Helminth Infection – from Transmission to Control

7-8 December 2017, Parterre Rialto, Basel, Switzerland



Associated Institute of the University of Basel

PROGRAMME

Thursday, 7 December 2017

Welcome and Registration

- 08:15 Registration
- **08:45** Welcome and Introduction, Jennifer Keiser and Peter Odermatt, Swiss TPH

Session 1 - Setting the Scene

Chair: J. Utzinger, Swiss TPH

- 09:00 **Helminthiasis Epidemiology and Control: Scoring Success**, Charles King, Case Western Reserve University, USA
- 09:30 Worms, History and Swiss TPH, Hanspeter Marti, Swiss TPH
- 10:00 Coffee Break

Session 2 - Helminth Diagnosis

Chairs: J. Keiser and P. Odermatt, Swiss TPH

- 10:30 Coprological Methods, Bruno Levecke, Ghent University, Belgium
- 11:00 Echinococcus multilocularis Diagnosis, Peter Deplazes, Vetsuisse-Faculty, University of Zurich
- 11:20 Sushi Worms Diagnostic Challenges, Beatrice Nickel, Swiss TPH
- 11:40 **Mobile Phone and Handheld Microscopy for Helminth Diagnosis**, *Isaac Bogoch, Toronto General Hospital, Canada*
- 12:00 Limitations and Future Considerations in Helminth Diagnostics, Daniel Paris, Swiss TPH
- 12:20 Lunch

Session 3 – Anthelminthic Drugs

Chairs: G. Panic, Swiss TPH and D. Rollinson, Natural History Museum, UK

- 13:30 Combination Chemotherapy for Soil-Transmitted Helminthiasis, Jennifer Keiser, Swiss TPH
- 14:00 **DNDi** Helminth Portfolio, Ivan Scandale, DNDi, Switzerland
- 14:20 Paediatric Praziquantel, Elly Kourany-Lefoll, Merck, Switzerland
- 14:40 **Tribendimidine Dose Finding in School-Aged Children Infected with Hookworm**, Jean Coulibaly, Université Félix Houphouët-Boigny, Côte d'Ivoire
- 15:00 Coffee Break

Session 4 – Anthelminthic Drugs and Beyond

Chairs: E. Hürlimann, Swiss TPH and R. Stothard, Liverpool School of Tropical Medicine, UK

- 15:30 ICE Health Promotion for Helminth Control, Giovanna Raso, Swiss TPH
- 15:50 Elimination of Urogenital Schistosomiasis in Zanzibar: Results of a 5-Year Multi-Disciplinary Integrated Intervention Approach, Stefanie Knopp, Swiss TPH
- 16:10 Evaluation of a Novel Treatment Approach for the Treatment of Human Cystic Echinococcosis, Andreas Neumayr, Swiss TPH
- 16:30 WASH for Accelerating Progress on NTDs New Frontiers, Yael Velleman, WaterAid, UK
- 17:00-17:30 Film Preview and Cocktails, "Why Rudolf Geigy Left for Africa" by Stéphane Kleeb

Friday, 8 December 2017

Session 5 – Helminth Infection: Pain and Gain

- Chairs: O. Fedorova, Siberian State Medical University, Russia and C. King, Case Western Reserve Uni., USA
- 08:30 **Helminth Infections and Cancer: Lessons from Human Liver Flukes**, Banchob Sripa, Khon Kaen University, Thailand
- 09:00 Helminths, Disability and Health-Related Quality of Life, Thomas Fürst, Swiss TPH
- 09:20 **Helminth Infection, Asthma and Diabetes**, Maria Yazdanbakhsh, Leiden University Medical Center, The Netherlands
- 09:40 Tuberculosis and Helminth Co-Infections in Tanzanian Adults, Claudia Daubenberger, Swiss TPH
- 10:00 Influence of Helminths on Cognition and Physical Activity, Markus Gerber, University of Basel
- 10:20 Coffee Break

Session 6 – Helminth Transmission

Chairs: S. Knopp and H. Marti, Swiss TPH

- 10:50 Breaking the Schistosome Life Cycle, David Rollinson, Natural History Museum, UK
- 11:20 Helminthiasis Risk Profiling in Africa, Penelope Vounatsou, Swiss TPH
- 11:50 Helminthiasis Mapping and Prediction in Southeast Asia, Peter Odermatt, Swiss TPH
- 12:10 Opisthorchis viverrini Transmission Models, Nakul Chitnis, Swiss TPH
- 12:30 **COUNTDOWN on WHO 2020 Targets: A Focus on Helminthiasis,** Russell Stothard, Liverpool School of Tropical Medicine, UK
- 13:00 Lunch

Session 7 – From Control to Elimination and Eradication

- Chairs: M. Yazdanbakhsh, Leiden Uni. Medical Center, The Netherlands and B. Sripa, Khon Kaen Uni., Thailand
- 14:00 The Global Programme to Eliminate Lymphatic Filariasis, Jonathan King, WHO, Switzerland
- 14:30 Schistosomiasis Elimination in China, Guojing Yang, Swiss TPH
- 14:50 Integrated Control Strategy for Elimination of Mekong Schistosomiasis in Lao PDR, Peter Odermatt, Swiss TPH
- 15:10 Opisthorchis felineus Control in Siberia, Olga Fedorova, Siberian State Medical University, Russia
- 15:30 Uniting against NTDs An Introduction to the Swiss Alliance against Neglected Tropical Diseases (SANTD), Peter Steinmann, Swiss TPH
- 15:40 Closing Words, Jürg Utzinger, Swiss TPH
- 15:55 End of Day 2

To register visit: www.swisstph.ch/events

Speaker Profiles

Session 1 - Setting the Scene

Jennifer Keiser, Swiss TPH

Jennifer Keiser, Prof. PhD, heads the Helminth Drug Development unit of the department of Medical Parasitology and Infection Biology at Swiss TPH. The unit maintains a large and quite unique set of helminth-rodent models. Research objectives of her team include *in vitro* and *in vivo* evaluation of biological activities of compounds, assay development, preclinical studies such as pharmacokinetics and metabolism, and clinical trials in helminthiasis-endemic countries, particularly in Côte d'Ivoire, Lao People's Democratic Republic, Russia and Tanzania.



Peter Odermatt, Swiss TPH

Peter Odermatt, Prof. PhD, is a group leader in the Ecosystem Health Sciences unit of the department of Epidemiology and Public Health at Swiss TPH. He holds an MSc in Medical Parasitology, a PhD in Epidemiology from the University of Basel, and an MPH from the Johns Hopkins Bloomberg School of Public Health in Baltimore, USA. After three years of postdoctoral research in Burkina Faso and Mauritania, Odermatt worked for several years in helminthiasis control programmes in Cambodia and co-directed a post-graduate training centre on tropical health in Vientiane, Lao People's



Democratic Republic for 6 years. At Swiss TPH, his research, teaching and training pertain to the epidemiology, control and health impact of helminth infections, including schistosomiasis, food-borne trematodiasis and soil-transmitted helminthiasis.

Charles H. King, Western Reserve University, USA

Charles H. King, Prof. PhD, is a medical specialist in infectious diseases and a researcher on parasitic diseases of sub-Saharan Africa. Based at the Center for Global Health and Diseases at Case Western Reserve University in Cleveland, USA, King has studied the many factors related to parasitic infections on the Kenyan south coast and along Lake Victoria. He has worked extensively with the Ministry of Health and the Kenya Medical Research Institute on the problem of preventing and controlling these diseases where they most frequently occur. He serves as Senior Scientist for the Schistosomiasis



Consortium for Operational Research and Evaluation (SCORE) based at the University of Georgia, and as Director of the WHO Collaborating Centre for Research and Training on Schistosomiasis Elimination. Research projects have involved clinical trials for optimal control of the morbidity of parasitic diseases, surveys of the space-time distribution of infection, family studies on the heritability of disease due to schistosomiasis, evaluation of ultrasound and dipstick diagnosis of urogenital schistosomiasis, and dynamic computer modelling of transmission. King has served on advisory panels for the World Health Organization, the Wellcome Trust, and the National Institutes of Health. He is a founding Deputy Editor for PLOS Neglected Tropical Diseases.

Hanspeter Marti, Swiss TPH

Hanspeter Marti, PhD, heads the Diagnostics unit of the department of Medicine at Swiss TPH, as well as the Swiss Reference Centre for diagnosis of human parasitic diseases. He received his MSc in Biology at the University of Basel, and did his PhD in Tanzania on the ecology and population dynamics of intermediate host snails of schistosomiasis. Marti completed his postdoctoral studies in the US on *Trichinella spiralis* in pigs. His current work involves establishing new or improved diagnostic tests for parasitic infections and collaboration in research projects in the field of epidemiology and control of parasitic diseases.



Session 2 – Helminth Diagnosis

Bruno Levecke, Ghent University, Belgium

Bruno Levecke is a veterinarian and holds both a PhD degree in Veterinary Sciences and an MSc in Statistical Data Analysis from Ghent University. He worked for 10 years on a variety of aspects of soil-transmitted helminthiasis, including, but not limited to, diagnosis and drug efficacy. Since 2009, he has shared responsibility for the WHO Collaborating Centre for Monitoring Drug Efficacy against soil-transmitted helminthiasis at Ghent University. Currently, he coordinates "Starworms," a Bill & Melinda Gates Foundation funded project that aims to develop and validate tools to strengthen monitoring and surveillance of drug efficacy and anthelminthic resistance in soil-transmitted helminthiasis control programmes based on preventive chemotherapy.



Peter Deplazes, Vetsuisse-Faculty, University of Zurich, Switzerland

Peter Deplazes is full Professor and Director of the Institute of Parasitology of the Vetsuisse, and Medical Faculty at the University of Zurich. He graduated from the University of Zurich in 1984, where he also received his PhD. From 1988 to 1990 he was an assistant and 1992 he became head of the Laboratory for Zoonoses at the Institute of Parasitology, University of Zurich. In 1991, he was a guest scientist at the Institute for Molecular Genetics and Animal Disease, School of Veterinary Studies, Murdoch, Western Australia. His main research focuses on the biology, epidemiology, diagnosis and



control of zoonotic parasites, such as *Cryptosporidium, Echinococcus, Toxocara*, and on opportunistic parasites in immune-deficient patients. He is a founding member of the European Veterinary Parasitology College (EVPC) and of ESCCAP and he is member of several professional organisations as well as several advisory boards of a number of foundations aiming to improve veterinary parasitology.

Beatrice Nickel, Swiss TPH

Beatrice Nickel, received her PhD in Cellular Biology from the University of Basel in 2001. From 2001–2012 she served as Team Leader at BioFocus DPI AG (former Discovery Partners International AG), Department of Assay Development and Hit Finding, focusing on management of assay development, high throughput screening and high content screening projects, applying immunological, and cellular and biochemical methods. Nickel has been a group leader in the Diagnostic unit in the department of Medicine at Swiss TPH since 2012.



Isaac Bogoch, Toronto General Hospital, University of Toronto, Canada

Isaac Bogoch, MD, is an Assistant Professor at the University of Toronto in the Department of Medicine, and an Infectious Diseases consultant and General Internist at the Toronto General Hospital. He completed medical school and his Internal Medicine residency training at the University of Toronto, and then specialised in Infectious Diseases at Harvard. He holds an MSc in Clinical Epidemiology from the Harvard School of Public Health, and has completed fellowships in both Tropical Infectious Diseases and HIV care. Bogoch divides his clinical and research time between Toronto and several countries in Africa and Asia. He collaborates with a team that models the spread of emerging infectious diseases, and studies innovative and simple diagnostic solutions to improve the quality of medical care in resource-constrained settings.



Daniel Paris, Swiss TPH

Daniel Paris, MD, PhD, DTMH, is Medical Director and heads the department of Medicine at Swiss TPH. Paris is a clinical doctor and researcher who recently jointed Swiss TPH in January 2017 in his new role as Medical Director and Head of the newly formed department of Medicine. This position incorporates the fusion of two predominantly service-oriented departments into a single medical department, with the addition of clinical translational research and diagnostic methodologies. Paris is a Swiss national clinically trained at the University of Zurich. He spent the past 12 years working in clinical research in Southeast Asia for the University of Oxford, based in Bangkok as coordinator of clinical tropical medicine research with a focus on tropical rickettsial illnesses, diagnostics, clinical trials and causes-of-fever studies.



Session 3 – Anthelminthic Drugs

Jennifer Keiser, Swiss TPH

see above.

Ivan Scandale, Drugs for Neglected Diseases initiative, Switzerland

Ivan Scandale is a Chemical Engineering and Industrial Chemistry graduate of the Swiss Federal Institute of Technology, Lausanne and the University of Genoa. His field of research was material science applied to separation processes by membrane and to photovoltaic electrodes. Following his studies, he worked as an R&D scientist in life science start-ups and a medium sized Swiss pharmaceutical company (TRB Chemedica). In 2008, he joined the Drugs for Neglected Diseases *initiative* (DNDi) where he manages discovery and preclinical projects aiming at identifying and developing new treatments for kinetoplastid diseases and filarial infections.



Elly Kourany-Lefoll, Merck, Switzerland

Elly Kourany-Lefoll holds a PhD in pharmaceutical chemistry and is currently the Head of Neglected Tropical Diseases Drug Development at the Merck Global Health Institute (within the healthcare business of Merck KGaA, Darmstadt, Germany) and the Project Leader of the Pediatric Praziquantel Consortium, since its foundation in 2012. She has more than 20 years of experience in drug development in the pharmaceutical/biotechnology industry and has led non-clinical and clinical drug development as well as life cycle management projects in several therapeutic areas including fertility, endocrinology and infectious diseases.



Jean Coulibaly, Université Félix Houphouët-Boigny, Côte d'Ivoire

Jean Coulibaly received his MSc in Entomology at the Université Félix Houphouët-Boigny, Côte d'Ivoire, and obtained his PhD in Epidemiology from the Swiss TPH University of Basel. Coulibaly pursues research on the epidemiology, diagnosis, treatment and control of schistosomiasis and other neglected tropical diseases. He is an Assistant at the Université Félix Houphouët-Boigny, a Group Leader at the Centre Suisse de Recherches Scientifiques en Côte d'Ivoire and a postdoctoral fellow in the Helminth Drug Development unit at Swiss TPH.



Session 4 – Anthelminthic Drugs and Beyond

Giovanna Raso, Swiss TPH

Giovanna Raso, PhD, is a project leader in the Ecosystem Health Sciences unit of the Department of Epidemiology and Public Health at Swiss TPH. Over the past 15 years she has carried out research on the epidemiology of malaria and neglected tropical diseases with an emphasis on the spatial epidemiology of single and multiple parasite species infections. Raso has spent four years in West Africa heading a research department at the Centre Suisse de Recherches Scientifiques en Côte d'Ivoire, while doing field-based trans-disciplinary research and supervising students. She has led and been



involved in the conception, implementation and coordination of health surveys in Côte d'Ivoire and the People's Republic of China. Recently, she conceived, implemented and coordinated a project on the impact of community-led total sanitation and health education on helminth infections in the Taabo health and demographic surveillance site in south-central Côte d'Ivoire.

Stefanie Knopp, Swiss TPH

Stefanie Knopp, PhD, is project leader in the Ecosystem Health Science unit of the Department of Epidemiology and Public Health at Swiss TPH. Her main area of research concerns the diagnosis, epidemiology and control of helminth infections in Africa. Her goal is to work toward sustainable control of neglected tropical diseases, particularly helminth infections, using an integrated multidisciplinary approach. The current focus of her research is the Zanzibar Elimination of Schistosomiasis Transmission (ZEST) project, which aims to eliminate urogenital schistosomiasis from the Zanzibar islands in the United Republic of Tanzania and receives financial support from the Schistosomiasis Consortium for Operational Research and Evaluation (SCORE).



Andreas Neumayr, Swiss TPH

Andreas Neumayr, MD, DTM&H, MCTM, graduated from medical school in Germany and completed his rotation as a junior house officer in Germany, Nepal and Tanzania. Thereafter, he worked for several years in various German university hospitals in the field of Internal Medicine, Anaesthesiology, Intensive Care and Emergency Medicine before receiving his training in Tropical Medicine at the Mahidol University in Bangkok, Thailand and the Instituto de Medicina Tropical Alexander-von-Humboldt at the Universidad Peruana Cayetano Heredia in Lima, Peru. Neumayr served as senior physician



at Swiss TPH since 2010, where he is now the Chief Medical Officer in the department of Medicine. His current research focuses on new diagnostic and treatment options for parasitic diseases, such as serodiagnostic assays for gnathostomiasis and novel treatment options for cystic echinococcosis.

Yael Velleman, WaterAid, UK

Yael Velleman is Senior Policy Analyst on Health and Hygiene at WaterAid, UK. She leads WaterAid's strategic engagement on the links between water, sanitation and hygiene (WASH), and human health. She holds a BSc in International Development from the University of East Anglia, and an MSc degree in Health Policy Planning and Financing from the London School of Hygiene and Tropical Medicine and the London School of Economics. She has worked in the UK, Uganda and Nicaragua, and has supported WaterAid's work in several countries in sub-Saharan Africa and Asia. She is passionate



about making the world a cleaner and healthier place for all, with a particular interest in the links between WASH and public health, including child health, undernutrition, neglected tropical diseases and reproductive/maternal health. Yael is currently seconded to the Department of Public Health, the Environment and the Social Determinants of Health at the World Health Organization, to support joint action on WASH and disease control.

Session 5 – Helminth Infection Pain and Gain

Banchob Sripa, Khon Kaen University, Thailand

Banchob Sripa, Prof. PhD, is chair of the Tropical Medicine Graduate Programme and Head of the WHO Collaborating Centre for Research and Control of Opisthorchiasis, Khon Kaen University, Thailand. He has over 30 years work experience, focusing his research mainly on liver fluke and cholangiocarcinoma (CCA). Sripa is a world expert in pathology, pathogenesis and control of liver fluke infection and CCA. Sripa is Deputy Editor of PLoS Neglected Tropical Diseases and pathogenesis and control of liver fluxes.



sits on the editorial board of Infectious Diseases of Poverty, Journal of Helminthology and Current Tropical Medicine Reports. He has received several scientific research awards - most prestigious, the Outstanding Scientist Award of Thailand from the Foundation for the Promotion of Science and Technology under the Patronage of H.M. the King and the Thailand Research Fund Senior Research Scholar. Sripa is a former panel member of the WHO's International Agency for Research on Cancer (IARC) of experts for biological agents of cancer, DRG4, and FERG.

Thomas Fürst, Swiss TPH

Thomas Fürst, PhD, is an epidemiologist and public health specialist in the Household Economy and Health Systems Research unit of the Department of Epidemiology and Public Health at Swiss TPH. He also holds an honorary research associate position at the School of Public Health of Imperial College London. Fürst obtained his MA in geography, economics and sociology at the University of Basel. In addition to other activities related to neglected tropical diseases, cost of control interventions, and health policy, his research focuses on burden of disease estimation and evaluation. He is a long-standing Global Burden of Disease (GBD) collaborator and a member of the GBD Scientific Council.



Maria Yazdanbakhsh, Leiden University Medical Center, The Netherlands

Maria Yazdanbakhsh, Prof., is Head of Parasitology at Leiden University Medical Center (LUMC), where medical specialists, scientists and (inter)national (bio)medically qualified PhD students and scientists work together to develop effective vaccines against neglected and poverty-related parasitic diseases, and identify parasite-derived immune modulatory molecules to control inflammatory diseases. As an immunologist, Prof. Yazdanbakhsh is interested in how the immune system is influenced by parasites. Her research is characterised by the strong link between laboratory studies at the LUMC



and field studies with collaborative centres in Indonesia and countries in Africa. As part of her activities in low and middle income countries, she puts much emphasis on capacity building. This is done largely through training clinicians and scientists to perform biomedical research at a high standard. As part of this, 15 students from Indonesia, Gabon and Ghana have already obtained their PhD degrees under Yazdanbakhsh's supervision and she is currently involved in supervising seven researchers from these countries, who are at various stages of their PhDs. Yazdanbakhsh has organised numerous courses in Africa and Asia on biomedical research.

Claudia Daubenberger, Swiss TPH

Claudia Daubenberger, Dr. Med. Vet., heads the Clinical Immunology unit in the department of Medical Parasitology and Infection Biology at Swiss TPH. Her main interest is the analysis of human immune responses in phase I to phase III vaccine trials against *Plasmodium falciparum* malaria in all age groups in Sub-Saharan Africa. Currently, the rigorous evaluation of whole purified *P. falciparum* sporozoite-based vaccine approaches in East and West Africa is a major focus of her work. Controlled human malaria infections as a tool to understand vaccine induced protection and to dissect the host-parasite



interactions using systems immunology approaches is pursued. The analysis of impact of helminth co-infections on cellular immunity in HIV, malaria and tuberculosis in Tanzanian children and adults is on-going in collaboration with partners in Tanzania and in Switzerland. Before joining the Swiss TPH, she worked at the International Livestock Research Institute (ILRI) in Kenya on vaccine development against *Theileria parva*, an apicomplexan parasite closely related to *P. falciparum*. With colleagues from the USA, she works on improvement of tick vector control measures and sporozoite based vaccine development against *T. parva*. She received her Doctor of Veterinary Medicine degree from the University of Veterinary Medicine Hannover, Germany.

Markus Gerber, University of Basel, Switzerland

Markus Gerber, Prof. PhD, is Head of the Sport and Psychosocial Health Division of the Department of Sport, Exercise and Health at the University of Basel. His focus is biological, sport and health psychology. His recent work includes an observational study on associations between selective attention and soil-transmitted helminth infections, socioeconomic status, and physical fitness in disadvantaged children in Port Elizabeth, South Africa. Together with colleagues at Swiss TPH, the Centre Suisse de Recherches Scientifiques en Côte d'Ivoire, the Ifakara Health Institute in Tanzania and the Nelson



Mandela Metropolitan University in South Africa, Gerber has obtained a new major research grant from the Fondation Botnar entitled "Effects of school-based physical activity and multi-micronutrient supplementation intervention on growth, health and well-being of schoolchildren in three African countries."

Session 6 – Helminth Transmission

David Rollinson, Global Schistosomiasis Alliance / Natural History Museum, UK

David, Prof. PhD, is an Individual Merit Research Scientist and Director of the World Health Organization Collaborating Centre for the identification and characterization of schistosomes and their snail intermediate hosts at the Natural History Museum in London. He is the new Director of the Global Schistosomiasis Alliance and a member of the WHO Expert Advisory Panel on Parasitic Diseases (Schistosomiasis). He is an editor of Advances in Parasitology and sits on the editorial board of many other journals. He is a former President of the British Society for Parasitology and the World Federation of



Parasitologists. Rollinson's research goal is to work towards a better synthesis and understanding of host-parasite interactions, especially of the schistosome-snail model, and to contribute to efforts to control and eliminate neglected tropical diseases across Africa. His research team employs a multidisciplinary approach, combining state-of-the-art molecular techniques with detailed studies of snail and parasite interactions in endemic areas of disease. He has worked on projects in many African countries, and has a strong network of international collaborators.

Penelope Vounatsou, Swiss TPH

Penelope Vounatsou, PD, PhD, heads the Biostatistics unit at the department of Epidemiology and Public Health at Swiss TPH. Vounatsou and her group pursue disease risk mapping and prediction, using state-of-the art Bayesian approaches with particular emphasis on malaria and neglected tropical diseases. She currently holds an ERC Advanced Grant.



Peter Odermatt, Swiss TPH

See above

Nakul Chitnis, Swiss TPH

Nakul Chitnis, PhD, is an applied mathematician who leads a mathematical epidemiology group in the Infectious Disease Modelling unit of the department of Epidemiology and Public Health at Swiss TPH. His main areas of activities lie in developing and analysing mathematical models to answer questions of public health relevance. Chitnis has used various types of models ranging from population-based difference and differential equations, to stochastic individual based models to analyse the dynamics of malaria and neglected tropical diseases, including opisthorchiasis, rabies, sleeping sickness and lymphatic filariasis.



Russell Stothard, Liverpool School of Tropical Medicine, UK

Russell Stothard, Prof. PhD, as Director of COUNTDOWN, a DFID-UK implementation research consortium, is particularly interested in the control of neglected tropical diseases in Africa from a variety of applied perspectives that promote interdisciplinary approaches. As a parasitologist, he hopes to address important questions concerning the molecular evolution and spatial epidemiology of schistosomiasis (*Schistosoma spp.* and planorbid snails), soil-transmitted helminthiasis and their interplay with malaria. Most recently, Stothard helped to highlight the importance of female and



male genital schistosomiasis with specific reference to longer term control of the HIV epidemic in Africa. He has also helped to expand access to praziquantel treatment from currently overlooked groups, such as preschool-aged children and have conducted seminal pharmacokinetic and pharmacodynamic studies exploring raised dosing in this paediatric setting. Alongside teaching and research duties in the UK, Stothard is currently co-editor of two academic journals Advances in Parasitology and Parasitology, and regularly provide advice to international agencies on worm control in general.

Session 7 – From Control to Elimination and Eradication

Jonathan King, WHO, Switzerland

Jonathan King, PhD, trained in epidemiology and applied public health programmes, has over 17 years of experience with 15 years focused on the integrated control or elimination of neglected tropical diseases spanning from the community to the global level with both government and non-government organisations. King has provided scientific and programmatic support to the Department of Neglected Tropical Diseases at the World Health Organization in Geneva serving as the focal point for lymphatic filariasis elimination since February 2014. Prior to working at WHO, King provided technical support to



NTD activities of the governments in Ghana, Nigeria, Niger, Mali, Sudan, South Sudan and Ethiopia through his work with The Carter Center. He worked for seven years with the U.S. Centers for Disease Control and Prevention (CDC) with four years focused specifically on efforts to eliminate lymphatic filariasis in the Pacific Islands. King completed his undergraduate studies in applied biology at Georgia Institute of Technology and obtained an MSc in Public Health and Epidemiology from Rollins School of Public Health at Emory University. He obtained his PhD in Epidemiology from Swiss TPH.

Guojing Yang, Swiss TPH

Guojing Yang, MD, PhD, is a Senior Scientific Specialist at Swiss TPH. Dr. Yang obtained her Medical Doctor title in 1996 from Tongji Medical University. In 2001, she received her MSc in Pathogenic Biology. She obtained her PhD in Epidemiology in 2006 from the University of Basel. Her PhD thesis topic was "Potential climate change on the transmission of schistosomiasis in China". She then did her post-doctoral fellowship at Charles Darwin University and University of Adelaide, Australia, working on mosquito population dynamics modelling. Before re-joining Swiss TPH, initially in the Biostatistics unit (April 2014) and later, the Infectious Disease Modelling unit (July 2017), she was engaged in tropical disease prevention and control of schistosomiasis and malaria on mainland China.



Peter Odermatt, Swiss TPH

See above.

Olga Fedorova, Siberian State Medical University, Russia

Olga Fedorova, MD, Dr Med Sci, is Professor of Faculty Pediatrics Department, Siberian State Medical University, Tomsk, Russian Federation. Fedorova is a specialist in the fields of epidemiology, and clinical immunology. Her main focuses are epidemiology of immune diseases and parasite infections in the endemic areas, development of new technologies for diagnostic, management of immune and infectious diseases as well as clinical trials. She is a founding member of the Tomsk OPIsthorchiasis Consortium (TOPIC) since 2014 and coordinates current projects in fields of epidemiology of *Opisthorchis*



felineus infection and clinical trials in Western Siberia, Russia. She took part as investigator in the projects of EU Sixth Framework Programme IINTAS, GABRIEL, EuroPrevall, and participates in a collaborative international project BIHSENA supported by ERASMUS+. She is a member of the European Academy of Allergy and Clinical Immunology, and the Union of Pediatricians of Russia.

Closing Words: Jürg Utzinger, Swiss TPH, Switzerland

Jürg Utzinger, PhD, is Director of Swiss TPH and Professor of Epidemiology at the University of Basel. He obtained his MSc in environmental sciences from the Swiss Federal Institute of Technology in Zurich, and his PhD in epidemiology from the University of Basel. He pursued several years of postdoctoral research in demography and epidemiology at Princeton University in the USA. Before his appointment as Director of Swiss TPH, Utzinger headed the Ecosystem Health Sciences unit of the Department of Epidemiology and Public Health at Swiss TPH. His research, teaching and training interests pertain to the epidemiology and integrated control of neglected tropical disease and health impact assessment of large footprint projects in low- and middle-income countries.



Upcoming Symposia

Clinical Decision Support and Health Information Systems – Potential and Pitfalls of New Technologies

25 April, 2018, Basel, Switzerland

New technologies are progressively transforming health care delivery. In health facilities, point-of-care devices can support clinical personnel in the diagnosis and care of patients. At system level, health information tools help aggregate and visualise data thereby facilitating decision-making for managers and policy makers.



The Spring Symposium 2018 invites health system professionals and students to share and review experiences of technology-enabled healthcare with a particular focus on low- and middle-income countries.

- Point-of-care solutions to improve diagnosis and care
- Data systems to support evidence-based decision-making
- Current digital trends and innovations

Clinical Research in Resource Limited Settings – Mission Impossible or Role Model for Future Drug Development?

28 June 2018, Zentrum für Lehre und Forschung, University Hospital Basel, Switzerland

The Swiss TPH Summer Symposium 2018 invites clinical researchers, drug development specialists and students to review and discuss future approaches to drug development. Topics will include:



- Cost explosion of drug development
- Impact of GCP-guideline amendment 2016
- Conducting sponsor-investigator trials in Switzerland
- Clinical trials in low resource settings
- The Biotech approach to clinical development
- The Pharma view on clinical development
- Alternative business models and partnerships
- What we can learn from R&D in low resource settings