Conclusion Otherwise stable, well developing former very low birth weight preterm infants are at risk for glucose instability, generally considered as unfavourable. It remains unclear whether this instability is likely to influence long-term outcome and whether continuous feeds are preventive.

1357 SIGNIFICANCE OF HIGH ALKALINE PHOSPHATASE LEVELS WITH IN FIRST TWO WEEKS OF LIFE AMONG EXTREMELY PRE-TERM BABIES

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Background Serum alkaline phosphatase levels (S-ALP) are often high among extremely preterm babies before first two weeks of life. It is not certain whether this represents increased physiological bone turn-over or is a predictor for osteopenia of prematurity.

Aim To study the relationship between osteopenia of prematurity and peak S-ALP levels with in first two weeks among pre-term babies born before twenty-nine weeks gestation.

Methods We evaluated seventy-three extremely pre-term babies born before twenty-nine weeks gestation who were admitted to tertiary neonatal units in Leeds, UK from 01/01/2009 to 31/01/2011. S-ALP, calcium and inorganic phosphate were checked regularly while they were in the neonatal unit. Forty out of seventy three babies had radiographs performed after five weeks post-natal age and were reported by radiologist.

Results In our cohort of seventy-three extremely pre-term babies, 55% had peak S-ALP levels exceeding 1200 iu/l (four times the upper limit of normal for adults) with in first two weeks. Infants who developed osteopenia had significantly lower gestational age and birth weight, and were significantly more likely to receive post-natal steroids. Radiologically proven osteopenia developed in 74% of infants with peak S-ALP exceeding 1200 iu/l compared to 35% of infants with peak S-ALP below 1200 iu/l before two weeks post-natal age (p-value 0.014).

Conclusion S-ALP exceeding 1200 iu/l with in two weeks post-natal age is associated with 2.1 fold increased risk of development of osteopenia in extremely pre-term infants.

1358 EFFECT OF MODE OF DELIVERY ON MORTALITY AND MORBIDITY IN VERY LOW BIRTH WEIGHT NEONATES WITH RESPIRATORY DISTRESS SYNDROME

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Background & Aim: It is known that wet lung syndrome and pulmonary maladaptation are more frequent in infants delivered by cesarean section while the effect of mode of delivery on RDS is unknown. In this study, we analyzed the effect of the mode of delivery on RDS outcome in very low birth weight (VLBW) neonates.

Methods Data of all the VLBW neonates with respiratory distress syndrome (RDS) between 2007 and 2012 was retrospectively analyzed. Gestational age, gender, birth weight, mode of delivery, necrotizing enterocolitis (NEC), intracranial bleeding (ICH), patent ductus arteriosus (PDA), retinopathy of prematurity (ROP), bronchopulmonary dysplasia (BPD) were noted.

Results A total of 186 newborns were diagnosed as VLBW neonates with RDS among the 5980 neonates hospitalized in NICU. Mean birth weight and gestational age were 1058±261 grams and 28±2.7 weeks, respectively. Cesarean delivery rate was 62.7%. There were no differences with respect to birth weight, gestational age and gender between mode of delivery. There was no significant relationship

between the NEC, PDA, ROP, BPD and mode of delivery. Also no significant relationship between the mode of delivery and mortality was determined. On the other hand, ICH was significantly higher in neonates delivered vaginally (48% vs. 31%, p<0.05).

Conclusion Mode of delivery has no effect on the mortality and morbidity of RDS in VLBW neonates but ICH was significantly higher in normal vaginal delivery group. Therefore, mode of delivery should be decided on the basis of obstetrical indications.

1359 NEONATAL MORTALITY AND MORBIDITY IN DIFFERENT SOCIOECONOMIC CLASSES IN SOUTHWEST OF IRAN

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Background and Aims Socioeconomic inequality in infant mortality and morbidity are challenging subjects even in many developed countries. In this study we compared neonatal mortality and morbidity in different socioeconomic status (SES) in Fars, Iran.

Methods A cross-sectional study was conducted in Fars, the fifth populated province in Iran from March to October, 2011. Using cluster random sampling method, data was collected by interviewing mothers two months after delivery and filling the check list from their health file. We categorized interviewees into low, middle and high SES according to their education, job, and wealth.

Results 2106 (93.6%) mothers participate in this study. Of them 11 (0.9%) lost their fetus in pregnancy, 8 mothers (0.4%) experienced still birth while 18 mothers (0.8%) lost their baby in neonate period. 97.3% of mothers gave birth in the hospital not related to their socioeconomic ranks (P=0.1). Also, no association was found between SES and APGAR (P=0.06), frequency of fetal and neonatal dead (p=0.1), and admission in neonatal intensive care units (P=0.2). Additionally, frequency of birth trauma (fracture of humerus, clavicle, femur and skull) did not statistically differ in these groups. However, congenital anomaly (P=0.005), icterus (P=0.004), neonatal convulsion (P=0.003) and neonatal infection (P=0.007) were highest in middle socioeconomic and lowest in wealthy group.

Conclusions This study showed good access to health facilities irrespective of SES. More attention should be paid to neonates of middle SES group, since they suffered the most from neonatal morbidity.

1360 MECONIUM/STOOL AND URINARY PATTERNS OF HEALTHY TURKISH NEWBORNS

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Background and Aims Routine follow-ups of healthy newborns for up to 48 h for those delivered by normal vaginal delivery (NVD) and for up to 96 h for those delivered by cesarean section (CS) are highly recommended as they facilitate the early detection of certain problems.

Objectives To investigate the meconium/stool and urinary patterns of healthy Turkish neonates, and to determine whether they correlate with delivery mode, birth weight and feeding method and frequency.

Methods Newborns with a gestational age of ≥ 34 wk were included. The frequency of meconium/stool and urine passage and the delivery mode, birth weight and feeding method and frequency were recorded throughout their hospital stay.

Results A total of 1,095 newborns were included. Within the first 24 h, 99.2% and 90.4% of the newborns passed their first meconium/stool and first urine, respectively. The number of meconium/stool and voidings was higher in the CS group. The number of meconium/stools within the first 24 h was higher in exclusively breast-fed newborns. Combination-fed newborns and newborns with a lower birth weight had a higher number of voidings. The number of meconium/stools in the first 24 h was significantly lower in newborns weighing < 2,500 g. Furthermore, breast feeding frequency correlated with the number of meconium/stools and voidings at all time points.

Conclusions The results of this study show that the mode of delivery, birth weight and feeding method and frequency may influence meconium/stool and urinary patterns in newborns.

1361 PERINATAL AND NEONATAL OUTCOMES IN MULTIPLE PREGNANCIES: ASSISTED REPRODUCTION VERSUS SPONTANEOUS CONCEPTION

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Background Studies comparing perinatal outcomes in multiples conceived following the use of artificial reproductive technologies (ART) vs. spontaneous conception (SC) have reported conflicting results in terms of mortality and morbidity. The objective of our study was to compare perinatal and neonatal outcomes of multiples born after artificial reproductive technology (ART) and spontaneous conception (SC).

Methods Three hundred and sixty seven neonates born after SC and 596 after ART were studied. Maternal characteristics, neonatal characteristics, neonatal morbidities and mortality were assessed between two groups.

Results The duration of pregnancy was significantly shorter in ART group (32.6±4.0 vs 34.2±3.2, $p<0.001$). The mean birth weight in the ART group was significantly lower when compared with control group (1892±690 vs 2112±602, $p<0.001$). The number of perinatal and neonatal deaths (9.5 vs 2.7%, $p<0.001$ and 1.7 vs 1%, $p<0.001$) were significantly higher in the ART group. The incidence of intraventricular hemorrhage (63.7 vs 52.8%, $p<0.05$), anemia (26.6 vs 16.5%, $p<0.05$), sepsis (22.3 vs 14.6%, $p<0.05$), bronchopulmonary dysplasia (7.1 vs 1.8%, $p<0.05$), retinopathy of prematurity (24 vs 16.1 %, $p<0.05$) were significantly higher in the study group.

Conclusion Multiple pregnancies achieved with ART are at greater risk for obstetric complications and adverse neonatal outcome in comparison with naturally conceived multiple pregnancies.

1362 PREVALENCE AND OUTCOME OF HIGHER ORDER MULTIPLE PREGNANCIES IN LAGOS, NIGERIA

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Background and Aims Higher order multiple (HOM) pregnancies are associated with higher risk of complications for both mother and babies with resultant increase in financial and psychological strain on the families. Data on outcome is essential for adequate counseling of families and positive interventions.

Aim To determine the prevalence and outcome of HOM pregnancies in a tertiary hospital in Lagos, Nigeria.

Methodology Data on the mode of delivery, gestational age, pregnancy and neonatal outcome of babies delivered from HOM pregnancies obtained from the labor ward and theatre registers and neonatal unit records over a 3year period (April 2009–March 2012) were reviewed retrospectively.

Results Seventy-four babies (45, 24 and 5 triplets, quadruplets and quintuplets respectively) were delivered from 22 HOM pregnancies out of 6521 deliveries giving a prevalence of 3.37/1000 total births. All deliveries were preterm and all the babies except 2 sets of triplets, 1 set and the 1st 2 of another set of quadruplets were delivered by caesarean section. The perinatal mortality rate was 243/1000 total births. Mortality was significantly increased with no antenatal booking (21/29 versus 5/45 for unbooked and booked pregnancies respectively, $p=0.000$), gestational age ≤ 30 weeks (21/25 versus 5/49 for gestational age ≤ 30 weeks and >30 weeks respectively, $p=0.000$) and birth weight < 1000g for live births (8/56 versus 10/10 for birth weight ≥ 1000 gm and <1000 gm respectively, $p=0.000$).

Conclusion Proper antenatal care and close fetomaternal monitoring of HOM pregnancies will significantly reduce early preterm births and the resultant immediate poor outcomes for these pregnancies.

1363 THE INFLUENCE OF GESTATIONAL AGE ON THE EARLY MORBIDITY OF PRETERM INFANTS OF 32 TO 36 COMPLETED WEEKS OF GESTATION

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Context Moderately preterm infants (32+0 to 36+6 gestational weeks [GW]) account for an increasing proportion of prematurity-associated short-term morbidities; yet there is a relative paucity of data regarding neonatal outcome in this cohort.

Objective To determine the association between neonatal morbidity and gestational age and also maternal and perinatal complications with an adverse impact on the neonatal outcome.

Methods In this retrospective cohort study, preterm infants (32+0 to 36+6 GW) without congenital anomalies, born in the Children's and Maternity Hospital Linz between 2007 and June 2010, were included ($n=870$). Data about all morbidities (respiratory and gastrointestinal problems, hypoglycemia, hyperbilirubinemia with phototherapy, length of stay in intensive care unit, other relevant problems) during their hospital stay. Stepwise regression analysis was used to determine significant associations between morbidity and the gestational age.

Results Overall, the incidence of morbidities increased from 24% at 36 weeks to 43%, 55%, 75% and 93% at 35, 34, 33 and 32 weeks, respectively. The most frequent morbidities were hyperbilirubinemia requiring a treatment (29%) followed by respiratory (14%) and gastrointestinal (14%) problems. Less than 10% of the children had hypoglycemia; cerebral complications were rare. Lower gestational age was an independent risk factor for increased neonatal morbidity and longer hospital and NICU stays ($p<0.001$).

Conclusion Moderately preterm infants (32+0–36+6 GW) are at higher risks for neonatal morbidities, and the lower the gestational age at birth is the higher is the risk for neonatal morbidities.

1364 CONSANGUINITY AND PREGNANCY OUTCOME

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Background and Aim Consanguineous marriage is common in Jordan and in middle east in general. the aim of the study was to see the effect of consanguinity on pregnancy outcome in east Amman. (capital).

Patients and Methods Mothers in the post natal ward were interviewed and a special questionnaire was filled. they were asked whether marriage was consanguineous or not, data was collected regarding no