

with a reduction in BPD (OR 0.797; 95% CI 0.666–0.954;  $p = 0.013$ ), severe HIV (OR 0.844; 95% CI 0.734–0.970;  $p = 0.017$ ), and an increase in survival (OR 1.384; 95% CI 1.213–1.580;  $p < 0.001$ ).

**PO-0681 EFFECTS OF EDUCATION NURSE PROGRAM IN IMPROVING FEEDING PATTERN IN PREMATURE INFANTS**

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**Background and aim** Poor oral motor development in premature infants is common. These feeding problems lead to longer hospital stay and higher hospital cost. Different interventions have shown their efficacy to accelerate transition and move faster to full oral feeding autonomy. Our study aimed to evaluate the impact of a two year education nurse program on feeding pattern and hospital stay of premature neonates.

**Method** We conducted a prospective, interventional study during 3-years (2013–2015) in an NICU of a University hospital in Lyon, France. After a pre-interventional six-months period, nurses received a two-days theoretical session coupled to three practical workshops. This training focused on early oral feeding, oral motor re-education and non-nutritive suction. During this two-years study period, nurses are coached in routine practice by speech therapist, physiotherapist, and psychologist. A satisfaction inquiry is conducted at the end of the theoretical session. Finally, we will evaluate the impact on the age of full oral feeding autonomy and hospital stay in a 6 month post-intervention period compared to a pre-intervention period.

**Primary results** Three day sessions have been organised in 2014 as well as nine workshops with 55 health professionals participating (46% of the total nurse health staff). Hundred percent of the nurses were satisfied and thought that this formation was helpful and could change their practice.

**Benefits** This would be the first study in France evaluating an educational intervention to improve oral feeding problems in premature neonates.

**PO-0682 WITHDRAWN**

**PO-0683 COMPARISON OF CLINICAL CONDITIONS OF VLBW (VERY LOW BIRTH WEIGHT INFANTS) AND BODY TEMPERATURE AT ADMISSION IN THE NICU**

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**Abstract** In Neonatal Intensive Care Units (NICU) the estimative of risk of morbidity and mortality in preterm infants is important for clinical decisions and management. The temperature at ward admission is known as an important factor to predict outcome. VLBW infants have lower temperatures at NICU admission many times due to their need of resuscitation measures at birth. The lower their temperature at admission the higher the

**Abstract PO-0683 Table 1**

	Temperature $\geq 95^{\circ}\text{F}$	Temperature $< 95^{\circ}\text{F}$	p
APGAR $\leq 5$	7,2%	20%	0,0001
Resuscitation	81,7%	89,5%	0,37
Cardiac massage	1,9%	8,69%	0,019
Epinephrine	1,1%	3,4%	0,0001
Gestacional age	29,5%	27,6%	0,0001
SNAP-PE 2	23,2%	50,5%	$< 0,001$
N	263	115	

SNAP-PE II score, that has a good predictive value in NICUs. Many clinical decisions, as early enteral feeding, assess these scores, often alone.

**Objectives** Evaluate the accuracy of the body temperature as an outcome predictor for VLBW infants in NICU.

**Methods** A retrospective study was carried out, using database. We evaluated 378 patients, VLBW infants born in our service, during the period January 2008 to December 2012. The exclusion criteria was major malformations. For analysis were performed "chi-square test" and Student's t-test.

**Results and conclusions** The results, after we analysed 378 patients, demonstrated the lower the temperature at the admission at NICU the worst outcome. The group with lower temperatures had lower birth weight and gestacional age and need of intensive neonatal resuscitation at birth.

**PO-0684 EFFECTS OF ENDOTRACHEAL SUCTIONING IN NEWBORN PRETERM INFANTS WEIGHING BETWEEN 500 AND 1500 G**

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**Objective** To observe different ways of implementing the techniques of aspiration of preterm infants and verify factors associated with changes in oxygen saturation and contamination of equipment.

**Methods** An observational, prospective, descriptive study. The aspirations of the endotracheal tube in infants with birth weights between 500 and 1500 g were observed during two procedures; morning and evening.

**Results** We evaluated 32 infants with a mean weight of 942 g and a mean gestational age of 28 weeks (64 aspiration procedures). During aspiration 61% of children had hypoxemia. The saturation drops were more related to the aspiration held by a single professional, also when they were made more than three disconnections of the fan and when disconnections occurred beyond fifteen seconds. The pre – oxygenation did not decrease significantly during the procedure hypoxia and preterm – oxygen showed hyperoxia from third minute of recovery. The aspiration held by two professionals joined the adequate pre – oxygenation, decreased number and duration of disconnections ventilation, and less contamination of materials. The use of saline during suctioning in less than 1 ml volume was associated with significant decreases saturation.

**Conclusions** The aspiration of the endotracheal tube can lead to hypoxemia. To minimise episodes is important that it be performed by two professionals that meet the care disconnecting the system less than 3 times and use less than 15 seconds. Also pre-oxygenation should be done with caution and the use of less