



Report Card of Community Health Indicators

March 2002

Building Healthier Communities

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Message from the County Executive



The Anne Arundel County Department of Health understands the key ingredients necessary for creating a healthy community. Their mission is to preserve, protect and promote the health of all county residents. To that end, they have created an effective system of partnerships between residents and the health care community, businesses, community and faith organizations, and government. Because of this coalition, in most comparisons of state and national health indicators, Anne Arundel County fares well.

This report highlights areas of accomplishment in the health of Anne Arundel County residents and was compiled by the Department of Health. I am especially proud of the progress this community has made in improving health care access for the working poor, a key component of a community's overall health.

This is a valuable resource that highlights notable achievements and areas for improvement in the overall health of our community. I encourage you to use it to learn how to improve your own family's health and well-being.

Warmest regards,

A handwritten signature in black ink that reads "Janet S. Owens". The signature is written in a cursive, flowing style.

Janet S. Owens
County Executive

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Areas Where Prevention Can Make A Difference

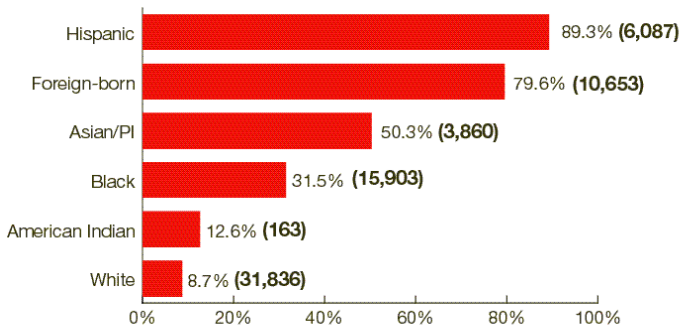
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Population Changes 1990 – 2000

Overall, between 1990 and 2000, the population of Anne Arundel County increased by 62,417. The County is becoming increasingly diverse. The ten-year population increase includes 10,653 who are foreign-born residents. As a percentage, Anne Arundel County's ten-year population growth (14.6%) exceeded Maryland's (10.8%) and the nation's (13.1%).

Year 2000	Anne Arundel County	(%)	Maryland # or (%)	United States # or (%)
Population				
Total Population	489,656		5,296,486	281,421,906
Male	243,677	(49.8)	(48.3)	(49.1)
Female	245,979	(50.2)	(51.7)	(50.9)
Race & Ethnicity*				
White	397,789	(81.2)	(64.0)	(75.1)
Black	66,428	(13.6)	(27.9)	(12.3)
Asian/Pacific Is.	11,535	(2.4)	(4.0)	(3.7)
Am.Ind./Alaska Native	1,455	(0.3)	(0.3)	(0.9)
Some Other Race	4,164	(0.9)	(1.8)	(5.5)
Hispanic (Any Race)	12,902	(2.6)	(4.3)	(12.5)
Foreign Born	24,043	(5.1)	(10.4)	(11.1)
* New Census methods for reporting one race or more than one race have minimally affected the reported racial/ethnic composition of the County.				

Anne Arundel County Racial and Ethnic Growth Percentage and Total 1990-2000



Data Sources: Maryland Department of Planning (Year of Entry by Citizenship Status & Foreign Born by Citizenship Status), U.S. Census Bureau (1990 & 2000 Table DP-1 for Anne Arundel County, Maryland & US).

Social Changes 1990 – 2000

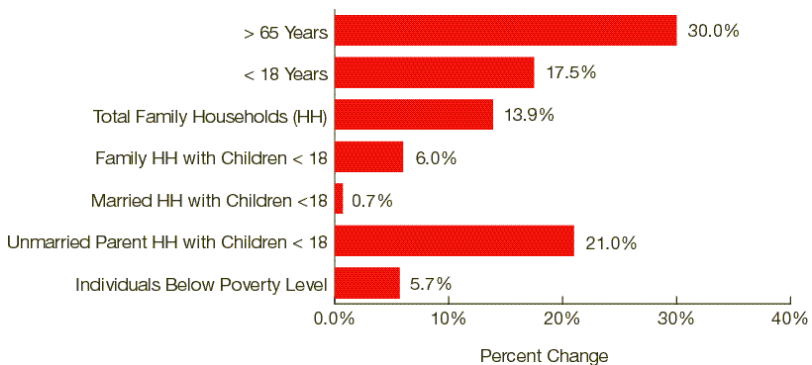
In 2000, there were 18,000 more children under age 18 and 11,000 more persons over 65 years old in Anne Arundel County compared to the 1990 census.

Unemployment decreased from 5% in 1990 to 2.9% in 2000. During 2001, the unemployment rate climbed to 3.7% by November 2001.

Year 2000	Anne Arundel County	AACo (%)	MD (%)	U.S. (%)
< 18 Years Old	123,636	(25.2)	(25.6)	(25.7)
65 Years Old	48,820	(10.0)	(11.3)	(12.4)
Median Household Income*	\$61,668			
Individuals Below Poverty Level *	36,597	(7.7)	(9.3)	(12.5)
Related Child (<18) Below Poverty Level *	15,626	(13.1)	(12.8)	(17.0)
Average Unemployed Number or Rate	7,476	(2.9)	(3.9)	(4.0)
Total Households	178,670			
Total Family Households	129,193	(72.3)	(68.6)	(68.1)
Family with Children < 18	62,297	(34.9)	(33.4)	(32.8)
Married with Children <18	47,240	(26.4)	(23.3)	(23.5)
Single Parent with Children < 18	15,057	(8.4)	(10.1)	(9.3)

* Sampling limitations and year-to-year variability result in wide confidence intervals.

**Change in Anne Arundel County Social Indicators
1990 - 2000**



Data Sources: U.S. Census Bureau (1990 & 2000 STF-1, SF-1, P5, P016, DP-1, DP4, QT-03). U.S. Bureau of Labor Statistics (Laupa 24015003-006, Lfu 21000000, Laust 24000006), Anne Arundel County Office of Planning and Zoning

General Health Indicators

Anne Arundel County Versus Maryland, US & Healthy People (HP) 2010 goals

Mortality Risk 1999	Anne Arundel	MD	U.S	HP 2010
All Causes Mortality Rate*	919.0	907.2	881.9	NA
Coronary Heart Disease	272.9	258.5	267.8	166.0
Stroke	64.8	62.4	61.8	48.0
All Cancer Mortality Rate*	219.8	211.0	202.7	159.9
Female Breast Cancer	33.1	28.5	27.0	22.3
Lung Cancer	67.8	59.5	56.0	44.9
Suicide Rate*	7.7**	8.4	10.7	5.0
Homicide	2.3**	10.1	6.2	3.0
Motor Vehicle	10.4**	10.8	15.5	9.2

* Death rate per 100,000 pop., age-adjusted to 2000 US standard population.
 ** Age-adj. Rate unavailable. Crude rate for available count and 1999 population provided.

Child Health 2000	Anne Arundel	MD	U.S.***	HP 2010
Births to Women <18*	2.5%	3.6%	4.1%	4.3%
Low Birth Weight	6.9%	8.7%	7.6%	5.0%
1st Tri. Prenatal Care	89.0%	86.4%	83.2%	90.0%
Infant Mortality Rate – Black**	12.7	13.1	14.0	4.5
Infant Mortality Rate – White	4.9	4.7	5.7	4.5
Infant Mortality Rate - Hispanic	4.6	6.4	N/A	4.5

* Percent of all births. ** Death rate/1,000 live births. ***Preliminary data. N/A= not available.

Communicable Diseases 2000	Anne Arundel 2000**	MD 2000**	U.S. 1999**	HP 2010
Chlamydia	161.3	274.4	240.8	NA
Gonorrhea	63.3	185.7	132.0	19.0
HIV	15.4***	41.6***	NA	NA
Syphilis (Primary & Secondary)	3.5	5.7	2.4	0.2
Tuberculosis	2.7	5.3	6.4	1.0
Hepatitis A	3.7	4.2	6.3	4.5
Hepatitis B (Acute)	4.5	2.5	2.8	NA
Hepatitis C (Acute)	1.0	0.3	1.1	1.0
Lyme Disease	16.4	13.3	6.0	9.7

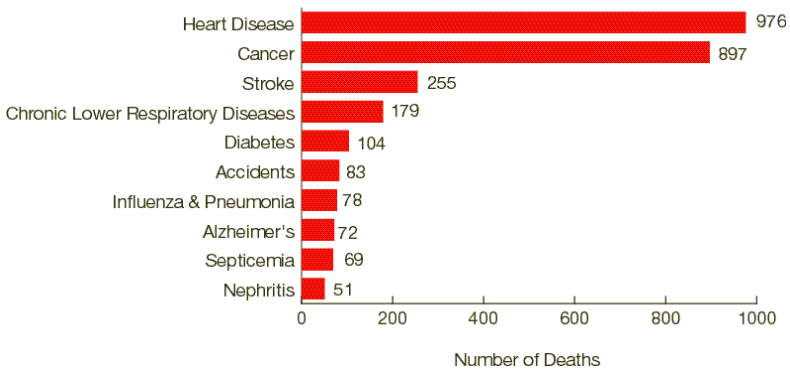
* Incidence Rate per 100,000 population. ** Preliminary. NA: Not Available
 ***HIV Incidence covers July 1, 2000 – June 30, 2001

Data Sources: Maryland Department of Health & Mental Hygiene (DHMH), Division of Health Statistics, Vital Statistics Reports. Centers for Disease Control & Prevention (CDC); Communicable Disease Program & MMWR. Anne Arundel County Department of Health, Communicable Diseases. DHMH, Maryland AIDS Administration.

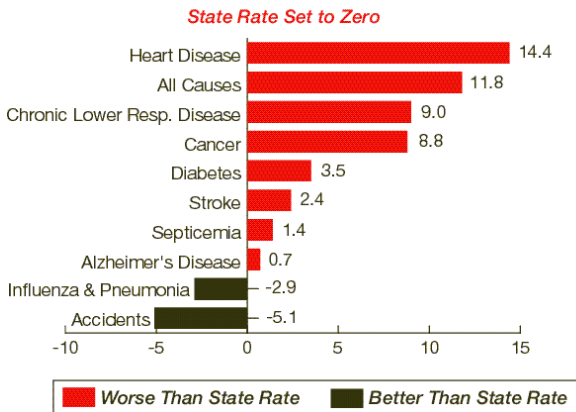
Leading Causes of Death

In 2000, heart disease, cancer, stroke and chronic lung disease accounted for 75% of recorded deaths in Anne Arundel County. In most of the top cause of death categories, the County has higher rates than the state.

Top Ten Causes of Death Anne Arundel County Year 2000



Differences in Age-Adjusted Death Rate per 100,000 Population for Leading Causes of Death, Anne Arundel County versus Maryland 1999



Data Source: Anne Arundel County Death Certificate Data 2000 and Vital Statistics 1999, Division of Health Statistics, DHMH.

Leading Causes of Hospitalization

Anne Arundel County 2000 Hospitalization Totals and Top 3 Reasons

In 2000, the leading causes of hospitalization for County residents were pregnancy, cardiovascular or respiratory-related illness

Ages 0-4 (7,465 Discharges)

1. Newborn (6,107)
2. Respiratory – Pneumonia, Bronchitis, Asthma (418)
3. Dehydration (140)

Ages 5-9 (485 Discharges)

1. Respiratory – Pneumonia & Asthma (84)
2. Dehydration (31)
3. Gastrointestinal – Appendicitis & Gastroenteritis (27)

Ages 10-14 (566 Discharges)

1. Respiratory – Asthma, Pneumonia (60)
2. Gastrointestinal – Appendicitis & Gastroenteritis (49)
3. Renal – Dialysis & Pyelonephritis (37)

Ages 15-17 (622 Discharges)

1. Pregnancy Related – Deliveries, Complications (89)
2. Gastrointestinal – Appendicitis (31)
3. Sickle Cell Crisis (19)

Ages 18-44 (15,154 Discharges – 11,000 Female, 4,000 Male)

1. Obstetrics (6,334)
2. Lumbar Disc Displacement (235)
3. Gastroenteritis – Appendicitis (147)

Ages 45-64 (12,074 Discharges)

1. Cardiovascular – Heart Failure, Coronary Art. Dis., Infarction (2,304)
2. Symptoms – Chest Pain, Fainting (600)
3. Respiratory – Pneumonia, Chronic Lung Disease (600)

Ages 65+ (17,400 Discharges)

1. Cardiovascular – Heart Failure, Coronary Art. Dis., Infarction (3,721)
2. Respiratory – Pneumonia, Chronic Lung Diseases (1,474)
3. Dehydration (339)

Source: Non-confidential Hospital Discharge Data, Health Services Cost Review Commission, Maryland DHMH

Uninsured

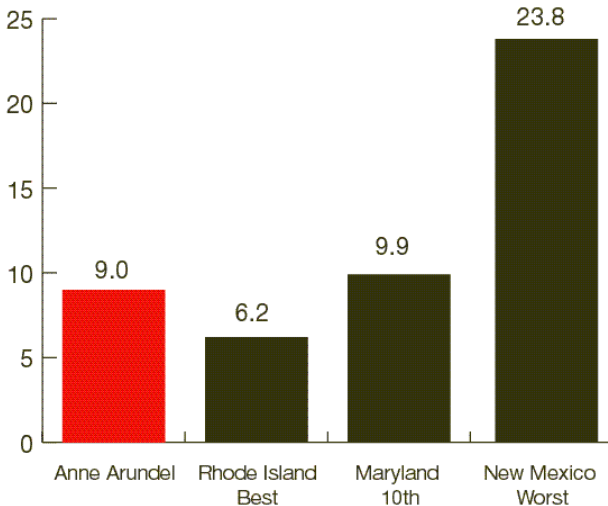
County Residents Lacking Health Insurance, 2000 Estimates

About 30,000 adults ages 19-64 in Anne Arundel County lack health insurance. Of these, 12,600 are at or below 200% of the Federal Poverty Level.

The **RE**sidents **A**ccess to a **C**oalition of **H**ealth (**REACH**) Program is the County's attempt to reach this group. REACH was established in December 1999 to improve health care access for the working poor. In 2001, there were over 1,100 REACH enrollees. A key component of this initiative is the willingness of local providers to partner with the County to improve health care access options for the uninsured.

The REACH Program was awarded the National Association of Counties' 2001 Achievement Award for its innovative approach in meeting the health care needs of uninsured County residents.

**Percent Without Health Insurance -
Anne Arundel County Versus States with Best & Worst Rankings
and Maryland 2000**



Data Source: U.S. Census, Maryland Health Improvement Plan 2000-2010, Community and Public Health Administration, Maryland DHMH. Anne Arundel County Department of Health

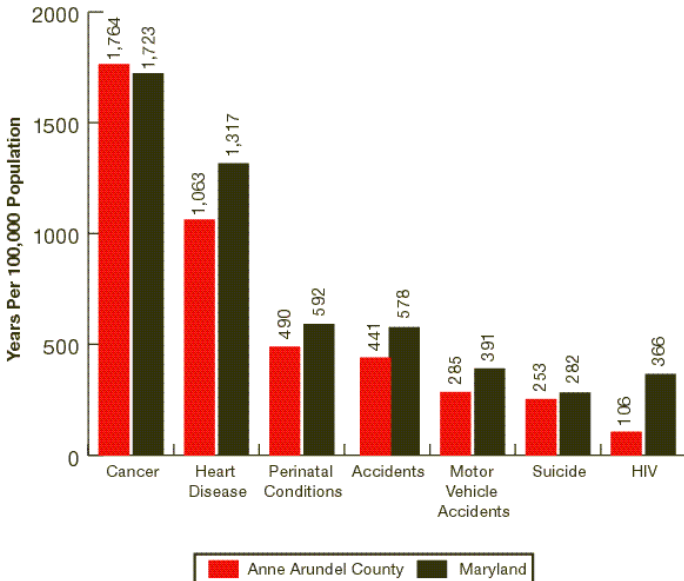
Early Death

Years of Potential Life Lost, 1999-2000

Years of Potential Life Lost (YPLL) is a measure of deaths occurring prematurely (usually stated before age 75) for various causes. This indicator helps focus on lives that may have been extended by preventive activities. The YPLL rate is calculated by subtracting the age of premature death from 75. The age of 75 is used by the Centers for Disease Control as approximating typical life expectancy.

In the years 1999 and 2000 in Anne Arundel County, there were 6,654 years of potential life lost for all causes for every 100,000 persons under the age of 75. Over the same period, the Maryland rate was 8,157.

**Estimated Years of Potential Life Lost < Age 75 For Select Causes
Anne Arundel County and Maryland 1999-2000**



Source: CDC, Division of Health Statistics, Maryland DHMH

Cancer Incidence

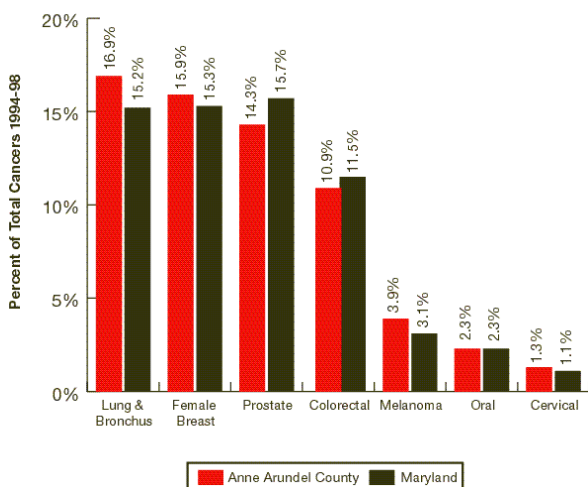
Select Sites, Anne Arundel County 1994-1998

Seven cancers were targeted as priority components of Maryland's Cigarette Restitution Fund Program. They are lung, colorectal, breast, prostate, oral, melanoma, and cervical cancers. These cancers were selected because they are preventable, detectable and treatable at an early stage or because they contribute significantly to mortality.

These seven cancers accounted for approximately 65% of all County cancers between 1994 and 1998. The 1994 to 1998 County cancer incidence rate was 457.6* versus an incidence of 435.8 for Maryland and 400.5 for the United States. For the same period, male residents had a greater cancer incidence than females (528.6 versus 408.1). While small numbers preclude significant analysis of cancers in many minority residents, there are notable differences between blacks and whites in two cancers with whites having a greater breast cancer incidence than blacks (134.6 versus 119.1) and blacks having a greater incidence of prostate cancer than whites (171.5 versus 140.7). Anne Arundel County has the 7th highest cancer incidence rate of 24 Maryland jurisdictions.

* Rate per 100,000-population age-adjusted to 1970 Standard Population.

Cigarette Restitution Fund Targeted Cancers.
Percent of All Cancers: Anne Arundel County and Maryland, 1994-1998



Data Source: Maryland DHMH, Annual Cancer Report, Cigarette Restitution Fund Program, Cancer Prevention, Education, Screening and Treatment Program, September 2001

Cancer Mortality

Select Sites, Anne Arundel County 1994-1998

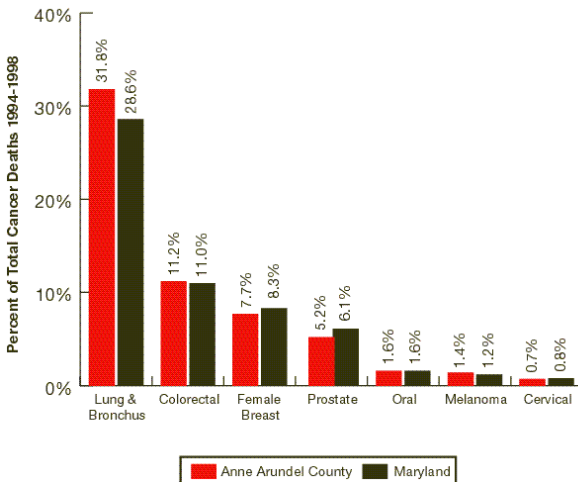
Cancer remains the second leading cause of death in Anne Arundel County. About 1/3 of these cancer deaths are lung and bronchus cancers. Smoking is the leading preventable cause of lung cancer deaths.

Anne Arundel County has a higher cancer mortality rate than the state or the nation. The cancer mortality rate for 1994 to 1998 in Anne Arundel County was 185.2* versus a rate of 178.9 for Maryland and 166.2 for the United States. For the same period, the only cancer to show a significant racial difference in mortality in the county was prostate cancer with blacks having a 1.5 times greater mortality rate than whites (34.7 versus 23.2). The Anne Arundel County cancer mortality rate is 10th of 24 Maryland jurisdictions. In 1999, Anne Arundel County cancer mortality was reported as 176.5 adjusted to the 1970 standard population and 221.5 adjusted to the 2000 Standard population**.

* Rate per 100,000 population age-adjusted to 1970 Standard Population.

** With 1999 rates, the 2000 standard population will be used. Due to an older population in 2000 compared to the 1970 population, rates will appear higher. Comparisons should be made only with similarly adjusted figures.

**Cigarette Restitution Fund Targeted Cancer Mortality:
Percent of All Cancer Mortality,
Anne Arundel County Versus Maryland, 1994-1998**



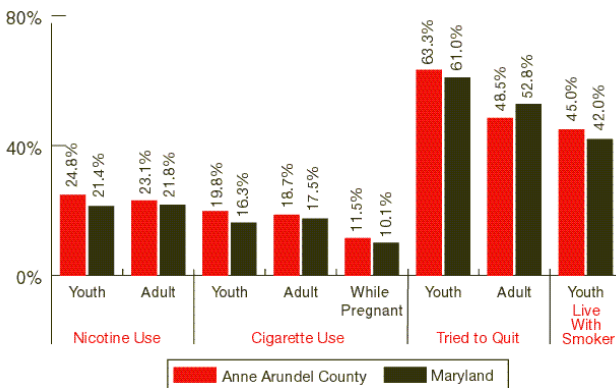
Data Source: Maryland DHMH, Annual Cancer Report, Cigarette Restitution Fund Program, Cancer Prevention, Education, Screening and Treatment Program, September 2001

Tobacco

The tobacco industry spends \$5 billion annually promoting tobacco. There are 390,000 tobacco-related deaths annually. The 1998 Multi-State Settlement against the tobacco industry will put \$4.4 billion over 25 years into Maryland's anti-tobacco effort. The settlement money supports counter-marketing efforts, community and school based anti-tobacco programs, and tobacco use surveillance.

In most categories compared in the Baseline Tobacco Study*, the County has higher tobacco use and risk rates than the State.

Anne Arundel Versus Maryland Estimated Tobacco Prevalance 2000



*The Baseline Tobacco Survey (BTS) is the first statewide administration of both the Maryland Youth Tobacco Survey (MYTS) and the Maryland Adult Tobacco Survey (MATS).

There are interventions shown to decrease tobacco use initiation and increase cessation. Multi-faceted school and community-based campaigns may prevent smoking onset in 20-40% of adolescents. Advice, counseling, and pharmacological support may enable 20-25% of users to quit. Advice by physicians may induce cessation rates of 5-10%. To help decrease initiation and increase cessation, the County's "Learn To Live" program (410-222-7979) offers Quit-Smoking Kits, Smoke-Free Kids Kits, and Teen Quit Kits. It also maintains a list of quit-smoking classes and manages the "Smoking Stinks" adolescent-targeted anti-smoking program.

Data Source: DHMH Community & Family Health Administration, DHMH Initial Findings from the Baseline Tobacco Study February 2001. Anne Arundel County Department of Health, CDC MMWR Vol 49 No. RR-16

Obesity

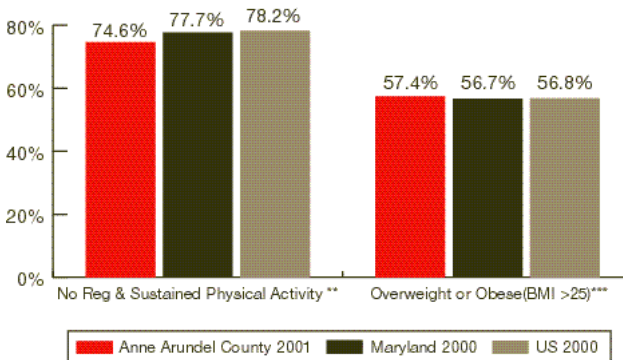
In 2001, the Surgeon General warned the country of the emerging epidemic of overweight and obesity in Americans. While there are many factors for this worrisome trend, the most important are felt to be too little activity and too many calories. Between 1977 and 1996, average caloric intake increased by 10% or 68,000 additional calories annually. At the same time, the percentage of individuals who have low activity levels has increased. Federal guidelines recommend 30 minutes of moderate physical activity most days of the week.

A Body Mass Index (BMI)* > 25 is associated with increased risk of heart disease, hypertension, stroke, diabetes, cancers (endometrial, colon, kidney, breast), and arthritis.

Recommendation: BMI can be improved with a balanced diet and increased activity. Even small amounts of weight loss in obese or overweight individuals can have large benefits. Many Americans fail to lose weight with diet alone because they fail to increase activity level. A free healthy eating kit can be obtained from the Health Department's "Learn To Live" line (410) 222-7979.

* Adult BMI = [(weight pounds)/(height inches)² x 703]

**Percent With Inadequate Activity and Overweight or Obese:
Anne Arundel County Versus Maryland and the United States**



** Regular and Sustained Physical Activity = 5 times/week, 30+ minutes per session, any intensity.

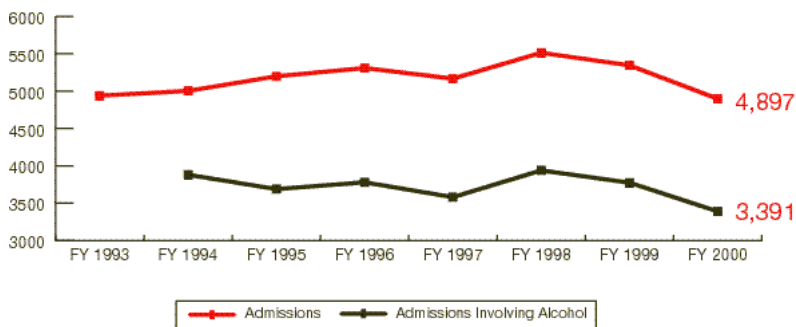
*** The range for county overweight or obese BMI is 54.6% for Asians to 74.1% for African-Americans. Assume percentages for minorities unreliable due to small sampling size.

Source: Office of the Surgeon General, CDC BRFSS, Anne Arundel County BRFSS, Maryland DHMH Obesity and Overweight in Maryland 1999

Alcohol

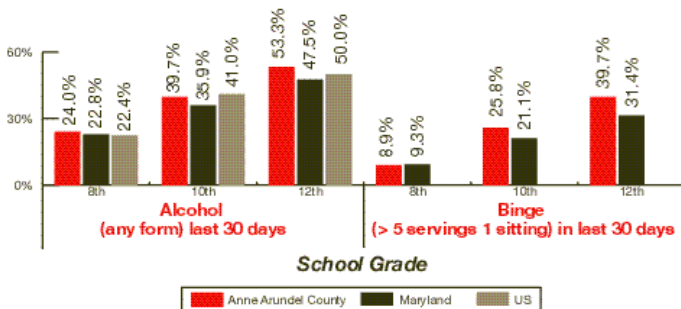
Alcohol is the most commonly abused substance in the County. In Maryland, it is a factor in almost 2/3 of addiction treatment admissions. An estimated 20,800 persons in the County need drug or alcohol treatment.

Anne Arundel County Residents Admissions to Drug & Alcohol Treatment Programs FY 1993 - FY 2000



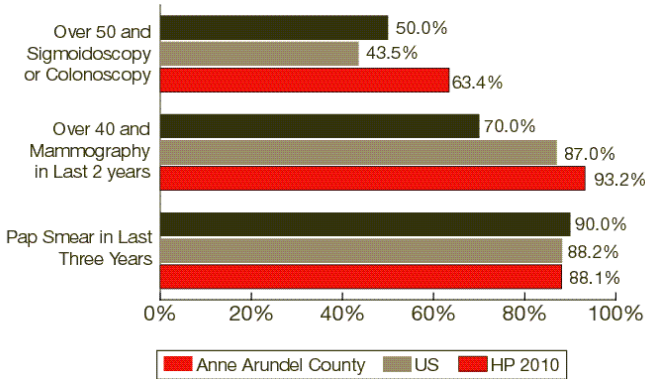
- County indicators for youth alcohol use exceed those for Maryland.

Adolescent Alcohol Use Characteristics, Anne Arundel County Versus Maryland & US, 2001



Preventive Health Screenings

Relative Percentage of Preventive Screenings for Anne Arundel County (CY 2001) Versus National Screening (CY 2000) and HP 2010 Objectives



Breast Cancer Screening

County Burden: 358 New Cases (1998), 63 Deaths (1998).

Recommendation: Mammography and clinical breast exam (CBE) every 1-2 years for all women over 40.

Cervical Cancer Screening

County Burden: 21 New Cases (1998), < 5 Deaths (1998).

Recommendation: Papanicolaou (PAP) testing at least every three years (or as indicated by your doctor) for women who are or have been sexually active and have an intact cervix.

Colorectal Cancer Screening

County Burden: 229 New Cases (1998), 93 deaths (1998).

Recommendation: Colonoscopy or other tests for adults over 50. Ask your doctor which test and screening schedule is best for you.

Outreach: The Department of Health offers the above screenings to low income individuals over age 40 (50 for colorectal screening) who lack health insurance. The Breast & Cervical Cancer Program has provided services to 2,830 women since its inception. The colorectal cancer-screening program, begun in March 2001, provided 103 colonoscopies by December 2001.

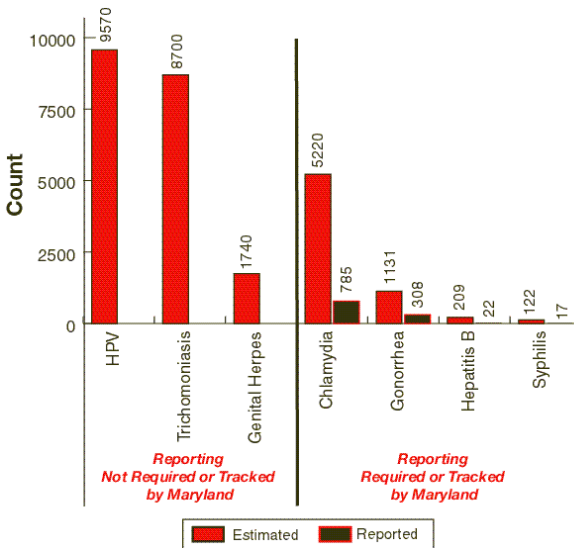
Data Source: Anne Arundel County Department of Health, Anne Arundel County BRFSS, Cancer in Maryland 1998, Maryland DHMH, U.S. Preventive Services Task Force Guide to Clinical Preventive Services 1997.

Sexually Transmitted Diseases

While reportable STDs account for 87% of all reportable diseases in the US, many STDs such as trichomoniasis, human papilloma virus (HPV, or genital warts), and genital herpes infections are highly prevalent but not reportable. There is no cure for Herpes and HIV. The major consequences of STDs include male and female infertility, pregnancy complications, invasive cervical cancers, liver disease, and AIDS. Young adults (especially women) are at greatest risk for STDs, which can cause problems even without obvious symptoms. Social factors (poverty, health care access, sexual abuse, and stigma) contribute to their spread.

Recommendation: Greater education, improved diagnosis/treatment, and safe sex (abstinence, monogamy, condom). Hepatitis A and B vaccination is recommended for those at risk.

Estimated Versus Reported New STD's by Maryland Reporting Requirement for Anne Arundel County, 2000



*Adapted to Anne Arundel County from CDC US incidence rate estimates

Source: CDC, Anne Arundel County Department of Health, C. Kauffman, Advance for Nurses May 22, 2000, p 25-27.

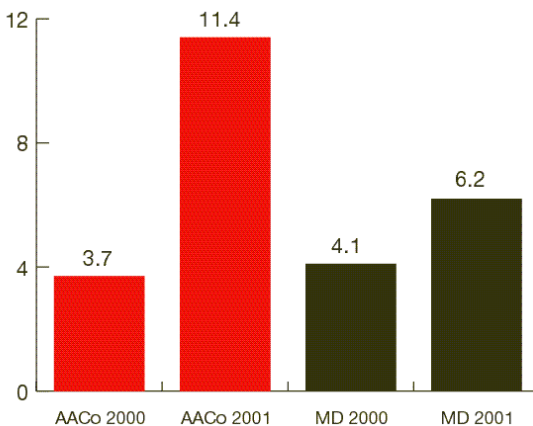
Hepatitis A Viral Infections

Between 2000 and 2001, Anne Arundel County experienced a more than three-fold increase in reported cases of Hepatitis A, from 18 cases in 2000 to 56 cases in 2001. The State of Maryland also experienced increases during this same period, although national rates fell.

The majority of cases in the County were among white men, many whose risk factors were associated with illicit drug use or unsafe sex practices. The long incubation period, sometimes up to 3 months makes identification of the source of infection difficult. The communicable period for Hepatitis A is greatest one to two weeks prior to the onset of symptoms. Children under the age of 6 without symptoms can spread the disease, especially in day care settings.

Hepatitis A is a liver infection that is transmitted from person to person through contaminated food or water. It can be prevented by vaccine, good hygiene and safe food handling practices. Hepatitis A vaccine is recommended for travelers to high or intermediate risk countries, men who have sex with men, drug users, persons with clotting factor disorders, persons with occupational risk, and persons with chronic liver disease, including Hepatitis C.

Preliminary Hepatitis A Incidence Rates Per 100,000 Population, Anne Arundel County Versus MD (2000 and 2001)



Source: CDC, Anne Arundel County Department of Health. Maryland DHMH, Control of Communicable Disease, J Chin 2000.

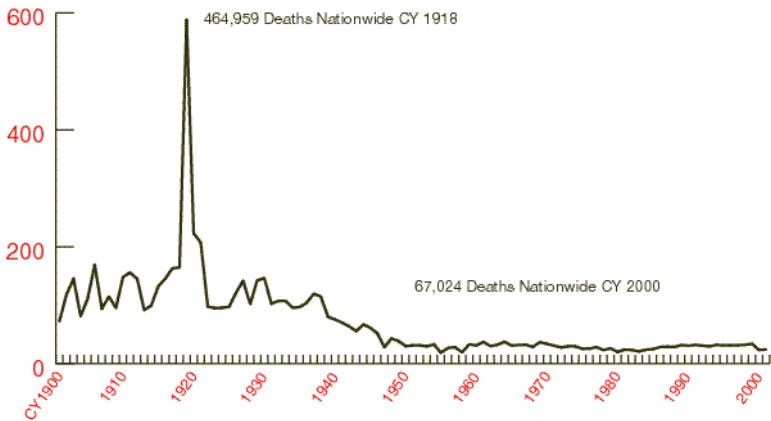
Pneumonia & Influenza

Overshadowed by World War I, few today recall that over 20 million people died in 1918 from a worldwide influenza epidemic. Influenza and pneumonia remain significant causes of morbidity and mortality in residents with poor health or in institutionalized care settings. They are often preventable with safe vaccines.

For Maryland residents over 65, influenza and pneumonia was the fifth leading cause of death. In 2000, there were over 70 pneumonia-related deaths in the County, most in those over 65 years of age.

The Anne Arundel County Department of Health provided 21,920 influenza vaccines to County residents in the first three months of the 2001-2002 influenza season and 628 pneumococcal vaccines for 2001. It is believed 38.3% of the County adult population received an annual influenza vaccine in the 2000-2001 season. As of Fall 2001, 24.1% of the over 65 adult population has received one immunization with pneumococcal vaccine.

Pneumonia & Influenza Death Rate per 100,000 US 1900-2000



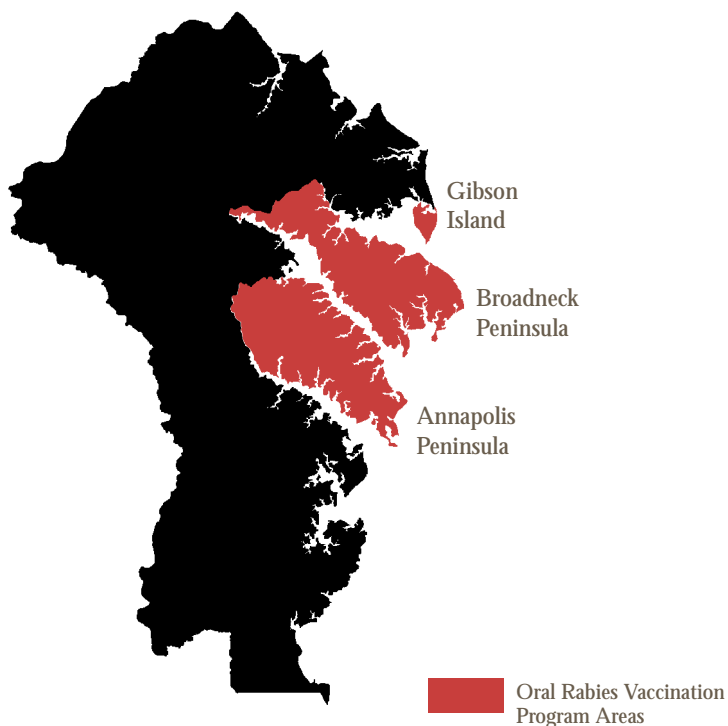
Data Source: CDC, Anne Arundel County Department of Health, County BRFS, County Vital Statistics

Rabies Control

Rabies and the Oral Rabies Vaccination Program 1998 - 2001

2001 was the fourth year of the County's oral rabies vaccination program targeting raccoons. The number of rabid raccoons on the Annapolis peninsula decreased from an average of nineteen between 1996 and 1998 to zero in 2000 and 2001. Based on this success, the program was expanded to Gibson Island in 2000 and the Broadneck Peninsula in 2001.

Prior to the initiation of the oral rabies vaccination program in 1997, Anne Arundel County reported more rabid animals than any other Maryland county. In 2000, Anne Arundel County ranked fourth with 41 rabid animals. Most were raccoons (31) followed by bats (5), foxes (3), a cat and an opossum. The oral vaccination program has had a significant impact on reducing animal rabies in Anne Arundel County.

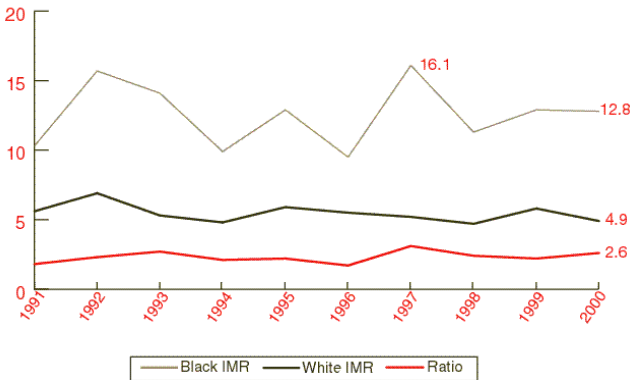


Infant Mortality

Maryland's overall infant mortality rate (IMR) dropped to 7.4 deaths per 1,000 live births in 2000. Unfortunately, although rates have been dropping for all races, IMR for African-Americans remains almost three times that of whites. This ratio of infant deaths for African-Americans to whites has been slowly increasing due to a greater decline in IMR in whites.

Top Three Infant Mortality Causes and Rates Per 100,000 Live Births, Black Versus White Disparities in Maryland	
White	African-American
Premature/Low Birth Weight 62.7	Low Birth Weight 285.6
Congenital Anomalies 89.6	Maternal Complications 134.6
SIDS 53.8	Congenital Anomalies 130.6

Anne Arundel County Infant Mortality Rate per 1,000 Live Births. Black Versus White 1991-2000 & Black to White Ratio



The County supports a multi-disciplinary team including the Health Department, local hospitals, and local providers to review infant and fetal deaths. The Fetal & Infant Mortality Review (FIMR) Team was established in late 1997 and attempts to clarify contributing factors to infant deaths within the County while also identifying those issues that work to alleviate infant mortality risk. The FIMR team addressed 40 deaths by January 2002.

Data Source: Infant Mortality in Maryland 2000, Vital Statistics Administration, DHMH. Maryland Vital Statistics 2000 Preliminary Report, DHMH. Child Deaths in Maryland, MD State Child Fatality Review Team First Annual Report 1999-2000 DHMH

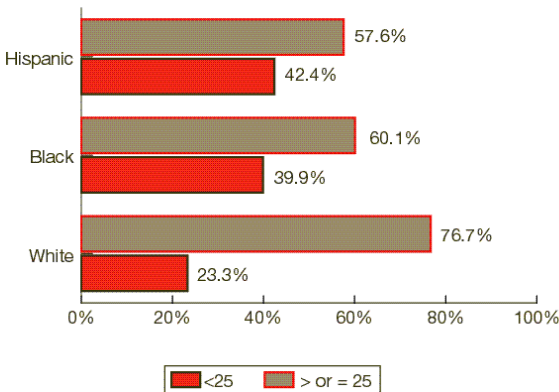
Infant Mortality

Using this table to classify birth weight and age at death, the County is considering utilizing the World Health Organization's Perinatal Periods of Risk (PPOR) approach to help identify those areas that might benefit from targeted intervention of limited resources. Early analysis of County infant deaths between 1997-2000 shows white rates are highest in the maternal care category while African-American rates were highest in the maternal health and prematurity category.

Age & Wgt at Death	Fetal	Newborn	Post Neonatal
500-1500 grams	Maternal Health/Prematurity		
1500+ grams	Maternal Care	Newborn Care	Infant Health

Analysis of births by race and marital status shows a greater percentage of African-American and Hispanic births occur before age 25 than white births. In addition, births to unmarried women occur at greater rates in African-Americans (55.3%) and Hispanics (40.4%) than whites (20.7%). These younger mothers may have greater difficulty providing an optimum prenatal and postnatal environment for the infant population at risk.

**Percent of Births By Race & Ethnicity For Mothers < 25 or Over 25 Years
Anne Arundel County 2000**

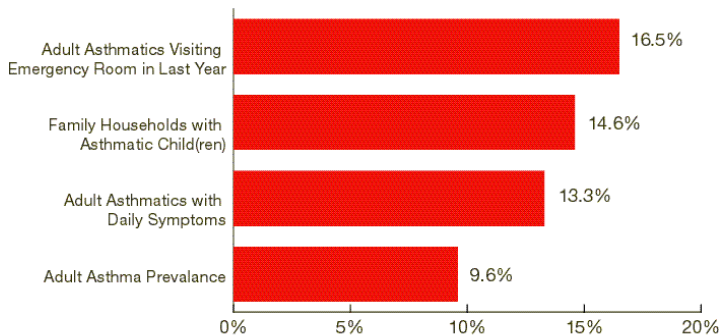


Data Source: Infant Mortality in Maryland 2000, Vital Statistics Administration, DHMH. Maryland Vital Statistics 2000 Preliminary Report, DHMH. Child Deaths in Maryland, MD State Child Fatality Review Team First Annual Report 1999-2000 DHMH

Asthma

Asthma is a leading cause of school absenteeism and one of the leading causes of hospitalization and emergency room visits for children and youth. It can be fatal or cause permanent lung damage if not treated properly. In 1997, there were 3,366 asthma hospitalizations in Maryland for children 0-14 years of age.

Asthma in Anne Arundel County 2001



Since 1998, the County's School Health Services Program has worked to improve asthma management in the County public schools. Asthma prevalence for the 1999-2000 school year was 6.9% or 5,102 of 75,000 students. School nurses provide asthma education to affected students. Many of these students had been missing class or been on home teaching status.

In 2000, the Open Airways for Schools Asthma Education Program was selected as a best practice asthma program by the Centers for Disease Control and Prevention. The School Health Services Asthma Management Program was selected as the case study to highlight the Open Airways program. In August 2000, a new school health management plan was developed to improve assessment and data collection. Presently the program is utilizing a \$19,000 DHMH grant to analyze the data to determine if the program decreases absenteeism.

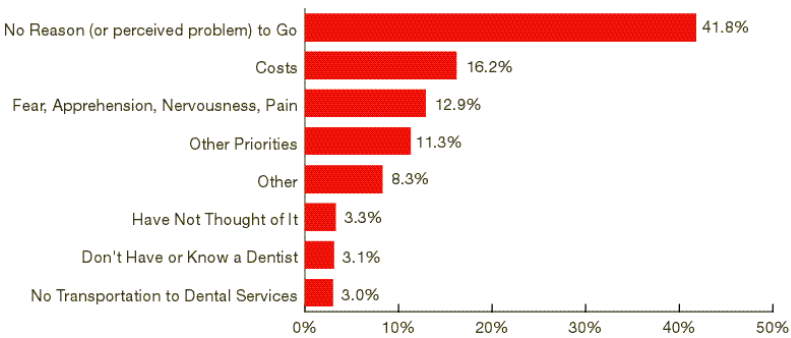
Data Source: Anne Arundel County Department of Health, Maryland DHMH, Center for Maternal and Child Health, CDC BRFSS, Agency for Healthcare Research and Quality

Oral Health

Oral hygiene and dental care are important at all stages of life but are often neglected at younger and older age extremes. Children often suffer with preventable cavities and many older residents have dental problems that negatively impact upon nutrition and health.

In Anne Arundel County, 76.7% of the adult County population has visited a dentist in the last year. A similar number of 74.9% had their teeth cleaned in the last year. Not surprisingly, 71.7% of the County has some kind of dental insurance coverage.

Reasons for Not Seeing a Dentist in Last Year, Anne Arundel County 2001



Data Source: Anne Arundel County BRFSS

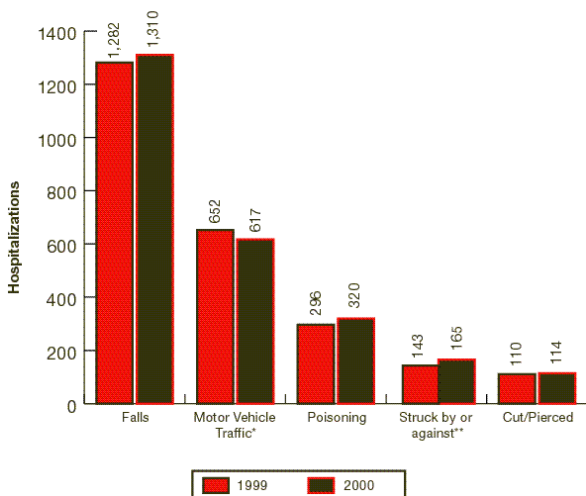
Unintentional Injuries

Injury-Related Hospitalizations in Anne Arundel County 1999 - 2000

Injuries remain a significant problem in Anne Arundel County, ranking 5th of 24 jurisdictions for hospitalizations related to motor vehicles, 4th for fire-related injuries, 3rd for firearm-related injuries, and 4th for injuries related to falls. For 1999 and 2000, the top five reasons for injury-related hospitalizations of County residents were falls, motor vehicle traffic, poisoning, struck by or against, and cut/pierced. Many of these injuries have considerable morbidity and financial costs associated with them.

The overwhelming majority of these injuries were unintentional and were previously considered accidents beyond our control. We now know that most injuries can be prevented through behaviors or engineering. With about 8,000 injury-related hospitalizations in both 1999 and 2000, injury prevention remains a County priority.

**Numbers of Hospitalizations for Top Five Injuries.
Anne Arundel County, 1999 - 2000**



* ICD Codes V30-86 (occupant), V20-28 (motorcycle), V12-14 (Cyclist), V02-04 (Pedestrian)

** ICD Codes E916 (Falling Objects), E917 (Striking Against or Struck Accidentally by Objects or Persons), E960 (Unarmed Fight), E968 (Assault by Striking Blunt or Thrown Object, etc.)

Data Source: Injuries in Maryland: A Statewide Perspective, 1999 – 2000. Department of Health and Mental Hygiene, Family Health Administration, Office of Injury Prevention.

Unintentional Injury Deaths

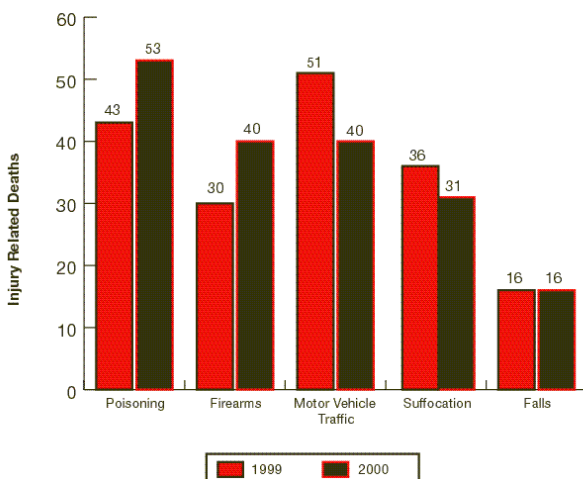
Unintentional Injury-Related Deaths in Anne Arundel County 1999 - 2000

Injury is the sixth most common cause of death in the County. Like injury-related hospitalizations, we know many injury-related deaths are preventable with interventions (e.g., seat belts, helmets, smoke alarms).

Statewide, there were 6,578 injury-related deaths over 1999 and 2000. It is the number one cause of death for children ages 1 to 14. Sixty percent of injury-related deaths occurred in the 15 to 54 age group. In addition, male injury-related death rates were about 2.5 times that of females (In 2000, 87.7/100,000 for males versus 34.4/100,000 for females).

There were a total of 434 injury-related deaths over 1999 and 2000 in Anne Arundel County. Two hundred forty-nine were unintentional, 25 were homicides, and 85 were suicides. The County injury-related death rate for 1999 was 45.4/100,000 and in 2000 was 44.1/100,000. Compared to other Maryland jurisdictions, the County's injury-related death rate ranked 21st in 1999 and 19th in 2000.

**Numbers of Injury-Related Deaths for Top Five Injury Causes.
Anne Arundel County, 1999 - 2000**



Data Source: Injury-Related Deaths in Maryland: A Statewide Perspective, 1999-2000. DHMH, Family Health Administration, Office of Injury Prevention

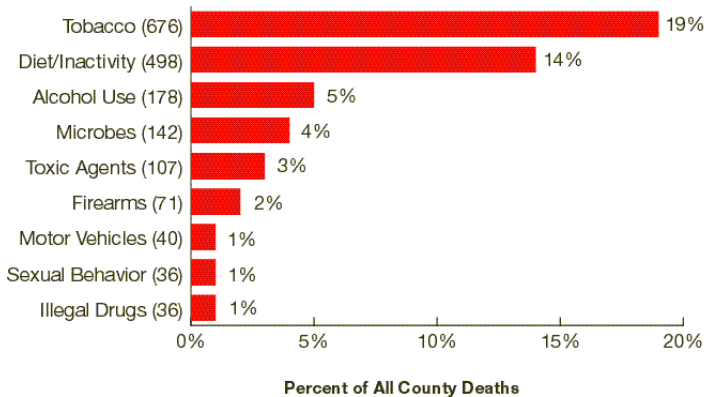
Underlying Causes of Death

What Really Kills Anne Arundel Countians?

Estimated Deaths by Preventable Causes for 3,556 Deaths in Year 2000

In 2000, there were approximately 1,800 deaths that could be attributed to preventable or environmental causes. The largest percentage of these deaths (33%) is related to tobacco use and diet/inactivity.

Estimated Deaths by Total (#) and Percent For Preventable Causes, Anne Arundel County 2000



Source: Estimated Deaths by Percent from McGinnis JM, Foege WH. Actual Causes of Death in the United States. JAMA. 1993;270(18) 2207-2212, adapted to Anne Arundel County Death Certificate Data.

