Methods A total number of 48 children aged 4.5 to 10 years were enrolled. All of them were diagnosed with attention deficit and hyperactivity disorder. Also, all children were tested for IgA deficiency, EMA and anti-tTg autoantibodies, and 3 children with abnormal tests were excluded. The 45 remaining children group was randomly divided in two subgroups: 22 of the children started gluten free diet (group A) and the rest 23 children continued their previous diet (group B). Hyperactivity status was measured using properly arranged questionnaire model and special scoring system for the therapist and the parents. Statistical analysis was performed using the statistical program SPSS/19 and χ^2 -test.

Results After 6 months of intervention, statistical significant difference ($p < 0.001$) was found in hyperactivity status between groups A and B, which was maintained also after 12 months.

Conclusions Children suffering from attention deficit and hyperactivity disorder have increased hyperactivity status, but it seems that gluten free diet has much to offer in order to lower hyperactivity levels.

Nursing

PS-254 NON- PHARMACOLOGICAL PAIN RELIEF STRATEGY DURING SCREENING FOR RETHINOPATHY OF PREMATURITY

S Treider. *Childrens Department, Oslo University Hospital Ullevaal, Oslo, Norway*

10.1136/archdischild-2014-307384.555

Introduction This study was conducted to determine pain relief using non- pharmacological strategy during routine ROP screening conducted in a clinical setting.

Methodology An observational, exploratory quantitative study of 28 ROP screenings was performed in a NICU level III. Pain assessment tools were Premature Infant Pain Profile (PIPP) and Skin Conductance Algesimeter (SCA). Non- pharmacological strategy included a fed and content infant, swaddled and nested in a physiological position. Facilitated tucking provided of a nurse including use of pacifier and sucrose 24% regularly every third minute.

Results Both PIPP and SCA showed that group 1; the first eye of the first time ROP screening the infant expressed no pain to any fraction of the examination. Group 2; examination of the second eye of the first ROP screening together with all the following examinations both PIPP and SCA detect increased pain.

Conclusion Using non- pharmacological strategy during ROP screening appears to have some pain relief. However, no firm conclusion can be drawn due to the uncertain variables.

PS-255 SOCIAL SUPPORT, PERCEIVED STRESS AND MATERNAL CONFIDENCE IN MOTHERS WITH PRETERM INFANTS AT HOME IN TAIWAN

¹LC Huang, ²YC Chang, ³TC Li, ⁴NH Peng. ¹School of Nursing, China Medical University, Taichung, Taiwan; ²Nursing Department, China Medical University Hospital, Taichung, Taiwan; ³Graduate Institute of Biostatistics, China Medical University, Taichung, Taiwan; ⁴Nursing College, Central Taiwan University of Science and Technology, Taichung, Taiwan

10.1136/archdischild-2014-307384.556

Purpose The purpose of study is to explore the relationships between social support, perceived stress and maternal confidence in mothers with preterm infant after discharged at one month in Taiwan.

Methods The study is a cross-sectional designed. Data were collected by purposive sampling. A total of 90 mothers with preterm infants were recruited in a sick baby room (SBR) at a medical centre in the central district of Taiwan. The measurement is self-reported questionnaire including both demographic data, Social Support Scale, Perceived Stress Scale, and Maternal Confidence Scale. Participants filled the questionnaire after infants discharged one month.

Results The study showed that mothers' social support at one month after discharge, average score was 76.47 (total 104), which indicated 70% of social support. The average score of perceived stress was 28, equivalent levels of stress. The average score of maternal confidence was 64.20 (total 90), which showed 70% of confidence. The related factors of mother perceived stress were mothers' perceived health status, daily sleep hour, perceived sleep quality, tangible support and emotional support, positive interaction, affection, and number of baby ($p < 0.05$). The daily sleep hour, perceived sleep quality and affection were the predictors of mothers' perceived stress with 32.5% of prediction explanation.

Conclusion These results suggest that factors related with mother perceived stress and maternal confident. The study suggests that the needs of mother with preterm infants should be included in nursing education and in-service education. The findings of this study will serve as a reference for nursing practice.

PS-256 THE DEVELOPMENT OF A PAEDIATRIC PAIN HISTORY

PL Dreschler, RP Kramer. *Women's and Children's Clinic, Academic Medical Center, Amsterdam, Netherlands*

10.1136/archdischild-2014-307384.557

Introduction Pain in paediatric inpatients remains an important clinical problem. Pain measurement to diagnose pain is an essential first step, that must be followed by an in depth pain history when pain is diagnosed or expected. Goals of a pain history are the reduction of unnecessary pain and suffering, promoting recovery and improving functionality of the patient. We developed a structured pain history for hospitalised children.

Methods Based on a literature study, key elements to be included in the pain history were identified. This resulted in a preliminary version of the pain history, that was discussed with seven specialists from three academic centres in the Netherlands and Belgium, in two rounds. The pain history was finalised after consensus was reached.

Results The final version consists of twenty-six questions, that highlight the main themes: (a) a detailed investigation of the symptoms, (b) aetiology and (c) relieving interventions. After completion, the pain history gives an overview of symptoms, possible causes and influencing factors and can be used as a base to start and evaluate interventions by the professionals. The pain history contains a part for children and a part for parents and is suitable for children aged 0–18 years.

Conclusion A pain history for hospitalised children is available. This document is a tool, helpful to investigate the pain in children accurately. We strongly advise the pain history to be used to reduce unnecessary pain in paediatric patients.