UTILIZATION AND PERCEPTION ON AMBULATORY CARE SERVICES OF RHEUMATOLOGY DEPARTMENT AT YANGON SPECIALTY HOSPITAL, 2019

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M.B., B.S

Dip. Med. Sc (Hospital Administration)

Master of Hospital Administration (MHA)

University of Public Health, Yangon

2019

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Thesis submitted to
the Postgraduate Academic Board of Studies
University of Public Health, Yangon
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This thesis has been approved by the Board of Examiners

Chief Examiner

Examiner (1) **Examiner (2)**

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ABSTRACT

Patients' perception is an important component of the health care industry in this competitive modern era. It is used as an important indicator of quality care and is frequently included in healthcare planning and evaluation. A cross-sectional hospital-based study using mixed method was conducted to describe the utilization and perception of patients on ambulatory care service of rheumatology department at Yangon Specialty Hospital during August to November, 2019. Data collection was done through face-to-face interviews and reviewing monthly reports of ambulatory day care services (January to June). Key informant interviews and individual in-depth interviews were also done. Most of the patients were female and the commonest disease for ambulatory care service was SLE with organ involvement. Most of the respondents were dependent and nearly one fourth of the respondents were middle school education level. The higher the education level, the poorer the perception on the hospital services as their expectation is high. The association between the education status and the perception on convenience of service and basic amenities is statistically significant (P=0.034). The main reasons for poor perception were waiting area cleanliness, adequacy of waiting chairs and toilet cleanliness. The perception level on responsiveness is good as the patients were pleased with communication of the healthcare providers and their care. More than 20% of patients responded that they were disagreeable on adequate drug supply. Most of the patients had good perception on quality of care as they were pleased on receiving effective treatment, the knowledge and skill of health care provider and proper appointment system. Nearly one third of patients received the ambulatory care services of rheumatology department. The longer the waiting time, the poorer the perception of patients and that is statistically significant (P< 0.001). The common challenges of patients were financial and transportation difficulties. In this study, overall perception of patients on ambulatory care service of rheumatology department was good perception.

Key words: patients' perception, ambulatory care service, rheumatology

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LIST OF ABBREVIATIONS

ACR	American College of Rheumatism
CIA	Chronic Inflammatory Arthritis
CT	Computed Tomography
EULAR	European Leakage against Rheumatism
HCP	Healthcare provider
IV	Intravenously
MRI	Magnetic Resonance Imaging
NOGH	North Okkalapa General and Teaching Hospital
OPD	Out-patient department
RA	Rheumatoid Arthritis
RDCU	Rheumatology Day Care Unit
RMDs	Rheumatic and musculoskeletal diseases
SC	Subcutaneous
SLE	Systemic Lupus Erythematosus
SpA	Spondylarthritis
UK	United Kindom
WHO	World Health Organization
YCH	Yangon Children Hospital
YGH	Yangon General Hospital
YSH	Yangon Specialty Hospital

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CHAPTER (1)

INTRODUCTION

1.1 Background information

Patients' perception about quality of care often determines whether they seek and continue to use services of hospital. Many authors consider patients' satisfaction as an indicator of quality of care from the patients' perspective and it is increasingly considered an important component of comprehensive chronic disease management (Patro et al., 2009). The importance of patients' satisfaction as a measure of quality is based in two main principles: (1) patients are an essential source of information on how a health care service works; (2) patients' perspective is increasingly being valued when planning and evaluating services (Sharma and Kamra, 2013).

Patients' perception is an important component of the health care industry in this competitive modern era. It is used as an important indicator of quality care and is frequently included in healthcare planning and evaluation (Development et al., 2008).

In the last decade there has been a paradigm shift in the approach to chronic inflammatory rheumatic diseases, in part thanks to a better understanding on the etiopathogenic mechanisms of the diseases, but also the emergence of new and more efficacious drugs.

With the widespread use of biological drugs in various inflammatory rheumatic diseases, including rheumatoid arthritis (RA) and spondylarthritis (SpA), rheumatology departments have adapted to this reality, being it essential to ensure high levels of quality in the care delivered. Department of Rheumatology, where every day patients with chronic systemic diseases are followed, in particular RA, SpA (including ankylosing spondylitis, psoriatic arthritis and undifferentiated spondylarthritis), juvenile idiopathic arthritis, Behçet's disease, systemic lupus erythematosus, progressive systemic sclerosis, Sjögren syndrome, systemic vasculitis or idiopathic inflammatory myopathy treated with biotechnological drugs. The biological therapies, administered subcutaneous (SC) or intravenously (IV), are expensive drugs with some well- known risks that justify close monitoring and rigorous evaluation of the risks and benefits (Barbosa et al., 2011).

However, due to the fact that biological therapy is relatively new, there is a lack of research about patients' experiences of how to administer and live with biological therapy (Larsson, 2013).

The term rheumatic and musculoskeletal diseases (RMDs) includes degenerative, inflammatory and auto-immune conditions which are associated with severe pain, joint damage, disability and even death. RMDs are the second leading cause of disability in worldwide according to the study of World Health Organization (WHO) Global Burden of Disease (2010). Estimates suggest that almost 2 billion people are affected worldwide imposing huge financial costs; in Europe alone, RMDs are associated with an economic burden of over €200bn per year (Institute for Health Metrics and Evaluation (IHME), 2018).

The global burden of RMDs has recently been stated in a series of individual articles. Nevertheless, awareness of the burden of RMDs amongst policy-makers remains limited for both pediatric and adult manifestations of diseases. In the developing and developed countries, the prevalence and burden of RMDs is expected to increase with the aging of the world's population, resulting in a reduction in the quality of life and loss of labor productivity, while at the same time significant burden on national health systems (Al Maini et al., 2015).

The replacement of clinical care by daycare can have several consequences for the hospital. It often results in new centers with a different philosophy and logistics. For instance, hospitals can rationalize their inpatient bed utilization with reduction of admissions and intra treatment transfers.

Daycare admission may have many advantages such as prevention of hospitalization, reduced waiting times and rapid recovery also may lead to reduce the hospital related infections. Therefore, most of the patients prefer to daycare admission because it interrupts their lives minimally.

1.2 Problem Statement

The health sector faces a wide range of challenges in Myanmar. Public hospitals have faced funding shortages and skills gaps, resulting in uneven quality and limiting their effectiveness due to the number of hospital admission are increasing gradually and increasing the expenditure of budget for improving health care. Public awareness and perception of patients and providers are increasing. In recent years, hospitals have increasingly been providing day care, i.e. the admission of patients to a hospital for a day without spending the night.

Yangon Specialty Hospital (YSH) is 500 bedded hospital and one of the tertiary hospital for specialty subject of Medicine such as Rheumatology, Chest Medical, Chest Surgical, Liver Medical, Liver Surgical, Renal Medical and Urosurgical care. Rheumatology department in YSH is the only one specialty department which provides hospital care not only the inpatient but also the outpatient care including the ambulatory day care service.

The assessment of patients' satisfaction through satisfaction surveys is nowadays the preferred method for valuing the perspective of patients about the health care provided. Empathy and assurance with the health care team, which mainly represent interpersonal communication, were identified as having a strong influence on the patients' willingness to come back to the hospital.

1.3 Justification

Over the last few years, more and more hospitals in Myanmar indicated their need for a valid and reliable instrument to measure patients' perception with day care admissions. The quality of health services provided by multidisciplinary teams and the patient's relationship and empathy with those, are essential issues to increase the security and the patient's compliance to therapy, which are a key to therapeutic success. For these reasons, it is important to know the level of the patients' satisfaction, both with to the provider's aspects of Rheumatology day care unit (RDCU), but also with the provision of health care by the various elements of the health team, in particular physicians, nurses and administrative staff (Barbosa et al., 2011).

A community's perception with a clear understanding of the needs and expectations of community health services can help better use of health services (Patro et al., 2009). Identify the factors affecting the patients' perception can be use systematically to improve the services and help to generate ideas towards resolving these problem (European Patients Forum, 2016).

There is also very limited study at related to that field in Yangon Specialty Hospital. This study is attempted to explore the utilization, workload and perception of patients and problems faced by health care providers on ambulatory care services. This could be helpful for hospital administration and management for better service and effective management. It is also important to realize that the role of ambulatory care services in public hospitals. The findings of this study will be useful for not only hospital administrative purpose but also for filling gaps in giving ambulatory services.

CHAPTER 2
LITERATURE REVIEW

2.1 Ambulatory care

Ambulatory care is a form of medical care provided for the patient who does not need to be hospitalized for treatment and sometimes referred to as "outpatient care". Ambulatory is the Latin word "ambulare" means "to walk"- that's why this sounds so similar to the other medical term, ambulance, which or course refers to the moving (or walking) van that can pick up patients and take the directly where they need to go (Smith, 2016).

Many hospitals can give the required treatment in the emergency rooms for patients who can be treated without hospitalization. Basic diagnostic tools, including X-rays, ultrasounds, some biopsies, and blood samples, can also be used to diagnose or manage a medical condition (Smith, 2016).

Many simple procedures can also be performed on out-patients. Ambulatory care tends to be preferable to hospitalization for patients, because most people want to avoid spending time in the hospital. This type of care can also be considerably less expensive, which is a concern for some people. Hospitals can also encourage patients to seek outpatient care wherever possible to ensure that medical facilities are free when critical patients are needed and reduce overall operating costs (McMahon, 2019).

2.2 Different types of ambulatory care settings

Ambulatory care refers to medical care provided for outpatients. Less expensive than an inpatient hospitalization, ambulatory care has emerged as the fastest growing segment of the health care market in the United States (US). The expansion of ambulatory care has been aided by improvements in medical technology and the level of home health nursing care available. The types of ambulatory care settings are as different as the recognized medical interventions and sub-specialties that practice within them (Abe, 2019).

Diagnostic ambulatory care settings include radiology and imaging centers as well as clinical laboratories. These venues allow individuals to complete a physician-ordered X-ray, CT scan, MRI, cardiac stress test, echocardiogram or laboratory test without returning to the hospital as an outpatient.

Other types of ambulatory care settings such as outpatient surgical centers and cosmetic surgery spas can be described as short-term treatment. Again, these care settings are often more convenient for the patient in terms of waiting times, location and privacy during the visit. Markedly shorter waiting times are often cited as the main reasons for using an urgent care clinic instead of a hospital emergency room (Abe, 2019).

Ambulatory care settings providing long-term care and treatment include physical therapy clinics, renal dialysis centers, rheumatology care unit and oncology centers providing both chemotherapy and radiation therapies. These care setting treat chronic diseases or injuries require long-term therapies. Despite having chronic or life-threatening illnesses, patients whose conditions are medically stable can obtain treatment on an outpatient basis. These facilities are less expensive than the inpatients and cause less disruption to a patient's lifestyle than hospitalization. Treatment length at long-term ambulatory care settings can range from weeks to years and often results in well-established patient-practitioner relationships (Abe, 2019).

2.3 Outpatient ambulatory care

Outpatient ambulatory care is any medical service that takes place within one day in a doctor's office, clinic or hospital. The patient is registered and discharged on the same day. Types of treatment include simple surgeries, dental care and routine medical exams to different types of diagnostic testing. Outpatient care is intended to reduce the medical expense by eliminating the requirement of overnight stays and to permit patients to return to their destinations as fast as possible (Baran, 2019).

In urgent but non-life-threatening circumstances, outpatient care is often faster and more convenient than visiting an emergency room. Outpatient care is one of the biggest concerns as patient safety increases over the years. Although most procedures have a very low risk of side effects or complications, issues may be more difficult to treat in clinics and offices without expansive supplies of emergency equipment and pharmaceuticals. Adequate training and preparation are necessary to ensure the safety of all patients receiving outpatient care (Baran, 2019).

2.4 Rheumatology Ambulatory Care Unit

Patients with Chronic inflammatory arthritis (CIA) undergoing biological therapy often live with lifelong disease and treatment. Although patients usually have

a good quality of life and feel well, they are concerned about the risk of treatment failure and relapse. In the same way as other people, their lives revolve around the family, work and social contacts but, in addition, they have to find the time for health care and medical treatment. Their lives are often characterized by regular monitoring of both the disease itself and biological therapy. There is a growing knowledge available about biological therapies in rheumatology care, as well as their effects and side effects (Fristedt, 2012).

2.5 Biological therapy

The primary goals of CIA treatment are to suppress disease activity, and achieve remission or low disease activity by controlling the symptoms and inflammation as well as prevent joint damage and early death (Gossec et al., 2012).

A limited number of measures to assess response in clinical trials and follow disease activity in clinical practice are widely used and the American College of Rheumatology (ACR) and the European League Against Rheumatism (EULAR) have jointly developed new definitions for remission which provide an optimal clinical outcome and can be achieved in a significant proportion of patients in trials and practice. Attaining remission according to these criteria, index-based or Boolean, will prevent joint destruction or at least progression of joint damage irrespective of residual subclinical changes, optimize physical function, improve quality of life and work capacity and reduce comorbidity risks (Smolen et al., 2017)

The biological therapies, administered subcutaneous (SC) or intravenously (IV), are expensive drugs with some well-known risks that justify close monitoring and rigorous evaluation of the risks and benefits. All patients taking these drugs, either administered IV (Infliximab, Rituximab, Abatacept, Tocilizumab), or SC (Etanercept, Adalimumab, Anakinra), are regularly monitored at the RDCU (Barbosa et al., 2011).

2.6 Patient perception Vs Patient satisfaction

The terms perceptions and satisfaction have often been used interchangeably. This lead to considerable conceptual confusion. Satisfaction is an example of a perception, but it is by no means the only example. Satisfaction can be defined as fulfilling expectations, needs, or desires. Even though satisfaction is not the only form of patient assessment of care, patient satisfaction and its correlates are predominant in quality care assessment studies. Most reviews of the literature have been critical of its use since there is rarely any theoretical or conceptual development of patient

satisfaction, little standardization, low reliability, and uncertain validity of measures (Sofaer and Firminger, 2005).

Patient satisfaction is a pre-requisite to successful clinical practice. While an efficacious treatment is an important consideration, other variables are recognized to contribute to clinical satisfaction (Jamison, 1996).

2.7 Patient perception

It can be defined as fulfillment or meeting of expectations of a person from a service or product. When a patient comes to a hospital, he has a preset image of the various aspects of the hospital as per the reputation and cost involved. Although, their main expectation is getting cured and going back to their work, but there are other factors, which affect their satisfaction. Sometimes, they might have rated a hospital very low on the basis of information, they have got from different sources but they find it above their expectation and they are satisfied. Similarly, if they have got a very high expectation from a hospital, but if they find it below their expectation, they will not be satisfied.

Hospitals have expanded in terms of availability of specialties, improved technologies, facilities and increased competition and the expectations of patients and their relatives have increased many fold. Consumer expectation in any medical experience influences whether how soon and how often they seek care from which medical facility. High expectation from a medical organization is a positive indicator of its reputation in the society and is very important for attracting patients, whereas low expectation deters patients from taking timely medical help, thus negatively affecting himself as well as the medical care provider.

However, a very high and unrealistic expectation may lead to dissatisfaction despite reasonable good standards of medical practice. Previously, there were very few government hospitals with no charge to the patients. Hence, the expectations were also very minimal. But now, the scenario has changed. The hospitals have started charging the patient in the name of user charges. Private hospital care cost has gone very high. With the advent of Consumer Protection Act (1986), the patient's expectation has also gone very high. Now hospitals have to be very careful about patient dissatisfaction to avoid any unnecessary litigation. Hospitals have evolved from being an isolated sanatorium to five star facilities. The patients and their relatives coming to the hospital not only expect world-class treatment, but also other facilities to make their stay

comfortable in the hospital. This change in expectation has come due to tremendous growth of media and its exposure, as well as improvement in the facilities (Mishra and Mishra, 2014).

Knowledge of expectation and the factors affecting them, combined with knowledge of actual and perceived healthcare quality, provides the necessary information for designing and implementing programs to satisfy patients.

Human satisfaction is a very complex concept that is affected by a number of factors like lifestyle, past experience, future expectation and the values of individual and society in terms of ethical and economical standings (Mishra and Mishra, 2014).

2.8 Patients' satisfaction with the rheumatology day care unit

Consumer satisfaction is increasingly recognized by hospital administrators and health care providers as an important aspect of health care. Although satisfaction is a desirable outcome in its own right, it can also influence whether a person seeks medical advice, complies with treatment, and maintains a continuing relationship with a practitioner. This is particularly important for patients with rheumatoid arthritis (RA), whose illness lasts a lifetime (Hill et al., 1992).

The quality of health services provided by multidisciplinary teams and the patient's relationship and empathy with those, are essential issues to increase the security and the patient's compliance to therapy, which are a key to therapeutic success. For these reasons, it is important to know the level of the patients' satisfaction, both with to the physical aspects of our RDCU, but also with the provision of health care by the various elements of the health team, in particular physicians, nurses and administrative staff (Barbosa et al., 2011).

2.9 Factors possibly associated with patients' satisfaction with the rheumatology day care unit

We also evaluated demographic and clinical factor possibly associated with the level of patients' satisfaction with the RDCU. Demographic factors assessed were age, gender, marital status, number and relationship to the people with whom the patient lived and educational level. With regard to clinical factors, we collected information on the rheumatic disease diagnosed, disease duration, follow-up time at RDCU and disease activity. Patients were also asked about some aspects related to the RDCU that could be associated with their level of satisfaction, including the distance from home to the RDCU, travel method, accompanying in the visit to the RDCU, ease of access to the

RDCU from the main entrance of the hospital, waiting time and adequacy of the physical environment for the purpose of the RDCU (Barbosa et al., 2011).

2.10 Related study in Myanmar

In 2018 study in ambulatory care at NOGH, female were more utilized ambulatory care about two times than male. Among 107 patients, 41-60 years age group was the most and female were significantly preponderance in this study. Majority were dependents. More than two third of patients had good perception level upon infrastructure and amenities. Approximately 65% of patients had waiting time for more than one and half hour duration. More than 60% of patients had good perception level regarding responsiveness and services. More than one third of patients had transportation difficulty and the main inconvenience during the course of receiving chemotherapy infusion was uncomfortable due to inadequate chemo chairs. Main positive perception towards receiving ambulatory services were relaxed feeling and no need to worry family because they can return to home on same day. Most of the patients suggested that patient's beds, chemo chairs, waiting space and waiting chairs should be provided adequately for them (Zin-Me-Ko, 2018).

In another study of satisfaction at Waibargi specialist hospital, it was found that the majority of the respondents were highly satisfied with the services offered. Patients were satisfied with basic amenities, doctor's services, nurse's services, waiting time, convenience of the services, respects for dignity, autonomy, financial expense and overall general performances. However, there were weak in satisfaction on sitting chairs toilets at OPD. Information and explanation, doctor's services, nurse's services, and financial expense were found to have significant relationships with patient satisfaction level. It is beneficial to understand that there is an opportunity for the improvement of the outpatient department services (Zaw-Linn, 2017)

In the 2016 study satisfaction in OPD at Yangon Children Hospital (YCH), 216 patients were selected and face to face interviewed was done. Nearly 50% of care-givers were less than or equal to 30 years and majority were female care-givers, who were from within Yangon region, dependent, middle school level education status and low and moderate family income groups. Regarding distribution of the waiting time, most of the care-givers waited not more than 30 minutes and only 4 care-givers waited equal and more than 30 minutes. It was found that nearly half of the care-givers had good satisfaction with overall impression of hospital service (Khin-Theingi-Myint, 2016).

2.11 Related study in other countries

In the study of Portugal, patients were overall very satisfied with the functioning of the RDCU. Waiting time, satisfaction with the physician role, room temperature and intravenous therapy were the main factors positively. An anonymous questionnaire was administered to all patients with rheumatoid arthritis (RA) or spondyloarthritis treated with biological drugs and followed at the RDCU at Hospital Garcia de Orta, Almada, Portugal (Barbosa et al., 2011).

In the study of Germany and Estonia study, most of the rheumatologically patients were female (Põlluste et al., 2012; Vanhoof, Declerck and Geusens, 2002). In the study of India, the patients were highly satisfied with their doctors. They found them courteous and attentive towards the patients. The health facility was clean and adequately ventilated. Majority of the patients were ready to re-visit the hospital (Kumari et al., 2009).

In the study of United Kingdom (UK), the patients were aged 22-75 years (mean and median 56 years); the duration of disease was from 1 to 40 years and one third of patients were women. Eighty six percent of patients were either satisfied (77%) or highly satisfied (9%) with the care they received in the clinic. However, 10% were not sure and three (4%) were dissatisfied. There was less agreement with the statement 'There are some things about my care in clinic which could be improved'; 43% were uncertain, 20% agreed with the statement and 36% disagreed (Hill et al., 1992).

In the study of Spain, the perception of patients from four general hospitals in varies on the level of education (Quintana et al., 2006). In the study of Nigeria, the perception of the patients from three tertiary general hospitals also varies regarding on the basic amenities and convenience of services (Ughasoro et al., 2017).

In the study of Netherlands,174 patients were studied for RA patient's perception of quality of care: waiting time, autonomy, continuity, efficiency, effectiveness, knowledge, information, and empathy, coordination among health professionals, office environment, and non-financial access; waiting time before the start of the treatment, waiting time during the treatment, quality and quantity of general information about RA and its treatment, and quality of individualized information on the purpose of treatment modalities and diagnostic procedures. Significant differences between nurse and day patients were seen in the following domains: waiting time during the treatment, autonomy, coordination, non-financial access, and quality of general information (all $P < 0.05$) (Tijhuis et al., 2003).

The literature review highlights many factors that can affect patient satisfaction. These determinants can be either provider-related or patient-related. Some provider-related factors are physician's proficiency and interpersonal communication skills, behavior of hospital staff, access to care, basic facilities, and infrastructure. Patient-related factors include sociodemographic characteristics of patients, stage of their disease as well as patients' perception of a relationship of trust and feeling of being involved in decisions about their care (Kumari et al., 2009).

The modern day patient is more aware and educated, has access to information, and has more expectations from the health system. Hence, it is more important today than ever before to address issues related to service delivery in this context. A patient with positive perceptions has a greater chance of translating it into positive outcomes. Whereas, negative attitudes in the patient and dissatisfaction with health care provided leads to poor compliance and, in extreme cases, patients resort to negative word-of-mouth that discourages others from seeking health care from the system (Kumari et al., 2009).

2.12 Conceptual framework

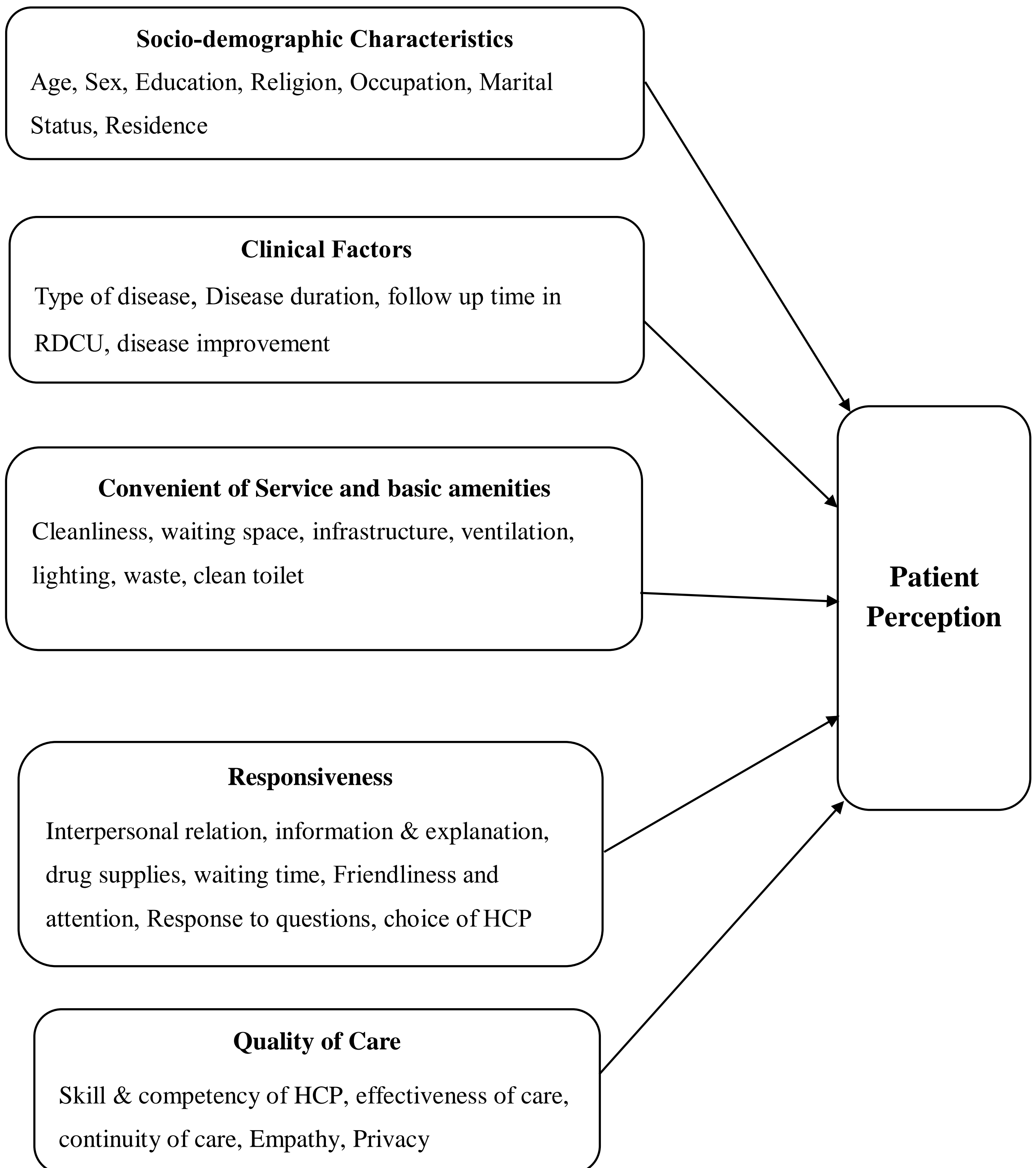


Figure (2.1) Conceptual framework of perception on ambulatory care services

CHAPTER (3)
OBJECTIVES

3.1 General objective

To assess the current utilization and perception of patients on ambulatory care services of Rheumatology Department at Yangon Specialty Hospital, 2019

3.2 Specific objectives

1. To describe the structure, functions and utilizations of ambulatory care services of Rheumatology Department
2. To determine the perception of patients on ambulatory care services of Rheumatology Department
3. To explore the challenges on providing ambulatory care services of Rheumatology Department

CHAPTER (4)
RESEARCH METHODOLOGY

4.1 Study Design

The study was hospital based cross-sectional descriptive study using both quantitative and qualitative methods.

4.2 Study Period

The study was conducted from August to November, 2019.

4.3 Study Area

The study was conducted in the Rheumatology Department at Yangon Specialty Hospital.

4.4 Study Population

For quantitative study,

- Monthly reports of ambulatory care services (January to June) of Rheumatology Department at Yangon Specialty Hospital
- Patients who utilized ambulatory care services of Rheumatology Department during study period

For qualitative study,

- Doctor and nurse from Rheumatology Department of Yangon Specialty Hospital and hospital administrator from this hospital

Inclusion Criteria

For patients,

- Patients who have been receiving ambulatory care services for more than one time

For health care providers,

- At least at least 6-month experience at that hospital

Exclusion Criteria

- Patients who are not willing to response and not mentally sound were excluded.

4.5 Sample size determination

For quantitative data collection, sample size was calculated using the formula in accordance with the study design and purpose.

Assume "p" as 0.5

$n = z^2pq/d^2$ (Daniel & Cross, 2013)

Where,

n = sample size

p = 0.5 (proportion of patients who have good perception on ambulatory care services)

q = 1-p

z = confidence coefficient for two-sided significant level (1.96 for 95%CI)

d = 0.1 (desired precision of the "p") (Zin-Me-Ko, 2018)

So the estimated sample size is 96. However, keeping the dropouts in the mind 10% extra sample for the study were considered and taken as (96+10) =106.

4.6 Sampling procedure

For quantitative data,

The average numbers of patients receiving ambulatory day care services at Rheumatology department were round about 60 per week. The ambulatory day care register was used as a sampling frame. Patients who are receiving ambulatory day care services at Rheumatology department were recruited consecutively until the required sample size was fulfilled.

For qualitative data,

(1) For the patient side, three patients who feel satisfied on overall satisfaction and three patients who feel dissatisfied on overall satisfaction by using purpose sampling method.

(2) For the provider side, one consultant, one nurse, one health care administrator who have at least 6-month experience at that hospital.

4.7 Data collection methods and tool

For quantitative portion of the study,

For utilization, the monthly reports and registers (January to June, 2019) of Rheumatology Department were reviewed. For perception, face to face interviews method was used by using structured questionnaire.

Structured questionnaires includes five sections: A. Socio-demographic characteristics, B. Clinical Factors, C. Convenience of services and basic amenities D. Responsiveness and E. Quality of care. Every section which the patients were asked to agree or disagree using a 4-point Likert scale (1=strongly disagree, 2= disagree, 3 = agree, and 4 =strongly agree).

For qualitative portion of the study,

In-depth interviews to patients and key informant interviews to health care provider and health care administrator were done using interview guidelines. Note taking was done. Voice recording was done with their permission. Field notes were written at the end of each interview.

4.8 Data management and analysis

4.8.1 Quantitative data

Completeness of questionnaires were checked after completing face-to-face questionnaires every day. Data from the questionnaires were entered into the computer after careful checking the coding by data checking system using the Epi data program, preparation of properties of data for all variables and minimizing of errors, to avoid missing data, to ensure skip pattern, to ensure possible range.

After data entry was completed, data was exported to SPSS version16, the data cleaning process for errors, missing and outliers were done carefully. Data analysis was done by SPSS version 16.

In exploratory data analysis, the final cleaning of data was done by looking for previously unrecognized illogical errors and any inconsistencies. After preliminary data analysis for further data cleaning and exploratory data analysis for data distributions, descriptive statistics on respondent's characteristics, socio-demographic characteristics were calculated. The summary measures (means, standard deviations, maximum, minimum) for continuous variables and frequency and percent for categorical variables were calculated.

For analytical process, association between background information of patients and perception level of infrastructure and amenities, responsiveness and services and waiting time were assessed by Chi-square test and probability value 0.05 was considered as significant.

4.8.2 Qualitative data

For qualitative study, recordings of the interviews were transcribed into text (transcripts) in exactly the same words (verbatim) as in the interviews. These transcripts included non-verbal expressions of the respondents.

The researcher read all the notes and transcripts thoroughly from the beginning to the end to familiarize the data and context within which data were collected. Then themes were identified based on the existing theory and literature search.

If necessary, themes were identified from the data via through and repeated reading. A coding system was set up, including themes, sub-themes and codes. Coding was done and data analysis was done using thematic analysis.

4.9 Ethical Consideration

The study was conducted according to the guidelines issued by the University of Public Health Ethical clearance obtained from Institutional Review Board of the University of Public Health (2019/MHA/4).

At the entry of the study, an introduction to the study and its purpose as well as an explanation about the selection of the research subjects and the procedure were thoroughly explained to the participants. In addition, the possible benefits such as gaining new knowledge from this study and the freedom to withdraw was explained. Free and written informed consent were obtained from the respondents only after knowing about the study in a clear and manifest way.

The opportunity for the participants to ask questions regarding the research was provided. The place for data collection was chosen appropriately in a private setting. No name was mentioned and the coding system was used in data collection. The privacy and confidentiality of the collected information from the research participants were strictly safeguarded.

The investigator conducted all analyses and patient identifiers was not present to anybody. Investigators and supervisors accessed all data.

After complete data analysis, a report on the findings and results of the study were written. The investigator published the finally approved version of the report that had been critically revised for important intellectual content. The personal identifiers was not being published.

CHAPTER (5)
FINDINGS

5.1 Structure, functions and utilization of ambulatory care services of Rheumatology Department

Ambulatory care center was located at the first floor of Rheumatology department which was at the corner of rehabilitation department and liver medical department of Yangon Specialty hospital. In terms of service days and hours, ambulatory care services are conducting in Wednesday, Thursday and Friday during office hours. Functions of this department involving OPD services, inpatients care services, ambulatory care services, undergoing checking laboratory investigations results for immunotherapy treatment. There was no separate organization set up for ambulatory care services.

5.1.1 Manpower of Rheumatology department

Table (5.1) Manpower of Rheumatology department

Position	Frequency
Professor	1
Senior Consultant	1
Junior Consultant	5
Rotating AS	3
Sister	2
Senior Nurse	3
Trained Nurse	5
Nurse Aid	2
Workers	2
Total	**24**

5.1.2 Monthly utilization on ambulatory care services of Rheumatology department (January - June, 2019)

Table (5.2) Monthly utilization on ambulatory care services of Rheumatology department (January - June, 2019)

Month	Male		Female		Total	
	Frequency	Percent	Frequency	Percent	Frequency	Percent
January	16	14.2	250	20.2	266	19.7
February	16	14.2	204	16.5	220	16.3
March	20	17.7	181	14.7	201	14.9
April	21	18.6	168	13.6	189	14.0
May	20	17.7	253	20.5	273	20.3
June	20	17.7	179	14.5	199	14.8
Total	113	100.0	1235	100.0	1348	100.0

According to above table, total utilization of ambulatory care services was highest in May (20.3%) and in April was the least (14.0%). Every month, female were more utilized the ambulatory care services than male approximately about ten times.

5.1.3 Utilization of ambulatory care services according to disease category of Rheumatology department

Table (5.3) Utilization of ambulatory care services according to disease category of Rheumatology department

Diseases	Frequency	Percent
SLE	78	71.6
Progressive systemic sclerosis	22	20.2
Takayasu’s arteritis	5	4.6
Connective tissue disease	4	3.7
Total	109	100.0

Regarding the utilization of ambulatory care services according to disease category of rheumatology department during study period 2019, SLE were the most (71.6%) followed by progressive systemic sclerosis (20.2%).

5.2 Perception of patients on ambulatory care services

5.2.1 Background information

Table (5.4) Background characteristics of respondents (n=109)

Age group	Frequency	Percent
≤20 years	21	19.3
21-40 years	68	62.4
41-60 years	16	14.7
>60 years	4	3.7
Total	109	100.0

Mean - 31.7±0.7 years

Maximum - 67 years

Minimum - 13 years

Among 109 respondents, 62.4% were 21-40years, which was the most frequent age group and 3.7% were more than 60years which was the least. The mean age was 31.7 years, minimum age was 13 years and maximum age was 67 years.

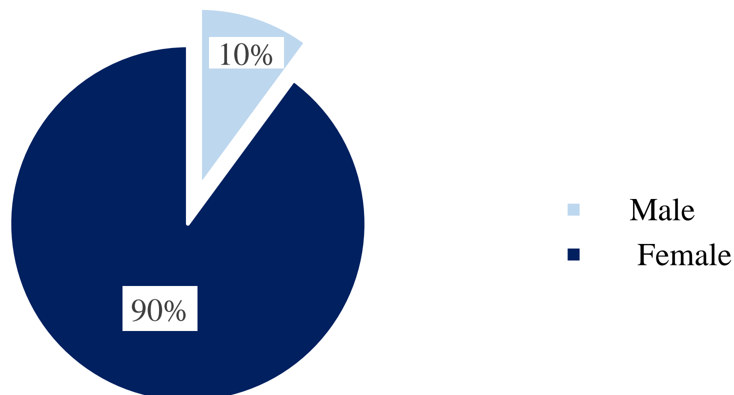


Figure (5.1) Gender distribution (n=109)

According to above figure, most of the patients were female 90% and 10% were male.

Table (5.4) Background characteristics of respondents (n=109) (contd.)

	Frequency	Percent
Religion		
Buddhism	100	91.7
Islam	5	4.6
Christianity	4	3.7
Marital status		
Married	60	55.0
Single	45	41.3
Separated/ divorced	2	1.8
Widow	2	1.8

Among the ambulatory care of rheumatology department, 91.7% were Buddhism who were the most. More than half of the respondents (55%) were married and (41.3%) were single.

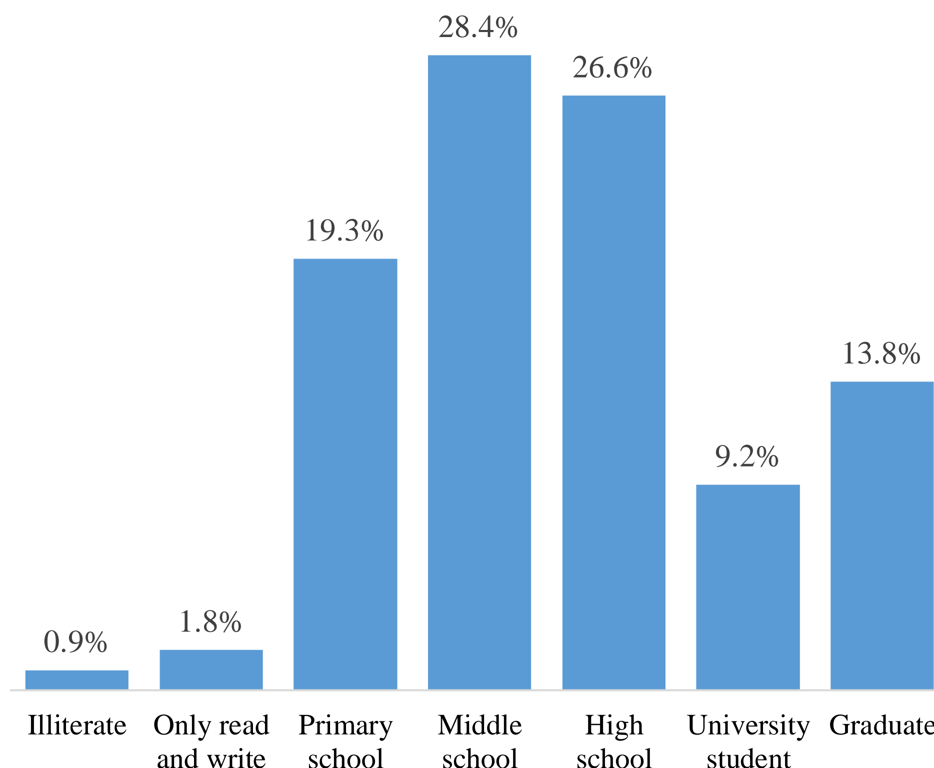


Figure (5.2) Education level of patients (n=109)

Among the study population, (28.4%) were middle school level, followed by high school level (26.6%) and about (19.3%) were primary school level and then (13.8%) and (9.2%) were graduated and university student. Only 1.8% and nearly 1% were only read and write and illiterate respectively.

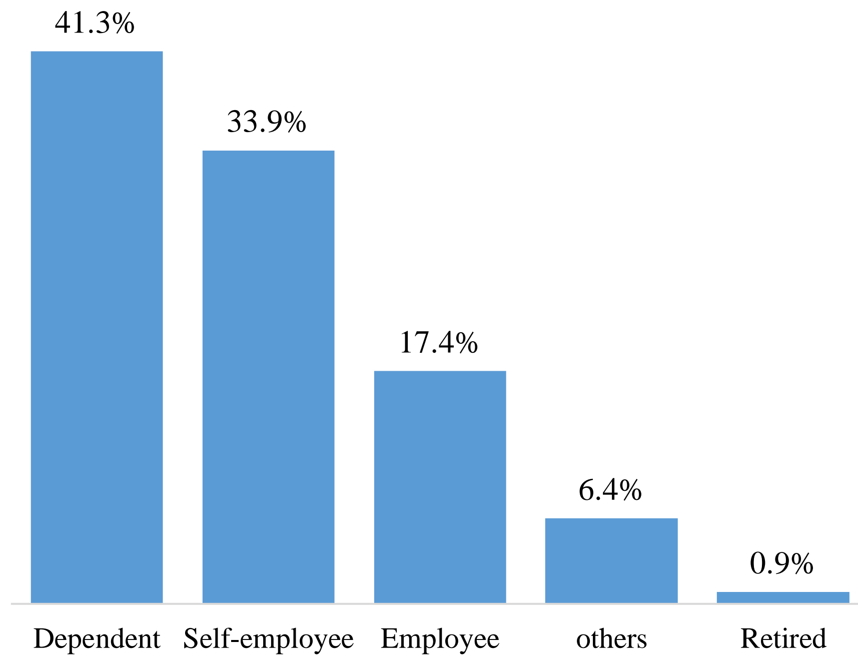


Figure (5.3) Occupation of the patients (n=109)

Figure (5.2) showed that most of the respondents were dependent (41.3%) followed by the self-employee (33.9%) and employee (17.4%). About (6.4%) were ad hoc staff and nearly 1% of respondents were retired.

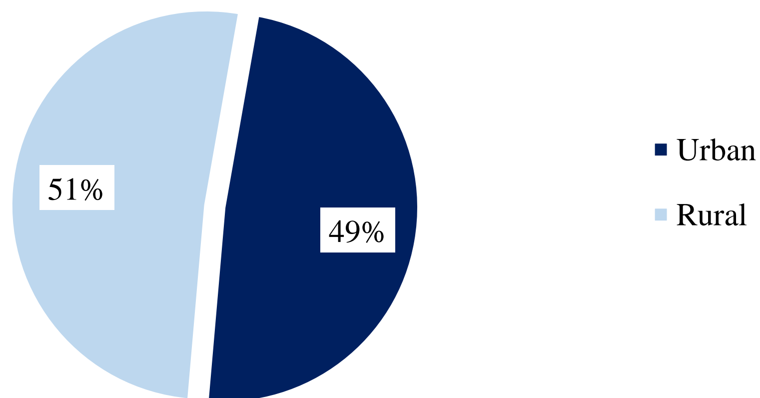


Figure (5.4) Residence of patients (n=109)

According to figure (5.4), more than half of the patients (51%) were from rural area and (49%) were from urban area.

Table (5.5) Duration of disease (n=109)

Duration	Frequency	Percent
≤6 months	42	38.5
7months - 12months	27	24.8
13months - 18months	5	4.6
19months - 24months	11	10.1
>24months	24	22.0
Total	109	100.0

Median - 8±19 months

Minimum - 1 month

Maximum - 240 months

Regarding duration of disease, most of the patients (38.5%) were less than and equal to six months duration and only 4.6% were between 13months and 18months duration. The minimum duration of disease was one month and the maximum duration of disease was two hundred and forty months.

Table (5.6) Duration of consultation (n= 109)

Duration	Frequency	Percent
≤6 months	77	70.6
7months - 12months	17	15.6
13months - 24months	3	2.8
>24months	12	11.0

Median - 5±6 months

Minimum - 1month

Maximum - 70 months

Regarding duration of consultation to rheumatology department, 70.6 % were less than and equal to six months duration and only 2.8% were between 13 months and 24 months duration. The minimum duration of consultation was one month and the maximum duration of consultation was seventy months.

Table (5.7) Number of visits (n= 109)

Number of visits	Frequency	Percent
<10times	96	88.1
10-20times	9	8.3
>20times	4	3.7
Total	109	100.0

Median - 5±3 times

Minimum - 2 times

Maximum - 40 times

Above table showed that 88.1% of patients were less than ten times visited and only 3.7% of patients visited to rheumatology department for more than twenty times. The minimum visit times was two time and the maximum visit times was forty times.

Table (5.8) Improvement of Health (n= 109)

No. of visits	Frequency	Percent
Improvement	94	86.2
No improvement	15	13.8
Total	109	100.0

Regarding the improvement of health, 86.2% thought that their health status has improved during ambulatory care at rheumatology department and 13.8% were thought that their health status has not improved significantly.

5.2.2 Perception on Convenient of Service and Basic amenities

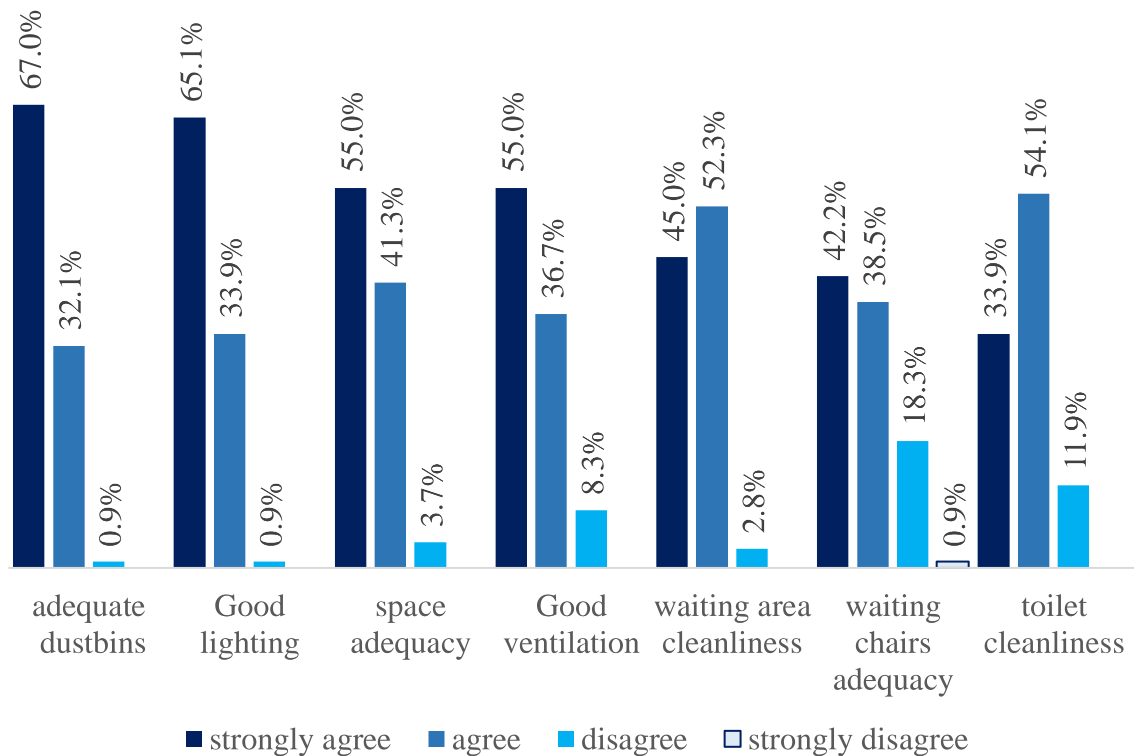
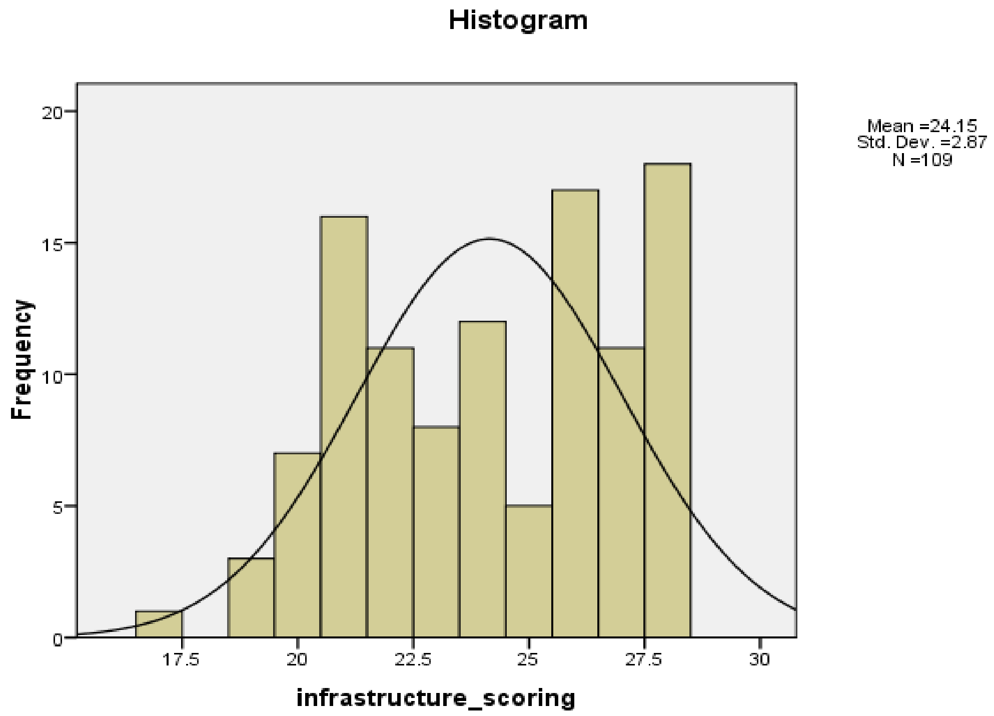


Figure (5.5) Perception on Convenient of Service and Basic amenities (n=109)

According to above figure, 67.0% of patients responded as "strongly agree", regarding adequate dustbins in waiting area and 65.1% regarding adequate lighting area in waiting area. Moreover, waiting space adequacy, good ventilation in waiting area, waiting area cleanliness, waiting chair adequacy and toilet cleanliness 55.0%, 55.0%, 45.0%, 42.2% and 33.9% of patients responded as "strongly agree" respectively.

In this study population, 0.9% of patient's opinion revealed that "strongly disagree" in regard about waiting chairs adequacy.

Perception level on convenient of service and basic amenities was assessed by 7 questions, and then summed up and grouped into good and poor. Minimum score obtained was 17 and maximum score obtained was 28. Perception level was calculated according to mean score because of score was normally distributed and there was no skewness noted. Mean score was 24.15. Mean score and above was categorized as good perception level and below mean score was categorized as poor perception level.



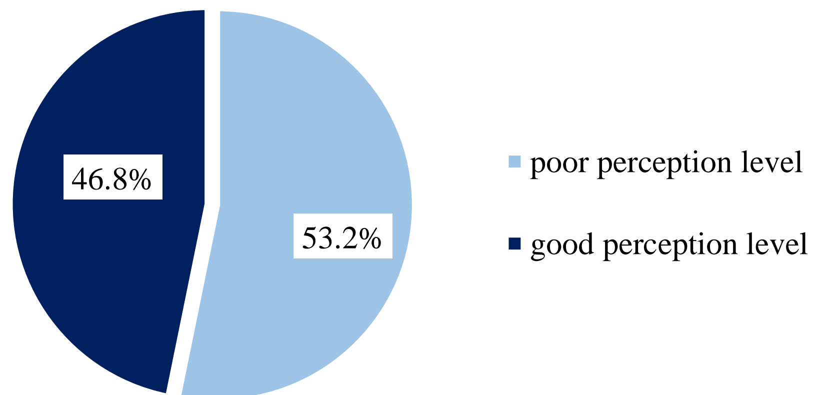


Figure (5.6) Perception level Convenient of Service and Basic amenities

Regarding perception level on convenience of service and basic amenities, approximately 53% of patients perceived as poor and nearly 47% of patients perceived as good.

5.2.3 Perception on responsiveness

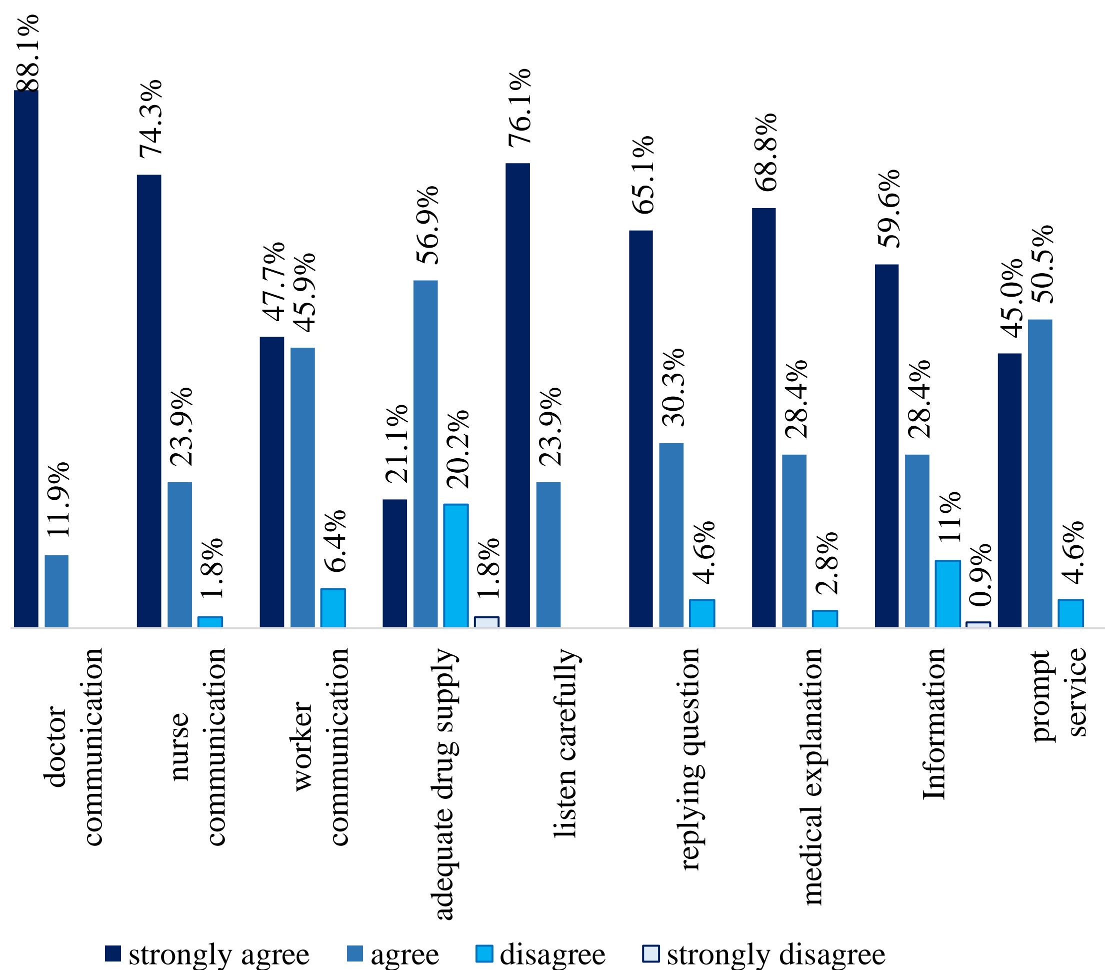


Figure (5.7) Perception on responsiveness (n=109)

According to figure (5.7), regarding communication with doctors, nurses and workers, 88.1%, 74.3% and 47.7% of patients answered as "strongly agree" respectively. Also majority of patients (56.9%) replied as "agree" that they received adequate drug supply for infusion during ambulatory care at rheumatology department. Regarding the questions about health care providers listened carefully and replying for their questions, 76.1% and 65.1% of patients responded as "strongly agree". Moreover, 68.8% of patients stated that they received medical explanation for treatment and 59.6% of patients received information regarding emergency and other complication of disease and treatment. Majority of patients (50.5%) responded that they received prompt service from health care providers when they have got treatment.

5.2.3.1 Waiting time of ambulatory care services

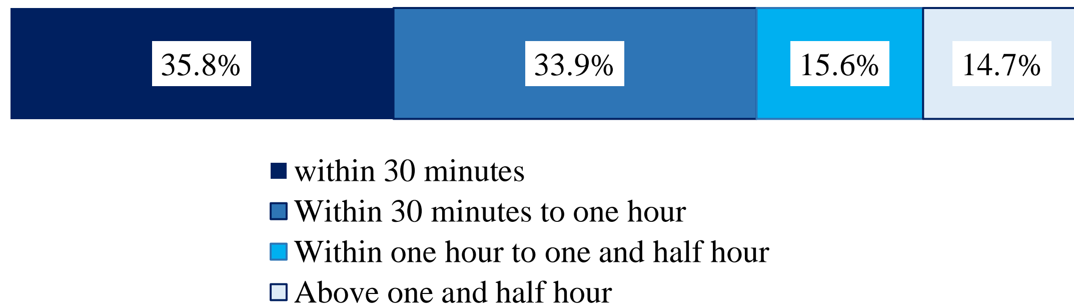


Figure (5.8) Waiting time (n=109)

Figure (5.8) showed that approximately 36% of patients responded that they can consult within 30 minutes and only 14.7% of patients responded that their waiting time was more than one and half hour after registration at the reception.

5.2.3.2 Perception on choice of healthcare provider

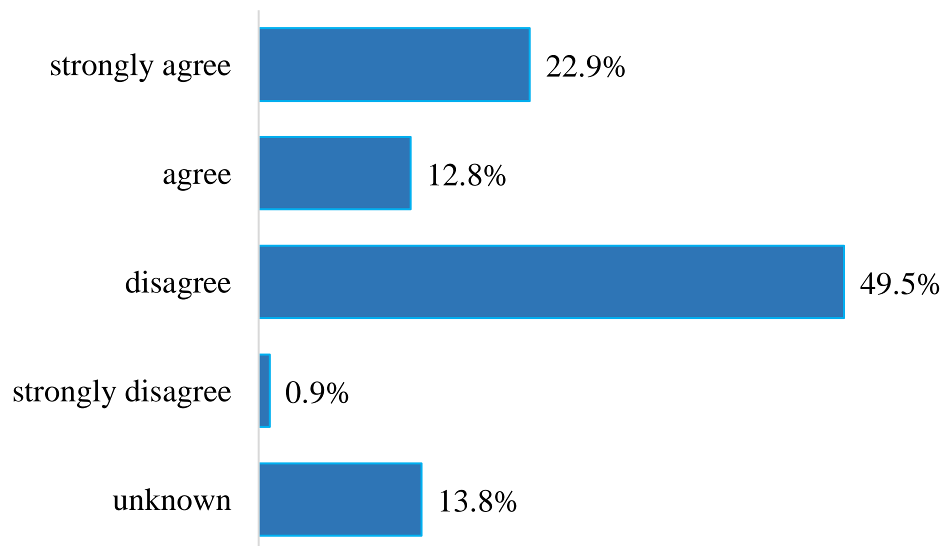
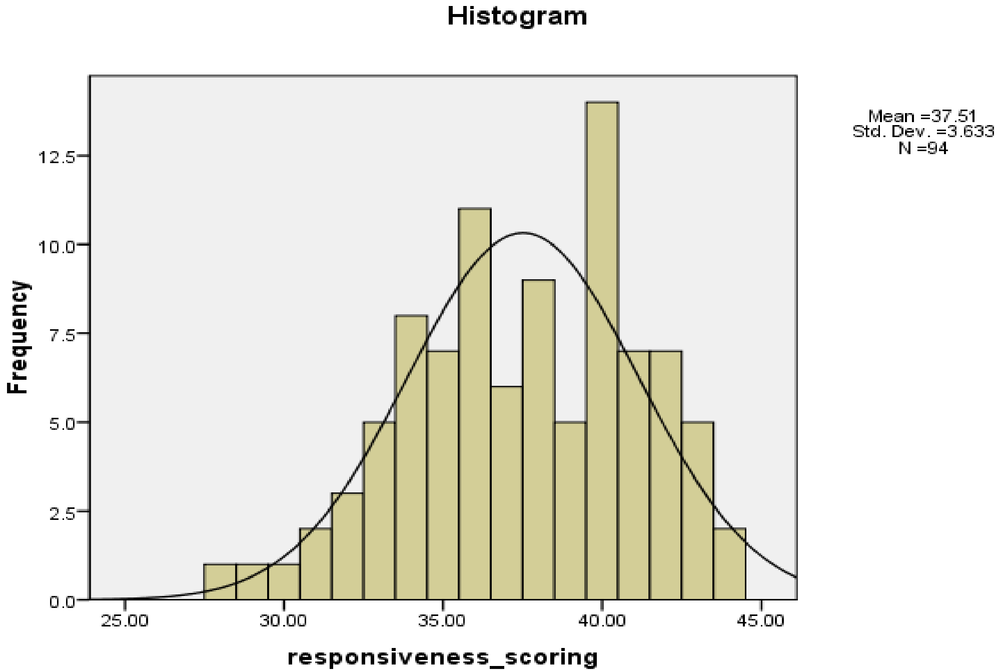


Figure (5.9) Choice of healthcare provider (n=109)

Figure (5.9) showed that approximately 23% of patients responded that they can consult with their desired healthcare provider in out-patient department. 49.5% of patients thought that there is no chance for the choice of healthcare provider and 13.8% cannot answered this section.

Perception on responsiveness was assessed by 11 questions, and then summed up and grouped into good and poor. Minimum score obtained was 28 and maximum

score obtained was 44. Perception level was calculated according to mean score because of score was normally distributed and there was no skewness noted. Mean score was 37.51. Mean score and above was categorized as good perception level and below mean score was categorized as poor perception level.



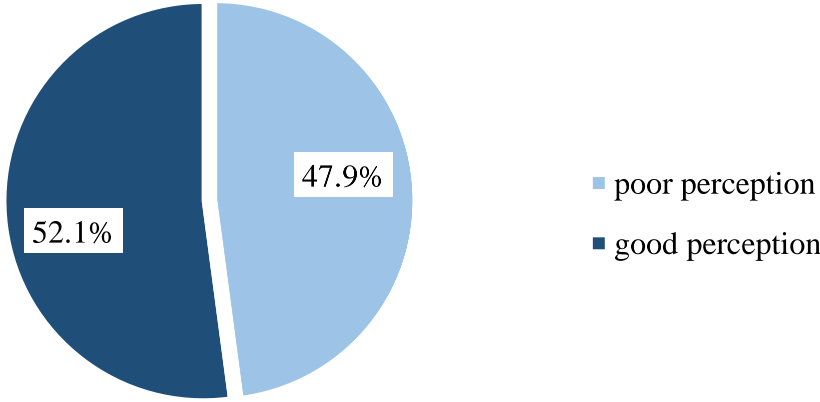


Figure (5.10) Perception level on responsiveness (n=109)

Regarding perception level of responsiveness on ambulatory care service of rheumatology department, nearly 48% of patients perceived as poor and about 52% of patients perceived as good.

5.2.4 Perception on Quality of care

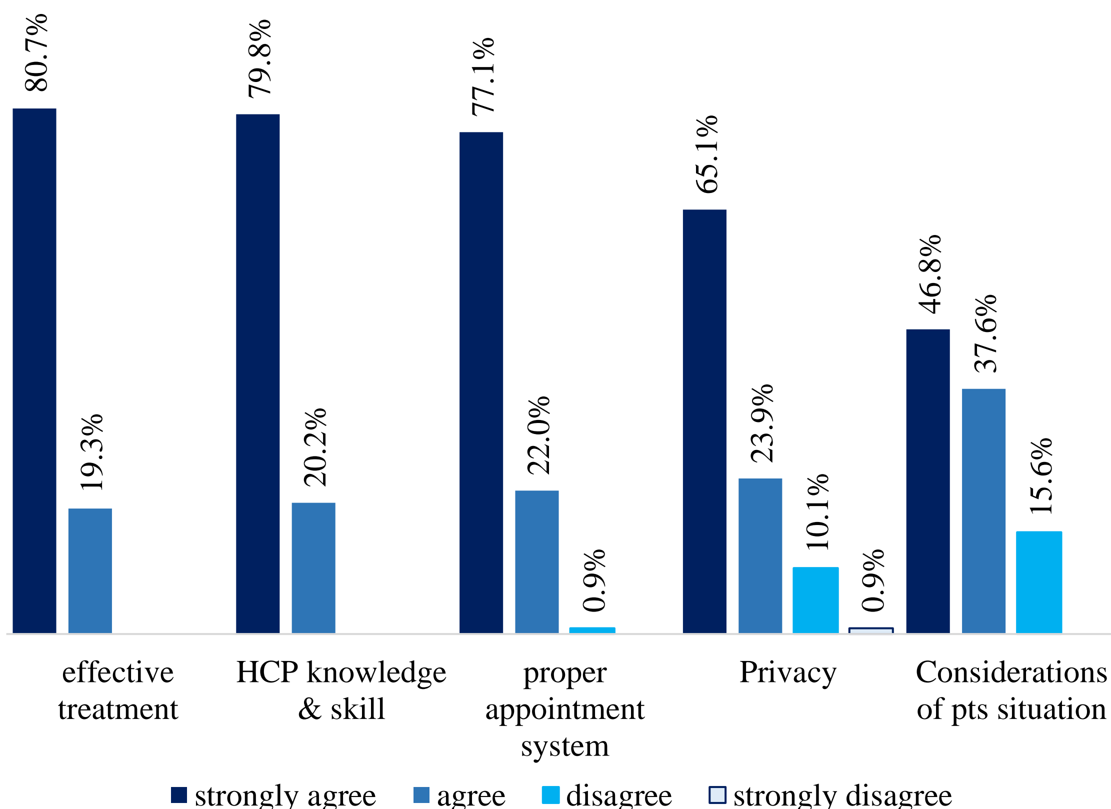
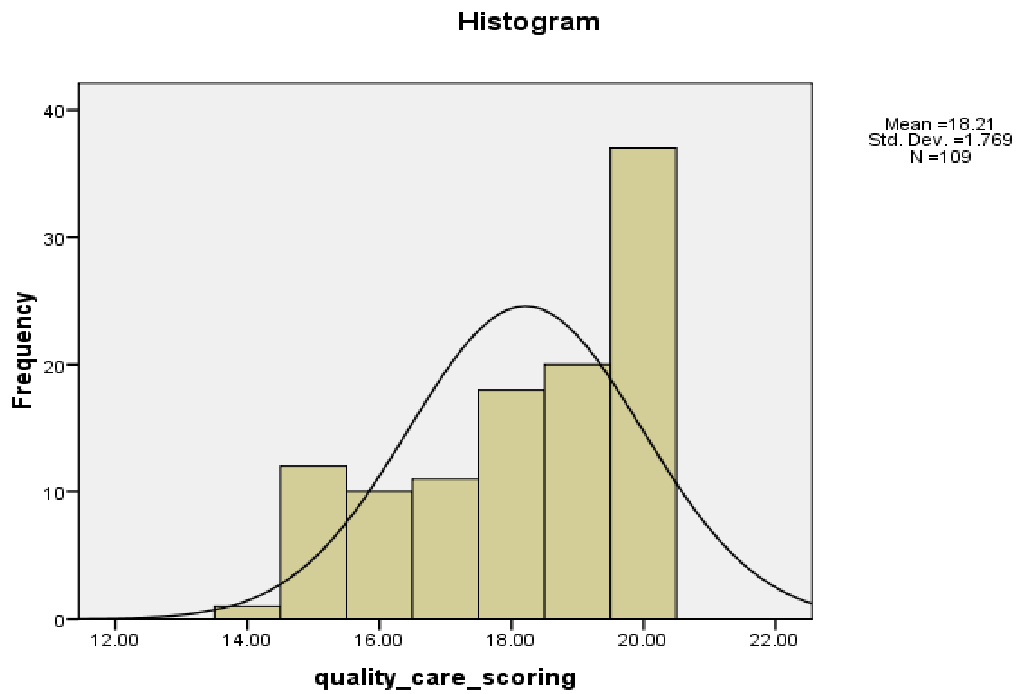


Figure (5.11) Perception on quality of care (n=109)

According to figure (5.11), 80.7% of the patient perceived they got effective treatment from the rheumatology department 79.8% and 77.1% of patients "strongly agree" for the knowledge of healthcare providers and good appointment system on ambulatory care service. Although about 65% of patients said that "strongly agree" for their privacy during examination, nearly 1% of patient "strongly disagree" for this questions. Moreover, 46.8% of patients perceived that patients' other difficulties were considered on treatment plan.

Perception on quality of care was assessed by 5 questions, and then summed up and grouped into good and poor. Minimum score obtained was 14 and maximum score obtained was 20. Perception level was calculated according to mean score because of score was normally distributed and there was no skewness noted. Mean score was 18.21. Mean score and above was categorized as good perception level and below mean score was categorized as poor perception level.



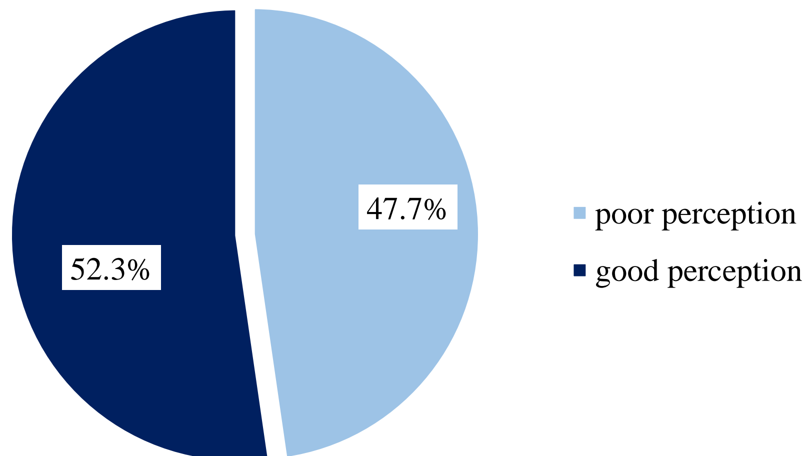


Figure (5.12) Perception level on quality of care (n=109)

Regarding perception level of quality of care on ambulatory care service of rheumatology department, about 47.7% of patients perceived as poor and 52.3% of patients perceived as good.

Table (5.9) Reported follow up status of the respondents (n=109)

Follow up status	Frequency	Percent
Regular follow up	99	90.8
Irregular follow up	10	9.2

The vast majority (90.8%) of respondents were reported to have regular follow up and 9.2% reported irregular follow up due to social problem, transportation problem, financial problem and their sick condition and so on.

5.2.5 Difficulties and Challenges

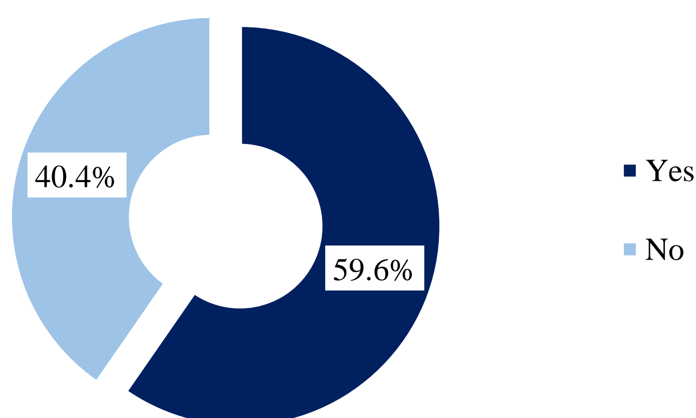


Figure (5.13) Difficulties to receive ambulatory care services of rheumatology department (n=109)

According to above figure, 59.6% of patients stated that they had difficulties to receive ambulatory care services.

Table (5.10) Difficulties for receiving ambulatory services (n=65)

Difficulties*	Frequency	Percent
Financial difficulty	36	33.0
Transportation difficulty	33	30.3
Other difficulties	13	11.9

*Multiple responses

The commonest difficulty was financial difficulty which was answered by 33.0% of patients followed by 30.3% of patients had transportation difficulty for receiving ambulatory care service of rheumatology department and 11.9% of patients faced the other difficulties such as social difficulties, care giver difficulties, rental difficulties and so on.

Table (5.11) Inconvenience during the course of ambulatory services (n=109)

Inconvenience	Frequency	Percent
Inconvenience	3	2.8
Convenience	106	97.2
Total	109	100.0

Regarding any inconvenience during the course of ambulatory services, only 2.8% of patient's response revealed that they experienced inconvenience during the course of ambulatory services due to poor communication by staff, worried the inexperience person who buy the needed drugs outside the hospital and worried about the children who are left behind at home.

Table (5.12) Experience of hospital admission before (n=109)

Experience	Frequency	Percent
Yes	94	86.2
No	15	13.8
Total	109	100.0

Regarding any experience of hospital admission before, 86.2% of patient response that they had been experienced of hospitalization before.

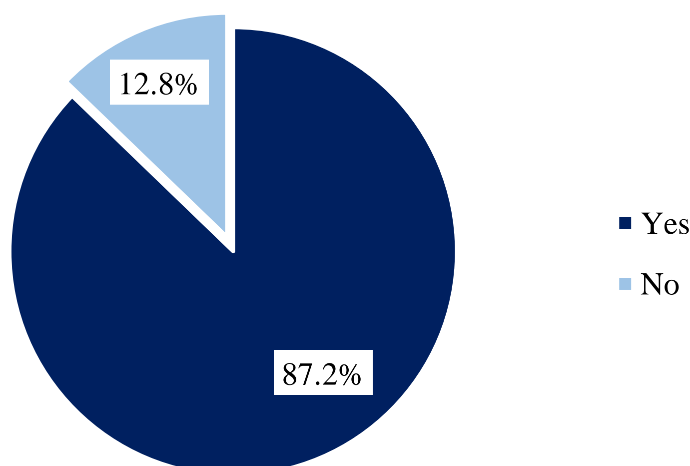


Figure (5.14) Perception of difference between receiving ambulatory service and admission (n=94)

Among the respondents of hospitalization before, 87.2% of patients perceived that there is any differences between receiving ambulatory care service and admission of hospitalization on rheumatology department.

Table (5.13) Different perception towards receiving ambulatory care services and admission (n= 82)

Different Perception	Frequency	Percent
Relaxed feeling for returning home	26	31.7
Feeling distress due to hospitalization	17	20.7
Liked as the OPD service	14	17.1
Admission is more convenience for rural patients	11	13.4
Feeling rapid recovery after treatment	5	6.1
No need of attendants for ambulatory service	3	3.7
Other differences	6	7.3

Among 109 participants, 82 patients gave different perception towards receiving ambulatory services and admission. Relaxed feeling for returning home was responded by (31.7%) followed by feeling distress due to hospitalization (20.7%). However, 13.4% of patients perceived that admission is more convenience for rural patients.

Table (5.14) Overall perception on the ambulatory services (n=109)

Perception	Frequency	Percent
Good perception	109	100.0
Poor perception	0	0.0
Total	109	100.0

All of the respondents stated that good overall perception on ambulatory care services of rheumatology department.

5.3 Association between the background information and perception level on convenience of service and basic amenities of ambulatory care services

Table (5.15) Association between the background information and perception level on convenience of service and basic amenities of ambulatory care services (n=109)

Background information	Perception level on convenience of service		*P* value
	Poor	Good	
Age			
≤30years	30 (55.6%)	24 (44.4%)	0.627
>30years	28 (50.9%)	27 (49.1%)	
Gender			
Male	7 (63.6%)	4 (36.4%)	0.465
Female	51 (52.0%)	47 (48.0%)	
Residence			
Urban	31 (58.5%)	22 (41.5%)	0.283
Rural	27 (48.2%)	29 (51.8%)	
Occupation			
Working Group	35 (54.7%)	29 (45.3%)	0.713
Dependent	23 (51.1%)	22 (48.9%)	
Education Status			
Low education status	11 (45.8%)	13 (54.2%)	
Medium education status	28 (46.7%)	32 (53.3%)	0.034**
High education status	19 (76.0%)	6 (24.0%)	
Type of disease			
SLE	48 (50.5%)	47 (49.5%)	
Other diseases	10 (71.4%)	4(28.6%)	0.143
Duration of disease			
≤8 months	26 (45.6%)	31 (54.4%)	0.096
>8 months	32 (61.5%)	20 (38.5%)	
Duration of consultation			
≤5 months	29 (48.3%)	31 (51.7%)	0.259
>5 months	29 (59.2%)	20 (40.8%)	
Number of visits/year			
≤5 months	31 (51.7%)	29 (48.3%)	0.721
>5 months	27 (55.1%)	22 (44.9%)	

** Statistically significant

According to the finding, 63.6% of male and 52.0% of female had poor perception level. Moreover, 51.8% of rural patients had good perception level. Low education status consisting of illiterate, read and write and primary school level, medium education status involving middle school and high school level. High education status were university students and graduated. Although low education status (54.2%) and medium education status (53.3%) had good perception level, high education status (24.0%) had good perception level and the finding is statistically significant (*P*= 0.034). About 50.0% of SLE patients had good perception level and (38.5%) of patients who was disease duration more than eight months had good perception level.

5.4 Association between the background information and perception level on responsiveness of ambulatory care services

Table (5.16) Association between the background information and perception level on responsiveness of ambulatory care services (n=109)

Background information	Perception level on responsiveness		*P* value
	Poor	Good	
Age			
≤30years	24 (47.1%)	27 (52.9%)	0.863
>30years	21 (48.8%)	22 (51.2%)	
Gender			
Male	4 (36.4%)	7 (63.6%)	0.416
Female	41 (49.4%)	42 (50.6%)	
Residence			
Urban	23 (48.9%)	24 (51.1%)	0.836
Rural	22 (46.8%)	25 (53.2%)	
Occupation			
Working Group	25 (48.1%)	27 (51.9%)	0.965
Dependent	20 (47.6%)	22 (52.4%)	
Education Status			
Low education status	9 (47.4%)	10 (52.6%)	0.856
Medium education status	27 (50.0%)	27 (50.0%)	
High education status	9 (42.9%)	12 (57.1%)	
Type of disease			
SLE	38 (46.3%)	28 (54.9%)	0.437
Other diseases	7 (58.3%)	5(41.7%)	
Duration of disease			
≤8 months	23 (45.1%)	31 (54.4%)	0.558
>8 months	22 (51.2%)	21 (48.8%)	
Duration of consultation			
≤5 months	22 (48.3%)	26 (54.2%)	0.686
>5 months	23 (50.0%)	23 (50.0%)	
Number of visits/year			
≤5 months	21 (42.9%)	28 (57.1%)	0.310
>5 months	24 (53.3%)	21 (46.7%)	

According to above table, no statistical significant were found between the background information and perception on responsiveness of ambulatory care services of rheumatology department. It was found that 52.9% of less than and equal 30 years age group had good perception level. Moreover, 63.6% of male and 50.6% of female had good perception level. 51.1% of urban patients and 53.2% of rural patients had good perception level. Regarding association between occupation and their perception level of responsiveness, dependents (52.4%) were the most who had good perception level. 52.6% of low education status and 57.1% of high education status had good perception level. Approximately 55% of patients who suffered duration of disease less than eight months had good perception level.

5.5 Association between the background information and perception level on quality of care

Table (5.17) Association between the background information and perception level on quality of care (n=109)

Background information	Perception level on quality of care		*P* value
	Poor	Good	
Age			0.149
≤30years	22 (40.7%)	32 (59.3%)	
>30years	30 (54.6%)	25(45.5%)	
Gender			0.632
Male	6 (54.5%)	5 (45.5%)	
Female	46 (46.9%)	52 (53.1%)	
Residence			0.297
Urban	28 (52.8%)	25 (47.2%)	
Rural	24 (42.9%)	32 (57.1%)	
Occupation			0.324
Working Group	28 (43.8%)	36 (56.2%)	
Dependent	24 (53.3%)	21 (46.7%)	
Education Status			0.749
Low education status	13 (54.2%)	11 (45.8%)	
Medium education status	27 (45.0%)	33 (55.0%)	
High education status	12 (48.0%)	13 (52.0%)	
Type of disease			0.183
SLE	43 (45.3%)	52 (54.7%)	
Other diseases	9 (64.3%)	5 (35.7%)	
Duration of disease			0.144
≤8 months	31 (54.4%)	26 (45.6%)	
>8 months	21 (40.4%)	31 (59.6%)	
Duration of consultation			0.810
≤5 months	28 (46.7%)	32 (53.3%)	
>5 months	24 (49.0%)	25 (51.0%)	
Number of visits/year			0.531
≤5 months	27 (45.0%)	33 (55.0%)	
>5 months	25 (51.0%)	24 (49.0%)	

According to the finding, no statistical significant were found between the background information and perception on quality of care of ambulatory care service of rheumatology department. It was found that 59.3% of less than and equal 30 years age group had good perception level. Although 54.5% of male had poor perception on quality of care, 53.1% of female had good perception level. 57.1% of rural patients had good perception level and 56.2% of working group had good perception level. According to perception on the quality of care, 54.7% of SLE patients had good perception level. 59.6% of patients with disease duration more than eight months had good perception level.

5.6 Association between waiting time and perception level on convenient of service and basic amenities

Table (5.18) Association between waiting time and perception level on convenient of service and basic amenities (n=109)

Waiting time	Perception level convenient of service		*P* value
	Poor	Good	
≤1 hour	36 (47.4%)	40 (52.6%)	0.064
>1 hour	22 (66.7%)	11 (33.3%)	

According to association, there is no statistical significant differences was found between waiting time and perception on convenient of service and basic amenities of ambulatory care services. The findings revealed that 52.6% of patients who have to wait less than and equal to one hour to consult with doctors had good perception level and about 66.7% of patients who have to wait more than one-hour duration had poor perception level.

5.7 Association between waiting time and perception level on responsiveness of ambulatory care services

Table (5.19) Association between waiting time and perception level on responsiveness of ambulatory care services (n=109)

Waiting time	Perception level on responsiveness		*P* value
	Poor	Good	
≤1 hour	22 (33.8%)	43 (66.2%)	
>1 hour	23 (79.3%)	6 (20.7%)	<0.001**

**Statistically significant

According to above table, there is a significant association ($P<0.001$) was found between waiting time and perception on responsiveness of ambulatory care services of rheumatology department. 66.2% of patients who waited less than one hour had good perception and 79.3% of patients who waited more than one hour had poor perception.

5.8 Association between waiting time and perception level on quality of care of ambulatory care services

Table (5.20) Association between waiting time and perception level on quality of care of ambulatory care services (n=109)

Waiting time	Perception level on quality of care		*P* value
	Poor	Good	
≤1 hour	32 (42.1%)	44 (57.9%)	
>1 hour	20 (60.6%)	13 (39.4%)	0.076

According to above table, although no statistical significant differences was found, the findings revealed that approximately 58% of patients who have to wait less than and equal to one hour to consult with doctors had good perception level and about 60.6% of patients who have to wait more than one-hour duration had poor perception level.

5.9 Qualitative Findings

Key informant interviews (KIIs) and in-depth interviews (IDIs) were done for describing the challenges, difficulties and suggestions of the health care providers and the patients.

Table (5.21) Characteristics of Respondents of In-depth Interviews

No	Age (Years)	Sex	Educational Level	Marital Status
1	27	Female	University	Married
2	35	Female	Middle School	Married
3	30	Male	Graduated	Single
4	17	Female	High school	Single
5	32	Male	Primary School	Married
6	36	Female	Middle School	Married

In-depth interviews to four women and two men were done. There were four person with good perception and two person with moderate perception. Respondents reported various educational level including one primary school, two middle school, one high school, one university school and one graduate. Two third of the respondents were married and two were single.

Table (5.22) Characteristics of Respondents of Key Informant Interviews

No	Age (Years)	Rank	Total Service (Years)	Service years at Current rank (Years)
1	44	M. S	16	1
2	40	Consultant	13	6
3	41	Nurse	16	6

Key informant interviews to one consultant, one nurse and one medical superintendent (at least 6 months experience at that hospital) from the hospital were done. The youngest respondent was 40 years and the oldest was 44 years. They reported total working service ranging from 1 years to 6 years.

A total of five themes were identified from in-depth interviews and key informant interviews:

1. General perception
2. Perception on building and infrastructure
3. Perception about ambulatory care service time, hours and appointment system
4. Perception on interpersonal relation
5. Perception towards supply including man, materials, equipment and drugs
6. Challenges
7. Suggestions

Theme 1 – General perception

About one third of the respondents showed that their poor perception on weakness of cleanliness and another one third had good perception on doctors' communication. Only one stated that there is poor perception for long process of admission.

"ဒါပေမယ့် သန့်ရှင်းရေးအားနည်းတယ်။ ကိုယ့်ဘာသာပဲ သန့်ရှင်းရေးလုပ်ရတယ်။ အမက Ward ထဲကနေ private ခန်းယူလိုက်တာလေ။ အခန်းရှေ့မှာ အိမ်သာနဲ့ အမှိုက်ပုံးကြီး ၂ပုံးရှိတယ်။ အဲဒီ အမှိုက်ပုံးက ၁၂ ရာသီ ပြည့်နေတာပဲ။ ဘေစင်တွေလည်းသိပ် အဆင်မပြေဘူး။ ဆေးကုသမှု ပိုင်းကတော့ တော်တော်ကောင်းပါတယ်။ ဆေးရုံတိုင်းမှာသန့်ရှင်းရေးကတော့ တော်တော် အားနည်း ပါတယ်။"

"*But the cleaning is weak. We have to do the cleaning ourselves. I take a private room in the ward. In front of the room, there are two large bins always full of litter. The basins were not proper for use. The medical service is good. Cleaning in every hospital is very weak.* "

(35 years, middle school passed, female)

"ဆရာဝန်တွေကအကုန်လုံးကောင်းတယ်။ လာပြနေတာ ၆လ ရှိပြီ။ ဘာမှ အဆင်မပြေတာမရှိဘူး။ ပိုက်ဆံမပေးရဘူးဆိုပေမယ့်သေသေချာချာလေးဂရုစိုက်ပေးတယ်။ အဲဒါကိုကြိုက်တယ်။ မကြိုက်တာ တော့ မရှိပါဘူး"

"*The doctors are all fine. It's been six months for me taking treatment here. Nothing is okay although I don't have to pay, I take good care of it. I like it. There is nothing I don't like.*"

(32 years, primary school passed, male)

“ဆေးရုံတက်ဖို့ လုပ်ရတာ တော်တော်ကြာတယ်။ လိုက်လုပ်ရတာ အဆင့်ဆင့်ဖြစ်နေတော့ နည်းနည်းလေး ကြာတယ်လို့ ထင်တယ်။ ပြီးခဲ့တဲ့အခေါက်ကဆို တော်တော်ကြာတယ်။ ကုတင်မရှိလို့။ မနက် ၈ နာရီ လောက်တည်းက ရောက်တာ ၁၁ နာရီလောက်မှ ကုတင်ပေါ်ကို ရောက်တယ်”

“ *It takes a long time to get admitted to the hospital. I think it was a bit of a complex process, and I think it took a little longer. It took too long last time. There was no bed. We got the bed at about 11o'clock after arriving since 8 o'clock in the morning”*

(36 years, middle school passed, female)

Theme 2- Perception on building and infrastructure

Two third of the respondents stated that there is no difficulties and like for the separated building and big enough for ambulatory room. But one third of the respondents, one health care provider and one administer identified that the difficulties and weakness of the building and requirement of infrastructure.

“မိုးရွာတယ်ဆို ရေ ကစုပ်ထုတ်နေရတယ်။ တိုက်နံရံတွေက မိုးရွာလို့ရှိရင် မိုးပက်တယ်။ တောက်လျှောက်ကြီးနံရံ ကနေ ရေတွေ ယိုတာလေ။ အိမ်ကနေ ရေစုပ်တဲ့ mount တံယူလာပြီး စုပ်ယူရတယ်။ ဒီလိုအဆောက်အဦမှာ ဒီလိုမိုးယိုတယ်ဆိုတော့ အဆင်မပြေဘူးလေ ”

“If it rains, water needs to be pumped. The walls cannot protect rain, and water leaks through the walls. I have to bring a suction mount from my home to absorb it. It is not good at this building because of the rain.”

(35 years, middle school passed, female)

"နေရာအနေအထား ကတော့ သိပ်မကြိုက်ဘူး။ လူနာတွေက အဆစ်နာတယ်။ Proximal myopathy တွေက တော်တော်များများမှာ ရှိတယ်။ ရောဂါကြောင့်လည်းဖြစ်တယ်။ Steroid ကြောင့်လည်း ဖြစ်တယ်။ ခက်တာက lift မရှိဘူး။ အရင်တုန်းက Daycare က အောက်ထပ်မှာ သွင်းတာ။ လူနာ၅၆ - ယောက်ပဲဆံ့တယ်။ အခုက လူနာ ၂၀ လောက်ဆိုတော့ အဲဒီ အခန်းနဲ့ ဘယ်လိုမှ မဆံ့တော့ဘူး။ အဲဒီတော့ အပေါ်ထပ်ကို ရောက်သွားတယ်။ လူနာတွေ အဲဒီအတွက် တော့ အခက်အခဲရှိတယ်။ ဆေးသုတ် ပေမယ့် မိုးတွေရွာတော့အကုန်ကွာကျကုန်တယ်။ Premium ကဈေးကြီးပေမယ့် သုံးသင့်တယ်။ အဆောက်အဦက Quality control မရှိဘူးဖြစ်နေ။ အစကကြွေပြားတွေ ကြွတက်နေတာ ရှိတယ်။ "

“Location is not very comfortable. Patients have arthritis. Proximal myopathy is common in many patients. It is also caused by the disease and also caused by steroid.

The problem is there is no lift. In the past, Daycare was at the downstairs. Only 5-6 patients are available. Now there are about 20 patients, so the room is out of reach, so it goes upstairs. It is difficult for patients. . Even though the painting was done, it was gone if it rains. Premium is expensive but should be used because the building has no quality control and the tiles are popping up".

(40 years, consultant, female)

"အခန်းအနေအထားတော့ မကောင်းဘူး။ Space အနေအထား တော့မဆိုးဘူး။ ဒါပေမယ့် ကုတင်အနေအထားနဲ့ Locker အနေအထားတော်ပြည့်စုံမှု မရှိဘူး။ အခန်းတဝက်ကလည်းStore ကြီးလိုဖြစ်နေတယ်။ Daycare center အနေနဲ့ ဦးစားပေးမယ့် အနေအထားတော့ ရှိပါတယ်။ ကုတင်ကတော့ လုံလောက်ပါတယ်။"

"*Room is not good. Space isn't bad either. However, the bed and locker positions are not perfect. The other half of the room looks like a big store. Daycare center should be a priority. The beds are enough."*

(44 years, medical superintendent, female)

"OPDမှာ အများစုက ထိုင်စရာ မရှိဘူး။ လူနာကစာအုပ်ထပ်ထားရတယ်။ ပြီးတော့အပြင်မှာ ထိုင်စောင့်နေရတယ်။ လူနာတွေ ထိုင်ဖို့အတွက် ထိုင်ခုံတွေအလုံအလောက်တော့ မရှိဘူး။ ဆေးသွင်းဖို့ လုပ်ထားတဲ့အခန်းနဲ့ပတ်သက်ပြီး cleansing လေးလုပ်စေချင်တယ်။စတိုခန်းလိုပုံစံမျိုးဖြစ်နေတယ်။"

"In OPD most have no seats .The patient has to add another book. And I had to wait outside. There are not enough chairs for patients. I would like to have a cleansing session on the room where the injection was made. It looks like a store."

(30 years, graduated, male)

"ကုတင် အနေအထားနဲ့ ပတ်သက်ပြီးကတော့ ၁ကုတင် ၁ယောက် ဆိုရင်တော့ တချို့ရက်တွေမှာ လိုပါလိမ့်မယ်။ အခန်းကလည်း နည်းနည်းလေးတော့ ကျဉ်းတော့ လုံလောက်ပေမယ့် အယောက် ၂၀ လောက် လာတဲ့ ရက်တွေကတော့ နည်းနည်းကျပ်မယ် ထင်ပါတယ်။ ၁ ကုတင် ၂ ယောက် ၃ ယောက် လောက်သွင်း ရပါတယ်။ "

"*In terms of bed condition, one bed will be needed on certain days. The room was a little crowded, but the days when it came to about 20 people seemed to be a little tight. One bed for three or three patients."*

(41 years, nurse, female)

Theme 3- Perception about ambulatory care service time, hours and appointment system

Most of the respondents perceived that there is good appointment system and only one of the respondents less likely for not coming to the Yangon Specialty Hospital in emergency condition.

“ရက်ချိန်းက ဒီတပတ်အတွင်း ဗုဒ္ဓဟူးနေ့ပြရမှာကို မအားလို့ နောက်နေ့လာပြရင် ရလို့ အဆင်ပြေပါတယ်။ ကျွန်တော်ဆိုချိန်းတဲ့ရက်က ၂၂ရက်နေ့၊ အဲ့ဒီနေ့မှာခရီးသွားနေရလို့အကြောင်းအမျိုးမျိုးကြောင့် မလာနိုင်ရင်လည်းအဆင်ပြေတဲ့ရက်လာလိုက်တယ်။ အရမ်းကြာရင်တော့ဆူတာပေါ့။ အရမ်းမကြာရင်တော့လည်း တပတ်အတွင်းလာနိုင်ရင်တော့အဆင်ပြေပါတယ်။ ချိန်းတဲ့ရက်ကိုလာပေးနိုင်ရင်တော့ အကောင်းဆုံးပေါ့ ”

“It is nice to have an appointment later in the week, because it is a busy Wednesday. My date is 22nd. It was a good day if I had to travel for a variety of reasons. It's a long time, but it's worth it. If it's not too long then you can come within a week. It is best if you can come to an appointment. ”

(30 years, graduated, male)

"ရက်ချိန်းချိန်းတဲ့နေ့ကပိတ်ရက်ဖြစ်နေတယ်ဆိုရင် ဖုန်းဆက်ပေးတယ်။ ဆက်သွယ်ရန်ဖုန်းနံပါတ်ယူထား တယ်။ ချိန်းတဲ့ရက် မအားရင် ဗုဒ္ဓဟူး ၊ ကြာသာပတေး၊ သောကြာ အဆင်ပြေတဲ့ ရက် လာလို့ရပါတယ်"

“If the date of the appointment is closed, it was contacted by phone and phone number is taken. If it's a busy day, Wednesday, Thursday, Friday, you can come in handy”.

(41 years, nurse, female)

“ ရက်ချိန်းက ဆေးရုံ ရက်ချိန်း ရှိတဲ့ရက်ဆို တိုက်ရိုက်လာပြလို့ရတယ်။ရက်ချိန်းပြတဲ့နေ့မဟုတ်ရင် ဆေးရုံကြီးကို သွားပြ ပြီးမှ ရတယ်”

“*Appointments can be made directly due to the hospital appointment date. If it is not OPD days, I would go to the Yangon General Hospital”.*

(17 years, high school passed, female)

Theme 4- Interpersonal relation

Regarding this section, all of the respondents indicated that there is good interpersonal relationship between the doctors, nurses, workers and patients.

“ဆရာဝန် ဆရာမ ဆက်ဆံရေးကတော့ ကောင်းပါတယ်။ လူနာတွေကို ခေါ်တာပြောတာမှာ ဖော်ဖော်ရွေရွေပဲရှိပါတယ်။အော်တာ ငေါက်တာ မရှိပါဘူး”

The doctor-patient relationship is good. Calling patients is friendly and there is no screaming”.

(27 years, university student, female)

"ဝန်ထမ်းအချင်းချင်းဆက်ဆံရေး မှာက ဒီမှာက family type ဆိုတော့ အဆင်ပြေတယ်။ အလုပ်သမား တွေနဲ့လည်းအဆင်ပြေပါတယ်။ တခါတရံ ပြောရတာလေးတွေတော့ ရှိတာပေါ့ ၊ များသောအားဖြင့် အဆင်ပြေပါတယ်။ "

“In relations between employees, there is a family type. It is okay with the workers, sometimes they have to talk. Usually it's fine here”.

(41 years, nurse, female)

"ဆရာဝန် ဆရာမတွေ တော်တော်ဂရုစိုက်တယ်။ အမှား အယွင်း မခံတာလားတော့ မသိဘူး။ သောက်ဆေးတွေက အစ ဆရာမတွေ ကိုယ်တိုင် လုပ်ပေးတယ်။ Round လှည့်နေချိန်မှာလည်း ဆရာကြီးတွေ ဆရာမကြီးတွေ က လူနာစောင့် ကိုရှင်းပြတယ်။ ဘာတွေနဲ့ ကုပေးနေတယ်။ ဘာကြောင့် ဒီလိုကုပေး ရတယ် ဆိုတာပြောပြတော့ လူနာရော လူနာစောင့်ပါ ဆောင်ရန် ရှောင်ရန် သိသွားတာပေါ့။ တစ်ခုကို ကုရင် တစ်ခုဖြစ်မှာစိုးလို့ ကုပေးနေတာနော် ဆိုပြီး ရှင်းပြပေးတယ်။ သွေးအဖြေ ဘယ်လို ဖတ်ရတယ် ဆိုတာပါ ရှင်းပြတယ် ”

“Doctors are very careful. I don't know if they do not want to be wrong. Drugs are also made by the nurses themselves. During the rounds, they explain to the warder how they are treating. They told me why I needed to be treated, so patient and attendant learned what to avoid and follow. If they were to treat one thing, they would explain why they treated for it”.

(17 years, high school passed, female)

Theme 5-Perception towards resources including man, materials, equipment and drugs

Most of the respondents mentioned that inadequate manpower especially nurses. There is adequate supply of drugs mainly for injection that is expensive and inadequate supply for oral drugs.

"ဆရာဝန် ဆရာမ ကတော့ အံကိုက်ဖြစ်နေတယ်လို့ ထင်ပါတယ်။ သူတို့ အခက်အခဲတော့ ကိုယ်လည်းမသိဘူး။ အခု သွင်းနေတဲ့ ဆေးဆိုဆေးရုံကသွင်းပေးတာ။အပြင်မှာ ၈သိန်းကျော်လောက် ရှိတယ်။ တစ်လတစ်ခါသွင်းရတယ်"

"I think the numbers of doctors and nurses may be okay. I don't know about their difficulties. There are more than eight lakhs for outpatient medicine, now supplied by the hospital. Once a month, I have to submit".

(35 years, middle school passed, female)

" အဟန့်အတား ကတော့nurse တွေမှာလည်း မလုံလောက်တဲ့ အပိုင်းတွေ ရှိကောင်းရှိမယ်ပေါ့နော်။ ဆရာမတွေကိုစောင့်ရတဲ့ဟာတွေနည်းနည်းလေးတော့ ....ဆေးသွင်းဖို့ အကုန်လုံး ready လုပ်ထားပေးပြီးသားပေါ့နော်။ ဒါပေမယ့် ဆေးသွင်းဖို့အတွက်ကို ကျွန်တော်တို့ နောက်ထပ် ၁နာရီ လောက်ထပ်စောင့်ရတယ်။ လူနာတွေက ဆေးသွားဝယ်၊ ပြီးတော့ ဆရာမတွေကိုပေးထားပြီး ဆရာမတွေ နည်းနည်းအားတဲ့ အချိန်မှ လာသွင်းပေးတော့ စောင့်ရတယ်"

"*The hurdle is that nurses may not be enough. It took a little longer to wait for the nurses………It's all ready for injection. But we had to wait another hour for the injection. Patients may go to buy medicines, and we have to give the nurses' time and wait for them to come in".*

(30 years, graduated, male)

" ဆရာမလည်း မလုံလောက်ဘူး။ ဆရာဝန်လည်း မလုံလောက်ဘူး။ သူများတွေကinfusion ကို သတ်သတ်ထားတယ်။ Workload က ၂ဆ ဖြစ်တယ်။ အဲဒီတော့ ဆရာမ က ပိုလိုတာပေါ့။ ဆရာမက နည်းတော့ စောင့်ရတာပေါ့။ မကြာသင့်ဘဲနဲ့ ပိုပြီးတော့ကြာတာပေါ့။"

"Both the nurse and the doctor is not enough. There is separate ambulatory unit for infusion in other countries. Workload is twice so that the nurse needed more. I have to wait a little. Soon it will take longer."

(40 years, consultant, female)

”သောက်ဆေးတွေ ကို သေချာရှင်းပြပေးတယ်။ရှိတာကိုပေးတယ်။ မရှိတာမှဝယ်ခိုင်းတယ်“

“He explained the medications and offered them. They were told to buy for the drugs not available here.”

(17 years, high school, female)

”ဈေးကြီးတဲ့ဆေးတွေပဲ ဝယ်ရတယ်။ တော်တော်များများ ထောက်ပံ့ပေးတယ်။“

“Buy only expensive drugs. A lot of support.”

(32 years, primary school passed, male)

“Day care ကိုသီးသန့်ကြည့်တဲ့ ဆရာမ မရှိလို့ ဆရာမ သီးသန့် ရှိတာ ပိုကောင်းပါတယ်။လူနာ အတွက် လည်းပိုအဆင်ပြေပါတယ်။ injection ကတော့ ပေးနိုင်ပါတယ်။ oral ကတော့ အလုံးစုံ တော့ မပေးနိုင်ဘူးပေါ့။ Day care မှာသွင်းတဲ့ဆေးက ၂ မျိုး ရှိတယ်။ ၁မျိုး က နိုင်ငံတော် ကပေး တယ်။ ၁မျိုး ကတော့ ဝယ်ရတယ်။ ဝယ်တဲ့ဆေးက ဈေးပိုနည်း ပါတယ်။ လိုတာတော့သွားဝယ် ပေးရတယ်။ ထောက်ပံ့ပေးနိုင်ရင်တော့ အကောင်းဆုံးပဲ။ inpatient အတွက် ကိုတော့ injection antibiotics နဲ့ အခြားဆေး ရှိတာတွေကိုတော့ ထောက်ပံ့ပေးပါတယ်"

“It is better that there is special nurse who cares for day care, and it is better for the patient. The injection can work. Oral drugs are not all given. There are two types of daycare medicines. One is provided by the Nation. We have to buy one. The drugs we buy are less expensive. We need to go and buy. It is best if we can provide. Inpatient are also provides with injection antibiotics and other medicines.”

(41 years, nurse, female)

"အထောက်အကူပြု အနေနဲ့ syringe pump, infusion pumpတို့ လိုတာပေါ့။ သွင်းရတာက immunosuppressive drug တွေ သွင်းရတာ ၊ အဲ့ အနေနဲ့ ထောက်ပံ့ပေးဖို့ အစီအစဉ်တွေလည်း ရှိတယ်။ ဆေးဝါး အနေနဲ့ SLE, RA တို့ကို အဓိက ကုသပေးရတာဖြစ်တယ်။ immunosuppressive drug တွေက လုံလောက်မှုရှိတယ်။ Supportive ဆေးတွေအနေနဲ့ Underlying disease-Diabetes ရှိတယ်ဆိုရင် metformin, antihypertensive တို့ကိုတော့ ၁လမျိုး ၂လမျိုး မပေးနိုင်ဘူး။ ဒါပေမယ့် အရေးကြီးတဲ့ ဆေးဝါးတွေ antihypertensive ဆို amlodipine လို ဆေးတွေ ပေးနိုင်အောင် ရှေ့နှစ်မှာကြိုးစားမယ်။"

“*To do this, you need syringe pump and infusion pump. The transplants include immunosuppressive drugs; there are also programs to support this. Medication is the*

main treatment for SLE and RA. The immunosuppressive drugs are adequate. In addition, for underlying disease such as diabetes, metformin or antihypertensive drugs are not available for one to two months. But next year, we will try to give them an antihypertensive drug such as amlodipine".

(44 years, medical superintendent, female)

"စက်ပစ္စည်း အနေနဲ့ infusion pump အဓိကသုံးတယ်။ ....Burette နဲ့ ချတာရှိတယ်။ နည်းနည်း အဆင်ပြေတာပေါ့။ဒီနှစ်တောindent တောင်းပေမယ့်မခေါ်တာလားလာမပြိုင်တာလား မသိဘူး။ အခက်အခဲရှိနေတယ်......စက်တွေပေးပြီးတော့Maintenanceဆိုတာမရှိဘူး။ပျက်သွားလို့ပြင်ရ မယ်ဆို အရမ်းဈေးကြီးတယ်။ Maintenance fees မရှိဘူး။......ဆေးကို တော်တော်များများ FOC ပေးတယ်။ ဆေးဝါးက အရမ်းအဆင်ပြေတယ်။ antibiotics.....လုံလောက်မှု ရှိတယ်။Targeted therapy ပဲမပေးနိုင်တာ။ အဲ့ဆေးတွေက အရမ်းဈေးကြီးတယ်။ နောက်တစ်ခုက Nutrition လိုတယ်။ အခုတခေါက်မှာ protein အထုတ်ကလေးတွေ ပေးနိုင်တယ်။"

"The device is used mainly as an infusion pump…. Burette is available for purchase. It's a little bit better. This year's indent asked but did not know whether to call or not to compete. There is a problem…… There is no maintenance. It is very expensive to repair it. There are no maintenance fees……Many medications are given FOC. The medicine is very good condition. Antibiotics... etc. are sufficient. They are very expensive. Another issue is nutrition. In the meantime, you can give a small amount of protein"

(40 years, consultant, female)

Theme 6- Challenges

One third of the patients and one of the health care provider indicated that there is difficulties for care giver to take ambulatory care service and most of the patients stated that financial problem. One of the healthcare provider and one third of the patients mentioned the difficulties in imaging and laboratory request. Other difficulties of patients were social, transportation and rental difficulties.

"လူနာစောင့်မရှိတော့ အခက်အခဲရှိပါတယ်။"

"*There are difficulties when there is no attendants*"

(27 years, university student, female)

"

“တချို့တွေက ရန်ကုန် ၁ခါမှ မရောက်ဘူးတဲ့ သူတွေရှိတော့ လူနာစောင့် ၂ယောက်လောက် ခေါ်ရတဲ့ သူတွေရှိတယ်။ တချို့ က ပိုက်ဆံ ငှားပြီးခေါ်ရတယ်။လိုက်ပေးမယ့်သူ မရှိလို့ လေ။”

“Some people have never been to Yangon since there are only two wardens. Some people hire others by money because there is no one to help them.”

(40 years, consultant, female)

“ခြေထောက်ထိသွားတဲ့အခါကျတော့ အလုပ်မလုပ်နိုင်တော့ဘူးလေ။ ခရီးစရိတ်နဲ့ ဆေးဖိုး တွက်ကြည့်လိုက်တဲ့ အခါကျတော့ ပိုက်ဆံ မလောက်တော့တာလည်းရှိတယ်။ အဲဒီ အခါကျတော့ သီးသီးသန့်သန့် ကြီး လာမပြနိုင်တော့ဘူးလေ။ ”

“When the leg is weak due to the complication, it can't work. When it comes to the cost of travel and medical expenses, money is insufficient. At that time, it was no longer possible to come exclusively.”

(35 years, middle school passed, male)

"ဓာတ်မှန်ရိုက်မယ်ဆိုရင် အလုပ်သမားမရှိတော့ လူနာကသူ့ဘာသာသွားရတယ်။ မိုးရွာချိန်မှာ လူနာစောင့်က လူနာကို ထီးဆောင်းပြီး wheelchair ကို သူ့ဘာသာတွန်းပြီးသွားရတယ်။ အမိုး မရှိဘူး။ တကယ်ဆိုပေါင်းကူးတံတားတွေ ရှိရမယ်။ Hospital design ကလေအဆင်မပြေဘူး။ "

“If a plan for imaging, the patient has to go out on his own. During the rainy season, the guard had to push the patient in and push the wheelchair on his own. There was no roof. In fact, there must be bridges. Hospital design is .....not good.”

(40 years, consultant, female)

“လူနာ အချင်းချင်းစောင့်နေရတယ်။ တချို့ က သွေးအဖြေမပါလာတာတို့၊ ထပ်သွား ဖောက်ရ တာတို့ ရှိတယ်။ ဆရာမတွေက လည်းသွေးအဖြေစုံမှ ဘာသွင်းရမလဲ ဆုံးဖြတ်ရတာ ဆိုတော့ ပြီးမှ အားလုံး အတူတူသွင်းပေးတာ ဆိုတော့ နည်းနည်း တော့ စောင့်ရတယ်။”

“The patients were waiting for each other. Some people do not have the blood test. We have to do another. The nurses also had to decide what blood transfusions were to be given, and then they were all put together so they had to wait a bit.”

(36 years, middle school passed, female)

Theme 7- Suggestions

There are different suggestions for ambulatory care service especially associated with service extension, building, infrastructure and drug supply.

အခြားဆေးရုံတွေမှာမရဘူးလေ။ ကျွန်တော်တို့ကဒေး“ဒရဲက ၊ ဒေးဒရဲမှာလည်းမရဘူး၊ ဖျာပုံမှာ လည်း မရဘူး။တိုးချဲ့ပေးနိုင်ရင်တော့အကောင်းဆုံးပဲ။ခရိုင်မှာရှိရင်တော့ခရိုင်တစ်ခုလုံးအတွက်ကောင်းတာပေါ့။ နယ်ဝေးကလာတဲ့လူနာတွေအတွက်နေစရာလေးစီစဉ်ပေးရင် ပိုအဆင်ပြေမယ်။”

“*Other hospitals are not available. We say: I don't get it in Daydaye. It's not available in Pyapone. It is best if you can expand in the district. In the district, it's good for the whole district. It may be more convenient to arrange an accommodation for patients from a remote area”.*

(32 years, primary school passed, male)

“အရင်နှစ်တွေက Rheumatology society အနေနဲ့ ပြည်နယ် နဲ့ တိုင်း ဆေးရုံ တွေ မှာ လိုက်ပြီးဟောပြောတယ်။ ဒီနှစ်မှာတော့ workshop လုပ်တယ်။ ပြည်နယ် နဲ့ တိုင်း တွေမှာရှိတဲ့ အကြီးဆုံးတွေနဲ့ second line တွေကို ဖိတ်ပြီး workshop ၂ ရက် လုပ်တယ်။ SLE treatment , RA treatment , daycare infusion အတွက် daycare ကို ဘယ်လို manage လုပ်ရတယ် ဆိုတာ သင်ပေးတယ်။ daycare မှာ ဖြည့်ရတဲ့ကဒ်တွေပါ ထည့်ပေးလိုက်တယ်။ …. Training ကိုလည်း ၁နှစ် ၁ခါ ဒါမှမဟုတ် ၂နှစ် ၁ခါ လုပ်သွားဖို့ရှိတယ်”

“Years ago, the Rheumatology Society talked to the state and region hospitals. This year there was a workshop. We invite the responsible person and second lines of state and region to conduct a two day workshop. They are showed how to manage daycare for SLE treatment, RA treatment for daycare infusion. The daycare card is included. …. Training will also be done once a year or once every two years in later.”

(40 years, consultant, female)

"တဖြည်းဖြည်းနဲ့ လူနာများလာတာကြောင့် နေရာလေးတွေ မလုံလောက်တာလေးတွေ ရှိတာပေါ့။ ထပ်ပြီးတိုးချဲ့ပြီး အခန်းလေးတွေ ထားသင့်ပါတယ်။ "

“As more and more patients are, there is not enough space. It should be expanded and added more room”.

(41 years, nurse, female)

“

“အိမ်သာအဆင်မပြေတာပဲရှိပါတယ်။အိမ်သာကိုသဘောမကျဘူး။ အထဲမှာချက်မရှိဘူး။ ချက် လေး တစ်ခု တော့ လုပ်စေချင်တယ်။”

“There is inconvenience in toilet. I didn't like the toilet, there was no latch on the toilet door, and I wanted to do it.”

(17 year, high school passed, female)

"စက်ပစ္စည်း အနေနဲ့ ကြီးကြီးမားမားမလိုအပ်ဘူး ဆိုပေမယ့် BP Cuff, ECG, syringe pump, infusion pumpတွေထောက်ပံ့သွားမှာဖြစ်ပါတယ်။လောလောဆယ်တော့ကာမိအောင်သုံးတာပေါ့။ ရှေ့နှစ်တွေမှာ ပိုပြီးတော့ ပေါပေါများများ ပိုပိုလျှံလျှံ ဖြစ်အောင် ထောက်ပံ့သွားမယ် လို့ အစီအစဉ် ရှိပါတယ်။ "

“Although the equipment is not a big deal, the BP Cuff, ECG, syringe pump and infusion pump are currently being used. There are plans to support more excesses in the coming years”.

(44 years, medical superintendent, female)

"သွေးစစ်တာကိုလည်းမနက် ၇ နာရီလောက်ဆိုရင်မရတော့ ။ ၆နာရီလောက် လာမှအဆင်ပြေတယ်။ လူနာတွေအတွက် ၈ နာရီလောက်အထိ လုပ်ပေးရင် ကောင်းမယ် ”

“To get blood tests is not convenient at 7am. It's only good to come from 6 a.m. It is good to work for patients in Daycare up to 8am”

(35 years, middle school passed, female)

“Daycare လုံး၀ အခန်းကseparate, unit သေးသေးလေး ဖြစ်နေရမယ်။ counter ရှိရမယ်။ သူနာပြုဆရာမတစ်ယောက် (သို့) nurse aid တစ်ယောက်ရှိရမယ်။ MO တစ်ယောက်ပါရှိနိုင်ရင်တော့ ပိုကောင်းတယ်။ ခုံလေးရှိရမယ်။စားပွဲရှိရမယ်။ထမင်းစားလို့ရတဲ့စားပွဲလေးလေ။ အိမ်သာလေးရှိရမယ်။"

“Daycare room must be completely separate, small unit. There must be a counter. You must have a nurse assistant or nurse. It's better to have a MO. There must be a chair. There must be a table, a small table that can be eaten. There must be a toilet.”

(40 years, consultant, female)

“စောင့်ရတဲ့လူနာတွေအတွက်ခုံတန်းလျားလေးတခုလောက်လုပ်ပေးစေချင်တယ်။မတတ်နိုင်တဲ့လူနာတွေကို ထောက်ပံ့ပေးတာ ဖြစ်ဖြစ်၊ စရိတ်မျှပေးဖြစ်ဖြစ် တခုခုလုပ်ပေးစေချင်တယ်။”

“I would like to make a bench for the waiting patients. Whether providing support to patients who cannot afford; I want you to do something for can’t afford cost.”

(30 years, graduated, male)

CHAPTER (6)

DISCUSSION

Yangon specialty hospital is 500 bedded specialty hospital and is situated in the Min Ye Kyaw Swar Road in Lanmadaw Township which was formally opened on August, 2014.It is also tertiary care teaching hospital. Hospital based cross-sectional descriptive study was to assess utilization, structure and the perception of patients and health care providers on ambulatory care services of rheumatology department at Yangon Specialty Hospital. During six months, 1348 of patients taking treatment from rheumatology department. Female is ten times prevalence of rheumatic disease than male.

Total of 109 respondents who were taken ambulatory care services of rheumatology department in this hospital were participated in this study. Overall perception of patients for ambulatory care services was good in YSH.

6.1 Background characteristics of respondents

In this study, 71.6% of SLE patients used ambulatory care services more frequently compared with other rheumatologically diseases. While the clearest guidelines for the treatment of SLE exist in the context of lupus nephritis, patients with other lupus manifestations such as neuropsychiatric, hematologic, musculoskeletal, and severe cutaneous lupus frequently require immunosuppression and/or biologic therapy(Jordan and D'Cruz, 2016). SLE patients with organ damage often require therapies for prolonged periods of time (Kumar, Chambers and Gordon, 2009).

Among the study population, the youngest age was 13 years and the oldest was 67 years old. About half of the respondents who participated in the study were between the age group of 21-40 years and 90% were female. In Germany study, patients were aged from 2 to 95 years, with a mean age of 54 and 69% of all patients were female (Vanhoof, Declerck and Geusens, 2002). In Estonia study, 17.6% were male and 82.4% were female. The mean respondent age was 59.2 (SD = 13.1) years (ages ranged from 19 to 93 years); 79% were >50 years of age (Põlluste et al., 2012). Although the age group were varied, female is more prone in rheumatologically disease than male in every study.

In the current study, more than half of the patients were from rural area and most of the respondents were dependent due to the disease complications and similar finding was reported in Estonia study (Põlluste et al., 2012).

In the present study, level of perception was significantly associated with level of education (*P*=0.034) and similar finding in the study of India (*P*=0.023) (Qadri et al., 2012) and also in the study of Spain (Quintana et al., 2006). Therefore, the higher the education, the more expectation and the poorer perception.

In Portugal study, the average rheumatic disease duration was 10.6 ± 7.9 years. Most patients were followed at the RDCU for more than five years for both intravenous therapy and subcutaneous therapy(Barbosa et al., 2011). In this study, the average disease duration was 22.8± 3.6 months and the average number of visit to rheumatology department was five times for only intravenous immunosuppressive therapy especially for organ threatening case. After specifying the treatment guideline and treatment started first and second cycle, the patients was referred to the nearest state and region hospitals that got training or refresher training from the rheumatology society, Myanmar until the last cycle. In a mixed cohort of rheumatology patients from the UK, Douglas expressed a much stronger preference to have follow-up care in a local hospital outpatient clinic (Douglas et al., 2005).

In this study, 86.2% of respondents thought their health status improved after taking treatment from rheumatology department. Health status measures constitute an essential part of outcome assessments in patients with rheumatic diseases. Currently used health status measures typically assess patient perceptions within various dimensions of health (Kvien and Heiberg, 2003). Improvement of health status include disease progress, pain relief, and perception of treatment option. The patient's perspective in assessing health is important both clinically and scientifically. In addition, focusing on the patient is very relevant in modern society, in which healthcare requires the consent and participation of patients. There are differences between healthcare providers and patients in the perception of the patient's health status and the need for care (Kvien and Heiberg, 2003).

6.2 Perception on Convenient of Service and Basic amenities

Regarding perception level on convenient of service and basic amenities, more than half of the patients had poor perception mainly due to the weakness in waiting area cleanliness and toilet cleanliness, waiting chair inadequacy and non-operational fan that

is inconvenience in hot weather. There is a separate room for ambulatory care service in the rheumatology department but it is needed for cleaning services and inadequacy of chair in waiting area especially for care giver. Similar findings in the study of Waibargi specialist hospital, satisfaction level of the respondents with basic amenities in OPD was 49% poor and 51% good as the unsatisfied in toilet cleanliness and unsatisfied in adequacy of waiting chairs (Zaw-Linn, 2017).

However, in the study of NOGH, approximately 33% of patients perceived as poor so the waiting space inadequacy and waiting chairs inadequacy and then nearly 70% of patients perceived as good (Zin-Me-Ko, 2018). Similar findings in the study of India, 25.1% of the respondents dissatisfied on availability on general basic amenities and the main reason was inadequate toilet cleanliness (Qadri et al., 2012). In Nigeria study, it was also found that poor satisfaction level was 46% and good satisfaction level was 54% regarding basic amenities (Ughasoro et al., 2017).

Although as a public hospital, there may be limitation of budget for improving infrastructure. There is needed to fulfill the waiting chairs, registration desk, repairing the infrastructure, extension the spaces and the requirement of sanitation at the day care unit to encounter forecasted demands and growing needs should be emphasized.

6.3 Perception on responsiveness

Regarding the perception on responsiveness, 52% of patients responded good perception. Regarding the choice of healthcare provider, about half of the patients revealed that there is not necessary for the choice of healthcare provider because good communication of all doctors at rheumatology OPD. The perception with doctor's communication, listen carefully for any question and replying the question want to know is good and there is no person answering "disagree" and "strongly disagree" and also similar finding in NOGH study (Lay-Phyu-Pyar-Aung, 2016). As the rheumatology ambulatory care diseases are chronic disease, they are familiar with the doctors, nurses and workers and get good communication between them. In the study of India, behavior of doctor, nurse and supporting staff are statistically associated with the patient satisfaction (Qadri et al., 2012) and similar finding in Lata Mangeshkar Hospital in Nagpur (Kulkarni, Dasgupta and Deoke, 2011) and in the study of UK (Hill et al., 1992). Patients identified needs related to a variety of aspects of communication. Patients valued positive interactions and relationships with their healthcare providers (Segan et al., 2018).

In the current study, only 21.1% of patients perceived "strongly agree" and nearly 57% of patients perceived "agree" for adequacy of medical supply. For inpatient and the patient can't afford for infusion treatment of ambulatory care service, the hospital supported the required drug but other ambulatory care patient were partially supported by the hospital. Similar finding found in the local studies of NOGH hospital (Zin-Me-Ko, 2018) and Waibargi hospital (Zaw-Linn, 2017).

Medical explanation and receiving information of the respective of the disease indicate the perception of the patients. In the present study, most of the patients had good perception for this session but some of the patients stated that they didn't know the explanation and information of the diseases. Several reasons for this may be due to the patients overcrowded at OPD, short discussing time with doctors, patients' anxiety although giving explanation and information of disease. It also depend on patient's education status. Similar findings in the study of India (Kumari et al., 2009) and in the study of YCH (Khin-Theingi-Myint, 2016). There is necessary to give enough time for the thorough explanation and essential information about the diseases.

6.4 Waiting time

In the present study, nearly 35.8 % of respondents waited less than thirty minutes to get ambulatory care service after registration. Perception level on ambulatory care services is associated with the waiting time. Persons who wait for less than one hour had good perception level on convenience of service, responsiveness ($P<0.001$) and quality of care. The longer the waiting time, the poorer perception on ambulatory care services. Similar findings in Chinese study (Sun et al., 2017) and in UK study mentioned that patients appear reasonably satisfied if they wait no more than 37 minutes when arriving on time and no more than 63 minutes (Huang, 1994). In Myanmar study, 98.1% of patients wait less than thirty minutes at OPD of YCH (Khin-Theingi-Myint, 2016) and 65.4% of the patients got reasonable treatment within thirty minutes (Lay-Phyu-Pyar-Aung, 2016). But in another study of NOGH, only 5.6% of respondents can consult within thirty minutes and nearly 65% of respondents wait above one and half hour and there is no poor perception in prolong waiting patients (Zin-Me-Ko, 2018). In this study, one reason for long waiting time is due to inadequate staff for infusion services and so there is need to fulfill the required resources and to build up the proper appointment system.

6.5 Perception on quality of care

In current study, 52.3% of the respondents had good perception on quality of care and most of the patient perceived that good appointment system, receiving effective treatment and health care provider had thorough knowledge and skill. Similar finding in study of YCH (Khin-Theingi-Myint, 2016) and in study of YGH (Tin-Tin-Khaing, 2016). In the study of United Kingdom (UK), sixty four per cent of patients considered that their feelings about their treatment were taken into consideration, patients showed most satisfaction with technical quality and competence (Hill et al., 1992).

In the present study, 15.6% of patients didn't feel that the health care provider considers for their situation such as financial difficulties, social difficulties and other difficulties.

In current study, about 90.8% of patients reported that they had regular follow up and most of the patients had the experiences of hospital admission before. In Sweden study, the follow-up measurements revealed that the patients were satisfied with the information they had received concerning their disease, but there was a strongly felt desire to have the opportunity to discuss alternative forms of treatment (Samuelsson, Ahlmén and Sullivan, 1993).

From Qualitative Findings,

6.6 Challenges

Regarding the building and infrastructure of the rheumatology department, there is a separate room for ambulatory care services but no registration desk and no separate toilet. Rheumatology department is two-storeyed building and the causes of poor perception was water leakage through the walls when raining and there is inadequate chairs in waiting area. In the infusion room, there is need to clean regularly and patients had good perception for ventilation and lighting of the room. Although separate duty doctor (consultant) present, no separate medical officer, no separate duty nurse and no duty worker. Doctor-nurse ratio is 1:1 and patients had to wait the nurse for infusion of immunosuppressive drug unnecessarily. No adequate worker cause the poor perception of patients and care givers to do other supportive care such as laboratory test, imaging test, etc that are not familiar with them. The need for an increase in resources and spaces at the ambulatory care unit to meet forecasted demands and growing needs was highlighted. Another challenges was financial difficulties of patients due to the SLE

and other rheumatologically diseases were chronic disease. Most of the patient who referred to the rheumatology department was organ involvement or complicated cases. So, patients and family member suffered from financial catastrophe and long term treatment causes loss to follow up.

During this year 2019, a workshop is held under rheumatology society by inviting the responsible persons from the states and regions for update rheumatology guidelines. After that, the patients under controlled treatment were referred to the trained hospitals to prevent loss to follow up and to reduce some extent of difficulties of patients. Therefore, patient's perception about regular follow up and continuity of care is important especially for chronic diseases. All staff should be trained for improving the abilities of the staff and using update guideline for specific treatment help for giving the effective treatment of the rheumatologically diseases.

6.7 Suggestions to improve ambulatory care services

Rheumatology department at Yangon specialty hospital is the one of the tertiary department and now extend in Mandalay. Patients who live away from Yangon face transportation difficulties and need of attendants for receiving ambulatory care and temporary resident difficulties. As a result, the ambulatory care service has been extended to the other state and region hospitals. Many patients suggested for inadequacy of toilets, chairs for waiting place, and support for human resources, especially request for extension blood collection time at laboratory for ambulatory care.

Limitations of the study

Although the strength of this study was the researcher performed personally herself, there were some limitations in this study. The interview was not conducted privately in a room due to the shortage of the hospital room. The study was conducted at a tertiary care center only but the level of patient perception with different types of health providers could have given more insight into various aspects of factors related to patient perception. Most of the patients referred to this tertiary center showed their preference over the public hospital services. Many factors indicated the good perception in this study, including social desirability, reluctance to express negative opinions, item wording, and location of interview and weakness in privacy. The findings of the study population were representative to the department but it does not generalize to the entire population.

CHAPTER (7)
CONCLUSION

In this study, female patients are more utilization than male in ambulatory care services. Systemic lupus erythematous with organ involvement patients are more suitable for ambulatory infusion, age ranging from thirteen years and above.

Patients with poor perception on convenient of service and basic amenities (53.2%) were high level of education. The association between education level and perception on convenient of service and basic amenities is statistically significant ($P = 0.034$). Most are good perception on good lighting, adequate dustbins and space adequacy. The common reasons for the poor perception are toilet cleanliness, ventilation and waiting area cleanliness.

Regarding the responsiveness, patients have good perception especially on doctor's communication, listen carefully and replying their questions. But 14.7% of patients had poor perception on prolong waiting time for infusion of immunosuppressive drug which were due to inadequate staff and incomplete blood result of some patients. The association between waiting time and responsiveness is statistically significant ($P < 0.001$). Patients felt poor perception on adequate drug supply and they want to know information and medical explanation about their diseases.

According to the perception on quality of care, most of the patients have good perception on receiving effective treatment, knowledge and skill of health care provider and proper appointment system. The major challenges for the patients was financial difficulties and for the health care providers was inadequate resources. Patients also expressed a strong desire to improve communication, more information, and a more genuine partnership with healthcare professionals who are willing to take a more active role in their care. In conclusion, the perception of patients on ambulatory care services of rheumatology department was good.

CHAPTER (8)
RECOMMENDATIONS

1. The building of the rheumatology department should be repaired and for basic amenities, seating chairs and other essential hospital infrastructures should be added to cover patients while waiting at the OPD.
2. Ambulatory care room should be cleaned more often and as necessary as possible and toilet cleanliness should be done more carefully.
3. The duty staff or worker should be designated or should be assigned to reduce the waiting time of ambulatory care service.
4. To reduce the waiting time and to facilitate the ambulatory care patients, the existing day admission process should be replaced by outpatient registration process.
5. Ambulatory care services should be encouraged and extended in this hospital as well as other tertiary hospitals.

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ANNEXES

Annex (1) Operational definitions of variables

No.	Variables	Operational Definitions	Scale of Measurement
1	Age	Age of patients in completed years	Ratio
2	Sex	Gender of patient	Nominal
3	Occupation	Current working status	Nominal
4	Education	Formal educational level of participant	Ordinal
5	Address	Permanent residential address (urban/rural)	Nominal
6	Ambulatory service	Giving care to patients on outpatient basis including any of the diagnostic procedure, intervention, treatment, and rehabilitation without admission.	Nominal
7	Duration of disease	From the time of diagnosis to until now	Ratio
8	Duration of consultation	From the time of first visit to this department to until now	Ratio
9	Prompt service	Without delay and giving care to patients as soon as possible	Nominal
10	Good communication	Treat patients with dignity, politely and affably	Nominal
11	Waiting time	From the time of registration to the time of consultation with doctors	Nominal
12	Responsiveness of services	Non-medical expectation of patients from hospital	Nominal
13	Proper appointment system	Well planned arrangement for next visit or follow up	Nominal
14	Inconvenience during the course of ambulatory service	Any inconvenience condition during the time of receiving treatment or procedure	Nominal

ANNEX (2) Informed consent form (Myanmar and English)

လူပုဂ္ဂိုလ်များအပေါ် သုတေသနပြုမှုဆိုင်ရာကျင့်ဝတ်ကော်မတီ

ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ် (ရန်ကုန်)

အဓိကသုတေသီအမည်- ဒေါက်တာ စုလှိုင်ထွေး

သုတေသနအမည်-ခုတင်(၅၀၀)ဆံ့ အထူးကုဆေးရုံကြီး၊ ရန်ကုန်မြို့ အရိုးအကြောအဆစ်ဆေးကုဌာန၏ နေ့စောင့်ရှောက်ကုသမှုအပေါ် လူနာများ၏အသုံးပြုခြင်းနှင့် သဘောထားခံယူချက်များ၊ ကျန်းမာရေး စောင့်ရှောက်မှု ပေးသူများ၏ သဘောထားခံယူချက်များကို လေ့လာခြင်း သုတေသန

အပိုင်း(က) သုတေသနနှင့်ဆိုင်သောအချက်အလက်များ

(၁) မိတ်ဆက်နိဒါန်း

ကျွန်မ အမည်မှာ ဒေါက်တာ စုလှိုင်ထွေး ဖြစ်ပါတယ်။ ကျွန်မသည် ပြည်သူ့ကျန်းမာရေး တက္ကသိုလ်တွင် ဘွဲ့လွန်သင်တန်းတက်ရောက်နေသော ကျောင်းသူဖြစ်ပါသည်။ ကျွန်မ အနေနှင့် လူနာများ၏သဘောထားခံယူချက်များနှင့် ပတ်သက်ပြီး သုတေသနလုပ်ငန်းတစ်ခုဆောင်ရွက်လိုပါ သည်။ သုတေသနအကြောင်းကို ရှင်းပြမှာဖြစ်ပြီးသင့်အားပါဝင်ရန် ဖိတ်ခေါ်ပါသည်။သင့်အနေနှင့် မရှင်းလင်းသည်များရှိပါက မေးမြန်းနိုင်ပါသည်။

(၂) ရည်ရွယ်ချက်

လူနာများ၏ နေ့စောင့်ရှောက်ကုသခြင်းအပေါ် သဘောထားခံယူချက်များကို လေ့လာလိုခြင်း ဖြစ်ပါသည်။

(၃) သုတေသနဆောင်ရွက်ပုံအမျိုးအစား

ဤသုတေသနသည်တစ်ဦးချင်းမေးခွန်းများကိုဖြေဆိုရမှာဖြစ်ပြီးနာရီဝက်ခန့်ကြာမှာဖြစ်ပါတယ်။

(၄) ပါဝင်သူများကိုရွေးချယ်ခြင်း

သင့်အား ဤသုတေသနတွင် ပါဝင်ရန်ဖိတ်ခေါ်ခြင်းမှာသင့်အနေနဲ့ ခုတင်(၅၀၀)ဆံ့ အထူးကုဆေးရုံကြီး၊ ရန်ကုန်မြို့၏ အရိုးအကြောအဆစ်ဆေးကုဌာနတွင် နေ့စောင့်ရှောက်ကုသမှု ခံယူနေသောလူနာဖြစ်တဲ့အတွက်ဖြစ်ပါတယ်။

(၅) မိမိဆန္ဒအလျောက်ပါဝင်ခြင်း

ဤသုတေသနတွင် သင်ပါဝင်ကူညီခြင်းသည် သင်၏သဘောဆန္ဒအလျောက်သာဖြစ်ပါသည်။ ပါဝင်ခြင်းမှာ သင်၏ဆန္ဒအတိုင်းရွေးချယ်မှုသာဖြစ်ပါတယ်။

(၆) **လုပ်ဆောင်ပုံ**

ဤသုတေသနတွင် ပါဝင်ဖို့ သင်သဘောတူမယ်ဆိုရင် မေးခွန်းများကို ကိုယ်တိုင် ဖြေဆိုရမှာဖြစ်ပြီး နာရီဝက်ခန့်ကြာမှာဖြစ်ပါတယ်။ သင့်ရဲ့ နေ့စောင့်ရှောက်ကုသမှု ခံယူခြင်း အပေါ် သဘောထားခံယူချက်အား မေးမြန်းလိုပါတယ်။ သင်မဖြေလိုတဲ့ အကြောင်းအရာ တွေ ပါရင် မဖြေဘဲနေနိုင်ပါတယ်။

(၇) အကျိုးကျေးဇူး

ဤသုတေသနတွင် ပါဝင်သောကြောင့် သင့်အတွက် တိုက်ရိုက်အကျိုးကျေးဇူးရရှိမည် မဟုတ်ပါ။ သို့သော် သုတေသနတွေ့ရှိချက်များဟာ ဆေးရုံအုပ်ချုပ်မှုနှင့် ကျန်းမာရေးစီမံခန့်ခွဲမှုမှ ဤဌာန တွင် နေ့စောင့်ရှောက်ကုသမှု ခံယူခြင်းနှင့် ပတ်သက်ပြီး လူနာများအပေါ်လုပ်ဆောင်ပေးရမည့် အရာများအားဖော်ထုတ်နိုင်မှာဖြစ်ပါတယ်။

(၈) လျှို့ဝှက်ခြင်း

သင့်အကြောင်းကို ယခုသုတေသနအဖွဲ့ဝင်များမှလွဲ၍ အခြားသူများနှင့် ပြောဆိုခြင်း ပြုမည် မဟုတ်၊ အကြောင်းအရာအချက်အလက်များကိုလျှို့ဝှက် ထားမည်ဖြစ်ပါ သည်။ အကြောင်းအရာ အချက်အလက်များကိုလည်း သင့်အမည်ဖြင့်မမှတ်ဘဲ၊ ဂဏန်းအမှတ်အသားဖြင့်သာ မှတ်ပါမည်။ ၎င်းဂဏန်းအမှတ်အသားကိုလည်း သုတေသနအဖွဲ့ဝင်များကသာ သိကြမှာဖြစ်ပြီး အကြောင်းအရာ များကို လုံခြုံစွာသိမ်းဆည်းထားမည်ဖြစ် ပါသည်။

(၉) သုတေသနရလဒ်များကို ဖြန့်ဝေခြင်း

ဤသုတေသနမှ ရလဒ်များကို အခြားသူများအား မသိရှိစေဘဲ သင့်အားသိရှိစေမည် ဖြစ်ပါသည်။ ဤသုတေသန၏ တွေ့ရှိချက်များကို ကျန်းမာရေးမြှင့်တင်မှုအတွက် တာဝန်ရှိသူ များအားသိစေမှာ ဖြစ်ပါတယ်။ ၎င်းနောက် အခြားစိတ်ဝင်စားသူများလေ့လာနိုင်ရန်စာတမ်းပြုစု ထုတ်ဝေပါမည်။

(၁၀) ဆက်သွယ်ရန်

သင့်အနေဖြင့် ဤသုတေသနနှင့်ပတ်သက်၍ မေးမြန်းရန်ရှိပါက ကျွန်တော်/ကျွန်မ (သို့မဟုတ်) သုတေသန အဖွဲ့ဝင်များကို ယခုဖြစ်စေ၊ နောင်တွင်ဖြစ်စေ မေးမြန်းနိုင်ပါသည်။ အကယ်၍ နောင်မှ မေးမြန်းလိုလျှင် ဒေါက်တာစုလှိုင်ထွေး၊ ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ်၊ ဖုန်း-၀၉-၇၉၅၇၈၇၃၂၆ ကို ဆက်သွယ်မေးမြန်းနိုင်ပါသည်။ ဤသုတေသနအဆိုပြုလွှာကို ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ်၏ သုတေသနနည်းပညာနှင့်ကျင့်ဝတ်ကော်မတီမှခွင့်ပြုချက်ရယူပြီး ဖြစ်ပါသည်။ အကယ်၍ သင့်အနေဖြင့် မေးခွန်းများမေးစရာရှိပါက သုတေသနပြုခြင်း နှင့် ဖြစ်နိုင်သည့်အန္တရာယ်ကို ကာကွယ်ပေးရန်

ဖွဲ့စည်းထားသည့် ပြည်သူ့ကျန်းမာရေး တက္ကသိုလ်၏ သုတေသနနည်းပညာနှင့်ကျင့်ဝတ်ကော်မတီ၊ ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ်၊ အမှတ်(၂၄၆)၊ မြို့မကျောင်းလမ်း၊ လသာ မြို့နယ်၊ ရန်ကုန်၊ စာတိုက်အမှတ်(၁၁၁၃၁)၊ ဖုန်း-၀၁-၃၉၅၂၁၃၊ ၀၁-၃၉၅၂၁၄ **ext** ၂၃၊ ၂၅ သို့ ဆက်သွယ်မေးမြန်း နိုင်ပါသည်။

အပိုင်း (ခ) သုတေသနတွင်ပါဝင်ရန်သဘောတူညီမှုပုံစံ

ကျွန်ုပ်သည် နေ့စောင့်ရှောက်ကုသမှုခံယူခြင်းနှင့်ပတ်သက်ပြီး လူနာများ၏ သဘောထား ခံယူချက်များ လေ့လာခြင်းသုတေသနတွင် ပါဝင်ရန်ဖိတ်ခေါ်ခြင်းခံရပါသည်။ ဤသုတေသနတွင် ပါဝင်ခြင်းဖြင့် ကျွန်ုပ်အတွက် တိုက်ရိုက်အကျိုးကျေးဇူးမရှိနိုင်ပါ။ ကျွန်ုပ်သည် မေးခွန်းများကို ကိုယ်တိုင်ဖြေဆိုရမည်ဖြစ်ပြီး နာရီဝက်ခန့်ကြာမည်ဖြစ်ကြောင်းနှင့် နေ့စောင့်ရှောက်ကုသမှုခံယူခြင်းနှင့် ပတ်သက်ပြီး ကျွန်ုပ်၏သဘောထားခံယူချက်ကို မေးမြန်းမှာဖြစ်ကြောင်း၊ မဖြေလိုလျှင် မဖြေဘဲ နေနိုင်ကြောင်း သိရှိရပါသည်။

ဤသုတေသနတွင် ကျွန်ုပ်သည် အထက်ဖော်ပြချက်များကို ဖတ်ရှုပြီးဖြစ်ပါသည်။ မရှင်းလင်းသည့်မေးခွန်းများကို မေးမြန်းနိုင်၍ ၎င်းတို့ကို ကျွန်ုပ်ကျေနပ်သည်အထိ ဖြေဆိုပေးပါမည်။ ကျွန်ုပ်ဆန္ဒအလျောက် ဤသုတေသနလုပ်ငန်းတွင် ပါဝင်ရန်သဘောတူပါသည်။

သုတေသနတွင်ပါဝင်သူလက်မှတ် ____________________

ရက်စွဲ ____________________

သုတေသီအမည် ____________________

သုတေသီလက်မှတ် ____________________

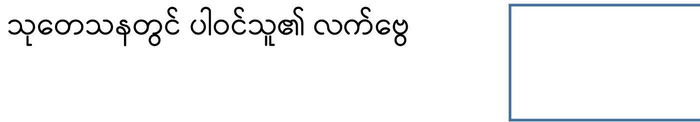
ရက်စွဲ ____________________

စာမတတ်သူအတွက်

ကျွန်ုပ်သည် ဤသုတေသနတွင်ပါဝင်နိုင်သူအတွက်သဘောတူညီချက်ပုံစံ ဖတ်ပြခြင်း ကို သက်သေခံပါသည်။ သုတေသနတွင်ပါဝင်ရန် သဘောတူညီသူသည် မရှင်းလင်းသည်များ ကို မေးမြန်းနိုင်ကြောင်း သက်သေပြုပါသည်။ ၎င်းသုတေသနတွင် ပါဝင်ရန် သဘောတူညီ ခွင့်ပြုချက် သည် လွတ်လပ်စွာ သဘောတူညီချက်ပေးခြင်းဖြစ်ကြောင်း သက်သေပြုပါသည်။

သက်သေအမည် ______________________

သက်သေလက်မှတ် ______________________



သုတေသနတွင် ပါဝင်သူ၏ လက်ဗွေ

သုတေသီအမည် ______________________________

လက်မှတ် ______________________________

ရက်စွဲ ______________________________

Informed consent form

Name of Investigator - Dr Su Hlaing Htwe, Candidate of MHA 1st Batch

Title of research - Utilization and perception on ambulatory care services Of Rheumatology department at Yangon Specialty Hospital

Part (A)

1. Introduction

I am Dr Su Hlaing Htwe, a candidate of MHA attending at University of Public Health, Yangon. I am doing research on "Utilization and perception on ambulatory care services of Rheumatology department in Yangon Specialty Hospital"

2. Purpose of the research

This study is to assess the utilization and perception on ambulatory care services of patients and health care providers of Rheumatology department in Yangon Specialty Hospital. So I want to study your perception on ambulatory care services of this department.

3. Time of Research Interview

This research will involve your participation in about thirty minutes interview.

4. Participant Selection

You are being invited to take part in this research because you are receiving ambulatory care services of this department.

5. Voluntary Participation

Your participation in this research is entirely voluntary. It is your choice whether participate or not.

6. Procedure

I would like to invite you to take part in this research project. If you accept, you will be asked to involve in interview individually. This will take about thirty minutes. The interview will be taken at a place which is comfortable for you. The interview questionnaire will include information about your background information, and your perception on receiving of ambulatory care services of this department. You do not have to answer any question or take part in the discussion if you feel the issue(s) are too personal or if talking about them makes you uncomfortable.

7. Benefits

Participation in this study will not benefit the participant directly. However, the findings from this study will be useful in enhancing health system performance of public hospitals.

8. Confidentiality

I will not be sharing information about your participation in this study to anyone outside. The information that I collect from this research project will be kept confidentially.

9. Sharing the Results

The knowledge that I've got from research will be shared only to the persons who have the responsibility for this study.

10. Who to contact

If you need further information and assistance, feel free to contact to researcher, Dr Su Hlaing Htwe, Ph No.09795787326, email-suhlainghtwe41@gmail. com

Part (B) Consent form

I have been invited to participate in research about on "Utilization and perception on ambulatory care services of Rheumatology Department in Yangon Specialty Hospital". I that I will have to participate in individual interview which will last about thirty minutes. I am aware that there may be no benefit to me personally and that I will be paid only for my time spent. The interview questionnaire will include patients" perception on ambulatory care services of that department". I have read the foregoing information, or it has been read to me. I have had the opportunity to ask questions about it and any questions I have been asked and have been answered to my satisfaction. I consent voluntarily to be a participant in this study.

Signature of participant ------------------------------

Date ------------------------------

Name of researcher Dr Su Hlaing Htwe

Signature of researcher ------------------------------

Date ------------------------------

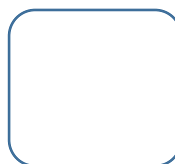
If illiterate

I have witnessed the accurate reading of the consent form to the potential participant and the individual has had the opportunity to ask questions. I confirm that the individual has given the consent freely.

Name of witness --------------------------

Signature of witness --------------------------

Thumb print of participant



Name of researcher --------------------------

Signature of researcher --------------------------

Date (Day/month/year) --------------------------

ANNEX (3) Questionnaires Form (Myanmar and English)

ခုတင်(၅၀၀)ဆံ့ဆေးရုံကြီး၊ ရန်ကုန်မြို့ ရှိ အရိုး အကြောအဆစ် ဆေးကုဌာန၏

နေ့စောင့်ရှောက်ကုသမှုအပေါ် လူနာများ၏ အသုံးပြုခြင်းနှင့် သဘောထားခံယူချက်များနှင့်

သက်ဆိုင်သောသုတေသန မေးခွန်းပုံစံ

လူနာအမှတ်စဉ် -

ဖြေဆိုသည့်အမှတ်စဉ် -

ရက်စွဲ -

နံပါတ်	မေးခွန်းများ	ကုဒ်
(က)	**လူနေမှုဘဝဆိုင်ရာ အချက်အလက်များ**	
၁။	အသက် (ပြည့်ပြီးနှစ်) ---------------	|_|_|
၂။	ကျား၊ မ (၁) ကျား (၂) မ	|_|_|
၃။	ဘာသာ (၁) ဗုဒ္ဓဘာသာ (၂) ခရစ်ယာန် (၃) အစ္စလာမ် (၄) ဟိန္ဒူ (၅) အခြား (ဖော်ပြပါ) __________	|_|_|
၄။	အိမ်ထောင်ရေး (၁) အပျို/ လူပျို (၂) အိမ်ထောင်သည် (၃) အိမ်ထောင်ကွဲ (၄) မုဆိုးမ/ဖို	|_|_|
၅။	နေရပ်လိပ်စာ (၁) ပြည်နယ်/ တိုင်း ____________ (၂) မြို့နယ် ____________ (၃) မြို့ပြ/ ကျေးလက် ____________	|_|_|

၆။	ပညာအရည်အချင်း (အောင်မြင်ပြီးသောအတန်း) (၁) စာမတတ် (၂) ရေးတတ်၊ ဖတ်တတ် (၃) မူလတန်း (၄) အလယ်တန်း (၅) အထက်တန်း (၆) တက္ကသိုလ်အဆင့် (၇) ဘွဲ့ရနှင့်အထက်	|_|_|
၇။	အလုပ်အကိုင် (၁) မှီခို (၂) ပင်စင်စား (၃) ဝန်ထမ်း (၄) ကိုယ်ပိုင်လုပ်ငန်း (၅) အခြား (ဖော်ပြပါ)	|_|_|
(ခ)	ရောဂါနှင့်ပတ်သက်သောအချက်များ	
၈။	ရောဂါအမည် _______________	|_|_|
၉။	ရောဂါသိရှိသည့်အချိန်မှစ၍ ယခုအချိန်ထိ စုစုပေါင်းကြာချိန် ________လ	|_|_|
၁၀။	ဤဌာနသို့စတင်လာရောက်ပြသချိန်မှ ယနေ့ထိကြာချိန် ___________လ	|_|_|
၁၁။	ဤဌာနသို့ လာရောက်ပြသသည့် အကြိမ်အရေအတွက် ___________လ	|_|_|
၁၂။	ဆေးရုံတွင်လာရောက်ပြသသည့်အတွက်ကျန်းမာရေးအခြေအနေတိုးတက်မှုရှိပါသလား။ (၁) ရှိပါသည်။ (၂) မရှိပါ။	|_|_|
(ဂ)	**ဌာနရှိလိုအပ်သည့်အထောက်အပံ့ပစ္စည်းများ၊အဆောက်အဦနှင့်ပတ်သက်သည့်အချက်အလက်များ**	
၁၃။	လူနာနှင့်လူနာစောင့်များနားနေစောင့်ဆိုင်းသည့်နေရာဝန်းကျင်သန့်ရှင်းမှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|

၁၄။	လူနာနှင့်လူနာစောင့်များ နားနေစောင့်ဆိုင်းသည့် နေရာဝန်းကျင်သည် ကျယ်ပြန့် လုံလောက်မှု ရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၁၅။	လူနာနှင့်လူနာစောင့်များနားနေစောင့်ဆိုင်းရန်ထိုင်ခုံများ လုံလောက်စွာ စီစဉ်ထားရှိမှု ရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၁၆။	ဤဌာနတွင်လူနာနှင့်လူနာစောင့်များအတွက်အိမ်သာများသန့်ရှင်းမှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၁၇။	လူနာနှင့်လူနာစောင့်များ နားနေစောင့်ဆိုင်းသည့် နေရာဝန်းကျင် သည် လေဝင်လေထွက် ကောင်းမွန်မှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၁၈။	လူနာနှင့်လူနာစောင့်များ နားနေစောင့်ဆိုင်းသည့် နေရာဝန်းကျင် သည် အလင်းရောင် လုံလောက်မှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၁၉။	ဤဌာနတွင်အမှိုက်ပစ်ရန်အမှိုက်ပုံးများစီစဉ်ထားရှိမှုအလုံအလောက်ရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|

(ဃ)	ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများ၏ တုံ့ပြန်မှု၊ ဝန်ဆောင်မှုနှင့် ပတ်သက်သည့် အချက်အလက်များ	
၂၀။	ဤဌာနရှိ ဆရာဝန်များ၏ဆက်ဆံရေးကောင်းမွန်သည်ဟုထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၁။	ဤဌာနရှိ သူနာပြုဆရာမများ၏ဆက်ဆံရေးကောင်းမွန်သည်ဟုထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၂။	ဤဌာနရှိ လုပ်သားများ၏ဆက်ဆံရေးကောင်းမွန်သည်ဟုထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၃။	ဆေးဝါးများအား အလုံအလောက် ထောက်ပံ့ပေးပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၄။	သိလိုသည်များ မေးမြန်းသည်ကို ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများမှ ဂရုတစိုက် နားထောင်မှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၅။	သိလိုသည်များ မေးမြန်းသည်ကို ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများမှ ရှင်းလင်း ဖြေကြားမှု ရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|

၂၆။	ရောဂါနှင့်ပတ်သက်ပြီး ရှင်းပြမှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၇။	ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများထံမှရောဂါ၊ဆေးဝါးများနှင့်ပတ်သက်ပြီး သတင်းအချက်အလက်များ ပေးနိုင်မှုနှင့် ရှင်းပြနိုင်မှု ရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၂၈။	ပြသရန်စောင့်ဆိုင်းရသည့်ယေဘုယျကြာမြင့်ချိန် မည်မျှရှိသနည်း။ (၁) မိနစ် ၃၀ အတွင်း (၂) မိနစ် ၃၀ မှ ၁ နာရီ အတွင်း (၃) ၁နာရီ မှ ၁နာရီခွဲ အတွင်း (၄) ၁နာရီခွဲ နှင့် အထက်	|_|_|
၂၉။	ကျန်းမာရေးစောင့်ရှောက်မှု ပေးသူများထံမှ နှောင့်နှေးကြန့်ကြာမှုမရှိဘဲ ဝန်ဆောင်မှုပေးနိုင်သည်ဟု ထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၃၀။	မိမိပြသလိုသော ဆရာဝန် ဆရာမ ကိုရွေးချယ်ပြသနိုင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
(င)	ဌာန၏ အရည်အသွေး ဝန်ဆောင်မှုနှင့်ပတ်သက်သည့် အချက်အလက်များ	
၃၁။	စမ်းသပ်ကုသရာတွင်အရှက်လုံအောင်ကာကွယ်ပေးမှုရှိသည်ဟုထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|

၃၂။	ဆရာဝန် ဆရာမများသည် ကျွမ်းကျင်မှုရှိသည်ဟုဟုထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၃၃။	ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများထံမှ ထိရောက်သောကုသမှု ရရှိသည်ဟု ထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၃၄။	ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများထံမှ လူနာကိုကုသရာတွင် ရောဂါအပြင် အခြားအချက်များ (လူနာ၏လူမှုရေးအခြေအနေများ) ကို ထည့်သွင်းစဉ်းစားပေးသည်ဟု ထင်ပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၃၅။	နောက်တစ်ကြိမ်ပြသရန်အတွက် သင့်လျော်သော ရက်ချိန်းစီစဉ်ပေးမှုရှိပါသည်။ (၁) အလွန်သဘောတူပါသည်။ (၂) သဘောတူပါသည်။ (၃) သဘောမတူပါ။ (၄) အလွန်သဘောမတူပါ။	|_|_|
၃၆။	ရက်ချိန်းမှန်မှန်ပြသဖြစ်ပါသလား။ (အကယ်၍ အဖြေ(၁)ဖြစ်ပါက မေးခွန်း (၃၇) သို့ကျော်ပါ။) (၁) ပြသဖြစ်ပါသည်။ (၂) မပြသဖြစ်ပါ။	|_|_|
၃၇။	မပြသဖြစ်ပါက ဘာကြောင့်လဲ ပြောပြပါ။ ______________________________	|_|_|
(စ)	**အခက်အခဲများ**	
၃၈။	ဤဌာနတွင် နေ့စောင့်ရှောက်ကုသမှုလာရောက်ခံယူရန် အခက်အခဲများရှိပါသလား။(ဥပမာ-ငွေရေးကြေးရေးအခက်အခဲ၊သွားရေးလာရေးအခက်အခဲ၊လူမှုရေးအခက်အခဲ)(အကယ်၍အဖြေ(၂)ဖြစ်ပါက မေးခွန်း(၃၉) သို့ကျော်ပါ။) (၁) ရှိပါသည်။ (၂) မရှိပါ။	|_|_|

၃၉။	ရှိခဲ့ပါက သင်၏အခက်အခဲများကိုပြောပြပေးပါ။	
၄၀။	ဤဌာနတွင်နေ့စောင့်ရောက်ကုသမှုလာရောက်ခံယူစဉ်အတွင်းအဆင်မပြေမှု တစ်စုံတစ်ရာရှိခဲ့ပါသလား။(အကယ်၍အဖြေ(၂)ဖြစ်ပါကမေးခွန်း(၄၁)သို ကျော်ပါ။) (၁) ရှိခဲ့ပါသည်။ (၂) မရှိခဲ့ပါ။	|_|_|
၄၁။	ရှိခဲ့ပါက သင်၏အဆင်မပြေမှု အတွေ့အကြုံများကိုပြောပြပေးပါ။	
၄၂။	ယခင်ကဆေးရုံတက်ဖူးပါသလား။(အကယ်၍အဖြေ(၂)ဖြစ်ပါကမေးခွန်း(၄၄) သို့ ကျော်ပါ။) (၁) တက်ဖူးပါသည်။ (၂) မတက်ဖူးပါ။	|_|_|
၄၃။	နေ့စောင့်ရောက်ကုသမှုခံယူခြင်းနှင့်ဆေးရုံတက်၍ကုသခြင်းအပေါ် ကွာခြားချက်ရှိပါသလား။ (၁) ရှိပါသည်။ (၂) မရှိပါ။	|_|_|
၄၄။	ကွာခြားချက်ရှိပါက ကွာခြားချက်များကိုပြောပြပေးပါ။	
၄၅။	ဆေးရုံ၏ဝန်ဆောင်မှုနှင့်ပတ်သက်၍ ဘယ်လိုသဘောထားပါသလဲ။ (၁) သဘောကျပါသည်။ (၂) သဘောမကျပါ။	|_|_|

Questionnaires Form

No	Questions	Code
(A)	Socio-demographic Characteristics	
1.	Age (in completed year)----------------	|_|_|
2.	Sex (1) Male (2) Female	|_|_|
3.	Religion (1) Buddhist (2) Christian (3) Islam (4) Hindu (5) Others(specify)-----	|_|_|
4.	Marital Status (1) Single (2) Married (3) Divorced/ Separated (4) Widow	|_|_|
5.	Residence (1) State /Region _ _ _ _ _ (2) Township _ _ _ _ _ (3) Urban /Rural	|_|_| |_|_| |_|_|
6.	Educational level (completed school) (1) Illiterate (2) Only read & write (3) Primary school (4) Middle school (5) High school (6) University (7) Graduate	|_|_|
7.	Occupation (1) Dependent (2) Retired (3) Employee (4) Self-employee (5) Others(specify)_ _ _ _ _	|_|_|
(B)	Clinical factors	
8.	Type of illness --------------------	
9.	Duration of disease---------------months	
10.	Duration of consultation----------months	
11.	No. of visits/year	
12.	Improvement of health after giving treatment (1) Yes (2) No	|_|_|

(C)	**Convenient of Service and Pleasant Surrounding amenities**	score
13.	Waiting area cleanliness present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
14.	Waiting space adequacy present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
15.	Waiting chairs adequacy present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
16.	Toilet cleanliness present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
17.	Is there good ventilation in waiting area? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
18.	Is there adequate lighting in waiting area? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
19.	Are there adequate dust bins in waiting area? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1

(D)	**Responsiveness**	score
20.	Doctor's communication good or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
21.	Nurses communication good or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
22.	Workers communication good or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
23.	Having adequate on drug supply (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
24.	Listen carefully for any questions? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
25.	Replying the questions you want to know or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
26.	Any medical explanation about the disease during consultation (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
27.	Giving information and explanation present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1

28.	Waiting time (in minutes) (1) Within 30 minutes (2) Within 30 minutes to one hour (3) Within one hour to one and half hour (4) Above one and half hour	
29.	Receiving prompt service or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
30.	Choice of HCP (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
(E)	Quality of care	score
31.	During examination and treatment, giving privacy (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
32.	HCP had the thorough knowledge and skill about the disease (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
33.	Feeling of effective treatment (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
34.	The situations of patient allow as consideration during treatment (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
35.	Proper appointment system present or not? (1) Strongly agree (2) Agree (3) Disagree (4) Strongly disagree	4 3 2 1
36.	Do you take follow-up treatment regularly?(if 1, go to no.(37)) (1) Yes (2) No	|_|_|
37.	If not, please mention the reasons,-----------------------	

(F)	**Difficulties , challenges**	
38.	Are there any difficulties to receive ambulatory services? (E.g., Financial, Transportation, Social, etc.) (1) Yes (2) No	
39.	What are the difficulties for receiving ambulatory services?	
40.	Is there any inconvenience during the course of ambulatory services in this department? (1) Yes (2) No	
41.	If yes, can you share your inconvenience?	
42.	Do you have any experience of hospital admission before? (1) Yes (2) No	
43.	Are there any difference between receiving ambulatory service and admission? (1) Yes (2) No	
44.	Please give your opinion about the difference between receiving ambulatory service and admission?	
45.	How do you feel overall service of the ambulatory day care at Rheumatology department? (1) Good perception (2) Poor perception	

ANNEX (4) Guideline for Key Informant Interviews (KII) (Myanmar and English)

ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများအတွက် Key Informant Interview မေးခွန်းလွှာပုံစံ

ဖြေဆိုသည့်ပုဂ္ဂိုလ် -

ရက်စွဲ -

မိတ်ဆက်စကားပြောရန်

ကျွန်မသည် ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ်တွင် ဆေးရုံအုပ်ချုပ်မှုနှင့် ကျန်းမာရေး စီမံခန့်ခွဲမှုပညာဘွဲ့လွန်သင်တန်း တက်ရောက်နေသောသင်တန်းသူဖြစ်ပါသည်။ တက်ရောက်နေသောဘွဲ့လွန်သင်တန်းနှင့်ပတ်သက်ပြီး ခုတင်(၅၀၀)ဆံ့အထူးကုဆေးရုံကြီး၊ ရန်ကုန်မြို့၏ အရိုးအကြောအဆစ်ဆေးကုဌာန၏နေ့စောင့်ရှောက်ကုသမှုအပေါ် လူနာများ၏အသုံးပြုခြင်း နှင့်သဘောထားခံယူချက်များ၊ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများ၏သဘောထား ခံယူချက် များကိုလေ့လာခြင်းသုတေသနရှိ အရိုးအကြောအဆစ်ဆေးကုဌာန၌ နေ့စောင့်ရှောက်မှု (Ambulatory care service) လာရောက်အသုံးပြုလျက်ရှိသော လူနာများ၏ခံယူချက်များနှင့် ပတ်သက်ပြီးစာတမ်းပြုစုမှာဖြစ်ပါတယ်။

( )မှ ဖြေကြားပေးသော အဖြေများနှင့်အကြံဉာဏ်များမှာ အလွန်အသုံးဝင်မှာ ဖြစ်ပါတယ်။စိတ်ထဲရှိတဲ့အတိုင်း သိထားတဲ့အတိုင်း ထင်မြင်ချက်များကို လွတ်လပ်စွာ ဆွေးနွေးပေးစေလိုပါတယ်။ ဆွေးနွေးချက်များကိုအသံသွင်းခွင့်ပြုပါ။ ကျွန်မတို့မကြားလိုက်တဲ့လွတ်သွားတဲ့ အကြောင်းအရာတွေကို ပြန်ဖွင့်ပြီးနားထောင်ချင်လို့ ဖြစ်ပါတယ်။ အခု ဆွေးနွေးချက်များကို စာတမ်းပြုစုမယ့်ကိစ္စတွေမှာပဲ အသုံးပြုမှာဖြစ်ပါတယ်။

၁။ ဖြေဆိုသူ၏အကြောင်းအရာ

- အသက်
- ကျား/ မ
- ရာထူး
- စုစုပေါင်းလုပ်သက်
- ဤဆေးရုံတွင် ယနေ့ထိတာဝန်ထမ်းဆောင်လျက်ရှိသောစုစုပေါင်းလုပ်သက်

၂။ နေ့စောင့်ရှောက်မှုနှင့်ပတ်သက်ပြီး အခက်အခဲများ၊ စိန်ခေါ်မှုများ

- ဒီဌာနရဲ့ နေ့စောင့်ရှောက်မှု ပေးခြင်းနှင့်ပတ်သက်ပြီး အခက်အခဲများ၊ စိန်ခေါ်မှုများကို သိပါရစေ

(Probe - နေ့စောင့်ရှောက်မှုပေးနိုင်သည့် အချိန်၊ နေ့ရက်များ၊

- ကုသမှု ဝန်ဆောင်မှု အမျိုးအစားများ၊
- ရက်ချိန်းစနစ်၊ ကုသမှုပေးနေသည့် နေရာအနေအထား၊
- ကုတင်လုံလောက်မှု ရှိ၊ မရှိ
- ဝန်ထမ်းအင်အားလုံလောက်မှု ရှိ၊ မရှိ
- လူနာများနှင့် ဝန်ထမ်းများအချင်းချင်း ဆက်ဆံရေး အနေအထား
- အခြားအခက်အခဲများ)

- ဌာနတွင် နေ့ကုသစောင့်ရှောက်မှုအတွက် အသုံးပြုနေသည့် စက်ပစ္စည်းကိရိယာများ၊ ဆေးဝါးများနှင့် ပတ်သက်ပြီး ပြောပြပေးပါ။

(Probe - ဆေးဝါးများလုံလောက်မှု ရှိ၊ မရှိ

- စက်ပစ္စည်းကိရိယာများ လုံလောက်မှုရှိ၊ မရှိ
- စက်ပစ္စည်းကိရိယာများ ထိန်းသိမ်းနိုင်မှု အခြေအနေ
- အခြားအခက်အခဲများ)

၃။ အကြံဉာဏ်ပြုချက်များ

- နေ့စောင့်ရှောက်ကုသမှုပေးခြင်းအပေါ် ဘယ်လိုမြင်ပါသလဲ။ အကြံဉာဏ်လေးများ သိပါရစေ။

(Probe - ဒီထက်ပိုမိုကောင်းမွန်အောင် ဘာတွေလုပ်ဆောင်သင့်ပါသလဲ။)

အခုလိုအချိန်ပေးပြီးဖြေကြားပေးတဲ့အတွက် ကျေးဇူးတင်ပါတယ်။

Guideline for Key Informant Interviews (KII)

For Health Care Provider and Hospital Administrator

Respondent Person -

Date -

Introduction

I am postgraduate candidate of University of Public Health, Yangon. I have to prepare a research paper of "Utilization and perception on ambulatory care services of Rheumatology department in YSH" for the degree of Master of Medical Science in Hospital Administration and Health Management. The facts in this interview will be used for policy and planning of hospitals including this hospital. Your suggestion will be very useful for us. Thank you for your time. You can give your suggestion freely without any control. Can I use your suggestion in my thesis? And also allow me to take record of your voice suggestion to listen for the facts that I can miss to hear.

1. **Background Information**
   - Age (completed in years)
   - Gender
   - Designation/Position
   - Years of total service
   - Years of service in Yangon Specialty Hospital

2. **Challenges**
   - May I know about challenges regarding ambulatory services that are giving currently in your department?

     (Probe - Schedule of ambulatory care service
     - Types of services
     - Appointment system
     - Service area
     - Bed status
     - Manpower shortage
     - Interpersonal Relationship
     - Others difficulties)

- Please give your opinion about equipment and drug supply in your department?

  (Probe - adequacy and availability of medications
  - Drug supply
  - Equipment and machines adequacy
  - Maintenance
  - Other difficulties)

3. Suggestion

- Please give your opinion on currently providing ambulatory care services in your department?

  (Probe - ways to improve)

Thank you.

ANNEX (5) Guideline for In-depth Interviews (IDI) (Myanmar and English)

ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများအတွက် **In-depth interview** မေးခွန်းလွှာပုံစံ

ဖြေဆိုသည့်ပုဂ္ဂိုလ် -

ရက်စွဲ -

မိတ်ဆက်စကားပြောရန်

ကျွန်မသည် ပြည်သူ့ကျန်းမာရေးတက္ကသိုလ်တွင် ဆေးရုံအုပ်ချုပ်မှုနှင့် ကျန်းမာရေးစီမံခန့်ခွဲမှုပညာဘွဲ့လွန်သင်တန်းတက်ရောက်နေသောသင်တန်းသူဖြစ်ပါသည်။ တက်ရောက်နေသောဘွဲ့လွန်သင်တန်းနှင့်ပတ်သက်ပြီး ခုတင်(၅၀၀)ဆံ့အထူးကုဆေးရုံကြီး၊ ရန်ကုန်မြို့၏ အရိုးအကြောအဆစ်ဆေးကုဌာန၏ နေ့စောင့်ရှောက်ကုသမှုအပေါ် လူနာများ၏အသုံးပြုခြင်းနှင့်သဘောထားခံယူချက်များ၊ကျန်းမာရေးစောင့်ရှောက်မှုပေးသူများ၏သဘောထားခံယူချက်များကိုလေ့လာခြင်းသုတေသနရှိ အရိုးအကြောအဆစ်ဆေးကုဌာန၌ နေ့စောင့်ရှောက်မှု (Ambulatory care service) လာရောက်အသုံးပြုလျက်ရှိသော လူနာများ၏ခံယူချက်များနှင့်ပတ်သက်ပြီးစာတမ်းပြုစုမှာဖြစ်ပါတယ်။

( )မှ ဖြေကြားပေးသော အဖြေများနှင့်အကြံဥာဏ်များမှာ အလွန်အသုံးဝင်မှာဖြစ်ပါတယ်။စိတ်ထဲရှိတဲ့အတိုင်းသိထားတဲ့အတိုင်းထင်မြင်ချက်များကိုလွတ်လပ်စွာ ဆွေးနွေးပေးစေလိုပါတယ်။ ဆွေးနွေးချက်များကိုအသံသွင်းခွင့်ပြုပါ။ ကျွန်မတို့မကြားလိုက်တဲ့လွတ်သွားတဲ့အကြောင်းအရာတွေကိုပြန်ဖွင့်ပြီးနားထောင်ချင်လို့ဖြစ်ပါတယ်။

အခုဆွေးနွေးချက်များ ကို စာတမ်းပြုစုမယ့်ကိစ္စတွေမှာပဲ အသုံးပြုမှာဖြစ်ပါတယ်။

၁။ သင့်အနေဖြင့်ဆေးရုံ၏ ဝန်ဆောင်မှုများနှင့် ပတ်သက်၍ စိတ်ကျေနပ်မှုရှိပါက မည်သည့် အပိုင်းကို စိတ်ကျေနပ်မှု အရှိဆုံးလဲ။ စိတ်ကျေနပ်မှုမရှိပါက မည်သည့် အပိုင်းကို စိတ်ကျေနပ်မှု မရှိဆုံးလဲ။

၂။ နေ့စောင့်ရှောက်မှုနှင့်ပတ်သက်ပြီး အခက်အခဲများ၊ စိန်ခေါ်မှုများ

- ဒီဌာနရဲ့ နေ့စောင့်ရှောက်မှု ပေးခြင်းနှင့်ပတ်သက်ပြီး အခက်အခဲများ၊ စိန်ခေါ်မှုများကို သိပါရစေ

(Probe - နေ့စောင့်ရှောက်မှုပေးနိုင်သည့် အချိန်၊ နေ့ရက်များ၊

- ရက်ချိန်းစနစ်၊ ကုသမှုပေးနေသည့် နေရာအနေအထား၊
- ကုတင်လုံလောက်မှု ရှိ၊ မရှိ
- ဝန်ထမ်းအင်အားလုံလောက်မှု ရှိ၊ မရှိ

- လူနာများနှင့် ဝန်ထမ်းများအချင်းချင်း ဆက်ဆံရေး အနေအထား
- အခြားအခက်အခဲများ)

- ဌာနတွင် နေ့ကုသစောင့်ရှောက်မှုအတွက် အသုံးပြုနေသည့် စက်ပစ္စည်းကိရိယာများ၊ ဆေးဝါးများနှင့် ပတ်သက်ပြီး ပြောပြပေးပါ။

 (Probe - ဆေးဝါးများလုံလောက်မှု ရှိ၊ မရှိ
 - စက်ပစ္စည်းကိရိယာများ လုံလောက်မှုရှိ၊ မရှိ
 - စက်ပစ္စည်းကိရိယာများ ထိန်းသိမ်းနိုင်မှု အခြေအနေ
 - အခြားအခက်အခဲများ)

၃။ အကြံဉာဏ်ပြုချက်များ

- နေ့စောင့်ရှောက်ကုသမှုပေးခြင်းအပေါ် ဘယ်လိုမြင်ပါသလဲ။ အကြံဉာဏ်လေးများ သိပါရစေ။

(Probe - ဒီထက်ပိုမိုကောင်းမွန်အောင် ဘာတွေလုပ်ဆောင်သင့်ပါသလဲ။)

အခုလိုအချိန်ပေးပြီးဖြေကြားပေးတဲ့အတွက် ကျေးဇူးတင်ပါတယ်။

Guideline for In-depth Interviews (IDI)

Respondent Person -

Date -

Introduction

I am postgraduate candidate of University of Public Health, Yangon. I have to prepare a research paper of "Utilization and perception on ambulatory care services of Rheumatology department in YSH" for the degree of Master of Medical Science in Hospital Administration and Health Management. The facts in this interview will be used for policy and planning of hospitals including this hospital. Your suggestion will be very useful for us. Thank you for your time. You can give your suggestion freely without any control. Can I use your suggestion in my thesis? And also allow me to take record of your voice suggestion to listen for the facts that I can miss to hear.

1. Which factor/s causing your satisfaction or dissatisfaction. Please mention.
2. Challenges

- May I know about challenges regarding ambulatory services that are giving currently in your department?

  (Probe - Schedule of ambulatory care service, Types of services
  - Appointment system, Service area
  - Bed status, Manpower shortage
  - Interpersonal Relationship
  - Others difficulties

- Please give your opinion about equipment and drug supply in your department?

  (Probe - adequacy and availability of medications
  - Drug supply
  - Equipment and machines adequacy
  - Other difficulties

Suggestion

- Please give your opinion on currently providing ambulatory care services in your department?

  (Probe - ways to improve)

Thank you

ANNEX (6) Gantt chart

Month	**August**				**September**				**October**				**November**				**December**			
Week	**1**	**2**	**3**	**4**	**1**	**2**	**3**	**4**	**1**	**2**	**3**	**4**	**1**	**2**	**3**	**4**	**1**	**2**	**3**	**4**
Protocol preparation																				
Protocol defend																				
Pilot study – Preparation for data collection																				
Data collection																				
Data entry and analysis																				
Preparation for Grand Presentation																				
Thesis preparation																				
Submission of Thesis (Draft)																				
Thesis defend																				
Correction and Submission of thesis																				

Annex (7) Curriculum Vitae

Name	Dr Su Hlaing Htwe
Gender	Female
Date of birth	2.4.1985
Race	Bamar
Religion	Buddhist
Permanent address	No.9, U Shwe Soe Street, Kyimyindine, Yangon
Phone Number	09795787326
E mail address	suhlainghtwe41@gmail.com
Academic qualification	1. Dip.Med.Sc (Hospital Administration), (2016), University of Public Health, Yangon 2. M.B, B.S (2008), University of Medicine 1, Yangon
Employment history	1. Assistant Director, Civil service affair division, Department of Medical services (10.4.2019 to date) 2. Medical officer, (1000) bedded Naypyitaw General Hospital (2.7.2016 to 8.4.2019) 3. Medical officer, Lanmadaw township, Department of Health (5.4.2014 to 4.1.2016) 4. Medical officer, Civil service affair division, Department of Medical services (1.3.2013 to 4.4.2014) 5. Assistant surgeon, Yangon General Hospital (16.6.2009 to 28.2.2013)
Publication	-