"NURSES' ATTITUDE AND SKILL ON INFANT MASSAGE"

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Abstract

One form of health care in newborns, which have recently been developed in some countries is the baby massage. Through several studies conducted by the researcher associated with infant massage, infant massage has been found to be very beneficial for babies and parents. Considering the many benefits of infant massage, St. Luke's Medical Center Quezon City was interested to improve the attitudes and skills of the nurses about infant massage, in order to provide health education to the mothers about it.

The methodologyusedtoassessnurses' attitudesaboutbabymassage was apreandpost-test, while for theskillsof nurseswas post-test only.The statistical treatment that was used waspaired t-test to determine the difference of thetwo means (pre-test and post-test).

The results showedthat mean score of nurses' attitudes in infant massage (pre-test) is 81.18 (SD = 7.38, 2), while mean score of nurses' attitudes in infant massage (post-test) is 91.18 (SD = 6.84). Mean scores of nurses' skills in infant massage (post-test) is 82.00 (min score = 69.00, max score = 93.00). The paired t-test results showed that p-value (sig. 2-tailed) = 0.001.

The results showed that there are significant differences between pre-test and post-test of nurses' attitudes in infant massage. Infant massage is an easy procedure, simple, and many benefits for both mother and baby.

Keyword: Nursing attitude, nursing skill and infant massage.

1. INTRODUCTION

St. Luke's Medical Center (SLMC) as the leading hospital and most admired hospital in the Philippines, has provided high-quality healthcare for over a century. With a mission to provide exceptional nursing care, have made this hospital as a center of healthcare excellence in Asia.

A variety of specialized services and the most advanced technology available in the hospital. Service culture that promotes compassion and care for the family of the patient, makes this hospital as one of the preferred alternative for medical tourism from other countries. Patients treated at this hospital, not only from Asian countries, but also from Micronesia, the Middle East, Europe and the United States.

The totality of dedication to the quality of the hospital as indicated by the implementation of research and development of health professionals who work in the hospital through a variety of scientific activities, such as seminars, workshops and training. The hospital has never ceased to develop a range of health services.

Nursing is a service that is not only based on science, but also the incorporation of the arts. At present, it is also required to be able to combine medical therapy with complementary therapy. One form of health care in newborns, which have recently been developed in some countries is the baby massage. In some countries in the eastern hemisphere, baby massage was originally done by the midwife who helped deliver the

baby at home. Through several studies conducted by researcher associated with infant massage, infant massage has been found to be very beneficial for babies and parents.

Some of the benefits of baby massage are: 1). Improves body awareness, 2). Improves relaxation and release of accumulated stress, 3). Stimulates circulation, 4). Strengthens digestive, circulatory and gastrointestinal systems, which can lead to weight gain, 5). Reduces discomfort from teething, congestion, gas, colic and emotional stress, 6). Improves muscle tone coordination, 7). Increases elimination, circulation and respiration, 8). Improves sleep patterns, 9). Increases hormonal function. While the benefits for the mother was: 1). Improves ability to read infant cues, 2). Improves synchrony between caregiver and infant, 3). Promotes bonding, 4). Increases confidence in parenting, 5). Increases communication-verbal and non-verbal, 6). Improves relaxation, 7). Provides time to share, and quality time, 8). Promotes parenting skills (Schneider, 2013).

Considering the many benefits of infant massage, some hospitals in Sweden, Japan, India and Indonesia have already incorporated this procedure in the health education materials provided by nurses to mothers who have just given birth in the hospital. SLMC is also interested to improve the skills of the nurses about baby massage, so that they can provide health education to the patient about it.

In an effort to improve the quality of nursing care in the newborn, in addition to providing direct physical nursing care to the newborn, the nurse is also expected to provide health education to mothers who have just given birth in the hospital. The main purpose of health education is to improve the knowledge, attitudes and skills in caring for the baby's mother at home later. Mothers are expected to care for their babies independently, without the help of a baby sister.

Some procedures are taught to mothers who have just given birth includes: techniques of breastfeeding, exclusive breastfeeding, cord care techniques, nutrition and contraception. One of the new procedures that is now added as a matter of health education for mothers who have just given birth at some major hospitals today is baby massage techniques.

The nurses who serve in newborn care are expected to have the ability to teach infant massage procedure to parents who have just given birth. So coming home from the hospital, parents can do it themself at home later.

Research Questions
1. What is the pre-test and post test scores of nurses in infant massage skill and attitude training module?
2. **Is there a difference in the pre and post-tests score of nurses in infant massage attitude training module?**

Problem Statement
There isaneed fortrainingtoimprove the knowledge, attitudesandskills ofthe nurseaboutinfantmassage.
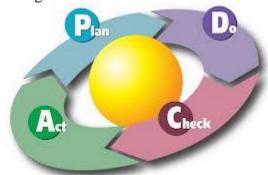
Objectives
By the end of 150 hours of immersion at nursery and maternity unit, the nurses' cognitive, attitude and skill on infant massage will improve as evidenced by a difference in the pre and post- test scores in the infant massage training module.

Performance Improvement Framework
This Quality Improvement study using the Plan, Do, Check and Act (PDCA) framework for identifying and analyzing the problem, developing and testing a potential solution, measuring how effective the test solution was, and analyzing whether it could be improved in any way, and fully implementing the improved solution.

According to Tague's (2004) the Plan-Do-Check-Act (PDCA) cycle or Plan-Do-

Study-Act (PDSA) also called the Deming Cycle or the Deming Wheel (Figure 1) is a four–step model for carrying out change. PDCAis shapeda circle has no end. The PDCA cycle should be repeated again and again for continuous improvement.

Figure 1 : Plan-Do-Check-Act Circle

Thefourphasesin thePlan-Do-Check-Act Cycle according to Pavey (2014) involve;

- **Plan:**Identifyingandanalyzingtheproblem.
- **Do:**Developingandtestingapotentialsolution.
- **Check:**Measuringhoweffectivethetestsolutionwas, andanalyzingwhether itcould beimprovedin anyway.
- **Act:**Implementingtheimprovedsolutionis fully

Referring to thefourphasesin thePlan-Do-Check-Act Cycle, inthis studycanbe describedasthe followingsteps:

1. **Plan:**
   Plan for Intervention:
   a. Develop amoduleand prepare VCD onbabymassage
   b. Presentedthe module infront of theChief Nurse / Vice Director of Nursing Services

2. **Do:**
   Conduct the project pilot:
   a. Pre-test (nurses' attitudestowardbabymassage)
   b. Implementationof the module and VCD

c. Post-test (nurses' attitudesand nurses' skill towardbabymassage)
d. Analysis

3. **Check:**
   Check / monitor thenurses' attitude and nurses' skill toward baby massage and the improvement activity

4. **Act:**
   Analyze the results of the project proposal. Reflect on the positive results and make necessary recommendations for different areas for improvement to the Chief Nurse and Vice Director of Nursing Services.

2. METHODOLOGY

The methodologythat was usedtoassessnurses' attitudesaboutbabymassage was apreandpost-test, while for theskillsof nursesit was post-test only.The statistical treatment that was used waspaired t-test to determine the difference of the two means (pre-test and post-test).

To determine the initial attitude of nurses towards infant massage, the researcher had distributed questionnaires about attitudes towards infant massage (pre-test), then the researcher carriedout the training, and after training, the researchers had assessed nurses' attitudes about infant massage again (post-test) . While for the skills of the nurse on infant massage, skill assessment was carried out, i.e after training.

This study was conducted on January 12 to February 18, 2014. The first step was the proposal, the researchers had proposed the process improvement project to the SVP Head of Hospital Operations and Vice Director of Nursing Services of St. Luke's Medical Center. From the Vice Director of Nursing Services, the researcherswere advised to ask for direction from the Associate Director of DCA. After presenting the proposal and module on infant massage

to the Associate Director of DCA and was approved then the researchers asked permission to the Department Manager of HR-TDED. After all the permission completed, the researchers contacted and explained the improvement project that will be done to the managers of maternity and nursery unit.

The study started by randomly selecting respondents and obtained 17 respondents, i.e. 10 nurses from the nursery unit and 7 nurses from the maternity unit. After the list of respondents was obtained, the researchers distributed pre-test questionnaires on attitudes of nurses towards infant massage. Three days later, the researchers collected pre-test questionnaire.

Infant massage training was conducted three times, because of the need to adjust to the shift schedule of respondents. Training was done after the endorsement, on January 30, 2014 (7 nurses), January 31, 2014 (5 nurses) and 01 February, 2014 (5 nurses). Each time during the implementation of training, three steps were carried out: presentation, view the video and the last was a simulation. After the training, nurses were asked to fill out questionnaires about nurses attitudes towards infant massage (post-test) and filled out the schedule for the evaluation of infant massage skills.

The evaluationof theskills of nurses on infantmassage, the researcherscarried out the evaluation five times, having to adjust shift schedules of nurses, namely: January31, 2014(3 nurses), February 02, 2014 (5 nurses), February 03, 2014 (2 nurses), February 04, 2014 (5 nurses)and the last February 05, 2014 (2 nurses).

After all the respondents were evaluate don their skill son infant massage, there searchers carried out in addition to performing infant massage to patient, the nurse also was asked to do health education on infant massage to the baby's mother. This was carried out on February 18,2014.

3. FINDINGS AND ANALYSIS

In this study, descriptive statistics were used to describe the central tendency (mean, mode, median and standard deviation) of the scores of nurses attitudes and skills. In analyzing the difference scores for the pre-test and post-test nurses' attitudes towards infant massage, researcher used the paired t-test.

The results showedthat: 1). Score of nurses' attitudes towards infant massage (pre-test) : Mean = 81.18 (min score = 68.83, max score = 96.67), Median = 80.00, Mode = 73.33, SD = 7.38, 2). Score of nurses' attitudes towards infant massage (post-test): Mean = 91.18 (min score = 76.67, max score = 96.67), Median = 93.33, Mode = 90.00, SD = 6.84, and 3). Scores of nurses' skills on infant massage (post-test) : Mean = 82.00 (min score = 69.00, max score = 93.00), Median = 85.00, Mode = 74.00 and 93.00.

The t-test result showed that p-value (sig. 2-tailed) = 0.001. The result showed that there is a significant differences between pre-test and post-test nurses' attitudes towards infant massage. The study results showed that the average (mean) score of nurses' attitudes towards infant massage (*pre-test*) is quite high: 81.8. This indicates that since the beginning of the study, nurses have shown a positive attitude towards infant massage. This initial positive attitude, is favorable. With a positive attitude at the beginning of a change will make it easier for the acceptance of the desired behavior.

According to Millon & MJ Lerner (2014) attitude in general is an evaluation of a person against the person, object or idea. Interested attitude often encourage a behavior this means that people will tend to do things because of the attitude of the attraction.

This was evidenced byan increase inattitudescoresof

infantmassageaftertraining(*post-test*) with a significantmean (91.18). The results of statistical tests paired t-test with ap-value(sig. 2-tailed) =0.00, indicating that the training was effective in improving the attitude and acceptance of the nurse to infant massage.

The results of the study also showed that the scores of nurses to infant massage skills, is also quite good with an average (mean) of 82.00, although its lowest value was 69.00. For the assessment of skills, score 69.00 is included in the low category. This low score is possible because this procedure is not known to the respondents and had never learned such skills. Simulation was performed only once and it may also be the cause. Expertise of a person in a skill highly influenced by the frequency of the exposure to try the procedure.

The latter stageof the research, nurses were asked to perform the infant massage. In addition to performing infant massage to the patient , the nurse also once asked to do health education on infant massage to the baby 's mother. It was implemented with the aim of convincing the nurses and parents of infants that the procedure is simple, easy and can be done either by nurses and parents of infants.

4. RECOMMENDATION

After five weeks of carrying out this improvement project, researcher had learned a lot about the process of quality improvement by using PDCA Framework. Quality improvement process is a process that is never ending circle.

In implementing quality improvement project with the title *"Nurses' attitude and skill on infant massage",* researcher found out that a positive attitude at the start of process improvement implemented is important for the success of the subsequent process improvement . with a positive attitude , then the nurse will easily accept and adopt a change or improvement.

Infant massage is an easy procedure, simple, and many benefits for both mother and baby. Health education about infant massage for mothers who have just given birth is important to prepare mothers in caring for her baby when they returned home. Health education about the procedure on infant massage can be used as standard procedure in maternity and nursery units .

5. REFERENCES

In T. Millon & M. J. Lerner (Eds.), Comprehensive handbook of psychology. (2nd ed). New York: John Wiley & Sons. Retrieved February 24, 2014 from http://facultygsb.stanford.edu/wheeler/documents /PettyWheelerTormala Handbookinpress.pdf

Pavey, S. (2014), Plan-Do-Check-Act (PDCA) : Implementing new ideas in a controlled way. Retrieved February 24, 2014 from http://www.mindtools.com/ pages/article/newPPM_89.htm

Schneider, EF. (2013), Touch Communication, The Power of Infant Massage. Health family Org. Retrieved February 24, 2014 from www.healthyfamily.org/cs/ user/print/article/2

Tague's, (2004). Plan-Do-Check-Act (PDCA) Cycle. (, Second Edition, ASQ Quality Press, 2004, pages 390-392. http://asq.org/learn-about-quality/project-planning-tools/overview/pdca-cycle.html