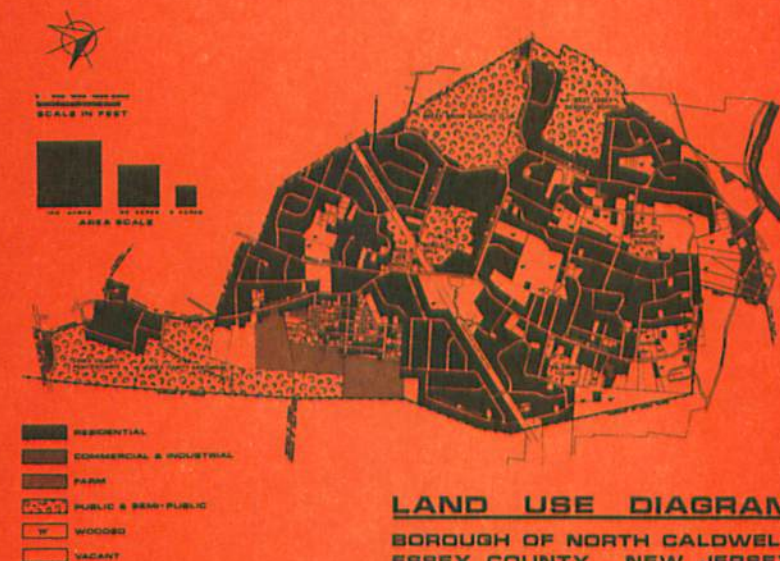


NORTH CALDWELL, N.J.



MASTER PLAN 1975

NORTH CALDWELL SUMMARY MASTER PLAN

Prepared by the
Planning Board, Borough of North Caldwell, New Jersey

FEBRUARY 1975

N O R T H C A L D W E L L , N E W J E R S E Y

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The help and cooperation of the above officials and many others at the local, County and State levels are gratefully acknowledged by

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NORTH CALDWELL SUMMARY MASTER PLAN

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"Modern American man is highly dependent on his fellows. . . his need to zone arises because humanity clustered in cities demands a form of protection which is of no importance to humanity dispersed.

"Zoning regulations take the form of dividing the community into districts, and within each district limiting the height, bulk, and use of buildings, the density of population, the use to which land may be put, and other matters. Such regulation must not be arbitrary or capricious. It must have a substantial relation to the general public welfare. It must be in accordance with a comprehensive plan. . . ."

Fred H. Bair, Jr., in a Model Zoning Ordinance, ASPO, 1966.

" . . . the Planning Board shall cause to be made careful and comprehensive surveys and studies of present conditions and the prospects for future growth of the municipality. The Master Plan shall be made with the general purpose of guiding and accomplishing a co-ordinated, adjusted and harmonious development of the municipality and its environs which will, in accordance with present and future needs, best promote health, safety, morals, order, convenience, prosperity and general welfare, as well as efficiency and economy in the process of development, and the maintenance of property values previously established."

N.J. Laws 1953, Chap. 433 R.S.
40:55-1.12

SUMMARY MASTER PLAN

I. INTRODUCTION: WHAT IS A MASTER PLAN?

During the course of the past 20 - 25 years, the Borough of North Caldwell grew at an accelerated pace. By 1973 there were approximately 365 (1) vacant, and 85 farm (1) acres left undeveloped. The Planning Board and governing body, desirous of an orderly development of these various parcels, resolved to develop a Master Plan to provide a guide for desirable future growth of the Borough. During the Summer of 1973, the Consultants were retained to assist the Planning Board in the preparation of this Master Plan. The goals of the Planning Board were shared by the Mayor and Council and were embodied in the following resolution:

- (1) TABLE I, Land Use Distribution; Report 1, Land Use, Physical Characteristics, Population and Housing Study.

"WHEREAS, N.J.S.A. 40:55-1.10 et seq. provides for the preparation, and after public hearing, the adoption by the Planning Board, of a Master Plan for the physical development of the Borough; and

WHEREAS, the Mayor and Council believe that it is in the best interests of the Borough that careful and comprehensive surveys and studies of present conditions and the prospects for future growth of the Borough be undertaken with the general purpose of guiding and accomplishing a coordinated, adjusted and harmonious development of the Borough and its environs which will, in accordance with present and future needs, best promote health, safety, morals, order, convenience, prosperity and general welfare, as well as efficiency and economy in the process of development and the maintenance of property values previously established; and

WHEREAS, the Mayor and Council believe that the Master Plan should cover proposals for:

- a) the use of land and buildings;
- b) services - water supply, utilities, sewerage, drainage and other like matters;
- c) transportation - including a circulation plan and road improvements;
- d) housing - residential standards, development and other like matters;
- e) conservation - water, forest, soil, flood control, and other like matters;
- f) public and semi-public facilities - civic center, schools, recreation and playgrounds, firehouse, police station, libraries, parks and other like matters;
- g) the distribution and density of population; and
- h) other elements of municipal growth and development, including, but not limited to, adequate provision for light and air, the promotion of good civic design and arrangements, the wise and efficient expenditures of public funds; and

WHEREAS, the Local Public Contracts Law (N.J.S.A. 40A:11-1 et seq.) requires that the resolution authorizing the award of contracts for "Professional Services" without competitive

bidding must be publicly advertised,

NOW, THEREFORE BE IT RESOLVED by the Mayor and Council of the Borough of North Caldwell, in the County of Essex as follows:

- 1) The Mayor is hereby authorized and directed to execute an agreement with Boorman and Dorram, Inc., Community Planning and Development Consultants, of Upper Montclair, New Jersey as special consultants for the preparation of a Master Plan for the Borough.
- 2) This contract is awarded without competitive bidding as a "Professional Service" under the provisions of the Local Public Contracts Law, N.J.S.A. 40A:11-1 et seq.
- 3) A copy of this resolution shall be published in the Progress as required by law within 10 days of its passage."

II. PRELIMINARY RESEARCH

In addition to the services to be provided by Boorman and Dorram, Inc., the Borough recognizing the need for professional engineering assessments of its utilities systems, engaged the services of Alfred Crew Consulting Engineers, Inc. to report on the waste-water collection system and Roger Coupe, P.E., to study the water supply and distribution system,

The results of these efforts are contained in the five research reports which are an integral part of the Master Plan. The reports are as follows:

- 1) Land Use, Physical Characteristics
- 2) Traffic and Circulation
- 3) Housing
- 4) Population and Community Facilities
- 5) Utilities

While the following pages contain summaries of each of these reports, a careful review of the full texts, available at Borough Hall, will aid in the understanding of the recommended land use plans.

1) Land Use, Physical Characteristics

The Land Use Report found that all the accessible and readily buildable land in North Caldwell has been developed, containing primarily one-family homes and other closely related uses such as schools, parks, etc. Most of the remaining sites include problem prone areas, with steep topography, adverse subsurface conditions and other limitations which would require land preparation costs of a prohibitive nature. From the planning point of view, conflicting pressures are

faced whereby the demand is, and will be, for the least suitable and most marginal lands of the Community to be utilized most intensively.

One-family detached homes constitute about 93% of the North Caldwell tax base. In 1972, the average assessed value of North Caldwell homes was \$53,100.00 and the average tax paid by homeowners was \$2,600.00. From these statistics, and as a result of regional comparisons and field inspections conducted in neighboring communities, it can be seen that the general character of the North Caldwell residential properties varied considerably from those located in nearby other areas. As a result of the natural topography, the geographic location, lack of major road access and because of established engineering standards, zoning and subdivision practices, North Caldwell evolved to its present characteristics as a community with 20% of its space available for future growth.

In order to adequately determine development potential, the U.S. Department of Agriculture Soil Conservation Service was requested to provide soils data on the remaining vacant land areas in North Caldwell. The Wet Areas and Flood Plains Map, presented in the Appendix, illustrates the location of such areas. Realizing the significance of the soils data, we visited the Soil Conservation Service in Morristown and the District Conservationist reciprocated by visiting our offices making sure that soils interpretations were made correctly.

Once the soils data were mapped, the reasons for key North Caldwell parcels having remained vacant became evident. Many of the vacant tracts evidenced flood or drainage problems. It was found, for example, that a portion of a 100-acre tract, a former farm off Mountain Avenue, had soils problems or soils limitations requiring special attention.

An estimated five-acre area located north of the joint Verona - Cedar Grove municipal line has a fine existing pond and could conceivably some day become a small lake for flood prevention purposes.

A fifteen-acre area at the westerly end of this property extending to the rear of the home sites fronting on Mountain Avenue has been classified as a muck area by the soil scientists. This clearly indicates the presence of severe drainage problems.

An additional 10 to 15 acre area, generally located westerly of the northern portion of the County Sanatorium lands are known to be wet for nine or more months of the year.

According to a February 28, 1974 report of the USDA Soil Conservation Service, the area shaded on the referenced map indicated as Made Land, is an area subject to flooding. The soil, when surveyed originally, was a very poorly drained Whitman stony, mucky loam. The original woods were removed and the land was filled.

The government soil conservationists advised us that:

"The filling will have an adverse effect downstream and probably will increase the flooding hazard.

If muck and vegetative materials are under the fill, the deterioration of this material could create problems of settling in the future.

Flood retention has been lost in this area by filling the low lying area, thus the effects of the first statement.

Stabilization of the new stream channel and banks should be looked into by the town engineer."

A second large site, the Main and Roosevelt Boulevard Area also has problems.

It seems that in this area, which might have been a premature subdivision of bygone days, all the lots, small as they are, are on dry ground. Conversely, all the lots in the areas classified by the soil scientists as wet for nine or more months of the year were left tax delinquent until eventually they became public property.

Thus it was the soils characteristics which determined the private and residential vs. public and vacant character of numerous parcels in the neighborhood. This observation only underscores the significance of soil characteristics of the adjacent lands as previously described.

Remaining large parcels such as the Walker's Pond area have problems with ponds and wet lands, while others such as the Lindsley Road area and the Brookside Terrace North area, have severe problems with steep topography, rock outcroppings or shallow depth to bedrock.

2) Traffic and Circulation

North Caldwell, tucked away on Second Watchung Mountain between the communities surrounding it, is without the benefit of direct access by any of the major regional roads.

Traffic accident trends, accident distribution and traffic volumes were analyzed carefully. It was found that of the seven county roads in the Borough, it was Lindsley Road, Mountain Avenue and Bloomfield Avenue which presented some of the severest existing and potential traffic problems.

Proposed intersection problems have been discussed and require co-operation with the County of Essex for remedy. It was found that

Mountain Avenue accomodates some of the heaviest traffic volumes for most of its length throughout the Borough and that this thoroughfare also has a greater than average concentration of accidents indicating need for improvements.

Lindsley Road is functionally similar to Mountain Avenue. Both roads are connector roads, carrying larger traffic volumes than their tributary roads. On Lindsley Road, the volumes are even somewhat higher, ranging from 5,633 to 6,886 Average Daily Traffic (ADT) at its ends near the municipal boundaries. The road length extends from Passaic County into Essex County's Cedar Grove and North Caldwell.

An Essex County traffic study clearly indicates that Lindsley Road is congested and that this road has difficulties in handling present traffic volumes. From this it becomes evident that added traffic on this road will only further aggravate the present situation.

According to Essex County engineers, a proposed road widening is uncertain because it depends on presently unavailable State funds, coordination with Passaic County and other factors. We are told that even when Lindsley Road becomes widened at some future date, such widening will only serve to render the road much safer, and will not increase its traffic handling capacity between intersections; or at best will increase capacity only marginally. For this reason, future land uses on vacant lands abutting Lindsley Road will need to be planned very carefully so as to avoid creating substantial new traffic generators.

3. Housing

North Caldwell is a community small in size, population and density, compared to surrounding communities. Its approximately 1,500 dwelling units utilized 51% of the total Borough area, with above average valuation homes, while also containing a significant portion in the assessed valuation range available to moderate income families.

In addition to analyzing North Caldwell's housing stock and development potential, statistical analysis of nine neighboring communities were made to assess practices, characteristics and possible trends in those areas; a regional assessment. The communities surveyed include Caldwell, Cedar Grove, Essex Fells, Fairfield, Little Falls, Roseland, Verona, Wayne and West Caldwell. Determinations as to the type of development which might be suited to the region, further detailed to the component jurisdictions, resulted in the judgement that North Caldwell is not the best suited locality for multi-family housing. Cedar Grove, Fairfield, Roseland, Wayne and West Caldwell are judged more logical sites because of the following:

- * These communities generally have relatively larger potential developable sites suitable for multi-family housing.
- * Several of the municipal Master Plans, (Cedar Grove, Roseland, Wayne and West Caldwell) already proposed multi-family housing for some parts of the developable areas.
- * All of these other towns are readily accessible from regional highways or arterial roads.
- * All of these towns accommodate numerous industries and other commercial places of employment which represent an integral part of the municipal economic base.

Urbanized Essex County ranked third highest in the State during the 1960-70 period for multi-family housing building permits issued. While Essex County accounted for 6% of all building permits issued during the 1960-70 period, it represented only 3% of the single-family permits, and almost 11% of all the multi-family permits issued in the State. It is significant to note that within Essex County, 70% of all new construction authorized was for multi-family dwelling units. This was the highest such proportion for any one of 21 counties in the entire State of New Jersey during the 1960-70 decade.

An analysis of regional and Statewide trends indicates that:

- * Because of increasing cost of land, labor and materials, home construction declined.
- * On the whole, 1960-74 annual building permits issued are fairly consistently above 1960 levels.
- * One-family home starts are down, even when compared to 1960 levels.
- * Construction of multi-family units reached a record high in 1972. Inflation slowed this trend by 1975.
- * By 1972 there were annually more multi-family dwelling units built than one-family homes.

Since 1972, the economic climate and the advent of the energy crisis make projections difficult. However, the regional and Statewide trends clearly indicate an increased supply of multi-family housing.

Additionally, a recent report released by Rutgers University,

funded by grants from the Rockefeller Foundation and the New Jersey Department of Community Affairs, states that there is no evidence of a housing crisis of any kind. Professor Franklin James, in the report, notes there is no evidence that persons holding jobs in suburban areas can't afford housing in these areas.

4. Utilities

North Caldwell is dependent, or inter-dependent on its many neighbors with its utilities needs.

Since several of the area's utilities and facilities have reached the limit of their capacity, moratoriums have been declared, and a building ban has been issued prohibiting the processing of building applications which increased utilities systems needs.

From an engineering point of view, it is ^{UN}reasonable to project the possible or probable consequences of continued or accelerated municipal growth, because many of the decisions which could affect the future of North Caldwell are out of the community's hands and will be made by the neighboring towns. However, to be more specific, the Engineering assessments of the state of utilities in North Caldwell found that:

- * The wastewater collection system was originally designed to accommodate a single family detached home type density usage in the North Caldwell area. Hence, this system as existing, ~~is~~ ^{is} inadequate to handle such demands but no more! The potential population densities of the major vacant areas under present zoning coincides with the limits of the sewer system capacities.
- * The North Caldwell storm sewer system is generally inadequate especially in the older areas. It is recommended that a complete study and master plan of the North Caldwell storm water drainage system be prepared, because such a plan will be necessary before any reasonable and efficient expansion of the present drainage system can be accomplished.
- * The Borough has a barely adequate water supply at present. It is recommended that prior to any substantial community growth which might be contemplated or encouraged, an additional source of water supply be secured and that additional improvements to the present water network be instituted.

It is therefore recommended that impact studies be submitted by developers covering wastewater, storm water and drainage and potable water as a part of any site plan and application.

a) Sewerage Disposal

The conclusions developed by the Alfred Crew Consulting Engineers, Inc. in their report on the adequacy of the existing wastewater collections system are in part as follows:

- * "The portion of the Mountain Avenue Tract which is tributary to Mountain Avenue Sewer, consisting of 71.4 acres, can not be developed for higher density use of garden apartments (as proposed by one developer) but can be developed in accordance with the present zoning requirements.
- * The portion of Mountain Avenue Tract which is tributary to Deer Trail Sewer, 34.03 acres, can not be developed for higher density use because of the inadequate capacity of the Deer Trail Sewer.
- * Because of the inadequate capacity of the Northern Trunk Sewer, both Beachmont Terrace and Lindsley Road Tracts can not be developed for higher density use.
- * No information is available regarding the infiltration and inflow occurring in the system. This report is based on the assumption that infiltration/inflow is within accepted design standards. The field investigation observed the possibility of illegal storm drainage connections into the wastewater collection system.
- * The system capacity is limited to and dependent upon the capacity of the adjacent systems receiving flow from the Borough of North Caldwell."

The report further states that North Caldwell "maintain the present zoning requirements in the Borough, because of the inadequate capacity in the existing Wastewater Collection System to permit increased wastewater contributions produced by higher density usage."

b) Water

North Caldwell has no water supply of its own. The Borough's water supply is provided for the most part by Essex Fells, and the Commonwealth Water Company (Little Falls). Thus, presently North Caldwell is dependent upon its neighboring communities for its water supply.

The study conducted by Roger Coupe, P.E., indicates that the Borough has a barely adequate water supply at present. Actually he states the Municipality is operating on a daily and annual water deficit.

Considered and informed engineering opinions hold that any additional, more substantial community growth, increasing water demand and usage, will in fact require substantial and costly projects for improving water supply and water distribution network.

5) Population

Current North Caldwell population is approximately 7,000. The future Borough ultimate population is estimated at 9,000, assuming that all vacant lands would become developed under present zoning standards.

This means that there is a 33% potential population growth - under present zoning - on the remaining 24% of the Borough area, as represented by vacant lands and farm acreage. Any further intensified use of this land could potentially endanger the public health and safety because of the probable strain of the public utility system which North Caldwell cannot control. Any such growth will have to be time coordinated with the expansion and improvement of utilities and other services which the Borough or its neighbors might be called upon to provide.

This Master Plan, as presented on the pages following, proposes an ultimate population substantially similar to that provided for under present zoning.

PLAN / MASTER PLAN AND ZONING

This is the sixth volume in a series, the Summary Master Plan of the Borough of North Caldwell. It is so designated because it presents the summary recommendations contained in the Plan. Hundreds of pages of technical back-up data - as referred to in the N.J. Laws 1953, Chap. 433 - are contained in the five reports listed on Page 3. As stated, they are an integral part of the entire Master Plan.

The purpose of the Master Plan is to provide guidance for the Borough Planning Board in both their day-to-day deliberations and also in their planning for the future. The Master Plan does not affect either property rights, values, or property taxes. Any change in the rights attached to the use of a property, the change in the value of property, or the change in the actual use of land, as well as the change in taxation as related to a property, does not result from the Master Plan. Such changes follow as a result of any rezoning. A Master Plan and zoning are substantively different.

The Master Plan is a long-range guide, which prescribes how things should hopefully develop in the future.

Zoning is immediate - it is the local law which prescribes how property must be used now!

The two do not conflict. From time to time, some Master Plan recommendations are implemented, causing the Zoning Ordinance to be consistent, to be amended. As this takes place over time, the Master Plan may also be updated. Most Planning Boards update their Master Plan on a continuous basis since planning by definition is a continuous process.

The Master Plan proposals for future land use- the type and location of residential, office, industrial, public and semi-public development - are shown on the Master Plan Map included in the Appendix. It should be emphasized again that this is not a proposed zoning map. The uses shown are in a form which can be incorporated into zoning amendments, but not all the changes need to or should be made immediately. The plan, as presented on the following pages, is a comprehensive and long-range plan providing for the future needs of North Caldwell for fifteen to twenty years from now.

Most of the plan proposals are in their original form as developed by the Consultants in cooperation with the Planning Board. Some changes were made by the Planning Board however, so the Plan as presented incorporates recommendations not specifically proposed by the Consultants.

"By planning now, the people of North Caldwell have the opportunity to plan for themselves. If they wait for the inevitable growth, others will be planning for them." - Peter Dorram.

IV. THE LAND USE PLAN

North Caldwell is a small community with an area of 1,856 acres and a 1973 estimated population of 6,790. The Borough is situated in the Northern part of New Jersey, Essex County, an area of 127 square miles with a population of almost one million persons.

As noted in the preceding pages, most of the readily developable land has been used in North Caldwell. Remaining parcels of acreage-with few exceptions-are either marginal lands or have one or more serious development problems.

The engineering study findings on the adequacy of wastewater collection system within North Caldwell indicate that this system was designed and constructed to accommodate a single family detached home type density usage. This existing system is adequate to handle such demands, but no more! The potential population densities of major vacant areas under present zoning is consistent with the limits of the system capacities.

The continued development of North Caldwell is dependent upon the proper operation of the wastewater treatment and transmission facilities operated by Caldwell, West Caldwell, Little Falls and perhaps some day also Cedar Grove. The wastewater flows at the Caldwell Plant, as revealed by recent investigations, have reached the design capacity and undoubtedly will require

the expansion and upgrading of the plant in the near future. Plans have already been completed for the expansion of the Kirkpatrick Lane Pumping Station and force main by West Caldwell because of the inadequacy of this facility. The Little Falls Plant is presently under orders of the New Jersey Department Environmental Protection banning additional sewer connections until the expansion and upgrading of these facilities are completed. No timetable for the completion of the West Caldwell or Little Falls improvements have been established as of this date.

Any such projects are also wholly dependent on federal funding allocations as well as stringent environmental regulations.

For the above stated reasons regarding wastewater collection and for similar assessments concerning surface water drainage as outlined previously and contained in the engineering studies, it is recommended that present zoning densities not be exceeded.

It is extremely significant to note that many of the present and future land use and zoning decisions will have to pay cognizance to the severe utility problems existing in North Caldwell. Many of the utility related decisions will be outside the scope of the Borough's sole determination due to its dependence on surrounding area providers.

Therefore, the Land Use Plan presented reflects a studied appreciation and understanding of the utilities limitations and the physical characteristics and prevailing environment.

The various land use proposals, which are also illustrated on the Master Plan Map, are as follows:

A.) Residential Uses

All existing and potential land uses have been carefully assessed. The following are recommended varieties:

- R-1: requiring a minimum of 21,875 square feet lot size
- R-1 Cluster: requiring a 30,000 square feet gross density, and a 15,000 square feet minimum lot size, subject to site plan review and approval
- R-2 Cluster: requiring a 20,000 square feet gross density, and a 15,000 square feet minimum lot size, subject to site plan review and approval

Cluster developments, while somewhat innovative, do exist in parts of New Jersey. Radburn, in Fairlawn, Village Green, in Hillsborough Township, and Panther Valley, in Allamuchy are a few of the leading examples.

The principle of clustering is the preservation of open spaces. Homes are permitted to be clustered on the most suitable land in return for the permanent preservation of the open spaces so gained. Instead of wall-to-wall subdivisions, clusters of homes are interconnected by woodlands,

parks, playgrounds, greenbelts or other open spaces. The developer obtains the same or similar number of units as under conventional development; but he saves on the costly leveling of hillsides, filling of marshes, and on the length of roads and utilities lines. The community gains by saving trees and open spaces without the direct need to buy outright such parks or greenbelts, by protecting the environment and by a reduced need for road and utilities maintenance in the future. Clustering under proper controls and ordinances is mutually beneficial to the land owner and the community.

In North Caldwell, cluster developments are proposed subject to adoption of new ordinances providing appropriate controls. Two main requirements proposed are:

- a) Minimum cluster development site to be twenty acres.
- b) Subdivisions and development plans to be subject to Planning Board site plan review and approval, including utilities impact studies and environmental impact studies to be presented by the applicant.
- c) Single family detached homes with two car attached garages to be the mode of construction.

R-1 Recommendations

1) The Mueller Property and environs (30 acres \pm)

This area is proposed for the 21,875 square feet lot size density and development to keep it consistent with the development pattern which surrounds it and because portions of the land had previously minimum one-acre lot size deed restrictions attached. It also has no severe land characteristics which would suggest consideration of other uses such as cluster development.

2) Former Schumann Heink Property (24 acres \pm)

This tract is surrounded only in the east and west by homes. In the north the abutting lands are vacant and to the south lies the Grandview School. This 24-acre parcel is predominantly wooded and reasonably accessible. There are no unusual characteristics or problems requiring clustering. Additionally, all or part of this land contains deed restrictions.

3) Birch Avenue North Area

This area lying west of Mountain Avenue near the Cedar Grove boundary consists of a number of smaller parcels, mostly vacant, with a few homes scattered among the woods. Accessibility is indirect and the overall area is inadequate in size for clustering. No apparent unusual physical characteristics exist.

4) Brookside Terrace North extending to Dupont Drive (20 Acres \pm)

The vacant and wooded area south of Dupont Drive is planned for R-1 residential use, because the topographic and access characteristics of this area are substantially similar to the already developed adjacent area to the south. Also, portions contain one acre deed restrictions.

5) Roosevelt Boulevard Area (38 Acres \pm)

Many years ago this area was prematurely subdivided into 40' x 120' size lots. Generally, the well drained lots on higher ground were developed first, while the wet or otherwise more problematic lots remained vacant. About one-half of the remaining vacant area is municipally owned.* This entire area because of its soils and utilities problems and because of its fragmented pattern is also recommended for R-1 density residential use.

*Interim municipal ownership is maintained for the purpose of land assembly of formerly prematurely subdivided land so that it can once again be productively returned to the tax rolls.

R-1 Cluster Recommendations

1) Walker's Pond Area (18 Acres \pm)

To protect the Greenbrook Valley and the Pond Area, R-1 Cluster is recommended for this area. Because of the size of the pond area, and the utilities easement besecting this site, it is recommended that in this exceptional instance an area smaller than 20 acres be considered as appropriate for cluster development.

2) Dupont Drive North (38 Acres \pm)

This large area in the northeast corner of North Caldwell is divided into numerous smaller parcels. The topography is steep and rugged, often rocky, mostly wooded and hardly accessible land. This area is not served by utilities, but perhaps some day it might be sewered by way of adjacent Cedar Grove. Some of the land is by voluntary deed restrictions limited to minimum one-acre and larger parcel sizes.

3) Mountain Avenue Tract (104 Acres \pm)

This large parcel of land has a wide variety of soils conditions and site problems, some of which were referred to in detail in the Introduction. In the engineer's opinion the site characteristics are different in the central portion of this site as opposed to its northern and southern extremities. For this reason there are different land uses proposed for these three portions of the farm.

a) Mountain Avenue Tract - Southern Portion (40 Acres \pm)
R-1 Cluster

This site has a variety of inherent site characteristics and problems which make it suitable for R-1 Cluster use at a minimum 30,000 square feet per home gross density and a minimum 15,000 square feet lot size with the balance of the tract maintained, as landscaped and improved open space recreation areas. This will provide flexibility to planning reducing the need to locate homes on muck covered by fill areas, wet lands, potential pond areas or the brook valley. Instead it will make it feasible to maintain a 100' wide park or permanent open space along the brook, provide space for a potential pond or retention basin, reduce the need to build on the muck and the like.

b) Mountain Avenue Tract - Central Section (32 Acres \pm)
R-1 Residential - 21,875 Square Foot Lots

This central section of the farm has no severe problems, such as muck, wet lands, ponds, or flood areas when compared to the two extremities of the property.

c) Mountain Avenue Tract - Northern Portion (28 Acres \pm)
R-1 Cluster

This 28 acre portion of the tract has an 800' long lake and several areas with bedrock at or near the surface. Since clustering would enable the maintenance of this aesthetically desirable lake to also serve as a drainage basin for flood prevention purposes, and its environs as a park or open space, and since clustering could also eliminate some of the need to build on shallow bedrock, the R-1 Cluster classification is recommended.

d) Area North of Above Farm (4 Acres \pm)

The four acre vacant area which lies between the Mountain Avenue tract and the homes fronting on Brookside Terrace has no special development problems and hence is earmarked for R-1 residential use.

R-2 RESIDENTIAL CLUSTER RECOMMENDATIONS

1) Lindsley Road (28 Acres \pm)

This is a rather steep and wooded area at the north end of North Caldwell near Little Falls.

In order to avoid extensive cut and fill necessitated by conventional land development methods which could have a negative drainage effect on properties below, clustering is recommended. Additionally, previously referenced utilities limitations and traffic circulation problems suggest this consideration.

B.) OPEN SPACE

The National Recreation and Park Association, a respected resource agency, recommends a minimum of ten acres of park land for every 1,000 persons of the population. Equally reasonable and realistic are the other national and State of New Jersey recreation and open space standards which are similar to the above.

Based on an estimated ultimate North Caldwell population of 9,000 persons, a minimum of 90 acres of open space and recreation areas are recommended.

In keeping with these authoritative and accepted standards, the following is recommended:

1) Municipal Open Space

The Greenbrook Valley between Mountain and Central Avenues is proposed for future park and recreation development. The early day settlers, developers and North Caldwell Land owners exhibited unusually good common sense and judgement in relation to this Greenbrook Valley area.

- a) The first of many sound decisions was made when the Greenbrook was permitted to run through the heart of abutting properties, instead of along the rear or front lines of parcels, where its water eventually would have had to be piped and wasted.
- b) The second wise decision was to divide the lands surrounding the brook as little as possible. And thus, this brook, which could cause untold problems and havoc, bisects only a few properties, four of which are rather large, such as:

- * Walker Pond tract
- * The Gould Avenue Municipal Park and Playground
- * The Dugan Estate
- * The Greenbrook Country Club

and which account for over 90 per cent of brook frontage in North Caldwell.

- c) The third logical decision was to avoid unnecessary brook crossings by roads. Instead, Gould Avenue and Greenbrook Road were laid out to run generally parallel with each other, cradling the brook valley in between; the center of the area bounded by the roads.

- d) The fourth good choice was made when the temptation of "straightening out" the meandering brook, and the piping of its waters in order to reclaim the adjacent wet lands, was resisted.

From the ecological point of view, leaving Greenbrook in its natural state was the best solution.

- e) In the final analysis, the most beneficial and far reaching resolutions were the one which determined the low intensity recreational land uses along this waterway.

In summary, the planning analysis indicates that the desire to maintain the fine character, recreational potentials, and ecological balance of the Greenbrook valley constitutes valid planning objectives. Therefore, this area is proposed for recreational and permanent open space uses.

2) Existing County Institutions and Open Spaces (142 Acres \pm)

In response to our inquiries, the Essex County Planning Board indicated that there are no plans for either the change, expansion or discontinuation of the present penitentiary and hospital uses. Hence, there is no compelling reason at present for this Master Plan to recommend any change in future land use.

A small portion of this land, near Mountain Avenue, is presently leased on a temporary basis for recreational purposes by the Borough of North Caldwell.

3) Greenbrook Country Club (122 Acres \pm)

This country club and golf course is located partly in North Caldwell and partly in Fairfield. The club property includes also a great part of the lower portion of the Greenbrook Valley - recommended for preservation-in North Caldwell.

The country club represents a desirable, well landscaped and much needed asset to the community and therefore, this Master Plan intends to protect and encourage its continued present use as a valuable open space.

From the planning point of view, there are many reasons for the Country Club land use to continue its existence, as follows:

- a) It is desirable that an already existing use--deserving protection and encouragement--continue its functions.

- b) Open space land uses are equally--or more-- important in urbanized and suburban areas for the ecology and environment, than more intensive uses of land.
- c) The present use when continued will not aggravate an already difficult utilities problem in the area.
- d) Open space as a natural resource should be preserved in urbanized areas wherever possible.

C.) OFFICE

The area bounded by Bloomfield Avenue, Elm Road and the Borough of Caldwell is a fully built up section of the most southerly part of North Caldwell.

The existing land uses in this area contain a poor mix of strip commercial development ranging from a bank building to a junk yard. This area is considered to have a good redevelopment potential because of its accessibility by way of Bloomfield Avenue. Therefore, it is proposed to prohibit all residential uses and to discourage all strip commercial uses within this section. Instead office uses requiring modern parking standards subject to site plan review and approval by the Planning Board are recommended.

D.) INDUSTRIAL

It is proposed that the present limited industrial zone along Fairfield Road remain industrial except that the zoning requirements be streamlined and modernized to convert this to a Planned Industrial Park Area. This would provide for more detailed parking, buffer strip, sign and site plan review requirements.

E.) COMMUNITY FACILITIES

As previously referenced, it is proposed that the Gould Avenue recreation area be gradually improved. It is further recommended that the Borough of North Caldwell enlarge over the next fifteen to twenty years the municipally owned area to encompass the major portion of the Greenbrook Valley. This would ensure the preservation of the most significant environmental and ecological features of the community, provide space for recreation and other municipal facilities and protect the water way and the flood plains.

It is suggested that a portion of the total acreage be preserved for possible municipal facility expansion as might be required.

The Public Service Electric and Gas Company Easement and the open space areas are recommended for appropriate uses in conformance with standards available from the company.

V. IMPLEMENTATION

The completion of this Master Plan is not the completion of the planning program, but an initial stage. Subsequent stages of work will provide for the implementation, updating and the extension of this Master Plan.

It is recommended that this Master Plan be implemented over the years, as circumstance and need determine. There are a variety of forms in implementation. The first step will be the Planning Board's official adoption or modification of its Master Plan following public hearings. Zoning Ordinance amendments; adoption of regulating ordinances controlling certain functions as the removal of natural resources, such as top soil, trees and the like; amendments to the Subdivision Ordinance, Road Ordinance, Building Code, evaluation of impact studies, development of a capital improvements program, the design of an official map, are possible subsequent actions.

A.) RECOMMENDED IMMEDIATE ZONING CHANGES

1) Bloomfield Avenue Area

Current Zoning: B-1 business zone
Recommended Zoning: O-Office

Prohibit residential and strip commercial uses; require up-to-date off-street parking standards, minimum frontage of 150', and height limit of 35 feet.

2) Essex County Institutional Properties

Current Zoning: R-1 and R-2
Recommended Zoning: Uniformly R-1 with provisions for adequate buffer strips near abutting institutional or non-residential uses.

3) Mountain Avenue Tract

Current Zoning: R-1 and R-2
Recommended Zoning:

- a) Southern Portion - R-1 Residential Cluster
- b) Central Section - rezone present R-2 Portion to R-1 residential and leave balance R-1 as is presently zoned.
- c) Northern Portion - R-1 Residential Cluster

4) Greenbrook County Club

Current Zoning: R-1
Recommended Zoning: Golf Course, Country Club and Open Space zone district.

Potential uses other than the current golf facility include the following:

Agricultural such as crop farming, horticulture, and tree farming; botanical conservatories; outdoor nature laboratories; native wildlife sanctuaries; public and semipublic recreation; recreational uses including riding academies, clubs, stables, country clubs and golf course.

5) Lindsley Road Tract

Current Zoning: R-1

Recommended Zoning: R-2 Cluster

6) M-1 Light Industry

Change to PIP - Planned Industrial Park district.

B.) FLOOD PLAINS

Adopt a flood plain zoning ordinance with special emphasis on protecting Greenbrook Valley.

The Borough has completed many improvement projects in the region to alleviate major flooding to limit possible damage.

C.) WATERWAYS CONSERVATION

Adopt a brook easement ordinance prohibiting all structures, buildings, etc. within 50 feet of the center line of all brooks and waterways.

D.) SITE PLAN REVIEW

Adopt a site plan review ordinance requiring Planning Board approval of site plans for any change of use and all new developments or divisions of land, excepting those for conventionally subdivided one-family detached homes developments. The review requirements for these shall remain vested in the Subdivision Ordinance.

E.) ENVIRONMENTAL AND UTILITIES IMPACT STUDIES

Adopt an ordinance requiring all developers to present full and complete studies regarding the impact of proposed developments on utilities systems and the environment as a condition of the site plan review process.

F.) LAND DISTURBANCE

Adopt a land disturbance ordinance which in effect shall provide for:

- a) Erosion and sedimentation control
- b) Tree removal restrictions

In order to preserve the Borough's beautiful suburban character and to promote traffic safety, it is recommended that the removal of trees for a depth of 50 feet from the edge of public right of ways shall be prohibited without Planning Board's approval, except where such removal is necessary to provide for access and egress drives. The purpose of such an ordinance amendment will be to preserve a 50 foot scenic easement along all public roads free of buildings, structures, signs or other improvements, to preserve the existing landscape in its natural state; for purposes of public safety and for maintaining good drainage.

- c) Removal of topsoil, sand and gravel mining provisions
- d) Limitations for land disturbance, including both cut or fill of soil within reasonable limits subject to Planning Board approval.

G.) CONTINUING PLANNING

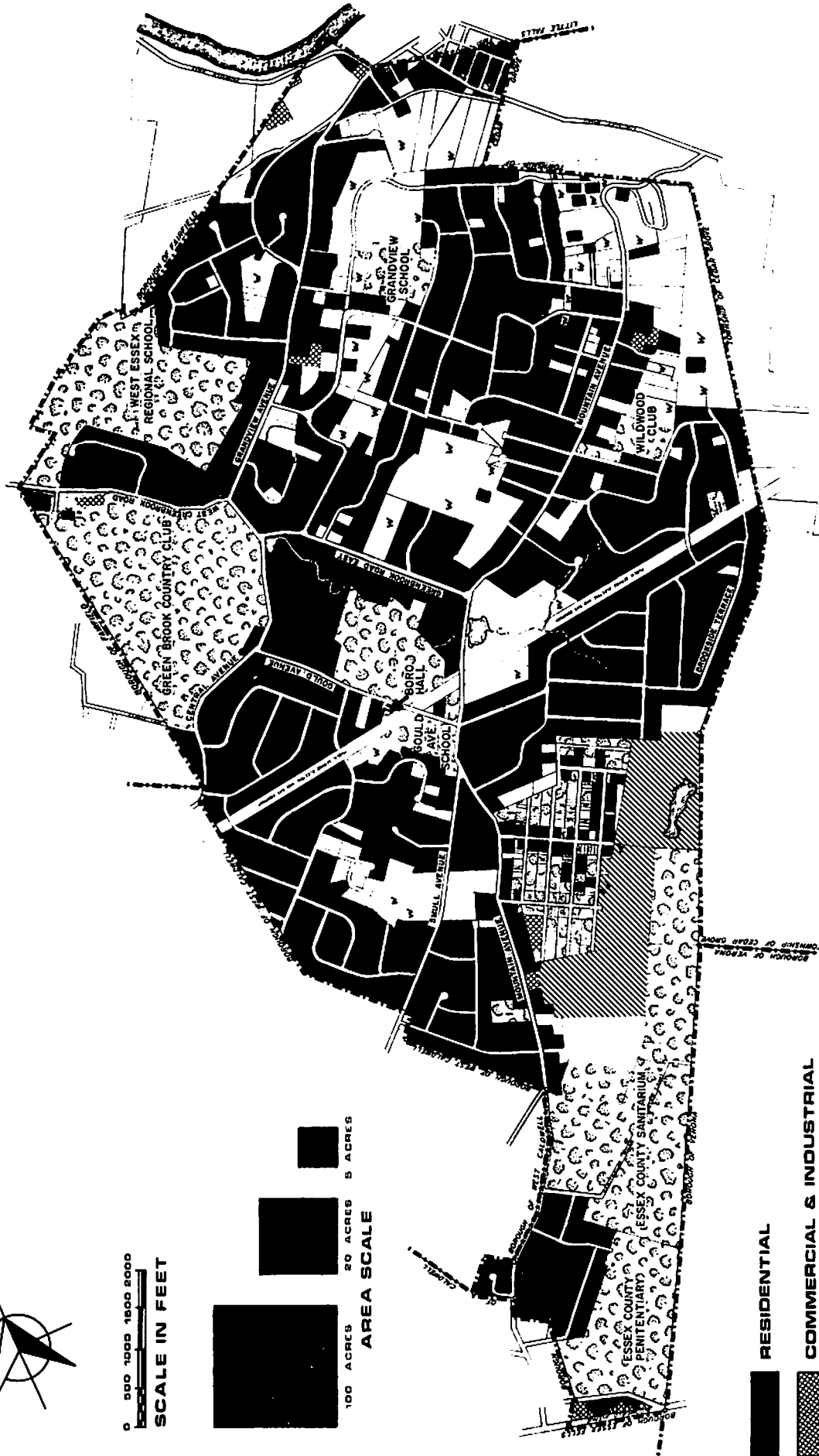
It is recommended that the adoption of the Land Use Plan be accomplished and that the Planning Board pursue a Continuing Planning Program to assure the proper review of site plan and subdivision applications, the implementation of the Master Plan, and to assure the continuing updating of this plan.

APPENDIX

- * Present Land Use
- * Wet Areas and Flood Plains Map
- * Steep Slopes and Depth to Bedrock Map
- * Future Land Use (Master Plan)



0 500 1000 1500 2000
SCALE IN FEET



- RESIDENTIAL
- COMMERCIAL & INDUSTRIAL
- FARM
- PUBLIC & SEMI-PUBLIC
- WOODED
- VACANT

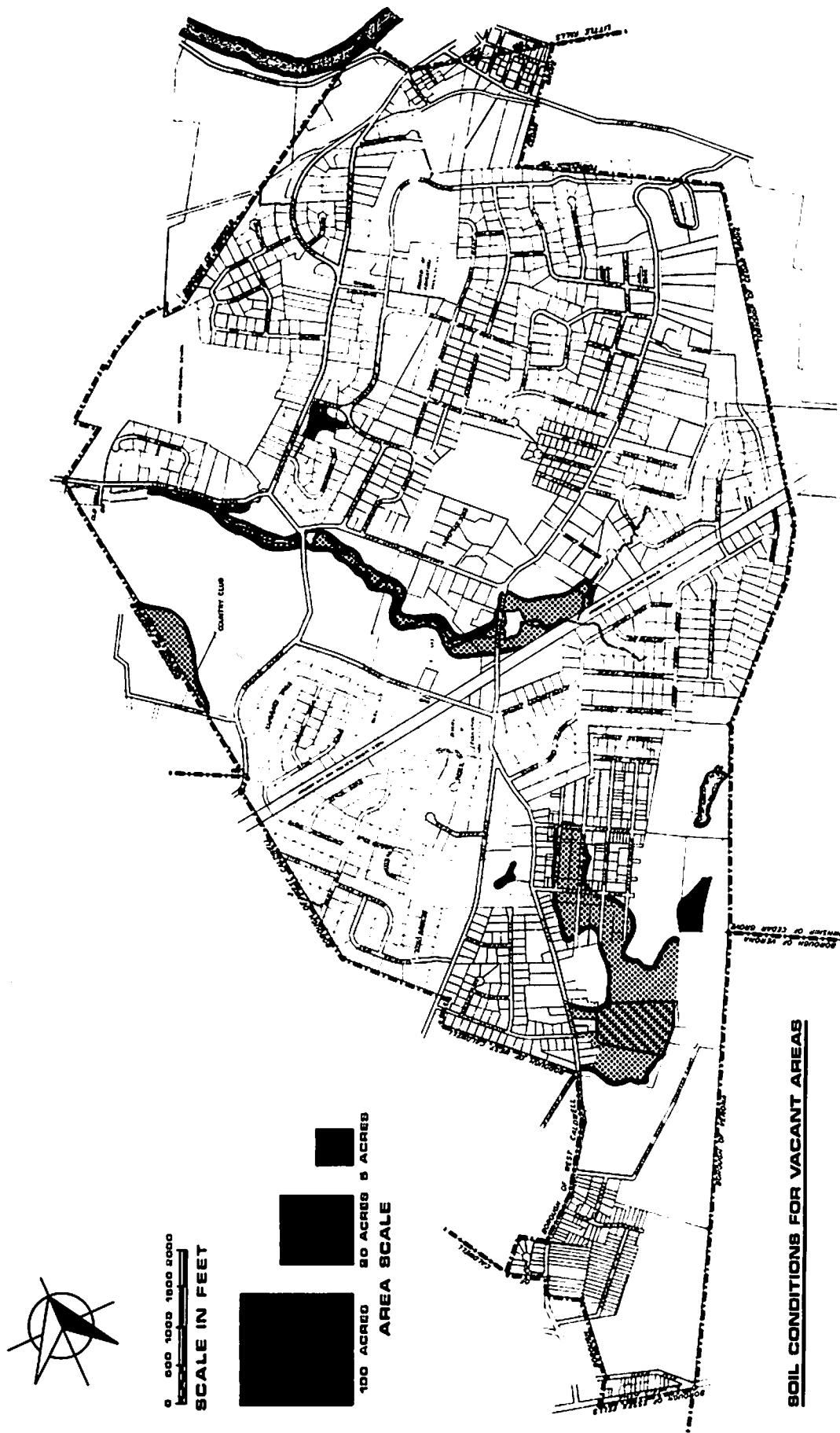
PRESENT LAND USE

DIAGRAM

**BOROUGH OF NORTH CALDWELL
ESSEX COUNTY, NEW JERSEY**

BOORMAN & DORRAN, INC. 1973
CONSULTANTS

REV 1-24-78 POND ADDED NEAR EAST BOUNDARY.
SOURCE: MAP BY COUVRETTE ASSOC. INC. FEB. 1971.
SOURCE: BASE MAP BY VALENTE & SULLIVAN INC.,
ENGINEERS, CALDWELL, N.J.



WET AREAS & FLOOD PLAINS

**BOROUGH OF NORTH CALDWELL
ESSEX COUNTY, NEW JERSEY**
1973
BOORMAN & BOORMAN, INC. - **CONSULTANTS**

BOIL CONDITIONS FOR VACANT AREAS

- WET 9 OR MORE MONTHS OF THE YEAR.
- MADE LAND-(FORMERLY WET & MUCKY LAND FILLED).
- FLOOD AREAS WITH FREQUENT FLOODING.

SOURCE : U.S.D.A., SOIL CONSERVATION SERVICE - 10-11-73.

REV. 3-5-74 • MADE LAND ADDED, SOURCE • S.C.S.

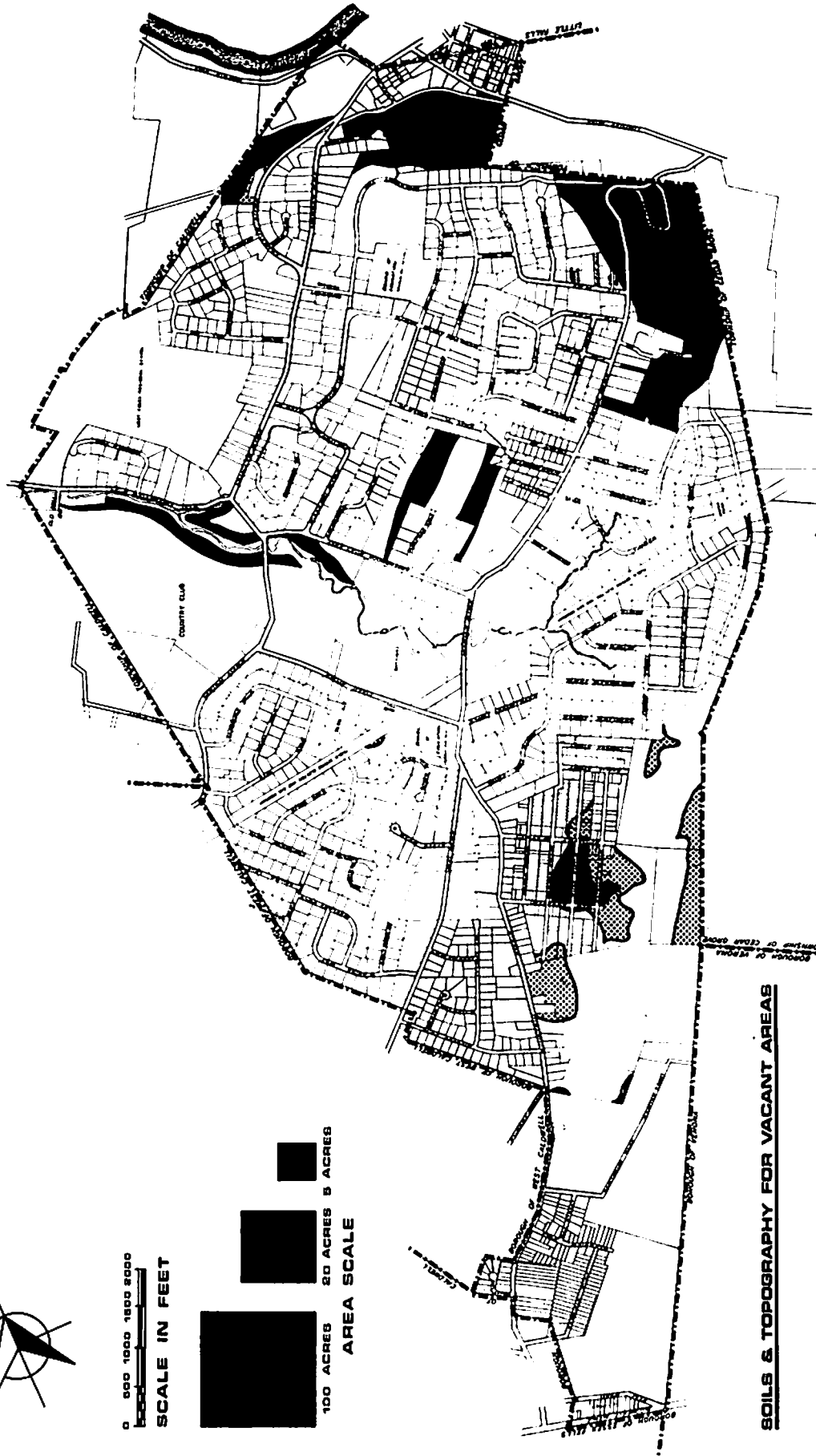
REV 1-24-74: POND ADDED NEAR EAST BOUNDARY

SOURCE: MAP BY COUVRETTE ASSOC INC. C/O 1971

**SOURCE - BASE MAP BY VALENTE & SULLIVAN INC.,
ENGINEERS, CALDWELL, N.J.**



0 500 1000 1500 2000
SCALE IN FEET



SOILS & TOPOGRAPHY FOR VACANT AREAS

SLOPES GREATER THAN 15%.

BEDROCK 5' OR LESS BELOW SURFACE.

SOURCE : U.S.D.A., SOIL CONSERVATION SERVICE • 10-11-73.

SOURCE : BASE MAP BY VALENTE & SULLIVAN INC.,
ENGINEERS, CALDWELL, N.J.

STEEP SLOPES &

DEPTH TO BEDROCK

**BOROUGH OF NORTH CALDWELL
ESSEX COUNTY, NEW JERSEY**

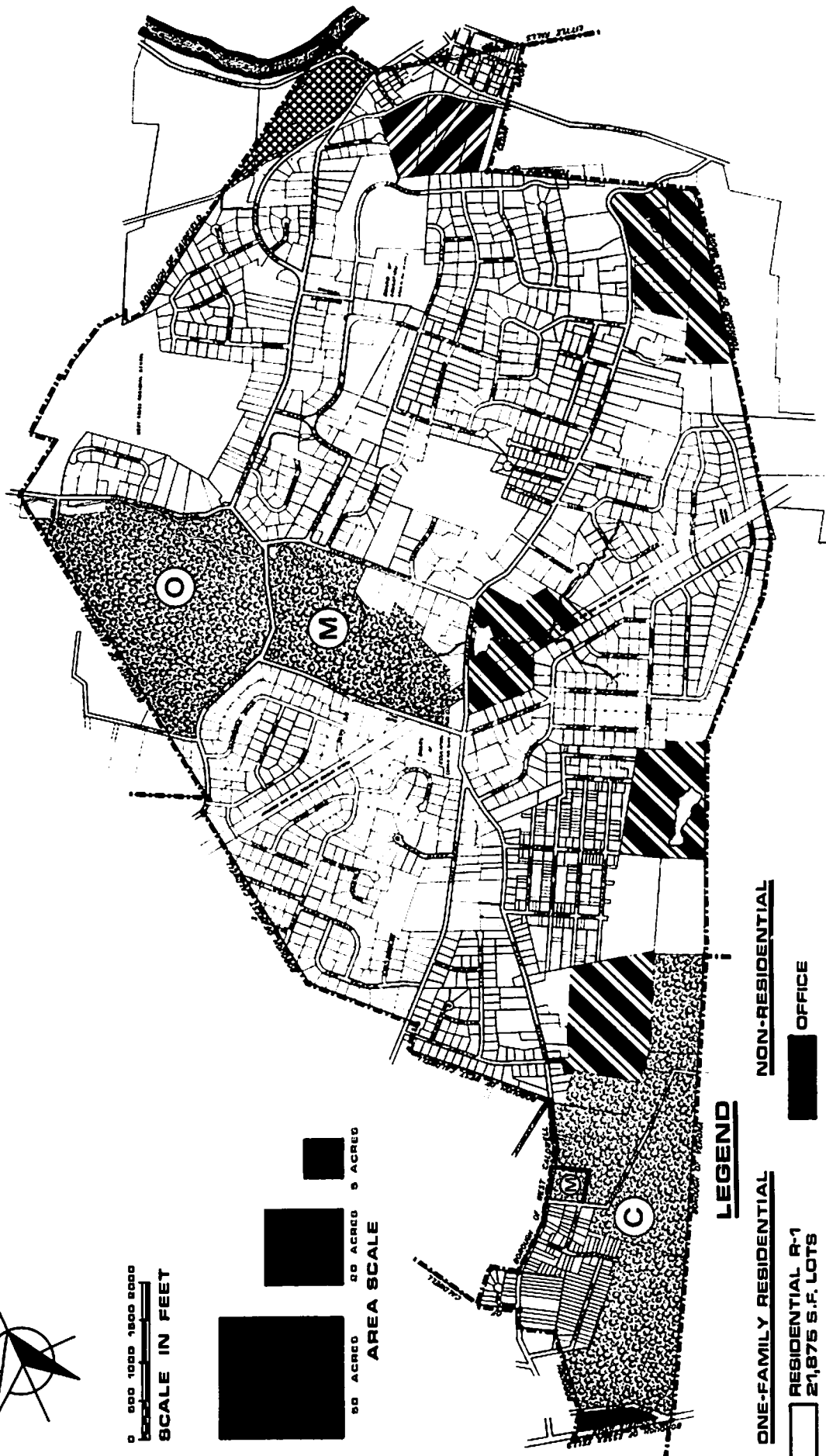
BOORMAN & DOORAM, INC. 1973

CONSULTANTS

MASTER PLAN



0 500 1000 1500 2000
SCALE IN FEET



LEGEND

ONE-FAMILY RESIDENTIAL

RESIDENTIAL R-1
21,875 S.F. LOTS

RESIDENTIAL R-1 CLUSTER
GROSS DENSITY 1 HOME/
30,000 S.F.
MIN. LOT SIZE 15,000 S.F.

RESIDENTIAL R-2 CLUSTER
GROSS DENSITY 1 HOME/
20,000 S.F.
MIN. LOT SIZE 15,000 S.F.

NON-RESIDENTIAL

OFFICE

INDUSTRIAL PARK
OPEN SPACE

MUNICIPAL PARKS &
OPEN SPACE

EXISTING COUNTY
INSTITUTIONS &
OPEN SPACE

GOLF COURSE &
OPEN SPACE

FUTURE LAND USE

**BOROUGH OF NORTH CALDWELL
PLANNING BOARD
ESSEX COUNTY, NEW JERSEY**
BOORMAN & DORRAN, INC. 1975
CONSULTANTS