Methods A prospective observational study was performed using a repeated measures design in children from 3–17 years in two intensive care and high-dependency units in Ireland. Interrater reliability was tested among nurses using linearly weighted kappa. Cronbach α was applied to test internal consistency of the COMFORT-B scale and concurrent validity involving comparing COMFORT-B with the FLACC and Numeric Rating Scale score of nurses.

69 paired nursing assessments to test the interrater-reliability of the COMFORT-B scale was performed. With a high interrater-reliability of Cronbach 0.87, Single nurse observations were commenced of the COMFORT-B, NRS and FLACC/Self-report scores at specific four-hourly intervals over the first 48 h of each admission.

Results Data in 19 patients (age 3 to 17 years) was collected for the pilot study. Initial compliance of 4% increased to over 80%. Interrater reliability between COMFORT, FLACC and NRS remained high throughout the study.

Conclusion The COMFORT-B is suitable for use in children and adolescents from 3–17 years.

Nursing – Neonatal Pulmonology

PO-0869 DEVELOPMENT AND IMPLEMENTATION OF EVIDENCE BASED CLINICAL GUIDELINE REGARDING ENDOTRACHEAL SUCTIONING OF THE INTUBATED NEONATE

There is sparse evidence regarding endotracheal suctioning procedures in neonatal intensive care. We undertook a systematic literature review on following topics:

1. Suctioning frequencies
2. Pre-oxygenation
3. Installation of normal saline
4. Catheter size
5. Suctioning depth
6. Suctioning strength
7. In-line suctioning versus open suctioning
8. Recruitment manoeuvres

Results showed some evidence that suctioning could safely be performed as rarely as every eight hours plus as needed, that catheter size should not be larger than 70% of internal diameter of endotracheal tube size, that catheter only should be inserted as far as the tip of the tube, and that closed in-line suctioning systems could be used, and might be beneficial in neonates.

There is sparse evidence regarding pre-oxygenation, installation of saline, strength of vacuum and recruitment manoeuvres to give evidence based recommendation.

The Neonatal unit in University Hospital of Copenhagen then changed suctioning guidelines accordingly to the recommendations found in the literature review.

We planned an implementation strategy inspired by Berwick and Bataldan’s ‘The Breakthrough Series’, and Rogers ‘Diffusion of Innovations’, starting with baseline monitoring of chosen indicators such as incidence of occlusion of tubes, re-intubations, days on ventilator, length of stay, incidence of VAP, morbidity and mortality.

The implementation process was and is monitored by visual charts, graphs and numbers of the chosen indicators, and is an interdisciplinary focus in the unit.

Nursing – Primary Care and General Paediatrics

PO-0870 THE SEXUAL DEVELOPMENT AND EDUCATION OF PRESCHOOL CHILDREN: KNOWLEDGE AND OPINIONS FROM DOCTORS AND NURSES

Background and aims Especially the period between the ages of 0–6, which is known as the early childhood period (preschool period), is a very critical period where learning is fastest, the child is affected the most from environmental factors, and the