

## PATIENT-PERCEIVED EMPATHY FROM NURSES AND THEIR ADHERENCE TO TREATMENT PLANS AMONG PATIENT'S TAKING MAINTENANCE

MARICEL S. QUIAMCO

### ABSTRACT

This study determined the significant relationship between patient-perceived empathy from nurses and their adherence to treatment plans using test for correlations and test for differences. The respondents of the study are the 150 patients in the community of Malamba, Marilog District, Davao City taking maintenance medicines who are most willing to participate in the study. Non-probability sampling specifically purposive and quota sampling were sampling technique used. Findings of study revealed that the level of empathy from nurses is very high indicative that majority of the patient's believed that attending nurses are very evidently manifesting empathy towards them. Similarly, the patient's level of adherence to treatment is also very high which implies that patients are complying to their doctor's order regarding their medicine intake. Moreover, test for correlations using Pearson  $r$  revealed that no significant relationship was established between the moderating variables (profile age, sex, education, and income), and the patient's overall perceived empathy from nurses (independent variable) from the dependent variable (adherence to treatment plan). However, indicator patient's feedback was found to have a significant positive relationship to patient's adherence to treatment plan. Finally, statistical results using T-test and One Way ANOVA revealed no significant differences were noted in patient's level adherence to treatment plans when analyzed according to their profile.

**Keywords:** *Nurse empathy, adherence, treatment plan, test for correlations, test for differences*

### INTRODUCTION

Patient-perceived empathy from nurses in fostering trust, reducing anxiety, and promoting adherence to treatment plans. Empathy in healthcare facilitates open communication, patient satisfaction, and holistic care that respects both emotional and physical needs, which ultimately leads to better health outcomes. Patient-centered care highlights the importance of recognizing and respecting patient values, preferences, and experiences, as these factors strengthen the patient-provider relationship and improve compliance with therapeutic plans.

Effective communication between healthcare providers and patients is essential to patient care and recovery, as shown in studies from Malawi and Iran, where patients valued empathetic and respectful communication highly. Poor communication, on the other hand, can negatively affect care quality. Patient adherence remains a significant concern, with approximately 25-50% of patients not following treatment regimens,

affecting health outcomes. Health-care providers, therefore, play a crucial role in educating patients, involving them in decision-making, and supporting adherence to treatment, particularly in chronic diseases like hypertension and diabetes.

In the Philippines, non-adherence is a major cause of treatment failure in chronic diseases, with high non-adherence rates among cardiovascular patients and rural communities facing barriers like financial constraints and low health literacy. This study aims to generate insights to improve patient adherence locally, nationally, and globally.

## **METHOD**

The descriptive correlational design was chosen to examine the relationship between patient-perceived empathy from nurses and treatment adherence. The study took place in Barangay Malamba, Davao City, and included 150 patients (100 on cardiovascular and 50 on diabetes maintenance).

Data was collected using an adapted questionnaire (SPPEN) to measure perceived empathy in three domains: nurse expression, patient feedback, and patient expectations. Adherence was assessed with the Medication Adherence Report Scale (MARS-5), which rates adherence behaviors on a five-point scale. Data gathering involved securing approval, distributing and collecting questionnaires, encoding data, and statistical analysis. Analytical tools included descriptive statistics, Pearson r correlation for relationships, and t-tests and ANOVA to assess empathy differences across groups.

## RESULTS AND DISCUSSION

### Demographic Profile

The majority of respondents are older adults (above 60 years, 44.7%) and predominantly male (50.7%). Most have completed only elementary education (68.7%) and have low income (80.7% earn Php10,000 or less).

Table 1 Respondent's Demographic Profile

Profile	Frequency	Percent
<b>Age</b>		
Below 50 years	38	25.30
51 – 60 years	45	30.00
Above 60 years	67	44.70
<b>Sex</b>		
Male	76	50.70
Female	74	49.30
<b>Education</b>		
Elementary	103	68.70
High School	36	24.00
College Level	7	4.70
College Graduate	4	2.70
<b>Income</b>		
Below Php10,000	121	80.70
10,001 – 20,000	28	18.70
20,001 – 30,000	1	0.70
<b>Total</b>	<b>150</b>	<b>100.0</b>

### Level of Patient's Empathy from Nurses

Table 2 outlines patients' perceptions of empathy from nurses across three indicators: nurse expression, patient feedback, and patient expectations. The overall empathy perception score was very high, with a mean of 4.79 (SD = 0.547), indicating that patients felt strongly that nurses exhibited empathy.

Under nurse expression, patients gave the highest ratings to nurses' attentiveness and friendliness, particularly in statements like "The nurses listen to my opinions" (M = 4.92) and "*The nurses are friendly*" (M = 4.88). However, relatively lower but still very high scores were given to aspects related to emotional understanding, such as "*The nurses can understand my feelings*" (M = 4.24) and "*The nurses care about my daily life*" (M = 4.31). The category mean for this dimension was 4.63, described as very high. This means that nurse expression is always observed.

This result is consistent with earlier studies that emphasize the vital role of empathy in nursing care and its impact on patient satisfaction and communication. For instance, McCabe (2004) found that nurse-patient communication characterized by

empathy significantly enhances the quality of care and patient satisfaction. Similarly, Reynolds and Scott (2000) emphasized that empathetic understanding is central to effective therapeutic relationships in nursing, aligning with the current finding that patients believe nurses listen to them, care about their daily life, and understand their emotions. Moreover, Williams and Stickley (2010) found that patients view empathy as a core component of compassionate care, reinforcing the relevance of the current results, where emotional understanding and active listening were rated very high.

In terms of patient’s feedback, patients reported a strong willingness to communicate with nurses about their condition (M = 4.85) and feelings (M = 4.57), as well as a sense of emotional support, as indicated by items like *“The nurses’ assistance reduces my depressive symptoms”* (M = 4.55). The category mean was 4.66 described as very high. This means suggest that patient’s feedback is always observed.

This aligns with existing literature that emphasizes the importance of open communication and emotional support in the nurse-patient relationship. According to O'Hagan et al. (2014), patients who perceive nurses as empathetic and approachable are more likely to share important information about their health and emotional needs, facilitating better clinical outcomes. McCabe (2004) also reported that empathetic communication fosters patient trust and encourages disclosure of sensitive information, contributing to personalized and effective care.

Finally, under patient’s expectations, the highest possible ratings were observed, with mean scores of 4.93 for both *“I hope that the nurses taking care of me can patiently listen to me”* and *“...can understand me,”* and 4.91 for *“...can assist me when I am in a bad mood.”* This dimension had the category mean of 4.93 described as very high. This denotes that patient’s expectations is always observed.

This finding supports the previous studies which emphasizes that patients view empathetic communication and emotional support as fundamental aspects of nursing care. Chan (2002) found that patients' expectations of emotional understanding and patient-centered communication significantly influence their perception of nursing quality. Similarly, Zamanzadeh et al. (2014) reported that patients place high value on nurses' ability to listen attentively, understand their feelings, and provide emotional comfort, especially during moments of vulnerability.

Table 2. Perceived Level of Patients Empathy from Nurses

<b>Patient’s Empathy From Nurses</b>	<b>Mean</b>	<b>Std Dev</b>	<b>Description Level</b>
<b>Nurse Expression</b>			
1. I think that the nurses care about me	4.92	0.296	Very High
2. The nurses listen to my			

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opinions	4.85	0.373	Very High
3. The nurses are friendly	4.88	0.326	Very High
4. The nurses aggressively solve my problems	4.55	0.619	Very High
5. The nurses can see things from my perspective	4.31	0.770	Very High
6. The nurses care about my daily life	4.24	0.792	Very High
7. The nurses can understand my feelings	4.69	0.586	Very High
<b>Category Level</b>	<b>4.63</b>	<b>0.536</b>	<b>Very High</b>

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**Patient's Feedback**

1. When I am in a bad mood, I will actively tell the nurses	4.85	4.182	Very High
2. I will actively tell the nurses about my condition	4.57	0.548	Very High
3. I am willing to tell the nurses my feelings	4.55	0.574	Very High
4. The nurses' assistance reduces my depressive symptoms	4.45	0.574	Very High
5. I can be encouraged by the nurses taking care of me	4.57	0.523	Very High
<b>Category Level</b>	<b>4.66</b>	<b>1.009</b>	<b>Very High</b>

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**Patient's Expectations**

1. I hope that the nurses taking care of me can patiently listen to me	4.93	0.250	Very High
2. I hope that the nurses taking care of me can understand me	4.93	0.250	Very High
3. When I am in a bad mood, I hope I can obtain assistance from nurses	4.91	0.292	Very High
<b>Category Mean</b>	<b>4.93</b>	<b>0.250</b>	<b>Very High</b>

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<b>Overall Mean</b>	<b>4.79</b>	<b>0.547</b>	<b>Very High</b>
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### Level of Patient's Adherence to Treatment Plan

Table 3 shows the level of patient's adherence to treatment plan. The results reveal that the overall mean is 4.14 described as very high. This suggest that patient's adherence to treatment plan is always evident. In particular, the highest mean is 4.46 in the aspect of *altering the dose*, while the lowest mean is 3.91 in terms of *missing out a dose*.

Table 3. Perceived Level of Patients Adherence to Treatment Plan

Adherence	Mean	Std Dev	Description
1 I take less than instructed	4.40	1.023	Very High
2. I stop taking it for a while	4.09	0.750	Very High
3. I miss out a dose	3.91	0.874	Very High
4. I alter the dose	4.46	0.783	Very High
5. I forget to take it	3.92	2.782	Very High
<b>Overall</b>	<b>4.14</b>	<b>0.941</b>	<b>Very High</b>

### Relationship between Perceived Empathy from Nurses and Patient's Adherence to Treatment Plan

The analysis presented in Table 4 shows a test of relationship between empathy and patient's adherence to treatment plan. The overall results reveal that there is no significant relationship between the dimensions of empathy and patient's adherence ( $r=.122$ ,  $p>.05$ ). More specifically, nurse expression and adherence ( $r=-.009$ ,  $p > 0.05$ ), patient expectations and adherence ( $r=.154$ ,  $p>.05$ ).

This finding contrasts with some prior research, which has typically suggested a positive association between perceived empathy and treatment adherence. For instance, Hojat et al. (2010) found that physician empathy was significantly associated with better clinical outcomes and higher adherence, particularly among diabetic patients. Similarly, Zolnierek and DiMatteo (2009) concluded in their meta-analysis that effective communication, which includes empathy, positively influences patient adherence.

On the other hand, there is a significant relationship between patient feedback and adherence ( $r=.185$ ,  $p<.05$ ). This suggests that when patients actively share information about their condition and feelings with nurses, they are more likely to follow their prescribed treatment regimen. This result is consistent with previous studies that highlight the role of patient engagement and communication in promoting adherence. According to Street et al. (2009), patients who participate actively in conversations with healthcare providers tend to be better informed, more motivated, and more committed to their care plans. Similarly, Haskard Zolnierok and DiMatteo (2009) found that effective communication especially when patients feel heard and involved significantly improves adherence to treatment.

Table 4. Relationship Between Patient's Empathy from Nurses and Adherence to Treatment Plan

<b>Nurse Empathy</b>	<b>r</b>	<b>p-value</b>	<b>Remarks</b>
Nurse expression	-0.009	0.912	Not Significant
Patient Feedback	0.185	0.024	Significant
Patient Expectations	0.154	0.060	Not Significant
Overall	0.122	0.138	Not Significant

**Comparison in the Patients Adherence to Treatment Plan When Analyzed According to their Profile**

Using One-Way ANOVA and t-tests, the results showed no significant differences in adherence based on age, gender, education, or income. In terms of age, it revealed no significant difference in adherence across age groups ( $F = 2.375$ ,  $p>.05$ ), also with gender, the t-test showed no significant difference in adherence between males and females ( $t = 0.929$ ,  $p>.05$ ), contrary to Angadi et al. (2020) and Al-Noumani et al. (2022), who found gender-based differences in treatment adherence. Moreover, in terms of education, the results indicated no significant difference in adherence across education levels ( $F = 0.871$ ,  $p>.05$ ), opposing studies that suggest higher education correlates with better adherence (Uchmanowicz, 2018). Furthermore, in the aspect of income, it was found to have no significant difference in adherence across income levels ( $F = 1.103$ ,  $p > .05$ , contradicting findings by Lee et al. (2019) that associated higher adherence with higher income and employment status.

## **CONCLUSIONS**

1. Respondents are primarily older, with low education and income levels.
2. Patients perceive a high level of empathy from nurses across various indicators.
3. Patients generally adhere well to treatment plans.
4. Only the dimension patient feedback has significant relationship with patient's adherence to treatment plans
5. There is no significant difference in the patient's adherence when grouped according to profile.

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