

Horst Vogel

代表性论文

- (1) Chan S., Li Y., **Vogel H***, Yuan S.. New binding sites, new opportunities for GPCR drug discovery. *Trends in Biochemical Sciences*, doi:10.1016/j.tibs.2018.11.011 (2019)
- (2) Pick, H., Alves, A. C., & **Vogel, H***. Single-vesicle assays using liposomes and cell-derived vesicles: from modeling complex membrane processes to synthetic biology and biomedical applications. *Chemical reviews*, doi: 10.1021/acs.chemrev.7b00777 (2018)
- (3) Yuan, S., Filipek, S., & **Vogel, H***. A gating mechanism of the serotonin 5-HT₃ receptor. *Structure*, doi: 10.1016/j.str.2016.03.019 (2016)
- (4) Yuan, S., Palczewski, K., Peng, Q., Kolinski, M., **Vogel, H***, & Filipek, S. The Mechanism of Ligand-Induced Activation or Inhibition of μ - and κ -Opioid Receptors. *Angewandte Chemie International Edition*, doi: 10.1002/anie.201501742 (2015)
- (5) Yuan, S., Hu, Z., Filipek, S., & **Vogel, H***. W2466. 48 opens a gate for a continuous intrinsic water pathway during activation of the adenosine A_{2A} receptor. *Angewandte Chemie International Edition*, doi: 10.1002/anie.201409679 (2015)
- (6) Yuan, S., Filipek, S., Palczewski, K., & **Vogel, H***. Activation of G-protein-coupled receptors correlates with the formation of a continuous internal water pathway. *Nature communications*, doi:10.1038/ncomms5733 (2014)
- (7) Hassaine, G., Deluz, C., Grasso, L., Wyss, R., Tol, M. B., Hovius, R., ... **Vogel, H***. & Nury H. X-ray structure of the mouse serotonin 5-HT₃ receptor. *Nature*, doi:10.1038/nature13552 (2014)
- (8) Werner, M., Kuratli, C., Martin, R. E., Hochstrasser, R., Wechsler, D., Enderle, T., ... & **Vogel, H***. Seamless Integration of Dose-Response Screening and Flow Chemistry: Efficient Generation of Structure–Activity Relationship Data of β -Secretase (BACE1) Inhibitors. *Angewandte Chemie International Edition*, doi:10.1002/anie.201309301 (2014)
- (9) Yuan, S., **Vogel, H***, & Filipek, S. The Role of Water and Sodium Ions in the Activation of the μ -Opioid Receptor. *Angewandte Chemie International Edition*, doi:10.1002/anie.201302244 (2013)
- (10) Sandén, T., Wyss, R., Santschi, C., Hassaine, G., Deluz, C., Martin, O. J., ... & **Vogel, H***. A zeptoliter volume meter for analysis of single protein molecules. *Nano letters*, doi : 10.1021/nl2036468 (2011)
- (11) Roizard, S., Danelon, C., Hassaine, G., Piguet, J., Schulze, K., Hovius, R., ... & **Vogel, H***. Activation of G-Protein-Coupled Receptors in Cell-Derived Plasma Membranes Supported on Porous Beads. *Journal of the American Chemical Society*, doi: 10.1021/ja205302g (2011)
- (12) Werner, M., Merenda, F., Piguet, J., Salathé, R. P., & **Vogel, H***. Microfluidic array cytometer based on refractive optical tweezers for parallel trapping, imaging and sorting of individual cells. *Lab on a Chip*, doi : 10.1039/C1LC20181F (2011)
- (13) Bolinger, P. Y., Stamou, D., & **Vogel, H***. An integrated self-assembled nanofluidic system for controlled biological chemistries. *Angewandte Chemie International Edition*, doi : 10.1002/anie.200801606 (2008).
- (14) Jacquier, V., Prummer, M., Segura, J. M., Pick, H., & **Vogel, H***. Visualizing odorant receptor trafficking in living cells down to the single-molecule level. *Proceedings of the National Academy of Sciences*, doi: 10.1073/pnas.0603942103 (2006)

- (15) Meyer, B. H., Segura, J. M., Martinez, K. L., Hovius, R., George, N., Johnsson, K., & **Vogel, H***. FRET imaging reveals that functional neurokinin-1 receptors are monomeric and reside in membrane microdomains of live cells. *Proceedings of the National Academy of Sciences*, doi: (2006)
- (16) Gopalakrishnan, G., Danelon, C., Izewska, P., Prummer, M., Bolinger, P. Y., Geissbühler, I., ... & **Vogel, H***. Multifunctional lipid/quantum dot hybrid nanocontainers for controlled targeting of live cells. *Angewandte Chemie International Edition*, doi: 10.1002/anie.200600545 (2006)
- (17) Gopalakrishnan, G., Segura, J. M., Stamou, D., Gaillard, C., Gjoni, M., Hovius, R., ... & **Vogel, H***. Synthesis of nanoscopic optical fibers using lipid membranes as templates. *Angewandte Chemie International Edition*, doi: 10.1002/anie.200500386 (2005)
- (18) Pick, H., Schmid, E. L., Tairi, A. P., Ilegems, E., Hovius, R., & **Vogel, H***. Investigating cellular signaling reactions in single attoliter vesicles. *Journal of the American Chemical Society*, doi: 10.1021/ja044605x (2005)
- (19) Geissbuehler, I., Hovius, R., Martinez, K. L., Adrian, M., Thampi, K. R., & **Vogel, H***. Lipid-Coated Nanocrystals as Multifunctionalized Luminescent Scaffolds for Supramolecular Biological Assemblies. *Angewandte Chemie International Edition*, doi : 10.1002/anie.200461491 (2005)
- (20) Bolinger, P. Y., Stamou, D., & **Vogel, H***. Integrated nanoreactor systems: triggering the release and mixing of compounds inside single vesicles. *Journal of the American Chemical Society*, doi: 10.1021/ja049023u (2004).
- (21) Guignet, E. G., Hovius, R., & **Vogel, H***. Reversible site-selective labeling of membrane proteins in live cells. doi: 10.1038/nbt954 *Nature biotechnology*, (2004)
- (22) Keppler, A., Gendreizig, S., Gronemeyer, T., Pick, H., **Vogel, H***, & Johnsson, K. A general method for the covalent labeling of fusion proteins with small molecules in vivo. *Nature biotechnology*, (2003)
- (23) Stamou, D., Duschl, C., Delamarche, E., & **Vogel, H***. Single vesicle positioning through template-guided self-assembly. *Angew Chem Int Ed*, (2003)
- (24) Terrettaz, S., Ulrich, W. P., Guerrini, R., Verdini, A., & **Vogel, H***. Immunosensing by a synthetic ligand-gated ion channel. *Angewandte Chemie International Edition*, doi: 10.1002/1521-3773 (2001)
- (25) Bieri, C., Ernst, O. P., Heyse, S., Hofmann, K. P., & **Vogel, H***. Micropatterned immobilization of a G protein-coupled receptor and direct detection of G protein activation. *Nature biotechnology*, doi: 10.1038/15090 (1999)