School of Medicine

Istanbul University
Institute of Child Health

1st INTERNATIONAL EURASIAN CONGRESS OF SOCIAL PEDIATRICS

NOVEMBER 28th- DECEMBER 1st, 2018

Dedeman Bostancı Hotel & Convention Centre, ISTANBUL / TURKEY

ABSTRACT BOOK

School of Medicine

İstanbul Üniversitesi
Çocuk Sağlığı Enstitüsü

5. ULUSAL SOSYAL PEDİATRİ KONGRESİ

28 KASIM - 1 ARALIK 2018

Dedeman Bostancı Otel & Kongre Merkezi, İSTANBUL

BİLDİRİ KİTABI

Dear Colleagues

We are privileged to announce the 1st International Congress of Euraisan Social Pediatrics which will be held by our Society for Social Pediatrics at Istanbul, during 26th November - 2nd December, 2018.

The congress revolves around the theme of “Early childhood development, and interventions, besides feeding, and immunization”.

One in every three children globally fail to reach their full physical, cognitive, psychological and/or socio-oemotional potential due to poverty, poor nutrition, insufficient care and stimulation.

Investments in maternal and child health have the highest benefits for communities. Enabling children to develop their full physical, cognitive, language and socioemotional potential, particularly during the first three years of life, has the highest rates of return across their life span, besides economic and social benefits for the community.

Evidence based interventions for improving women’s and children’s health include promoting breast-feeding, improving maternal and young child nutrition, responsive caregiving and providing nurturing care with stimulation in the first years of life, prevention and management of childhood illness and de-velopmental problems, immunization, and promoting maternal mental health.

This congress reflects our goal to provide and discuss the latest scientific knowledge and current evi-dence based practices in early childhood development, contexts that challenge children’s development, maternal and infant nutrition, and immunization. This year, we will introduce a new course on pediatric sleep, addressing the importance of sleep, sleep problems confronting children, and sleep interventions, besides our traditional Child health surveillance, Immunization, and Pediatric epidemiology courses held in our previous congresses. The congress also presents distinguished international keynote speakers.

We are happy to invite and welcome professionals from multiple disciplines who work with children, and families. We hope you will enjoy the topics, feel fulfilled by your experience at the congress and use your experiences in your future studies.

Best regards,

Prof. Perran Boran MD, PhD
Congress President

Prof. Gülbin Gökçay MD, MSc (UK)
President of Society for Social Pediatrics, Turkey

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Programme

26th November 2018, Monday

COURSE HALL 1

THINKING HEALTHY PROGRAMME: WORKSHOP FOR TRAINERS
Tutors: *Najia Atif, Psychologist, Human Development Research Foundation, Pakistan.*
Atif Rahman, Professor of Child Psychiatry, University of Liverpool, UK,

08:30-09:00 INTRODUCTION
Perran Boran

09:00-10:30 Perinatal depression and its public health impact Challenges to delivering psychosocial interventions in LMIC Development of the Thinking Healthy Programme (THP)
Najia Atif, Atif Rahman

10:30-11:00 COFFEE BREAK

11:00-12:30 Understanding the core strategies of THP – I
Najia Atif, Atif Rahman

12:30-13:00 LUNCH

13:00-15:00 Understanding the core strategies of THP - II
Najia Atif, Atif Rahman

15:00-15:30 COFFEE BREAK

15:30-17:30 Understanding the core strategies of THP - III
Najia Atif, Atif Rahman

27th November 2018, Tuesday

COURSE HALL 1

THINKING HEALTHY PROGRAMME: WORKSHOP FOR TRAINERS
Tutors: *Najia Atif, Psychologist, Human Development Research Foundation, Pakistan.*
Atif Rahman, Professor of Child Psychiatry, University of Liverpool, UK,

09:30-10:30 Workshop Sessions 1 and 2
Najia Atif, Atif Rahman

10:30-11:00 COFFEE BREAK

11:00-12:30 Workshop Session 3 and 4
Najia Atif, Atif Rahman

12:30-13:00 LUNCH

13:00-15:00 Workshop challenging situations
Najia Atif, Atif Rahman

15:00-15:30 COFFEE BREAK

15:30-17:00 Implementation discussion and feedback
Najia Atif, Atif Rahman

28th November 2018, Wednesday

COURSE HALL 3

SLEEP DISORDERS IN EARLY CHILDHOOD COURSE PROGRAMME
Chair: *Perran Boran*
Trainers: *Perran Boran, Elif N. Özmert, Adem Aydın, Refika Ersu, Sarah Blunden (Psychologist, Pediatric Sleep Research, Queensland University, Australia)*

08:45-09:00 INTRODUCTION
Perran Boran

09:00-10:30 Sleep in early childhood, behavioural and physiological sleep disorders, how to deal with these disorders
Sarah Blunden

10.30-11.00 COFFEE BREAK

11:00-11:45 Parasomnias: Sleep terror, confusional arousals
Elif N. Özmert

11:45-12:20 Obstructive sleep apnea
Adem Aydın

12:20-13:00 Obstructive sleep apnea
Refika Ersu

13:00-14:00 LUNCH

14:00-14:45 Cued based sleep training methods for breastfeeding mother-infant pairs
Perran Boran

14:45-15:30 Acceptance and Commitment therapy in sleep training
Perran Boran

15:30-16:00 COFFEE BREAK

16:00-17:30 Sleep training for toddlers and preschoolers
Sarah Blunden

28 Kasım 2018, Çarşamba

KURS SALONU 1

PEDİATRİDE KANITA DAYALI TIP, MAKALELERİN ELEŞTİREL DEĞERLENDİRİLMESİ VE YAZININ YAYINA HAZIRLANMASI KURS PROGRAMI
Düzenleyenler: *Prof. Dr. Ahmet Ergin, Prof. Dr. Sibel Sakarya*

09:00-09:30 **Açılış: Kursun tanıtımı ve beklentilerin alınması (Ön test)**

09:30-09:50 **Pediatride kanıta dayalı uygulama ne demektir**
Ahmet Ergin

09:50-10:10 **Kanıta dayalı tıp uygulamasının basamakları nelerdir? Kanıt hiyerarşisi (Kanıt piramidi)**
Ahmet Ergin

10:10-10:30 **Nasıl soru oluşturalım? Nasıl literatür tarayalım?**
Ahmet Ergin

10:30-10:50 **KAHVE MOLASI**

10:50-11:30 **Temel epidemiyolojik araştırma tasarımları**
Sibel Sakarya

11:30-12:00 **Epidemiyolojik araştırmalarda sıklıkla yapılan hatalar ve başa çıkma yolları**
Sibel Sakarya

12:00-13:00 **ÖĞLE YEMEĞİ**

13:00-14:00 **Araştırmaları yayına hazırlarken kullanılan kontrol listelerinin (Consort, Strobe ve Stard) gözden geçirilmesi (Büyük grupta-interaktif tartışma)**

14:00-14:30 **KAHVE MOLASI**

14:30-15:30 **Eleştirel Değerlendirme Becerileri Programı Kontrol Listelerini (CASP) (https://casp-uk.net/casp-tools-checklists/) , kullanarak makalelerin eleştirel değerlendirilmesi- (Grup çalışması)**

15.30-16.30 **Grup sunumları ve tartışma**

16:30-17:00 **Genel Değerlendirme, ne öğrendik? (Son test)**

28 Kasım 2018, Çarşamba

KURS SALONU 2

BAĞIŞIKLAMA KURS PROGRAMI
Düzenleyenler: *Dr. Öğr. Üyesi Sevtap Velipaşaoğlu, Doç. Dr. Selda Karaayvaz*

09:00-09:30 TANIŞMA, BEKLENTİLERİN ALINMASI
Sevtap Velipaşaoğlu, Selda Karaayvaz

09:30-10:15 Bağışıklamada temel ilkeler
Sevtap Velipaşaoğlu

10:15-11:00 Rutin Aşılar (HBV, BCG, 5'li Karma, OPA)
Sevtap Velipaşaoğlu, Selda Karaayvaz

11:00-11:20 KAHVE MOLASI

11:20-12:00 Rutin Aşılar (KPA, Suçiçeği, KKK, HAV, Td)
Sevtap Velipaşaoğlu, Selda Karaayvaz

12:00-13:00 ÖĞLE YEMEĞİ

13:00-14:00 Rutin dışı aşılar (HPV, mevsimsel grip, polisakkarid pnömokok, rotavirus, meningokok, Tdap)
Sevtap Velipaşaoğlu, Selda Karaayvaz

14:00-14:10 KAHVE MOLASI

14:10-15:00 Aşı sonrası istenmeyen etkiler ve aşı redleri
Sevtap Velipaşaoğlu

15:00-15:20 KAHVE MOLASI

15:20-16:00 Risk grubu aşıları
Sevtap Velipaşaoğlu

16:00-16:15 KAHVE MOLASI

16:15-17:00 Aşılamalı mı aşılamamalı mı? Senaryolarla bağışıklamada karar verme süreci.
Sevtap Velipaşaoğlu

28 Kasım 2018, Çarşamba

KURS SALONU 4

ÇOCUK SAĞLIĞI İZLEMİ KURSU
Düzenleyen: *Prof. Dr. Emel Gür*
Eğiticiler: *Emel Gür, Gülbin Gökçay, Filiz Şimşek Orhon, Feyza Koç, Melek Kılıç, Sadık Akşit, Melike Mete*

09:00-09:30 TANIŞMA

09:30-10:15 Toplumda Çocuk Sağlığı İzlemi Prensipleri
Gülbin Gökçay

10:15-11:00 Çocuk Sağlığı İzleminde Taramalar
Emel Gür

11:00-11:15 Tartışma

11:15-11:30 KAHVE MOLASI

11:30-12:00 Büyümenin izlenmesi
Filiz Şimşek Orhon

12:00-12:15 Tartışma

12:15-13:30 ÖĞLE YEMEĞİ

13:30-14:00 Emzirme tekniği ve emzirmede karşılaşılan sorunlar
Feyza Koç

14:00-14:30 Bebek Dostu Hastane Prensipleri-Mama Kodunun İzlenmesi
Melek Kılıç

14:30-14:45 Tartışma

14.45-15:15 Tamamlayıcı beslenme ve karşılaşılan sorunlar
Sadık Akşit

15:15-15:30 Tartışma

15:30-15:45 KAHVE MOLASI

15:45-16:15 Çocuk Sağlığı İzleminde Sık Sorulan Sorular
Melike Mete

16:15-16:30 Tartışma

16:30-17:00 Kapanış

November 29th, 2018, Thursday

MAIN CONFERENCE HALL

09:00-09:30 OPENING CEREMONY

09:30-10:00 SESSION I
Chairs: Jeff Goldhagen, Gülbin Gökçay

09:30-10:00 History of Social Pediatrics in the world
Nick Spencer

10:00-10:20 COFFEE BREAK

10:20-11:20 SESSION II
Chairs: Perran Boran, Refika Ersu

10:20-11:10 Infant sleep interventions: To cry or not to cry: a non-cry intensive and responsive method for settling young babies
Sarah Blunden

11:10-11:20 Discussion

11:20-11:40 COFFEE BREAK

11:40-12:40 SESSION III
Chairs : Gülbin Gökçay, Perran Boran

11.40-12.30 Peripartum depression and infant brain development
Atıf Rahman

12.30-12:40 Discussion

12:40-13:20 SATELLITE SYMPOSIUM
Pertussis Disease and Coccoon Strategy
Metehan Özen

SANOFI PASTEUR

13:20-14:20 LUNCH

14:20-15:00 SATELLITE SYMPOSIUM
Meningococcal Disease and Early Protection with MenACWY-TT
Ener Çağrı Dinleyici

15:00-16:00 SESSION IV
Chairs: Elif N. Özmert, Nick Spencer

15:00-16:00 Early years theme of Northwest London, CLAHRC
Mitch Blair

16:00-16.20 COFFEE BREAK

16:20-17:30 SESSION V
Chairs: Adem Aydın, Sarah Blunden

16:20-16:50 Is Attention Deficit and Hyperactivity Disorder preventable?
Yankı Yazgan

16.50-17.20 Assessment of language delay
İlknur Maviş

17:20-17:30 Discussion

17:30-18:50 SESSION VI
Chairs: Songül Yalçın, Gonca Yılmaz

17.30-18.20 Counselling and supporting working mothers for exclusive breastfeeding-Bangladesh experience
Rukhsana Haider

18:20-18:40 New perspectives of complementary feeding
Selda Bülbül

18:40-18:50 Discussion

18:50-19:50 Annual Meeting of National Society for Social Pediatrics

November 30th, 2018, Friday

MAIN CONFERENCE HALL

08:00-08:30 Poster Presentations
Chairs: Nalan Karabayır, Feyza Koç, Gonca Keskindemirci, Pınar Yılmazbaş

08:30-10:20 SESSION VII
Chairs: Sevgi Başkan, Nurdan Evliyaoğlu

08:30-08:50 Rational use of antibiotics
Eda Kepenekli

08:50-09:10 Frequently asked questions about immunizations
Feyza Koç

09:10-09:30 Incomplete childhood vaccination
Filiz Şimşek Orhon

09:30-09:50 Challenges to successful immunization programme
Gülbin Gökçay

09:50-10:10 Global practices of meningococcal vaccine use
Sevtap Velipaşaoğlu

10:10-10:20 Discussion

10:20-10:40 COFFEE BREAK

10:40-11:30 SESSION VIII
Chairs: Kadriye Yurdakök, Ayşe Kılıç

10:40-11:00 Immunization in special circumstances-Solid organ transplant
Melda Çelik

11:00-11:20 Immunization in special circumstances-Bone marrow transplant
Gonca Keskindemirci

11:20-11:30 Discussion

11:30-12:10 SATELLITE SYMPOSIUM
Chair: Adem Aydın

New approaches for meningococcal disease protection
Sadık Akşit

12:10-13:30 LUNCH

13:30-14:40 SESSION IX
Chairs: Mübeccel Demirkol, Emel Gür

13:30-13:50 Adverse childhood experiences survey among university students in Turkey-2
Betül Ulukol

13:50-14:10 Management of food refusal and poor appetite
Aysu Duyan Çamurdan

14:10-14:30 Use of multivitamin/mineral supplements
Sadık Akşit

14:30-14:40 Discussion

14:40-15:00 COFFEE BREAK

15:00-16:30 SESSION X
Chairs: Eren Özek, Rukhsana Haider

15:00-15:20 Role of the gut microbiota in functional gastrointestinal disease
Nilgün Çöl

15:20-15:40 Use of nutritional supplements
Oya Baltalı

15:40-16:00 The first 1000 days: promoting healthy eating habits early in life
Bahar Kural

16:00-16:20 Breastfeeding problems: clinical case studies
Nalan Karabayır

16:20-16:30 Discussion

16:30-17:30 Oral Presentations and Research Counselling
Stuart Logan, Gülbin Gökçay

17:30-18:30 Oral Presentations and Research Counselling
Mitch Blair, Perran Boran

18:30-19:30 Cocktail

December 1st, 2018, Saturday

MAIN CONFERENCE HALL

08:00-09:00 Poster Presentations
Chairs: Vefik Arıca, Osman Tolga İnce, Meltem Dinleyici, Ayşin Taşar

09:00-10:10 SESSION XI
Chairs: Mehmet Akif İnanıcı, Figen Şahin Dağlı

09:00-09:20 The epigenetic effects of child neglect and abuse
Kadriye Yurdakök

09:20-09:40 Adverse childhood experiences
Betül Ulukol

09:40-10:00 Early childhood interventions: global perspective
Gonca Yılmaz

10:00-10:10 Discussion

10:10-10:30 COFFEE BREAK

10:30-12:00 SESSION XII
Chairs: Betül Ulukol, Sadık Akşit

10:30-10:50 Early identification and assesment of children at risk
Elif N.Özmert

10:50-11:10 Promoting early childhood development
Adem Aydın, Osman Tolga İnce

11:10-11:30 Parents' role in promoting infant mental health, attachment
Songül Yalçın

11:30-11:50 Responsive parenting, child discipline methods
Figen Şahin Dağlı

11:50-12:00 Discussion

12:00-13:00 LUNCH

13:00-14:10 SESSION XIII
Chairs: Ahmet Arvas, Sarah Blunden

13:00-13:20 Early childhood sleep problems
Perran Boran

13:20-13:40 Impact of media use on early childhood development
Seda Topçu

13:40-14:00 Assessment and management of emotional and behavioral problems in early childhood (temper tantrums, elimination disorders)
Emel Örün

14:00-14:10 Discussion

14:10-14:30 COFFEE BREAK

14:30-15:40 SESSION XIV
Chairs: Serpil Uğur Baysal, Selda Bülbül

14:30-14:50 Importance of preschool education, school readiness, and management of school refusal
Selda Karaayvaz

14:50-15:10 Importance of early detection of Autism Spectrum Disorder and its impact on the prognosis
Meda Kondolot

15:10-15:30 Promotion of oral health
Betül Kargül

15:30-15:40 Discussion

15:40-16:40 Oral Presentations and Research Counselling
Stuart Logan, Aysu Duyan Çamurdan

16:40-17:40 Oral Presentations and Research Counselling
Nick Spencer, Ahmet Ergin

17:40-18:00 CLOSING CEREMONY

2nd December 2018, Sunday

COURSE HALL 1

SLEEP DISORDERS IN EARLY CHILDHOOD
COURSE PROGRAMME
Chair: *Perran Boran*
Trainer: *Sarah Blunden (Psychologist, Pediatric Sleep Research, Queensland University, Australia)*

08:45-09:00 INTRODUCTION

09:00-10:30 Sarah Blunden's GeMSS responsive method
Sarah Blunden

10.30-11.00 COFFEE BREAK

11:00-11:45 Sarah Blunden's GeMSS responsive method
Sarah Blunden

11:45-12:30 Sarah Blunden's GeMSS responsive method
Sarah Blunden

ABSTRACTS

November 29th, 2018, Thursday

History of Social Pediatrics in the world

Nick Spencer
Emeritus Professor of Child Health,Division of Mental Health and Wellbeing,Warwick Medical School,University of Warwick, UK

Having considered a working definition of social pediatrics, the presentation will discuss its historical roots going back to early social epidemiology studies in 19th century Europe and the role of early pioneers of pediatrics in identifying the importance of social causes and consequences of child health and illness. The longstanding debate on the relative importance of biological against social explanations for child health and illness led eventually to the establishment in 1969 of the Club Internationale de Pediatrie Sociale (CISP) in France under the leadership of Prof Michel Manciaux and the European Society for Social Pediatrics (ESSOP) in 1977 under the leadership of a group of Professors of Pediatrics including Prof İhsan Doğramacı. Lennart Kohler was elected as General Secretary and led ESSOP, later as President, for 25 years. In 2012, in recognition of the increasing involvement of social pediatricians from outside Europe and need for a truly international organisation, ESSOP became ISSOP. In conclusion, the presentation will consider some of the challenges and threats to child health globally and the implication for social pediatrics in the future.

Infant Sleep Interventions: To Cry Or Not To Cry: A Non-Cry Intensive And Responsive Method For Settling Young Babies

Sarah Blunden
Central Queensland University Appleton Institute for Behavioural Science Department, Australia

In families with babies, sleep disturbance is significant, often putting parents at risk of a range of negative psychological and psychosocial consequences. This sleep disturbance can be reduced, and the most commonly prescribed sleep interventions for these disturbances are extinction methods ("Cry-it-out method" and/or "Controlled crying or comforting"), which require parents to ignore their infant's overnight cries for settling assistance, either completely or periodically.

Despite treatment success, these bouts of crying are often untenable for some parents who fear the impact of stress on their infant. Many parents do not want to undertake any extinction methods to achieve their aim of sleep consolidation in their baby. For them, while the evidence suggests that extinction will probably work, their capacity to comply with the requirements of the approach is limited. For these parents the treatment is considered worse than the problem. This paper presents an alternative to Extinction methods, a proven "responsive " method, which does not necessitate ignoring but gradually withdraws parental assistance so that the infant learns to self-settle back to sleep, eventually without the need for parental attendance.

Peripartum Depression and Infant Brain Development

Atıf Rahman
Institute of Psychology, Health & Society, University of Liverpool, UK

Peripartum or perinatal depression, affecting mothers during pregnancy and in the first year after childbirth, is highly prevalent globally, ranging from 10-15% in High Income countries and 18-20% in low and middle income countries (LMICs). The condition is associated with a number of negative infant and child outcomes including temperamental, cognitive, emotional and behavioural, and physical. Hypothesised transgenerational mechanisms include placental, neurodevelopmental, genetic, epigenetic and deficits in attachment and caregiving. Psychological interventions, which are recommended as first-line treatment for perinatal depression, can have a protective effect on infant development. However, the treatment gap for perinatal depression is over 50% in highly developed countries and over 90% percent in LMICs. The main hurdle in scaling-up perinatal psychological services is the lack of mental health specialists who can deliver effective evidence-based interventions. A key strategy to overcome this hurdle is to adapt such interventions so that non-specialists can deliver them effectively under supervision of specialists. The Thinking Healthy Programme (THP) is one such intervention recommended by the World Health Organization. THP has been shown to be highly effective when delivered by community health workers in rural Pakistan. Efforts to scale-up THP are taking place in a number of countries.

Early Years Theme of Northwest London, CLAHRC

Mitch Blair
Imperial College London, Faculty of Medicine, Department of Medicine, Division of Pediatrics, London, UK

The North West London Collaboration for Learning and Applied Health Care and Research (CLAHRC) is a multidisciplinary practitioner and researcher coalition which aims to use a range of quality improvement and action research methods in tackling the “wicked “ problems of 21st century child health. A prominent issue in our area of London is the high numbers of children utilising hospital acute services for unscheduled care. The presentation will focus on how we went about exploring this issue; the development of a number of programmes of care including optimisation of asthma and allergy care, integration of primary and specialist care models (Connecting Care for Children (https://www.cc4c.imperial.nhs.uk/)understanding emergency attendances and infant feeding support using a social paediatrics approach.

Is Attention Deficit and Hyperactivity Disorder Preventable?

Yankı Yazgan
Emeritus Proffessor of Child and Adolescent Psychiatry, Marmara University, School Of Medicine, Istanbul

Assessment of Language Delay

İlknur Maviş
Anadolu University, Faculty of Health Sciences, Department of Speech & Language Therapy

Developmental delay is the most common disability in children aged 0 to 4 years. Developmental delay is a delay in any one of the four developmental domains: gross and fine motor skills, speech and language, social and personal and activities of daily living, and performance and cognition. More recent surveys suggest that 5% to 10% have a delay in a single domain. Delayed speech or language development is the most common developmental problem.

Children with delayed speech or language acquire language at a slower rate than their typically developing peers. If the language comprehension skills are also delayed, in addition to the fact that the child isn't talking and isn't combining at least two words (that is, an expressive vocabulary of fewer than 50 words and no two-word combinations by 24 months of age), those are the benchmarks that we use around two. It should be noted that late talking may also be an early or secondary sign of disorders, such as specific language impairment, social communication disorder, autism spectrum disorder, learning disability, attention deficit hyperactivity disorder, intellectual disability, or other developmental disorders. In order to make a differential diagnosis, it is critical to monitor the global development of a child in domains that include, but are not limited to, cognitive, communication, sensory, and motor skills. In making the determination, it is also important to consider other language development factors, including rate of vocabulary growth, speech sound development, emerging grammar, language comprehension, social language skills, use of gestures, and symbolic play behaviors (Olswang, Rodriguez, & Timler, 1998; Wetherby, Allen, Cleary, Kublin, & Goldstein, 2002).

Parents help provide some enrichment in the child's language environment early on. They can use techniques like shared book reading, or be taught focused stimulation or other communication techniques, and all these can provide a rich language environment that may have some facilitative effects. Parents are encouraged to have the child's language development monitored by a speech language pathologist and to initiate direct intervention if significant growth isn't seen by age three. Speech & language pathologists can really work with families to help children improve their listening and recognize familiar words and phrases in their environment and respond to them appropriately, and begin to use gestures as well as sounds and vocalizations and words to express their wishes and desires.

Counselling And Supporting Working Mothers for Exclusive Breastfeeding-Bangladesh Experience

Rukhsana Haider
Training & Assistance for Health & Nutrition Foundation (TAHN), Bangladesh

In Bangladesh, there are currently about 13 million women of reproductive age in the labor workforce. The majority of these women are employed in the readymade garments industry and in other factories. Considering their long working hours, and that they do not have adequate access to health information and care, they find it difficult to have optimal breastfeeding practices.

To provide female factory workers with correct information, skills and support for optimal breastfeeding and infant and young child feeding practices.

A project was conducted in urban and rural areas of Chittagong during May 2015 to March 2017. Seven women were trained as peer counselors to provide home-based counseling to pregnant and lactating factory workers (in readymade garments and shoe factories), and to neighboring unemployed women monthly from the fifth month of pregnancy, within 72 hours of delivery, once between 6-8 days, and monthly until infants reached six months. Counseling included raising awareness about the importance of breastfeeding, demonstration of correct breastfeeding techniques, hand expression, storage and feeding of mother's milk by caregiver, Peer counselors recorded relevant information during their household visits. Project staff monitored peer counselors' visits, and interviewed mothers for problem solving. Descriptive analyses of data collected was examined to assess their influence on breastfeeding practices.

Total 591 pregnant women were enrolled, 456 factory workers and 135 unemployed women. About 40% of the workers resigned either during pregnancy or after delivery (n=183). Most of the women initiated breastfeeding within one hour (88% in both groups). The exclusive breastfeeding prevalence at 6 months was 111/127 (87%) among the factory workers, compared to 194/202 (96%) in their unemployed neighbors (p=0.003).

Community-based peer counselors could inform, encourage and support the majority of factory workers to initiate breastfeeding within one hour and to continue exclusive breastfeeding. The prevalence of exclusive breastfeeding at 6 months was, however, significantly lower in the factory workers compared to their unemployed neighbors.

New Perspectives of Complementary Feeding

Selda Bülbül
Kırıkkale University Medical School, Social Pediatrics Department

As decribed by the American Pediatric Association (APA), Complementary Foods (CF) are any energy-containing foods that displace breastfeeding and reduce the intake of breast milk.

Definition of World Health Organization (WHO) is not much different than the APA such as; "any nutrient containing foods or liquids other than breastmilk given to young children during the periods of complementary feeding….[when] other foods or liquids are provided along with breastmilk."

Growth, nutritional, and developmental factors form the basis of feeding transitions and recommendations for complimetary foods. Key factors are; digestion and absorbtion, neuromuscular development, taste and texture acceptance.

Some Considerations in Complementary feedings

Based on individual development, growth, activity level as well as consideration of social, cultural, psychological and economic considerations most infants are ready at 4-6 months. Introduction of solids after 6 months may delay developmental milestones. As mentioned at the position paper of The European Society for Paediatric Gastroenterology Hepatology and Nutrition (ESPGAN) -2017, exclusive or full breast-feeding should be promoted for at least 4 months (17 weeks, beginning of the 5th month of life) and exclusive or predominant breast-feeding for approximately 6 months is considered a desirable goal.
Too Early to start causes diarrheal disease & risk of dehydration, decreased breast-milk production and allergic sensitization. However starting too late is also risky, because, it can cause potential growth failure, iron deficiency and developmental problems.

Different studies investigated the impact of the timing of introducing different food textures on the eating behavior of young children: introducing lumpy solids after the age of 9 months reduced consumption of many of the food groups at 7 years more than those introduced to lumpy foods between 6 and 9 months. Also, it was reported as having more feeding problems at 15 months and 7 years.

It is more important to first offer a variety of single-ingredient fruits, vegetables, grains, and meats, in any order, to allow for a baby to become accustomed to diverse flavors. Infants exposed to an intervention with greater variety of vegetables during CF also consumed a greater variety at 6-year follow-up.

Well-prepared home-made foods may offer the opportunity for a greater variety of culturally appropriate flavours and textures, with greater energy density. There is, however, also the potential for homemade foods to be unsuitable, for example, with the addition of sugar or salt. Food preparation and cooking methods may also alter nutrient content.

The World Health Organization (WHO) indicates that pureed foods could be consumed and swallowed at 4–7 months, mashed or chopped foods and finger foods (bread) at 7–12 months, and foods eaten by the family at 12–24 months. ESPGHAN committee on nutrition emphasized that there may be a critical window for introducing solid foods before the age of 10 months. Prolonged use of pureed foods should be discouraged and infants should be eating lumpy foods by 8–10 months at the latest.

In 2013, the FDA released information concerning high levels of arsenic that may be found in rice products.

Arsenic is a natural component of water, air, food, and soil, as well as a result of contamination from human actions, including mining and arsenic-containing pesticides.The FDA recommends that iron-fortified cereal, such as rice cereal, be given to provide important nutrients for infants; however, ironfortified infant rice cereal does not have to be the first food introduced, and other cereals (oat, barley, and multigrain) should also be offered to a baby as part of a varied diet.
The AAP also recommends that homemade purees of vegetables that are higher in nitrates (spinach, beets, squash, carrots) not be given earlier than 3 months of age, since these vegetables can potentially cause methemoglobinemia.

WHO suggests offering finger foods at each meal at this age. Fear of choking was previously reported to delay the introduction of lumpy or chopped foods by mothers. Children whose parents were afraid of their child choking when first introducing food pieces, had more problems with this step. Choking hazard should not worry parents and potentially disturb complementary feeding, but should encourage adopting adequate measures to limit this hazard. The key information should be known by parents to help them to feel safer when introducing new food textures such as; an appropriate eating posture for the child (sitting down with the back straight) and environment (always under adult supervision) as well as the size and shape of given foods (avoiding round, cylindrical, and very hard pieces, etc.). By 8-10 months most infants accept finely chopped foods. 1 “single ingredient” new food at a time (3-5 days) should be introduced.

Evidence that higher protein intake in infancy and early childhood was associated with increased growth and higher BMI in childhood, particularly when the energy percentage from protein (PE%) at 12 months of age was between 15% and 20%. A mean intake of 15 PE% was proposed as the upper limit at 12 months on the basis that there is no risk of an inadequate protein intake at this level. Given increasing evidence that the protein intake of infants in high-income countries generally exceeds recommendations, and that this may be
causally related to an increased risk of obesity, the recent EFSA scientific opinion on the composition of infant formulas and followon formulas recommended that the minimum level of protein in cows’ milk–based infant formulas and follow-on formulas should remain at 1.8 g/100 kcal, but that the upper limit for protein content of follow-on formulas should be reduced from 3.0 to 2.5 g/100 kcal.

Fat intake is an important determinant of energy supply, and energy requirements remain high throughout the first year of life. A low-fat CF diet will typically result in a diet with a low energy density, which may mean that the total amount of food needed to meet energy requirements is so large that the infant is unable to eat enough. Conversely, a high-fat diet (with fat content >50%) may lead to reduced dietary diversity. It was recommended that fat should constitute 40% of energy intake from 6 to 12 months, including 4% of energy from linoleic acid, 0.5% from alpha-linolenic acid, and 100 mg/day from docosahexaenoic acid (DHA).

Long-chain polyunsaturated fatty acids (LCPUFA), notably docosahexaenoic acid (DHA), play an important role in brain development. It is known that DHA status tends to decline during the complementary period when the intake of breast milk or LCPUFA-supplemented formula decreases. In late infancy, with each 10-g increment in fish intake being associated with a 0.3 FA% increase in DHA status. Those who received the supplemented formula had significantly better visual acuity up to 1 year of age than did those weaned to unsupplemented formula.

Weaning Time in Preterm Infants
Improvements in neonatal management, both during hospitalization and follow-up, has resulted in a significant increase in survival of very preterm infants. Preterm infants are at a higher risk of postnatal growth deviation, including rapid catch-up growth or failure to thrive. In this period, it is not only important

to suggest the choice of the best "milk" (human milk with or without supplementation and/or formula) to enhance a balanced infant growth but also to choose the right food and right time to start weaning, dependent upon family compliance.

The Joint Consensus Statement on weaning preterm infants suggests "preterm infants should be considered for weaning between 5 and 8 months uncorrected age to ensure that sensitive periods for the acceptance of solids are not missed and to allow development of appropriate feeding skills"

In a commentary from ESPGHAN on Enteral Nutrient Supply for Preterm Infants, vitamin D intake of 800–1000 IU/day during the first months of life was recommended to support neuromuscular function and bone mineralisation. In the same document by ESPGHAN Committee on Nutrition, regarding iron supplementation, an intake of 2–3 mg/kg/day is recommended and should be started at 2–6 weeks of age.

Gluten Introducing

Research has focused on timing of introduction, amount of introduction, and whether ingesting small amounts of gluten while breastfeeding would be helpful in preventing celiac disease. Current data do not show that any of these infant feeding practices, or breastfeeding, prevent celiac disease. It is currently recommended that children be introduced to wheat around 6 months of age or after a few first foods have been introduced.

In children at high risk of developing type 1 diabetes, gluten introduction at <3 months compared with gluten introduction at >3 months of age was associated with increased risk of type 1 diabetes autoimmunity, but beyond 3 months the age of gluten introduction had no effect on the risk of developing type 1 diabetes.

In the Enquiring About Tolerance [EAT] study, the median duration of EBF was 16 weeks in the intervention group and 24 weeks in the control group, found that parent-reported upper respiratory tract infection in the 4- to 6-month period was significantly higher in the intervention group but there was no significant difference for parent-reported lower respiratory tract infection, bronchiolitis, or other infections, nor in parent-reported diarrhoea between two groups. Thus these findings showed that the introduction of solids alongside breast-feeding may not result in an increase in infection risk, with the exception of upper respiratory tract infection.
(https://digital.nhs.uk/data-and-information/publications/statistical/infant-feeding-survey/infant-feeding-survey-uk-2010).

Collectively, these data suggest there may be some beneficial effect on iron stores of introducing CF alongside breast-feeding from 4 months, even inpopulations at low risk for iron deficiency. Based on theoretical calculations, the ESPGHAN suggested the dietary iron requirement to be 0.9 to 1.3 mg/kg from 6 to 12 months consistent with recommendations from other authorities for infants ages 6 to 12 months which range from 6 to 11 mg/day. Facilitators of absorption include human milk, meat proteins, ascorbic and citric acids, and fermented vegetable products, whereas inhibitors include cocoa, polyphenols, phytates, tannins, dietary fibre, calcium, and cows' milk.

Microbial gut Environment

A reverse metabolic approach to weaning: in silico identification of immune-beneficial infant gut bacteria, mining their metabolism for prebiotic feeds and sourcing these feeds in the natural product space. The introduction of solid foods and the changes in milk consumption trigger significant GI tract, immune and developmental adaptations. Weaning also exposes infants to nondigestible carbohydrates and provides new substrates for the microbial gut community with resulting growth and dominance of some taxa, such as Bacteroides, and a reduction of others, such as bifidobacteria, enterobacteria, and some Clostridium

spp. Top 20 foods were proposed (Table 1) that include vegetables and fruits, which are natural resources of prebiotic compounds, and moreover, most of them are normally recommended as complementary foods which can provide infants a large proportion of micronutrients such as iron, zinc, phosphorus, magnesium, calcium, and vitamin B6.

Vegetarian and Vegan Diet

Vegan diets have generally been discouraged during CF. Although theoretically a vegan diet can meet nutrient requirements when mother and infant follow medical and dietary advice regarding supplementation, the risks of failing to follow advice are severe, including irreversible cognitive damage from vitamin B12 deficiency, and death. If a parent chooses to wean an infant onto a vegan diet this should be done under regular medical and expert dietetic supervision and mothers should receive and follow nutritional advice. Mothers who are consuming a vegan diet need to ensure an adequate nutrient supply, especially of vitamins B12, B2, A, and D, during pregnancy and lactation either from fortified foods or supplements. Careful attention is required to provide the infant with sufficient vitamin B12 (0.4 mg/day from birth, 0.5 mg/day from 6 months) and vitamin D, and iron, zinc, folate, n-3 fatty acids (especially DHA), protein, and calcium, and to ensure adequate energy density of the diet. Tofu, bean products, and soy products can be used as protein sources. Infants who are not receiving breast milk should receive a soy-based infant formula.

Food Allergy

By most societies it is recommended that exclusive breastfeeding for about 6 months is desirable, but complementary feeding should be introduced no earlier than 17 weeks of age and no later than 26 weeks. In addition, since there is no evidence that suggests food allergy can be prevented by delaying solid food introduction beyond 4 to 6 months, the American Academy of Allergy, Asthma, and Immunology recommends 4 to 6 months of age for the introduction of complementary foods.

Liquid whole milk and honey (or products that contain honey, such as honey-sweetened cereal) should not be given before 1 year of age, and unpasteurized dairy and undercooked foods (such as meat, fish, or eggs) should not be introduced to infants or young children.

In general, for infants who are not at high risk for food allergies, it is recommended to introduce typically allergenic foods (milk, egg, soy, wheat, fish, shellfish, tree nuts, sesame) in age-appropriate forms and consistencies, along with other complementary foods at any time after 4 t o 6 months of age. For infants who are at higher risk for food allergies, including children who have mild eczema or a strong family history of atopy but who have not themselves shown any symptoms of food allergy, allergenic foods should be introduced early, starting between 4 and 6 months of age, after a few typical early infant foods (such as grains, meat, fruits, or vegetables) have already been tried and tolerated.

Milk protein allergy

It is a prevalent cause of rectal bleeding in infancy and is more accurately termed “food protein–induced proctocolitis.” This condition has commonly been called “allergic colitis” or “milk soy protein intolerance.” Milk is the most common trigger for this condition; however, soy, egg, corn, and other foods have been implicated also. Treatment generally involves eliminating the infant’s exposure to milk and soy (or other potentially triggering foods) from themother’s diet. For a formula-fed infant, transitioning from amilk- or soy-based formula to an extensively hydrolyzed infant formula should result in resolution of proctocolitis.

Acute food protein–induced enterocolitis syndrome (FPIES)

It is a non–IgE-mediated response to food that manifests in young infants as episodes of repetitive and

severe vomiting, often followed by diarrhea, starting several hours after a baby ingests a causative food. Vomiting may be protracted (lasting for several hours) and can be severe enough to lead to dehydration or shock. Diarrhea may be watery or bloody and may also persist for several hours or more after vomiting ceases. An infant having an FPIES reaction may also appear lethargic and pale but will not have cutaneous skin findings (ie, hives, rash, itching) or respiratory symptoms characteristic of an IgE-mediated food allergy. FPIES most often manifests between 2 and 7 months of age, coinciding with the timing of formula and solid food introduction for infants. The most common triggers for FPIES in the United States are cow milk and soy. Among solid foods, the most common FPIES triggers are rice, oat, other grains, egg, vegetables, poultry, and fish, although FPIES reactions have been observed with many other foods. The diagnosis of FPIES and the identification of causal foods is established clinically on the basis of a history of characteristic symptoms. There are no laboratory or other diagnostic tests that confirm the diagnosis of FPIES. Treatment of an acute FPIES reaction may be a medical emergency and requires fluid resuscitation (either orally or intravenously). Vomiting due to acute FPIES may also abate with the administration of the antiemetic ondansetron. Management of FPIES in the long term requires elimination and continued avoidance of the causative food.

Lactose Intolerance

Primary lactose intolerance is rare during infancy and early toddlerhood. It may be seen transiently in children after gastroenteritis or in children who have celiac disease due to villous atrophy that leads to decreased lactase levels on the brush border of the small bowel. There is no underlying intestinal inflammation in primary lactose intolerance; however, children may have increased intestinal gas, abdominal distention, and watery diarrhea due to the presence of lactose (an osmotic load) in the colon, which leads to increased water secretion.

Constipation

Stool production is involuntary in infancy, as babies do not have control of the external anal sphincter. In response to the presence of stool, the colon stretches, which signals the internal anal sphincter to open. When infants push to pass a stool while lying down, the anorectal canal does not straighten, and the pelvic floor muscles, particularly the puborectalis muscle, do not relax, making stools more difficult to pass. Infants may appear uncomfortable, strain, or turn red in the face, but they will usually pass a soft stool. This normal process is known as rectal confusion, and it usually resolves by 4months of age. Some babies may go 1 week without a bowelmovement. Some foods have a tendency to constipate babies (examples include bananas and rice cereal), while others have a relative laxative effect (“p” foods, such as prunes, pears, peaches, and apricots), so it is recommended that parents feed their infants a balance of these foods and adjust them to their baby’s bowel habits. Beginning at 6 months of age, a few ounces of water may be given in a sippy cup during meals and snack times.

Specific Foods to Avoid

Salt and sugar should not be added to complementary foods, and the intake of free sugars (sugars added to foods and beverages by the manufacturer, cook, or consumer, and sugars naturally present in syrups and fruit juices) should be minimized. Sugarsweetened beverages should be avoided.

Honey should not be introduced before 12 months of age unless the heat-resistant spores of Clostridium botulinum have been inactivated by adequate high-pressure and high-temperature treatment, as used in industry since the consumption of honey has been repeatedly associated with infant botulism.

Fennel, which is sometimes used in the form of a tea or infusion as a treatment for infant colic and digestive symptoms, contains estragole, which is a naturally occurring genotoxic carcinogen. Although occasional exposure to fennel products in adults is unlikely to be of concern, an expert panel of the European

Medicines Agency concluded that fennel oil and fennel tea preparations are not recommended in children younger than 4 years of age due to the lack of adequate safety data.

To reduce exposure to inorganic arsenic, which is considered a first-level carcinogen, this Committee previously recommended that rice drinks should not be used for infants and young children.

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Rational Use of Antibiotics

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Rational drug use is defined as the use of the drug in accordance with the disease findings and personal characteristics of the individual at the appropriate time, at the appropriate dose, at the lowest cost to themselves and to the community. Physicians, pharmacists, patients, healthcare workers, public, pharmaceutical manufacturers, non-governmental organizations and the written and visual press are all responsible for rational drug use.

WHO advocates 12 key interventions to promote more rational use:
- Establishment of a multidisciplinary national body to coordinate policies on medicine use
- Use of clinical guidelines
- Development and use of national essential medicines list
- Establishment of drug and therapeutics committees in districts and hospitals
- Inclusion of problem-based pharmacotherapy training in undergraduate curricula
- Continuing in-service medical education as a licensure requirement
- Supervision, audit and feedback
- Use of independent information on medicines
- Public education about medicines
- Avoidance of perverse financial incentives
- Use of appropriate and enforced regulation
- Sufficient government expenditure to ensure availability of medicines and staff.

The activities related to 'Rational Drug Use' (AİK) have been carried out in our country for about 20 years. AİK Branch Office was established in October 2010 and the provincial representative offices were put into service in 81 provinces. Family physicians, as of November 2013 'Prescription Information System' has been started to provide monthly information. There are many details in these feedback and antibiotic prescription rates can be seen. Rational Drug Use-National Action Plan was carried out between 2014 and 2017. The priority drug clusters were antibiotics, respiratory system drugs, mental health drugs and geriatric drugs. Improving the use of antibiotics constitutes the leading target in AİK activities.

Antibiotics are the main drugs used in the treatment of infectious diseases. However, the use of this treatment option more than necessary and misguided reasons increasingly threatens the healing effect on diseases. According to World Health Organization data, more than 50% of drugs are prescribed or used inappropriately.

The World Health Organization Regional Office for Europe Office 's Antibiotic Use in Eastern European Countries: According to the data obtained in the Cross-National Database Study; penicillin compounds (in particular amoxicillin-clavulanic acid) peak usage is seen in Turkey and Georgia, maximum use of all cephalosporins set in Turkey, second generation cephalosporins (especially cefuroxime) peak usage seen in Turkey, macrolides are used highly in Turkey.

Today, young children are the age group that is most exposed to the wrong antibiotic practices. Commo cols is a health problem associated with viruses, and it is often tried to be treated with antibiotics both in the world and in our country. Such practices stimulate the development and propagation of antibi-

otic resistance mechanisms in bacteria. Common infectious agents such as *Streptococcus pneumoniae* and *Staphylococcus aureus* can often be treated with antibiotics. However, the antibiotic resistance issue complicates the treatment and increases healthcare cost. In addition, *Enterobacter, Klebsiella, Acinetobacter, Enterococcus* spp. who are the common causative agents in healthcare-associted infections can be resistant to all current antibiotics. Many studies have shown that; recent exposure to antibiotics increases both the carriage of resistant bacteria and the rates of diseases caused by these bacteria.

It is known that resistant bacteria species spread after antibiotic use for prophylactic purposes. Therefore, it is the main focus of public health practices that aim to reduce the exposure of antibiotics and prevent the growth and spread of resistant bacteria in individuals and communities. Training of Healthcare workers aiming to raise awareness of rational antibiotic use in common infections are frequently performed in our country as well as in some other countries. It has been proved by many observational studies that similar trainings reduce antibiotic abuse. In addition, these studies have shown that; the decrease in antibiotic use does not lead to an increase in the associated diseases and their complications.

Frequently Asked Questions About Immunizations

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Vaccination practices play an important role in well-child visits. Pediatricians and family practitioners have important roles in childhood vaccination practices. If the physicians know about the common problems about vaccination practices and how to deal with them, it's possible to increase vaccination rates. The main topics to evaluate common problems are 1) the injection methods of vaccines 2) the principles of safe vaccination 3) the most common problems during and following vaccination 4) the storage and safety of vaccines

The injection methods of vaccines
The appropiate injection of the vaccine is important for both improving immunity and minimizing local reactions. There are 5 ways of administering a vaccine; intradermal, subcutaneous, intramuscular, oral and intranasal.

The principles of safe vaccination
The child must be evaluated with some screening questions for safe vaccination. The information of history of any other drugs (including corticosteroids, chemotherapotics, etc);
any alergic reactions against vaccines or food; any chronic diseases should be obtained. The interval with previous vaccination should also be considered.

The most common problems during and following vaccination
1) Anaphylaxis
The vaccination room should contain oxygen tube, adrenaline, corticosteroids and antihistaminics, ambu, airway, serum and serum set in case of anaphylaxis.
2) Head trauma following vasovagal reactions
The vaccine should be injected after the child is cooperated and immobilized if he/she can not cooperate. The child should sit down during injection in order to minimize head trauma following possible vasovagal reactions.
3) Systemic reactions due to vaccination
Fever, loss of appetite and restlessness are common systemic reactions that can occur following vaccination. An appropriate dose of antipyretic treatment can be administered if fever exceeds 38.5ºC.
4) Local reactions due to vaccination
The most common local reactions following vaccination are hyperemia, edema and pain at the injection site. Local reactions are commonly seen in first 72 hours following vaccination and generally resolves spontaneously. Local administiration of ice bags can help rapid resolution of reactions.
5) Pain due to injection
Hugging the infants during vaccination instead of laying on the bed and flicking the injection site may reduce the pain due to injection.
6) Preservation and storage of vaccines
Vaccines should be preserved in appropiate condition until administeration. In refrigerator, all vaccines should be reserved at +4 °C (+2° - +8). Especially, live vaccines such as BCG, MMR and varicella are more sensitive to light and temperature, so they should be preserved in the upper site of the refrigerator.

Incomplete Childhood Vaccination

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Immunization is the most effective method for the elimination and eradication of communicable diseases. The vaccination status of every infant, child, adolescent and pregnant referring to the health institution should be checked in health visits. Thus, incomplete or uncertain vaccination status of the person may be noticed. There are many reasons for incomplete vaccination in society. The reasons regarding health system include inappropriate physical infrastructure, insufficiency of the number of health personnel, not being asked about child vaccination status and lack of information on vaccination. Also, individual and familial reasons include the families' lack of information about vaccination, inappropriate communication between parents and health personnel, life away from health institutions and hesitation to vaccinate. Furthermore, various reasons such as presence of war, immigration, disaster etc., false or insufficient information about vaccination in society and superstitions may be important reasons for incomplete vaccination.

In evaluating children with incomplete vaccination, it is necessary to determine if vaccination is performed. Only written and dated records should be accepted as evidence of immunization. Serologic testing to determine vaccination status may be an alternative but not always recommended.

General principles should be considered when completing routine vaccines. A lapse in the immunization schedule does not require reinitiating the entire series or addition of doses to the series for any vaccine in the recommended schedule. If the primary series has been started but not completed, the series should be completed, but there is no need to repeat doses or restart the full course. When in doubt, a person with unknown or uncertain immunization status should be considered disease susceptible, and recommended immunizations should be initiated without delay on a schedule commensurate with the person's current age. Minimum age and interval recommendations should be followed for administration of all doses.

Reducing or dividing doses of any vaccine can result in inadequate immune response. Thus, these doses should not be considered valid. If the minimum interval between the vaccine doses is not observed, the dose should be considered invalid and should be repeated after the appropriate time. In general, vaccine doses administered 4 days or fewer before the minimum interval or age can be counted as valid (except for the rabies vaccine). Doses administered 5 days or more before the minimum interval or age should not be counted as valid doses and should be repeated as age appropriate. The repeat dose should be spaced by the recommended minimum interval after the invalid dose.

Some principles should be observed when simultaneous administration of multiple vaccines is required. There is no contraindication to simultaneous administration of multiple vaccines routinely recommended for infants and children such as BCG, OPV, DaPT-IPV-Hib, MMR and hepatitis B vaccines. When vaccines are administered simultaneously, separate syringes and separate sites should be used, and injections into the same extremity should be separated by at least 2 cm so that any local reactions can be differentiated. As a rule, two parenteral live viral vaccines (MMR, varicella vaccines) can be administered at the same time. However, if they cannot be applied at the same time, a minimum of 4 weeks between the doses should be allowed. There is no need to interval between OPV and other live vaccines. Since live virus vaccines may disrupt the Tuberculin Skin Test (TCT), PPD administration should be performed on the same day or 4-6 weeks after measles vaccination. Because of the possibility of lymphopenia and insufficient cellular immunity after measles disease or vaccination, it is necessary to perform BCG vaccination 4 weeks after measles vaccination.

As a result, vaccination is the right of every child. In order not to cause a missed opportunity, the vaccination status of every infant, child, adolescent and pregnant referring to the health institution for any reason should be checked. Further, the vaccination requirements should be determined and every opportunity should be evaluated for vaccination.

Challenges to Successful Immunization Programme

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Principles of immunization programmes are based on scientific knowledge of vaccine characteristics, biology of immunization, current epidemiology of specific diseases, and human characteristics. Experience and the judgement of the health personnel especially health officials, and of the community have a key role in the successful implementation of these programmes. In this respect an immunization encounter should include the followings:

1- Communicating about vaccines
2- Screening children for contraindications
3- Technique for safe and less painful injection
4- Dealing with anxiety, pain, and fever
5- Dealing emergencies

Communication about vaccines must be focused on what parents want to hear. The communication should start as early as possible after delivery. A team approach should be used. Communication should be coordinated between physicians, nurses in the team. Development of simple, direct messages and easy to understand printed materials can eliminate some questions. Individual background should be understood. Many factors influence risk perception including educational, emotional, religious, and philosophical. Immunization messages should be formed with these differences in mind. Information should be presented with sensitivity to individual needs. Parents should be engaged in a decision-making partnership. Studies showed that patients trust their physicians more than anyone else for accurate and honest information. To build on this trust, the approach should be nonjudgemental, empathetic, and mutually respectful. Barriers such as insufficient time should be minimized. Bossy approaches should be avoided. Physicians should check that parents understand what has been told. .

Screening children for contraindications, precautions, and other problems before every dose of a vaccine is an important part of succesful immunization. This can be achieved by asking some simple questions. Technique of the immunisation and organisation of the session should be carefully carried out. To bring the vaccine into examination room is better than to move the parents and the child to a designated shot area. Infants may do better if held on the parent's lap. Older children prefer to sit on the examining table and hug their parents. Health care workers should wash their hands before treating each child and sterile technique should be used. Gloves are not required. Each vaccine should be prepared separately. A direct and rapid plunge of the needle through the skin is recommended. Aspirating back on the syringe after penetration is not necessary.

To deal with anxiety, and pain during the immunisation session is important. Various methods have been used to reduce pain during injection. The efficacy of those interventions are variable. The most reasonable approach for young children is to allow parents to comfort them. Breastfeeding the infants and distracting techniques such as to let the child cough can be useful. To some extent stress and anxiety created by vaccination can be decreased by truthfully informing the children of what to expect before the visit occurs and by parental genuine acceptance of vaccination as valuable.

Acute emergencies after vaccinations are very rare. However some authorities recommend observation in the office for 15 minutes after vaccination. Standing orders for emergencies should be in place at the office and supplies should be available just in case.

In the era of information there are some challenges to successful immmunisation due to misinformation. This misinformation or misunderstanding creates vaccine hesitancy. Vaccine acceptance demonstrates the spectrum of demand from high demand of accepting all vaccines to small amonut of vaccine deniers. The World Health Organization defines vaccine hesitancy as "… a delay in acceptance or refusal of vaccines despite the availability of vaccination services" . Physicians and other vaccine providers should adopt an easy-to-understand approach and use frameworks for facing hesitancy. As vaccine use increases and the incidence of vaccine-preventable diseases is reduced, vaccine-related adverse events become more prominent in decisions for vaccination. Recent outbreaks of measles in Europe and in the USA are important reminders of how immunization delays and/or refusals can result in resurgence of vaccine-preventable diseases.

To overcome the challenges to successful immunization programme in a country, political commitment to primary health care from governments, non-governmental organizations, professional organizations, and academia should be strenghtened as the recent Astana declaration has pointed out. Reaching parents of today and tomorrow by educating pupils in the setting of "Health Promoting Schools"may significantly boost immunization acceptance. The critical thinking must be developed during medical education as well as primary education in the era of information.

It is important to note that studies have shown that education programmes can be a cost-saving to health care system. We are in a World already benefiting from vaccines that exist. The challenge we have now is to make that the children will not suffer because we did not present the benefits and risks of vaccines in a meaningful way acceptable to public, and did not educate community for scientific thinking in the era of information.

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Global Practices of Meningococcal Vaccine Use

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Neisseria meningitidis is a gram-negative, encapsulated diplococcus that infects only humans. Meningococci colonize the nasopharynx and are usually harmless commensals. Between 5-11% of adults and 25% of adolescents carry the microorganism. However, an estimated 1.2 million cases of invasive meningococcal diseases (IMD) occur each year, leading to 135 000 deaths around the world. So far at least 13 serologically distinct meningococcal capsular groups have been defined. Capsular groups A, B, C, W, X, and Y are responsible from the great majority of IMD.

Demographic risk factors for IMD include, geographic location, season, smoking, preceding influenza A infection, living in closed/semiclosed community, and travel to endemic countries. Major medical risk factors are sickle cell disease, functional or anatomic asplenia, complement deficiencies, preterm birth, HIV infection and other immunosuppressive conditions.

Several vaccines have been developed to prevent IMD. Today widely used vaccines contain monovalent (against serogroups A, B or C) and quadrivalent conjugate vaccines (against serogroups A, C, W and Y). World Health Organization recommends the immunization of individuals in countries which have a high (>10 cases per 100 000 population per year) or intermediate (2-10 cases per 100 000 population per year) endemicity. Immunization of only the individuals who have a higher risk of developing IMD is recommended for the countries with low endemicity (<2 cases/100 000 population/year).

The decision to include meningococcal vaccines in the routine immunization programmes varies by country. Factors such as incidence rates, peak age groups, serogroup distribution of the pathogen within the country and across different age groups are taken into account while deciding on immunization schedule. For example many countries in the African region use meningococcal A vaccines starting from 9 months of age, whereas most European countries use meningococcal C conjugate or B vaccines, and countries in the American or Eastern Mediateranean region mostly utilize quadrivalent conjugate vaccines. Impact of immunization programmes in other countries, combined with the epidemiology of IMD in Turkey may help us in determining whether meningococcal vaccines are needed to be added to Turkish immunization schedule.

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Immunization in Special Circumstances-Solid Organ Transplant

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The number of Solid Organ Transplant (SOT) recipients are continuously increasing, with life expectancy and lifestyle being closer to non-transplanted persons. In the United States, more than 33,500 SOT s have been performed annually in 2016 and transplants have increased 20% over 5 years. In Turkey, approximately nearly 5000 transplants have been made in year 2017 and numbers have increased over years. Infections constitute a major cause of morbidity and mortality in pediatric transplant recipients whose susceptibility to infections is increased owing to their need for life-long immunosuppressive treatment to avoid organ rejection. Prevention of systemic infections that can be more severe in this vulnerable patient population is therefore of vital importance. Vaccination is an essential strategy for reducing the rate of specific, potentially life-threatening, bacterial and viral infections. For these reasons, clinicians must understand the optimal vaccination schedule and the immunogenicity of vaccines to ensure the best immunization of their patients before and after transplantation. In this presentation the general principles and vaccine recommendations for pediatric solid organ transplantation patients pre-and post-transplantation under the light of recent literature are discussed.

Every effort should be made to ensure that the transplant candidate, household members and healthcare workers have completed the full complement of vaccines reccommended. Transplant candidates should be vaccinated early in the course of their disease because response to many vaccines diminishes in organ failure. Ideally, vaccination status should be documented by serological tests (Hepatitis B, Varicella, Measles, Mumps Rubella) at the pretransplant clinic and the patient should be vaccinated appropriately at the time of listing.

Inactive vaccines are generally safe when posttransplant vaccination is needed. Where data are lacking specifically for transplant candidates or recipients, recommendations made by national immunization advisory committees (e.g. the Advisory Committee on Immunization Practices [ACIP] in the United States) for the general population should be followed. Live Attenuated Viral Vaccines (MMR, Varicella) are generally not recommended after transplantation. When possible, vaccination at least 4 weeks prior to transplantation is recommended. Although the optimal time to give vaccines after transplantation is not known, most centers restart vaccinations at approximately *3–6 months* after SOT when baseline immunosuppression levels are attained.

Seroconversion should be documented by serologic assays for specific vaccines minimum 4 weeks after vaccination where serologic assays are available and protective titers are known. Serology may not be an accurate measure of immunity posttransplant, therefore further studies are needed to develop assays for cellular immunity. Level of immune response to vaccines is related to some factors determining absolute condition of immunosuppression: Level and type of immunosuppression, underlying diseases (renal insufficiency, liver insufficiency), and presence of graft rejection. The effect of the type of transplantation to the vaccine response is not known. After transplantation antibody responses to vaccines are weak as a result of imunosuppression to avoid rejection.

Although there are reports of graft rejection of vaccinated patients after SOT, it was showed that inactivated vaccines are not related to graft rejection and are safe to use after SOT. Inactivated vaccines recommended by guidelines before or after SOT are Diphteria, Tetanus, Pertussis, Poliovirus (inactive), Pneumococcal (conjugated and polysaccharide), *Haemophilus influenzae,* Influenza, Hepatitis B, Hepatitis A,

Meningococcal and Human papillomavirus vaccines. Live virus vaccines (MMR and Varicella vaccine) are generally not recommended in SOT recipients because of insufficient safety and effectiveness data, except for Varicella vaccine in children without evidence of immunity who are renal or liver transplant recipients, are receiving minimal or no immunosuppression, and have no recent graft rejection.

There are some studies that investigated serologic responses to both inactive and live vaccines in pre- and post-transplantation periods in SOT recipient children with highly variable results. However, there are no sufficient data on long-term responses and continued immunity in pediatric SOT recipients, and larger controlled studies are needed.

Key words: immunity, pediatric, solid organ transplantation, vaccination

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Immunization in Special Circumstances- Bone Marrow Transplant

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Immunization or vaccination is an important healthcare practice. The most important aim of vaccination is to protect against diseases that are high in mortality and morbidity, but also to provide herd immunity. If there is no contraindication before bone marrow transplantation (BMT), it is expected that the vaccines should be completed according to the national immunization schedule. Infections are an important factor influencing transplantation success and vaccination is the most effective way of preventing infections. The beginning of vaccination is associated with the time to regain the functions of mature T and B lymphocytes. Factors such as graft-versus-host disease, duration of transplantation, receiving immunosuppressive therapy should be considered in the construction of vaccination programmes after BMT. Vaccination should be started as soon as possible and at the most appropriate time. BCG and oral polio vaccines are contraindicated after BMT. Antibody levels decrease after autologous and allogenic BMT. Therefore revaccination may be needed after BMT. It is appropriate to investigate the antibody responses of the vaccinated individuals after transplantation and to re-evaluate the vaccination schedule in case of unresponsiveness. Vaccination schedule should be developed according to individual needs. Which vaccines, how many doses, the time between vaccines should be decided according to the characteristics of each patient. There are national and international guidelines for vaccination after BMT. On the other hand studies are needed on this subject.

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Adverse Childhood Experiences Survey Among University Students In Turkey - 2018

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There is a clear relationship between exposure to childhood traumatic events and negative health behaviors, and health status. The first comprehensive study was done by Felitti and colleagues in 1998 in the USA. In Turkey, the first study was conducted among university students by Ulukol and colleagues in 2013. After 5 years, this study was repeated with a larger sample group. The first objective of this study was to identify the prevalence of adverse childhood experiences (ACEs) in a large sample of university students, The second objective was to view of changing of ACE prevalences during the last 5 years in Turkey.

This is a descriptive cross-sectional study. 8033 students of 29 universities in 12 NUTs area in Turkey were enrolled in the study in 2018. The same questionnaire that it was used in the first ACE study in 2013 in Turkey. This questionnaire was modified from the ACE Questionnaire developed by CDC and Kaiser Permanente before the first study. The questionnaire has 6 different question categories such as sociodemographic characteristics, household dysfunctions, childhood maltreatment, health risk behaviors, somatic complaints, and health status.

40.2 % of the 8033 respondents were male and 59.8 % were female. The mean age of respondents was 20.9 years. The overall prevalence of childhood physical abuse, sexual abuse, emotional abuse, emotional neglect, and physical neglect was 19.1%, 6.9%, 8.9%, 6.6%, and 7.8% respectively.

The overall prevalence of domestic violence, divorced or separated parents, psychological problem or attempted suicide, alcohol addiction problem, street drug use and involvement in crime or imprisonment in household members was 15.2%, 6.9%, 9.5%, 5.5%, 2.4% and 8.3% respectively.

The ACE scores were calculated by adding up the number of ACEs. The questionnaire asked about 11 different types of adverse childhood experiences, including both child maltreatment and household dysfunction. The ACE scale therefore ranged from 0-11 and was based on the number of these items that respondents answered affirmatively to (Table 1). In the total group, 47.8% of the students had at least one ACE history. ACE scores were higher among male students than female. This difference was statistically significant ($p<0.001$).

Table 1: Frequencies of ACE scores according to the gender of students

ACE scores	Gender		Total %
	Male %	Female %	
0	46.9	55.8	52.2
1	25.2	22.1	23.3
2	14.2	10.7	12.1
3	7.1	5.7	6.3
4 +	6.6	5.7	6.1

The ACE score was positively associated with health risk behaviors of respondents. The risk of smoking, harmful alcohol drinking, alcohol drinking and drug using increased dependently on the ACE score.

All health problems and complaints asked in this survey and ACE scores had a clear relationship between each other. As the ACE score increased, the frequency of complaints was increasing. The frequency of those who expressed that the health perception was bad was also higher among the students with high ACE scores was higher.
When we compare of 2013 and 2018 studies, except for physical neglect and separated or divorced parents the prevalence of all maltreatment and household dysfunctions were 1 – 3 % lower in the last survey (Table 2).

Table 2: The prevalence of ACE between ACE studies 2013 and 2018

ACE categories	ACE 2013 %	ACE 2018 %
Child maltreatment		
Physical abuse	21.1	19.1
Sexual abuse	7.9	6.9
Emotional abuse	9.8	8.9
Emotional neglect	8,9	6.6
Physical neglect	5.7	7.8
Household dysfunction		
Domestic violence	18.4	15.2
Separated or Divorced Parents	5.2	6.9
Psychological Problem or Attempted Suicide	9.3	9.5
Alcohol Addiction Problem	6,4	5.5
Using street drug	3.4	2.4
Involved in the Crime or Imprisoned	10.3	8.3

As a conclusion, child maltreatment and other negative life experiences are a public health problem that affects children's health and the consequences of such behaviors continue throughout life. Adverse childhood experiences are a very important problem for children in Turkey. But the prevalences of almost all ACE categories, are lower than the result of ACE 2013 study. These results may be a reflection of studies in the field of child protection. Especially from the beginning of the 2000's, both institutional studies and civil society's work in this field may have a positive impact. However, there is not yet a national action plan to prevent violence against children. A national action plan should be established to prevent all forms of violence against children and to sustain their lives in safe and secure environments. Such the plan should include prevention programs, which emphasize who should do what with which resources.

Management of Food Refusal and Poor Appetite

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Common feeding or eating difficulties seen in clinical settings include: lack of interest in, or appetite for, food; delayed or absent development of feeding/eating skills, limited appetite, highly selective intake, avoidance or refusal of foods, diffucilty in swallowing.

Nutrition practice in the first 2 years of life forms the bases of lifelong eating behavior. Infants -who are genetically prone to sweet and salty tastes- tend to avoid sour and bitter ones. They prefer intense energetic foods and have instincts to refuse new nutrients. However, genetic predispositions change with experience. Exclusive breastfeeding for 6 months and meanwhile delaying introduction of complementary foods reduces unhealthy eating behaviors that could be faced during preschool years. Breastfeeding also enhances customization to different tastes and nutrients. Family attitude and role modelling have a decisive influence on getting used to different taste and texture of different nutrients.

The development of healthy eating behavior requires a healthy eating environment and relationship. Parental feeding practices are based on well-described parenting and feeding styles. These styles are influenced by cultural norms, parental concern, and child characteristics. Preferred style is the “responsive feeder”. Responsive feeders follow the concept of a division of responsibility; the parent determines where, when, and what the child is fed; the child determines how much to eat. Responsive feeders guide the child’s eating instead of controlling it.

Interpretation of an infant/child with a suspected feeding/eating difficulties include:
- Food consumption
- Behaviour during mealtime
- Outcomes (growth disturbance, macro and micro nutrient deficiencies, etc).

In the management and treatment of feeding disorders, it is extremely important to differentiate between organic and nonorganic causes of the feeding problem. A basis medical evaluation including anamnesis of feeding process and planning of diagnostic tests, nutritional counseling and supplemantation should be performed by pediatrician. The important elements to be highlighted in nutritional counseling are:
- Developing a meal-time routine
- Planning three main meals and 2-3 snacks, avoiding food fillers
- Encouraging new foods (remembering that it may take up to 15 offerings before a child can be confidently determined to be refusing that food and giving up)
- Considering nutritional supplementation

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Use of Multivitamin/Mineral Supplements

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Nutritional disorders are still among the most common health problems in children worldwide. Micronutrients include vitamins and trace elements. Micronutrient deficiencies have an important place among nutritional disorders. Although micronutrients are daily required in very small amounts, they are very important because they are present in many enzyme and hormone structures, they play a role in growth and development, and they are necessary for the functioning of the many tissues such as reproductive and immune systems. Therefore, micronutrients should be taken in sufficient amounts in the early childhood with growth spurt, as well as during pregnancy and breastfeeding periods.

Iron deficiency is the most common micronutrient deficiency in the world and is associated with iron-deficiency anemia and neurocognitive deficits. Iron requirements are higher during infancy and early childhood as compared to later life. Breast milk provides optimal amounts of micronutrients for infants except iron and vitamin D. Iron present in animal protein as the heme moiety is more bioavailable than that found in vegetables and other foods. Since 2004, Turkey Ministry of Health has recommended iron supplementation to term infants from 4th months (10 mg /day) and to preterm infants from second month of life (2 mg/kg/day) until 12 months of age. Because the frequency of iron deficiency anemia in pregnant women is around 50%, 40-60 mg/day elementary iron supplementation is recommended for pregnant women starting from the 4th month of pregnancy until 3th months after delivery.

Zinc deficiency is also widespread in the developing countries and is associated with increased risk for stunting, impaired immune function, and increased risk for respiratory and diarrheal diseases. After 6 months of age, iron and zinc are required from complementary foods, such as pureed vegetables with meats. Diets rich in phytates bind zinc and impair absorption. Zinc supplementation to children at risk reduces the incidence and severity of diarrhea and pneumonia.

The main function of iodine in the body is the synthesis of thyroid hormones. The developing brain is particularly vulnerable to the consequences of certain micronutrient deficiencies like iodide and iron. Symptomatic iodine deficiency such as goiter and hypothyroidism is common in many developing countries. Turkey has been accepted among countries with endemic iodine deficiency before 2004. After widespread use of iodized salt, iodine deficiency rate decreased significantly. However the use of iodized salt was found to be 73% in a study carried out in 900 school children in 30 provinces of Turkey in 2009.

Vitamin D is necessary for calcium and bone metabolism, but is also an important for other tissues and organ systems. Vitamin D is synthesized in the skin by the aid of sunlight. Breast milk and unfortified foods are poor sources of vitamin D. Sunlight exposure varies by season. Therefore, vitamin D supplementation is required to achieve optimal status for especially small children. The goal is to achieve serum levels of 25(OH) D levels above 30 ng/dl. Vitamin D supplementation of 400 IU/day was recommended for all breast-fed infants and 600 IU/day for toddlers especially in winter periods.

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Table 1. Recommended dietary allowances of some elements.

Age group	Calcium (mg/d)	Copper (µg/d)	Iodine (µg/d)	Iron (mg/d)	Selenium (µg/d)	Zinc (mg/d)
Infants						
0–6 mo	200	200*	110	0.27	15	2
6–12 mo	260	220*	130	11	20	3
Children						
1–3 y	700	340	90	7	20	3
4–8 y	1,000	440	90	10	30	5
Males						
9–13 y	1,300	700	120	8	40	8
14–18 y	1,300	890	150	11	55	11
19–30 y	1,000	900	150	8	55	11
31–50 y	1,000	900	150	8	55	11
51–70 y	1,000	900	150	8	55	11
> 70 y	1,200	900	150	8	55	11
Females						
9–13 y	1,300	700	120	8	40	8
14–18 y	1,300	890	150	15	55	9
19–30 y	1,000	900	150	18	55	8
31–50 y	1,000	900	150	18	55	8
51–70 y	1,200	900	150	8	55	8
> 70 y	1,200	900	150	8	55	8
Pregnancy						
14–18 y	1,300	1,000	220	27	60	12
19–30 y	1,000	1,000	220	27	60	11
31–50 y	1,000	1,000	220	27	60	11
Lactation						
14–18 y	1,300	1,300	290	10	70	13
19–30 y	1,000	1,300	290	9	70	12
31–50 y	1,000	1,300	290	9	70	12

Table 2. Recommended dietary allowances of some vitamins.

Age Group	Vitamin A (µg/d)	Vitamin C (mg/d)	Vitamin D (µg/d)	Thiamin (mg/d)	Vitamin B_6 (mg/d)	Folate (µg/d)	Vitamin B_{12} (µg/d)
Infants							
0–6 mo	400	40*	10	0.2	0.1	65	0.4
6–12 mo	500	50*	10	0.3	0.3	80	0.5
Children							
1–3 y	**300**	**15**	**15**	**0.5**	**0.5**	**150**	**0.9**
4–8 y	**400**	**25**	**15**	**0.6**	**0.6**	**200**	**1.2**
Males							
9–13 y	**600**	**45**	**15**	**0.9**	**1.0**	**300**	**1.8**
14–18 y	**900**	**75**	**15**	**1.2**	**1.3**	**400**	**2.4**
19–30 y	**900**	**90**	**15**	**1.2**	**1.3**	**400**	**2.4**
31–50 y	**900**	**90**	**15**	**1.2**	**1.3**	**400**	**2.4**
51–70 y	**900**	**90**	**15**	**1.2**	**1.7**	**400**	**2.4**[h]
> 70 y	**900**	**90**	**20**	**1.2**	**1.7**	**400**	**2.4**[h]
Females							
9–13 y	**600**	**45**	**15**	**0.9**	**1.0**	**300**	**1.8**
14–18 y	**700**	**65**	**15**	**1.0**	**1.2**	**400**[i]	**2.4**
19–30 y	**700**	**75**	**15**	**1.1**	**1.3**	**400**[i]	**2.4**
31–50 y	**700**	**75**	**15**	**1.1**	**1.3**	**400**[i]	**2.4**
51–70 y	**700**	**75**	**15**	**1.1**	**1.5**	**400**	**2.4**[h]
> 70 y	**700**	**75**	**20**	**1.1**	**1.5**	**400**	**2.4**[h]
Pregnancy							
14–18 y	**750**	**80**	**15**	**1.4**	**1.9**	**600**[j]	**2.6**
19–30 y	**770**	**85**	**15**	**1.4**	**1.9**	**600**[j]	**2.6**
31–50 y	**770**	**85**	**15**	**1.4**	**1.9**	**600**[j]	**2.6**
Lactation							
14–18 y	**1,200**	**115**	**15**	**1.4**	**2.0**	**500**	**2.8**
19–30 y	**1,300**	**120**	**15**	**1.4**	**2.0**	**500**	**2.8**
31–50 y	**1,300**	**120**	**15**	**1.4**	**2.0**	**500**	**2.8**

Role of The Gut Microbiota In Functional Gastrointestinal Disease

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The term microbiota refers to the sum of all microbial communities living in or on the human body. The human gut mainly the large intestine harbors the greatest numbers of microbiota in the body when compared to other human body niches such as the skin, vagina, mouth, and ears. Humans have more than 10^{14} symbiotic organisms in the distal small intestine and colon, and 10–100 times more bacterial cells than body cells. Particularly, after bacterial colonization in infant, intestinal microbial composition is unique for each individual, although more than 95 % can be assigned to four major phyla: Firmicutes, Bacteroidetes, Actinobacteria and Protecteobacteria. But the various body habitats, e.g. saliva, skin, and gut have some specific bacteria which will be found among all individuals, in varying abundance. The development of the intestinal microflora starts at birth, the early life development of the infant gut microbiota plays an important role in the maturation of the host immune system such as immune activity of resistance to pathogen colonization and improving mucosal barrier function; metabolic functions such as fermentation of indigestible fibers resulting in the production of short chain fatty acids (SCFA), trophic activity such as stimulation of angiogenesis, effect on intestinal motility by maintaining motor and sensory functions. The gut microbiota are considered to have an important role in maintaining health, and early microbiota colonization may influence the occurrence of later diseases. The diversity and colonization pattern of infants gut microbiota during first year of life are influenced by numerous factors and the changes in the composition of the gut microbiota (dysbiosis) may be associated with several clinical conditions such as atopic diseases, obesity, metabolic sydrome, necrotizing enterocolitis, chrohn disease, and functional gastrointestinal diseases (e.g. colic, constipation).

A Multinational Working Team developed criteria for functional gastrointestinal disorders known as the "Rome IV" criteria. In early childhood, functional constipation (FC) is defined by the presence of at least two of the following symptoms occurring at least one month, which are not explained by another medical condition. 1) two or fewer defecations per week; 2) history of excessive stool retention; 3) history of painful or hard bowel movements; 4) history of large-diameter stools; 5) presence of a large fecal mass in the rectum. In toilet-trained children, the following additional criteria may be used:1) at least one episode/week of incontinence after the acquisition of toileting skills; 2) history of large-diameter stools that may obstruct the toilet. The etiology of FC is still incompletely understood but is likely to be multifactorial. Some important factors in children include: withholding behavior of stools, psychosocial factors, behavioral disorders, parental child-rearing attitudes, low fiber intake, and the gut microbiota composition. Stool consistency is strongly associated with gut microbiota richness and composition, enterotypes and bacterial growth rates. In the last decades, only a few studies reported on microbiota in children with constipation. These studies gave different results, which might be caused by the differences in study populations. Two studies were conducted in otherwise healthy children with FC while another study was conducted in obese children. One study found a significant increase in clostridia and bifidobacteria in children with FC compared to healthy children. An increased abundance of bifidobacteria was confirmed in constipated children. In obese children with FC, this effect was not seen. In this study population, a significant decrease of Prevotella and increase in several genera of firmicutes was seen. These differences may be explained by obesity, which has been associated with a particular gut microbiota composition. In practice, the population of children with constipation is very heterogeneous; therefore, it may be useful to link altered gut microbiota signatures to specific subgroups of children. The hypothesis that probiotics may have therapeutic potential for the treatment of constipation is supported by data demonstrating differences in the intestinal microbiota between healthy individuals and patients with chronic constipation. Administration

of Bifidobacterium or Lactobacillus has also been shown to improve colonic transit times in constipated patient. Only a few clinical trials have addressed the use of probiotics for constipation, with mixed results. A randomized trial in 60 children found that the addition of Lactobacillus sporogenes to mineral oil increased stool frequency and reduced straining and soiling as compared with children treated with mineral oil alone. Furthermore, a large trial found that Lactobacillus reuteri given prophylactically to young infants helped to prevent the development of constipation during the first three months of life. However, negative results were reported in another randomized trial, in which 84 children were randomized to lactulose plus Lactobacillus rhamnosus GG or a lactulose-containing placebo for 12 weeks. There were no differences between the experimental and control groups in terms of spontaneous bowel movements or fecal soiling at 12 or 24 weeks of follow-up. Similarly, a trial in 94 preschool-aged children found no difference in defecation frequency for children receiving Lactobacillus casei rhamnosus Lcr35 compared with placebo. The evidence available from controlled trials in children and adults is insufficient to support a recommendation about use of probiotics to treat constipation in children, or to identify the most effective strain, dose, or treatment duration.

The Rome IV criteria, which classify infantile colic as a functional gastrointestinal disorder in infants from birth to five months of age, require all of the following: 1) age <5 months when the symptoms start and stop; 2) recurrent and prolonged periods of crying, fussing, or irritability that start and stop without obvious cause and cannot be prevented or resolved by caregivers; 3) no evidence of poor weight gain, fever, or illness; 4) caregiver reports crying/fussing for ≥3 hours per day on ≥3 days/week in a telephone or face-to-face interview; and 5) total daily crying is confirmed to be ≥3 hours when measured by at least one prospectively kept 24-hour diary. The etiology of colic is unknown. It probably represents a final common pathway for numerous contributing factors. Alterations in fecal microflora may play a role in infantile colic. Several observational studies have demonstrated differences in intestinal microflora between infants with colic and control infants, particularly Klebsiella species, anaerobic gram-negative bacteria, coliform bacteria, Escherichia coli, and Lactobacillus species (L. Brevis and L. lactis). One study also found a two fold increase in fecal calprotectin, a marker of intestinal neutrophil infiltration, among colicky infants compared with controls. Others have noted decreased fecal calprotectin levels as colicky symptoms improved over time or in response to L. reuteri therapy. The role of fecal microflora in colic is supported by randomized trials comparing L. reuteri and placebo in breastfed or predominantly breastfed infants. Treatment with L. reuteri was associated with a greater reduction in crying per day, increased fecal Lactobacilli, and decreased fecal *E. coli*, suggesting that *L. reuteri* may promote gut health by reducing E. Coli colonization. But it has not been suggested probiotics for the prevention and routine management of colic.

Use of Nutritional Supplements

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Nutritional supplements are vitamins, minerals, essential fatty acids (ω-3, ω-6), amino acids and herbal products, which are usually used to support the diet for different reasons. An adequate and balanced nutrition diet usually does not require the use of nutritional supplements. However, it may be necessary to use nutritional support products in some cases; diet fed with insufficient energy, those who cannot provide adequate and balanced nutrition for economic or psychological reasons, infants (prevention of vitamin D and iron deficiency, breastmilk supplements in premature infants), pregnant and lactating women (iron, folate, vitamin B12 and vitamin D), menopausal women, elders, vegetarians (especially vegan) and conditions requiring special nutrition therapy for loss, absorption or metabolic reasons.

The main purpose of using nutritional supplements is to complete the lack of macro and/or micro nutrients. Malnutrition and growth retardation may develop in cases where energy and macro nutrient requirements are increased, inadequate nutrition or malabsorption. In such cases, early recognition of the need of the child and start of adequate nutritional support are necessary for healthy development. Especially, the supplementation of nutrients to young, malnourished children may provide them with necessary resources for rapid brain development during the first year of age.

Unnecessary nutritional supplement use rate among healthy children and adolescents is surprisingly high. Despite uncertain benefits and possible harms (wrong and overdose consumption) nutritional supplements are the most commonly used all over the world. The study using nationally representative data (1999 to 2012) from the National Health and Nutrition Examination Survey (NHANES) showed that about a third of children and adolescents use dietary supplements and multivitamins were the most common nutritional product, followed by omega-3 fatty acids. Reasons for supplement use included perceived short-term health benefits, prevention of illness, improved immunity and better sports performance.

Health educators should be aware that adolescents and parents seek specific health benefits from nutritional supplements, which may be better achieved through appropriate consumption of a nutritious diet.

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The First 1000 Days: Promoting Healthy Eating Habits Early in Life

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Optimum child development needs health, nutrition, security, safety, loving care and learning. This nurturing environment should be present from before pregnancy and onwards. The first 1000 days between conception and a child's second birthday has been identified as the most crucial window of opportunity for interventions (1). It represents an important period to implement interventions to ensure healthy nutrition and development (2).The right nutrition during this period can positively affect a child's ability to grow, learn, and rise out of poverty, and therefore, shape a society's long-term health, stability and prosperity (3).

Evidence from literature supports the association between off-spring' s metabolism and maternal nutrition during the gestational period. Both maternal undernutrition and over nutrition during pregnancy have been found to lead to impaired programming and consequent higher risk for childhood obesity and non communicable diseases (4). Promoting healthy diet and prevention of macro- and micro-nutrient deficiencies in pregnant women should be a cornerstone of public health. Flavor learning in children starts in utero. Flavors consumed by mother appear in amniotic fluid and after birth infants prefer flavors previously experienced in amniotic fluid. The choices and variety of food consumed during pregnancy have lifelong effect in children's diet. Flavor learning continues when infants experience the flavors of the mother's diet transmitted in breastmilk (5). Breastmilk is the normative standard for infant feeding and nutrition; short-term and long-term advantages of breastfeeding are well-documented. World Health Organization recommends exclusive breastfeeding up to six months of age, with continued breastfeeding along with appropriate complementary foods up to two years of age and beyond (6). At weaning, infants show greater liking for and acceptance of flavors and foods to which they have had exposure. Breastfed infants were more accepting of fruits and vegetables than formula-fed babies, but only if their mothers regularly ate these food themselves (5).The ease of accepting new foods change with age and the first two years of life reported to be essential in the development of healthy eating habits later in life (7).

Parents mainly decide the content of the diet and shape their offspring's eating behavior by transmitting to their children their attitudes and beliefs about food and feeding. The way they interact with their children will also influence their eating behavior. Parenting styles are associated with the development of healthier eating habits in two years of life (7). Children who are raised with caregivers who model healthy eating behaviors, such as diet rich in fruit and vegetables establish food preferences that include fruit and vegetables in the first two years (8).

As conclusion, the first 1000 days is an opportunity for promoting healthy eating habits early in life. The importance of a varied and adequate diet for both pregnant and lactating women must be emphasized. Breastfeeding influences later flavor acceptability. Children at weaning look to their mothers to learn what and how to eat. Healthy food choices of parents and repeated exposure of foods are positively correlated with their children's intake of healthy foods.

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Breastfeeding Problems: Clinical Case Studies

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Breastfeeding is the main condition for the health and development of the child. Many organizations, such as the WHO and UNICEF, recommends exclusive breastfeeding starting within one hour after birth until a baby is 6 months old and that breastfeeding should be continued until at least 2 years of age. However, the problems occurring during this period have a negative impact on the duration of breastfeeding. The most common problems are inadequate milk, cracked and sore nipple, flat or inverted nipple, engorgement, plugged ducts, mastitis and breastfeeding refusal. Prevention and / or resolution of these problems will enable the babies to get breast milk for a long time and thus lead a healthy life. The most common breast-feeding problems in this presentation were discussed with the cases.

DECEMBER 1st, 2018

The Epigenetic Effects of Child Neglect And Abuse

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Adverse Childhood Experiences

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In last two decades, many research findings showed that there is strongly relation between early life stress and some health problems in adulthood. Health problems associated with childhood adversity include; psychological problems, health risk behaviours such as smoking and drug using, muskuloskeletal problems, obesity, risky sexual behaviours and high risk for early mortality.
In 1998, Felitti and colleagues investigated advers childhood experiences and associated health problems in adulthood in CDC-Kaiser Study. In Adverse Childhood Experiences(ACE) Study, the adversities contain into two broad stress categories as child maltreatment and household dysfunctions.
Defining categories of adverse childhood experiences:
In child maltreatment category there are physical abuse, sexual abuse, emotional abuse, physical and emotional neglect;
〈 Physical abuse: to use physical force against the child in a manner that harms or damages the child's health, life, development.
〈 Sexual abuse: to involve of a child in sexual activity that he or she does not fully comprehend, is unable to give informed consent to, or else that violates the laws or social taboos of society.
〈 Emotional abuse: Emotional and psychological negligence and abuse involve a pattern of failure of a parent or caregiver to provide an appropriate and supportive environment.
〈 Physical neglect: The failure to provide the child with basic necessities such as nutrition, housing, clothing, and cleaning.
〈 Emotional neglect: The failure to provide emotional support to the child by maximizing his development, keeping with his potential.
Household dysfunction includes domestic violence, separated or divorced parents, having a family member who has a psychiatric disorder, alcohol or drug misuse, or being imprisoned.

Effect of Adverse Childhood Experiences
Adverse childhood experiences are very important cause of high level of stress for children. Harmful effect of stress disrupt child's neurodevelopmental process. Children who experience more adverse events are more likely to develop risky behaviours for their health such as smoking, drinking alcohol or antisocial behaviour. Adverse childhood experiences can negatively affect neurological, endocrine and immune system. These problems of the biological systems are strongly related with diseases, disabilities and social problems in aduldhood.

Early Childhood Interventions: Global Perspective

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It is estimated by the World Health Organisation (WHO) that over 250 million children have developmental disabilities and fail to reach their full human potential. And that costs society in terms of an estimated 20% loss in adult productivity. If we look at the literature, we can see that 12 to 15 percent of children have at least one developmental delay. But if we think about some risk factors especially common in low income settings, such as malnutrition, iron deficiency or lack of proper stimulation for development and poverty; these frequencies may increase.

Most of low or middle income countries have policies that include children with developmental disabilities but often disabitity is **'not pirority'** for programs. There is lack of technical expertise, especially in rural and low resources areas. Data and statistics sometimes does not exist and also services may not be enough. Unfortunately focus tends to be on physical disabilities and rarely other kinds of disabilities are thought. And on the top of all of these, myths and supertitions related to developmental disabilities can exist in rural settings. And stigma and attitudes towards developmentally delayed children could be a problem.

The 2016 Lancet Early Childhood Development Series highlights early childhood development at a time when it has been universally endorsed in the 2030 Sustainable Development Goals. The Series emphasises the importance of "Nurturing Care Framework", especially for children below three years of age. The multisectoral approach is a key factor for this framework. Interventions should start 'early' (from pregnancy to the age of 3). Nurturing Care Framework also draws attention to preconception health particularly in communities where the women are vulnerable. Interventions for family planning and birth spacing are so important. Early learning and stimulation are also crucial. Starting early helps to mitigate developmental risk factors outweighed protective factors for development. The earlier we start, the more we can achieve to mitigate inequalities. Responsive caregiving should be integrated to our well baby visits. Furthermore, we should not focus on child alone, we also need to concentrate on the resources and well-being of parents or caregivers. For promoting caregivers competency, maternal postnatal depression should always be kept in mind.

Multiple risk factors can cause developmental delays. If we tackle multiple risk factors together, we will be more successful. For example; nutrition is very important for healthy child development. On the other hand, if we use nutritional approach alone, we are not expected to be successful. If we combine nutrition and stimulation, we will see an amplified effect. The health worker can integrate both related messages to boost child development in the life course.

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Early Identification and Assessment of Children at Risk

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Neurodevelopmental disorders are prevalent both in developed and developing countries and constitute an important burden for the societies. Its prevalence is reported between 10-20 % in developed countries, it is estimated that there are 250 million children who cannot achieve his developmental potential in developing countries. So both prevention and early diagnosis will be a great contribution for the person, family and society.

Epidemiologically risk can be defined as the chance or likelihood of an undesirable event or harm (injury, disability, loss etc.) that will occur, as a result of internal (genetic) or external (environmental) factors that could be prevented by taking appropriate measures. Development, during this speech will refer to the increase in functionality in motor, communication, cognitive and social-emotional domains.

During child health supervision the first step of early diagnosis is risk assessment. Risks can be classified or assessed according to duration, severity, life time of onset, number, or characteristics (biological, physical, chemical etc). While assessing risks the resilience factors of child and family should also be assessed.

The concerns of family are next to be discussed. We have to accept, understand and approach the concerns relevantly. These should be complemented with physical examination.

Development should be monitored continuously which is developmental surveillance by asking risks, concerns and observing the child at each and every health care visit. However, combining surveillance with developmental screening will increase the probability of early diagnosis of developmental delay and referral to rehabilitative services twice as much.

During 2018 WHO and UNICEF launched the “Nurturing Care Framework” which classified the vital factors for early childhood development under good health, adequate nutrition, responsive parenting, security and safety and opportunities for early learning. This framework would be an excellent guide for assessing risks and planning interventions for early childhood development.

There are several screening test for development. It is most vital to use a valid, reliable, easily applied test that the clinician is competent.

Promoting Early Childhood Development

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Early childhood development programs vary in coordination and quality, with inadequate and inequitable access, especially for children younger than 5 years. Although global attention to early childhood development has been established through its inclusion in the UN Sustainable Development Goals, 250 million children (43%) younger than 5 years in low-income and middle-income countries are at risk of not achieving their developmental potential.

There is therefore an urgent need to increase multisectoral coverage of quality programming that incorporates health, nutrition, security and safety, responsive caregiving, and early learning. Although the health system working well in our country, it cannot support the development of children effectively due to the openness in the system after one year of age. Moreover, due to the lack of mandatory preschool education, early childhood development support in the first five years of life is still incomplete.

In this presentation, we aim to discuss and share our experience on early childhood development.

Parents' Role in Promoting Infant Mental Health, Attachment

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Infants are dependent on their caregivers to meet their needs starting from delivery. Early social and emotional experiences of infants influence all aspects of their development—cognitive, physical, social, and emotional including infant mental health. On the other hand, early toxic stressful influences can affect the infant through modification of gene expression, with epigenetic changes, such as DNA methylation and histone acetylation. These changes will produce long-lasting effects on the health and well-being of the infant and may be passed on to future generations. Therefore, the development of healthy social and emotional behaviors between the infant and his/her caregivers is the key to preventing and treating the mental health problems of the infant and their families.
As shown in Figure 1, Ecobiodevelopmental framework summarizes how the ecology of childhood including social and physical environments interacts with biologic processes to determine outcomes and life trajectories.

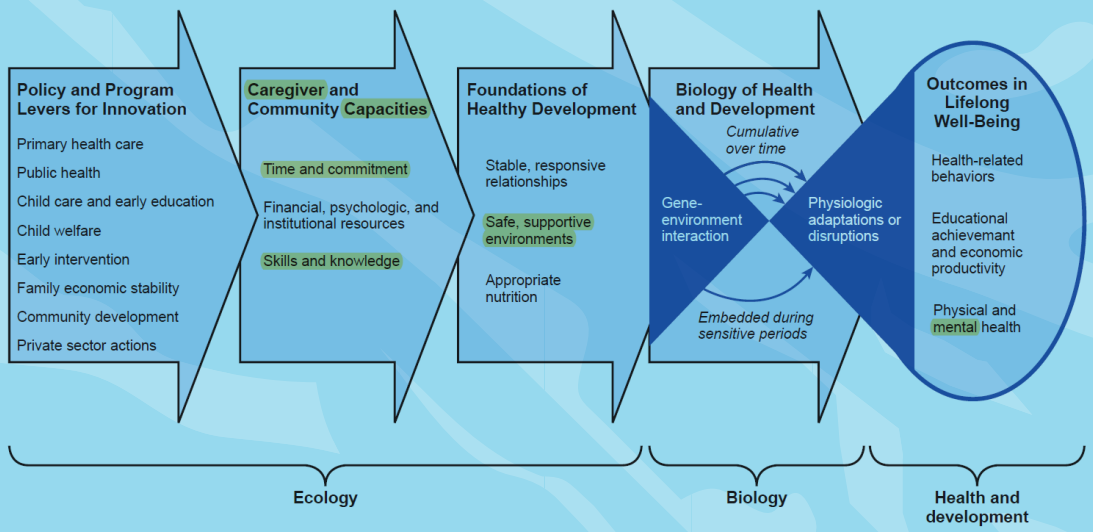

Figure 1. Determinants of mental health from Ecobiodevelopmental Framework for Early Childhood Policies and Programs *(*Pediatrics *129(1):e232–e246, 2012.)*

Infant and child mental health can be defined as: "The developing capacity of the child from birth to three/five years of age to form close and secure adult and peer relationships, experience, manage and express a full range of emotions, and explore the environment and learn - all in the context of family, community and culture". Therefore, infant mental health refers to how well a child develops socially and emotionally from birth to three.

Mother-child attachment bond is outlined as "a set of internal behaviors that would cause the infant to become closely related to his/ her main caregiver, who is usually the mother". Bonding is the process of forming an attachment.

When an infant shows its positive emotional states (e.g., joy, excitement) and negative emotional states (e.g., fear, anger) to the caregiver, an emotionally and physically healthy mother/caregiver feels a physical

desire to hold, rock, sing, smell, cuddle, coo and gaze at her infant and responds her infant. In turn the infant replies with snuggling, babbling, smiling, sucking and clinging. This reciprocal positive feedback loop can be termed as “maternal-infant dance” (Figure 2). This dance occurs in episodes of right brain-to-right brain visual-facial, tactile-gestural, and auditory-prosodic affective transactions. By this way attachment develops.

The attachment bond has several key elements: (1) an attachment bond is an enduring emotional relationship with a specific person; (2) the relationship brings safety, comfort, soothing and pleasure; (3) loss or threat of loss of the person evokes intense distress. This special form of relationship is best characterized by the maternal-child relationship.

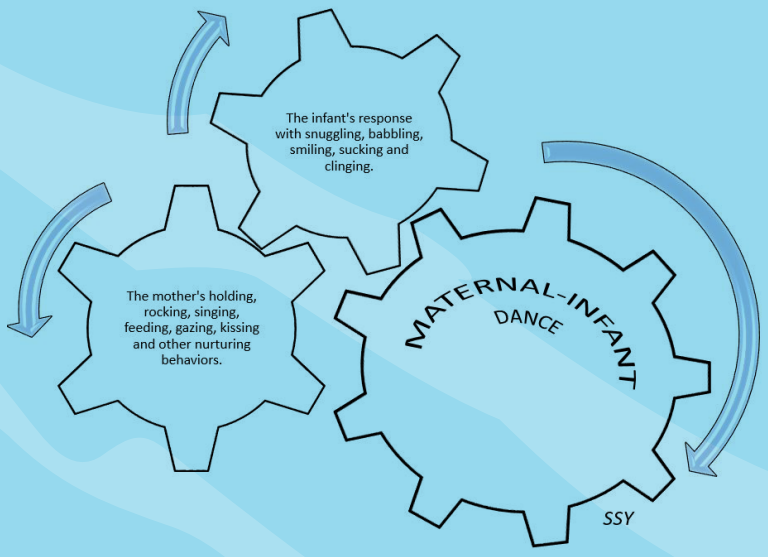

Figure 2. Maternal-infant dance

Some social and emotional indicators of attachment is given in Table 1. The consistent availability of a trusted caregivers to meet the infant’s urgent needs creates the conditions for secure attachment. Secure attachment also positively affects the development of the hypothalamic pituitary axis, which regulates stress.

Table 1. Social and Emotional Indicators of Attachment

Age Range	Attachment Trust/Security
Infant (Birth to 15 months)	Newborns recognize human language and prefer their own mother’s voice Prefer human faces Early social interaction is a smile and mutual gazing Crawls away but checks back visually; calls, and gestures to ensure adult contact Stretches arms to be taken Prefers familiar adults Acts anxious around strangers Uses a blanket or stuffed toy for security and reassurance
Toddler (12 mos. to 2 1/2 years)	Relates to others by exploring things with them Pulls up, stands holding furniture, then walks alone Goes through a phase of clinging to primary caregiver Experiences periods of intense feelings when separating or reuniting with a parent Sees others as a barrier to immediate gratification

The attachment relationship could be affected by different factors like nationality, cultural, mental and social conditions and individual's past; namely women who have not experienced a secured attachment during their childhood might encounter problems in developing an attachment to their infant (Figure 3).

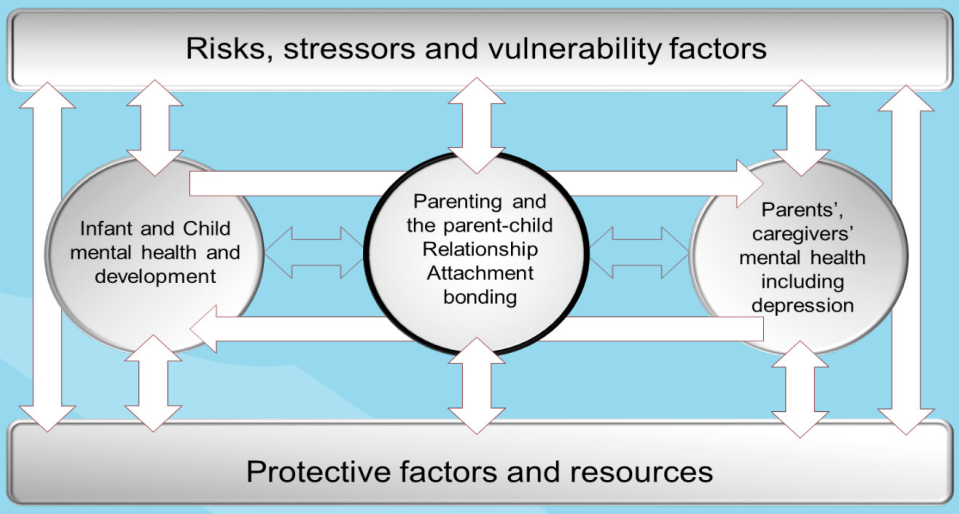

Figure 3. Crossing bridges family model with attachment. (adapted from Falkov, 1998)

Although attachment concept was first introduced for the post-partum period, attachment between parents and their infants is believed to start long before birth, during the antenatal period. . Also, prenatal attachment is associated with mother-infant post-partum interactions and communications [13
Therefore, the clinician should start to evaluate risk factors for attachment and sources of social support since the first antenatal visit. A prenatal pediatric visit allows clinicans/pediatricians to assess potential threats to bonding including unwanted pregnancy, history of maternal depression or serious mental illness, parental drug and/or alcohol abuse, serious illness of loss of siblings, financial stress or job loss, absence of social support, presence of violence.

A pediatrician/clinician can support healthy newborn development in several ways. To assess and to improve "parent–infant attachment" different guidelines were implemented (Table ….). Attachment Parenting International identified eight principles of attachment parenting. Sears defined seven B's of Attachment Parenting. Seven tips for better bonding was described. In summary, attachment parenting was defined by different authors and mainly included "birth–bonding, breastfeeding, baby wearing, bed sharing, and being responsive".

Following birth, neonates are alert and ready to interact and nurse. This first alert-awake period may be affected by delivery type and procedures. Both immediate skin-to-skin contact and postponing routine procedures provide birth-bonding. Neonates are nearsighted from the breast to the mother's face and preferentially turn toward a female voice. This social interaction usually lasting about 40 minutes, is followed by a period of somnolence.

Early initiation of breastfeeding support attachment. As shown in Table 2, "Baby Friendly Hospital Initiative" provides almost all Attachment Parenting Styles.

Providing constant, loving care states to advocate against childcare for more than 20 hours a week for babies younger than 30 months old. Caregivers/mothers are encouraged to create a support network, live a healthy lifestyle, and prevent parenting burn-out.

Pediatricians may detect postpartum depression using the Edinburgh Postnatal Depression Scale at well

child visits during the 1st yr.
Caregivers should be evaluated for red flags including “overwhelming breastfeeding struggles”, “expressions of anger directed toward the infant”, “unhealthy parenting behaviours about attachment”, “parents who do not set firm, loving boundaries”. Also an infant with “inconsolable irritability”, “chronic eating or sleeping difficulties”, “easily startled or alarmed by routine events” and “flat affect (shows little to no emotion at all)” should be assessed for mental health.

The attachment relationship between infant and caregiver(s) is crucial to healthy development and detailed evaluation and anticipatory guidance is part of Child Care Visits.

Table 2. Some “Attachment Parenting” guidelines during the first year of life

Attachment Parenting International	Sears’s seven B’s of Attachment Parenting	7 Tips For Better Bonding	Baby-friendly Hospital Initiative
Prepare for pregnancy, birth, and parenting	Birth bonding.	Delay routine procedures	Step 3: Antenatal information: Step 4. Immediate postnatal care: Facilitate immediate and uninterrupted skin-to-skin contact
Feed with love and respect: Breastfeeding	Breastfeeding	Let your baby breastfeed right after birth	Step 4. Immediate postnatal care: support mothers to initiate breastfeeding as soon as possible after birth. Step 5. Support with breastfeeding
Respond with sensitivity.	Read and respond to your baby’s cues	Gaze at your newborn Talk to your newborn	Step 8. Responsive feeding
Provide nurturing touch: skin-to-skin touching and “baby-wearing”.	Babywearing	Touch your baby Stay connected	Step 4. Kangaroo mother care
Engage in nighttime parenting: “co-sleeping” Provide constant, loving care Practice positive discipline	Bedding close to baby	Room in with your baby	Step 7. Rooming-in
Strive for balance in personal and family life.	Balance and boundaries Beware of baby trainers		Step 10. Coordinate discharge so that parents and their infants have timely access to ongoing support and care.

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Responsive Parenting, Child Discipline Methods

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Consistent sensitivity from parents is very important for infants' development. Parents should try to be sensitive to their infants as this will help their infant to have the optimal development. Parental sensitivity is defined as: " a parent's ability to be in tune with their infant's cues and signals and respond correctly and consistently". It includes providing support and care during distress and being prompt. Infants learn best when interacting with others who are aware of them and responsive to them. Sensitive parents provide a secure base from which children can explore their environments – and thereby learn. Research shows tremendous benefit to children when parents interact responsively and supportively.

One of the most well known benefits of sensitive parenting is better cognitive development of their infants. It is shown that infants learn language more rapidly when caregivers respond promptly and contingently to what babies do (Tamis-Lamonda et al 2014). Young children develop better problem-solving ability, attention skills, and school readiness when their parents are sensitive and responsive (Landry et al 2003; Landry et al 2006; Yousafzai et al 2016). With sensitive parents, children feel secure and confident thus they spend more time exploring and experiencing different situations that foster cognitive development.This security allows the child to concentrate and master new skills.

Supportive sensitive parenting can possibly reverse the effects of adverse events and stress in a child's life. Researchers followed preschool children (aged 3 – 6 years) for five to ten years and obtained MRI brain scans at early adolescence. Poverty adversely affected brain growth, but these effects were mediated by positive caregiving.

There are three main parenting styles, namely authoritarian, permissive and authoritative. Authoritarian parents demand a sort of blind obedience from their children whereas permissive parents are reluctant to impose rules and standards, preferring to let their kids regulate themselves.

Authoritative parents take a different, more moderate approach that emphasizes setting high standards, being nurturing and responsive, and showing respect for children as independent, rational beings. Authoritative parents want to encourage independence in their kids. But they also want to foster self-discipline, maturity, and a respect for others.

Warm, responsive parenting promotes secure attachments, and protects kids from developing internalizing problems. The children of authoritative parents are less likely engage in drug and alcohol use, juvenile delinquency, or other antisocial behavior. These children have better problem solving skills, and improved emotional health.

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Early Childhood Sleep Problems

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Sleep is regulated by two overlapping systems-the circadian system and sleep/wake homeostasis. Sleep/wake homeostasis refers to a neurophysiological drive to sleep after long periods of wakefulness and drive to wake after long periods of sleep. The circadian system is driven by the circadian clock located in the suprachiasmatic nucleus in the ventral hypothalamus. This biological clock is synchronized by daily environmental cues, of which light is the most powerful one. Melatonin levels are low at 12-16 weeks, but by 6 months they stabilize. Exposure to morning light decreases daytime melatonin which highlights the importance of behavioral routines. Children should be exposed to bright light in the morning and encouraged to play outside during the day. Bedtime routines assist children to prepare for sleep, and involve relaxing activities before bed, such as a bath, and reading stories. The sleep environment should be calm, quiet, dark, and at ideal room temperature without TV. Nap times should not be too late in the afternoon, thus making children less sleepy at bedtime.

Although there are age related sleep recommendations, adequate sleep is best defined as the number of hours of sleep that a child requires to be well-rested and function optimally, which varies from child to child, and among cultures.

Behavioral insomnia of childhood (BIC) is a prevalent condition, affecting 20-30% of children aged between 6 to 36 months. Sleep-onset association and limit setting types are the most common sleep disorders in infants and toddlers. Although by 6 months, a healthy infant can sleep through the night without a night feed, 25-50% continue to awaken at night. Extinction based sleep interventions are favored worldwide, and graduated extinction or extinction with parental presence are considered as effective sleep interventions and both include ignoring child's bedtime crying. These interventions avoid feeding once the child has been put to bed, and implement an interval between infant waking and feeding, rather than feeding immediately.

Sleep interventions in infants under 12 months of age has a small to moderate effect on improving maternal reports of total nocturnal sleep time in infants and these interventions do not reduce the number of night wakes.

These interventions are criticized by experts for having the potential to lead to insecure parent-child attachments, and later emotional/behavioral problems. Because, these interventions aim to improve sleep by removing parent attention which is considered the reinforcer of the child's crying, to eliminate protesting behavior at night.

Neuroscience and epigenetic studies have highlighted the relevance of early programming on later health. The HPA-axis is shaped by environmental factors such as prenatal care, early life stresses, and dysregulation of the HPA-axis can be a risk factor for the development of psychopathology. It is suggested that increased maternal caregiving behaviors are related to lowered cortisol responses to stress. Maternal emotional availability and response to infant distress at bedtime and across the night was linked to healthier cortisol patterning in the first year of infants' life. In addition, mothers who are more emotionally available were found less likely to perceive the child as having sleep problems.

Mothers who are inattentive, impulsive, aggressive and depressed are more likely to adopt problematic

parenting behaviors especially in stressful situations. Maternal cognitions about setting limits, anger towards the infant and doubts about parenting ability were associated with infant sleep problems. Modifying the mothers' cognitions and beliefs are suggested to be effective in sleep interventions.

Breastsleeping concept is proposed to acknowledge the fact that normal infant sleep can only be derived from studies of breastsleeping dyads. Breastfeeding initiates a cascade of hormonal changes that provides the opportunity for mothers to consistently respond to their infant's stress and promotes bonding with the infant. Breastfed infants are fed more often and therefore have more opportunities for close proximity to their mothers, making mothers more physically available, and more quickly available to help the infant regulate distress. Mothers who choose to breastfeed display enhanced sensitivity for their infants, which can foster secure attachment. It has been shown that maternal higher sensitivity is associated with longer duration of breastfeeding during the first year of life. Breastfed infants develop more flexible interaction patterns than infants who receive solely bottle feeding. It is also suggested that although breastfed infants had a more fragmented sleep the overall duration of wakefulness at night was similar in breastfed and formula fed infants. Melatonin in breastmilk is suggested to play a role in improving sleep and reducing colic in breastfed infants. Furthermore, breastfeeding is suggested to play a role in maternal mental health by reducing the stress response.

Infant sleep problems adversely affect parental sleep, and interventions for improving infant sleep should consider the needs of both mother and the child. Interventions should aim to enhance parents' emotional regulation, impulse control, mood, their ability to cope with stress, and respond to infant cues contingently. Infant cued parenting includes high proximity, and rapid responses to infant signaling both day and night. Cued care parenting and maintaining breastfeeding are two important issues that conventional sleep interventions do not consider. However, when to transition from cued care to limit setting parenting is still unknown.

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Impact of Media Use on Early Childhood Development

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The advancement of technology increases the use of digital media in all age groups, from adults to younger children. The rapidly growing media industry is targeting young children, claiming these programs are educative and support children's cognitive development.

Early childhood (0-6 years), which is called pre-school and "critical window" period for all phases of development, is the period where neuroplasticity is highest. Neuronal development in early childhood provides the shaping of cognitive characteristics as executive functions. Executive functions sustain the intellectual, language, emotional and social development effects throughout life. Experiences during this period shape the development of the brain through synaptic pruning of the existing neural connections. With the increasing popularity of media among families during this critical period of children, the American Academy of Pediatrics (AAP-1999,2001) made recommendations against the use of early screen-mediated media on the grounds that it would limit the social interaction required for the healthy development of children under 2 years of age. In 2016, AAP recommended the restriction the use of digital media except video chat for 18 months and younger children and stated that 18 to 24-month-old children may use high-quality media with their parents to help them understand what they see. For children aged 2 to 5 years, AAP recommended that high quality programs should be limited with 1 hour per day although it was under parental control. Despite no direct evidence was presented with the proposal, the concern behind this was expressed.

The interaction of children with digital media is still under investigation, but it is a subject that needs to be analyzed well.

How can media affect children?
1. Cognitive: Learning, media literacy, attention problems, language development / communication, executive function, creativity, habits of mind
2. Social: Family relations, parenting, social competence, communication
3. Emotional: Digital addiction, violent content, cyber bullying, sexual behavior, anxiety and depression
4. Behavioral: Sleep, aggression, risk taking, play
5. Physical: Obesity / activity, visual effects, orthopedic effects
6. Cross-cut topics: Privacy, virtual / augmented reality and developing technologies, advertising, social media, screen time

When learning through the digital media is evaluated, only 18 to 24 months old children begin to show the basic symptoms of cognition. However, apart from repeating learning, the steps of comprehension and internalization occur over time with the speaker having a non-verbal communication with the child through eye contact and common attention. Children up to 3 years of age can be alerted to and learned by television, but this learning is by taking a picture of the visual. The child cannot physically interact with the image, enter the area of the screen or move.Adult-like comprehension and understanding continue to develop until early adolescence. Young children need first-hand experience directly with materials and equipment that support thinking and problem-solving skills to learn. In pre-school period (3-6 years), using well-designed digital education practices can encourage learning.

It has been reported that digital media may adversely affect language development according to the con-

tent of the program and the age of the child. It has been reported that programs that include large vocabulary and narrative language have a positive effect on language, while programs with a small narrative structure and spoken language negatively affect language development. In a study, it was found that watching video for 8-16 month-old-children had a negative effect on the language development but this effect has not been shown in infants aged 17-24 months. Also, the fact that parents engage in long-term digital media is also a factor for slowing the child's language development, as it reduces the length and quality of the time spent with the child.

Digital media images provide very different stimulation from real-world visual stimulation. Visual displays on electronic displays consist of a series of illuminated pixels and are refreshed again with short transitions. Even high-resolution displays cannot display images that can be detected by children with normal vision. The most striking one is the hypothesis that media use may be related to behaviors like attention deficit / hyperactivity disorder is on attention network system. They define the attention network as consisting of three components: alerting (highly sensitive to incoming information), orienting (selecting specific information from environmental input), and executive attention (managing, monitoring, and switching attention in service of a goal) At first, the orienting reflex is dominant, but slowly gives way to the executive attention system as it substantially improves from 4 to 8 years of age. In this case, it has been suggested that exposure to digital media continually disrupts the baby's orienting reflex, thereby strengthening the system and potentially disrupting the development of a manager's attention (ie, monitoring, modification, editing and interpretation) system. Researchers explain this by creating a style of attention that is actively seeking constant stimulation on the screen, with fast-paced, frequent interruptions and regulations (scan and shift).

The behaviors of parents carry quite importance in supporting basic cognitive skills such as children's attention, executive function and language development. The nature and amount of interactions of parents with their children decreases in the presence of screens. It is also suggested that the effect of the screen directly affects the behavior of the parents and thus leads to a potential greater indirect effect on young children. The time spent on the screen has been the subject of controversy as well as the potential for children to displace important social interactions and experiences. When assessing the negative impact, "the assumption that children will spend their time in the face of the screen with a more useful activity (media displacement) than media use should be taken into consideration.

Studies in the literature mostly relate to the duration, content and adverse effects of screen usage. In fact, the use of digital media is a combination of multiple cognitive activities that require special attention, perception, and insight, and is a surprisingly challenging task for young children. It is a process that develops not only through biological maturation, but also through experience. It is important that children grow up as media literate in order to adapt to the digital age.

While discussing the media in children's life, the effects of the media on both the child and the parent should be evaluated. To benefit from the media at the highest level, to anticipate and interfere with the risks that can be encountered at the same time, it is possible with the media literacy of parents who will guide children first.

Assessment and Management of Emotional and Behavioral Problems in Early Childhood (Temper Tantrums, Elimination Disorders)

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Primary care physicians and pediatricians are generally the first point of contact with a family when questions arise about a child's behavioral and emotional problems. Actually, these are a part of the child's grow up and development. Families often consult to pediatricians to learn about the cause and how to manage the problems. Childhood behavioral problems are a complex assortment of individual mental disorders, genetic and medical disorders, family interaction difficulties, social problems, and combinations of these. That's why, these problems are required careful consideration and evaluation. The most common problems are sleep disorders, eating/feeding disorders, temper tantrums, encopresis and enüresis, autism. In this session, temper tantrums and elimination problems (encopresis, enüresis) will be presented.

Temper Tantrums (TT) is commonly seen behavioral problem in early chilhood. TT are unpleasent, emotional outbursts and behaviors that toddlers display when their needs and desires are not met. During a TT, a child might cry, say "no", scream, whine, stomp his or her feet, hold his or her beath, kick or hit, throw things. TT usually begin after the first year of life and are the worst at 2-3 years of age. Temper Tantrums may be associated with iron defiency anemia, allergy of respiratory tract, sleep disorders, attention deficiencyhyperactivity disorder, developmental delays, autism.

Encopresis (fecal incontinence, soiling) refers to the repetetive, voluntary or involuntary, passage of stool in inappropriate places by children 4 years of age and older. at which time a child may be reasonably expected to have completed toilet training. In most children (80%) with encopresis, the problem is associated with and probably caused by underlying constipation. The symptoms of constipation may be obvious and well recognized by the family or may be subtle. Up to 20 percent of children with encopresis have no evidence of underlying constipation, termed "nonretentive encopresis". The pathophysiology of this disorder is not clear, but there is a strong association with psychosocial triggers and dysfunction.

Enuresis refers to the discrete episodes of urinary incontinence during sleep at least twice a week for 3 months in children 5 years of age. Three enuresis subtypes are defined in DSM-5: monosymptomatic enuresis (nocturnal only), nonmonosymptomatic enuresis (diurnal only), combined nocturnal and diurnal. "Monosymptomatic enuresis"- Enuresis in children without any other lower urinary tract symptoms and without a history of bladder dysfunction. Primary enuresis refers to enüresis without a period of continence, whereas secondary enüresis occurs after a 6 month period of normal bladder control. "Nonmonosemptomatik enurezis"-Enuresis in children with other lower urinary tract symptoms (increased frequency, daytime incontinence, urgency, disuria). Primary monosymptomatic enuresis has a high rate of spontaneous resolution. Management of primary nocturnal enuresis may involve one or a combination of interventions. Education and motivational therapies usually are tried inially. More active intervention is warranted as the child gets older, social pressures increase, and self-esteem is affected. Enuresis alarms and desmopressin are effective interventions for nocturnal enuresis in children and families who desire active treatment.

Importance of Preschool Education, School Readiness, and Management of School Refusal

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Early education includes all of a child's experiences at home, in childcare, and in other preschool settings. High-quality early education for young children not only improves and promotes their development and learning but supports social learning progression and simplifies the child's cohesiveness to an environment with the rules.

Preschool education is indispensable for the preparedness for school years as social adaptation, self-control on behaviors, self-regulation and academic success are all developed in this period. School readiness includes not only the early academic skills of children but also their physical and mental health, language skills, social and emotional development, motivation to learn, creativity, and general knowledge. The concept also includes schools' readiness for children, the family, and community support services that contribute to in-school success and happiness.

Approximately 80% of preschool children experience school adaptation problems, consisting of mostly school fear. They can show some acute symptoms directly related to the school subject such as unexpected aggressive behaviors, refusing to go to school, crying, trying to escape, returning back home or some somatic findings such as losing appetite, nausea, vomiting, feeling sick, fainting, abdominal pain, general body pain and so on. Sometimes late symptoms include losing interest for school, not doing homework and night's sleep disturbances.

Most children experiencing school fear are well-behaved, family dependent, feeling concerns about success and also need much approval. Sometimes there can be precipitating factors in the family such as, loss of a beloved person, any disease, hospitalization, operation history, a new sibling, divorce, migration, socio-economic problems. Children of parents who are warm and nurturing, provide cognitively stimulating environments, and establish routines for their children have higher cognitive, academic, and behavioral functioning.

In normal situations separation anxiety arises in infants between 8-14 months of age, serving as a protective mechanism towards danger. By the help of repeating separation experiences through 3-4 years of age, children develop a calmer approach while away from their caregiver. If this protective mechanism is not correlated with developmental stage of the child and exaggerated, the cure becomes reversed and disturbs consistence. School fear in healthy children sometimes continue for 4 weeks and is considered normal. The collaboration between school staff, especially the primary teacher, family and child as well, usually solves the problem but persistent symptoms over 1 month needs a professional approach.

Before school begins, presenting the school as a fun and game setting but not a punishment or frightening environment, introducing the child to the school and teacher, informing the child about transportation, making a backup plan together for unexpected circumstances, telling some sweet stories about school and arranging stationery shopping with the child are facilitative activities. If the child resists not to go to school, being open to communication, adopting a thoughtful and understanding, a stable and soft disciplinary manner by relaxing some of the rules temporarily could help the adjustment. If the problem is not solved by the first step precautions, professional reevaluation of the child's physical, psychiatric,

social, emotional and mental health could be needed. In differential diagnosis alongside disorders such as, depression, social phobia, simple phobias, selective mutism, separation or any kind of anxiety, panic attacks, autism spectrum disorders, intellectual disability, and attention-deficit/ hyperactivity disorders should be excluded.

In conclusion, the concept of school readiness encompasses the entirety of a child's physical, cognitive, and social/emotional attributes, which serve as the foundation for early brain development and learning. A team effort among families, the medical home, child care/early intervention, schools, and communities provide the experiences, relationships, and interactions that shape the learning process and serve as building blocks for later success in school and in life.

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Importance of Early Detection of Autism Spectrum Disorder and Its Impact on the Prognosis

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Autism and Developmental Disabilities Monitoring (ADDM) Network estimates that about 1 in 59 children aged 8 years in the United States has been identified with autism spectrum disorder (ASD). In a community based study, from a central Anatolian city in Turkey it was reported that 1 in 1000 children aged 18-30 months diagnosed with ASD.

Symptom severity of the patients with ASD are in the broad spectrum and some individuals with ASD are mildly impaired by their symptoms, whereas others are profoundly impaired. Severity of associated conditions such as intellectual impairment, self-injury, aggressiveness toward others, sleeping disorders, eating disturbances, attention deficit and hyperactivity disorder and seizures are also important on the prognosis. Symptom manifestation also can change throughout the lifespan for persons with ASD. For example, language difficulties and hyperactivity that is often seen in younger ages can shift to relational problems, mood dysregulation, and hypoactivity in adolescence and young adulthood.

It is well established that evidence-based interventions significantly improve the quality of life of individuals with ASD as well as of their carers and families. Studies have found that interventions implemented before age 4 are associated with significant gains in cognition, language, and adaptive behavior. Similarly, researchers have linked the implementation of early interventions in ASD with improvements in daily living skills and social behavior.

Nowadays, adults with ASD are usually living with their parents. Adults with Asperger's or higher-functioning autism are able to live independently and they are more likely to work. Some of the adults with ASD who have good jobs have developed expertise in a specialized skill that people value. However, many autistic often have difficulties finding and then maintaining a job because of social insufficiency. Thus, it is important to encourage appropriate social skills early on. Today education, intervention and medical therapy are much better than the past decades and it is expected that children with ASD with the right individual interventions will be much better in the future. However, we should establish strategies to determine the children with ASD in the earlier ages to improve long-term outcomes.

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Promotion of Oral Health

Betül Kargül

ORAL PRESENTATIONS

OP-01

Health-Related Quality-of-Life Evaluation of Healthy Siblings of Children With Chronic Illness

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Chronic diseases during childhood can also cause changes in the quality of life of the family members themselves. Because of health related quality of life studies varies between the countries and chronic diseases, the aim of this study was to evaluate the health-related quality of life among healthy siblings of children with chronic diseases. We performed the Pediatric Quality of Life Inventory (PedsQL®) questionnaire for the evaluation of health related quality of life. The physical health score and the psychosocial health score (emotional, social and school functional) were calculated by the individual sibling and parents responses. The primary end point is the comparison of health-related quality of life scores of healthy siblings of children with chronic illness and siblings of healthy children. We enrolled healthy siblings of 191 children with chronic disease (cerebral palsy, epilepsy, diabetes, celiac disease, hematological malignancy, asthma) and 100 healthy children. Physical health score, psychosocial health score and total score in healthy siblings of children with chronic illness; were significantly lower than the healthy children group ($p < 0.001$) regarding to sibling's response and parent's response. In the chronic disease group, the lowest psychosocial health score was found in cerebral palsy, hematological oncological diseases and asthma groups ($p < 0.001$). For physical health score, the lowest scores were found in hematologic oncologic diseases and asthma group ($p < 0.01$). Global impact of the quality of life for healthy siblings of children with chronic disease was significantly higher regarding to individual responses of children comparing the parent's responses (30.4% versus 15.1%, $p < 0.05$). Parental responses were found to be lower in quality of life (30.4% versus 15.1%, $p < 0.05$) than healthy children's self-reported scales, suggesting that parents perceived less deterioration in quality of life in healthy children. It is seen that most of the siblings of children with chronic illness - other than celiac disease - are physically and psychosocially affected. In healthy siblings; impact of global quality of life, especially psychosocial impact, and the low level of parental awareness increase the risk for emotional neglect and abuse in these children. For this reason, special support programs are needed for families with children with chronic illness.

Key words: Chronic disease, quality of life, sibling

OP-02

New Advances In Understanding the Involvement of Gut-Brain Axis in Autism Spectrum Disorder

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Objective: Since 1970s, there have been repeated instances of parent reports and clinician observations claiming some individuals with autism spectrum disorder (ASD) to show behavioral improvements when gluten and casein were eliminated from their diets. In these same years, theories have been put forth positing that some individuals with ASD may suffer from a "leaky gut." This leaky gut was considered to enable the leakage of toxic digestion products from gluten and casein to the bloodstream, which then reached the brain and resulted in ASD symptoms. Until recent years, these ideas stayed at a speculative level with scant physiological evidence for their accuracy.

Material & Methods: With the recent scientific advances in the fields of biology and physiology and the current global focus on the gut-brain axis, the mechanisms underlying these decades-long beliefs are starting to be revealed. This presentation draws connections between previous speculations and current biological evidence that can elucidate physiological abnormalities in individuals with ASD.

Results: We overview the evidence for the leaky gut hypothesis and reveal what characterizes the specific ASD subgroups for whom gluten-free/casein-free diets may be effective. We then talk about potential future treatments that can target the same areas of physiological impairment and result in similar improvements in individuals with ASD while avoiding the harmful effects of these diets that eliminate certain nutrients.

Conclusion: This presentation brings together evidence from multiple lines of research and is an important integrative effort that can help understand certain biological abnormalities underlying ASD. Such an approach can pave the way to finding new treatments that can target these areas of impairment in a safe and holistic manner, and lead to both physiological and behavioral improvements in individuals affected by this disorder.

Keywords: autism spectrum disorder, biology, gut-brain axis, physiology

OP-03
Factors Affecting Body Mass Index And Body Fat Ratio in School Age Children

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Objective: The prevalence of obesity in childhood is increasing all over the world and the World Health Organization (WHO) shows obesity as one of the most important public health problems.The aim of this study is to investigate the changes in BMI and body fat ratios of children in two different age groups (6 and 11 years of age), and to search for influencing factors on obesity.

Material & Methods: Our study is a cross-sectional epidemiological study. It was held between January and March 2016 in two different schools, one private and the other public school. Participants' sociodemographic characteristics, exercise habits, eating patterns, screening times were evaluated by a questionnaire form and body weight, height, waist circumference, body fat ratio variables were recorded by the researcher in their schools.

Permission from the Governorship of Istanbul and from Istanbul Provincial National Education Directorate were taken. Istanbul University Faculty of Medicine Clinical Investigation Ethics Committee dated 25.01.2016, numbered 100 Ethics Committee was approved.

Results: Two hundred and seventy children (54.5%) participated in the study were 6 years old and 50.7% of them were female. Of children 21.2% were overweight and 14.5% are obese. In the 11 years group the rate of having their own electronic devices was (68%) significantly higher ($p < 0.05$) than the 6 year old group (22%). While 75.6% of the children in the 6 age group were having breakfast every day, in 11 age group it was 51.6%. The daily screen time of children with normal and low weight was significantly shorter than the children who were overweight and obese. The mean BMI and body fat values of the students in the age group of 11 years were significantly higher than the 6 year old group. Although the obesity rate (15,9%) was higher in public school, than those attending private school (6%), this was not statistically significant ($p > 0.05$).

Conclusion: According to our results, the prevalence of obesity in school children is increasing. Screen time was found to be the most important factor influencing obesity. The changes in eating habits by age, and prolonged screening times should be considered in interventions to prevent obesity.

Keywords: Obesity, child, school age, body mass index, body fat ratio

OP-04

Breastfeeding Status of Children Whose Mothers Returned to Work in the First Year After Birth

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Objective: Significant evidence continues to emerge proving the breastfeeding is key on child survival, nutrition and development, and maternal health. All organisations concerned with child health recommend exclusive breastfeeding for the first 6 months of life, followed by continued breastfeeding with appropriate complementary foods for up to 2 years or beyond. While some studies indicate that maternal employment may be an obstacle to breastfeeding, there are also studies which demonstrate that breastfeeding rates high in working mothers. It was aimed to determine the socio-demographic characteristics of the mothers who returned to work in the first year after birth and the factors affecting the breastfeeding of their children and the effect of mothers' reemployment on breastfeeding.

Material and Methods: The study is a cross-sectional study, with retrospective cohort features for evaluation of some data. It was conducted at Bakırköy Dr. Sadi Konuk Research and Training Hospital, Well-Child Clinic. Data were collected by a questionnaire that was prepared by the researcher and consisted of questions on socio-demographic characteristics, breastfeeding status of child and maternal employment status. The study encompassed 348 children and their families.

Findings: While 72.3% of the mothers who started to work in the first year after birth continued breastfeeding, this ratio was 70.7% in mothers who did not work and there was no statistically significant difference between them. Also 43.2% of mothers who started to work before 6th month stopped breastfeeding in the first year, this ratio was found to be 12.5% when they started to work after 6 th months. It has been shown that breastfeeding in the mothers who returned to work earlier than 6 th month has decreased compared to
whose who started later, and there is a statistically significant difference. The ratio of breastfeeding up to 1 year of age in the second child was found to be statistically higher than that of the first child.

Conclusion: Mothers returning to work in the first year have been shown to have similar breastfeeding durations to whose who do not work. Mothers who returned to work within the first 6 months after birth were found to have shorter breastfeeding duration than employed mothers who did not return to work. It has been determined that in employed mothers breastfeeding might be affected by returning to work in the first 6 months.

Keywords: Breastfeeding, working mother, breastfeeding counseling, cessation of breastfeeding

OP-05
Are We Family Centered in Pediatric Health Care?

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Objective: Family centered service (FCS) refers to a philosophy of service delivery that aims to facilitate partnerships between family and professionals. Family centered practices (FCP) have been shown to promote child's health, increase parental satisfaction, and contribute to the parental and child psychosocial well-being. As FCS is recognized as the gold standard in healthcare, it is crucial for pediatricians to be family centered. The aim of this study is to evaluate self-reported implementation of FCS, perceptions and beliefs of pediatric residents towards FCS.

Material & Methods: Participants were recruited from pediatric residents of Hacettepe University Faculty of Medicine. Two questionnaires were distributed. The first one, Measure of Processes of Care for Service Providers(MPOC-SP),is designed by CanChild Group/McMaster Universityto measure the family-centeredness of professionals. The second is designed by the authors to present perceptions and beliefs towards FCS.

Results: Demographic information of residents is presented in Table 1. MPOC-SP consists of four factors focusing on different components of FCS: Showing Interpersonal Sensitivity (SIS), Providing General Information (PGI), Communicating Specific Information (CSI) and Treating People Respectfully (TPR). The descriptive statistics of MPOC–SP are shown in Table 2. Statistical analyses revealed a significant difference (p=0.004) on PGI part between 1-year (mean: 4.02) and 4-years (mean: 3.14) experienced residents but no difference for gender.

Table 1: Demographic information of the participants (n: 113)

Gender		
	Male	34
	Female	79
Age		
	25-30	108
	30-35	3
	35-40	2
Years of experience		
	1 year	30
	2 years	19
	3 years	26
	4 years	38

Table 2: The descriptive statistics for four scales of MPOC–SP

Scale	Mean	Standard Deviation	Minimum	Maximum
Showing Interpersonal Sensitivity	4.50	0.90	1.89	7.00
Providing General Information	3.59	1.07	1.20	6.60
Communicating Specific Information	4.60	1.10	1.67	7.00
Treating People Respectfully	4.64	0.86	2.33	6.78

Nearly half of the respondents (48%) agreed with the statement of 'FCS is the ideal way of health care'. However, 35% of the respondents disagreed with 'Priorities, wishes, preferences are important in planning the treatment'. Twenty-seven respondents agreed with the statement of 'FCS will negatively affect the perception of the physician in the community'. Participants who agreed with the statements; 'FCS practices will increase workload of physicians' and 'Time and space constraints will reduce the applicability of FCS' are 56% and 78%, respectively. Only 19% of participants did not find easier to practice traditional methods than FCS. While 20% of the respondents stated that 'I know about FCS', only 13% felt competent about practicing FCS. When the results were analyzed depending on gender or year of experience, there was no statistically significant difference.

The first open ended question was 'What are the positive aspects and benefits of FCS?'. While the most common answers were 'FCS increases the compliance of family with the treatment' (26%) and 'FCS increases the efficiency of treatment' (22%); surprisingly, %4 of the residents believed 'FCS has no benefits'. The second one was 'What are the negative aspects of FCS and what are the obstacles for the implementation of FCS?'. The most common answers were 'Knowledge of family about health is insufficient to practice FCS' (35%) and 'Time is insufficient to practice FCS' (20%).

Conclusion: The present study measures FCP of residents and evaluates their perceptions and beliefs towards FCS. To the best of our knowledge, the current work is the first study presenting evaluation of FCP of pediatricians in Turkey. Obstacles for the implementation and current application of FCS by residents and their perceptions and opinions about FCS should be well understood to improve FCP in pediatrics. This study reveals promising and challenging aspects of FCP and guides how to improve implementation of FCS and health care quality.

Keywords: family entered service, family centered practices, health care quality

OP-06
To Identify Trends And Priorities in Social Pediatrics Research in Russia

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Aim: To identify trends and priorities in social pediatrics research in Russia.

Method: Interpretive content analysis of dissertations in the field of public health for the period from 1991 to 2014 was performed. The sampling included 4194 units of information. Then qualitative and quantitative analysis of social pediatrics aspects in public health dissertations was conducted.

Findings: It was found that only 14.8% of public health research dissertations are considered in children population. The analysis of social pediatrics aspects showed that the most studies focused on three main topics: social determinants of children's health (35.9%) (living in back-country districts, use of drugs by parents, inhabitancy in the extreme north, etc.), problems of vulnerable children groups (15%) (orphans, children migrants, children with disabilities) and integration issues (multidisciplinary approach) in children health care system with using social paediatrics aspects — only 7.6% of dissertations. In the course of investigation, a serious problem was identified: less than 2% of the research were performed in a uniform design which making it possible to compare results obtained in different parts of the country.

Result: It should be done as follows to facilitate the research in social pediatrics to optimize the scientific data and improve pediatric health care; conduct multicenter multinational social paediatrics research in the Russian Federation.

Keywords: Social paediatrics research, public health, vulnerable children, social determinates, integrated health care

OP-07

Knowledge and Awareness of Medical Personel and Healthcare Executives About Human Milk Banks

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Objective: This research aims to identify awareness of human milk bank and human milk banking and current situation of human milk bank in Turkey and identify the thoughts and approaches of medical personnel and healthcare executives about establishing human milk banks in the healthcare centers in Turkey.

Yöntem - Gereçler: Within the scope of the research, 9 health institutions active in gynecology and child care services in Ankara city center were identified and 101 health workers and 19 health managers working in these hospitals were reached. Participants were included in the statistics with their answers to the questionnaires they filled anonymously. Data were analyzed with SPSS 16.0 for Windows.

Results: %82.5 of research group (n=99) mentioned that they heard the human milk bank before , %38.3 of them (n=46) finding the human milk bank applications right , %35.8 of them (n=43) thinking to donate her milk to a milk bank when it is established. %82.2 of medical personnel (n=83) mentioned that they heard the human milk bank before , %37.6 of them (n=38) finding the human milk bank applications right , %34.7 of them (n=35) thinking to donate her milk to a milk bank when it is established. %84.2 of healthcare executives (n=83) mentioned that they heard the human milk bank before , %42.1 of them (n=8) finding the human milk bank applications right , %42.1 of them (n=8) thinking to donate her milk to a milk bank when it is established. 48/120 of research group (%40) mentioned that they will not donate her milk. The most common reason stated is based on forbidden by religious. (13/48)(%28). The question that we asked to healthcare executives in research group, " Do you think that mother's milk2 banks will be established in the long term? %47 of them (n=9) answered, they will be established; %53 of them (n=10) told that won't be opened. Also %31.6 of executives (n=6) think to open human milk bank in the hospital that are working at.

Conclusion: Within the scope of these results, medical personnel and executives have a positive attitude on human milk bank, however they are unsettled about their applicability. Considering the tradition, custom and general belief systems of our society, without affecting community dynamics, making the required arrangements and it is suggested to prevent the lack of information within the framework of utilitarianism.

Keywords: human milk bank, medical personnel, milk sibling, The current situation in Turkey, wet nurse

OP-08
Validation of Turkish Parental Perception on Antibiotics Scale

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Objective: Antibiotic misuse is an important public health problem spreading worldwide, leading to antibiotic resistance, increased side effects, and economic burden. Parents' perceptions of antibiotics are critical for the antibiotic intake of children. However, Turkey does not have a valid and reliable scale that can be used for this topic. The aim of this study is the validation of Turkish Parental Perception on Antibiotics Scale.

Material & Methods: The population of this methodological study consists of the parents of the students studying at primary schools in Denizli City Center. Two primary schools were randomly selected and included in the research sample.Out of 1431 students studying in these two schools, 252 were excluded since they did not meet the research criteria. The data were collected in the April-May 2018 period. PAPA Scale is a 5-point Likert scale developed by Alumran et al. The scale consists of 5 subscales and 31 items: Knowledge and Beliefs (10), Behaviors (5), Sources of Information (7), Adherence (5), and Awareness about antibotics resistance (4). After the completion of the language adaptation and content validity of the scale, exploratory and confirmatory factor analysis (EFA, CFA) was used for construct validity. Reliability was tested with Cronbach alpha internal consistency coefficients. SPSS and LISREL programs were used for data analysis. Ethics committee permission and other necessary permissions were obtained prior to the study.

Results: In the study, 1008 (85.5%) participants were reached. As a result of EFA, it was determined that the factors were collected on 5 subscales and the load values ranged from 0.41 to 0.86. A difference from the original scale was that the 26th item was included in the Adherence subscale instead of the Behaviors subscale. The total variance explained by the five factors was 50.6%. The CFA results were found to be SRMR (Standardized Root Mean Square Residuals) = 0.058, GFI (Goodness of Fit Index) = 0.89, RMSEA (Root Mean Square Error of Approximation) = 0.059, CFI (Comparative Fit Index) = 0.95, NNFI (Non-normed Fit Index) = 0.93. The fit indices were shown to be acceptable, good or excellent, and confirmed the 5-factor structure. When the 26thitem was removed, the internal consistency coefficient of the Behaviors subscale increased from 0.55 to 0.78. It was found that the internal consistency coefficients calculated by taking this item into the Adherence subscale were 0.79 for the whole scale and ranged from 0.63 to 0.86 for the subscales.

Conclusion: The PAPA Scale has been shown to be a valid and reliable measurement tool for parents to measure their antibiotic perception. It is appropriate that the 26thitem in the Behaviors subscale of the original scale is included in the Adherence subscale in the Turkish form.

Keywords: Antimicrobial agents, knowledge, behavior, validity, reliability

OP-09
Mobile Phone Use Among Children Under Five Years of Age

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Objective: It is known that mobile phone use, which starts from preschool period and becomes much more widespread in adolescence, may have harmful effects on the physical and mental development of children. In Turkey, we did not find any studies on mobile phone use among children aged under five years. Therefore, the aim of our study was to investigate the use of mobile phones among children under five years of age.

Material & Methods: Mothers with children under five years of age who were admitted to the outpatient clinic of our hospital were included in the study. Patients' mothers who agreed to participate in our study were asked to complete a questionnaire.

Results: Of the 253 mothers who completed the questionnaire, 84.6% (n= 214) stated that they give mobile phone to their children, while 15.4% (n= 39) do not. The median age of the children who were given mobile phones was 18 months (2-60) and the median age of the children who were not given mobile phones was 6 months (3-36) (p= 0.001). There was no difference between genders in both groups. 90.7% of housewife mothers and 76.7% of working mothers stated that they give mobile phones to their children (p= 0.004). 95.3% of the mothers who are primary school graduates and 76.7% of the mothers who are high school or university graduates give mobile phones to their children (p= 0.000). 94.1% of fathers who are primary school graduates and 78.3% of fathers who are high school or university graduates give mobile phones to their children (p= 0.001). There was no significant relationship between father's occupation and giving mobile phone to their child. When asked about the purpose of giving mobile phones to their children, mothers' responses were 21% to play games, 17.3% to silence the child, 61.7% for multiple reasons. 47.7% of the mothers allowed their children to spend less than 30 minutes, 36% between 30 minutes and 1 hour, 16.4% more than 1 hour with mobile phones. 17.3% of the mothers (n= 37) gave mobile phones to their children every day, 33.2% once a week, and 49.5% several times a week. There was no relationship between fathers' occupation and education level and duration of their children's mobile phone use (p> 0.005). However, 22.8% of the working mothers gave their children mobile phones for longer than one hour (p= 0.034). Mothers of 62.2% (n= 23) of the children who were given a mobile phone every day were high school or university graduates (p= 0.002). Similarly, mothers of 40.5% of the children who used mobile phones everyday were working (p= 0.045).

Conclusion: In our study, we observed that the use of mobile phones started at a very young age, and children spend too much time with these devices. We found that mothers who were housewives gave mobile phones to their children more often while working mothers let their children use mobile phones longer. We think that this situation may have negative effects on the development of children and therefore these devices should be used consciously and under parental control.

Keywords: Mobile Phone, children

OP-10
Neurologic Findings of Nutritional Vitamin B12 Insuffuciency in Infants

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Introduction: Vitamin B12 insufficiency in infants generally causes neurological deficits including neurodevelopmental delay or regression, irritability, weakness, feeding difficulties, hypotonia, ataxia, apathy, tremor, and convulsions. Vitamin B12 treatment results in rapid recovery, despite the long-term neurodeficits may prevail with late treatment.The aim of the study is define the neurologic symptoms of nutritional vitamin B12 insufficiency in infants and create awareness of this easily curable condition.

Material and Methods: A retrospective record review of infants who were diagnosed with nutritional vitamin B12 insufficiency between January 2017-September 2018 at Sağlık Bilimleri University, Kocaeli Derince Training and Research Hospital was done and neurologic findings were covered. The cut-off value for vitamin B12 insufficiency was taken as 200 pg/mL.Infants with vitamin B12 insufficiency were all treated with intramusculer hydroxocobalamin.Demographic,clinical,laboratory parameters of the patients, and the response of the treatment were evaluated.

Results: Nineteen infants including 10 boys, 9 girls ages between 2-24 months were identified. The mean age was 13.7 months. The vitamin B12 levels of the infants were between 55-192 pg/mL (116.7 + 32 pg/mL). For the mothers, the levels were between 118-435 pg/mL (208 + 78 pg/mL). Presenting symptoms were developmental retardation in 12 infants (63.1%), involuntary movements in 4 (21%), and afebrile seizures in 3 (15.7%). Feeding problems regarding solid food refusal were present in 11 (57.8%) infants. Diarrhea was seen in 4 (21%) infants.One had recurrent stomatitis and dermatitis. Neurologic examinations reported variable degree of apathy, reduced eye contact, and irritability in all. Seventeen (78.9%) infants had hypotonia and 2 hypertonia. Tonus was normal in 2 infants. Tremors were encountered in 4 (21%) infants. Cranial magnetic resonance images were done for 10 patients. In 2 patients were diagnosed with cortical atrophy and 2 had delayed myelination.Three of our patients recorded afebrile seizures,1 had focal motor seizures,1 had generalized tonic-clonic seizures, and 1 had epileptic spasms.EEGs were normal in 1 case, focal epileptic abnormalities was recorded in 1 patient and modified hypsarrhythmia was found in 1 patient. The other metabolic tests and cranial MRIs were normal in the epileptic spasm patient.

Vitamin B12 levels were within normal ranges for all patients after 6 months of the treatment. The patients showed a marked response, improvement in appetite and general activity. No seizure recurrence was recorded in any patients after treatment. Also in all involuntary movements recovered in the first 2-3 weeks.

Conclucion: The results of the study show that nutritional vitamin B12 insufficiency is a serious health problem for infants. Neurological findings may be severe and observe early. Therefore, the early diagnosis of vitamin B12 insufficiency is critical, so is the treatment.

OP-11
Do the Children of Mothers With High Piccolo Scores Have Better Denver II Test Results?

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Objective: Especially the mother-child interaction and mother's parenting skills affect the child's mental development and behaviors. It is aimed to evaluate the development of children with Denver II and to compare with mother-child interaction scores.

Material & Methods: This study includes 1-5 years old pediatric patients applying consecutively to pediatrics outpatient clinic for routine check-up or simple complaints (e.g. upper respiratory tract infection) and whose parents accepted to work voluntarily. Demographic features and prenatal, natal and postnatal histories were recorded into a survey form.

A ten-minute video recording was obtained while the mother and her child were playing with toys suitable for the children's age in a room. The video recordings were evaluated using the Checklist of Observations Linked to Outcomes (PICCOLO)tool created by Rogmann et al,with a checklist of 29 observable behaviors to assess parenting interaction with children in four domains: affection, responsiveness, encouragement, and teaching. We used the Turkish validation of the PICCOLO tool which was performed by Bayoglu et al. Developmental steps of children using the Denver Developmental Screening Test II (DDST-II) were assessed.

Results: Total of 115 videos were evaluated, having applied to our outpatient clinic between July 2015 and June 2016 meeting the conforming criteria. Total female/male ratio was 1.05. Average age of the mothers participating in this study was 28.9±5.0 (min: 18, max: 41) years. Average age of children was 28.9±11.8 (min: 12, max: 65) months. Median PT score was 43 (Interquartile range (IQR)=35-48), Affection score was 11 (IQR=9-13), Responsiveness score was 12 (IQR=10-14), Teaching score was 8(IQR=5-11) and Encouragement score was 11 (IQR=9-13). Median PT score was 44 (IQR=35-49.25) in DDST normal group and 38 (IQR=29.5-46) in abnormal group, and this was statistically significant ($p<0.05$). Total score median variables of affection, responsiveness and encouragement were 12 (IQR=9-13), 12 (IQR=10-14), 11 (IQR=9-13) respectively in DDST normal group and 11 (IQR=6-12), 12 (IQR=9-13), 10 (IQR=7.5-12.5) in the abnormal group, and this was not statistically significant. However, teaching total score median variables was detected lower as 9 (IQR=6-11) in DDST normal group, 6 (IQR=5-8) in the abnormal group and this was statistically significant ($p=0.020$). Interaction differences in DDST results based on gender was examined in PT and each sub-units. While there was no gender-based difference related to the scores of PT, affection, responsiveness and encouragement for Denver results, PICCOLO teaching scores of 75% of the mothers of boys with normal DGTT were high (≥9 points) and this was statistically significant (chi-square, $p=0.019$).

Conclusion: DDST results of children whose mothers with high scores in PICCOLO evaluating the parenting skills were better. This was significant especially in the teaching sub-group. While there was no difference by gender in PT, mothers' teaching scores were significantly low in the boys group with abnormal denver results.
In conclusion it is important to measure parenting skills because we can support the children's development with early detection of parents' inadequate aspects and early intervention. Besides, it is important to evaluate mother teaching skills in especially boys with abnormal denver results more carefully and to support mother on this issue.

Keywords: children, mother-child interaction, DENVER II PICCOLO

OP-12
Prevention of Influenza-Related Illness in Young Infants By Postpartum Influenza Vaccination of Mothers and Household Contacts

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Background: Influenza is a contagious, acute viral illness of the respiratory tract. Neonates and infants are especially susceptible because they are naïve to past influenza virus infections and immunologically immature. Vaccination is the best way to prevent influenza illness. However, influenza vaccines are not licensed for administration in this age group. We conducted this study to evaluate the impact of influenza vaccination of mothers and household contacts in preventing infants from influenza like illness.

Material & Methods: The influenza vaccine was offered to mothers and household members of neonates born in our hospitals prior to the 2017-2018 season. Mothers were contacted every 4 weeks during the influenza season, and data regarding the onset of fever and/or respiratory symptoms in infants, healthcare seeking, hospitalization and administration of antibiotics were collected. Risk factors (eg, smoking exposure, household crowding, breastfeeding, and number of older siblings) were obtained using standardized questionnaires.

Results: Influenza vaccination was offered to 236 infants' family. The response rate was 87.3% (n:206). 31.1% of mother reported that they and least 1 close contact of their new-born had received influenza vaccine. Postpartum maternal vaccination reduced the incidence and severity of respiratory symptom score (OR=0.21; 95% CI 0.03-0.40). Household crowding and smoking exposure were found significant effective factors for reporting respiratory symptom (OR_1= 1.21; 95% CI 1.07-1.67), (OR_2= 1.81; 95% CI 1.45-2.14). Postpartum maternal vaccination had 39.3% effectiveness against influenza like illness, and 52.4% against administration of antibiotics. None of the infants whose mother were vaccinated hospitalized.

Conclusion: Maternal postpartum vaccination against influenza was associated with a significant reduction of influenza-related morbidity and antibiotic use in infants during the influenza season. Pediatricians could motivate parents for influenza vaccination to protect their children.

Keywords: Influenza; vaccination; cocooning; infants; postpartum; mothers.

OP-13
Protective and Supportive Injunctions for Children Exposed to Sexual Abuse: The First Data From Turkey

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Objective: Child sexual abuse (CSA) requires a multidisciplinary approach by forensic, social, and medical services, thus Child Advocacy Centers (CACs) have been established to evaluate CSA cases in Turkey since 2010. At CACs, following forensic interview and forensic examination, the social needs of children are assessed by social workers. Protective and supportive injunctions are considered at each step of evaluation and are proposed to child courts based on the Child Protection Law No: 5395 that entered into force in 2005. The mentioned injunctions defined by law are listed as counseling, education, maintenance, health care and housing injunctionsThe aim of this study was to evaluate both proposed and performed social investigations, and injunctions at İzmir CAC, which is one of the leading CACs in Turkey.

Material & Methods: The study group consisted 400 children exposed to CSA aged between 0 and 18 years who were admitted to Izmir CAC between April 2014 and April 2015. Data were retrospectively assessed using patient records after local ethics committee's approval was obtained (Protocol No: 2017/156, Decision No: 2017/09-02). Information about socio-demographic characteristics, social investigation reports (if available), psychiatric evaluation reports, and any proposed injunctions were evaluated. The Chi-square test was used for categorical variables, logistic regression analysis was performed to examine the relationship between the binary dependent variable and the independent variables. For all analyses, $p<0.05$ was considered statistically significant.

Results: The study group consisted 400 children affected by CSA with a mean age of 14.7 ± 3.5 years (min: 22 months, max:18 years); 28.3% of whom were children and preadolescents (aged 0-12 years) and 71.7% were adolescents (aged 13-18 years). Most of the children (n=340; 85%) were girls and M/F ratio was 60/340. Twenty percent (n=80) of the study group consisted of intrafamilial sexual abuse cases, and 80% (n=320) had experienced extrafamilial CSA.The rate of social investigation necessity was 28.3% (n=113), and the rate of being proposed for at least one protective or supportive injunction decision was 24.3% (n=97) following CAC process. The most common proposed injunctions were maintenance care injunctions (n=47; 48%) and counseling injunctions (n=46; 47%). The rate of proposed protective and supportive injunctions was significantly higher in adolescents, intrafamilial abuse cases and abuse types including penetration than in the other groups.

Conclusion: This is the first study to provide data about protective and supportive injunctions, which are the main steps in the child protection system. It should be kept in mind that by performing a multidisciplinary approach, CACs have a unique point of view by means of child protection, however, further studies are needed to improve children's welfare in this important area.

Keywords: Child sexual abuse, child advocacy center, social investigation, supportive and protective injunctions

OP-14
Sleep-Related Nighttime Crying in Early Childhood

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Aim: To investigate factors influencing sleep-related nighttime crying (SRNC) in three to 36 month-old children

Material and method: A questionnaire was applied to the parents of 3-36 month-old children who were attending a well-child unit. Sociodemographic and sleep characteristics of children were evaluated. All 323 children was divided into 4 age groups. Group A encompassed 3-5 month-old children , Group B 6-11 months, Group C 12-24 months, and Group D 25-36 months. Logistic regression analysis was used for the evaluations.

Results: The frequency of SRNC was 38% in Group A, 43% in Group B, 37% in Group C and 7% in the oldest group. In Group A, SRNC was less common among pacifier users. The protective factors on SRNC was wearing of pyjamas, while the negative factors were swinging the baby, high educational level of the mother and difficulty in falling asleep in Grup B. In Group C, the protective factor on SRNC was bed-sharing with parents, while the negative factors were permissive parenting style, and sleep disorder of the mother.

Conclusion: SRNC is common in early childhood. The factors which influence SRNC change according to the age of the child and SRNC significantly decreases after two years of age.

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OP-15
The Average Duration of Time for Breastfeeding Initiation After Birth and Evaluation of the Factors Related to Delayed Initiation

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Aim: Breastfeeding is one of the most important evidence-based strategy for optimum infant nutrition and growth. Although WHO and Baby Friendly Initiative strongly recommend to initiate breastfeeding within the first hour after birth, initiation of breastfeeding may often be delayed due to many factors. In this study we aimed to evaluate the average duration of time for breastfeeding initiation and the related factors for delayed breastfeeding initiation.

Material & Methods: Babies who were born in our Obstetrics Department and followed up in Newborn Nursery Room after birth and their mothers were included in this study. The duration of time for breastfeeding initiation was determined for each baby. The babies who were initiated breastfeeding within 1 hour after birth and the babies who were initiated breastfeeding later were groupped into two and compared. The socio-demographic features, maternal and neonatal characteristics which may be related to delayed initiation were evaluated.

Results: Of the 151 newborns included, 76 (50.3%) were female and 75(49.7%) were male. The average gestational age and birth weight was 38.19±1.33 weeks and 3228±484 gr, respectively. Eighty two (54%) neonates were delivered by cesarean section. The average duration of time for breastfeeding initiation was 88.18±52.8 minutes. The number of babies who were initiated breastfeeding within 1 hour was 46 (30.5%). Birth weight, gestational age, cesarean section as delivery route and 1st minute Apgar scores were inversely correlated with the breastfeeding initiation time (p=0.008, p=0.01, p=0.04 ve p=0.034). Maternal education for breastfeeding was statistically not found to have an effect on breastfeeding initiation time (p=0.579). A statistical significant correlation was not found between maternal, paternal educational status, socio-economic status of the family and breastfeeding initiation (p>0.05). Among the babies whom the time to initiate breastfeeding was found to be more than 1 hour, infant-related factors were responsible for delayed initiation in 55 (%51.8) and mother-related factors in 50 (48.2%) of the newborns. Respiratory distress, hypoglycemia and transport to another center were the main infant-related causes for delayed breastfeeding initiation.

Conclusion: In this study, we found that the number of newborns who were initiated breastfeeding in postnatal 1 hour was not as high as suggested. Among the preventable related factors for delayed breastfeeding initiation, decreasing ceseraen section rates and prevention of premature births would likely increase breastfeeding rates. For initiation of breastfeeding sooner after birth, delivery via spontaneous vaginal route, maternal education and support for breastfeeding should be encouraged.

Keywords: Breastfeeding; neonate; initiation

OP-16
The Possible Effects of The Presence of Electronic Media Device in the Children's Sleeping Environment on Children's Sleep Patterns

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Aim: Sleep plays an important role in the physical and psychological development of children. Sleep disorders is one of the most common health complaints can be affected by exposure to electromagnetic fields (EMFs) originating from electronic media devices **(**EMDs). Therefore, the aim of this study was to examine the possible association between EMD presence in the sleeping environment on children's sleep disturbances in South-eastern Turkey.

Material & Methods: The study was carried out with 216 healthy children aged between 2-5 years whose parents agreed to complete the questionnaire form. The questionnaire form consists of three parts. The first part included questions on socio demographic features of families. The second part included questions about the presence of EMDs (e.g. TV, computer, wi-fi, mobile phone) in the childrens' sleeping environment, and duration of their open time. The final part included questions about the presence of sleep disorders in children like bedtime resistance, night-time wakings, wake up crying, difficulties in falling asleep, and mean sleep duration at night-time/daytime in children. All data were analyzed by using the computer software SPSS 22.0 programme. Statistical significance was determined as $p<0.05$.

Results: The mean age of the 216 children (female/male 103/113) is 3.31±1.23 years (2-5 years). The mean sleep duration at night was 9.61±1.39 hour (5-13 hours). The 70.0% of children slept during socio-demographic at least once a week. The mean day time sleep duration was 2.04±0.83 hour (1-5 hours). The 43.0% of children had difficulty in falling asleep, 50.2% of them had bedtime resistance, and 51.6% of them had night wakings at least once time in a week. Difficulty in falling asleep at least once a week is more prevalent in children with wi-fi is open in the sleeping room (wi-fi is open: 17/28, 60.7%; wi-fi is not open: 75/185, 40.5%; $p=0.045$). Computer opened time in the children's sleeping room was longer in children who had difficulty falling asleep (DFA) at least once a week (with DFA: 4.83±2.72 hour (1-8 hours); without DFA: 1.28±0.48 hour (1-2 hours); $p=0.019$). There was no significant relationship between the opened time of television/mobile phone in the children's sleeping room and sleep disorders ($p>0.05$).

Conclusion: Supporting to our hypothesis, we observed that the presence of wi-fi and computer in the sleeping room of the children is associated with sleep disturbances. Clinicians, parents, teachers, and children should be educated about the harmful effects of the presence of the electronic media device (not use it) in sleeping environment night time. But, this is just a preliminary study, further research are needed in large series.

Keywords: Childhood, electromagnetic device, sleep pattern

OP-17

Effect of Baby Walker Use on Child Development

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Background: The aim of this study was to evaluate the effect of baby walker (BW) use on child development

Method: The study was conducted at a social pediatrics well child unit Children aged 18-30 months who used BW (n=100) and those who never used a BW were enroled to the study as a control group (n=100). Demographic characteristics of the parents were obtained from the personel health records and by face to face interview with a questionnaire. The Ankara Developmental Screening Inventory (ADSI) was applied for language-cognitive, motor and mental development. The Social Communication Area Screening Test (SCAST) and M-CHAT results of the children were examined retrospectively from their files.

Results: ADSI results were similar in BW-user and control groups. The prevalance of atypical gait pattern especially toe-walking was higher in BW-user group than in control group. Also, in BW-user group, 24 % of the children had accident and all of these were due to BW.

Conclusion: According to our findings, neuromotor development of children was similar in both groups. The frequencies of accidents and toe walkers were high among BW-users. The use of walkers should be questioned in the differential diagnosis of the toe-walking. Families need to be thoroughly informed about the safety of BW use during the well child visits.

OP-18
Postpartum Depression and Related Risk Factors in a District of Istanbul

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Background and aim: Psychiatric problems increase ih the period of pregnancy and postpartum one year. Thirteen percent of women who have given birth in the last year had psychiatric disorders. Postpartum depression (PPD) is major depression episode occurring within 4 weeks after birth according to DSM-IV diagnostic criteria. However, there are studies indicating this period may last up to 1 year. PPD frequency in the world is between 3.5-40%. In our country, PPD frequency is between 5-40% in the postpartum 6 month period. Postpartum psychiatric morbidity is a major public health problem due to being one of the most frequent complications of birth, the leading third cause of DALYs among perinatal disorders, frequent cause of suicide, negative effects on marital relationship and children. The aim of this study is to determine the frequency of PPD and to assess relationship between PPD and socioeconomic level, obstetric characteristics, neonatal characteristics, social support, spousal support.

Material and method: This is a cross-sectional study consisted of descriptive and analytical components. Our sample is composed of 303 mothers of 0-6 month old babies registered to 5 family health centers in Maltepe on May- July 2018. Stratified sampling method was used. Edinburgh Postpartum Depression Scale (EPDS) for detecting PPD, Postpartum Support Scale (PSQ) to measure social support, The Scale of Perceived Spousal Support Among Women in Early Postpartum Period to measure spousal support and a questionnaire to determine the other independent variables were used. Pearson Chi-square test, Fisher's Exact test, Mann-Whitney U test, Student T test for univariate analyzes and binary logistic regression model were used in data analysis. Ethics committee and institutional approval was obtained.

Results: The median age of participants (25th-75th percentile) was 31 (27-35) and the PPD frequency was 9.9%. Percentage of garduating from a collage or higher education level was 47.2%, and 7.6% of participants actively work. Median value of the per capita income was 1000 (600-1667) TL. Low educational status, low income, chronic illness and smoking, low first gestational age, unplanned pregnancy, health problem and smoking in last pregnancy, experiencing stressful events in pregnancy, having 3 months ≤ old baby, having low birth weight baby, baby feeding not only breast milk, psychiatric illness history, close loss in the last 6 months, poor communication with spouse, spouse's family and own family, poor maritial satisfaction, high score of unfulfilled social support were the factors rising the risk of PPD ($p<0.05$). According to the results of binary logistic regression analysis; while increase in the per capita income was a protective factor, actively working, unplanned pregnancy, having one child, low birth weight in baby and high score of unfulfilled social support were found as risk factors for PPD ($p<0,05$).

Conclusion: Postpartum PPD is present in one out of every 10 mothers having a 0-6 months old baby. Poor economical status , active working, unplanned pregnancy and lack of social support were the main reasons for the increase in PPD risk. In this context, it is proposed to increase the level of education and employment of women in order to increase the life prosperity of the women. Additionally prevention of unplanned pregnancies using effective family planning methods to facilitate the living conditions, and increasing social support including spousal support is essantial.

Key words: Postpartum depression, social support, spouse support

OP-19
Environmental Tobacco Exposure in Early Childhood

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Objective: According to the recent Report by World Health Organization(WHO) on Tobacco, 700 million children exposure to tobacco smoke by 1.2 billion adult smokers in the world. Cigarette use rates in low- and middle-income nations are increasing. Tobacco use is linked to other high-risk behaviors. In Turkey, studies show that 53-85% children exposure to passive smoking. Cotinine is the most important and most reliable biological marker in smokers, nonsmokers and passive smokers. The aim of this study was to investigate passive smoking in healthy children younger than five years old, and to determine the adverse effects of second- hand smoking on child health.

Material & Methods: Children under five years old regularly monitored at the Child Health Surveillance Outpatient Clinic of Department of Pediatrics, Faculty of Medicine, Dokuz Eylul University, were included following informed consent by their parents and the questionnaire method was applied. Demographic variables related to family and children, respiratory tract infections, recurrent infections were asked in the questionnaire. The levels of cotinine and creatinine were measured and the cotinine / creatinine ratios were calculated in urine specimens taken from children participating in the study. Measurements of cotinine levels in urine specimens were performed by the Chemiluminescence Immunoassay Method in the Central Laboratory of the Faculty of Medicine Hospital. Using demographic data, cotinine / creatinine ratios in urine, the effects of secondhand tobacco smoke on children, growth status and infection frequency were determined. A licensed SPSS 22.0 package program was used for the statistical analysis of the data obtained in our study. Chi square test was used to compare the proportional values of categorical variables. A p value of $p < 0.05$ was considered statistically significant.

Results: The ratio of household smokers was 70.3% and the number of non-smokers was 29.7%. Fifty per cent of the mothers were smokers. Urinary cotinine / creatinine ratios were found to be significantly higher in children of smokers compared with children of non-smokers ($p = 0.011$). One third of the children was evaluated as passive smokers. The presence of a smoker at home and the increase in the number of cigarettes smoked during the day increased the frequency of acute respiratory infections ($p = 0.047$).
Conclusion: In this regularly monitored preschool children, we found frequent exposure to cigarette smoke. The presence of exposure can be deduced from urinary cotinine / creatinine ratios in addition to information from the parents. This study contributes to national data on the subject and will aid in increasing the awareness in families to the deleterious effects of secondhand smoking on child health. Identification of harmful consequences associated with second-hand smoking in children that we know to be common in Turkey, gives a more reliable data on this issue and will help to raise awareness in the community. All women should be specifically counseled to abstain from the use of tobacco as well as the use of alcohol and illicit drugs during pregnancy.

Keywords: Environmental tobacco smoke, second- hand smoking, passive smoking, cigarette, early childhood

OP-20

Risk Factors Affecting Autism Spectrum Disorder Screening in Primary Care Setting: A Preliminary Study in the Context of The National Action Plan

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Objective: Autism Spectrum Disorder (ASD) is a substantial public health burden that could benefit from an action plan including early diagnosing, identifying possible risk factors and addressing the educational, and occupational needs of this individuals. But, early diagnosis of ASD is complicating based on various phenotypic and etiologic phenomenology of ASD. This research aims to examine the characteristics that make it facilitators to define ASD for screening and early diagnosis process, and also assessed significance of differences among ASD and other diagnoses in children defined as risky in primary care setting.

Material & Methods: National Action Plan for Individuals with Autism Spectrum Disorders (NAPIASD) have been started nationwide to provide administrative data for the prevalence of ASD in Turkey. NAPIASD is an ongoing, record-based surveillance process. The first stage is the training for family physicians about ASD by a child and adolescent psychiatrist (CAP), and then the screening phase by trained physicians. Five risk areas were identified: Eye contact, respond to her/his name, language impairment, joint attention, stereotype. The children who were detected with impairment in any of these area were defined as risky children. The second stage consists of referral to a hospital for evaluation by a CAP for detected risky children. A case is defined as ASD if he/she exhibits behaviours, as described on one or more comprehensive assessment completed by a CAP, consistent with the Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition (DSM-5) diagnostic criteria for ASD. In this research, we extracted data from Tuzla and Pendik districts of Istanbul, in the NAPIASD. Moreover, a detailed form for sociodemografic characteristics was used for assessment of children.

Results: The total number of screened children were 2940. Of these, 6.25% (n=184) have been referred to our hospital because they were risky for ASD, and 95 of the cases referred to the hospital have been evaluated. The average age of our sample was 33.92±9.57 months, and 73.7% were male. Our sample were composed of 17.9% (n=17) ASD, 18.9% (n=18) Developmental Delay (DD), 47.4% (n=45) Speech and Language Disorder (SLD), and 15.8% (n=15) with no diagnosable disorders. There were no significant differences between age, sex and sociodemographic features among groups. The language impairment was not statistically significant risk factor for ASD diagnosis compared to SLD and DD ($p>.05$). Other defined risk areas were significantly higher in the ASD group ($p<.05$). The sensitivity (SN) and specificity (SP) of the risk areas for ASD diagnosis were examined. The most sensitive risk was language impairment and the most specific risk was impaired joint attention for ASD (Language impairment SN=1, SP=0,19; respond to his/her name SN=0.82, SP=0.93, eye contact SN=0.76, SP=0.93; joint attention SN=0.76, SP=1; stereotypes SN=0.47, SP=0.96). Respond to his/her name (OR = 12.654, $p<.05$) were found to predict ASD in logistic regression analysis.

Conclusion: Our study is in progress. Our preliminary study findings show that respond to his/her name which can be considered the starting point of social reciprocity was an important risk factor in the differential diagnosis of ASD from other disorders with impaired language. Additionally, the results of the present study underline that intact joint attention may be used exclusion criteria for ASD due to high specificity.

Keywords: autism, early diagnosis, risk factors, screening

OP-21

Retrospective Evaluation of Clinical Presentation of Vitamin B12 Deficiency in Breastfed Infant Whose Mother Had Normal Vitamin B12 Levels

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Objective: Dietary vitamin B12 (VitB12) deficiency, although common in the elderly, is rare in childhood. VitB12 deficiency in infancy period needs prompt recognition and treatment in order to prevent permanent neurological damage. In infant, VitB12 deficiency may cause severe impairment in only a few weeks. The most common symptoms include failure to thrive, hypotonia, irritability or lethargy. In infancy the most common cause of VitB12 deficiency is found to be maternal dietary deficiency. Infants with vitB12 deficiency were diagnosed without maternal dietary deficiency. There is no article about infants with vitB12 deficiency whose mothers has no dietary deficiency in the literature yet.

To determine clinical presentation of VitB12 deficiency in healthy breastfed infants without maternal dietary deficiency.

Material & Methods: Methods: 198 healthy breastfed infants with VitB12 deficiency were included in the study. The visits of all infants were examined in one center and clinical presentation of vitB12 deficiency of the first year of their lives was recorded. All mothers, who had not VitB12 deficiency, were not vegetarian. Blood was collected from symptomatic infant at the time of the clinician's decision. Blood taken from other babies who had no symptoms at the age of 9 months. Symptomatic and non-symptomatic infants with vitB12 deficiency were compared.

Results: The average age at diagnosis was 7.5 ± 1.8 months and first clinical symptoms appeared at the age of 5.2 ± 1.5 months (F/M:1). Birth weight and length were within normal range. Clinical symptoms included refusal to breastfeeding and irritability (% 19,4), refusal to solid food (%17,5), sleeping problems (% 14,6), failure to thrive (%14,6) and constipation (%10,6). %47,4 (n:94) of infants had no symptoms. The average level of VitB12 of all infants at diagnosis was 158,06 ng/L (± 29,93). All infant had normal range of hemoglobin, MCV and ferritin levels. No statistically significant difference was found in level of vitB12, hemoglobin, MCV, ferritin, mother age, gestation age and birth weight between the symptomatic and non-symptomatic infants. When the whole group was divided in terms of gender, no significant difference was found between the two groups in laboratory findings, mother age, gestation age and birth weight. Symptoms were disappeared after VitB12 treatment.

Conclusion: Infantile VitB12 deficiency is a rare disorder, caused, as in adults, by either insufficient intake, insufficient uptake or disturbed VitB12 processing. Therefore, infants have repeatedly been described with clinical symptoms of VitB12 deficiency, while their mothers were asymptomatic. In this study, none of the mothers had vitB12 deficiency but their children had VitB12 deficiency. Symptomatic group had failure to thrive, refusal breastfeeding-solid food and irritability-sleeping problems. The diagnosis age of symptomatic group was earlier than non-symptomatic group. Early recognition of infantile VitB12 deficiency followed by prompt treatment is very important in order to avoid irreversible permanent neurological damage.

Keywords: breastfeeding, infant, vitamin B12

OP-22

How is the Continuity of Breast Milk in Children Under 2 Years of Age After Congenital Heart Disease Surgery: Has Enteral Nutrition Support Negative Effect?

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Objective: We aimed to investigate the continuation of the breast milk (BM) in the postoperative period of the patients who were operated for congenital heart disease before two years of age. Also we studied the factors causing discontinuation of breast milk.

Material & Methods: Twenty-nine patients who were operated for congenital heart disease under two years of age in a single center between June 2017 and June 2018 were included in the study. The operation types were determined from the medical records of patients and Risk Adjustment for Congenital Heart Surgery method (RACHS), Pediatric Risc of Mortality III scores (PRISM) were recorded. Age, gender, birth weight and height, age of diagnosis, weight and length at diagnosis, age at the operation time, postoperative BM feeding, presence and duration of enteral support, total length of stay in intensive care and hospitalization time, weight and height at discharge and actual weight and height were recorded. Genetic syndromes, patients need for post-operative interventions, need for ECMO, heart transplantation, asyst device and patients over 2 years of age were excluded from the study.

Results: All patients were term infants. The mean age of the patients was 11.2 ± 4.4 (median = 11, range = 4-21 months) and age of operation was 4.7 ± 4.2 (median = 3, range = 1-16 months).
All patient received BM before surgery. Seventeen patients (%69.3) patients continued to receive breast milk (Median=7, Range: 6-18 months) and 12 patients (%30.7) stopped receiving BM (Median=3, Range: 1-4.5 months) (p=0.0001). For determination predictors of discontinuation of BM logistic regression analyzes was performed. Predictors considered in the model were total hospitalization time, intensive care period, RACHS score, intake of postoperative enteral nutrition products, age at operation. The only significant predictor was intake of postoperative enteral nutrition products (OR: 16.1, 95% CI: 1.13-228.8, p=0.040). Seven patients (24.1%) received preoperatively enteral nutrition support. Five of 7 patients continued taking enteral nutrional support postoperatively. Six patients started enteral nutrition support after surgery. RACHS, PRISM score, hospital stay were not predictor for starting enteral nutrition in the postoperative period in logistic regresion analyzes.

Conclusion: According to WHO and UNICEF recommendations, BM is the most important factor for healthy growth and development. Advances in surgical and post operative period have increased survival rate of children in CHD. Despite advances in surgical techniques, the nutritional status of these patients is a factor that affects surgical outcomes. We found that BM was abandonned in postoperative period statistically. We showed that, enteral feeding play a role in leaving BM.

Therefore, there is a need to train health personnel to pay more attention to breast milk and especially to motivate mothers to give breast milk, even their children were taking enteral feeding. If necessary, psychological support should be given before and after the surgery for mothers.

Keywords: breast milk, congenital heart disease, children

OP-23

Evaluation of the Psychiatric Status of Mothers With the Problematic Feeding Behavior of 9-24 Month Old Babies

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Introduction: Infant feeding is influenced by the individual structure and health of the child, the emotional state of the child and the family, the interaction of the child and the caregiver, the knowledge and practices of the family about child development and the content and diversity of the food offered.Our aim is to evaluate the social and relational status and psychiatric status of mothers who have problems while feeding their babies.

Method: The study included 50 babies (9-24 months old) and their mothers who admitted to the Ankara University Social Pediatric Department for well-child visits in January-June 2018. Problematic Feeding Behaviour is defined as the difficulty of feeding the child according to the form of"Adaptive Eating Behavior Scale-Infant Form" and the lack of adequate food intake, the inability of the child to regulate the food according to the physiological requirements and the eating rejection which lasts for at least one month, containing all the foods or only some types of food.All mothers who participated in the study had psychiatric interviews that were blinded by the Department of Mental Health and Diseases, regardless of whether there was a food refusal.Structured Clinical Interview for DSM-IV Axis Diagnosis and six different psychometric tests for obsessions, depression, anxiety, eating behavior and marital adjustment were applied to all mothers.

Results: The incidence of at least one psychiatric disorder in the mothers of babies with eating problems is 2 times higher than in the control group.Some sociodemographic characteristics of children and parents (Table 1) and the results of mothers' psychiatric evaluation (Table 2) are seen.

Table1. Sociodemographic characteristics of children and parents

	Control n=25	Case n=25
child		
sex		
female (n)	12	15
male(n)	13	10
birth weight (mean, gr)	3278,6±626	3023,4±527
gestational week	38,6±1,4	37,8±1,4
age (months)	15,1±6,5	14,5±5,3
children having regular meal time (n)	22	19
children having regular sleep time (n)	23	18
first child of family (n)	14	13
mother		
age (years)	30,8± 5,2	31,2± 5,4
university education (n)	16	16
housewife (n)	13	16
pregnancy number	1,8±0,9	1,8±0,9
number of children (n)	1,5±0,5	1,6±0,7
support for giving care to her baby (n)	21	19
father		
age (years)	33,6±4,5	33,4±5,9
university education (n)	15	16
Total monthly income >5000TL	9	13

Table 2. Psychiatric diagnoses of mothers in case and control groups

Psychiatric diagnoses	**control n=25 (%)**	**case n=25 (%)**
Depression	1 (4)	2 (8)
Depression and obsessive compulsive disorder	-	1(4)
obsessive compulsive disorder and Specific Phobia	-	1(4)
Specific Phobia	-	1(4)
Panic disorder and obsessive compulsive disorder	-	1(4)
Common anxiety disorder	4 (16)	3 (12)
Common anxiety disorder and obsessive compulsive disorder	-	1(4)
Total	**5 (20)**	**10 (40)**

Conclusion: When the physiological and social reasons that cause the eating problem are excluded, psychiatric problems are observed in the mothers.To be able to say that the problematic feeding behaviour is the result of maternal factors;it may be possible to show that the baby's adaptive eating behavior improved after mothers' treatment.In addition, the long-term follow-up of these babies to determine whether they will experience psychiatric problems may solve the problem.

OP-24
Is It Feeding Problem Or Gastrointestinal Disorder ?

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Objective: Feeding disorders in children usually present as refusal to eat, low food intake or food selectivity. In the management and treatment of feeding disorders, it is extremely important to differentiate organic and nonorganic causes of feeding problem. Aim of the study was to evaluate children with feeding problems and to identify gastrointestinal disorders causing food refusal.

Material & Methods: The present study included 312 children ranging from 1 month of age to 12 years. The medical reports of the children admitted to the hospital with feeding disorders were evaluated. Children with food refusal and low food intake were included in the study. Patients' history and physical examination findings were noted. Anthropometric measurements were carefully assesed. Children with neurodevelopmental or anatomic problems and alarming symptoms (such as involuntary weight loss, bleeding, chronic diarrhea) were excluded from the study. After appropriate behavioral and diet intervention patients with insufficient weight gain and continuing feeding problems (122 children) were underwent upper gastrointestinal endoscopy and biopsy.

Results: Reflux esophagitis was detected in 42% of the patients. Eosinophilic esophagitis was present in 6 patients. Helicobacter pylori gastritis was identified in 45% of the patients. Food refusal and dysphagia was found to be more often related with organic causes. Age and sex of the patients with organic and non organic causes were similar. Food selectivity by texture was slightly higher in younger children. Appropriate medical therapy was given according to the diagnosis. After treatment feeding problems were reported to be decreased in 56% of the patients and significant weight gain was detected in 34% of the children 6 months after medical treatment.

Conclusion: Feeding disorders resulting from organic diseases needed to be properly recognized and treated according to the basic problem.

Keywords: feeding disorder, gastrointestinal, endoscopy

OP-25
Experiences of Stigma Among Parents Having Children With Cerebral Palsy Attending a Special Education Center: A Qualitative Study

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Objective: Cerebral palsy (CP) is a neurodevelopmental disorder that affects muscle tone, movement, and motor skills and is the most common physical disability in childhood. It also affects other body functions that involve breathing, bladder and bowel control, eating, and talking. Stigma is a mark of disgrace that sets a person apart from others. The aim of this study was to evaluate stigmatization experiences of parents who have children with cerebral palsy and the impacts of the stigmatization to their lives.

Material & Methods: This qualitative study was conducted at a special education center with parents of children diagnosed with CP who were receiving their education in a special education center. Data were collected via in-depth interviews with eleven parents. Semi-structured questionnaire has been used which was included open-ended questions that were constituted as a result of literature review. Thematic content analysis was used for the process of coding and the identification of themes. Ethical Committee of Marmara University School of Medicine approved the study. Written and oral informed consent was received from participants.

Results: Most parents said that people in the community did not know about CP. Parents has mentioned that they were disturbed by staring of other people. Most of the parents told that the healthy child was complaining about all the attention was on the other child who had CP whereas in some families explained that the healthy sibling felt responsibility on the child with CP and tried to help. The thoughts about the reason of having child with CP were several such that some mothers were blaming the father and his family by the words ''they didn't support me when I was pregnant.'' whereas some mothers were thinking that the reason was the long duration of their delivery and wished to have C-section at that time. Another problem was defined by some parents that disabled child with a wheelchair was not accepted to public transportation because of more people could travel instead of having a wheelchair in that space of the bus. Also, it was discovered that most of the parents have preferred private schools for disabled children other than government schools due to anxiety about that their children would not be understood by other students.

Conclusion: We discovered in this study that most of the parents did not have knowledge about CP when the disease was first diagnosed and also some parents still did not know the exact diagnosis and kind of the CP that their child suffered from. It was found that these children were defined as disabled by the relatives of parents and the society. On the other hand, the parents were asked if their children were able to walk and these kinds of questions were making the parents to get worried about their children's future. It was also concluded that education and awareness about CP in society were important and would decrease the amount of stigma faced by the parents.

Keywords: Cerebral palsy, Stigma, Qualitative Study, Education Center.

OP-26
The Knowledge, Attitude and Practices of Parents With Infants About Breastfeeding and Infant Nutrition

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Objective: World Health Organisation recommends exclusive breastfeeding up to 6 months of age, with continued breastfeeding along with appropriate complementary foods up to two years of age or beyond. The latest version of Turkey Demographic Health Study, reports decreasing exclusive breastfeeding rates and early weaning compared with previous report. This study aims to evaluate the knowledge, attitude and practices of parents about breastfeeding, complementary food and infant nutrition.

Material & Methods: The parents of infants who admitted for well-child visits to pediatric clinics of 4 hospitals (İstanbul University Medical Faculty, İzmir Dr. Behçet Uz Children's Hospital, Erciyes University Medical Faculty and Namık Kemal University Medical Faculty) who have healthy infants under 2 years of age and had born at term were interviewed. The questionnaire included 35 questions to determine parents' knowledge, attitude and practices about infant nutrition in addition to sociodemographic data.

Results: The study group encompassed 679 infants [M/F:366/313; median age: 9 (min: 0.3- max: 24) months] and their parents (92% mothers, 3% fathers and 5% both). The rate of having breastfeeding counseling was 72% ; 95% of which occured at postpartum period. The 90% of the participants stated that infants must be exclusively breastfed for 6 months but the rate of exclusive breastfeeding was 44%. The rate of correct knowledge about protective effect of breast milk from infections was 92% while 74% from breast cancer. The 38% of the participants stated that they knew about contraindications of breastfeeding, 62% of which were false contraindications. The most common reason to start complementary food before 6 months of age was stated as breastfeeding refusal (median age: 4 months) while the most common reason to start formula was stated as insufficient breastmilk (median age: 2 months). The decision to start formula was led by doctors (46%), neighbours and friends (19%), family members (15%) and other health professionals (9%). The sociodemographic characteristics did not influence exclusive and any breastfeeding durations ($p>0.05$). The 90% of the participants stated that formula milk advertisements did not affect their decision on starting formula milk but the rate of thinking that other people may be affected by the advertisements was 80%.

Conclusion: Although the knowledge of parents on breastfeeding and breastmilk is not insufficient, they need to be supported especially to continue exclusive breastfeeding during first 6 months and appropiate complementary food during weaning period. Health professionals have important role on decision making to start formula milk and thus should be encouraged to recommend exclusive breastfeeding during first 6 months.

Keywords: Breast milk, breastfeeding, complementary feeding, knowledge and attitude

OP-27
Etiological Factors for Children With Delayed Speech

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Objective: Language development is a neccessity for communication and it effects academic and social parfomance as well as cognitive development. This study evaluates aetiological factors in children with delayed speech.

Material & Methods: Children who referred to our outpatient clinic with the complaint of delayed speech between May 2017 and May 2018, and who were examined at least twice with at least 6 months of interval, were evaluated. We included patients whose ages were between 24 and 72 months. The same pediatric neurologist was examined all patients. Hearing test and Denver II Developmental Screening Test (DDST) were performed and they were classified as isolated developmental language delay (IDLD) or neurodevelopmental delay (NDD).

Results: Two-hundred eighty-two patients (172 boys; 60%) with language delay were evaluated. Their mean ages was 44.8±6.7 months. IDLD was detected in 196 patients and NDD was detected in 86 patients. In NDD group, 26 patients were diagnosed as cerebral palsy, 30 patients as autistic spectrum disorders (10%), six patients as neurofibromatosis type 1, one patient as tuberosclerosis, one patient as glutaric aciduria and two patients were diagnosed as Prader Willi syndrome. In three patients, intense epileptic discharges were found in electroencephalographies of three patients. In IDLD group, hearing loss in five patients and anatomic abnormalities in three patients were detected. In 48 patients (%24) one or more languages are used in their daily lives. 126 children (64%) watched television or used other electronic devices (tablets, computers or mobile phones) more than two hour per day

Conclusion: Delay in language can be a symptom of several neurological disorders. IDLD is probably related to the duration of technological, electronic device usage, especially mobile phones, tablets and televisions. Early recognition of the problem may help to improve the neurodevelopmental prognosis of the children.

Keywords: Developmental language delay, digital technology usage, neurodevelopmental.

OP-28
Infant Sleep Habits and Effects on Maternal Bonding and Marital Life

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Objective: Sleep problems in infancy are common and may negatively impact maternal bonding and the family, which may show up as marital problems. In this study, we aimed to identify sleep habits of infants and investigate if they affect maternal-infant bonding and marital satisfaction.

Material & Methods: Mothers of healthy infants were asked to complete Marital Satisfaction Scale (MSS), Edinburgh Postpartum Depression Scale (EPDS) and Postpartum Bonding Questionnaire (PBQ) during their well child visits. Baby sleep habits were asked by structured interview. The study was approved by the local ethics committee.

Results: Hundred and four infants (53% girls, 51% boys) with a median age of 7.2 months [Interquartile range (IQR) 5-11] and their mothers were evaluated. According to maternal report, 39.4% of infants (n=41) had sleep problems and 29 mothers (%27.9) had poor sleep quality. Sixteen mothers (15.4%) had positive screening for postpartum depression. Mothers reporting their baby's sleep as a problem had higher EPDS scores [8 (4.5-12) vs 6 (2-10), p=0.022]. Similarly, mothers having poor sleep had higher EPDS scores [9 (4-16.5) vs 7 (2-10), p=0.023]. Median MSS score was 38 (34-40) and was not different in mothers reporting poor sleep compared to mothers reporting good sleep quality. Mothers with positive screening for postpartum depression had lower scores of MSS [33 (26.2-39.2) vs 38 (36-40), p=0.009] associated with low marital satisfaction. MSS scores were higher when the father was sleeping in the same room with the mother [38 (35-40) vs 36 (29-38), p=0.008]. According to factors in PBQ, there were 9 mothers (%8.7) with problems in bonding and one mother had risk of incipient abuse. Higher PBQ scores indicating problems in bonding were associated with higher EPDS scores (r_s=0.28, p=0.003) and lower MSS scores (r_s= -0.20, p=0.04). Frequent night waking of the infant was negatively correlated with MSS scores (r_s= -0.27, p=0.005).

Conclusion: Our findings showed that infant sleep problems have an important impact on the whole family functioning especially in terms of maternal depression and marital satisfaction. Efforts regarding better management of infant sleep habits may positively change maternal depressive symptoms and family functioning.

Keywords: Infant, sleep habits, maternal-infant bonding, maternal depression.

OP-29

The Effect of Family Participation in Nutrition Education Intervention on the Nutritional Status of Preschool Age Children

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Objective: Establishing healthy eating behaviour in early childhood helps to prevent malnutrition, growth retardation, and acute child nutrition problems, in addition to preventing chronic, long-term health problems. Preschool children spend an important part of the day in school, and the school serves as an effective environment for learning and developing healthy eating behaviour. However, in Turkey preschool education programs do not aim to provide regular and balanced eating habits. The first objective of this study was to assess the effectiveness of a nutrition education program developed for preschool children, and the second aim was to assess the impact of family involvement in this program.

Material & Methods: A ten-lesson nutrition education program was implemented in 74 children from a public kindergarten. Participants were assigned to one of three groups, namely the family participation group (FPG), the education group (EG), and the control group (CG). Family nutrition education documents and family-child take-home activities were given to FPG (n:24) to support the school nutrition education. Nutrition education was given to the EG (n:16) only in the school. Control Group (n:34) continued as usual. Before and after the nutrition education a three - day food records and the food group consumption assessment at the kindergarten were repeated, anthropometric measurements were measured. Dietary intake and food groups' consumption data were entered and assessed the using computer software. Ethical approval was obtained from the Non-Invasive Research Ethics Committee of the Istanbul Medipol University. The paired sample t-test or the Wilcoxon signed-rank test was used to assess the statistical significance based on the normality of the data distribution; a p-value < 0.05 was considered significant. The Kruskal Wallis test was used in the comparison of the three groups before and after the education. The Mann-Whitney U test was used to determine which of the groups with a significant difference.

Results: In FPG and in EG obesity frequencies were decreased, and the decrease was higher in FPG. After the intervention in FPG the percentage of energy from protein was increased, in the EG energy, carbohydrate, fiber and were decreased ($p < 0.05$). In the CG only fiber intake was decreased ($p < 0.05$). After the intervention; the vegetable group consumption was increased in all groups, but the a was higher in FPG ($p < 0.05$). Fat consumption was decreased in FPG and in CG sweet consumption was increased after intervention ($p < 0.05$). In FPG and in EG, more positive changes occurred in food offering to the children and children's consumption. In the FPG, there were positive changes observed in the availability of foods at home.

Conclusion: Our results showed that family participation in preschool nutrition education programs, as well as family awareness and knowledge, are effective in enhancing positive nutritional behaviours in children. Moreover, the family participation alone had a greater positive effect on the child's nutrition behaviour compared to the nutrition education given at school.

Keywords: Education, nutrition, international child health, family participation, pre-school-aged children.

OP-30
0-3 Years Old Referrals to Child and Adolescent Psychiatry Outpatient Clinics: Why do They Refer?

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Introduction: Most of the referrals at child and adolescent psychiatry polyclinics are school age (6-12 years old) or adolescent (12-18 years old) cases. Preschool age children are rather rare in comparison. Especially 0-3 years old children compose a special group at child and adolescent psychiatry polyclinics with the need of careful developmental assessments. In the literature most of the studies in child and adolescent psychiatry topics are conducted with older children. Thus, we have less knowledge about the reasons for the referrals of this small age group of children at outpatients. Starting from this point, it is aimed to review the referral symptoms at child and adolescent polyclinics and related conditions of 0-3 years old children in this study.

Material & Methods: For the study, the system records of 0-3 years old children who referred between the dates 1.1.2018- 30.6.2018 to Pamukkale University Medical Faculty Child and Adolescent Psychiatry Outpatient Polyclinics (6 polyclinics at total) were reviewed retrospectively. The number of total assessments between these dates is 8121 (0-18 years with all follow up assessments). When only the 0-3 years olds were included, it was understood that 179 cases were evaluated between these dates with at least one interview. One case was excluded from the study due to inadequate anamnesis record in the data system. The age and gender data, referral complaints, suggestions and management approaches of the remaining cases were reviewed.

Results: The mean age of the cases were 2.19±0.72 as years and, 32.01±8.122 as months. When gender dispersion was assessed, girls' ratio was found to be 29.8% (n=53) and boys' ratio was 70.25% (n=125). In the 6 months period, 116 of the cases (65.2%) were assessed once, 43 of them (24.2%) were twice and 19 cases were assessed 3 or more times. 9.6% (n=17) of the cases were referred by other clinics (pediatrics, genetics etc.). The rest referrals were by parents' decision or teachers' suggestions. A striking part of the referrals was due to speech delays. 44.38% (n=79) of the all cases had a speech delay complaint. Irritability (24.5%, n=43) and hyperactivity (21.34%, n=38= followed it. 31.46% (n=56) of the children had at least one complaint other than speech delay that could be alarming about " Pervasive Developmental Disorders" (i.e. limited eye contact, unresponsiveness to his/her name, limited communication, interaction or interests and stereotypes). Interest and stimulus deficiency as well as screen overexposure was apparent in most of the cases with speech delay.

Conclusion: An important amount of the 0-3 years old children refer to child and adolescent outpatients due to speech delay. A part of them are children who don't have difficulties regarding social interactions and they seem to have maturational speech delays. However children who carry risks for PDD are also among the referrals at this age group. Close follow up of those children, increase in interest at family environments, screen limitation and providing educational support if needed are important.

Keywords: child and adolescent psychiatry outpatients, 0-3 years, referral complaints

OP-31
The Impact of Vitamin B12 Deficiency on Infant Gut Microbiota

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Objective: Vitamin and mineral deficiencies affect many people but little is known about the results of micronutrient deficiency on human gut microbiota. It is suggested that early environmental factors influencing gut microbiota can lead to long term consequences on health and disease. Vitamin B12 is an essential micronutrient especially in early development of infants but recent research showed that vitamin B12 deficiency is common in exclusively breastfed Turkish infants. In this study, we aimed to investigate the gut microbial composition of healthy term exclusively breastfed 4-6 months old infants with or without vitamin B12 deficiency.

Material & Methods: Fecal samples from healthy infants were collected for analysis of gut microbial composition. Infants recruited for the study were characterized into two groups (Vitamin B12 sufficient and Vitamin B12 insufficient) according to serum vitamin B12 levels. Fecal samples of some infants from vitamin B12 insufficient group were recollected after vitamin B12 replacement and reanalyzed. Comparison of alpha diversity, beta diversity and taxonomy among these groups were performed. The study was approved by the local ethics committee. The study was supported by the university fund (SAG-A-091116-0488).

Results: A total of 88 infants were recruited into the study of which 28 (31.8%) were vitamin B12 sufficient and 60 (68.2%) were vitamin B12 insufficient. Fecal samples were recollected in a subgroup of infants with vitamin B12 deficiency and reanalyzed after vitamin B12 replacement. Male to female ratio was 1:1 and median age was 4 months (Interquartile range 4.0-5.0 months). Comparisons between vitamin B12 sufficient and vitamin B12 insufficient infants revealed no evidence of differences in the microbiome in terms of alpha diversity, beta diversity and taxonomy. Further analysis according to gender, delivery mode and probiotic use didn't show significant difference. Proteobacteria, Firmicutes, Actinobacteria and Bacteroidetes are the most abundant phyla in all groups and the relative abundance of the phyla was not different according to vitamin B12 level. There was no difference between the pre and post-treatment composition of gut microbiota. Infants in all groups showed extreme variation in the microbiome at both phylum and genus level.

Conclusion: Our research revealed that although vitamin B12 deficiency is a significant problem among exclusively breastfed infants, it did not change the gut microbiota when compared to vitamin B12 sufficient infants. Since the samples were collected at a very early period of life and the exposure of vitamin B12 deficiency was relatively short, it may be possible that the effects on gut microbiota were not fully established. Further mechanistic research will be helpful in better understanding of dynamics of gut microbiota and the effects of micronutrients.

Keywords: infants, vitamin B12, micronutrients, gut microbiota

OP-32
Effects of Ankyloglossia on Language Development of Children

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Objective: Ankyloglossia is a benign structural anomaly of the tongue which may cause functional limitation. Most common reported dysfunction is reported on breastfeeding. Besides, many parents worry if ankyloglossia will affect their childrens' speech in the future. Evidence regarding the effects of ankyloglossia on speech of children is only limited and relies largely on expert opinions instead of specific testing. In this study, we aimed to evaluate the language function of children born with ankyloglossia with developmental tools.

Material & Methods: Charts of children with ankyloglossia born between the years 2012 and 2015 were retrospectively reviewed for demographic characteristics, degree of ankyloglossia assessed by Hazelbaker score and effects on breastfeeding. Turkish version of the Test of Early Language Development-Third Edition (TEDL-3) was performed to evaluate language development in addition to the Denver II test which evaluates all domains of the development. The study was approved by the local ethics committee.

Results: There were 57 children with ankyloglossia. Language development tests were performed for 39 (68.4%) children. Median age at time of study was 56 months (Interquartile range:51-60 months) and male to female ratio was 1:2. There was a positive family history of ankyloglossia in 11 children (28.2%). Hazelbaker scoring was performed at a median age of 2.5 months (IQR:1-5 months). Significant ankyloglossia was present according to function score in 11 children (28.2%) and appearance score in 26 (66.7%) children. Gender, consanguineous marriage and family history of ankyloglossia were not associated with severity. Median time of exclusively breastfeeding was not different according to severity of ankyloglossia. Frenotomy was performed in 8 children (20.5%), according to otorhinolaryngologist's (n=2) and pediatrist's (n=3) suggestion or family request (n=3). All children evaluated with Denver II were developmentally normal in all domains except for one child with epilepsy who was 8 months retarded in language domain. Median expressive and receptive language scale scores in TEDL were not different between children who were undergone frenotomy and those who were not.

Conclusion: Our results indicate that long term language development outcome of children with ankyloglossia is not inversely effected. Therefore effort must be paid to prevent unnecessary interventions concerning speech disorders even though the surgery has only few adverse outcomes.

Keywords: ankyloglossia, children, language development

OP-33
What do Parents Know About Safe Sleep Environment?

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Objective: Sleep related infant death is a serious issue. As a result of current studies to reduce sleep-related infant death, recommendations have been developed like back to sleep position, using a firm sleep surface, breastfeeding, room sharing, keeping soft objects out of the sleeping environment. In this study, we wanted to evaluate the safe sleeping habits of the children, knowledge level of parents, andrelated risk factors.

Material & Methods: The study carried out in Istanbul University Istanbul Medical Faculty Hospital, Well Child Clinic and General Pediatric Clinic, between 1st of August and 20th of September 2016. The population of the study consisted the children who applied to the Pediatric Clinic for the regular visit and/or with non-specific complaints. Mothers whose children were between 6-59 months age asked to join a survey about sleeping habit of their children and knowledge about risk of death and suffocation during sleeping period. The survey questions were about; the sleeping position in the first 6 months, where they sleep, how they fall asleep, use of a pillow, existance of soft objects in bed and indoor smoking habit of parents. Ages and BMI of parents were noted. To investigate the risk factors associated with sleeping habits; they were asked “how they feed their baby during the first 6 months ?”, “how long is the usual breastfeeding period ?”.

Findings: Two hundred thirty-six questionnaire were included in our study. Among recommendations to reduce the risk of SIDS; the ratio of exclusive breastfeeding in the first 6 months was 67,8%, sleeping in the same room was %89,2, back to sleep position was 28,4% and choosing ‘the babies feet at the bottom of the cot’ position was 18,3%. Among the risk factors; the ratio of sedative use in parents was 4,4%, pillow use while sleeping was 54,9%, using soft objects in bed was 11,2% and smoking mother ratio was 17,6%. Cosleeping ratio was 8,4% inbetween smoking parents, 10,8% inbetween obese parents.

Results: In our study,it was understood that the knowledge of safe sleeping environment was not enough, even among the mothers who could easily access the health service. To reduce the risk of SIDS, it is necessary to give detailed information about safe sleeping habits while breastfeeding counseling after birth as an early intervention, .

Keywords: “safe sleep”, “sleep environment”

OP-34

Assessment of the Effect of Responsive Feeding Education on Nutritional Status of Infants

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Responsive feeding is a comprehensive term describing the nutritional interactions between the mother and the baby, the nutritional status and how to deal with food rejection. Mothers should recognize the hunger and satiety cues and not force the babies to eat. Meal times should be seen as a period of learning and love, and babies should be encouraged to feed themselves. The aim of this study was to investigate the effect of responsive feeding education on the nutritional behavior and status of babies. It is a cross-sectional case-control study of 140 mothers with infants 6-9 months of age, enrolled between February and June 2017, who accepted to participate in the study, received responsive feeding education (RFG, n = 71), (CG, n = 69). At 6 months of age, during which complementary feeding is introduced, mothers were given responsive feeding education and their sociodemographic characteristics, feeding practices and habits were evaluated using face-to-face interview technique and anthropometric measurements were taken. At 9 months of age, feeding practices and habits were re-evaluated and anthropometric measurements were taken. In order to evaluate the nutritional status of the babies, food consumption records of babies were taken from mothers at 3 consecutive days. The majority of the mothers were between the ages of 25-34 (60,0%), primary school graduates (31,4%) and housewives (75%). It was found that the use of glass, fork, spoon and highchairs was higher in RFG than in CG group and the difference was not significant (p> 0.05). It was determined that responsive feeding education did not affect eating time of babies and duration of breastfeeding (p> 0.05). In addition, it was determined that the education did not affect the feeding behavior of the mother, such as supporting the baby during feeding, encouraging the baby to feed itself and feeding according to hunger satiety cues (p> 0.05). When weight for age Z score values were examined, frequency of babies between -2SD and + 2SD was 95.8% in RFG and 95.7% in CG. Height for age Z score was found to be between 91.5% in RFG and 87.2% in CG between -2SD and + 2SD. It was found that mean weight for age Z score of babies in RFG was lower than CG, but the difference was not significant. It was determined that in RFG energy intake was 844.6 ± 124.7 kcal; protein intake was 24,6 ± 5,7 g; fat intake was 45.0 ± 8.1 g; carbohydrate intake was 85,8 ± 16,2 g; in CG, mean energy intake was 889.4 ± 142.8 kcal protein was intake 25.5 ± 7.6 g; fat intake was 42.5 ± 12.8 g and carbohydrate intake was 89.0 ± 18.1 g. The mean energy intake of babies in CG was found to be significantly higher than RFG group ($p = 0.012$); there was no significant difference in mean macro nutrient intake (p> 0.05). As a result, it was determined that responsive feeding education does not affect nutritional status and behaviors of the baby except energy intake. It was thought that the effects of this education which should improve the eating skills and support growth by observing the behaviors of babies should be evaluated in larger sample groups.

Key words: Responsive feeding, Eating behavior, Complementary feeding, Nutrition education

OP-35
Evaluation of Measles Immunity in Turkey. Is it Still a Threat ?

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Objective: Measles is one of the important vaccine preventable diseases with many complications in childhood. This study aims to present a cross-sectional seroepidemiological data beginning from neonatal cord blood in infants and children under six, about waning of measles antibody and tries to remark the proper time for measles immunization.

Material & Methods: A total of 564 blood samples consisting of neonatal cord blood and samples taken from infants and children at 6, 9 months, “24-48” and “49-72” month intervals, were analysed for measles IgG levels in the period of 6 months.

Results: Measles seropositivity rate was 72.5% in 109 cord blood, 2.6% in 117 infants of sixth and 3.6% in 111 infants of ninth months of age. The seropositvity of was checked in 118 children of 24-48 months and in 109 children of 49-72 months and was 80.5% and 66% respectively (p=0.001). These children were vaccinated on the 12th month per se.

Conclusion: Though measles immunization coverage is 97% in Turkey, population immunity is somewhat lower than expected. Increase of measles cases in Europe and refugee problem in the country could easily lead to outbreaks. Implementing the first dose immunization at 9 months can be an issue.

Keywords: Childhood immunization, measles, measles elimination, measles epidemiology, measles immunization

OP-36

Associations Between Parental Acceptance-Rejection/Control and Over Screen Time in 2-5 Years Preschool Children.

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Background and Objective: Early childhood screen exposure leads to multiple adverse health events and therefore, the American Academy of Pediatrics recommends limiting screen use for preschool children, ages 2 to 5, to just 1 hour a day of high-quality programming. As known parents have a major influence on their children's screen time. We aim in this study to determine how parenting style and parental attitudes affect their children's screen time.

Material and Methods: In this descriptive study, the volunteer parents of 2-5 years old children who had daily screen time less than 1 hour (n=68) and more than 4 hours (n=58) from six centers were included. Demographic information form and parental Acceptance-Rejection/Control Questionnaire (PARQ/C) were filled in by parents. The PARQ scale involves 60- items (20 affection items, 15 hostility items, 15 neglect items, and 10 undifferentiated rejection items). The 13-item Control subscale measures parental behavioral control.

Results: Compared to low level screen-time, the average PARQ/C score was found to be significantly higher in parents whose children were exposed to screen over 4 hours (p=0.021), showing low levels of acceptance. In addition, higher hostility (p=0.046) and neglect (p=0.030) scores were detected in higher screen-exposed group. However, no significant differences were seen in affection and undifferentiated rejection scores according to screen-exposed time. The Parental Control subscale revealed that 53.5 % and 38.6 % of parents were found to be moderate-controlled and firm-controlled respectively, however, there was no significant difference in frequencies of controlled type between two groups.

Conclusion: Parents hostility, neglect and low acceptance behaviors are associated with over screen exposure of preschool children. Further studies with extended sample size were necessary to evaluate the impact of parental controlled type on screen-time of children.

OP-37
Difference and Awareness Caused by Presence of Pediatricians in Institutions Where Risky Children Live

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Objective: There is a group of children (n=450) between age 0-12 live under protection of government in an institution in İstanbul. There had never been a staff pediatrician before in this institution. Children live in are known as 'risky children' or 'children under risk' because of different factors. Pediatricians are sensitive and well equipped in risky baby or risky child follow ups and also play an important role in preventive measures and acute treatments in such institutions. Employment of a pediatrician as a staff in such institutions would be best for superior benefit of children. The aim of this report is to share the experience of a pediatrician who had been working in the institution for six months.

Material & Methods: The experience of a pediatrician who worked for six months in such institution summarized briefly and systematicly.

Results: There was an obvious decrease (60%) in hospitalization of children in the period of staff pediatrician when compared to the same period of time but a year ago. Retrospective screening of health files for auditory tests and vaccinations resulted; 38%of children aged 0-2 couldn't pass the auditory test and 46% of children aged 0-2 with missed or delayed vaccinations when compared to the national vaccination schedule. The ones with the failed auditory test were directed to hospitals and the family practitioners who owned the population and public health departments were informed about the vaccination situation. After the screening, 24% of children aged 0-2 diagnosed as iron deficiency anemia and the treatment had been started. Dynamic feeding list had been organised monthly with the feedbacks of caregivers. Pilot studies were planned for developmental support and applied to different age groups.

Conclusion: Staff pediatrician in an institution is going to focus how to find sustainable goals on healthy child follow ups, growth and developement, vaccinations, helathy eating, security of those children and preventive measures. Multiple branch follow ups of risky children are succesfully organised by a pediatrician. Daily follow ups for acute problems prevent the unnecessary use of medicine and hospitalization. After this report, the information should be reached to the government office to maket hem understand the need of a pediatrician in institutions like this.

Keywords: pediatrician, institution, risky children

OP-38

The Effects of an Education Program for the Parents of Moderate and Late Preterm Infants on the Parents and Infants

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Objective: Although the vast majority of premature infants are from moderate and late preterm births, only few studies have been focused on them.

In this study, it was aimed to evaluate the effects of a parents' education program, prepared by the researchers, on the parents of moderate and late preterm infants, in terms of the health of the premature infants during the period of up to 1 year of corrected age (CA), parents' anxiety level and hopelessness level, quality of life, and parent-infant bonding.

Methods: Moderate and late preterm infants and their families were randomly separated into 3 groups as the Standard Care Group (SCG) (n:22) of those who were regularly followed up at the outpatient clinic, the Mothers Education Group (MEG) (n:22) of those who had regular home visits and only whose mothers participated in the education program, and the Family Education Group (FEG) (n:22) of those whose both parents participated in the education program. The groups were compared in terms of the infants' breastfeeding status up to 1 year CA, the time they were given supplements, their sleep patterns, problems, their physical-neuromotor developments, their rehospitalization rates, the parent-infant bonding, the levels of anxiety and hopelessness of the parents, the quality of life, and the mother's infant perception. Approval for the study was granted by the Ethics Committee of Cumhuriyet University.

Results: The sociodemographic characteristics of the infants and parents were similar among the groups. The rates of breastfeeding at 3, 4 and 6 months CA were significantly higher in the MEG and FEG, as compared to the SCG. At 9 and 12 months CA, the breastfeeding rates were higher in the education program groups. In the SCG, the infants were given supplements either early or late. The crying status at 3 months CA, and the sleep problems at 6 and 12 months were reported at a significantly higher rate in the SCG. Rates of rehospitalization were similar among the groups. No difference was determined among the groups in respect of the infants' weight and head circumference at 6 and 12 months CA, but the length of infants in the SCG was significantly shorter than in the FEG. In the groups that participated in the education program, mothers' perception of infants was more positive, and the levels of mother-infant bonding were higher. The highest rates of bonding were determined in the fathers of the FEG at 6 months CA. The highest levels of anxiety and the highest levels of hopelessness were determined in the SCG mothers at 6 and 12 months CA. As the infants grew up, fathers in the MEG and FEG were determined to participate more actively in infant care and the quality of life of the parents was higher.

Conclusions: The education program provided positive contributions to the parents of moderate and late preterm infants. It was particularly noticeable that the education of fathers had a positive effect on the hopes, concerns, and the mental health of the mothers. The results of this study demonstrate the importance of educating fathers to support the physical and mental health of the parents.

Keywords: Moderate and late preterm infants, mother, father, education program

POSTER PRESENTATIONS

PP-01
Evaluation of Children's Readiness for Beginning to Primary School Who Didn't Complete 72 Months of Age

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Objective: Ministry of National Education published a regulation on pre-school education and primary education institutions on 26.07.2014, and it was published in official journal numbered 29072. According to the third chapter 11,6/b article of this directive, the children who have the right to register primary school according to age can be directed to the preschool education or can be postponed for a year with the petition of parents if they are 66,67,68 months old. For the children who are 69,70,71 months old, they should have a medical decumantation which reports that they are not ready to begin primary school education.

The aim of this study was to evaluate the suitability of 39 children who are 69,70,71 months old to begin primary school, who admitted to the well-child and pediatric psychiatry outpatient clinics.

Material & Methods: Thirty nine children who were born in October, November and December 2011 applied for the evaluation of their suitability to start primary education in 2017-2018 academic year, constituted the working universe. Denver II Developmental Screening Test and family interview form were applied to assess the children.

Results: Twelve of 20 children (60%) who were born in December 2011 and 8 of 13 children who were born in November 2011 (61%), and 5 of 6 children who were born in October 2011 (%83) had developmental delay according to Denver 2 development test.

Of the 25 cases with developmental delay, 7 had delay in language development, 5 in the fine motor, 8 in both language and fine motor development , and 5 cases had general growth retardation. Of the 39 children, 25 (64%) were found not to have proper development to begin primary school and were given a report stating that they should take pre-school education

Conclusion: Family interviews and development evaluation test results show that the majority of 69-70-71 months old children do not have the appropriate readiness to start primary education. More studies are needed to assess the suitable age of beginning to primary school.

Keywords: Child, Primary School, Denver test

PP-02
An Important Cause of Breastfeeding Problem: Tongue-Lip Tie

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Introduction: A congenital problem, the tongue tie (ankyloglossia), is related to the shortening and / or thickening of the frenulum. The fact that tongue movements are limited in these children may cause weight loss, crying, reflux and speech disorders, especially in breastfeeding.

Results: In the examination of a 3-month-old male infant who was brought to our outpatient clinic with the complaint of insufficient weight gain and was fed with breast milk and formula, no findings other than the posterior tongue and upper lip tie were found. The baby couldn't suck effectively and his mother had severe nipple pain. As a result of the consultation with ENT, the baby›s tongue and lips were excised. It was determined that the baby was weighed 260 grams after five days. While amount of formula was gradually decreased, the infant gained enough weight. One month later, the baby fed exclusively breast milk was found to have enough weight.

Conclusion: In babies with breastfeeding problems, presence of tongue and / or lip attachment should be investigated. Tongue and lip tie examination may be a part of child health monitoring since the newborn period and may reduce potential breastfeeding problems.

Keywords: Breastfeeding, infant, lip tie, tongue tie

PP-03
A Rare Treatable Cause of Acquired Epileptic Aphasia Spectrum: Landau- Kleffner Syndrome

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Objective: Landau- Kleffner syndrome (LKS) is typically characterized by acquired verbal auditory agnosia and other predominantly linguistic deficits often with cognitive and neuropsychological abnormalities. Age of onset is typically between 3 and 8 years. Diagnosis may be delayed as child would appear deaf or behavioral disturbance may cause to spend time in different clinics. Here we present a boy who lost his speech by time and diagnosed as Landau- Kleffner Syndrome.

Material & Methods: A previously healthy 4 year 9 month old boy referred to our clinic for regression in his speech. Five months ago his family noticed that he was using fewer words day by day and one months ago he lost his speech totally. Moreover, he was so much aggressive. They had interviews with different child psychiatrist. At admission there was no significant problem in his pre-and postnatal history. He achieved his developmental milestones on time, he started to say first words on 13 months and sentences about 18 months. His neurologic examination was normal except he was aphasic. He was able to understand and make simple instructions but unable to say any words or even sounds. His complete blood count, liver and kidney function tests and metabolic tests for inborn metabolic diseases were normal. He had a normal tympanogram and brain MRI. His EEG showed continuous generalized multiple spikes during slow sleep. There was no significant difference with valproic acid treatment so we started ACTH treatment additionaly and than oral steroid was given. After two year follow up; we used several antiepileptic drugs (valproic acid, levetiracetam, clobazam, sulthiame), intravenous immunglobuline and pulse/oral methylprednisolone . The EEG findings never efficiently decreased by antiepileptic drugs. In the last visit, he can speak ten words, his neuropsychological disturbances gradually improved and his family describes improvement in his perception on oral steroid. Genetic mutations for epileptic aphasia is not completed until now.

Conclusion: LKS is an epileptic aphasia during childhood. Rapid initiation to treatment has proven to be important for the prognosis. In children with acquired speech loss EEG monitoring should take place and LKS should be tought in differential diagnosis.

Keywords: landau,kleffner,aphasia,epileptic

PP-04
Determination of Differences in Nutritional Behaviour and Consumption of Children Continuing to The Kindergartens According to Socioeconomic Region

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Objective: This study was planned to determine the differences in nutritional behaviors and nutritional consumption of children aged between 3-6 who were enrolled in 3 kindergartens with the different socio-economic region.

Material & Methods: This study was carried out with 489 students from 3 different kindergartens from the Ministry of National Education between 22 February and 4 March in the second semester of the academic year 2015-2016. Kindergartens were randomly selected different socioeconomic regions in Ataşehir, İstanbul. Food consumption of children participating in the study was observed and evaluated also anthropometric measurements of children were taken, a questionnaire was applied to the families of the children. Statistical analysis was performed using IBM SPSS Statics Version 16.0.

Results: The body mass indexes of children according to age Z scores in kindergartens with low, moderate and high socioeconomic region were; 0.8±1.1, 0.5±0.9; 1.52±1.26 respectively. Regarding the subject of being choosy in eating, 85.7% of children attending kindergartens at the moderate socioeconomic region, 60.2% of children attending kindergartens at low socioeconomic region and 49.6% of children attending kindergartens at high socioeconomic region reported by their families. Based on questionnaire with families, children who continued kindergarten at low socioeconomic region usually consumed meals in kindergarten (73.5%), liked the dining hall (70.8%), and loved the food in kindergarten (69.9%); children who continued kindergartens with moderate socioeconomic region; generally consumed the meals in kindergarten (77.4%), liked the food in kindergarten (77.4%) and kindergarten affected their diets positively (65.5%); children who continued kindergarten in high socioeconomic region liked the dining hall and meals in kindergarten (73.6%, 67,4% respectively), usually consumed the meals in the kindergarten (69.8%). 20.2% of the families with the low socioeconomic region, 34.5% of the families with the moderate socioeconomic region and 20.2% of the families with high socioeconomic region stated that their children have gained weight since they started kindergarten. Children in kindergartens at low socioeconomic region had higher daily energy intake (293.7±132.6 kcal), than moderate (199.9±53.3 kcal) and high socioeconomic region (158.6±60.2 kcal) in breakfast. Similarly, protein intake was found to be lower in the high socioeconomic region (4.5±2.1 g), than moderate (7.8±3.5) and low (8.8±3.3 g) socioeconomic region. It was reported by the families that the consumption of fruit (27.1-44.2%) and milk (25.0-33.6%) has increased in 3 different kindergartens belonging to different socioeconomic regions.

Conclusion: In this study, it was seen that children received energy below the recommendations[1] (419 kcal) they should take at breakfast for the 3-6 age group. In addition to adequate and balanced contents of the menus in kindergartens, food consumption of children should be carefully evaluated and monitored. It should be kept in mind that adequate and balanced eating habits which will be gained in preschool period will be effective in maintaining a healthy life in the future and increase.

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Keywords: Kindergarten, preschool children, nutritional behaviors, nutritional consumption

PP-05
A Single Center Measles-Mumps-Rubella (MMR) Vaccination Experience in Patients with Egg Allergy

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Objective: Routine immunization is one of the most cost-effective methods of all health interventions, significantly reducing morbidity and mortality. Due to their widespread use, vaccines can cause adverse reactions; most common ones are local minor reactions such as pain swelling and redness at the injection site or systemic reactions such as fever, irritability, drowsiness, and rash. Hypersensitivity reactions are rare among adverse reactions associated with vaccine administration. All components of vaccines including microbial antigens, residual media, preservatives or stabilizers may elicit hypersensitivity reactions in susceptible individuals.

According to Republic of Turkey, Ministry of Health; first dose of measles-mumps-rubella (MMR) vaccination is routinely performed in the 12th month unless there is an epidemics and the second dose is performed in the first grade of primary school. While, measles and rubella vaccines are produced in chicken embryo fibroblast cell cultures, mumps vaccines are produced in human diploid cell cultures. It has been reported that current MMR vaccines in our market contain negligable amounts of egg proteins (nanograms/ picograms), which may be disregarded. Therefore, it is recommended that children with known egg allergy should be vaccinated in the primary care settings, as non-allergic children. However, due to lack of knowledge about production procedures, there are some concerns about administration of the MMR vaccine in egg-allergic children and thus vaccination for MMR can be delayed or referred to tertiary centers. In this report, we present our MMR vaccination experience in children with egg-allergy.

Material & Methods: We included children with known egg allergy admitted to the Division of Pediatric Allergy and Immunology, Istanbul Faculty of Medicine in between October 2016-October 2018, who have not received their regular MMR vaccines on time due to above mentioned concerns. Data on demographic and clinical features including age, gender, time of vaccination, duration of breastfeeding, total breastfeeding period, egg consumption patterns of mother and child, as well as subsequent reactions after vaccination and laboratory values such as serum total IgE, egg specific (sp) IgE levels, skin prick test results with egg white and yolk were collected through patient's medical records, retrospectively

Results: Seventeen children with egg allergy, who underwent vaccination at our center were included in the study. The median age was 24 months. Ten patients (58.8%) were male. The median age of vaccination was 13 months (min-max: 12- 91 months). While 47.1% of the patients were fed with breast-milk, 5.9% of patients were never fed with breast milk.The most common observed reaction after egg consumption was urticaria. Skin prick test was performed in 82,4% of the patients and half of them were reactive to egg allergen. The median serum total IgE level was 96 U/L (min-max: 4,78-1022), egg white spIgE: 2,22 kU/L (min-max: 0,35- 28,20), egg yolk spIgE: 0,35 kU /L (min-max: 0.07- 3.01). Ten children (58.8%) were vaccinated with Priorix® and 7 children were vaccinated with M-M-R-II® brand MMR vaccines. No immediate and delayed type hypersensitivity reaction was observed in children after MMR vaccination.

Conclusion: As recommended by well-known guidelines, MMR vaccination can be administered in egg allergic children in primary care settings safely, regardless of clinical findings and laboratory values.

Keywords: egg, allergy, vaccine, MMR

PP-06
Development of Social Interaction In Children With Autism: A Literature Review

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Introduction-Objective*:* The main problem among the characteristics of autistic children is the inadequacy of social interactions. The treatment process can be improved by increasing the social interactions of autistic children with a systematical education. For this reason, it was aimed to examine the studies in the literature that have been conducted to improve social interactions in children with autism.

Method*:* EBSCOhost, Science Direct, and Google Scholar databases were used for the literature review and the studies on autistic children and social interactions in these children were included.

Findings*:* Role-playing, performance, modeling, coaching, direct teaching method, problem-solving or cognitive process approach, cognitive social learning method, peer-supported learning, drama, scenario and social stories, classroom-based social skills activity programs, cooperative learning methods are used in the social skills training of students with special needs. Some studies use a single technique and some studies use more than one technique together. In the light of the studies conducted, in addition to the academic skills of the students with special needs in the mainstreaming education process, the development of social skills such as adaptive skills, self-control, communication, and cooperation has gained importance and social skills training has been approved as one of the main objectives of mainstreaming education practices. While planning studies, it is suggested for teachers to conduct “social skills” activities that will increase the empathy skills of the students by using methods such as respecting individual differences in the classroom, being a positive model for accepting and valuing. Moreover, they are suggested to show positive examples such as movies, books in which how some individuals become successful and famous despite their disability, and to invite guest speakers.

Conclusion*:* Children with autism who have Intelligence Quotient score over 70 in the preschool period and with language development up to the age of 6 years are more likely to study in a university and have a job to earn money. Therefore, early diagnosis and treatment of children with autism are highly important. Training provided by considering the personality characteristics and habits of the children with autism, the positive attitudes of the family and the skills of planning the time and the achievements of using the skills gained by these training in daily life will positively affect the development of social interaction.

Keywords: autism, child, social interaction

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PP-07
Media Use Among 1- To 18-Year-Old Children in Izmir, Turkey

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Objective: The aim of this study was to investigate the characteristics associated with media use among 1- to 18-year-old healthy children in İzmir, Turkey.

Material & Methods: Three hundred healthy children, aged 1 to 18 years, followed up at Ege University Medical School Social Pediatrics Well Child Care outpatient department were included in the study. A survey form was filled in including sociodemographic characteristics of children, media consumption habits of the child and the parents, sleeping problems and school success if the child attends to the school. The weight and height of children were also measured. The data were analyzed using SPSS statistics version 18.0. When P value was < 0,05, it was regarded as statistically significant.

Results: Of all the 300 children included in the study, 166 (55.3%) were male and 134 (44.7%) were female, and 29% of them were single child of the family. The percentage of mothers with 5 years or less education was 28.7%, while that of the mothers with 12 years or more education was 26.7% (n=80). The percentage of the families with a monthly income of 1500 TRY or less was 21% (n=64), while 24% (n= 72) of the families had more than 4500 TRY monthly income. The average duration of TV watching was 12.2 ± 0.9 hours per week for children aged 1 to 4 years, and 12.1 ± 1.1 hours for children aged 13 to 18 years. Seventy-two percent of children between one and four years of age had total media use for 14 hours or more per week. Pearson correlation analysis showed that as the age of children increased, the duration of TV watching decreased (r =-0.27, P <0.01), but the duration of mobile phone use increased (r = 0.56, P <0.01). Logistic regression model showed that females under five years living with a less educated father were more likely to watch TV for more than 14 hours per week (P <0.05). Likewise, children older than 8 years, single child of the family and those having his/her own computer used computer for more than 14 hours per week (P <0.05). In the logistic regression model, the use of mobile phones for 14 hours or more per week was identified as the only factor causing sleep problems in children (P <0.001). The use of mobile phones over 14 hours per week was also one of the risk factors increasing children's aggression (P <0.001). In 14.7% of the children in the study, the BMI z score was ≥2. However, there was no relationship between obesity and duration of media use in the logistic regression model (P> 0.05).

Conclusion: The data obtained from this study showed that duration of media use especially in young children in our study population were more than those recommended by international scientific organizations. Therefore, it is important to give information to the parents about rational media use in children in well child care visits.

Keywords: Media use, childhood, television, computer, mobile phone

PP-08
A Case of Gastroesophageal Reflux Disease Due to Congenital Gastric Malrotation

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Objective: Gastroesophageal reflux disease (GERD) is defined as the presence of complications associated with gastroesophageal reflux.

Material & Methods: Herein, we present an interesting case of GERD due to congenital gastric malrotation characterized with clinical symptoms and findings such as cough, apnea and cyanosis.

Results: A four-month-old girl was hospitalized with a history of coughing, apnea and cyanosis during or immediately after feeding for 3 months. From her history, it was learned that the baby was born at 38 weeks' gestational age with a birthweight of 3000 grams and was exclusively breastfed. She was started on phenobarbital (5 mg/kg) treatment for epilepsy approximately 2 weeks ago. On physical examination, her weight was 10p, her height is 25-50p, head circumference was 25p, heart rate was 119/min, and respiratory rate was 32/min. The examination of other systems were all within normal limits. Laboratory investigations revealed that a complete blood count, routine biochemistry, blood gas analysis and chest radiography were also within normal limits. Echocardiography showed the presence of patent foramen ovale with a diameter of 2 mm. Cranial magnetic resonance imaging was normal. Because no epileptic discharge was detected on the electroencephalogram, the antiepileptic treatment was discontinued. In clinical follow-up, he had frequent breaks while sucking with a head position back, and apnea and perioral cyanosis developing after a cough episode. An upper gastrointestinal series revealed that gastroesophageal reflux rising up to the middle part of the esophagus and an organoaxial gastric malposition with a diagonal bulbus. The patient was started on antacid treatment with a diagnosis of gastric malrotation and GERD. Because weight gain was not enough with breastfeeding, the mother's milk was expressed and was given by a nasogastric tube. Although there was a slight decrease in the frequency of symptoms, they did not completely disappear. So, intermittent bolus feeding with 2 hour intervals via a nasogastric tube was changed with slow-continuous feeding via a nasojejunal nutrition catheter. When mother's milk was not enough, it was supplemented with a thickened (AR) formula. Then, the patient's complaints disappeared and weight gain was observed. Gastric operation was planned after the baby reached the appropriate weight.

Conclusion: GERD may present with a life-threatening clinical picture in early infancy. A detailed history as well as a careful clinical observation of the child during feeding is very important for differential diagnosis.

Keywords: Gastroesophageal reflux disease, gastric malrotation, infant

PP-09
A Neglected Case With Severe Malnutrition

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Objective: The most important causes of malnutrition in early infancy are the lack of adequate knowledge and skills related to infant care and nutrition of the mothers and to stop breastfeeding.

Material & Methods: Herein, a neglected case with severe malnutrition was presented.

Results: A 6-month-old boy was referred to our clinic with fever. From her history, it was learn that she was born at term with a birth weight of 2750 gm, was breastfed in the first week of life and then she was fed with formula because her mother used psychotropic drugs. The mother was 32 years old and she had a family history of schizophrenia. On physical examination, the weight was 4300 g (z = -5.0), the length was 61 cm (z = -3.0) and head circumference was 43 cm (z=-0.1). Edema was not detected. The body temperature was 38.6 degrees Celsius. Bilateral rales were detected on the thorax auscultation. Laboratory investigations revealed a moderate anemia (hemoglobin of 9.6 g/dL) and CRP increase (3.0 mg/dL). The patient was diagnosed as severe acute and chronic malnutrition in addition to lower respiratory infection. So, antibiotic treatment was initiated. Since adequate nutritional support could not be achieved via oral route, a standard infant formula (70 kcal/kg/day) was started via nasogastric catheter. After the recovery of respiratory infection, daily amount of calories was gradually increased to 150 kcal/kg/day on the 15th day. Complementary foods with small portions were also given to encourage oral nutrition. At the end of the second month of his hospitalizations, the height was 66 cm (z = -2.1), the weight was 7050 g (z = -1.9), and the weight z score was -0.9. So, the nasogastric catheter was removed and oral feeding was started. The grandmother was the primary caretaker of the child during hospitalization and the baby was discharged with regular follow-up visits.

Conclusion: Social environment of the child as well as acute and chronic diseases should be considered in the management of malnutrition. The hospital team should be very careful and patient during nutritional therapy. The mother or caretaker of the child should be trained about child care and nutrition before the child was discharged.Social environment of the child as well as acute and chronic diseases should be considered in the management of malnutrition. The hospital team should be very careful and patient during nutritional therapy. The mother or caretaker of the child should be trained about child care and nutrition before the child was discharged.

Keywords: Child neglect, malnutrition, respiratory infection

PP-10

Demographic and Clinical Features of Child Abuse and Neglect Cases: Nine-Year Experience of a Hospital-Based Child Protection Team in Izmir, Turkey

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Objective: Our aim was to review demographic and clinical features of child abuse and neglect (CAN) cases evaluated by the Child Protection Team of Ege University, Izmir, Turkey.

Material & Methods: The data of the CAN cases referred to Ege University multidisciplinary team between 2009 and 2018 were retrospectively reviewed. The demographic and clinical characteristics of the cases were analyzed in SPSS statistics 22 program.

Results: There were a total of 488 CAN cases evaluated by the team in our hospital during the 9 years. Age of the cases ranges from 1 to 17 years, and 208 (42.6%) of them were male while 280 (57.4%) were female. The sexual, physical and emotional abuse rates were 34%, 14% and 11% respectively, while 41% of them were diagnosed as pure neglect cases. The fathers were offenders in 70% of physical abuse and 11% in sexual abuse cases. However, an extra-familial person was the perpetrator in 57% of the sexual abuse cases. The children were from nuclear, broken and extended families in 61%, 34% and 5% respectively. Most (78%) of child abuse had occurred in the child's home and 90% of the children were brought to hospital by their parents. The percentage of the mothers and fathers graduated from primary school were 70% and 68%, respectively.

Conclusion: We believe that the number of reported CAN cases in our country will continue to rise as the cases are evaluated by the multidisciplinary experienced permanent teams with an appropriate approach reassuring to the families. Providing more support to the multidisciplinary teams working on CAN by the state, in particular judicial/legal and social services, will increase the success rate of management of these cases.

Keywords: child, abuse, child protection team

PP-11
Attitudes and Behaviors of Mothers on Complementary Feeding

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Objective: Nutrition is one of the main factors for a child to grow up in a healthy way. This study aims to determine the exclusive breastfeeding periods, weaning practices, and the factors affecting the decision to start complementary foods.

Material & Methods: The children between 12-36 months were included in the study, who admitted to outpatient clinics of Ege University. The questionnaire included socio-demographic features of families, nutritional condition of children, breastfed in the first 24 hours or not, the duration of nutrition only with breast milk, the manner of nutrition in the first 6 months, the reason to start complementary food before the first 6 months, caregiver's attitude. The data obtained from the research were analyzed in SPSS statistics 22 program.

Results: A total of 300 children aged between 12-36 months were included in our study. The average age of children was 22.5±7.8 months. 293 of the cases (97.7%) got breast milk within the first 24 hours after birth, yet those having taken only breast milk was 78.3% (n=235). The duration of nutrition only with breast milk was 4±2.5 months. The average age of starting complementary food was 5.6±1.2 months and 88% of the cases started complementary food before the 6th month. When the mothers were asked why they started complementary food before the 6th month, the most common answer was "to have them taste" (37.5%). No relationship was found between time of starting complementary food and mother-father education, mother's working or not, economic level of the family ($p>0.05$)

Conclusion: Mothers have high tendency of giving breast milk in the first 24 hours, while the rate of exclusive breastfeeding is low. The rate of early starting complementary food was found to be high. Society needs more training about the nutrition of infants.

Keywords: breast milk, infant, complementary feeding, nutrition

PP-12
Children With Disabilities: Experiences From the Health Board of University Hospital

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Objective: The quality of services available for disabled people, and the life quality of them are among major indicators of countries' health, education and economic growth. The prevalence of disabled people in Turkey is 12 per cent; the rate of children with a disability and/or a chronic disease is nearly nine per cent. Many families with a disabled or chronically ill child apply to the health boards to qualify for the support given by the government.

Our objective was to evaluate the needs and outcome of children with disabilities applied to our University Health Board.

Material & Methods: The board employes an approach based on the regulations for disability criterion, classification and health board reports in coordination with Ministry of Family and Social Policies, Ministry of Labour and Social Security, Ministry of Finance, Ministry of Education and Ministry of Health. Motor delays are classified as mild or severe. Cognitive delays are classified as borderline, mild, moderate or severe. Developmental functions are assesed by the clinical judgements of the specialists based on restriction of activity, difficulty in participation and level of restriction. Balthazard's Index is used to calculate the combined degree of impairment. In the report, level of impariment is classified as 'severe' or 'not severe'.

Results: The diagnostic classification are neurological, visual, auditory, psychological- emotional, severe chronic diseases, genetic diseases and childhood malignancies. The main disorders of development and mental health are motor, intellectual, communication, learning disorders(LDs), Cerebral Palsy(CP), Autism Spectrum Disorders(ASDs) and Attention Deficit Hyperactivity Disorders(ADHDs). The report is used for reporting the level of impairment, to gain access to social rights, tax exemption and municipality services, to get disabled identification cards, special education and rehabilitation, to qualify for home care financial support.

Conclusion: Disability level scale provides a standart and objective approach for physicians to assess and report the level of disability. The' family centered functional evaluation' in which the physician evaluates the child with the family and in their domestic environment is essential for detailed diagnosis and classification.

Keywords: children, disability, needs, family- centered, health board, university hospital

PP-13
Parental Perceptions on Antibiotics and Related Factors in Denizli

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Objective: Antibiotic misuse is an important public health problem affecting individuals and communities. Children's antibiotics use is largely associated with parents' perceptions of antibiotics. The aim of this study was to determine the parents' perceptions of antibiotics and related factors.

Material & Methods: The population of this cross-sectional study consists of the parents of the students studying at primary schools in Denizli City Center. Two primary schools, each representing one low and one high socioeconomic status (SES), were chosen by simple random sampling and all students in these schools were included in the study (n=1179). The data were collected in the April-May 2018 period. A questionnaire including 15 questions about sociodemographic (10) and health characteristics of the family (5), and ABANA Scale (31 items) were used to collect the data. The scale developed by Alumran et al. was adapted to Turkish by Özdemir and Ergin. Scores from each item of the 5-point Likert-type scale are calculated and the antibiotic perception score is calculated (min. 31 and max. 155). Increased score indicates better antibiotic perception. SPSS (Statistical Package for the Social Sciences) was used for statistical analysis and descriptive statistics were given by frequencies, percentages, means and standard deviations. Mann-Whitney U and Kruskal Wallis tests were used for comparison of independent group medians. Backward linear regression analysis was performed to determine the factors associated with antibiotic perception scores. The level of statistical significance (p) was accepted as <0.05. Ethics committee permission and other necessary permissions were obtained prior to the study.

Results: In the study, 1008 (85.5%) participants were reached. Most of the participants (68.8%) were mothers. The mean ages of the mothers and fathers were 35.7 ± 5.0 and 39.4 ± 5.2 years, respectively. The mean antibiotic perception score of the participants was 119.0 ± 14.7. According to the linear regression analysis, factors that increase the antibiotic perception scores of the parents were presence of health workers in the family (b: 5.74 95% CI:3.50-7.98 p<0.001), father's educational level, high school and above (b: 3.54 95% CI:1.21-5.87 p:0.003), participants living in the urban area for the longest period of her/his life (b:3.46 95% CI:1.34-5,58 p:0.001), having a children studying in the high SES area school (b:2.92 95% CI:0,55-5.29 p:0.016), perceived family income, equal or greater than their expenses (b:2.80 95% CI:0.56-5.04 p:0.014) and fewer number of the child's colds during the last year (b:1.53 95% CI:0.49-2.57 p:0.004).

Conclusion: Parents' perception of antibiotics are needed to improve. Any intervention should be given to groups with low perception scores. Further studies are needed to identify other factors associated with parents' perception of antibiotics.

Keywords: antimicrobial agents, antimicrobial drug resistance, knowledge, attitude, behavior

PP-14
The Awareness About Autism of Security Officers Working in a University Research and Application Hospital in İstanbul

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Objective: Autism is a neurodevelopmental disorder manifested in the first three years of life. A child with autism can apply to a hospital like any other normally developing child. Security officers are among the first personnel meeting him at a hospital. In case of temper tantrums the security officers are expected to calm the child and people around him and handle him appropriately. The aim of this study is to evaluate the awareness and approaches about autism among security officers working in a University Research and Application Hospital.

Material & Methods: This cross-sectional study has been conducted in May 2018 and includes security officers working in an University Research and Application Hospital. 103 of 120 security officers were included into our study (Response rate: 85,6%). The data were collected by a questionnaire which was applied face to face with officers. Our questionnaire was made up of a case scenario about a child with autism having temper tantrums at a hospital waiting room followed by Likert type questions about autism awareness. Ethical approval to our study was granted by the Ethical Committee of Marmara University School of Medicine.

Results: Approximately 50,2% of participants correctly answered to case scenario question. Around 90,3% (n=93) have heard of the word autism. Statistically significant difference was not observed between the participants as far as their educational status was concerned (p>0,05). No effect of gender has been founded over the findings (p>0,05). Having an individual with autism among the family and/or among the relative was found as the most powerful determinant of having knowledge about autism (p<0,05). Among the participants who have heard the word autism 40,2% described it as kind of a 'mental retardation'. 18,5% described autism as 'strange and repetitive behaviors'. Whereas 18,5% described autism as 'social communication problem' and 15,2% described it as 'speech problem'. In Likert type questionnaire, the most correctly answered questions were; 'they can shout suddenly and make unexpected moves' (80,3%). 'they have difficulty to understand what people say'(76,7%), 'they have difficulty to wait their turn'(74,8%), 'they may flap their hands like birds'(70,9%), 'they can do wrong actions without knowing that it is a fault' (68,9%), 'they may overreact to sounds such as children's voices or sirens' (64,1%), 'they are not aware of the dangerous situations like fire or earthquake' (63,1%), 'they can answer questions by a repeating question like parrots'(46%).

Conclusion: In this study most of participants have heard about autism, however they still lack knowledge. To our knowledge, our study can be considered to be the first and only study about the awareness of autism in security officers of hospitals. The results were found to be better when compared with some other community awareness studies about autism.

Keywords: Autism Awareness, Security Officer, Hospital

PP-15
A Breastfeeding Story for an Adopted Child

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Objective: Induced lactation without gestation may be possible theoretically, but in the clinical practise it can be difficult. But sometimes in adoptive mothers it can be achived with lactation induction techniques and the help of her increased motherhood wishes.

Material & Methods: In this report, we present an adoptive mother who began to lactation before coming together with her adopted child.

Results: A 38-year old gravida 0 para 0 adoptive mother had experienced no gestations with multiple assisted reproductive techniques for ten years marriage time. When she became in the first rank for taking her adopted child, she began to take domperidon 10 mg pills for 3 times day. She used breast pump for 5 times a day, after 3 weeks she had very much milk for keeping in the deep freeze. She reached her 3 months old adopted child after 1 months and contiuned breastfeeding the baby.

Conclusion: Breastfeeding is a natural and psychological way of feeding an infant, but sometimes it can be difficult even for birth mothers. There are multiple factors which can effect lactation; many techniques and therapeutic agents were defined, no doubt, motivation of the mothers is the most important of all.

Keywords: Induced lactation, breastfeeding, adopted child

PP-16
Positive Feedback on Family Education About Screen Exposure: A Case Report

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Today TV, media, computer are in everywhere. Children are growing up in this digital world. For healthy development of the children it is important for parents to know how to deal with screen exposure.

Case: A 15-month-old boy born term was brought to our unit for well child controls. He was exclusively-breastfed for 6 months and than started to complementary feeding. Neonatal screening tests were all normal. During the evaluation, it was seen that he had only one meaningful word. Gross and fine motor abilities, hearing tests , language comprehension, social skills were all normal. It was learned that he was watching TV more than 2 hours a day at home. Familiy interview was carried out. Recommendations were given to parents as follows; playing with the child at home, having routine outdoor activites, and reading book. At 18th month visit M-CHAT was applied and evaluated as normal. TV exposure was reduced but not stopped and expressive language was increased to 7-8 meaningful word. With close follow-up and repetitive recommendations to parents about limiting screen exposure, his expressive communication was reached to age appropriate levels at 25 months of age.

Screen exposure was not rare at the early ages. Parents may use screen exposure especailly during feeding periods. Pediatric asociations recommend that parents and caregivers should avoid screen exposure during the first 18 months of age.

This case was presented to point out the effect of screen exposure at early ages on child development and also the importance of family counseling in this respect.

PP-17

Self-Competencies of Medical Students About Breastfeeding Counselling and Baby Friendly Hospital Applications

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Objective: Adequately trained healthcare workers can counsel and help mothers and babies about breastfeeding issues. Aim of this study is to detect self-competencies of medical faculty students about breastfeeding counselling and baby friendly hospital applications.

Material & Methods: Following ethical committee approval, this cross-sectional study was conducted in June 2018 in Istanbul. Target population (N=274) was the 4th and 6th grade medical students; this timeline represents students first and last opportunity during their medical education to counsel mothers about breastfeeding. Data were collected via a structured self-administered questionnaire. Questionnaire items (what a physician should know and able to apply for successful breastfeeding counselling) was mainly derived from the content of Breastfeeding Counselling Handbook published by Turkish Ministry of Health. But semi-structured interviews with specialists related to breastfeeding (social pediatrician, neonatologist, pediatric gastroenterologist, lactation nurse, and general pediatricians) and literature was considered, also. Students graded 11-point likert scale (0=feel not competent at all; 10=feel fully competent) for each of the 54 items. Recoding was performed (0-4=somewhat incompetent, 5=not sure; 6-10=somewhat competent) and competency frequencies calculated for each item.

Results: Totally 75.5% of target population completed the questionnaire (n=207). Competency frequencies are higher in theoretical knowledge items and gradually decreases in items about problem-detection and problem-solving abilities. Among 54 items some competency frequencies of students from highest to lowest are as follows: telling about the advantages of breastmilk (92%), describing the correct breastfeeding position (86.5%), helping mother taking the correct breastfeeding position if necessary (83.1%), positioning a baby at the mother's breast (79.7%), noticing signs of possible difficulty on suckling (78.7%), helping a mother who will first breastfeed her baby (71.5%), listing common mistakes effecting breastfeeding when complementary feeding begins (71.0%), helpful nonverbal communication with mother (70.5%), explaining how to store expressed milk (67.1%), deciding express breastmilk or not (62.8%), demonstrate mother how to express milk (58%), differentiating between real "not enough breastmilk" and less milk due to breastfeeding mistakes (56%), knowing the places of hospital's breastfeeding rooms (54.6%), listing the rules of being a baby friendly hospital (47.8%), explaining the breastfeeding policy of (our) hospital (40%).

Conclusion: Acknowledgement competencies are better than application or problem-solving competencies in medical students. Students felt least competent about baby friendly hospital concept and milk-expressing skills. Implementation of problem-targeted training courses about breastfeeding counselling may be beneficial to graduate competent physicians.

Keywords: breastfeeding counselling, medical student, baby-friendly hospital

PP-18
Structure of Hospital-Based Pregnancy Classes

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Introduction-Purpose: Pregnancy is an important period in which women experience physiological, psychological and social changes. The beginning of birth preparation classes in the world dates back to the 1930s. Various philosophies and movements have been influential at various times and as a result, many birth preparation methods became widespread.

Material & Methods: We launched a pregnancy school at Marmara University Pendik Research and Training Hospital in 2011, as part of a programme of the Ministry of Health. It operates under the "Conscious Mom Healthy Baby" tag line.

The Ministry of Health has determined the standards of pregnancy school and prenatal and counseling centers to serve in public, university and private hospitals. The main objective of the school is to educate pregnant women with knowledge on pregnancy, pregnancy care, delivery, breastfeeding, infant massage, and infant care.

Results: A total of 12258 mothers attended our pregnancy school. Approximately 10 pregnancies per month are taken into group trainings in five week periods, and the remaining receive individual sessions lasting 25 minutes. After the training and counseling, brochures and booklets are presented to the mothers. Expectant mothers admitted to obstetrics and gynecology outpatient clinics are invited to attend the school. One nurse is responsible for the coordination of the school and there are gynecologists, psychologists, dietitians, physiotherapists, pediatricians and pilates, yoga trainers from multiple disciplines. Within the program, the mothers are referred to psychiatrists if they screen positive in Beck Depression Scale. The babies of Pregnancy School graduates are followed up at our well child outpatient clinics from newborn period till 5 years of age.

Conclusion: Pregnancy schools serve as an important opportunity for mothers to meet with healthcare services, and an opportunity to improve maternal and child health.

Keywords: Pregnancy schools, hospital, mother education

PP-19
Parent's Knowledge and Attitude About Vaccination-Preliminary Results

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Objective: Immunization is one of the most cost-effective implementations in public health. In recent years, negative news about vaccines has been increasing. The aim of this study was to assess the knowledge and attitudes of parents of 12-60 month-old children about vaccination.

Material & Methods: The research sample consisted of 218 families who were admitted to the General Pediatric Outpatient Clinic of Istanbul University, Faculty of Medicine, Istanbul. were asked with a face to face A questionnaire was developed to collect information about socio-demographic characteristics, knowledge, and attitudes of the families about vaccines. The questionnaire was applied face-to face.

Results: Of all families in the study 87.6% believed that vaccines were necessary. Mothers over 40 years old are less likely to believe in vaccine necessity. 62.8% of families knew at least two vaccine from the national expanded programme of the immunisation. The most known vaccine was the tetanus vaccine (44.5%). 44% of families could mention that the first vaccine was applied at birth. Families who know the vaccine schedule indicated that they learned it from vaccination cards and doctors, and families who do not know the vaccine schedule follow the vaccination dates through vaccination card. Paid vaccination rates for families are low (29.8%). Mothers' education and employment status is related to getting paid vaccine. Families mentioned that they would vaccinate their children with paid vaccine if they were informed. Healthcare professionals are the most recorded information source. Families mentioned that the vaccine hesitancy is the most common reason for the unvaccinated children around them.

Conclusion: In conclusion, families did not have enough information about vaccines and infectious diseases in our study. Mothers' education status, employment status and being informed about vaccination influence the children's vaccination status. Families reported vaccine hesitancy around them. Healthcare professionals are important to informed families about vaccination. Informing families about vaccination may affect the rate of children's vaccination positively.

Keywords: families, vaccination, knowledge, attitude

PP-20
Assessment of Young Children in Terms of Language Delay

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Objective: Speech and language development are useful indicators of a child's overall development and cognitive ability. For preschool-aged children studies of language delay have reported prevalence rates ranging from 2.3% to 19%. Preschool-aged children with speech and language delay may be at increased risk for learning disabilities once they reach school age. While assessing children for speech and language delay and disorders, parent questionnaires and parent concerns are often used to detect delay. We sought to evaluate the characteristics of young children who have deficits in language/vocabulary development.

Material & Methods: The study included children with language delay who were 24 months old or older. The Denver II Developmental Screening Test was employed to assess children's language development. Auditory brain stem reflex (ABR) is used to assess hearing by the audiology clinic and questionnaires were prepared for parents to obtain sociodemographic data.

Results: The study sample comprised of 66 children, who were predominantly male (n=51 males, %77.3). The median media exposure time was 4.5 hours (4-5.75), and family history was positive in %43.9 (n=29). Median language delay was 10.5 months (6.75-20.25). There was no significant difference in language delay according to gender (p=0.19). With increasing media exposure, language delay was increased (p=0.021). Language delay was more pronounced in children of mothers who were housewives compared to working mothers (p=0.020). There were positive correlations between language delay and the other developmental domains (p<0.05). Autism spectrum disorder (ASD) was determined in 3 children and median media exposure time was significantly different from the children without ASD. We found no specific hearing problems in any children with language delay.

Conclusion: Autism Spectrum Disorder prevalence was higher than population estimates, which shows ASD should be in the differential diagnosis of children with language delay. Media exposure should be avoided during early childhood. Language delay has a significant impact on other developmental domains. Therefore, far more attention needs to be paid to the early diagnosis of the problems and the treatment of these children.

Keywords: language delay, media, young children, Autism Spectrum Disorder

PP-21
Let's Not Feed the Babies With a Bottle. How to Feed?

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Objective: Introduction: Infants who cannot be breastfed for various reasons are often fed with a bottle. There are feeding methods that can be applied as an alternative to this situation which can cause nipple confusion. One of these methods, finger feeding, can be easily applied by the caregiver and the continuity of breastfeeding can be ensured.

Material & Methods: Case: Thirty-five-week, 2520 g born 7-day-old male baby did not want to latch and fed with bottle by his mother. On physical examination, his weight is 2350 gm and have no abnormal system findings. Mother's health and thyroid function tests, hemogram, b12, iron and iron binding levels were found to be normal. The mother who was given breastfeeding counseling was recommended breast-feeding camp and frequent breastfeeding in different positions. The mother was taught finger feeding method. The baby, who was fed with this method for 4 months and started to exclusive breastfeeding at 5 months of age.

Conclusion: Finger feeding method will provide feeding of infants without feeding with bottles and will eliminate the risk of nipple confusion. The knowledge of the health personnel about this method will enable the babies to take the breastfeeding at least to the age of 2 years, which will ensure a healthy life.

Keywords: Breastfeeding, bottle feeding, finger feeding infant, nipple confusion

PP-22
Relations of Excessive Screen Time and Video Gaming Habit With Emotion Regulation in Children Aged 2-5 Years

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Aim: "Emotion regulation" is defined as the extrinsic and intrinsic processes responsible for monitoring, evaluating, and modifying emotional reactions. Excessive screen use is reported to result in neuroanatomical changes which are related to decreased empathy, poor impulse control and emotional processing. There was no study investigating the Emotion Regulation according to screen time and video gaming habits of children aged 2-5 years. The aim of this study is to investigate the relation of screen time and video gaming habits with emotion regulation of children aged 2-5 years.

Material and Methods: Our study was designed as a descriptive study. This study was carried out in January 1, 2018 and October 1, 2018 and was approved by Hacettepe University Faculty of Medicine Ethics Committee. Parents of healthy children aged 2-5 years with a daily screen time of less than 1 hour or over 4 hours were included in the study. A structured survey and Emotion Regulation Cheklist were applied to the parents who agreed to participate.

Results: Of the 124 children participating in the study, 46.0% had more than 4 hours of screen time, while 26.6% were playing video games. No statistically significant difference was found between the Emotion Regulation Cheklist total score and sub-scores (Lability/Negativity and Emotion Regulation) of children who had a screen time of less than 1 hour and over 4 hours ($p>0.05$). No statistically significant difference in Cheklist total score and sub-scores were detected between children who were video gamer and non-gamer ($p>0.05$).

Conclusion: We detected no impact of preschool children's habit of video gaming on the emotion regulation scores of children. In addition, excessive and less screen time did not influence the emotion regulation scores of children. Further studies are necessary for different age groups and different gaming characteristics.

PP-23
Associations Between Parenting Style and Video Gaming in Preschool Children

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Background and aim: In early childhood, excessive digital media use leads to multiple developmental and health concerns. More children, even in economically disadvantaged households, are using digital technologies on a daily basis. Parents have a major influence on their children's digital media usage and the aim of this study is to investigate associations between parenting style and digital video gaming in pre school age children.

Material-Methods: Our study was designed as a descriptive study. This study was approved by Hacettepe University Faculty of Medicine Ethics Committee. The study was carried out in out-patient clinics of 6 centers between January 2018 and October 2018. Parents of infants between the ages of 2 and 5 years were informed about the study and written informed consent was obtained from eligible parents before enrollment. Video gaming of children were assessed with face-to-face interview with a structured survey. To detect parenting styles, Parent Attitude Scale (PAS) was administered to the parents. The PAS consisted of 4 dimensions: authoritative, authoritarian, permissive, and overprotective.

Results: The study included 124 pre-school children and their parents. The mean (SD) ages of the children were 3.5 (1.0) years and 55.6% were male. In our study 26.6% of children were playing digital games. Playing video games was statistically significantly associated with older age, male gender, number of children and ≥2. birth order (respectively; $p<0.001$, $p=0.021$, $p=0.033$, $p=0.010$). Overall, 85.8% of the questionnaires were filled in by mothers and, therefore parenting styles were mainly reported by mothers. In video gamer group permissive scores of parents were statistically significantly higher than those of non-video gamer group ($p=0.020$).

Conclusion: Based on the study results, permissive parenting style was associated with playing video games. In permissive parenting, parents are too responsive and are seldom demanding. They do not impose many rules on their children and have little control on their behaviors. This study could provide a basis for the development of parent-oriented intervention studies to encourage healthy media usage.

PP-24

The Immunization Status of Children With Chronic Neurological Disease and Serological Assessment of Vaccine-Preventable Diseases

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The aim of this study was to evaluate the age-appropriate immunization coverage in 366 children with chronic neurological disease (CND), to evaluate the use of vaccines not included in routine program, to evaluate serological tests for vaccine-preventable diseases and to describe the related factors in unvaccinated children. 95.6% of all children with had received age-appropriate vaccinations according to the actual National Immunization Program (NIP) during childhood. 12 children (3.6%) had not received vaccines; only two had true contraindications. Because most of the vaccines have been implemented through the NIP for 10 years in Turkey, 88% of children required these new vaccines or booster doses. Moreover, 86.6% of the children and 92.6% of household contacts had no prior history of influenza vaccine. Furthermore, 88% of the patients had not received the varicella vaccine, and the anti varicella IgG levels were only negative in 27.9%. In addition, 18.6% of the children were negative for anti-mumps IgG, 23.7% for anti-measles IgG, and 6.3% for anti-rubella IgG. Anti-HBs IgG level was 0–10 IU/L in 45.6% of the patients (most of them previously vaccinated) and 79.8% were negative for hepatitis A IgG antibodies. For pertussis infection, the antibody titers of 54.1% of patients were below the protective level, and 10% of patients had a prior acute pertussis infection. Therefore, it is suggested that children with CND should be evaluated for their vaccination status during their first and follow-up visits at certain intervals, and their primary immunization should be completed; moreover, many will need revaccination or booster doses.

Key words: Chronic Neurological Disease, Vaccination, Children

PP-25
Toilet Habits in Children With Recurrent Urinary Tract Infection

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Objective: Urinary tract infection (UTI) is one of the most common bacterial infections in children, with a reported prevalence in toilet-trained children of 1.7 % in boys and 8.4 % in girls. The rate of recurrent UTI (RUTI) is reported to be as high as 30–40 % in children. RUTI may lead to significant morbidity and result in permanent renal cortical scarring, hypertension and chronic renal failure in children. The aim of this study was to evaluate toilet habits in children with RUTI.

Material & Methods: This study included the patients between the ages of 6 and 18 years with RUTI. The patients with urinary tract anomalies such as vesico-ureteral reflux, cystic dysplasia, urinary tract obstruction and neurogenic bladder were excluded from study. Information on the detailed history of UTI and enuresis, voiding postponement, infrequent voiding (≤3 voids/day), constipation and encopresis was obtained.

Results: The 170 patients with RUTI were included in this study (female/male: 154 / 16, the mean age: 8.4 ± 2.23 years). The age of the first UTI was under two years old in 84 (49.44%) patients. The 46 patients had a family history of RUTI. There was inadequate fluid intake in 88 (51.8%) patients, and voiding postponement in 108 (63.5%) patients. The 64 (37.6%) patients had constipation. There was a history of improper genital region cleaning after urination in 65 girls (42.2%). The 100 patients had a full-time school program. The frequencies of voiding postponement and constipation were higher in patients with full-time school program than in part-time school program (72 / 36 patients, p = 0.034; 41 / 23 patients, p = 0.042, respectively).

Conclusion: Toilets habits should be questioned in routine developmental follow-up program in children. The development of true toilet habits may be useful to prevent the development of RUTI in children.

Keywords: Toilets habits, recurrent urinary tract infection, children

PP-26
The Sociodemographic Characteristics of Syrian Immigrant Pregnant Women and Their Babies

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Objective: Migration is the displacement of individuals or communities from one region to another. It contains many social, economic, cultural and psychological elements. Inadequate health institutions in migrant areas, low level of income of immigrants, lack of language barrier, lack of health insurance, having traditional life patterns have a negative effect on health conditions. It is reported that 36% of women between the ages of 20-24 are married before they reach the age of 18. Since 2011, our country has received many migrations due to the impact of the Syrian civil war. In this study; Syrian mother and babies in a university hospital were evaluated retrospectively.

Material & Methods: In this study; electronic records of Syrian women who were admitted to our hospital for child birth were evaluated for sociodemographic characteristics, maternal age, gestational week, birth weight, number of previous pregnancies, duration of hospital stay, and type of delivery.

Results: The birth cohort consists of 1021 Syrian Women giving birth between years 2014-2018. Median age was 23 years (Interquartile range 20-28 years). Consanguineous marriage was 9% and only 6.6% of women had received prenatal care. Cesarean section rate was 24.5%. Median hospital stay was 24 hours (IQR:24-24) and longer in cesarean section(p<0.001).Thirthy-one percent of women were primiparous and most of the primiparous women were under age 18. In the whole study population 16.8% of them were under age 18. Median birth weight was significantly lower in babies of mothers who were below 18 years old (3080 grams, IQR:2780-3330) compared to older mothers (3130 grams, IQR:2840-3437)(p=0.005).In addition, mothers below 18 years old had higher rates of having babies under 2500 grams (12.7%) compared to mothers older than 18 years (7.8%)(p=0.040). Rate of prenatal care was not different between women below 18 years old and older women (5.5% vs 6.8%).

Conclusion: In conclusion, minority of immigrant women received prenatal care, and adolescent pregnancy rates are high. Efforts should be made to improve prenatal care, and to prevent or lower the rates of adolescent pregnancies in this population.

Keywords: Immigrant, adolescent, pregnancy

PP-27
Improving Breastfeeding Counseling Knowledge and Skills in Undergraduate Medical Students

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Objective: Physicians' practices play a crucial role in the promotion and support of breastfeeding. Their lack of education on breastfeeding undermines the practice of breastfeeding. Breastfeeding education should be included in medical school curriculum. We introduced a half-day breastfeeding counseling module at the 5th grade in 2013, during pediatric clerkship. This course addresses knowledge and skill based competencies. The aims of the study is to 1) provide baseline data on the medical students' knowledge, attitudes and comfort with basic breastfeeding topics 2) identify which factors might be predictive of students self-reported counseling behaviors.

Material & Methods: A test consisting of 15 - item questions to measure the breastfeeding knowledge, and counseling practices of students were introduced before and after the course. The content analyses and a comparison of pre and posttest answers were performed. Since the test points were not normally distributed, Wilcoxon test was used to compare the change between pre and posttests.

Results: A total of 457 students (52% female) participated the course during 4 educational years. The posttest score (95.4±7.4 points) was significantly higher than the pretest score (68.7±14 points), ($p<0.001$). Female students (71 points) scored significantly higher in the pretest compared to male students (66 points), but gender difference disappeared in the posttest. We randomly analyzed a subgroup of 136 of the records for content analyses. Our findings showed that medical students are not adequately prepared to counsel mothers about breastfeeding, lacking knowledge and confidence. However, the educational intervention significantly increased the knowledge and confidence of the students.

Conclusion: Our study showed that the majority of students were not comfortable with basic breastfeeding medicine and counseling. A more targeted educational intervention improved physician' knowledge, and confidence in breastfeeding counseling.

Keywords: breastfeeding, educational intervention, medical student training

PP-28
Social Media and Breast Milk: Does The New Doctor of Children Give the Right Knowledge?

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Objective: Social media has become a tool used by many mothers to create social bonds and to cope with the stress created by their responsibilities as a parent. In our country where breastfeeding rates are below the optimal requirement despite all the known benefits, it is obvious that breastfeeding related posts can contribute to raising awareness in social media platforms where information can reach too many people in a very fast way, and that it's contribution to this issue cannot be ignored. In this study we aim that to determine the extent of social media sharing about important issues like breast milk promotion, formula feeding and bottle feeding, only by analyzing Instagram accounts that share posts about child health and diseases.

Material & Methods: Accounts that share on child health and diseases in Instagram were found by using the hasthags: #cocuksagligi #pediatri #annesutu #emzirme #cocukdoktoru #cocukbeslenmesi and by scanning similar account suggestions. Accounts with over 1000 followers were included in the study. From 56189 posts, the posts that made about breastfeeding or giving information about breastfeeding, and the ones that about bottle feeding or formula, were given into two categories. The number of likes received by these posts and the inclusion rates in accounts in the study, were calculated and included in the statistics. Data were analyzed using SPSS 16.0 for Windows.

Results: 75 Instagram pages with more than 1000 followers have been reviewed. In accounts that have been analyzed; only 11 of the Instagram page owners (14.7%) were male and 62 (82.7%) were female. 60 (80%) of them have children. 54.7% of the whole group was employed in a job about healthcare and 8% of them have a job about education, 37.3% was from other occupational groups or housewives. The average number of posts per page is 743.77 (min 22-max 11349) and the number of posts related to breastmilk and bottle feeding is 9,80 (min 0-max 89) and 2,07 (min 0-max 9), respectively. The ratio of the posts associated with breast milk to all posts is 2.57 and the ratio of those related to infant formula is 0.75. Posts related to breast milk got 13693 like in average, posts related to infant formula/bottle feeding got 4373 like in average.

Conclusion: As a result of our study, it is seen that the benefits of breastmilk and the shares made about breastfeeding promotion are significantly higher when compared with the formula shares. It is also possible for physicians to make a difference by using one of the most important information platform of our time to share true and scientific knowledge with the community. It is obvious that the effective use of social media will make a difference in mass studies to increase breastfeeding rates and should be taken into consideration.

Keywords: anne sütü, emzirme, formül mama, sosyal medya, Instagram

PP-29
The Assessment of Services Provided to Children in Ankara Child Follow Up Center (2011-2015)

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Objective: Child sexual abuse is very important public health problem which affects not only victims and their family but whole society, social organizations, judicial systems, educational systems and business areas. According to the judicial process in Turkey, victims are investigated and examined many times, therefore, this process may lead to secondary trauma in the abused children. To reduce the problems in the process Child Follow up Centers (CFCs) are established. A variety of staff including public prosecutors, forensic interviewers, forensic science specialist, medical doctors and lawyers serve in the CFCs. Victims are forensic interviewed, general, forensic and psychiatric examination and family interview are performed.

The purpose of the research is to detect the process and the service satisfaction of the families of the children receiving services from the Child Follow up Centers, and also to increase the level of occupational satisfaction of the professional staff working in CFCs.

Material & Methods: The service and the process satisfaction of parents of the children who were forensic interviewed at Ankara Child Follow up Center. In addition to public prosecutors, lawyers, forensic interviewers and forensic science specialists working in CFC were assessed through questionnaires. Questionnaires for each occupational group are performed which also includes questions for service satisfaction (scoring from 1 to 6, 6 is the best) For this purpose, 86 families, 9 public prosecutors, 21 lawyers, 41 judicial interviewers and 17 forensic science experts participated in the research. The collected data were analyzed with the SPSS data program.

Results: The mean ± SD satisfaction of the families participating in the survey for the judiciary interview in CFC was found 5.73 ± 0.75 over 6; 5,62 ± 0,93 from the forensic examination, 5.77 ± 0.57 from psychiatric examination, 5.75 ± 0,52 from the general medical examination, 5.63 ± 0.98 from the family interview. 74 (86.2%) of families reported that the service they received met the requirements. All prosecutors, lawyers, judicial interviewers and forensic science specialist were generally satisfied about the CFC process.

Conclusion: The families of the victims were generally satisfied with the services provided in the CFCs which were established to prevent repeated questioning of the victims in the judicial process after explaining sexual abuse. Moreover not only the families but also the employees were generally found to be satisfied with the service. The lack of legal infrastructure was the main problem. To increase the satisfaction rates, arrangements should be made; duty definitions and standardization should be provided.

Keywords: Sexual abuse, forensic interview, Child Follow up Center

PP-30
Mothers' Awareness About Home Accidents Who Had Children At 0-6 Ages In Sivas And Factors Affecting Home Accidents In This Age Group.

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Introduction: Accident is any casual preventable event that is unplanned, unexpected, sudden and can result in injury or damage. Accidents that occur in or around the house are defined as "home accidents". Home accidents which account for about 25% of childhood accidents are an important public health problem for children. In Turkey, 45.5% of home accidents occurred in 0-6 age children. Our aim is to determine the frequency, the type and the risk factors for home accidents in Sivas. In addition, it is to investigate the relationship between the score of defining security measures for home accidents by the mothers who have a child under 6 years and the relationship between the child's perception of the situation and the home accidents.

Material & Methods: Our study is a questionnaire study and ethical approval was obtained from Cumhuriyet University Ethics Board. It was performed with the mothers who applied to Cumhuriyet University Pediatrics Clinic and who had children at 0-6 ages. Mothers who are not literate and do not agree to participate in the study are excluded. A 32-question questionnaire for home accidents prepared by the researcher was used in the study. There is "Child Character Detection Form" and "Scale for ıdentification of the safety measures taken by mothers to prevent home accidents in children in the 0-6 age group (SISMHA)" in the questionnaire.

Results: Our data are preliminary data obtained from 100 mothers of the ongoing study. The average age of the mothers is 29.78±4.82 years and the number of children is 2.01±1.01. The average age of the children participating in the survey is 2.69±1.73 years. The ratio of girls / boys is 39/61. 73% of the mothers are housewives and 71% of the children are looking after their mothers. Monthly income level is below minimum wage at 44%. 45% of the families own the house, 58% own the car. 39.7% of the families who have cars do not have a child car seat. 89% of the mothers think that they are taking measures to prevent accidents at home. 39% of the children were exposed to a home accident that required going to the hospital. The most frequent accidents were falls (48.9%), chemical-drug abuse (20.5%) and burns (10.3%). 31% of the children who have experienced home accident in the last 3 months. Accidents were most common in the sitting room (35.5%). The mean score of SISMHA was 177.40±13.94, which was significantly higher in mothers who stated that they were taking measures against home accidents and who have child car seat. The level of education of the parents, the number of children, the work of the mother, the monthly income level, the gender of the child, the level of perception of the child's character and the need for going to the hospital did not make a significant difference on this scale.

Conclusion: Home accidents are an important health problem especially in children aged 0-6 years. In order to prevent this, it is necessary to raise the awareness of the whole society on this subject.

Keywords: Home accident, children 0-6 years old, mothers, Sivas

PP-31
The Nutritional Properties Of The Kindergartens' Menus In Anatolian Side Of Istanbul

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Objective: In this study, it is aimed to determine the properties of menus offered in the private and state kindergartens in the Anatolian side of Istanbul and to meet the energy requirements of the preschool children.

Material & Methods: This cross-sectional descriptive study was carried out between November 2017 and May 2018 at the kindergartens from the randomly selected seven districts (Ataşehir, Kartal, Kadıköy, Ümraniye, Üsküdar, Pendik, Tuzla) located on the Anatolian side of Istanbul. A total of 343 kindergartens were held on the basis of the principle of homogeneity from 103 state and 474 private kindergartens. The study resulted in 210 kindergartens due to reasons such as not wanting to share their menus, not finding the time for the interview, or not wanting to be involved in the study. In order to be able to apply to the kindergartens in all districts in the province Anatolian side, the Istanbul Provincial Directorate of National Education gave permission for the study. Ethical approval was obtained from the Ethics Committee of Marmara University Health Sciences Institute. The frequencies of food servings were analyzed for meals such as breakfast, lunch, and mid-afternoon. The total daily amount of nutrient intakes calculated by using the Nutrition Information System (Bebis 7.2 Student) programme. Calculated data for this age group was evaluated in terms of the ratio of daily energy requirements were compared with Turkish recommendation for preschool children in Nutrition Guide-2015. Also; restricted food and beverages, food diversity, food groups, organoleptic properties, amounts and frequencies of menus items were also evaluated. Statistical analysis was performed using IBM SPSS Statics Version 16.0.

Results: In this study, while 78.6% of the menus of the kindergartens were provided in terms of color, 81% of them were paid attention to harmony. In 94.3% of the kindergartens, the menu included meals that children can consume comfortably. Pattern diversity was not achieved in 31.9% of the menus. 92.9% of the kindergartens participating in the study gave breakfast meals 93.8% of them had lunch. Only 1% of the schools offered a mid-morning meal and 0.5% dinner. The breakfast lunch and mid-afternoon menus of the kindergartens met the energy needs according to TOBR 26.1%, 29.5%, and 16,5% respectively. In this study, there were unhealthy foods such as sugared beverages (29.2%), ready-made fruit juice French fries (27.3%) and sweets (16.7%) in the menus. In 76.1% of the kindergartens, vegetables were given more than 3 times a week.

Conclusion: When planning the menu meals should be evaluated in terms of color, structure, consistency, flavor, preparation, cooking methods, service temperatures and distribution of all food groups. The menus prepared in accordance with these rules improve the healthy eating behavior of children and support their growth and development.

Keywords: Menu planning, preschool children, kindergarten

PP-32
Are Our Adolescent Girls Satisfied With Their Body Weight?

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Objective: In our study, it was aimed to determine the distribution of body weights, dietary habits, body perception, weight loss desire ratio and the methods used to lose weight among female students between the ages of 17-21 in Kırıkkale University. It is important to determine the current situation and to educate the young people in terms of protection from these damages caused by the distorted body perception in the adolescent age and the unconsciously used methods to lose weight.

Material & Methods: 100 female students participated in our study. The study was conducted with random sampling method, with volunteer participants. In the questionnaire applied to the participants, the individuals were asked about their general information, where they lived, how they found their body weights, their satisfaction with the body weights, whether they were trying to lose weight and the reasons for these efforts and the methods of weight losing efforts in this direction. The participants' anthropometric measurements (height, weight, BMI) were recorded. SPSS 16.0 statistical package program was used to evaluate the data.

Results: The mean age of the participants was 20.13 (± 1.63) years and the university education period was 2.37 (± 1.01) years. When the BMIs of the individuals were evaluated, it was concluded that 9% was underweight, 58% was normal, 21% was mildly fat/overweight and 12% was fat/obese. 6% of the girls who participated in the study said that they felt themselves underweight, 50% were felt normal and 44% felt overweight. Of the 6 girls who found their body weight underweight, 2 of them were, and 4 of them were normal, one out of 44 girls who think they are overweight, 13 is normal, 18 is overweight and 12 is obese. 7% of the participants were very happy with their body weight, 34% were happy, 51% were unhappy and 8% were indecisive. Results showed that more than half of the female students were unsatisfied with their body weight.

46% of the respondents stated that they are striving to lose weight. Of these 46 subjects, 20 tried to diet, 20 to sports and herbal supplements, 14 to weight-loss pills, 2 to psychological support and 1 to surgical intervention methods. 14% of the participants used weight-loss pills. 14 out of 14 people who use weight-loss pills stated that they learned about it from Internet. The diet that was sustained for the longest period of time that provided the most weight loss and maintained that weight loss for the longest time period was the diet that has been done with a dietician.

Conclusion: In conclusion, individuals should be made aware of the health problems that may occur as a result of wrong weight-loss practices. More research is needed on the positive and negative effects of plant supplements, safest way for their consumption and individuals' psychology of body weight perception should be examined more closely.

Keywords: BMI, weight-loss methods, female students, body perception

PP-33
D Vitamin Levels in Refugee and Turkish Children

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Objective: Changes in social life and lifestyle, decreased contact with the sun light, and type of nutrition may cause vitamin D deficiency. Although vitamin D is recommended as prophylaxis for babies in Turkey, it has the potential to be an important public health problem during childhood and adolescence and also due to migration from abroad.

Material & Methods: The files of the patients who applied to the general polyclinic of our hospital between June 1 and June 30, 2018 were retrospectively analyzed. Serum vitamin D results of the patients were recorded. Patients with rickets or bone disease were not included in the study. Sociodemographic characteristics of the patients were attained from the personal information section of their files. Serum vitamin D level less than 20 µ/L was defined as 'deficient', between 20 and 30 µ/L was defined as 'insufficient' and more than 30 µ/L was defined as 'normal.'

Results: During this period, laboratory results of 123 patients were investigated retrospectively. The mean age of the patients was 43.68 ± 41.9 (4-164) months and 56.9% were male. Turkish citizens consisted 58.5% of patients, 27.6% were Iraqi, and 13.8% were Syrian. The mean serum vitamin D of all patients was 22.09 ± 11.57 µ/L. The average vitamin D of the Syrian patients was 17.2 ± 9.7 µ/L, Iraqi patients' average was 17.7 ± 13.2 µ/L, and Turkish patients' average was 25.3 ± 10.1 µ/L. Vitamin D average of Syrian and Iraqi patients were significantly lower than Turkish patients' average ($p<0.05$). 70.6% of Syrian patients, 61.8% of Iraqi patients, and 33.3% of Turkish patients had vitamin D deficiency ($p<0.05$); 23.5% of Syrian patients, 26.4% of Iraqi patients and 37.5% of the Turkish patients had insufficient levels of Vitamin D.

Conclusion: Although Turkey is a rich country in terms of sun light, vitamin D deficiency is still observed among Turkish citizens and it is even a bigger problem among refugees. We think that it is especially important to evaluate the refugees in terms of vitamin deficiencies and provide them with necessary supplements.

Keywords: Vitamin D deficiency, refugee

PP-34
The Latest Situation of Chickenpox in the Post-Vaccination Period in Turkey

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Objective: Chickenpox is a viral infectious disease capable of causing severe morbidity, and even mortality. The purpose of this study was to determine the current position and demographic characteristics of cases of chickenpox following the addition of chickenpox vaccination to the routine vaccine schedule in Turkey.

Material & Methods: Patients aged 0-17 years presenting to Adiyaman University Training and Research Hospital Pediatrics clinics and diagnosed with chickenpox between January 2013 and December 2016 were included in the study. Data were analyzed on Statistical Package for the Social Sciences (SPSS, version 22.0, Chicago, IL, USA) software. $p<0.05$ was regarded as statistically significant.

Results: Three hundred and fourteen patients diagnosed with chickenpox were included in the study. Mean age of the subjects included was 84.76 ± 41.67 months, and 54.1% were male and 46.9% female. A significant difference was observed between the groups in terms of age ($p=0.001$). Cases' ages decreased on a year-by-year basis. Fifty (15.9%) cases of chickenpox were identified as having been infected despite vaccine. A significant difference was determined between the mean ages of vaccinated and non-vaccinated patients with chickenpox.

Conclusion: Although the addition of a single dose chickenpox vaccine to the national immunization schedule in Turkey reduces both severe complication and the incidence of the disease. In the light of our study we think that the addition of a second dose of chickenpox vaccination to our routine vaccine schedule will further reduce hospitalization numbers resulting from chickenpox-related complications. More comprehensive studies on the subject are now needed.

Keywords: chickenpox, child, varicella, vaccine.

PP-35
The Relationship Between Sleep Disorders and Social-Emotional Problems in Preschool Children

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Objective: Sleep creates an opportunity for the body to regain its energy, its normal processes, and to support physical growth and mental development. Sleepiness manifests usually irritability, behavioral and emotional problems, poor academic performance and learning difficulties.

The prevalence of sleep problems has been reported to range from 25% to 50% among typically developing children (TDC). Children with neurodevelopmental delay (NDD) may have higher risk of sleep problems in comparison with TDC. Between 50% to 95% of children with NDD have a sleep disorder.Poor sleep in children with NDD has been associated with impairments in many areas of functioning so these high rates are extremely concerning.

The aim of the study was to examine the association between sleep parameters and social-emotional development in preschool TDC and children with NDD. Here only the preliminary results are presented.

Material & Methods: METHODS:The study included 128 children [TDC:61, NDD:67 (Autism spectrum disorder:17, Global developmental delay :28, Language and speech disorder:22)]aged between 3 and 6 years. Parents completed the Childhood Sleep Habits Questionnaire (CSHQ) in order to evaluate sleep disturbances. Ages and Stages Questionnaire: Social Emotional (ASQ:SE) scale were filled out by the mothers and were used to assess social-emotional development. ASQ-ES score above the cut-off value indicates a risk for social emotional problems. The sociodemographic information were collected by a questionnaire.

Results: Sleep problems were reported in 52.5% of TDC and 77.6% of children with NDD. The median values of CSHQ total scores were 43 and 45 respectively in TDC and NDD groups (p= 0.148). The ASQ-ES score was found to be above the cut-off in 6.6% of TDC group, and in 35.8% of children with NDD.

The relationship between sleep and emotional-social problems was further evaluated; the median values of ASQ-ES score were found to be 20 and 25 respectively in TDC without sleep problems (n=29) and with sleep problems (n=32) (p> 0.05). The median of the ASQ-ES score in the NDD group with no sleep problems (n=15) was 25, while the median of the ASQ-ES score was 52.5 in NDD children with sleep problems (n=52) (p <0.001).

Total sleep duration of the children in both groups were similar (p>0.05, median:10, 10.5h respectively in TDC and NDD groups,)

Children ‘s total sleep duration was categorized as <9 hour (n=26), 10-11 hours (n = 67) and >11 hours (n=32), there were no statistically significant differences between the TDC and children with NDD (p > 0.05) for the number of children in each category. The median score of ASQ-ES score of <9 hour sleepers was 42.50, the median score of ASQ-ES of 9-11 hour sleepers 40 and the median score of ASQ-ES score of >11 hours sleepers 17.50 (P <0.001).

There were 83 children who were reported to awaken after sleeping, it was seen that 16 children stayed awake for >30 min, and 75% of these 16 children had NDD. The ASQ-ES scores of those who were awake for >30 min were higher than ASQ-ES scores of those who were awake for < 30 min (p <0.001). In children with NDD ,there was also a statistically significant difference between the ASQ-ES scores of children who were awake for <30 min and >30 min (respectively median:45, 90 p=0.022) .

Conclusion: In children with NDD, sleep problems are seen more frequently but a significant number of children with TDC have sleep problems. Sleep problems in children with NDD increase emotional social problems, there is need for more samples to be able to make a conclusion for TDC.

Keywords: Emotional social problems, Neurodevelopmental delay, Sleep disorder

PP-36
A Retrospective Analysis of Child Abuse And Neglect in Turkish Medical Students

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Objective: Child abuse and neglect is an important health and social issue both in the world and in Turkey. We do not have certain and sufficent data for the prevalence of child abuse in our country. We need more studies to be done with internationally accepted instruments.

We aimed to estimate the prevalance abuse and neglect during childhood among first year medical students in our Faculty. We also aimed to contribute to data pool for determination of the prevalence of child abuse in Turkey.

Material & Methods: This study was reviewed and approved by our Ethics Committee for noninvasive clinical research. All participants gave written informed voluntary consent. A cross-sectional study was conducted. We used an international instrument, child abuse screening tool –retrospective(ICAST–R) designed by The International Society for Prevention of Child Abuse and Neglect (ISPCAN). The relationship between socio-dermographic features and child abuse and neglect was also examined for determining social risk factors that may cause abuse and neglect.

This study was reviewed and approved by our Ethics Committee for noninvasive clinical research. All participants gave written informed voluntary consent. A cross-sectional study was conducted. We used an international instrument, child abuse screening tool –retrospective(ICAST–R) designed by The International Society for Prevention of Child Abuse and Neglect (ISPCAN). The relationship between socio-dermographic features and child abuse and neglect was also examined for determining social risk factors that may cause abuse and neglect.

Results: Of 173 students who completed the survey, 51.4 percent was found to be subjected to at least one type of child abuse (physical, emotional or sexual). The prevalence was higher in male gender and the difference was statistically significant. Physical, emotional and sexual abuse exposure rates were found to be; 23.1, 40.5 and 11 percent, respectively. Physical and emotional abuse rates were higher in male gender and the difference was statistically significant. We did not found a statistically significant association with gender and sexual abuse.

Conclusion: Efforts to prevent child abuse and neglect are growing in our country. But yet it is seen frequently as an important problem. It is important to determine the prevalence and risk factors for child abuse to raise awareness. We need further studies investigating not only prevalence but also risk factors to have reliable data for our country.

Keywords: Abuse, neglect, ICAST-R, young adult, prevalence

PP-37
The Relationship Between the Discipline Behaviour and Dysfunctional Family Structure

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Objective: Discipline is an important concept for the growth and development of children. Every child who grows healthy needs disciplinary rules suitable for the ages and the development process of the child that is set by the families. Families who do not comply with the development of children may exhibit traumatic emotional or physical behaviors. These behaviors may be related to many independent factors, events and situations that disrupt family structure and functioning. In this study, it was aimed to determine the discipline understanding of families and different disciplinary approaches, to evaluate these practices in terms of child abuse and to evaluate the effects of the dysfunctional family structure on the disciplinary understanding of families.

Material & Methods: The study included 400 parents (mothers / fathers) having children between 1-18 years of age and admitted to our hospital for follow-up or acute disease between January 2018 and May 2018. A questionnaire including demographic data was applied to the participants. By a disciplinary applications questionnaire, physical and emotional neglect and abuse were considered. According to the answers to the grouped questions, participants were grouped as individuals with emotional neglect and abuse / physical neglect and abuse risk. The study was confirmed by the ethical committee. The written informed consent was taken from the participants.

Results: According to the results, 329 (82.3%) of the parents were found to be risky for emotional neglect / abuse in the terms of disciplinary method. For the physical neglect / abuse, the number of parents who answered the questions as a discipline method was 126 (31.5%). All of the parents who were identified as risky individuals for physical neglect / abuse were found to be risky individuals in terms of emotional neglect / abuse ($p < 0.001$). The parents having risk for physical and emotional neglect/abuse reported to be experienced physical abuse in their first 18 years of life was found to be significantly higher than the parents who did not have a risk of behavior ($p < 0.05$). The proportion of parents who found physical punishments as a discipline method was found to be significantly higher when compared to parents who had no risk of behavior in parents with physical negligence / abuse behavior ($p = 0.004$). Parents physically punished as children had a significant risk for both physical and emotional abuse ($p < 0.05$). It was found that the level of physical punishment experienced as a child was significantly higher as a discipline method in the parents who had physical neglect / abuse behavior risk ($p = 0.001$). A significant increase in emotional neglect / abuse was found in patients with small family structure ($p = 0.047$).

Conclusion: Parents who had dysfunctional family structure in their childhood were found to have emotional and physical neglect / abuse risks in terms of the discipline methods to their children. Families tend to accept risky behaviors considered as emotional and physical neglect / abuse as a discipline method. Regardless of the education level of families, children should be informed in terms of development stages, age-appropriate discipline practices.

Keywords: children; disipline; family structure; child abuse

PP-38
Early Regulatory Problems and Associations With Parenting Styles

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Objective: Early regulatory problems are difficulties for infants in adjusting to the environment and self-regulation. It is suggested that excessive crying, sleeping, or feeding problems may predict behavioral problems later in childhood. Besides, they also put strain on parents and may impact parenting styles. In this study we aimed to investigate certain regulatory problems in infants and associations with parenting styles.

Material & Methods: Mothers of healthy 6-36 months old children were assessed during their well child visits by a questionnaire on regulatory disorders. Parenting styles were evaluated by Parenting Attitude Scale, which determines parenting attitudes towards children with subscales measuring overprotective, permissive, democratic and authoritarian parenting. The study was approved by the local ethics committee.

Results: In a cohort of 141 children at a median age of 17 months [Interquartile range(IQR): 13.0-30.0] prevalence of regulatory problems was as follows: sleep problems 30.5% (n=43), feeding problems 27% (n=38), discipline problems 20.6% (n=29) and excessive crying 13.5% (n=19). Mothers of 58 children (41.1%) reported no regulatory problem while 32 mothers (22.7%) reported more than one problem. Crying and discipline problems was associated with higher scores of overprotective (p=0.043 and p=0.028) and authoritarian (p=0.003 and p=0.019) parenting, feeding problems with overprotective parenting (p=0.038) and sleep problems with permissive parenting (p=0.029). Mothers expressing one or more regulatory problem had higher overprotective parenting scores when compared to mothers reporting no regulatory problem (p=0.004).

Conclusion: In a cohort of Turkish infants, sleep problems are the most common regulatory disorder and mostly associated with permissive parenting. This may be explained by inability to follow regular sleep routine by permissive parents. Discipline problems are common in authoritarian parents and overprotective parenting are mostly associated with multiple regulatory problems. Education of parents about parenting may be helpful in the management of infant regulatory problems, and thus prevent future behavioral problems in the children.

Keywords: Infant, early regulatory problems, early child development.

PP-39

Factors Affecting Suicide Related Thought and Behavior in Adolescents Admitted to Child Advocacy Center

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Objective: Sexual abuse is a traumatic event and known to be a risk factor for suicidal thought and behaviour for all age groups. Especially, adolescence is the most common period that suicidal thoughts and behavior occur independent from other factors. The aim of this study is to evaluate suicidal thoughts and behavior with respect to sociodemographic features, depressive symptoms, hopelessness and self-esteem, in order to determine predictors of suicidal thoughts and behavior among adolescent victims of sexual abuse who were admitted to Child Advocacy Center.

Method: Sociodemographic data of sexually abused adolescents who were between 14- 18 years of age and had been admitted to Izmir Child Advocacy Center between August 01, 2016- January 31, 2017, were recorded. All participants were asked to fill up Suicidal Behavior Evaluation Form (SBEF), Beck Hopelessness Inventory (BHI), Beck Depression Inventory (BDI) and Coopersmith's Self-esteem Inventory (CSI). The relationship between sociodemographic data, inventory scores and suicidal thoughts and behavior were evaluated.

Results: One hundred twelve adolescents were enrolled to the study but 12 of them were excluded due to insufficient data and study group consisted 90 sexually abused adolescents (mean age: 15.6±1.2; M/F:2/88). The rate of having suicidal thoughts or behavior was 26.6% in the study group. Being raised by a single parent, lower maternal education levels, dropping out of school, living in rural parts of the city, being the middle child of the family, high BHI and BDI scores and low scores on CSI were found to predict increased risk of suicidal thoughts and behavior, among sexually abused adolescents.

Conclusion: Beyond many adverse health outcomes, suicidal behaviour is the most fatal result of trauma. The rate of suicidal thought and behaviour is found to be high compared with literature probably due to wide perspective of suicidal thought in the study concept. The results of this study showed that some sociodemographic features including family and school environment might create certain effects on suicidal thoughts and behavior among sexually abused adolescents. Moreover, it would indeed be safe to conclude, multidimensional evaluations via instruments such as BHI, BDI and CSI are efficient tools to determine suicidal thought and behavior and to prevent fatal consequences of sexual abuse, namely suicidal behavior.

Key Words: Child advocacy center, sexual abuse, adolescent, suicide

PP-40

Effects of Sociodemographic, Familial and Individual Characteristics on Frequency and Onset Age Of Video Gaming in Children

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Aim: Video gaming is an activity increasing from year to year among children. The aim of this study is to investigate the effects of sociodemographic, familial and individual characteristics on frequency and onset age of video gaming in children.

Material & Methods: Our study was designed as a cross-sectional descriptive study. This study was carried out in four secondary schools with different sociodemographic characteristics between January 15, 2018 and January 30, 2018. Permission to carry out the study was approved by Afyon Kocatepe University's Clinical Research Ethics Committee (No: 2018 / 1-14 dated 05.01.2018). A structured survey was applied to the parents who agreed to participate.

Results: 297 parents with healthy children were included in the study and 245 (82.5%) of them reported that their children are video gamers. We determined that students who were male, aged <12 years, with ≥2. birth order and having only one sibling were significantly more video gamers ($p<0.001$, $p= 0.038$, $p= 0.009$, $p=0.035$; respectively). We found that presence of internet access at home and ownership of a private computer were also enhancing factors on video gaming ($p=0.011$, $p= 0.009$; respectively). The use of social media by the students and their siblings, as well as play of video games by parents and siblings were identified as risk factors ($p=0.002$, $p=0.001$, $p=0.002$, $p<0.001$, respectively). Multiple logistic regression analyse showed that being male, being under 12 years of age, having only one sibling, presence of internet access at home, the use of social media by the students, play of video games by siblings and parents increased the frequency of video gaming of participants ($p<0.01$). Sociodemographic, familial and individual factors affecting onset age of video gaming of participant students were analysed with Kaplan-Meier Test. We found that being male, having internet access at home, ownership of private computer, tablet and game console, the use of social media by the students and their siblings, play of video games by siblings and parents were related with age of earlier onset (<0.05).

Conclusion: Present study showed that video gaming is a frequent habit in Turkish secondary students and revealed the risk factors related to the habit of video gaming. This study also identified factors associated with the earlier age of onset of video gaming. Further prospective and nation-wide studies are needed on this area.

Keywords: Video gaming, Children, Onset age

PP-41
Evaluation of Refugee Pediatric Patients Hospitalized in a Tertiary Pediatric Hospital

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Objective: In the 7th year of the war in our neighboring region, according to the latest data, our country is the only country that hosts the most refugees with 3.5 million people. During this period, refugees were provided required protection, food and health services. Out-patient and preventive health services were given to the refugee people. But for the patients who need further treatments, surgical interventions and intensive care services are applied in a proper way. The aim of this study was to evaluate the demographic characteristics, diagnosis and treatment options of refugee pediatric patients hospitalized in a tertiary pediatric hospital.

Material & Methods: Between January 2013 and January 2018, the patients who were hospitalized in refugee status were evaluated retrospectively from the hospital electronic record systems. Demographic characteristics, diagnosis and treatment processes of the patients were recorded.

Results: Of the 12,031 children hospitalized for 5 years, 728 (6%) were refuges. Over the years, the ratio of refugee patients who are hospitalized has increased from 1.4% (30/2094) to 12% (366/3036). Of the patients, 340 were female (46.70%) and 388 (53.29%) were male. The median age of the patients was 3 years, 9 months and 14 days (minimum 31 days - maximum 17 years and 11 months). The mean hospitalization period was 11 days (minimum 1 day - maximum 94 days). The nationality of the patients was Syria in 465 patients (63.87%), Iraq in 174 patients (23.9%) and Afghanistan in 39 patients (5.3%). Among all, 211 (28.98%) patients needed the support for intensive care. Of the patients, 16.5% of the hospitalized patients died. The most common cause of death was sepsis. The overall mortality rate in whole hospitalized patients was 4,8%. Extracorporeal Membrane Oxygenation (ECMO) was applied to 5 patients. Forty patients underwent surgery, 40 patients underwent cardiovascular operations and 24 patients underwent cardiac angiography. The most common reason for hospitalization was infections by 372 patients (51%). The lower respiratory tract infections were the most common infection in hospitalized patients. The other reasons were followed as sepsis, urinary tract infections and acute gastroenteritis. The patients had more than one diagnosis due to their comorbid conditions.

Conclusion: All treatment modalities including surgical interventions were applied to refugee patients in addition to the required treatments. Refugee patients experience have comorbid conditions and complications. Over the years, the rate of admission refugee patients has increased. Mortality rates were higher in patients who needed intensive care.

Keywords: Refugee; children; hospitalization; tertiary hospital

PP-42
Household Product Exposures in Pediatric Patients: Clinical Outcomes and Prevention

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Aim: Household products are easy to reach everyday products which account for almost half of toxic exposures. Most of these patients are safely discharged but in a small group of patients, serious complications can be seen and admission to intensive care unit can be necessary, resulting in in morbidity and rarely in mortality, therefore it is important to be aware of clinical characteristics and clinical outcomes to use effective treatment and preventive measures.
Our objective was to study clinical characteristics and clinical outcomes of these group of patients.

Material and Methods: The study was designed as retrospective cohort study. All patients between 0 and 18 years old presented to Pediatric Emergency Department (PED) between May 1st 2016 and April 30th 2017 with a complaint of acute exposure were included in the study. Patients with chronic intoxications, food intoxications, intoxications from an unknown material and patients with illicit drug use were excluded from the study.

Age and gender of the patient, type of toxic compound, route of toxic exposure (oral, inhalational or cutaneous), way of exposure (intentional or accidental), presence of cardiovascular, neurologic, respiratory and gastrointestinal findings, admission state (either pediatric ward or pediatric intensive care unit), length of stay either in emergency unit or pediatric ward and final outcome were recorded for each patient.
The study was reviewed and approved by Baskent University Medical Review Board at July 17th 2018 with assigned project number KA 18/218.

Results: In one year period, 676 patients presented to PED with toxic exposures (0.52% of all patients), 44% of them were nonpharmaceutical exposures, most commonly cleaning products (49.5%), followed by carbon monoxide (19.2%), thinner and other hydrocarbon products (5.5%), cosmetic products (5.2%) and ethanol and acetone (4.8%).

Fourty three percent of patients were girls and median age of patients in this age group was 3 years old (range 0-18 years,). Most common route of exposure was oral route (73.2%) followed by inhalational route (26.8%) and most of exposures were unintentional (97.9%). Respiratory symptoms were the most common manifestation (4.8%), followed by neurologic, cardiac and mucosal manifestations (2.4%), gastrointestinal manifestations were seen only in three patients (1%). Fifty seven percentage of patients were hospitalized, one patient admitted to Pediatric Intensive Care Unit (PICU). None of the patients died.
When compared with pharmaceutical exposures, observation period of patients in household group was shorter and less patients in household group were admitted to PICU. Cardiac manifestations were seen more in household group.

Conclusion: Household toxic exposures are common childhood injuries that usually happen unintentionally at home.Our results showed that unintentional exposures are significantly more in non pharmaceutical group. Unlabelled products used at home can increase the risk of non pharmaceutical exposures. Although mortality risk of pharmaceutical exposures is higher, household toxic exposures can also result in

significant clinical manifestations therefore identifying the source of exposure and intervening to remove the source result in significant decreases in poisoning cases. To prevent household exposures, characteristics should be studied in detail and parents should be educated about the potential sources of exposure and necessary precautions to avoid unintentional exposures.

PP-43

The Evaluation of the Possible Effective Factors on The Speech and Language Neurodevelopment in Healthy Children Aged 13-24 Months

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Aim: Speech and language neurodevelopment is influenced by parental and environmental factors. It is very important to know the affecting factors at early stages of children with a risk of speech and language neuro developmental delay. The aim of this study was to determine the factors that may affect the speech and language neurodevelopment in healthy children aged between 13-24 months.

Material & Methods: The study was carried out with 222 healthy children aged between 13-24 months whose parents agreed to complete the questionnaire form in Gaziantep University, Faculty of Medicine, Department of Paediatrics. The questionnaire form consists of two parts. The first part included questions on socio demographic features of families. The second part included questions about the age of the starting speech and the factors that could be effective. All data were evaluated in SPSS 22.00 software program. The $P<0.05$ values were considered statistically significant.

Results: The mean age of the children was 19.62±3.65 month (13-24 months). The mean age of the starting the meaningful words was 12.11±3.05 month (5.0-20.0 months). The mean age of the starting the meaningful sentence with two words was 17.49±3.64 month (9.0-24.0 months). In children with working mothers age of the starting the meaningful words was lower than housewife mothers (working mothers: 11.50±2.85 month (5.5-18.0 month); housewife mothers: 12.42±3.11 month (5.0-20.0 month); p= 0.029). In children with consanguineous parents age of the starting the meaningful words was lower than non-consanguineous parents (with: 12.91±2.64 month (5.0-18.0 month); without: 11.89±3.13 month (5.5-20.0 months); p=0.030). The mothers who reading a book/listening to music/playing toys with her child was the effective factor on the age of the starting speech ($p<0.05$). There was a negative correlation between parental age and age of the starting the meaningful words ($p<0.001$).

Conclusion: Determining the affecting factors on the speech and language neurodevelopmental delay could be important in preventing health problems of the children in the later stage of life. The parental age, mother's working status, consanguinity in parents, reading a book/listening to music/playing toys with the child may be an effective factor on the speech and language neurodevelopment in healthy children. But, this is a preliminary study, further studies are needed in large series.

Keywords: Children, speech, language neurodevelopment

PP-44
Denver Developmental Test Findings of Children with Growth Failure: One-Year Results of a Single Center

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Objective: Growth and development are parallel childhood processes. Growth failure is often accompanied by neuromotor and mental developmental delay at early ages. The aim of this study was to investigate the findings of Denver II Developmental Screening Test of children with growth failure.

Material & Methods: Children who applied to pediatric outpatient department in 2018 with inappetency, failure to thrive complaints and poor nutritional history were evaluated. Growth failure criterias were accepted as following: weight for age <3 percentile or weight for length/height <5 percentile or no adequate weight gain in last 2 months or percentile loss more than two major percentiles in last 6 months. Denver II was applied to children at the time of growth failure diagnosis. If acute or chronic systemic / infectious / inflammatory disease, malabsorption syndrome, endocrinopathy, metabolic disorder, parasitosis, Celiac, food allergy, gastro-oesophageal reflux disease or gastrointestinal tractus anomaly were detected by physical examination and diagnostic procedures, Denver II results of these sick children were excluded. Denver II data and anthropometric measurements of children who had no perinatal risk factors, who were born at term and with average birth weight, who were breastfeeded at least 4 months, who had no hospitalization or trauma history, who had normal vision and hearing were investigated, retrospectively.

Results: There were 40 children who met the inclusion criterias at the age of 4-72 months. Fifty-two and a half percent of children was female, median age was 20.25 months. Mean SDS values of weight for age, lenght /height for age, weight for length/height, head circumference for age, arm circumference for age, triceps skinfold for age were -2.57±1.01, -1.22±0.89, -2.04±1.42, +0.38±0.64, -1.77±1.22, -0.97±0.35, respectively. Mean hemoglobine value was 11.5±0.8 g/dL, median ferritin value was 20.7 ng/mL. Median values of vitamin B12, folate, vitamin D were in normal range. Developments of 8 (20%) children could not be tested by Denver II. Six children (18.7%) had abnormal, 14 (43.7%) had risky, 12 (37.5%) had normal findings on the Denver II results. Language skills were normal in 78.1%, abnormal in 3.1%, risky in 18.7%. Personal-social skills were normal in 93.7%, abnormal in 3.1%, risky in 3.1%. Fine motor skills were normal in 84.3 %,abnormal in 6.2%, risky in 9.3%. Gross motor skills were normal in 53.1%, abnormal in 9.3%, risky in 37.5%.

Conclusion: In children with growth failure underweight, wasting and decreased muscle mass may adversely affect gross motor skills, especially. Children with growth failure are at risk of developmental delay, so it would be right to follow up their neuromotor development by using screening tests since early infanthood. Denver II can be used as a valuable developmental screening tool.

Keywords: Child, Denver II, Development, growth failure

PP-45
Development of a Training Material for Healthcare Professionals to Educate Parents During Healthy Child Visits for the First Five Years of Age

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Objective: Healthcare professionals are consultants on issues like breastfeeding, security and vaccination during healthy child visits. It's easier to explain if visual materials (like pictures) are used during these consultations. With the use of material, it's easier for parents to understand and remember the key points of these consultations. The material includes brief texts and tables to emphasize the pictures and also help healthcare professional to remind the main issues about the topic.

Material & Methods: The most important consultations and mostly needed topics by parents are; breastfeeding, how to start complementary feeding and healthy feeding habits, security, vaccination, sleeping problems, dental health, toy choices, how to play and how to support children's development. A professional advertisement company involved for the design of the training material. Images emphasizing the topics were described and those were drawn by an artist. The text and tables behind the images were selected according to the needs of healthcare professionals and parents.

Results: Training material has been started being used by healthcare professionals during healthy child visits in Istanbul University Istanbul Medical Faculty Hospital and Marmara University Marmara Medical Faculty Hospital. Istanbul Provincial Health Directorate decided to distribute the training material to 4000 family health centers and systematic training of the healthcare professionals were planned in those centers.

Conclusion: This well designed, easy to use training material with lots of images and valuable information will be helpful for healthcare professionals in well child visits to address frequently asked questions. Collecting the feedbacks will be helpful to improve the efficacy of the material and that is planned for the next step.

Keywords: development of training material, well child visit, healthcare professionals

PP-46
Autism And Stigma: Parents Of Children With Autism in Lagos, Nigeria

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Objective: Stigma is one of the most difficult aspects of public encounters experienced by families of children with disability. The parents might be subjected to stigma due to the public's misconception of their lack of control or discipline over their children with autism. The aim of this study was to evaluate perception of social stigma of parents of children with autism.

Material & Methods: This qualitative study was conducted at a speech and language center in Lagos, Nigeria with parents of children diagnosed with autism via in-depth interviews. The content of the interviews was considered to be saturated when no new content was gained from participants. Therefore, after five interviews data collection was ended. A semi structured question guide was used. Oral and written informed consent was obtained from the study participants. The recordings were transcribed with permission and thematic analysis was done to categorize the data for better interpretation. Ethical approval to our study was granted by the Ethical Committee of Marmara University School of Medicine.

Results: Most of the parents said that the reason they sought for medical intervention was due to the speech delay of their child. Upon receiving the diagnosis most parents were distraught and the mothers took it harder than the fathers who tried their best to be supportive. Also, even though the health personnel didn't stigmatize the parents of the children, most of the parents felt that health personnel were not knowledgeable enough about autism and as a result they felt that they lost out on the benefit of early intervention for their children. Most parents had enlightened family members and as such suffered little or no stigma in their families, but this could not be said of the society in which the lived in. The communities were the major sources of stigma often labelling not just the child but also the parents. In the schools most teachers according to some of the parents often neglected the children and left them to themselves at the back of the class.

Conclusion: In this study we discovered that acceptance of the diagnosis of autism for the various parents was a major turning point, it made most families closer as they struggled to make sense of what they couldn't understand while some folded up for the same reason. We also discovered the importance of education and awareness about autism in communities, as where these were present, the amount of stigma faced by the parents were decreased. The stigma against parents of autistic children is real, and even in societies where about 50 percent of people are literate it is still present. Because of this there is often a delay in diagnosis and early intervention for autism is necessary in prevention a worse prognosis.

Keywords: Autism, Stigma, Qualitative, ASD, Speech and Language Center

PP-47
Immunisation Practices in Children With a History of Allergies

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Objective: Immunisation is the most important primary care health measure for the prevention of certain infectious diseases. In the presence of food allergies, especially egg allergies, primary care providers in Turkey avoid vaccine administration and refer the children to the tertiary health care centers. In this study, we retrospectively evaluated the characteristics of children, who had allergies or suspected allergies and referred to our well child clinic in a university hospital for the administration of their vaccines. We aimed to develop a protocol for the immunisation of children with a history of allergies.

Material & Methods: Charts of all children, who were referred to our outpatient clinic due to concerns for allergies in the last two years were retrospectively reviewed. Data regarding age, sex, allergy history, delay in the administration of vaccine, laboratory test results, referral of which vaccine, opinions of allergists before immunisation and reactions after immunisation were extracted from the charts. The study was approved by the local ethics committee.

Results: A total of 122 children with or without an allergist made diagnosis of allergies were referred by their primary health care providers. According to families' statement and notes from family physicians, 47 children (40.9%) had reactions with egg, 40 (34.8%) with multiple foods, 9 (7.8%) with milk, 8 (7.0%) with a previous vaccination,1 (0.8%) with medicine and in the remaining children the offending agent was either unknown or the data was unavailable in the charts. The most common reported reaction was rash (n=84, 68.8%). Only 9 children had a history of anaphylaxis. Egg white allergy was positive in 51 (54.3%) children and 24 (19.7%) children had positive testing for egg yolk. Most of the children (n=90, 73.8%) was referred for all of the 12th month vaccines, followed by only measles mumps rubella (MMR) (n=20, 16.4%) vaccine. Median delay in the administration of MMR vaccine was 20.0 days (Interquartile range 8.7-41.2). Twelve children were undergone skin prick testing with the vaccine (8 with MMR). In 6 children (4 with MMR and 2 with 4th month vaccinations), vaccines were administered in increasing amounts according to allergists suggestions. No allergic reaction was observed after vaccine administration except for one child reporting a slight rash several hours after MMR vaccination.

Conclusion: Food allergies, especially egg allergy, are the most common barrier of vaccine administration in children referred from family physicians to our outpatient clinic. Given the absence of any reactions, our practice supports the administration of MMR vaccine in primary care centers even in egg allergic children to prevent delays in national vaccine schedule. However, we suggest for objective evaluation of children with suspected food allergies to resolve family concerns. Allergy history with a previous vaccination needs yet to be definitely evaluated by allergists and careful vaccine administration.

Keywords: Immunisation, children, measles mumps rubella, allergy, egg

PP-48

How We Use the Microcephaly Algorithms in Well-Child Visits?

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Objective: Microcephaly is defined as a head circumference more than two standard deviations below the mean for each gender and age. It is really important neurological sign and predictor of future disability. One of its diagnostic difficulties lies in the ranks of the head circumference reference against which we measure each child. The WHO developed universally and also we have our national growth curves. The classification of the microcephaly in primer (congenital) and seconder (postnatal) makes it possible to define the etiology, the associated symptoms and the prognosis. The evaluation of a child with microcephaly requires a thorough analysis of its history, clinical examination and if necessary, it is required some blood tests, X-rays or genetic tests. Depending on the cause and severity, children with microcephaly may have different problems such as totally normal or intellectual disabilities, development retardation, epilepsy, cerebral palsy, as well as vision and hearing disorders. The microcephaly requires crucially careful for initial assessment and following for especially for pediatricians or family physicians.

In this study, we aimed to describe how we use the microcephaly algorithms in our well-child clinic.

Material & Methods: This descriptive clinical study was carried out in the well child unit of a medical faculty hospital. The health records of the children who visit at least one time in the last year were reviewed. The records of children with the diagnosis of head circumference were evaluated until 2 ages. Repeated measures mixed model was used to examine the longitudinal anthropometric data.

Results: Forty three children had followed with microcephaly. Eight of them were premature and 5 of them were down syndrome and they were excluded because their head circumference didn't diagnosed of microcephaly according to their special curves. Thirty of them analyzed retrospectively. Thirteen(%43) of them are male. Five (%16,6) of them are familial microcephaly with normal intelligence. The etiology of the other cases were slightly different each others.

Conclusion: Microcephaly is a rare condition but also popular topic especially after Zika Virus. On the other hands it is often associated with symptoms of neurological impairment including seizures and may also be associated with developmental delay, intellectual impairment, problems with vision, hearing and feeding. For this reason this cases can detected and followed up carefully in well-child visits.

Keywords: Algorithm of Microcephaly, well-child visit, etiology

PP-49
Relationship Between Anxiety Depression and Smart Phone Use in Children Aged Between 6-18 Years Old

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Objective: The aim of this study was to evaluate the relationship between using smart phone and social media applications with anxiety and depression states of children aged between 6 - 18 years old.

Material & Methods: Our study was conducted between April 4, 2017 and March 20, 2018 who were admitted to the outpatient clinics of Namik Kemal University who were aged between 6-18 years old and did not have any psychiatric disease, did not have any chronic diseases and did not use any psychiatric medication. Patients were assessed by questionnaires and scales containing sociodemographic information. The Sociodemographic Data Form consisting of 23 questions was filled in by filling in the information from the participant and participant families. Depression Scale for Children (CDS) as a depression scale; State and Trait Anxiety Inventory STAI I-II were used as anxiety scale. The data obtained from the study were evaluated using the SPSS (The Statistical Package for Social Sciences) 17.0 package program.

Results: Male respondents were 45.2% whereas 54.8% of respondents were female. The mean age of the males (n = 184) was 13,86 ± 2,991 while the mean age of the females (n = 223) was 13,87 ± 2,767. 71.7% (n = 292) of participants had mobile phones. 65.6% (n = 267) had a smartphone while 6.4% (n = 26) was not a smartphone. There were 230 people on the phone with internet packages, which accounted for 56.5% of the participants. WhatsApp was found to be the most frequently used application in 36.1% (n = 147). Instagram with 14.5% (n = 59), facebook with 5.7% (n = 23), other applications with 2.7% (n = 11), at least twitter with 0.7% (n = 3) ratio. According to our statistics, the use of social media on mobile phones and the use of smartphones causes a significant increase in anxiety depression scores.

Conclusion: In children with using smart phone and it's applications significantly increased depression and anxiety. So, families and young people should be more careful about using social media and smartphones.

Keywords: smartphones, social media, anxiety, depression, children

PP-50
Two Cases Of Gastroesophageal Reflux Disease Presenting With Apnea And Cyanosis

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Objective: Gastroesophageal reflux disease (GERD) is defined as the presence of complications associated with gastroesophageal reflux.

Material & Methods: Herein, we present two cases of gastroesophageal reflux disease presenting with apnea and cyanosis.

Results: The first case, 35-day-old male infant, was hospitalized due to perioral cyanosis during feeding. Her medical history revealed that she was exclusively breastfed. All system examinations were normal. Laboratory investigations revealed that a complete blood count, routine biochemistry, blood gas analysis, chest radiography, ECG and EEG were within normal limits. At the clinical follow-up, it was observed that the baby had frequent breaks while sucking, that perioral cyanosis developed towards the end of breast-feeding and he threw his head back. Cine-esophagogram demonstrated intense barium reflux into the esophagus 6 seconds after gastric filling. The patient was diagnosed GERD and a thickener product was given after breastfeeding. The symptoms disappeared gradually and monthly weight gain returned to normal.

The second case, a 2.5-month-old boy, was admitted to our clinic with complaints of perioral cyanosis and apnea periods for 15-25 seconds, 7-8 times a day for a week. From his history, it was learned that he has been fed breast milk and formula for 2 months, but, her sucking was poor since birth. On physical examination, his head control was poor. Laboratory investigations revealed that a complete blood count, routine biochemistry, blood gas analysis, lactic-pyruvic acid levels, tandem mass and urine organic acid examinations were all within normal limits. The findings of cranial ultrasonography, chest radiography, ECG, EEG, cranial MRI and MR spectroscopy were also within normal limits. On the 5th day of his hospitalization, the patient was intubated after a prolonged apnea period and transferred to the intensive care unit with the diagnosis of an apparent life-threatening event (ALTE). After he was discharged from intensive care unit, apnea and cyanosis attacks continued during ward observation. Cine-esophagogram demonstrated intense barium reflux into the esophagus 9 seconds after gastric filling. The patient was diagnosed GERD and infant formula was replaced by an AR formula. In the following days, the symptoms disappeared gradually.

Conclusion: GERD may present with a life-threatening clinical picture in infancy. For differential diagnosis, it is very important to observe the child during feeding in addition to taking a detailed history.

Keywords: Infant, gastroesophageal reflux disease, nutrition, apnea

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