Consideration was given in the late 1940s to enlarging the 26th Street hospital building by adding a wing and also erecting a doctors' office building. Both ideas were discarded as plans matured for a new building on 44th Street and Dewey Avenue, across the street from the University of Nebraska Medical Center. A $5 million dollar, 200-bed hospital was completed and occupied on Dec. 16, 1955. It was emphasized by the Board of Trustees that its geographic location did not change Clarkson's position as an independent Episcopal institution which was to be maintained as such in any joint activities with the Medical Center. The two institutions have enjoyed a cooperative venture in medical education. Clarkson facilities--especially the Storz Pavilion--have been used most effectively.

The hospital was very active and at times hard-pressed to provide beds for acutely ill patients. For example there were 9,730 patients admitted in 1955 and 15,135 in 1965. The medical staff had increased from 172 to 282 and in 1986 to 466. All agreed to the need for an additional wing containing 250 beds, which accepted its first patient in January 1969. Fifteen million dollars was spent adding the so-called North Tower and renovation of the South Tower, including changing the hospital entrance from the south to the east side of the building.

The bed capacity was increased to over 525, on one occasion (1979) reaching 542. This census required 2,241 employees to operate the hospital.

Improvements and expansion of various departments took place, including Radiology and Nuclear Medicine, as well as special units for ophthalmologic surgery, orthopedics and GU surgery.

Funds for this massive enterprise were from many sources, including generous pledges by the medical staff, the Service League and the hospital employees. It is noteworthy that the pledge by the medical staff far surpassed the $460,000 goal which had been set. The drive was under the direction of Henry J. Lehnhoff Jr., M.D. The willingness of the staff to participate assured those in charge of the building project that the doctors would support the newly modified institution. The Clarkson staff was now equipped to maintain its position of professional leadership.

In 1980, the hospital completed the construction of the Doctors Building North Tower, located on the north side of Farnam Street and connected by a skywalk to the existing South Tower. Excellent, easily accessible office space was thereby available to the staff and to outpatients requiring the facilities located in the hospital. As professional expertise advances, more outpatient services are being utilized for all patients. Since 1982, the hospital has made structural alterations to comply with this change in the provision of medical care.
The science of medicine made rapid advances during the 1940s to the present, most of it while the Clarkson staff and personnel were enjoying the advantages of the current building and the equipment it contained.

Physicians' practices changed in this same interval. Specialization became more prevalent, necessitated by the burgeoning knowledge relative to all aspects of medical practice. Change in the provision of care to patients has been supported by the hospital in the area of grave professional problems as evidenced by the employment of intensive care units and a cardiac care unit and the linear flow unit expressly for the isolation and protection of patients with blood disorders resulting in impairment of immunity to infection. As mentioned above, outpatient care of patients who once required hospitalization is now provided in many instances. This is well exemplified by ophthalmic surgery, minor surgery and diagnostic procedures such as colonoscopy.

The hospital complies with appropriate response--whether structural or administrative--to the requirement for changes as they appear and maintains a high standard of practice within its walls.

Various special techniques were developed which continued to add to Clarkson's prestige as an up-to-date hospital providing care of the most formidable disorders. One of the first of these was renal dialysis, the credit for which goes to George W. Loomis, M.D., a productive member of the department of Internal Medicine.

It was in 1955 and 1956 that consideration of the development of such a renal dialysis unit started. Prior to that, a patient
with acute kidney failure, which is usually fatal, could be treated only with supportive measures. Attempts were made to treat such patients with peritoneal dialysis, a modality which has had some limited utilization in the late 1940s. Dr. Loomis, with the strong backing of the hospital administration, launched hemodialysis by first investigating the so-called rotating drum artificial kidney.

In 1956, he recognized the efficiency of the twin-coil artificial kidney. A unit was constructed later that year.

The first dialysis treatment was done on Feb. 2, 1957. The patient had been transferred from University Hospital and the treatment was a success. Dialysis was thereafter carried out over the next year or two on patients with chronic renal failure. Transportation of the machine to other hospitals was fraught with massive difficulties and was discontinued. The first successful treatment of acute renal failure was in 1959, when a patient who had received several units of mismatched blood at another institution required the procedure. Another patient in the early days of dialysis had kidney failure from acute tubular necrosis, a unique form of kidney damage in this case due to muscle destruction (rhabdomyolysis) in uncontrolled epilepsy.

Frederick Ware, M.D., joined the staff in 1961 and has since played a substantial role in nephrology. His interest in and knowledge of cardiovascular and pulmonary disease strengthened the Department of Internal Medicine. He played a role in forming the Department of Pulmonary Medicine. Steven A. Schwid, M.D., was associated with the program from 1967 until 1973. In 1973, Dr. Ware became the director of the hemodialysis unit. Dr. Loomis continues as a consultant in nephrology and has won the respect and gratitude of the professional staff and all concerned who have observed the need for the development of that specialty.

An outpatient unit was developed without federal or university funding. The program had the support of a far-sighted hospital administration and Board of Directors. Dr. Ware emphasizes that only one other unit in the United States can claim similar financial independence.

In the beginning the technical work was done by the doctors. There were no trained personnel as there are today. Sixty patients are maintained on an outpatient basis and over 8,000 treatments are given annually. Home dialysis, using the peritoneal technique, has been developed and some 60 patients are under that management.

With the advantage of the recently developed external shunt (a vein-to-artery connection), repeated treatments may be
given to patients without need for multiple vein and artery punctures.

Dr. Loomis and Dr. Ware were truly pioneers in the field of nephrology.

The transplantation of organs was initiated with that of kidney from human donors to patient. After some years of preparation and with the arrival of Richard W. Steenburg, M.D., in 1970, the program was established at Clarkson Hospital where it has remained. Around 35 transplants are done annually. The program is an excellent example of teamwork by hospital administration and professional staff.

Progress in ophthalmic (eye) surgery coincided with the hospital’s expansion. Prior to World War II, cataract enucleation required the patient to endure 10 to 14 days of bed confinement with the head immobilized by sandbags. Since the improvement in sutures and finer needles, removal of cataracts has become in many cases an outpatient procedure. Advancing techniques and the development of the intraocular lens have added to the success of cataract surgery. Surgical treatment of glaucoma has progressed equally. Recently the condition has responded well to laser therapy.

Retinal detachment, once considered hopeless, responds to surgery and the use of the laser.

In 1958, John Filkins, M.D., performed the first corneal transplant in Nebraska at the Clarkson Hospital.

There were additional firsts in eye surgery, including lens implant (1975), rotoextractor vitrectomy (1973) and employment of the YAG (Yitrium Aluminum Garnet) laser (1984).

These intricate techniques are now performed in superbly equipped operating rooms complete with surgical microscopes, Argon and YAG lasers and capable nursing assistance. The ophthalmic surgical volume is greater in Clarkson than in any other Omaha hospital. The department has always been outstanding, listing such prominent members as Dr. Gifford and J. Hewitt Judd, M.D., and currently John C. Filkins, M.D., and Stanley M. Truhlsen, M.D.

Outstanding among the professional advances providing patients with more effective care has been in the area of lung disease, namely the department of Pulmonary Medicine Services. This was initiated by Louis W. Burgher, M.D., current director and his three associate physicians, all specialists in the field (see list of pulmonologists).

The department was first designated Inhalation Therapy Services and in 1970 was under the direction of Dr. Ware, whose clinical skill was augmented by a unique knowledge of physiology. He currently applies this special training to the management of the Renal Dialysis Center.

That same year the department changed its name to Respiratory Therapy. A state-of-the-art intensive care center was developed which emphasizes the application of up-to-date management for patients with respiratory problems.

In 1970, Dr. Burgher was hired as the medical advisor to the department. This was followed by certification of Clarkson Hospital for the treatment of pulmonary tuberculosis. The state tuberculosis hospital closed because of decreased need.

In 1974, a referral hospital service concept was developed. By 1986, this includes nine hospitals in three different states whose pulmonary function laboratories and respiratory services are managed by this department.
In 1975, Clarkson developed the first pulmonary rehabilitation service in a private hospital in the United States. Its success has received some national prominence.

A School of Respiratory Therapy, part of Metropolitan Technical Community College, was assisted in its development in 1979. The hospital finds it a source of fine employees for the department.

Respiratory stress testing became an efficient facet of the program and included metabolic testing, nocturnal monitoring of lung function (oximetry) and brought to light a relatively new disease—sleep apnea—which responds to appropriate treatment.

Pulmonary medical services expanded to include all professional advances including the utilization of the YAG laser during bronchoscopy and the addition of a computer-enhanced pulmonary function laboratory. Office pulmonary testing is offered to physicians in the region.

In 1980, the department published a study indicating that the humidification of low-flow oxygen was not necessary if it be provided below four liters per minute. Having been reported to the profession, this principle has been universally adopted and saved millions of dollars of hospital expenses in the treatment of patients requiring oxygen therapy.

The department has become a national leader in all respects and most recently for the promising development of the use of the hyperbaric oxygen chamber. The chamber administers oxygen in higher concentration than usual atmospheric air to promote healing of diseased oxygen-deficient tissues.

The expansion of the department is illustrated by the following data:

- In 1974, 2,500 respiratory treatments were administered. Fifty patients were treated with mechanical ventilators. By fiscal 1986, 76,000 respiratory treatments were administered and 898 patients received treatment by mechanical ventilators.

- The increased professional activity required an increase in the number of respiratory therapists from seven in 1974 to 45 in 1986. This exemplifies the hospital’s willingness to meet the needs for specialized treatment of lung disorders in a rapidly enlarging number of patients.

- Heart disease, a major cause of death in the United States, demands accurate diagnostic evaluation as well as up-to-date effective treatment. Both are available at Clarkson and both are upgraded as technical advances occur. The medical investigations of heart and circulatory disorders are accomplished with state-of-the-art equipment. The Electrocardiography Department performs over 16,000 readings a year and around 4,000 treadmill exercise tolerance tests. Within the department, some 1,132 cardiac catheterizations were done in 1985. These demonstrate detailed degrees of obstruction of the coronary arteries and are done in substantial numbers, among the total of 4,043 other diagnostic procedures of various kinds. Echocardiography has been refined and is becoming progressively more valuable as a noninvasive diagnostic procedure. There were 1,436 done in 1985.

- William D. Angle, M.D., Theodore F. Hubbard, M.D., and Richard R. Miles, M.D., contributed to the early development of cardiology. There are currently nine specialists on the Clarkson staff (see list of cardiologists).

- Cardiologists now use percutaneous transluminal coronary angiography to visualize the heart’s blood vessels. At times, by the insertion of a small balloon,
they can successfully dilate a coronary artery and restore circulation through it without major surgery. Some 245 such procedures were done in the fiscal year 1985-1986. Selected cases are being done as outpatients, some 255 patients underwent 702 diagnostic procedures without complications.

Cardiovascular surgery has advanced at Clarkson along with other specialties previously mentioned. In the 1960s many of the procedures were done by Delbert Neis, M.D. In recent years Randolph M. Ferlic, M.D., has performed the major volume of cardiac surgery, including seven heart transplants (four in 1985 and three in 1986). Treatment of coronary heart disease by bypass surgery has increased annually--264 such procedures being done in 1984, 334 in 1985, and 225 in the first six months of 1986. Surgical restoration of occluded circulation in the carotid arteries in the neck (which supply blood to the brain) responds very favorably to the removal of the obstruction by endarterectomy. Obstruction of other blood vessels is likewise amenable to surgery, including the treatment of occluded arteries in the legs by iliofemoral bypass procedures. Disability has been spared many patients who heretofore had no hope for anything but progressive invalidism.

The Department of Radiology of which Richard A. Bunting, M.D., is chairman, contributes substantially to the physicians' care of his patients. In 1985, 49,000 procedures, of which 19,060 were chest X-rays, were done in the department, which illustrates the growth of its utilization. In a report of 1950 by the original chairman of the Department, T.T. Harris, M.D., a maximum of 500 cases a month had been done, amounting to something less than 6,000 per year. At that time, one part-time radiologist provided adequate service. This included diagnostic and therapeutic radiology. Today 10 radiologists are required to provide the various services including the use of a $2 million X-ray therapy apparatus (in 1950 it cost $13,000) and a $3 million CAT scan apparatus. In 1985, 4,315 CAT scans were done.

Special procedures, particularly those involved with evaluating the degree of arterial obstruction, have provided a means of restoring circulation through obstructed arteries by so-called “balloon” angioplasty, which may be applied to the lower extremities, kidneys, or other vessels. In 1985, 23 renal artery obstructions to the kidney were relieved and 24 such procedures were done in the lower extremities by members of the Radiology Department.

Nuclear medicine provides scanning of lungs, bones, abdominal organs such as liver or kidney, heart and thyroid gland. It
is a rapidly expanding source of clinical information. Radioisotopic studies of the heart inform the doctor as to the state of the heart muscle after it has been damaged by various diseases. Considerable help is provided by Nuclear Medicine in the diagnosis of pulmonary infarction (blood clot in the lungs).

As in the case of the Department of Radiology, the Department of Pathology, as recently as the late 1940s, provided its service to the hospital, utilizing one part-time pathologist, J.P. Tollman, M.D., and two technicians. The medical staff was given information regarding their patients based on relatively simple and tedious biochemical analysis of blood and urine and other routine studies, such as blood counts. All phases of clinical pathology were expanded as the employment of new apparatus and techniques contributed to the variety and reliability of laboratory procedures.

As the hospital census grew so did the number of procedures done in the department as did the number of personnel required. The department now consists of eight full-time well-trained pathologists, each with a special interest in some phase of pathology. Earl G. Greene, M.D., is chairman. In 1985, 140 employees were kept busy within the department, providing service to 17,870 patients who were admitted that year, requiring 347,085 procedures. Up-to-date recording and storage of data employing computers and other advanced techniques is efficiently employed.

Subspecialization among pathologists has resulted from the large assortment of techniques whose intricacy requires special and unique capabilities of the pathologists and their supporting staff. Currently, there is the section of chemistry capable of the accurate and rapid evaluation of all common and many rare disorders as to the chemical abnormality of body fluids, the evaluation of which assists in their diagnoses and followup treatment. There is the section of immunology and one of immunohematology which provide valuable information to the clinicians dealing with problems presented by patients with various blood disorders of which one group are those who may require bone marrow transplants. These are now available to patients and the department can freeze and store bone marrow specimens for autologous transplants. The patients’ own marrow is removed, stored and returned to him at the proper time. This program works closely with Hematology-Oncology, of the Department of Medicine.

Only recently has certain esoteric new tests been developed and used. One of these is DNA cell cycle analysis. By identifying abnormalities in malignant cells, it can aid the clinician in the determination of diagnosis and prognosis of the patient. Another important field of progress is in antibody studies which are particularly valuable in providing safely matched blood transfusions.

Substantial help is given to the physician caring for patients with infectious diseases. The section of microbiology has methods for identification of organisms and their sensitivity to antibiotic therapy.

The microscopic analysis of diseased tissue obtained by surgery or biopsy has been more efficient with the passing of years and improved instruments and materials. Clarkson possesses an electron microscope, which provides much higher image magnification and better structural details.

The department maintains a School of Medical Technology which graduated 11 students in 1985. A large percent of them received special awards for various outstanding scholastic achievements.
Hematology-Oncology is a relatively new medical subspecialty. In 1952, Peyton Pratt, M.D., became the first physician in Nebraska to confine his work to it. In 1973, he was joined by John R. Feagler, M.D. Subsequently, Joseph D. Verdirame, M.D., and James R. Commers, M.D., were added to the Hematology-Oncology group. Dr. Pratt retired in 1975.

There are malignant states which involve the body generally and are not usually amenable to local treatment. Among these are the lymphomas (malignancy of lymph glands, one of the most common being Hodgkin’s disease). Also included are the leukemias in which abnormal white blood cells (leukocytes) proliferate to a degree incompatible with health.

The management of certain of these cases includes X-ray therapy and chemotherapy (drugs which destroy the lethal abnormal cells). In accomplishing this, it is sometimes imperative to temporarily destroy the bone marrow where blood cells are formed. In this way the condition may be cured. To preserve bone marrow, it is sometimes necessary to harvest it from the patient to be frozen and stored (cryopreserved) and later restored to the patient who may then be free of disease. This is known as autologous bone marrow transplant. Bone marrow transplanted from one individual to another is termed allogenic. It was the type employed first at Clarkson Hospital and, incidentally, the first bone marrow transfusion in Nebraska. The patient was cured and has lived four and one-half years since. In 1985, the first autologous transplant was done and 10 patients have subsequently been so treated, of which eight are disease free. A total of 35 patients have undergone bone marrow transplantation at Clarkson Hospital since 1983.

Patients with damaged bone marrow have reduced immunity to infections and require special protection, which is uniquely provided by the Hematology-Oncology Care Center (HOCC) through which air four times cleaner than ordinary room air is filtered and circulated in a laminar fashion. Special cleanliness of patients in attendance as well as visitors is observed. In one year, approximately 80 patients are admitted to the unit, of which an average of 42 have acute leukemia and an average of seven have bone marrow transplants.

In connection with the Red Cross, Dr. Feagler was instrumental in developing a technique for the collection and storage of platelets--cells essential to blood coagulation--the transfusion of which may be life saving. A technique for granulocytes (white cells) transfusion has been developed.

Abnormal substances can be removed from the patient’s blood by a process called plasmapheresis. A normal plasma can be reconstituted. This is a significantly valuable treatment in certain disorders.

This section of Clarkson Hospital provides help to many seriously ill individuals.