

## **RESIDENTIAL PLAN**

To the average family, the home constitutes one of the largest single capital investments to be made in a lifetime. Further, the identity of an individual with his home and his neighborhood is often more important than the financial investment. Thus, it is necessary that every effort be expended to provide a healthful and safe environment for the home, and secure basic services for it. The soundness and quality of any residential area is the responsibility of both the home owner and the community. Foremost, the home owner is responsible for providing adequate living space, maintaining the structure in a habitable condition and keeping the grounds clear of debris. The community at large must enforce protective codes, minimize traffic conflicts, provide necessary public facilities, and in general safeguard the neighborhood environment. Financial institutions should assume responsibility for assisting families with the financing of safe and decent housing at reasonable interest rates, and to support programs to bring good housing to persons not otherwise able to afford it.

### **THE NEIGHBORHOOD UNIT CONCEPT**

The Hancock-Houghton Residential Plan is based in part on the Neighborhood concept which establishes a series of standards for evaluating both existing and proposed residential areas. Sometimes the term neighborhood is synonymous with planning unit, hence, the neighborhood becomes a tool for analyzing residential areas in detail.

Neighborhoods normally do not conform to an ideal concept when applied to older and more developed areas of the community. However, neighborhoods that approach the development standards of the concept will have the following attributes:

1. Children will be able to walk to school and play with a minimum danger from fast through traffic or congested commercial traffic.
2. Homeowners will be encouraged to take pride in and improve their property. This will lead to a better neighborhood appearance, and property values will improve or become more stable.
3. Street mileage can be minimized in new neighborhoods and utility expansions can be planned with shorter lineal runs.

4. As a measure of size, the neighborhood will generally conform to the following standards:
  - a) Capacity population ranging between 3,000 and 5,000 persons.
  - b) A K-6 Elementary school enrollment from 400 to 600 pupils.
  - c) One-half mile desirable walking distance to the elementary school.
  - d) An elementary school and playground site of five acres plus one acre for each K-6 pupil in the neighborhood population.
  - e) Neighborhood park space at 1.0 acres per 1,000 persons.

The foregoing standards of the Neighborhood Unit Concept represent goals or objectives to be achieved within residential areas.

An important feature of the Neighborhood Analysis lies in the estimated population capacity of each planning unit. Regardless of the projected population for the overall community, it is certain that at least some neighborhoods will approach their expected capacity population level. The capacity population figure becomes a logical basis for determining utility, school and park needs, even if they are not realized in the foreseeable future.

#### **RESIDENTIAL DEMAND**

Community planning involves an analysis of relationships between land, people, jobs, housing, and various supporting services. Because projected relationships must also be considered, the planning process involves some assumptions and estimations of likely future events. In communities like Hancock and Houghton, estimates of future events are more tenuous and readily altered by unforeseen events. For example, one new industry can completely alter established trends, and if not anticipated, could render plans for schools, parks and other community services obsolete.

The Hancock-Houghton community is in a region that has experienced a gradual population decline since 1910. Houghton County lost over 47% of its population between 1910 and 1970. Current projections for the area suggest a continuing decline through 1990, but at a reduced rate of decline.

Despite County population declines, both Hancock and Houghton have optimistic growth factors related to Suomi College and Michigan Technological University. Hence most of the future housing demand will be from:

1. Students who in-migrate for College-University instruction. It is interesting that some 47% of the projected 1990 Houghton County population may be students attending Michigan Tech and Suomi.
2. Teaching staff and personnel necessary to support an operating educational facility.
3. Re-housing of families displaced by business expansion, highway construction and public facility expansions.
4. Replacement of substandard homes because such homes may become uninhabitable from a safety-sanitation standpoint. Replacement may occur by either private or community action.
5. Some new home construction will be stimulated by families who wish to move from older homes into new homes, a natural housing market condition.

Even though the population forecast data does not include a factor for industrial employment increases, the Neighborhood Unit Plan is sufficiently broad so that a major influx of unanticipated growth can be accommodated. According to present trends gross housing demands are moving in two opposing directions. Non-University and College related families are generally on a declining trend in the area. Hence, there is a theoretical increase in available homes.

Teaching staff, however, is increasing with student enrollments at MTU and Suomi. A problem relates to the fact that available existing homes may not be desirable in terms of basic design, lot characteristics, convenience improvements, and maintenance. Hence, a demand for new housing exists even though there are existing units available.

According to 1990 projections in the preliminary Comprehensive Plan report on Neighborhood Units, the area must provide housing for 4,850 students who will in-migrate to the Hancock-Houghton Region. This will generate demands for about 1,620 dwelling units (3 per unit). With the additional demands from personnel there could be a demand for 1,325 dwellings. These plus deteriorating and dilapidated dwellings produce a gross demand for some 3,000 safe and decent dwellings by 1990.

The housing that must be provided through various sources will involve new construction, rehabilitation, and replacement of existing units. The magnitude of the housing demand picture should be a source of optimism for community improvement programs.

## LAND TO ACCOMMODATE DEVELOPMENT

Most of the projected new community growth is directly related to Michigan Technological University and Suomi College, hence new home demands will probably be directly related to University-College expansion.

In the Hancock-Houghton area, there appears to be ample land available to house the projected population. Some of the land potential lies within existing water and sewer service areas, and some lies in unserved township areas. Altogether, the Townships of Adams, Portage, Franklin, Hancock, and Quincy are land resources for residential expansion that may be generated in the Hancock-Houghton Region.

Desirable expansion areas would be as close as possible to existing developed areas and public facilities. This is essential to avoid residential scatteration, minimize commuting (including school bus service areas), avoid excessive utility extensions, and maximize the use of existing services.

There should be a positive development policy be municipalities and private interests to consolidate new development in existing areas with available public services. Otherwise a long term development trend of urban scatteration will result in the following:

1. Parceling off of forest and farm resource areas, to result in reduced logging capacity, inferior wildlife areas, fewer acres for agriculture.
2. Duplicating retail facilities, urban systems and other services including fire protection, police, new streets (plowing and maintenance), schools, churches and related.

The foregoing may be avoided to a great extent by attempting to consolidate urban development within planned neighborhood areas.

## NEIGHBORHOOD BOUNDARIES

Information used to delineate neighborhoods include generalized soil resources, U.S.G.S. Topographic maps, existing land use maps, and other inventory data.

TABLE 8 translates basic neighborhood information in dwelling units and vacant land into estimates of the capacity population. The capacity data should not be regarded as a projected or proposed population level for any given future year. This information has been developed as a guide for "planning" residential neighborhoods. Even if only one new dwelling were to locate in a neighborhood unit, that dwelling would be considered to be in a good location.

TABLE 8 shows a gross school-playground acreage need of 117.3 acres of land in Hancock- Houghton with another 44.4 acres for neighborhood parks. These

figures are based upon the recreation standards of school and recreation site authorities, and existing neighborhood facility acreages must be deducted from this total. Hence, they are optimum acreage needs for urban oriented neighborhoods to be reviewed further in subsequent chapters.

## RECOMMENDATION

The preliminary plan report titled "Neighborhood Unit Plan" delineated a long range neighborhood pattern that included suggested sites for neighborhood schools and playgrounds. This plan was visionary to a point beyond the long range population projections for the planning area, and in that sense fulfilled planning objectives for capacity studies. Refer to accompanying map.

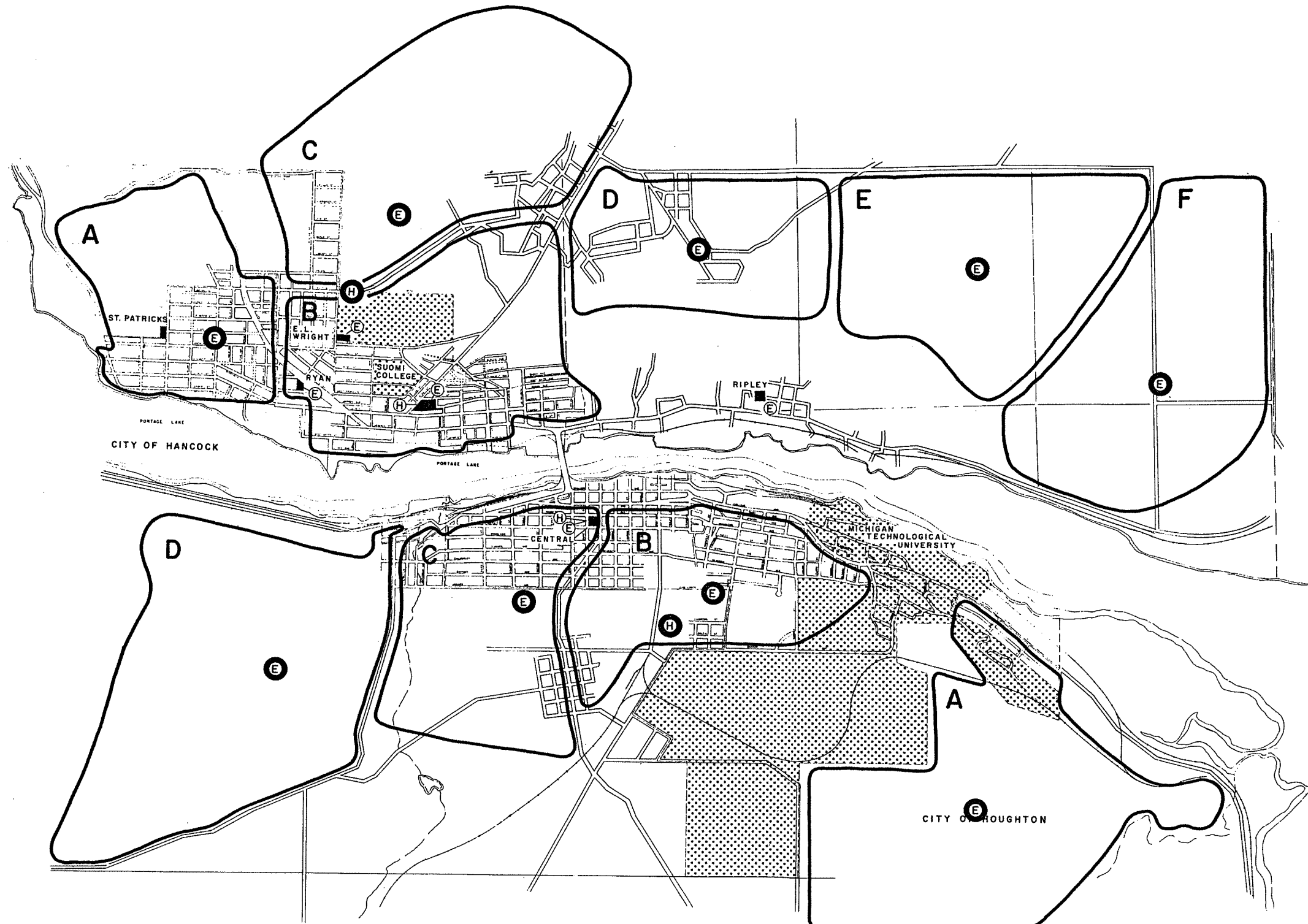
Actual development trends show the need for school sites to be well under the capacity indicators and this renders the Neighborhood Unit Plan locations to be more meaningful for long term site acquisition. As the School Plan demonstrates, the trend is toward fewer central schools, rather than dispersed neighborhood schools

TABLE 8

**GROSS NEIGHBORHOOD POPULATION CAPACITY AND SCHOOL-PARK DEMANDS**  
Hancock-Houghton Region

City of <u>Hancock</u>	Total <u>Dwellings</u>	Capacity <u>Population</u>	Potential <u>K-6 Population</u>	<u>Gross Acreage Need</u>	
				<u>School/ Playground</u>	<u>Neighborhood Parks</u>
A	806	2,820	400	9.0	2.8
B	1,115	4,030	560	10.6	4.0
C	1,755	6,140	880	13.8	6.1
D	910	3,190	450	9.5	3.2
E	1,205	4,220	600	11.0	4.2
F	1,495	5,230	750	12.5	5.2
	<b>7,286</b>	<b>25,630</b>	<b>3,640</b>	<b>66.4</b>	<b>25.5</b>
<b>Village of <u>Houghton</u></b>					
A	1,430	5,000	720	12.2	5.0
B	962	3,370	480	9.8	3.4
C	1,214	4,250	610	11.1	4.3
D	1,761	6,160	880	13.8	6.2
	<b>5,367</b>	<b>18,780</b>	<b>2,690</b>	<b>46.9</b>	<b>18.9</b>
				<b>117.3</b>	<b>44.4</b>

SOURCE: Neighborhood Unit Plan, March, 1970



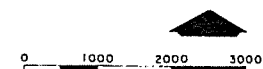
EXISTING PROPOSED

- E    (E) PUBLIC SCHOOLS & PLAYGROUNDS (E-ELEMENTARY, H-HIGH)
- NEIGHBORHOOD BOUNDARIES (A-NEIGHBORHOOD REFERENCE)
- ▨ COLLEGE - UNIVERSITY AREAS

NOTE:  
SOME NEIGHBORHOOD UNITS AND SCHOOL SITES  
ARE VERY LONG RANGE REFLECTING CAPACITY  
DEVELOPMENT CONCEPTS.

# Generalized NEIGHBORHOOD UNIT PLAN

HANCOCK - HOUGHTON MICHIGAN



SCALE IN FEET  
MAY 1972  
BASE MAP BY WILLIAMS & WORKS

vilican leman & associates inc.  
community planning consultants

## **SCHOOLS**

School services in the Hancock-Houghton Region have undergone significant changes in the past decade and additional change can be expected in the future. The two most critical forces influencing schools are population trends and the condition of the physical plant.

Existing and proposed school building information is illustrated on the "Neighborhood Unit Plan" map in the previous section.

### **SCHOOL CENSUS AND ENROLLMENT**

TABLE 9 summarizes the School Census data available for communities in the area, and shows trends for persons in the under 20 age group. Since there is no separate data for the City of Houghton, information is given for the Portage Township School District.

It is pertinent that the number of persons aged under 20 declined sharply in the City of Hancock and slightly in the Portage-Houghton Community. This decline is also documented by the 1960 to 1970 U.S. Census trends presented on TABLE 6.

School enrollment information is more complicated to analyze than the census data because of the variables affecting non-public schools and the out-migration of local persons aged 18 to 20 years. Moreover, both the Hancock and Houghton school systems were affected by the closing of parochial schools in recent years. Even though the under 20 age group showed an overall decline, public school enrollments have increased. No parochial schools are currently operating in either school district, and this should simplify future schoolhouse demand estimates.

**TABLE 9**  
**SCHOOL CENSUS OF POPULATION**  
**Hancock-Houghton Area**

<u>Communities</u>	<u>Census of Persons Under 20 Years of Age</u>			
	<u>1960</u>	<u>1968</u>	<u>Perct</u>	<u>Change</u>
City of Hancock	1,668	1,426	-242	-14.5%
Franklin Township	334	442	+108	+32.3%
Hancock Township	36	45	+9	+25.0%
Quincy Township	29	127	+98	+337.9%
<b>Total</b>	<b>2,067</b>	<b>2,040</b>	<b>-27</b>	<b>-1.3%</b>
City of Houghton	-(Not available)			
Adams Township	1,085	952	-133	-12.3%
Portage Township and City of Houghton	2,092	2,063	-29	-1.4%
<b>Total</b>	<b>3,177</b>	<b>3,015</b>	<b>-162</b>	<b>-5.0%</b>
<b>Grand Total</b>	<b>5,244</b>	<b>5,055</b>	<b>-189</b>	<b>-3.6%</b>

SOURCES:

- a) Mr. Gordon Barkell, Superintendent of the Hancock Pubic Schools.
- b) Mr. Bruce Wolck, Superintendent of the Portage Township School District.
- c) Copper Country Intermediate School District.



**TABLE 10**  
**K-12 SCHOOL ENROLLMENT TRENDS**  
**HANCOCK-HOUGHTON REGION**

	<u>Hancock Schools</u>	<u>Portage Township Schools</u>	<u>Totals</u>
1960-1961	1,213	-	-
1962-1963	1,193	-	-
1963-1964	-	-	-
1964-1965	1,208	1,137	2,345
1965-1966	-	1,123	-
1966-1967	1,280	1,133	2,413
1967-1968	-	1,161	-
1968-1969	1,330	1,154	2,484
1969-1970	1,315	1,165	2,480
1970-1971	1,307	-	-
1971-1972	<u>1,391</u>	<u>1,325</u>	<u>2,716</u>
Total Change During Trend	+178 pupils	+188	N/A
Change Adjusted for Parochial Transfers	<u>-80</u>	<u>-150</u>	<u>          </u>
Net Change	+98	+38	N/A

SOURCE: School District Superintendents

TABLE 10 inventories pupil enrollments for selected years. In some instances the data is not comparable for both School Districts in the same year, hence, the analysis is somewhat separate for each District.

It is significant that actual school demands have increased at the rate of:

9 pupils per year in Hancock  
4 pupils per year in Portage Township  
13 pupils per year overall!

The modest annual pupil increases conflict somewhat with trends in the school age and preschool age population. If declines continue in this segment of the population, school enrollment will ultimately be affected. Kindergarten classes are beginning to show reduced enrollment levels over previous years.

### **EXISTING SCHOOL FACILITIES**

Enrollment information is a helpful tool for evaluating theoretical school building needs. The term theoretical is used because building requirements are based not only on optimum enrollment figures, but on school district boundaries, travel conveniences, existing plant investment, and citizen desires. However, it is interesting to note the suggestions of National-State school consultants on schoolhouse construction, that an optimum sized junior high serves from 700 to 1,500 pupils. Senior high schools may effectively house from 1,000 to 2,000 pupils in grades 10, 11 and 12.

Taking an average enrollment standard for grades 7 to 12, an optimum junior-senior high school would enroll 2,600 pupils. The entire K-12 enrollment in both the Hancock and Portage Township School Districts numbered 2,716 pupils in 1972. Further, the combined 1972 Junior-Senior High School population is under the minimum enrollment suggestion of 1,700 pupils. It is fair to conclude that each of the two high schools are operating at about half the optimum, and in theory, only one junior high and one senior high are needed to serve the planning region.

The school building inventory in TABLE 11 points up some educational plant deficiencies for the Hancock-Houghton region. This should be a point of concern because any effort to encourage community growth and/or improvement rests heavily on the quality of local services of which education is basic.

In general, the schools are crowded to capacity, they are aged, and their sites are very limited. However, both School Districts are actively in the process of upgrading their physical plants. The Portage Township Schools purchased 15.0 acres for a new elementary school site. This Spring construction will be underway

on a new K-3 structure that will overlook the Portage Valley from the Bridge and Jacker Streets site. If enrollments decline, as the school Superintendent believes or if the building is enlarged, this school may house all grades in K through 6 within 10 years.

**TABLE 11**  
**PUBLIC SCHOOL BUILDING INVENTORY**  
Hancock-Houghton Region

<u>Structures and Grades Served</u>	<u>1971-1972 Attendance</u>	<u>Effective Capacity</u>	<u>Surplus or Defi- cit of Capacity</u>	<u>Year Constructed</u>
<u>Hancock Schools:</u>				
Central High School (6 to 12)	771	750	-21	1923
Ryan Elerentary (K-5)	210	180	-30	1880+
E.L. Wright (K-5)	252	250	-2	1910
Ripley School (1-5)	<u>158</u>	<u>180</u>	<u>+22</u>	1908
	1,391	1,360	-31	
<u>Portage Township:</u>				
Houghton Central (K-12)	1,160	800	-360	1923
J.A. Doelle (K-6)	<u>165</u>	<u>250</u>	<u>+85</u>	1931
	1,325	1,050	-275	

SOURCE: School District Superintendents

The Hancock School District purchased a 15.0 acre school site near the north City Limits in Quincy Township, just east of Elevation Street. This school will not be constructed until voters approve millage to finance its construction. The proposed school would serve all pupils in grades K-6, and would displace the Ryan, Ripley and E.L. Wright Schools. The new school would enroll 720 pupils, however, its design capacity is planned for 850 pupils.

Athletic fields which serve the High Schools in Hancock and Houghton are located on separate sites away from the school buildings. Condon Field in Hancock is located in a residential area in the east central portions of the City. Hubbell Field in Houghton is well situated for active sports and community-wide traffic access, being near the new M.T.U. student ice arena on Sharon Avenue.

## **RECOMMENDATIONS**

Including the two elementary schools housed with the high schools, there are seven school buildings to maintain in the Hancock-Houghton Planning Area. If current school building plans materialize there would be only four schools, distributed as follows:

- . New Portage Township Elementary at the South Central City Limits of Houghton.
- . New Hancock Elementary at the Northeast City Limits of Hancock in Quincy Township (when voter approved.)
- . Two high schools (Hancock and Houghton) with increased capacity as a result of removing the elementary grades currently occupying both structures.

If voters do not approve the construction of a new elementary school in Hancock, consideration should be given to renovating and expanding the E.L. Wright School or perhaps purchasing the unused St. Patricks facility.

Both new elementary school locations were selected with a view to serving larger area-wide school districts and less concern was given to existing residential neighborhoods in either Hancock or Houghton. However, the sites are compatible with the general school location pattern recommended in the "Neighborhood Unit Plan" prepared in March 1970. Trends suggest that these two new schools will become central elementary facilities rather than neighborhood schools, even though both functions are served.

Should there be unforeseen new population growth and City development, future elementary school locations should follow the guidelines established in the "Neighborhood Unit Plan".

High schools located in Hancock and Houghton do not face the same critical deficiencies as the elementary grades. Therefore, plans for these schools must be longer range, and depending on population trends and community desires the

building plans can vary. Both high schools were constructed in 1923, both are in fair to good maintenance and there is little pressure for new facilities. However, the high school sites are minimum sized, particularly in Houghton, and the structures may or may not adapt to major renovation since they are rapidly approaching the half century age category.

Based on a comparison with general school enrollment standards, the Hancock and Portage Township School Districts could think in terms of combined junior and senior high school systems. One senior high school and one junior high school could satisfy existing and foreseeable enrollment demands, and these could be located on either side of the Portage Waterway, perhaps one on each side.

If a combined high school system proves feasible, then new and/or major remodeled facilities should be sited near the existing high school sites, because they are close to the Portage Lift Bridge and would minimize commuting distances in both School Districts. If separate K-12 systems are retained the present locations could still be used, but there would be wider locational options if new and larger sites are desired. Some new sites are suggested on the plan maps.