Annual Report

Approved by Oncology Committee on October 9, 2007

HCA Richmond Health System

Committee Chair Report
Retreat Hospital
2006

Retreat Hospital embraces the vision of “improving the health of the communities we serve by providing innovative, comprehensive and compassionate healthcare services at the best value.” In pursing this vision, Retreat Hospital’s Community Hospital Cancer Program follows the goal of the American College of Surgeon’s to decrease the morbidity and mortality of cancer, through ACoS guidelines as standards set forth by this organization.

This annual report reflects data regarding cancer diagnoses at Retreat Hospital in 2006 with specific site and comparative reports. Some highlights of Retreat Hospital’s American College of Surgeon’s approved Community Hospital Cancer Program 2006 activities are enumerated below –

- Special focus on colorectal cancer with community education and staff education as part of Retreat’s Colorectal Cancer Program
- Community presentations on cancer prevention and early detection
- Tune-up for Life: Health Maintenance for Men Seminar
- Continued education and certification through a national organization for staff administering chemotherapy
- Community education, as well as a support group for lymphedema patients by Retreat’s trained lymphedema therapists
- Involvement in Relay for Life and Daffodil Days, American Cancer Society events
- Community Health Fair, between Mulberry and Robinson Streets including information regarding multiple services provided by Retreat for cancer screening and education

We are grateful for the dedication of our multidisciplinary team, as they continue to provide quality cancer care to the members of our communities.

Ghulam D. Qureshi, MD

Cancer Committee Membership
Retreat Hospital
2006

Ghulam D. Qureshi, MD
Chair - *Hematology/Oncology*

Richard M. Clary, MD
ACoS Program Liaison
General Surgery

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Urology

Leslie Cohen, MD
Plastic Surgery

Timothy R. Taylor, MD
Diagnostic Radiology

Bernard Tisdale, MD
Radiation Oncology

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Pathology

Carlene Bennett, RN, CTR
Cancer Program Coordinator

William Boldin, M. Div.
Chaplain

Sarah Golightly
Quality Management

Rebecca Janssen, RN, BSN
Interim Nurse Executive

Terri Levandoski
American Cancer Society Mission Delivery Director

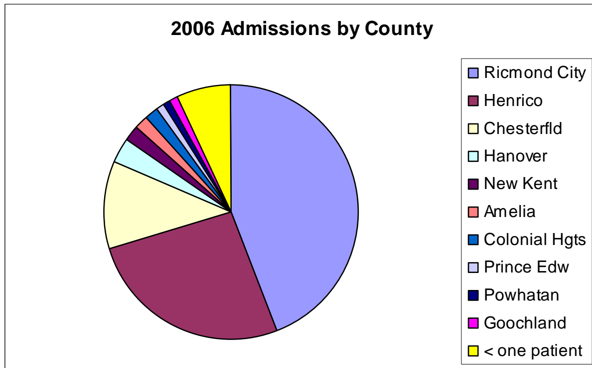
James Moniz, RN
Manager, 5E Clinical Coordinator

Lori Moyer, PT
Director Rehabilitation Services

Judith Poole, MSW
Social Work

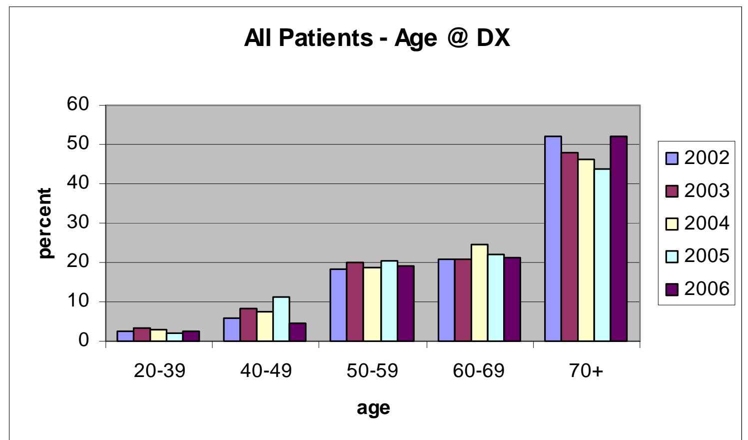
Brenda Woodcock, RN, BSN, WHNP
Dir. Med/Surg & Women's Services

Cancer Registry Focus

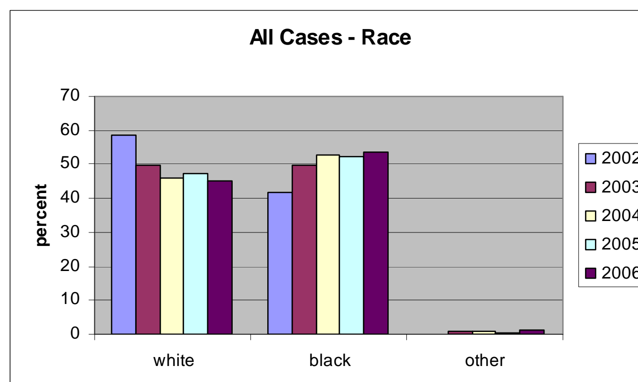


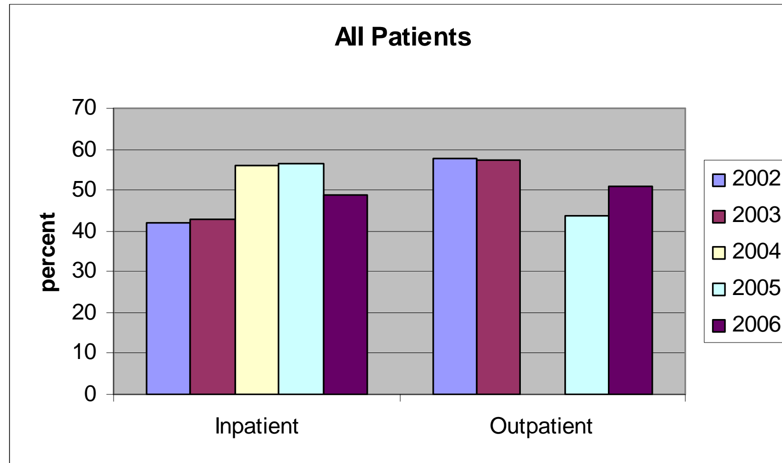
An integral element of Retreat Hospital's Community Hospital Cancer Program is the Cancer Registry, which contains data on demographic, diagnostic, treatment and survival information on over 4,889 patients who were diagnosed or received first course of treatment at Retreat Hospital since 1991. While patients come to Retreat from multiple counties, forty percent of them came from the City of Richmond in 2006, with Henrico and Chesterfield Counties following with twenty-six percent and eleven percent respectively. These data vary little from the data gathered in 2004.

In a bird's eye view of Retreat Hospital cancer registry's patients, we can see that Retreat Hospital over the past five years continues to have a markedly higher percentage of patients seventy years of age an older, which is generally representative of Retreat's overall patient population.



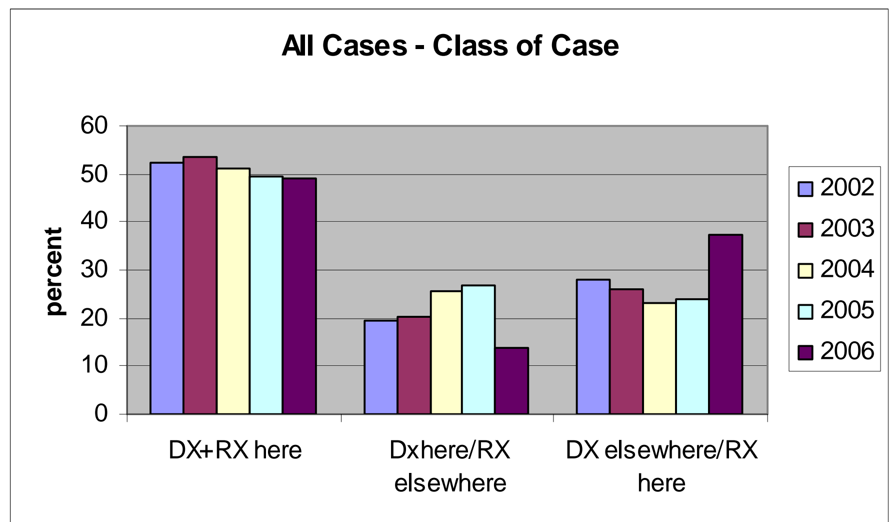
Race/ethnicity continues to shift following physician practices and the composition of the City of Richmond population, as well as location of the various hospitals.





Interestingly, over the past five years there is variance in trending of inpatient and outpatient admissions for cancer, alternating in 2002/2003 with 2004/2005, then balancing in 2006.

The type of admission may have been impacted by potential reimbursement issues for services as regulations changed, as well as the age and comorbidities of patients. Consistently over the past five years about 50% of patients were diagnosed and treated at Retreat Hospital with a significant decline in 2006 of patients diagnosed here and treated elsewhere, and a significant increase in patients diagnosed elsewhere and treated here in 2006.

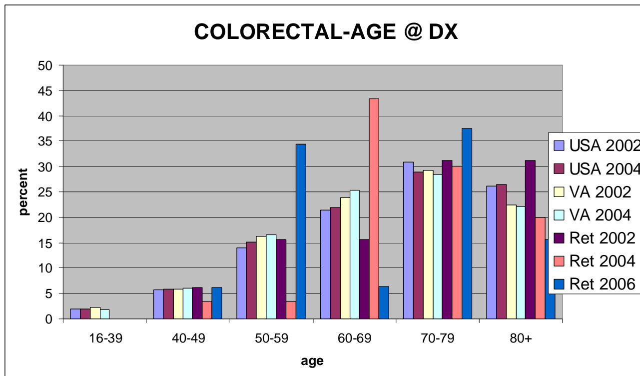


To assure continued medical surveillance and to provide statistical data each case is followed annually. Data from our registry is reported to the Virginia Cancer Registry and the National Cancer Data Base. There about 1,500 Commission on Cancer approved hospitals in the United States and Puerto Rico, representing approximately twenty-five percent of all hospitals. Eighty percent of newly diagnosed cancer patients are diagnosed and/or treated at these Commission on Cancer approved hospitals and data regarding these cases is used regularly to monitor the quality of care delivered in Commission on Cancer approved Cancer Programs and is invaluable to improving cancer care outcomes. Thus, the care of cancer patients in this community and data relative to them contributes to the effort to decrease the morbidity and mortality from cancer. Retreat is proud to be an approved by the Commission on Cancer as a Community Hospital Cancer Program.

2006 PRIMARY SITE TABLE - Best Stage (ICD-0-3) ** Only Analytic Cases are listed under Stage*

Primary Site	Cases	Analytic	Non-Analytic	Male	Female	Stage 0	Stage I	Stage II	Stage III	Stage IV	Unkn / Unstg / Stg 88
Tongue	1	0	1	1	0	0	0	0	0	0	0
Esophagus	3	2	1	1	1	0	0	0	1	0	1
Stomach	5	5	0	2	3	0	4	0	0	1	0
Colon	35	32	3	14	21	4	5	12	7	4	0
Rectum/Rectosig	14	12	2	7	7	2	3	6	0	0	1
Anus/Anocanal	3	2	1	1	2	0	0	1	0	0	1
Liver	1	1	0	0	1	0	0	0	0	1	0
Pancreas	6	6	0	4	2	0	2	0	0	2	2
Gallbladder	1	1	0	0	1	0	1	0	0	0	0
Respiratory											
Lung/Bronch	32	29	3	17	15	2	4	2	5	12	6
Soft Tissue	4	4	0	2	2	0	1	0	1	2	0
Skin											
Melanoma	6	6	0	4	2	4	1	1	0	0	0
Non-Epithelial Skin1	1	1	0	0	1	0	0	0	1	0	0
Breast	23	17	6	0	23	4	7	3	2	1	0
Fe Genital											
Vulva	1	1	0	0	1	1	0	0	0	0	0
Ovary	3	3	0	0	3	0	0	0	1	2	0
M Genital											
Prostate	52	47	5	52	0	0	1	41	2	0	3
Urinary Sys											
Bladder	4	3	1	3	1	2	1	0	0	0	0
Kidney	6	4	2	3	3	0	2	1	0	1	0
Benign CNS	2	2	0	0	2	0	0	0	0	0	2
Lymphoma											
Hodgkin	2	2	0	1	1	0	1	0	1	0	0
Non-Hodgkin	3	2	1	2	1	0	0	0	0	2	0
Myeloma	2	0	2	0	2	0	0	0	0	0	0
Leukemias											
CLL	1	0	1	0	1	0	0	0	0	0	0
ILL-DEFINED/UNSPEC	5	5	0	5	0	0	0	0	0	0	5
TOTAL	**217**	188	29	120	96	17	33	67	22	28	21

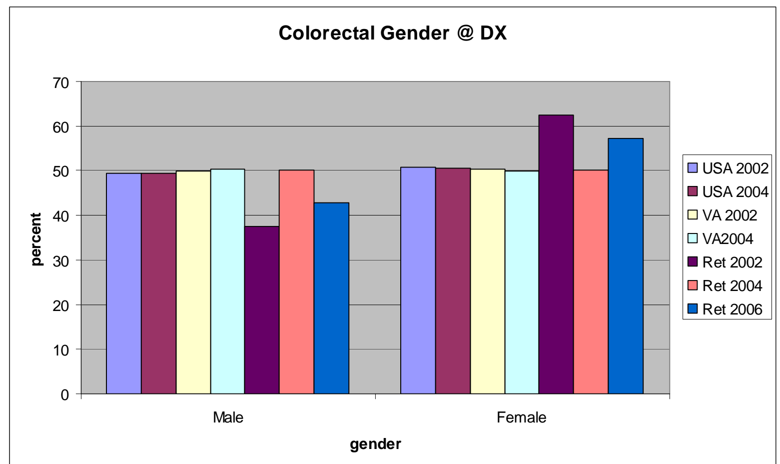
COLORECTAL CANCER

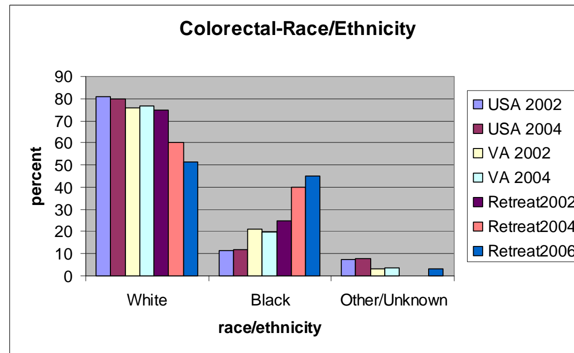


Colorectal cancer is the third most common cancer in the United States in both men and women, with an estimated 112,340 cases of colon cancer and 41,420 cases of rectal cancer in 2007. Virginia is expected to see 3,530 of these cases with 1,320 deaths from this disease in 2007. These numbers are reduced in recent years due to increased screening promoting early detection through increased public awareness, and improved treatments.

As with many cancers the incidence of colorectal cancer increases with age, with most occurring after the age of fifty. Retreat Hospital's data varies from that of the nation and the state. Overall demographics of Retreat's patient population, changing physician practices and the early development of a colorectal program at Retreat may have contributed to this deviation.

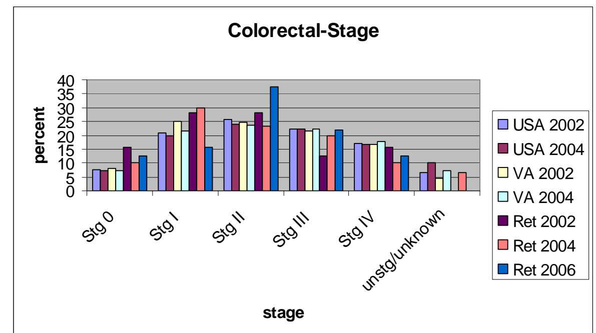
Since early colorectal cancer often has no warning symptoms it is important to undergo screening utilizing fecal testing for occult blood, sigmoidoscopy, barium enema or most importantly colonoscopy. Most colorectal cancers develop from polyps; therefore detection of these polyps through colonoscopy potentially allows them to be removed before they become cancerous, or at least at an earlier and usually more treatable stage. Participating in regular physical activity, reducing intake of high saturated fats and red meats, avoiding smoking, limiting alcohol intake and eating fruits, vegetables and whole grains can help reduce risk. Less than 10 percent of colorectal cancers are caused by inherited genetic syndromes, however colorectal cancer is twice as common in those with family history, and inflammatory bowel disease may increase risk as well. Throughout the past few years Retreat physicians have provided several public presentations stressing the importance of screening for gastrointestinal problems in general, and more specifically colorectal cancer. The attendance of more women than men at these events may have led more women to actively seek screening at our facility, consequently contributing to Retreat's data variance from national and state data.

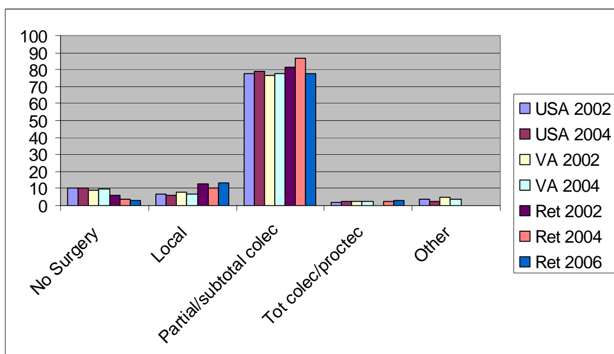




Although African Americans have the highest rates of colorectal cancer when compared with any other ethnic group in the United States, Retreat's declining rates among whites compared to an increase among African Americans may be due in part to the hospital's demographics rather than to an actual rise in rates for African Americans.

In reviewing stage of disease it is of interest that Retreat experiences somewhat higher numbers of Stage 0 to II cases and fewer Stage IV cases than experienced in the nation and in Virginia. This may again be related to Retreat's community education efforts directed toward prevention of colorectal cancer. We recognize that the stage of disease not only influences treatment but has a direct bearing on survival rates. The American Cancer Society reports the following five year survival rates for colorectal cancer – 90% for early localized disease, 68% regionally spread disease, and 10% for distant metastasis. At all stages of colorectal cancer Retreat's survival rates exceed national percentages with 100% survival of patients with local and regional disease and 29% survival of patients with distant metastasis.





Surgery remains the most common treatment for colorectal cancer ranging from polypectomy (local destruction) to total colectomy or coloprototectomy. As we look at the surgical intervention for colon cancer alone, it appears the extent of surgery at Retreat is comparable to that of the nation and state. While laparoscopic surgery generally offers a shorter length of stay in the hospital, less pain and a quicker recovery time, it may not be the most appropriate method due to the location of the tumor, or other pre-existing conditions. During 2006 sixty percent of the partial colectomies at Retreat were performed laparoscopically.

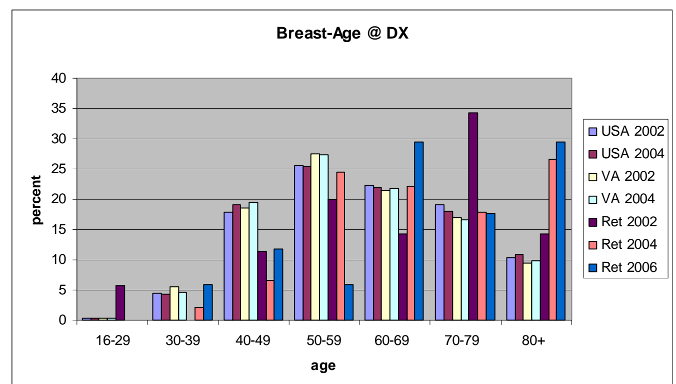
For patients with involvement of tumor beyond the bowel wall, in lymph nodes or with distant involvement adjuvant chemotherapy would be a desired addition to treatment. We are seeing multiple advances in drug therapy, as well as targeted therapy for colorectal cancer, affording patients fewer side effects and improved outcomes for younger and older patients alike. Radiation therapy and chemotherapy may be advocated pre-operatively and/or post-operatively for patients with rectal cancer depending on the stage of the tumor.

It is recognized that with previously mentioned prevention and early detection measures, outcomes will be improved and cure is more likely to be achievable. Retreat Hospital continues to work for excellence in colorectal cancer education, early detection and best practices in colorectal cancer management.

Breast Cancer and the Future

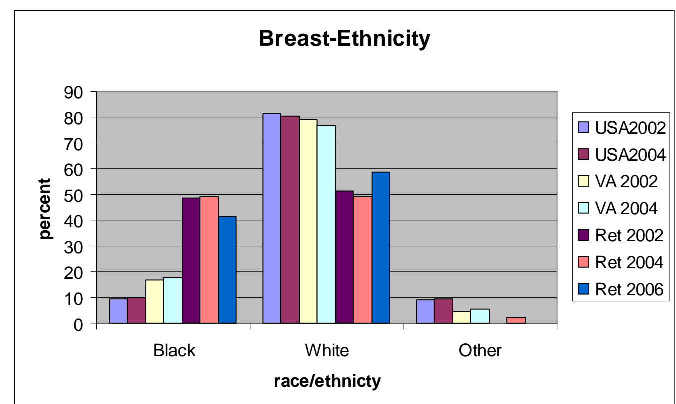
Breast cancer is the most frequently diagnosed cancer in United States women. In 2007, 178,480 new cases of invasive breast cancer are expected to be diagnosed among U.S. women, accounting for more than one in four cancers in women. Despite the increasing number of cases being diagnosed each year, the most impressive finding is the report from the American Cancer Society which finds the death rate from breast cancer in the U.S. continues to decline by more than two percent per year since 1990. This increase in breast cancer survival is credited to the progress made in early detection and treatment.

It is anticipated that Virginia will see 4,570 of these cases comprising thirteen percent of all cancer cases in the state. This report will offer a comparison of Retreat's data with that of the nation and the state. Although about one percent of breast cancers occur in men, it is a disease that primarily affects women; therefore this report will focus on Retreat's female breast cancer statistics.



Risk factors include increasing age, family history of breast cancer, high breast tissue density, a long menstrual history, never having children or having a first child after 30 years of age, recent use of oral contraceptives, being overweight, physical inactivity, consumption of one or more alcoholic beverages a day and possessing the BRCA 1 and BRCA2 genes.

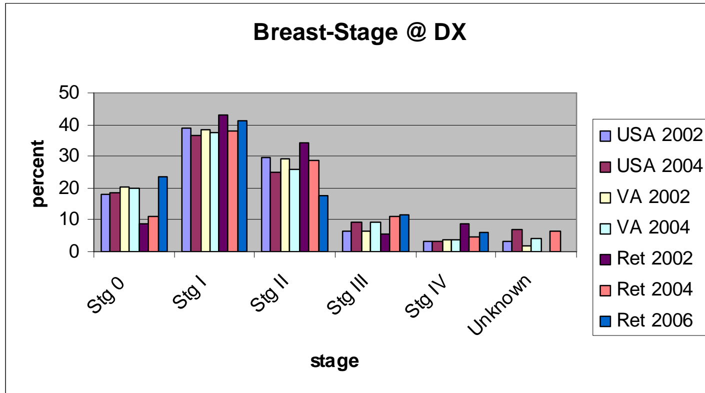
As we review age at diagnosis Retreat's numbers are somewhat lower than those of the nation and of Virginia for the 30-69 age range. The numbers at Retreat are higher in the 70 and above range, the national median age being 61 years of age between 2000 and 2004. In addition, Retreat experiences disparity in race/ethnicity with both factors due to the facility's overall patient demographic profile.



Presently, a woman's prognosis is based on the stage of her disease, including the differentiation and the size of the primary tumor and the number of nodes involved. Women diagnosed with early stage cancer on the average are more likely to have a favorable outlook compared to women with a high stage. Yet, there are individuals with early stage breast cancer who will recur and die from their breast cancer. Conversely, there is a subgroup of women who have more advanced cancer and who survive without any evidence of recurrence.

Our present problem is the inability to identify these subgroups so proper approach can be rendered. Currently treatment recommendations are based upon best-guess estimates of an

individual cancer patient's prognosis. However, custom tailored therapy to the specific individual is in the near future.



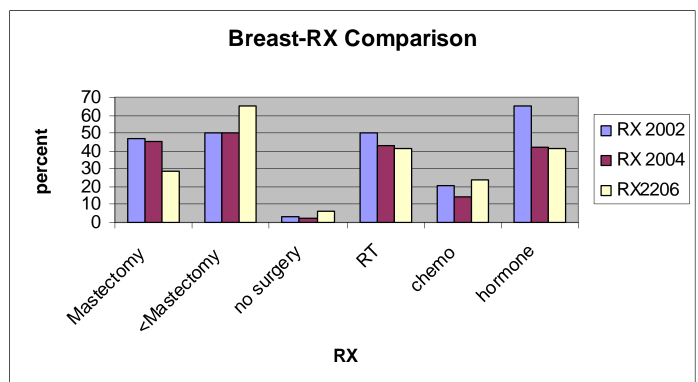
Retreat has seen, over time a slightly greater number of stages I, III and IV cases than in the nation and in Virginia. This again may be influenced by Retreat's demographics. American Cancer Society data reveal the five year relative survival rate for localized disease is 98%, regional disease is 83% and distant disease is 26%.

Retreat's survival rates, from 2002 cases have exceeded these data with exception of the two stage III cases. For these patients advanced age and multiple co-morbities may have been contributing factors to the lower survival rate.

The entire approach to breast cancer prognosis and treatment is in the process of being changed. Due to the tremendous and rapid advances in our understanding of the genetics of breast cancers from research, we are now beginning to discover the alteration in breast cancer cells that lead to their uncontrolled growth and tendency to spread to distant sites. Recent innovations make it possible to study thousands of genes and proteins at once to compare differences in genetic and protein make-up between different individuals and different breast cancers.

Very soon we will be able to obtain a small sample of the breast cancer from an individual, determine how it will behave and select a more tailored best-approach therapy. Taking this approach to the next level, we will be able to determine the specific biochemical or molecular reactions that are abnormal and allow a particular women's cancer to grow and spread. We will then be able to develop a treatment specific to that alteration. Currently there are studies, such as oncotyping that allows evaluation of the genetic influences in early stage, estrogen receptor positive, node negative breast cancers to better determine prognosis and treatment than staging alone. We will identify those individuals who truly will benefit from chemotherapy and those in which the risk would have been useless.

Breast cancer management most often involves more than one modality and calls for a multimodality approach, which may include surgery, chemotherapy, hormonal therapy and radiation therapy. When comparing surgical management from 2002 to 2006 the trend at Retreat has shifted from mastectomy to segmentectomy or lumpectomy; and this is in keeping with national trends.



Studies have shown that patients having segmentectomy or lumpectomy followed by radiation therapy, when compared to those having mastectomy alone, have equivalent outcomes. Patients receiving chemotherapy are generally patients with large tumors, positive lymph nodes, oncotypes that indicate high risk for recurrence, and metastasis. The use of hormonal treatment is dependent on hormone receptor results with choice of agents influenced by the patient's menopausal status. Targeted biologic therapy may also be employed for treatment if the tumor tests positive for HER2/neu. Generally, patients having surgery less than mastectomy are referred for radiation therapy in order to decrease risk of local recurrence. In more recent years the face of radiation oncology has changed in offering more options in the arena of breast cancer treatment.

Detection capabilities are also being technologically improved. With newer modalities such as MRI and PET scans for staging, better understanding of the natural history of breast cancer will unfold. As a result, current treatment philosophies will be challenged. We are entering into a new and exciting era in understanding breast cancer with how the patient will be diagnosed to the way the patient will be treated. It is possible the elusive "cure" could be found around the corner.