The Relationship Between Communication Skills and Early Maladaptive Schemas in Pediatric Nurses

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ABSTRACT

Introduction: In nursing, the communication between the nurse and the child is the core of child care. Some barriers can affect the nurse-patient relationship to have proper communication skills for child care.

Objective: This study aimed to examine the correlation between communication skills and early maladaptive schemas in nurses working in pediatric wards.

Materials and Methods: This is an analytical and correlational study. The participants were 178 nurses working in a children’s hospital in Rasht City, Iran in 2016. The data collection tool was a three-part questionnaire: A demographic form, the interpersonal communication skills scale (ASMA), and the Young Schema Questionnaire-Short Form (YSQ-SF). The collected data were analyzed using descriptive statistics and the Friedman and Spearman tests.

Results: The majority of nurses were younger than 30 years (80.8%), had a bachelor’s degree in nursing (89.0%), were married (65.1%), had children (54.8%), were living in urban areas (95.2%), had employment status (63.3%) and less than 15 years of work experience (46.5%). The highest mean scores of ASMA (44.12±0.53) and YSQ-SF tools (2.65±1.04) were related to general communication skills and then disconnection and rejection, respectively. The results of the Spearman correlation test showed that the overall ASMA score had significant negative correlations with early maladaptive schemas of impaired autonomy and performance (r=-0.283), impaired limits (r=-0.421), other-directedness (r=-0.303), and disconnection and rejection (r= -0.302) (P=0.0001).

Conclusion: Nurses who have a higher level of early maladaptive schemas showed poorer communication skills. Examining maladaptive schemas in nurses may provide appropriate strategies to improve their communication skills.
Introduction

Nursing, as a science of health care, focuses on meeting human needs in biological, psychological, and social aspects and requires not only scientific knowledge but also interpersonal skills and intellectual and technical abilities. It comprises a combination of knowledge, clinical work, and interpersonal communication [1]. Communication skills are essential for nurses, but mastering communication skills can be difficult. Nurses interact with people at different educational, cultural, and social levels, and they have to use these skills in an effective, compassionate, and professional manner when communicating with patients and their families [2].

Learning communication skills for child care is very important because of the differences in how children communicate with adults [3], and learning these skills based on the child’s growth and development can be very useful in nursing care [4, 5]. In the field of child care, communication is considered a basic element. Hospitalization of a child leads to family turmoil and is a difficult experience for the family. Child care is a priority in the family. Therefore, nurses should take appropriate caring measures to reduce the anxiety of the child and family [3]. Disbelief and confusion in accepting the child’s illness, feelings of guilt, anger, and frustration are among the emotions that parents experience during the child’s hospitalization [6].

Communicating with the child’s parents during hospitalization and participating in their child’s care and meeting the child’s needs can reduce the parents’ stress and increase the child’s sense of security, and positively affect the child’s emotions [7]. Anxiety in the family increases when the illness leads to the hospitalization of the child which affects the role of parents, and any failure to pay attention to the requests and needs of parents by nurses’ damages the relationship between the nurse and the family [8]. Studies have shown that the type of nurses’ communication skills is related to the patient’s satisfaction [9].

Therapeutic interaction between the child, family, and nurse can lead to the independence of caregivers, lower workload, higher care satisfaction, and possibly lower side effects and shorter hospital stay [3]. Many studies consider the ability to communicate properly as one of the key characteristics of a nurse [10]. Shimoinaba et al. reported that nurses, who communicated correctly and completely during patient care over a longer period and in a more appropriate environment, were able to prepare patients and their caregivers to express their feelings and have better communication [11]. The nurses do that by creating a better therapeutic nurse-patient relationship.

Factors such as restrictions for giving information to the patient, the nurse’s issues, unfamiliarity with how to communicate, gender differences, the age of the nurse and the patient, and the nurses’ fatigue can affect the communication process [12]. There are also inhibitory

Highlights

- Communication is an essential part of patient-centered care.
- Nurses should learn effective communication skills appropriate to the growth and development of their patients.
- Schemas continue throughout life and affect a person’s relationships with others.
- The child’s emotional state in interaction with painful childhood events leads to the formation of schemas.

Plain Language Summary

The child’s emotional state in interaction with painful childhood events leads to the formation of schemas that continue throughout life and affect a person’s relationships with others. Maladaptive schemas can affect nurses’ communication skills, which can be more critical in caring for and communicating with hospitalized children due to their developmental sensitivity. This study examined the correlation between nurses’ communication skills and maladaptive schemas and the results showed that nurses with higher scores of maladaptive schemas had poorer communication skills. We suggest conducting further studies to examine more accurately maladaptive schemas and so to plan interventions for improving nurses’ communication skills.
factors such as nurses’ mental state, performance, and decisions affected by early maladaptive schemas which can affect the nurse’s relationship with the patient and its quality because schemas directly affect our relationship with others [13]. They can even increase occupational stress and health-related problems [14]. Young et al. defined schemas as the voice of parents which is the result of child-parent dialogue [16]. The child’s emotional state in interaction with painful childhood events leads to the formation of schemas. They cause bias in our interpretation of adulthood events and are expressed as interpersonal psychopathological problems such as communication disorders [17, 18].

The nursing profession is a sensitive and important job and the correct relationship of nurses with sick children and their families can accelerate the process of recovery and treatment. As we mentioned, schemas can affect interpersonal relationships, but the concept of maladaptive schemas in nursing care has not been directly addressed in studies. Therefore, nurses’ problems need to be well understood and identified to help them communicate effectively. In this regard, this study aimed to evaluate the correlation between communication skills and early maladaptive schemas in pediatric nurses.

Materials and Methods

This is an analytical and correlational study. The study population consisted of 178 nurses with an academic degree in nursing working in the children’s hospital in Rasht City, Iran formally or by a contract. Sampling was performed for 10 days from February 23 to March 4, 2016. Out of 178 nurses, 32 were withdrawn from the study (5 due to maternity leave and 27 due to loss of interest to participate) and thus 146 eligible nurses entered the study.

The data collection tool was a questionnaire consisting of three parts. The first part surveys demographic characteristics, including age, level of education, marital status, having children, the status of work shifts, and type of employment. The second part was the interpersonal communication skills scale (ASMA), and the last part was the Young Schema Questionnaire-Short Form (YSQ-SF). The ASMA questionnaire, developed by Vakili et al. [19] in Persian, has 43 items measuring general (13 items) and specific communication skills (30 items) in six areas of active listening (5 items), explaining, and clarifying the audience (5 items), speaking (5 items), giving feedback (5 items), applause (5 items), and asking questions (5 items). Items are scored on a 5-point Likert-type scale from 1: Very poor to 5: Excellent, and its total score ranges from 43 to 215 and higher scores indicate better communication skills.

The YSQ-SF, developed by Welburn et al. [20] based on the Young schema questionnaire, was used to measure maladaptive schemas of nurses. It has 75 items and 5 subscales. Each item is scored on a 6-point Likert-type scale from 1=completely untrue of me to 6=completely true of me. The score above 25 for each subscale indicates that the schema is maladaptive. We used the Persian version of this questionnaire whose psychometric properties have been evaluated by Sadooghi et al. [21]. After obtaining permissions, the researcher referred to the wards of the study hospital on all days of the week at the beginning of working shifts (morning, evening, and night). Then, after explaining the study objectives and methods to them and assuring them of the confidentiality of their information, nurses signed a written informed consent form and finally questionnaires were distributed among them.

The collected data were analyzed in SPSS v.21. Descriptive statistics (mean, standard deviation, median, minimum, maximum, and mean rank) were used to describe data. Since the data distribution was not normal according to the results of the Kolmogorov-Smirnov test, the Friedman test was used to compare the nurses’ communication skills and schemes, and the Spearman correlation test was used to examine the relationship of ASMA and YSQ-SF subscales.

Results

The age range of the participants was 22-53 years (Mean±SD age = 33.66±8.17 years). The majority of them were younger than 30 years (80.8%), had a bachelor’s degree in nursing (89.0%), were married (65.1%), had children (54.8%), were living in urban areas (95.2%), had employment status (63.3%), and were circulating nurse (85.6%). The work experience of participants was 1-28 years (Mean±SD= 8.91±6.77 years). The majority of them had less than 15 years of work experience (46.5%), had forced overtime (90.6%), and were satisfied with the work shift (43.8%) and the field of study (33.6%). About 93.2% stated that they are aware of communication skills and 51.4% had received communication skills training.

Table 1 presents the descriptive statistics of communication skills in nurses. According to the results, the highest mean value (44.12±0.53) was related to general communication skills and the lowest (33.67±0.67) was related to the communication skills of explaining and clarifying the audience. Although the scores of participants were above 3 (out of 1-5), according to Friedman test results, there were significant differences between the types of com-
As can be seen, the highest mean (2.65±1.04) was related to the disconnection and rejection and the lowest (1.76±0.73) was related to the impaired limits. The scores of participants were less than 3 (out of 1-6) and there were significant differences between schemas (P=0.0001). Moreover, the results of the Spearman correlation test (Table 3) showed that the overall ASMA score had significant negative correlations with early maladaptive schemas of impaired autonomy and performance (r=-0.283)(P=0.0001), impaired limits (r=-0.421), other-directedness (r=-0.303), and disconnection and rejection (r=-0.302), while it had no significant relationship with overvigilance and inhibition.

**Discussion**

Based on the results of the present study, the correlation between communication skills and early maladaptive schemas in pediatric nurses was statistically significant. The highest mean score of the ASMA tool was related to general communication skills. The results of Safavi, who examined the communication skills of nurses, showed that their communication skills were at a moderate level [22], while Wloszczak-Szubzda in a study focusing on the communication skills of nurses and other medical staff in Poland, reported that nurses’ communication skills with patients were poor [23]. The results of Fakhr-Movahedi showed that although nurses are aware of the importance of their relationship with patients and the importance of paying attention to their needs, there are problems that prevent a patient-centered relationship between them [24].

The highest mean score of the YSQ-SF tool belonged to the disconnection and rejection and the lowest mean score to the impaired limits. In Kaeding’s study, the early maladaptive schema of other-directedness was associated with burnout in clinical psychology and counseling trainees [25]. Those who have the disconnection and re-
jection schema are more likely to be heavily dependent on the family in childhood and have lower self-esteem. These people need to strengthen their self-esteem and self-concept to improve their communication skills.

Findings showed the significant inverse relationship of communication skills with all subscales of the YSQ-SF tool except overvigilance and inhibition subscale. That is, nurses who had higher levels of maladaptive schemas had poorer communication skills. Ylmaz showed that the relationship between communication skills and early maladaptive schemas in females was significantly higher than that in males [13]. Another study has shown a significant relationship between early maladaptive schemas (especially the schemas of disconnection and rejection, and impaired autonomy and performance) and interpersonal communication problems [16].

In a study with inconsistent results to ours, Khodabakhshi et al. compared early maladaptive schemas, irrational beliefs, and communication skills in orphan and non-orphan adolescents. They reported a significant difference between the total scores of early maladaptive schemas and their subscales, while there was no significant difference between the two groups in irrational beliefs and communication skills [26]. This result indicates that the existence of early maladaptive schemas in the two groups did not affect their communication skills. Since the early maladaptive schemas form before adolescence, the difference between the findings may be due to learning communication skills or the age of the subjects.

The results of this study indicated that nurses who had poor communication skills had higher levels of maladaptive schemas. Based on Young's findings, O'Hagan states that the traumatic events of one's current life are perceived as similar to the traumatic experiences of one's childhood. Schemas are thus evoked and directly or indirectly lead to cognitive disorders (e.g. anxiety, occupational disability), and interpersonal conflicts (e.g. communication disorders) [27]. Nurses face many problems and obstacles in patient care that can be perceived

<table>
<thead>
<tr>
<th>Variables</th>
<th>Tests</th>
<th>Impaired Autonomy and Performance</th>
<th>Impaired Limits</th>
<th>Other-Direct edness</th>
<th>Over Vigilance and Inhibition</th>
<th>Disconnection and Rejection</th>
</tr>
</thead>
<tbody>
<tr>
<td>General communication skills</td>
<td>r</td>
<td>-0.239</td>
<td>-0.451</td>
<td>-0.291</td>
<td>-0.91</td>
<td>-0.251</td>
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<tr>
<td></td>
<td>Sig.*</td>
<td>0.004</td>
<td>0.0001</td>
<td>0.0001</td>
<td>0.273</td>
<td>0.002</td>
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<tr>
<td>Speaking</td>
<td>r</td>
<td>-0.165</td>
<td>-0.382</td>
<td>-0.219</td>
<td>-0.103</td>
<td>-0.249</td>
</tr>
<tr>
<td></td>
<td>Sig.*</td>
<td>0.046</td>
<td>0.0001</td>
<td>0.008</td>
<td>0.217</td>
<td>0.002</td>
</tr>
<tr>
<td>Active listening</td>
<td>r</td>
<td>-0.308</td>
<td>-0.393</td>
<td>-0.307</td>
<td>-0.161</td>
<td>-0.312</td>
</tr>
<tr>
<td></td>
<td>Sig.*</td>
<td>0.0001</td>
<td>0.0001</td>
<td>0.0001</td>
<td>0.0001</td>
<td>0.0001</td>
</tr>
<tr>
<td>Explaining and clarifying</td>
<td>r</td>
<td>-0.308</td>
<td>-0.161</td>
<td>-0.147</td>
<td>0.57</td>
<td>-0.178</td>
</tr>
<tr>
<td></td>
<td>Sig.*</td>
<td>0.012</td>
<td>0.046</td>
<td>0.076</td>
<td>0.496</td>
<td>0.32</td>
</tr>
<tr>
<td>Asking questions</td>
<td>r</td>
<td>-0.179</td>
<td>-0.103</td>
<td>-0.41</td>
<td>0.59</td>
<td>-0.30</td>
</tr>
<tr>
<td></td>
<td>Sig.*</td>
<td>0.031</td>
<td>0.217</td>
<td>0.623</td>
<td>0.054</td>
<td>0.723</td>
</tr>
<tr>
<td>Giving feedback</td>
<td>R</td>
<td>-0.151</td>
<td>-0.207</td>
<td>-0.188</td>
<td>0.054</td>
<td>-0.142</td>
</tr>
<tr>
<td></td>
<td>Sig.*</td>
<td>0.070</td>
<td>0.012</td>
<td>0.023</td>
<td>0.519</td>
<td>0.087</td>
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<tr>
<td>Applause</td>
<td>r</td>
<td>-0.303</td>
<td>-0.265</td>
<td>-0.254</td>
<td>-0.234</td>
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<tr>
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<td>0.0001</td>
<td>0.002</td>
<td>0.004</td>
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</tr>
<tr>
<td>Total</td>
<td>r</td>
<td>-0.286</td>
<td>-0.421</td>
<td>-0.303</td>
<td>-0.118</td>
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<tr>
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<td>Sig.*</td>
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<td>0.0001</td>
<td>0.0001</td>
<td>0.157</td>
<td>0.0001</td>
</tr>
</tbody>
</table>

*Spearman test
as harmful and lead to the evocation of their maladaptive schemas and ultimately the adverse effect on their various aspects, including communication.

Therefore, it is suggested that plans be made to improve nurses’ communication skills by holding training workshops and group therapy and specialized counseling. One of the limitations of this study was that, since the relationship between communication skills and maladaptive schemas in nurses was determined by a self-report method, there is a possibility of bias in completing the questionnaires by them. The mental state of nurses can also affect their responses. Moreover, since specialized interviews for measuring maladaptive schemas and communication skills can provide more accurate and complete results, it is suggested that studies be conducted using questionnaires and clinical interviews in the field of pediatric nursing care.

Ethical Considerations

Compliance with ethical guidelines

This study obtained its ethical approval from the Research Ethics Committee of GUMS (Code: IR.GUMS.REC. 1395.341). Before collecting data, the study objectives and methods were explained to the participants, and they all signed an informed consent form. They were assured of the confidentiality of their information.

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Authors contributions

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Conflict of interest

The authors declare no conflicts of interest.

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