

بسم الله الرحمن الرحيم



-Call 4000





شبكة المعلومات الجامعية التوثيق الالكتروني والميكروفيلم





جامعة عين شمس

التوثيق الإلكتروني والميكروفيلم

قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها علي هذه الأقراص المدمجة قد أعدت دون أية تغيرات



يجب أن

تحفظ هذه الأقراص المدمجة يعبدا عن الغبار



Assessment of Mothers Knowledge and Practice Regarding Breast Feeding Patterns for Neonates with Cleft Lip and Palate

Thesis

Submitted for Partial Fulfillment of the Requirement of Master Degree in Pediatric Nursing

 $\mathcal{B}y$

Haidy Fawzy Ammar

B.SC. 2012 Clinical Instructor Faculty of Nursing - Al Azhar University

> Faculty of Nursing Ain Shams University 2021

Assessment of Mothers Knowledge and Practice Regarding Breast Feeding Patterns for Neonates with Cleft Lip and Palate

Thesis

Submitted for Partial Fulfillment of the Requirement of Master Degree in Pediatric Nursing

Under Supervision of

Dr./ Safy Salah ElDin Ibrahim AlRafay

Professor & Head of Pediatric Nursing Department Faculty of Nursing – Ain Shams University

Dr./ Salma ElSayed Hassan Mohamed

Professor of Pediatric Nursing Faculty of Nursing- Ain Shams University

> Faculty of Nursing Ain Shams University 2021



First and for most I feel always indebted to Allah, The Most Kind and Most Merciful.

I wish to express my deepest thanks and sincere appreciation to **Dr. Safy Salah Eldin Ibrahim AlRafay**, Professor of Pediatric Nursing, Faculty of Nursing, Ain Shams University, for her great support and advice, her valuable remarks that gave me the confidence and encouragement to fulfill this work.

I express my special gratitude and appreciation to **Dr. Salma ElSayed Hassan Mohamed,** Professor & Head of Pediatric Nursing Department, Faculty of Nursing Ain Shams University, for her great support and advice, her valuable supervision, cooperation and direction that extended throughout this work.

I wish to convey my thanks to all participants who gave their time to and participated in this work.



List of Contents

Subject	Page No.
List of Tables	i
List of Figures	iii
List of Abbreviations	iv
Abstract	V
Introduction and Aim of the Study	1
Review of Literature	7
I. Cleft Lip and Palate	7
II. Breast feeding Patterns for neonates with cleft lip and cleft palate	27
III. Nursing Role toward Breast Feeding Patterns for Neonates with Cleft Lip and Palate	45
Subject and Methods	53
Results	62
Discussion	103
Conclusion	122
Recommendations	123
Summary	124
References	137
Appendices	Ι
Arabic Summary	

List of Tables

Table	Title	Page No.
(1)	Distribution of the studied mothers according to their characteristics	63
(2)	Distribution of the studied mothers according to their family characteristics	66
(3)	Distribution of the studied neonates according to their characteristics	68
(4)	Distribution of the studied mothers according to nutritional instructions regarding their neonates	69
(5)	Distribution of the studied neonates according to their diagnosis	71
(6)	Distribution of the studied neonates regarding their previous hospitalization	72
(7)	Distribution of the studied neonates regarding their present hospitalization	75
(8)	Distribution of the studied neonates according to their growth parameters	76
(9)	Distribution of the studied mothers regarding their knowledge about breast care	77
(10)	Distribution of the studied mothers regarding their knowledge about breas tfeeding	78
(11)	Distribution of the studied mothers regarding their knowledge about breast expression/pumping	80
(12)	Distribution of the studied mothers regarding their knowledge about bottle feeding of expressing breast milk (EBM) for the neonate with cleft lip and cleft palate	81
(13)	Distribution of the studied mothers regarding their knowledge about syringe feeding expressing breast milk for the neonate with cleft lip and cleft palate	82
(14)	Distribution of the studied mothers according to their practices regarding breast care	84

Table	Title	Page No.
(15)	Distribution of the studied mothers according to their practices regarding breast feeding	85
(16)	Distribution of the studied mothers according to their practices regarding hand expressing breast milk	87
(17)	Distribution of the studied mothers according to their practices regarding Manual/hand breast pumps	89
(18)	Distribution of the studied mothers according to their practices regarding the use of electric pumps	91
(19)	Distribution of the studied mothers according to their practices regarding bottle feeding	92
(20)	Distribution of the studied mothers according to their practices regarding Combined feeding	94
(21)	Distribution of the studied mothers according to their practices regarding syringe feeding	95
(22)	Relation between knowledge of the studied mothers regarding breast feeding patterns for neonates with cleft lip and palate and their characteristics	97
(23)	Relation between practices of the studied mothers regarding breast feeding patterns for neonates with cleft lip and palate and their characteristics	99
(24)	Relation between knowledge of the studied mothers regarding breast feeding patterns for neonates with cleft lip and palate and their neonate's breast feeding patterns	101
(25)	Relation between practices of the studied mothers regarding breast feeding patterns for neonates with cleft lip and palate and their neonate's breast feeding patterns	102

List of Figures

Figure	Title	Page No.		
Figures in Review				
(1)	Anatomy of the palate	7		
(2)	Soft palate	8		
(3)	Schematic diagram showing embryonic development of face at 6 weeks	9		
(4)	Midline cleft lip and bifid nose deformity	10		
(5)	Classification of cleft lip and palate	16		
(6)	Bilateral complete cleft lip and palate	17		
(7)	Types of cleft palate	18		
Figures in Results				
(1)	Distribution of the studied mothers according to	64		
(1)	their occupation	01		
(2)	Distribution of the studied mothers according to	65		
(2)	their residence			
(3)	Distribution of the studied mothers according to	67		
(4)	their family members			
(4)	Distribution of the studied neonates according to their ranking in their families	70		
(5)	Distribution of the studied neonates regarding	74		
	their pattern of breast feeding	, .		
(6)	Distribution of the studied mothers according to			
	their total knowledge regarding breast feeding	83		
	patterns for the neonate with cleft lip and cleft			
	palate			
(7)	Distribution of the studied mothers according to			
	their total practices regarding breast feeding	96		
	patterns for the neonate with cleft lip and cleft			
	palate			

List of Abbreviations

Centre for disease and control
American Academy of Pediatrics
American College of Obstetrics and Gynecology
American Academy of Family Practice
World health organization
National public health service
Low birth weight
Secretory immunoglobulin
Necrotizing enterocolitis
Very low birth weight
Supplemental nursing system
Left foot
Moderate acute malnutrition
Nuklearmedizin
Neonates intensive care unit
Cleft lip
Cleft palate
Cleft Lip and Palate
United nations international children's emergency fund
Boys with bilateral cleft lip and palate
Nasal pit
Medial nasal process
Lateral nasal process
Maxillary process

Assessment of Mothers Knowledge and Practice Regarding Breast Feeding Patterns for Neonates with Cleft Lip and Palate

Abstract

Background: Cleft lip and palate are developmental defects or congenital malformations of the upper lip and roof of the mouth that are present at birth. Aim: This study aimed to assess mothers' knowledge and practices regarding breast feeding patterns for neonates with cleft lip and Clift palate CL/CP. **Design:** A descriptive design was utilized in carrying out this study. **Subject**: A purposive sample composed of sixty-eight mothers with neonates with CL/CP for six months at the NICU and the Inpatient Surgical Department and Outpatient Surgical Clinic affiliated to children's Hospital, Ain Shams University hospitals, Cairo. Tools: Interviewing Questionnaire to assess characteristics of the studied neonates as; age, gender, weight, diagnosis, mothers and family as; age, age, level of education, occupation and residence, assess feeding patterns of breast feeding among neonates with CL/CP, assessment of the studied growth parameters of neonates and levels of mothers' knowledge regarding breast feeding patterns for neonates with CL/CP as; illness history, feeding method, time for complete feeding, difficulty during feeding, nutritional supplement, kind of supplement, feeding position, neonates appetite and stress feeding. In addition, Observational Checklist to assess the mothers' reported practices of breast feeding methods. Results: almost one-third of studied neonates had unilateral cleft lip, and about half of them of them admitted to the hospital for surgical repair. Inaddetion Majority of mothers had unsatisfactory knowledge and practices regarding breast feeding patterns for the neonate with cleft lip and cleft palate. **Conclusion:** There were statistically significant differences between the levels of knowledge and practices of the studied mothers and their neonates' breast feeding patterns. **Recommendations:** Continuous educational programs and feeding guidelines designed and implemented for mothers having neonate with cleft lip and cleft palate.

Keywords: Cleft Lip, Cleft Palate, Breast feeding Patterns, Mothers. Knowledge, Practices, Neonates

Introduction

Cleft Lip (CL) and Palate (CP) are congenital malformation occurring between the 6th and the 10th week of intra-uterine live, period corresponding to the face development because of the lack of development of nasal and maxillary process, the bones and tissues of a neonate's mouth, upper jaw and nose come together. Most neonates who are born with a cleft palate also end up with a cleft lip (**Dixon et al., 2015**).

Cleft is a gap or opening, and it happens when the neonate's lip or palate or both fails to fuse together completely during development in the uterus. The type and location of the cleft varies. A cleft lip can be unilateral (on one side of the mouth) or bilateral (on both sides) (Sino et al., 2017).

Neonates with CL or CP or both tend to have more ear infections and breast milk helps protect against these infections. The mother's antibodies are passed on to the neonate in the breast milk. Breast milk is less irritating to the mucous membranes than formula, because it is a natural body fluid. Breast feeding refers to direct placement of neonate to the breast for feeding, and breast milk feeding refers to delivery of breast milk to neonate via bottle, cup, spoon, or any other means except breast. Neonates use both suction and compression to breastfeed successfully (Vieira, 2018).

There is a relationship between the amount of oral pressure generated during feeding and the size/type of cleft and maturity of the neonate. For this reason, neonates with CL are more likely to breastfeed than those with CP or both some neonates with small clefts of the soft palate generate suction, but others with larger clefts of the soft and/or hard palate may not generate suction (**Papi et al., 2015**).

Breast feeding patterns, by using breast or fingers to block the cleft to help neonate to get proper sucking. The soft palate may have a cleft. This is often hard to see, so it may only be found after a few hours or days if neonates seem unable to breastfeed. The neonate may make a clicking sound while breast feeding or slip off the breast. Breast feeding is most difficult for neonates with a cleft of the hard palate. Learning to breastfeed may take a long time and will most likely to require some assisted techniques and/or lactation aids (**Duarte et al., 2016**).

Breast feeding patterns as: breast compression that is a method to stimulate an easy milk let down or ejection reflux, Breast feeding position that should make neonates head with cleft lip close to the breast in all of the positions cross over, cradle, rugby as well as lying position, Skin-to-skin contact that help neonate with cleft lip and cleft palate feel comfortable while obstruction of breast feeding and also

helps the neonate to grow and develop faster cause it stimulates the neonates feeding reflexes (McGuire, 2017).

That pediatric nurses should upgrading the mother's knowledge, raising awareness of mothers about the importance of follow up care for promoting their neonates health condition and periodical meetings are to be held with all mothers having cleft lip and palate neonates to discuss prevention methods and early detection of problems associated with the defect and different ways of management (Vlahovic and axhija, 2017).

However, evidence based practice shows that with intervention techniques, oral feeding can be successful and neonate can survive. Ideally, feeding interventions should reduce the stress experienced by the family and neonates, promote growth and development in the neonates and facilitate a normal feeding pattern. Early education combined with nutritional intervention protocol can improve outcomes including weight gain, feed velocity and fluid intake. Early nursing guidance on the best feeding techniques should be performed. Pediatric nurses encourage establishment of breast feeding and stimulated, observing the physiological, psychological and social limits involving the child and family (Surendra, 2020).