



HFSP AWARDS 2019

LONG-TERM FELLOWSHIPS

as approved by the Board of Trustees (March 2019)

The HFSP fellowship program funds innovative, ground-breaking projects that have the potential to advance knowledge in the applicants' field of study or open a new approach to a research problem. High risk research is supported.

Long-term fellowships provide 3 years of support for applicants with a degree in the life science to obtain training in a new area of research in an outstanding laboratory of their choice in another country. Applicants are expected to broaden their horizon and to move into a new research field that is different from their doctoral studies or previous postdoctoral training.

AHREND Tomasz POLAND	From	Divison of Tumor Biology and Immunology The Netherlands Cancer Institute Amsterdam THE NETHERLANDS	<i>The role of neuro-immunological memory in response to enteric infections</i>
	To	Laboratory of Mucosal Immunology Rockefeller University New York USA	Supervisor: MUCIDA Daniel
AMBROZIAK Wojciech POLAND	From	Department of Physiology University of Auckland NEW ZEALAND	<i>The role of tanycytes in temperature and metabolic regulation</i>
	To	Institute of Pharmacology University of Heidelberg GERMANY	Supervisor: SIEMENS Jan
ANZO Marie JAPAN	From	Department of Genetics University of Tokyo JAPAN	<i>Investigating the role of muscles in morphological plasticity of sea anemone <i>Nematostella vectensis</i></i>
	To	Developmental Biology Unit EMBL, Heidelberg GERMANY	Supervisor: IKMI Aissam
BARONE Vanessa ITALY	From	University of Sydney AUSTRALIA	<i>Cell-cell contacts in tissue patterning and evolution</i>
	To	Scripps Institution of Oceanography UC San Diego La Jolla USA	Supervisor: LYONS Deirdre
BEJARANO Leire SPAIN	From	Department of Molecular Oncology Centro Nacional de Investigaciones Oncológicas Madrid SPAIN	<i>Exploring the role of the tumor vasculature in brain metastasis</i>
	To	Department of Oncology University of Lausanne SWITZERLAND	Supervisor: JOYCE Johanna

BENDER Franziska GERMANY	From	Department of Behavioural Neurodynamics Leibniz Institute for Molecular Pharmacology Berlin GERMANY	<i>Synaptic basis of temporal learning</i>
	To	Department of Neuroscience Institut Pasteur Paris FRANCE	Supervisor: DIGREGORIO David
BEN-SHAANAN Tamar ISRAEL	From	Department of Immunology Technion Haifa ISRAEL	<i>Defining how activation of skin and lymph node sensory neurons controls immunity</i>
	To	Microbiology and Immunology UC San Francisco USA	Supervisor: CYSTER Jason
BOON Ruben BELGIUM	From	Stem Cell Institute KU Leuven BELGIUM	<i>Epigenetic normalization through engineering of S-adenosyl methionine metabolism</i>
	To	Cancer Center MGH Boston USA	Supervisor: MOSTOSLAVSKY Raul
BOWLING Sarah UK	From	National Heart and Lung Institute Imperial College London UK	<i>Generating a global view of cell lineage trees during early mouse embryo development</i>
	To	Stem Cell Program Boston Children's Hospital USA	Supervisor: CAMARGO Fernando
BURGOS BARRAGAN Guillermo SPAIN	From	MRC Laboratory of Molecular Biology Cambridge UK	<i>Dissecting the role of metabolism in cancer genomic instability</i>
	To	Meyer Cancer Center Weill Cornell Medical College New York USA	Supervisor: CANTLEY Lewis

CAPOVILLA Giovanna ITALY	From	Department of Molecular Biology MPI for Developmental Biology Tubingen GERMANY	<i>Prochlorococcus cyanophage: lysogenic potential and development of a genetic system</i>
	To	Departments of Civil and Environmental Engineering and Biology MIT Cambridge USA	Supervisor: CHISHOLM Sallie
CHAKER-MARGOT Malik CANADA/FRANCE	From	Laboratory of Protein and Nucleic Acid Chemistry Rockefeller University New York USA	<i>Structural and functional characterization of P-Rex 1/2 in cell signaling and cancer</i>
	To	Biozentrum University of Basel SWITZERLAND	Supervisor: MAIER Timm
COVELO Ana SPAIN	From	Department of Neuroscience University of Minnesota Minneapolis USA	<i>Astroglial bioenergetic control of positive and negative reinforcement</i>
	To	Neurocentre Magendie, INSERM University of Bordeaux FRANCE	Supervisor: MARSICANO Giovanni
DAR Daniel ISRAEL	From	Department of Molecular Genetics Weizmann Institute of Science Rehovot ISRAEL	<i>Elucidating the effects of phenazines on the composition and biogeography of the soil microbiome</i>
	To	Division of Geological and Planetary Sciences Caltech Pasadena USA	Supervisor: NEWMAN Dianne
DAVIDI Dan ISRAEL/AUSTRIA	From	Plant and Environmental Sciences Weizmann Institute of Science Rehovot ISRAEL	<i>Saturating mutagenesis of the mitochondrial genome in search for critical cis-regulatory elements</i>
	To	Department of Genetics Harvard Medical School Boston USA	Supervisor: CHURCHMAN Stirling

DE NIZ Mariana MEXICO	From	Wellcome Centre for Molecular Parasitology University of Glasgow UK	<i>Elucidation of Trypanosoma brucei dynamics and biophysical properties in the host adipose tissue</i>
	To	Department of Parasitology Instituto de Medicina Molecular Joao Lobo Antunes Lisbon PORTUGAL	Supervisor: MIRANDA-FIGUEIREDO Luisa
DEL RIO BERMUDEZ Carlos SPAIN	From	Department of Psychological and Brain Sciences University of Iowa Iowa City USA	<i>Thalamic modulation of cortico-hippocampal connectivity and memory consolidation during sleep</i>
	To	Department of BioMedical Research University of Bern SWITZERLAND	Supervisor: ADAMANTIDIS Antoine
ERNST Christina GERMANY	From	European Bioinformatics Institute EMBL Cambridge UK	<i>Expanding the regulatory role of human KRAB-zinc finger proteins by profiling their RNA interactome</i>
	To	Global Health Institute EPFL Lausanne SWITZERLAND	Supervisor: TRONO Didier
FRISCHKORN Kyle USA	From	Lamont-Doherty Earth Observatory Columbia University Palisades USA	<i>Investigating the role of diatom-bacteria interactions in accessing the critical micronutrient iron</i>
	To	Department of Biology Ecole Normale Supérieure Paris FRANCE	Supervisor: BOWLER Chris
GEISSMANN Quentin FRANCE	From	Department of Life Sciences Imperial College London UK	<i>Manipulation of insect vector behaviour by the plant microbiome</i>
	To	Department of Microbiology and Immunology University of British Columbia Vancouver CANADA	Supervisor: HANEY Cara

GIRALDO SANCHEZ Diego COLOMBIA	From	Department of Cellular Neurobiology Georg-August-University Göttingen GERMANY	<i>Neuromodulatory networks controlling mosquito attraction to humans</i>
	To	Department of Molecular Microbiology and Immunology Johns Hopkins University Baltimore USA	Supervisor: MCMENIMAN Conor
GIZOWSKI Claire CANADA	From	Department of Neurology and Neurosurgery McGill University Montreal CANADA	<i>The molecular and cellular mechanisms underlying thermodetection by vagal sensory neurons</i>
	To	Department of Physiology UC San Francisco USA	Supervisor: KNIGHT Zachary
GLASER Juliane FRANCE	From	Department of Genetics and Developmental Biology Institut Curie Paris FRANCE	<i>The role of MusD transposable elements in the 3D regulation of the mammalian genome</i>
	To	Development and Disease Group MPI for Molecular Genetics Berlin GERMANY	Supervisor: MUNDLOS Stefan
GREEN Patrick USA	From	Department of Biology Duke University Durham USA	<i>Principles and mechanisms of intergroup contests: understanding social evolution</i>
	To	Department of Biosciences University of Exeter Penryn UK	Supervisor: CANT Mike
GUNA Alina-Ioana CANADA/ROMANIA	From	MRC Laboratory for Molecular Biology Cambridge UK	<i>Regulating mammalian mitochondrial homeostasis</i>
	To	Department of Cellular and Molecular Pharmacology UC San Francisco USA	Supervisor: WEISSMAN Jonathan

HALLIN Johan SWEDEN	From	Institute for Research on Cancer and Ageing Université Côte d'Azur Nice FRANCE	<i>A forward systems biology approach to investigate the origins and fitness effects of de novo proteins</i>
	To	Département de Biologie Institut de Biologie Intégrative et des Systèmes Québec CANADA	Supervisor: LANDRY Christian
HUANG Chengjie CANADA	From	Department of Physiology McGill University Montreal CANADA	<i>Mechanisms underlying distortions in the neural code induced by sensorineural hearing loss</i>
	To	Ear Institute University College London UK	Supervisor: LESICA Nicholas
JANSZ Natasha AUSTRALIA/UK	From	Department of Medical Biology Walter and Eliza Hall Institute of Medical Research Melbourne AUSTRALIA	<i>Investigating the role of transposable elements in 3D genome organisation in vivo</i>
	To	Institute of Epigenetics and Stem Cells Helmholtz Zentrum München GERMANY	Supervisor: TORRES-PADILLA Maria Elena
JEONG Dae-Eun KOREA	From	Department of Life Sciences Pohang University of Science and Technology KOREA	<i>Dissecting functional long non-coding RNAs and their working mechanisms</i>
	To	Department of Pathology Stanford University USA	Supervisor: FIRE Andrew
JONES Stephanie CANADA	From	Department of Biology McMaster University Hamilton CANADA	<i>Bacteria versus phage: exploring new strategies in an ancient arms race</i>
	To	Department of Biology MIT Cambridge USA	Supervisor: LAUB Michael

JORDAN Rebecca UK	From	Neurophysiology of Behaviour Laboratory Francis Crick Institute London UK	<i>Mechanistic investigation into the driving forces of sensorimotor learning in the visual cortex</i>
	To	Department of Neurobiology FMI Basel SWITZERLAND	Supervisor: KELLER Georg
KALE Girish INDIA	From	National Centre for Biological Sciences Tata Institute of Fundamental Research Bengaluru INDIA	<i>Explaining evolutionary divergences in epithelial morphogenesis through cell biological innovations</i>
	To	Centre for Organismal Studies University of Heidelberg GERMANY	Supervisor: LEMKE Steffen
KAZLAUSKIENE Migle LITHUANIA	From	Institute of Biotechnology Vilnius University LITHUANIA	<i>Mechanistic and structural studies of the RNA m6A writer machinery</i>
	To	Department of Biochemistry University of Zurich SWITZERLAND	Supervisor: JINEK Martin
KIM Geundon KOREA	From	Department of Life Science Korea University Seoul KOREA	<i>Unraveling an interdependency between metabolic cluster for the homeostasis of cellular ATP and Pi</i>
	To	Department of Biochemistry University of Lausanne Epalinges SWITZERLAND	Supervisor: MAYER Andreas
KIM Jaeryung KOREA	From	Department of Ophthalmology Sungkyunkwan University School of Medicine Seoul KOREA	<i>Dissecting the role of intestinal lymphatics in bacteria-derived metabolite transport and signaling</i>
	To	Department of Fundamental Oncology University of Lausanne SWITZERLAND	Supervisor: PETROVA Tatiana

KLUGHAMMER Johanna GERMANY	From	Medical Epigenomics Laboratory Austrian Academy of Sciences Vienna AUSTRIA	<i>Spatio-molecular dissection of the tumor microenvironment</i>
	To	Department of Biology Broad Institute of MIT and Harvard Cambridge USA	Supervisor: REGEV Aviv
KOTLER Eran ISRAEL	From	Dept. of Molecular Cell Biology & Computer Science and Applied Mathematics Weizmann Institute of Science Rehovot ISRAEL	<i>Microenvironmental, epigenomic and clonal dynamics during breast cancer evolution</i>
	To	Department of Genetics Stanford University USA	Supervisors: CURTIS Christina and KUNDAJE Anshul
KRAGESTEEN Bjoert Katrinardottir DENMARK/ FAROE ISLANDS	From	Department of Development and Disease MPI for Molecular Genetics Berlin GERMANY	<i>Systematic identification and functional dissection of non-coding variants in human adaptation</i>
	To	Department of Immunology Weizmann Institute of Science Rehovot ISRAEL	Supervisor: AMIT Ido
LANG Patricia GERMANY	From	Department of Molecular Biology MPI for Developmental Biology Tubingen GERMANY	<i>Evolutionary genetics of stomata-related climate change-adaptation through space and time</i>
	To	Department of Biology Stanford University USA	Supervisor: BERGMANN Dominique
LATORRE-MURO Pedro SPAIN	From	Department of Animal Production and Food Science University of Zaragoza SPAIN	<i>Mechanisms of electron transport chain supercomplex assembly during ER and nutrient stress</i>
	To	Department of Cancer Biology Dana-Farber Cancer Institute Boston USA	Supervisor: PUIGSERVER Pere

LEE Junmo KOREA	From	Department of Biological Sciences Sungkyunkwan University Suwon KOREA	<i>Evolution of functional organization of the eukaryotic genome</i>
	To	Gregor Mendel Institute of Molecular Plant Biology Vienna AUSTRIA	Supervisor: BERGER Frederic
LI Hsin-Jung TAIWAN	From	Department of Molecular Biology Princeton University USA	<i>Functional characterization of host-microbiome interactions in a tissue-engineered mini-gut</i>
	To	Global Health Institute EPFL Lausanne SWITZERLAND	Supervisors: LUTOLF Matthias and PERSAT Alexandre
LI Kai CHINA	From	Institute of Neuroscience Chinese Academy of Sciences Shanghai CHINA	<i>The molecular and cellular mechanisms underlying the sense of balance in Drosophila melanogaster</i>
	To	Department of Physiology UC San Francisco USA	Supervisor: JAN Yuh Nung
LISCOVITCH-BRAUER Noa ISRAEL	From	School of Physics and Astronomy Tel Aviv University ISRAEL	<i>Genome-wide search for essential noncoding elements using Cpf1 tiling deletion screen</i>
	To	New York Genome Center USA	Supervisor: SANJANA Neville
MARTIN FERNANDEZ Mario SPAIN	From	Neuroscience Department University of Minnesota Minneapolis USA	<i>Deciphering the coding strategies underlying the selection of active and passive fear responses</i>
	To	Neurocentre Magendie, INSERM University of Bordeaux FRANCE	Supervisor: HERRY Cyril

MASUBUCHI Takeya JAPAN	From	The Institute for Quantitative Biosciences University of Tokyo JAPAN	<i>Reconstituting and deciphering the TCR signaling apparatus by DNA nanotechnology</i>
	To	Section of Cell and Developmental Biology UC San Diego USA	Supervisor: HUI Enfu
MAYRAN Alexandre FRANCE/ SWITZERLAND	From	Department of Neurobiology and Development Institut de Recherches Cliniques de Montréal CANADA	<i>Investigating collinear bursts of HoxD genes transcription through live imaging of gastruloid body</i>
	To	ISREC EPFL Lausanne SWITZERLAND	Supervisor: DUBOULE Denis
MISHRA Archita INDIA	From	Molecular Biophysics Unit Indian Institute of Sciences Bengaluru INDIA	<i>Exploring the human fetal microbiome and its role in immune system development</i>
	To	Singapore Immunology Network A*STAR Singapore SINGAPORE	Supervisor: GINHOUX Florent
MONTE Isabel SPAIN	From	Department of Plant Molecular Genetics CNB-CSIC Madrid SPAIN	<i>Microbiome manipulation by the host: lessons from early- divergent plant immunity</i>
	To	Department of Plant and Microbial Biology University of Zurich SWITZERLAND	Supervisor: ZIPFEL Cyril
NICHOLS Annika AUSTRALIA/SWEDEN	From	Research Institute of Molecular Pathology University of Vienna AUSTRIA	<i>The neuronal and genetic regulation of sleep and arousal in zebrafish</i>
	To	Biozentrum University of Basel SWITZERLAND	Supervisor: SCHIER Alexander

NOVOSOLOV Maria ISRAEL/RUSSIA	From	School of Zoology Tel Aviv University ISRAEL	<i>A lizards' tail: the genomics of island adaption</i>
	To	Centre for GeoGenetics University of Copenhagen DENMARK	Supervisor: ALLENTOFT Morten
ODSTRCIL Iris ARGENTINA	From	Department of Molecular and Cellular Biology Harvard University Cambridge USA	<i>Neuronal circuit mechanisms mediating the interplay between action selection and internal states</i>
	To	Department of Neurobiology FMI Basel SWITZERLAND	Supervisor: LÜTHI Andreas
ORLANDI GOMEZ Javier SPAIN	From	Department of Physics and Astronomy University of Calgary CANADA	<i>Revealing the neural underpinning of learning and decision-making with recurrent neural networks</i>
	To	Center for Brain Science RIKEN Saitama JAPAN	Supervisor: BENUCCI Andrea
OTSUKI Leo UK	From	Gurdon Institute University of Cambridge UK	<i>Encoding and retrieving positional identity during limb homeostasis and regeneration</i>
	To	Research Institute of Molecular Pathology Vienna Biocenter AUSTRIA	Supervisor: TANAKA Elly
PARDO-PASTOR Carlos SPAIN	From	Department of Oncological Sciences University of Utah Salt Lake City USA	<i>Mechanical regulation of epithelial cell turnover by Piezo1: proliferation, migration and death</i>
	To	Randall Centre for Cell and Molecular Biophysics King's College London UK	Supervisor: ROSENBLATT Jody

PERINO Matteo ITALY	From	Molecular Developmental Biology Radboud University Nijmegen THE NETHERLANDS	<i>Identification of zygotic genome activation regulators through thermal proteome profiling</i>
	To	Genome Biology Unit EMBL, Heidelberg GERMANY	Supervisor: FURLONG Eileen
PFISTER Katherine USA	From	Biochemistry and Molecular Genetics University of Virginia Charlottesville USA	<i>Imaging actomyosin dynamics and in vivo probing of tissue mechanics in mammalian gastruloids</i>
	To	Developmental Biology Institut de Biologie du Développement de Marseille FRANCE	Supervisor: LENNE Pierre-François
PLATRE Matthieu FRANCE	From	Plant Development and Reproduction ENS Lyon FRANCE	<i>Decoding the rules of root system plasticity</i>
	To	Plant Biology Salk Institute for Biological Studies La Jolla USA	Supervisor: BUSCH Wolfgang
PÖNISCH Wolfram GERMANY	From	MPI for the Physics of Complex Systems Technical University Dresden GERMANY	<i>Cross-talk between cell shape and state during fate transitions in embryonic stem cells</i>
	To	Department of Physiology, Development and Neuroscience University of Cambridge UK	Supervisor: PALUCH Ewa
POSTAT Jérémy FRANCE	From	Department of Immunology Institut Pasteur Paris FRANCE	<i>Cellular crowd dynamics and control in lymphoid organs</i>
	To	Department of Physiology McGill University Montréal CANADA	Supervisor: MANDL Judith

PRAETORIUS Florian GERMANY	From	Physics Department Technical University of Munich GERMANY	<i>Computational de novo design of translational motor proteins</i>
	To	Institute for Protein Design University of Washington Seattle USA	Supervisor: BAKER David
PRIEGO MORENO Sara SPAIN	From	Institute of Cancer and Genomic Sciences University of Birmingham UK	<i>Investigating the roles of dormant telomeric origins in response to replication stress</i>
	To	Molecular and Cell Biology Laboratory Salk Institute for Biological Studies La Jolla USA	Supervisor: KARLSEDER Jan
PULSCHEN André BRAZIL	From	Biochemistry Department University of Sao Paulo BRAZIL	<i>Vesicle trafficking: from archaea to eukaryotes</i>
	To	MRC Laboratory for Molecular Cell Biology University College London UK	Supervisor: BAUM Buzz
SANTORELLI Marco ITALY	From	Telethon Institute of Genetics and Medicine Fondazione Telethon Pozzuoli ITALY	<i>An integrated organoid-engineering approach to study human brain development</i>
	To	Eli and Edythe Broad CIRM Center for Regenerative Medicine and Stem Cell Research University of Southern California Los Angeles USA	Supervisors: QUADRATO Giorgia and MORSUT Leonardo
SUGIYAMA Ryosuke JAPAN	From	Metabolic Systems Research Team RIKEN Center for Sustainable Resource Science Yokohama JAPAN	<i>Survival strategy of anaerobes in human microbiome using radical enzyme-assisted peptide metabolites</i>
	To	Department of Pharmacy National University of Singapore SINGAPORE	Supervisor: MORINAKA Brandon

TREMBLAY Robin CANADA	From	Department of Neuroscience New York University USA	<i>Circuit mechanisms for visual stability</i>
	To	Institute of Molecular and Clinical Ophthalmology Basel SWITZERLAND	Supervisor: ROSKA Botond
TREMBLAY Sebastien CANADA	From	Department of Neurology and Neurosurgery McGill University Montreal CANADA	<i>A new reversible lesion technique for studying the primate brain in naturalistic environments</i>
	To	Department of Neuroscience University of Pennsylvania Philadelphia USA	Supervisor: PLATT Michael
VAGHI Matilde ITALY	From	Department of Imaging Neuroscience University College London UK	<i>Role of functional connectivity dynamic changes to cognitive control-mood interplay</i>
	To	Department of Psychology Stanford University USA	Supervisor: POLDRACK Russell
VINCENT Maxence FRANCE	From	Laboratoire d'Ingénierie des Systèmes Macromoléculaires CNRS Marseille FRANCE	<i>Unraveling regulation of mutagenesis by DNA damage and antibiotic stress responses in single cells</i>
	To	Department of Biochemistry University of Oxford UK	Supervisor: UPHOFF Stephan
VINOGRAD Amit ISRAEL	From	Edmond and Lily Safra Center for Brain Science The Hebrew University Jerusalem ISRAEL	<i>Mechanisms controlling development of aggression</i>
	To	Division of Biology Caltech Pasadena USA	Supervisor: ANDERSON David

VISWANATHAN Pooja INDIA	From	Eberhard Karls Universitaet Tubingen GERMANY	<i>The neuronal mechanisms of concept formation in social memory</i>
	To	Laboratory of Neural Systems Rockefeller University New York USA	Supervisor: FREIWALD Winrich
WELLS Jonathan UK	From	MRC Human Genetics Unit University of Edinburgh UK	<i>The coevolution of transposable elements and zinc finger proteins across the vertebrate phylogeny</i>
	To	Department of Molecular Biology and Genetics Cornell University Ithaca USA	Supervisor: FESCHOTTE Cédric
WILBERTZ Johannes GERMANY	From	FMI for Biomedical Research Basel SWITZERLAND	<i>Tracking mRNA exchange by extracellular vesicles: from delivery to on-site translation</i>
	To	Institut d'Hématologie et d'Immunologie University of Strasbourg FRANCE	Supervisor: GOETZ Jacky
WILLIS Julian UK/IRELAND	From	MRC Laboratory of Molecular Biology University of Cambridge UK	<i>Manipulation of linear plasmids in vivo for enhanced homologous recombination</i>
	To	Broad Institute of MIT and Harvard Harvard University Cambridge USA	Supervisor: LIU David
WRIGHT Alexandra USA	From	Department of Psychology Vanderbilt University Nashville USA	<i>Elucidating the functional asymmetry of echolocation and communication systems in odontocete brains</i>
	To	School of Biology University of St. Andrews UK	Supervisor: TYACK Peter Lloyd

YANG Aerin KOREA	From	Department of Chemistry Korea Advanced Institute of Science and Technology Daejeon KOREA	<i>Designing a new class of protein ligands to control cell surface receptor signaling</i>
	To	Department of Molecular and Cellular Physiology Stanford University USA	Supervisor: GARCIA Christopher
YEUNG Jake CANADA	From	Department of Computational Systems Biology EPFL, Lausanne SWITZERLAND	<i>Single-cell DNA methylation dynamics of stem cell differentiation across intestinal crypts</i>
	To	Laboratory of Quantitative Biology Hubrecht Institute Utrecht THE NETHERLANDS	Supervisor: VAN OUDENAARDEN Alexander
YEUNG WONG Maggie Sui Yan SWEDEN	From	Department of Cell and Molecular Biology Karolinska Institutet Stockholm SWEDEN	<i>Unwrapping myelin plasticity in health and disease</i>
	To	Department of Neurology UC San Francisco USA	Supervisor: CHAN Jonah
ZHANG Jingchao CHINA	From	School of Biological Sciences University of Edinburgh UK	<i>Investigating heterochromatin dynamics underlying early development and reprogramming</i>
	To	Department of Cell and Developmental Biology University of Pennsylvania Philadelphia USA	Supervisor: ZARET Kenneth