Chapter 17 Women's Health

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Objectives

Upon completion of this chapter, the reader will be able to do the following:

1. Identify the major indicators of women's health.
2. Examine prominent health problems among women of all age-groups (i.e., from adolescence to old age).
3. Identify barriers to adequate health care for women.
4. Discuss issues related to reproductive health.
5. Explain the influence of public policy on women's health.
6. Discuss issues and needs for increased research efforts focused on women's health.
7. Apply the nursing process to women's health concerns across all levels of prevention.

Key Terms

breast cancer

Cesarean section

Civil Rights Act

cardiovascular disease

domestic violence

ectopic pregnancy

Family and Medical Leave Act

hypertension

life expectancy

multiple family configurations

osteoporosis

pelvic inflammatory disease

sexual harassment

To achieve “health for all” in the twenty-first century, health care services must be affordable and available to all. Although adequate health care for women is a key to realizing this goal, a significant number of women and their families face tremendous barriers to health care access. Additionally, knowledge deficits related to health promotion and disease prevention activities prevent women of all educational and socioeconomic levels from assuming responsibility for their own health and well-being.

Beginning in the 1970s, the women’s movement called for the reform of systems affecting women’s health. Women were encouraged to become involved as consumers of health services and as establishers of health policy. More women entered health professions in which they were previously underrepresented, and those in traditionally female-dominated professions, such as nursing and teaching, became more assertive in their demands to gain recognition for their contributions to society. Health care for women has evolved from a focus on the pelvic area and breast to viewing the woman as a holistic being with specialized needs.

In “Preamble to a New Paradigm for Women’s Health,” Choi (1985) declared that collaboration and an interdisciplinary approach are necessary to meet the health care needs of women. She further stated, “essential to the development of health care for women are the concepts of health promotion, disease and accident prevention, education for self-care and responsibility, health risk identification and coordination for illness care when needed” (p. 14). To realize this paradigm, community-based health care focuses on health beyond the biophysical, disease-focused approach. Health from a social perspective considers the interaction of individual physiology along with work environment, living conditions, lifestyle choices, and health habits (Ruzek et al, 1997). Community health nurses must work with other health care professionals to formulate upstream strategies that modify the factors affecting women’s health. Many *Healthy People 2020* objectives address health problems pertaining to women and include specific targets and strategies to improve the health of this aggregate. The *Healthy People 2020* boxes in this chapter present a small selection of these objectives. This chapter examines the health of women from adolescence to old age. It explores the major indicators of health, including specific health problems and the socioeconomic, sociocultural, and health policy issues surrounding women’s health. The chapter also discusses identification of current and future research aimed at improving the health of women. An understanding of these points will enable community health nurses to appropriately apply this expertise in a community setting to help improve women’s health.

Major Indicators of Health

interpret the levels of health in different groups. The primary indicators of health this chapter covers are life expectancy, mortality (i.e., death) rate, and morbidity (i.e., acute and chronic illness) rate.

HEALTHY PEOPLE 2020: Selected Objectives for Women's Health

Objective	Baseline (Year)	Target (2010)	Final (Year)	Target (2020)
3-3: Reduce breast cancer death rate.	26.6 deaths per 100,000 (1999)	21.3 deaths per 100,000	22.9 deaths per 100,000 (2007)	20.6 deaths per 100,000
3-4: Reduce death rate from cervical cancer.	2.8 deaths per 100,000 (1999)	2.0 deaths per 100,000	2.4 deaths per 100,000 (2008)	2.2 deaths per 100,000
3-11b: Increase the proportion of women 21 years of age and older who have received a Papanicolaou smear test within the preceding 3 years.	79%* (1998)	90%	84.5%* (2008)	93%
3-13: Increase the proportion of women who have received breast cancer screening based on most recent guidelines in 2008.	67%‡(1998)	70%	67%‡ (2008)	81.1%
16-4: Reduce maternal deaths.	9.9 deaths per 100,000 live births (1998)	4.3 deaths per 100,000 live births	12.7 deaths per 100,000 live births (2007)	11.4 deaths per 100,000 live births
16-5a: Reduce maternal complications during labor and delivery.	31.2% (1998)	24%	31.1% (2007)	28%
16-6a: Increase the proportion of pregnant women who receive early and adequate prenatal care beginning in the first trimester.	83% (1998)	90%	70.8% (2007)	77.9%
16-15: Reduce the occurrence of neural tube defects (spina bifida and anencephaly).	60 cases per 100,000 live births (1996)	50 cases per 100,000 live births	60 cases per 100,000 live births (2007)	52 cases per 100,000 live births
25-1a: Reduce the proportion of females 15 to 24 years of age attending Sexually Transmitted Disease clinics with *Chlamydia* infections.	5% (1997)	3%	7.4% (2008)	6.7%
25-6: Reduce the proportion of females 15 to 44 years of age who have required treatment for pelvic inflammatory disease.	8% (1995)	5%	4.2% (2006-2010)	3.8%

* Reflects a change in practice guidelines: Through 2008, women >18 years old were recommended for routine Pap smear screening, but guidelines changed the age to 21 years old in 2008.

final review, 2012. Available from <http://www.cdc.gov/nchs/data/hpdata2010/hp2010_final_review.pdf>.

There are 156.9 million women in the United States (Howden, 2010). Of these women, 11% are considered in fair to poor health, a 12% have conditions that impair their daily functioning (Adams et al, 2011). Many factors that lead to death and illness among women are preventable or avoidable (see Veteran's Health box). If certain conditions receive early detection and treatment, a significant positive influence on longevity and the quality of life could ensue. Recognition of patterns demonstrated by these indicators can address problems preventively. This section presents an overview of these major indicators of health among women.

VETERANS' HEALTH: Women in the Military

Women veterans are a growing segment of the veteran population, as indicated by the following findings:

- There were an estimated 1.8 million women serving in the military in 2010
- 49% have a bachelor's degree
- 61.5% are from the post-Vietnam era
- The average age of women veterans is 48 years, compared with 63 years for men
- 240,000 sought care at Veterans Administration (VA) facilities
- Top diagnoses were postttaumatic stress disorder, hypertension, and depression
- 1 in 5 women responded "yes" when screened by the VA for military sexual truama (MST)

Health care professionals must recognize that this special cohort may have health concerns related to their service. Public health nures should be prepared to counsel women verterans and to be aware of community resources for referrals to meet health needs of this special group of women.

Modified from a presentation created by Bridgette Crotwell Pullis, PhD, RN, CHPN.

Life Expectancy

Except in a few countries, such as Bangladesh, Malawi, Niger, Pakistan, Qatar, and Zimbabwe, women typically experience greater longevity than their male counterparts (World Health Organization [WHO], 2013). For example, women born in the 1970s in the United States have an average life expectancy of 74.7 years, or 7.6 years longer than men born in the same year.

Life expectancy for Americans is at an all-time high, but the discrepancy between males and females remains. Males born in 2011 have a life expectancy of 76 years, compared with 81 years for females. This suggests a trend toward narrowing the gap between male and female life expectancies. Ethnic/racial disparities in life expectancy unfortunately continued into the twenty-first century, as there is considerable variation among races. For example, black females gained an

Mortality Rate

Table 17-1 lists the six major causes of death among American women in 2009 by age-group (Centers for Disease Control and Prevention [CDC], 2009d). As age increases, the leading causes of death change. In the adolescent to early adulthood years, the leading cause is unintentional injuries (i.e., motor vehicle accidents, drug overdose). Changes since 1999 include (1) human immunodeficiency virus (HIV) as a cause of death is no longer in the top six causes for the 25- to 44-year group and (2) death from pregnancy complications is higher in the list for the 20- to 34-year group. As middle age approaches, cancer becomes the number one cause for women aged 35 to 74 years. Finally after age 75, cardiovascular disease is the most common cause of death.

RESEARCH HIGHLIGHTS: Nurse Researchers Study the Inclusion of Women in Research

A group of nurse researchers (Crane et al, 2004) examined more than 1000 articles published in nursing journals between 1995 and 2001 to determine whether women had been included in research studies focusing on the leading causes of mortality. They found that 87% of the studies did include women participants. They also noted that there appeared to be a slight increase in inclusion of women from the earlier years to the later years.

Cardiovascular Disease

About one in four Americans has one or more forms of **cardiovascular disease** (CVD) (e.g., high blood pressure, coronary heart disease, stroke, congenital defects, or rheumatic heart disease). CVD accounts for about 35.3% of all deaths in the United States, or about 1 out of every 2.8 deaths. One in ten women under age 60 has some form of CVD; the ratio increases to one in three after age 65. Black women are more likely to die from CVD than white women. In 2005, the CVD death rate among white women was 230.4 per 100,000, compared with 319.7 per 100,000 for black women. Black women are also more likely to die from stroke than white women (60.7 per 100,000 and 44 per 100,000, respectively) (American Heart Association, 2013).

Cardiovascular disease continues to be the number one overall killer of women. One out of every 3 deaths is from CVD, whereas one out of every 29 deaths is from breast cancer. Since 1984, CVD caused more deaths among females than males. In 2010, 386,436 men and 401,4950 women died from CVD (AHA, 2013). The overall number of deaths due to CVD decreased dramatically from 424.2 per 100,000 in 1950 to 236 per 100,000 in 2010, with significant differences between white women (190.4 per 100,000) and black women (267.9 per 100,000).

Disparities continue in relation to prevention, diagnosis, and management of heart disease in women, although research has focused more on the unique aspects of women and heart disease. After age 65, women are twice as likely as men to die from heart disease (Vaccarino et al, 2003). Women have higher rates of complications after revascularization procedures (Jacobs, 2003) and higher rates of death after myocardial infarction (Wenger, 2004). This phenomenon

TABLE 17-1 SIX LEADING CAUSES OF DEATH AMONG AMERICAN WOMEN FOR ALL RACES BY AGE-GROUPS IN 2009

AGE-GROUP (YEARS)	CAUSE OF DEATH (IN RANK ORDER)
15 to 19	Unintentional injury or accidents (43.9%)
	Suicide (9.1%)
	Homicide (8.1%)
	Cancer (8.1%)
	Heart disease (3.4%)
	Birth defects (3.1%)
20 to 24	Unintentional injury or accidents (36.8%)
	Suicide (9.1%)
	Homicide (8.1%)
	Cancer (7.8%)
	Heart disease (4.9%)
	Pregnancy complications (3.6%)
25 to 34	Unintentional injury or accidents (26.5%)
	Cancer (13.9%)
	Suicide (7.7%)
	Heart disease (7.6%)
	Homicide (5.6%)
	Pregnancy complications (3.0%)
35 to 44	Cancer (25.3%)
	Unintentional injuries (15.8%)
	Heart disease (11.9%)
	Suicide (5.5%)
	Stroke (3.1%)
	Chronic liver disease (3.0%)
45 to 54	Cancer (34.6%)
	Heart disease (14.4%)
	Unintentional injuries (9.0%)
	Stroke (3.8%)
	Chronic liver disease (3.6%)
	Chronic lower respiratory disease (3.3%)

55 to 64	Cancer (40.1%)
	Heart disease (26.6%)
	Chronic lower respiratory disease (5.7%)
	Stroke (3.8%)
	Diabetes mellitus (3.8%)
	Unintentional injuries (2.9%)
65 to 74	Cancer (36.5%)
	Heart disease (19.1%)
	Chronic obstructive pulmonary disease (8.9%)
	Stroke (4.7%)
	Diabetes mellitus (3.7%)
	Kidney disease (2.2%)
75 to 84	Heart disease (23.8%)
	Cancer (23.5%)
	Chronic obstructive pulmonary disease (8.0%)
	Stroke (7.0%)
	Alzheimer's disease (4.6%)
	Diabetes mellitus (3.1%)
85+	Heart disease (31.1%)
	Cancer (10.5%)
	Stroke (8.0%)
	Alzheimer's disease (8.0%)
	Chronic obstructive pulmonary disease (4.6%)
	Influenza and pneumonia (3.0%)

Data from Centers for Disease Control and Prevention: *Leading cause of death by age group, all females-United States, 2009*. Available from <http://www.cdc.gov/women/lcod/2009/index.htm>.

exists because women display different symptoms of heart disease and are managed differently from men (Chang et al, 2003, Martin et al, 2004, Schulman et al, 1999). Women have smaller arteries and higher rates of metabolic syndrome, diabetes, heart failure, and other comorbidities. They tend to be older at their first cardiovascular event, with more urgent and emergency presentations (Jacobs, 2003). These differences result in fewer preventive interventions, such as cholesterol screening and the use of aspirin and other fibrinolytic therapy and of statin drugs to lower cholesterol (Downs, Clearfield, and Weis, 1998).

Rates of CVD among women can decline further when individuals become more aware of risk factors and accept responsibility for managing their own health and well-being (Kuehn, McMahon, and Creekmore, 1999). Concerned and motivated providers must encourage women to practice heart-healthy behaviors. In 2002, the American Heart Association launched the "Go

Cancer

Cancer is the second leading cause of death in the United States. One out of 4 deaths in the United States is due to cancer (Siegel et al, 2014). Cancer rates rose through the early 1990s for a number of reasons, including lifestyle choices (smoking, diet, sun exposure), increasing exposure to environmental carcinogens, and, probably most important, greater life expectancy. Because of improvements in early detection, screening, and treatment of the major cancers, incidence rates have leveled off and in some cases decreased (ACS, 2009). To illustrate, death rates from cancer among women have increased from 136 per 100,000 women in 1960 to 167.3 per 100,000 women in 2000 (CDC, 2004). Yet there was a decline in the cancer death rate from 2002 to 2004, about 2% per year, which was "large enough to overcome the impact of the growth and aging of the population" (ACS, 2013b). The ACS (2013a) estimates that 273,430 deaths will have occurred among women as a result of cancer in 2013.

In 1987, lung cancer surpassed breast cancer as the leading cause of cancer deaths in women, and death rates from lung cancer increased sharply until about 1990. Lung cancer deaths leveled off in 2005, when 26% of cancer deaths in American women were attributed to lung cancer. Breast cancer was the second most common cause, accounting for 15% of all cancer deaths (ACS, 2013a). Colorectal cancer, the third most frequent cause of cancer deaths, accounts for 9% of all cancer deaths and claims the lives of some 28,000 women annually.

Other female-specific cancers include ovarian cancer (fifth most common cancer), uterine cancer (sixth most common cancer), and cervical cancer. Cervical cancer, in particular, has received considerable attention of late because it has been determined that 90% of women with cervical cancer have evidence of cervical infection with human papillomavirus (HPV) (ACS, 2013c). In June 2006, the U.S. Food and Drug Administration (FDA) licensed Gardasil (Merck and Co, Inc.), the first vaccine to prevent HPV infection (CDC, 2012a, CDC 2012b). Through March of 2013, 57 million doses have been given (CDC, 2014). Gardasil has been shown to be highly effective in preventing the most common types of HPV infection and was approved for use in females between 9 and 26 years of age. For additional information, consult the CDC's website (http://www.cdc.gov/vaccinesafety/vaccines/HPV/Index.html).

The good news is that healthy lifestyle changes and early detection and intervention have contributed to the decreases in mortality rates from some cancers. For example, the death rate for colorectal cancer has been dropping since the mid-1980s as a result of early detection and treatment (ACS, 2011). Lung cancer deaths are beginning to show a slight decline that parallels a lower incidence of smoking by women older than 18 years (ACS, 2008).

Five-year survival rates vary according to the type of cancer and stage at diagnosis. For instance, the 5-year survival rate for all clients with lung cancer is only 18%. For those with localized breast cancer, it is 98%, decreasing to 23% for those diagnosed with distant metastases. Of cancers related to the reproductive tract, ovarian cancer has the lowest survival rate, as only around 46% of women survive for 5 years. With diagnosis at an early stage, the 5-year survival rate is 91% for women with colon cancer and 89% for those with rectal cancer (NCI, 2013d; 2013e).

Early diagnosis and prompt treatment are major factors in surviving many types of cancer.

examination and annual clinical breast examination, with the addition of mammography after age 40, or sooner in those with increased risk of hereditary breast cancer. Colorectal cancer screenings include annual fecal occult blood tests along with sigmoidoscopy every 5 years or colonoscopy every 10 years (ACS, 2008).

Certain health choices may reduce an individual's risk of cancer. Women reduce their risk for cancer by never smoking or by quitting if they already use tobacco products. Eating a nutritious, plant-focused, high-fiber diet along with adopting a physically active lifestyle and maintaining a healthy body weight protects against both heart disease and many cancers. Nutrition guidelines include avoiding salt-cured, smoked, nitrite-containing, and charred foods, high-fat foods, and excessive alcohol (Rhodes, 2002, Vogel, 2003). Obesity has been associated with an increased risk for cancers of the colon and rectum, endometrium, and breast (ACS, 2008). Finally, the practice of safe sex has been shown to reduce the spread of cancer associated with sexually transmitted diseases such as HPV, hepatitis B and C, and HIV.

Community health nurses must encourage all females (i.e., from childhood to old age) to adopt these healthy lifestyle choices and pursue early cancer detection. Community health nurses play a major role in providing cancer control services that should be culturally sensitive and appropriate to the targeted aggregate. If providers and clients applied everything known about cancer prevention, approximately two thirds of cancer cases would not occur.

Diabetes

In 2008, the number of diabetics in the United States reached 24 million, 8% of the population, with 25% of the population over age 60 being affected (CDC, 2008a). From 2003 to 2006, the number of diagnosed diabetics rose by 7.8%, especially among women (Cheung, Ong, and Cherny, 2009).

Diabetes mellitus is a chronic disease that causes the premature death of many women and overall ranks sixth in mortality among that group, being highest after the age 45. Diabetes ranks fourth as the cause of death among several aggregates, including Native Americans, blacks, and Asians, and is fifth among Hispanics (National Center for Health Statistics, 2013).

In addition to being a serious illness in itself, diabetes is a risk factor for the development of CVD; furthermore, it dramatically influences the severity and course of the CVD. In death certificates from 2004 on which the cause of death was related to diabetes, 68% also listed CVD and 16 % also listed stroke (CDC, 2008a). When comparing men and women with diabetes, of those who suffer myocardial infarction before age 65, women are more likely to die and suffer long term health problems (Norhammar, Stenestrand, Lindbäck, and Wallentin, 2008). The good news is that the number of women hospitalized for diabetes has dropped, indicating that better management with tighter control of blood glucose has decreased complications (CDC, 2008a). The community health nurse is an important resource for supporting the tight control of diabetes to prevent its complications. An upstream approach to this problem includes helping women maintain a desirable weight throughout life in an effort to avoid nutrition-related causes of death such as diabetes and CVD.

Maternal Mortality

women experience complications during pregnancy, childbirth, and the postpartum period, 15% of which are life-threatening.

Before 2003, in the United States, **maternal mortality** was defined as the deaths of women while pregnant or within 42 days after termination of pregnancy. The U.S. Standard Certificate of Death and the tenth revision of WHO's *International Statistical Classification of Diseases and Related Health Problems* (ICD-10) revised this definition in 2003 to include late causes of maternal death, defined as occurring more than 42 days but less than 1 year after the end of the pregnancy (Hoyert and Xu, 2012 WHO, 2007). The duration and the site of the pregnancy are irrelevant, and causes are defined as related to or aggravated by the pregnancy or its management but not to accidental or incidental causes.

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The United States ranks seventeenth in maternal mortality among all nations. In 2012 the rate of maternal death was 12.1 per 100,000 pregnancies (WHO, 2012). Reduction of maternal mortality is one of the *Healthy People 2020* objectives for the United States. See Box 17-1 for information on a group approach to prenatal care.

Beginning in the 1950s, maternal mortality rates began to decline in the United States owing to the use of blood transfusions, the availability of antimicrobial drugs, and the maintenance of fluid and electrolyte balance during serious complications of pregnancy and birth. The development of obstetrical training programs and obstetrical anesthesia programs was also important.

Racial discrepancy persists, however, in maternal mortality rates as in life expectancy. Table 17-2 illustrates how nonwhite women have a significantly higher incidence of death during pregnancy than white women. The gap in maternal mortality rates between black and white women has widened over the past several decades. Early in the twentieth century, black women were two times more likely to die of pregnancy-related complications than white women. Currently, black women are nearly four times more likely to die (CDC, 2009). Major risk factors for maternal death include lack of antepartum care and family planning services, inadequate health education, and poor nutrition. An additional risk factor, regardless of race, is advancing age. Women 40 years and older have more than three times the risk of dying from a pregnancy-related cause as women aged 30 to 39 years (National Center for Health Statistics, 2008). Intrinsic maternal factors, such as higher frequency of hypertension and

BOX 17-1 CENTERING PREGNANCY: MODEL FOR PRENATAL CARE

Developed in 1993, the Centering Pregnancy model uses a group approach to prenatal care. The prenatal visit occurs with women of similar gestational ages and includes an assessment with the provider along with group learning, facilitated discussion, and support among women. The group dynamic contributes to health-promoting behaviors and to normalizing attitudes to pregnancy. Women report high satisfaction with the care and go onto have fewer preterm births and babies of optimal weight (Centering Health Care, 2013, Manant and Dodgson, 2011).

TABLE 17-2 MATERNAL MORTALITY RATE PER 100,000 LIVE BIRTHS—SELECTED YEARS

YEAR	TOTAL	WHITES	BLACKS	OTHER (NON-WHITE)
1992	7.8	5.0	20.8	18.2
1999	13.2	9.5	32.2	14.5
2001	14.7	10.2	36.8	9.9
2003	16.8	11.7	43.5	18.9
2005	15.4	10.7	38.7	15.9

Data from Berg CJ, Callaghan WM, Syverson C, Henderson Z: Pregnancy-related mortality in the United States, 1998 to 2005, *Obstet Gynecol* 116(6):1302-1309, 2010.

greater likelihood of uterine hemorrhage, help explain this increase in the mortality rate among older mothers.

In 2005, maternal mortality in the United States was 17 per 100,000 live births, up from 12 births in 1990 (Hogan et al, 2010). Historically, the leading cause of maternal death is pulmonary embolism (17%), followed by pregnancy-induced hypertension, ectopic pregnancy, hemorrhage, stroke, and anesthesia (Cunningham et al, 2010). Of growing concern are the increasing cesarean section rate, the rising incidence of maternal obesity, and the greater age of mothers, all of which may be contributing to the rise in this rate (Kaiser Daily, 2009). Death associated with legal surgical abortion is rare in the United States, with 12 cases reported in 2008 (CDC, 2012). Complications that result in death from legal abortion relate to the woman's age, the type of procedure, the gestational age of the fetus, and general health problems at the time of the abortion (Cates, Ellertson, and Stewart, 2004).

A medical, or induced, method of abortion using mifepristone (i.e., RU-486), an antiprogestin medication, together with prostaglandins has been used in the United States since September 2000. This method is as effective as surgical abortion and is considered a safe alternative to surgical abortion in pregnancies of less than 49 days (7 weeks). In 2005, 9.9% of the 820,151 legal abortions in the United States employed this method. Curettage as an abortion procedure is still the most widely used (Gamble et al, 2008).

Abortion is a controversial issue for providers and for the women in their care. Adequate access to affordable family planning services are key to decreasing the need for elective abortions. Consider statement by Dr. Jocelyn Elders (2009): "I never knew a woman who needed an abortion who wasn't already pregnant." Nurses must continue to keep abreast of all available pregnancy prevention and termination options to provide the best counsel for women.

Ectopic pregnancy is the leading cause of maternal death in the first trimester. Since the 1980s, the incidence of ectopic pregnancy has decreased from 1.15 to 0.50 per 100,000 live births, the cause of death being hemorrhage in 67% of cases. Racial discrepancy is evident, with rates 6.8 times higher in African Americans. Rates are also 3.5 times higher in women older than than 35 years than in those younger than 25 years. The rates are possibly higher because sexually transmitted diseases (STDs) are diagnosed more frequently in this older population and may

interventions for women at risk for acquiring STDs are critical in reducing a woman's risk for an ectopic pregnancy. An important task of health care providers is to educate women and men about methods to reduce sexual health risk-taking behaviors. Additional risk factors for ectopic pregnancy include tubal pathology, previous ectopic pregnancy, tubal surgery, and the use of intrauterine contraceptive devices.

Morbidity Rate

Hospitalizations

The 2007 National Hospital Discharge Survey reported that more women than men are hospitalized each year in the United States (Hall, et al, 2010). Pneumonia resulted in an average hospital stay of 5.0 days, which occurred most frequently among women aged 65 or older. Fractures accounted for an average 5.1 days, malignant neoplasms for an average 6.5 days, and diseases of the heart for an average 4.4 days. The primary reason for hospitalization was childbirth, followed by circulatory, digestive, and respiratory diseases, and finally injury or poisoning (DeFrances et al, 2008).

The prospective payment system for hospitalization resulted in a greater demand for skilled nursing services in the home. After community members have been hospitalized for any of several of these conditions, community health nurses may provide ongoing nursing care in the home by referral. Nurses practicing in home environments must be prepared to deliver "high-tech" and "high-touch" services. Chapter 33 discusses home health care in detail.

Chronic Conditions and Limitations

Women are more likely than men to be disabled by chronic conditions. Arthritis and rheumatism, hypertension, and impairment of the back or spine decrease women's activity level more often than they affect their male counterparts. In fact, twice as many women (24.3%) as men (11.5%) are limited in activity from arthritis and rheumatism. Women are more likely than men to have difficulty performing activities such as walking, bathing or showering, preparing meals, and doing housework (CDC, 2009f).

Functional limitations may require home health care that community health nurses supervise and deliver. Nurses plan and implement interventions on the basis of functional assessments. Each care plan facilitates optimal resumption of the individual's independence in personal care activities.

Surgery

Women are more likely than men to have surgery. Hysterectomy is the second most frequently performed major surgical procedure among women of reproductive age after cesarean section. Approximately 600,000 hysterectomies are performed each year (CDC, 2008). Hysterectomy rates for women in the south are slightly higher than those in the northeast (6.3 and 4.9 per 1000 women, respectively). Overall, rates of hysterectomy decreased from 5.4 to 5.1 per 1000 in the years 2000 through 2004 (Whiteman, Hillis, and Jameson, 2008).

The most common reason for hysterectomy is uterine fibroids or leiomyoma, which contributes

Optional procedures are becoming available to women. Myomectomy—removal of only the tumors with repair of the uterus—uterine artery ablation, and the use of a gonadotropin-releasing hormone to shrink the tumors can decrease the need for hysterectomy, but women may not know about these alternatives. Community health nurses function as advocates for women and can provide health education programs related to alternatives to hysterectomy, indications for hysterectomy and oophorectomy (i.e., removal of ovaries), and information regarding the type of surgical approach and the purpose of a second opinion. Second opinions and higher levels of education tend to lower the rate of hysterectomies (Finkel and Finkel, 1990).

Birth by **cesarean section** is the most prevalent surgical procedure experienced by women in the United States and accounts for 32% of births. This rate has gone up more than 50% since 1996 (Martin, Hamilton, and Ventura, 2011). Several factors contribute to the high rates of C-section, including physician fear of malpractice suits, routine use of early induction of labor, and epidural anesthesia. The technology of fetal monitoring has been shown to increase the C-section rate without improving neonatal outcomes.

Mental Health

The most frequently occurring interruption in women's mental health relates to depression. Well-controlled epidemiological studies consistently demonstrate that women experience depression at two to three times the rate of men (American Psychological Association, 2005). Symptoms of depression include depressed mood, apathy, anxiety, irritability, and thoughts of death and suicide (Evans et al, 1999). Unique to women are atypical symptoms including anxiety, increased appetite, weight gain, and somatic complaints along with increased rates of comorbid conditions. Women are more likely to attempt suicide but less likely to be successful (Urbanic, 2009). Women with socioeconomic barriers, such as lower income and lower educational levels, racial/ethnic discrimination, unemployment, poor health, single parenthood, and high-stress jobs, are at greater risk for depression than women with higher educational levels or higher economic status. Other risk factors are childhood negligence and abuse, parental death, negligence, and alcoholism (Urbanic, 2009).

Nurses practicing in community health settings should be aware of the signs and symptoms of depression and should identify referral sources for professional help within the community. The community health nurse plays a vital role in identifying mothers who suffer from postpartum depression. The CDC (2008d) reports that up to 12% of women suffer postpartum depression that interferes with a woman's ability to care for her self, baby, and family. The nurse needs to also be aware of the impact a mother's depression may have on her child's development and family functioning. A woman experiencing depression displays a variety of symptoms, including depressed mood, weight changes, sleep disturbances, and fatigue among others which and be found in the Diagnostic and Statistical Manual of Mental Disorders (APA, 2013).

Social Factors Affecting Women's Health

Health Care Access

In 2012, 18.2% of the U.S. population, or 48.2 million U.S. citizens, lacked health insurance coverage, (CDC, 2012e). Owing to the nature of their employment, women frequently lack health

may rely on home remedies, over-the-counter drugs, or folk healers for health care. Older women on fixed incomes may have difficulty meeting co-payments required by Medicare and paying for prescription medications. Many senior citizens have paid hospitalization insurance premiums for policies that fail to meet the gap.

Education and Work

In the workplace, women traditionally predominated as secretaries, administrative assistants, registered nurses, teachers, cashiers, and retail sales people. However, in the 1980s, more women began to enter professions traditionally held by men (e.g., lawyers, physicians, and dentists), and in 2008, more than half (51%) of young professionals were women (U.S. Department of Labor, 2008). In 1970, 55.4% of all women aged 25 or older were high school graduates, compared with 81.6% in 1995 and 85% in 2003. Of this same age-group in 2003, 25.7% had completed college, which was more than three times the 1970 rate of 8.1% (U.S. Census Bureau, 2005). A growing number of women have earned degrees in traditionally male-dominated professions. Table 17-3 reflects the

TABLE 17-3 PERCENTAGES OF DEGREES RECEIVED BY WOMEN

DEGREE	1970	1980	1988	1996	2002	2007
Medicine (MD)	8.4	23.4	33.3	40.9	44.4	49.2
Dentistry (DDS or DMD)	0.9	13.3	26.7	35.8	38.5	44.5
Law (LLB or JD)	5.4	30.2	40.8	43.4	48.0	47.6
Theology (BD, MDiv, or MHL)	2.3	13.8	19.3	23.3	33.2	33.2

From U.S. Department of Education: *Digest of education statistics,* Washington, DC, 2008, Author.

changes occurring in percentages of women receiving degrees in medicine, dentistry, law, and theology.

Employment and Wages

In 2008, 46.5% of the workforce were women. In addition, more than half (62%) of women with young children (younger than 6 years) were working outside the home (U.S. Department of Labor, 2005). In 1950, only 12% of women were combining these roles (Chadwick and Heaton, 1992).

Several questions concern women's health and well-being relate to employment issues. A review of female-dominated versus male-dominated jobs discloses inequalities in wage and salary scales; despite the diminishing gap between women's and men's incomes, there is still much room for improvement. Table 17-4 depicts median annual income by sex and ethnicity for both men and women (DeNavas-Walt, Proctor, and Smith, 2011). Disparities in income, based on sex and ethnicity, are clear.

Women heads of households and their children are the poorest aggregate in the United States

resources for families in need. The community health nurse often needs to act as case manager and advocate for families with social service agencies and other public entities.

Working Women and Home Life

Added to inequalities outside the home are inequalities within the home. A working woman is less likely to have a spouse or partner help with the home and children. Even when a spouse or partner is present, the burdens of housework and child care usually fall more heavily on the woman, regardless of ethnicity. Mothers generally spend more time than fathers preparing meals and training and disciplining their children. These multiple-role demands and conflicting expectations contribute to stress (American Academy of Pediatrics, 2005, Matthews and Power, 2002).

However, changes are occurring, as both younger and older men now report spending more time in family activities than middle-aged men. Black and Hispanic men tend to spend a little more time working at family tasks than white men. Books and articles encourage wives and husbands to make their needs known, encouraging greater communication

TABLE 17-4 MEDIAN ANNUAL EARNINGS BY TYPE OF HOUSEHOLD IN 7 YEARS BETWEEN 1969 AND 2011

HOUSEHOLD TYPE	1969	1979	1989	1999	2003	2007	2011
Married couple with children	41,453	47,793	50,613	56,827	62,405	72,785	74,130
Female householder with children	16,327	18,468	17,651	26,164	29,307	33,370	33,637
Male householder with children	33,749	36,619	34,646	41,830	41,959	49,839	49,567

From DeNavas-Walt C, Proctor D, Smith J: *Income, poverty, and health insurance coverage in the United States: 2011* (U.S. Census Bureau Current Population Reports), 2012. Retrieved from <http://www.census.gov/prod/2008pubs/p60-243.pdf>.

TABLE 17-5 CHARACTERISTICS OF BLACK, WHITE, AND HISPANIC FEMALE-HEADED HOUSEHOLDS: 2009

CHARACTERISTIC	BLACK	WHITE	HISPANIC
Never married	51.5	27.4	39.7
Married and spouse absent	12.1	11.3	17.8
Widowed	11.1	16.9	9.6
Divorced	21.7	40.6	26.4
Number of children per female-headed household	1.87	1.65	1.82

Modified from U.S. Census Bureau: *Current population reports* and *America's families and living arrangements: 2007*. Available from <http://www.census.gov/population/www/socdemo/hh-fam/cps2007.html>.

Family Configuration and Marital Status

Women are members of **multiple family configurations** (e.g., nuclear families, extended family units, single-parent units, families of group marriages, blended family units, adoptive family units, non-legal heterosexual unions, and lesbian family units). This diversity causes changes in women's roles within families. Whether or not they function in a traditional role, most women do whatever is necessary to maintain the integrity of their families. Early assessment of the strengths of family units by the community health nurse provides a database for positive nursing interventions established on upstream strategies to enhance each family's level of health and well-being.

Many women are delaying marriage, and an increasing number are not marrying. Overall, marriage rates have remained stable, perhaps because the increasing number of remarriages balances the declining rate of first marriages. When a relationship ends in divorce or separation, more women than men have the responsibility of providing for themselves and their children. According to the U.S. Census Bureau (2007), single-parent households in 2006 represented 9% of all households with children, and a third of all children lived with a single parent. Single mothers are most often the head of a single-parent family. Even in the face of changing lifestyles, divorce, and increased mobility, which leads to long-distance relationships, most Americans report that they remain connected to their extended families through parents, grandparents, siblings, aunts, and uncles.

One contemporary family configuration involves single women with one or more adopted children. Single-parent adoptions are legal, and a growing number of single women are becoming adoptive parents. An often-ignored family structure is one headed by a lesbian parent. Lesbians who become parents have needs similar to those of all mothers. Many cities have lesbian-gay parent groups that provide support, anticipatory guidance, and strategies for coping in society. However, lesbian women often neglect their own health. This self-neglect may be traced to hostile and rejecting attitudes of health care providers (Zeidenstein, 2004). However, the parents or guardians must remain healthy to ensure the child's well-being.

Health Promotion Strategies for Women

A woman's ability to carry out her important roles can affect her entire family; therefore women should receive services that promote health and detect disease at an early stage. Early detection and improved treatments for disease allow women to return to work or remain working throughout the course of an illness. Although work is essential to the economic and social well-being of many women's families, the workplace itself creates physical and social stress. As more women enter the workforce and face many of the same risks and stressors as men, it is not surprising that their formerly favorable mortality and morbidity rates have been declining.

Many women seek information that will allow them to be in control of their own health. Since the early 1970s, women have met in self-help groups to develop a better understanding of their own health needs. Some of the health behaviors that women learn in self-help groups are the importance of nutrition and exercise, breast self-examination (BSE), pregnancy testing and contraceptive awareness; recognition of the early signs of vaginal infections and STDs; and awareness of the variations in female anatomy and physiology.

Consumer (http://www.fda.gov/fdac/), the official consumer site of the FDA, which reports on studies that cover a variety of women's health issues, such as mammography standards, menopause, treatment for STDs, eating disorders, infertility, cosmetic safety, silicone breast implants, and osteoporosis. Another resource is the U.S. Department of Health and Human Services' Office on Women's Health (www.WomensHealth.gov) which highlights positive health behaviors for women and girls. The community health nurse can use models such as Pender's Health Promotion Model in teaching health behaviors that lead to general health promotion among women. Pender notes that health-promoting behaviors are directed toward sustaining or increasing the level of well-being, self-actualization, and fulfillment of a given individual or group (Pender, Murdaugh, and Parsons, 2006). However, because many models were developed for the middle class, they may not be useful to community health nurses working with low-income families.

Knowledge deficits related to body awareness prevail among all women, regardless of socioeconomic or educational level. For example, a woman may ask whether she will menstruate after a hysterectomy, whether she should perform a BSE, or what she can do to prevent recurrent episodes of vaginitis. Nurses can play an instrumental role in helping women develop a greater sense of self-awareness. Furthermore, community health nurses can remove the mystery surrounding the woman's body and encourage clients to ask previously unmentionable questions.

Chronic Illness

Included among chronic diseases that may affect a woman during her life span are coronary vascular disease and metabolic syndrome, hypertension, diabetes, arthritis, osteoporosis, and cancer.

Coronary Vascular Disease and Metabolic Syndrome

Evidence suggests that cardiovascular disease (CVD) and metabolic syndrome in most women are preventable. CVD is caused by atherosclerosis, which results in buildup of plaque that in turn narrows arteries, decreasing blood flow to the heart muscle. Metabolic syndrome is a group of risk factors that have been linked to an increased risk of cardiovascular events. These factors are abdominal obesity (waist circumference more than 35 inches in women), dyslipidemia (elevated triglyceride and low high-density lipoprotein cholesterol values), insulin resistance, and elevated blood pressure. The underlying etiology of metabolic syndrome is related to the combination of inactivity, obesity, and genetics.

At-risk women have nonmodifiable risk factors such as increasing age, race, gender, or family history of CVD and diabetes. Where the greatest impact can be made is with the modifiable risk factors, which are as follows (AHA, 2013):

- Cigarette smoking
- Obesity
- Diet high in calories, total fats, cholesterol, refined carbohydrates, and sodium
- Glucose intolerance
- Elevated serum lipid values

- Stress
- Alcohol use

Education by community nurses can assist women in identifying their risk of CVD and metabolic syndrome along with health behaviors that decrease modifiable risk factors. Also important are evidence-based recommendations for high-risk women with existing CVD, including aspirin therapy and omega-3 fatty acid supplementation (Mosca, 2007).

Hypertension

The latest report of the Joint National Committee on Prevention, Detection, Evaluation, and Treatment of High Blood Pressure defines **hypertension** as blood pressure of 140 mm Hg or greater systolic and 90 mm Hg or greater diastolic. The guidelines include the category "prehypertension," which refers to systolic pressure 120 to 139 mm Hg and/or diastolic pressure 80 to 89 mm Hg. Clients with prehypertension are at increased risk for progression to hypertension and require lifestyle modifications to prevent CVD (Chobanian et al, 2003). Essential hypertension is the most common type of chronic hypertensive disorder in women of childbearing age, accounting for 85% of such cases. It is also responsible for approximately one third of all hypertension cases during pregnancy. Hypertension is more common in women than in men and affects more blacks than whites. Additional factors associated with primary hypertension are age (older than 35 years), family history of hypertension, obesity, cigarette smoking, and diabetes mellitus (AHA, 2012). Hypertension usually starts with an asymptomatic phase; therefore, every woman should be screened on an average of every 2 years beginning in her teenage years. Diagnosis is crucial to prevent or modify possible complications of this disease.

Diabetes

According to the U.S. Department of Health and Human Services (2011), 25.8 million people (8.3% of the population) have diabetes in the United States, and the number is growing every year. Furthermore, although an estimated 18.8 million have been diagnosed, some 7.0 million people are not aware they have the disease. In previous years, community health nurses have worked to educate women to assume responsibility in their management of diabetes mellitus. More recently, community health nurses have been actively involved in education and screening programs for groups at high risk. Included in these groups are individuals who have a family history of diabetes, those who are obese, and older adults. Nurses who design education programs need to be aware of the ethnic differences in the prevalence of diabetes. African American, Hispanic, American Indian, and Asian women are two to four times more likely to have diabetes than their non-Latino white counterparts (USHHS, 2011).

According to Cunningham and colleagues (2010), pregnancy is potentially diabetogenic. Pregnancy may aggravate the condition, and clinical diabetes may appear in some women only during pregnancy. Consequently, screening for diabetes is routine in pregnancy.

Controversy surrounds the most effective method of screening for diabetes, but regardless of the selected method, the nurse is involved in explaining the purpose of the screening and how to prepare for the tests. In most public health settings, the nurse is responsible for explaining the

Arthritis

In 2009, 50 million people in the United States, nearly one in five adults, were afflicted with arthritis.

The incidence of arthritis is higher in women than in men: approximately 25.9 million women have the condition, compared with 18.3 million men (CDC, 2010).

Osteoarthritis (OA) is the most common form of the disease. It is characterized by degeneration of the joints and is more common with increasing age and in women. OA of the knee is the leading cause of disability in the U.S. Modifiable risk factors for OA include excess body mass, joint injury, occupation, and estrogen deficiency (CDC, 2008b).

Rheumatoid arthritis (RA) can affect anyone, but for every man affected, 2.5 women have the disease. Onset usually occurs between 30 and 50 years of age. RA often goes into remission in a pregnant woman, although symptoms tend to increase in intensity after the baby is born, and RA develops more often than expected the year after giving birth. Although women are two to three times more likely to have RA than men, men tend to be more severely affected when they do have it (Arthritis Foundation, 2014).

Arthritis is the leading cause of disability in the United States (CDC, 2007b). Nursing interventions focus on prevention of joint deformity and modification of lifestyle if necessary.

Osteoporosis

Osteoporosis is a major disorder affecting women, occurring in 25% to 50% of postmenopausal women. Although men may experience osteoporosis, it is four times more common among women. The National Osteoporosis Foundation (2014) estimates that of the 10 million Americans who have osteoporosis, 8 million are women and 2 million are men. An additional 34 million Americans have osteopenia. Half of all non-Hispanic white women in the United States will experience an osteoporosis-related fracture during their lifetimes. The most serious complication of osteoporosis is hip fracture, which is experienced by 280,000 Americans annually. Approximately 24% die within a year from complications of hip fracture (U.S. Department of Health and Human Services [USDHHS], 2000).

Postmenopausal white women are at highest risk for osteoporosis. Loss of bone begins at an earlier age in women and proceeds twice as rapidly as in men. Guidelines issued by the National Osteoporosis Foundation recommend bone mineral density tests for selected postmenopausal women and the use of oral bisphosphonates as the first-line pharmacological treatment of osteoporosis. In light of the results of the Women's Health Initiative Study showing that non-estrogen therapies fail or cause intolerance to side effects, hormone replacement therapy is currently considered second-line therapy for the disease (Wei et al, 2003). Osteoporosis has no cure; therefore prevention is especially important early in life. Prevention involves an awareness of dietary practices such as maintaining a correct balance of calcium, vitamin D, and protein throughout life, in addition to regular weight-bearing, muscle-strengthening, and aerobic exercise.

Nurses in ambulatory health practices should encourage women to become more knowledgeable

Breast Cancer

The incidence of **breast cancer** has been rising since the 1950s. Currently, one of every eight women will have breast cancer sometime in her life. The chance of dying from breast cancer is about 1 in 35. The National Cancer Institute (NCI) (2013c) estimated that 226,870 women in the United States will have been found to have invasive breast cancer in 2013 and that 39,510 will die from it. Risk factors include aging, personal or family history (especially mother or sister) of breast cancer, early age at menarche, late age at menopause, never having children, and having a first child after age 30. Female gender and aging are the most significant risk factors for breast cancer (ACS, 2008). An additional risk is a genetic mutation of tumor suppressor genes, known as *BRCA1* and *BRCA2*. The lifetime risk for women with this mutation to be diagnosed with breast cancer is 60%, compared with 12% for the general population. Additional risks are for ovarian cancer, with a 40% lifetime risk for those who inherit the gene, compared with 1.4% for the general population (NCI, 2013a). Genetic testing is available, and the rights of those tested is protected legally, so insurers and employers cannot use this information to discriminate against those testing positive (Genetic Information Nondiscrimination Act, 2008, NCI, 2013a & 2013d).

In 2009 the United States Preventive Services Task Force (2009) published recommendations based on review of scientific evidence that women should not have routine mammography screening between ages 40 and 49 years but should have biennial screenings between the ages 50 and 74 years. This was a major shift from the recommendation of annual screening mammograms for women older than 40 years. The researchers cited the reason for this recommended change as improvements in mammography screening films that lead to more accurate diagnosing. They also cited the high cost and harmful psychologic effect of screening on women related to unnecessary diagnostic testing resulting from the high number of false-positive results. Despite that recommendation, the America Cancer Society (2012) continues to recommend annual mammograms after age 40, whereas the NCI (2013c) recommends screening every 1 to 2 years, except in women at higher risk, who should begin prior to age 40. Key to mammogram screening is a woman's informed choice based on individual risk factors for development of breast cancer as well as the benefits (early detection and improved survival) and potential harms (false-positive results or missed cancer).

The current position of the U.S. Preventive Services Task Force is that there is insufficient evidence to recommend for or against the teaching of BSE (Thomas et al, 2002). Studies support the contention that BSE contributes to awareness, helping women be alert to changes in their breasts. However, for women 40 years and older, the greatest potential to save lives from breast cancer is through early detection with clinical breast examination and mammography (ACS, 2012).

The ACS (2012) recommendations for BSE are as follows:

- BSE's benefits and limitations should be taught to women beginning their 20s.
- The correct technique for BSE should be taught to improve detection of abnormalities.
- Recommendations for the frequency of BSE are no longer specified.

- There may be an added benefit for the woman at higher risk of breast cancer to perform regular BSE.

In addition to annual mammography and clinical breast examinations, breast cancer detection may involve ultrasound, magnetic resonance imaging, positron emission tomography, and genetic testing for *BRCA1* and *BRCA2* (NCI, 2013a). Box 17-2 lists resources that provide information about breast cancer and early detection.

RESEARCH HIGHLIGHTS: Breast Cancer Study

A study of the data collected in the U.S. National Cancer Institute's Surveillance, Epidemiology, and End Results (SEER) program demonstrated an increase in the incidence of breast cancer with distant involvement in younger women. From 1976 to 2009 there was a 2.07% average compounded increase in this diagnosis in women 25 to 39 years old but not in older women. This increase was highest in Hispanic and African American women (Johnson, Chien, and Bleyer, 2013).

The Centers for Disease Control looked at data from United States Cancer Statistics (USCS) to determine whether race impacted breast cancer outcomes. Black women had a lower incidence of breast cancer diagnosis than white women, yet cancers were diagnosed at more advanced stages and the death rate was 41% higher in the former group from 2005 through 2009 in the United States. Self-reports of mammogram frequency did not differ in the two groups. However, research shows that in black women, differences do exist in breast cancer screening, follow-up, and treatment after diagnosis, leading to greater mortality (Cronin et al, 2012).

Lung Cancer

Although breast cancer is the most common cancer among women after skin cancer, cancer of the lung and bronchus is responsible for more cancer deaths. The NCI (2013d) predicted that in 2013, 109,690 women will have been diagnosed with lung cancer. Lung cancer is responsible for more deaths yearly in U.S. women than breast cancer. From 2005 to 2009, 39.6 of every 100,000 women died from lung cancer, compared with 23 per 100,000 from breast cancer. In fact, lung cancer kills more women annually than breast, ovarian, and uterine cancers combined (ACS, 2008). Between 1990 and 2003, there was a 60% increase in the number of new cases of lung cancer in American women, whereas the number of men diagnosed with lung cancer remained stable (Patel, 2005). The rise in the incidence of lung cancer in women is due primarily to an increase in their tobacco use: 85% to 90% of all clients who have lung cancer have a history of cigarette smoking. Yet lung cancer develops in only 20% of cigarette smokers, suggesting that the cause of lung cancer is multifactorial.

Widely accepted risk factors for lung cancer include exposure to environmental tobacco smoke, certain occupational exposures (especially asbestos), genetic predisposition, sex, gender, diet, chronic lung disease, and a history of tobacco-related cancer (Rivera and Stover, 2004). Studies have shown that the risks for development of lung cancer are different in women and men and that lung cancer appears to be a biologically different disease in women. Women smokers are

Although medical treatment may be similar for men and women, the symptom distress, quality of life, and demands of illness experienced by women may be different from those in men because the competing household, child care, and other role-related demands take a toll on many women (Sarna and McCorkle, 1996). Further, women with advanced lung cancer

BOX 17-2 RESOURCE MATERIALS FOR BREAST CANCER

BCCCP (Breast and Cervical Cancer Control Program)

Federally funded free breast and cervical cancer screening through state departments of community health

American Cancer Society

Website

Breast Cancer: Early Detection (available from http://www.cancer.org/acs/groups/cid/documents/webcontent/003165-pdf.pdf)

Publications

*Breast Cancer Awareness Information Packet**

*ABC's of Breast Health**

*The Older you Get, the More you Need a Mammogram** *(pamphlet)*

Breast Health(card)

*How to Check your Breasts** *(pamphlet)*

Let's Talk about Mammograms (pamphlet)

For copies, call (800) ACS-2345. For more information, visit http://www.cancer.org/acs/groups/cid/documents/webcontent/003165-pdf.pdf.

National Cancer Institute

Website

General Information About Breast Cancer (available from http://www.cancer.gov/cancertopics/pdq/screening/breast/Patient/page2)

Publications and Videos

Guidelines for Screening Mammography (pamphlet)

A Mammogram Could Save Your Life[*]

Take Care of Your Breasts[*]

For copies, call (800) 4-CANCER. For more information, visit http://www.cancer.gov/cancertopics/pdq/screening/breast/Patient/page2.

U.S. Department of Health and Human Services, and Health Care Financing Administration

Get a Mammogram: A Picture That Can Save Your Life

(pamphlet)

Medicare Covers Mammograms (pamphlet)

For copies and more information, call (800) 4-CANCER (breast cancer and mammograms) or (800) MEDICARE (Medicare coverage).

* Specifically designed for low-literacy audiences; some resources are available in Spanish and English.

report more psychological symptoms than men (Hopwood and Stephens, 1995).

Lung cancer is often a fatal illness because it is diagnosed most commonly at an advanced stage; early detection is difficult, and treatment for advanced disease is not as effective. Women appear to have a slight survival advantage over men: the 5-year survival rate is 15.6% for women with lung cancer, and 12.4% for men (Patel, 2005).

The primary factor in preventing lung cancer is for individuals either to never start smoking or to quit smoking. Nurses must work with other health care providers to reverse the morbidity and mortality rates related to this disease. The Agency for Healthcare Research and Quality has developed a useful guideline for health care professionals to assist women and their families in smoking cessation efforts plus summaries of more than 400 guidelines on a wide variety of topics, which can be found on their website (http://www.ahrq.gov).

Gynecological Cancers

About 20% of all malignant diseases in women occur in the genital tract. The incidence of invasive cervical cancer has declined dramatically as a result of regular Pap smears, which allow for identification of precancerous conditions. However, 3909 women died from the disease in 2009 (CDC, 2013a). Cervical cancer used to be the leading cause of cancer death, but the use of cytological screening has decreased the mortality rate. One major risk factor is infection with HPV, which is linked to 65% of cervical cancer cases. Other risk factors include

infection and inflammation. It is uncommon for women who undergo regular screening to be diagnosed with cervical cancer.

Current guidelines recommend cervical cancer screening to begin approximately 3 years after a woman begins having vaginal intercourse, but no later than 21 years of age. Screening should then be performed every 3 years until the age 65 using regular or liquid-based Pap smear tests, or every 5 years with a co-test for HPV DNA (CDC, 2013a). HPV DNA testing is not recommended for routine screening in adolescent women, because the prevalence of HPV is 60% to 80% at this age, and more 90% of those who test positive will clear the HPV within 1 to 2 years of their sexual debuts (Wright et al, 2006). HPV infection is linked to 5% of cancers worldwide, 85% affect the anus and at least half of those in the vagina, vulva, and throat (NCI, 2013b). Current recommendations are that girls and boys be vaccinated for HPV beginning at the age of 11 or 12 years. As of June 2012, more than 46 million doses of HPV vaccine had been administered without serious safety concerns. Because of the Affordable Care Act, vaccinations are covered by private insurers and through the Vaccines for Children Program for eligible children who would otherwise not have access (CDC, 2012).

According to the ACS (2013a), the incidence of carcinoma of the endometrium has increased lightly for black women from 2005-2009, but remained stable for white women. This drop has been attributed to the decline in the use of unopposed exogenous estrogen to control menopausal symptoms. This cancer is commonly found in women during their sixth and seventh decades of life (i.e., 80% of women with this condition are postmenopausal). Approximately 7,470 women in the United States died from endometrial cancer in 2009. The incidence of endometrial cancer is highest among white women, but mortality is higher among black women, suggesting disparity in diagnosis and/or treatment. Factors related to its occurrence are obesity, low parity, diabetes mellitus, and conditions in which high circulating estrogen levels are not countered by adequate progesterone levels. The most common sign of endometrial cancer, occurring in 90% of women, is abnormal vaginal bleeding. Postmenopausal women experiencing vaginal bleeding should seek immediate gynecological evaluation.

Cancer of the ovary causes more deaths than any other pelvic malignancy. According to the NCI (2013e), the lifetime risk of ovarian cancer is 1.38%. The incidence increases with age, peaking in women 75 to 79 years old at 56.7 per 100,000. Risk factors include increasing age, nulliparity, never having breastfed, a history of breast cancer, postmenopausal use of hormone replacement therapy, obesity, a family history of breast and ovarian cancer, as well testing positive for the *BRCA* mutation. Protective factors against ovarian cancer include use of oral contraceptives, having and breastfeeding children, tubal sterilization, hysterectomy, and prophylactic oophorectomy (NCI, 2013e).

Ovarian cancer is a silent cancer. Early-stage detection of ovarian cancer is difficult; therefore it has usually reached an advanced stage when discovered. The health professional should be alert to ovarian enlargement on pelvic examination with suspicion that ovarian malignancy may be present, especially in a postmenopausal woman. The most common sign a woman experiences is abdominal enlargement. She may complain that her skirts and slacks are getting tighter in the waist. Any woman older than 40 years who experiences vague digestive complaints that persist and are not explained by another cause must have a thorough evaluation for ovarian cancer. According to the ACS (2008), transvaginal ultrasound and a blood test for tumor marker

Mental Disorders and Stress

Various circumstances and conditions influence the mental health of women. Women face stressful decisions about career and family, and many express anxieties about these decisions. A woman may feel pressured to make decisions regarding childbearing before she has fulfilled her career goals. Deciding to focus on a career may mean decreased authority and the suffering of stress in the workplace. More women are occupying middle-management positions, which are known for creating stress-related illnesses associated with high demands and little or no power. Women combining motherhood and a career have additional decisions, such as whether to work during pregnancy and choice of child care.

A woman's emotional state can be influenced by ovarian function from the onset of menstruation to the cessation of menstrual periods. Depression may be triggered or worsened by premenstrual hormonal changes. Women with a history of depression are also at increased risk for a recurrent episode of depression during the postpartum period, and they also are at risk for depression during the perimenopausal transition (Blehar, 2003). Depression is more prevalent among women than among men. In all age-groups from adolescents through the elderly, approximately two thirds of those affected with depression are women. According to Bhatia and Bhatia (1999), the higher prevalence of depression in women is most likely due to a combination of gender-related differences in cognitive styles, certain biological factors, and a higher incidence of psychosocial and economic stressors.

Mental disorders often go undiagnosed and untreated or undertreated despite the availability of effective treatments. Women may not recognize or correctly identify their symptoms, and even when they do, they may be reluctant to seek care because of stigma associated with mental illness (Blehar, 2003). Community health nurses are in a good position to assess women's moods in diverse aggregates. Being familiar with the symptoms of common mental disorders, nurses can identify these problems and can help women in seek and maintain continuity of care.

Reproductive Health

Community health nurses provide a variety of services in the area of women's reproductive health from menarche through postmenopause. Nurses, in collaboration with other health care professionals, have identified a persistent group of preventable and correctable problems related to maternal-child health. *Healthy People 2020* (USDHHS, 2000b) provides numerous recommendations for improving maternal and infant health, including reduction of cigarette smoking, reduction of alcohol and other drug use, optimal nutrition, improved socioeconomic opportunities (including education), and decreased environmental hazards.

For the *Healthy People 2020* initiative, some of the family planning objectives demonstrated progress. Adolescent pregnancy rates decreased until the year 2005, but a 5% increase occurred between 2005 and 2007 (CDC, 2009b). There were also improvements in rates of adolescent abstinence, contraceptive failure, and condom use. However, health disparities remain an issue for Hispanic and black populations. With *Healthy People 2020* family planning objectives, the focus is on the positive that "all pregnancies should be intended." Examples of *Healthy People 2020* objectives related to family planning are shown in the *Healthy People 2020* box (National Center for Health Statistics, 2012).

single cause of absenteeism from school and work among young women and causes the loss of approximately 140 million working hours annually; therefore the economic influence of this condition is significant.

ETHICAL INSIGHTS: Working With Women's Health

Community health nurses working in the field of women's health will be exposed to ethical dilemmas during their careers. For this reason, nurses must have a working knowledge of the principles of health care ethics. The commonly accepted principles include the following:

- Respect for autonomy
- Beneficence
- Non-maleficence
- Justice

Nursing care revolves around moral values such as compassion, empathy, honesty, trust, and respect. Most encounters will be nonproblematic. Occasionally, nurses may be exposed to clinical situations that challenge their values and beliefs. Clients and family members may, at times, also disagree with the nurse's professional advice/plan. It is important for the nurse to keep his or her personal philosophy, politics, religion, and moral values out of clinical work with individuals and families.

Examples of potential ethical dilemmas related to women's health care are emergency contraception, abortion, assisted reproductive technology, and end-of-life issues.

The average age of menopause in the United States is 51 years. *Menopause* is defined as the cessation of menses for at least one full year, but it is characterized by several years of symptoms as the hormonal shifts occur, called perimenopause (Schuiling and Likis, 2013). At this stage, women's health concerns become focused on the symptoms associated with this transition. The most common complaints are related to vasomotor changes causing hot flushes, increased heart rate, insomnia and night sweats, urogenital atrophy causing incontinence, vaginal dryness and dyspareunia, and mood alterations including irritability, depression, and anxiety (North American Menopause Society, 2012; PubMed Health, 2011). Community health nurses can play a key role in helping women find resources to deal with symptoms and develop an understanding of the normal processes associated with menopause. Also, women in menopause need guidance in promoting a healthy lifestyle because they have an increased risk for development of chronic conditions such as osteoporosis, coronary heart disease, hypertension, and type 2 diabetes.

HEALTHY PEOPLE 2020: Selected Objectives for Family Planning

Objective	Baseline (Year)	Target (2010)	Final (Year)	Target 2020
9-1: Increase the proportion of pregnancies that are intended.	52% (2002)	70%	51% (2002)	56%
9-7: Reduce pregnancies among adolescent females (pregnancies per 1000 females 15 to 17 years of age).	63 (1996)	39	40.2 (2005)	36.2
9-11: Increase the proportion of women who have received formal instruction on birth control methods before turning 18 years of age.	70% (2002)	73%	70.5% (2006-10)	77.6%
9-12: Reduce the proportion of married couples whose ability to conceive or maintain a pregnancy is impaired.	13% (1995)	10%	11% (2006-2008)	10.8%

Data from U.S. Department of Health and Human Services: *Healthy people 2020*, ed 3, Washington, DC, 2010, Author.

Nutrition

One of the most important factors in a woman's reproductive health is her total life nutritional experience from infancy through childhood and adolescence. Obesity has become a major public health concern. The community health nurse is in an advantageous position to provide nutritional counseling. The U.S. Department of Agriculture updates the dietary recommendations every 5 years on the basis of current scientific information. In 2011, the "My Plate" approach to health eating was unveiled. This approach is intended to encourage persons to be mindful of the foods they eat in terms of both portion size and proportion to other foods. One half of the plate should consist of fruits and vegetables, one quarter each for meats/proteins and grains, preferably whole grains. Recommendations also include eating less sodium and fewer sugary foods (U.S. Department of Agriculture, 2013).

Pregnancy may provide a motivational factor for developing an awareness of proper nutrition. During the nutritional assessment of a prenatal client, the community health nurse can take the opportunity to determine dietary habits and initiate a referral to the Special Supplemental Food Program for Women, Infants, and Children (WIC). This program provides food vouchers for pregnant or breastfeeding women, infants, and children who are at nutritional risk.

Good nutrition must include factors other than kinds and amounts of foods. Elements to consider include age, lifestyle, economic status, and culture. For example, when counseling an pregnant adolescent, the nurse can include the primary person responsible for meal preparation. The nurse should include the adolescent in the planning of her diet, asking her to identify foods

Sexually Transmitted Diseases

STDs are commonly found among U.S. women. Community health nurses and other health providers, including physicians, nurse practitioners (NPs), nurse midwives, and social workers, must be prepared to provide age-appropriate STD prevention, education, and counseling.

In 2007, the CDC reported the most common sexually transmitted disease was infection with *Chlamydia trachomatis* (1,108,374 cases), followed by *Neisseria gonorrhea* (355,991 cases). This was the largest number of *Chlamydia* cases ever reported. *Chlamydia* infection is diagnosed three times more in women than men, most likely because of the CDC's recommendation for routine screening of any sexually active woman of childbearing age to prevent infertility. Gonorrhea is also diagnosed more often in women, but particularly in black women, who are diagnosed 15 times more often than white women. The Gonococcal Isolate Surveillance Project (GISP) demonstrated that gonorrhea was becoming resistant to treatment with CDC-recommended fluoroquinolone drugs in 2007, prompting the CDC to revise treatment guidelines (CDC, 2007).

When rates of syphilis, another STD, dropped nearly 90% between 1990 and 2000, the CDC initiated the National Plan to Eliminate Syphilis. However, rates have increased yearly since 2001. Racial disparity in cases of syphilis has improved from 1999, when 29 times more blacks than whites were diagnosed, down to a rate that is now 7 times higher. The major increase in syphilis between 2001 and 2007 has been in men, especially men having sex with men, and less in women (CDC, 2007).

Treatments of STDs are outlined in the CDC guidelines, which are updated regularly and available online (http://www.cdc.gov/std/treatment/2010/default.htm). A vital role of the community health nurse is to follow up with the woman's sex partner(s) who require(s) evaluation and treatment. Partner notification and expedited treatment, along with avoidance of sexual activity until treatment/cure, are key to stopping the spread of STDs. In addition to medications, women and their partners need individualized counseling on reducing risky sexual behaviors.

Human Immunodeficiency Virus and Acquired Immunodeficiency Syndrome

Today, the HIV/acquired immunodeficiency syndrome (AIDS) epidemic represents a growing and persistent health threat to women in the United States, especially young women and women of color. According to the CDC (2009c), in 2005, HIV infection was the third leading cause of death for African-American women aged 25 to 44 years and was the fourth leading cause for those aged 45 to 54 years. Among women diagnosed with HIV/AIDS, 64% are black, yet black women make up only 13% of the general U.S. population. The majority of infants born with HIV are black. For all ethnicities, primary transmission in men occurs through sexual contact with other men, whereas in women, the route is high-risk heterosexual contact. In 2005, HIV disease was the fifth leading cause of death among Hispanic women aged 25 to 44 years. Worldwide, AIDS is a leading cause of death among young women (WHO, 2004).

- Lack of awareness regarding disease and condom use
- Sexual inequality in relationships
- Biological vulnerability to sexually transmitted infections
- Substance abuse
- Poverty; dropping out of school
- Stigma surrounding testing and treatment
- Working in the sex trade
- Participants in unprotected sex

In November 2008, the USDHHS released the updated *Guidelines for the Use of Antiretroviral Agents in HIV-1 Infected Adults and Adolescents* (USDHHS, 2013). Treatment guidelines continually evolve with new research and experience. The use of antiretroviral drugs has reduced the rate of death for HIV disease in women, which peaked in 1993-1994 at 6 per 100,000, down to 2.5 per 100,000 (CDC, 2009c). It is imperative that the community health nurse working with this population stays abreast of the current trends for both counseling and treatment options. Community health nurses also must target at-risk populations and campaign for the use of safer sex practices and routine HIV testing for those at risk.

Other Issues in Women's Health

Unintentional Injury or Accidents and Domestic Violence

Although unintentional injury affects women less commonly than men, several areas of concern still exist for women. For example, older women are at increased risk for accidents such as falls. Falls account for the majority of serious unintentional injuries and lead to 40% of all deaths from injury in people older than 75 years (Stevens, 2005). Factors that may be responsible for this major cause of injury among older adults are an unsteady gait, reduced vision, and a hazardous environment. Older women experience an increasing number of falls; therefore the nurse must identify the preventable factors. Whether working with older adults in the home or in institutional settings, nurses must be knowledgeable about hazards that may be corrected to decrease the incidence of falls.

Domestic violence is the single largest cause of injury to women between the ages of 15 and 44 in the United States—more common than muggings, car accidents, and rapes combined. Each year 4.8 million women are battered. In 2004, 1,158 of these women died from their injuries. Two thirds of women are abused by a current or former intimate partner (CDC, National Center for Injury Prevention and Control, 2006).

Abuse in women is often explained as accidental injury. Approximately 6% of visits made by women to emergency departments are for injuries that result from physical battering by their husbands, former husbands, boyfriends, or lovers. Domestic violence includes physical, sexual, and psychological attacks and economic coercion (Warshaw, Ganley, and Salber, 1995).

Nurses employed in community health settings need to know how to make assessments, provide support, and make referrals to agencies dealing with domestic violence (see Boxes 17-3 through 17-5). Understanding the state laws related to reporting known or suspected domestic violence is important. The American Medical Association and American Nurses Association advocate that all women should be assessed for intimate partner violence. Questions should be posed privately, in nonjudgmental but specific terms (i.e., "Do you feel safe?" "Have you ever been hit, punched, slapped, or kicked?") with follow-up questions if the woman responds "yes" (Kovach, 2004). Many nurses are past or current victims of abuse; assessing abuse with clients can evoke painful emotions that the nurse may not be ready to confront. Chapter 27 contains additional information about domestic violence.

Disability

More women than men have disabilities resulting from acute conditions, but women experience fewer disabilities resulting from chronic conditions because they report their symptoms earlier and receive necessary treatment. There are 56.7 million disabled persons, which is 18.7% of the population and 19.8% are women (Brault, 2012). Women report proportionately more days of restricted activity than men.

BOX 17-3 DOMESTIC VIOLENCE STRATEGIES FOR NURSES

It is important not to re-victimize the woman who admits to intimate partner violence. Avoid asking the woman "why" or talking negatively about the abuser. Sit down with her, give her time to talk, listen actively. Provide her with privacy and confidentiality as much as you can. Useful statements include:

"I believe what you are telling me."

"I am here for you."

"This will only get worse."

"You deserve better."

"I am afraid for you safety."

"You deserve to be treated with respect."

"It is a crime."

This approach will empower the victim. Episodes of imminent danger must be reported to the police. An emergency plan should be formulated with the woman. Resources including phone numbers for hotlines and the local women's shelter should be provided in a format that is easy to conceal (such as on a business card).

BOX 17-4 SIGNS OF INTIMATE PARTNER VIOLENCE

- Overuse of health services
- Nonspecific, vague complaints
- Missed appointments
- Injuries without legitimate explanation
- Injuries not matching reported cause
- Untreated serious injuries
- Intimate partner describing the cause of injuries
- Intimate partner refusing to leave the woman's room

Adapted from Krieger CL: Intimate partner violence: a review for nurses, *Nursing Women's Health* 12(3):224-334, 2008.

BOX 17-5 RESOURCES FOR VICTIMS OF DOMESTIC VIOLENCE

National Domestic Violence Hotline: 1-800-799-SAFE (7233) and http://www.thehotline.org

Dating Violence on Women's Health.gov: http://womenshealth.gov/violence-against-women/

National Coalition Against Domestic Violence: http://www.ncadv.org

Office on Violence Against Women: http://www.ovw.usdoj.gov

Disabling conditions limit the physical functional abilities of many women, but the health care delivery system has often overlooked the unique needs of this aggregate. In planning care for disabled women, community health nurses should focus attention on enabling women to strengthen their capabilities. In addition, nurses should be sensitive to barriers in the clinical setting that affect the access of disabled women to health care services. Chapter 21 discusses the needs of disabled people in greater detail.

Major Legislation Affecting Women's Health

Several legislative acts have direct or indirect influence on the health of women. Many changes have been made in the past five decades that have the potential for improving the health and welfare of all women.

Public Health Service Act

targeted by the PHS Act include those disabled by specific diseases, victims of sexual abuse and domestic violence, recent immigrants, and occupational groups.

Title X of the PHS Act is the Family Planning Public Service Act, which helped 5 million women obtain family planning services in 2008. Since 1970, federally subsidized family planning funds have been available to clinics and health departments throughout the country. These facilities provide access not only to contraception but also to routine preventive health services, education, and counseling. The program is an important part of the public effort to prevent low birth weight through addressing the relationship between lack of family planning and women at greatest risk for low-birth-weight infants (women who are adolescents, single, and/or low-income) (Fowler, 2010).

Civil Rights Act

Title VII of the **Civil Rights Act** of 1964 prohibits discrimination based on sex, race, color, religion, or national origin in determining employment eligibility or termination, wages, and fringe benefits. The Act has been amended to prohibit discrimination against pregnant women and conditions involving childbirth or pregnancy. This landmark legislation makes it unlawful for employers to refuse to hire, employ, or promote a woman because she is pregnant. In addition, employee benefit plans that continue health insurance, income maintenance during disability or illness, or any other income support program for disabled workers must include disabilities resulting from pregnancy, childbirth, and other related conditions. If employers allow disabled employees to assume lighter or medically restricted assignments, the same considerations must extend to pregnant women.

Sexual harassment is a violation of the Civil Rights Act. Sexual harassment is “conduct of a sexual nature … unwelcome by the target .. severe or pervasive enough to create an intimidating work environment” (Women Employed Institute, 1994). Female and male workers may face unwelcome sexual advances or requests for sexual favors or other verbal or physical conduct of a sexual nature. Awareness of sexual harassment in the workplace has increased dramatically over the past decade, but sexual harassment has not been eliminated.

Social Security Act

The Social Security Act provides monthly retirement and disability benefits to workers and survivor benefits to families of workers covered by Social Security. Full retirement benefits are available after 10 years of covered employment, and workers can collect partial benefits beginning at age 62 and full benefits after age 67.

The Social Security Act permits a divorced person to receive benefits based on a former spouse’s earning record when that spouse retires, becomes disabled, or dies if the marriage lasted at least 10 years. Since January 1985, a woman who has been divorced for at least 2 years can receive spousal benefits at age 62, if her former husband is eligible for benefits, regardless of whether he is actually receiving them.

Medicare and Medicaid also resulted from the Social Security Act. Medicare is the insurance plan that covers the majority of the health care expenses of older adults, including payments for hospital care, physicians, home health care, and other services and supplies after co-payments and

Occupational Safety and Health Act

The Occupational Safety and Health Act, enacted in 1970, helps ensure safe and healthful working conditions for workers throughout the United States. Although there is a growing emphasis on the study of the health of women workers, gaps in knowledge exist. For example, little is known about women who work in cottage industries, as domestic workers, as prostitutes, in agriculture, and in the garment industry. In addition, the work of some women is classified as "women's work" and includes such things as housework, child care, caregiver of the sick, and farming (Misner, Beauchamp-Hewitt, and Fox-Levin, 1995). These women experience physical demands and hazards, yet government economic reports have not recognized them as workers. Investigations of factors that influence the health of these women workers are needed. Table 17-6 lists specific positions in which a large number of women are employed and the potential for health hazards within these positions.

Community health nurses, occupational health nurses, and NPs need to be cognizant of environmental hazards wherever they find women at work. In taking a health history, the nurse should collect data regarding the client's occupational environment to assess the potential risk to emotional, general, and reproductive health. In addition, nurses must work individually and as an aggregate with their legislatures to maintain strong worker health and safety programs to protect the health of all women.

Family and Medical Leave Act

Enacted in 1993, the **Family and Medical Leave Act** (FMLA) allows an employee a minimum provision of 12 weeks unpaid leave each year for family and medical reasons such as personal illness; an ill child, parent, or spouse; and the birth or adoption of a child. In 2008, the FMLA was updated to include family providing care to members of the Armed Forces injured in the line of duty. This act guarantees the employee the same or an equivalent job with the same pay and benefits upon the employee's return to work. In addition, health benefits must continue throughout the

TABLE 17-6 HAZARDOUS OCCUPATIONS IN WHICH WOMEN ARE EMPLOYED

OCCUPATION	HEALTH HAZARD
Clerical workers	Organic solvents in stencil machines, correction fluids, and ozone from copying machines
Textile and apparel workers	Cotton dust, skin irritants, and chemicals
Hairdressers and beauticians	Hair, nail, and skin beauty preparations
Launderers and dry cleaners	Heat, heavy lifting, and chemicals
Electronics workers	Solvents and acids
Hospital and other health care workers	Infectious diseases, heavy lifting, radiation, skin disorders, and anesthetic gases
Firefighters	Exposure to hazardous materials and rescue environments
Laboratory workers	Biological agents; flammable, explosive, toxic, or carcinogenic substances; exposure to radiation; and bites from and allergic reactions to research animals
Construction workers	Exposure to hazardous materials, dangerous environments
Military personnel	Exposure to hostile persons, hazardous materials, harsh environments and sexual assault.

Data from Centers for Disease Control, National Institute for Occupational Safety and Health: *Workplace safety and health topics: Industries & occupations,* 2013. Available from <http://www.cdc.gov/niosh/topics/industries.html>.

leave. In 2011, 14 million people utilized FMLA. Of these 56% were women, 40% took less than 10 days, and those with a new child took and took an average of 22 days (NPF, 2012).

The FMLA is particularly important to female workers because they are more likely to use leave to care for seriously ill family members, whereas male workers more often use leave for personal illness (Gilinson, 1999). Employees who must be away from work for family and medical reasons lose income, with the most significant impact on those without job-protected leave. The FMLA is an important step toward equitable leave policies, but more change is needed.

Health and Social Services to Promote the Health of Women

Major changes for women came with the signing of the Affordable Health Care Act (ACA) of 2010 (HHS, 2012). Particular to women are protections from being denied coverage by insurance companies and from being charged more for health care services because of gender. As of August 1, 2012, 47 million women gained access to preventive care without co-pays. Services include well-woman visits along with screening and counseling for gestational diabetes, HPV, STDs including HIV, contraception, and domestic violence. Also included are breastfeeding counseling, support, and supplies. The ACA mandates an expansion of Medicaid to include persons younger than 65 years with income below 133% of the Federal poverty level; estimates are that an additional 22 million would have coverage by 2022 (Holahan et al, 2012, Medicaid.gov, 2012). Medicaid is a health insurance program that was instituted in 1965 for the poor and is funded jointly by the federal and state governments but is administered by individual states. Medicaid is the largest source of funding for medical and health-related services for people with limited income regardless of age

maternal risk immediately after conception. However, too often these women seek prenatal care late in pregnancy or arrive at the emergency department when delivery is imminent without having previously received prenatal care. Barriers limit access to prenatal care for those most in need. Medicaid allows some access to care. Greater public awareness of facilities and maternity care providers who accept Medicaid are necessary.

Clinical Example

Anita Rogers, a 16-year-old unemployed single woman, arrived at the Family Services Health Center seeking initial prenatal care at 36 weeks of gestation. She stated that for a few days she noted some brown discharge from her vagina. She told the nurse she knew she should have begun prenatal care earlier, but when she called several physicians' offices, the receptionists told her she should bring $1000 for her first visit. She said that neither she nor her parents had that much money. Her father was unemployed, and her mother worked at a cafe as a waitress. She also had difficulty with transportation. Anita was sent to the hospital immediately for an ultrasound examination. The sonogram revealed triplets, but two of them had died in utero. Anita was hospitalized and began to hemorrhage. She delivered a 3-lb infant.

Women's Health Services

Since the mid-1970s, women have sought health services beyond the conventional mode of care delivery. Women desire a participatory role in their health and have become more assertive. Health care facilities have recognized the importance of meeting women's health needs. A notable evolution has occurred in maternity care, in which the demands of women as consumers lead to the emergence of freestanding and hospital-based birth centers and family- and sibling-attended births.

The National Women's Health Network (NWHN) has been a strong advocate for women's concerns and has provided testimony at congressional hearings dealing with women's issues. This organization is concerned with women's rights, environmental safety, reproductive rights, warnings about the effects of alcohol and drugs on the developing fetus, safety in relation to medical devices, and to drugs, especially those that may have teratogenic or carcinogenic effects. Examples of the organization's work include recall of the Dalkon Shield intrauterine device, identification of women who may have been exposed to diethylstilbestrol (DES) in utero, and promotion of well-woman health care.

Other Community Voluntary Services

Networking, the exchange of information among interconnected or cooperating individuals, has been one of the major movements during the past two decades. It is a means by which women seek to advance their careers, improve their lifestyles, and increase their income while helping other women become successful. Networking in business, professional support, politics and labor, arts, sports, and health is established throughout the United States enabling women to develop and become empowered to achieve mutual goals.

Many private voluntary organizations spend money, time, and energy in attempting to increase health awareness among its members and provide direct services to the public. Most urban areas

houses scattered throughout the United States. One of the goals of *Healthy People 2020* relates to this issue, as many women needing shelter are often denied emergency housing.

Women's organizations have a long history of voluntary involvement with the community. An increasing number have added activities to their agendas to improve pregnancy outcomes, prevent teen pregnancy, and support older women's rights. Organizations such as the Older Women's League, United Methodist Women, women's groups of other religious denominations, Urban League, sororities, Junior League, Young Womens' Christian Association, and the National Association of Colored Women's Clubs, have made women's health a major item on their agendas.

Levels of Prevention and Women's Health

Primary Prevention

The focus of primary prevention is preventing disease from occurring. Women should recognize the risk of disease and target their health care behaviors accordingly. Types of primary prevention include never smoking, following a nutritious diet, practicing safe sex, avoiding drugs, limiting alcohol consumption, and staying physically active.

Consider Jackie, a 39-year-old woman with three first-order relatives diagnosed with breast and/or ovarian cancer. She is at risk for hereditary cancer and should seek genetic counseling and possibly testing. If genetic test results are positive, she should be given information on measures that could prevent cancer from occurring, a process that constitutes primary prevention. These measures include lifestyle choices (early childbearing/breastfeeding); prophylactic surgical procedures (oophorectomy/mastectomy); and medical treatment (contraceptive pills, tamoxifen). Vigilant screenings (pelvic ultrasound with Ca-125 measurement or breast magnetic resonance imaging) to detect cancer early would be considered secondary prevention.

Secondary Prevention

The focus of secondary prevention is detecting the disease once it has begun but before it appears clinically. Examples of this level of prevention are routine screening for cervical cancer through Pap smears, for chlamydial infections through nucleic acid amplification tests on either urine or cervical specimens, and clinical breast examination and mammogram.

Tertiary Prevention

Tertiary prevention seeks to stop further complications after a disease has become clinically evident. For example, Sandra Smith, a 55-year-old Native American, has had diabetes mellitus for the past 3 years. She attended an urban clinic for monitoring of the diabetes. After the physician examined her, he suggested that she have her annual pelvic examination. She was overdue for one and agreed to be seen by the women's health care NP. Ms. Smith described symptoms of a yeast infection (e.g., increase in vaginal discharge and itching) to the nurse. Her examination and a wet mount examination confirmed the diagnosis of *Candida albicans* infection, a common problem among diabetic women. Sandra then learned about the nature of, predisposing factors for, and treatment of the infection.

Nursing, and expressed concern for the health of an inmate, Lela Marvin. According to Mr. Lawrence, Lela, a 19-year-old pregnant primigravida, was being seen at the state-supported hospital for antepartal care; however, she was not permitted to attend perinatal education classes. He stated that other pregnant women in the facility could benefit from perinatal education. In fact, approximately 6.1% of female state prison inmates are pregnant when admitted to prison and could benefit from perinatal education (Snell, 1994).

Lawrence's call was followed by a call from Herman Martin, an RN who also expressed concern for the other women's needs for information regarding their personal hygiene. Although an RN, Mr. Martin was not knowledgeable of women's health because his primary clinical focus was emergency and trauma care. He indicated that many of the women were overweight, cared little about themselves, and lacked a general knowledge of how to maintain their health.

Assessment

After gaining clearance from the prison officials, Ms. Williams made an assessment of health care information needs and started offering classes for the inmates. The immediate need was for perinatal education for women in the last weeks of pregnancy. Lela said she wanted to learn about labor because she had heard only horror stories from other women. Ms. Williams noted that three other women were close to term and they also seemed eager to learn. She knew that students' readiness to learn was key to the course's success. Success of this course would be crucial to future course offerings.

The traditional perinatal education course was designed to promote healthy birth outcomes and an emotionally satisfying birth experience. These goals are also important to pregnant women in a correctional facility; however, perinatal education would have to be modified to meet this group's special needs. For example, information on newborn care is not appropriate because the infant born to an inmate is usually placed with the mother's family or in foster care.

Assessment of nonpregnant women provided opportunities for other health education classes. The next spring and each spring thereafter, junior nursing students under Ms. Williams's guidance were assigned to develop and carry out 1-hour weekly health education and awareness sessions at the correctional facility. Although each student expressed some initial anxiety about the experience, each evaluated it as being worthwhile.

Diagnosis

After assessment, the community health nurse developed community and aggregate diagnoses, which served as the basis for the care plan.

Individual

- Inadequate preparation for childbirth related to lack of resources in prison (Lela)
- Lack of family support related to separation secondary to incarceration (Lela)

Family

- Lela's family visits were rare; therefore she looked for others to provide support during her pregnancy. Lela told Ms. Williams that her cellmate, Julieanna, offered to be her labor support person.
- Lack of knowledge of her role as a labor support person (Julieanna).

Community

- Lack of adequate health-seeking behaviors of women in the correctional facility (i.e., pregnant and nonpregnant women)
- Lack of programs to promote health and prevent diseases among women prisoners

Planning

After the nursing diagnosis was validated with the individual, family, or community, the plan of care was developed. Examples of long- and short-term goals follow.

Individual

Long-Term Goal

- Individual family members will have a positive birth experience (Lela).

Short-Term Goal

- Family member or friends will help Lela use relaxation techniques to cope with the discomforts of labor.

Family

Long-Term Goal

- The family members will be strengthened through their newly acquired knowledge and skills.

Short-Term Goal

- The family members will demonstrate increased ability to perform their role as labor support people.

Community

Long-Term Goal

- The health and well-being of incarcerated women (i.e., pregnant and nonpregnant) will improve.

Intervention

The community health nurse worked with the individual, family, or community to achieve mutually established goals. Intervention was aimed at empowering individuals and groups to take responsibility for themselves and to form links with others to accomplish goals.

Individual

Providing a perinatal education program for Lela was Ms. Williams's first priority. In addition, counseling related to feelings of loss after birth might be appropriate. Referral to a counselor might be necessary, and Ms. Williams had to become familiar with available resources.

Family

Teaching the family the roles and responsibilities of a labor support person was an important intervention. In the correctional facility, interventions must ensure that Lela has a labor support person with whom to practice her relaxation techniques and to be available. In this case, Lela's cellmate, Julieanna, was willing to act in this role, and the nurse had to negotiate with prison officials to allow this arrangement.

Community

Specific interventions with a group of pregnant women in the correctional facility were based on the specific needs of the group. The community health nurse had to identify prison officials who were supportive of health education programs and request their input as to which women should be targeted for such programs. Then the nurse met with targeted women to assess their level of knowledge and skills regarding women's health. For example, the nurse surveyed what each woman perceived as learning needs (e.g., well-woman care, women's anatomy and physiology, self-care in health promotion, health protection, and disease prevention). Then the nurse tailored an intervention that was compatible with the community. Ms. Williams asked each nursing student to select a topic the basis of the survey and to develop a teaching plan for presentation to female prisoners (i.e., pregnant and nonpregnant) at least once during the spring semester.

Evaluation

The community health nurse compared the actual and predicted outcomes to determine the efficacy of the plan of care and make revisions.

Individual

For example, Lela learned necessary relaxation techniques that were useful to her in labor and helped make the birth experience positive. Follow-up of Lela's psychosocial concerns in postpartum was also important.

Family

interaction between family members (i.e., Lela and Julieanna) prepared them for other situations.

Community

The aggregate evaluation focuses on the community. For example, in health education programs designed for pregnant and nonpregnant women in the correctional facility, it was important to do the following: 333 334

- Maintain attendance records.
- Seek feedback from women, the referring nurse-educator, and prison officials regarding changes in self-care behavior regarding health.
- Obtain student response to learning experience.
- Make changes in health education programs on the basis of evaluation.

Levels of Prevention

The following are examples of the three levels of prevention as applied to the individual, family, and community.

Primary

- Assessment and teaching perinatal education course to pregnant inmates
- Assessment and teaching health education classes to nonpregnant inmates
- Teaching the family the roles and responsibilities of a labor support person

Secondary

- Screening at the community level (correctional facility) of what is perceived as learning needs
- Educating the family and community of the signs of postpartum depression

Tertiary

- Educating HIV-positive pregnant inmates on the need for antiviral treatment and delivery by cesarean section
- Educating family members and foster parents about the need for neonatal follow-up with regard to HIV status
- Assessing available community resources for counseling and treatment of postpartum depression

Roles of the Community Health Nurse

Direct Care

Educator

The nurse encounters many opportunities for teaching. To be successful with health education, the nurse must attempt to gain the client's trust and must be sensitive to any cultural issues present. The nurse must also be aware of the emotional and physical state of the client. If the client is anxious or in pain, teaching may be ineffective.

Counselor

The counseling role of the nurse occurs in almost every interaction in the area of women's health. Before counseling in the area of reproductive health is begun, it is essential for effective intervention that the nurse become aware of his or her value system, including how biases and beliefs about human sexual behavior affect the counseling role.

Research in Women's Health

Women have long been the major users of the health care system. Research involving women is beginning to provide information enabling prediction, explanation, or description of phenomena affecting health. In the past, medical treatment for women was based on findings of research performed with male subjects exclusively, even in conditions that caused more deaths in women. Since the federal mandate regarding women and research was instituted, research efforts to include women in studies have grown. If women are not included in a research project, a rationale must be given for their exclusion.

The National Institutes of Health established the Office of Research on Women's Health (ORWH) in 1990. Through a special task force, recommendations were made for the research agenda for women's health. In addition, nurse researchers are encouraged to test interventions and question rituals in nursing by conducting research. Following are some of the areas for exploration and research among women:

- Alcohol, tobacco and other drug use
- Domestic violence
- Heart disease
- Health behaviors
- Genetic screening and breast cancer
- Bone and musculoskeletal disorders
- Cancer prevention, screening, diagnosis, and treatment
- Health education at various literacy levels
- Wellness throughout the life cycle
- Differences among women experiencing menopausal symptoms
- Dysmenorrhea

- Infertility
- Coping with chronic illness, such as systemic lupus erythematosus or arthritis
- Discomforts of pregnancy, including morning sickness
- Strengths of single, female heads of households
- Adolescent sexuality
- Multiple-role adaptation
- Menstrual cycle variations
- Control of obesity
- Substance abuse and its effect on pregnancy
- HIV infection and pregnancy
- Influence of diet on osteoporosis
- Effect of socialization on role
- Gender differences in pharmacology

Currently, research on the financing and delivery of health services for women has been supported. The American Recovery and Reinvestment Act of 2009 provided funding to the National Institutes of Health to support research in women's health by the ORWH. Overarching themes in women's health research identified by the ORWH include: 334 335

- Effects of developmental, psychological, spiritual, and physiological factors on lifespan
- Effects of female determinants, such as genetics and gender expectations, on health
- Health disparities and diversity
- Diseases and conditions affecting women
- Career development and advancement of women in the sciences

With the increased emphasis on community health, community health nurses can make significant contributions to the improvement of women's health through scholarly research, either as principal investigators or through data gathering. Furthermore, they can become consumers of research and develop nursing interventions based on sound research and recommendations.

Summary

Women's health care has multiple facets, with many areas for community health nursing intervention. Nurses are advocates and activists for women's health through their involvement in health policy making as a profession. Along with other multidisciplinary and consumer groups, professional nurses are in the forefront of making changes in the health care delivery system that will promote an overall quality and research-based health plan for women. Women are at the center

Learning Activities

1. Identify examples from everyday life that support or encourage violence against women (e.g., magazines, books, and television advertisements). Share findings with classmates.
2. Survey lay magazine advertisements and estimate the percentage of total pages that use a woman's image, including aging, menopause, overweight and obesity, and sexuality, to sell products. Share these with classmates.
3. Discuss the need for cancer screening with female relatives; refer to the ACS guidelines.
4. Discuss with female relatives the need for a heart-healthy nutritional plan based on AHA guidelines.
5. Identify resources for mammograms and Pap smears for low-income women.
6. Visit with a women's group in the community (e.g., business, church, sorority, Parents Without Partners, Red Hat Society) to discuss members' health care needs and concerns. From these data, develop research questions.
7. Call a family planning clinic and determine the population served (i.e., eligibility), available services, and costs.
8. Review county or state health department statistics for leading causes of death among women of varying ethnic or racial groups.

EVOLVE WEBSITE

http://evolve.elsevier.com/Nies

- NCLEX Review Questions
- Case Studies
- Glossary

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