ABOUT INVITED SPEAKERS

Special plenary lectures

Izv. prof. dr. sc. Sanja Musić Milanović

Izv.prof.dr.sc. Sanja Musić Milanović is a distinguished expert in the field of public health and epidemiology, renowned for her extensive work in promoting healthy lifestyle and preventive healthcare in Croatia. With a medical degree from the University of Zagreb and a Ph.D. in public health, Dr. Musić Milanović has dedicated her career to advancing public health initiatives and research. Her work at the Croatian Institute of Public Health includes overseeing national programs that focus on community health education, policy development, and evidence-based interventions to improve public health outcomes. She is head of the Health Promotion Division which is the Reference Centre of the Ministry of Health for Health Promotion and leads the implementation of the National Programme “Healthy Living”. She is also a respected academic, holding a position as an Associate Professor at the School of Medicine, University of Zagreb. Dr. Musić Milanović's commitment to public health extends beyond her professional responsibilities. She actively participates in various public health campaigns and collaborates with international organizations to enhance healthcare practices globally.

Prof. dr. sc. Dragan Primorac

Prof. dr. Dragan Primorac is a pediatrician, forensic scientist and subspecialist in medical genetics. He is among the top 2% of scientists with the greatest influence of citations. He is the first holder of the title "Global Penn State Ambassador" in the history of that University founded in 1855. Until recently, he was the president of the Committee on International Relations of the American Academy of Forensic Sciences. He is the president of the "International Society for Applied Biological Sciences", one of the most respectable international scientific organizations in the field of clinical and forensic genetics, with eight Nobel Prize winners participating in its work. He is a full professor at Penn State University, the University of New Haven, the Chinese Xi'an Jiaotong University, College of Medicine and Forensics, and the medical faculties of the Universities of Split, Osijek and Rijeka. In total, he has published around 300 scientific papers, congress reports and about 30 books and book chapters, and has been cited more than 8,870 times (Google Scholar). Primorac is among the first scientists in the world to apply DNA analysis for the purpose of identifying skeletal remains from mass graves and is among the founders of forensic genetics in Croatia. In 1993, together with his team, he explained the molecular mechanism of a type of Osteogenesis Imperfecta. In 2000 he was the author of original results on the origin of Europeans, and among them Croats, which were published in the journal Science, and the author of a paper published in the journal Nature in which, from a genetic point of view, a great step forward was made in understanding one of the most significant migrations of anatomically modern humans, which took place 75,000 years ago from Africa. In Croatia, he introduced the integrated concept of personalized medicine into clinical practice. His special interest and great contribution is in the field of regenerative medicine and cell therapy, and in 2017, for the first time, with his team he explained the molecular basis and

therapeutic effect of mesenchymal stromal cells isolated from adipose tissue during the treatment of articular cartilage damage. In 2018, in cooperation with the company OneOme, which was founded by the famous American Mayo Clinic, the systematic introduction of pharmacogenomic testing into clinical practice was launched for the first time. In 2020, as the president of the Health Commission of the Croatian Football Association, together with his American colleagues, in accordance with the principles of personalized medicine, he introduced the analysis of 294 genes associated with the occurrence of sudden cardiac death in athletes with the aim of prevention. During the COVID-19 pandemic, he leads a team of scientists from the St. Catherine Specialty Hospital, Split Clinical Hospital Center and Slovenian "Educel", which was among the first in the world to successfully apply mesenchymal stromal cells for the purpose of treating a patient with COVID-19 with acute respiratory distress syndrome.

Prof. Davor Štimac, MD, PhD, Specialty Hospital Medico, Rijeka, Croatia, Department of Internal Medicine, Faculty of Medicine, University of Rijeka, Croatia

Davor Štimac is the director of the Specialty Hospital Medico in Rijeka and a full professor at the Department of Internal Medicine of the Faculty of Medicine, University of Rijeka, Croatia. He is an internal medicine specialist and his main areas of scientific and professional interest include gastroenterology, endoscopy, liver and pancreatic diseases, as well as treatment of obesity. Apart from his MD and PhD from the Faculty of Medicine in Rijeka, he holds a PhD in health management from the University of Zagreb and the London School of Economics. Through training at globally renowned clinics in Padova, Milano, Udine, Copenhagen, London and Cleveland he further perfected his skills in gastroenterology.
Before coming to the Specialty Hospital Medico, he was the General manager at the University Hospital Centre Rijeka and the Head of the Department of Internal medicine, Faculty of Medicine. He is the most cited Croatian gastroenterologist, he mentored many master and PhD theses, authored over 30 textbooks and textbook chapters, organized and participated in a number of international conferences. Also, he led several national research projects, some of which include: Prognostic factors in acute pancreatitis; Effects of enteral nutrition in severe acute pancreatitis; Antimicrobial prophylaxis in the treatment of patients with acute pancreatitis; The relationship between the occurrence and severity of liver and pancreas damage in people suffering from alcohol addiction.
Currently, he is the Vice president of Croatian Academy of Medical Sciences, the Vice president of Croatian Society for Quality Improvement in Health Care and the President of Croatian Society of Obesity. Throughout his career he received various awards and accolades (Medal of St. Vid, annual award of the City of Rijeka, award of the Croatian Medical Association for the best scientific publication in the field of clinical medicine).

EAA Plenary Speakers

Kate E Pickett, OBE FRSA FFPH FAcSS, Professor of Epidemiology, Academic Director of Health Equity North, Associate Director of the Leverhulme Centre for Anthropocene Biodiversity University of York, UK

Kate Pickett trained in biological anthropology at Cambridge, nutritional sciences at Cornell and epidemiology at UC-Berkeley. She is currently Professor of Epidemiology and As sociateDirector of the Leverhulme Centre for Anthropocene Biodiversity at the University of York and an Academic Co-Director of Health Equity North. She is aFellow of both the RSA, the UK Faculty of Public Health and the Academy of Social Sciences. She was awarded an OBE in 2023 for services to societal equality. She is co- author, with Richard Wilkinson, of the worldwide best-selling The Spirit Level (2009) and The Inner Level (2018). The Spirit Level was awarded Publication of the Year by the Political Studies Association, chosen as one of the Top Ten Books of the Decade by the New Statesman, and one of the top 100 books of the century by the Guardian. She is a co-founder and patron of The Equality Trust and a trustee of the Wellbeing Economy Alliance.

Professor Jan C. Semenza, Environmental epidemiologist Department of Sustainable Health at Umeå University, Sweden Heidelberg Institute of Global Health, University of Heidelberg, Germany

Jan C. Semenza is an environmental epidemiologist with 30 years of experience in climate change and health. He led the US CDC response to the 1995 heat wave in Chicago that claimed the lives of more than 700 individuals. He elucidated the underlying medical, environmental, societal, and behavioral causes of heat-related mortality. These insights became the underpinning of policy interventions and heat health action plans in the US, designed to prevent these climate change impacts. Moreover, he pioneered the characterization of heat-related morbidity by analyzing excess hospital admissions. Over the course of 15 years, he led the work on infectious diseases and climate change at European Centre for Disease Prevention and Control (ECDC). He investigated climatic and environmental determinants of water- food- and vector-borne diseases and developed novel surveillance and early warning systems. For example, he devised a tool that has been operationalized at ECDC to monitor sea surface temperature and salinity in marine environments to assess and forecast the suitability of vibrio infections, a potentially fatal disease. He also used population mobility to predict the risk of importation of tropical diseases into Europe. As a lead author of the Intergovernmental Panel on Climate Change (IPCC) AR6 report, he wrote the infectious disease section. He has developed indicators for climate change and health that are tracked as part of the global Lancet Countdown reports and is the co-lead of WG1&2 of the Lancet

Countdown in Europe. Currently, he is associated with the Department of Sustainable Health at Umeå University in Sweden and Heidelberg Institute of Global Health, at the University of Heidelberg in Germany.

Professor Eörs Szathmáry, Biological Institute, Eötvös University, Budapest, Hungary Research Professor, Institute of Evolution, Centre for Ecological Research, Budapest, Hungary Director, Center for the Conceptual Foundations of Science, Parmenides Foundation, Pöcking, Germany

Eörs Szathmáry is Professor of Biology at the Department of Plant Taxonomy and Ecology of Eötvös Loránd University, Budapest, where he also directs the PhD programme in Evolutionary Genetics and Conservation Biology. He is the Director of the Parmenides Centre for the Conceptual Foundations of Science at the Parmenides Foundation. Since 2011, Eörs Szathmáry has been a visiting professor at the Faculty of Biology, Ludwig Maximilian University in Munich. Since 2021 he is Research Professor at the Institute of Evolution, Centre for Ecological Research, Hungarian Academy of Sciences, Budapest. His main interests are in evolutionary biology and include the following topics: major evolutionary transitions, origin of life and the genetic code, origin of the cell, origin of animal societies, origin of human language, levels and mechanisms of biological cooperation, Darwinian neurodynamics and astrobiology. With his mentor, John Maynard Smith, he has published two landmark books which are the main references in the field (The Major Transitions in Evolution, Freeman, 1995, and The Origins of Life, Oxford University Press, 1999). Both books have been translated into other languages (so far into German, French, Japanese and Hungarian). His periods abroad include (in chronological order): University of Sussex (Brighton, UK), MCR National Institute for Medical Research (London, UK), Wissenschaftskolleg zu Berlin (Institute for Advanced Study), University of Zurich, Bellaggio Centre of the Rockefeller Foundation, College de France (Paris), Parmenides Foundation (Pullach/Munich). He is a member of the Presidium of the Hungarian Academy of Sciences, the Norwegian Academy of Sciences and Letters, the Academia Europaea and EMBO. Since 2021 he is Vice-President of the International Basic Sciences Programme (IBSP) of UNESCO. He has been awarded the New Europe Prize for Higher Education and Research (1996), the Academy Prize (1999) and the Széchenyi Prize (2017).

EAA Confirmed Invited Speakers

Mait Metspalu, Institute of Genomics, Tartu, Estonia

Mait Metspalu is the Director of the Institute of Genomics in Tartu, Estonia. His research concentrates on using and developing population genetics approaches to understand the genesis of the genetic diversity patterns of humans through reconstructions of past population movements, splits and admixtures as well as adaptations to local environments (both natural and manmade). During the few past years Mait has also started a dedicated ancient DNA program aiming mostly at reconstructing population changes in the East European Plain since the Paleolithic. Until 2018 he was the Director of the Estonian Biocentre, the leading research institute in Estonia in the interdisciplinary and interconnected fields of evolutionary genomics, population genetics and archaeogenetics. In 2018 they merged with Estonian Genome Center, which houses the population based Estonian Biobank containing genetic and health data for a cohort of 200 000. Mait became the Director of the Institute of Genomics, University of Tartu in 2018.

Emanuela Cristiani, Sapienza University of Rome, Rome, Italy

Emanuela Cristiani is Associate Professor of Prehistoric Archeology at the Department of Oral and Maxillo-Facial Sciences at Sapienza University of Rome, where she also directs the DANTE – Diet and Ancient Technology laboratory. Soon after she received her PhD in Archeology at Sapienza University of Rome in 2010, Cristiani was awarded a Wenner-Gren Foundation Post-Doctoral Fellowship. In 2011 she obtained a Marie Curie Individual Research Fellowship at the University of Cambridge (UK). Subsequently, in 2013, she was Associate Research Fellow at the Italian Academy for Advanced Studies in America (Columbia University, USA). Since 2015 E. Cristiani is principal investigator of the ERC Starting Grant “HIDDEN FOODS: Plant foods in Paleolithic and Mesolithic societies of SE Europe and Italy "aimed at exploring the diet and technology of ancient hunter-gatherers through the integration of various anthropological and cultural evidences. Her main research focus is the study of the identity and traditions of Paleolithic and Mesolithic societies of southern Europe through the characterization of their material culture.

Vladimir Ivković, Massachusetts General Hospital, Harvard Medical School and Harvard University, USA

Vladimir Ivković is a translational neuroscientist and integrative physiologist with emphases in neuroimaging, physiology, operational and behavioral assessments in extreme environments and clinical settings. He is the Director of the Laboratory for Neuroimaging and Integrative Physiology at the Massachusetts General Hospital, an Instructor in Psychiatry at the Harvard Medical School and an Instructor in Neuroscience at the Harvard University. He conducted numerous studies on healthy, elite (astronauts, firefighters, active military, athletes), and patient (Parkinson's disease, cardiosurgical) populations in operational and clinical environments. He currently serves as a principal investigator on a translational study of neurophysiologic and cognitive markers of resiliency to post-traumatic stress disorder (PTSD), and a co-investigator on the first complex spaceflight study investigating functional brain, neurobehavioral, immune, metabolomic, and sleep changes in NASA's missions.

Christiane Scheffler, University of Potsdam, Germany

Christiane Scheffler is Human Biologist at University of Potsdam and interested in research on Human Growth and Development. She studied Biology, Chemistry and Pedagogics. Her main research interest is phenotypic plasticity on human growth in association to changing environmental and social living conditions. Her main scientific interest is the impact of changing environment on body measurements. Currently she is working on social regulation of body height, especially due to secular trend in historic and recent in European and stunted populations. She has conducted a big data bank of anthropometric measurements of children and adults. She is founder and editor of the Journal "Human Biology and Public Health" and published more than 100 scientific paper and book chapter. She is board member of the European Anthropological Association and member of the Anthropological Society in Germany, the Auxological Society and the Society for the Studies of Human Biology. As an expert of anthropometrics she is a member of national (DIN) and international (CEN, ISO) standardization committees.

Mario Novak, Institute for Anthropological Research, Zagreb, Croatia

Mario Novak received BA in history and archeology from the University of Zagreb, where he also received his PhD in Roman period archaeology (bioarchaeology). Between 2002 and 2013, he worked at the Croatian Academy of Sciences and Arts, and from 2013 to 2015 at the University College Dublin as a post-doctoral researcher. Today, he is working at the Institute for Anthropological Research in Zagreb as a senior research associate. His research is focused towards a holistic study of human skeletal remains from archaeological contexts. In his research, he combines numerous

analytical methods taken from various scientific disciplines such as (bio)archaeology, stable isotope analysis, paleogenetics, radiology, etc. He is the PI and collaborator on several domestic and international projects, and in addition to publications in scientific and professional journals, he has presented the results of his research at more than 80 professional meetings.

Janina Tutkuviene, Institute of Biomedical Sciences, Faculty of Medicine, Vilnius University, Lithuania

Janina Tutkuviene is a doctor, anatomist and anthropologist, Head of the Department of Anatomy, Histology and Anthropology (Institute of Biomedical Sciences, Faculty of Medicine, Vilnius University). She also heads Doctoral School of Medicine and Health Sciences at Vilnius University. Her research interests are interdisciplinary studies of the human body (growth and development, aging) in a changing environment, variations of body in health and disease, evolutionary medicine. She prepared growth guidelines and charts for Lithuanian children. Her current research interests include child growth and maturation, growth programming, physical status in relation to various clinical pathologies, body image and attractiveness, craniofacial research. Professor has published (together with co-authors) over 200 publications (including articles, chapters at the monographies, textbooks, also popular science publications). She has given numerous scientific presentations or keynote lectures at the Universities in various European countries and US. Janina Tutkuviene supervised and consulted 12 doctoral dissertations, and currently supervises four PhD students. Janina Tutkuviene has participated in several EC projects (STOP-II, AGIS, ISEC, Leonardo da Vinci, HORIZON 2020, Alliance4Life). She is an active member of many international scientific societies and is one of the editors of the journals Anthropologischer Anzeiger and HOMO, also editorial board member of Annals of Human Biology and Collegium Antropologicum. Professor has a broad collaboration with scientists from many countries (Austria, Croatia, Germany, Latvia, Poland, Switzerland, UK, US and the others).

Helen Liversidge, Institute of Dentistry, Faculty of Medicine and Dentistry, Queen Mary University of London, UK

Helen Liversidge qualified in dentistry from Stellenbosch, South Africa. She worked in NHS and private general dental practice whilst at the same time completing an MSc (Mineralised Tissue Biology) and PhD (Human Tooth development in an archaeological population of known age) at University College London studying with Professors Alan Boyde and Christopher Dean (respectively). She joined Child Oral Health in the Dental Institute, Barts and The London, Queen Mary's School of Medicine and Dentistry in 1985. Helen teaches undergraduate and postgraduate dental students in clinical paediatric dentistry and has supervised numerous postgraduate research projects, PhD's and joint supervision with Universities in Dunedin, New Zealand and Niarobi, Kenya. Her research area and most important publications relate to tooth formation and estimating age from developing teeth.

ISGA-SSHB Confirmed Invited Speakers

Ahmed Elhakeem, Bristol Medical School, University of Bristol, UK

Ahmed is an epidemiologist working on the EU funded LifeCycle and LongITools projects. His research uses large multicohort collaborations to study the determinants of cardio-metabolic and musculoskeletal health trajectories. His current research includes studies relating to medically assisted reproduction, pregnancy complications, pubertal growth, physical activity, and environmental exposures. He is an epidemiologist working on the EU funded LongITools project. His research uses large multicohort studies to investigate the determinants (and consequences) of cardio-metabolic and musculoskeletal health trajectories across the life course. His current research includes various studies relating to assisted reproductive technology, pregnancy complications, pubertal growth, physical activity, and environmental exposures.

Babette Zemel, Children's Hospital of Philadelphia, University of Pennsylvania, Philadelphia, USA

Dr. Zemel is a biological anthropologist by training, and Professor of Pediatrics at The University of Pennsylvania Perelman School of Medicine in the Division of Gastroenterology, Hepatology and Nutrition. She directs the Nutrition and Growth Laboratory at The Children's Hospital of Philadelphia, which also serves as the Nutrition Core for the Center for Human Phenomic Science at her institution. The Nutrition and Growth Laboratory provides assessment of growth, body composition, energy expenditure, bone density and muscle strength and supports a broad, interdisciplinary group of investigators. Her research program aims to improve understanding of lifelong health and how it relates to childhood antecedents of physical growth and maturation, body composition, population ancestry/genetics, and lifestyle factors. Such understanding has public health implications for disease prevention and lifelong wellness. It also addresses concerns for children across a wide spectrum of chronic diseases who experience impaired growth, altered body composition and limitations in nutrition and physical activity. She has primarily focused on two health concerns, bone fragility and obesity. I was the site PI for the multi-center, multi-ethnic, longitudinal, prospective study, the NICHD Bone Mineral Density in Childhood Study, and related studies investigating the genetics of bone accretion in childhood in this cohort. She has also conducted a study of bone accretion in very young children. These studies have provided reference ranges for bone density in children and advanced our understanding of bone mineral accretion from early childhood through adulthood, and effects of growth, muscle development, physical activity, diet and genetics during this critical life phase. The other broad theme in my research is childhood body composition and development of obesity. I lead the Infant Growth and Microbiome Study that is examining factors contributing to excess weight gain in African

American infants and young children, including the gut microbiome and metabolome and contextual factors associated with growth and dietary intake. She has also developed reference ranges for assessment of growth and nutritional status in children with Down syndrome, premature infants, and DXA based body composition for children and adolescents. Additional accomplishments include behavioral interventions to evaluate the effect of increased calcium intake in school age children and a behavioral intervention to reduce energy intake and increase physical activity in obese adolescents. She also collaborates extensively with pediatric experts in children with chronic diseases such as kidney diseases, sickle cell disease, childhood cancer survivors, and cardiovascular diseases.

Jelena Šarac, Institute for Anthropological Research, Zagreb, Croatia

Jelena Šarac, PhD, is an anthropologist, a senior research associate and the head of the Laboratory for Molecular Anthropology at the Centre for Applied Bioanthropology, Institute for Anthropological Research, Zagreb, Croatia. Her research interest involves anthropological investigation of maternal and child health, with special emphasis on the development of complex diseases, as well as evolutionary biology and population genetics. Her early work was focused on the anthropological analysis of genetic diversity and population structure in the eastern Adriatic and the wider area of Croatia and Europe based on molecular genetic markers (mitochondrial DNA and Y chromosomes) and the study of microevolutionary, historical and cultural processes that shaped the genetic landscape of these populations. In the last years her focus shifted towards the identification of risk factors for the development of complex non- communicable diseases (especially metabolic syndrome, diabetes mellitus and obesity) in early childhood, adolescence and adulthood and means of their prevention, through studies performed on Croatian islands. The investigation of maternal and child health in Dalmatia, Croatia and the identification of early risk factors affecting future well-being of the child have been in the center of her latest work, based on her active involvement in the “Croatian Islands’ Birth Cohort Study (CRIBS)” funded by the Croatian Science Foundation. She is also involved in the Horizon Europe project on improving child health with regards to indoor air pollution ("Evidence-driven indoor air quality improvement - EDIAQI"). She is an author or co-author of more than 40 scientific publications with a h-index 13. From 2010 onwards she taught several Anthropology undergraduate and graduate courses at the Faculty of Humanities and Social Sciences and the Faculty of Science.

Katherine A. Kentistou, MRC Epidemiology Unit, University of Cambridge, UK

Dr. Katherine Kentistou is a genetic epidemiologist and works as a Research Associate at the University of Cambridge in the UK. Her research aims to identify and characterise genetic mechanisms that drive growth and body composition and their relation to metabolic disease susceptibility, using population-level data. She has established a framework that integrates genetic association information with other types of functional data, pertaining to gene expression regulation and protein function, to prioritise disease-relevant genes. Recently, she has brought together common genomic variant association data on pubertal onset and childhood growth from

several different population biobanks to apply this framework, alongside sequencing data on rare coding variants with large effects on these growth phenotypes. Katherine holds a BSc in Biology, an MSc in Human Molecular Genetics and obtained her PhD in Precision Medicine from the University of Edinburgh. She has authored and co-authored more than 40 scientific publications and has an i10-index of 17.

Lawrence Schell, Department of Anthropology, and Department of Epidemiology & Biostatistics, University at Albany, State University of New York, Albany, USA

Lawrence M. Schell is a Distinguished Professor in the Department of Epidemiology and Biostatistics Department and in the Department of Anthropology at the University at Albany, State University of New York, and a Clinical Associate Professor of Pediatrics at the Albany Medical College, Albany, NY. His research concerns the relationship of social factors to human prenatal and postnatal growth, and maturation particularly on the effects of pollutants disproportionately experienced by marginalized communities. He has conducted four major studies of pollutants and health. In 1992 he led a study of lead exposure and infant development among socioeconomically disadvantaged, mostly African American mothers and infants. In 1994 he began a research partnership with the Akwesasne Mohawk Nation living along the St. Lawrence River which was facing exposure to polychlorinated biphenyl pollution. Over the next twenty years his team conducted three studies with the Nation. Results from these studies pertain to the relationship of several pollutants to adolescent size (overweight and obesity), sexual maturation, thyroid function, and cognitive-behavioral status of 10–20-year-olds, as well as immune function and women's reproductive health. The 25-year collaboration with the Mohawk is cited as a model of collaborative and respectful research between scientists and Native Americans. Beginning with the study of poor women in Albany, it was clear that exposure to pollutants in the US affects communities of color disproportionately and their health suffers. In 2005 he established the Center for the Elimination of Minority Health Disparities at the University at Albany, funded continuously by NIMHD and served as its director until 2021. From 2016- 2021 he executed a program of transdisciplinary training in minority health disparities research funded with a 10-million-dollar S21 award from NIH supplemented by a 1-million-dollar award from the Hearst Foundations. He continues as a professor and a consultant on the Croatian Island Birth Cohort Study and with the Bergen Growth Studies group. He has edited nine books, conference proceedings and special issues of journals, and published over 130 articles and chapters on growth, maturation, and health disparities. He has organized 21 conferences and symposia.

Liina Mansukoski, Hull York Medical School, University of York, ActEarly Research, Bradford Institute for Health Research, UK

Liina is presently working on ActEarly, a large UKPRP funded research project focusing on early life changes to improve the health and opportunities for children living in areas with high levels of child poverty, Bradford, West Yorkshire and Tower Hamlets, London. This work is in collaboration with the Bradford Institute for Health Research at Bradford Royal Infirmary. Liina is leading the meta-evaluation of the program, developing core outcomes sets for ActEarly, and using quantitative methods to understand overall system change as a result of the ActEarly interventions. She further contributes to Teaching and Learning on the MBBS Programme and supervises Masters students. Before starting at the Hull York Medical School, Liina worked as a Research Fellow in the Department of Health Sciences at University of York. Previously, she has worked as a Child Growth and Development Research Fellow at the Hospital for Sick Children, and as a doctoral researcher and University Teacher at Loughborough University. She obtained her PhD in Public Health Nutrition from Loughborough University in 2019, and her BSc and MSc(Res) in Anthropology from Durham University. Liina's background is in the anthropology and human biology of growth, and her expertise are in: Child growth and development (e.g., inequalities, secular trends, nutritional status), Evaluation of early years public health interventions from a systems perspective (e.g., development of core outcome sets, consensus methods), Harnessing large longitudinal and routine datasets to address research questions related to growth and growth metrics (e.g., growth modelling using specialist software). In her current role Liina has further started investigating ways to utilise connected routine datasets in systems evaluation. Liina is a peer-reviewer for several human biology, anthropology and nutrition journals.

Linda Adair, Department of Nutrition and Fellow, Carolina Population Center, University of North Carolina at Chapel Hill, Chapel Hill, USA

Linda Adair is a Professor in the Department of Nutrition at the Gillings School of Global Public Health and School of Medicine at the University of North Carolina at Chapel Hill, Fellow at the Carolina Population Center, and Honorary Professor at the University of the Witwatersrand in Johannesburg. She earned her PhD in Biological Anthropology at the University of Pennsylvania and completed a Mellon Postdoctoral Fellowship for Studies at the Interface of Biology and Demography at the Carolina Population Center at the University of North Carolina at Chapel Hill (UNC-CH). Her research focuses on maternal and child nutrition, in particular, the determinants and consequences of infant and early childhood feeding and growth patterns, and the developmental origins of adult health. She has led the Cebu (Philippines) Longitudinal Health and Nutrition Survey for more than 30 years, and has been a collaborator on research in China, South Africa, Rwanda, and Malawi. As one of the founding members of the COHORTS collaboration, she has published numerous studies based on birth cohorts in low and middle-income countries. Her US work is with the Coordinating Center for the Environmental Influences on Child health (ECHO) which focuses on child obesity, airways, neurodevelopment and positive health. Her methodological focus is on the design and implementation of population-based health/demographic/nutrition surveys

and the application of longitudinal epidemiologic and structural models to health outcome research. At the University of North Carolina, she teaches courses in international nutrition as well and analytic methods in nutrition epidemiology. Adair is the 2014 recipient of the Kellogg International Nutrition Award, and was recently inducted into the American Society for Nutrition Society of Fellows. She has more than 300 peer-reviewed publications in biomedical journals.

Nicola L. Hawley, Department of Chronic Disease Epidemiology, Yale School of Public Health, New Haven, USA

Dr. Nicola Hawley is an Associate Professor of Epidemiology (Chronic Disease) and Anthropology at the Yale School of Public Health. Her expertise is in the etiology and prevention of obesity-related chronic disease in resource-poor, low-income settings. Her research focuses predominantly on Pacific Islander populations, although she has ongoing collaborations in South Africa, Uganda, Honduras, China, Columbia and the US. Methodologically, Dr. Hawley employs a life-course approach that utilizes cross-sectional, cohort, and randomized controlled trial designs to address questions of causality and identify critical periods of susceptibility. She is a mixed-methods expert and an advocate for community-engaged approaches to research, intervention, and development of health policy. Dr. Hawley's current research focuses broadly on: (1) understanding how maternal and child health are impacted by rising levels of obesity and diabetes in resource-poor settings; (2) determining how innovations in healthcare delivery can impact identification and treatment of obesity-related disease during the perinatal period; and (3) developing interventions focused on pregnancy, childhood, and adolescence to prevent the intergenerational transmission of obesity-related disease.

Outi Mäkitie, University of Helsinki and Helsinki University Hospital, Helsinki, Finland, Dept of Molecular Medicine and Surgery, Karolinska Institutet, Stockholm, Sweden

Outi Mäkitie received her MD degree at University of Helsinki in 1986 and completed specialty training in Helsinki for paediatrics in 1998 and for paediatric endocrinology in 2000. Presently she is Professor of Paediatric Endocrinology and Chief Physician at Children's Hospital, University of Helsinki, Finland, and Senior Researcher and Team leader at Karolinska Institutet, Stockholm, Sweden. Prof. Mäkitie's research has since the beginning of the research career focused on clinical and translational aspects of pediatric bone diseases, mainly on rare genetic disorders including skeletal dysplasia, childhood-onset osteoporosis and various defects of mineral homeostasis. Her research groups in Helsinki and Stockholm have identified new disease genes and elucidated the biological disease mechanisms in several pediatric bone disorders.

Patrick Mahoney, The Histology Lab | Skeletal Biology Research Centre, School of Anthropology and Conservation, University of Kent,UK

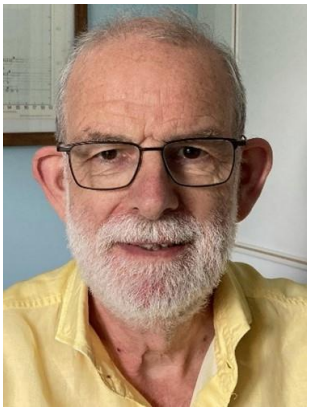
Patrick Mahoney is a human skeletal biologist who specialises in reconstructing the cell mechanisms underlying the morphology of hard tissues, especially deciduous teeth and long bones. This allows Patrick to address questions related to growth and development, bioarchaeology and human evolution. Dr Mahoney was awarded a first class BSc degree in Archaeology from University College London in 1999, and a distinction for an MSc in Human Osteology and Palaeopathology from the University of Sheffield in 2000. With Research Council funding, he gained a PhD from the University of Sheffield in 2004. Before joining the School of Anthropology and Conservation at Kent in 2008 as a Lecturer in Biological Anthropology, Patrick was employed as a postdoctoral researcher on AHRC and NSF-funded projects researching dental development in humans and fossil primates. Dr Mahoney's current research interests include: biorhythms and human growth, histology of hominoid deciduous teeth and evolution of human bone microstructure.ž

Paula van Dommelen, The Netherlands Organization for Applied Scientific Research (TNO), Leiden, The Netherlands

Dr. van Dommelen is a scientist at The Netherlands Organization for Applied Scientific Research (TNO). Her main focus has been on the development of technological innovations and data science to protect and improve child health worldwide. This includes the development of innovative statistical methods (including artificial intelligence, prediction modelling, matching techniques, etc.), personalized child health care applications, frameworks for decision support systems, youth health care guidelines and implementation strategies, and research on mental and physical child health, including many aspects of child growth and assessment of child development, such as growth chart construction, growth curve analysis, factors relating early growth and development to later outcomes, and the early detection of disorders related to growth and development. She developed and implemented a guideline for preventive child healthcare professionals in order to improve early detection of pathological disorders associated with short stature (or growth faltering) or tall stature (or accelerated growth). She developed digital health solutions for the management of growth disorders in pediatric patients receiving growth hormone therapy. She has a broad experience in analyzing data from multiple sources, such as survey questions, electronic health records of Youth Health Care, monitoring health systems for screening, the Dutch Perinatal and Neonatal registers, the Dutch Central Bureau of Statistics, the Netherlands Twin Register, worldwide eHealth tools for patients with growth disorders, and underlying data sets from the Bill and Melinda Gates Foundation. She has published over 100 peer reviewed scientific publications with a total H-index of 38.

Pétur Benedikt Júlíusson, National Institute of Public Health; Department of Clinical Science, University of Bergen; Children and Youth Clinic, Haukeland University Hospital, Bergen, Norway

Professor Pétur B. Júlíusson divides his time between the Norwegian Institute of Public Health (NIPH, leader of the Department of Health Registry Research and Development), Haukeland University Hospital (HUH, senior consultant, paediatric endocrinology) and the University of Bergen (UiB, professor). His main research interest is on childhood growth, pubertal development and obesity. At the NIPH he is administrating and facilitating research and developmental activities attached to major national registries (Medical Birth Registry of Norway, Cause of Death Registry, Heart Registry and Abortion Registry), as well as being involved in projects on health and development of children (PI of the HealthProfile 0-20 project, in the scientific advisory boards of the Mother, Father and Child Study (MoBa) and The Child Growth Study/WHO-COSI). At the HUH, he has been responsible for the development of the Obesity Outpatient Clinic treating children and adolescents, since start in 2012, and is the PI of the FABO-study, and effectiveness study employing Family- based Behavioural Social Facilitation Treatment, treating children and adolescents with severe obesity. Further, he is a co-PI of the eBATTLE Obesity study, a national multi-center study on treatment of adolescents with severe obesity. He is the PI of the Bergen Growth Studies 1 and 2 (BGS1 and BGS2); BGS1 provided the national growth charts currently used in Norway; BGS2 being the first (and currently the only) pubertal reference study conducted in Norway, using ultrasound as a novel method for objective assessment of breast tissue and testicular development. He is the current leader of Health Registry Group, Alrek Health Cluster, Bergen. He has supervised 12 PhD candidates and has published 120 papers with peer review (November 2022).



Tim Cole, Great Ormond Street Institute of Child Health at University College London, London, UK

Tim Cole is Professor of Medical Statistics at the Great Ormond Street Institute of Child Health at University College London, where he has been since 1998. Previously he studied at the Universities of Cambridge and Oxford, and from 1970 to 2019 he was employed by the British Medical Research Council at, in turn, the Pneumoconiosis Research Unit in South Wales (1970-75), the Dunn Nutrition Unit in Cambridge (1975-98) and University College London. His research interests cover the statistics of anthropometry and growth and the factors affecting them across the life course. He has invented several novel growth charts, including the International Obesity TaskForce child obesity BMI cut-offs, and his LMS method is the statistical basis for constructing national growth references in the UK, the USA, WHO and elsewhere. More recently he developed the SITAR growth curve model for analysing longitudinal growth, which has particular applications in infancy and puberty where it estimates the timing and intensity of the growth spurt in individuals, i.e. peak velocity and age at peak velocity. He has produced open source software and patented the Cole Calculator to simplify growth assessment. Another of his interests is the use of dental and skeletal age imaging for assessing age in unaccompanied asylum-seeking children. In 2011

he acted as expert witness in several cases of Indonesian fishermen accused by the Australian Government of people smuggling. In 2022 he served as a member of the Home Office Age Estimation Scientific Advisory Committee to advise the UK Government on the use of biological measures of developmental age to improve age assessment. He has also contributed statistical insight to human nutrition research working with colleagues in the areas of infant feeding, child body composition, child bone health, energy intake and energy expenditure, all of which require an understanding of and adjustment for body size effects. He has a longstanding interest in statistical peer review, working as Statistical Editor with the BMJ for over 30 years, and leading a panel of statistical reviewers for the Archives of Disease in Childhood for 20 years. Tim Cole has published over 600 peer-reviewed research papers, of which 15 have more than 1000 citations, and 200+ have more than 100, on Google Scholar, with a total of more than 110,000 citations and an h-index of 152. In 2007 he was elected a Fellow of the Academy of Medical Sciences (FMedSci) and appointed an Honorary Fellow of the Royal College of Paediatrics and Child Health, and in 2022 he was elected a Member of the Academia Europaea (MAE). In 2015 he won the Royal Statistical Society's Bradford Hill Medal, in 2016 the Rank Prize for Nutrition, and in 2019 the Tanner Memorial Medal of the Society for the Study of Human Biology.

Will Johnson, Epidemiology and Population Health, School of Sport, Exercise and Health Science, Loughborough University, Loughborough, UK

Will Johnson is a Reader in Epidemiology and Population Health at Loughborough University in the UK. His research focuses on working with complex longitudinal data to investigate the life course epidemiology of non-communicable diseases in both high-income settings (e.g., UK and USA) and low- and middle-income settings (e.g., The Gambia and India). His experience and expertise are in investigating the role of body size trajectories and inequalities in obesity and related-disease development. Much of this work has been conducted across multiple cohorts of individuals born at different points in time, thereby allowing investigation of secular trends in longitudinal processes and relationships. From conducting this research, he has developed skills in the design and application of statistical methods to model longitudinal data, particularly those pertaining to human physical growth and obesity development. His research has resulted in over 85 publications (h-index 26; i10 index 56) and has been funded by (among others) the UK Medical Research Council, USA National Institutes of Health, the British Academy, and the Child Growth Foundation.