UNIVERSITY OF CAPE COAST

EXPERIENCES OF PATIENTS LIVING WITH INdwELLING URETHRAL
CATHETER IN AJUMAKO ENYAN ESSIAM DISTRICT OF THE CENTRAL
REGION OF GHANA.

BY

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Thesis submitted to the School of Nursing and Midwifery, of the College of Health and Allied Sciences, University of Cape Coast, in partial fulfillment of the requirement for the award of Master’s Degree in Nursing.

JULY 2018
DECLARATION

Candidate’s Declaration

I hereby declare that this thesis is the result of my own original research and that no part of it has been presented for another degree in this university or elsewhere.

Candidates Signature ……………………………….. Date …………………

Name: Ahwireng Stephen Opare,

Supervisors’ Declaration

I hereby declare that the preparation of the thesis was supervised in accordance with the guidelines on supervision of thesis laid down by the University of Cape Coast.

Principal Supervisor’s Signature……………………….. Date………………

Name: Dr Jerry Paul Ninnoni

Co- supervisor’s Signature……………………………..

Date………………

Name: Professor Akwasi kumi-kyereme.
ABSTRACT

This study described the lived experiences of patients living with indwelling urethral catheter in Ajumako Enyan Essiam District of the Central Region of Ghana. The specific objectives were: to explore patients’ experiences related to living with indwelling urethral catheter on patients’ lives; explore the challenges faced by patients who use indwelling urethral catheter; investigate coping strategies utilized by patient’s living with indwelling urethral catheter. A qualitative, phenomenological design was used for the study. Purposive sampling technique was utilized in selecting the participants for the study. Data were collected using semi-structured face to face interviews of ten (10) patients at the emergency unit and at patient’s homes. The interviews were tape recorded with permission from the participants, transcribed verbatim, and analyzed following Colaizzi’s (1978) strategy of descriptive phenomenological data analysis. The analysis revealed both positive and negative experiences which were categorized into Six (6) themes namely: physical impact; psychological impact; social impact; financial impact; coping strategies; information seeking behaviours. Based on findings from this study the researcher is of the view that, nurses should make it a point to counsel patients’ properly, most especially on sexual and emotional needs and also should always make available all needed information (written or verbal) about the catheter to patients as this will help alleviate patients’ frustration and also enable patients to cope with the indwelling urethral catheter.
KEY WORDS

Experiences
Indwelling catheter
Urethral catheter
Catheterization
Coping strategies
Catheter associated urinary tract infections (CA-UTI)
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Finally, I wish to thank my family and friends for their prayers and support, especially my parents, siblings, my wife Gladys Mends and my son, Sean Nkunim Opare-Ahwireng.
DEDICATION

To nurses working at the Emergency Department of Ajumako District Hospital and the participants who took part in this study.
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<td>BC</td>
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CHAPTER ONE
INTRODUCTION

Background to the Study

The Urinary catheter as a medical device dates back to 3000 BC (Abdel-Halim, 1990). However, the first balloon-inflated device was used in the 1920s, while the closed drainage system type mainly used these days was developed in the 1950s (Dailly, 2011). The catheter is a slender hollow, flexible tube, made in varying lengths, bores and shapes, and manufactured from either latex or silicone (Lewis, Heitkemper, & Dirksen, 1996; Madigan, 2003).

Urinary catheterization comes in two folds, the intermittent and indwelling catheterization (Dougherty & Lister, 2008). Indwelling catheters are subdivided into two types, Suprapubic and urethral catheterization (European Association of Urology Nurses (EAUN), 2005).

The Indwelling urethral catheter which is the focus of this study has a plethora of functions; as stent, as drainage tube and for diagnostic purposes in the operating room (Rothrock 2003; Smeltzer, Bare, Hinkle, & Cheever, 2010). Though both catheters (intermittent and indwelling) are used to drain the bladder, indwelling catheters are mainly for used in patients with diseases like benign prostate hyperplasia (B.P.H), injury to the spinal cord, urethral strictures, multiple sclerosis, acute or chronic urinary retention, neurogenic bladder dysfunction, and the delivery of medication directly into the bladder (Smeltzer et al., 2010; Turner & Dickens, 2011).
The insertion of the catheter is a sterile procedure and is carried out by either Registered Nurses, Advanced Nurse Practitioners or Doctors. This is done to ensure infections are not introduced into the urinary bladder (Crow, Munhall & Chapman, 1998; Turner et al., 2011; White, Brinson & Glentworth, 2013).

Prinjah and Chapple (2013) reported that about 450,000 people are living with indwelling urinary catheter in the UK and are facing varied challenges. Dellimore, Helyer and Franklin (2013) also posit that over 4 million patients undergo urinary catheterization in the United States and more than 30 million urinary catheters are inserted annually. Documented statistics concerning Africa is however unknown.

Although the use of the indwelling urinary catheter has many physiological and social functions, living with the catheter presents numerous challenges that must be addressed on daily bases. Some of the challenges include: physical problems; such as recurrent urinary tract infections, blockages and leakages and also impaired body image and sexuality (Stickler & Feneley, 2010; Waugh, 2010; Wilde, McDonald, Brasch, McMahon, & Fairbanks, 2013).

Urinary Tract Infection (UTI) is the most frequent of the challenges linked to the urinary catheter (Souza Neto, Oliveira, Kobaz, Silva, Lima, & Maciel, 2008), hence strategies to prevent catheter associated urinary tract infection (CA-UTI) have been emphasized in many countries and hospitals. The current guideline for prevention of CA-UTI recommends the need to minimize duration for catheterization and maintain sterile technique for insertion and keep closed
drainage system (Gould, Umscheid, Agarwal, Kuntz, Pegues, & Healthcare Infection Control Practices Advisory Committee (HICPAC, 2010).

Accordingly, each physician should insert catheters only for appropriate indications and leave in place only as long as needed (Lo, Nicolle, Coffin, Gould, Maragakis, Meddings & Yokoe, 2014).

These challenges linked to the indwelling urethral catheters (IUC) are associated with considerable morbidity, prolonged hospitalization, and increased health care expenditure (Talaat, Hafez, Saied, Elfeky, El-Shoubary and Pimentel (2010).

Undocumented observation by the researcher among patients living with indwelling urethral catheters suggest that patients on indwelling catheters always agitate for the removal of the catheter though the disease condition necessitating the use of the catheter persists. Considering everyday problems, they go through as a result of the disability, the researcher was intrigued to investigate further the experiences of persons living with indwelling urethral catheters.

**Statement of the Problem**

Several studies have been conducted on the experiences of people living with indwelling urinary catheter but most of these researches are either from the UK, (Dailly, 2011; Prinjha & Chapple, 2013; Turner, 2011) or USA (Wilde, 2002; Wilde et al. 2013). Although there is literature on indwelling catheterization in Africa and Ghana, most of the literature concentrated on catheter related Urinary Tract Infections (Adjei & Opoku, 2004; Dougnon et al. 2016; Taiwo, &

Quality of life and prevalence of depressive symptoms among patients on prolonged indwelling urinary catheters (Abiola, et al. 2016) while others focused on the reasons for the prolonged use of indwelling urethral catheters in men (Bello et al., 2013).

However, limited studies focused on patient’s experiences regarding the use of indwelling urinary catheter in particular, and the psychosocial impact of the catheter. Akum (2005) carried out a similar study, her study was limited to the experiences of individuals with Spinal Cord Injury (SCI) who used an indwelling catheter to manage neurogenic bladder dysfunction.

This study however seeks to look at experiences of persons with varied medical conditions such as benign prostate hyperplasia (BPH), urethral strictures, multiple sclerosis, acute or chronic urinary retention, bladder cancer and neurogenic bladder dysfunction using indwelling urethral catheters.

Secondly, WHO (1948) defined Health as a “state of complete physical, mental and social well-being and not merely the absence of disease or infirmity”. Per this definition, patient care should be holistic encompassing the physical, the mental and the social aspect of man but this is usually not the case in the various health facilities in the country. It is for this reason, persons living with IUC were given the opportunity to tell their stories on how they experience living with an indwelling urethral catheter. It is hoped that this study will identify their needs and concerns because personal stories can help health care workers to identify
appropriate interventions for the individual patient to improve quality of life. Patients’ experiences from this study will be categorized into psychological, social and physical experiences.

**Objectives of the Study**

The general objective of the study was to examine the experiences of patients living with indwelling urinary catheters in the Ajumako district. The specific objectives are:

i) explore patients’ experiences related to living with indwelling urethral catheter.

ii) explore the challenges faced by patients who use indwelling urethral catheter.

iii) investigate coping strategies utilized by patient’s living with indwelling urethral catheter.

**Research Questions**

i) What impact has indwelling catheters had on the lives of users?

ii) What are the challenges faced by patients living with indwelling urinary catheter?

iii) What coping strategies do patients living with indwelling urethral catheter utilize in their daily living?
Significance of the Study

The significance of this study can be demonstrated from different perspectives. First of all, findings from this study will not only add up to existing knowledge on indwelling urinary catheter but also inform practicing nurses to care for patients with indwelling urinary catheter in a holistic manner, as against the concentration on only the physical needs of the patients with indwelling urinary catheters.

Furthermore, the findings of the study could influence policy or lead to the creation of a policy where clinical psychologists or counselors will be actively involved in the day to day care for persons living with indwelling urinary catheters.

Lastly, the findings will provide health care providers the opportunity to understand in-depth individuals’ experiences, and through this understanding, develop better bladder management programmes that will go a long way to improve the quality of life of patients living with indwelling urinary catheter in Ghana.

Delimitation

The findings from this study may not be generalized as respondents were from Ajumako Enyan Essiam district only.

Limitations

The main limitation to this study relates to financial and time constraints. Adequate funds and time were not available to utilize a large sample size for the study. Secondly, a longitudinal design would have been more effective to
understand how people cope with chronic illnesses or situation such as living with an indwelling urethral catheter.

**Operational definition of Terms**

i) Acute Urine Retention (AUR): It is the sudden inability to pass urine. It is usually painful and requires emergency treatment with a urinary catheter.

ii) Chronic Urine Retention (CUR): It is a painless retention associated with significant amounts of post-void residual urine.

iii) Benign Prostate hyperplasia (BPH): It refers to the non-cancerous enlargement of the prostate gland.

iv) Catheter Associated Urinary Tract Infections (CA-UTI): It refers to urinary tract infections that occur due to the use of a urinary catheter.

v) Multiple Sclerosis (MS): It is a demyelinating disease in which the insulating cover of nerve cells in the brain and spinal cord are damaged, disrupting the ability of parts of the nervous system to communicate.

**Organization of the Study**

The study is divided into five chapters. Chapter One and Chapter Two addressed the conceptual approaches relevant to the study. It also comprised the review of related literature around the topic under investigation and a summary of major findings of the literature review. Chapter Three addressed the research methodology which includes research design, population, sample and sampling
procedure, instrument, data collection procedure and data analysis. Chapter Four looked at the results obtained from the study and discussed them within the context of the literature reviewed. Chapter Five focused on the summary of the study, conclusions and recommendations.
CHAPTER TWO

LITERATURE REVIEW

Introduction

A review of the literature was undertaken through a search of databases that included CINAHL, MEDLINE, HINARI, EBSCO host and Google scholar. Key words used in literature search included: Lived experience, experience with long term urinary catheter, quality of life and indwelling urinary catheters, urinary catheterization and urinary function disorder. The review was presented under the following headings: overview of urinary catheterization, living with indwelling catheter, problems and challenges associated with indwelling urinary catheters, quality of life of persons living with indwelling catheters, management of indwelling urinary catheters, and the adaptation model in relation to coping strategies of living with indwelling catheters. The chapter ends with a summary and a conclusion.

Overview of the Urinary Catheter and Catheterization

The urinary catheter comes in a wide range of sizes (10 - 24 Fr) and lengths (23-26cm, 30 cm and 40-45 cm) which are chosen for a patient based on factors such as gender, age, and clinical application (Dellimore, Helyer & Franklin, 2013; Rothrock, 2003).

The urinary catheters are in sizes and designated according to the French scale (Dellimore, Helyer & Franklin, 2013; Feneley, Ian, Hopley & Wells, 2015). Each French unit equals 0.33mm and this represents the internal diameter of the catheter (Lewis et al., 1996). In men, size 16F to 24F are the common sizes used,
14F to 18F are mainly used in women while the 10F to 12F are used for children (Lewis et al., 1996).

Urinary catheters are also made from different biomaterials (soft or hard rubber, gum, elastic, glass, rubberized silk; silver and other metals; some are radio opaque) and often have their surfaces coated to enhance their biocompatibility, functionality (friction reduction) and resistance to bacterial infection (Feneley, Ian, Hopley & Wells, 2015).

Amongst the most widely used biomaterials are latex, nylon, percuflex, polyethylene, polyvinylchloride, polyurethane, silicone, silver and stainless steel (Dellimore, Helyer & Franklin, 2013; Feneley, Ian, Hopley & Wells, 2015).

The commonly used urinary catheters include; simple urethral catheter, much room or de Pezzar (can be used for suprapubic catheterization), winged tip or malecot catheter, indwelling with Coude’ tip or Tiemann and the three-way indwelling (the third lumen is used for irrigation of the bladder) (Dellimore et al., 2013; Feneley et al., 2015). Indwelling catheters have self-retaining balloons to keep the catheter in place (Lewis et al., 1996).

**Types of Urinary Catheterization**

Urinary catheterization comes in two folds; the intermittent and indwelling catheterization (Dougherty & Lister, 2008).

Intermittent catheterization is the insertion of a catheter into the bladder via the urethra to drain urine. The catheter is removed immediately after the bladder is emptied of its content (Geng, Cobussen-Boekhorst, Farrell, Gea-Sanchez, Pearce, Schwennesen, Vahr, & Vandewinkel, 2012).
Intermittent catheterization is inserted for patients or persons who are undergoing surgery, patients with acute urine retention and in patient with a brief urinary urgency dysfunction. Available clinical evidence suggests that intermittent catheterization is the first therapeutic choice before considering the use of an indwelling catheter and is central to reduce morbidity related to renal failure and neurogenic bladder dysfunction (Cobussen-Boekhorst, Beekman, Wijlick, Schaafstra, Kuppevelt, & Heesakkers, 2016).

Indwelling catheters involve more invasive placement either through the abdominal wall (suprapubic indwelling) or through the urethra (urethral indwelling) and has a constant in and out flow leaving a static bladder (Dougherty & Lister, 2008; Elpern, Killeen, & Ketchem, 2009; Rothrock, 2003).

The indwelling catheters derives its name from the fact that it is left in the urinary bladder to drain urine for (6weeks to 3months or more) pending surgery or a definitive treatment for patient’s urinary dysfunction. The urinary catheter is secured in the urinary bladder by inflating the integral balloon with water following insertion (European Association of Urology Nurses (EAUN), 2005). The prolonged period (6weeks to 3months or more) of catheter usage does not necessarily mean patients will use the single catheter for life he or she is mandated to go for periodic catheter changes usually on monthly basis (Turner, 2011).

Catheter-associated urinary tract infections (CA-UTI) are the most common complication of all catheterization (Hooton et al., 2010). The daily increase in UTI risk when using an indwelling catheter is approximately 5% and
there is a 3-10% daily bacteriuria incidence. Intermittent catheters are reported to reduce the risk of infections as compared to indwelling catheters and as an example a 20% reduction is reported after just short-term post-operative use (Hakvoort, Nieuwkerk, Burger, Emanuel, & Roovers, 2011).

Recent research suggests that infection rates correlate with an occurrence of multidrug-resistant bacteria and that multidrug-resistant bacteria is more common among users of indwelling catheterization than intermittent catheterization (Kang, Lee, Lee, Hwang, & Han, 2015).

Guidelines in the literature identifies intermittent catheterization as the first and preferred choice when possible, both for short and long-term bladder management, and it is recommended to completely avoid or minimize use and duration of indwelling catheters (Gould et al., 2010; Tse, King, Dowling, English, Gray, Millard, & Thavaseelan, 2016). The safety of suprapubic placement of an indwelling catheter is debated but recently it has been concluded that it is not superior to the urethral route and should only be considered for short-term use when intermittent catheterization is not an option (Kuo et al., 2014).

Urological complications related to bladder management method have been studied by several authors and intermittent catheterization have been found to reduce risk of upper urinary tract deterioration, enable faster return to normal voiding, shorten hospital stay after surgery, and to improve the possibility of renal recovery (Dixon, Dolan, Brown, & Hilton, 2010). It furthermore reduces the risk of bladder stones with approximately 20 times compared with indwelling catheter use (Bartel, Krebs, Wöllner, Göcking, & Pannek, 2014). In addition, intermittent
catheterization, when practiced on demand only, appears to be best practice for bladder management in more general areas, such as women in labour with epidural and management of post-operative urinary retention (Woodward, 2015). It might also be one of the solutions to the problem with indwelling catheter misuse. Inappropriate use of indwelling catheters has been reported to lie somewhere between 24-62% (Murphy, Prieto, & Fader, 2015).

**Experiences of People Living with an Indwelling Urinary Catheter**

In a phenomenological study by Wilde (2002) on the experiences of adults living with urinary catheter to unearth the perspective of patients about catheters, the study involved fourteen participants who had been living with an indwelling catheter from 6 months to 18 years, 9 females and 5 males aged between (35 -95 years) and they were all of European descent. Participants were aware of the flow of urine through their catheters. Respondents also said they were also aware when emptying of the catheter was needed and when urine flow seem sluggish. Furthermore, the respondents mentioned they were embarrassed at the lack of control of the noise from the urine bag coupled with the fact that lack of control related with urine flow made them to express their vulnerability. A major limitation of this study is that, it does not unearth findings on the socio-economic experiences of patients living with indwelling catheters.

A hermeneutic phenomenological study carried out by Wilde (2003) to describe and interpret the lived experience of people living with long term urinary catheter with particular emphasis on the meaning and practical knowledge of living with a long term urinary catheter found that participants were comfortable
living with the catheter because the urinary catheter enabled them to urinate freely as against the inconvenience of the urinary incontinence they had to endure in their everyday life (Wilde, 2003). Participants of the study although happily living with the IUC said, the presence of the device served as a constant reminder of their condition and disability, due to the presence of the urinary catheter needs, such as monthly catheter changes, emptying the urine bags, and changes associated with sex, hence the need to treat medical problems related to the underlying disease or injury (Wilde, 2003). Again the findings of Wilde did not reflect the psycho-social experiences of persons living with an indwelling urinary catheter. The study only unearthed how patients have adopted to living with the device hence the need for a study to bring the missing psycho-social experience to light.

A qualitative study by Kralik, Seymour, Eastwood and Koch (2007) used an exploratory descriptive design to identify respondent’s perspectives of living in the community with permanent indwelling urinary catheter. A group of 21 patients (male and female) aged between 24 to 82 years who had permanent indwelling urinary catheters (either urethral or supra pubic) were interviewed and relevant statements were classified into categories. The most prominent finding was that participants wanted more information on urinary catheter self-care practices as this allowed them to take control of their daily life. The study data also revealed seven interconnected themes as patients have learned to self-manage: (i) resisting the intrusion of the catheter, (ii) reckoning with the need for signs of problems, (iii) being vigilant for signs of problems, (iv) reconciling life,
(vi) managing self-care, and (vii) taking control (kralik et al., 2007). Concluding on the topic, Kralik et al. (2007) said promoting self-care of catheter is not just about educating or providing relevant information to patient on their condition, but it involves a learning process, observing responses to every day activity, such as signs of infection, urine flow into urine bag and blockages in urine flow. The identification of these themes provides information for further research and findings will serve as a resource for the nurse to direct the focus of nursing assessments on these resources as well as their problems and needs. Once again, the study by Kralik et al. (2007) failed to fill the gap on the psycho-social experience of the patients living with indwelling urinary catheter (IUC). Although the study brought to light the need for education of patient on the indwelling catheter, there is therefore the need for a study to fill the gap on experiences of patients living with IUC.

An exploratory study by Godfrey (2008) on the experiences of older adults living with long term urinary catheter guided by a grounded theory approach and making use of in-depth interview identified ‘all about acceptance’ as major theme. Characterizing ‘all about acceptance’ was either an experience of being ‘at ease’ or ‘uneasy’. A feeling of at ease meant that, patient had accepted living with the IUC and have also found ways to cope with the challenges associated with the urinary catheter. A feeling of Uneasy meant on the other hand meant that patients are troubled and frustrated with the challenges associated with the catheter. Godfrey (2008) concluded that, ‘trying to understand’, ‘judging catheter performance’ and ‘being aware of physical manifestations’ shaped the older
person’s relationship with their catheter and this was mediated by the quality of their interaction with others. ‘Engaging actively’ made it more likely for the older person to be ‘at ease’ whilst enduring ‘downbeat sentiments’ facilitated an ‘uneasy’ acceptance of life with an indwelling catheter.

Research by Prinjha and Chapple (2013) guided by the philosophical foundations of phenomenology (interpretive approach) involving thirty-six (36) respondents who were aged between 22-96 years found living with an indwelling urinary catheter to be beneficial but also associated with complications.

Major experiences and concerns expressed by users of the device included; a lack of information from health professionals on technical aspects of the catheter; preventing catheter-related physical problems; promoting self-care and self-management; self-image and social life with a catheter in place (Prinjha et al., 2013). The respondents added that they believe the information from health care professionals can help them (patients) to accept and manage their own catheter. Again, the participants expressed their disdain at the silence of health care workers on sexual issues as it was a big issue to a majority of them and hence the topic should not be relegated to the background as most of them wanted more information from health professionals on the subject during consultation. Prinjha et al., 2013).

To conclude, participants were of the view that though the urinary catheter is of immense benefit to them they admonished health care providers and stakeholders to undertake more researches in this area so as to unearth a new
catheter design that would reduce complications and promote independence (Prinjha et al., 2013).

An area the research by Prinjha et al. (2013) did not touch on was the cultural impact experiences of participants as it indicated respondents were from diverse cultural background.

The inability to have sexual intercourse was the overarching theme found in review of literature by Bostock (2008) on the sexual health and living with a urinary catheter. This theme was expressed mostly by male patients living with indwelling urinary catheter. Despite acknowledging a responsibility to address the issue of sexual intercourse, nurses, do not discuss sexual issues with patients (Bostock, 2008). The issue of sexual intercourse not addressed properly by nurses is shared by Prinjha and Chapple (2013). Furthermore, Bostock indicated that nurses engage a number of behaviours and defense mechanisms to avoid an open discussion on sexual issues which is a major concern to male patients living with catheters. To conclude, Bostock (2008) indicated that nurses needs to be more empathetic to genuinely relate in a meaningful way with their patients on sensitive issues such as sex. He also added it is important that nurses acknowledge all the issues of the day-to-day management of urinary catheters and fully equip patients with information and education to manage the urinary catheter most especially on issues pertaining to intimacy and sexuality.

Quality of life among catheter users with various medical conditions is a topic of great concern but James, Fransure, and Mahajan (2014) posit that there is scarce data available to determine the device’s impact on its users. Borch, Baron,
Davey, Hattala, Kiernan and Rust (2011) said some patients did choose indwelling catheters over surgery where they thought the device will improve their quality life. This revelation is also shared by Bradway, Miller, Heivly, and Fleisher (2010).

A study conducted by James et al. (2014) involving 14268 patients with Multiple Sclerosis living with indwelling catheter found that, of the 14268 participants, 304 respondents representing (25.35%) reported that the catheter impacted negatively on their life, whilst 629 respondents’ representing (52.4%) said the catheter had a positive impact on their life. On the contrary, studies by Cravens and Zweig (2000) and Abiola et al. (2012) reported that the catheter had a negative impact on user’s life. There is however a need for research on the impact of the catheter on the quality of life of the users as the studies found on the topic leaves readers in a dilemma.

**Challenges associated with the Urinary Catheter**

Urinary tract infections, catheter blockages, urinary bladder stones and catheter encrustation are some of the problems associated with prolong use of the urinary catheter (Getiliffe, 1994; Turner, 2011). To find a lasting solution to the incessant urinary tract infections associated with urinary catheters, Hus, Witts and Jacobson (2012) conducted a study on the efficacy of using vinegar solution to clean the urine bags attached to the catheter on daily basis in an attempt to reduce catheter-associated urinary tract infections (C-AUTI) among patients who have undergone radical prostatectomy as this was a standard practice at the urological unit. The authors concluded that the vinegar had no antimicrobial property and
hence it was not necessary to use it as a cleaning agent of catheter bag. They rather came across a study that found washing of the catheter bag with a mild bleach efficacious in prevention of catheter bag odor. The discovery led to the scraping of the use of vinegar, while use of good hand hygiene and washing of catheter ends with soap and water was promoted.

In an article by Makic, VonRueden, Rouen and Chadwick (2011) on Evidence-Based Practices as to how to end the recurrent Urinary tract infections among catheter users, Makic et al. (2011) recommended the use of aseptic techniques and sterile equipment during catheterization. Furthermore, they highlighted on the need for nurses to adhere to the use of the closed catheter system and also patients maintaining the drainage bag below the level of the bladder so as to reduce reflux of urine back into the bladder. This view is shared by Mori (2014) who researched into implementing a nurse-driven protocol on catheter usage.

Key findings from a study conducted by Godfrey (2008) on older people’s experience of living with a long term urinary catheter concluded that, the device has numerous challenges (catheter blockages and difficulty travelling long distances) that users had to cope with. The author claimed that there is the need for health care professionals and care providers to shift their attention from catheter performance and its complications to the discussion of life situations and issues like their sex life, and how they have become a burden to their spouses and cares. However, little is known regarding the experiences of persons living with indwelling urethral catheters.
A study by Wilde et al. (2013) on persons living with long-term indwelling urinary catheters revealed pain and its management as a major concern to participants, 23(%) of the respondents encountered this challenge. The respondents added that they felt more pain when fitted with urethral catheters as compared to the suprapubic catheter and hence health care professionals should have sought patient’s preferences before being managed on a long term catheter.

Dougnon et al. (2016) in their study on catheter-associated Urinary Tract Infections among 60 hospitalized patients discovered that, the recurrent Urinary Tract Infections associated with indwelling urethral catheter usage is as a results of the biofilms formed around the catheter. They found 23.33(%) of all catheter related urinary tract infections were caused either by Escherichia coli (63%) and Staphylococcus aureus (21%). Reasons given for this revelation were the fact that, Escherichia coli is an unhygienic bacterium hence its isolation in the urine is as a result of a lack of hygienic practices at the hospital during catheterization.

A descriptive study by Wilde and Carrigan (2003) to identify urine flow and the factors contributing to urinary tract infection in home care clients having urinary catheter involving 24 participants of which 12 were males and 12 females and aged 31 – 102 years revealed that, catheter blockages and low urine output are significantly linked with the occurrence of C-AUTI. The authors posit that out of the 13 respondents who reported with blockages, 6 had urinary tract infection while 7 did not. Based on the findings, Wilde and Carrigan (2003) concluded that health care workers providing services to catheter users should educate patients
on ways of preventing catheter blockages and on copious fluid intake to improve urine output.

To determine if the occurrence of catheter encrustation is a continuum experienced by all catheterized patients or whether patients can be grouped under either “blockers or non-blockers” and also to determine the factors which contributed to recurrent encrustation and blockage, Getiliffe (1994) conducted a longitudinal study among 42 patients with indwelling urinary catheters of which 18 were males aged 27 – 90 years and 24 females aged 58 – 90 years. Getiliffe found 43 % of the blockers were significantly less mobile than non-blockers and more female than male were blockers and the blockage was characterized with high urine PH and ammonium concentration. It was also found that age, medical condition, blood pressure, medication, alcohol consumption, bowel habit or smoking did not correlate with blockers status. Blockers were managed by “crisis care” in response to leakage or retention rather than planned catheterization prior to catheter blockage. Most of the blockers experienced early warning symptoms impending blockage. Getiliffe (1994) concluded that the blockage was not related to fluid intake hence a need for research in this area.

A longitudinal study conducted by Stickler and Feneley (2010) on the encrustation and blockages of Foley catheters found strong evidence that Proteus mirabilis infection is the main cause of encrustation and recurrent blockages in the urinary catheter. The authors recommended the immediate commencement of Antibiotic therapy by doctors or by an appropriate healthcare provider as soon as this was detected is made. They were quick to add that Antibiotic therapy is
palliative in patients with a history of chronic blockage and kidney stones, but recommended highly a regime of citrated drinks for such patients until kidney stone removal could take place (Stickler & Feneley, 2010).

A reviewed of literature on leakages associated with urinary catheter usage by Theriault, Ward-Smith and Soper (2012) revealed two main dimensions of catheter leakages as: (a) Leakage accompanied with bladder spasms where occlusion of the catheter lumen or the drainage tubing has not been identified, and (b) Leakage associated to occlusion of the catheter lumen or the drainage tubing. The authors added that, one cause of catheter leakage is due to the design of the catheter, specifically catheter tip kinking, and proposed a design modification to prevent this kinking occluding the flow of urine. Finally, the authors stressed the need for healthcare professionals to understand the mechanisms inside the bladder that result in leakage, in order to bring about clinical research to improve catheter design and quality of life of patients.

The major reason given by Lawrence, Fisher and Chan (2009) in their study to understand the reasons for over frequent catheter change (over frequent referring to a more frequent change than that recommended in the Australian and New Zealand Urological Nurses Society Inc. 2006 Guidelines), was fluid loss from the in-situ anchoring catheter balloon. To support this claim empirically, the authors measured at intervals of 6 and 12 weekly changes, and found the quantity of water removed from the anchor balloon, clearly demonstrating relative osmotic loss over time; however, the conclusion was that there was evidence for the
potential to extend time between routine changes of long term indwelling urethral and suprapubic catheters.

An article by Dailly (2011) on the prevention of indwelling catheter-associated urinary tract infections among hospitalized patients reported that, urinary tract infection is a major challenge of the urinary catheter that users will have to deal with each passing day. She added that literature reviewed revealed that approximately 20 per cent of all healthcare-associated infections are urinary tract infections, with an estimated 80 per cent of those linked to urethral catheters. Another bother revealed was the irony over whose decision it was to remove the catheter – the doctor or the nurse despite the effect of this device on patients’ health. This lack of clarity on the indication for insertion or removal of catheters was reiterated in a study of catheters in end-of-life care by Foxley (2011). Dailly (2011) in her concluding statement advocated for changing catheter drainage bags every 5-7 days, and recommended the use of monitoring forms to ensure adherence to best practice guidelines such as: Essential Steps to Safe, Clean Care: Reducing Healthcare-Associated Infections.

A study by Jakobsson and Hallberg (2000) to investigate the experiences of micturition problems, indwelling urinary catheter and sexual life consequences in 25 men with prostate cancer and utilizing hermeneutic phenomenological approach, (as cited by Akum, 2005) found that a major problem of catheter users is social withdrawal. The authors added that persons living with urinary catheters isolate themselves in order not to be seen with the catheter. The authors concluded
that this challenge needs to be addressed as a solution has not been found to curtail it.

A study conducted in the UK by Prinjha and Chapple (2013) on people living with an indwelling urinary catheter revealed both merits and demerits. Patients indicated that, the catheter helped them to engage in social activities and also go to work. Despite relief associated with the catheter, the device posed some health challenges such as recurrent Urinary Tract Infections (UTI), blockages, leakages and bladder spasms which they had to endure periodically. Also, the study revealed that users of the catheter had low self-image and were also constantly embarrassed by the leakages and the stench of urine that accompanied the use of the device. Furthermore, it also showed that the catheter users felt that a little more education and information on catheter care and its functions from health care providers may assists them from the use of the catheter.

A qualitative study on urinary catheter claimed that, adults living with urinary catheters felt like living with forces of flowing water, meaning that the constant awareness of the flow of urine into the attached urine bag was like water let loose from a dam (Wilde, 2002). The participants reported that, they depended heavily on the functioning of the catheter and the urine bag to be continent. They were constantly anxious about the failure of the catheter to function properly whenever they leave their houses. The lack of control of urine flow was also a bother to them as this sometimes resulted in wetting of their clothes.

Another study of patients on urinary catheters among 165 participants in a tertiary hospital in South Western Nigeria by Abiola, et al. (2016) noted that there
is a high incidence of depressive symptoms among catheter users hence the need for health professionals not only to concentrate on the physical needs of patients whenever they interact with patients, but they should also focus on the mental and psychological needs of patients.

In a research study on the topic “Good Practices in Healthcare” concerning Urethral Catheterization found the process of catheterization to be an invasive procedure that can cause embarrassment and psychological discomfort and can affect patients’ self-image. The study concluded that nurses should acknowledge that, for some patients, there may be psychological and psychosexual obstacles that needs to be overcome, hence need assessment should always be done whenever patients come to the hospital for a catheter change (EAUN, 2005).

An exploratory study on the lived experiences of patients with long term urinary catheter conducted by Akum (2005) indicates that a loss of dignity, hindrances to daily activity and the device considered as a killer were other feelings expressed by the participants. These findings however reflect the findings by Wilde et al. (2013) on pain and loss of self-image.

A study by Logan and Shaw (2012) to explore patients with spinal injuries who required intermittent self-catheterization (ISC) involving 11 men and 4 women, aged 24–68 years, found that most men became distress and anxious when first informed that they were required to self-catheterize in the long term. The authors also found that patients worried about the stigma associated with carrying out ISC and therefore were particularly concerned about disposing of
catheters in other people’s homes or public toilets. Concluding on the topic, the authors mentioned that despite some concerns and anxieties about performing ISC, expert teaching and good nursing support can help allays patients fears and subsequently enable patients to develop coping strategies and integrate it into their daily lives. The findings by Logan et al., (2012) is similar to findings by Wilde et al., (2002) who found that the feeling of frustration was a major psychological problem for persons living with indwelling urinary catheter.

**Coping Strategies adopted by People Living with Indwelling Urethral Catheter.**

Illness, especially chronic illnesses and some prolonged treatment regimen posed substantial challenges to efficacious coping because chronic illness brings stress on an already vulnerable individual (Heijmans, Rijken, Foets, de Ridder, Schreurs, & Bensing, 2004). Heijmans et al. (2004), added that the demands of illness compounded by the cumulative effects of stress imposed severe limitations on a sufferer’s ability to self-regulate to manage stress. Though the urinary catheter itself is not a disease but a treatment regimen for several chronic illnesses, its usage is purported to be linked with psychological and cognitive stress that needs to be given immediate attention Abiola, et al. (2016). It is therefore very useful to understand what coping is and the strategies that persons with chronic illnesses and undertaking long term treatments utilize in their daily life based on the assertion by (Abiola, et al., 2016).

Coping is the process through which the individual manages his or her person-environment interaction which is already appraised as stressful and the
emotions generated according to this relationship. Coping strategies can be emotion-focused (such as avoidance, distancing self, wishful thinking, seeking emotional support) or Problem-focused (such as learning new skills and finding options for satisfying with life) (Folkman, Chesney, Pollack & Phillips, 1992; Lazarus & Folkman, 1984).

Folkman and Moskowitz (2004) also defined coping as the process of managing external and/or internal demands that tax or exceed the resources of the person. The authors added that coping is complex and a multidimensional process that is sensitive to both the environment and the personality of the individual.

Juvakka and Kylma (2009) and Wu, Chin, Haase and Chen (2009) indicated that coping strategies can take the form of strategies for concealing signs such as getting hair cut or shaving, wearing caps, strategies for instilling hope such as belief in recovery, belief in God, and willingness to fight the disease and strategies for gaining social support which is characterized by seeking support from parents, relatives, friends.

Beitz and Zuzelo (2003) using phenomenology as method investigated the lived experiences of people with constructed neo-bladder and living with an indwelling catheter, (as cited by Akum, 2005) concluded that having a positive thought and engaging in regular exercise enabled participants of the study to cope with the urinary catheter.

A comprehensive literature review by John, Wallis, Griffith, and Mackenzie (2010) on the daily-living management of urinary incontinence found containing, restricting, concealing, and modifying strategies as major urine
incontinence management approaches. On containing Strategies, John et al., said they refer to personalized acts and actions taken when the patients suddenly develop either incontinence or has a retention and is fitted with an intermittent catheter either awaiting surgery, or a concrete decision from the Physician as to what path of treatment to be taken. The most utilized Containment strategy used by some patients were wearing absorbent pads over the catheter in case of leakages and in unforeseen urinary incontinence especially with those using intermittent catheters.

Major restricting Strategies found were, patients avoided activities and situations that brought about complications. Activities includes: limit of travel to places and routes that lacked toiletries, restrain from lifting heavy loads and objects, avoid standing for long hours, restriction of intimate relationship and sexual intercourse and going out less.

John et al. (2010) posit that concealing strategies were aimed at hiding or preventing people from becoming aware of their predicaments. The strategies include paths and actions taken by users of the device. Some of the strategies included withholding information about them from close family though some did tell close family relations and frequent toileting routines to conceal odours from the device.

The modifying strategies were actions, paths and behavioural changes that enabled users of the device to as it were ‘feel normal’ and lead their daily lives. Major modifying strategies identified includes: sexual practices, use of absorbent pads as routine, clothing, use of medications, toileting routines and the adoption
of ways users of the device deems it fit. The authors added that an understanding of these strategies by health personnel will enable them provide care that is appropriate and beneficial to clients.

A phenomenological study to understand the lived experiences of people who had had construction of an ileoanal reservoir by Beitz (as cited by Akum, 2005) identified self-help support groups to be important. The participants added that their interactions with others who were living with similar condition, the sharing of knowledge, mutual acceptance and moral support that was available from persons who had had this experience before enabled them to cope very well with the catheter.

Beitz and Zuzelo (2003) using phenomenology as method investigated the lived experiences of people with constructed neo-bladder and living with an indwelling catheter, (as cited by Akum, 2005) concluded that having a positive thought and engaging in regular exercise enabled participants of the study to cope with the urinary catheter. Beitz et al., said this positive finding needs to be adopted by all manner of patients living with chronic illnesses.

Godfrey (2008) says living with an indwelling urinary catheter is a subject that has not been dealt with to the core. Godfrey (2008) suggests there is the need for research in this area as there is paucity on how patients cope with the urinary catheter.
Conceptual Framework

Roy's Adaptation Model (RAM) (1999) was used as a for this study. Major components of RAM which is illustrated in figure 1 include: input (stimuli and adaptation level); control processes (coping mechanisms and regulator cognator); effectors (physiological function, self-concept, role function and interdependence); output (adaptive and ineffective response) and feedback.

Roy described a human being as an adaptive system who acts in unity for a purpose with interdependent parts. The human adaptive system is in constant interaction with his environment both physical and social. Stimuli are identified as that which provoke responses (Roy & Andrews 1999). Roy defined “Adaptation” as a process involving the holistic functioning of the person using his potential to affect health positively (Roy, 1988). Roy also referred to adaptation as an act or response, as well as "a process of coping with stressors" (Roy & Roberts, 1981).

Roy’s definition of the environment consists of internal and external stimuli (Factors). External stimuli represent those factors outside the person, while Internal stimuli is the environmental influences created within the self (Fitzpatrick & Whall, 1996). A human's behaviour or outcome is the result of input stimuli and the adaptation level of the individual. The behaviour may be adaptive or ineffective. The responses then act as a feedback or more input allowing the system to decide whether to increase or decrease efforts to cope with the stimuli (Roy & Andrews 1999). RAM indicates that ways in which man adapts are labeled as "adaptive modes". RAM categorized stimuli into three distinct classes namely: focal, contextual and residual. Focal stimuli are those
internal and external stimuli most immediately confronting the human system. Contextual stimuli are other stimuli present which can contribute to the effect of the focal stimuli. Residual stimuli may be the nonspecific stimuli that influence the person’s response to the focal stimulus such as attitudes, beliefs, experiences and expectation (Roy & Andrews, 1999).

The adaptation level is subdivided into three possible conditions of the life processes of the human adaptive system; (a) integrated, (b) compensatory, and (c) compromised. Integrated adaptation levels include structures and functions that work to meet human needs. Compensatory adaptation levels occur when regulator and cognator processes are activated by a challenge to the integrated processes. Compromised adaptation levels occur when both integrated and compensatory processes are inadequate (Roy & Andrews, 1999).

**Regulator processes**

Roy and Andrews (1999) defined Regulator processes as those coping channels that respond automatically to internal and external stimuli. These are the endocrine, neural and chemical channels. Regulator processes in this study would include physiological and psychological reactions that the person experiences when making decisions on the use of indwelling urethral catheter for his entire life. Examples would include an increase in heart rate, tension, and anxiety.

**Cognator processes**

Cognator processes respond through four cognitive-emotive channels: (a) perceptive and information processing, (b) learning, (c) judgment, and (d) emotion (Roy & Andrews, 1999). Behavioural responses that results from
cognator processes include selective attention, memory, developing insight, problem solving and decision making. In this study, cognator coping processes are related to the learning and information processing of men living with indwelling urethral catheter, decision making on periods or intervals on when catheter should be changed, and the expressed emotions associated with these processes.

The responses or behaviours’ of the adaptive system, or person, to the environment are observed via four adaptive modes identified by Roy and Andrews (1999). The four adaptive modes are (a) the physiological-physical mode, (b) role function mode, (c) self-concept-group-identity mode and (d) the interdependence mode. The physiological physical mode includes behaviours of the body and has nine components: five basic needs (oxygenation, nutrition, elimination, activity, and rest) and four complex processes, which are the (a) senses, (b) fluid and electrolyte, and acid-base balances, (c) neurological function and (d) endocrine function. The self-concept-group identity mode pertains into spiritual integrity, body image, self-ideal and personal self. The role function mode pertains to expectations one places on oneself in society and expectations one has for others with different roles.

The interdependence mode focuses on relationships and the need for relational integrity. Roy's model of adaptation identifies two sub areas of self-concept: the physical self and the personal self. Body sensation and body image comprise the physical self and include physical attributes, functioning, health
state, sexuality, and appearance. Personal self-include personal thoughts and ideas of oneself, and beliefs and values one has in relation to the universe.

The use of the indwelling catheter results in life style changes that affects all four modes of adaptation. Physiological changes compromise the physiological mode of adaptation by affecting the electrolyte, fluid, and acid balance. Common physical symptoms include catheter leakages and blockages. There are also alterations of daily life and this affect the role function mode and interdependence mode of adaptation. Jobs may be lost, finances change dramatically and emotional reactions result in mood changes. Roy and Andrews (1999) note that grieving is one of the compensatory processes for the self-concept mode. Patients with indwelling urethral catheters experiences many losses such as the ability to urinate through his own urethra, loss of self, loss of relationships (intimate), and loss of interpersonal relationships. If the client cannot adapt to these incoming stimuli, energies will be directed at compromised processes such as low morale and depression.

RAM provides a framework for explaining adjustment to illness and to life stressors which in this study is the use of the indwelling urethral catheter. The use of the urethral catheter for the first time presents an individual (patient) with multiple stimuli to which he/she must respond to.

The focal stimuli in this situation is the use of an indwelling urethral catheter for the first time. The contextual stimuli presented to the patient is the routine urethral catheter change at the health facility. The residual stimuli presented to the individual living with an indwelling urethral catheter is the
anxiety, discomforts and interference with life task that becomes part of the individual’s life till a permanent solution is found and the catheter removed entirely.

Living with an indwelling urethral catheter for the first time presents significantly different stressors to the individual which can potentiate maladaptive responses. RAM indicates that, if not all, the self-concept mode, which involves appearance, background abilities, and feelings will definitely be affected in an individual who happens to live with the urethral catheter for the first time hence there is the need for the individual to adjust to changes in social and physical relationships and feelings brought on by the use of the urethral catheter.

A residual stimulus among persons living with urethral catheters is how they will feel about their self-concept or the thought and perceptions they will have about themselves and the catheter as well. RAM indicates that the way the individual will feel will be reflected in his/her psychological well-being.

Nurses caring for patients with indwelling urethral catheters need to have knowledge of these losses and changes experienced by these people so that they can device interventions that not only cater for their physical needs but interventions that will help promote successful behavioural responses of the client as he adjusts to the demands of the use of the indwelling catheter. Modifications can be made as behaviour of the client changes to promote successful adaptation.
Summary of Literature Review

Studies on urinary catheter prevalence, patients’ experiences with the IUC, challenges with the IUC and coping strategies of persons living with indwelling urinary catheter have been reviewed in this literature. Studies on prevalence of urinary catheter included Gammack (2003) and Prinhja and Chapple (2013). Both authors posit that persons living with IUC are increasing by the years, hence there is the need for them to be given some form of attention.

Studies such as; Getiliffe (1994), Wilde and Carrigan (2003) Lawrence, Fisher and Chan (2009), Stickler and Feneley, (2010), Theriault, Ward-Smith and Soper (2012) reviewed on the challenges person encounter while living with the IUC identified numerous challenges and modifications of life patients with indwelling urinary catheters undergo in their daily lives. Losses, both physical and psychological; limitations; and feelings of dependency were the dominant
themes found in the reviewed literature. Feelings of hope declared were eclipsed by the tremendous aggregates of deleterious uncertainties and adjustments facing the patient with a urinary catheter.

Notable studies that explored the experiences of persons living with IUC included; Wilde (2002), Wilde (2003), Akum (2005), kralik, et al. (2007), Godfrey (2008), Dailly (2011) and Wilde (2013) did not really provide sufficient information about how people lived with the catheter, especially on the psychosocial, economic and cultural dimensions of life.

Again, for the studies that sought to understand patients’ perspectives and experiences of living with an IUC utilized a qualitative approach and employed methods such as interviews and questionnaires for data collection.
CHAPTER THREE
RESEARCH METHODS

Introduction

This chapter described the research design, study setting, population, sampling technique, instruments, and procedures that will be used to address the research objectives for this study. The purpose of this chapter is to provide methodological processes that will be employed in conducting the study.

Study Design

A phenomenological design was used in this qualitative study. Phenomenology is the study of one's world as experienced from the first person's viewpoint (Munhall, 1994). The phenomenon in this study was the lived experiences of patients living with indwelling urethral catheter in Ajumako Enyan Essiam district of the Central Region of Ghana.

Qualitative research is an approach usually associated with the social constructivist paradigm which emphasizes the socially constructed nature of reality. It is about recording, analyzing and attempting to uncover the deeper meaning and significance of human behaviour and experience, including beliefs, behaviours and emotions and not in obtaining information which can be generalized to other larger groups (Neumann & Robson, 2004).

Furthermore, unlike the quantitative approach, the qualitative approach focuses on hypothesis generation rather than hypothesis testing (Maudsley, 2011). Nevertheless, they clearly identify a problem or topic that they want to explore
and may be guided by a theoretical lens - a kind of overarching theory which provides a framework for their investigation (Malterud, 2001).

Qualitative data is collected in textual form on the basis of observation and interaction with the participants e.g. through participant observation, in-depth interviews and focus groups. This research approach often involves a smaller number of participants as it is not aimed at generalization (Robson, 2002). Creswell (2007) posits that it is appropriate to use the qualitative research approach when a “problem or issue needs to be explored”.

Moustakas (1994) explains that phenomenology is applicable to human science research as: Phenomenology is concerned with wholeness, with examining entities from many sides, angles, and perspectives until a unified vision of the essence of phenomenon or experience is achieved. He also added that, Phenomenology seeks meanings from appearances and arrives at essences through intuition and reflection of conscious acts of experience, leading to ideas, concepts, judgments, and understandings.

Edmund Husserl (1859-1938) is the primary founder of phenomenology (Giorgi, 2005). He identifies the word intentionality as a major factor of phenomenology, a concept he embraced during his study with Franz Brentano (Beyer, 2011). Husserl defined Intentionality as a relationship between the external world and mental phenomena or psychological acts. That act is directed at an object; the "intentional object."

According to Husserl, phenomenology studies consciousness without reducing the objective meanings that contribute to experience to subjective
meanings. Husserl also proposes practicing phenomenology by "bracketing" the question of the existence of the natural world around us. Bracketing, putting aside one’s own thoughts and beliefs then will assist us to focus on the structure of experience. The researcher will ensure that prior experiences and observations made through interaction with men living with indwelling urethral catheter would be set aside to prevent any form of interference with the structure of experiences.

Husserl’s transcendental (descriptive) phenomenology is intended to study intentional acts or experiences which are representational, through linguistic manifestations. The linguistic manifestations create a relationship between a specific experience and other experiences and also note characteristics (descriptions) of the experience (Breyer, 2011).

Heidegger modified the work of Husserl and introduced some assumptions that may yield meaningful inquiry. Heidegger’s ideas include the interpretive or hermeneutic research tradition. Hermeneutics comprises not only description of the major concepts and essences but also looking for meanings embedded in common life practices. These meanings are not obscure, so it can be extracted from the narratives generated by people (Lopez & Willis, 2004; Wojnar & Swanson, 2007). Heidegger believed that the relationship between an individual and his or her world should be the focus of phenomenological inquiry.

The phenomenological approach is appropriate, as the problem is one in which, “it is important to understand several individuals’ common or shared experiences of the phenomenon” (Creswell, 2007). Secondly, the approach is
appropriate as the study’s aim was to understand the experiences of the individual within their “Life world” (Polit & Hungler, 1999).

**Study Area**

Ajumako Enyan Essiam District is one of the districts that make up the Central Region of Ghana. It has a population of 138,046 representing 6.3% of the region’s total population. Males constitute 46.7% and females represent 53.3%. Over 68.1% of the population live in the rural localities, while 42.0% of the population are in their youthful ages. The district has a growth rate of 2.5% and over 90% of the population are farmers (Census Report, 2010). It is made up of six major towns namely, Ajumako, Bisease, Mando, Enyan Abaasa, Eyan Denkyira and Baa which are surrounded by small villages and hamlets. The District shares boarders to the north with Asikuma Odoben Brakwa District, Northwest with Assin south to the East with Gomoa west, to the South-West with Mfantsiman and to the South with Ekumfi Essakyir District. It has just one hospital supported by six major health centres in the five communities mentioned above and a few clinics.

The district was purposely selected for the study because, a review of the 2014, 2015 and 2016 hospital annual reports indicated a significant upsurge in the number of patients who for various reasons (most especially acute and chronic urine retention) had to use an indwelling urethral catheter.
Study Population

The target population for this study were patients living with indwelling urethral catheters in Ajumako Enyan Essiam District of the Central Region of Ghana.

Sample and Sampling Procedure

Purposive sampling technique was used to recruit respondents for the study. Bernard (2002) defined purposive sampling as the deliberate choice of a participant due to the qualities the participant possesses. Patton (2002) added that the purposive sampling strategy helps the researcher to choose information-rich cases for the most effective use of limited resources. Saturation was reached after ten (10) interviews.

Eligibility Criteria

Inclusion criteria:

i) Men and women using indwelling urethral catheters

ii) Persons residing in Ajumako District.

iii) Persons who consented to participate in the study.

Exclusion criteria:

i) Persons who were unable to give informed consent.

ii) People with catheters aged less than 18 years.

iii) People who considered themselves too unwell to take part, or were considered too unwell to take part by the researcher.
Data Collection Instruments

Semi-structured face to face interviews were used to collect data. A semi-structured interview is a verbal interchange where one person that is the interviewer elicits information from another person by asking questions (Clifford, French, & Valentine, 2010). The semi-structured interview is one of three major categories of interviews identified by Babbie (2007), which Lambert and Loiselle (2007) purports are mainly used as research strategies to gather information about participants’ experiences, views and beliefs concerning a specific research question or phenomenon of interest.

Although the interviewer prepares a list of predetermined questions, semi-structured interviews unfold in a conversational manner offering participants the chance to explore issues they feel are important (Clifford et al., 2010). The semi-structured face to face interview method was chosen for this study over the structured and unstructured interviews purported by Babbie (2007) because it is flexible, it allows the interviewer to pursue a series of less structured questioning and collect in-depth information, it also permits the exploration of spontaneous issues raised by the interviewee to be explored. (Alvarez & Urla, 2002; Berg, 2009; Drever, 1995). Furthermore, the semi-structured interview method seems to provide more useful data when the sample size is relatively small and also allows thematic analysis of the qualitative data (Alvarez et al., 2002).

The instrument for this study was in two sections namely; the demographic section and an interview session which was self-prepared with support from the research supervisor. The interviews were conducted using an
interview schedule framed to address the research objectives. Follow up questions were asked when clarification was needed.

A pre-test of the interview schedule was conducted at Saltpond Government hospital where three (3) patients living with IUC were interviewed and recorded in order to address any problems and omissions in the interview guide. The pre-testing unearthed omissions such as; route of urinary catheterization and indication for the use of the IUC were corrected.

**Data Collection Procedure**

Participants from which data was collected were selected through purposive sampling technique. The researcher visited the emergency unit where patients living with IUC come to periodically have their catheters changed. Patients were exposed to the research to be undertaken by the researcher after the researcher was introduced to the patients by the ward in-charge.

Participants were assured of confidentiality of information given. An ephemeral questionnaire was read to each participant to collect demographic data such as; age, gender, employment status and marital status. The interview session commenced immediately after completion of the questionnaires. Majority of the interview session was done in “Fante” and participants were given a number code (1, 2, 3, 4, 5, etc.) during the interview session which also appears on the transcripts and file notes. Eight (8) interviews were done at the hospitals premises except for two (2) which were done at patient’s residence. Data was collected from 7th September to 5th October 2017. Each interview begun with the question “How long have you been living with the urinary catheter?” Beginning the
interview with this question assisted in establishing rapport and gaining the trust of participants. For most part, the interview protocol was followed closely. However, there were instances where additional questions were asked for clarification as they arose to gain more insight into the phenomenon under investigation. Saturation was achieved with 10 interviews, each lasting between 25 to 35 minutes. The Interviews were audiotaped and recordings were transcribed verbatim by researcher. Participants were allowed to tell their own stories with least interruption during the interview session. Transcribed interviews were stored in electronic folders that were created were labeled for easy identification. The data was stored on a pen drive and kept under lock and key.

**Data Analysis**

Qualitative data analysis consists of identifying, coding, and categorizing patterns or themes found in the data (Woods, 2011). Data analysis was guided by Colaizzi’s (1978) thematic method of data analysis. Thematic analysis in phenomenology strives to reveal the “structures of experience” (van Manen, 1997). Steps in Colaizzi’s thematic data analysis method included the following:

i) Each transcript should be read and re-read in order to obtain a general sense about the whole content.

ii) For each transcript, significant statements that pertained to the phenomenon under study should be extracted. These statements must be record on a separate sheet noting their pages and lines numbers.
iii) Meanings should be formulated from these significant statements.

iv) The formulated meanings should be sorted into categories, clusters of themes, and themes.

v) The findings of the study should be integrated into an exhaustive description of the phenomenon under study.

vi) The fundamental structure of the phenomenon should be described.

vii) Lastly, validation of the findings should be sought from the research participants to compare the researcher's descriptive results with their experiences.

---

Figure 2. Colaizzi's approach for phenomenological data analysis. Source: Shosha, (2010).
The following steps consistent with Colaizzi’s approach were followed:

**Step one**

Each transcript was read many times to gain a sense of the whole content and context. Thoughts, feelings, and ideas that arose during this stage were added to the bracketing diary (Please refer to appendix C). This helped to explore the phenomenon as experienced by participants themselves.

**Step two**

In this step of the analysis, significant phrases and statements relevant to living with indwelling urinary catheters were extracted from each transcript. These statements were written on separate sheets and coded based on their "transcript, page, and line numbers". One hundred and eighty-five significant statements were extracted from the transcripts. Table (1) provides examples from the significant statements which were identified and extracted from patients' data.

**Table 1: Examples of Significant Statement**

<table>
<thead>
<tr>
<th>Significant Statements</th>
<th>Client No.</th>
<th>Page No.</th>
<th>Lines No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>“The insertion of the catheter is very painful though the device helps me to urinate”</td>
<td>3</td>
<td>1</td>
<td>18-20</td>
</tr>
<tr>
<td>“The urinary catheter is a good device, as it has enabled me to urinate ever since wearing it”</td>
<td>5</td>
<td>1</td>
<td>1-2</td>
</tr>
<tr>
<td>“I think this catheter is not a good thing. I have not been myself ever since having this device fitted on me”</td>
<td>6</td>
<td>1</td>
<td>19-21</td>
</tr>
<tr>
<td>“Though the urinary catheter is associated with pain and also has affected my sexual life, but on the whole the device is good, as it helps me to urinate”</td>
<td>8</td>
<td>7</td>
<td>20-24</td>
</tr>
<tr>
<td>“I used to visit my brothers and friends and other places which made me felt better good, but the device hampers my travel these days”</td>
<td>1</td>
<td>3</td>
<td>1-4</td>
</tr>
</tbody>
</table>

Source: Field data, 2017
Step three

Meanings were formulated from the significant statements. Each underlying meaning was coded in one category as they reflect an exhaustive description. One hundred and eighty-five formulated meanings were derived from the 127 significant statements. Afterwards, the statements and their meanings were checked by an expert researcher (the principal and co-supervisor) who found the process to be correct and the meanings were consistent. Table (2) provides examples of how significant statements were converted into formulated meanings.

Table 2: Illustrates the Process of Creating Formulated Meanings from Significant Statements.

<table>
<thead>
<tr>
<th>SIGNIFICANT STATEMENTS</th>
<th>FORMULATED MEANINGS</th>
</tr>
</thead>
<tbody>
<tr>
<td>“The insertion of the catheter is very painful though the device helps me to urinate” (Client 3, page 1, lines 18-20).</td>
<td>Patient has pain concern associated with catheterization.</td>
</tr>
<tr>
<td>“With my first experience, I will say the insertion of the devise is associated with pain though I was given pain medication” (Client 6Page 1, line 10-13).</td>
<td>Pain is a major challenge to patient from the unset of wearing the catheter.</td>
</tr>
<tr>
<td>“Pain is the first thing I encountered with this urinary catheter” (Client 7, page 1, line 23-25).</td>
<td>Patient indicates Pain is a major first with the device.</td>
</tr>
</tbody>
</table>

Source: Field data, 2017

Step four

After reaching an agreement on all formulated meanings, the process of grouping all formulated meanings into categories that reflect distinctive clusters of themes was commenced. Each cluster of theme was coded to include all
formulated meanings related to that group of meanings. After that, groups of clusters of themes that reflect a particular issue were merged together to form a unique theme. Thereafter, the themes were reviewed thoroughly to make sure they fall only in one theme cluster that is distinguished in meaning from other structures as demanded by Colaizzi. Sixteen theme cluster emerged and were grouped later into six themes. The six themes emerging from merging all the cluster of themes were also verified by the research supervisors. Table (3) provides examples of how formulated meanings from the significant statements by participants were grouped into cluster of themes and subsequently to major themes.

**Table (3): Illustrates the Process of Creating theme clusters and major themes out of the Formulated Meanings from Participants.**

<table>
<thead>
<tr>
<th>Examples of Formulated Meanings</th>
<th>Theme Cluster</th>
<th>Emergent Theme</th>
</tr>
</thead>
</table>
| • Client links his inability to work to living with the catheter hence has missed a job opportunity to work as a labourer.  
• Patient feels his waist pains is due to the catheter and this has made him unable to weed on his farm.  
• Patient feels his inability to do any house chores are due to the catheter. | Difficulty performing daily activities | Physical impact of Indwelling catheter. |
| • Client has sexual concerns, which is as a result of the catheter.  
• Patient has sexual issues which is as a result of the catheter.  
• Client is unable to have sexual intercourse.  
• Client finds it difficult to have sex due to the catheter. | Sexual problems | |

Source: Field data, 2017
Step five

At this stage of the analysis, all emergent themes were defined into exhaustive descriptions. After merging all study themes, the whole structure of the phenomenon "experiences of patients living with indwelling urinary catheters" had been extracted. Thereafter, the researcher sought an expert researcher who reviewed the findings in terms of richness and completeness to provide sufficient description and to confirm that the exhaustive description reflects the lived experiences of patients living with indwelling urinary catheter in the Ajumako Enyan Essiam district of Ghana. Step five is illustrated in table four (4).

Table (4) Illustrates the Emergent themes from merging all the theme clusters.

<table>
<thead>
<tr>
<th>Theme one: Physical Impact</th>
<th>Theme two: Psychological impact</th>
</tr>
</thead>
<tbody>
<tr>
<td>Difficulty performing daily activity</td>
<td>Exhibition of frustration and depression.</td>
</tr>
<tr>
<td>Difficulty performing periodic activity</td>
<td>Social isolation and apathy</td>
</tr>
<tr>
<td>Catheter is associated with pain</td>
<td>Fear of stigmatization and discrimination.</td>
</tr>
<tr>
<td>Sexual problems</td>
<td>Positive perception about catheter</td>
</tr>
<tr>
<td></td>
<td>Negative thoughts on the catheter</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Theme three: Social impact</th>
<th>Theme four: Financial Impact</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marital separation and divorce emanating from sexual difficulty.</td>
<td>Clients are unable to work, resulting in financial challenges.</td>
</tr>
<tr>
<td>Family connection</td>
<td>Client have challenges with money due to frequent buying of drugs.</td>
</tr>
<tr>
<td>Hostile nursing attitude toward clients.</td>
<td>Lack of funds due to frequent Referrals</td>
</tr>
<tr>
<td>Nonexistent supportive organizations</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Theme five: Coping strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Patients have become very religious.</td>
</tr>
<tr>
<td>Information seeking behaviours</td>
</tr>
<tr>
<td>Practicing of positive diversional therapy</td>
</tr>
</tbody>
</table>

Source: Field data, 2017
Step six

This step is similar to step five. The difference in this step is that no exhaustive meanings were sought. A reduction of findings was done, where redundant, distorted or overestimated descriptions were eradicated from the overall structure by a thorough reading of the distinct themes that emerged. Colaizzi (1978) indicated that, this step helps the researcher to eliminate some ambiguous findings or themes that weakens the whole description. Some amendments were made after this step, as some themes were renamed to generate conspicuous relationships between clusters of theme and their extracted themes, which also assisted in the elimination of some ambiguous structures that weakened the whole description. Table five (5) illustrates examples of how step six (6) was carried out.
Table (5) Illustrates the process of reducing and eradicating redundant description from the obtained themes.

<table>
<thead>
<tr>
<th>Cluster of themes</th>
<th>Data Reduction</th>
<th>New theme cluster</th>
<th>Final theme</th>
</tr>
</thead>
<tbody>
<tr>
<td>Difficulty performing daily activity</td>
<td></td>
<td>Limitation to daily activities</td>
<td>Physical Impact</td>
</tr>
<tr>
<td>Difficulty performing periodic activity</td>
<td></td>
<td>Pain and discomfort</td>
<td></td>
</tr>
<tr>
<td>Catheter is associated with pain</td>
<td></td>
<td>Sexual challenges</td>
<td></td>
</tr>
<tr>
<td>Sexual problems</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Cluster of themes</strong></td>
<td><strong>Data Reduction</strong></td>
<td><strong>New theme cluster</strong></td>
<td><strong>Final theme</strong></td>
</tr>
<tr>
<td>Exhibition of frustration and depression.</td>
<td></td>
<td>Feeling of frustration</td>
<td>Psychological Impact</td>
</tr>
<tr>
<td>Social isolation and apathy</td>
<td></td>
<td>Exhibition of depressive symptoms</td>
<td></td>
</tr>
<tr>
<td>Fear of stigmatization and discrimination.</td>
<td></td>
<td>Social isolation</td>
<td></td>
</tr>
<tr>
<td>Positive perception about catheter</td>
<td></td>
<td>Fear of stigmatization</td>
<td></td>
</tr>
<tr>
<td>Negative thoughts on the catheter</td>
<td></td>
<td>Ambivalent views about the catheter</td>
<td></td>
</tr>
</tbody>
</table>

Source: Field data, 2017

**Step seven**

This step is meant to validate study findings using "member checking" technique. It was done by returning the research findings to the participants and discussing the results with them. Participants' views on the study results were obtained directly through a one on one discussion at the emergency unit where they come to have their catheters’ change routinely. The purpose of the second interview was to determine if findings uncovered by the researcher is
representative of the experiences of the participants. All participants expressed their satisfaction with the results which entirely reflect their feelings and experiences.

Table (6) Indicate the final Thematic map of the study.

<table>
<thead>
<tr>
<th>Theme one: <strong>Physical Impact</strong></th>
<th>Theme two: <strong>Psychological impact</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Limitation to daily activities</td>
<td>Feeling of frustration</td>
</tr>
<tr>
<td>Pain and discomfort</td>
<td>Exhibition of depressive symptoms</td>
</tr>
<tr>
<td>Sexual challenges</td>
<td>Fear of stigmatization</td>
</tr>
<tr>
<td></td>
<td>Ambivalent views about the catheter</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Theme three: <strong>Social impact</strong></th>
<th>Theme four: <strong>Financial Impact</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Social isolation</td>
<td>Lack of funds due to work challenges</td>
</tr>
<tr>
<td>Marital separation</td>
<td>Patients lack funds due to regular buying of drugs</td>
</tr>
<tr>
<td>Divorce</td>
<td>Patient lack funds due to frequent referrals</td>
</tr>
<tr>
<td>Supportive family members</td>
<td></td>
</tr>
<tr>
<td>Unfriendly nurses</td>
<td></td>
</tr>
<tr>
<td>Lack of supportive organizations</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Theme five: <strong>Information seeking Behaviours</strong></th>
<th>The Six: <strong>Coping strategies</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Reading of books</td>
<td>Religious patients</td>
</tr>
<tr>
<td>Listening to educative radio programmes</td>
<td>Diversional therapy</td>
</tr>
</tbody>
</table>

Source: Field data, 2017

**Ethical Considerations**

The research proposal was submitted to and approved by the University of Cape Coast Institutional Review Board (UCCIRB). Furthermore, the study received approval from both the hospital and the District Assembly where the research was conducted. All principles of research ethics were adhered to. Participants were briefed about the study’s aim and procedures before obtaining their written informed consents. Participants were informed about their rights to
refuse to participate in the study or to leave at any time. Also, participants were informed that their refusal to participate in the study would not be used against them in any form. The confidentiality of participants was enforced and they were assured that the data would be used only for research purposes. The study process did not entail any harmful effects on participants.

**Summary of Chapter**

This chapter described the design of the study, the setting or study area, selection of participants, data collection tool, data collection process and data analysis. Data analysis used Colaizzi’s thematic data analytical approach which focused on the identification of a core variable (themes).
CHAPTER FOUR
RESULTS AND DISCUSSION

Introduction

The first part of this chapter presents demographic results and the second part presents thematic categories that were arrived at after analysis of data.

Demographic Data of Respondents

According to table 7, eight (8) of the participants were male. Seven participants (7) amongst them were using indwelling urethral due Benign prostate hyperplasia (BPH) while the remaining three (3) were living with the IUC due to urethral strictures. Though all participants were living with IUC, two participants recounted they had ever used a supra-pubic catheter before being switched back to the urethral catheter. The age range of the participants was from 43-73 years. Four respondents (4) were between the ages of 51 to 60, whereas 10% were between the ages of 71 to 80. The mean age was 55.8 years while the length of time with the catheter ranged from 14 months to 8 years.

Fifty (50%) of the respondents were fully employed, 20% were employed on part time basis and 20% were retired. Thirteen (13%) of the participants were not educated, 20% attended primary school, 40% attended Junior and 10% Senior Secondary School. Two participants representing (20%) had diploma education whereas 10 % had graduate education. A single diagnosis affecting bladder function was identified for each person and was labelled as ‘primary’. Diagnosis that had a secondary effect on the bladder were labelled ‘secondary’. The primary
diagnosis includes; BPH and urethral stricture, whereas no secondary diagnosis was identified. The demographic data is illustrated in table seven (7).

### Table (7): Results of Demographic Data

<table>
<thead>
<tr>
<th>Variable</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Age (in years)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>40-49</td>
<td>4</td>
<td>40</td>
</tr>
<tr>
<td>50-59</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td>60-69</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td>70-79</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>8</td>
<td>80</td>
</tr>
<tr>
<td>Female</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td><strong>Marital Status</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Single</td>
<td>5</td>
<td>50</td>
</tr>
<tr>
<td>Married</td>
<td>1</td>
<td>10</td>
</tr>
<tr>
<td>Divorced</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td>Separated</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td><strong>Employment Status</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employed full time</td>
<td>5</td>
<td>50</td>
</tr>
<tr>
<td>Employed part time</td>
<td>1</td>
<td>10</td>
</tr>
<tr>
<td>Retired</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td><strong>Educational Status</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Primary</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td>JHS</td>
<td>4</td>
<td>40</td>
</tr>
<tr>
<td>SHS</td>
<td>1</td>
<td>10</td>
</tr>
<tr>
<td>Diploma</td>
<td>2</td>
<td>20</td>
</tr>
<tr>
<td>Graduate</td>
<td>1</td>
<td>10</td>
</tr>
<tr>
<td><strong>Indication for urinary catheterization</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Benign Prostate hyperplasia (BPH)</td>
<td>7</td>
<td>70</td>
</tr>
<tr>
<td>Urethral Stricture</td>
<td>3</td>
<td>30</td>
</tr>
</tbody>
</table>

Source: Field data, 2017
Results after Analysis

The research question for this study was: “What is the lived experience of patients living with indwelling urethral catheter’’? Specific objectives of the study included; (a) explore patients’ experiences related to living with indwelling urethral catheter, (b) explore the challenges faced by patients’ who use indwelling urethral catheter and (c) investigate coping strategies utilized by patients’ living with indwelling urethral catheter. Six (6) themes emerged from the analysis of the individual interviews. The findings provided insight into how the participants in this study defined their experiences living with the indwelling urethral catheter. The themes included: Physical impact; Psychological impact; Social impact; Financial impact; Information seeking behaviours and Coping strategies.

Figure 3: illustrates the dimensions of patients’ experiences in relation to living with the indwelling catheter.
Theme one: Physical impact

The first theme physical impact was manifested through three (3) sub-themes. The theme clusters include; limitation to daily activities, catheter associated discomfort and sexual challenges.

![Physical Impact Diagram]

**Figure 4: Physical impact and its cluster of sub-themes.**

**Limitation to daily activities**

Seven (7) participants stated they felt idle living with the IUC because living with the device hampered them in one way or the other in the performance of some daily normal human activities. They expressed this uselessness as such: 

“I am not able to do anything at home as I feel severe pain for a whole week after having the catheter changed. Hence I stay indoors all day” (Client 1). Another client also stated: “The severe pain I feel in my waist has made me unable to weed and maintain my farm. The land owner is threatening to take the land back if I cannot maintain the farm” (Client 7). Other participants reported that the catheter
has hindered their movement drastically. A participant communicated it as such: "This illness has restricted my movement. I always have to send people on errands that I should have performed myself" (Client 7).

Some participants reported that the catheter hampered them when they had to embark on long journeys. The participants expressed this as such: "Traveling far distance is a problem to me. I have left my farm to my brother to take care of it as it is far from here and I am unable to work too" (Client 9). Another participant said: "I used to visit my brothers, friends and other places which made me felt good, but the device hampers my travel these days" (Client 1). A female participant said: "I am unable to travel long distances as I wouldn’t get a good place to clean up and to conceal the catheter" (Client 10).

**Pain and discomfort**

Feeling of Pain was expressed by all of the participants. They said pain is inexorable when it comes to living with an indwelling urinary catheter. The participants expressed it as such; "The insertion of the catheter is very painful though the device helps me to urinate" (Client 3). One middle-aged gentleman said: "Feeling of lower pelvic and waist pain is my major headache after having the catheter changed" (Client 9). A female patient said: "the pain is dull and piercing and am always scared when the next date of catheter re-change is approaching (Client 6).

**Sexual challenges**

The catheter was considered a hindrance when the need to undertake sexual intercourse arose. This assertion was a major issue among the middle-aged
male participants, though some older male adults also expressed same sentiments. This challenge was expressed as such: “My major worry is my inability to have sexual intercourse with my wife ever since I came to live with the urinary catheter” (Client 9). Another frustrated middle-aged adult said: “I have not been able to have sexual intercourse with my wife ever since I came to live with the catheter” (Client 5). An older adult said: “though I am old, I still have sexual desires, but I am hindered by the indwelling urethral catheter” (Client 7). The female participants and most of the older participants did not express sexual concern.

Theme two: Psychological impact

This theme emanated from patients’ thoughts and perceptions concerning living with the IUC. The theme is made of several sub-themes which includes: Feeling of frustration, Exhibition of depressive symptoms, Stigmatization and Ambivalent perceptions about the IUC.

![Figure 5: Psychological impact and its cluster of sub-themes.](image-url)
Feeling of frustration

Most of the participants expressed some form of frustration ever since they started living with the device. The frustrations were expressed as: “Living with this device is a big problem for me. It is my desire to see the catheter removed” (Client 1). Other participants also expressed it as follows; “I always yearn for the day when the device will be removed. Living with the device is accompanied with several challenges” (Client 2). The participants ascribed their frustrations to the several challenges they had to deal with ever since coming to live with the IUC.

Exhibition of depressive symptoms

This sub-theme resulted from the several depressive statement and comments made by participants during the interview session about living with the urethral catheter. “I was very sad when the catheter was fitted on me, I am still sad, I want it removed” (Client 4). Another patient also said: “I was very bitter when I was told the catheter is the only solution to my illness (AUR). I am not happy at all living with this device” (Client 1). Participants again attributed their depressive state to the complexities associated with living with the urethral catheter.

Stigmatization

Stigmatization was a major issue of concern to participants. Though it mattered not to some, some participants were very afraid of being stigmatized. Others on the other hand encountered some form of stigmatization. They expressed the experiences as follows: “I feel shy when am in the mist of my
friends, as man am living with a urinary catheter, and also think they might laugh at me, hence I stay indoors always” (Client 9). A client retorted: “My friends are not aware am living with an indwelling urinary catheter, as I feel friends are more liable to make fun of me” (Client 3) Clients who encountered stigmatization retorted, “Initially family members did not make fun of me, but they did laugh at me when a quarrel ensued. Some family members also say my predicament is as a result of my bad behaviour” (Client 5). Another client indicated: “Recently, some ladies in my neighborhood made fun of me and called me names because am living with the catheter” (Client 9).

**Ambivalent perception about the catheter**

This sub-theme emerged from several positive and negative statements made by participants after having to live with the catheter for various periods of time. Nine (9) out of the participants shared this ambivalent feeling about the urethral catheter. A respondent said: “I think overall the catheter is good, it helps me to urinate, but also not good. (Client 9). Another client sighed as he mentioned: “I think this catheter is not a good thing. I have not been myself ever since having this device fitted on me, though the device helps me to urinate, I want it taken away” (Client 6). One middle-aged participant said “On the whole, the device is good and bad. It is good because it helps me to urinate, but the catheter is associated too much discomfort” (Client 8).

**Theme three: Social impact**

Theme three emerged from experiences participants encountered in their various interaction with other people either in brief moments or on constant basis.
This theme was manifested through six (6) theme cluster; Social isolation, Marital separation, Divorce, Good family connection, Unfriendly nurses and Nonexistent supportive organizations.

**Figure 6: Social impact and its cluster of sub-themes**

**Social isolation**

Social isolation was a major challenge expressed by both the younger and the older adults. The participants recounted they had to shun social activities and also stay indoors in order to avoid unforeseen inconveniences. The following are some of the statements made by participants: “I sometimes do not go for public gatherings (weddings and funerals). I do this to prevent people from possibly seeing the catheter (during urination) which will cause me to become embarrassed” (Client 6). An older female participant said: “I normally avoid occasions that are far away which will inconvenience me” (Client 10).
Marital separation

Separation from one’s spouse was a very big challenge experienced by three (3) of the participants. The separation was mostly among the middle aged male respondents who were still in their sexual active years. They claimed their separation was as a result of their inability to have sexual intercourse with their spouses. They expressed this experience as: “I have not been able to have sexual intercourse with my wife ever since I came to live with the catheter leading to our separation” (Client 5). Another client said: “I am unable to have sexual intercourse with my wife and that’s my problem, she now lives in Dunkwa, I live in Ajumako. (Client 9).

Divorce

One male participant said sadly that he and the wife are divorced due to living with the urethral catheter. He was quick to add that their divorce is as a result of his inability to satisfy his wife sexually. He expressed this loss as: “The presence of this device has cost me my marriage as am unable to engage in sexual intercourse with my wife” (Client 3).

Supportive family members

This sub theme arose from expressions of support offered by family members. Unrelenting family responsibilities were labelled as reasons that enabled participants to honor the routine change of the catheter. Six participants lived with spouses, while others lived with relatives who offered support of various sort. An older female said: “my children are very supportive, they send me money for transportation to the health facility whenever I had to visit, they
sometimes accompany me to the hospital whenever they come home” (Client 10). A female respondent said: “I am very well supported by my family members. The family meets occasionally and those with problems share it and we encourage each other” (Client 6). Another client commented as: “My family members have been very helpful ever since I got sick. They offer their help in monetary terms and also food stuffs” (Client 3).

**Unfriendly nurses**

Almost all the participants interviewed lamented about the hostile behaviour of nurses towards them whenever they came to have the catheter changed at the hospital. They expressed this experience as such: “Some nurses are always angry when they see me and other persons living with catheter. They frown their face and also put up an attitude towards me” (Client 7). Other clients also said: “Some of the staff at the hospital are rude, and they talk to me harshly when I come over to change my catheter” (Client 10).

**Lack of supportive organizations**

This sub-theme arose when clients were asked if they knew of any Non-governmental organizations or social groups supporting persons living with IUC. All participants were not aware of any such organizations or groups. A participant said: “I will say I am not aware of any such support offered to persons living with urinary catheters (Client 7). Another participant said: “I have no knowledge whatsoever about any organization or support group that assist persons living with my condition” (Client 2) Participant did indicate that they needed help hence
they should be made aware of the existence of such organizations so they can access their services.

**Theme four: financial impact**

This theme emerged from statements made by client on how their financial fortunes have dwindled ever since they started living with the indwelling IUC. The lack of money was an issue for all the participants. Sub-themes under financial support include: Lack of funds due to work challenges, Patients lack funds due to regular buying of drugs and lack of funds due to frequent referrals.

![Diagram showing financial impact and its cluster of sub-themes]

**Figure 7: Financial impact and its cluster of sub-themes**

**Lack of funds due to work challenges**

Most of the patients lacked funds due to one reason or the other. Prominent amongst the reasons were the inability to do any productive work due to challenges brought unto to them by the catheter. The participants expressed this experience as follows: “I was not able to go and work as a labourer in a rubber plantation, a job my nephew looked for me, but I think the catheter has to be removed first before I can start the work” (Client 2). Others also expressed this
sentiment as: “I am unable to work on my farm and travel to work too due to the device and the disease. Hence I have no money to care for myself” (Client 9).

**Patients lack funds due to regular buying of drugs**

Patients also complained that the lack of funds they experienced was through the constant buying of drugs which they felt took a toll on their finances. The challenge of lacking funds was expressed by both young and old adults. A participant said: “I have been using every money I earn to buy drugs, access health care and other treatment in attempt to get a cure but to no avail. I can’t even pay my children’s school fees” (Client 4). Another participant stated: “The routine changing of the devices at the hospital (money for transportation and buying of drugs regularly) is taking a toll on my already deplorable financial status” (Client 10).

**Patient lack of funds due to frequent referrals**

Frequent referrals were cited by some participants as a means through which the little funds they had accrued through the little work they did was lost. The lack of funds due to frequent referrals was a challenge expressed by patients who have had catheter blockages and had to be referred to see the Urologist at Cape Coast Teaching Hospital. A participant stated: “I do not know why, but my catheter always gets stuck whenever I go to change it. I am always referred to higher health facility to get it changed, am really suffering due to this device (Client 1).” An older male participant stated: “Client has no money as he has used his money for transportation due to frequent referrals to higher medical facilities (Client 7).”
Theme Five: Information seeking Behaviours.

Theme six emerged from statements made by participants on ways they sought information about the catheter as they felt the knowledge they had was quite inadequate hence making living with the device very challenging. They expressed this inadequacy as follows: “I have been reading about my condition from books and I have been listening to radio programmes to obtain information on my condition, this has been very helpful to me (Client 3).” An older client retorted: “I listen to a local radio station which share information on the condition, and this helps me a lot (Client 1).”

Theme Six: Coping strategies

Participants of this study made use of varied coping mechanisms or strategies as far as living with the indwelling urethral catheter is concerned. Major coping strategies utilized by patients include; Religious patients utilizing time and making use of diversional therapies.

Figure 8: Coping strategies and its cluster of sub-themes
Religious patients

All participants of the study did indicate that they became very prayerful, as in praying to a supreme being (God) for comfort which they did not really do often before coming to live with the IUC. This act was termed as being very religious. This was expressed as follows: A client said: ‘‘I pray, and am always waiting on God to open a way (Client 2).’’ Another client stated: “Prayer has been a major sustenance for me, but I also relaxing to take my mind off my illness” (Client 1).

Diversional therapy

Other clients also coped with the challenges they encountered by making use of several diversionary activities. They expressed this in statements such as: “I keep myself busy with the little work I can tolerate to take my attention off the catheter (Client 2).” Another client said: “Apart from concealing the device, I read books to take my attention from my condition (Client 8).”

Discussion of findings

Data for the study were collected from interviews; Eight (8) conducted within the Emergency ward where the patients come to change their catheter routinely, and two (2) at patient’s private residence. The target population were all patients living with indwelling urethral catheter residing in Ajumako Enyan Essiam District of the Central Region of Ghana. All the ten (10) patients who took part in the study met the inclusion criteria and were made to sign a consent form prior to participating in the study. The phenomenological approach of inquiry as a philosophy helped to explore patients experience as they lived with the indwelling
urethral catheter. The discussion centre on the emerged themes in respect of literature and in relation to the theoretical framework. For the purposes of discussion, some sub themes under the broader themes will be merged.

The sample for the study was not diverse by age (43-72 years) and gender, as younger adults (18-35 years) were not involved in the study likewise, 80% of the respondents were males while female respondents were 20%. This disclosure may be attributed to the fact that Benign prostatic hyperplasia, AUR and CUR which are said to be major disease conditions requiring the use of an IUC affects about 50% of men between the ages of 51-60 and up to 90% of men older than 80 years (Teh, Sahabudin, Lim, Chong, Woo, Mohan, Khairullah, & Abrams, 2001; Smeltzer, Bare, Hinkle, & Cheever, 2010). To buttress the assumption on why there is no diversity in age, Kaplan, Wein, Stacking, Roehrborn and Steers (2008) and Emberton, Cornel, Bassi, Fourcade, Gómez and Castro (2008) indicated that AUR is rare in younger men; men in their 40s, but however common in older men. This revelation may be the reason why no study was found on younger adults. The undiversified nature of gender may also be attributed to the fact that urinary retention in women is less common though not rare, however researchers primarily believe urinary retention is peculiar to men and it is related to the prostate gland (Wein, Kavoussi, Novick, Partin, Peters, & Ramchandani, 2011; Mevcha, & Drake, 2010).

The marital status of client was diverse as five participants (50%) representing a majority were married and living with their spouse, one
representing (10%) were divorced, two representing (20%) were widowed and two also representing (20%) were separated.

The educational status of respondents was fairly distributed, as of the ten (10) participants, 40% had had junior secondary school education, 10% each had had senior secondary school education and graduate education respectively. 20% of the participants had had diploma education.

**Patients’ Experiences related to living with the Indwelling Urethral Catheter.**

**Psychological impact**

The major Psychological impact of the IUC on patients’ lives include: Feeling of frustration, Exhibition of depressive symptoms, fear of stigmatization and ambivalent views (Positive and negative perceptions about the catheter).

**Feeling of frustration and Exhibition of depressive symptoms**

Most of the participants expressed some form of frustration and exhibited some depressive symptoms ever since they started living with the device. Experiencing of frustration by persons living with IUC revealed in this study is consistent with findings by Wilde et al. (2013). Participants in the study by Wilde et al. (2013) said they always felt frustrated because the device prevented them from doing what they wanted to do. Smeltzer, et al. (2010) defined depression as “a state in which a person feels sad, distressed and hopeless with little to no energy for normal activities.” WHO (2014) also posit that “depression as a common mental disorder associated with feeling of sadness, losing interest or pleasure, feeling guilty or low self-worth, sleep disorder or loss of appetite, feeling tired, and poor concentration.” Smeltzer, et al. (2010) added that people
can be depressed due to injury, illness or suffering from an earlier loss. The authors added that depression can be diagnosed by the duration and severity of an individual’s sadness. Furthermore, Smeltzer et al. (2010) and Pratt and Brody (2014), stated that depressed individuals do not take part in social and general daily activities but rather exhibit symptoms such as feeling of sadness, worthlessness, fatigue, loneliness, feeling of guilty, weight gain or loss, and agitation.

It can be deduced from the definitions by Smeltzer et al. (2010) and WHO (2014) that patients living with the IUC were exhibiting depressive symptoms such as the feeling of sadness and bitterness after having to live with the IUC. To add up to the inference made, participants in this study ascribed their frustrations and depressive symptoms to the several challenges they had to deal with ever since coming into contact with the IUC. This finding is consistent with findings by Abiola et al. (2016), who purported that the usage of the IUC is linked with psychological and cognitive stress that needs to be given immediate attention.

**Fear of Stigmatization**

Stigmatization was one of the experiences participants had to deal with. Goffman (1963) posits that living with a “urinary catheter might be a stigma, a brand, mark, or blemish that bears negative implications because its visibility sets the patient apart from others and draws attention to other physical differences” on the individual. Wilde (2012) reported that, the experience of living with a catheter was like a “dialectical swing” between accepting it as an embodied part of self and “viewing it as a stigma” (i.e., feeling vulnerable) when it caused shame or
embarrassment. Joachim and Acorn (2000) on the issue of stigmatization and how people react to stigma said that visibility or invisibility of the disease condition was very paramount. The authors did indicate that, if the condition is such that it could not be invisible (e.g., hypertension), patients had the choice to either disclose the illness to people. On the contrary when the condition is widely visible, patients focused on how to hide the condition. Patients were more likely to face stigmatization when the condition is in-concealable. Although the catheter in the case was concealable, participants in this study were afraid of being stigmatized while others on the contrary encountered stigmatization irrespective of whether the device was functioning well or not and also after taking concrete steps to conceal the device from friends and family. Stigmatization from the use of the urinary catheter and incontinence is known to elicit depression and negatively impact quality of life (Paterson, 2000). Goffman (1963) recommends keeping away from upsetting situations and “passing as normal” are the right strategies to deal or cope with stigmatization.

**Ambivalent perception about the catheter**

This sub-theme emerged from several positive and negative statements made by participants after having to live with the catheter for various periods of time. All the participants shared this ambivalent feeling about the urethral catheter. This ambivalent view on the catheter contradicts the findings by Sweeney et al. (2007) who indicated that participants of their study had moved along a “continuum” from initial negative experiences of living with a suprapubic catheter toward a more optimistic or positive viewpoint. The findings by Prinjha
et al. (2013) corroborates findings of this current study but however contradicts that of Sweeney et al. (2007). Prinjha et al. (2013) said that clients had ambivalent thoughts about the urinary catheter. The results by Sweeney et al. (2007) and Prinjha et al. (2013) makes it unclear as to whether the urethral catheter is good or bad. There is the need for further research in this area so as to unearth better ways of managing the numerous challenges faced by patients IUC so that the catheter can be more beneficial to patients.

Social impact

The theme Social impact emerged from the collective challenges encountered by participants in their interaction in the society. Sub-themes under social impact include: Social isolation, Marital separation, Divorce, Supportive family members, Unfriendly nurses and Nonexistent supportive organizations.

Social isolation

Social isolation was a major challenge to users of the IUC. They felt cut off from the world as they needed to isolate themselves in fear of stigmatization and embarrassment. Social isolation is a theme consistent with findings by Akum (2005). Akum stated that persons who lived with catheters were always isolated socially and culturally because they wanted to conceal the catheter. Akum added that cultural interaction is a vital part of the African people hence many people who valued this aspect of interaction always found it difficult to adjust to the self-imposed isolation.

The activity theory by Havighurst and Albrecht (1953) states that older adults are happiest when they stay active and maintain social interactions. The
statement by Havighurst et al. (1953) implies that persons living with IUC whom for fear of stigmatization isolate themselves from some social activity were not happy and may have exhibited depressive symptoms. More needs to be done concerning ways to properly manage and conceal urinary catheters to eliminate the fear of complications by patients so that they can freely interact with people without fear.

**Marital separation and Divorce**

Separation and divorce from spouses was amongst the numerous problems encountered by patients. The separation and divorce was prevalent amongst the middle age (40-49 years) male respondents who were still in their sexual active years. The participants claimed the separation and divorce was as a result of their inability to have sexual intercourse with their spouses. Awosan (2009) reported a similar revelation in his book, *Currents Thoughts in African Sociology & Global community*. The author stated patients living with IUC are unable to keep intimate relationships which was ascribed to the social isolation and the inability to engage in sexual acts. Awosan concluded that much needs to be done by doctors and nurses to alleviate the plight of patients. Furthermore, He added that nurses should not only concentrate on the medical aspect of patients’ condition but should be very concerned also about the psychosocial impact the catheter has on the users’ life.

**Supportive family members**

Roseland, Piette and Heisler (2009) indicates that family support is very critical for survival among patients with chronic illness. This claim is however
true as participants of this study recounted how family support had been very helpful to them. The good support and family connection system reflects one of several themes revealed by Sweeney et al. (2007) that support from friends and family was key to participants accepting and coping with the IUC. The authors added that those who had the insight of social support adjusted to their condition more positively. Furthermore, the supportive role could be enhanced through information sharing and accessing support groups. Conspicuously all the participants of this study had no knowledge of support groups that assisted persons living with IUC mentioned by Sweeney et al. (2007).

**Unfriendly nurses**

Patients living with indwelling catheter lamented on how they had to endure rude and unfriendly nurses whenever they visited the hospital to have the catheter changed. Apart from being rude, patients also indicated some nurses made them to wait long hours before attending to them. This revelation affirms findings by Ayensu (2015) where patients said some Ghanaian nurses are very unfriendly. Participants of the study by Ayensu concluded the unfriendly nurses are those mostly in the public hospitals in Ghana. A study by Dzomeku, Ba-Etilayoo, Perekuu and Mantey (2013) also revealed that patients were not satisfied with nursing care due to poor staff attitude towards them. Though Dzomeku et al. and Ayensu (2015) did not cite reasons for the unfriendly behaviour by nurses, however the constant interaction between nurse and patient and the lack of wellness associated to caring for patients living with IUC could be reasons why
nurses were rude to patients. This is not to say nurses are justified to be hostile to patients due to reasons cited.

**Lack of supportive organizations**

Sweeney et al. (2007) in a study amongst patients living with Suprapubic catheters did indicate that, support from organizations and support groups offering help to persons living with IUC was very instrumental in helping patients cope with living with the IUC. The revelation by Sweeney et al. (2007) contradicts findings from this study as all participants in this study had no knowledge about organization offering specific help and support to persons living with IUC. Participant did indicate that they needed help hence they should be made aware of the existence of such organizations so they can access their services.

**Information Seeking Behaviours**

Budych, Helms and Schultz (2012), posit that seeking information about ones’ illness improves health care outcomes, affect coping strategies and helps alleviate patients feeling of uncertainty. Katavić, Tanacković and Badurina (2015), posit that patients tend to seek information about their illness when they are not satisfied with the information provided to them by health care providers when they lack expertise knowledge about their illnesses and related therapies and given that knowledge about them is insufficient even among health professionals. Seeking of information about ones’ illness was a behaviour amongst participants of this study though they did not categorically say they lacked it. Seeking of information about the catheter and its management found in this study reflects the findings by Prinjha and Chapple (2013) and Mciver, Mackay, Banks, Rodgers,
Kydd, MacIntosh and Williams (2015), where patients said they had to seek information from other sources since what they had from health care professionals (either written or verbal) was inadequate. The participants added that the knowledge they acquired helped them felt better and satisfied about living with the catheter.

Patients’ Challenges with the Indwelling Urethral Catheter

Major challenges encountered by patients’ in this study includes; Physical and financial impacts. The sub-theme under both themes includes: Limitation to daily activity, discomfort and Lack of funds due to work challenges.

Physical impact

Physical impact encompasses the following sub-themes: limitation to daily activities, pain and discomfort (severe pain) and sexual challenges.

Limitation to daily activities

Most of the participants stated they felt idle living with the IUC because living with the device hampered them in one way or the other in the performance of some daily normal routine and periodic activities. Other participants admitted that not only did the catheter hinder their movement drastically, it also hindered activities such as travelling long distances. This finding concurs with findings by Abiola et al. (2016) that prolonged indwelling urinary catheters prevented some of the patients in observing their daily physical activities such as routine work, house chores, periodic travel and also affected their social interactions. This revelation is corroborated by the findings in a study by Akum (2005) that found participants
saying they felt useless living with a long-Term urinary catheter. Much needs to be done to improve the life of patients living with IUC live.

**Pain and discomfort**

Feeling of Pain was expressed by all of the participants. They said pain is inexorable when it comes to living with an indwelling urinary catheter. This theme is consistent with Wilde (2013) who concluded that major challenges experienced by patients living with indwelling urinary catheter included pain. Wilde (2013) added that pain was experienced by all the patients irrespective of the kind of catheter and type of indwelling urinary catheterization. Sørbye and Grue (2013) found severe pain among patients with spinal cord injury using IUC as a major challenge which is consistent with the current study. Participants of this study indicated that their pain is mostly not taken care of properly as they felt instillagel, an anesthetic lubricant which is normally applied to the catheter to reduce the pain during catheterization is normally bought by them. This means that whenever a patient has no money to buy this expensive drug (gel), it means he/she has to endure severe pain during the insertion of the catheter. The participants suggested that the health facilities should provide the instillagel to them through National Health Insurance Scheme (NHIS) which patients are all registrants.

**Sexual challenges**

Sex was a concern especially to the middle-aged male participants; They added that it was a subject that was seldom discussed by health professionals. Participants felt a discussion on this topic could have unearth ways to enable them
to be intimate with their partners. The device hindering sexual activity reflects one of several themes discovered by Prinjah and Chapple (2013). Participants who took part in a study by Sweeney, Harrington & Button (2007) expressed the same sexual sentiment. Sweeney et al. (2007) concluded that health care professionals should not assume all is well with the sexual life of patients with IUC but should endeavor to discuss the topic to the fullest when interacting with patients.

An interesting revelation found was that some patients who had ever used a supra pubic catheter but reverted to urethral catheters made claims that they had no difficulty with sex as the position of the device did not interfere with sexual intercourse and would be glad if health care providers or institutions will reserve the urethral route of catheterization for short term use only.

Other clients did say that they suggested they should be put on the intermittent self-catheterization which they found out through their research but this view was not given attention by the health workers at all though the patient felt the intermittent self-catheterization regimen would help them undertake sexual intercourse.

Financial impact

The lack of money was an issue for all the participants and it was expressed by both the young and the old. They expressed the challenge in three main dimensions. The dimensions include: Lack of funds due to work challenges, lack funds due to regular buying of drugs and lack of funds due to frequent referrals.
Lack of funds due to work challenges, frequent buying of drugs and referrals.

Prominent amongst the reasons patient had financial challenges were the inability to do any productive work due to challenges brought unto to them by the catheter, lack of funds due to the constant purchasing of drugs and lack of money as a result of frequent referrals stated. The theme financial challenge is consistent with findings by Akum (2005) in a study conducted among persons living with IUC in Cameroon. Patients in the study state the lacked funds due to their inability to work. Financial challenge was also a major theme discovered by Abiola et al. (2016) in a study in South west Nigeria. This challenge was however nonexistent in the literature from Europe and the Americas. Financial challenges were nonexistent in literature from the advanced world due to improved insurance systems and higher level of health care equity. In a nation with a minimum wage less than $ 5.00, the lack of funds and an NHIS which is not all encompassing makes life difficult for patients who are already battling with other challenges the catheter presents.

Coping Strategies utilized by patient’s living with Indwelling Urethral Catheters.

Although disease processes and long term treatment are stressful (Heijmans, et al, 2004), Roy et al. (1999) however stated that patients or sufferers always find ways to cope or adapt to their situation no matter the extent of disease or treatment stress. It is however necessary to look at how persons living with the IUC coped with the device. Participants of this study made use of varied coping mechanisms or strategies as far as living with the indwelling urethral catheter is
concerned. Major coping strategies utilized by patients include: Patients being religious and use of diversional therapies.

*Religious patients and diversional therapy*

Being religious meant patient having faith in God, spending more time reading and reciting the Bible than they did before their illness as well as praying fervently. Participants said this strong faith and hope of being healed by God, made it easy for them to cope with the IUC.

Some clients were able to cope with the IUC by utilizing diversional therapies such as keeping themselves busy with the little work they could tolerate to take their attention off the catheter. Apart from keeping themselves busy, others read books to take their attention (ignore) off the disease condition. Coping strategies utilized by patients in this study is synonymous to the literature reviewed. The major strategy, “Praying to a supreme being” was consonant with study findings by Babamohamadi, Negarandeh and Dehghan-Nayeri, (2011) and Shosha, Abu-Shaikha, Marnocha and Al Kalaldeh (2013), who found that the first strategy of coping with disease and treatment stress was the reliance on religious beliefs for understanding and the belief in God by accepting his decree and fate.

The use of the diversional therapy to cope with the IUC among participants of this study is consistent with findings by Yanos, West and Smith, (2010). Yanos et Al. (2010) indicated that the use of the diversional therapies is an attempt by patients to ignore the stressor (disease). Yanos et Al. (2010) added that ignoring the stressor is an effective coping strategy especially when patient’s disease condition is the chronic type.
Lastly, concealing the device as a strategy falls in line with findings by Shosha, et al. (2013) and John et al. (2010) who concluded that sufferers of various conditions coped by concealing physical body changes so as to prevent people from becoming aware of their predicament. Strategies such as positive appraisal and meaning-focused coping strategies mentioned by Folkman, et al., (2004) were missing from strategies utilized by persons in this particular study.

It is very necessary to research into how patient cope with the urinary catheter, which is an assertion by Godfrey (2008).

**Relationship of findings to Conceptual Framework**

Key findings of this study were examined in relation to Roy’s (Roy & Andrews, 1999) model of adaptation. RAM describes humans as adaptive systems in constant interaction with their environments. The theory postulates that, Man displays adaptive (or ineffective) behaviours in four modes: (a) physiological-physical, (b) self-concept-group identity, (c) role function, and (d) interdependence.

The physiological mode includes physical and chemical behaviours of the body. The self-concept mode refers to spiritual integrity, self-ideal and body image. The role function mode relates to self-expectations in relation to society and expectations of others with different roles. The interdependence mode centres on relationships and the need for relationship integrity.

The sub-theme limitation to activity found under the major theme which is physical impact reflects the physiological and chemical mode of RAM. Clients facing challenges doing house chores and travelling make it clear that client were
living compromised lives as a result of the catheter. Again, some clients said they had to restrict their fluid intake when embarking on long distance travels so as to prevent them from urinating on the way. The restrictions reflect the chemical aspect of the physiological mode and pointing to how compromised the lives of persons living with IUC are.

Participant being “religious” reflects the self-concept mode where an individual is expected to attain spiritual integrity. “Ambivalent views about the catheter,” also reflect the self-concept mode from Roy’s adaptation model. Though some participants expressed positive feelings (acceptance) to having the catheter fitted on them to cure the urine incontinence, acute and chronic urine retention problems, others however were still finding it difficult in assimilating the catheter into their lives hence expressing negative thoughts about the catheter.

The negative thoughts shared by most of the participants after living with the IUC indicate that, the compensatory process being the use of the IUC to enable participants attain an integrated life failed, resulting to participants living a compromised life. The failure of the compensatory processes is due to the numerous challenges associated with the IUC.

“Supportive family members” where participants shared feelings of the good relationship and interaction they had with family and friends reflects the interdependence mode from Roy’s model of adaptation.

The sub-theme “sexual challenge” which has resulted in spousal separation and divorce reflects the role function mode. Middle age male participants who could not have sexual intercourse with their spouse represents a
primary role which society expect them to play under the role function mode. The inability of participants to engage in sexual activity means that participants are living comprised lives as the catheter which was intended to enable them live a compensatory life to compensate for their integrated life did not materialize. The older adults who had no issues with sex though they had IUC in-situ are said to have adapted well to living with IUC.

Summary of Chapter

This chapter discussed the findings that resulted from the thematic analysis in relation to both literatures reviewed and the theoretical framework. Physical impact, Psychological impact, Social impact, Financial impact and Coping strategies were major themes that emerged from the thematic analysis.

Frustration, depression, social isolation, good family connection and stigmatization were major psychosocial experiences by participants of the study. Limitation to daily activity, discomfort and sexual challenges were major physical challenges encountered by participants. Utilizing time wisely and diversional therapies were major coping strategies.

The findings of the study in relation to the RAM indicates that, while some participants are exhibiting adaptive behaviours to cope with the IUC, others on the other hand were living maladaptive lives as a result of the IUC.
CHAPTER FIVE

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

This chapter consists of the summary, conclusions and recommendations for further research. The aim of the summary segment is to briefly describe the processes used in conducting this research. Based on the study’s results and discussion, conclusions are drawn. Recommendations will briefly discuss suggestions by the researcher on how to improve health care and quality of life of patients living with indwelling urinary catheter.

Summary

This research sought to explore the experiences of patients living with indwelling urethral catheter in Ajumako Enyan Essiam District of the Central Region of Ghana. The study was a qualitative study which utilized a phenomenological exploratory design. Approval to conduct the research was received from the Institutional Review Board of the University of Cape Coast. Pre-testing of the research instrument was done at the Saltpond Government Hospital. Participants were purposively selected and made to sign a consent form before partaking in the study. Data were obtained through a semi-structured interview until saturation was achieved. Analysis was done using Colaizzi’s (1978) thematic analysis approach. Result of demographic data was analyzed using descriptive statistics and exhibited with tables. Six (6) thematic categories were also identified and discussed. Key findings of the study were:
A large number of the participants (40%) were within the age range of 50-60 years. 80% of the respondents were males while no younger adult participated in the study. 50% of the participants were fully employed.

The first objective of the study which was to explore patients’ experiences related to living with the indwelling urethral catheter revealed both positive and negative experiences. Persons living with the device in the Ajumako Enyan Essiam District of the Central Region of Ghana felt frustrated and exhibited depressive symptoms living with the urethral catheter. Other revelations include: Fear of stigmatization, ambivalent perception about the catheter, social isolation, marital separation and divorce, supportive family members, unfriendly nurses, lack of supportive organizations and patients cultivating the habit of seeking information about the catheter.

Objective two which was to explore challenges encountered by patients living with the urethral catheter revealed pain and discomfort, sexual and financial challenges and limitation to daily activities as major challenges patients had to contend with living with the IUC.

Research objective three which was to investigate coping strategies utilized by patient’s living with the urethral catheter revealed religiosity and use of diversional therapies such as concealing the catheter as major coping strategies utilized by patients living with IUC in the Ajumako Enyan Essiam District of the Central Region of Ghana.
Conclusions

Based on the findings of the analysis and the discussions, the following conclusions have been drawn: Patients living with IUC expressed Ambivalent viewpoints about the device. Other expressions included limitation to routine activities, discomforts, social isolation and financial and Sexual challenges. Supportive family members and patients being religious as a major coping strategy.

The sub-themes, “Ambivalent views about the catheter” “Sexual challenges” and “supportive family members” reflects the concepts underpinning the Roy’s Adaptation Model (1999) utilized in this study. Most of themes revealed were also consistent with literature reviewed. It is vital to take steps to alleviate the negative experiences or challenges in order to improve care of patients living with IUC in the district and in Ghana at large. It is also essential to make use of positive experiences to the advantage of health facilities to advance the care rendered to patients living with IUC.
Recommendations

Recommendations are discussed under the following sub-headings: nursing research, hospital administration and nursing practice.

Nursing research

The researcher believes to really understand patients’ experiences, challenges, coping strategies and the ever changing demands of chronic illnesses, a longitudinal study using a larger sample size among patients living with indwelling urinary catheters has to be conducted to provide a larger chunk of data and knowledge than uncovered in this current study.

A similar study should be extended to the various regions of Ghana to find out if it will produce the same result which will help bring the Ghanaian perspective on the catheter to light properly.

Further research needs to be conducted to understand in detail the interpersonal relations between nurses and patients with chronic illnesses.

A longitudinal research also needs to be conducted to ascertain if the depressive symptoms exhibited by patients in this study eventually leads to depression or not.

Hospital administration and Nursing practice

To curb pain and discomfort associated with the IUC, the researcher suggests that Ghana Health Service (GHS), should liaise with the NHIS to absorb the cost of the instillagel (an anesthetic gel applied to reduce pain when inserting the urethral catheter), borne by patients. The provision of the instillagel to patients
free of charge will not only reduce some of the financial burden on patients but also take away the pain and discomfort felt during insertion of the catheter.

The Hospital administration should ensure patients are properly and thoroughly counseled by nurses or by clinical psychologists before and after having the catheter fitted on them. Patients should also be counselled especially on sexual and emotional needs as this may help alleviate feelings of frustration.

Again nurses should make it a point to make available all needed information about the device whether written or verbal to patients rather than patients going to look for it themselves, Budych, et al. (2012) purports that information from health care personnel helps patients cope with their disease conditions better as compared to what they find out by themselves.

To alleviate patients pain and discomfort felt after insertion of the catheter, all Nurse managers and medical superintendent should ensure patients pain are managed using WHO pain analgesic ladder regimen. Furthermore, the researcher recommends every hospital can make it a cooperate responsibility to provide instillagel for use by patients pending an outcome from suggestion to be made to GHS.

Nurses caring for patients living with IUC should take the initiative to either form support groups or advocate on behalf of patients to organizations to extend a helping hand to patients living with IUC, looking at the vast benefits to patients as highlighted by Sweeney et al. (2007).

To reduce the financial burden of patients, the hospital administration should liaise with the District health directorate to train nurses at the health
centres and clinics within the district to undertake catheterization so that patients can have their routine catheter change at these facilities rather than travelling from the remote areas of the district to the hospital to have their catheter changed.

The Hospital administration should encourage and sponsor the training of more urology nurses to man the urology unit at the hospital to help solve catheter related complications so as to prevent patients from travelling all the way to the Regional hospital whenever catheter complications arises.

Lastly, the general public, as well as family and of patients living with IUC needs to be sensitized and educated properly by nurses on the indwelling catheter so as to curb patients fear of being stigmatized.
REFERENCES


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APPENDICES

APPENDIX A: Data Collection Tool

APPENDIX B: Ethical Clearance

APPENDIX C: Introductory Letter
APPENDIX A

DATA COLLECTION TOOL

The purpose of this study is to explore the lived experiences of patients living with indwelling urethral catheter in Ajumako Enyan Essiam District of the central Region of Ghana. Information collected for this research will be treated with utmost confidentiality.

SECTION A. (DEMOGRAPHIC INFORMATION)

1. Age: ............
2. Gender: Male □ Female □
3. Marital status:
   Single □ Married □ Divorced/Separated □ Widowed □
4. Employment status:
   Employed full time □ Employed part time □ Previously employed □
   Retired □
5. Educational status:
   Primarily level □
   J H S level □
   S H S level □
   Diploma level □
   Graduate □
SECTION B. (INTERVIEW GUIDE)

1. For how long have you been living with the catheter?
2. Tell me about your first experience of having to live with a catheter?
3. How do you feel about living with the device? (Perceptions, emotions and thoughts)
4. What are your major concerns, and needs in relation to living with the urethral catheter? (Stigmatization by family and friends and treatment regimen)
5. How has the urinary catheter affected your life since you have been living with it (in relation to relationships, family life, spiritual/religious life, communal life, status, physically/daily routine (movement) and paths taken/not taken)?
6. Has living with the urinary catheter affected your job, finances, and any life opportunities?
7. What or who did you use as your support system?
   a. Are you aware of support groups or systems for persons living with indwelling urethral catheter?
   b. If yes, have you ever attended any support groups?
   c. What kind of support/assistance did you receive from the support groups?
8. How is your interaction with the health care professionals?
   a. Has your interaction with them been helpful?
   b. What did they fail to do for you?
   c. What did they do that wasn’t helpful?
9. What coping strategies or mechanism has aided you to live with the catheter all this while?
10. Any suggestions to health care professionals and health facility managers on how to improve care rendered to patients living with the device.

Conclusion of interview: Thank you for participating in this interview. Your responses will be confidential, and I will return your interview transcripts for you to review and verify for accuracy.
APPENDIX B

Mr. Stephen Opare Ahwireng
School of Nursing and Midwifery
University of Cape Coast

Dear Mr. Ahwireng,

ETHICAL CLEARANCE –ID : (UCCIRB/CHAS/2017/28)

The University of Cape Coast Institutional Review Board (UCCIRB) has granted Provisional Approval for the implementation of your research protocol titled 'Experiences of patients living with indwelling urethral catheter in Ajumako Enyan Essiam District of the Central Region of Ghana.'

This approval requires that you submit periodic review of the protocol to the Board and a final full review to the UCCIRB on completion of the research. The UCCIRB may observe or cause to be observed procedures and records of the research during and after implementation.

Please note that any modification of the project must be submitted to the UCCIRB for review and approval before its implementation.

You are also required to report all serious adverse events related to this study to the UCCIRB within seven days verbally and fourteen days in writing.

Always quote the protocol identification number in all future correspondence with us in relation to this protocol.

Yours faithfully,

Samuel Asiedu Owusu
Administrator

Date
APPENDIX C

Dear Sir/Madam,

LETTER OF INTRODUCTION: MR. STEPHEN Opare Ahwireng

The above named person is a level 850 Post Graduate student of the school of Nursing and Midwifery, University of Cape Coast with ID numbers SN/MNS/15/0012.

As part of the School’s requirement for graduation, he has to do a research and present a report on it. He intends to collect data from the Ajumako Enyan Essiam District Assembly and Ajumako District Hospital as his research topic depicts: Experiences of persons living with indwelling catheter. A study at the Ejumako District Hospital and Ejumako Enyan Essiam District Assembly

We would be grateful, if you could offer him the necessary assistance and support he may need to enable him collect his data for the research.

Thank you.

Yours faithfully,

Dr. Samuel Victor Nvor
VICE-DEAN