### James Brooks, PhD

jamesbrooks@hotmail.ca

# RESEARCH AND EMPLOYMENT EXPERIENCE

#### **Post doctorate:**

German Primate Center DPZ, Göttingen, Germany	2024-present
Kyoto University Institute for Advanced Study, Kyoto, Japan	2023-2024

#### **Pre doctorate:**

Kumamoto Sanctuary, Kumamoto Japan	Winter 2018
Taiwan Free Ranging Dog Project, Hsinchu City, Taiwan	Fall 2018
Wildlife Science Center, Stacy, MN, USA	Summer 2018
Duke Puppy Kindergarten, Durham, NC, USA	Spring-Summer 2018
Duke Red Colobus Project, Tanzania	Summer 2017
Orangutan Kutai Project, Indonesia	Summer 2016

**Species Studied**: Coyote, grey wolf, domestic dog, horse, red colobus monkey, chimpanzee, bonobo, orangutan, human, finless porpoise

#### **EDUCATION**

#### **Degrees:**

Wildlife Research Center, Kyoto University, Kyoto, Japan	2021-2023
PhD	

Thesis: The evolutionary origins of group-mindedness: Comparative studies with apes and equines

Advisor: Dr. Shinya Yamamoto

## Wildlife Research Center, Kyoto University, Kyoto, Japan

2019-2021

Master of Science

Thesis: Evolution of groupmindedness: Comparative research with bonobos and chimpanzees

Advisor: Dr. Shinya Yamamoto

### **Duke University**, Durham NC, USA

2014-2017

Bachelor of Arts with Distinction in Evolutionary Anthropology, cum laude

Concentration in Behavior, Ecology and Cognition

Minors in Mathematics and Philosophy

Thesis: Evidence for self-domestication in wild coyotes?

Advisor: Dr. Brian Hare

### Other education:

Diverse Intelligences Summer Institute (2023)

CIFAR Neuroscience of Consciousness Winter School (2023)

#### **PUBLICATIONS**

- 1. **Brooks, J**, Maeda, T, Ringhofer, M, Yamamoto, S (2024) "Oxytocin homogenizes horse group organization" *iScience* 27(7), 110356. doi:10.1016/j.isci.2024.110356
- **2. Brooks, J**, Samuni, L (*in press*) "Revisiting the spaces of societies and the cooperation that sustains them" Commentary in Behavioural and Brain Sciences.
- **3.** Morimura, N, Itahara, A, **Brooks, J,** Mori, Y, Yige, P, Hashimoto, H, Mizumoto, I (2023) "A Drone Study of Sociality in the Finless Porpoise Neophocaena asiaeorientalis in the Ariake Sound, Japan" *Drones* 7(7), 442. doi:10.3390/drones7070422
- **4. Brooks, J\***, Kano, F\*, Yeow, H, Morimura, N, Yamamoto, S (2022) "Testing the effect of oxytocin on social grooming in bonobos." *American Journal of Primatology* 84(12), e23444. doi:10.1002/ajp.23444
- 5. **Brooks**, **J**, Yamamoto S (2022) "The evolution of group-mindedness: comparative research on top-down and bottom-up group cooperation in bonobos and chimpanzees" *Current Opinion in Behavioural Science* 47, 101205. doi:j.cobeha.2022.101205
- 6. **Brooks, J,** Kano, F, Kawaguchi, Y, Yamamoto S (2022) "Oxytocin promotes species-relevant outgroup attention in bonobos and chimpanzees" *Hormones and Behaviour* 143, 105182. doi: j.yhbeh.2022.105182
- 7. **Brooks, J,** Yamamoto S (2021) "The founder sociality hypothesis" *Ecology and Evolution* 11(21), 14392-14404. doi: 10.1002/ece3.8143
- 8. **Brooks, J,** Yamamoto S (2021) "Response: Commentary: Dog stick chewing: an overlooked instance of tool use?" *Frontiers in Psychology* 12, 757526. doi:10.3389/fpsyg.2021.757526
- 9. **Brooks, J\*,** Yoshimura, H\*, Taki, Y\* (2021) "Knowledge-based enrichment: development of a novel enrichment device for captive chimpanzees" *Zoo Biology* 40(5), 398-406. doi:10.1002/zoo.21617
- **10. Brooks, J,** Onishi, E, Clarke, IE, Bohn, M, Yamamoto, S (2021) "Uniting against a common enemy: outgroup threat elicits ingroup cohesion in chimpanzees" *PLOS ONE* 16(2), e0246869. doi:10.1371/journal.pone.0246869
- **11. Brooks, J** (2021) "Function and representational content through Tinbergen's levels of analysis" *Biology and Philosophy* 36(7). doi:10.1007/s10539-021-09783-5
- **12. Brooks, J**, Yamamoto, Y (2021) "Dog stick chewing: an overlooked instance of tool use?" *Frontiers in Psychology* 11, 3753. doi:10.3389/fpsyg.2020.577100
- **13. Brooks, J\***, Kano, F\*, Sato, Y, Yeow, H, Morimura, N, Nagasawa, M, Kikusui, F, Yamamoto, S (2021) "Divergent effects of oxytocin on eye contact in bonobos and chimpanzees." *Psychoneuroendocrinology* 25, 105119. doi: 10.1016/j.psyneuen.2020.105119

- **14.** Onishi, E, **Brooks, J,** Leti, I, Monghiemo, C, Bokika, J-C, Shintaky, Y, Idani, G, Yamamoto, S (2020) "Nkala Forest: Introduction of a forest-savanna mosaic field site of wild bonobos and its future prospects." *Pan Africa News* 27(1), 2-5. doi:10.5134/254101
- **15. Brooks, J**, Kays, R, Hare, B (2020) "Coyotes living near cities are bolder: implications for dog evolution and human-wildlife management." *Behaviour* 157(3-4), 289-313. doi:10.1163/1568539X-bja10002

#### **SELECTED CONFERENCE PRESENTATIONS**

- **Brooks, J** Maeda, T, Ringhofer, M, Yamamoto, S (2024) "Oxytocin modulates group organization in free-moving horses" Animal Behaviour Sciety 2024, London, Canada (Oral)
- Kobayashi, C, Palacino, G, Brooks, J, Yamamoto, S (2023) "Revealing the
  effect of oxytocin on social relationships in semi-free-ranging horses under food
  competition with behavioral tracking using deep learning" 18th International
  Symposium on Primatology and Wildlife Science, Kyoto, Japan (Oral)
- Onishi, E, Inoue, S, Brooks, J, Yamamoto, S (2023) "Urination Behavior in Captive Chimpanzees: Synchrony, Contagion, and Social Patterns" 18th International Symposium on Primatology and Wildlife Science, Kyoto, Japan (Oral)
- Brooks, J, van Heijst, K, Epping, A, Lee, S, Niksarli, A, Pope, A, Clay, Z, Kret, M, Taglialatela, J, Yamamoto, S (2023) "Outgroup cues promote ingroup cohesion in bonobos despite limited intergroup competition" Joint Meeting of the International Primatological Society and the Malaysian Primatological Society, Kuching, Malaysia (Oral)
- **Brooks, J,** Kano, F, Kawaguchi, Y, Yamamoto, S (2022) "Oxytocin promotes species-relevant outgroup attention in bonobos and chimpanzees" 82nd Annual Conference of the Japan Society for Animal Psychology (Oral)
- **Brooks**, **J**, Onishi, E, Clarke, I, Bohn, M, Yamamoto, S (2022) "Perceived outgroup threat promotes ingroup cohesion in chimpanzees" International Society for Behavioural Ecology Congress 2022, Stockholm, Sweden (Oral)
- Onishi, E, Inoue, S, Brooks, J, Yamamoto, S (2022) "Contagious urination among captive chimpanzees: Investigation of initiator and follower" International Society for Behavioural Ecology Congress 2022, Stockholm, Sweden (Poster)
- **Brooks, J,** Kano, F, Yeow, H, Morimura, N, Yamamoto, S (2022) "Oxytocin can promote social grooming in bonobos" Animal Behaviour Society 2022, San Jose, Costa Rica (Oral)

<sup>\*</sup>denotes equal contribution

- **Brooks, J,** Yamamoto, S (2022) "The founder sociality hypothesis" 17<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Oral)
- **Brooks**, J, Kano, F, Yamamoto, S (2022) "Oxytocin promotes species-relevant social attention in bonobos and chimpanzees." Joint Meeting of the International Primatological Society and the Latin American Society of Primates, Quito, Ecuador (Oral-presented online)
- **Brooks, J**, Kano, F, Yamamoto, S (2021) "Oxytocin promotes species-relevant outgroup attention in bonobos and chimpanzees." 15<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Oral)
- **Brooks, J**, Kano, F, Sato, Y, Yeow, H, Morimura, N, Nagasawa, M, Kikusui, T, Yamamoto, S (2020) "Contrasting effects of exogenous oxytocin on chimpanzees' and bonobos' attention to eyes." 80<sup>th</sup> Annual Meeting of the Japanese Society for Animal Psychology, Japan (Oral)
- Onishi, E, Brooks, J, Yamamoto, S (2020) "Chimpanzees urinate together: synchronized urination among captive chimpanzees and investigation of social relationships." 80<sup>th</sup> Annual Meeting of the Japanese Society for Animal Psychology, Japan (Oral)
- **Brooks, J,** Onishi, E, Clark, I, Bohn, M, Yamamoto, S (2020) "Outgroup threat promotes ingroup tolerance despite increased stress in chimpanzees." 14<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Oral)
- Yoshimura, H, Brooks, J, Taki, Y (2020) "Efficacy of a novel chimpanzee enrichment device using prior knowledge and motivational structure." 64<sup>th</sup> Primates Conference, Japan Monkey Center, Japan (Poster)
- Onishi, E, **Brooks**, J, Leti, I, Bokila, J, Shintaku, Y, Idani, G, Yamamoto, S (2020) "Report on the disappearance of four adult bonobo males in Mbali, DR Congo" 64<sup>th</sup> Primates Conference, Japan Monkey Center, Japan (Poster)
- 大西絵奈, Brooks, J, 山本真也 (2019) "飼育チンパンジーにおける生理反応の同期."12<sup>th</sup> Annual Meeting of the Human Behaviour and Evolution Society of Japan, Meiji University, Japan (Poster)
- 大西絵奈, Brooks, J, 山本真也 (2019) "飼育チンパンジー(Pan Troglodytes)
   における排尿タイミングの同期."動物行動学会, Japan (Poster)
- Onishi, E, Brooks, J, Yamamoto, S (2019) "Bonobo food culture? Preliminary comparison of wild bonobos' feeding ecology between two sites." SAGA 22, Japan Monkey Center, Japan (Poster)
- **Brooks, J**, Kano, F, Yamamoto, S (2019) "Modulation of great ape social attention by oxytocin." 12<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Poster)

- Onishi, E, Brooks, J, Yamamoto, S (2019) "Preliminary behavioral survey of bonobos in Mbali, savanna-forest mosaic environment." 12<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Poster)
- **Brooks, J**, Kano, F, Yamamoto, S (2019) "Effects of oxytocin on chimpanzee social attention." 35<sup>th</sup> Annual Congress of the Primate Society of Japan, Kumamoto, Japan (Poster)
- **Brooks, J**, Kays, R, Hare, B (2019) "Selection for boldness in urban coyotes: Implications for wildlife management." 14<sup>th</sup> International Conference on Environmental Enrichment, Kyoto University, Japan (Poster)
- Brooks, J (2019) "Self-domestication, Groupmindedness, and the Evolution of Cooperation: Comparative studies with coyotes, bonobos, and chimpanzees."
   11<sup>th</sup> International Symposium on Primatology and Wildlife Science, Kyoto University, Japan (Poster)
- Brooks, J (2018) Evidence for self-domestication in wild coyotes?" 9<sup>th</sup>
  International Symposium on Primatology and Wildlife Science, Kyoto
  University, Japan (Poster)

#### **INVITED TALKS**

- "The mechanisms and evolution of group-based cooperation" Behaviour and Evolution Research Group (BERG), University of Stirling (online). 2024
- "Behavioural effects of exogenous oxytocin and outgroup stimuli in great apes" Department of Comparative Cultural Psychology, Max Planck Institute for Evolutionary Anthropology. 2023
- "Oxytocin, affiliation, and group-mindedness" Diverse Intelligences Summit, University of St Andrews. 2023
- "Comparative studies with apes and equines: the evolution of group-mindedness" Center for the Advanced Study of Collective Behaviour, University of Konstanz. 2023
- "The evolutionary origins of group-mindedness" Burkart Lab, University of Zurich. 2023
- "Comparative studies of group cohesion in apes and horses" Mathematical Biology Group, Graduate University for Advanced Studies (SOKENDAI). 2023
- "Groupmindedness in great apes" University of California San Diego Rossano Lab (online). 2022
- "The evolution of groupmindedness: Comparative primatology in the field and captivity" Boğaziçi University Evolution Seminars (online). 2020

#### **FUNDING**

## **Grants/scholarships:**

JSPS PD Postdoctoral Fellowship, 5,400,000 JPY	2023-2024
Japan Society for the Promotion of Science	
JSPS DC1 Doctoral Fellowship, 9,400,000 JPY	2021-2023
Japan Society for the Promotion of Science	
Evolution of Groupmindedness, ad libitum funding	2019-2023
Leading Graduate Program in Primatology and Wildlife Science	
MEXT Research Scholarship, 3,456,000 JPY	2019-2021
Japanese Ministry of Education, Culture, Sports, Science and Technology	
Duke Red Colobus Research Project, 3,000 USD	2017
Duke Internship Funding Program	
Orangutan Kutai Project, 2,200 USD	2016
Duke Internship Funding Program	
Early career travel funding:	
International Society of Behavioural Ecology	2024
CIFAR Neuroscience of Consciousness Winter School	2023
Diverse Intelligences Summer Institute	2023

#### SELECTED MEDIA COVERAGE



## **SELECTED AWARDS**

**Best Oral Presentation (2<sup>nd</sup>),** 16th International Symposium on Primate and Wildlife Science, Kyoto University, September 2021

**Best Oral Presentation (2<sup>nd</sup>),** 15th International Symposium on Primate and Wildlife Science, Kyoto University, February 2021

**Best Poster (2<sup>nd</sup>),** 11th International Symposium on Primate and Wildlife Science, Kyoto University, March 2019

## **SOCIETY MEMBERSHIPS**

International Society for Behavioural Ecology	2022-present
Animal Behaviour Society	2022-present
International Primatological Society	2020-present

## **REVIEWS**

Ad hoc peer review for: Journal of Comparative Psychology, Emotion, Ecology and Evolution, Royal Society Open Science, Frontiers in Ecology and Evolution, PeerJ, Evolution and Human Behaviour, PLOS ONE, Animal Behaviour and Cognition

# **LANGUANGES**

English (Native), French (proficient), Japanese (intermediate), German (beginner)