochemica* (2020) DOI:10.1267/ahc.20-00020
97. Morita R., Onuma T.A., Manni L., Ohno N., Nishida H. Mouth opening is mediated by separation of dorsal and ventral daughter cells of the lip precursor cells in the larvacean, *Oikopleura dioica*. *Development Genes and Evolution* (2020) DOI:10.1007/s00427-020-00667-4
98. Miyata T., Hagiwara D., Hodai Y., Miwata T., Kawaguchi Y., Kurimoto J., Ozaki H., Mitsumoto K., Takagi H., Suga H., Kobayashi T., Sugiyama M., Onoue T., Ito Y., Iwama S., Banno R., Matsumoto M., Kawakami N., Ohno N., Sakamoto H., Arima H. Degradation of Mutant Protein Aggregates within the Endoplasmic Reticulum of Vasopressin Neurons. *iScience* (2020) DOI:10.1016/j.isci.2020.101648
99. Makita K., Takiguchi S., Naruse H., Shimada K., Morioka S., Fujisawa T.X., Shimoji K., Tomoda A. White matter changes in children and adolescents with reactive attachment disorder: A diffusion tensor imaging study. *Psychiatry Research - Neuroimaging* (2020) DOI:10.1016/j.psychresns.2020.111129
100. Liu C., Konagaya Y., Chung M., Daigh L.H., Fan Y., Yang H.W., Terai K., Matsuda M., Meyer T. Altered G1 signaling order and commitment point in cells proliferating without CDK4/6 activity. *Nature Communications* (2020) DOI:10.1038/s41467-020-18966-9
101. Leong S.Y., Edzuka T., Goshima G., Yamada M. Kinesin-13 and Kinesin-8 function during cell growth and division in the moss *Physcomitrella patens*[OPEN]. *The Plant Cell* (2020) DOI:10.1105/tpc.19.00521
102. Kushioka J., Kaito T., Okada R., Ishiguro H., Bal Z., Kodama J., Chijimatsu R., Pye M., Narimatsu M., Wrana J.L., Inoue Y., Ninomiya H., Yamamoto S., Saitou T., Yoshikawa H., Imamura T. A novel negative regulatory mechanism of Smurf2 in BMP/Smad signaling in bone. *Bone Research* (2020) DOI:10.1038/s41413-020-00115-z
103. Kumar D., Koyanagi I., Carrier-Ruiz A., Vergara P., Srinivasan S., Sugaya Y., Kasuya M., Yu T.S., Vogt K.E., Muratani M., Ohnishi T., Singh S., Teixeira C.M., Chérasse Y., Naoi T., Wang S.H., Nondhalee P., Osman B.A.H., Kaneko N., Sawamoto K., Kernie S.G., Sakurai T., McHugh T.J., Kano M., Yanagisawa M., Sakaguchi M. Sparse Activity of Hippocampal Adult-Born Neurons during REM Sleep Is Necessary for Memory Consolidation. *Neuron* (2020) DOI:10.1016/j.neuron.2020.05.008
104. Koshiyama D., Okada N., Ando S., Koike S., Yahata N., Morita K., Sawada K., Morita S., Kawakami S., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Araki T., Kano Y., Endo K., Yamasaki S., Nishida A., Hiraiwa-Hasegawa M., Kasai K. Association between duration of breastfeeding based on maternal reports and dorsal and ventral striatum and medial orbital gyrus volumes in early adolescence. *NeuroImage* (2020) DOI:10.1016/j.neuroimage.2020.117083
105. Koshiyama D., Fukunaga M., Okada N., Morita K., Nemoto K., Yamashita F., Yamamori H., Yasuda Y., Matsumoto J., Fujimoto M., Kudo N., Azechi H., Watanabe Y., Kasai K., Hashimoto R. Association between the superior longitudinal fasciculus and perceptual organization and working memory: A diffusion tensor imaging study. *Neuroscience Letters* (2020) DOI:10.1016/j.neulet.2020.135349
106. Kondow A., Ohnuma K., Kamei Y., Taniguchi A., Bise R., Sato Y., Yamaguchi H., Nonaka S., Hashimoto K. Light-sheet microscopy-based 3D single-cell tracking reveals a correlation between cell cycle and the start of endoderm cell internalization in early zebrafish development. *Development Growth and Differentiation* (2020) DOI:10.1111/dgd.12695

107. Kobachi K., Kuno S., Sato S., Sumiyama K., Matsuda M., Terai K. Biliverdin reductase-a deficiency brighten and sensitize biliverdin-binding chromoproteins. *Cell Structure and Function* (2020) DOI:10.1247/csf.20010
108. Kinjo T., Watabe T., Kobachi K., Terai K., Matsuda M. Single-Cell Activation of the cAMP-Signaling Pathway in 3D Tissues with FRET-Assisted Two-Photon Activation of bPAC. *ACS Chemical Biology* (2020) DOI:10.1021/acscchembio.0c00333
109. Kimata Y., Higaki T., Kurihara D., Ando N., Matsumoto H., Higashiyama T., Ueda M. Mitochondrial dynamics and segregation during the asymmetric division of Arabidopsis zygotes. *Quantitative Plant Biology* (2020) DOI:10.1017/qpb.2020.4
110. Kadota Y., Hirai T., Azuma M., Hattori Y., Khant Z.A., Hori M., Saito K., Yokogami K., Takeshima H. Differentiation between glioblastoma and solitary brain metastasis using neurite orientation dispersion and density imaging. *Journal of Neuroradiology* (2020) DOI:10.1016/j.neurad.2018.10.005
111. Itahashi T., Okada N., Ando S., Yamasaki S., Koshiyama D., Morita K., Yahata N., Koike S., Nishida A., Kasai K., Hashimoto R.I. Functional connectomes linking child-parent relationships with psychological problems in adolescence. *NeuroImage* (2020) DOI:10.1016/j.neuroimage.2020.117013
112. Ishibashi K., Sakakibara H., Oiwa K. Force-generating mechanism of axonemal dynein in solo and ensemble. *International Journal of Molecular Sciences* (2020) DOI:10.3390/ijms21082843
113. Imachi H., Nobu M.K., Nakahara N., Morono Y., Ogawara M., Takaki Y., Takano Y., Uematsu K., Ikuta T., Ito M., Matsui Y., Miyazaki M., Murata K., Saito Y., Sakai S., Song C., Tasumi E., Yamanaka Y., Yamaguchi T., Kamagata Y., Tamaki H., Takai K. Isolation of an archaeon at the prokaryote–eukaryote interface. *Nature* (2020) DOI:10.1038/s41586-019-1916-6
114. Horibata Y., Mitsuhashi S., Shimizu H., Maejima S., Sakamoto H., Aoyama C., Ando H., Sugimoto H. The phosphatidylcholine transfer protein StarD7 is important for myogenic differentiation in mouse myoblast C2C12 cells and human primary skeletal myoblasts. *Scientific Reports* (2020) DOI:10.1038/s41598-020-59444-y
115. Higaki T., Mizuno H. Four-dimensional imaging with virtual reality to quantitatively explore jigsaw puzzle-like morphogenesis of arabidopsis cotyledon pavement cells. *Plant Biotechnology* (2020) DOI:10.5511/plantbiotechnology.20.0605a
116. Higaki T., Akita K., Katoh K. Coefficient of variation as an image-intensity metric for cytoskeleton bundling. *Scientific Reports* (2020) DOI:10.1038/s41598-020-79136-x
117. Hara S., Hori M., Hagiwara A., Tsurushima Y., Tanaka Y., Maehara T., Aoki S., Nariai T. Myelin and axonal damage in normal-appearing white matter in patients with moyamoya disease. *American Journal of Neuroradiology* (2020) DOI:10.3174/ajnr.A6708
118. Hagiwara A., Fujita S., Ohno Y., Aoki S. Variability and Standardization of Quantitative Imaging: Monoparametric to Multiparametric Quantification, Radiomics, and Artificial Intelligence. *Investigative Radiology* (2020) DOI:10.1097/RLI.0000000000000666
119. Gao L., Kita T., Katsuno T., Yamamoto N., Omori K., Nakagawa T. Insulin-Like Growth Factor 1 on the Maintenance of Ribbon Synapses in Mouse Cochlear Explant Cultures. *Frontiers in Cellular Neuroscience* (2020) DOI:10.3389/fncel.2020.571155
120. Fumoto S., Kinoshita E., Ohta K., Nakamura K.I., Hirayama T., Nagasawa H., Hu D., Okami K., Kato R., Shimokawa S., Ohira N., Nishimura K., Miyamoto H., Tanaka T., Kawakami S., Nishida K. A pH-adjustable tissue clearing solution that preserves lipid ultrastructures: Suitable tissue clearing method for DDS evaluation. *Pharmaceutics* (2020) DOI:10.3390/pharmaceutics12111070

121. Choong C.-J., Okuno T., Ikenaka K., Baba K., Hayakawa H., Koike M., Yokota M., Doi J., Kakuda K., Takeuchi T., Kuma A., Nakamura S., Nagai Y., Nagano S., Yoshimori T., Mochizuki H. Alternative mitochondrial quality control mediated by extracellular release. *Autophagy* (2020) DOI:10.1080/15548627.2020.1848130
122. Fujita S., Hagiwara A., Otsuka Y., Hori M., Takei N., Hwang K.P., Irie R., Andica C., Kamagata K., Akashi T., Kumamaru K.K., Suzuki M., Wada A., Abe O., Aoki S. Deep Learning Approach for Generating MRA Images From 3D Quantitative Synthetic MRI Without Additional Scans. *Investigative Radiology* (2020) DOI:10.1097/rli.0000000000000628
123. Aoki K., Satoi S., Harada S., Uchida S., Iwasa Y., Ikenouchi J. Coordinated changes in cell membrane and cytoplasm during maturation of apoptotic bleb. *Molecular Biology of the Cell* (2020) DOI:10.1091/mbc.E19-12-0691
124. Otubo A., Kawakami N., Maejima S., Ueda Y., Morris J.F., Sakamoto T., Sakamoto H. Vasopressin gene products are colocalised with corticotrophin-releasing factor within neurosecretory vesicles in the external zone of the median eminence of the Japanese macaque monkey (*Macaca fuscata*). *Journal of Neuroendocrinology* (2020) DOI:10.1111/jne.12875
125. Otomo K., Goto A., Yamanaka Y., Hori T., Nakayama H., Nemoto T. High-peak-power 918-nm laser light source based two-photon spinning-disk microscopy for green fluorophores. *Biochemical and Biophysical Research Communications* (2020) DOI:10.1016/j.bbrc.2020.05.213
126. Notaguchi M., Kurotani K.I., Sato Y., Tabata R., Kawakatsu Y., Okayasu K., Sawai Y., Okada R., Asahina M., Ichihashi Y., Shirasu K., Suzuki T., Niwa M., Higashiyama T. Cell-cell adhesion in plant grafting is facilitated by beta-1,4-glucanases. *Science* (2020) DOI:10.1126/science.abc3710
127. Yamashita A., Sakai Y., Yamada T., Yahata N., Kunimatsu A., Okada N., Itahashi T., Hashimoto R., Mizuta H., Ichikawa N., Takamura M., Okada G., Yamagata H., Harada K., Matsuo K., Tanaka S.C., Kawato M., Kasai K., Kato N., Takahashi H., Okamoto Y., Yamashita O., Imamizu H. Generalizable brain network markers of major depressive disorder across multiple imaging sites. *PLoS Biology* (2020) DOI:10.1371/journal.pbio.3000966
128. Ozaki K., Kato D., Ikegami A., Hashimoto A., Sugio S., Guo Z.T., Shibushita M., Tatematsu T., Haruwaka K., Moorhouse A.J., Yamada H., Wake H. Maternal immune activation induces sustained changes in fetal microglia motility. *Scientific Reports* (2020) DOI:10.1038/s41598-020-78294-2
129. Nakamura S., Hagihara S., Otomo K., Ishida H., Hidema J., Nemoto T., Izumi M. Autophagy contributes to quality control of leaf mitochondria. *Plant and Cell Physiology* (2020) DOI:10.1093/pcp/pcaa162
130. Saccetti L., Hagiwara A., Andica C., Yokoyama K., Fujita S., Kato S., Maekawa T., Kamagata K., Le Berre A., Hori M., Wada A., Tateishi U., Hattori N., Aoki S. Myelin Measurement Using Quantitative Magnetic Resonance Imaging: A Correlation Study Comparing Various Imaging Techniques in Patients with Multiple Sclerosis. *Cells* (2020) DOI:10.3390/cells9020393
131. Kawasoe R., Shinoda T., Hattori Y., Nakagawa M., Pham T.Q., Tanaka Y., Sagou K., Saito K., Katsuki S., Kotani T., Sano A., Fujimori T., Miyata T. Two-photon microscopic observation of cell-production dynamics in the developing mammalian neocortex in utero. *Development Growth & Differentiation* (2020) DOI:10.1111/dgd.12648
132. Gunji S., Oda Y., Takigawa-Imamura H., Tsukaya H., Ferjani A. Excess Pyrophosphate Restrains Pavement Cell Morphogenesis and Alters Organ Flatness in *Arabidopsis thaliana*. *Frontiers in Plant Science* (2020) DOI:10.3389/fpls.2020.00031

133. Fujioka Y., Alam J.M., Noshiro D., Mouri K., Ando T., Okada Y., May A.I., Knorr R.L., Suzuki K., Ohsumi Y., Noda N.N. Phase separation organizes the site of autophagosome formation. *Nature* (2020) DOI:10.1038/s41586-020-1977-6
134. Soltysik K., Ohsaki Y., Tatematsu T., Cheng J.L., Maeda A., Morita S., Fujimoto T. Nuclear lipid droplets form in the inner nuclear membrane in a seipin-independent manner. *Journal of Cell Biology* (2020) DOI:10.1083/jcb.202005026
135. Satrialdi, Munechika R., Biju V., Takano Y., Harashima H., Yamada Y. The optimization of cancer photodynamic therapy by utilization of a pi-extended porphyrin-type photosensitizer in combination with MITO-Porter. *Chemical Communications* (2020) DOI:10.1039/c9cc08563g
136. Sato Y., Kamiyo K., Tsutsumi M., Murakami Y., Takahashi M. Nonmuscle myosin IIA and IIB differently suppress microtubule growth to stabilize cell morphology. *The Journal of Biochemistry* (2020) DOI:10.1093/jb/mvz082
137. Morohoshi A., Miyata H., Shimada K., Nozawa K., Matsumura T., Yanase R., Shiba K., Inaba K., Ikawa M. Nexin-Dynein regulatory complex component DRC7 but not FBXL13 is required for sperm flagellum formation and male fertility in mice. *PLOS Genetics* (2020) DOI:10.1371/journal.pgen.1008585
138. Irie R., Otsuka Y., Hagiwara A., Kamagata K., Kamiya K., Suzuki M., Wada A., Maekawa T., Fujita S., Kato S., Nakajima M., Miyajima M., Motoi Y., Abe O., Aoki S. A Novel Deep Learning Approach with a 3D Convolutional Ladder Network for Differential Diagnosis of Idiopathic Normal Pressure Hydrocephalus and Alzheimer's Disease. *Magnetic Resonance in Medical Sciences* (2020) DOI:10.2463/mrms.mp.2019-0106
139. Kataoka K., Bilkei-Gorzo A., Nozaki C., Togo A., Nakamura K., Ohta K., Zimmer A., Asahi T. Age-dependent Alteration in Mitochondrial Dynamics and Autophagy in Hippocampal Neuron of Cannabinoid CB1 Receptor-deficient Mice. *Brain Research Bulletin* (2020) DOI:10.1016/j.brainresbull.2020.03.014
140. Iwaki A., Moriwaki K., Sobajima T., Taniguchi M., Yoshimura S.I., Kunii M., Kanda S., Kamada Y., Miyoshi E., Harada A. Loss of Rab6a in the small intestine causes lipid accumulation and epithelial cell death from lactation. *FASEB Journal* (2020) DOI:10.1096/fj.202000028R
141. Ohno M., Nishi K., Hiraoka Y., Niizuma S., Matsuda S., Iwasaki H., Kimura T., Nishi E. Nardilysin controls cardiac sympathetic innervation patterning through regulation of p75 neurotrophin receptor. *FASEB Journal* (2020) DOI:10.1096/fj.202000604R
142. Nagao Y., Sakamoto M., Chinen T., Okada Y., Takao D. Robust classification of cell cycle phase and biological feature extraction by image-based deep learning. *Molecular Biology of the Cell* (2020) DOI:10.1091/mbc.E20-03-0187
143. Kobayakawa T., Takano H., Ishii T., Tsuji K., Ohashi N., Nomura W., Furuta T., Tamamura H. Synthesis of hydrophilic caged DAG-lactones for chemical biology applications. *Organic & Biomolecular Chemistry* (2020) DOI:10.1039/d0ob00807a
144. Kakeda S., Watanabe K., Nguyen H., Katsuki A., Sugimoto K., Igata N., Abe O., Yoshimura R., Korogi Y. An independent component analysis reveals brain structural networks related to TNF-alpha in drug-naive, first-episode major depressive disorder: a source-based morphometric study. *Translational Psychiatry* (2020) DOI:10.1038/s41398-020-00873-8
145. Watanabe T., Nishizawa Y., Minato H., Song C., Murata K., Suzuki D. Hydrophobic Monomers Recognize Microenvironments in Hydrogel Microspheres during Free-Radical-Seeded Emulsion Polymerization. *Angew Chem Int Ed Engl* (2020) DOI:10.1002/anie.202003493

146. Shimizu K., Hara S., Hori M., Tanaka Y., Maehara T., Aoki S., Tazawa T., Nariai T. Transient Global Amnesia: A Diffusion and Perfusion MRI study. *Journal of Neuroimaging* (2020) DOI:10.1111/jon.12745
147. Yamasaki A., Alam J.M., Noshiro D., Hirata E., Fujioka Y., Suzuki K., Ohsumi Y., Noda N.N. Liquidity Is a Critical Determinant for Selective Autophagy of Protein Condensates. *Molecular Cell* (2020) DOI:10.1016/j.molcel.2019.12.026
148. Takeuchi T., Mori K., Sunayama H., Takano E., Kitayama Y., Shimizu T., Hirose Y., Inubushi S., Sasaki R., Tanino H. Antibody-Conjugated Signaling Nanocavities Fabricated by Dynamic Molding for Detecting Cancers Using Small Extracellular Vesicle Markers from Tears. *Journal of the American Chemical Society* (2020) DOI:10.1021/jacs.9b13874
149. Otani Y., Ohno N., Cui J.J., Yamaguchi Y., Baba H. Upregulation of large myelin protein zero leads to Charcot-Marie-Tooth disease-like neuropathy in mice. *Communications Biology* (2020) DOI:10.1038/s42003-020-0854-z
150. Maeda K., Sasabe M., Hanamata S., Machida Y., Hasezawa S., Higaki T. Actin Filament Disruption Alters Phragmoplast Microtubule Dynamics during the Initial Phase of Plant Cytokinesis. *Plant and Cell Physiology* (2020) DOI:10.1093/pcp/pcaa003
151. Kakizuka T., Takai A., Yoshizawa K., Okada Y., Watanabe T.M. An improved fluorescent protein-based expression reporter system that utilizes bioluminescence resonance energy transfer and peptide-assisted complementation. *Chemical Communications* (2020) DOI:10.1039/c9cc08664a
152. Sasabayashi D., Takayanagi Y., Takahashi T., Katagiri N., Sakuma A., Obara C., Katsura M., Okada N., Koike S., Yamasue H., Nakamura M., Furuichi A., Kido M., Nishikawa Y., Noguchi K., Matsumoto K., Mizuno M., Kasai K., Suzuki M. Subcortical Brain Volume Abnormalities in Individuals With an At-risk Mental State. *Schizophrenia Bulletin* (2020) DOI:10.1093/schbul/sbaa011
153. Andica C., Kamagata K., Hatano T., Saito Y., Uchida W., Ogawa T., Takeshige-Amano H., Hagiwara A., Murata S., Oyama G., Shimo Y., Umemura A., Akashi T., Wada A., Kumamaru K.K., Hori M., Hattori N., Aoki S. Neurocognitive and psychiatric disorders-related axonal degeneration in Parkinson's disease. *Journal of Neuroscience Research* (2020) DOI:10.1002/jnr.24584
154. Bae S., Lee S., Harada K., Makino K., Chiba I., Katayama O., Shinkai Y., Park H., Shimada H. Engagement in Lifestyle Activities is Associated with Increased Alzheimer's Disease-Associated Cortical Thickness and Cognitive Performance in Older Adults. *Journal of Clinical Medicine* (2020) DOI:10.3390/jcm9051424
155. Shiotani H., Miyata M., Kameyama T., Mandai K., Yamasaki M., Watanabe M., Mizutani K., Takai Y. Nectin-2 alpha is localized at cholinergic neuron dendrites and regulates synapse formation in the medial habenula. *Journal of Comparative Neurology* (2020) DOI:10.1002/cne.24958
156. Konagaya Y., Takakura K., Sogabe M., Bisaria A., Liu C., Meyer T., Sehara-Fujisawa A., Matsuda M., Terai K. Intravital imaging reveals cell cycle-dependent myogenic cell migration during muscle regeneration. *Cell Cycle* (2020) DOI:10.1080/15384101.2020.1838779
157. Murata K., Kinoshita T., Ishikawa T., Kuroda K., Hoshi M., Fukazawa Y. Region- and neuronal-subtype-specific expression of Na,K-ATPase alpha and beta subunit isoforms in the mouse brain. *Journal of Comparative Neurology* (2020) DOI:10.1002/cne.24924
158. Matsuoka T., Yamasaki M., Abe M., Matsuda Y., Morino H., Kawakami H., Sakimura K., Watanabe M., Hashimoto K. Kv11 (ether-a-go-go-related gene) voltage-dependent K⁺ channels promote resonance and oscillation of subthreshold membrane potentials. *Journal of Physiology-London* (2020) DOI:10.1113/jp280342

159. Nishikawa S., Yamaguchi Y., Suzuki C., Yabe A., Sato Y., Kurihara D., Sato Y., Susaki D., Higashiyama T., Maruyama D. Arabidopsis GEX1 Is a Nuclear Membrane Protein of Gametes Required for Nuclear Fusion During Reproduction. *Frontiers in Plant Science* (2020) DOI:10.3389/fpls.2020.548032
160. Kawakami N., Otubo A., Maejima S., Talukder A.H., Satoh K., Oti T., Takanami K., Ueda Y., Itoi K., Morris J.F., Sakamoto T., Sakamoto H. Variation of pro-vasopressin processing in parvocellular and magnocellular neurons in the paraventricular nucleus of the hypothalamus: Evidence from the vasopressin-related glycopeptide copeptin. *Journal of Comparative Neurology* (2020) DOI:10.1002/cne.25026
161. Yoshida M.W., Yamada M., Goshima G. Moss kinesin-14 KCBP accelerates chromatid motility in anaphase. *Cell Structure and Function* (2019) DOI:10.1247/csf.19015
162. Tomiyama H., Nakao T., Murayama K., Nemoto K., Ikari K., Yamada S., Kuwano M., Hasuzawa S., Togao O., Hiwatashi A., Kanba S. Dysfunction between dorsal caudate and salience network associated with impaired cognitive flexibility in obsessive-compulsive disorder: A resting-state fMRI study. *NeuroImage: Clinical* (2019) DOI:10.1016/j.nicl.2019.102004
163. Terai K., Imanishi A., Li C.J., Matsuda M. Two Decades of Genetically Encoded Biosensors Based on Förster Resonance Energy Transfer. *Cell Structure and Function* (2019) DOI:10.1247/csf.18035
164. Shitara A., Malec L., Ebrahim S., Chen D., Bleck C., Hoffman M.P., Weigert R. Cdc42 negatively regulates endocytosis during apical membrane maintenance in live animals. *Molecular Biology of the Cell* (2019) DOI:10.1091/mbc.E18-10-0615
165. Serizawa T., Isotani A., Matsumura T., Nakanishi K., Nonaka S., Shibata S., Ikawa M., Okano H. Developmental analyses of mouse embryos and adults using a non-overlapping tracing system for all three germ layers. *Development (Cambridge)* (2019) DOI:10.1242/dev.174938
166. Saccenti L., Andica C., Hagiwara A., Yokoyama K., Takemura M.Y., Fujita S., Maekawa T., Kamagata K., Le Berre A., Hori M., Hattori N., Aoki S. Brain tissue and myelin volumetric analysis in multiple sclerosis at 3T MRI with various in-plane resolutions using synthetic MRI. *Neuroradiology* (2019) DOI:10.1007/s00234-019-02241-w
167. Nguyen L.H., Kakeda S., Katsuki A., Sugimoto K., Otsuka Y., Ueda I., Igata R., Watanabe K., Kishi T., Iwata N., Korogi Y., Yoshimura R. Relationship between VEGF-related gene polymorphisms and brain morphology in treatment-naïve patients with first-episode major depressive disorder. *European Archives of Psychiatry and Clinical Neuroscience* (2019) DOI:10.1007/s00406-018-0953-8
168. Murata S., Tachibana Y., Murata K., Kamagata K., Hori M., Andica C., Suzuki M., Wada A., Kumamaru K., Hagiwara A., Irie R., Sato S., Hamasaki N., Fukunaga I., Hoshito H., Aoki S. Comparison of magnetization transfer contrast of conventional and simultaneous multislice turbo spin echo acquisitions focusing on excitation time interval. *Japanese Journal of Radiology* (2019) DOI:10.1007/s11604-019-00848-w
169. Morita K., Miura K., Kasai K., Hashimoto R. Eye movement characteristics in schizophrenia: A recent update with clinical implications. *Neuropsychopharmacology Reports* (2019) DOI:10.1002/npr2.12087
170. Maruyama D., Higashiyama T., Endo T., Nishikawa S.-i. Fertilization-Coupled Sperm Nuclear Fusion is Required for Normal Endosperm Nuclear Proliferation. *Plant and Cell Physiology* (2019) DOI:10.1093/pcp/pcz158

171. Koshiyama D., Fukunaga M., Okada N., Morita K., Nemoto K., Usui K., Yamamori H., Yasuda Y., Fujimoto M., Kudo N., Azechi H., Watanabe Y., Hashimoto N., Narita H., Kusumi I., Ohi K., Shimada T., Kataoka Y., Yamamoto M., Ozaki N., Okada G., Okamoto Y., Harada K., Matsuo K., Yamasue H., Abe O., Hashimoto R., Takahashi T., Hori T., Nakataki M., Onitsuka T., Holleran L., Jahanshad N., van Erp T.G.M., Turner J., Donohoe G., Thompson P.M., Kasai K., Hashimoto R. White matter microstructural alterations across four major psychiatric disorders: mega-analysis study in 2937 individuals. *Molecular Psychiatry* (2019) DOI:10.1038/s41380-019-0553-7
172. Kinjo T., Terai K., Horita S., Nomura N., Sumiyama K., Togashi K., Iwata S., Matsuda M. FRET-assisted photoactivation of flavoproteins for in vivo two-photon optogenetics. *Nature Methods* (2019) DOI:10.1038/s41592-019-0541-5
173. Kakeda S., Watanabe K., Katsuki A., Sugimoto K., Ueda I., Igata N., Kishi T., Iwata N., Abe O., Yoshimura R., Korogi Y. Genetic effects on white matter integrity in drug-naive patients with major depressive disorder: a diffusion tensor imaging study of 17 genetic loci associated with depressive symptoms. *Neuropsychiatric Disease and Treatment* (2019) DOI:10.2147/ndt.s190268
174. Hwang D., Wada S., Takahashi A., Urawa H., Kamei Y., Nishikawa S.-i. Development of a Heat-Inducible Gene Expression System Using Female Gametophytes of Arabidopsis thaliana. *Plant and Cell Physiology* (2019) DOI:10.1093/pcp/pcz148
175. Hayashi T., Hashitani H., Takeya M., Uemura K.I., Nakamura K.I., Igawa T. Properties of SK3 channel-expressing PDGFR α (+) cells in the rodent urinary bladder. *European Journal of Pharmacology* (2019) DOI:10.1016/j.ejphar.2019.172552
176. Haruwaka K., Ikegami A., Tachibana Y., Ohno N., Konishi H., Hashimoto A., Matsumoto M., Kato D., Ono R., Kiyama H., Moorhouse A.J., Nabekura J., Wake H. Dual microglia effects on blood brain barrier permeability induced by systemic inflammation. *Nature Communications* (2019) DOI:10.1038/s41467-019-13812-z
177. Griesbeck S., Michail E., Rauch F., Ogasawara H., Wang C., Sato Y., Edkins R.M., Zhang Z., Taki M., Lambert C., Yamaguchi S., Marder T.B. The Effect of Branching on the One- and Two-Photon Absorption, Cell Viability, and Localization of Cationic Triarylborane Chromophores with Dipolar versus Octupolar Charge Distributions for Cellular Imaging. *Chemistry - A European Journal* (2019) DOI:10.1002/chem.201902461
178. Fujita S., Hagiwara A., Hori M., Warntjes M., Kamagata K., Fukunaga I., Andica C., Maekawa T., Irie R., Takemura M.Y., Kumamaru K.K., Wada A., Suzuki M., Ozaki Y., Abe O., Aoki S. Three-dimensional high-resolution simultaneous quantitative mapping of the whole brain with 3D-QALAS: An accuracy and repeatability study. *Magnetic Resonance Imaging* (2019) DOI:10.1016/j.mri.2019.08.031
179. Matsumoto M., Sawada M., García-González D., Herranz-Pérez V., Ogino T., Nguyen H.B., Thai T.Q., Narita K., Kumamoto N., Ugawa S., Saito Y., Takeda S., Kaneko N., Khodosevich K., Monyer H., García-Verdugo J.M., Ohno N., Sawamoto K. Dynamic changes in ultrastructure of the primary cilium in migrating neuroblasts in the postnatal brain. *Journal of Neuroscience* (2019) DOI:10.1523/JNEUROSCI.1503-19.2019
180. Ito H., Tsunoda T., Riku M., Inaguma S., Inoko A., Murakami H., Ikeda H., Matsuda M., Kasai K. Indispensable role of STIL in the regulation of cancer cell motility through the lamellipodial accumulation of ARHGEF7–PAK1 complex. *Oncogene* (2019) DOI:10.1038/s41388-019-1115-9
181. Osawa T., Kotani T., Kawaoka T., Hirata E., Suzuki K., Nakatogawa H., Ohsumi Y., Noda N.N. Atg2 mediates direct lipid transfer between membranes for autophagosome formation. *Nature Structural & Molecular Biology* (2019) DOI:10.1038/s41594-019-0203-4

182. Nozoye T., von Wiren N., Sato Y., Higashiyama T., Nakanishi H., Nishizawa N.K. Characterization of the Nicotianamine Exporter ENA1 in Rice. *Frontiers in Plant Science* (2019) DOI:10.3389/fpls.2019.00502
183. Muta Y., Matsuda M., Imajo M. Divergent Dynamics and Functions of ERK MAP Kinase Signaling in Development, Homeostasis and Cancer: Lessons from Fluorescent Bioimaging. *Cancers* (2019) DOI:10.3390/cancers11040513
184. Murata K., Hirata A., Ohta K., Enaida H., Nakamura K. Morphometric analysis in mouse scleral fibroblasts using focused ion beam/scanning electron microscopy. *Scientific Reports* (2019) DOI:10.1038/s41598-019-42758-x
185. Hara S., Hori M., Ueda R., Hayashi S., Inaji M., Tanaka Y., Maehara T., Ishii K., Aoki S., Nariai T. Unraveling Specific Brain Microstructural Damage in Moyamoya Disease Using Diffusion Magnetic Resonance Imaging and Positron Emission Tomography. *Journal of Stroke and Cerebrovascular Diseases* (2019) DOI:10.1016/j.jstrokecerebrovasdis.2018.12.038
186. Goto A., Otomo K., Nemotou T. Real-Time Polarization-Resolved Imaging of Living Tissues Based on Two-Photon Excitation Spinning-Disk Confocal Microscopy. *Frontiers in Physics* (2019) DOI:10.3389/fphy.2019.00056
187. Chougar L., Hagiwara A., Takano N., Andica C., Cohen-Adad J., Warntjes M., Maekawa T., Hori M., Koshino S., Nakazawa M., Abe O., Aoki S. Signal Intensity within Cerebral Venous Sinuses on Synthetic MRI. *Magnetic Resonance in Medical Sciences* (2019) DOI:10.2463/mrms.mp.2018-0144
188. Wang C.G., Taki M., Sato Y., Tamura Y., Yaginuma H., Okada Y., Yamaguchi S. A photostable fluorescent marker for the superresolution live imaging of the dynamic structure of the mitochondrial cristae. *Proceedings of the National Academy of Sciences of the United States of America* (2019) DOI:10.1073/pnas.1905924116
189. Nakayama T., Nomura M., Takano Y., Tanifuji G., Shiba K., Inaba K., Inagaki Y., Kawata M. Single-cell genomics unveiled a cryptic cyanobacterial lineage with a worldwide distribution hidden by a dinoflagellate host. *Proceedings of the National Academy of Sciences of the United States of America* (2019) DOI:10.1073/pnas.1902538116
190. Murakoshi H., Horiuchi H., Kosugi T., Onda M., Sato A., Koga N., Nabekura J. ShadowR: a novel chromoprotein with reduced non-specific binding and improved expression in living cells. *Scientific Reports* (2019) DOI:10.1038/s41598-019-48604-4
191. Andica C., Kamagata K., Hatano T., Saito A., Uchida W., Ogawa T., Takeshige-Amano H., Zalesky A., Wada A., Suzuki M., Hagiwara A., Irie R., Hori M., Kumamaru K.K., Oyama G., Shimo Y., Umemura A., Pantelis C., Hattori N., Aoki S. Free-Water Imaging in White and Gray Matter in Parkinson's Disease. *Cells* (2019) DOI:10.3390/cells8080839
192. Sasaki T., Tsutsumi M., Otomo K., Murata T., Yagi N., Nakamura M., Nemoto T., Hasebe M., Oda Y. A Novel Katanin-Tethering Machinery Accelerates Cytokinesis. *Current Biology* (2019) DOI:10.1016/j.cub.2019.09.049
193. Nishikawa T., Narita H., Ogi S., Sato Y., Yamaguchi S. Hydrophobicity and CH/ π -interaction-driven self-assembly of amphiphilic aromatic hydrocarbons into nanosheets. *Chemical Communications* (2019) DOI:10.1039/c9cc08070h
194. Hattori A., Kamagata K., Kirino E., Andica C., Tanaka S., Hagiwara A., Fujita S., Maekawa T., Irie R., Kumamaru K.K., Suzuki M., Wada A., Hori M., Aoki S. White matter alterations in adult with autism spectrum disorder evaluated using diffusion kurtosis imaging. *Neuroradiology* (2019) DOI:10.1007/s00234-019-02238-5

195. Fujita S., Hagiwara A., Hori M., Warntjes M., Kamagata K., Fukunaga I., Goto M., Takuya H., Takasu K., Andica C., Maekawa T., Takemura M.Y., Irie R., Wada A., Suzuki M., Aoki S. 3D quantitative synthetic MRI-derived cortical thickness and subcortical brain volumes: Scan-rescan repeatability and comparison with conventional T-1-weighted images. *Journal of Magnetic Resonance Imaging* (2019) DOI:10.1002/jmri.26744
196. Yasuda Y., Okada N., Nemoto K., Fukunaga M., Yamamori H., Ohi K., Koshiyama D., Kudo N., Shiino T., Morita S., Morita K., Azechi H., Fujimoto M., Miura K., Watanabe Y., Kasai K., Hashimoto R. Brain morphological and functional features in cognitive subgroups of schizophrenia. *Psychiatry and Clinical Neurosciences* (2019) DOI:10.1111/pcn.12963
197. Andica C., Kamagata K., Hatano T., Saito Y., Ogaki K., Hattori N., Aoki S. MR biomarkers of degenerative brain disorders derived from diffusion imaging. *Journal of Magnetic Resonance Imaging* (2019) DOI:10.1002/jmri.27019
198. Sone E., Noshiro D., Ikebuchi Y., Nakagawa M., Khan M., Tamura Y., Ikeda M., Oki M., Murali R., Fujimori T., Yoda T., Honma M., Suzuki H., Ando T., Aoki K. The induction of RANKL molecule clustering could stimulate early osteoblast differentiation. *Biochemical and Biophysical Research Communications* (2019) DOI:10.1016/j.bbrc.2018.12.093
199. Shimahara Y., Sugawara K., Kojo K.H., Kawai H., Yoshida Y., Hasezawa S., Kutsuna N. IMACEL: A cloud-based bioimage analysis platform for morphological analysis and image classification. *PLoS ONE* (2019) DOI:10.1371/journal.pone.0212619
200. Maekawa T., Hagiwara A., Hori M., Andica C., Haruyama T., Kuramochi M., Nakazawa M., Koshino S., Irie R., Kamagata K., Wada A., Abe O., Aoki S. Effect of Gadolinium on the Estimation of Myelin and Brain Tissue Volumes Based on Quantitative Synthetic MRI. *American Journal of Neuroradiology* (2019) DOI:10.3174/ajnr.A5921
201. Kiyonari H., Kaneko M., Abe T., Shioi G., Aizawa S., Furuta Y., Fujimori T. Dynamic organelle localization and cytoskeletal reorganization during preimplantation mouse embryo development revealed by live imaging of genetically encoded fluorescent fusion proteins. *Genesis* (2019) DOI:10.1002/dvg.23277
202. Kimata Y., Kato T., Higaki T., Kurihara D., Yamada T., Segami S., Morita M.T., Maeshima M., Hasezawa S., Higashiyama T., Tasaka M., Ueda M. Polar vacuolar distribution is essential for accurate asymmetric division of Arabidopsis zygotes. *Proceedings of the National Academy of Sciences of the United States of America* (2019) DOI:10.1073/pnas.1814160116
203. Hagiwara A., Otsuka Y., Hori M., Tachibana Y., Yokoyama K., Fujita S., Andica C., Kamagata K., Irie R., Koshino S., Maekawa T., Chougar L., Wada A., Takemura M.Y., Hattori N., Aoki S. Improving the Quality of Synthetic FLAIR Images with Deep Learning Using a Conditional Generative Adversarial Network for Pixel-by-Pixel Image Translation. *American Journal of Neuroradiology* (2019) DOI:10.3174/ajnr.A5927
204. Fujita S., Nakazawa M., Hagiwara A., Ueda R., Horita M., Maekawa T., Irie R., Andica C., Kunishima Kumamaru K., Hori M., Aoki S. Estimation of Gadolinium-based Contrast Agent Concentration Using Quantitative Synthetic MRI and Its Application to Brain Metastases: A Feasibility Study. *Magnetic Resonance in Medical Sciences* (2019) DOI:10.2463/mrms.mp.2018-0119
205. Suzuki A.Z., Sekine R., Takeda S., Aikawa R., Shiraishi Y., Hamaguchi T., Okuno H., Tamamura H., Furuta T. A clickable caging group as a new platform for modular caged compounds with improved photochemical properties. *Chemical Communications* (2019) DOI:10.1039/c8cc07981a
206. Soltysik K., Ohsaki Y., Tatematsu T., Cheng J.L., Fujimoto T. Nuclear lipid droplets derive from a lipoprotein precursor and regulate phosphatidylcholine synthesis. *Nature Communications* (2019) DOI:10.1038/s41467-019-08411-x

207. Okada N., Yahata N., Koshiyama D., Morita K., Sawada K., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Koike S., Araki T., Kano Y., Endo K., Yamasaki S., Ando S., Nishida A., Hiraiwa-Hasegawa M., Edden R.A.E., Barker P.B., Sawa A., Kasai K. Neurometabolic and functional connectivity basis of prosocial behavior in early adolescence. *Scientific Reports* (2019) DOI:10.1038/s41598-018-38355-z
208. Hagiwara A., Hori M., Cohen-Adad J., Nakazawa M., Suzuki Y., Kasahara A., Horita M., Haruyama T., Andica C., Maekawa T., Kamagata K., Kumamaru K.K., Abe O., Aoki S. Linearity, Bias, Intrascanner Repeatability, and Interscanner Reproducibility of Quantitative Multidynamic Multiecho Sequence for Rapid Simultaneous Relaxometry at 3 T A Validation Study With a Standardized Phantom and Healthy Controls. *Investigative Radiology* (2019) DOI:10.1097/rli.0000000000000510
209. Yoon Y., Park J., Taniguchi A., Kohsaka H., Nakae K., Nonaka S., Ishii S., Nose A. System level analysis of motor-related neural activities in larval *Drosophila*. *Journal of Neurogenetics* (2019) DOI:10.1080/01677063.2019.1605365
210. Andica C., Hagiwara A., Hori M., Kamagata K., Koshino S., Maekawa T., Suzuki M., Fujiwara H., Ikeno M., Shimizu T., Suzuki H., Sugano H., Arai H., Aoki S. Review of synthetic MRI in pediatric brains: Basic principle of MR quantification, its features, clinical applications, and limitations. *Journal of Neuroradiology* (2019) DOI:10.1016/j.neurad.2019.02.005
211. Tanaka H., Okazaki T., Aoyama S., Yokota M., Koike M., Okada Y., Fujiki Y., Gotoh Y. Peroxisomes control mitochondrial dynamics and the mitochondrion-dependent apoptosis pathway. *Journal of Cell Science* (2019) DOI:10.1242/jcs.224766
212. Takaki T., Ohno N., Saitoh S., Nagai M., Joh K. Podocyte penetration of the glomerular basement membrane to contact on the mesangial cell at the lesion of mesangial interposition in lupus nephritis: a three-dimensional analysis by serial block-face scanning electron microscopy. *Clinical and Experimental Nephrology* (2019) DOI:10.1007/s10157-019-01701-0
213. Nishimura A., Shimoda K., Tanaka T., Toyama T., Nishiyama K., Shinkai Y., Numaga-Tomita T., Yamazaki D., Kanda Y., Akaike T., Kumagai Y., Nishida M. Depolysulfidation of Drp1 induced by low-dose methylmercury exposure increases cardiac vulnerability to hemodynamic overload. *Science Signaling* (2019) DOI:10.1126/scisignal.aaw1920
214. Nakamura M., Takahashi T., Takayanagi Y., Sasabayashi D., Katagiri N., Sakuma A., Obara C., Koike S., Yamasue H., Furuichi A., Kido M., Nishikawa Y., Noguchi K., Matsumoto K., Mizuno M., Kasai K., Suzuki M. Surface morphology of the orbitofrontal cortex in individuals at risk of psychosis: a multicenter study. *European Archives of Psychiatry and Clinical Neuroscience* (2019) DOI:10.1007/s00406-018-0890-6
215. Li J.L., Suda K., Ueoka I., Tanaka R., Yoshida H., Okada Y., Okamoto Y., Hiramatsu Y., Takashima H., Yamaguchi M. Neuron-specific knockdown of *Drosophila* HADHB induces a shortened lifespan, deficient locomotive ability, abnormal motor neuron terminal morphology and learning disability. *Experimental Cell Research* (2019) DOI:10.1016/j.yexcr.2019.03.040
216. Katsuno T., Belyantseva I.A., Cartagena-Rivera A.X., Ohta K., Crump S.M., Petralia R.S., Ono K., Tona R., Imtiaz A., Rehman A., Kiyonari H., Kaneko M., Wang Y.X., Abe T., Ikeya M., Fenollar-Ferrer C., Riordan G.P., Wilson E.A., Fitzgerald T.S., Segawa K., Omori K., Ito J., Frolenkov G.I., Friedman T.B., Kitajiri S. TRIOBP-5 sculpts stereocilia rootlets and stiffens supporting cells enabling hearing. *JCI Insight* (2019) DOI:10.1172/jci.insight.128561

217. Griesbeck S., Ferger M., Czernetzi C., Wang C.G., Bertermann R., Friedrich A., Haehnel M., Sieh D., Taki M., Yamaguchi S., Marder T.B. Optimization of Aqueous Stability versus pi-Conjugation in Tetracationic Bis(triarylborane) Chromophores: Applications in Live-Cell Fluorescence Imaging. *Chemistry – A European Journal* (2019) DOI:10.1002/chem.201900723
218. Goto N., Fukuda A., Yamaga Y., Yoshikawa T., Maruno T., Maekawa H., Inamoto S., Kawada K., Sakai Y., Miyoshi H., Taketo M.M., Chiba T., Seno H. Lineage tracing and targeting of IL17RB(+) tuft cell-like human colorectal cancer stem cells. *Proceedings of the National Academy of Sciences of the United States of America* (2019) DOI:10.1073/pnas.1900251116
219. Fujiwara D., Iwahara N., Sebori R., Hosoda R., Shimohama S., Kuno A., Horio Y. SIRT1 deficiency interferes with membrane resealing after cell membrane injury. *PLoS ONE* (2019) DOI:10.1371/journal.pone.0218329
220. Fujioka T., Kaneko N., Sawamoto K. Blood vessels as a scaffold for neuronal migration. *Neurochemistry International* (2019) DOI:10.1016/j.neuint.2019.03.001
221. Yamamoto K., Otomo K., Nemoto T., Ishihara S., Haga H., Nagasaki A., Murakami Y., Takahashi M. Differential contributions of nonmuscle myosin IIA and IIB to cytokinesis in human immortalized fibroblasts. *Experimental Cell Research* (2019) DOI:10.1016/j.yexcr.2019.01.020
222. Shimahara Y., Kutsuna N., Hasezawa S., Kojo K.H. Quantitative Evaluation of Stomule Frequency at Hourly Intervals in Arabidopsis Stomatal Guard Cell Chloroplasts. *Cytologia* (2019) DOI:10.1508/cytologia.84.31
223. Kubota-Kawai H., Burton-Smith R.N., Tokutsu R., Song C.H., Akimoto S., Yokono M., Ueno Y., Kim E., Watanabe A., Murata K., Minagawa J. Ten antenna proteins are associated with the core in the supramolecular organization of the photosystem I supercomplex in *Chlamydomonas reinhardtii*. *Journal of Biological Chemistry* (2019) DOI:10.1074/jbc.RA118.006536
224. Katagiri N., Pantelis C., Nemoto T., Tsujino N., Saito J., Hori M., Yamaguchi T., Funatogawa T., Mizuno M. Longitudinal changes in striatum and sub-threshold positive symptoms in individuals with an 'at risk mental state' (ARMS). *Psychiatry Research: Neuroimaging* (2019) DOI:10.1016/j.psychresns.2019.01.008
225. Okada N., Ando S., Sanada M., Hirata-Mogi S., Iijima Y., Sugiyama H., Shirakawa T., Yamagishi M., Kanehara A., Morita M., Yagi T., Hayashi N., Koshiyama D., Morita K., Sawada K., Ikegame T., Sugimoto N., Toriyama R., Masaoka M., Fujikawa S., Kanata S., Tada M., Kirihara K., Yahata N., Araki T., Jinde S., Kano Y., Koike S., Endo K., Yamasaki S., Nishida A., Hiraiwa-Hasegawa M., Bundo M., Iwamoto K., Tanaka S.C., Kasai K. Population-neuroscience study of the Tokyo TEEN Cohort (pn-TTC): Cohort longitudinal study to explore the neurobiological substrates of adolescent psychological and behavioral development. *Psychiatry and Clinical Neurosciences* (2019) DOI:10.1111/pcn.12814
226. Kamemizu C., Fujimori T. Distinct dormancy progression depending on embryonic regions during mouse embryonic diapause. *Biology of Reproduction* (2019) DOI:10.1093/biolre/ioz017
227. Inagaki S., Agetsuma M., Ohara S., Iijima T., Yokota H., Wazawa T., Arai Y., Nagai T. Imaging local brain activity of multiple freely moving mice sharing the same environment. *Scientific Reports* (2019) DOI:10.1038/s41598-019-43897-x
228. Hara S., Hori M., Ueda R., Hagiwara A., Hayashi S., Inaji M., Tanaka Y., Maehara T., Ishii K., Aoki S., Nariai T. Intravoxel incoherent motion perfusion in patients with Moyamoya disease: comparison with (15)O-gas positron emission tomography. *Acta Radiologica Open* (2019) DOI:10.1177/2058460119846587

229. Griesbeck S., Michail E., Wang C.G., Ogasawara H., Lorenzen S., Gerstner L., Zang T., Nitsch J., Sato Y., Bertermann R., Taki M., Lambert C., Yamaguchi S., Marder T.B. Tuning the pi-bridge of quadrupolar triarylborane chromophores for one- and two-photon excited fluorescence imaging of lysosomes in live cells. *Chemical Science* (2019) DOI:10.1039/c9sc00793h
230. Andica C., Hagiwara A., Kamagata K., Yokoyama K., Shimoji K., Saito A., Takenaka Y., Nakazawa M., Hori M., Cohen-Adad J., Takemura M.Y., Hattori N., Aoki S. Gray Matter Alterations in Early and Late Relapsing-Remitting Multiple Sclerosis Evaluated with Synthetic Quantitative Magnetic Resonance Imaging. *Scientific Reports* (2019) DOI:10.1038/s41598-019-44615-3
231. Sekiguchi T., Satoh T., Kurimoto E., Song C., Kozai T., Watanabe H., Ishii K., Yagi H., Yanaka S., Uchiyama S., Uchihashi T., Murata K., Kato K. Mutational and Combinatorial Control of Self-Assembling and Disassembling of Human Proteasome alpha Subunits. *International Journal of Molecular Sciences* (2019) DOI:10.3390/ijms20092308
232. Ieda T., Tazawa H., Okabayashi H., Yano S., Shigeyasu K., Kuroda S., Ohara T., Noma K., Kishimoto H., Nishizaki M., Kagawa S., Shirakawa Y., Saitou T., Imamura T., Fujiwara T. Visualization of epithelial-mesenchymal transition in an inflammatory microenvironment-colorectal cancer network. *Scientific Reports* (2019) DOI:10.1038/s41598-019-52816-z
233. Hara S., Tanaka Y., Hayashi S., Inaji M., Maehara T., Hori M., Aoki S., Ishii K., Nariai T. Bayesian Estimation of CBF Measured by DSC-MRI in Patients with Moyamoya Disease: Comparison with O-15-Gas PET and Singular Value Decomposition. *American Journal of Neuroradiology* (2019) DOI:10.3174/ajnr.A6248
234. Hashida Y., Takechi K., Abiru T., Yabe N., Nagase H., Hattori K., Takio S., Sato Y., Hasebe M., Tsukaya H., Takano H. Two ANGUSTIFOLIA genes regulate gametophore and sporophyte development in Physcomitrella patens. *The Plant Journal* (2019) DOI:10.1111/tpj.14592
235. Hoshikawa E., Sato T., Kimori Y., Suzuki A., Haga K., Kato H., Tabeta K., Nanba D., Izumi K. Noninvasive measurement of cell/colony motion using image analysis methods to evaluate the proliferative capacity of oral keratinocytes as a tool for quality control in regenerative medicine. *Journal of Tissue Engineering* (2019) DOI:10.1177/2041731419881528
236. Hagiwara A., Kamagata K., Shimoji K., Yokoyama K., Andica C., Hori M., Fujita S., Maekawa T., Irie R., Akashi T., Wada A., Suzuki M., Abe O., Hattori N., Aoki S. White Matter Abnormalities in Multiple Sclerosis Evaluated by Quantitative Synthetic MRI, Diffusion Tensor Imaging, and Neurite Orientation Dispersion and Density Imaging. *American Journal of Neuroradiology* (2019) DOI:10.3174/ajnr.A6209
237. Andica C., Hagiwara A., Hori M., Haruyama T., Fujita S., Maekawa T., Kamagata K., Yoshida M.T., Suzuki M., Sugano H., Arai H., Aoki S. Aberrant myelination in patients with Sturge-Weber syndrome analyzed using synthetic quantitative magnetic resonance imaging. *Neuroradiology* (2019) DOI:10.1007/s00234-019-02250-9
238. Ueda I., Kakeda S., Watanabe K., Sugimoto K., Igata N., Moriya J., Takemoto K., Katsuki A., Yoshimura R., Abe O., Korogi Y. Brain structural connectivity and neuroticism in healthy adults. *Scientific Reports* (2018) DOI:10.1038/s41598-018-34846-1
239. Ogawa C., Kidokoro H., Fukasawa T., Yamamoto H., Ishihara N., Ito Y., Sakaguchi Y., Okai Y., Ohno A., Nakata T., Azuma Y., Hattori A., Kubota T., Tsuji T., Hirakawa A., Kawai H., Natsume J. Cytotoxic edema at onset in West syndrome of unknown etiology: A longitudinal diffusion tensor imaging study. *Epilepsia* (2018) DOI:10.1111/epi.13988
240. Muta Y., Matsuda M., Imajo M. Dynamic ERK signaling regulation in intestinal tumorigenesis. *Molecular and Cellular Oncology* (2018) DOI:10.1080/23723556.2018.1506684

241. Konishi Y., Terai K., Furuta Y., Kiyonari H., Abe T., Ueda Y., Kinashi T., Hamazaki Y., Takaori-Kondo A., Matsuda M. Live-Cell FRET Imaging Reveals a Role of Extracellular Signal-Regulated Kinase Activity Dynamics in Thymocyte Motility. *iScience* (2018) DOI:10.1016/j.isci.2018.11.025
242. Katano T., Takao K., Abe M., Yamazaki M., Watanabe M., Miyakawa T., Sakimura K., Ito S. Distribution of Caskin1 protein and phenotypic characterization of its knockout mice using a comprehensive behavioral test battery. *Molecular Brain* (2018) DOI:10.1186/s13041-018-0407-2
243. Irie R., Kamagata K., Kerever A., Ueda R., Yokosawa S., Otake Y., Ochi H., Yoshizawa H., Hayashi A., Tagawa K., Okazawa H., Takahashi K., Sato K., Hori M., Arikawa-Hirasawa E., Aoki S. The Relationship between Neurite Density Measured with Confocal Microscopy in a Cleared Mouse Brain and Metrics Obtained from Diffusion Tensor and Diffusion Kurtosis Imaging. *Magnetic Resonance in Medical Sciences* (2018) DOI:10.2463/mrms.mp.2017-0031
244. Imanishi A., Murata T., Sato M., Hotta K., Knayoshi I., Matsuda M., Terai K. A Novel Morphological Marker for the Analysis of Molecular Activities at the Single-cell Level. *Cell Structure and Function* (2018) DOI:10.1247/csf.18013
245. Hirata A., Hayashi K., Murata K., Nakamura K.I. Removal of choroidal neovascular membrane in a case of macular hole after anti-VEGF therapy for age-related macular degeneration. *American Journal of Ophthalmology Case Reports* (2018) DOI:10.1016/j.ajoc.2017.12.003
246. Hashimoto N., Ito Y.M., Okada N., Yamamori H., Yasuda Y., Fujimoto M., Kudo N., Takemura A., Son S., Narita H., Yamamoto M., Tha K.K., Katsuki A., Ohi K., Yamashita F., Koike S., Takahashi T., Nemoto K., Fukunaga M., Onitsuka T., Watanabe Y., Yamasue H., Suzuki M., Kasai K., Kusumi I., Hashimoto R., Cocoro. The effect of duration of illness and antipsychotics on subcortical volumes in schizophrenia: Analysis of 778 subjects. *NeuroImage: Clinical* (2018) DOI:10.1016/j.nicl.2017.11.004
247. Goto M., Abe O., Aoki S., Kamagata K., Hori M., Miyati T., Gomi T., Takeda T. Combining Segmented Grey and White Matter Images Improves Voxel-based Morphometry for the Case of Dilated Lateral Ventricles. *Magnetic Resonance in Medical Sciences* (2018) DOI:10.2463/mrms.mp.2017-0127
248. Akiyoshi R., Wake H., Kato D., Horiuchi H., Ono R., Ikegami A., Haruwaka K., Omori T., Tachibana Y., Moorhouse A.J., Nabekura J. Microglia enhance synapse activity to promote local network synchronization. *eNeuro* (2018) DOI:10.1523/ENEURO.0088-18.2018
249. Watanabe T., Imamura T., Hiasa Y. Roles of protein kinase R in cancer: Potential as a therapeutic target. *Cancer Science* (2018) DOI:10.1111/cas.13551
250. Oti T., Takanami K., Ito S., Ueda T., Matsuda K.I., Kawata M., Soh J., Ukimura O., Sakamoto T., Sakamoto H. Effects of Sex Steroids on the Spinal Gastrin-Releasing Peptide System Controlling Male Sexual Function in Rats. *Endocrinology* (2018) DOI:10.1210/en.2018-00043
251. Kuragano M., Uyeda T.Q.P., Kamijo K., Murakami Y., Takahashi M. Different contributions of nonmuscle myosin IIA and IIB to the organization of stress fiber subtypes in fibroblasts. *Molecular Biology of the Cell* (2018) DOI:10.1091/mbc.E17-04-0215
252. Imamura T., Saitou T., Kawakami R. In vivo optical imaging of cancer cell function and tumor microenvironment. *Cancer Science* (2018) DOI:10.1111/cas.13544
253. Tsukamoto M., Chiba K., Sobu Y., Shiraki Y., Okumura Y., Hata S., Kitamura A., Nakaya T., Uchida S., Kinjo M., Taru H., Suzuki T. The cytoplasmic region of the amyloid beta-protein precursor (APP) is necessary and sufficient for the enhanced fast velocity of APP transport by kinesin-1. *FEBS Letters* (2018) DOI:10.1002/1873-3468.13204

254. Todokoro A., Tanaka S.C., Kawakubo Y., Yahata N., Ishii-Takahashi A., Nishimura Y., Kano Y., Ohtake F., Kasai K. Deficient neural activity subserving decision-making during reward waiting time in intertemporal choice in adult attention-deficit hyperactivity disorder. *Psychiatry and Clinical Neurosciences* (2018) DOI:10.1111/pcn.12668
255. Sugimoto K., Kakeda S., Watanabe K., Katsuki A., Ueda I., Igata N., Igata R., Abe O., Yoshimura R., Korogi Y. Relationship between white matter integrity and serum inflammatory cytokine levels in drug-naive patients with major depressive disorder: diffusion tensor imaging study using tract-based spatial statistics. *Translational Psychiatry* (2018) DOI:10.1038/s41398-018-0174-y
256. Saeki A., Sugiyama M., Hasebe A., Suzuki T., Shibata K. Activation of NLRP3 inflammasome in macrophages by mycoplasmal lipoproteins and lipopeptides. *Molecular Oral Microbiology* (2018) DOI:10.1111/omi.12225
257. Ishikawa T., Eto K., Kim S.K., Wake H., Takeda I., Horiuchi H., Moorhouse A.J., Ishibashi H., Nabekura J. Cortical astrocytes prime the induction of spine plasticity and mirror image pain. *Pain* (2018) DOI:10.1097/j.pain.0000000000001248
258. Grzybowski M., Taki M., Senda K., Sato Y., Ariyoshi T., Okada Y., Kawakami R., Imamura T., Yamaguchi S. A Highly Photostable Near-Infrared Labeling Agent Based on a Phosphorhodamine for Long-Term and Deep Imaging. *Angewandte Chemie-International Edition* (2018) DOI:10.1002/anie.201804731
259. Takahashi T., Mori T., Ueda K., Yamada P., Nagahara S., Higashiyama T., Sawada H., Igawa T. The male gamete membrane protein DMP9/DAU2 is required for double fertilization in flowering plants. *Development* (2018) DOI:10.1242/dev.170076
260. Saitou T., Takanezawa S., Ninomiya H., Watanabe T., Yamamoto S., Hiasa Y., Imamura T. Tissue Intrinsic Fluorescence Spectra-Based Digital Pathology of Liver Fibrosis by Marker-Controlled Segmentation. *Frontiers in Medicine* (2018) DOI:10.3389/fmed.2018.00350
261. Koshiyama D., Fukunaga M., Okada N., Morita K., Nemoto K., Yamashita F., Yamamori H., Yasuda Y., Fujimoto M., Kelly S., Jahanshad N., Kudo N., Azechi H., Watanabe Y., Donohoe G., Thompson P.M., Kasai K., Hashimoto R. Role of frontal white matter and corpus callosum on social function in schizophrenia. *Schizophrenia Research* (2018) DOI:10.1016/j.schres.2018.07.009
262. Kaneko N., Herranz-Perez V., Otsuka T., Sano H., Ohno N., Omata T., Nguyen H.B., Thai T.Q., Nambu A., Kawaguchi Y., Garcia-Verdugo J.M., Sawamoto K. New neurons use Slit-Robo signaling to migrate through the glial meshwork and approach a lesion for functional regeneration. *Science Advances* (2018) DOI:10.1126/sciadv.aav0618
263. Ishiyama S., Shibata Y., Ayuzawa S., Matsushita A., Matsumura A. Clinical Effect of C2 Peripheral Nerve Field Stimulation Using Electroacupuncture for Primary Headache. *Neuromodulation* (2018) DOI:10.1111/ner.12772
264. Hayashi Y., Jinnou H., Sawamoto K., Hitoshi S. Adult neurogenesis and its role in brain injury and psychiatric diseases. *Journal of Neurochemistry* (2018) DOI:10.1111/jnc.14557
265. Hara S., Hori M., Inaji M., Maehara T., Aoki S., Nariai T. Regression of White Matter Hyperintensity after Indirect Bypass Surgery in a Patient with Moyamoya Disease. *Magnetic Resonance in Medical Sciences* (2018) DOI:10.2463/mrms.ci.2018-0088
266. Tanoue R., Ohta K., Miyazono Y., Iwanaga J., Koba A., Natori T., Iwamoto O., Nakamura K.I., Kusukawa J. Three-dimensional ultrastructural analysis of the interface between an implanted demineralised dentin matrix and the surrounding newly formed bone. *Scientific Reports* (2018) DOI:10.1038/s41598-018-21291-3

267. Sawada M., Ohno N., Kawaguchi M., Huang S.H., Hikita T., Sakurai Y., Nguyen H.B., Thai T.Q., Ishido Y., Yoshida Y., Nakagawa H., Uemura A., Sawamoto K. PlexinD1 signaling controls morphological changes and migration termination in newborn neurons. *EMBO Journal* (2018) DOI:10.15252/embj.201797404
268. Saitou T., Kiyomatsu H., Imamura T. Quantitative Morphometry for Osteochondral Tissues Using Second Harmonic Generation Microscopy and Image Texture Information. *Scientific Reports* (2018) DOI:10.1038/s41598-018-21005-9
269. Nakamura A., Tasaki T., Okuni Y., Song C.H., Murata K., Kozai T., Hara M., Sugimoto H., Suzuki K., Watanabe T., Uchihashi T., Noji H., Iino R. Rate constants, processivity, and productive binding ratio of chitinase A revealed by single-molecule analysis. *Physical Chemistry Chemical Physics* (2018) DOI:10.1039/c7cp04606e
270. Ishii Y., Maruyama S., Fujimura-Kamada K., Kutsuna N., Takahashi S., Kawata M., Minagawa J. Isolation of uracil auxotroph mutants of coral symbiont alga for symbiosis studies. *Scientific Reports* (2018) DOI:10.1038/s41598-018-21499-3
271. Ohta Y., Furuta T., Nagai T., Horikawa K. Red fluorescent cAMP indicator with increased affinity and expanded dynamic range. *Scientific Reports* (2018) DOI:10.1038/s41598-018-20251-1
272. Ogasawara H., Grzybowski M., Hosokawa R., Sato Y., Taki M., Yamaguchi S. A far-red fluorescent probe based on a phospho-fluorescein scaffold for cytosolic calcium imaging. *Chemical Communications* (2018) DOI:10.1039/c7cc07344e
273. Koshiyama D., Fukunaga M., Okada N., Yamashita F., Yamamori H., Yasuda Y., Fujimoto M., Ohi K., Fujino H., Watanabe Y., Kasai K., Hashimoto R. Subcortical association with memory performance in schizophrenia: a structural magnetic resonance imaging study. *Translational Psychiatry* (2018) DOI:10.1038/s41398-017-0069-3
274. Koshiyama D., Fukunaga M., Okada N., Yamashita F., Yamamori H., Yasuda Y., Fujimoto M., Ohi K., Fujino H., Watanabe Y., Kasai K., Hashimoto R. Role of subcortical structures on cognitive and social function in schizophrenia. *Scientific Reports* (2018) DOI:10.1038/s41598-017-18950-2
275. Kimura Y., Tasaka M., Torii K.U., Uchida N. ERECTA-family genes coordinate stem cell functions between the epidermal and internal layers of the shoot apical meristem. *Development* (2018) DOI:10.1242/dev.156380
276. Hirata A., Murata K., Hayashi K., Nakamura K. Three-Dimensional Analysis of Peeled Internal Limiting Membrane Using Focused Ion Beam/Scanning Electron Microscopy. *Translational Vision Science & Technology* (2018) DOI:10.1167/tvst.7.1.15
277. Fujimoto T., Kuwahara T., Eguchi T., Sakurai M., Komori T., Iwatsubo T. Parkinson's disease-associated mutant LRRK2 phosphorylates Rab7L1 and modifies trans-Golgi morphology. *Biochemical and Biophysical Research Communications* (2018) DOI:10.1016/j.bbrc.2017.12.024
278. Goto M., Yamashita F., Kawaguchi A., Abe O., Aoki S., Miyati T., Gomi T., Takeda T., Japanese Alzheimer's Dis N. The Effect of Single-Scan and Scan-Pair Intensity Inhomogeneity Correction Methods on Repeatability of Voxel-Based Morphometry With Multiple Magnetic Resonance Scanners. *Journal of Computer Assisted Tomography* (2018) DOI:10.1097/rct.0000000000000657
279. Watanabe T., Song C.H., Murata K., Kureha T., Suzuki D. Seeded Emulsion Polymerization of Styrene in the Presence of Water-Swollen Hydrogel Microspheres. *Langmuir* (2018) DOI:10.1021/acs.langmuir.8b01047

280. Kikuchi K., Nakamura A., Arata M., Shi D.B., Nakagawa M., Tanaka T., Uemura T., Fujimori T., Kikuchi A., Uezu A., Sakamoto Y., Nakanishi H. Map7/7D1 and Dvl form a feedback loop that facilitates microtubule remodeling and Wnt5a signaling. *EMBO Reports* (2018) DOI:10.15252/embr.201745471
281. Kamiya K., Okada N., Sawada K., Watanabe Y., Irie R., Hanaoka S., Suzuki Y., Koike S., Mori H., Kunimatsu A., Hori M., Aoki S., Kasai K., Abe O. Diffusional kurtosis imaging and white matter microstructure modeling in a clinical study of major depressive disorder. *NMR in Biomedicine* (2018) DOI:10.1002/nbm.3938
282. Kakeda S., Watanabe K., Katsuki A., Sugimoto K., Igata N., Ueda I., Igata R., Abe O., Yoshimura R., Korogi Y. Relationship between interleukin (IL)-6 and brain morphology in drug-naive, first-episode major depressive disorder using surface-based morphometry. *Scientific Reports* (2018) DOI:10.1038/s41598-018-28300-5
283. Hirota K., Yasoda A., Kanai Y., Ueda Y., Yamauchi I., Yamashita T., Sakane Y., Fujii T., Inagaki N. Live imaging analysis of the growth plate in a murine long bone explanted culture system. *Scientific Reports* (2018) DOI:10.1038/s41598-018-28742-x
284. Hagiwara A., Hori M., Kamagata K., Warntjes M., Matsuyoshi D., Nakazawa M., Ueda R., Andica C., Koshino S., Maekawa T., Irie R., Takamura T., Kumamaru K.K., Abe O., Aoki S. Myelin Measurement: Comparison Between Simultaneous Tissue Relaxometry, Magnetization Transfer Saturation Index, and T(1)w/T(2)w Ratio Methods. *Scientific Reports* (2018) DOI:10.1038/s41598-018-28852-6
285. Otomo K., Hibi T., Fang Y.C., Hung J.H., Tsutsumi M., Kawakami R., Yokoyama H., Nemoto T. Advanced easy STED microscopy based on two-photon excitation by electrical modulations of light pulse wavefronts. *Biomedical Optics Express* (2018) DOI:10.1364/boe.9.002671
286. Muta Y., Fujita Y., Sumiyama K., Sakurai A., Taketo M.M., Chiba T., Seno H., Aoki K., Matsuda M., Imajo M. Composite regulation of ERK activity dynamics underlying tumour-specific traits in the intestine. *Nature Communications* (2018) DOI:10.1038/s41467-018-04527-8
287. Komatsu N., Terai K., Imanishi A., Kamioka Y., Sumiyama K., Jin T., Okada Y., Nagai T., Matsuda M. A platform of BRET-FRET hybrid biosensors for optogenetics, chemical screening, and in vivo imaging. *Scientific Reports* (2018) DOI:10.1038/s41598-018-27174-x
288. Inaba K., Shiba K. Microscopic analysis of sperm movement: links to mechanisms and protein components. *Microscopy* (2018) DOI:10.1093/jmicro/dfy021
289. Lin H.A., Sato Y., Segawa Y., Nishihara T., Sugimoto N., Scott L.T., Higashiyama T., Itami K. A Water-Soluble Warped Nanographene: Synthesis and Applications for Photoinduced Cell Death. *Angewandte Chemie-International Edition* (2018) DOI:10.1002/anie.201713387
290. Kuragano M., Murakami Y., Takahashi M. Nonmuscle myosin IIA and IIB differentially contribute to intrinsic and directed migration of human embryonic lung fibroblasts. *Biochemical and Biophysical Research Communications* (2018) DOI:10.1016/j.bbrc.2018.02.171
291. Hori M., Hagiwara A., Fukunaga I., Ueda R., Kamiya K., Suzuki Y., Liu W., Murata K., Takamura T., Hamasaki N., Irie R., Kamagata K., Kumamaru K.K., Suzuki M., Aoki S. Application of Quantitative Microstructural MR Imaging with Atlas-based Analysis for the Spinal Cord in Cervical Spondylotic Myelopathy. *Scientific Reports* (2018) DOI:10.1038/s41598-018-23527-8

292. Goto M., Kamagata K., Hatano T., Hattori N., Abe O., Aoki S., Hori M., Gomi T. Depressive symptoms in Parkinson's disease are related to decreased left hippocampal volume: correlation with the 15-item shortened version of the Geriatric Depression Scale. *Acta Radiologica* (2018) DOI:10.1177/0284185117719100
293. Tanaka K., Takeda S., Mitsuoka K., Oda T., Kimura-Sakiyama C., Maeda Y., Narita A. Structural basis for cofilin binding and actin filament disassembly. *Nature Communications* (2018) DOI:10.1038/s41467-018-04290-w
294. Matsuyama S., Kage Y., Fujimoto N., Ushijima T., Tsuruda T., Kitamura K., Shiose A., Asada Y., Sumimoto H., Takeya R. Interaction between cardiac myosin-binding protein C and formin Fhod3. *Proceedings of the National Academy of Sciences of the United States of America* (2018) DOI:10.1073/pnas.1716498115
295. Kuno M., Hirano Y., Nakagawa A., Asano K., Oshima F., Nagaoka S., Matsumoto K., Masuda Y., Iyo M., Shimizu E. White Matter Features Associated With Autistic Traits in Obsessive-Compulsive Disorder. *Frontiers in Psychiatry* (2018) DOI:10.3389/fpsy.2018.00216
296. Fujikake K., Sawada M., Hikita T., Seto Y., Kaneko N., Herranz-Perez V., Dohi N., Homma N., Osaga S., Yanagawa Y., Akaike T., Garcia-Verdugo J.M., Hattori M., Sobue K., Sawamoto K. Detachment of Chain-Forming Neuroblasts by Fyn-Mediated Control of cell-cell Adhesion in the Postnatal Brain. *Journal of Neuroscience* (2018) DOI:10.1523/jneurosci.1960-17.2018
297. Andica C., Hagiwara A., Hori M., Nakazawa M., Goto M., Koshino S., Kamagata K., Kumamaru K.K., Aoki S. Automated brain tissue and myelin volumetry based on quantitative MR imaging with various in-plane resolutions. *Journal of Neuroradiology* (2018) DOI:10.1016/j.neurad.2017.10.002
298. Takeda A., Shinozaki Y., Kashiwagi K., Ohno N., Eto K., Wake H., Nabekura J., Koizumi S. Microglia mediate non-cell-autonomous cell death of retinal ganglion cells. *Glia* (2018) DOI:10.1002/glia.23475
299. Sano T., Kobayashi T., Ogawa O., Matsuda M. Gliding Basal Cell Migration of the Urothelium during Wound Healing. *American Journal of Pathology* (2018) DOI:10.1016/j.ajpath.2018.07.010
300. Okada N., Yahata N., Koshiyama D., Morita K., Sawada K., Kanata S., Fujikawa S., Sugimoto N., Toriyama R., Masaoka M., Koike S., Araki T., Kano Y., Endo K., Yamasaki S., Ando S., Nishida A., Hiraiwa-Hasegawa M., Kasai K. Abnormal asymmetries in subcortical brain volume in early adolescents with subclinical psychotic experiences. *Translational Psychiatry* (2018) DOI:10.1038/s41398-018-0312-6
301. Ida-Yonemochi H., Morita W., Sugiura N., Kawakami R., Morioka Y., Takeuchi Y., Sato T., Shibata S., Watanabe H., Imamura T., Igarashi M., Ohshima H., Takeuchi K. Craniofacial abnormality with skeletal dysplasia in mice lacking chondroitin sulfate N-acetylgalactosaminyltransferase-1. *Scientific Reports* (2018) DOI:10.1038/s41598-018-35412-5
302. Hirano T., Konno H., Takeda S., Dolan L., Kato M., Aoyama T., Higaki T., Takigawa-Imamura H., Sato M.H. PtdIns(3,5)P-2 mediates root hair shank hardening in Arabidopsis. *Nature Plants* (2018) DOI:10.1038/s41477-018-0277-8
303. Abe T., Kutsuna N., Kiyonari H., Furuta Y., Fujimori T. ROSA26 reporter mouse lines and image analyses reveal distinct region-specific cell behaviors in the visceral endoderm. *Development* (2018) DOI:10.1242/dev.165852
304. Tsunoda J., Song C.H., Imai F.L., Takagi J., Ueno H., Murata T., Iino R., Murata K. Off-axis rotor in *Enterococcus hirae* V-ATPase visualized by Zernike phase plate single-particle cryo-electron microscopy. *Scientific Reports* (2018) DOI:10.1038/s41598-018-33977-9

305. Hara S., Hori M., Murata S., Ueda R., Tanaka Y., Inaji M., Maehara T., Aoki S., Nariai T. Microstructural Damage in Normal-Appearing Brain Parenchyma and Neurocognitive Dysfunction in Adult Moyamoya Disease. *Stroke* (2018) DOI:10.1161/strokeaha.118.022367
306. Ageta-Ishihara N., Konno K., Yamazaki M., Abe M., Sakimura K., Watanabe M., Kinoshita M. CDC42EP4, a perisynaptic scaffold protein in Bergmann glia, is required for glutamatergic tripartite synapse configuration. *Neurochemistry International* (2018) DOI:10.1016/j.neuint.2018.01.003
307. Miyatake Y., Kuribayashi-Shigetomi K., Ohta Y., Ikeshita S., Subagyo A., Sueoka K., Kakugo A., Amano M., Takahashi T., Okajima T., Kasahara M. Visualising the dynamics of live pancreatic microtumours self-organised through cell-in-cell invasion. *Scientific Reports* (2018) DOI:10.1038/s41598-018-32122-w
308. Kakegawa W., Katoh A., Narumi S., Miura E., Motohashi J., Takahashi A., Kohda K., Fukazawa Y., Yuzaki M., Matsuda S. Optogenetic Control of Synaptic AMPA Receptor Endocytosis Reveals Roles of LTD in Motor Learning. *Neuron* (2018) DOI:10.1016/j.neuron.2018.07.034
309. Eguchi T., Kuwahara T., Sakurai M., Komori T., Fujimoto T., Ito G., Yoshimura S., Harada A., Fukuda M., Koike M., Iwatsubo T. LRRK2 and its substrate Rab GTPases are sequentially targeted onto stressed lysosomes and maintain their homeostasis. *Proceedings of the National Academy of Sciences of the United States of America* (2018) DOI:10.1073/pnas.1812196115
310. Ageta H., Ageta-Ishihara N., Hitachi K., Karayel O., Onouchi T., Yamaguchi H., Kahyo T., Hatanaka K., Ikegami K., Yoshioka Y., Nakamura K., Kosaka N., Nakatani M., Uezumi A., Ide T., Tsutsumi Y., Sugimura H., Kinoshita M., Ochiya T., Mann M., Setou M., Tsuchida K. UBL3 modification influences protein sorting to small extracellular vesicles. *Nature Communications* (2018) DOI:10.1038/s41467-018-06197-y
311. Yamaguchi S., Fukazawa A., Taki M. Phosphole P-oxide-containing ϕ -electron materials: Synthesis and applications in fluorescence imaging. *Yuki Gosei Kagaku Kyokaiishi/Journal of Synthetic Organic Chemistry* (2017) DOI:10.5059/yukigoseikyokaishi.75.1179
312. Watanabe R., Kakeda S., Watanabe K., Liu X., Katsuki A., Umeno-Nakano W., Hori H., Abe O., Yoshimura R., Korogi Y. Relationship between the hippocampal shape abnormality and serum cortisol levels in first-episode and drug-naïve major depressive disorder patients. *Depression and Anxiety* (2017) DOI:10.1002/da.22604
313. Tsuchiyagaito A., Hirano Y., Asano K., Oshima F., Nagaoka S., Takebayashi Y., Matsumoto K., Masuda Y., Iyo M., Shimizu E., Nakagawa A. Cognitive-behavioral therapy for obsessive-compulsive disorder with and without autism spectrum disorder: Gray matter differences associated with poor outcome. *Frontiers in Psychiatry* (2017) DOI:10.3389/fpsy.2017.00143
314. Takemura M.Y., Hori M., Yokoyama K., Hamasaki N., Suzuki M., Kamagata K., Kamiya K., Suzuki Y., Kyogoku S., Masutani Y., Hattori N., Aoki S. Alterations of the optic pathway between unilateral and bilateral optic nerve damage in multiple sclerosis as revealed by the combined use of advanced diffusion kurtosis imaging and visual evoked potentials. *Magnetic Resonance Imaging* (2017) DOI:10.1016/j.mri.2016.04.011
315. Takeda K., Matsumoto M., Ogata Y., Maida K., Murakami H., Murayama K., Shimoji K., Hanakawa T., Matsumoto K., Nakagome K. Impaired prefrontal activity to regulate the intrinsic motivation-action link in schizophrenia. *NeuroImage: Clinical* (2017) DOI:10.1016/j.nicl.2017.07.003

316. Saito J., Hori M., Nemoto T., Katagiri N., Shimoji K., Ito S., Tsujino N., Yamaguchi T., Shiraga N., Aoki S., Mizuno M. Longitudinal study examining abnormal white matter integrity using a tract-specific analysis in individuals with a high risk for psychosis. *Psychiatry and Clinical Neurosciences* (2017) DOI:10.1111/pcn.12515
317. Kawaoka T., Ohnuki S., Ohya Y., Suzuki K. Morphometric analysis of autophagy-related structures in *Saccharomyces cerevisiae*. *Autophagy* (2017) DOI:10.1080/15548627.2017.1384888
318. Jin M., Pomp O., Shinoda T., Toba S., Torisawa T., Furuta K., Oiwa K., Yasunaga T., Kitagawa D., Matsumura S., Miyata T., Tan T.T., Reversade B., Hirotsune S. Katanin p80, NuMA and cytoplasmic dynein cooperate to control microtubule dynamics. *Scientific Reports* (2017) DOI:10.1038/srep39902
319. Igata N., Kakeda S., Watanabe K., Nozaki A., Rettmann D., Narimatsu H., Ide S., Abe O., Korogi Y. Utility of real-time prospective motion correction (PROMO) for segmentation of cerebral cortex on 3D T1-weighted imaging: Voxel-based morphometry analysis for uncooperative patients. *European Radiology* (2017) DOI:10.1007/s00330-016-4730-7
320. Igata N., Kakeda S., Watanabe K., Ide S., Kishi T., Abe O., Igata R., Katsuki A., Iwata N., Yoshimura R., Korogi Y. Voxel-based morphometric brain comparison between healthy subjects and major depressive disorder patients in Japanese with the s/s genotype of 5-HTTLPR. *Scientific Reports* (2017) DOI:10.1038/s41598-017-04347-8
321. Hori M., Kamiya K., Irie R. Advanced diffusion-weighted magnetic resonance imaging in the evaluation of white matter axons in patients with idiopathic normal pressure hydrocephalus. *Neural Regeneration Research* (2017) DOI:10.4103/1673-5374.221149
322. Hagiwara A., Hori M., Yokoyama K., Takemura M.Y., Andica C., Kumamaru K.K., Nakazawa M., Takano N., Kawasaki H., Sato S., Hamasaki N., Kunimatsu A., Aoki S. Utility of a multiparametric quantitative MRI model that assesses myelin and edema for evaluating plaques, periplaque white matter, and normal-appearing white matter in patients with multiple sclerosis: A feasibility study. *American Journal of Neuroradiology* (2017) DOI:10.3174/ajnr.A4977
323. Goto M., Abe O., Miyati T., Aoki S., Gomi T., Takeda T. Mis-segmentation in voxel-based morphometry due to a signal intensity change in the putamen. *Radiological Physics and Technology* (2017) DOI:10.1007/s12194-017-0424-3
324. Goto M., Abe O., Hata J., Fukunaga I., Shimoji K., Kunimatsu A., Gomi T. Adverse effects of metallic artifacts on voxel-wise analysis and tract-based spatial statistics in diffusion tensor imaging. *Acta Radiologica* (2017) DOI:10.1177/0284185116641348
325. Abe H., Shimoji K., Nagamine Y., Fujiwara S., Izumi S.I. Predictors of Recovery from Traumatic Brain Injury-Induced Prolonged Consciousness Disorder. *Neural Plasticity* (2017) DOI:10.1155/2017/9358092
326. Abe H., Keigo S., Takeo K., Takanori K., Yoshihide N., Satoru F., Yutaka O., Shin-Ichi I. Longitudinal White Matter Alteration in Prolonged Disorders of Consciousness due to Traffic Accidents. *International Journal of Neurology and Neurotherapy* (2017) DOI:10.23937/2378-3001/1410064
327. Sato K., Kerever A., Kamagata K., Tsuruta K., Irie R., Tagawa K., Okazawa H., Arikawa-Hirasawa E., Nitta N., Aoki I., Aoki S. Understanding microstructure of the brain by comparison of neurite orientation dispersion and density imaging (NODDI) with transparent mouse brain. *Acta Radiologica Open* (2017) DOI:10.1177/2058460117703816
328. Kimura K., Mamane A., Sasaki T., Sato K., Takagi J., Niwayama R., Hufnagel L., Shimamoto Y., Joanny J.F., Uchida S., Kimura A. Endoplasmic-reticulum-mediated microtubule alignment governs cytoplasmic streaming. *Nature Cell Biology* (2017) DOI:10.1038/ncb3490

329. Andica C., Hagiwara A., Nakazawa M., Kumamaru K.K., Hori M., Ikeno M., Shimizu T., Aoki S. Synthetic MR Imaging in the Diagnosis of Bacterial Meningitis. *Magnetic Resonance in Medical Sciences* (2017) DOI:10.2463/mrms.ci.2016-0082
330. Wang C.G., Taki M., Sato Y., Fukazawa A., Higashiyama T., Yamaguchi S. Super-Photostable Phosphole-Based Dye for Multiple-Acquisition Stimulated Emission Depletion Imaging. *Journal of the American Chemical Society* (2017) DOI:10.1021/jacs.7b04418
331. Takano N., Suzuki M., Irie R., Yamamoto M., Teranishi K., Yatomi K., Hamasaki N., Kumamaru K.K., Hori M., Oishi H., Aoki S. Non-Contrast-Enhanced Silent Scan MR Angiography of Intracranial Anterior Circulation Aneurysms Treated with a Low-Profile Visualized Intraluminal Support Device. *American Journal of Neuroradiology* (2017) DOI:10.3174/ajnr.A5223
332. Sobu Y., Furukori K., Chiba K., Nairn A.C., Kinjo M., Hata S., Suzuki T. Phosphorylation of multiple sites within an acidic region of Alcadein alpha is required for kinesin-1 association and Golgi exit of Alcadein alpha cargo. *Molecular Biology of the Cell* (2017) DOI:10.1091/mbc.E17-05-0301
333. Nakao A., Miyazaki N., Ohira K., Hagihara H., Takagi T., Usuda N., Ishii S., Murata K., Miyakawa T. Immature morphological properties in subcellular-scale structures in the dentate gyrus of Schnurri-2 knockout mice: a model for schizophrenia and intellectual disability. *Molecular Brain* (2017) DOI:10.1186/s13041-017-0339-2
334. Koike S., Satomura Y., Kawasaki S., Nishimura Y., Kinoshita A., Sakurada H., Yamagishi M., Ichikawa E., Matsuoka J., Okada N., Takizawa R., Kasai K. Application of functional near infrared spectroscopy as supplementary examination for diagnosis of clinical stages of psychosis spectrum. *Psychiatry and Clinical Neurosciences* (2017) DOI:10.1111/pcn.12551
335. Hori M., Irie R., Suzuki M., Aoki S. Teaching Neuroimages: Obscured Cerebral Infarction on MRI. *Clinical Neuroradiology* (2017) DOI:10.1007/s00062-017-0576-x
336. Chiba K., Chien K.Y., Sobu Y., Hata S., Kato S., Nakaya T., Okada Y., Nairn A.C., Kinjo M., Taru H., Wang R., Suzuki T. Phosphorylation of KLC1 modifies interaction with JIP1 and abolishes the enhanced fast velocity of APP transport by kinesin-1. *Molecular Biology of the Cell* (2017) DOI:10.1091/mbc.E17-05-0303
337. Uno K., Sasaki T., Sugimoto N., Ito H., Nishihara T., Hagihara S., Higashiyama T., Sasaki N., Sato Y., Itami K. Key Structural Elements of Unsymmetrical Cyanine Dyes for Highly Sensitive Fluorescence Turn-On DNA Probes. *Chemistry-an Asian Journal* (2017) DOI:10.1002/asia.201601430
338. Mizuno Y., Jung M., Fujisawa T.X., Takiguchi S., Shimada K., Saito D.N., Kosaka H., Tomoda A. Catechol-O-methyltransferase polymorphism is associated with the cortico-cerebellar functional connectivity of executive function in children with attention-deficit/hyperactivity disorder. *Scientific Reports* (2017) DOI:10.1038/s41598-017-04579-8
339. Katoh M., Wu B., Nguyen H.B., Thai T.Q., Yamasaki R., Lu H.Y., Rietsch A.M., Zorlu M.M., Shinozaki Y., Saitoh Y., Saitoh S., Sakoh T., Ikenaka K., Koizumi S., Ransohoff R.M., Ohno N. Polymorphic regulation of mitochondrial fission and fusion modifies phenotypes of microglia in neuroinflammation. *Scientific Reports* (2017) DOI:10.1038/s41598-017-05232-0
340. Morizawa Y.M., Hirayama Y., Ohno N., Shibata S., Shigetomi E., Sui Y., Nabekura J., Sato K., Okajima F., Takebayashi H., Okano H., Koizumi S. Reactive astrocytes function as phagocytes after brain ischemia via ABCA1-mediated pathway. *Nature Communications* (2017) DOI:10.1038/s41467-017-00037-1

341. Kotani R., Sotome H., Okajima H., Yokoyama S., Nakaike Y., Kashiwagi A., Mori C., Nakada Y., Yamaguchi S., Osuka A., Sakamoto A., Miyasaka H., Saito S. Flapping viscosity probe that shows polarity-independent ratiometric fluorescence. *Journal of Materials Chemistry C* (2017) DOI:10.1039/c7tc01533j
342. Kaneko N., Sawada M., Sawamoto K. Mechanisms of neuronal migration in the adult brain. *Journal of Neurochemistry* (2017) DOI:10.1111/jnc.14002
343. Arai R., Sugawara T., Sato Y., Minakuchi Y., Toyoda A., Nabeshima K., Kimura H., Kimura A. Reduction in chromosome mobility accompanies nuclear organization during early embryogenesis in *Caenorhabditis elegans*. *Scientific Reports* (2017) DOI:10.1038/s41598-017-03483-5
344. Takano N., Suzuki M., Irie R., Yamamoto M., Hamasaki N., Kamagata K., Kumamaru K.K., Hori M., Oishi H., Aoki S. Usefulness of Non-Contrast-Enhanced MR Angiography Using a Silent Scan for Follow-Up after Y-Configuration Stent-Assisted Coil Embolization for Basilar Tip Aneurysms. *American Journal of Neuroradiology* (2017) DOI:10.3174/ajnr.A5033
345. Ikematsu S., Tasaka M., Torii K.U., Uchida N. ERECTA-family receptor kinase genes redundantly prevent premature progression of secondary growth in the Arabidopsis hypocotyl. *New Phytologist* (2017) DOI:10.1111/nph.14335
346. Tsuiji H., Inoue I., Takeuchi M., Furuya A., Yamakage Y., Watanabe S., Koike M., Hattori M., Yamanaka K. TDP-43 accelerates age-dependent degeneration of interneurons. *Scientific Reports* (2017) DOI:10.1038/s41598-017-14966-w
347. Sasabayashi D., Takayanagi Y., Takahashi T., Koike S., Yamasue H., Katagiri N., Sakuma A., Obara C., Nakamura M., Furuichi A., Kido M., Nishikawa Y., Noguchi K., Matsumoto K., Mizuno M., Kasai K., Suzuki M. Increased Occipital Gyrfication and Development of Psychotic Disorders in Individuals With an At-Risk Mental State: A Multicenter Study. *Biological Psychiatry* (2017) DOI:10.1016/j.biopsych.2017.05.018
348. Konagaya Y., Terai K., Hirao Y., Takakura K., Imajo M., Kamioka Y., Sasaoka N., Kakizuka A., Sumiyama K., Asano T., Matsuda M. A Highly Sensitive FRET Biosensor for AMPK Exhibits Heterogeneous AMPK Responses among Cells and Organs. *Cell Reports* (2017) DOI:10.1016/j.celrep.2017.10.113
349. Shinozaki Y., Kashiwagi K., Namekata K., Takeda A., Ohno N., Robaye B., Harada T., Iwata T., Koizumi S. Purinergic dysregulation causes hypertensive glaucoma-like optic neuropathy. *JCI Insight* (2017) DOI:10.1172/jci.insight.93456
350. Hagiwara A., Warntjes M., Hori M., Andica C., Nakazawa M., Kumamaru K.K., Abe O., Aoki S. SyMRI of the Brain Rapid Quantification of Relaxation Rates and Proton Density, With Synthetic MRI, Automatic Brain Segmentation, and Myelin Measurement. *Investigative Radiology* (2017) DOI:10.1097/rli.0000000000000365
351. Hagiwara A., Hori M., Yokoyama K., Nakazawa M., Ueda R., Horita M., Andica C., Abe O., Aoki S. Analysis of White Matter Damage in Patients with Multiple Sclerosis via a Novel In Vivo MR Method for Measuring Myelin, Axons, and G-Ratio. *American Journal of Neuroradiology* (2017) DOI:10.3174/ajnr.A5312
352. Satoh T., Song C., Zhu T., Toshimori T., Murata K., Hayashi Y., Kamikubo H., Uchihashi T., Kato K. Visualisation of a flexible modular structure of the ER folding-sensor enzyme UGGT. *Scientific Reports* (2017) DOI:10.1038/s41598-017-12283-w
353. Matsumoto-Makidono Y., Nakayama H., Yamasaki M., Miyazaki T., Kobayashi K., Watanabe M., Kano M., Sakimura K., Hashimoto K. Ionic Basis for Membrane Potential Resonance in Neurons of the Inferior Olive. *Cell Reports* (2016) DOI:10.1016/j.celrep.2016.06.053

354. Aramaki S., Mayanagi K., Jin M., Aoyama K., Yasunaga T. Filopodia formation by crosslinking of F-actin with fascin in two different binding manners. *Cytoskeleton* (2016) DOI:10.1002/cm.21309
355. Tsuboyama K., Koyama-Honda I., Sakamaki Y., Koike M., Morishita H., Mizushima N. The ATG conjugation systems are important for degradation of the inner autophagosomal membrane. *Science* (2016) DOI:10.1126/science.aaf6136
356. Sakakibara E., Homae F., Kawasaki S., Nishimura Y., Takizawa R., Koike S., Kinoshita A., Sakurada H., Yamagishi M., Nishimura F., Yoshikawa A., Inai A., Nishioka M., Eriguchi Y., Matsuoka J., Satomura Y., Okada N., Kakiuchi C., Araki T., Kan C., Umeda M., Shimazu A., Uga M., Dan I., Hashimoto H., Kawakami N., Kasai K. Detection of resting state functional connectivity using partial correlation analysis: A study using multi-distance and whole-head probe near-infrared spectroscopy. *NeuroImage* (2016) DOI:10.1016/j.neuroimage.2016.08.011
357. Matsumoto J., Miura K., Fukunaga M., Nemoto K., Koshiyama D., Okada N., Morita K., Yamamori H., Yasuda Y., Fujimoto M., Ito S., Hasegawa N., Watanabe Y., Kasai K., Hashimoto R. Association Study Between White Matter Microstructure and Intelligence Decline in Schizophrenia. *Clinical EEG and Neuroscience* DOI:10.1177/15500594211063314
358. Tomiyama H., Murayama K., Nemoto K., Tomita M., Hasuzawa S., Mizobe T., Kato K., Ohno A., Tsuruta S., Togao O., Hiwatashi A., Nakao T. Increased functional connectivity between presupplementary motor area and inferior frontal gyrus associated with the ability of motor response inhibition in obsessive-compulsive disorder. *Human Brain Mapping* DOI:10.1002/hbm.25699