



PHILIPS

AVENT

Symposium 2019

**Proven and practical
approaches to breastfeeding;**
from hospital to home

Share, learn, connect

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Hello / Willkommen

We're excited to welcome you to our 2019 Symposium



Thank you for joining us. We're looking forward to a fantastic two days of sharing, learning & connecting

We founded the Philips Avent Scientific Symposium in 2017 as an annual forum for healthcare professionals to share, learn, and connect on how best to support each other, and the babies and parents in their care. By working together and sharing research and best practices, we believe that we can help every baby get a strong start that sets the stage for a healthy future.

Like you, at Philips Avent, we're committed to helping mothers breastfeed for longer, and make informed choices about the care of their baby. There are many challenges; physical, emotional, and practical that need attention to enable more breastfeeding for longer and we wish to work together with you to meet this shared goal.

The first 1000 days are key to a healthy future and that's why we work with professionals and parents to co-create solutions, services and products that support their needs during this time.

With this event, we aim to shed light on some of these challenges and explore scientific evidence, case-studies, expert and parental experiences and insights. This will enable us together, to ensure high quality and effective solutions and programs.

Over the next few pages, you'll find more details on the key theme and topic areas being covered in this Symposium, as well as logistical details.

Thank you for making the time to attend and to share your insights and knowledge. I wish you an enjoyable Symposium and I look forward to meeting and talking with you these days.

Your host, on behalf of the Philips Avent Team

**Dr Victoria Davies,
Director Medical and
Clinical Programs**



**Solving challenges
and exploring
opportunities together**



Proven and practical approaches to breastfeeding; from hospital to home

This year, our Symposium focuses on 'Proven and practical approaches to breastfeeding; from hospital to home'. It's a theme that requires attention, and was chosen to provide a platform from which we can share, learn and debate how to translate the science and real-life global scenarios of breastfeeding, to enable consistently better experiences for professionals and parents.

Our agenda covers three sub themes, with deep dives into:

1. Enabling optimal breastfeeding within the care system

Understanding the latest insights into best practices, the role that healthcare professionals play in impacting breastfeeding, and care centered around the family.

2. Optimizing breastfeeding for those who require an alternative care pathway post-birth

Learn about the latest insights into bonding, environments and solutions to help promote healthy breastfeeding practices and overcome feeding challenges for mums and babies who require special care.

3. Insights in making breastfeeding successful in the community space

Supporting breastfeeding rates through a multidisciplinary network of professionals which help facilitate easier hospital to home transitions. We'll discuss the physical, emotional and practical challenges that need to be addressed at home. Next to that we'll explore the role of the father in breastfeeding, and how to best foster dialogue between parents and professionals, hospitals and communities.

Knowledge is power

Two inspiring days to share, learn and connect



An overview of the program themes

Medical



Birth practices and breastfeeding

The success of breastfeeding is often attributed to safe birth and post-partum practices that ensure the maternal-infant breastfeeding dyad is intact.

Since every birth is unique, we will explore some best practices around it, and what can be done in the post-partum period to ensure positive breastfeeding outcomes.

Family-centered care

With the family of the infant being key collaborators to help initiate and establish breastfeeding early and for longer durations, discussions around the care model of family-centered care are relevant.

What are the key considerations in using this model and how do we begin the path to change in existing health systems?

Role of the midwife

The involvement of a midwife promotes a non interventional, individualized approach to perinatal care, which leads to better breastfeeding outcomes.

This role is an integral part of the healthcare system in many countries, yet does not always get the platform it deserves. Learn more including how to advocate for midwifery practice.

Speciality



NICU Design

Rethinking a traditional medical environment into a nurturing, ambient experience for better health outcomes is slowly making progress in the western world.

What changes can be made to facilitate breastfeeding or breast milk expression? And what can be explored in locations with limited resources?

Post-partum depression

Mental health awareness is slowly being destigmatized. Post-birth experiences are no exception to this conversation, as mental health permeates and affects many areas and people in our lives.

We discuss how mothers experience mental health changes in the post-partum period and the unique care and support they need whilst maintaining essential breastfeeding routines.

Milk banking

The many benefits of human milk allow for it to be the primary source of infant nutrition for infants in the first six months of life.

Donor milk is a vital source for infants whose mothers are unable to breastfeed or express.

Human milk banks have taken a prominent role in many health centers and communities to both support breastfeeding, but what more opportunities are there?

Community



Continuity of care; hospital to home

The journey from hospital to home, requires a careful oversight of the health care system, ensuring new parents have the right support as they make the transition from hospital to home. Breastfeeding support is an important component of this transition and continuity-of-care.

How do we ensure transitional care and guidance on breastfeeding is protected and promoted in the community?

Bonding with the father

Research shows that no other time in history have fathers been so passionate and committed to having a prominent role in their children's lives.

With breastfeeding being an important bonding moment between mother and infant, how can fathers experience something similar? We will discuss his role in promoting and protecting breastfeeding throughout the journey from hospital to home.

Lactation support in the community

Baby-friendly guidelines from the WHO and UNICEF ensure that breastfeeding support is met with a responsible approach.

In the midst of this, how can lactation consultants help empower mothers to breastfeed, but also feel secure in their choices as a mother? What are the aspects of informed decision making?



Berlin. The perfect place to pioneer healthcare outcomes

After highly successful Symposia in London and Amsterdam, 2019 sees us gather in Berlin

"I am very happy to welcome you to my city. One of the hippest cities and start-up capitals of the world, Berlin's healthcare acclaim is less well known.

Home to over 41 renowned scientific institutions including the Berlin Institute of Health (BIH) and over 500 biotech, pharma and medtech companies, it represents the perfect location to share, learn and connect.

I extend my thanks to Philips Avent for choosing Berlin as the location of the third annual Philips Avent Scientific Symposium and congratulate them on bringing us together to pioneer better maternal and infant health outcomes."

Warm regards,
Dr. Abou-dakn

Healthcare in Berlin. Did you know?

Health sector is one of the most vital industries in Berlin. 1 in 8 Berliners work in healthcare.

Colleges and universities in Berlin offer 208 programs in health-related subjects alone.

Federal Government institutions, the Drug Commission of the German Medical Association, patients' representatives, associations and health insurance companies are all based here.

Renowned institutions include the Charité university hospital, the Robert Koch Institute, the Max Delbrück Center (MDC) for Molecular Medicine, the Deutsches Herzzentrum Berlin, and the Fraunhofer, Helmholtz, Leibniz and Max Planck Institutes.

Berlin's regional government recently announced that childcare centers in Berlin would be free for children aged zero to six.

The agenda

Day 1

11:00 – 13:00 **Registration Symposium**

12:00 – 13:00 **Lunch**

13:00 – 13:45 **Opening ceremony** Dr. Victoria Davies (Philips Avent) and Dr. Michael Abou-Dakn (Chairperson)

13:45 – 14:45 **Birth and in-hospital perinatal practices that ensure successful breastfeeding** Dr. Carlos Carlomagno

14:45 – 15:45 **Infant- & Family-Centered Developmental Care (IFCDC) in a global systems perspective** Dr. Björn Westrup

15:45 – 16:15 **Break and poster session**

16:15 – 17:15 **The mother – midwife partnership** Ms. Franka Cadée

17:15 – 17:30 **Wrap up and close day 1**

17:30 – 18:30 **Break**

18:30 – 21:00 **Dinner**

Day 2

8:30 – 8:45	Day 1 recap and introduction day 2
8:45 – 9:30	Optimizing NICU care environment to support breast milk expression and feeding Dr. Valerio Romano
9:30 – 10:15	Breastfeeding as a protective factor against post-partum depression Dr. Tim Walrave
10:15 – 10:30	Break
10:30 – 11:15	Human milk banking; the right to accessibility for every newborn Dr. Sertac Arslanoglu
11:15 – 12:00	Continuity of care; breastfeeding support as a key component in transition to community care Dr. Marlies Rijnders
12:00 – 13:00	Lunch
13:00 – 14:00	Panel discussion: Digital technologies and breastfeeding
14:00 – 14:45	40 years of father in the obstetrical – helpful or rather counterproductive? Dr. Michael Abou-Dakn
14:45 – 15:00	Break
15:00 – 15:45	Lactation support; from hospital to home Ms. Bettina Kraus
15:45 – 16:00	Closing

Experiences not to miss...

Join us for welcome dinner and drinks on Friday 15th March

After an inspiring first day, we'd like to invite you for drinks and dinner at Austernbank restaurant, located next to the Humboldt Carré. A destination in Berlin and renowned for its fish, Austernbank restaurant is situated in the vault of Disconto Bank and was inspired by New York's Grand Central Oyster Bar. Drinks are from 18:30, dinner from 19:30 on Friday 15th March.

Visit the exposition space at the Symposium

In the break out areas of the Symposium, you'll find poster presentations, the Philips Avent Immersive Augmented Reality (AR) experience and our pregnancy and feeding solutions. Please also take a look at our museum wall, detailing the Philips Avent history, heritage and innovations timeline in the registration hallway.



Inspiring presentations



Scientific poster sessions



Historical timeline



Networking dinner



Exploring Berlin

Berlin is an exciting blend of old and new, home to famous landmarks, government buildings and incredible architecture. By taking a walk from the NH hotel to the venue, you'll see much of this great scenery.

If you're staying longer in Berlin, don't miss out on visiting:

Brandenburg Gate – Built in 1791, it was one of 18 original city gates.

The Berlin Wall – although the majority of the wall was demolished between June–November 1990, a portion still remains as a monument to German reunification.

Walk the route of the wall or visit **Checkpoint Charlie**, a former border control point turned into a tourist information centre.

Berlin's rich **museum options** include Topography of Terror to the Bauhaus Archives, a museum linked to the country's deep creative past both pre- and post-war.





“Successful breastfeeding is multifactorial. Healthcare professionals must continuously support mothers throughout their in-hospital journeys (birth to breastfeeding), adjusting practices that best meet their needs and expectations.”

Carlos Carlomagno

Neonatologist

Albert Einstein Hospital, Brazil

Biography

I graduated from Medical School at Universidad de Monterrey, in Mexico and specialized in Pediatrics and Neonatology at Universidade de São Paulo, Brazil. I am a medical staff member at the Neonatology Department at Albert Einstein Hospital (Brazil) and I am currently studying for a master's degree in Health Science.

Birth and in-hospital perinatal practices that ensure successful breastfeeding

The success of short- and long-term breastfeeding is multifactorial. It is unquestionable that a mother's milk contains the most appropriate nutritional and immunological composition for a baby's immediate and long-term health (including, higher cognitive development, as well as protection against sudden infant death syndrome, otitis, diarrhea, asthma, atopic dermatitis, and obesity)¹. This is well established by the 1000 days nutrition program, as well as recommendations by the World Health Organization (WHO) and the UNICEF to breastfeed exclusively during the first 6 months of age²⁻³. Breastfeeding also benefits moms, who are more likely to undergo faster uterine involution, and increase fat deposits catabolism. Furthermore, this practice also increases the bond between mothers and their babies¹.

But despite of all this knowledge, breastfeeding rates are still quite low worldwide. According to the Global Breastfeeding Scorecard, out of the 194 evaluated nations, only 23 (11.9%) rate above 60% of exclusive breastfeeding at 6 months⁴.

Guaranteeing the success of breastfeeding begins during pre-natal care and may also depend on several perinatal and in-hospital factors. Cochrane has conducted several meta-analysis over recent years to try to determine the impact of different practices on breastfeeding rates. Their evidence, however, are mostly moderate- to low-impact, due to inherent methodological limitations.

Healthcare professional-led education (midwives + nurses + doctors) in formal settings (promotion campaigns and counselling) improves rates of breastfeeding initiation compared to standard care (RR 1.53, 95% CI 1.07-1.92)⁵. Furthermore, all forms of organized support increased length of time women continued to breastfeed exclusively. Such help showed better results when scheduled (predictable), and may be provided by trained volunteers, doctors, and/or nurses (RR 0.91, 95% CI 0.88-0.96)⁶.

Continuous support by a person of the woman's choice (midwife, nurse, family or friend) is perceived as humanized and enhances woman confidence in their own strength and ability to give vaginal birth with lesser obstetric intervention (RR 1.08, 95% CI 1.04-1.12)⁷. However, it showed no difference whether babies were breastfed at 8 weeks of age (RR 1.05, 95% CI 0.96-1.16)⁷.

Hospital birth centers increase likelihood of no intrapartum analgesia/anesthesia, spontaneous vaginal birth (RR 0.88, 95% CI 0.78-1.00)⁸, and very positive feelings of care. But again, showed no difference whether babies remained breastfeeding at 6-8 weeks of age (RR 1.04, 95% CI 1.02-1.06)⁸.

Skin-to-skin contact, placing a newborn naked on mother's bare chest immediately (first 10 minutes of age) or soon after birth (from 10 minutes to 24 hours of age), increases chances of breastfeeding at 1-4 months after discharge (RR 1.24, 95% CI 1.07-1.43)⁹.

Rooming-in, keeping mothers and babies together throughout hospitalization, showed higher exclusive breastfeeding rates before hospital discharge (RR 1.92, 95% CI 1.34-2.76)¹⁰, but no difference between proportion of infants receiving any breastfeeding at 6 months of age (RR 0.84, 95% CI 0.51-1.39)¹⁰.

Kangaroo mother care during babies (usually premature) stay at neonatal intensive or semi-intensive care units found to increase breastfeeding at discharge (RR 1.16, 95% CI 1.07-1.25)¹¹ and at 1 to 3 months (RR 1.20, 95% CI 1.01-1.43)¹¹.

Use of dextrose gel for treating hypoglycemia did not improve breastfeeding rates at 6 weeks of age (RR 1.06, 95% CI 0.88-1.29)¹². Frenotomy in tongue-tied babies showed no consistent positive effect on infant breastfeeding performance assessed by validated scales (MD -0.07, 95% CI -0.63 to 0.48)¹³.

Breastfeeding has many positive benefits for both, babies and their moms. Despite WHO and UNICEF recommendations to maintain it exclusively until 6 months of age, and to continue until 2 years or beyond, breastfeeding rates globally low. Current literature shows mostly low- to moderate-quality evidence on what can be done during pre-natal and throughout hospital admission to stimulate such act. This is a challenge that requires active participation of engaged and enthusiastic multi-professional teams.

References: See page 30



“The basis of IFCDC is the recognition that the newborn infant is a human being in his or her own right.”

Björn Westrup

Senior Consultant in Neonatology
Karolinska University Hospital, Sweden

Biography

Dr Björn Westrup is a senior consultant in neonatology and founder of the Karolinska NIDCAP Training & Research Center at Astrid Lindgren Children's Hospital, Karolinska University Hospital and lecturer at Karolinska Institute.

Dr Westrup is one of the pioneers in field of infant- and family-centred developmentally supportive neonatal care both from scientific and practical aspects. Since the beginning of 1990s he has research experience in clinical randomized controlled trials of the newborn with major focus on effects of parental involvement in the care as well as effects of family centred supportive organisation and architected design of nurseries. Consequently, the Karolinska neonatal programme is one of few with long experience of parental involvement in the care of the newborn 24/7 from admission to discharge with an

exceptional daily skin-to-skin contact implementation beginning at birth of the infant. Dr Westrup is currently one of the principle investigators in a large WHO coordinated global multicentre study of the effect on survival by immediate skin-to-skin contact for very low birth weight infants.

Dr Westrup has a long and close collaboration with parental organisations and serves in the Scientific Advisory Board of European Foundation for Care of Newborn Infants (EFCNI). He is Chair of the Topic Expert Group on Infant and Family Centred Developmental Care.

Infant- and Family- Centred Developmental Care (IFCDC) in a global systems perspective

Worldwide – including also high income societies – the prematurely born infant is the most vulnerable human being due to its immaturity of all organs systems including the brain and over recent years the importance of Infant- & Family- Centred Developmental Care (IFCDC) has become more obvious. In addition, to provide the best possible treatment, nutrition and environmental conditions for the vital functions of the infant to properly develop, we also have to support the psychological processes of bonding and attachment between parents and infant, which is so crucial for the long-term health and development.

By integrating scientific findings from natural and behavioral science in multidisciplinary developmentally supportive interventions programs, recommendations for redesigning nurseries and integrating families have

developed to meet these challenges. It not only is “baby and family friendly” but also has economic benefits and improves the long-term development of the child.

The basis of IFCDC is the recognition that the newborn infant is a human being in his or her own right, and letting the caregivers be guided by the current needs of the individual infant and family. In this context, the Newborn Individualized Care and Assessment Program (NIDCAP) is unique since it is the only program designed to be implemented from the moment of birth of the infant.

Different strategies can be used to support the nursing and medical teams to help the family becoming the primary caregivers of their own infants. Sweden has a long tradition of engaging parents in the actual care and of around the clock visiting hours.

Nurseries have, or are remodeling to have, the facilities enabling parents to live in the units throughout the entire hospital stay. Breastfeeding support and skin-to-skin contact is widely implemented. Also in low income countries, where the infants are at high risks of death and developmental impairments, the awareness the importance of IFCDC strategies Care in a global perspective is increasing.



“The scope of midwives varies worldwide and is often adapted to the context of women.”

Franka Cadée

President International Confederation of Midwives (ICM)

Biography

Franka Cadée is a midwife and expert on global maternal health with over 30 years' experience in strategy and policy development, advocacy, leadership and project management. She is known to many for her PhD research work on twinning between organisations of midwives. Franka worked as a practising midwife in an independent group practise in The Netherlands for 25 years and is well-versed in all aspects of midwifery care, of course including breastfeeding.

With her anthropological and midwifery background, Franka has lived and worked across a range of differently resourced countries and is well aware of the realities of midwifery practice in various cultural contexts. She is a strong proponent of gender equity and a human rights based approach to midwifery care.

The mother – midwife partnership

A strong women – midwife partnership supports successful breastfeeding, this fact is underpinned by a wide range of evidence. For this reason it can appear strange for a midwife to be asked what her role in supporting breastfeeding is. After all, what is her role not?

There is much confusion and misunderstanding globally about what a midwife and midwifery is. The scope of midwives varies worldwide and is often adapted to the context of women. For example, a European midwife may need to understand how to support a mother to latch on her baby, whereas in South Sudan the focus of the midwife may be how to support the mother to feed herself, latching on the baby is only rarely an issue. One thing most midwives have in common is that they are trained according to the ICM Essential Competencies for Midwifery

Practise, competency specifically refers to promoting and supporting breastfeeding.

In this presentation the audience will be taken on a journey with the midwife to experience the mother – midwife partnership in different contexts in relation to successful breastfeeding, adapted to the mothers and baby's individual needs.





“A family-centered and breastfeeding friendly NICU layout is paramount to increase the rate of very low birth weight infants discharged home on human milk.”

Valerio Romano

Neonatologist

Ospedale Fatebenefratelli Isola Tiberina, Rome

Biography

I graduated in medicine and surgery at Campus Bio-Medio University and then attended the paediatric residency program at Catholic University of Sacred Heart in Rome. My main interest is in perinatal cardiology. Since 2015 I have been working as an attending neonatologist in the neonatal intensive care unit of Ospedale Fatebenefratelli Isola Tiberina in Rome. Giving birth to more than 60 critical congenital heart defect per year, Fatebenefratelli Isola Tiberina is the referral centre for congenital heart lesion for all the centre and southern part of Italy.

Following parents from the diagnosis to the delivery, my personal goal is to avoid unnecessary detachment right after birth, to facilitate bonding and to ensure skin to skin contact after birth even for most critical heart defects, when possible, trying to establish breastfeeding as soon as in the delivery room. Since January 2018, I have followed the “screen to screen” project by Philips, which ensures that every mother and father whose baby is admitted to our neonatal intensive care unit can watch their child from home through an application in their smartphone, as part of our family-centered care environment.

Optimizing NICU care environment to support breast milk expression and feeding

Having a baby in the neonatal intensive care unit (NICU) is a stressful, overwhelming experience and feeding a preterm infant is a challenge even for mothers with a predetermined resolve to breastfeed. Even though breast-feeding is an efficient and cost-effective therapeutic approach to lessen the morbidity associated with preterm birth, a very low percentage of infants are discharged on exclusive human milk. Infant's first oral feed is a critical window during which mothers must be encouraged to put their baby to breast. Early initiation of oral feeding with breast milk may improve neuropsychomotor development of low birth weight preterm infants within the NICU setting. Despite evidence that the use of human milk in the NICU is compelling, the translation of this evidence into best practices, toolkits, policies and procedures, talking points, and parent information packets is limited. In fact, as compared

to other therapies, feedings are not yet prioritized and NICU staff members and families have inconsistent information and a lack of lactation technologies to optimize the dose and exposure period of human milk feedings.

Stimulating a culture of using the evidence about breastfeeding in the NICU can change this circumstance and requires use of evidence-based quality indicators to benchmark the use of human milk, consistent messaging by the entire NICU team about the importance of breastfeeding for infants in the NICU, establishing procedures that protect maternal milk supply, and incorporating lactation technologies. Bedside nurses should frequently receive mandatory breastfeeding training. Mothers needs to be prepared for this first feed through education, reinforcing milk expression practices, and facilitating skin-to- skin contact.

A family-centered and breastfeeding-friendly layout is paramount, this may include privacy measures such as visual barriers, the chance of rooming in in a private room during the last few days before infant discharge, the presence of specialized breastfeeding chairs, milk expression rooms, and parent beds by infants' bedsides.

NICU with better work environments, better educated nurses, and more infants who receive breastfeeding support by nurses have higher rates of infants discharged home on human milk.



“Breastfeeding is protective against postpartum depression, both for mother and child breastfeeding is the best option in general, but there are a few rare psychiatric exemptions.”

Tim Walrave

Consultant Psychiatrist
Ziekenhuis Groep Twente, Netherlands

Biography

Tim Walrave is a consultant psychiatrist, since 2008 working at the Ziekenhuis Groep Twente, a two location large district general hospital in the East of The Netherlands. He is the head of the Mother-Baby Unit of the Psychiatric Department of the hospital. When a mother develops a serious maternal psychiatric disorder within six months after delivery (post partum anxiety or mood disorder or post partum psychotic disorder) mother and child are admitted to the Mother Baby Unit. Our aim is to treat the maternal psychiatric disorder and to strengthen the bond between mother and partner and child.

In our Mother Baby Unit team we have, next to the psychiatric nurses and the psychiatrist, a musical therapist, a bondings therapist, a child psychologist, a drama therapist, a psychomotor therapist and a social

worker. We also have a day-clinic for pregnant and postpartum mothers and we have a large out-patients clinic where we focus on pregnancy related psychiatry, in close relationship with Obstetrics and Gynaecology, Pediatrics and the hospital social workers.

Tim Walrave graduated in Medicine from the Utrecht University in 1989. He completed his General Practice Vocational Training Scheme in Chester, England in 1994 and specialized in Psychiatry in 1999 from Utrecht University in Netherlands. Previously he worked in the Franciscus Gasthuis in Rotterdam as a hospital psychiatrist. His specialized interest has always been the pregnancy related psychiatry.

Breastfeeding as a protective factor against post partum depression

The birth of a baby is a major event in everybody's life, it triggers great changes in the social, psychological, biochemical, hormonal and neuro-endocrine environment of mother and partner. Often there is an enhanced feeling of well-being but sometimes a lowering of mood, increased anxiety or psychotic features occur, due to genetic, psychological or psychosocial factors. One in eight women (12,5 % of postpartum women in the general population) is susceptible for the occurrence of a postpartum anxiety or mood disorder.

In this presentation we differentiate between physiological postpartum baby blues, postpartum depression and postpartum psychosis and we walk through the different treatment options. Compared to a depressive episode that is not related to pregnancy, the postpartum depression is burdened by severe guilt feelings towards the baby. Negative cognitions as failed motherhood and feelings of maternal incompetence can worsen the postpartum depression. Intensive psychological and sometimes medical treatment can be necessary.

Breastfeeding can be a protective factor against the lowering of mood, postpartum. It has a significant impact on the mother-child bonding and due to increased oxytocin levels; there is a positive effect on the maternal serotonin level. Furthermore it is important

that the intention to breastfeed in pregnancy actually develops into the initiation of breastfeeding postpartum.

When a pregnant woman has the intention to breastfeed and after delivery actually breast feeds the baby, then the risk for postpartum depression is lower.

But when there is a breastfeeding intention but the actual breastfeeding fails, then the post partum depression risk is higher.

Breastfeeding success lowers the chance of developing postpartum depression.

Breastfeeding failure is associated with depressive symptoms.

Dysphoric Milk Ejection Reflex (D-MER): a rare complication with breastfeeding:

Strong negative emotions start just before release of breast milk.

It lasts usually 30-90 seconds every breast feeding.

In all breastfeeding women the brain dopamine levels are reduced, but in some women they plunge dramatically. Dopamine is a hormone that releases endorphins and pushes "feel good" chemicals around the brain. A sudden dip causes feelings of sadness.

Breastfeeding failure rates are higher in 3 groups:

- women who have experienced sexual trauma in past
- obsessive compulsive women
- women with a history of a postpartum psychosis

Breastfeeding dose-response effect: there is strong evidence for fewer maternal sleep difficulties and fewer maternal depressive symptoms with mothers who exclusively breastfeed compared to partial breastfeeding mothers.

Multi-factorial mechanism of action:

Psychological factors:

- depressed mothers have a greater risk to feel unsatisfied with breastfeeding and can experience more breastfeeding problems. The negative perceptions lead to reduced breastfeeding.
- breastfeeding enhances the mother-child interaction.

Neuro-endocrine response:

- During lactation there are higher levels of oxytocin and prolactin: this promotes the relaxation during nursing and decreases cortisol levels and enhances sleep.

In general, breastfeeding has a positive effect on the maternal mood, a careful and accurate individual approach is always necessary to notice specific vulnerabilities.

References: See pages 30-31



“The accessibility of every newborn to a well-established milk bank becomes a human right.”

Sertac Arslanoglu

MD, Neonatologist, Professor of Pediatrics
İstanbul Medeniyet University, Istanbul

Biography

Currently is:

- Director of the Division of Neonatology and Administrative Director, Department of Pediatrics at İstanbul Medeniyet University, School of Medicine, İstanbul, Turkey
- Vice President of European Milk Bank Association (EMBA)
- Scientific Coordinator and Component of the Board of Directors - Italian Association of Human Milk Banks (AIBLUD)

Her main field of research is neonatal nutrition, human milk, human milk fortification, human milk banking, methodologies of preterm infant feeding, and prebiotics/probiotics/microbiota. After 10 years of experience working in Northern Italy, mainly in Milan; in December 2011 she moved back to Izmir, Turkey by

invitation, primarily to establish human milk banking in this country.

Professor Arslanoglu had the academic degrees of Associate Professorship in 2009 and Full Professorship in 2015. She is acting now as a lecturer at İstanbul Medeniyet University School of Medicine and is the Head of the Division of Neonatology at the University Hospital. She acted as organizer and/or scientific secretary in many international and national scientific congresses; participated to more than 60 international congresses as an invited speaker and moderator. She has 150 international and national publications and book chapters. Her publications have 4128 citations and her h-index is 28.

Human milk banking; the right to accessibility for every newborn

Evidence-based data show that human milk (HM) is the best nutritional and normative standard for infant nutrition. HM contains nutrients with optimal bioavailability and a myriad of bioactive components including hormones and enzymes, anti-infective, trophic and growth factors, stem cells, prebiotics and probiotics rendering it suited not only to term but also to preterm infants. Feeding preterm infants with HM, indeed, confers protection against the most common and important NICU challenges such as necrotizing enterocolitis (NEC) and sepsis, retinopathy of prematurity (ROP) bronchopulmonary dysplasia (BPD) and decreases mortality in a dose-dependent manner. Human milk feeding improves long-term neurocognitive development and cardiovascular health outcomes¹⁻³. Studies comparing solely donor human milk (DHM) versus formula

show that DHM is protective against NEC improves feeding tolerance and supports breastfeeding⁴⁻⁶. That is why HM is the recommended feeding for all neonates including premature infants. The European Society for Pediatric Gastroenterology Hepatology and Nutrition (ESPGHAN)⁴, American Academy of Pediatrics (AAP)⁷, and Milan ESPGHAN/AAP Joint Meeting Consensus⁸ in their most recent recommendation papers stated that “mother’s own milk (MOM) is the first choice in the feeding.

Given the proven clinical benefits deriving from the use of DHM, “the accessibility of every newborn to a well-established milk bank” becomes a human right.

In this presentation, benefits of HM, some emerging bioactive compounds shaping infant’s health at short and long-term, proven clinical benefits deriving from the use of DHM and

its vital importance for preterm infants, the role of DHM as a bridge for term infants and in supporting breastfeeding, some concerns and practical points will be presented and discussed.



“Continuity of care helps women to start breastfeeding and feel good about it. However, care provision is always limited. Therefore, care providers should also facilitate a peer network to make sure women receive continuity of care and support for a much longer period of time. This will help them to continue breastfeeding”.

Marlies Rijnders

Midwifery Researcher and Consultant Dutch Centering Foundation, Netherlands

Biography

Marlies Rijnders graduated as a midwife in 1989 and subsequently worked as an independent midwife in the Netherlands for 10 years. In 1999 she started working as a midwifery researcher at TNO in Leiden, a nationwide institute for applied research.

She conducted several research projects in Dutch midwifery care, with a focus on interventions in primary care which contribute to physiological pregnancy and birth (f.e. ECV, amniotomy at home to induce labour in post-term pregnancy), postpartum care, group antenatal care and women's experiences. In 2011 she obtained her PhD.

In 2011 Rijnders introduced group antenatal care and group youth health care in the Netherlands and is the initiator of and now consultant for the Dutch Centering foundation which aims to further implement, develop and evaluate group care. She is active in several (inter-) national research collaborations and board member of the Group Care Global foundation.

Continuity of care; breastfeeding support as a key component in transition to community care

Wide variations exist in breastfeeding rates between countries and among subgroups of populations. Breastfeeding is found to be associated with maternal and infant characteristics such as education, smoking habit, and infant birthweight, as well as with health-system-related factors, such as rooming-in, and psychosocial and cultural factors such as intention to breastfeed, and social support. Associations, however, are not consistent.

In the Netherlands, 80% of mothers initiate breastfeeding and although this seems high after six months only 39% of the mothers still offer exclusive breastfeeding while 11-13% offer a combination of breastmilk and formula milk. Longer duration of breastfeeding is mostly found amongst higher-educated, non-smoking women.

There are several policies in place within antenatal and postnatal care to optimize the start and continuation of breastfeeding based on continuity of care.

Postnatally, a maternity care assistant is present at the woman's home for approximately 49 hours within the first 8 days to take care of the mother and baby. An important task of the maternity care assistant is to provide information on how to (breast)feed the newborn and offer practical support and assistance.

Another successful approach is antenatal group care. Instead of individual prenatal care, an integrated approach of health assessment, interactive education, and facilitation of peer support and community building is provided by the midwife to a group of 10-12 women. This approach has been proven to increase

breastfeeding rates. One of the topics in the group sessions allowing women to prepare and think about it, gain information and discuss expected difficulties. Furthermore, peer support seems extremely helpful postnatally.

References: See page 31



“Studies have shown that men in the phase around the birth, have a significantly higher willingness to inclusion of health topics.”

Michael Abou-Dakn

**Chief Physician of Gynecology
St. Joseph Hospital, Berlin**

Biography

Chief physician for gynecology at the St. Joseph Hospital in Berlin, Prof. Dr. med. Abou-Dakn has over 30 years of experience in maternity and antenatal care, especially in high-risk births, pelvic births, twins, etc.

As the first chairman of the WHO / UNICEF initiative "Baby Friendly Hospital" and member of the National Nursing Commission Germany, he is also a breastfeeding specialist, providing breastfeeding consultation as an international board certified lactation consultant (IBCLC).

Achievements include authorship on books and numerous publications for research in breastfeeding and lactation challenges such as mastitis, women's health extending into bleeding and postmenopausal challenges, and a particularly unique perspective of the role of the father, and bonding with the infant.

40 years of father in the obstetrical - helpful or rather counterproductive?

Since the mid 70s of the last century, the presence of the father at birth increasingly has become a matter of course. In 1970, only 12% of fathers were present at the birth of their child, approximately 60% in 1980 and in 1990 already over 90%. This change is also reflected in the literature of the time, both in the lay press (e.g. parents and newspaper articles), as well as in the specialist literature. The presence of the father at birth in mammals can't be found neither in nature nor in observations of the ethnologists.

The question therefore arises why such a change in the obstetrics came?

In principle, this is certainly the social change in the understanding of the role of women, but also in obstetrics. After the primary orientation of the obstetrics on the prevention of deaths of mother and child, it came already in the 60s of the last century to a rethinking of the way of birth.

Literature searches show that the effects due to the presence of the man are still not unique. There is no unequivocal statement to the effect on the course of birth, the medicalization and the mode of birth. Recent studies deal with the preparation for the birth and the differences in the perception of the birth preparation courses for more specific situations and that men experience a more positive birth experience, which is also reflected then in the women. Studies have shown that men in the phase around the birth, have a higher willingness to be included in health topics. The influence of the Father on breastfeeding and breastfeeding duration is described in several studies





Bettina Kraus

Midwife and breastfeeding expert
St. Josephs Hospital, Berlin

Biography

Bettina Kraus is a midwife and lactation consultant living in Berlin. She has been working in the obstetric department of St. Josephs Hospital for 6 years now. Besides her daily routine in the maternity ward supporting mothers with early breastfeeding problems, she is also responsible for the walk-in-clinic for breastfeeding. Bettina assists the St. Joseph's quality management team and is involved in the hospitals certifications management.

During the International breastfeeding week, Bettina organizes special events and is involved in other public relations activities. She regularly gives training for St. Joseph's staff as well as offering informative meetings for soon to be parents. In St. Joseph's hospital she is closely connected with her colleague from the pediatrics clinic which includes specialized work for the NICU.

Bettina is also a Study Nurse. Her special interest is in diabetes and the effects of antenatal breastmilk expression. She educates pregnant women with diabetes on how to collect colostrum in advance during the last weeks of pregnancy, giving it to the newborns, lowering their risk of hypoglycemia. Another interest of hers is the effect of a C-section on breastfeeding and considering what is the best care method for women who have had one.

Before her time at St. Joseph's she was working as a self employed midwife in her community. In this culturally diverse setting she worked with lower income mothers and also underaged mothers.

Lactation support in the community

Bettina Kraus's presentation will cover most common breastfeeding problems during the first days after birth including difficulties with attachment of the baby to breast, sore nipples, lack of or limited amounts of milk forcing the need of formula supplement as well as heavy or painful engorgement.

She will answer questions such as: Which factors influence a good breastfeeding start? What difficulties can be experienced at the beginning of breastfeeding? How could bonding and breastfeeding fit in clinic's routines?

She will give a glimpse into how the St. Joseph Hospital in Berlin focuses on supporting bonding and breastfeeding for mother and child, for instance the NICU has 18 rooming-in-beds where mothers (and/or fathers) can stay with their child and become more involved in their care. The St. Joseph Hospital is an A-Level Perinatal Center with over 4000 deliveries per year.

In St. Joseph Hospital there are more than 40 standard operating procedures about breastfeeding management. This guarantees the same level of knowledge for staff in their daily work. The staff are also trained. They use in-house collected data (in their practice) concerning the start of breastfeeding after C-section and teach the benefits of pre-birth expression of colostrum from diabetic mothers to prevent/reduce risk of hypoglycaemia.

Postnatal care in the home is done by self-employed midwives and is financed by the German health insurance system. Midwives usually visit the families during the first eight weeks or longer if there are breastfeeding problems or if the baby was born preterm or if the birth was with twins.

If any follow up care is needed, what help is available?

There are different types of support offered out there such as a new project called "Baby-Lotse" or Baby/Family-Navigator, specially trained family-midwives, lactation consultants and breastfeeding meetups are made available for those in need.

And what kind of governmental support is there for mothers and pregnant women? There is a law in Germany specifically protecting these women with parental financial support, work-rules and the option of paid parental leave.

Looking at this amount of offers, there is still the question coming up: Does all this help to increase the rate of breastfeeding women?

Panel discussion

How can digital technologies be used by healthcare professionals and parents to support breastfeeding?

Moderated by Nina Warburtons

Digital technologies, such as applications on smart phones, optimized website content, media sharing via platforms like Youtube, and social media (Facebook, Instagram, etc.) are increasingly integrated into the lives of parents and professionals. The debate of whether digital has a role in our health care system has been long answered, as a resounding 'yes'. The question now is on HOW these technologies are to be integrated and WHAT can they do to optimize a health care moment for both parents and professionals.

Using the journey from hospital to home as the landscape, we will look at how digital technologies and wireless capabilities are transforming breastfeeding education, initiation and duration ultimately aiming to improve overall health of families, as well as drive improved quality, cost efficiency and operational performance across healthcare systems.

Through an interactive discussion with the experts, we will explore 'proven and practical approaches' of digital technologies and data in facilitating successful breastfeeding for parents.



**Dr. Michael
Abou-Dakn**



**Dr. Marlies
Rijnders**



Dr. Tim Walrave



Bettina Kraus



Silke Mader



Planning your stay

Symposium venue

The Scientific Symposium will take place at Humboldt Carré Konferenz- und Eventzentrum am Gendarmenmarkt, right in the heart of Berlin.

An elegant building steeped in history, Humboldt Carré is one of the most attractive event locations in Germany:

- Humboldt Carré Konferenz und Eventzentrum am Gendarmenmarkt**
Behrenstraße 42
10117 Berlin, Germany



Hotel accommodation

Your overnight stay has been pre-booked at the NH Collection Berlin Mitte am Checkpoint Charlie. This newly renovated, luxury hotel is only at 11 minutes walking distance from the Symposium venue. It is also only a short stroll away from Berlin's major attractions including Potsdamer Platz, Brandenburger Tor and Checkpoint Charlie as well as the luxury boutiques of Friedrichstraße and Lafayette Mall.

- NH Collection Berlin Mitte am Checkpoint Charlie**
Mitte, Leipziger Straße 106-111
10117, Berlin, Germany



Planning your trip



Travel to Berlin

Berlin is served by two airports, Berlin Schönefeld airport and Berlin Tegel airport. Both airports are within easy reach of the city center.

Travelling to the hotel

From the Berlin Schönefeld airport:

Either take the RE7 or the RB14 train, which departs every 10 minutes, for the station “Friedrichstraße”. From there please switch the trains and use the U6 for the station “Stadtmitte”. The Hotel is on the right site at the Leipziger Straße. It's a 40-minute trip.

By taxi:

It's a 30-minute trip and is around €50.

From Berlin Tegel airport:

Take the bus 128, which departs every 5 minutes, to get to the metro station “Kurt-Schumacher-Platz”. From there, please take the U6 for the station “Stadtmitte”. The Hotel is on the right site at the Leipziger Straße. It's a 30-minute trip

By taxi:

It's a 20 – 25 minute trip and is around €30.

From train station Stadtmitte:

Turn right, the hotel is on the right, on Leipziger Straße.

Closest metro station:

Stadtmitte (U6)

By car:

The hotel's GPS coordinates are 52.510612°N 13.388186°E

Parking:

Offsite, €22/day.

References

Carlos Carlomagno - Birth and in-hospital perinatal practices that ensure successful breastfeeding

From pages 12-13

1. Prell C, and Berthold K (2016) Breastfeeding and Complementary Feeding. Deutsches Ärzteblatt International | Dtsch Arztebl Int 2016; 113: 435–44
2. Schwarzenberg SJ, Georgieff MK and Committee on Nutrition. Advocacy for Improving Nutrition in the First 1000 Days to Support Childhood Development and Adult Health. Pediatrics 2018;141. DOI: 10.1542/peds.2017–3716.
3. https://www.who.int/nutrition/topics/exclusive_breastfeeding/en/
4. <https://www.who.int/news-room/detail/01-08-2017-babies-and-mothers-worldwide-failed-by-lack-of-investment-in-breastfeeding>
5. Balogun OO, O'Sullivan EJ, McFadden A, Ota E, Gavine A, Garner CD, Renfrew MJ, MacGillivray S. Interventions for promoting the initiation of breastfeeding. Cochrane Database of Systematic Reviews 2016, Issue 11. Art. No.: CD001688.DOI: 10.1002/14651858.CD001688.pub3.
6. McFadden A, Gavine A, Renfrew MJ, Wade A, Buchanan P, Taylor JL, Veitch E, Rennie AM, Crowther SA, Neiman S, MacGillivray S. Support for healthy breastfeeding mothers with healthy term babies. Cochrane Database of Systematic Reviews 2017, Issue 2. Art. No.: CD001141.DOI: 10.1002/14651858.CD001141.pub5.
7. Bohren MA, Hofmeyr GJ, Sakala C, Fukuzawa RK, Cuthbert A. Continuous support for women during childbirth. Cochrane Database of Systematic Reviews 2017, Issue 7. Art. No.: CD003766.DOI: 10.1002/14651858.CD003766.pub6.
8. Hodnett ED, Downe S, Walsh DHodnett ED, Downe S, Walsh D. Alternative versus conventional institutional settings for birth. Cochrane Database of Systematic Reviews 2012, Issue 8. Art. No.: CD000012.DOI: 10.1002/14651858.CD000012.pub4
9. Moore ER, Bergman N, Anderson GC, Medley N. Early skin-to-skin contact for mothers and their healthy newborn infants. Cochrane Database of Systematic Reviews 2016, Issue 11. Art. No.: CD003519.DOI: 10.1002/14651858.CD003519.pub4
10. Jaafar SH, Ho JJ, Lee KS. Rooming-in for new mother and infant versus separate care for increasing the duration of breastfeeding. Cochrane Database of Systematic Reviews 2016, Issue 8. Art. No.: CD006641.DOI: 10.1002/14651858.CD006641.pub3

11. Conde-Agudelo A, Díaz-Rossello JL. Kangaroo mother care to reduce morbidity and mortality in low birthweight infants. Cochrane Database of Systematic Reviews 2016, Issue 8. Art. No.: CD002771.DOI: 10.1002/14651858.CD002771.pub4.
12. Hegarty JE, Harding JE, Crowther CA, Brown J, Alsweiler J. Oral dextrose gel to prevent hypoglycaemia in at-risk neonates. Cochrane Database of Systematic Reviews 2017, Issue 7. Art. No.: CD012152.DOI: 10.1002/14651858.CD012152.pub2.
13. O'Shea JE, Foster JP, O'Donnell CPF, Breathnach D, Jacobs SE, Todd DA, Davis PG. Frenotomy for tongue-tie in newborn infants. Cochrane Database of Systematic Reviews 2017, Issue 3. Art. No.: CD011065.DOI: 10.1002/14651858.CD011065.pub2

Tim Walrave - Breastfeeding as a protective factor against post partum depression

From pages 20-21

1. Hendrick et al., Post partum and non post partum depression, Depression and Anxiety, 2000, 11(2):66–72.
2. Figueiredo et al., Breastfeeding reduces post partum depression, Psychological Medicine, 2014, 44(5):927–936.
3. Dias et al., Breastfeeding and depression: a systematic review, Journal of Affective disorders, 2015, 171:142–154.
4. Borra et al., New evidence on breastfeeding and post partum depression, Maternal and Child Health Journal, 2015, 19(4):897–907.
5. Akman et al., Breastfeeding duration, Journal of Pediatrics, 2008, 44(6):369–373.
6. Kendall-Tackett et al., Depression, sleep quality and maternal well-being, Breastfeeding Medicine, 2013, 8(1):16–22
7. Gillham R, Wittkowski A. Outcomes for women admitted to a mother and baby unit. International Journal of Women's Health. 2015;7:459.
8. Glangeaud-Freudenthal NMC, Sutter AL, Thieulin AC, Dagens-Lafont V, Zimmerman MA, Debourg A, et al. Inpatient mother-and-child postpartum psychiatric care: Factors associated with improvement in maternal mental health. European Psychiatry. 2011;26: 215–223.

9. Christl B, Reilly N, Yin C, Austin MP. Clinical profile and outcomes of women admitted to a psychiatric mother-baby unit. *Arch Women's Mental Health*. Published online: DOI 10.1007/s00737-014-0492-x
10. Salmon MK, Abel K, Webb R, Warburton WL, Appleby L. A national audit of joint mother and baby admissions to UK psychiatric hospitals: an overview of findings. *Arch Women's Ment Health*. 2004;7:65-70.
11. Meltzer-Brody SD, Brandon AR, Pearson B, Burns L, Raines C, Bullard E, et al. Evaluating the clinical effectiveness of a specialized perinatal psychiatry inpatient unit. *Arch Women's Ment Health*. 2014;17:107-113.
12. Milgrom J, Burrows GD, Snellen M, Stamboulak W, Burrows K. Psychiatric illness in women: a review of the function of a specialised mother-baby unit. *Australian and New Zealand Journal of Psychiatry*. 1998;32:680.
13. Salmon M, Abel K, Cordingley L, Friedman T, Appleby L. Clinical and parenting skills outcomes following joint mother-baby psychiatric admission. *Aust N Z J Psychiatry* 2003;37(5):556-62.
14. Mezzacappa E.S., Katkin E.S., Breastfeeding is associated with reduced perceived stress and negative mood in mothers, *Health Psychology*, 2002; 21(2):187-193.
15. Watkins S., Early breastfeeding experiences and post partum depression, *J Obstetrics and Gynaecology*. 2011; 118 (2): 214-221.
4. Arslanoglu S, Corpeleijn W, Moro G, Braegger C, Campoy C, Colomb V, Decsi T, Domellöf M, Fewtrell M, Hojsak I, Mihatsch W, Mølgaard C, Shamir R, Turck D, van Goudoever J. ESPGHAN Committee on Nutrition. Donor human milk for preterm infants: current evidence and research directions. *J Pediatr Gastroenterol Nutr*. 2013 Oct;57(4):535-42.
5. Quigley M, Embleton ND, McGuire W. Formula versus donor breast milk for feeding preterm or low birth weight infants. *Cochrane Database Syst Rev*. 2018 Jun 20;6:CD002971. doi: 10.1002/14651858.CD002971.pub4. Review.
6. Williams T, Nair H, Simpson J, Embleton N. Use of Donor Human Milk and Maternal Breastfeeding Rates: A Systematic Review. *J Hum Lact*. 2016 May;32(2):212-20. doi: 10.1177/0890334416632203. Epub 2016 Feb 17. Review.
7. Eidelman AI. Breastfeeding and the use of human milk: an analysis of the American Academy of Pediatrics 2012 Breastfeeding Policy Statement. *Breastfeeding Med* 2012;7:323e4.
8. Moro GE, Arslanoglu S, Bertino E, Corvaglia L, Montirosso R, Picaud JC, Polberger S, Schanler RJ, Steel C, van Goudoever J, Ziegler EE; American Academy of Pediatrics; European Society for Pediatric Gastroenterology, Hepatology, and Nutrition. XII. Human Milk in Feeding Premature Infants: Consensus Statement. *J Pediatr Gastroenterol Nutr*. 2015 Sep;61 Suppl 1:S16-9.5.

Sertac Arslanoglu – Human milk banking; the right to accessibility for every newborn

From pages 24-25

1. Arslanoglu S, Boquien CY, King C, et al. Fortification of human milk for preterm infants: Update and Recommendations of the European Milk Bank Association (EMBA) Working Group on Human Milk Fortification. *Frontiers in Pediatrics* 2019, in press.
2. Victora CG, Bahl R, Barros AJ, França GV, Horton S, Krasevec J, Murch S, Sankar MJ, Walker N, Rollins NC; Lancet Breastfeeding Series Group. Breastfeeding in the 21st century: epidemiology, mechanisms, and lifelong effect. *Lancet*. 2016 Jan 30;387(10017):475-90.
3. Maffei D, Schanler RJ. Human milk is the feeding strategy to prevent necrotizing colitis. *Semin Perinatol*. 2017 Feb;41:36-40. Review.



A close-up, slightly out-of-focus photograph of a person's lower body wearing blue denim jeans. The person's hand is visible on the left side, holding a small object with green star patterns. The background is a warm, reddish-brown color.

Contacts

Any questions, queries, problems or requests? Just ask. We'll be available throughout the 2 day event to make sure you have everything you need and to answer any questions.

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