

Introduction

Coronary artery disease (CAD) is the leading cause of death in the United States in both men and women. This disease happens when the arteries that supply blood to heart muscle become hardened and narrowed (*DMD, 2009*). This can reduce or obstruct blood flow to areas of the myocardium, sometimes with seeming abruptness, resulting in myocardial ischemia. These formations are more closely associated with acute ischemic events. The serious complications of CAD are angina pectoris, unstable angina, myocardial infarction, causing permanent heart damage, and sudden cardiac death as the result of arrhythmias. The peak incidence of clinical pathology for men is between the ages of 50 and 60, and for women, between the ages of 60 to 70 (*American Heart Association, 2011*).

Recent research findings suggest that morbidity and mortality in cardiac patients can be improved with a comprehensive treatment plan in which a nurse manages the patient based on actual plan and practical standards (*Xian, 2010*). Randomized controlled trials have also demonstrated the benefit of nurse-run clinics for primary and secondary prevention of coronary heart disease (*Riley, 2003*).

The coronary intensive care nurses (CICN) should be self-directed and purposeful in seeking necessary knowledge and skills to enhance career goals. Other activities-such as membership in professional organizations, certification in specialty or advanced practice based on the nursing care standards to enhanced quality of care and decreased the morbidity and mortality. The nurses must have continuing education and further academic

education, to enhancing the nurses professionalism in career. (*Agency for Healthcare Research and Quality (AHRQ), 2003*).

The first coronary intensive care units (CICUs) were developed in the mid-1960s to treat patients suffering from acute myocardial infarction (AMI). Since those early days, CCNs have expanded their focus to include a wide spectrum of cardiovascular diseases. In addition to AMI, these disorders include inflammation and infections of the heart, pericardium, and valves, as well as diseases involving the aorta and peripheral vascular system, cardiomyopathy, and hypertensive crisis (*AOA, 2009*).

Patients admitted to CICUs tend to have specialized health care needs, and often require continuing monitoring .These units need highly efficient health care providers, including nursing personnel. Nurses working in these units require highly technical preparations in order to enable them to meet the patient's needs, and life threatening situations. A standard of nursing care is especially needed in these units in order to guarantee a high level of quality care (*Youssef, 2009*).

The nursing care should be guided by clearly defined nursing care standards to ensure the high quality of care. Standards of care are definitive statements that describe a common or acceptable level of patient's care or performance. They also define the professional practice. Thus, the standards of care are basic in determining the level of care delivered and for quality improvement within the organization (*Ellis & Hartly, 2000*). Nurse-provided or nurse-coordinated standards of nursing care using an integrated or multifactor approach have been shown to be highly effective in reducing morbidity and mortality of high-risk patients (*Haskell, 2003*).

Standards have also been defined as nursing care outcomes, as well as nursing activities, and structural resources needed. They are used for planning nursing care as well as for evaluating it. According to many other authors, a standard also is a written statement that specifies expectations. It refers to an acceptable level of achievement, based on the realistic availability of resources and on the practice environment (*Swansburge, 1991*) and (*Sullivan & Clotworth, 2006* and *Ellis & Hartely, 2000*).

Several frames are used in establishing standards. The nursing process is suited to formulate standards based on valid principle: assessment, planning, implementation and evaluation of outcome (*Wessourik, 1990*). Standards assist the profession in meeting their obligation for improving practice. Furthermore, it can be used as teaching material for education and orientation in this area of specialty (*Dolan, 1991*).

The standards of practice provide a guide to the knowledge, skills, judgment & attitudes that are needed to practice safely. They reflect a desired and achievable level of performance against which actual performance can be compared. Their main purpose is to promote, guide and direct professional nursing practice and optimal quality of care (*Linda, 2008 & Potter, 2005*).

Titration therapy against nursing care standards (NCS) is a significant role for the nurse in improving patient outcomes and contributes to reducing risks associated with critical care, particularly when implemented in conjunction with other patient safety initiatives. (*Rauen, Chulay, Bridges, Vollman, Atbour 2008, and Martinez, Reyes, Lorenzo, Menendez, 2009*).

Significance of the Problem

In Arab Republic of Egypt, the incidence of CAD, are 4.41 /1000 as a result of international data base (2008). In Coronary Care Unit of Sohag University Hospital the number of admitted patient during the year 2010-2011 was 1200 patients with coronary artery diseases, of them 40% patients with AMI, 20% angina pectoris, 15% ischemic cardiomyopathy and valvular heart diseases, 20% Congestive heart failure (CHF) and its various complications, and 5% hypertension. Cardiac patients are facing many problems which affect the quality of life; these problems can be overcome with proper NCS in addition to the therapeutic regimen.

From my clinical observation, the nurses staff caring for patients with CAD at CICU at Sohag University Hospital didn't follow NCSs for caring of such group of patients to help them providing qualified care and deal safely with such condition. Consequently, formulating NCSs could help nurses in promoting the quality of nursing care and decreasing morbidity and mortality for this patients. Fortunately new CICU was recently designed at Sohag University Hospitals for acquainted the trained nurses on NCSs application and all the administrative staff at the study setting were willing to conduct this study for its reflection on patient outcome.

The aim of this study is to develop nursing care standard for patient with coronary artery disease at the selected setting and to test the application of these standards. Hopefully, the study results would generate attention and motivation for further investigation into this topic.