# Bharath Chandra Talluri

Postdoctoral/Visiting fellow
Laboratory of Sensorimotor Research, National Eye Institute
Center on Compulsive Behaviors
National Institutes of Health, Bethesda, USA

## Academic Positions

2023- Fellow at the Center on Compulsive Behaviors [*with fellowship award*]
**National Institutes of Health**, Bethesda, USA
*Advisors:* Hendrikje Nienborg, Bruno Averbeck

2021- Visiting fellow at Laboratory of Sensorimotor Research
National Eye Institute, **National Institutes of Health**, Bethesda, USA
*with:* Hendrikje Nienborg

## Education

2015-21 Ph.D. *summa cum laude*
**University Medical Center Hamburg-Eppendorf**, Germany
*Advisor:* Tobias H. Donner

2012-13 M.Sc. in Cognitive Science
**University of Edinburgh**, UK
*Master's thesis supervised by:* James Bednar

2008-12 B.Tech. in Electrical Engineering
**Indian Institute of Technology (I.I.T) Roorkee**, India
*Bachelor's thesis supervised by:* Gopinath Pillai

## Short courses

2024 Computational Neuroscience of Vision, Cold Spring Harbor Laboratory
2019 Neurohackademy, University of Washington in Seattle
2015 Computational approaches to Memory and Plasticity, National Center for Biological Sciences at Bengaluru

## Awards & Honors

2024 Director's award for Administrative/Technical excellence, National Eye Institute
2023- Fellowship from the Center on Compulsive Behaviors, National Institutes of Health
2023 Trainee Professional Development Award, Society for Neuroscience
2022 Second place, Three Minute Talk (TmT) competition, National Eye Institute
2019-20 Postdoc transition grant, Deanery for Research, University Medical Center Hamburg-Eppendorf
2019 People's Choice award, Three Minute Thesis (3MT) competition, Hamburg Research Academy
2010-11 Student Affairs Council award, I.I.T Roorkee
2009-10 Merit-cum-Means scholarship, I.I.T Roorkee
2008-12 A.P.P. Meritorious scholarship, India
2008-09 T.I.M.E scholarship for best performance in entrance examination, India
2008 All India Rank 965 (99.7 percentile) in the Indian Institutes of Technology Joint Entrance Examination

*Travel Awards*

2019 eScience Institute, University of Washington in Seattle [participation in Neurohackademy]
2018 German Neuroscience Society [participation in FENS Forum]
2016 Boehringer Ingelheim Fonds foundation for basic research in medicine [research visit to Berlin]
2015 School of Neuroscience (Ecole des Neurosciences) Paris

## Research

*Preprints*

- Linton, P., Heeger, D., Movshon, T., Muckli, L., Nienborg, H., Papale, P., Parker, A., Petro, L., Roelfsema, P., **Talluri, B. C.**, Vetter, P., Xue, C., Zhaoping, L., Kriegeskorte, N. (2024). Is V1 a Cognitive Map? OSF preprints. *doi: 10.31219/osf.io/guf93.*

*Journal Articles*

- Park, H.*, Arazi, A.*, **Talluri, B. C.***, Celotto, M., Panzeri, S., Stocker, A. A., Donner, T. H. (2025). Confirmation bias through selective readout of information encoded in human parietal cortex. Nature Communications. *doi: 10.1038/s41467-025-61010-x.*

- Kang, I.*, **Talluri, B. C.***, Yates, J. L., Niell, C. M., Nienborg, H. (2025). Is the impact of spontaneous movements on early visual cortex species specific? Trends in Neurosciences. 48(1), 7-21. *doi: 10.1016/j.tins.2024.11.006.*

- **Talluri, B. C.***, Kang, I.*, Lazere, A., Quinn, K. R., Kaliss, N., Yates, J. L., Butts, D. A., Nienborg, H. (2023). Activity in primate visual cortex is minimally driven by spontaneous movements. Nature Neuroscience. 26(11), 1953-1959. *doi: 10.1038/s41593-023-01459-5.*

- **Talluri, B. C.**, Urai, A. E., Bronfman, Z. Z., Brezis, N., Tsetsos, K., Usher, M., Donner, T. H. (2021). Choices change the temporal weighting of decision evidence. Journal of Neurophysiology. 125(4), 1468-1481. *doi: 10.1152/jn.00462.2020.*

- **Talluri, B. C.***, Urai, A. E.*, Tsetsos, K., Usher, M., Donner, T. H. (2018). Confirmation bias through selective overweighting of choice-consistent evidence. Current Biology. 28(19), 3128-3135. *doi: 10.1016/j.cub.2018.07.052.*

- **Talluri, B. C.**, Hung, S.-C., Seitz A. R., Seriès, P. (2015). Confidence-based integrated reweighting model of task-difficulty explains location-based specificity in perceptual learning. Journal of Vision. 15(10):17, 1-12. *doi: 10.1167/15.10.17.*

* equal contribution

*Commentaries*

- **Talluri, B. C.**, Nienborg, H. (2024). Decisions: Tracking the evolution of a single choice. eLife. 13, e103059. *doi: 10.7554/eLife.103059.*

- **Talluri, B. C.**, Braun, A, Donner, T. H. (2021). Decision making: How the past guides the future in frontal cortex. Current Biology. 31(6), R303-R306. *doi: 10.1016/j.cub.2021.01.020.*

- **Talluri, B. C.**, Urai, A. E., Donner, T. H. (2019). Our own choices generate biases for subsequent decisions. The Science Breaker. *doi: 10.25250/thescbr.brk203.*

*Selected Conference Abstracts*

- **Talluri, B. C.***, Kang, I.*, Yates, J. L., Butts, D. A., Nienborg, H. (2025). Pronounced modulation of activity in primate early visual cortex by internal state. Annual Meeting of the Vision Sciences Society (VSS).

- Thothathri, S., **Talluri, B. C.**, Shushruth, S., Shadlen, M.N., Nienborg, H. (2024). Decoupling choice from motor response reduces choice-history effects. Program No. 281.24. Chicago, IL. : Society for Neuroscience.

- Arazi, A., Park, H., **Talluri, B. C.**, Stocker, A., Donner, T. H. (2023). Representation of a continuous decision variable in human extrastriate visual cortex. Program No. 413.15. Washington, D.C.: Society for Neuroscience.

- **Talluri, B. C.***, Kang, I.*, Lazere, A., Quinn, K. R., Kaliss, N., Yates, J. L., Butts, D. A., Nienborg, H. (2023). Do spontaneous movements drive activity in the primate visual cortex? Cosyne [*contributed talk; top 3.2% of submitted abstracts*].

- Hall, H., Hassan, M.H.M.O., Verma, A., Dutta, B., Pattisapu, S., Sharma, V., **Talluri, B. C.** (2022). Asymmetric functional connectivity is not specific to reward-related task activity in OFC. Neuromatch Conference.

- Wimmer, K., **Talluri, B. C.**, Donner. T., Roxin, A., Esnaola-Acebes, J. M. (2022). Neural network mechanisms underlying post-decision biases. Cosyne.

- **Talluri, B. C.***, Urai, A. E.*, Tsetsos, K., Usher, M., Donner, T. H. (2018). Confirmation bias in continuous decisions: Giving more weight to choice-consistent evidence. FENS Forum.

- Rudiger, P., Stevens, J.-L., **Talluri, B. C.**, Perrinet, L., Bednar, J. (2014). Relationship between natural image statistics and lateral connectivity in the primary visual cortex. Cosyne.

*Visits*

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| 2019 & 2016 | Guest Scientist, Prof. John-Dylan Haynes' lab, Berlin Center for Advanced Neuroimaging |
| 2014-15 | Research Intern, Prof. Stefan Treue's lab, German Primate Center, Goettingen |
| 2012-13 | Research Assistant, Institute of Perception, Action & Behaviour, University of Edinburgh |
| 2011 | Research Intern, Prof. Robert Fisher's lab, School of Informatics, University of Edinburgh |

## Selected Talks

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| 2025 | Annual Meeting of the Vision Sciences Society (VSS), St. Pete Beach, Florida |
| 2024 | CCN Seminar, University Medical Center Hamburg- Eppendorf |
| 2024 | Cognitive & Systems Neuroscience group, Swammerdam Institute for Life Sciences |
| 2023 | Computational and Systems Neuroscience (Cosyne) meeting, Montreal |
| 2021 | Symposium on Computational Neuroscience, University of Osnabrueck |
| 2020 | Seriès lab, School of Informatics, University of Edinburgh |
| 2020 | Laboratory of Sensorimotor Research, National Eye Institute, NIH |
| 2020 | Short talk at Monsoon Brain Meeting, India |
| 2019 | Gold Lab, University of Pennsylvania, Philadelphia |
| 2019 | Garrett group, Max Planck Institute for Human Development, Berlin |
| 2018 | de la Rocha lab, August Pi i Sunyer Biomedical Research Institute (IDIBAPS), Barcelona |
| 2015 | Glaescher lab, University Medical Center Hamburg-Eppendorf |
| 2015 | Forstmann lab, University of Amsterdam |

## Mentoring

*Postbacc Researchers*

2023-25 Sreeram Thothadri
2022 Leya Luo (now Postbacc at University of Maryland College Park)

*Summer Interns*

2021 Jonel Morris (now PhD candidate at University of Florida )

*Volunteer Mentoring*

2024-25 Program for Advancing the Health Sciences (PATHS), Prince George County Public Schools
2022 Neuromatch Academy

## Teaching

2024 Lecturer at Summer Vision Course, National Eye Institute
2022-23 Journal club leader, NIH summer journal club

## Organisational Roles

2022-24 Member of LSR Fellows council, NIH
2022 Member of Organising Committee, National Eye Institute's annual Focus on Fellows event
2012 Departmental Convener at Cognizance, the annual technical festival of I.I.T Roorkee
2011-12 Member in the Board of studies, I.I.T Roorkee
2011-12 Secretary, Himalayan Explorers' Club, I.I.T Roorkee

## Professional Service

Reviewer PLoS Biology, PLoS Computational Biology, Journal of Vision [*exceptional review*], Scientific Reports, PLoS One, Cosyne abstracts, CCN abstracts
Co-reviewer Nature Neuroscience, Current Biology, eLife

## Non-Academic achievements

2012 Black belt (first dan), awarded by World Taekwondo Federation
2010 Award of Excellence, Himalayan Explorers' Club, I.I.T Roorkee

Last updated: June 27, 2025