

## Evan O'Brien

Postdoctoral Scholar, Molecular and Cellular Physiology

### Bio

---

#### PROFESSIONAL EDUCATION

- Doctor of Philosophy, University of Pennsylvania (2018)
- B.S., University of Pittsburgh , Biochemistry & Chemistry (2012)

#### STANFORD ADVISORS

- Brian Kobilka, Postdoctoral Faculty Sponsor

### Publications

---

#### PUBLICATIONS

- **Large library docking for cannabinoid-1 receptor agonists with reduced side effects.** *bioRxiv : the preprint server for biology*  
Tummino, T. A., Iliopoulos-Tsoutsouvas, C., Braz, J. M., O'Brien, E. S., Stein, R. M., Craik, V., Tran, N. K., Ganapathy, S., Liu, F., Shiimura, Y., Tong, F., Ho, T. C., Radchenko, et al  
2024
- **Step-wise activation of a Family C GPCR.** *bioRxiv : the preprint server for biology*  
Kumar, K. K., Wang, H., Habrian, C., Latorraca, N. R., Xu, J., O'Brien, E. S., Zhang, C., Montabana, E., Koehl, A., Marqusee, S., Isacoff, E. Y., Kobilka, B. K.  
2023
- **Conformational dynamics of the  $\mu$ -opioid receptor determine ligand intrinsic efficacy.** *bioRxiv : the preprint server for biology*  
Zhao, J., Elgeti, M., O'Brien, E. S., Sár, C. P., Ei Daibani, A., Heng, J., Sun, X., Che, T., Hubbell, W. L., Kobilka, B. K., Chen, C.  
2023
- **Negative allosteric modulation of the glucagon receptor by RAMP2.** *Cell*  
Krishna Kumar, K., O'Brien, E. S., Habrian, C. H., Latorraca, N. R., Wang, H., Tuneew, I., Montabana, E., Marqusee, S., Hilger, D., Isacoff, E. Y., Mathiesen, J. M., Kobilka, B. K.  
2023; 186 (7): 1465-1477.e18
- **Negative allosteric modulation of the glucagon receptor by RAMP2**  
O'Brien, E. S., Kumar, K., Habrian, C., Latorraca, N. R., Wang, H., Tuneew, I., Montabana, E., Marqusee, S., Hilger, D., Isacoff, E. Y., Mathiesen, J. M., Kobilka, B. K.  
CELL PRESS.2023: 161A
- **Negative allosteric modulation of the glucagon receptor by RAMP2.** *Biophysical journal*  
O'Brien, E. S., Krishna Kumar, K., Habrian, C., Latorraca, N. R., Wang, H., Tuneew, I., Montabana, E., Marqusee, S., Hilger, D., Isacoff, E. Y., Mathiesen, J. M., Kobilka, B. K.  
2023; 122 (3S1): 161a
- **Structural insights into differences in G protein activation by family A and family B GPCRs.** *Science (New York, N.Y.)*  
Hilger, D. n., Kumar, K. K., Hu, H. n., Pedersen, M. F., O'Brien, E. S., Giehm, L. n., Jennings, C. n., Eskici, G. n., Inoue, A. n., Lerch, M. n., Mathiesen, J. M., Skiniotis, G. n., Kobilka, et al  
2020; 369 (6503)
- **Membrane Proteins Have Distinct Fast Internal Motion and Residual Conformational Entropy.** *Angewandte Chemie (International ed. in English)*  
O'Brien, E. S., Fuglestad, B. n., Lessen, H. J., Stetz, M. A., Lin, D. W., Marques, B. S., Gupta, K. n., Fleming, K. G., Wand, J. J.

2020