

ROBERT J. FLANAGAN, M.A.I.  
REAL ESTATE APPRAISER AND CONSULTANT  
57 CEDAR GROVE AVENUE  
NEW LONDON, CONNECTICUT 06320

TELEPHONE (203) 444-2033, 442-6530, 739-2588

September 1, 1987

Edward Elcik  
City Assessor  
City Hall  
126 Daniel Street  
Portsmouth, NH 03801

Dear Mr. Elcik:

Pursuant to your request for an appraisal of the market value of real property located on Junkins Avenue, Portsmouth, New Hampshire, owned by Portsmouth Hospital Foundation, and known as Portsmouth Hospital; I submit herewith a report which describes the methods of approach and contains data gathered in the investigation.

The definition of market value is contained in the body of this report. This appraisal is made in fee simple title subject to recorded easements and rights-of-way. The dates of appraisal are April 1, 1985 and April 1, 1986. The date of inspection of the property is July 31, 1987.

In my opinion, the market value of subject property, identified and described in the body of this report, as of April 1, 1985 and April 1, 1986, is \$4,700,000.

It has been a pleasure being of service to you.

Very truly yours,



Robert J. Flanagan, MAI







### IDENTIFICATION OF SUBJECT PROPERTY

Subject property is located on Junkins Avenue, Portsmouth, New Hampshire, and is owned by Portsmouth Hospital Foundation. The legal description is contained in the Addenda to this report. The property is known as Portsmouth Hospital. The most recent deed reference is Book 2679, Pages 2802-2803 of the Rockingham County Land Records.

### PURPOSE OF THE APPRAISAL

The purpose of this appraisal is to estimate the market value of subject property as of April 1, 1985 and April 1, 1986. The date of inspection of the property is July 31, 1987. This appraisal is made with the understanding that the present ownership of subject property includes all the rights which may be lawfully owned subject to recorded easements and rights-of-way and is, therefore, in fee simple title.

### DEFINITION OF MARKET VALUE

Market value is defined in Real Estate Appraisal Terminology, Revised Edition, published by the American Institute of Real Estate Appraisers and the Society of Real Estate Appraisers, as "the most probable price in terms of money which a property should bring in an open and competitive market under all

conditions requisite to a fair sale, the buyer and seller each acting prudently and knowledgeably and assuming the price is not affected by undue stimulus."

#### ZONING DATA

Subject property is located in a "GR" General Residential zoning district of the City of Portsmouth. Pertinent sections of the Portsmouth zoning regulations and a zoning map are contained in the Addenda to this report. Subject property is in the Portsmouth Historical District "HA".

#### ASSESSMENT AND TAX DATA

Subject property has an assessed value of \$8,009,700 for Portsmouth ad valorem taxes as of the dates of appraisal. This assessment is designed to represent 100% of April 1, 1983 values, the date of the last general revaluation of taxable property in Portsmouth. This assessment is composed of: Land - \$800,000, and Improvements - \$7,209,700. The applicable tax rate for the City of Portsmouth is 27.25 mills for 1985 and 26.80 mills for 1986. The property tax for subject property, therefore, is  $\$8,009,700 \times 0.02725 = \$218,264.32$  for 1985 and  $\$8,009,700 \times .02680 = \$214,659.96$  for 1986.

### HIGHEST AND BEST USE

Highest and best use is the most profitable, likely use to which a property can be put. It is that use which may reasonably be expected to produce the greatest net return to land and/or buildings over a given period of time.

Taking into consideration the character and nature of the neighborhood, zoning, the physical characteristics of the land and buildings, and all other factors which affect value; it is the opinion of the appraiser that the highest and best use of subject property is municipal development. (See expanded discussion in "Property Data" section of this report.)

### CITY DATA

The City of Portsmouth is located in Rockingham County in the Seacoast Region of the State of New Hampshire. It is located midway between Boston, Massachusetts, 52 miles to the south, and Portland, Maine 54 miles to the north.

Interstate Route #95, the major north-south highway between Maine and Florida, runs through Portsmouth. This highway, with four interchanges in Portsmouth, provides excellent motor transport access to the City. U.S. Route #1, the Spaulding Turnpike, U.S. Route #4 and New Hampshire Routes #16 and #101 complete the major road network serving Portsmouth.

Rail freight transportation is provided by the Boston and Maine Railroad. Logan International Airport is one hour south of Portsmouth in Boston. Frequent limousine service is available. A small commercial airport, Skyhaven, is located in Rochester, New Hampshire, 15 miles northwest of Portsmouth. Water freight transportation is available at piers controlled by the New Hampshire State Port Authority. Interstate bus transportation is provided by Greyhound and Trailways. In-city bus service is provided by Marshall's Transport.

The City of Portsmouth, 15.6 square miles in area, has a population of 29,210 as of 1975. This is an increase of 13.3% over the 1970 population total of 25,717. Projections for 1980

show an increase of 14.7%, up to 33,518. Rockingham County has a population of 164,291 as of 1975. This is an increase of 18.2% over the 1970 population total of 138,951. County projections for 1980 show an increase of 29.4%, up to 212,600. Many of these County residents patronize the business and shopping facilities of Portsmouth.

Tourism is among the major industries of the area. The largest area industry is the Portsmouth Naval Shipyard, located across the Piscataqua River in Kittery, Maine. Pease Air Force Base is another large civilian employer as well as having about 9,000 military personnel on duty as of 1975.

Portsmouth has a city manager - city council type of government. There are fully-paid police and fire departments. There are two commercial banks and three savings banks. Disposable personal income per household amounted to \$11,412 in 1974. The various hotels and motels offer 450 rooms to visitors. The City of Portsmouth is currently experiencing many of the same economic problems as those of other cities throughout the nation; however, this does not appear to have had a significantly adverse economic effect on the community.

### PROPERTY DATA

Subject property is known as the Portsmouth Hospital or the Old Portsmouth Hospital. It is located on a 9.02-acre parcel of land just south of the central business district on the east side of Junkins Avenue. It is an elevated site providing various water views from various elevations. It is an institutional use which helps make the transition from commercial uses to the north to residential uses to the south. It is an attractive parcel.

The improvements feature two hospital building complexes containing an estimated 134,200 square feet of floor area, 20% of which was constructed in 1895 and 80% between 1928 and 1979. The hospital contains 144 beds. Zoning is Residential; the property is located in an "HA" Historic District. More specific information on the site and buildings have been culled from pre-existing technical reports and excerpted in the Addenda to this report.

During the early 1980's, some hospital interests urged changes which included the construction of a new hospital facility. On February 19, 1985, the Portsmouth Hospital Foundation entered into a lease agreement with Hospital Corporation of America and a second agreement to purchase the real estate.

It is apparent that during this general title period a decision was made to construct a new hospital facility. An new site was acquired on Borthwick Avenue on November 19 and 20, 1984. New hospital construction commenced and occupancy occurred in February, 1987. The Certificate of Need had been transferred from the old to the new facility.

After extended negotiations, subject property was acquired by the City of Portsmouth on May 18, 1987 for a price of \$2,250,000, according to City Attorney Robert Sullivan, who reports that this sale is not an "arm's length" transaction in that there were considerations other than money on the parts of the seller - Portsmouth Hospital Foundation - and the buyer - the City.

The Portsmouth Hospital, as a private entity, competes with hospitals in York, Dover, and Exeter. It became increasingly obvious in 1984 and 1985 that a new facility would replace the old one. The appraiser inspected the interiors of subject buildings on July 31, 1987, accompanied by Edward Elcik, Assessor of Portsmouth, and John Adams, Maintenance Supervisor for the plant.

The 80% of building area represented by those facilities constructed between 1928 and 1979 are in better physical and functional condition than the 20% of building area constructed in 1895. Both buildings can be accommodated to other uses, in the judgment of the appraiser.

A review of the mechanical systems in the buildings is contained in several previous technical reports. In summary, the property is served by municipal water supply and sanitary sewer services. The sprinkler system which serves several building areas is in acceptable condition. The electrical system of 2500 amps can adequately serve hospital and other uses. The elevators are in good, working order. The heating and air conditioning systems need replacement, according to Mr. Adams. Better physically handicapped access is desirable.

Addressing the opinion of the highest and best use, most consideration is given to the existing hospital use as of the dates of appraisal - April 1, 1985 and 1986. As a hospital, subject property had a limited useful life as of these dates. Much factual information is available to support this observation. Reference is invited to the Cost Approach contained in this report. This Approach indicates a value in the general \$4,000,000 range.

Consideration is then given to alternate uses such as municipal, offices, residential, and commercial. Special consideration is given to municipal uses since the municipality eventually acquired the property. The City can place this property to a variety of office, residential, or commercial uses while in municipal ownership, according to City Attorney Sullivan.

Sales of properties in Portsmouth which required rehabilitation and/or renovation indicate that subject property is a likely candidate for such treatment. Area rental information tends to support this conclusion. Highest and best use of subject property is rehabilitation and renovation for municipal uses.

LAND SALES

Sale No. 1 - This property was purchased by Portsmouth Investment, Inc. from Paul Mack on August 30, 1985 for \$1,008,000. It is located on Lafayette Road, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2561, Page 446. This is a vacant land parcel containing 74.45 acres, much of which is rear land. The parcel has 100 feet of street frontage on the east side of Lafayette Road. The purchase was made for the development of condominiums. The frontage is in a GB - Commercial zone and the rear, representing the major section of the site, is in a SRI - Residential zone. The location is across from Constitution Avenue. The sale was made at the rate of \$13,539 per acre or \$0.31 per square foot of land area.

Sale No. 2 - This property was purchased by Magnolia Corp. from Robert W. Simpson on August 14, 1985 for \$315,000. It is located at 2600 Lafayette Road, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2558, Page 876. This is a vacant land parcel containing 2.75 acres with good usable frontage on the west side of Lafayette Road south of Constitution Avenue. This site has not been developed. Zoning is GB - Commercial. The sale was made at the rate of \$114,545 per acre or \$2.63 per square foot of land area.

Sale No. 3 - This property was purchased by Joseph C. Tucker from James A. Shanley on May 8, 1984 for \$140,000. It is located on Lafayette Road, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2491, Page 831. This is a vacant land parcel containing 8.0 acres with 254 feet of frontage on the west side of Lafayette Road just north of the Rye Town line. A portion of this site was subsequently developed with a 24,000 square foot metal building. Zoning is I - Industrial. The sale was made at the rate of \$17,500 per acre or \$0.40 per square foot of land area.

Sale No. 4 - This property was purchased by High Street Associates from Evergreen Park Corp. on October 1, 1984 for \$155,000. It is located on Constitution Avenue and Lafayette Road, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2515, Page 1548. This vacant land parcel contains 1.66 acres on the west side of Lafayette Road and the south side of Constitution Avenue. Subsequent to the sale a Friendly Ice Cream store and other retail businesses located in buildings constructed on the site. Zoning is GB - Commercial. The sale was made at the rate of \$93,373 per acre or \$2.14 per square foot of land area.

Sale No. 5 - This property was purchased by Martin S. Quirk from Joseph C. Tucker on August 10, 1984 for \$80,000. It is located at 3580 Lafayette Road, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2505, Page 1800. This is

a vacant land parcel containing 2.1 acres with 300 feet of frontage on the west side of Lafayette Road just north of the Rye Town line. This site was subsequently developed with a one-story, metal, industrial-type building. Zoning is I - Industrial. The sale was made at the rate of \$38,095 per acre or \$0.87 per square feet of land area.

SUMMARY OF LAND SALES

Sale

<u>No</u>	<u>Location</u>	<u>Date</u>	<u>Price</u>	<u>Area</u>	<u>Zoning</u>	<u>Rate</u>
1.	Lafayette Rd	08/85	\$1,008,000	74.45	GB-SRI	\$13,539
2.	Lafayette Rd	08/85	315,000	2.75	GB	114,545
3.	Lafayette Rd	05/84	140,000	8.00	I	17,500
4.	Lafayette Rd	10/84	155,000	1.66	GB	93,373
5.	Lafayette Rd	08/84	80,000	2.10	I	38,095

SITE VALUATION

Reference is invited to the listing of "Land Sales" contained in this report and to "Summary of Land Sales." These sales are used as evidence of the value of subject site. Also considered is the sale of the new hospital site on Borthwick Avenue in November 1984. The price of \$1,190,000 for 41.36 acres indicates a rate of \$28,772 per acre. Much of this land was not developable and was subsequently donated to the City of Portsmouth. The unit price of usable acreage, therefore, was significantly higher than \$28,772 per acre.

Consideration is given to location, zoning, physical characteristics including view, site improvements, and all other factors affecting value. The value estimate for subject site is:

$$9.02 \text{ acres} \times \$50,000 \text{ per acre} = \$451,000.$$

### VALUATION PROCESS

The three recognized approaches to value have been considered in this appraisal. They are the Cost Approach, the Sales Comparison Approach, and the Income Approach to Value.

The Cost Approach is the summation of the site value and the depreciated replacement cost of the improvements. This approach includes the estimate of accrued depreciation, which is evident in subject improvements. The Cost Approach is employed in this appraisal.

The Sales Comparison Approach examines and analyzes sales of comparable properties as evidence of the value of subject property. Where there is sufficient quantity and quality of sales information available, this approach is considered good evidence of value since it reflects the actions of buyers and sellers in the real estate marketplace. This approach is processed in this appraisal.

The Income Approach to Value capitalizes or converts net income into a value estimate for subject property. It is the present worth of future benefits from an economic viewpoint. Properties of this size and nature are not typically rented in the real

estate marketplace. Market rental data are not available for processing. The Income Approach is not employed in this appraisal.

COST APPROACH

Current Cost - Replacement cost is used in this appraisal. It would not be reasonable to project that the subject buildings would be reproduced. Pertinent definitions are:

Replacement Cost. The estimated cost to construct, at current prices, a building with utility equivalent to the building being appraised, using modern materials and current standards, design, and layout.

Reproduction Cost. The estimated cost to construct, at current prices, an exact duplicate, or replica, of the building being appraised, using the same materials, construction standards, design, layout, and quality of workmanship, and embodying all the subject's deficiencies, superadequacies, and obsolescence.

The Marshall Valuation Service is used as the source for current replacement cost of subject buildings. It is a nationally-recognized cost reference. The basic cost indicators are taken from the November 1984 edition in Section 15. For April 1, 1985 and April 1, 1986, replacement costs are estimated as follows:

Base Cost, Sec. 15, Page 20, Class B, Average Hospital	\$92.31
Adjustment for lack of central air conditioning	- <u>2.80</u>
Modified cost per sq. ft. of building	\$89.51

	<u>1985</u>	<u>1986</u>
Multipliers - Cost	1.00	1.02
- Local	<u>0.97</u>	<u>0.97</u>
Total	0.97	0.99

Adjusted 1985 cost per sq. ft. -  $\$89.51 \times 0.97 =$  \$86.82

Adjusted 1986 cost per sq. ft. -  $\$89.51 \times 0.99 =$  \$88.61

Current Cost - 1985 - 134,200 sf x \$86.82 per sf = \$11,651,000

Current Cost - 1986 - 134,200 sf x \$88.61 per sf = \$11,891,000

#### Physical Deterioration

First building was constructed in 1895. Use as hospital terminated in 1986-87 period. Total life as hospital is 91-92 years. Some useful life remains in these buildings. Total useful life is estimated to be 100 years.

<u>Year Built</u>	<u>Bldg %</u>	<u>Eff. Age</u>	<u>Eff. Age Component</u>
1985	20%	91 yrs.	18.2 yrs.
1928	18%	58 yrs.	10.4 yrs.
1934	14%	52 yrs.	7.3 yrs.
1964	35%	22 yrs.	7.7 yrs.
1968	1%	18 yrs.	0.2 yrs.
1973	1%	13 yrs.	0.1 yrs.
1975	5%	11 yrs.	0.6 yrs.
1979	6%	7 yrs.	<u>0.4 yrs.</u>

$\frac{44.9\%}{100} = 45\%$  Physical

Based on this age-life relationship, it is estimated that physical deterioration in subject buildings is 45% as of the dates of appraisal.

Functional Obsolescence - This form of accrued depreciation has been addressed with the use of replacement cost.

Economic Obsolescence - This form of accrued depreciation is caused by negative influences outside the property's borders. It is also known as locational obsolescence. Recognition is given here that subject buildings are reaching the end of their useful lives as hospital buildings and there is restricted foreseeable alternative use. An additional 45% penalty is applied to physically depreciated replacement cost.

These cost totals, on a per bed basis, workout as follows:

1985 - \$11,651,000 divided by 144 beds =	\$80,910 per bed
1986 - \$11,891,000 divided by 144 beds =	\$82,576 per bed

The median area per bed in general hospitals is 1,005 square feet (93.4 square meters) with a typical range of 745 to 1,410 square feet (69.2 to 131.0 square meters). Community hospitals, particularly teaching, and newer hospitals with a high percentage of private rooms tend toward the higher area per bed, while older public hospitals with more ward areas and investor owned hospitals tend toward the lower side of the range.

The following are costs per bed of completely equipped general hospitals, including Group I and II equipment, excluding extremes, at designed capacity.

<u>Class</u>	<u>Average Cost</u>	<u>Typical Cost Range</u>
A & B	\$112,000	\$77,000 to \$156,000
C & D	92,000	63,000 to 130,000

The above-cited information is taken from Section 15, Page 21 of the cost manual. It is used to test the validity of the current cost totals. For subject buildings, there are 134,200 square feet for 144 beds at the rate of 932 square feet per bed. This tends toward the lower end of the range.

The per bed costs of \$80,910 in 1985 and \$82,576 in 1986 are also in the lower end of the range of cost indicators.

<u>Summary of Cost Approach</u>	<u>1985</u>	<u>1986</u>
Replacement Cost	\$11,651,000	\$11,891,000
Physical Deterioration - 45%	- 5,243,000	- 5,351,000
Physically Depreciated Replacement Cost	\$6,408,000	\$6,540,000
Economic Obsolescence - 45%	-2,884,000	-2,943,000
Fully Depreciated Replacement Cost	\$3,524,000	\$3,597,000
Site Value (includes site Improvements)	451,000	451,000
Property Value Estimate - Cost Approach	\$3,975,000	\$4,048,000
Value per Sq. Ft. of Bldg. Area (134,200)	\$29.62	\$30.16

PROPERTY SALES

Sale No. 1 - This property was purchased by Peirce Block Partnership from Peirce Estate Trustee on May 2, 1986 for \$1,196,000. It is located at 21 High Street and Market Square, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2600, Pages 47 and 49. The land area is 0.20 acre. There is rear street access. The property contains three buildings with 23,468 square feet to four stories. Building ages are from 1860-1910. These brick buildings have oil-fired, steam heating systems. Use is commercial. Zoning is Central Business. Municipal water supply and sanitary sewer services are available. The buildings were in fair condition at the time of sale. The sale was made at the rate of \$50.96 per square foot of building area including land.

Sale No. 2 - This property was purchased by Christos Papoutsy from George H. Kimball, Trustee et al on December 17, 1985 for \$575,000. It is located at 19-25 Market Street, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2578, Page 834. The land area is 0.20 acre. This is an excellent downtown location. The property contains some vacant land affording eight rental parking spaces. The three-story, brick building is old. It has 11,094 square feet. There is a gas-fired, hot water heating system. Use is commercial. Zoning is Central Business. Municipal water supply and sanitary sewer

services are available. The building was in average condition at the time of sale. The sale was made at the rate of \$51.83 per square foot of building area including land.

Sale No. 3 - This property was purchased by Russell W. Jeppesen from J.R. Maher et al on October 1, 1985 for \$600,000. It is located at 270-272 State Street, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2565, Page 2498. The land area is 0.07 acre. The location is less than prime. The property contains two buildings, three and four stories, with a total area of 10,002 square feet. The brick buildings were constructed in 1840. They have steam heating systems. Use is commercial. Zoning is Central Business. Municipal water supply and sanitary sewer services are available. The sale was made at the rate of \$59.99 per square foot of building area including land.

Sale No. 4 - This property was purchased by Barry Shore and Carol L. Aronson from Edmond L. Daigle and Ann Shine on September 30, 1985 for \$245,000. It is located at 79 Daniel Street, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2565, Page 1583. The land area is 0.03 acre. The property contains a three-story, brick building which was constructed in 1840 and contains 3,625 square feet. There is a steam heating system and also space heaters. Use is commercial.

Zoning is Central Business. Municipal water supply and sanitary sewer services are available. The sale was made at the rate of \$67.59 per square foot of building area including land.

Sale No. 5 - This property was purchased by Clyde E. and Fimie A. Williamson from Exchange Titleholders Continental Properties, LTD. on September 4, 1985 for \$621,000. It is located at 401 State Street and 10-14 Congress Street, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2561, Page 2936. The land area is 0.46 acre. The location is prime. The property contains a theater building of brick construction of old age. Building area is 11,106 square feet in one and two stories. There is a paved parking area on site. The building has a steam heating system. Zoning is Central Business. Municipal water supply and sanitary sewer services are available. The sale was made at the rate of \$55.92 per square foot of building area including land.

Sale No. 6 - This property was purchased by Robert Chidlaw and Deborah Phillips from Alfonso Cabera in February 1985. The second section was purchased by Russell Jeppesen from Barbara H. Gray on May 31, 1985. The total purchase price is \$630,000. It is located at 84-92 Pleasant Street, Portsmouth. The deed is located in the Rockingham County Land Records in Book 2535, Page 659 and Book 2547, Page 1385. Land area is 0.16 acre. The two and three story, frame buildings were constructed in 1840 and contain a total area of 12,485 square feet. Use is commercial.

Zoning is Central Business. Municipal water supply and sanitary sewer services are available. The sales were made at the combined rate of \$50.46 per square foot of building area including land.

### SALES COMPARISON APPROACH

Reference is invited to the listing of "Property Sales" contained in this report. These sales are used as evidence of the value of subject property. They are summarized as follows:

Sale #	Date	Price	Land	Bldg	Age	Stories	Rate/SF
1.	05/86	\$1,196,000	.20ac	23,468sf	1860	4	\$50.96
2.	12/85	575,000	.20ac	11,094sf	Old	3	51.83
3.	10/85	600,000	.07ac	10,002sf	1840	4	59.99
4.	09/85	245,000	.03ac	3,625sf	1840	3	67.59
5.	09/85	621,000	.46ac	11,106sf	Old	2	55.92
6.	05/85	630,000	.16ac	12,485sf	1840	3	50.46

These sales demonstrate clearly there is an active market in the downtown Portsmouth area for old, well-located properties which can be renovated. These are 1985-1986 vintage sales of commercial-type properties with building sites which range from 3,625 square feet to 23,468 square feet, considerably smaller than subject property. The unit value indicators range from \$50.46 to \$67.59 per square foot of building area including land. The unit of \$50.00 per square foot is selected as most appropriate for subject property before comparison adjustments.

In real estate there is a tendency for larger properties to sell at lower unit prices. A minus adjustment is necessary to recognize the smaller size of the comparable sales. A minus

adjustment is also indicated for location since subject property is not located in the central business district. Since the sales occurred between May 1985 and May 1986, no time adjustment is indicated.

Adjustments of 15% each are made for size and location as follows: \$50.00 per square foot x 70% = \$35.00 per square foot. Using this comparison process for both dates of appraisal, the value estimate for subject property is: 134,200 square feet of building area including land x \$35.00 per square foot = \$4,697,000.

Recognizing the more desirable characteristics and qualities of the building complex constructed between 1928 and 1979, this value estimate may also be expressed as follows:

1928-1979 Buildings - 107,360sf x \$40.00 per sf -	\$4,294,400
1895 Building - 26,840sf x \$15.00 per sf -	<u>402,600</u>
Total Property Value Estimate	\$4,697,000

CORRELATION - FINAL VALUE ESTIMATE

The results of the two approaches to value used in this appraisal are:

Cost Approach - 1985	\$3,975,000
- 1986	\$4,048,000
Sales Comparison Approach	\$4,697,000

The Cost Approach is based on the hospital use as the highest and best use of subject property for both valuation dates. This opinion of highest and best use has been rejected in favor of municipal development.

The Sales Comparison Approach is based on the concept of municipal development. This approach is oriented to market information in Portsmouth. The value estimate is appropriate for both dates of appraisal.

It is the opinion of the appraiser that the market value of subject property, identified and described in this report, as of April 1, 1985 and April 1, 1986, is \$4,697,000, rounded to \$4,700,000.

CERTIFICATION

I certify that, to the best of my knowledge and belief,

- the statements of fact contained in this report are true and correct.
- the reported analyses, opinions, and conclusions are limited only by the reported assumptions and limiting conditions, and are my personal, unbiased professional analyses, opinions, and conclusions.
- I have no present or prospective interest in the property that is the subject of this report, and I have no personal interest or bias with respect to the parties involved.
- my compensation is not contingent on an action or event resulting from the analyses, opinions, or conclusions in, or the use of, this report.
- my analyses, opinions, and conclusions were developed, and this report has been prepared, in conformity with the requirements of the Code of Professional Ethics and the Standards of Professional Practice of the American Institute of Real Estate Appraisers.
- the use of this report is subject to the requirements of the American Institute of Real Estate Appraisers relating to review by its duly authorized representatives.
- I am currently certified under the voluntary continuing education program of the American Institute of Real Estate Appraisers.
- I have made a personal inspection of the property that is the subject of this report.
- no one provided significant professional assistance to the person signing this report.

The opinion of market value of subject property, as described in this report, is certified as follows:

Value Estimate: \$4,700,000

Date of Appraisal: April 1, 1985 and  
April 1, 1986

  
Robert J. Flanagan, M.A.I.

ASSUMPTIONS AND LIMITING CONDITIONS

This appraisal is made subject to the assumptions and limiting conditions as follows:

1. No liability is assumed by the appraiser for matters of a legal nature affecting the property, such as title defects, encroachments or liens. The title is assumed to be good and marketable. The property is appraised as being free and clear of any indebtedness or easements, unless otherwise stated.
2. The plots and measurements, while not representing an actual survey of the property, were derived from reliable records.
3. Unless otherwise stated, mechanical equipment, heating and plumbing systems, and electrical systems have not been specifically tested, and they are assumed to be in working condition. It is assumed that there are no hidden or inapparent conditions of the property, subsoil or structures which would render it more or less valuable than otherwise comparable property. The appraiser assumes no responsibility for such conditions or for engineering which might be required to discover such things.
4. No specific test for vermin has been made by the appraiser, unless otherwise stated.
5. In this appraisal assignment, the existence of potentially hazardous material used in the construction or maintenance of the building, such as the presence of urea formaldehyde foam insulation, and/or existence of toxic waste, which may or may not be present on the property, has not been considered. The appraiser is not qualified to detect such substances. The client is urged to retain an expert in this field if so desired.
6. The distribution of land and improvement values applies only under the existing program of utilization and conditions stated in this report. Separate valuations for either the land or improvements may not be used in conjunction with any other appraisal.
7. The information and opinions furnished by others and used in this report are considered reliable and correct, however, no responsibility is assumed as to their accuracy.
8. Possession of this report, or any copy or part thereof, does not constitute the right of publication nor may the same be used for any other purposes by anyone but the recipient without the consent of the appraiser.
9. The appraiser, by reason of this appraisal, is not required to give testimony in court or attendance on its behalf, unless arrangements have been made previously therefor.

ROBERT J. FLANAGAN, M.A.I.  
 57 Cedar Grove Avenue  
 New London, Connecticut 06320

### Professional Experience

Independent Fee Appraiser. Director of Real Estate, City of New London, CT. Assessor, New London, 1963-1972. Member, Board of Tax Review, 1963. Secretary, Zoning Study Committee, 1962. Real Estate & Building Editor, Norwich Bulletin, 1954-1963. Lecturer, Real Estate Appraisal, International Association of Assessing Officers, numerous states and provinces, several appraisal organizations. Fee appraising for companies, attorneys, governmental bodies, individuals. Member, New London Board of Realtors. Member, Budget Committee, United Fund of Southeastern Connecticut 1969-1971. Member, Finance & Management Committee, St. Mary's Church. Chairman, New London Retired Policemen and Firefighters Pension Fund. Chairman, Mortgage Loan Review Board, New London Housing Conservation Program.

### Education and Training

Graduate of Providence College, B.A. in Economics 1951. Real Estate Appraisal Courses I, II, IV, VI, American Institute of Real Estate Appraisers. Accounting Course, Mitchell College, 1967. Statistical Analysis Course, Mitchell College, 1970. Numerous professional seminars.

### Associations

Member, American Institute of Real Estate Appraisers, M.A.I. Designation, 1970. Conn. Chapter Admissions Committee, 1971-1974. Professional Recognition Award, 1976 through 1986. Chairman, National Assessor Liaison Subcommittee, 1979-1982. Chairman, Chapter Legislative Committee, 1981. Chapter Director, 1982-1984.

Member, International Association of Assessing Officers, Certified Assessment Evaluator (C.A.E.) Designation. Donehoo Essay Award, 1968. Professional Admissions Committee 1968-1971, Chairman 1974. Speaker at several International Conferences and Professional Seminars. Chairman, Demonstration Appraisal Report Grading Committee. Member, Executive Board 1971-1973. Formulated courses on the Income Approach, Land Valuation, Industrial Real Estate Appraisal, Appraisal Report Writing, Assessment Administration. Most Valuable Member Award 1974. Professional Member of the Year 1975. Presidential Citations 1970, 1973, 1974, 1976, 1977, 1978, 1980, 1981, 1982, 1983. Chairman Education Committee 1976-1977. Elected Vice President 1977. Elected President 1978. Chairman, Professional Admissions Committee 1980-1984.

### Publications

"The Typical Buyer," Assessors Journal 1969. Text: "Assessing and the Appraisal Process," International Association of Assessing Officers 1971. "Industrial Property: Crucial Points in the Valuation Process", International Assessor 1976. Edited Text: "Property Assessment Valuation," International Association of Assessing Officers, May 1977. "The Effects on Inflation on Residential Property," Ontario Assessors Review, Summer 1980. "Education of the Assessor in the United States," International Assessor, May 1978. "Gross Income Estimates: Market Rent versus Contract Rent," Assessment Digest, January-February 1982. "Equitable Assessment Practices," New York University Proceedings of the Second Annual Institute on State and Local Taxation and Conference on Property Taxation, 1984.

## **ADDENDA**

LEGAL DESCRIPTION  
SUBJECT PROPERTY

SCHEDULE A

BK2679 P2803

A certain tract of land with the buildings thereon situate in Portsmouth, County of Rockingham, State of New Hampshire, bounded and described as follows:

Beginning at the Southwesterly corner of the said premises at a point in the northerly sideline of South Street at the Easterly sideline of Junkins Avenue; thence running North  $21^{\circ} 06' 30''$  West 456.45 feet; thence continuing North  $20^{\circ} 40'$  West still by the Easterly sideline of Junkins Avenue 188.0 feet; thence North  $20^{\circ} 15'$  West 232.9 feet to a concrete bound; thence North  $6^{\circ} 08'$  West still by said Junkins Avenue 82.0 feet to the Southerly shore of the South Mill Pond; thence in an Easterly direction by the Southerly shore of South Mill Pond to land now or formerly of Tucker; thence running South  $20^{\circ} 59'$  East 34 feet, more or less, to a concrete bound; thence turning and running South  $69^{\circ} 01'$  West 40.0 feet to a concrete bound; thence turning and running South  $19^{\circ} 17'$  East 43.9 feet; thence continuing South  $32^{\circ} 18'$  East 199.9 feet to a corner; thence running South  $24^{\circ} 54'$  West 68.5 feet; thence continuing South  $26^{\circ} 37'$  West 97.7 feet partially by a stonewall; thence continuing Southwesterly partially by said stonewall 160.70 feet; thence continuing South  $71^{\circ} 37'$  West 114.5 feet to a corner; thence turning and running South  $15^{\circ} 45'$  East 248.2 feet to a corner; thence turning and running South  $71^{\circ} 04'$  West 53.0 feet to a corner; thence turning and running South  $21^{\circ} 34'$  East 105.2 feet to a point in the Northerly sideline of South Street; thence turning and running by said Northerly sideline of South Street, South  $57^{\circ} 54' 30''$  West 161.4 feet to the Easterly sideline of Junkins Avenue to the point of beginning.

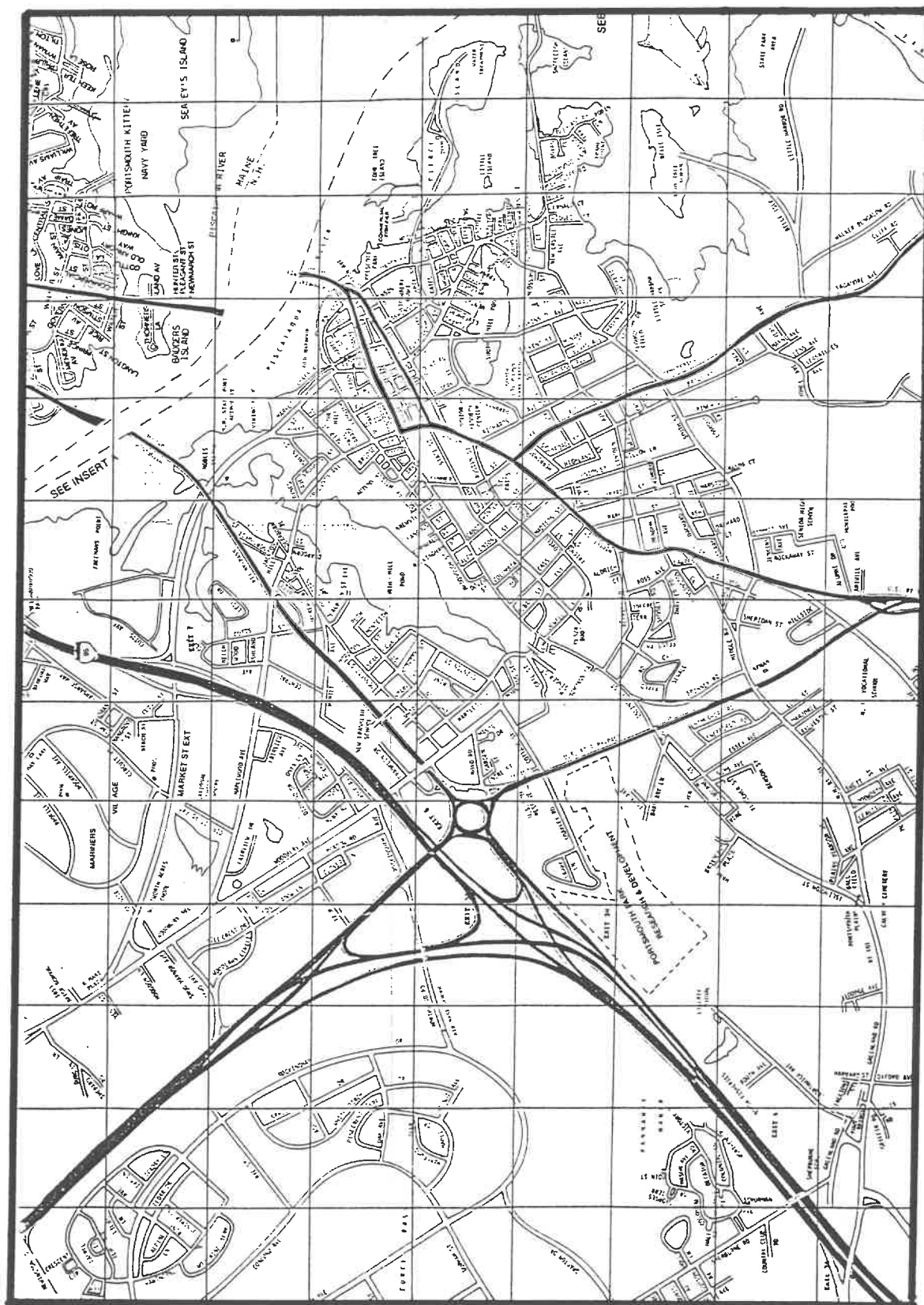
The Portsmouth Hospital and the Portsmouth Hospital Foundation merged on February 19, 1985, with the Portsmouth Hospital Foundation being the surviving corporation. A certificate of merger is recorded at the Rockingham County Registry of Deeds at Book 2534, Page 743.

Portsmouth Hospital Foundation changed its name to Foundation for Seacoast Health effective April 8, 1986.

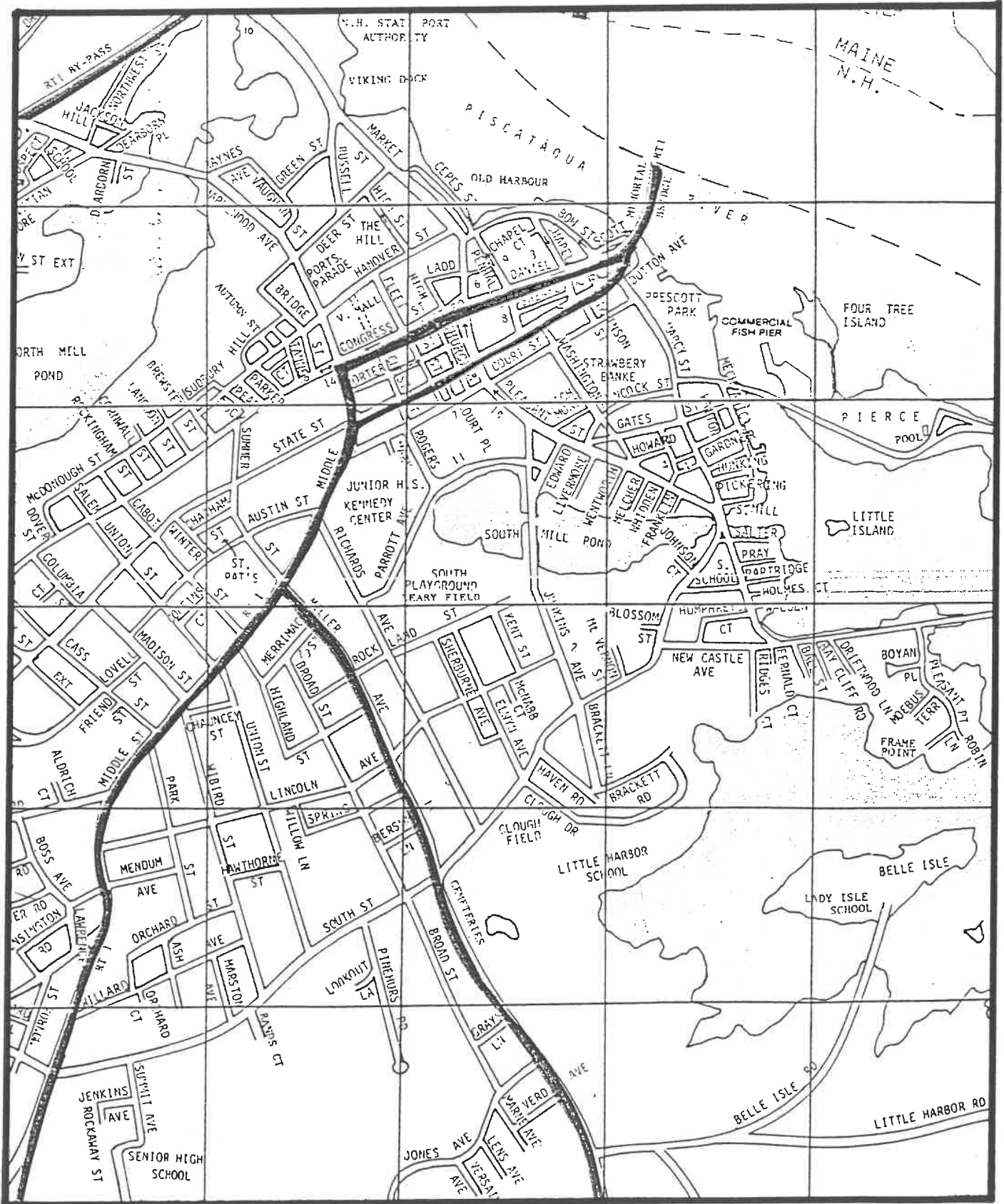
The foregoing premises are conveyed subject to all easements and restrictions of record.

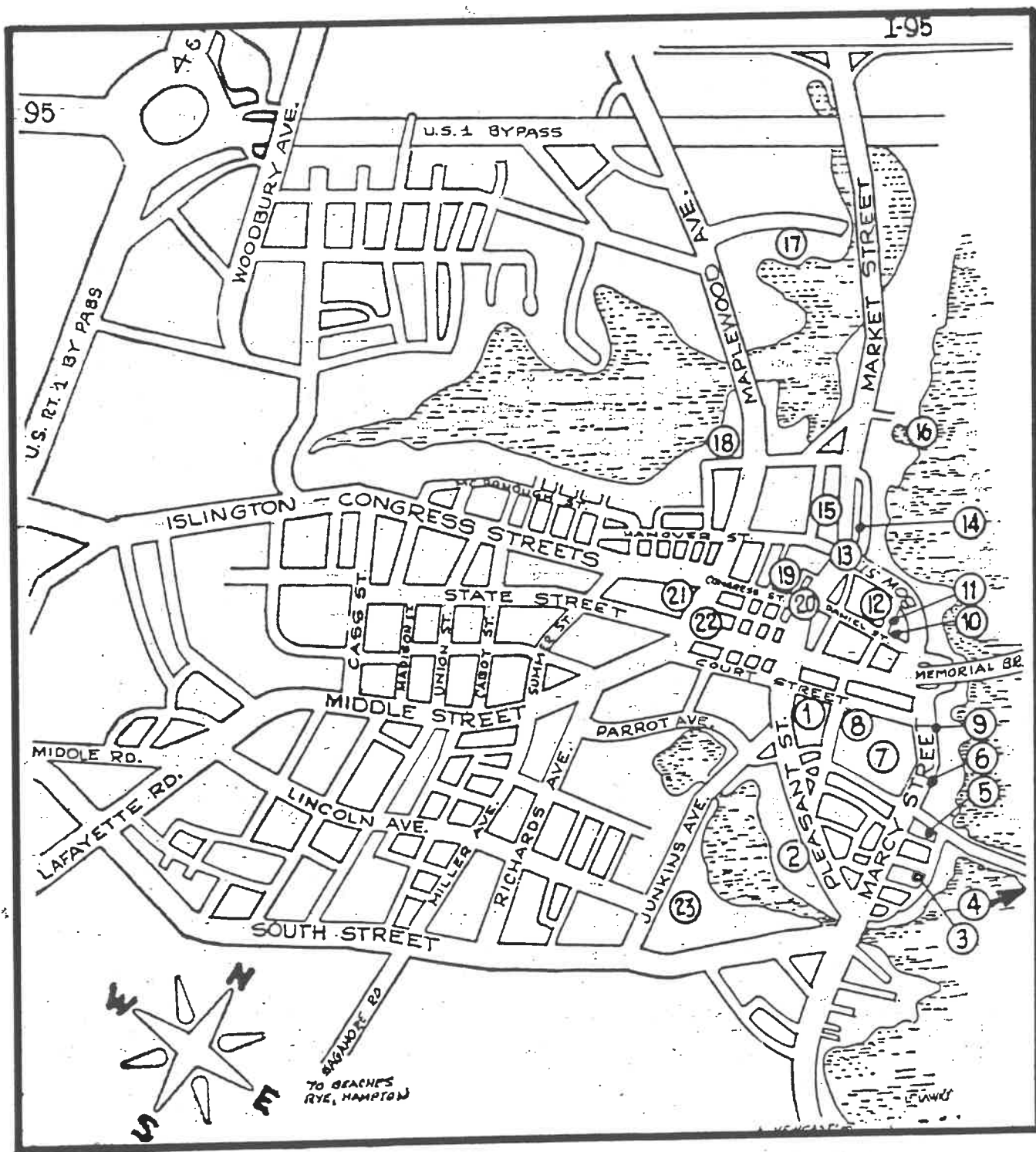
## REGIONAL MAP



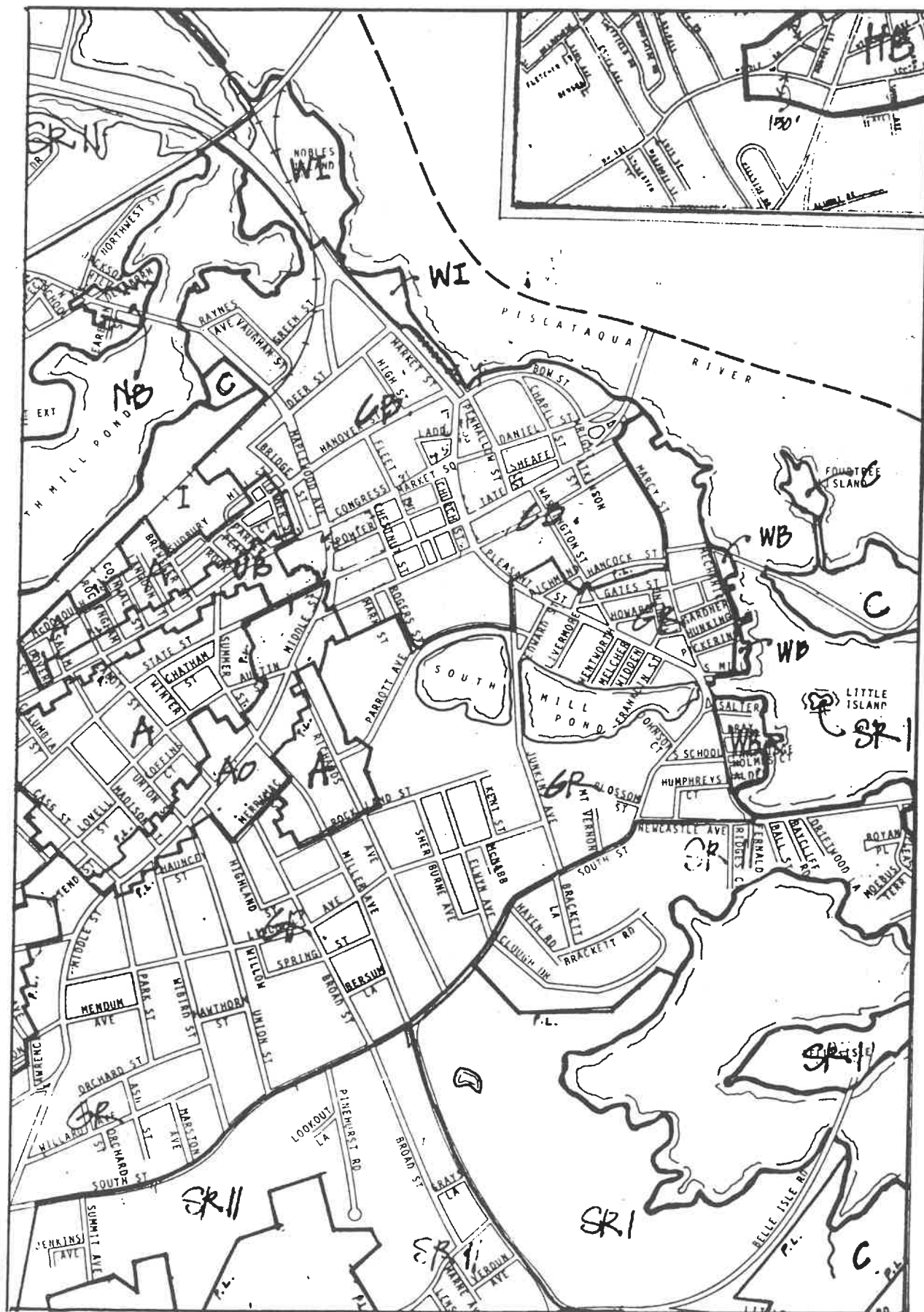


NEIGHBORHOOD MAP





## 36



DISTRICT	MINIMUM LOT DIMENSIONS		CONTINUOUS FRONTAGE			MINIMUM YARD DIMENSIONS (In Feet)			MAXIMUM HEIGHT OF STRUCTURE FEET	MAX & MIN & LOT		
	AREA	FRONTAGE	DEPTH	FRONT	SIDE	REAR	MAX. ELDG. COV./ LOT	MIN. OPEN SPACE LOT		AREA PER FAMILY		
Single Residence I	1 acre	150 ft.	200 ft.	40	20	40	35	10	50			
Single Residence II	20,000 <sup>1</sup> sq. ft.	100 ft.	80 ft.	30	10	30	35	20	40			
General Residence	10,000 <sup>2</sup> sq. ft.	100 ft. <sup>3</sup>	80 ft.	20	10	25	35	20	30	10,000 sq. ft. <sup>5</sup>		
Garden Apartment	5 acres			30	25	25	35	20	50	10,000 sq. ft. <sup>6</sup>		
Apartment and Apartment-Office	10,000 sq. ft.			One-half height of Building			60	40	20	10,000 sq. ft. <sup>7</sup>		
Rural	5 acres			40	20	40	35	5	75			
Neighborhood Business	10,000 sq. ft.	100 ft.		40	20	20	35	20	10			
General Business	1 acre	200 ft.		70	30	50	35	30	10			
Urban Business	20,000 sq. ft.	150 ft.		15	10	15	35	40	10			
Central Business									5			
Waterfront Business	20,000 sq. ft.	100 ft.	100 ft.	20	20	20	35	30	10	20,000 sq. ft.		
Office-Research	3 acres	300 ft.	300 ft.	70	50	50	40	20	50			
Industrial	2 acres	200 ft.	200 ft.	70	50	50	60	50	20			
Waterfront Industrial	2 acres	200 ft.	200 ft.	70	50	50	60	50	20			

P = Permitted Use;  
 S = Special Exception;  
 - = Not permitted

USES	SRI & SR II	GR	A	AO	M	R
1. Single family dwelling	P	P	P	P	P	P
2. Two-family, three-family, and four-family dwellings, up to four dwelling units per lot.	-	P	P	P	-	-
3. Apartments:						
a. Structures built after the time of passage of this Ordinance complying with the requirements of Sec. 10-302.	-	-	P	P	-	-
b. Conversion of structures existing at the time of passage of this Ordinance to accommodate not more than four (4) families per lot, provided:	-	P	P	P	-	-
1. exterior of the building is not changed except for egress						
2. off-street parking meets the requirements of Section 10-1201 and the street used for vehicular access has a right-of-way width (abutting the lot) of forty (40) feet or more						
3. an average of five hundred (500) s.f. of gross floor area and two thousand (2,000) s.f. of lot area is available per family						
4. minimum open space meets the requirements of Section 10-302						
c. Conversion of structures existing at the time of passage of this Ordinance to accommodate not more than four (4) families per lot, provided:	-	S	S	S	-	-
1. exterior of the building is not changed except for egress						
2. off-street parking meets the requirements of Section 10-1201						
3. an average of five hundred (500) s.f. of gross floor area and two thousand (2,000) s.f. of lot area is available per family						
4. minimum of open space meets the requirements of Section 10-302						
d. Conversion of structures existing at the time of passage of this Ordinance to accommodate five or more families provided:	-	-	S	S	-	-
1. exterior of the building is not changed except for egress						
2. off-street parking meets the requirements of Section 10-1201						
3. an average of five hundred (500) s.f. of gross floor area and two thousand (2,000) s.f. of lot area is available per family						
4. minimum of open space meets the requirements of Section 10-302						
4. Planned unit developments in accordance with Article XV	S	-	S	S	-	S
5. Housing for the elderly multiple dwelling projects designed for and to be occupied by persons over sixty (60) years of age without limit as to the number of dwelling units. Such projects shall provide at least seven thousand five hundred (7,500) s.f. of lot area per dwelling unit and shall have a maximum building coverage per lot of twenty (20) percent notwithstanding the re-	-	P	-	P	P	-



Sec. 10-205. Uses in Residential Districts (Continued)

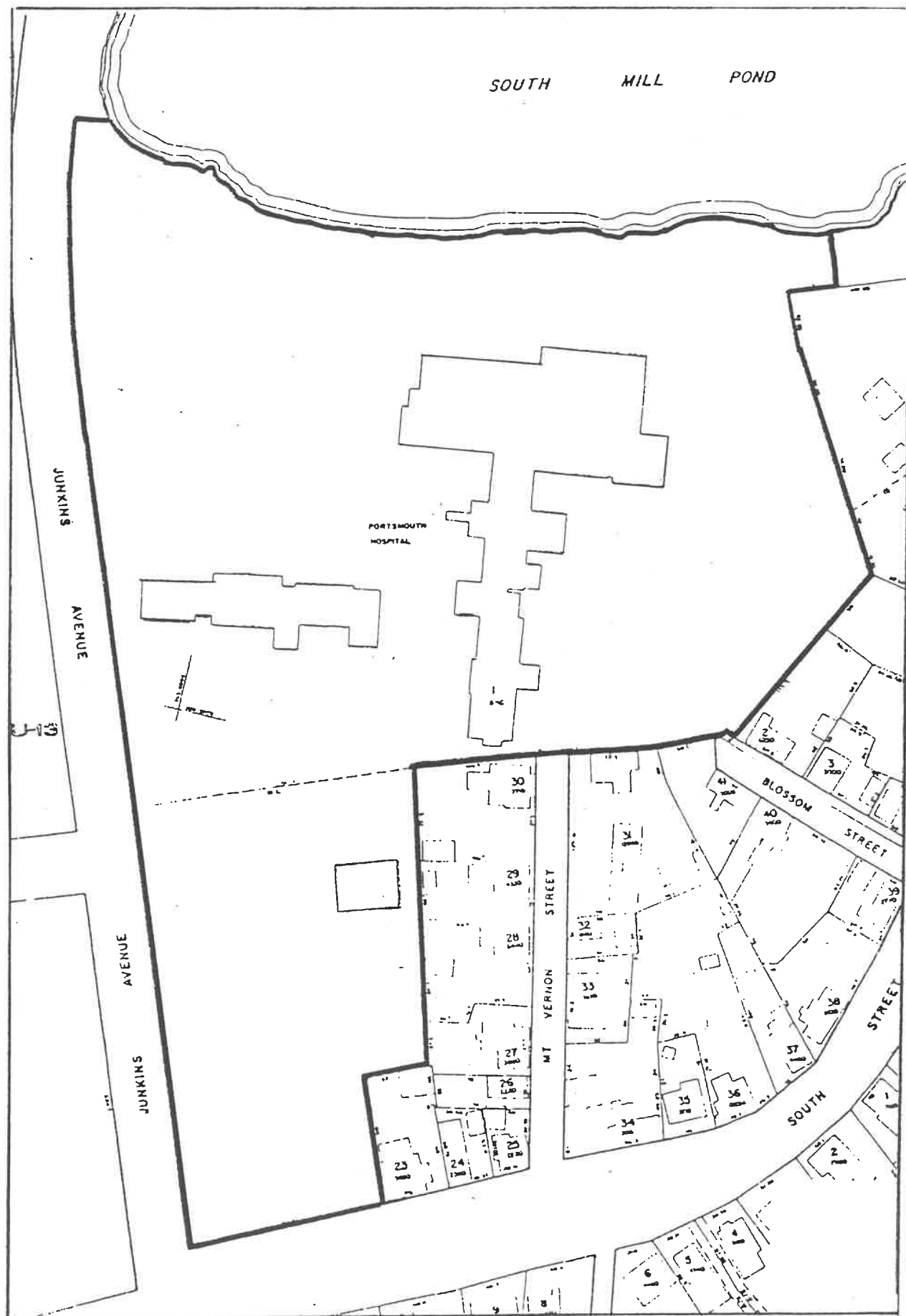
USES	P = Permitted Use; S = Special Exception; - = not permitted						
	SRI & SRII	GR	GA	A	AO	N	R
8. Renting of not more than two (2) rooms in a one or two family dwelling provided no more than two (2) persons are accommodated for rooming or boarding purposes in addition to the family or families living in the dwelling.	-	P	-	P	P	-	-
9. Conversion of structures existing at the time of passage of this Ordinance to overnight lodging with not more than six (6) sleeping rooms provided the exterior of the building is not changed except for egress.	-	S	-	S	S	-	-
10. Non-profit lodges and clubs, except those having as the chief activity a service customarily carried on as a business, and those with more than five (5) sleeping rooms.	-	S	-	S	S	-	-
11. Home occupation as defined in Sec. 10-102.	S	S	-	S	S	S	-
12. Family group day care homes, group child care centers, nursery schools, and kindergartens, for seven or more children.	S	S	S	S	S	S	-
13. Conversion of structures existing at time of passage of this Ordinance to professional offices, with no exterior changes except for egress.	-	-	-	-	P	-	-
14. Public, religious, sectarian, and private non-profit schools, and non-profit recreational uses provided no active play space is nearer to a lot line than fifty (50) feet.	S	S	S	S	S	S	-
15. Religious institutions, including places of worship, parish houses, rectories, or convents.	S	S	S	S	S	S	-
16. Cemeteries.	S	S	S	S	S	S	S
17. Hospitals, sanitariums, nursing, rest or convalescent homes, not primarily for contagious diseases nor for the care of the insane or feeble-minded provided such structures and their parking lots and their accessory uses do not occupy more than sixty (60) percent of the lot upon which they are located.	S	S	-	S	S	S	-

Sec. 10-205. Uses in Residential Districts (Continued)

41

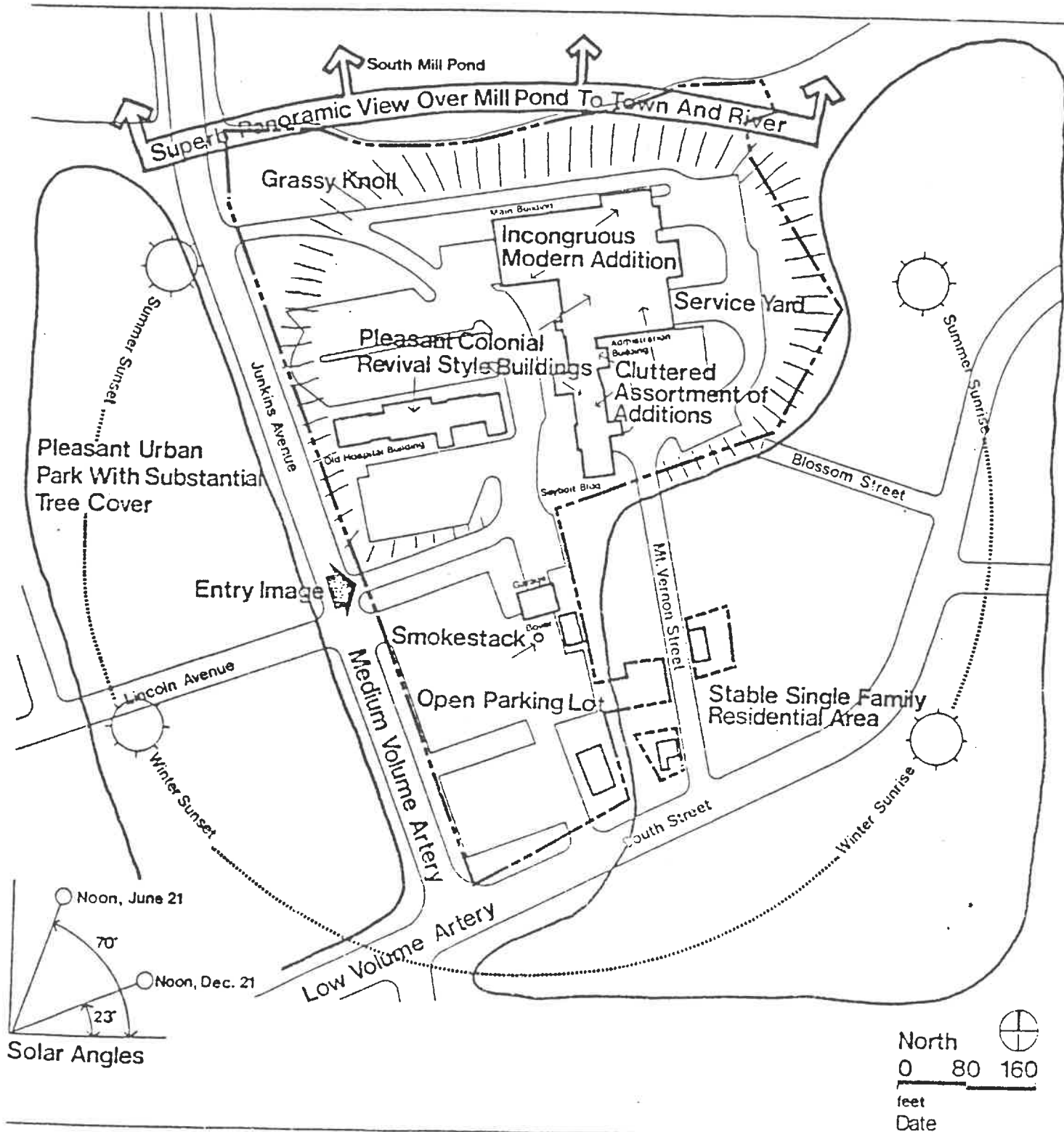
USES	P = Permitted Use; S = Special Exception; - = not permitted						
	SR I & SR II	GR	GA	A	AO	M	R
18. Conversion of existing residential structures with more than two thousand (2000) square feet of habitable floor area to rest, convalescent and nursing homes devoted to use by elderly or invalid persons for living purposes provided the exterior of the structure is not changed other than to provide egress.	S	S	-	S	S	S	-
19. Golf courses and country clubs of twenty-five (25) acres or more.	S	-	-	-	-	S	-
20. Landing for one commercial fishing craft used by no more than two persons provided that: (1) No processing or sales of fish takes place in this district; (2) Such landing, sheds, and other structures associated with such use shall be no nearer than seventy-five (75) feet from an adjoining lot line.	S	S	-	-	-	-	-
21. Farms for the growing of fruits, vegetables, hay, grain and other produce.	P	P	P	P	P	P	P
22. The keeping of farm animals provided that any shelter for such animals or storage of manure or other noxious substances shall be located no nearer than one hundred (100) feet to a lot line and that the Animal Control Officer of the City of Portsmouth shall be consulted for an advisory opinion prior to a decision by the Board with regard to the adequacy, safety and suitability of the proposed use.	S	S	-	-	-	S	S
23. Commercial greenhouses and nurseries	S	S	-	S	S	S	-
24. Non-commercial radio antennae.	S	S	S	S	S	S	-

USES		SR	IR	CA	A	AG	N	R
P = Permitted Use; S = Special Exception; - = not permitted		SR	IR	CA	A	AG	N	R
25.	Temporary structures if bond or other form of security is posted to insure their removal and the restoration of grounds to their original condition. Such structure shall not be construed to mean mobile homes (except as related to temporary construction activities) and such permits as may be granted shall be limited to the term of ninety (90) days.	S	S	-	S	S	S	-
26.	Public or private transformer station, substation, pumping station, or automatic telephone exchange, providing that such public service structure or building is essential to service the residential area in which it is located, and that no business office nor any storage yard or storage building is operated in connection therewith.	S	S	S	S	S	S	-
27.	Accessory uses as listed herein:	P	P	P	P	P	P	P
	a. Garage or outdoor storage, for motor vehicles owned by residents of the premises which shall not include more than one (1) commercial vehicle. Such commercial vehicle shall be limited to no more than four (4) wheels.							
	b. Off-street parking as required in Sec. 10-1201.							
	c. Signs as permitted in Sec. 10-900 to 10-909.							
	d. Non-commercial boat landings, boat houses and bath houses.							
	e. Roadside stands in conjunction with a farm for the sale of products raised on the premises by the owner or lessee thereof provided that such stand is located at least thirty (30) feet from the street right-of-way and adequate off-street parking is provided and arranged in such a way that automobiles will not back into the street. Such stand or display area shall not cover more than one hundred and fifty (150) square feet of gross floor or ground area.							
	f. Family day care for one to six children within a single family dwelling.							

SITE SKETCH

# Environmental Character Analysis

44



## Site and Facilities Master Plan Portsmouth Hospital

M. Bostin Associates, Inc.; Hellmuth, Obata & Kassabaum P.C. - Architects

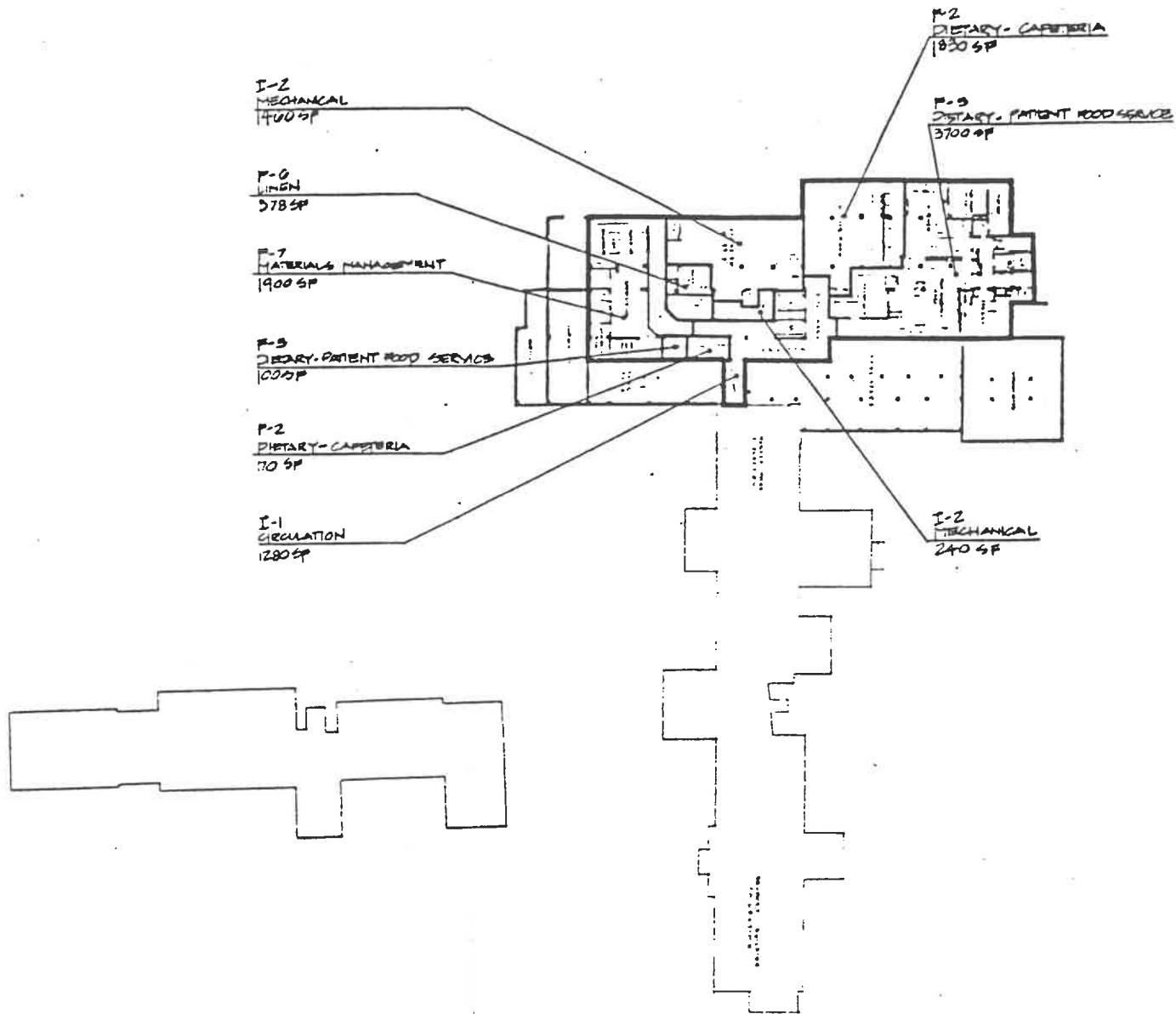
The diagram illustrates the layout of several buildings on the University of Texas at Dallas campus. The buildings and their associated information are as follows:

- Main Building:**
  - 1968: 1400 sf.
  - 1964: 42,500 sf.
  - 1975: 2400 sf.
  - 1975: 3200 sf.
  - 1964: 1900 sf.
  - 1975: 1600
- Administration Building:**
  - 1928: 23850 sf.
  - 1979: 7600 sf.
- Lobby:**
  - 1964: 350 sf.
- Conf. Rm. 1:**
  - 1964: 900 sf.
- Old Hospital Building:**
  - 1895: 26,400 sf.
- Seybolt Building:**
  - 1973: 1100 sf.
  - 1934: 17,700 sf.

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Architects

# Sub Basement

46

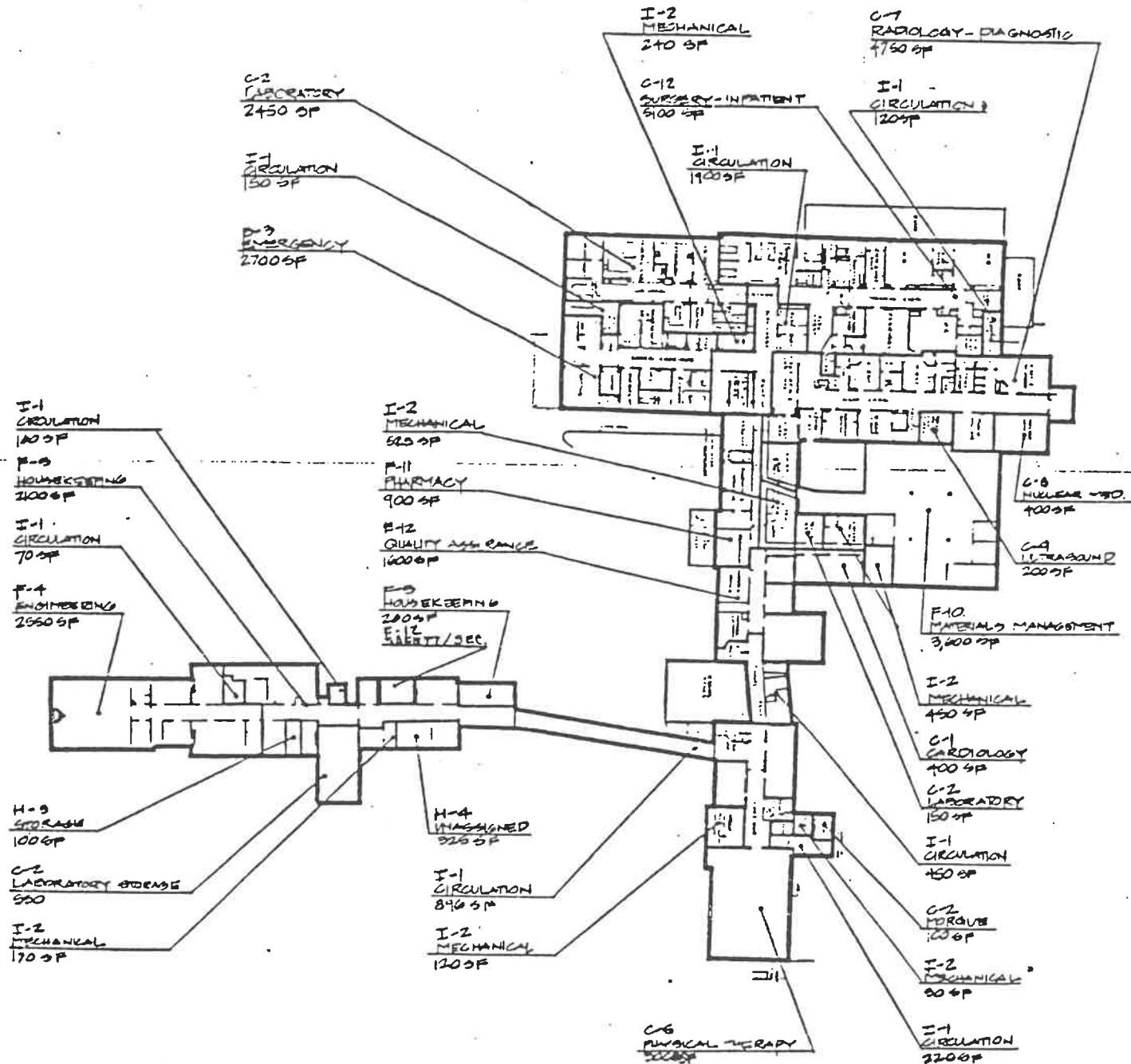


North  
0 32 64  
feet  
Date

## Site and Facilities Master Plan Portsmouth Hospital

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Architects

## Basement



North

0 32 64

feet

Date

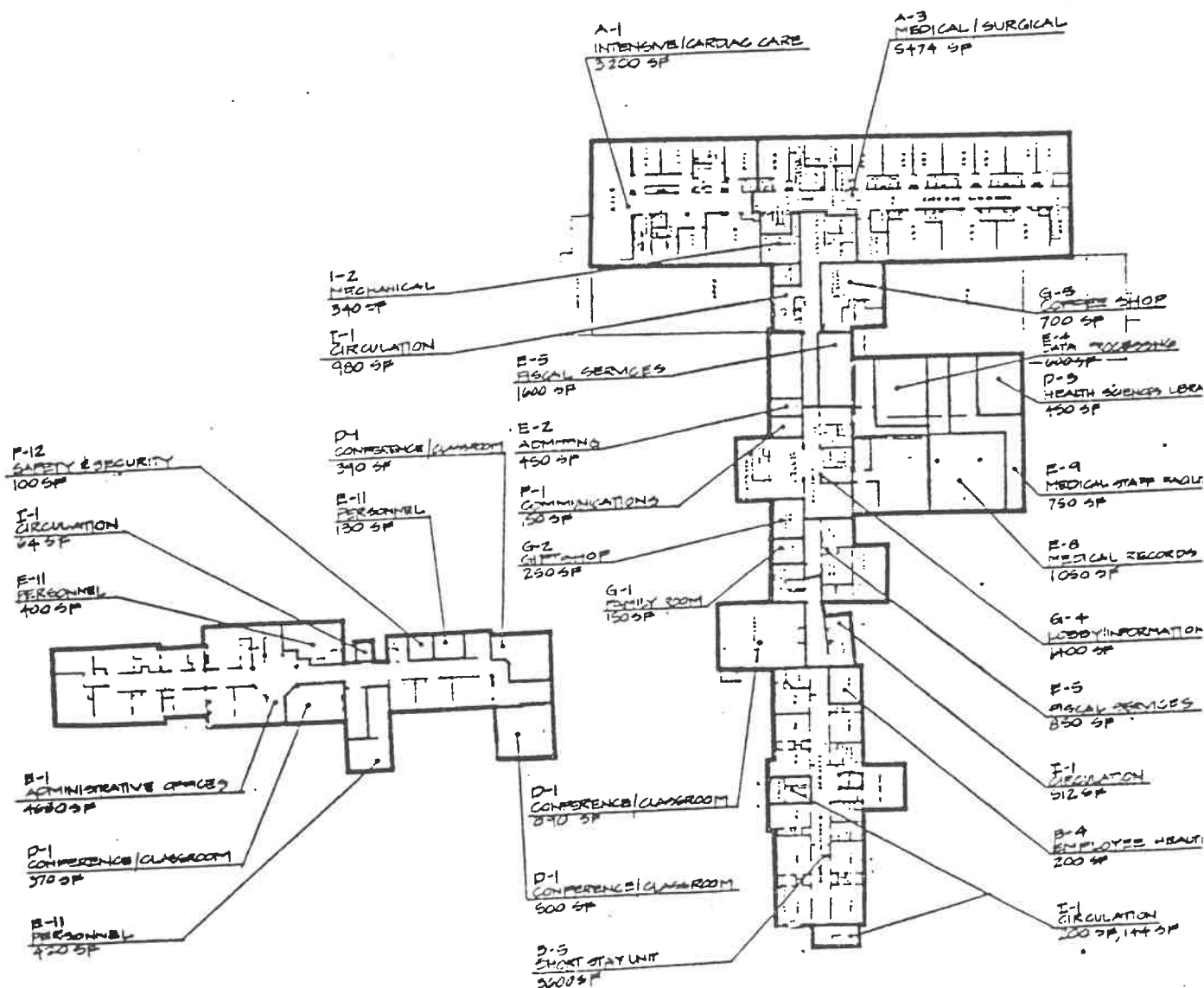
# Site and Facilities Master Plan

## Portsmouth Hospital

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Architects

# First Floor

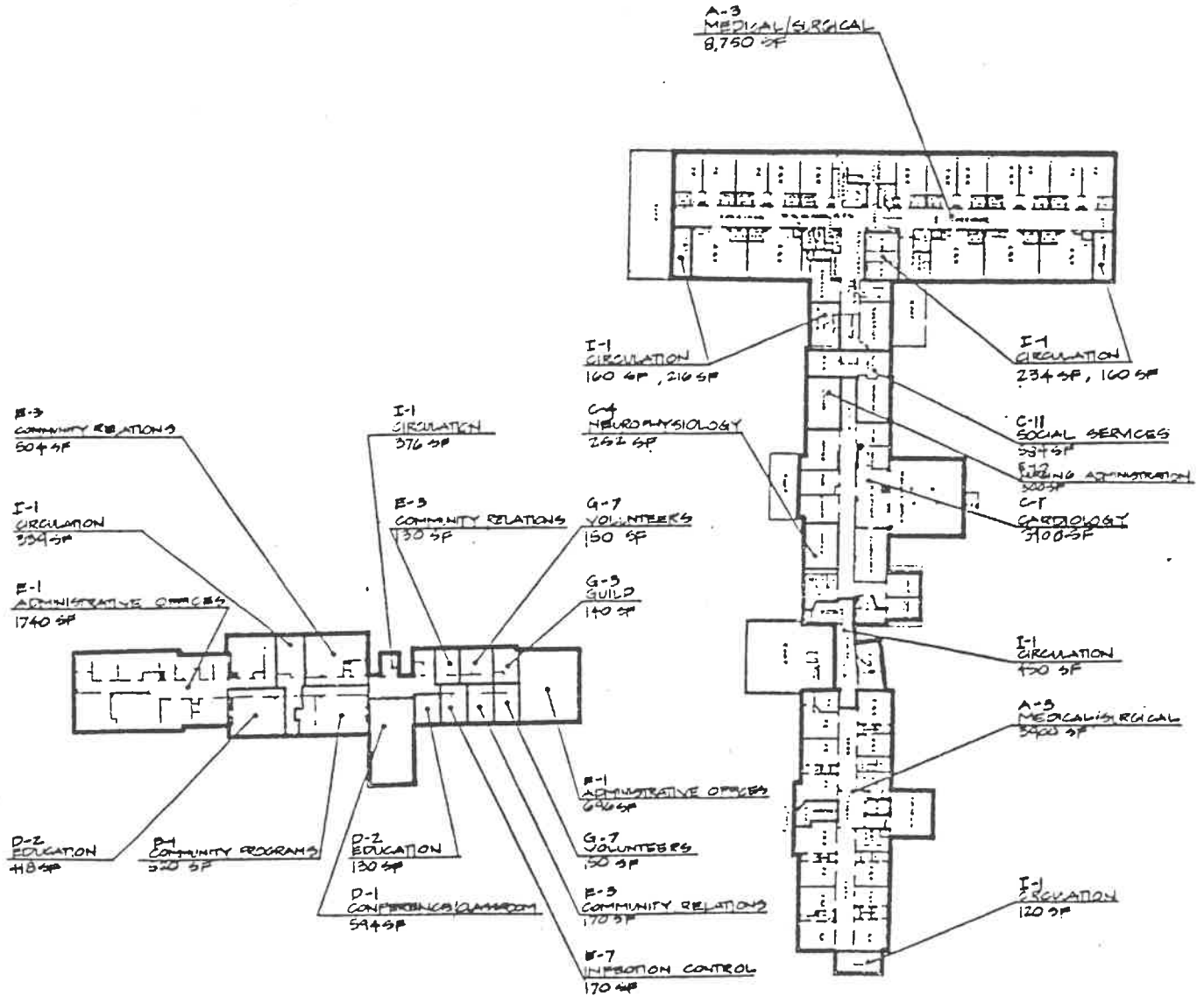
48




North  
0 32  
feet  
Date

## Site and Facilities Master Plan Portsmouth Hospital

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Architect

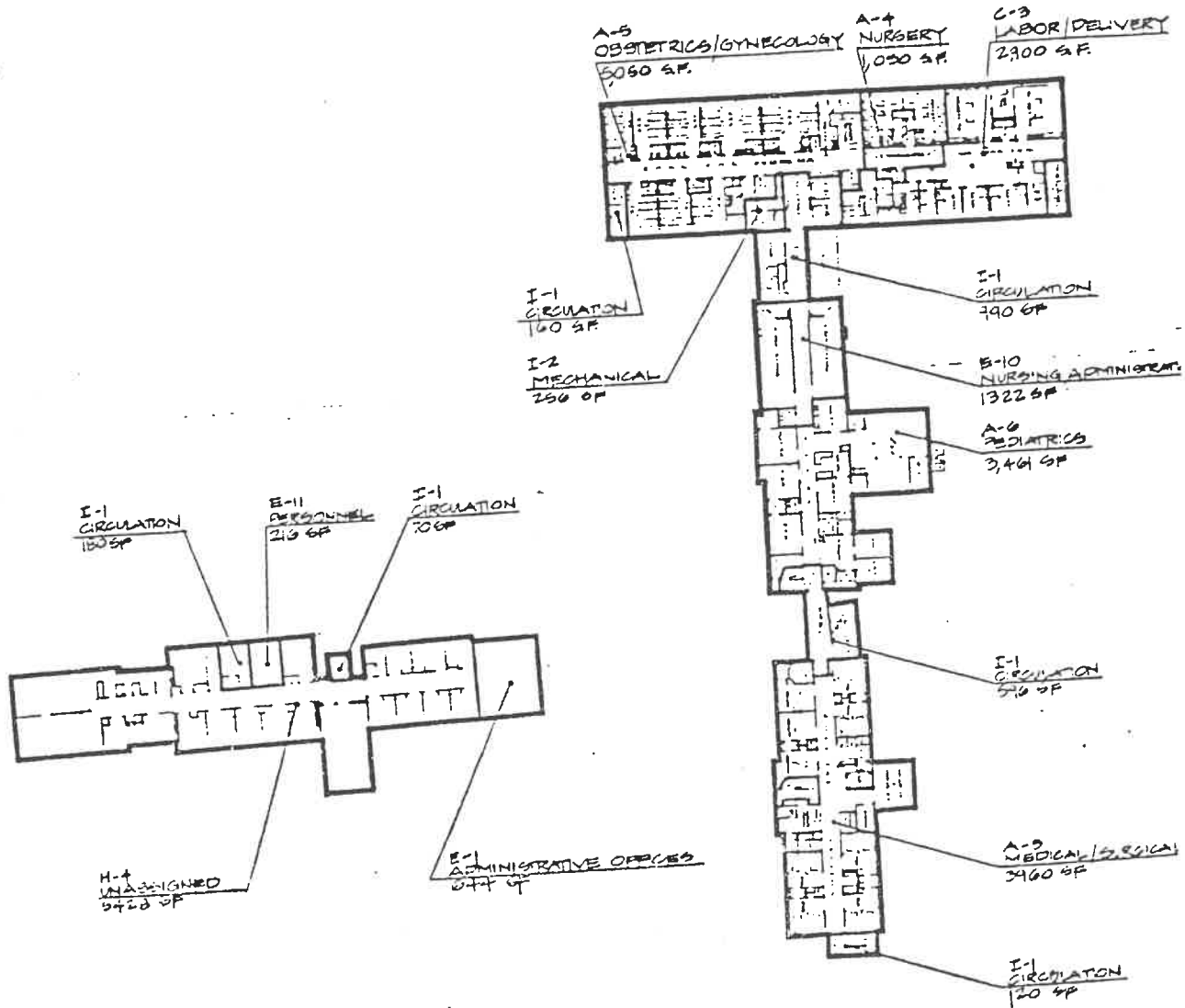


North   
 0 32 64  
 feet  
 Date

## Site and Facilities Master Plan Portsmouth Hospital

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Architects

# Third Floor



North  
0 32  
feet  
Date

## Site and Facilities Master Plan Portsmouth Hospital

M. Bostin Associates, Inc. - Hellmuth, Obata & Kassabaum P.C. - Archi

# Old Hospital Building

## STRUCTURE

Frame	- steel and bearing wall
Slabs	- concrete
Columns	- steel
Remarks	- condition good

## EXTERIOR

Walls	- clay tile
Facing	- brick, needs tuckpointing, ornamental concrete deteriorating
Fenestration	- wood double hung windows, cords broken, water penetration at sills
Remarks	- entrance at north end badly deteriorated; water seeping into basement through window sills

## ROOF

Type	- slate, leaks, needs sections replaced
Remarks	- gutters and flashings in poor condition

## INTERIOR

Floors	- carpet and v.a.t. in poor condition
Walls	- plaster in poor condition
Ceilings	- plaster and new suspended acoustical tile
Equipment	- none
Cabinetry	- none
Specialties	- non-functional fireplaces
Remarks	- third floor walls and ceiling have loose plaster; basement tunnel to seybolt leaks; when building was abandoned for 10 years, it was left unheated

## CIRCULATION

Exits	- 2 in center, 1 at each end
Stairs	- 1 in center, may not meet code for lack of 2nd stair
Elevators	- 1 cab in poor condition
Corridors	- in center 6'-0" wide, dead ends at upper floors
Remarks	- no fire alarms or smoke detectors, open transoms over most doors

# Seybolt Building

---

## STRUCTURE

---

Frame	- steel
Slabs	- concrete
Columns	- steel
Remarks	- condition is good

## EXTERIOR

---

Walls	- concrete and brick
Facing	- brick, precast cement ornamental work, in good condition
Fenestration	- wood double hung windows with new aluminum storm windows
Remarks	- fair to good condition, but water penetration at sills

## ROOF

---

Type	- slate, in fair shape
Remarks	- gutters in fair shape, trimming in good shape

## INTERIOR

---

Floors	- v.a.t. in good shape, except on 2nd floor which is old and cracked
Walls	- plaster, in fair shape
Ceilings	- acoustic tile, poor to fair shape
Equipment	- fire alarm system
Cabinetry	- minimal
Specialties	- solariums at northeast side of building
Remarks	- general condition is in fair to good shape, several doors don't close properly; bulk oxygen and nitrous oxide should not be stored in an unlocked exposed location; room size at minimum for present nursing care use

## CIRCULATION

---

Exits	- at both ends and center not accessible to the handicapped
Stairs	- at both ends and center
Elevators	- 1 cab in fair condition
Corridors	- narrow, 6'-0" wide
Remarks	- unheated, fiberglass enclosed fire exit at south end; stairwells too narrow and somewhat dangerous; new doors at landings in poor location

# Administration Building

---

## STRUCTURE

---

Frame	- steel
Slabs	- concrete
Columns	- steel
Remarks	- condition is good

---

## EXTERIOR

---

Walls	- brick, in good condition
Facing	- brick with precast concrete
Fenestration	- wood double hung with aluminum storm windows, well caulked
Remarks	- condition is good, solarium faced with slate and looks incongruous

---

## ROOF

---

Type	- slate, in good shape
Remarks	- main entrance addition has flat built-up roof

---

## INTERIOR

---

Floors	- v.a.t. in good shape
Walls	- plaster and drywall, in good shape
Ceilings	- acoustic tile, glued and hung, fair to good shape
Equipment	- fire alarm
Cabinetry	- reception desk and nurse's station
Specialties	- ornamental entrance, slate floor, built in seats
Remarks	- 2nd floor remodeled, 3rd floor remodeled, in good shape

---

## CIRCULATION

---

Exits	- at both ends and both sides of center
Stairs	- at both ends and center
Elevators	- none
Corridors	- narrow 6'-0" width
Remarks	- no second exit from cardio-pulmonary area from roof to below; main entrance not accessible to the handicapped

---

# Administration Extension - West

---

## STRUCTURE

---

Frame	-	bearing wall
Slabs	-	composite deck with concrete
Columns	-	none
Remarks	-	condition is good

## EXTERIOR

---

Walls	-	brick and block
Facing	-	brick with cement fascia, mortar thinning out between units
Fenestration	-	aluminum sliding windows
Remarks	-	condition good

## ROOF

---

Type	-	flat, built-up roof
Remarks	-	leaks through the flashings at exterior wall

## INTERIOR

---

Floors	-	v.a.t., good condition
Walls	-	gypsum board, good condition
Ceilings	-	suspended acoustical tile, good condition
Equipment	-	none
Cabinetry	-	none
Specialties	-	none
Remarks	-	generally in good condition

## CIRCULATION

---

Exits	-	to outside and to hall
Stairs	-	none
Elevators	-	none
Corridors	-	none
Remarks	-	good access

## Administration Extension - East

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### STRUCTURE

---

Frame	-	concrete
Slabs	-	concrete with dropped panel
Columns	-	concrete
Remarks	-	good condition

### EXTERIOR

---

Walls	-	brick and stud wall
Facing	-	brick
Fenestration	-	Aluminum sliding windows
Remarks	-	good condition

### ROOF

---

Type	-	flat, built-up roof
Remarks	-	good condition

### INTERIOR

---

Floors	-	v.a.t., concrete at basement level
Walls	-	gypsum board
Ceilings	-	acoustic tile suspended ceiling
Equipment	-	
Cabinetry	-	
Specialties	-	
Remarks	-	good condition, sprinkler system not efficient with present layout

### CIRCULATION

---

Exits	-	to administration building and 1st floor and basement at rear
Stairs	-	none
Elevators	-	none
Corridors	-	6'-0" width
Remarks	-	exit from medical records opens into room at corridor and is unmarked

# Main Building

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## STRUCTURE

---

Frame	- concrete
Slabs	- concrete
Columns	- concrete
Remarks	- good condition, structure designed to accommodate two additional floor loading

## EXTERIOR

---

Walls	- brick and concrete block
Facing	- brick
Fenestration	- aluminum sliding windows
Remarks	- steel rods and new expansion joints placed in northeast and southwest corners due to brick movement at windows; major cracks at floor beams in stairwells

## ROOF

---

Type	- flat, built-up roof
Remarks	- recently resurfaced

## INTERIOR

---

Floors	- v.a.t. in good shape
Walls	- plaster, in good shape
Ceilings	- acoustical tile suspended ceiling
Equipment	- full nursing unit
Cabinetry	- full nursing unit
Specialties	- full nursing unit, fire alarm
Remarks	- vinyl base is segmented and falling off; doors not labelled in emergency area

## CIRCULATION

---

Exits	- at both ends and at center
Stairs	- at both ends
Elevators	- 2 cabs in good condition, no dedicated elevators
Corridors	- 8'-0" wide at center of building
Remarks	- machine room has access through central supply area

# Dining Extension

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## STRUCTURE

---

Frame	-	concrete
Slabs	-	concrete
Columns	-	concrete
Remarks	-	good condition

## EXTERIOR

---

Walls	-	concrete block
Facing	-	stucco
Fenestration	-	aluminum awning window
Remarks	-	good condition

## ROOF

---

Type	-	flat, built-up roof
Remarks	-	good condition

## INTERIOR

---

Floors	-	v.a.t., good condition
Walls	-	plaster, good condition
Ceilings	-	suspended acoustical tile, poor condition
Equipment	-	kitchen equipment, inadequate freezer and coolers
Cabinetry	-	cafeteria furnishings
Specialties	-	
Remarks	-	dining room and storage are inadequate for peak loads; cosmetic renovation presently being done

## CIRCULATION

---

Exits	-	adequate
Stairs	-	none
Elevators	-	none
Corridors	-	none

# Boiler Room / Garage

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## STRUCTURE

---

Frame	-	steel and wood
Slabs	-	concrete
Columns	-	none
Remarks	-	good condition

## EXTERIOR

---

Walls	-	brick
Facing	-	brick
Fenestration	-	wood casements in good condition

## ROOF

---

Type	-	slate
Remarks	-	leaks

## INTERIOR

---

Floors	-	concrete
Walls	-	concrete
Ceilings	-	exposed wood deck
Equipment	-	maintenance and vehicle service
Cabinetry	-	storage
Specialties	-	
Remarks	-	floor leaks between levels

## CIRCULATION

---

Exits	-	none to rear of upper level
Stairs	-	none
Elevators	-	none
Corridors	-	none
Remarks	-	incinerator recently relined and tuck pointed

REVIEW OF MECHANICAL, ELECTRICAL, PLUMBING SYSTEMS  
AT PORTSMOUTH HOSPITAL -

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TASK STATEMENT -

A survey of the various systems was made to evaluate the potential renovation and possible options available for modification of existing equipment. The survey evaluation should then serve as a basis for future decision making regarding the capability of the systems with respect to the planned facility development.

APPLICABLE ENERGY -

Guidelines: At present no quantitative energy conservation guidelines have been formulated. It is anticipated, however, that all new building systems will incorporate, as fully as possible, the following sections of the revised ASHRAE 90-80 guidelines; "Energy Conservation in New Building Design"; Section 5, HVAC Systems; Section 6, HVAC Equipment; Section 8, Electrical Distribution System; Section 9, Lighting Power Budget Determination Procedure.

Similarly, attempts to upgrade the systems in the other buildings on the basis of the 90-80 guidelines will be considered where cost effective.

EXISTING MECHANICAL SYSTEMS -

Old Hospital Building

Heating is provided throughout the building by a low pressure two-pipe up-feed steam distribution system. Terminal heating in the perimeter spaces is via cast iron, free-standing radiators. Most radiators have been retrofitted with Danfoss Thermostatic Control Valves as a means of improving the space temperature control, and reducing energy consumption.

There are no central air handling and exhaust systems. Generally, all the systems are in the process of being restored to proper operating conditions.

Air-conditioning where available is provided by window units. Because of the floor to floor heights, the building could be easily converted to a central air distribution system providing both heating and cooling functions.

The domestic water, sanitary and storm systems are adequate for the building's continued use as an administrative building.

The electrical lighting, power, communications and alarm systems were not reviewed in significant detail. However, a very preliminary calculation would indicate the existing electrical service must be increased if the total building space is developed. The lighting system is now in the process of being converted from incandescent to fluorescent fixtures, as a means of increasing the building operating efficiency.

#### Seybolt Building -

Heating is provided by a low pressure two-pipe up-feed steam system with radiators as in the Old Hospital Building. In 1962 an attic sprinkler system was added, as well as two multi-zone air-handling units serving special patient treatment areas on the upper levels. The condition and function of the patient areas exhaust systems was indeterminate at this time. Air-conditioning is generally not available in this building section.

The electrical system as installed has sufficient capacity, however, the status of the required loads on the emergency generator was not determined. Fire Alarm System upgrading is now in progress by the addition of smoke detectors, pull stations, and automatic door closers to provide the necessary fire separations from the adjoining buildings.

Some revisions to the sprinkler system will be necessary to provide complete protection through the year, due to possible freezing conditions, etc.

An appraisal of this building would be as follows: heating system, domestic water, storm and sanitary systems are adequate. Lighting and power are also adequate, however, special systems such as the fire alarm, emergency power and lighting and automatic sprinkler systems would require considerable review for a totally accurate evaluation. The costs of a complete upgrading of these systems may be considerable, depending upon its final purpose.

#### Administrative Building -

Systems in this building are as for those described in the Seybolt Building, with the exception that numerous spaces have been provided with air-conditioning by the installation of window units.

#### Main Building -

This latest addition to Portsmouth Hospital contains the laboratories, dietary, surgical, operating suites, recovery, and emergency functions.

The HVAC systems are located in the Lower Level mechanical spaces and consist of central air-handling units with steam and/or hot water heating coils, steam humidifier, and cooling coils. Chilled water for the cooling coils is provided by a 100 ton absorption chiller. Heat is rejected through a roof mounted Marley Cooling Tower.

Operating suites are served by a separate air-handling unit, with a forty ton (40) direct expansion chiller. The emergency room has its own separate roof-top unit.

Several disadvantages of the operational aspects of the HVAC systems became apparent during the review. Namely, the central air-handling units all utilize one hundred (100) percent outside air at all times, as does the unit serving the surgical suites. In addition, during the summer months, operation of an absorption chiller, combined with terminal reheating for the various cooling zone, constitutes an extremely inefficient method of cooling the spaces.

With all the exhaust fan systems located in the penthouse, energy recovery cannot be easily accomplished. The possibility of not being able to separate the hazardous exhaust air further complicates this possibility.

Of all the buildings surveyed, the Main Building is the single-most energy intensive, and represents the building whose functional aspects should be closely reviewed.

The electric lighting and power systems, fire alarm and communications systems are adequate.

#### Central Boiler Plant -

The central boiler plant contains two (2) high pressure Cleaver-Brooks and one (1) high pressure Bigelow steam boilers. Two of these have been recently replaced as part of a scheduled capital improvements program, which included rehabilitation of all the pressure reducing stations in the various buildings. Boilers replaced in 1981 and 1982 are Cleaver-Brooks, Model CB, rated at 150 boiler horsepower each, and supplying 85 psig steam to the radial type central steam distribution system. Fuel firing utilizes a combination of oil or gas with full modulating boiler controls.

The third boiler was installed in 1962 and is a Bigelow, Model CBH, rated at 75 boiler horsepower delivering 85 psig steam. Fuel and burner controls are similar to the two larger boilers. This smaller boiler is used as a standby, in the winter heating mode, and is operated continuously in the summer months, to supply miscellaneous steam requirements, including that to operate the absorption chiller in the 1963 addition.

Presently, the boilers are operated with continuous boiler blow-down, which if modified by the installation of a boiler blow-down heat recovery unit, would improve the overall efficiency of operation.

A general assessment of the steam generation facility and distribution system, is that, since the major improvements completed and those still in progress, the system is much improved, very reliable, and serviceable for years of continued use.

#### GENERAL OBSERVATIONS AND RECOMMENDATIONS -

The central heating plant is very serviceable, and could be incorporated into any future development plans with only modification to the boiler capacities, as dictated by increased loads.

Providing a total facility summer cooling system would represent a major expense and disruption of service in the buildings. Systems to consider for this type improvement which would cause the least disruption, would be individual closed loop hydronic heat pump systems for the individual buildings, or through the wall air-conditioning units with steam/ hot water coils. These kinds of cooling systems would obviate the need for a central chiller plant, and would allow the individual buildings to function independently of one another. Either of these choices would reduce the space presently required in each building if a mechanical room were planned for air-handling units, chillers, pumps, etc.

Without further consideration of the future development plans, the items listed represent major potential of improvement in the operating efficiency.

1. Incinerator heat reclaim system combined with the boiler feed-water makeup system and domestic hot-water requirements.
2. Reduction of O.A. use in the Main Building.
3. Boiler blow-down heat recovery system.