## Sigma's 30th International Nursing Research Congress

# Children's Pain Post-Discharge: Parent Views of Support From an Australian Nurse Practitioner Acute Pain Service

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## Purpose:

Annually, approximately 365 children are referred to the Nurse Practitioner Acute Pain service at the tertiary paediatric hospital in Brisbane, Australia and over half of these are orthopaedic surgical cases that require follow up care post discharge to manage pain. The consequences of poorly managed pain are significant for the child, family and the organisation. Physical and psychological consequences for children who experience pain may include fear, anxiety, the development of post-traumatic stress disorder, increased infection risk and wound healing complications (Hovde, Granheim, Christopherson & Dihle, 2012). Prolonged length of stay and the inadequate management of acute pain can place increase paediatric patients' risk for re presentation at emergency departments as well as the risk of developing chronic pain (Hovde et al., 2012).

Children's post-discharge pain is often managed by parents with clinician support (Cai, Lopata, Roh, Huang, Monteleone, Wang & Sun, 2017). Support via telephone consultation is the current follow up method employed by the Nurse Practitioner Acute pain service (NPAPS) and research into this follow up has shown its usefulness in improving paediatric pain management and reducing parental anxiety (Gerceker, Muslu & Yardimci, 2016; Paquette et al., 2013).

The research study aimed to firstly, investigate children's pain as measured by parents following discharge from hospital. Secondly, explore parental views on participation in their child's pain management and perceptions of support from the NPAPS were sought.

#### Methods:

The research employed a mixed methods approach utilising a cross sectional survey and qualitative questions. The convergent mixed methods design enabled an in depth perspective of the pain experiences of children post discharge and parent perceptions of their child's pain management through the complementary merging of the quantitative and qualitative results (Zheng, 2015).

Data were collected using the Parents' Post operative pain measure- short form which is a ten item parental measure of their child's pain (von Baeyer et al., 2011) and the Parental views on participation in their child's pain relief measures developed by Polkki et al. (2002).

Survey analyses were conducted in IBM SPSS Statistics 24. Qualitative responses were and coded using NVivo Version software and analysed using thematic analysis (Clarke & Braun, 2017).

#### Results:

Pain scores collected on day of discharge from hospital, day after discharge, day after medication was reduced, and final follow-up were compared. All children had a clinically significant score of pain on the day of discharge and 85% on the day following discharge from hospital. Wilcoxon signed-rank tests showed that there was no difference in pain intensity at discharge and day after discharge (Z = -1.90, p = .06), though pain intensity was less at medication reduction and final follow-up telephone call when compared to discharge (Z = -2.96, p = .003; Z = -2.68, p = .007).

Parental views regarding participation in their child's pain relief post discharge from hospital indicated that the majority of parents felt that hospital staff provided sufficient and understandable information, opportunities for support and recognised parent preferences and choices regarding their child's management.

#### Conclusion:

The clinically significant pain levels of a majority of children on day of discharge and day post discharge from hospital is a concern and suggests that pain could be better managed for these early post discharge days. The majority of parents indicated they felt well supported by the NPAPS both prior to discharge and upon return home, however qualitative responses indicated worry and uncertainty among parents, particularly on the day of discharge. Therefore, the transition period where responsibility of the clinical management of pain is handed over to the parent may require a greater focus for parental support.

#### Title:

Children's Pain Post-Discharge: Parent Views of Support From an Australian Nurse Practitioner Acute Pain Service

## **Keywords:**

Nurse Practitioner, Parent Support and Pediatric Pain

### References:

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## **Abstract Summary:**

This individual oral presentation reports on findings from a study into children's pain post-discharge and perceptions of support from an Australian Nurse Practitioner led Acute Pain Service

#### **Content Outline:**

Introduction

Introduce Nurse Practitioner Acute Pain Service and model of care.

Location of Service (Brisbane, Australia) and types of paediatric patients referred to the service

Body

Introduce Aims of the Research Study:

- (1) To measure children's pain post discharge from hospital
- (2) To explore parent views on participation in their child's pain management and perceptions of support from the Nurse Practitioner Acute Pain Service

Introduce Methods

- (1) Parents' Post operative pain measure- short form which is a ten item parental measure of their child's pain (von Baeyer et al., 2011) and
- (2) Parental views on participation in their child's pain relief measures developed by Polkki et al. (2002).

Discuss Analysis and Results

Survey analyses were conducted in IBM SPSS Statistics 24. Qualitative responses were and coded using NVivo Version software and analysed using thematic analysis (Clarke & Braun, 2017).

Pain scores collected on day of discharge from hospital, day after discharge, day after medication was reduced, and final follow-up were compared. All children had a clinically significant score of pain on the day of discharge and 85% on the day following discharge from hospital.

#### Conclusions

The clinically significant pain levels of a majority of children on day of discharge and day post discharge from hospital is a concern and suggests that pain could be better managed for these early post discharge days.

First Primary Presenting Author

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**Author Summary:** Dr Elizabeth Forster is a Senior Lecturer and Paediatric Nursing Program Director at Griffith University School of Nursing & Midwifery in Brisbane, Australia. She is the Editor of two Australian Paediatric Nursing textbooks and her research interests include paediatric nursing, paediatric pain and end of life care as well as teaching and learning.

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