

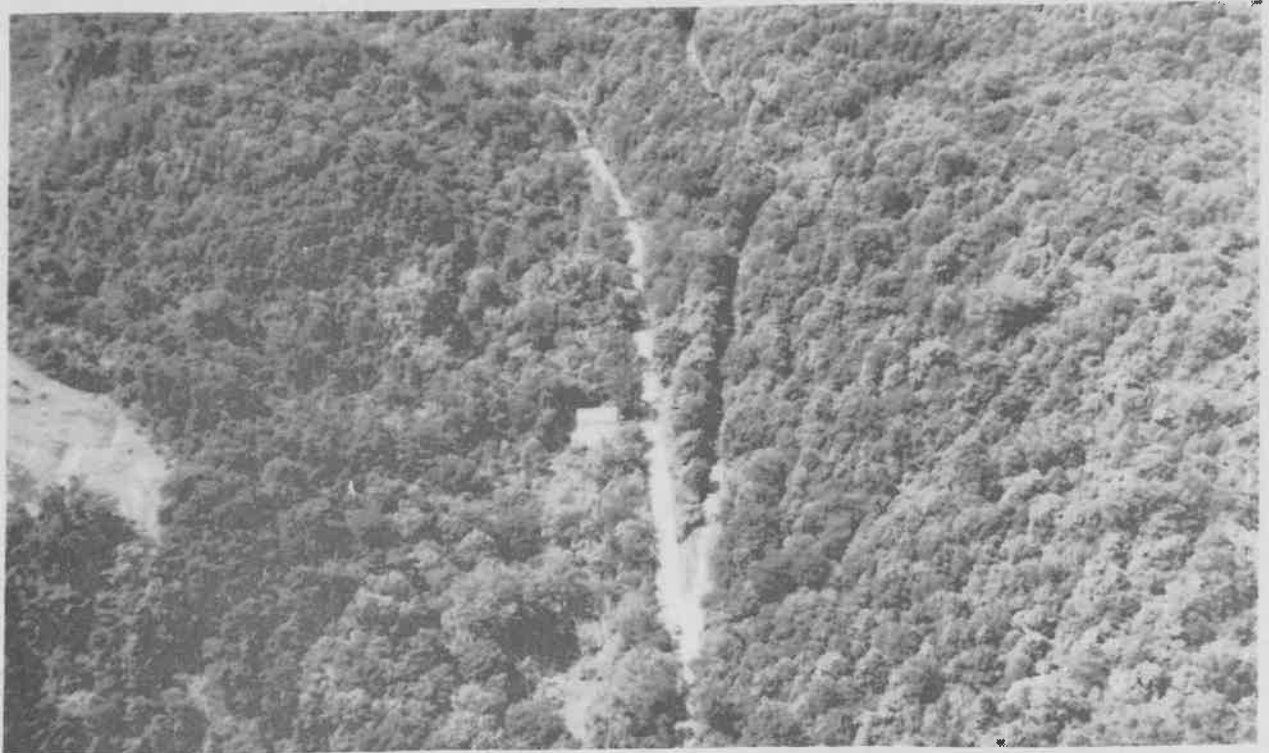
26-8129-1743

TRANSPORTATION



COLERAIN CORRIDOR STUDY

LAND DISPOSITION



ENGINEERING DIVISION

DEPARTMENT OF PUBLIC WORKS



room 141 city hall
cincinnati, ohio 45202
513-352-3441

JULY 1983

COLERAIN CORRIDOR STUDY

Transportation

Land Disposition

Prepared by

Engineering Division
Department of Public Works

July 1983

COLERAIN CORRIDOR COORDINATING COMMITTEE

COLERAIN CORRIDOR STUDY

Rick Bailey, OKI, Regional Council of Governments
Debra Barman, Real Estate
Joseph Bischof, P.E., City Engineer
Steve Bloomfield, Director, Neighborhood Housing & Conservation
Jim Bodmer, College Hill
Sr. Elizabeth Bowyer, Northside
Agnes Brienza, Mt. Airy
Don S. Carpenter, P.E. District 8, ODOT
Robert Cordes, P.E., Engineering Division
Nancy Core, Queen City Metro
John Deatrack, P.E., Study Coordinator, Engineering Division
Paul A. Drees, College Hill
Robert Duffy, City Planning Department
Dennis Finney, Neighborhood Housing & Conservation
Hubert Guest, Director, City Planning Department
Marcus Key, Mt. Airy
Evonne Kovack, Neighborhood Housing & Conservation
Karen Hurley, Northside
Robert Fitzpatrick, Mt. Airy
Barbara Lichtenstein, Neighborhood Housing & Conservation
Benjamin McKay, P.E. Traffic Engineering
Ted Mayer, Queen City Metro
Richard Molby, Park Board
John Niehaus, P.E., Mt. Airy
Joseph Sizemore, P.E., Hamilton County Engineering
Betty Ann Smiddy, College Hill
Gifford Tebbs, Neighborhood Housing & Conservation
Susan Utt, Neighborhood Housing & Conservation
Alma Voelckel, Northside
Donald Wehmeyer, P.E., Traffic Engineering
Michael Weyand, Northside
Thomas Young, P.E., City Traffic Engineer
Paul Zisla, City Planning Department

TABLE OF CONTENTS
COLERAIN CORRIDOR STUDY

	Page Number
I. Introduction	1
A. Study background	1
B. Product Goals of study	1
C. Study Assumptions	1
D. Brief history of area's transportation network & the Corridor Study	1-3
II. Study Process - Responsibilities	
A. Process goal of Study	4
B. Study process and responsibilities of participants	5-8
III. Needs Assessment/Existing Conditions	
A. Neighborhood Needs Assessment	9
B. Data Sources	
C. Traffic counts	
D. Traffic projections	
IV. Transit System Needs Assessment	
A. Transit history	10
B. Role of transit in corridor	
C. Relationship to Queen City Metro corridor study	
D. Traffic Engineering's role in transit component	
V. Land Use Planning: Plan Review & Data	
A. City Planning Department's role	11
B. OKI population projections	
C. Review of existing plans	
D. Study of areas physical characteristics	
VI. Problem & Resource Identification	
A. Definitions	12
B. Field checks	
C. Calculated problem analysis	
D. Roadway Level of Service	
E. Land Use deliberations	
VII. Alternative Generation	13-14
A. Major roadway alternatives	
B. Common improvements	
C. Component improvement maps and analysis	
D. Land use alternatives	
E. Traffic projections for major alternatives	
F. Neighborhood review	
VIII. Final Evaluation	
A. Component improvements resource and problem identification	15
B. Evaluation criteria	
C. Neighborhood review	
IX. Recommended Street Improvements and Financing	16-17
A. Summary and financing	
B. Improvement categories	
C. Map listing improvement categories	
D. Recommended traffic systems	18-23
E. Summary of neighborhood requests and results	24-25

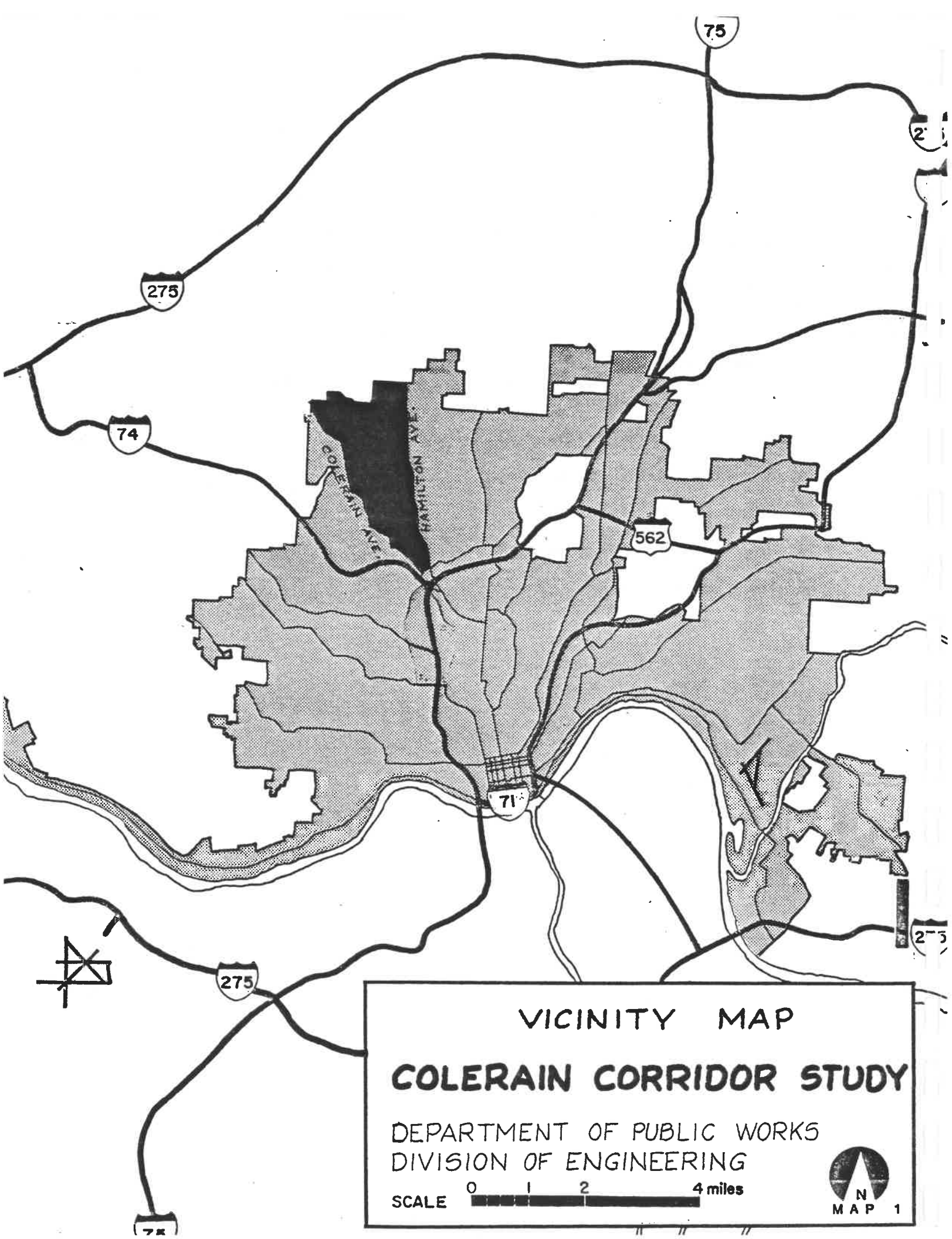
	Page Number
X. Transit Proposals	26-42
A. List of proposals	27
B. Details of proposals	28-33
C. Sources of requests for proposals	34-41
D. Proposals for routes outside study area	42
XI. Land Use Recommendations	43
A. Introduction	
B. Study Area - Existing Conditions and Recommendations	

MAPS

1. Vicinity Map
2. Traffic Flow Diagram
3. Accident Summary
4. Existing Bus Routes
5. Population Projections
6. Transportation Problems
7. Schematic Alternative "C"
8. Schematic Alternative "B"
9. Schematic Alternative "A"
10. Schematic Alternative "D"
11. Proposed Highway Improvements
12. Proposed Off-Peak Bus Routes
13. Proposed Peak Hour Bus Routes
14. Bus Routes Proposed for Knowlton's Corner Area
15. Land Use Study Areas
16. Zoning

TABLES

1. Intersection Level of Service
2. List of component improvements
3. Project Evaluation criteria
4. Contents of Mailing for Evaluation Phase
5. Street Improvement Categories



VICINITY MAP
COLERAIN CORRIDOR STUDY
DEPARTMENT OF PUBLIC WORKS
DIVISION OF ENGINEERING
SCALE 0 1 2 4 miles
MAP 1

INTRODUCTION COLERAIN CORRIDOR STUDY

The purpose of this Study is to remove the cloud of uncertainty from transportation and land use issues in the Colerain Corridor.

Between 1976 and 1979, Cincinnati, at ODOT's request, provided a leadership role in implementing a Colerain Corridor study between I-74 and Struble Road. This process, in cooperation with the various community groups, identified the scope of work, advertised for and selected a consulting team. The City was ready to enter into an Engineering agreement when ODOT indicated that it lacked its share of the cost for the \$1,500,000 undertaking. That study was to evaluate a no-build, Traffic System Management(TSM) and exclusive busway alternatives over the seven (7) mile gap, of which three (3) miles were in the City of Cincinnati. After failure to implement the study proposed by City Council, the administration reported back to Council and recommended that a similar inhouse study be undertaken for those three (3) miles within Cincinnati. Map 1 defines the study area. The study considered the contribution and restrictions of the outlying areas as uncontrolled externalities.

The product goals of the study were to identify:

1. Transportation improvements required in the area to handle Year 2000 traffic
2. Transit suggestions for Queen City Metro to support the transportation network in Colerain Corridor, focusing on those changes which could be accomplished without increasing operating costs.
3. Land use recommendations for property purchased for Colerain Modified Expressway and not required for proposed transportation improvements.

The Study assumed the completion of the Cross County Highway in the 1990's. It also assumed the following from the July 1981 "OKI Regional Transportation Plan "to which the City contributed heavily:

- (1) The Colerain Freeway not be built; a process be initiated to dejournalize the center line, and plans be made for other use of acquired lands.
- (2) An operational improvement study for the Colerain Corridor be done that considered a full range of improvements to the existing transportation system.

The same document dropped further consideration of a rapid transit facility through the corridor. The assumptions set a challenge to engineers, planners and residents of the affected neighborhoods to establish a clear direction for dealing with traffic problems and development issues in the area.

Colerain Avenue, West Fork Road, Kirby Road and Hamilton Avenue originated in the first two decades of the nineteenth century as links from the rich farms and small villages on the broad flat plateau in the north and northwest of Cincinnati down to the city's agricultural processing industries. Flourmills, breweries, stockyards and other related businesses gradually spread up the Mill Creek Valley from the Ohio River along what became Spring Grove Avenue.

The early roads from the City climbed the hillsides through stream valleys from the Mill Creek/Ohio River basin area, to the edge of the plateau where at the top they were interconnected by roadways that became North Bend and Belmont. Intersecting with Colerain and Hamilton further to the north, Blue Rock, Banning and Groesbeck linked more areas to the east and the west into the roadway network. Present day travel patterns on those roads began to emerge in the early nineteenth century when topography and destinations helped to determine their routes and character. Farmers, merchants, workers and other travelers used the network on the plateau to reach the major roadways down the hillsides to the Mill Creek Valley, both on the east and the south, as well as the routes across the plateau north to Hamilton and west to Harrison.

When the City Planning Commission designated future expressway locations in its 1947 "Motorways" plan, it used many existing alignments following those historical routes, including the "Colerain Modified Expressway" up the existing Colerain Avenue. However, by the time Interstate Highway routes were officially designated, much of the property along those routes from the "Motorway Plan" had been built up to the extent that any upgrading would have caused massive displacement. The planners and engineers looked for unbuilt land for a bypass. I-74 was built on its present alignment to connect the Harrison corridor to Cincinnati with the least disruptive route, much of it following park land. However, the highway still had to penetrate the inner ring of development along the Mill Creek and West Fork Channel at Cumminsville. As it was conceived, at the point where it descended the hill from Mt. Airy Forest, I-74 was supposed to collect traffic from Colerain, Kirby/Glenview, and Hamilton via a new road built on the hillside face parallel to the development on Virginia and Ashtree. The interchange should have connected those routes plus West Fork to the Mill Creek Valley and the City via I-74 and an improved Beekman. The Beekman connection was eventually completed, but the rest of the proposed roadway was terminated in a "temporary" partial interchange of I-74 and Colerain at Virginia/West Fork. The required scale of the other improvements was never officially settled. The conflicting issues of how much traffic was acceptable on a heavily residential arterial (Colerain) or collector (Virginia), versus how much damage to the natural environment or displacement of housing/businesses could be tolerated, were never resolved.

The proposed routes had a long history. The connecting route parallel to Virginia was planned and the Colerain Modified Expressway was journalized in 1962. In November of 1964 Hamilton County voters passed the \$30 Million County Bond Issue, which included money for design, property acquisition, and construction of the section between Ashtree and the North Corporation Limit. As in the location of I-74, the overriding policy determining route location continued to be the bypassing of existing built-up areas and the focusing of traffic on those new alignments, even if it meant the loss of park or other green spaces.

By the late 1960's the national philosophical pendulum began to swing toward preservation of green areas and in the early 1970's, roadway impact studies on new highways were broadened considerably to include a wide variety of environmental and indirect social/economic costs. At the same time, local questions on the traffic projections and sensitivity to the unique requirements of building on Cincinnati's hillsides drew fire to the designated interconnecting route parallel to Virginia Avenue, a hillside slopes. Additionally, in the County another formidable problem existed with the journalized centerline. Unlike the City, which had spent over three quarter of a million dollars of Bond Issue Funds to protect the expressway right-of-way, the County had allowed development on the land designated for the Colerain Modified Expressway north of the City's

corporation limit up to Struble Rd. The State had, in the meanwhile, funded acquisition of over \$2.5 Million work of property for the road linking I-74 with Colerain, Kirby and Hamilton on the alignment parallel to Virginia and Ashtree.

The project still had considerable momentum, but under strong pressure City Council decided in May of 1976 that transportation and development issues demanded that the project be stopped and an Environmental Impact and Hillside Stability Study be undertaken with County, State and Federal government participation on the entire route from I-74 to Struble Road.

From May 1976 to October 1979 the City Engineer's staff shepherded the study through the initial steps of the process. OKI handled most of the neighborhood interaction and formatting once the consultant selection process commenced. In late 1978 after a considerable expenditure of time, the Coordinating Committee composed of neighborhood residents and staff from affected governmental entities chose their preferred consultant. Unfortunately by late 1979, while formalizing the agreement, the process stopped when the State announced that it did not have its share of the study funds available. By that time authority for acquisition, which had virtually ceased seven years before, was officially terminated by City Council.

From that point, both the City and Neighborhood resident councils sent letters to ODOT in an attempt to renew the State's commitment to the study. Finally, in early 1982, the Department of Public Works recommended to City Council that a mini-study be undertaken, in-house, to remove the cloud of uncertainty on transportation and development issues in the Corridor. In August 1981, OKI had documented the doubts being felt about the originally projected transportation improvements in the corridor and made the recommendations which were utilized as the basic premise of this Study.

By the time the mini-study had been initiated in 1982, the general atmosphere surrounding transportation improvements had changed again and moved away from the bypass philosophy. Beginning in the mid 1970's, declining growth rates in development and traffic counts, combined with the environmental concerns of the early 1970's, called into question any new highway improvement, regardless of alignment. Declining availability of capital funds further focused attention on optimizing existing networks. The term "traffic systems management" gained currency to describe a systematized approach to the identification and removal of bottlenecks and safety problems. Most of the changes in the new techniques were actually shifts in emphasis and expectations for the process and scope of the final product. One of the major goals of the Traffic Engineering staff of the City of Cincinnati has always been to wring the last drop of capacity of the existing network by using specific research and operational techniques. Additionally, Highway Engineering has for many years been increasing the radii of strategic corners and adding left turn storage lanes to intersections. However, studying a transportation corridor to identify a group of improvements has still been a significant shift in expectations from the previously proposed expressway.

At this point, identification of small scale improvements may be safe and inoffensive since it, usually, does not call for any substantial roadway widening, which usually aggravates the property owners all along the route. The implications of the approach for the 1990's and beyond can only be judged by current standards, although if history is any indicator, the preferred style of improvement to meet transportation needs is sure to evolve again.

STUDY PROCESS COLERAIN CORRIDOR STUDY

As the Process Goal of this study, the Engineering Division set out to use a broad range of neighborhood, City department, and outside agency persons as consultants to assist in achieving the product goals of the study. These groups formed the Coordinating Committee. The Committee was composed of representatives from the three directly affected neighborhoods, as well as the Hamilton County Engineer, OKI, Queen City Metro, Providence Hospital, and the following City Departments and Divisions: City Planning Department, Neighborhood Housing and Conservation, Cincinnati Park Board, Real Estate Division of the Law Department, Traffic Engineering Division and all sections of the Engineering Division of the Public Works Department. The neighborhood representatives on the Coordinating Committee were selected by the community council in College Hill. Mt. Airy set up transportation and land use committees and Northside set up a broad based committee with persons from the community council, as well as specific block clubs.

The following pages detail the process and responsibilities of each entity:

STUDY PROCESS - RESPONSIBILITIES

COLERAIN CORRIDOR STUDY

NEEDS ASSESSMENT/EXISTING CONDITIONS

Neighborhood Needs Assessment and Existing Conditions

1. Action - Hold neighborhood meetings to collect list of transportation needs and ideas for reuse of land purchased
Lead - Engineering Division

Transit System Needs Assessment

1. Action - Determine operational needs of existing routes of Queen City Metro
Lead - Engineering Division
2. Action - Determine transit needs from neighborhood meetings and research
Lead - Highway and Traffic Engineering, Queen City Metro

Traffic and Roadway Data

1. Action - Review existing physical condition of roadway network and traffic controls
Lead - Highway and Traffic Engineering Divisions
2. Action - Assemble all proposed roadway plans for Study area
Lead - Highway Engineering
Asst - Traffic Engineering
3. Action - Develop new 24 hour machine and manual peak hour traffic counts, accident analysis and speed and delay studies
Lead - Traffic Engineering Division
Asst- Hamilton County Engineer
4. Action - Develop Zonal Traffic Projections
Lead - O K I

Data and Plan Assembly and Review

1. Action - Review O K I population projections
Lead - City Planning Department , O K I
2. Action - Review current land use/zoning plans for conflicts and needed changes
Lead - City Planning Department
Asst - Neighborhood Housing and Conservation, Park Board
3. Action - Map property purchased for Colerain Modified Expressway
Lead - Highway Engineering
4. Action - Investigate natural features and advise
Lead - Engineering Division
5. Action - Check existing inventories and other appropriate sources for information on historical and archaeological resources
Lead - City Planning Department

EVALUATION & DRAFT RECOMMENDATIONS

ALTERNATIVE GENERATION & TESTING

DATA ANALYSIS/PROBLEM RESOURCE IDENTIFICATION

NEEDS ASSESSMENT/CONDITIONS

DATA ANALYSIS/PROBLEM & RESOURCE IDENTIFICATION

Identify Roadway Problem

1. Action - Determine capacity restrictions and safety hazards
Lead - Highway and Traffic Engineering

Identify Land Planning Problems

1. Action - Complete site profiles of property purchased for Colerain Modified Expressway
Lead - City Planning Department
Asst - Engineering Division

Synthesize Transit Requirements

1. Action - Bring together transit system and roadway problems to search for common solutions
Lead - Traffic Engineering Division

Identify Resources for Problem Solution

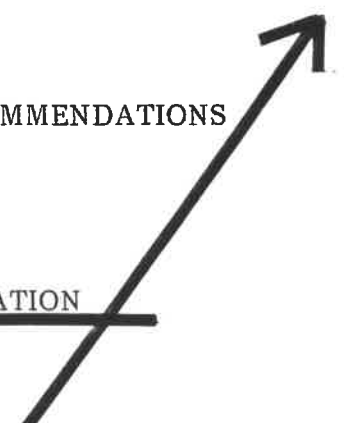
1. Action - Identify supporting resources for transportation improvements
Lead - Highway Engineering
2. Action - Identify potential financial resources for transportation improvements
Lead - Highway Engineering

EVALUATION & DRAFT RECOMMENDATIONS

ALTERNATIVE GENERATION & TESTING

DATA ANALYSIS/PROBLEM RESOURCE IDENTIFICATION

NEEDS ASSESSMENT/CONDITIONS



ALTERNATIVE GENERATION & TESTING

Schematic Roadway Alternatives

1. Action - Map possible roadway improvements
Lead - Highway and Traffic Engineering

Schematic Transit Alternatives

1. Action - Develop and map transit alternatives
Lead - Traffic Engineering

Schematic Land Use Alternatives

1. Action - Map possible land use alternatives
Lead - City Planning Department
Asst - Neighborhood Housing & Conservation

Neighborhood Review

1. Action - Distribute information on needs assessment data and alternative generation
Lead - Highway Engineering
Asst - Traffic Engineering and City Planning Department

Alternative Testing

1. Action - Traffic projections for highway construction alternatives
Lead - O K I

EVALUATION & DRAFT RECOMMENDATIONS

ALTERNATIVE GENERATION & TESTING

DATA ANALYSIS/PROBLEM RESOURCE IDENTIFICATION

NEEDS ASSESSMENT/CONDITIONS

EVALUATION & DRAFT RECOMMENDATIONS

Evaluate Alternative Highway Improvements

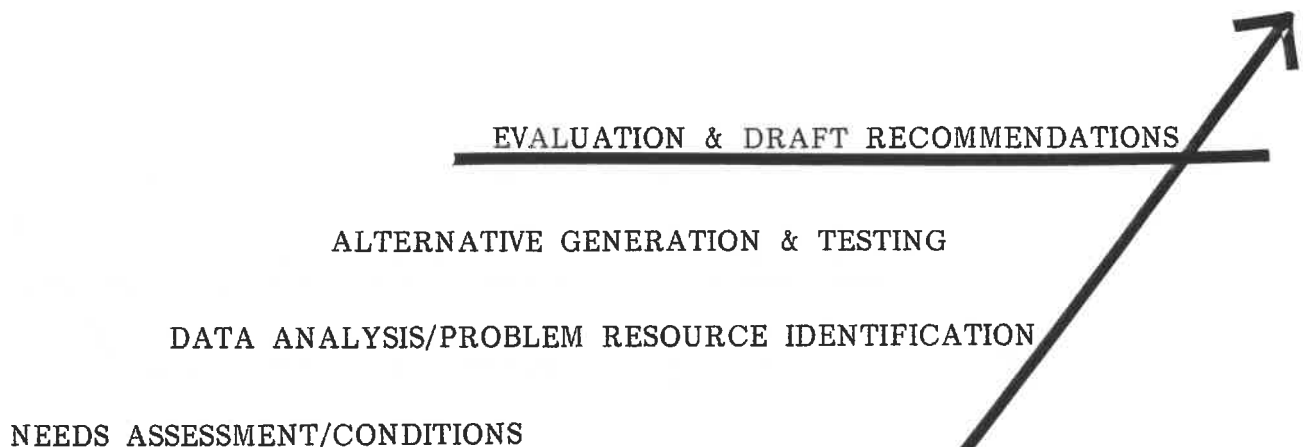
1. Action - Develop evaluation criteria to group highway improvements in priority categories
Lead - Highway Engineering
Asst - City Planning Department
2. Action - Agency and neighborhood review of draft schematic improvements
Lead - Highway Engineering

Evaluate Alternative Land Use Proposals

1. Action - Agency and neighborhood review of land use proposals
Lead - City Planning Department
2. Action - Evaluate response to land use proposals
Lead - City Planning Department

Report

1. Action - Write final draft report
Lead - Highway Engineering
Traffic Engineering (Transit)
Planning Department (Land Use)



NEEDS ASSESSMENT & EXISTING CONDITIONS COLERAIN CORRIDOR STUDY

Preliminary data comes from many sources, both from the neighborhood, as well as from analysis by engineers and planners.

Page 25 in the Recommendations Section includes the results of the Neighborhood Needs Assessment portion of the data collection process. These items were mapped on a large scale for use in meetings and to enable quick recognition of trouble spots and other locations requiring further study.

Traffic and Highway Engineering began their data collection from their own considerable files on the area. Traffic Engineering then undertook a wide range study of traffic conditions within the study area, including accident analysis and traffic counts, developing a current data base, as noted on the flow chart, to bring the files up to date. This effort included the utilization of numerous summer interns and regular staff (during the spring and autumn) monitoring intersections to count vehicle turning movements, and automatic machine counters set up on intersection approaches to obtain twenty-four (24) hour volumes. This information resulted in three (3) large maps of the area which graphically depicted the data. Combined with other operational information, accident report analysis, checks on signal operation, the review of old reports and proposed plans (including Colerain Modified Expressway) the Traffic Engineering and Highway Engineering Divisions produced a substantial data base.

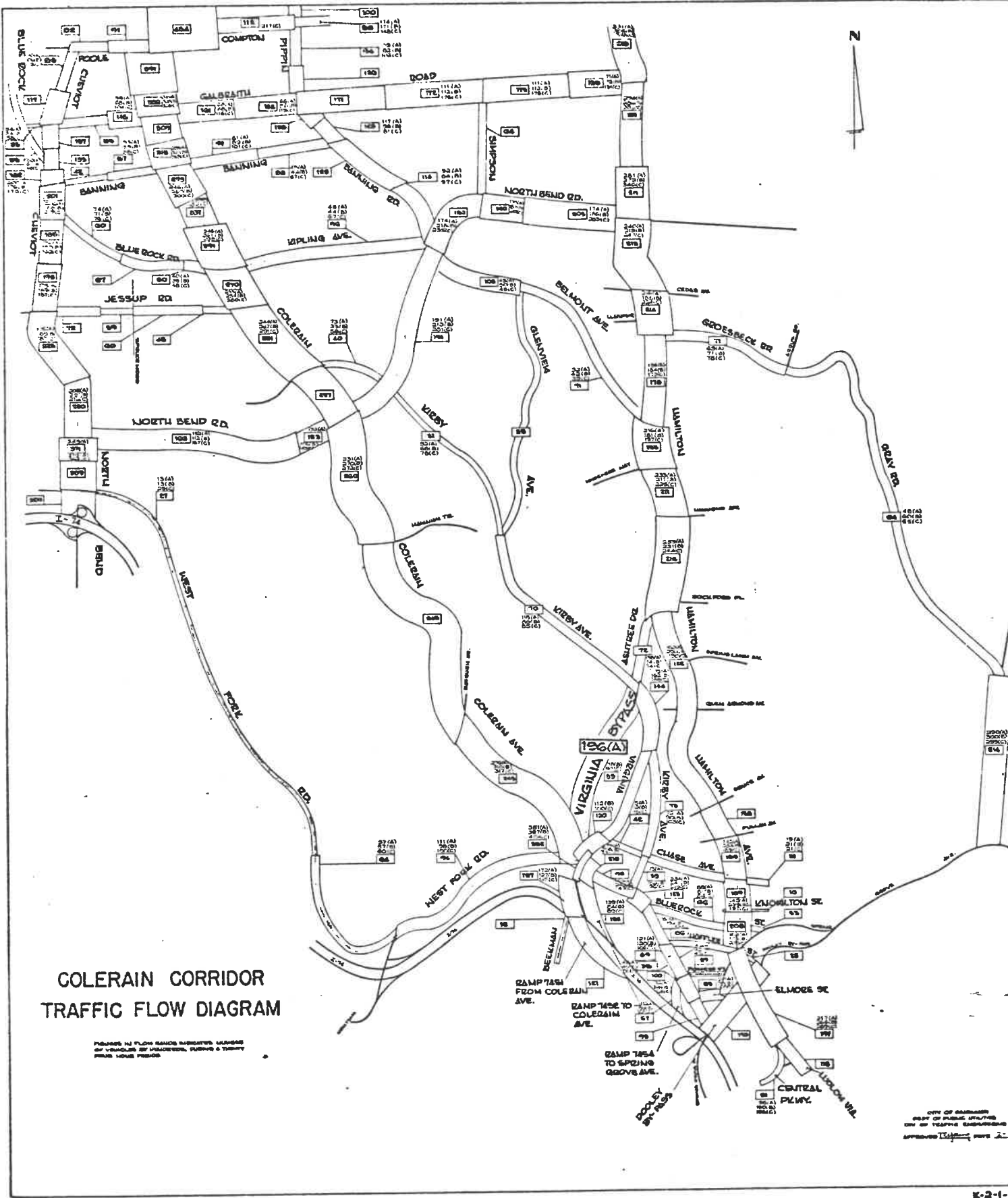
Current data and needs statements catalog existing conditions. Future traffic projections came from the OKI Year 2000 Capacity Restrained Traffic Assignment which used a computer to predict trips between traffic zones (neighborhood sub-areas). Fortunately, OKI was in the process of updating the program and were able to provide the required traffic projections for various proposed improvements, as well as a model which considered no major construction. The system was not without its failings, especially when one attempted to use a program which was developed on a regional basis to determine traffic volumes on a single roadway segment. In addition, since the cross system collectors handle a significant volume of traffic and could be affected dramatically by completion of the Cross-County Highway from Colerain to I-75, the assumption was made that it would become part of the highway network in the 1990's.

Map 2 illustrates the current volumes and projections for roadway construction alternatives discussed in the Alternative Generation Section. Map 3 graphically portrays traffic accident data for the Corridor.

MAP 2

1982 Traffic Volumes and Year 2000 OKI Produced Traffic Projections By
Improvement Alternative

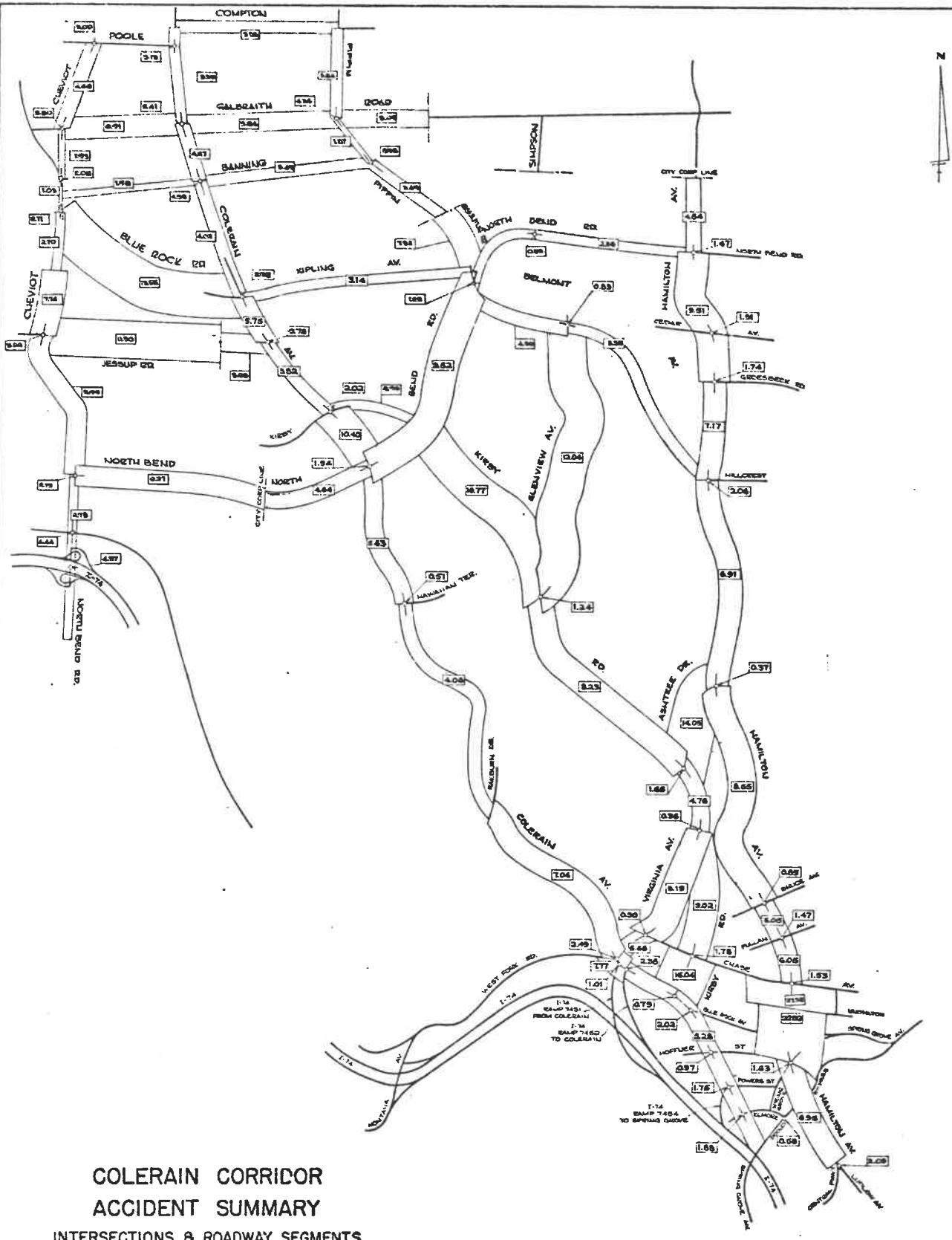
- Key:
- (A) Grade Separation at Colerain/Virginia/West Fork with Virginia By-pass to Kirby
 - (B) Grade Separation only
 - (C) Existing Intersection widened and Interstate connections improved
 - (D) Later alternative. Grade separation plus By-pass and Springlawn Connector



**COLERAIN CORRIDOR
TRAFFIC FLOW DIAGRAM**

FIGURES IN FLOW BARRS INDICATE NUMBER OF VEHICLES BY HOUR, PEAKING AT 4:30 PM TO 6:00 PM

DATE OF SURVEY
NAME OF ENGINEER
APPROVED



COLERAIN CORRIDOR ACCIDENT SUMMARY INTERSECTIONS & ROADWAY SEGMENTS

INTERSECTION
 FIGURES IN BOXES INDICATE NUMBER OF INTERSECTION
 ACCIDENTS PER MILLION VEHICLES

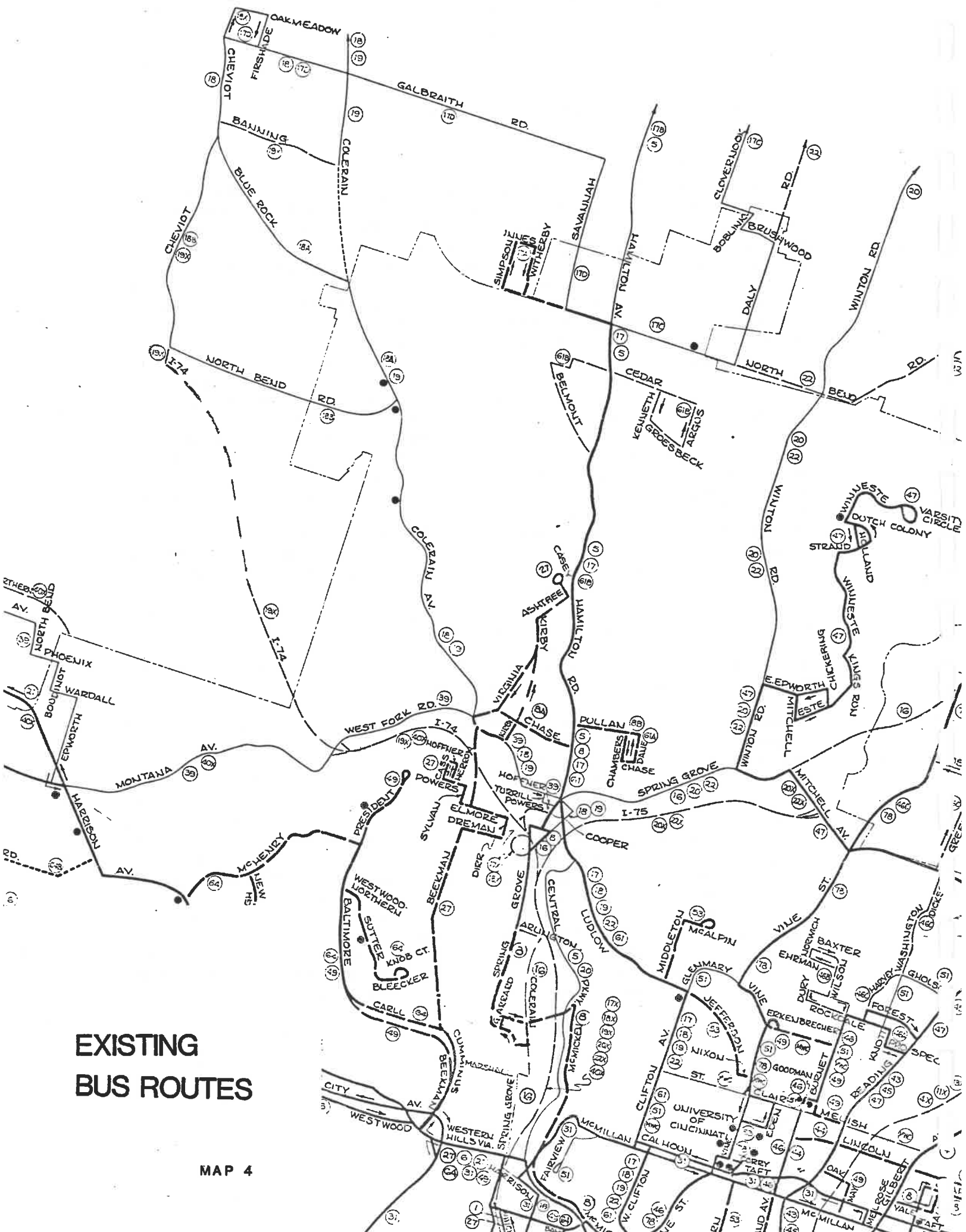
ROADWAY SEGMENT
 FIGURES IN BOXES INDICATE NUMBER OF ACCIDENTS
 PER MILLION VEHICLE MILES

CITY OF CINCINNATI
 DEPT. OF PUBLIC WORKS
 DIV. OF TRAFFIC ENGINEERING
 APPROVED: 11/11/03 DATE: 2-18-04

TRANSIT SYSTEM NEEDS ASSESSMENT COLERAIN CORRIDOR STUDY

The OKI Regional Transportation Plan stated that transit needs in the Study area could be handled by conventional buses operating on the public roadways. The area once had a full complement of trolleys, inter-urban rail and other rail oriented transit, focusing on Hamilton Avenue. This mass transit technology became the preferred method of in-town travel and opened up the Northside and College Hill areas for mass housing development. The system has now been eliminated. Traces have remained, however, such as Knowlton's Corner, one of the principal transfer points for both the former street car system and the present day buses. A private horse riding trail and electrical transmission lines have replaced inter-urban rails on the right-of-way from Northside up the valley along the west side of Spring Grove Cemetery to College Hill. Other aspects of the old transit system in College Hill can be seen in the street layout, including Railroad Street and Llanfair. Early mass transit made a strong imprint on the development patterns and transportation traditions of Northside and College Hill and since many current bus routes were based on extensions of the earlier rail system, it has become much more a part of the fabric of the neighborhoods. The Mt. Airy neighborhood, broadly speaking, grew up dependent on the automobile. It would be hard to convert to public transit without a greater focusing of high/medium density housing near commercial areas on Colerain to create a center of activity with greater ridership. Currently, private cars offer quick access to downtown or other centers of employment. Speed and delay studies of traffic flow on Colerain Avenue demonstrated that present delays were minimal; it took only six to eight minutes from Kipling to I-74 at Virginia, certainly a minimal time compared with some other areas of town. Even express buses require more time, due partly to their routes through Northside. Traffic counts have been stable on Colerain for about five years, which also has tended to reinforce existing patterns.

By accepting the OKI Regional Transportation Plan, this Study assumed that the automobile, augmented by conventional buses would continue to be the predominate mode of transportation in both peak and off-peak periods. According to input received in neighborhood meetings, however, the current transit system could serve the population better. Queen City Metro did begin their own Colerain Corridor Study, but since it was part of a system wide effort consisting of multiple corridors, their timetable was lengthier than the City's Study. To integrate transit into the Colerain Corridor Study, Traffic Engineering, as the lead office on that component, took the information from both Metro's and the City's Colerain Corridor needs assessments and combined them with information from their files and experience, and comments from bus operators, to accomplish the second product goal of the Study: "Transit suggestions for Queen City Metro to support the transportation network in the Colerain Corridor." Traffic Engineering analyzed and formulated the City's proposals, included in the Transit Section of this report for use by Queen City Metro.



**EXISTING
BUS ROUTES**

MAP 4

LAND USE PLANNING: PLAN REVIEW & DATA
COLERAIN CORRIDOR STUDY

The City Planning Department compiled the material to

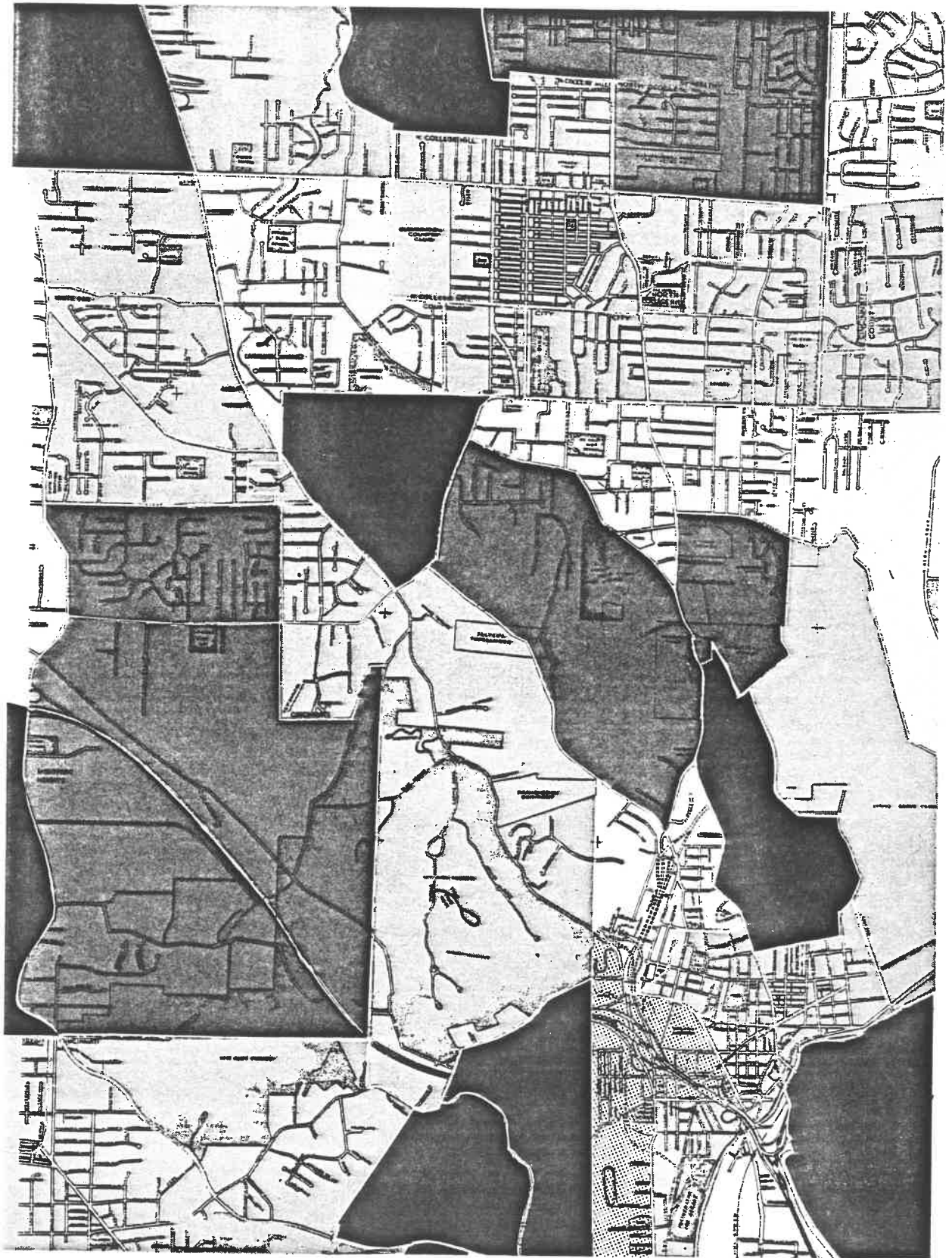
1. Evaluate the potential impact of transportation improvements
2. Determine potential reuse of property in the transportation corridor which was purchased by the City and the State and not used for transportation improvements.

The City Planning work satisfied the third product goal of the Study. In addition their staff produced the all important base maps for the area which Engineering used to map the City and State owned property and for marking up for various presentations.

Evaluation of the OKI population projection figures (a basic factor in developing traffic projections) indicated to the Planning Department that they required some adjustments. After these were completed, the growth areas were checked for the adequacy of the infra-structure system of roadways and utilities. Planning then related those growth areas to the City owned property to see if its development would effect the areas projected growth and transportation requirements. The growth area are shown on Map 4.

The review and compilation of current plans and historical inventories for the area was hampered by incomplete neighborhood plans for Northside and Mt. Airy. Planning had been underway for some time and some preliminary material was available from Neighborhood Housing and Conservation. In addition, meetings with the Park Department, and their participation in the Study helped integrate inter-departmental objectives. The Environmental Quality District Studies for the Virginia Avenue and Kirby Valley hillsides contained most of the needed background. Most of the City owned property in that area was included in EQ-HS 7 and EQ-HS 8 and, the College Hill Business District in EQ-UD 1 because of the high level of public investment in the area's streetscapes. The zoning issues raised in the land use deliberations were made more complex by the need to target potential transportation improvements before disposition planning could proceed. Some small conflicts were found between the zoning sections of the Coordinated City Plan and the land use sections of the EQ-HS documents.

In addition to the population research, land use and zoning investigation work by the Planning Department, Engineering compiled existing conditions studies on storm water facilities and landslides. Summary information from those studies has been included in the site profiles section of the Land Use Recommendations. The preliminary investigations on both subjects are available in the Engineering Division. This study also collaborated with the detailed analysis of the Kipling Road storm water drainage area. The General Engineering Section sought a solution to the problems to protect existing housing as well as to permit further development without contributing to the storm water runoff problem. It was the hope of the Public Works Department that the excess property disposition process would achieve construction of the recommended storm water detention facility.








Colerain Corridor Stud,
Population Projections

O.K.I. Transportation 2000 Plan

Department of City Planning
 Cincinnati, Ohio May, 1983

Projected Change in Households
 by Traffic Zone 1978-2000

-  significant growth +151 & above
-  moderate growth + 51 to +150
-  stable - 50 to + 50
-  moderate decrease - 51 to -150
-  significant decrease 151 & below

Scale in feet 0 1500 3000 4500

PROBLEM AND RESOURCE IDENTIFICATION

Problem identification and resource identification are derivatives of the needs assessment and existing conditions studies. They are also a step closer to solution. For example, discussion of the congestion at Virginia/West Fork/Colerain/I-74 dominated the Needs Assessment discussion in Mt. Airy and Northside. After completion of traffic counts (the data collection phase), studies by Traffic Engineering demonstrated that the needs were quantifiable. They went on to identify the specific capacity problems that combined to create the need for improvement. This type of analysis also helped test solutions and compare them to either existing, or needed, capacity in order to evaluate the proposed improvement during the Evaluation Phase.

Problem identification focused on field checks and desk checks on locations picked out in neighborhood and staff meetings, or mentioned in transportation sections of neighborhood plans and various complaint files. Office work (mostly by Traffic Engineering) included calculating the capacity of key intersections. Not surprisingly, Traffic Engineering's analysis of Virginia/West Fork/Colerain/I-74 demonstrated that the intersection had inadequate capacity in key directions and systematic observation of the intersection confirmed the specific problems.

As stated, research demonstrated that the problems were quantifiable, not just perceived. In an effort to describe the congestion in a manner that would allow comparison at those points, at various times of the day and with other intersections, Traffic Engineering went on to determine the "Level of Service." That factor is a simple one letter statement calculated from a formula which describes traffic density or how "congested" the roadway appears and feels to the driver. It is meant to describe the level of difficulty a driver has in driving through a given intersection or roadway segment, including a time factor. The summaries of resource and problem identification are available from the Engineering Division. Map 5 contains a summary of early work on roadway problem identification.

The information determined from study of Colerain/Virginia/West Fork/I-74 intersection as well as other principal intersections in the area is included as Table 1, Intersection Level of Service. Level "A" is free flow such as on an open Interstate Highway. Level "C", the usual design goal, represents stable flow of traffic and speeds and maneuverability are more closely restricted. Level "D" approaches unstable flow with temporary restrictions. Level "E" volumes are near capacity and flow is unstable. Level "E" is forced flow, low operating speeds with queues forming.

Spot checks on the roadway segment capacity between the critical intersections on Colerain and Hamilton confirmed the visual inspection that indicated that under normal operating conditions, the intersections were the capacity restraints, not the intervening segments.

Also as a part of this section of the Study, the Planning Department used the comments received from neighborhood and staff meetings in their analysis process. In addition, they met with staff from Providence Hospital to discuss their proposed use for the City land fronting on Kipling.

COLERAIN CORRIDOR
INTERSECTION LEVEL OF SERVICE

INTERSECTION	PEAK	Southbound		Northbound		Westbound		Eastbound			
		thru RT	LT	thru RT	LT	thru RT	LT	thru RT	LT		
Colerain and North Bend	AM	E'		A	A	A	E'	A	A		
	PM	E'		E'	A	A	C	A	D		
Colerain and Jessup	AM	B		A	A				A		
	PM	A		E'	C				A		
North Bend and Hamilton	AM	A	A	A	A	A	D	C	A		
	PM	A	E'	B	E'	C	A	A	E'		
Colerain, Virginia and West Fork	AM	E'		A	A	A	E'		E'		
	PM	C		D	E'	B	E'	B	A		
Hamilton and Cedar	AM	A		A	A	A	A	A	A		
	PM	A		A	A	A	A	A	A		
Colerain, Kipling and Blue Rock	AM	B		A	A	A	D		E'		
	PM	D	E	E'	A	E'	E'		E'		
Hamilton, Belmont and Hillcrest	AM	A		A	A	A	A	A	C		
	PM	A		E'	E'	A	A	A	A		
Colerain and Kirby	AM	E		A	A	A	A	A	A		
	PM	B	D	C	C	A	A	A	A		
Kirby Rd. and Ashtree	AM		A			A	A	A	A		
	PM		A			A	A	A	A		
APPROACH											
Hamilton, Hoffner, Spring Grove and Ludlow	AM	Hamilton	E'	Ludlow Via	A	Hoffner	A	Old Ludlow	A	E.B. S.Grove	W.B. S.Grove
					thru RT< Right	E'	thru RT< E' C	A	thru RT< E' Left	thru &RT A Left	thru &RT A E'
Hamilton, Hoffner, Spring Grove and Ludlow	PM	Hamilton	A	Ludlow Via	E'	Hoffner	A	Old Ludlow	A	E.B. S.Grove	W.B. S.Grove
							A	thru RT< E' Left	thru RT< E' Left	thru &RT A Left	thru &RT A E'

ALTERNATIVE GENERATION COLERAIN CORRIDOR STUDY

After analyzing neighborhood requests and plans, researching departmental files, and completing problem identification, the Highway and Traffic Engineering Divisions developed a schematic improvement plan for each problem location. Because of the controversy surrounding the study of the Colerain Avenue/Virginia Avenue/I-74 intersection and the direct connection to Kirby and Hamilton, they developed three alternative sketch plans for that area. The options ranged from minimal to major construction and thus offered varying balances between traffic handling and environmental impact. They included (C), an on-grade minimal improvement; (B), a plan providing elevated connections between I-74 and Colerain; and (A), a plan which added a Virginia Bypass, also directly connected to I-74. Later, a fourth alternative (D) was added which extended the Virginia Bypass to Hamilton at Springlawn. Copies of these schematics are included as Maps 6,7,8,9.

Both Plans (A) and (D) were similar to the plans which were developed early in the Seventies with two major exceptions. First, the Bypass on both new proposals was projected as a limited access city street (35 M.P.H.) rather than an expressway. Secondly, both schemes also maintained existing Virginia Avenue, not a feature of the previous plans. Plan (B) was devised in an attempt to remedy the primary bottleneck while eliminating the connection to Kirby and Hamilton. Plans (A), (B), and (D) called for a widening of Colerain Avenue from Leeper to Kipling to handle the anticipated Year 2000 traffic volumes. Plan "C" was derived from meetings with the Northside neighborhood committee. All plans called for improvement to Kirby between Virginia and the previous Ashtree improvement.

In addition to the main alternatives focusing on the connection below the top edge of the hillside, the two Engineering sections also suggested a number of other proposals to balance the roadway network and the transit system. The transit system is covered in its own section of this Study. A group of roadway improvements were common to all four major alternatives:

1. Left turn lanes at North Bend/Colerain
2. Left turn lanes at Kipling/Blue Rock/Colerain
3. Kipling Improvement
4. Banning Improvement
5. Belmont Improvement
6. Groesbeck Improvement
7. Turn lanes at Llanfair and Hamilton
8. Savannah at North Bend Corner Rounding
9. Knowlton's Corner One-way street system.

These improvements were of the accept or reject nature. The Study considered them as base level improvements.

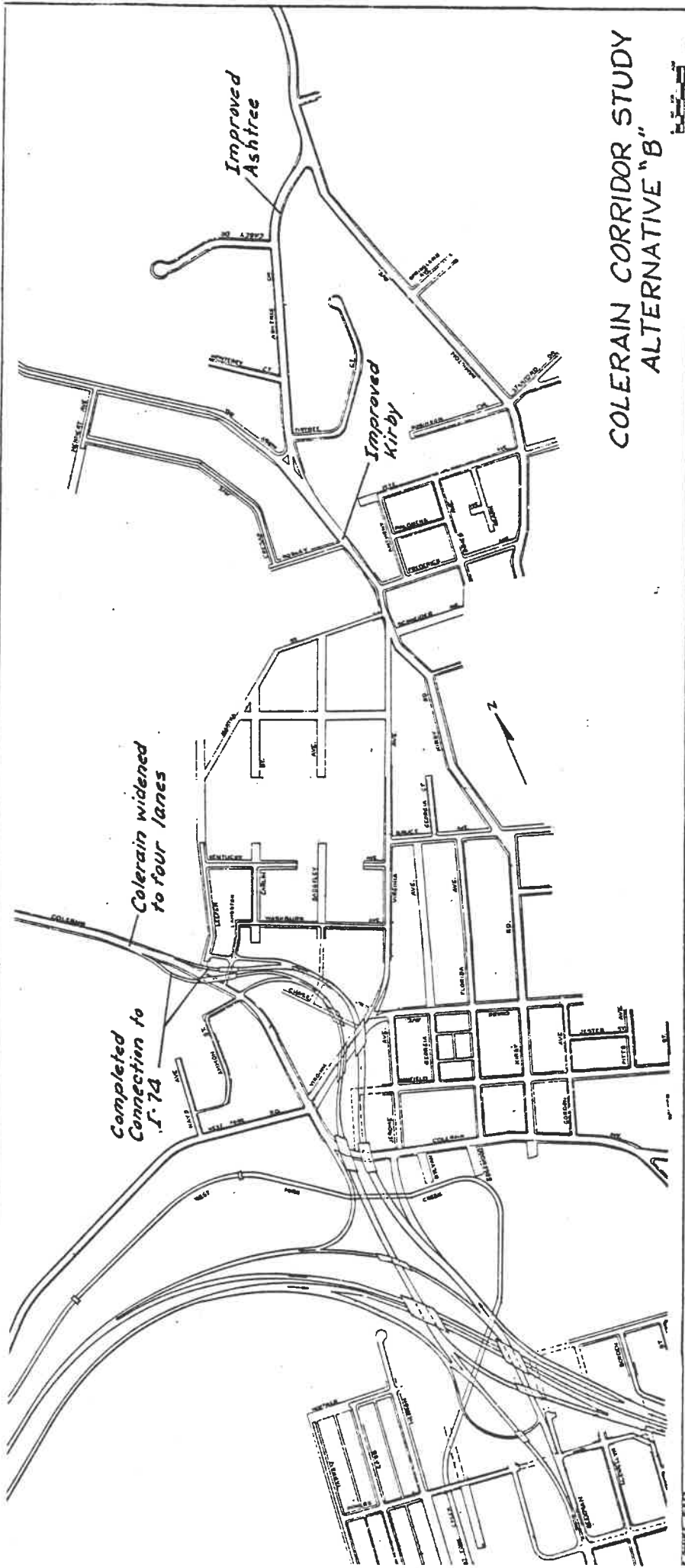
After a series of meetings, the neighborhoods commented on the concept plans. Engineering then separated each scheme into component parts to aid in the

evaluation phase and to see if any further combinations of those components were possible. The list of component improvements included large scale improvements, intersections which could be improved, and operational improvements to the signal and signing systems which could theoretically be implemented without major roadway improvements. A list of the component improvements has been included as Table 2. (Schematic plans for each are available from the Engineering Division.)

To aid in the discussions on land use, the Planning Department developed alternative land use proposals for the alternative roadway improvement plans. They broke the study area into sub-sections corresponding to the surplus property that would be available for the four levels of improvements, as well as re-use potential.

After the three major alternatives were developed, OKI worked up the input necessary to obtain approximate traffic projection for each from their Regional Model. Although the Model does not, strictly speaking, provide information accurate to the individual street level, it indicates an order of magnitude on which to judge the proposed improvements. That information has been plotted on Map 2 against the 1982 base data and was included in the previous "Data Collection" Section.

Once Engineering and Planning developed the necessary maps and narratives, they took them back to the Coordinating Committee and the neighborhood meetings. Northside carried an article in their neighborhood newspaper and reproduced the initial versions of the three major alternatives as well as transit proposals. Their broad based committee chaired by a neutral convener, met monthly and analyzed both transportation and land use. They made recommendations to the Community Council who in turn voted on them and sent them on to Engineering. College Hill used their existing Transportation and Real Estate committees to formulate recommendations, subsequently passed by the College Hill Forum. Mt. Airy's Transportation and Land Use Committees also met monthly and forwarded recommendations to the Mt. Airy Town Council who in turn voted on them. The neighborhood meetings brought some changes by all parties involved from the initial needs assessment and problem identification sessions. Also, the meetings gathered a considerable amount of information which will be of use to the future design work.



**COLERAIN CORRIDOR STUDY
ALTERNATIVE "B"**



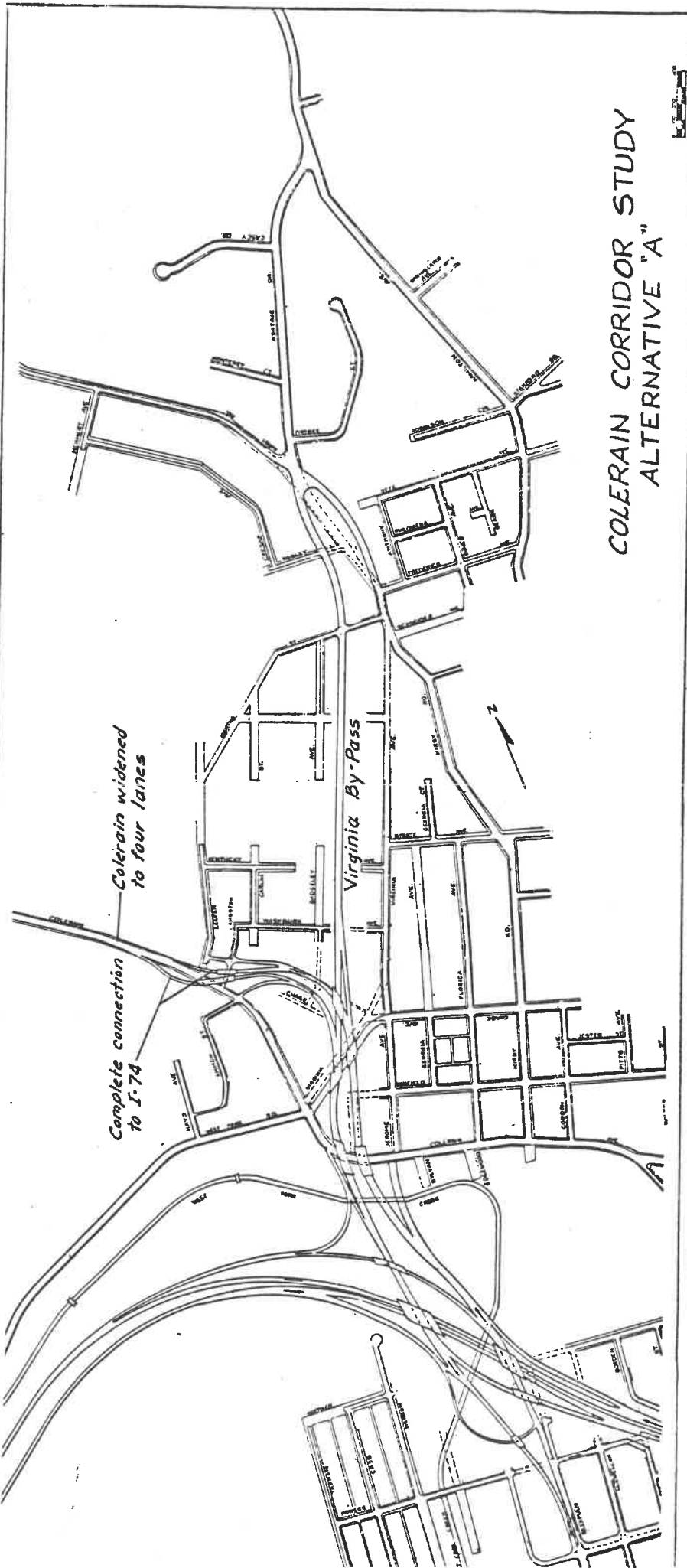
*Colerain widened
to four lanes*

*Completed
Connection to
I-74*

*Improved
Ashtree*

*Improved
Kirby*





COLERAIN CORRIDOR STUDY
ALTERNATIVE "A"

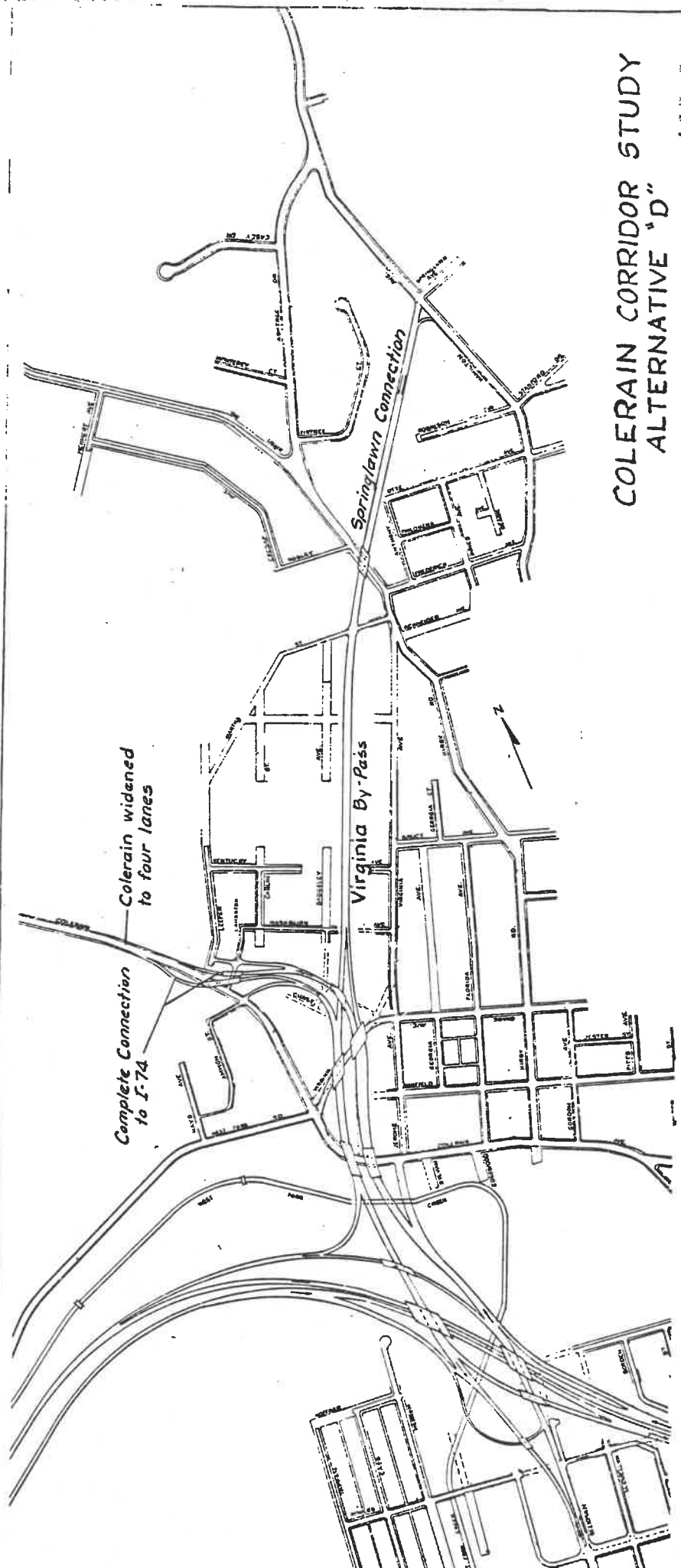


Colerain widened to four lanes

Complete connection to I-74

Virginia By-Pass





**COLERAIN CORRIDOR STUDY
ALTERNATIVE "D"**

DATE: 11/15/88

COMPONENT IMPROVEMENTS
COLERAIN CORRIDOR STUDY

Large Scale Improvements Considered

Grade Separation at Colerain and Virginia and I-74
At Grade Improvement Colerain/Virginia/I-74
Virginia Avenue Curve North of Chase
Virginia Bypass
Four Lane Improvement to Colerain (Virginia to North Bend)
Four Lane Improvement to Colerain (North Bend to Kipling/Blue Rock)
Kirby Between Virginia and Ashtree (Four Lanes & alignment review)
Kirby and Glenview (Two Lanes)
Ashtree (Four Lanes)
Springlawn Connector
Knowlton's Corner #8 Transit Alternative
(Spring Grove One Way System, Blue Rock Widening)
Hamilton Avenue Curves (Glen Parker to Springlawn, Rockford, near Hammond
North)
Kipling (Colerain to North Bend)
Banning Improvement (Kipling to City Limits)
Belmont (Oakwood to North Bend)
Grosbeck (Hamilton to Kiefer)
North Bend (At East Knoll and West of Hamilton to Betts)

Intersections Considered As Separate Alternatives

Colerain/Virginia/W. Fork
Colerain/N. Bend
Colerain/Kipling/Blue Rock
Blue Rock/Hamilton
Ashtree/Hamilton
Belmont/Hamilton
Grosbeck/Hamilton
Llanfair/Hamilton
Savannah/N. Bend
Belmont/Glenview/Oakwood
Casey Cul-de-Sac

Operational Improvements Considered

Three Lane Marking to Colerain, Leeper to N. Bend and N. Bend to Kipling
One Way System Virginia/Kirby
R/W Control Kirby/Virginia Intersection

PROJECT EVALUATION CRITERIA

COLERAIN CORRIDOR STUDY

Transportation

1. Relieve Congestion
2. Improve safety
3. Simplify traffic network
4. Improve Interstate access
5. Focus traffic on arteries
6. Maintain local property access
7. Maintain overall accessibility
8. Reduce roadway maintenance
9. Minimize capital cost
10. Funding feasibility
11. Enhance transit operation
12. Improve parking opportunities

Environmental Concerns

1. Preserve park space
2. Stabilize noise pollution
3. Enhance air quality & energy savings
4. Improve storm water control
5. Maintain tree cover
6. Limit visual intrusion
7. Enhance hillside stability

Neighborhood Concerns

1. Minimize housing displacement
2. Minimize business displacement
3. Stabilize neighborhood patterns & real estate values
4. Minimize physical barriers
5. Improve access to neighborhood business
6. Compatibility with neighborhood development programs
7. College Hill recommended
8. Mt. Airy recommended
9. Northside recommended

FINAL EVALUATION COLERAIN CORRIDOR STUDY

Evaluation commenced with the summarization of the problems, and resources available, for each of the component proposed roadway improvements on Table 2. That list was distributed to the Coordinating Committee and is still available from the Engineering Division. The information on those sheets came from every portion of the Study process. It was in turn used to accomplish the Project Evaluation of each of the component improvements. The criteria for the evaluation came from the existing plan review by the Planning Department, draft neighborhood plans, neighborhood meetings, Coordinating Committee meetings, and criteria discussed during the original Colerain Corridor Study start-up period. The criteria are listed in Table 3. Completed forms for each component improvement are filed in Highway Engineering. Although the rating system was subjective, and did not give a numerical score to the individual component improvements, it enabled comparison of projects on each criteria.

Copies of the recommendations and evaluations went to all groups on the Coordinating Committee for review. Table 4 lists the contents of that mailing. Another series of neighborhood and agency reviews followed distribution of the material. Engineering received the comments and incorporated them into the final recommendations. Representatives from Highway Engineering, Traffic Engineering and Planning Department attended neighborhood meetings where recommendations were formulated as noted previously on Page 4.

CONTENTS OF MAILING FOR EVALUATION PHASE

COLERAIN CORRIDOR STUDY

Pack #1

A. Draft Recommended Traffic Systems

This proposal followed the major traffic routes, both North/South and East/West, and included the roadway segment or intersection improvement priority category.

B. Colerain Corridor Study Priority Categories

Explanation of Priority Categories.

C. Improvements for Evaluation

Numbers refer to individual maps which follow in Pack #2. The categories are those from the sheet above. If the project is marked "Category I (Design)", then funding will be sought for only that aspect at this time. The design process will include neighborhood participation and use of necessary consulting assistance.

D. Problem and Resource Identification Revised draft of improvement being evaluated.

Pack #2 Sketch Maps of Proposed Improvements

Thirty-one 8 1/2 x 14" maps.

Pack #3 Project Evaluation Sheets

Evaluation of each improvement on the sketch maps.

Pack #4 Transit Proposals

Narrative description of proposals.

Pack #5 Transit Proposal Maps

Pack #6 Land Use Study and Recommendations

RECOMMENDED STREET IMPROVEMENTS & FINANCING
COLERAIN CORRIDOR STUDY

This section detailed the results formulated to satisfy the first product goal of the Study: "Identify transportation improvements required in the area to handle Year 2000 traffic." The location of the improvements have been marked on Map 10. The project categories have been explained on Table 5. Since the Study assumed that the Colerain Modified Expressway would not be built, it was necessary to improve the existing roadway network. The Engineering Division considered the network to be a series of North/South and East/West traffic systems and through this Study identified improvements to their weak links. Those recommended systems are listed on pages 18-23 along with the agency responsible and a completion goal. Not every improvement had a total consensus at the end of the Study process. That information is also listed. Following, page 24 listed the improvements as the neighborhoods requested them and the outcome of each.

A final decision has still not been made on the form of the improvement at the Colerain/West Fork/Virginia/I-74 intersection, clearly the most crucial in the Study area. However, some issues were resolved. The Virginia Bypass does join the Colerain Modified Expressway as a Category IV, Rejected Project. The projected benefits gained by construction of that facility failed to balance out the direct and indirect costs of the undertaking due to the site conditions, potential difficulty with Federal environmental regulations, and a potential undesirable focusing of traffic onto an already overloaded section of Interstate Highway. The issues were not as clear at Colerain/Virginia, however. Landslide analysis determined no slope stability problems. Also, the traffic projections indicated that Colerain Avenue, without a relief road will gain 15% - 20% more traffic by the year 2000, although it had experienced no growth since 1977. The intersection is already carrying over its capacity during peak hours, indicating that a direct connection between Colerain/I-74 would apparently be required to keep a minimal level of service, and to increase the portion of the signal timing devoted to Virginia Avenue.

Financing of the recommended improvements can be undertaken by a number of mechanisms. The regulations and monies available vary from year to year, but principal funds available, and some of the problems connected with their use include:

1. City Capital Improvement Funds - Limited availability for 100% financing but useful for City's portion of project costs.
2. City allocation of Community Development Funds - Limited area of eligibility, only a small portion of Northside east of Hamilton and south of Pullan.
3. Municipal Road Fund - Administered by County. Currently a useful source of funds for smaller improvements or useful for match money for City's portion of project costs.
4. Federal Interstate, Primary and Urban Systems Funds - Proposed improvement must be a part of the OKI T.I.P., (Transportation Improvement Plan) and matching monies available if standards are met. Recommended improvements from this Study will be considered for funds.

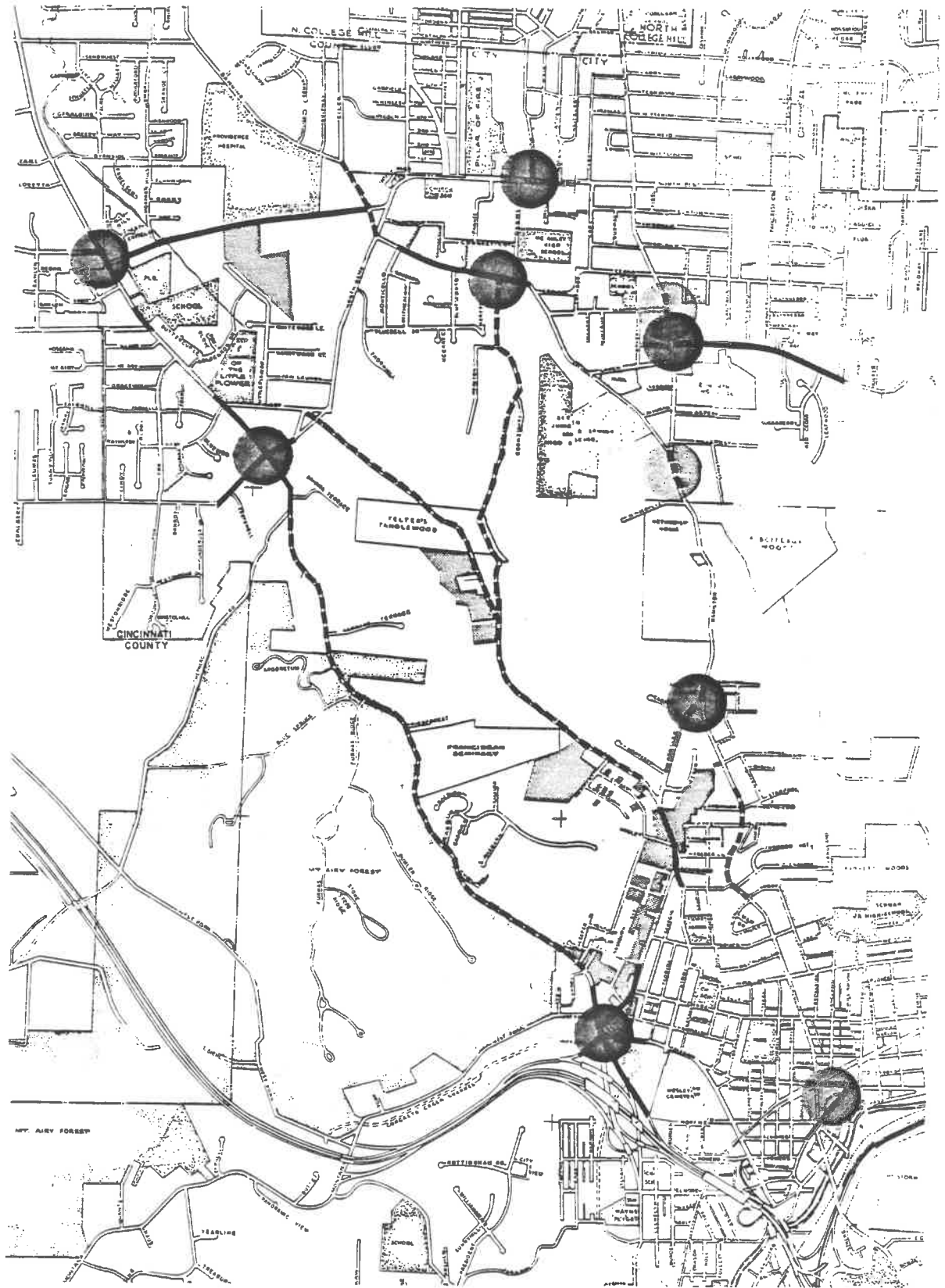
5. Special Federal grants - highly competitive. Funds have been requested for two projects.
6. Monies from sale of surplus property - could become resource for project funding but dollar amount unknown and would require approval of County.
7. Remaining 1964 Bond Issue funds - approximately \$110,000 remain. Use will require approval of County.

COLERAIN CORRIDOR STUDY
STREET IMPROVEMENT CATEGORIES

Category	Description
I.	Recommended improvements - Public Works will actively pursue funding for design and construction.
II.	Recommended improvements (Held) - not rejected, schematic design may be considered to allow pursuit of funding if needs change.
III.	Projects removed from consideration - Projects better dealt with by other means.
IV.	Projects rejected.

LAND DISPOSITION CATEGORIES

Category	Description
I.	Land for Category I project will be reserved for transportation uses.
II.	Land for Category II projects will be reserved for transportation or open space.
III.	There should be no Category III land.
IV.	Land for Category IV projects, as well as any other land purchased for the Colerain Modified Expressway and connecting roadways not covered by Categories I or II, should be designated for disposal to private ownership or another appropriate public entity.



Colerain Corridor Study
Proposed
Highway Improvements

Department of Public Works
 Cincinnati, Ohio May, 1983

Category I
 ● Intersection
 — Segment

Category II
 ○ Intersection
 - - - Segment



0 1000 2000 3000
 Scale in feet

RECOMMENDED TRAFFIC SYSTEMS
COLERAIN CORRIDOR STUDY

I. North - South Transportation Routes

A. Colerain Avenue

1. Colerain/Virginia/West Fork/I-74: Category I Design Feasibility Only
 - a. Preferred alternative: Some form of grade separation.
 - b. Action: Highway Engineering begin intensive study to resolve environmental and grade problems and neighborhood concerns to identify improvement. Hold land to Washburn for transportation.
 - c. Completion Goal: Fall 1984 (Study)
 - d. Estimated Cost: \$10,000
 - e. Potential Conflict - Northside opposes any new overpasses.
2. Colerain, Virginia to North Bend: Category II Improvement.
 - a. Preferred alternative: Four lane improvement with turn lanes.
 - b. Action: Highway & Traffic continue work to identify possible minimum impact future improvement & interim measures.
 - c. Potential Conflict - Mt. Airy opposes widening past existing sidewalks.
3. Colerain/North Bend: Category I Improvement.
 - a. Preferred alternative: Add left turn storage and improve from north of Kirby to Shepherd on Colerain, and East Knoll to Kirby on North Bend.
 - b. Action: Highway Engineering pursue funding for final design for roadway. Neighborhood Housing & Conservation pursue streetscape in business district, consolidation of parking lots and driveways.
 - c. Completion Goal: To be set soon as funding is approved.
 - d. Estimated Cost - \$500,000
 - e. No opposition.

4. Colerain, Kirby to Kipling/Blue Rock Widening: Category IV Dropped

- a. Preferred alternative: Major improvement dropped. See Colerain, Kipling, Blue Rock Intersection.
- b. Action: Improvement dropped unless requested by neighborhood. At that point localized turn storage lanes and other action should be utilized before widening entire section.

5. Colerain/Kipling/Blue Rock Intersection: Category I Improvement.

- a. Preferred alternative: Project funded. Consider adding school bus turnaround at Mt. Airy School as shown in old plan or connect Play Field Drive to school parking lot.
- b. Action: Highway Engineering complete design, review with neighborhood and build improvement.
- c. Completion Goal: Finish Construction by Fall 1985
- d. Funding: Included in County's 1983 Municipal Road Fund Program. Estimated Cost - \$200,000
- e. No opposition.

B. Kirby Avenue

1. Kirby, Virginia to Ashtree: Category I Improvement.

- a. Preferred alternative: Extend present four lane improvement to Virginia, with some consideration given to easing curve at Glenparker. Install signal at Virginia/Kirby.
- b. Action: Highway Engineering pursue funding for design. Interim improvement may include traffic signal at Virginia by Traffic Engineering.
- c. Completion Goal: Dependent on Funding
- d. Estimated Cost - \$250,000
- e. No opposition. Northside wants signal at Virginia/Kirby as interim improvement.

2. Kirby/Glenview, Ashtree to North Bend/Belmont: Category II improvement.

- a. Preferred alternative: Reconstruct as four lanes with walks from Ashtree to Mehmert and two lanes with walk to North Bend. Consider new intersection with North Bend.
- b. Action: Hold. Slope failures may raise priority at a later time. Interim improvement might include installation of guard rail in critical locations by Highway Maintenance. See also Belmont Avenue.

C. Hamilton Avenue

1. Knowlton's Corner: Category I Improvement.

- a. Preferred alternative: Install two Phase traffic signal by making Spring Grove one way away from the intersection, to Blue Rock on the northeast and Cooper on the southwest. Install traffic signal at Spring Grove/Blue Rock.
- b. Action: Traffic Engineering take preferred alternative and other two phase alternatives for one way streets.
- c. Completion Goal: Summer 1985.
- d. Estimated Cost - \$75,000
- e. Partial Opposition - Northside opposes one-way south bound Spring Grove.

2. Hamilton Avenue Curves: Category II Improvement.

- a. Preferred alternative: Construct corner roundings as funds become available. Priority may rise at later time on individual alternatives.
- b. Action: Hold. Structures Office, Engineering Division already monitors slide at Frederick.

3. Hamilton/Ashtree Intersection: Category I Improvement.

- a. Preferred alternative: Add right turn storage to south bound Hamilton Avenue. Add corner rounding at Rockford to remedy poor transition in pavement width.
- b. Action: Highway Engineering pursue funding for design study.
- c. Completion Goal: To be set when funded.
- d. Estimated Cost of Improvement - \$100,000
- e. No opposition

4. Hamilton/Belmont Intersection: Category II Improvement.

- a. Preferred alternative: Add left turn storage on north bound Hamilton.
- b. Action: Hold.

5. Hamilton/Groesbeck Intersection: Category I Design Study.
 - a. Preferred alternative: Add left turn storage on both Hamilton and Groesbeck.
 - b. Action: Continue current design feasibility study. (See Groesbeck Rd.)
 - c. Completion Goal: Study completion by Fall 1983
 - d. Funding: Study funded. No money for implementation at this time.
 - e. No opposition

6. Llanfair/Hamilton Intersection: Category II Improvement.
 - a. Preferred alternative: Add left turn storage north bound
 - b. Action: Hold until Neighborhood Housing and Conservation proceeds on proposed improvement to northwest corner. Roadway improvement should be included in that project.

D. North Bend Road

1. North Bend/Hamilton Intersection: Category II Improvement.
 - a. Preferred alternative: Modify traffic signal.
 - b. Action: Hold until traffic volumes increase or balance of intersection left turn movements changes.
2. Savannah at North Bend: Category I Improvement.
 - a. Preferred alternative: Corner Rounding.
 - b. Action: Begin design study and seek funds for early construction.
 - c. Completion Goal: Study completed by Spring 1984.
 - d. Funding: Design study from existing funds
 - e. No opposition

II. East - West. Cross System Connectors.

- A. Blue Rock, Colerain to Spring Grove: Category II Improvement.
 1. Preferred alternative: Widen critical sections if operational problems occur in one way system for Spring Grove.
 2. Action: Hold.

- B. Virginia, Colerain to Kirby: Category I Improvement.
1. Preferred alternative: Widen from Colerain to north of Chase. Increase radius of curve north of Chase and align Virginia with West Fork or Colerain, depending on results of design study for Colerain/Virginia/West Fork/I-74 intersection.
 2. Action: Include in design study as mentioned above.
 3. Completion Goal: Fall 1984 (Study)
 4. Estimated Cost - \$10,000 (Design Study)
 5. No opposition
- C. Virginia Bypass & Springlawn Connector: Category IV
1. Preferred Alternative: Drop
 2. Action: Dispose of surplus right-of-way.
- D. Ashtree, Monterey to Hamilton: Category II improvement.
1. Preferred alternative: Widen to four lanes, continuing improvement from Monterey, including gutters, curbs, and walks.
 2. Action: Hold.
- E. Kipling, Colerain to Banning: Category I Improvement.
1. Preferred alternative: Design as developed by neighborhood and Engineering Division.
 2. Action: Actively pursue funding for design and construction of both phases.
 3. Completion Goal: First phase 1986 if funding approved.
 4. Estimated Cost - First phase - \$1,225,000, second phase - \$850,000
 5. No opposition
- F. Belmont, Monticello to Oakwood: Category I Improvement.
1. Preferred alternative: Plan as developed by neighborhood and Engineering division.
 2. Action: Pursue funding of design.

3. Completion Goal: 1988
4. Estimated Cost - \$930,000
5. No opposition

G. Banning Road: Category II Improvement.

1. Preferred alternative: Design study.
2. Action: Hold until Hamilton County raises priority. Intersection with Kipling may be improved with Kipling.

H. Groesbeck Road, Hamilton to Argus: Category I Improvement.

1. Preferred alternative: Two lanes with walk.
2. Action: Pursue design feasibility study currently underway.
3. Completion Goal: Study by late 1983
4. Funding: Design study funded. (Construction could possibly be funded by Federal Urban Systems money.)
5. No opposition

SUMMARY
NEIGHBORHOOD REQUESTS
COLERAIN CORRIDOR STUDY

REQUEST	NEIGHBORHOOD	PROJECT CATEGORY (ACTION)
1. Install double left turn from Virginia to Colerain with one lane for I-74 access only	College Hill, Mt. Airy, Northside	CAT I (Design)
2. Complete westbound ramp from Colerain/West Fork to I-74	Northside, Mt. Airy, College Hill	CAT I (Design)
3. Round out angle on Virginia near Chase	Northside	CAT I (Design)
4. Widen Colerain northbound, south of Virginia to assist turns onto Virginia	Northside, College Hill	CAT I (Design)
5. Develop off-street parking, on lots or access roads for homes or businesses at Colerain/Virginia/West Fork & eliminate on-street parking for those served	Northside, College Hill Mt. Airy	CAT I (Design)
6. Study Virginia/Kirby/Hamilton connection to I-74	Mt. Airy (Conflict College Hill, Northside)	CAT IV (Dropped)
7. Connect I-74 directly to Colerain north of Virginia	Mt. Airy (Conflict College Hill, Northside)	CAT I (Design)
8. Redefine Colerain as three lanes from Leeper to North Bend with added turn lanes, where necessary, to allow 2-lanes up and one lane down	Mt. Airy, Northside	CAT II (Hold)
9. Add left turn lanes at North Bend and Colerain	Mt. Airy	CAT I (Build)
10. Add left turn lanes at Kipling/ Blue Rock/Colerain	Mt. Airy	CAT I (Build)
11. Improve Kipling according to approved design concept	Mt. Airy	CAT I (Build)

12.	Improve Belmont according to approved design concept	College Hill	CAT I (Build)
13.	Improve Kirby/Virginia intersection, including traffic signal	Mt. Airy, College Hill	CAT I (Build)
14.	Maintain or rebuild Kirby as two lane roadway	Northside, College Hill	CAT II (Hold)
15.	Construct parkway by-pass around Mt. Airy through Kirby Valley	Mt. Airy (Conflict Northside College Hill)	CAT IV (Dropped)
16.	Improve Glenview & Kirby intersection	Northside, College Hill, Mt. Airy	CAT II (Hold)
17.	Improve Glenview as a 2 lane roadway	College Hill	CAT II (Hold)
18.	Improve Knowlton's Corner per Knowlton's Corner Study	Queen City Metro (Possible conflict Northside)	CAT I (Build)
19.	Where possible add left turn lanes on Hamilton, north of Cedar	College Hill	CAT II (Hold)
20.	Improve Groesbeck Rd., two lanes with walks	College Hill	CAT I (Design)
21.	Add left turn arrows at North Bend/Hamilton	College Hill	CAT II (Hold)
22.	Increase radius of corner of Savannah & North Bend	Queen City Metro	CAT I (Build)
23.	Improve roadways in County to move cars to I-75 and I-74 before they reach Mt. Airy	Northside, Mt. Airy, College Hill	N.A. (outside study area)

TRANSIT STUDY
COLERAIN CORRIDOR STUDY

As stated in the earlier section, "Transit System Need Assessment," Traffic Engineering formulated a series of transit recommendations for use by Queen City Metro. This section states the suggested changes in the following outline format:

- I. Summary of recommendations
- II. Details of the above recommendations
- III. Sources of the requests for the recommendation.
- IV. Proposals for routes outside City Corporation Limits.

COLERAIN CORRIDOR STUDY

- I. LIST OF PROPOSALS TO IMPROVE TRANSPORTATION EFFICIENCY BY IMPROVING ATTRACTIVENESS AND EFFICIENCY OF TRANSIT SERVICE.
 - A. Reduce travel time for route 18X expressway service to and from Mt. Airy. The proposal also involves changes for routes 61 and 8.
 - B. Implement Knowlton's Corner Transit Alternatives plan 8, modified, to reduce routes 18 and 19 off-peak travel time, remove express buses from Powers Street, and reduce pedestrian and vehicle crossing delays at Hamilton Avenue traffic signals between Knowlton's Corner and Bruce Street, thereby improving safety. The plan also involves routes 8, 16, 17X, 20, 22, and 61.
 - C. Improve Knowlton's Corner bus access to Millvale and to Virginia-Ash-tree areas, via bus route 27.
 - D. Improve Northside and Westwood access to University and hospitals area, via bus route 39.
 - E. Increase usage of under-utilized route 16 buses, by combining with routes 8 and 27.
 - F. Improve bus service on Colerain between Mt. Airy and Northgate.
 - G. Provide bus service between Mt. Airy and Providence Hospital, using route 18BRX, Blue Rock.
 - H. Provide Sunday bus service to Mt. Airy, if funds become available.
 - J. Provide route 17 bus service to Belmont-Oakwood area of College Hill, and to Providence Hospital from College Hill, if funded.
 - K. Provide all-day route 17 bus service to Argus-Groesbeck Road area of College Hill.
 - L. Provide bus service from Hamilton Avenue via Mt. Healthy to Northgate Shopping Center. This involves routes 17N, E. Northbrook and 19N, W. Northbrook.
 - M. Provide bus service to Skyline Acres subdivision. This involves route 17GX, Groesbeck.
 - N. Provide off-peak bus service to Seven Hills. This may involve route 5, 17, or 19, if funds permit.
 - P. Provide Sunday bus service on Hamilton Avenue north of North Bend Road. This involves route 17N, if funds permit.
 - Q. Coordinate the scheduling of routes 5, 17, 18, 19, and 61 through Knowlton's Corner, Northside, Mt. Airy, and College Hill, as well as through Clifton.

COLERAIN CORRIDOR STUDY

- II. DETAILS OF PROPOSALS TO IMPROVE TRANSPORTATION EFFICIENCY BY IMPROVING ATTRACTIVENESS AND EFFICIENCY OF TRANSIT SERVICE.
- A. Reduce travel time for route 18X expressway service to and from Mt. Airy.
1. Relocate route 18X express buses via I-74 and the Colerain-Virginia interchange, instead of Knowlton's Corner.
 2. Relocate route 61 Clifton-Pullan buses to a loop which passes through Colerain interchange area at Virginia, instead of Pullan Avenue. Change destination sign and route number to read
" 18 Colerain via
Virginia Clif- ".
ton
 3. Build a transfer facility for transferring between the above express and local buses, without having to change bus stops. The transfer facility might include shelters from wind and rain, pull-out lanes for the buses, and possibly, if needed, special bus ramps for freeway access.
 4. Relocate peak-period buses of route 8 Colerain-Chase from Chase Avenue to Pullan Avenue.
- B. Implement Knowlton's Corner Transit Alternatives plan 8, modified as described below, to reduce routes 18 and 19 off-peak travel time, remove express buses from Powers Street, and reduce pedestrian and vehicle crossing delays at Hamilton Avenue traffic signals between Knowlton's Corner and Bruce Street, thereby improving safety.
1. Reroute southbound off-peak buses of routes 18, 19, and proposed 18/61 Colerain-Virginia buses via Colerain, Blue Rock Avenue, and Hamilton to Ludlow Viaduct.
 2. Reroute northbound off-peak buses of routes 18, 19, and proposed 18/61 Colerain-Virginia buses via Ludlow Viaduct, Spring Grove, Blue Rock Avenue, and Colerain. This revision of the alternative plan 8 is recommended to avoid a potentially confusing and hazardous left turn from the Ludlow Viaduct into Hoffner Street. This turn is now prohibited.
 3. Relocate all route 17X northbound expressway buses from the I-74 ramp at Powers Street via Colerain and Hoffner to Hamilton Avenue, avoiding residential property on Powers Street.
 4. Relocate all route 8 and 16 northbound buses via Spring Grove, Elmore, Spring Grove, Cooper, Apple, and Hoffner to Knowlton's Corner, to retain two-way bus service at the Health Center on Spring Grove.
 5. Relocate southbound routes 16, 20, and 22 buses from Spring Grove and Blue Rock Avenue via Blue Rock Avenue and Hamilton Avenue to Knowlton's Corner.

6. No change is proposed for southbound bus routes 8, 17, and 17X, or for northbound off-peak routes 17, 20, and 22.
 7. Related traffic control improvements:
 - a. Install one-way traffic flow northbound on Spring Grove north of Knowlton's Corner to Blue Rock Avenue with a new traffic signal at Spring Grove and Blue Rock Avenue.
 - b. Either: Install one-way traffic flow southbound on Spring Grove south of Knowlton's Corner to Cooper Street,
Or: Retain two-way traffic flow in this block, but with northbound traffic restricted to allow only right turns to Ludlow Viaduct, and with an enlarged traffic island for better pedestrian safety and turn restriction enforcement.
- C. Improve Knowlton's Corner bus access to Millvale and to Virginia-Ash-tree areas.
1. Relocate half of route 27 buses, alternate trips, between Elmore and Dirr Streets and Chase and Virginia Streets outbound via Elmore to the east, Colerain, Hoffner, Hamilton Avenue, and Chase Avenue to Virginia, and the reverse for inbound buses.
 2. Retain present route via Cass Street loop for the other half of route 27 buses.
 3. Operate all route 27 buses on Virginia and Ashtree between Chase Avenue and Casey Avenue.
 4. Relocate all buses of route 8 Colerain-Chase from Chase Avenue to Pullan Avenue.
 5. Related traffic control improvement and minor curb relocation:
 - a. At Kirby and Virginia:
Either: Reverse stop signs to stop Kirby Avenue through traffic for traffic turning into or out of Virginia,
Or: Install a traffic signal if conditions develop which are typical where traffic signals elsewhere are successful.
 - b. At Casey Drive cul-de-sac, set back curbs to a position that will accommodate turn-around of the largest Metro buses.
 6. Note: While proposal C is independent of proposals A and B, adoption of proposal C at the same time as either or both of the other two proposals would enhance the service provided to the Northside area.
- D. Improve Northside and Westwood access to University and hospitals area.
1. Extend route 39 eastwardly from Knowlton's Corner.
 2. Avoid additional wage cost by operating through buses connecting route 39 to an existing bus route east of Knowlton's Corner.

- a. Community preference seems to favor service to University Hospital, and Jewish Hospital. Through routing of route 39 with every third, fourth, or fifth bus of route 49 would provide buses at about 1½-hour intervals which would connect, without transfer, Western Hills Shopping Center, Westwood, Knowlton's Corner, University of Cincinnati, Veterans Hospital, the Zoo, University Hospital, Jewish and Bethesda Hospitals, Peebles Corner and Mt. Adams.
 - b. Other through routing options for route 39 could provide connections at about 1½-hour intervals to either route 61 or 53, but not both, instead of route 49.
3. Relocate route 39 through Northside via either Blue Rock or Chase, discontinuing the Cooper-Turrill loop.
- E. Increase usage of under-utilized route 16 buses.
1. Relocate half of route 8 buses, alternate trips, north of Knowlton's Corner, to Carthage via the same route as presently operated by route 16. This service, to be operated Monday through Friday, would provide buses between Knowlton's Corner and Carthage at approximately the same frequencies as the present route 16, and would replace route 16.
 2. Use the present Pullan Avenue loop for the other half of route 8 buses Monday through Friday, and for all weekend route 8 service.
 3. Although proposals for routes 8, 16, and 27 south of Knowlton's Corner are technically beyond the scope of the Colerain Corridor Study, details are described below to show the effect that they would have on bus service in Northside.
 4. Operate all buses for both Pullan and Carthage to and from downtown via a single route south of Knowlton's Corner.
 - a. This route should include Colerain through Camp Washington, south to Marshall, and McMicken as far north as Dixmyth, as long as the Hopple Viaduct remains restricted for buses.
 - b. Provide any needed West End service by rerouting South Cummins ville buses.
 - c. After Hopple Viaduct rebuilding, reroute the South Cummins ville buses via Hopple, Dixmyth, and McMicken so that the Pullan and Carthage buses can use a more direct route to downtown from Colerain and Marshall.
 - d. Reassign unused route 16 buses to relieve overcrowding on other routes, and/or to provide bus mileage for the proposed route 39 extension east of Knowlton's Corner.
- F. Improve bus service on Colerain between Mt. Airy and Northgate.
1. Relocate off-peak route 18 Blue Rock branch north of Blue Rock Road via Banning Road and Colerain to Northgate, rather than Che-

viot Road, Galbraith, and Colerain. This will restore Saturday service to Colerain between Banning Road and Galbraith Road. Also, change the route number in the destination sign for these buses to read

Blue Rock via
" 19 Northgate Clif- "
ton

since this revised route

has more in common with route 19 than with route 18.

2. No change is proposed for off-peak route 18 North Bend branch, which will remain on Cheviot Road between North Bend Road and Galbraith.
3. See item G.1.c below.

G. Provide bus service between Mt. Airy and Providence Hospital.

1. Relocate peak-hour buses on route 18X Blue Rock (renumbered route 19X) to serve Providence Hospital.
 - a. Shorten the north end of the route to end in a loop consisting in the afternoon of Blue Rock Road, Cheviot Road, Banning Road, and returning via Colerain to Blue Rock Road. The reverse direction would be used during the morning peak period.
 - b. From Colerain, Blue Rock Road and Kipling, relocate inbound buses past Providence Hospital via Kipling and North Bend Road to Colerain, then south. The reverse route would be used outbound.
 - c. Relocate route 19X Northgate-Seven Hills buses away from I-74, North Bend Road, and Cheviot Road to the I-74 interchange at Colerain and Virginia and the proposed local bus transfer facility, then via Colerain to the Northgate area. It is proposed that these buses operate as a closed-door express on Colerain between Virginia Avenue and North Bend Road. This will add peak-hour bus service on Colerain between Kipling and Banning and will retain service on Colerain between Kipling and North Bend while shortening the one-way route by about 2½ miles, which should both increase revenue and cut costs.
 - d. No change is proposed north of Virginia Avenue for route 18X North Bend-Firshade branch, which will remain on Cheviot Road between North Bend Road and the Firshade loop at Oakmeadow.
2. Under present funding, route extensions which add operating miles and costs are not recommended. If additional funding becomes available:
 - a. Restore Saturday service on route 19 along Colerain, alternating off-peak buses between the Colerain and the Blue Rock branches, daily except Sunday.
 - b. Relocate the off-peak Blue Rock buses northbound from Colerain and North Bend via east on North Bend to Kipling, past Providence Hospital, then Blue Rock, Cheviot Road, Banning, and

north on Colerain, with the reverse southbound.

- c. Restore peak-hour express buses via I-74 to North Bend Road, then extend the route via Cheviot Road, Poole Road, and via various streets, perhaps including Yellowwood Drive and Springdale Road, to the Northgate Shopping Center area. This route should be numbered 18X, and would replace the northern part of the present North Bend branch of route 18X. Replace the remainder of route 18X by extending route 61 (the branch to be renumbered 18) local peak-period buses which pass through Clifton to the recommended transfer facility at Colerain and Virginia. The proposed extension is via Colerain from Virginia to North Bend, then via North Bend Road to a turn-around near North Bend and Cheviot Road or at White Oak shopping center.

H. Provide Sunday bus service to Mt. Airy.

Under present funding, route extensions which add operating miles and costs are not recommended. If additional funding becomes available, add Sunday bus service to Mt. Airy via Clifton. Mt. Airy is the only major Cincinnati community which does not have any Sunday bus service.

J. Provide bus service to Belmont-Oakwood area of College Hill and to Providence Hospital from College Hill.

- 1. Relocate route 17 College Hill branch north of Hillcrest Avenue via Belmont and North Bend to the existing loop at Simpson, Innes, and Witherby. Revise the destination sign to read

via
" 17 Belmont Clif- "
 ton

- 2. Retain the present route 17 College Hill route via Hamilton Avenue and North Bend Road for nights and Sundays.

- 3. Relocate route 61 Cedar branch north of Hillcrest Avenue via Hamilton Avenue, Llanfair, Lathrop, and Cedar so as to avoid duplicating the relocated Belmont service. Revise the destination sign and route number to read

via
" 17 Cedar Clif- "
 ton

rider confusion, since this route is identical to route 17 from downtown all the way to College Hill.

- 4. If additional funding to permit route extensions becomes available, extend route 17 Belmont buses from the Simpson loop back along North Bend Road to Kipling, then via Banning Road to a turn-around to be built near the Providence Hospital driveway. The turn-around, which would be similar to one at McAlpin near Middleton, should be on the west side of Banning Road on hospital property so that passengers do not have to cross the road to reach the hospital.

5. Related roadway improvement is the proposed paving and drainage improvement of Belmont Avenue, along with intersection widenings.
- K. Provide all-day bus service to Argus-Groesbeck Road area of College Hill.
1. Relocate route 17C and 17CX Clovernook buses north of Hillcrest Avenue via Hamilton Avenue, Groesbeck Road, Argus Road, North Bend Road, to regular route on Daly Road.
 2. Relocate route 61 Cedar (renumbered 17) buses east of Hamilton Avenue during the afternoon via Cedar, then north on Argus Road to North Bend, returning to North Bend and Hamilton Avenue, then south on Hamilton Avenue to Ludlow. The morning route is the reverse. This is to minimize duplicating the revised Clovernook route.
 3. Related roadway improvement is the proposed paving and drainage improvement of Groesbeck Road, along with intersection widenings.
- L. Provide bus service from Hamilton Avenue via Mt. Healthy to Northgate Shopping Center.
1. Extend route 17N East Northbrook via Niagara Avenue and Springdale Road to Northgate Shopping Center. Eight trips per day can be extended without adding to costs of operation. If funds become available for service additions, additional trips could be extended.
 2. Discontinue eight daily trips of route 19 West Northbrook between Pippin Road and Northgate Mall, leaving off-peak buses of route 19 to terminate in the Northgate area.
- M. Provide bus service to Skyline Acres subdivision.
1. Check to see whether subdivision streets will support bus traffic.
 2. If streets will support buses, relocate certain buses from route 17GX Groesbeck expressway service, beginning at Galbraith and Pippin Roads, north on Pippin Road to a loop on local subdivision streets in Skyline Acres. Two morning peak buses and two afternoon peak buses is suggested for a trial to test potential ridership.
 3. Relocate the end of the line for all remaining route 17G and 17GX buses to the Colerain and Galbraith area, either on a residential street loop or on a specially constructed turn-around to be built on the south side of Galbraith. This will eliminate service duplication at the Firshade loop and reduce operating costs by an amount to allow for the Skyline Acres proposed extension.
- N. Provide off-peak bus service to Seven Hills.
1. Under present funding, service extensions which add operating miles and costs are not recommended. If additional funding becomes

available, check feasibility of extending either route 5 or 17 Mt. Healthy or route 19 Northgate into Pippin Road and the Seven Hills area off-peak.

2. If route 5 or 17 is used off-peak, check feasibility of using that same route for peak-period service.

P. Provide Sunday bus service on Hamilton Avenue north of North Bend Road.

Under present funding, service extensions which add operating miles and costs are not recommended. If additional funding becomes available, provide limited Sunday service via Mt. Healthy to Northgate Mall, using route 17N Northbrook-Northgate.

Q. Coordinate the scheduling of routes 5, 17, 18, 19, and 61 through Knowlton's Corner, Northside, Mt. Airy, and College Hill, as well as through Clifton.

1. Use consistent scheduled running times for each route segment and time of day, to avoid bunching of buses or overtaking of one bus by another.
2. Use approximately equal scheduled spacing of bus departure times for each route segment and time of day, to avoid overloading of some buses while other buses are lightly loaded, and to insure efficient utilization of equipment and drivers.
3. Combine routes 5, 17, 18, 19, and 61 into a single schedule, similar to the route 43, 45, and 47 schedule, to insure schedule coordination between all branches.
4. Investigate the feasibility of rerouting off-peak Mt. Healthy buses via Clifton Avenue and route 17 instead of via Central Parkway and route 5. If this is found feasible and implemented, peak-period route 5 buses should be retained on Central Parkway while off-peak Central Parkway service would be provided by route 20.

COLERAIN CORRIDOR STUDY

- III. SOURCES OF REQUESTS FOR PROPOSALS TO IMPROVE TRANSPORTATION EFFICIENCY BY IMPROVING ATTRACTIVENESS AND EFFICIENCY OF TRANSIT SERVICE.
- A. Reduce travel time for route 18X expressway service to and from Mt. Airy. The proposal also involves changes for routes 61 and 8.
1. a. COMMENT: Route 18X expressway bus route through Knowlton's Corner discourages riders because it is round-about, not direct.
 - b. SOURCE: City Traffic Engineering Division.
 2. a. COMMENT: The Colerain Corridor Study should stress mass transit more, and not solely car transportation. The study should allow for the alternative of more bus service and fewer cars to provide the needed amount of transportation.
 - b. SOURCE: Alma Voelkel comment of 9/7/82.
 3. a. COMMENT: Routes #18 and #19 be routed east on Blue Rock Street inbound.....
 - b. SOURCE: Northside Community Transportation Committee letter.
 - c. EXPECTED RESULT: This could overcrowd the bus stop on Hamilton Avenue just north of Hoffner.
 - d. PREFERRED ALTERNATIVE: The proposal could be made workable if route 18X were rerouted to bypass Knowlton's Corner, using I-74 and the Colerain interchange.
- B. Implement Knowlton's Corner Transit Alternatives plan 8, modified to reduce routes 18 and 19 off-peak travel time, remove express buses from Powers Street, and reduce pedestrian and vehicle crossing delays at Hamilton Avenue traffic signals between Knowlton's Corner and Bruce Street, thereby improving safety. The plan also involves routes 8, 16, 17X, 20, 22, and 61.
1. a. COMMENT: Scheme 5.....incorporation of bus loading facilities off the main arteries.....would allow routes #18 and #19 to avoid the loop around Dooley Bypass.....
 - b. SOURCE: Northside Community Transportation Committee letter.
 - c. EXPECTED RESULT: On-street loading bays shown schematically in the Plan are barely traversible by the turning radius of city buses and offer insufficient space to store waiting second and third buses which tend to accumulate when buses run late, off schedule.
 - d. PREFERRED ALTERNATIVE: Best plan is to operate all outbound local route #18, and #19, and proposed route #61 buses north from Knowlton's Corner on Spring Grove to west on Blue Rock to Colerain.

2. a. COMMENT: Routes #18 and #19 be routed east on Blue Rock Street inbound.....
- b. SOURCE: Northside Community Transportation Committee letter.
- c. EXPECTED RESULT: This could overcrowd the bus stop on Hamilton Avenue just north of Hoffner.
- d. PREFERRED ALTERNATIVE: The proposal could be made workable if route #18X were rerouted to bypass Knowlton's Corner, using I-74 and the Colerain interchange.
3. a. COMMENT:At Knowlton's Corner.....assist.....routes #18 and #19 by....eliminating the loop on Dooley, Alternative #8 from "Knowlton's Corner Transit Alternatives Study".....
- b. SOURCE: Metro Operations, Item #1B.
- c. EXPECTED RESULT: Alternative #8 with bus left turns from a reserved lane in the middle of Knowlton's Corner would attract violators who would get in the way of buses and other traffic.
- d. PREFERRED ALTERNATIVE: Traffic Engineering proposal is different from Alternative #8 in proposing that outbound route #18 and #19 buses use Spring Grove and Blue Rock, rather than turning left at Knowlton's Corner from Ludlow Viaduct. Traffic Engineering will include a new traffic signal at Spring Grove and Blue Rock if needed to make this plan work. Parking regulation and pavement marking channelization will also be coordinated to assure adequate turn radius from Spring Grove to Blue Rock.
4. a. COMMENT: Routes 16, 20, and 22 be routed west on Blue Rock to Hamilton Avenue inbound.....
- b. SOURCE: Northside Community Transportation Committee letter.
- c. EXPECTED RESULT: No harmful effect. Routes #20 and #22 already use I-75 south of Mitchell in peak direction during peak periods. Route #16 is infrequent, one bus every 30 to 50 minutes.
5. a. COMMENT: Desire approval of Spring Grove one-way north of Knowlton's Corner.
- b. SOURCE: Northside Community Transportation Committee letter.
- c. EXPECTED RESULT: Beneficial, but alone is not sufficient to ease Hamilton Avenue traffic congestion.
- d. PREFERRED ALTERNATIVE: Spring Grove one-way away from Knowlton's Corner, both to the north and to the south.
6. a. COMMENT: Keep Spring Grove two-way south of Knowlton's Corner, retaining three-phase signal.
- b. SOURCE: Northside Community Transportation Committee letter.

- c. EXPECTED RESULT: No relief from AM and PM peak congestion and from delays to buses and other traffic.
 - d. PREFERRED ALTERNATIVE:
 - (1) one-way southbound operation of Spring Grove for one block south of Knowlton's Corner, or
 - (2) limit the exit from Spring Grove from south of Knowlton's Corner to a right turn to Ludlow Viaduct, with "STOP" sign control, which will permit retaining two-way flow south of Knowlton's Corner on Spring Grove, or
 - (3) build a turn-around in Spring Grove south of Knowlton's Corner, to provide two-way access to properties but with no entrance to Knowlton's Corner, and retain exit from Knowlton's Corner to Spring Grove south.
- C. Improve Knowlton's Corner bus access to Millvale and to Virginia-Ash-tree areas, via bus route 27.
- 1. a. COMMENT: Extend bus route #39 to Millvale loop.
 - b. SOURCE: Northside Community Transportation Committee letter.
 - c. EXPECTED RESULT: No harmful effect on Knowlton's Corner area traffic, but no beneficial effect on low route #39 usage.
 - d. PREFERRED ALTERNATIVE: Extend bus route #27 to Knowlton's Corner. Extend route #39 via Ludlow and Clifton to U.C. and hospitals.
 - 2. a. COMMENT: Route 61 Clifton/Cedar bus be routed over Ashtree,Kirby, (and).....Bruce.
 - b. SOURCE: Northside Community Transportation Committee letter.
 - c. EXPECTED RESULT: This would provide only for peak hours. Residents of Bruce, who don't now have bus service, may not want it.
 - d. PREFERRED ALTERNATIVE: Operate alternate buses of route #27 via Knowlton's Corner.
 - 3. a. COMMENT: Casey turn-around still doesn't work.
 - b. SOURCE: Metro Operations, Item #5.
 - c. PREFERRED ALTERNATIVE: Relocate curbs on Casey loop to suitable position.
 - 4. a. COMMENT: Reverse (the) "STOP" signs on Kirby/Virginia, (or provide traffic light.....with continuous right turn onto east-bound Virginia).
 - b. SOURCE: Metro Operations, Item #4, Highway Improvements - College Hill, Item #5.

5. a. COMMENT: Desire to retain two-way bus service on Hoffner.
 - b. SOURCE: Remarks made at Northside Transportation Committee meeting of 3/2/83 and other dates.
- D. Improve Northside and Westwood access to University and hospitals area, via bus route 39.
1. a. COMMENT: Investigate making Turrill one-way north to allow route #39 more maneuvering room.
 - b. SOURCE: Metro Operations, Item #3.
 2. a. COMMENT: Improved service from Mt. Airy through Medical Center-U.C. then to downtown.
 - b. SOURCE: Transit Comments - Mt. Airy Town Council, Item #1.
 3. a. COMMENT: Provide crosstown service to the U.C./M.C. area.
 - b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 8.
 4. a. COMMENT: Extend bus route #39 to Millvale loop.
 - b. SOURCE: Northside Community Transportation Committee letter.
 - c. EXPECTED RESULT: No harmful effect on Knowlton's Corner area traffic, but no beneficial effect on low route #39 usage.
 - d. PREFERRED ALTERNATIVE: Extend bus route #27 to Knowlton's Corner. Extend route #39 via Ludlow and Clifton to U.C. and hospitals.
- E. Increase usage of under-utilized route 16 buses, by combining with routes 8 and 27.
- a. COMMENT: "The SORTA Board and Queen City Metro staff are committed to continuing making the provision of bus transportation for the Cincinnati area as cost effective as possible. The decrease in federal funding allocations and the fiscal crisis in the State of Ohio now requires that expenditures be reduced still further.....(which) will result in an additional savings to the system."
 - b. SOURCE: Metro News Release of 5/27/82.
- F. Improve bus service on Colerain between Mt. Airy and Northgate, using route 18BR, Blue Rock.
1. a. COMMENT: Route #19 Northbrook, Saturday. Eliminate two buses from the route and remove this service.
 - b. SOURCE: Metro News Release of 5/27/82.
 2. a. COMMENT: Reallocate service from routes 17 and 18 to help cover service lost by the removal of Saturday service on

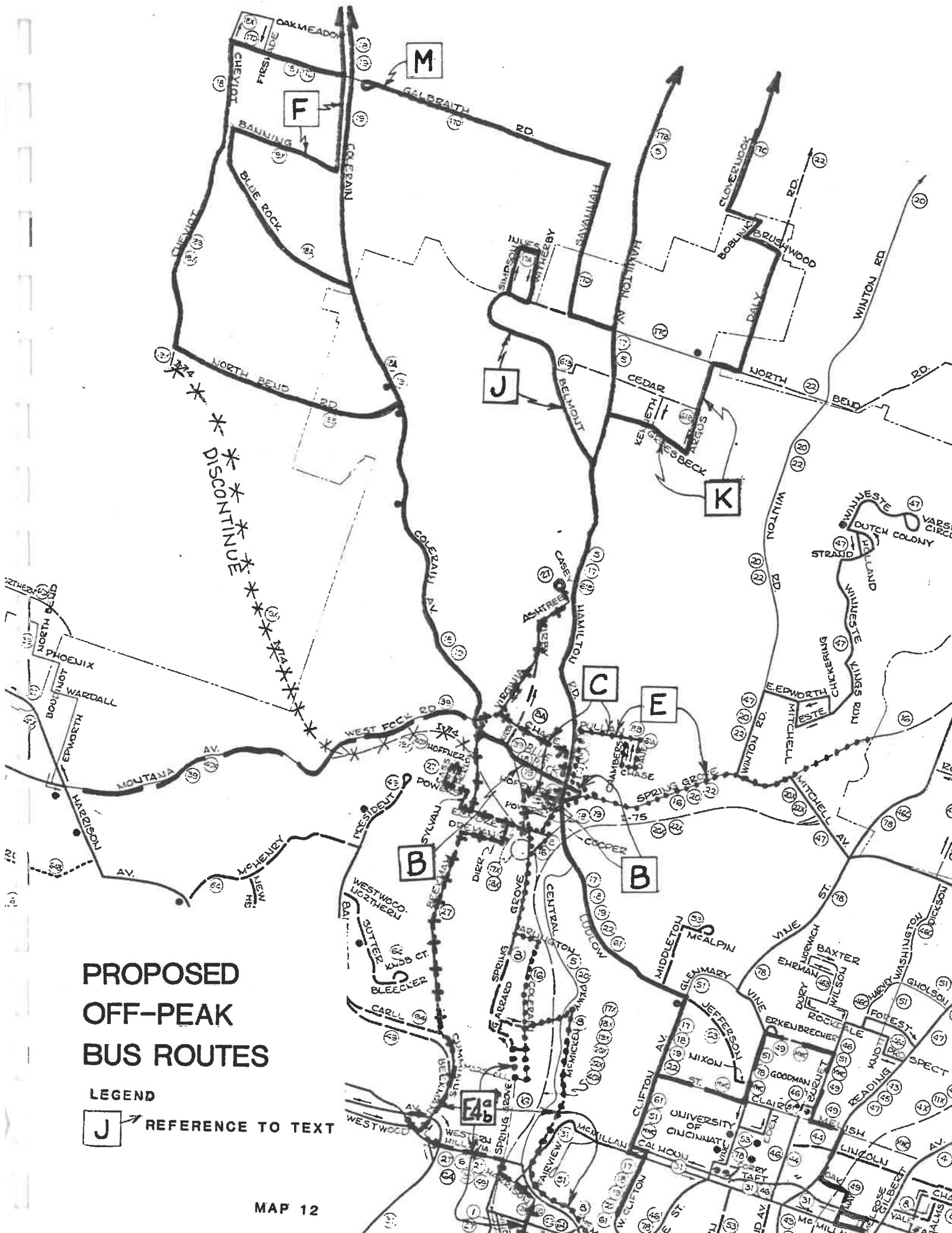
- route 19.
- b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 3a.
- G. Provide bus service between Mt. Airy and Providence Hospital, using route 18BRX, Blue Rock, and relocating route 19X.
1. a. COMMENT: Route #19X Northbrook Saturday. Eliminate two buses from the route and remove this service.
- b. SOURCE: Metro News Release of 5/27/82.
2. a. COMMENT: Extend route #17 to Mt. Airy by looping over Kipling, Colerain, and North Bend to serve the neighborhood and Providence Hospital.
- b. SOURCE: Transit Comments - Mt. Airy Town Council, Item #3.
3. a. COMMENT: Provide service to Providence Hospital.
- b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 6.
4. a. COMMENT: Provide crosstown service on North Bend Road.
- b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 8.
- H. Provide Sunday bus service to Mt. Airy, if funds become available.
- a. COMMENT: Mt. Airy is the only major Cincinnati community which does not have any Sunday bus service.
- b. SOURCE: Remark made at Mt. Airy Town Council meeting of 1/26/83.
- J. Provide route 17 bus service to Belmont-Oakwood area of College Hill, and to Providence Hospital from College Hill, if funded.
1. a. COMMENT: Improve service to Oakwood/Belmont area.
- b. SOURCE: College Hill Transit, Item #4.
2. a. COMMENT: Provide service to Providence Hospital.
- b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 6.
3. a. COMMENT: Provide crosstown service on North Bend Road.
- b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 8.
- K. Provide all-day route 17 bus service to Argus-Groesbeck Road area of College Hill.

1. a. COMMENT: Would like all-day bus service in Argus-Groesbeck Road area. Present service is peak hour only.
 - b. SOURCE: Remark made by attendee at College Hill Forum meeting of 1/25/83.
 2. a. COMMENT: Groesbeck Road, improve pavement, sidewalks and drainage.
 - b. SOURCE: Highway Improvements - College Hill, Item #1.
- L. Provide bus service from Hamilton Avenue via Mt. Healthy to Northgate Shopping Center. This involves routes 17N, E. Northbrook and 19N, W. Northbrook.
1. a. COMMENT: The Colerain Corridor Study should stress mass transit more, and not solely car transportation. The study should allow for the alternative of more bus service and fewer cars to provide the needed amount of transportation.
 - b. SOURCE: Alma Voelkel comment of 9/7/82.
 2. a. COMMENT: Extend route 17, E. Northbrook to Northgate Mall.
 - b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 2.
- M. Provide bus service to Skyline Acres subdivision. This involves route 17GX, Groesbeck.
- a. COMMENT: Provide peak-hour bus service to Skyline Acres (the area immediately south of Compton Road and east of Pippin Road).
 - b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 1.
- N. Provide off-peak bus service to Seven Hills. This may involve route 5, 17, or 19, if funds permit.
- a. COMMENT: Extend off-peak service to Seven Hills.
 - b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 7.
- P. Provide Sunday bus service on Hamilton Avenue north of North Bend Road. This involves route 17N, if funds permit.
- a. COMMENT: Provide Sunday service to Mt. Healthy (extend route 17).
 - b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 3b.
- Q. Coordinate the scheduling of routes 5, 17, 18, 19, and 61 through Knowlton's Corner, Northside, Mt. Airy, and College Hill, as well as through Clifton.

1. a. COMMENT: The SORTA Board and Queen City Metro staff are committed to continue making the provision of bus transportation for the Cincinnati area as cost effective as possible. The decrease in federal funding allocations and the fiscal crisis in the State of Ohio now requires that expenditures be reduced still further.....(which) will result in an additional savings to the system.
b. SOURCE: Metro News Release of 5/27/82.
2. a. COMMENT: The Colerain Corridor Study should stress mass transit more, and not solely car transportation. The study should allow for the alternative of more bus service and fewer cars to provide the needed amount of transportation.
b. SOURCE: Alma Voelkel comment of 9/7/82.
3. a. COMMENT: Coordinate the scheduling of routes 5, 17, 18, 19, and 61 through Knowlton's Corner.
b. SOURCE: Queen City Metro Colerain-Hamilton Task Force, priority 3c.

COLERAIN CORRIDOR STUDY

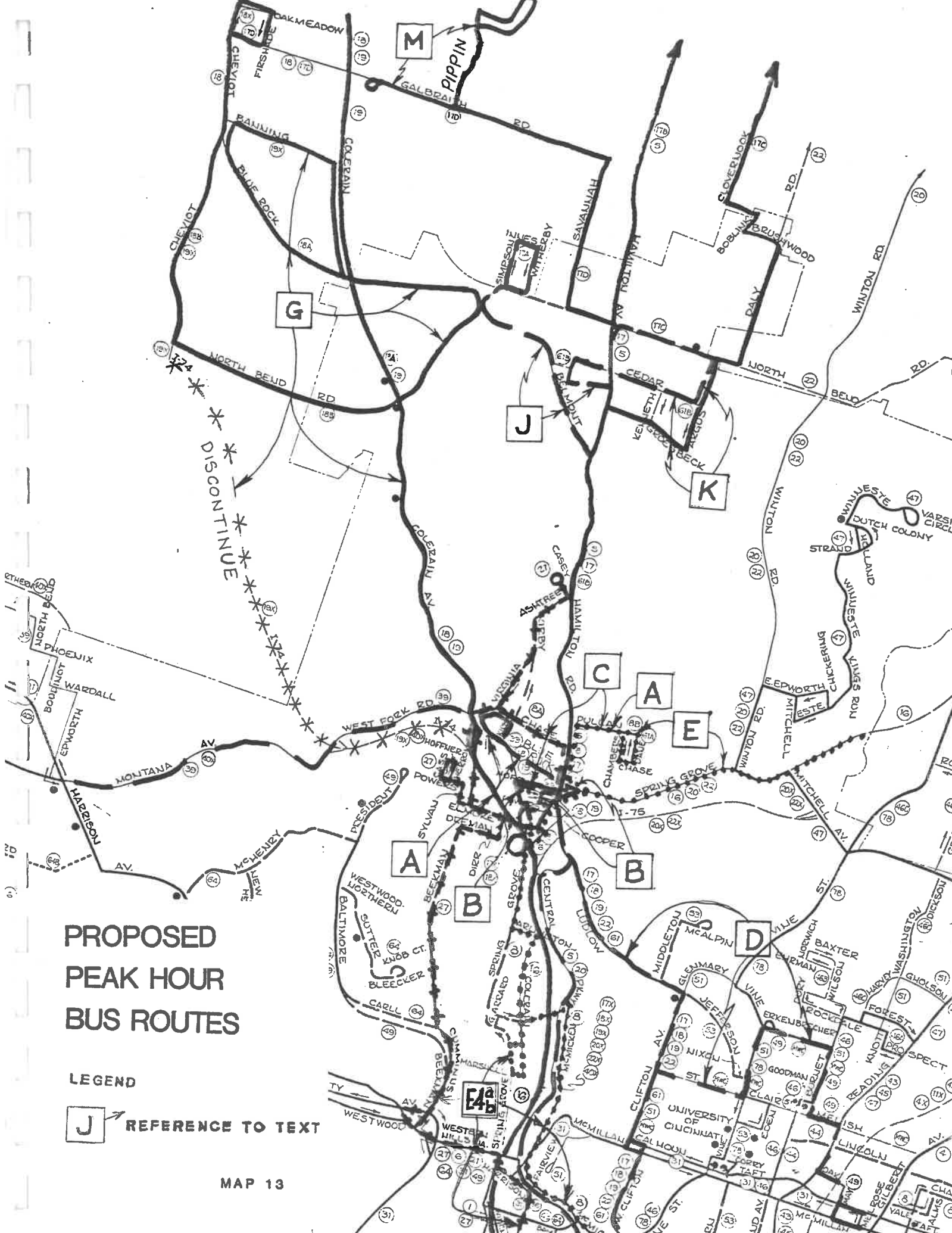
- IV. PROPOSAL "E" FOR BUS ROUTES 8, 16, AND 27; DETAILS OF THE PORTION WHICH IS OUTSIDE THE COLERAIN CORRIDOR (INCLUDED TO SHOW THE IMPACT ON THE CORRIDOR).
1. South of Knowlton's Corner, during restriction of Hopple Viaduct for buses:
 - a. Operate all inbound buses from both Pullan and Carthage via Spring Grove, Arlington, Colerain to Marshall, turn around and return to Hopple, Dixmyth, McMicken and Race to downtown. Operate outbound buses via Elm, McMicken, and the reverse of the above route.
 - b. Between Western Hills Viaduct and Clark Street, relocate route 27 along present route 16, so as to provide weekend service and to eliminate service duplications between routes 1 and 27.
 - c. Relocate route 27 entrance to downtown via Court Street and route 1 downtown loop to avoid the circuitous routing of both of the present routes 16 and 27.
 - d. Provide service, if needed, along Linn and Third south of Eighth Street by diverting seven route 33GG Glenway-Gilsey weekday buses along this route.
 2. South of Knowlton's Corner, after Hopple Viaduct rebuilding:
 - a. Operate all buses from Pullan and Carthage via Spring Grove, Arlington, Colerain, Marshall, Spring Grove, Harrison, and to downtown via Freeman, Findlay, Linn, and Court.
 - b. Relocate South Cumminsville buses from Beekman and Hopple via Hopple, Dixmyth, McMicken, and to downtown via Mohawk, McMicken, and Race (returning on Elm).
 - c. Retain McHenry-Sutter-Carll buses on the Western Hills Viaduct, with buses continuing to downtown via the present route on Bank, Mohawk, McMicken, Walnut, and Sycamore (returning on Vine and Main).



PROPOSED OFF-PEAK BUS ROUTES

LEGEND

J → REFERENCE TO TEXT

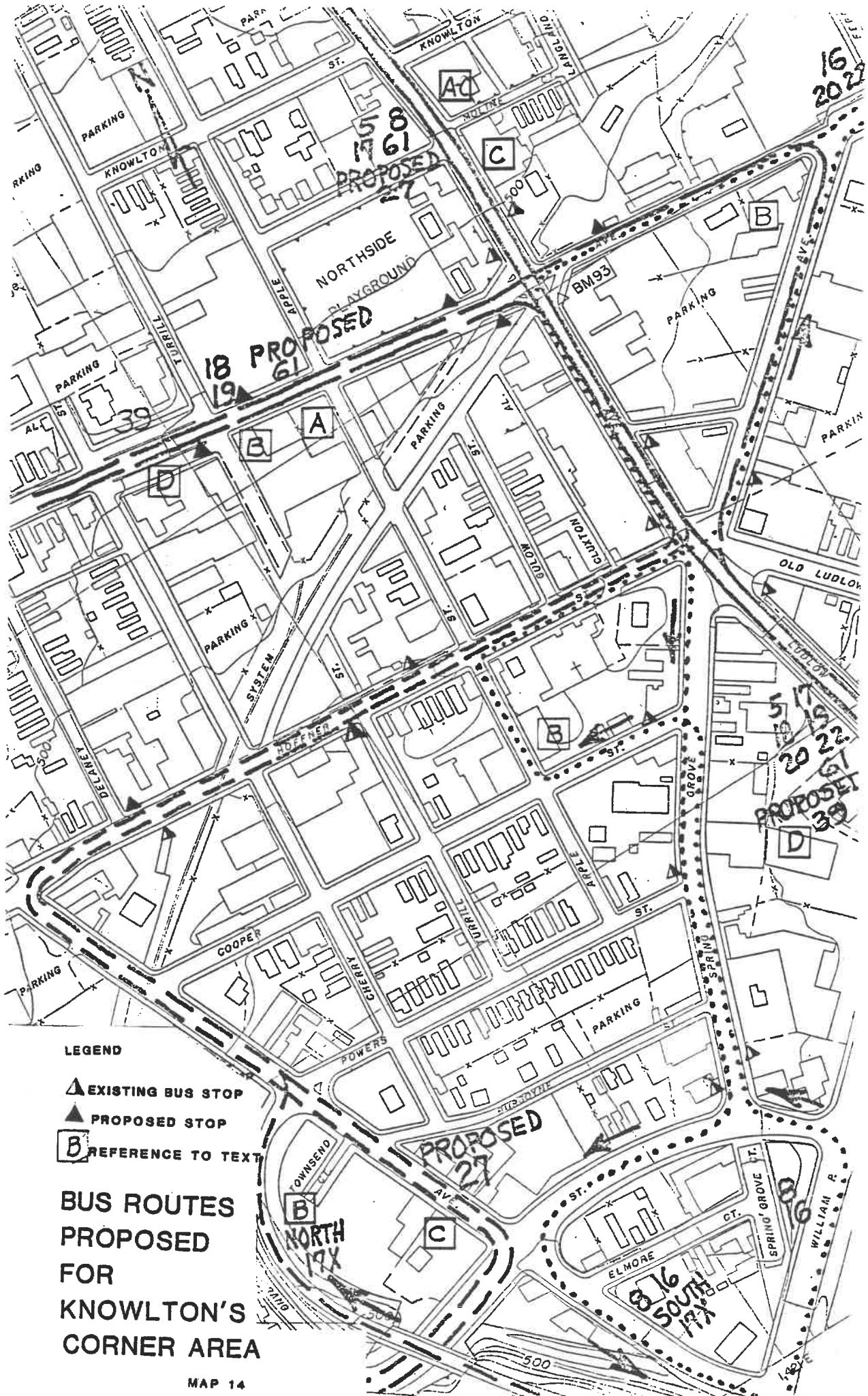


PROPOSED PEAK HOUR BUS ROUTES




LEGEND

J → REFERENCE TO TEXT

MAP 13



LEGEND

-  EXISTING BUS STOP
-  PROPOSED STOP
-  REFERENCE TO TEXT

**BUS ROUTES
PROPOSED
FOR
KNOWLTON'S
CORNER AREA**

LAND USE RECOMMENDATIONS

COLERAIN CORRIDOR STUDY

Introduction

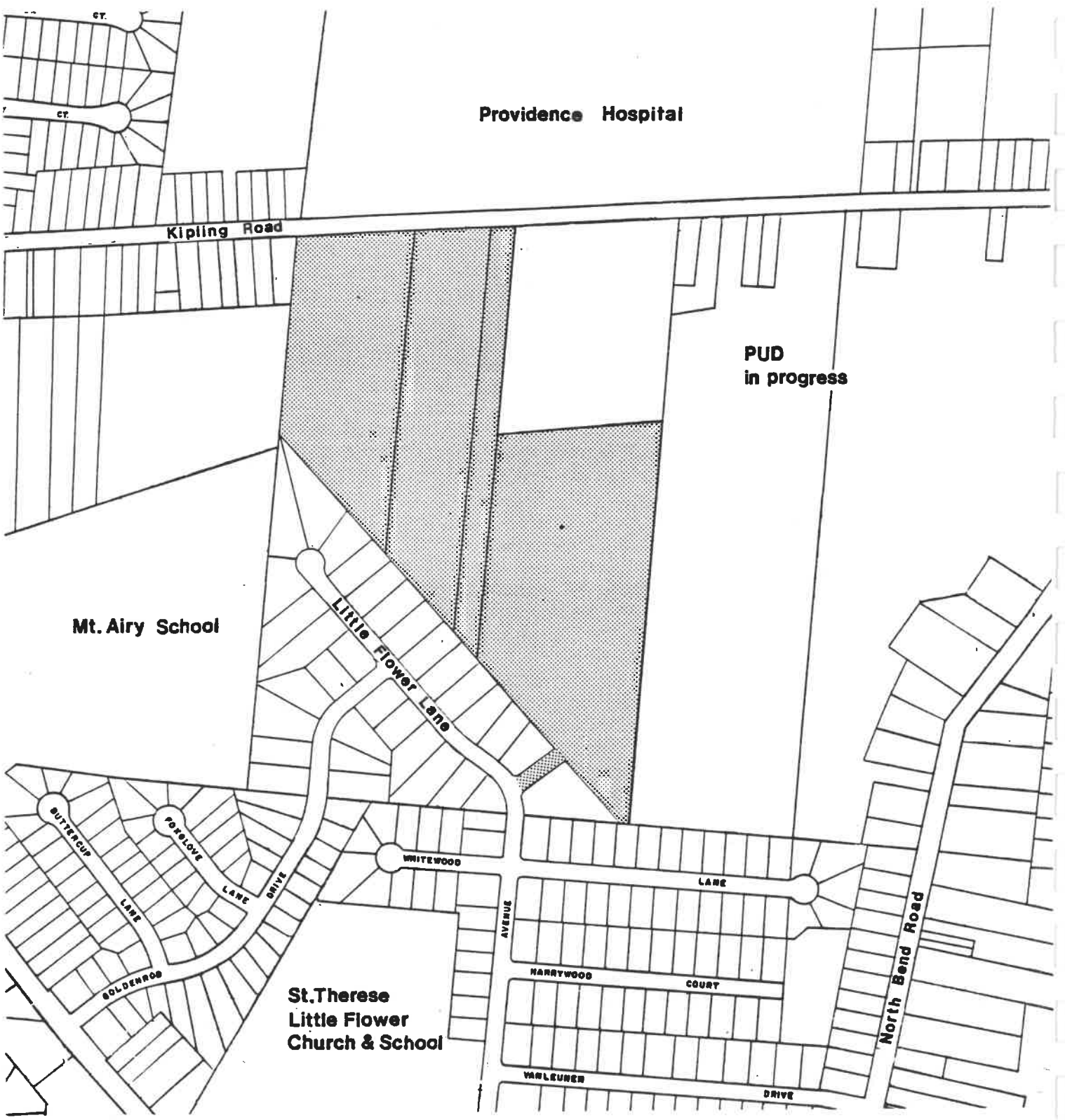
As part of the Colerain Corridor Study, the City Planning Department has developed land use recommendations for property acquired for the Colerain Modified Expressway. This section of the report documents the analysis of the properties, and presents the land use recommendations and a disposition strategy.

The publicly owned land is mapped for the entire corridor. Then, parcels are grouped into study areas and a site profile provided for each study area. The profiles describe location, size, ownership, land use, zoning, topography, soil type, landslide susceptibility, vegetation, access and utility conditions. A land use recommendation is made for each study area and reasons are given for the recommendation. These explanatory statements often set forth considerations for future development guidelines.

Before properties are sold, the City must work with the State of Ohio to de-journalize the Colerain Modified Expressway centerline, arrive at consensus regarding the study recommendations, and clearly establish the inter-governmental arrangements and processes of disposition. Then interagency transfers can take place and specific land sale strategies formulated. This will include designating certain properties for open sale, others for sale to abutting owners and yet others for packaging and marketing within a process using development guidelines. In several instances, this will require more extensive site analysis and conceptual planning as well as neighborhood consultation. The entire disposition process should strive for consistency with the recommendations which follow.

Storm water issues deserve discussion in terms of the entire corridor since they pervade the study area. Generally all development of the publicly owned land requires specific attention to drainage. Current efforts to establish a storm water management program and utility could lead to a direct solution to the corridor's problem. That solution is not at hand so storm water management guidelines are highlighted for each study area. Future disposition and subsequent development should acknowledge and satisfy these guidelines..

The residential development recommendations agree with the Kirby Valley/Mt. Airy Hillside plan policies adopted by the City Planning Commission May 30, 1980. That report recommends that, where feasible, development within the area of the proposed Colerain Modified Expressway should occur as residential Planned Unit Developments. The adopted Policies and Kirby Valley EQ-HS Guidelines which accompany the EQ District as part of the Zoning Code, provide a review process and development guidelines designed to assure sensitive development of the valuable and sensitive character of the hillside natural features.



Colerain Corridor Study

Study Area 1: Kipling Road

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 1

Location

Kipling Road east of Colerain and west of North Bend Road.

Acreage

+ 25.8 acres

Ownership

City of Cincinnati

Existing Land Use

Vacant

Adjacent Land Use

Providence Hospital to the north, a P.U.D. development to the east, Mt. Airy School and Mt. Airy Playground to the west, single-family residences to the south and west.

Existing Zoning

R-2

Topography

Ranges between 915' north of Little Flower Lane and south of Kipling Road and 875' in the center along the main drainage path.

Soils

Rossmoyne Urban Land Complex (RtB) Switzerland Silt Loam (SWD₂)

Landslide Susceptibility

Low.

Vegetation

Extensive tree cover.

Sewerage

Sanitary sewers are available.

Water System

Requires improvement.

Access

Primary on Kipling Road, secondary on Little Flower Lane.

Recommendation

Low Density Residential Planned Unit Development (PUD) *W. 22 to 30 mg. WHC working on this as of 9/21/88*

Reasons

A low density residential Planned Unit Development (PUD) would conform to the surrounding land use pattern and could complement the PUD under development east of the site. Close proximity to Providence Hospital, stable neighborhood character and the site's natural assets support PUD feasibility. Because PUD regulations allow flexibility in site design, such development could take advantage of the site's natural amenities and lead to sensitive use of the physical elements. Furthermore, using the site for housing would expand residential opportunities within the City of Cincinnati and enhance the City's tax base.

The site's storm water drainage problems are currently under study by the Department of Public Works. A specific strategy for resolving these problems, probably the construction of a detention pond must be implemented for site development. Highway improvements are planned for Kipling Road and should be coordinated with site development. The highway project could include necessary water service improvement. Adequate buffering for adjacent housing and compatible site development should receive consideration in the development process. To achieve this, the City should review development proposals as part of the land disposition process.

Low density is equivalent to density permitted by R-1A, R-1, R-2 or R-3 zoning.



Colerain Corridor Study

Study Area 2: North Bend Road

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 2

Location

East and west of North Bend Road north of Van Leunen Drive.

Acreage

± 1.7 acres

Ownership

City of Cincinnati

Existing Land Use

Vacant except for Parcel 228-4-6 which has a vacant church.

Adjacent Land Use

Single family residential to the north, vacant land to the east, multi-family residential to the west and single family residential to the south.

Existing Zoning

R-4 and R-1. The eastern section is within EQ-HS 7.

Topography

Ranges between 875' and 925'.

Soils

Eden, silty clay loam (EcE), Rossmoyne-Urban Land Complex (Rtb), west of North Bend Road.

Landslide Susceptibility

Low and moderate high susceptibility.

Vegetation

Scattered along North Bend Road, more dense deeper into lot.

Sewerage

Available

Water System

Adequate

Access

North Bend Road

Recommendation

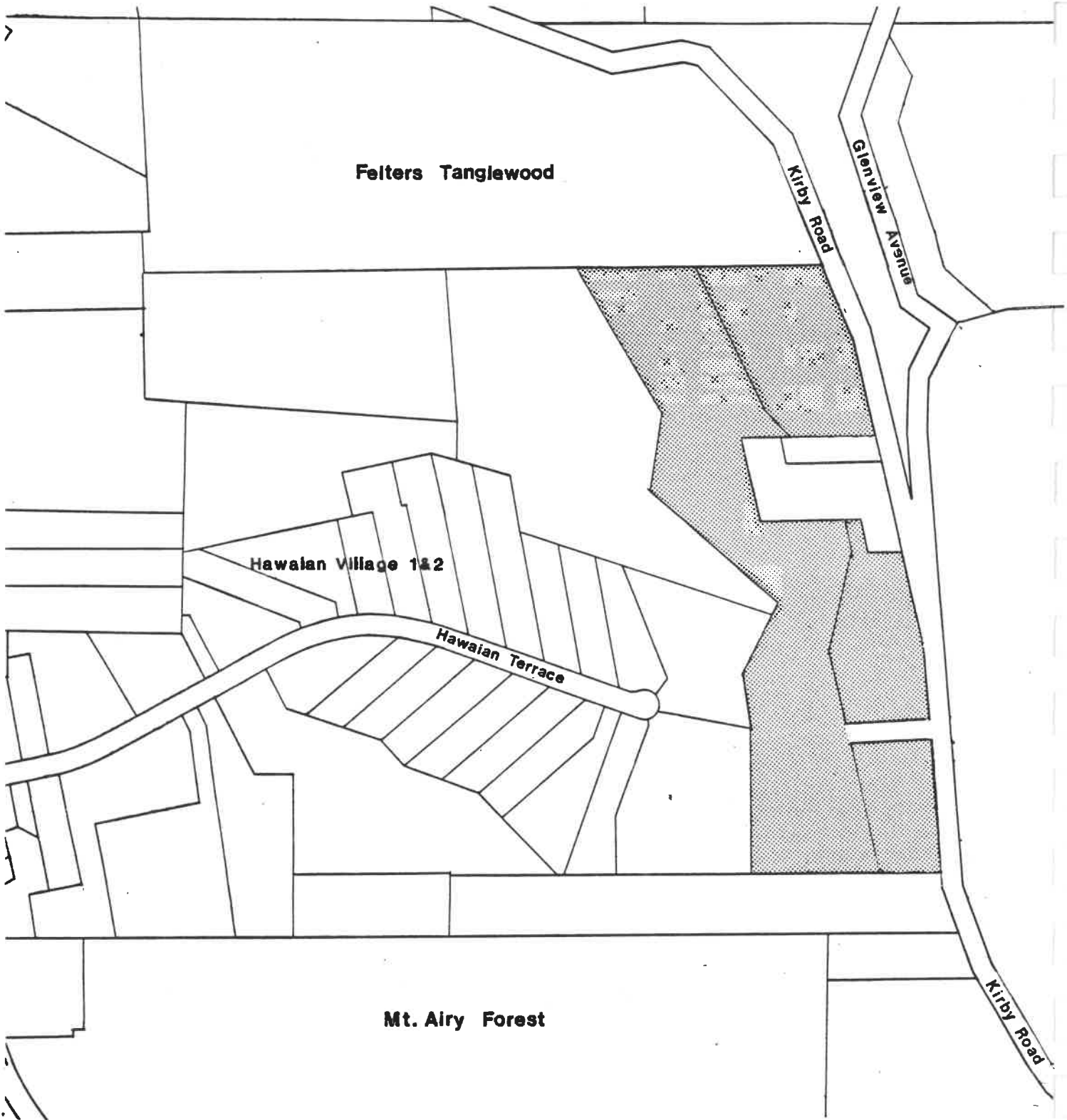
Medium Density Residential

One property already sold for housing, the other will be for housing or for church purposes

Reasons

Development should be consistent with existing zoning which is R-4 for all but a sliver of the parcels on the east side of North Bend Road. The eastern parts of those parcels fall within the Kirby Valley/Mt. Airy EQ-HS 7 District. Therefore development in this portion of the site should be reviewed in terms of the appropriate hillside guidelines.

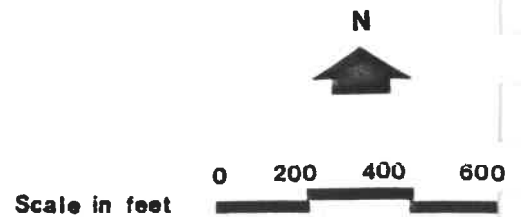
Medium density is equivalent to the residential density permitted by R-4 zoning.



Colerain Corridor Study

Study Area 3: Kirby Road

Department of Public Works
Department of City Planning
Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 3

Location

West side of Kirby Road, between Felter's Tanglewood and Mt. Airy Forest.

Acreage

+ 18.8 acres

Ownership

City of Cincinnati

Existing Land Use

Vacant land.

Adjacent Land Use

Felter's Tanglewood Park to the north and east, Mt. Airy Forest and vacant land to the south, Hawaiian Village Apartments and vacant land to the west.

Existing Zoning

R-4 and entirely within EQ-HS 7.

Topography

Ranges between 775' east of Hawaiian Village and 625' west of Kirby Road.

Soils

Pate silty, clay loam (PSE)
Eden flaggy silty clay loam (EdF)

Landslide Susceptibility

High and moderately high.
Landslides have occurred in the vicinity of Hawaiian Terrace.

Vegetation

Extensive tree cover.

Sewerage

Not available.

Water System

Adequate

Access

Kirby Road

Recommendation

Deed to the Park Department for Open Space/Park use.

Park Bd is negotiating with Pub Works to take this over as of 9/2/88

Reasons

This land should be used to provide an open space linkage between Mt. Airy Forest and Bradford-Felters Tanglewood Park. Such use accommodates recreation and park needs and helps maintain important urban open space. Slope and landslide susceptibility are strong deterrents to development.

ing Conditions

Study Area 4

Location

4a) Large site, northwest of Mehmert Ave. on south side of Kirby Road.

4b) Site of scattered parcels, west of Kirby Road and south of Mehmert Ave.

Acreage

+ 16.3 acres

Ownership

City of Cincinnati

Existing Land Use

Vacant except for house and barn on 4729 Kirby Road.

Adjacent Land Use

St. Anthony's Monastery and single family residences to the north, single family residences to the east and south, vacant and single family to the west.

Existing Zoning

R-4, and entirely within EQ-HS 7.

Topography

Ranges between 750' west of Mehmert Avenue and 550' at Kirby Road.

Soils

Urban Land Martinsville Complex (UmB)
Pate silty clay loam (PSE)

Landslide Susceptibility

High and moderately high.
Landslides have occurred in the vicinity of Cresap Ave., Reemlin St., and Monterey Court.

Vegetation

Extensive tree cover north of Mehmert Avenue, and dispersed north and south of Cresap Avenue.

Sewerage

Available

Water System

Adequate

Access

Kirby Road, Mehmert Avenue, Cresap Avenue, Reemlin Street.

Recommendation

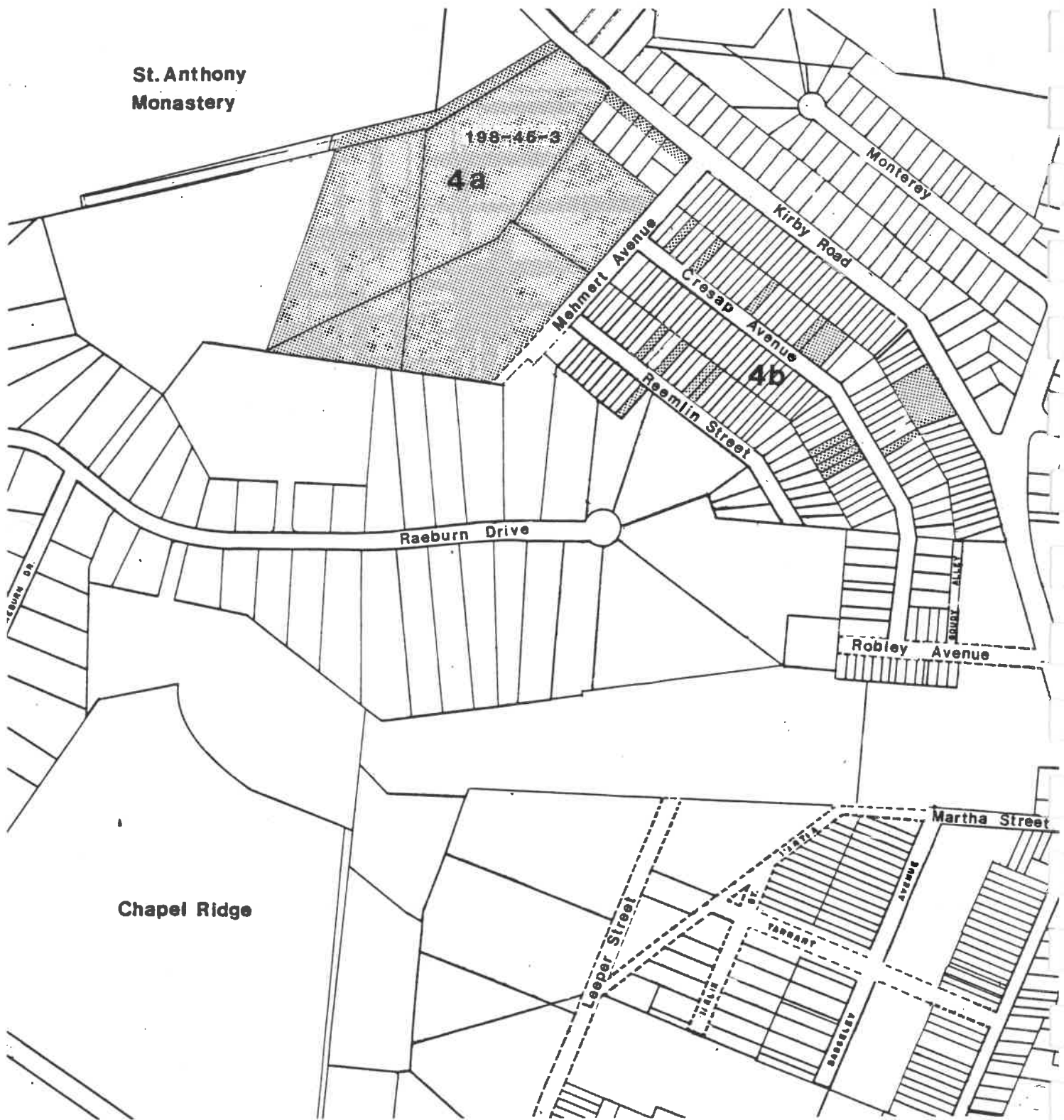
Low density residential and open space.

Reasons

The large site north of Mehmert Avenue has potential for medium density residential use, preferably as clustered PUD development. Severe slopes and landslide susceptibility in the western portions suggest open space use. The site lies near the northerly terminus of the Badgley Run Sewer and has potential for use as a storm water retention area. Because of storm water problems in this corridor, development of the site should be required to contribute no more runoff than currently leaves the site. This land should be sold with these conditions and constraints recognized.

Development opportunities are limited for the scattered sites between Mehmert and Robley Avenues. Open space use and extensions of side yards are most feasible given the terrain and slippage problems.

All development in this subarea would be governed by Environmental Quality District-Hillside regulations. These should be used to assure sensitive development of these fragile lands. The low density recommendation reflects the adopted policies and the land use plan of the Kirby Valley Mt. Airy Hillside Plan. These policies supplant the recommendations of the Coordinated City Plan.



Colerain Corridor Study

Study Area 4: Kirby Road and Mehmert Avenue

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Scale in feet 0 200 400 600

Existing Conditions

Study Area 5

Location

West of Kirby Road and north and south of Robley Avenue.

Acreage

+ 8.4 acres

Ownership

State of Ohio (7.6 a)
City of Cincinnati (.80 a)

Existing Land Use

Vacant

Adjacent Land Use

Vacant land to the north, vacant and commercial uses to the east, vacant and single-family residences to the south and west.

Existing Zoning

B-3 along Kirby Road, and R-4 north and south of Robley Avenue.

Topography

Ranges between 600' west of Robley Avenue and 515' west of Kirby Road.

Soils

Urban Land-Martinsville complex (UmB)
Pate silty clay loam (PSE)

Landslide Susceptibility

Moderately high and high.
Landslides have occurred in the vicinity of Robley Avenue.

Vegetation

Scattered close to Kirby Road and increasingly dense farther west.

Sewerage

Available

Water System

Adequate

Access

Kirby Road, Martha Street, Robley Avenue.

Recommendation

Low density residential/open space, recreation and commercial.

Not approved by CPC in 1983. Recommended use is premature as of 9/21/89

Reasons

The land north of Robley could be used for residences. South of Robley a mix of uses would be appropriate because of natural feature concerns. The low area near Martha Street tends to flood so it could be used as an alternative recreation site for the facility proposed for Firtree Court.

Higher ground in the western part of the study area has potential as a residential site with a mix of open space to help assure compatibility with sensitive features. The EQ-HS zoning will help achieve this objective. The low density residential recommendation is consistent with the adopted policies and the land use and zoning recommendations of the Kirby Valley/Mt. Airy Hillside Plan. These policies supplant the medium density recommendation of the Coordinated City Plan. Commercial expansion opportunities should be provided at the intersection of Martha Street and Kirby Road. Such use would be compatible with adjacent uses and would allow strengthening of the commercial node already at the Kirby Road, Frederick Avenue and Martha Street intersection.



Colerain Corridor Study

Study Area 5: Kirby Road and Robley Avenue

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983





Colerain Corridor Study

Study Area 6: Firtree Court and Kirby Road

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 6

Location

East of Firtree Court, and Kirby Road, and west of Hamilton Avenue.

Acreage

10.1 acres

Ownership

State of Ohio (2.4 a)
City of Cincinnati (7.7 a)

Existing Land Use

Vacant except for house on Parcel 200-47-2
4667 Hamilton Avenue

Adjacent Land Use

Single-family residences to the north; one and two-family residences, a multi-family development and commercial uses to the east; single-family residences and commercial uses to the south, and vacant land to the west.

Existing Zoning

R-2 east of Firtree Court; R-5 and B-3 east of Kirby Road; B-1 west of Hamilton Avenue; R-4 west of Robinson Circle.

Topography

Ranges between 600' west of Hamilton Avenue and 550' at the south edge of Firtree Court.

Soils

Urban Land-Martinsville Complex (UmB)
Casco loam (CdF)

Landslide Susceptibility

Moderate

Vegetation

Dense only along eastern boundary.

Sewerage

Available

Water System

Adequate

Access

Kirby Road and Firtree Court

Recommendation

Open Space/Recreation, Residential, and Commercial

*Not approved by CPC in 1983
Recommended use as premature as
of 9/21/88*

Reasons

Firtree Court residents desire the development of a recreation facility on this site. Low density housing is another possible use. Any residential development should retain sufficient open space to satisfy the needs of Firtree Court residents. The west end of Otte Street should be vacated to better accommodate site development. Due to storm sewer capacity problems south of this site, new development should be restricted from adding additional runoff into the existing sewer system. Recreation facilities could be located along Kirby Road which would allow for better community access. The parcels at the far southern tip of the study area could serve commercial expansion needs for the business already at Frederick and Kirby, or for new business compatible with the neighborhood environment.



Colerain Corridor Study

Study Area 7: Virginia Avenue

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 7

Location

West of Virginia Avenue between Martha Street and Washburn Street.

Acreage

16.6 acres

Ownership

State of Ohio (14.7 a)
City of Cincinnati (1.9 a)

Existing Land Use

Vacant

Adjacent Land Use

Vacant land to the north, single and two-family residences to the east; vacant, single-family and multi-family residences to the south and west.

Existing Zoning

R-4 and entirely within EQ-HS 7.

Topography

Ranges between 625' at Bagdley Avenue and 515' along Virginia Avenue.

Soils

Urban Land-Martinsville Complex (UmB)
Bonnell silt loam (BoD)

Landslide Susceptibility

High and moderately high.

Vegetation

~~Scattered along Virginia Avenue, increasing tree cover throughout the site.~~

Sewerage

Available

Water System

Adequate

Access

Martha St., Badgley Ave. and Washburn St.

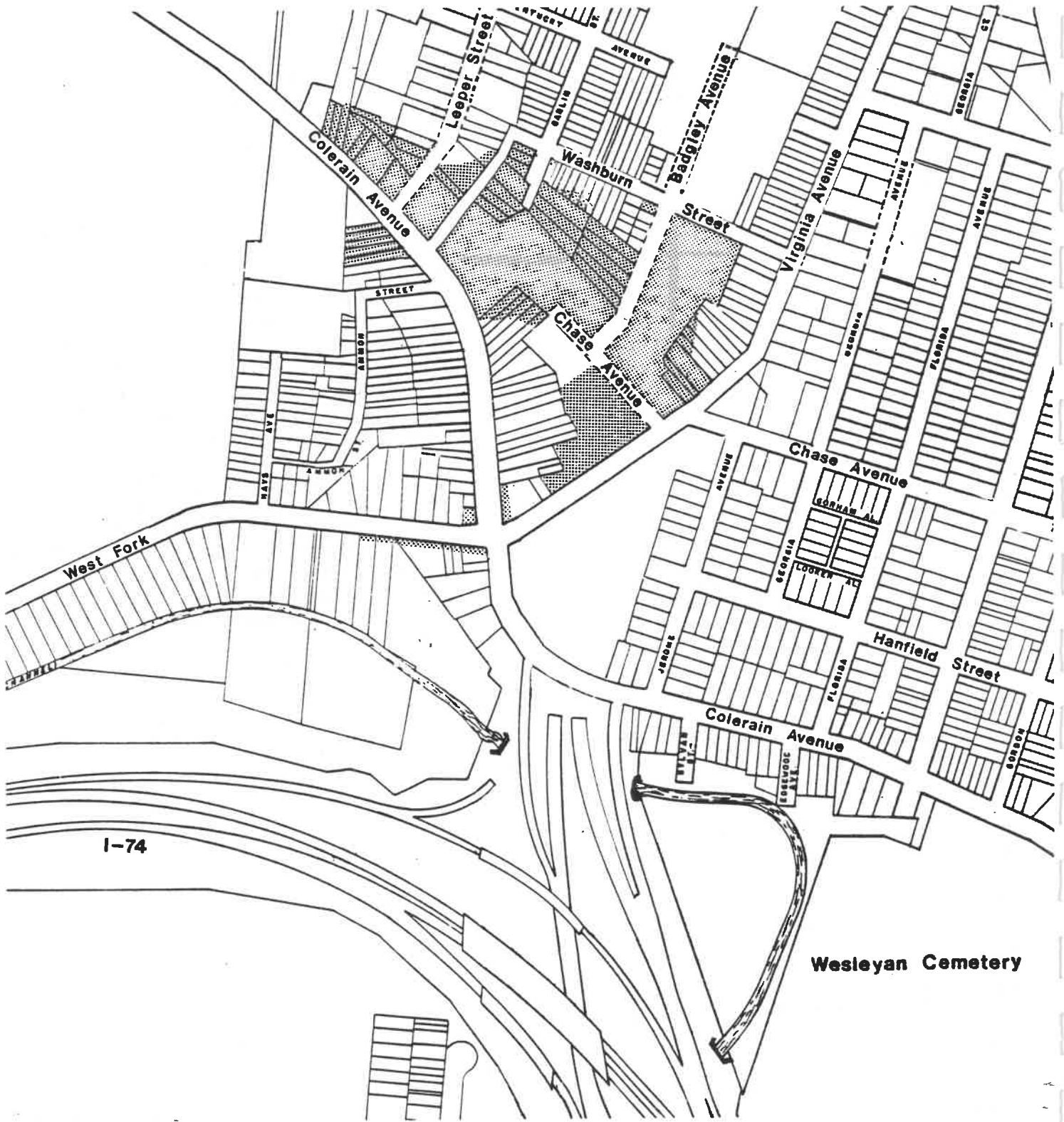
Recommendation

Public open space, and residential mixed with open space.

Reasons

*Not approved by CPC in 1983.
Recommended use is premature
as of 9/21/88*

Severe slopes and high landslide potential preclude development of much of this land, especially that between Tarrant Street and Kentucky Avenue. This land should remain in public ownership. Residential use of the remainder of the study area must acknowledge the fragile nature of the land and integrate open space with any new development. Existing EQ-HS zoning provides a tool for implementing this aspect of the recommendation. Storm water requires careful attention. New development should not add to the amount of storm water leaving the site, and storm drainage within the existing ravines should be intercepted and disposed of.



Colerain Corridor Study

Study Area 8: Washburn Street and Chase Avenue

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Scale in feet 0 200 400 600

Existing Conditions

Study Area 8

Location

North of Colerain Ave. and Virginia Ave. intersection and south of Washburn St.

Acreage

+ 8.3 acres

Ownership

State of Ohio (7.9 a)
City of Cincinnati (.4 a)

Existing Land Use

Vacant

Adjacent Land Use

Single and two family residences and vacant land to the north and east, single and two family residences and commercial use to the south, and single family, two family and multi-family residences to the west.

Existing Zoning

B-1 and B-4 north of Virginia Avenue, B-3 east of Colerain Ave. and R-4 north of Chase Avenue -- major part of the site is within EQ-HS 7.

Topography

Ranges between 575' at Washburn and Leeper Street and 525' along Virginia Avenue.

Soils

Bonnell silt loam (BoD)
Pate Urban Land Complex (PhD)

Landslide Susceptibility

Moderate, moderately high and high susceptibility.
Landslides have occurred in the vicinity of Leeper and west of Leeper.

Vegetation

Few and scattered.

Sewerage

Available

Water System

Adequate

Access

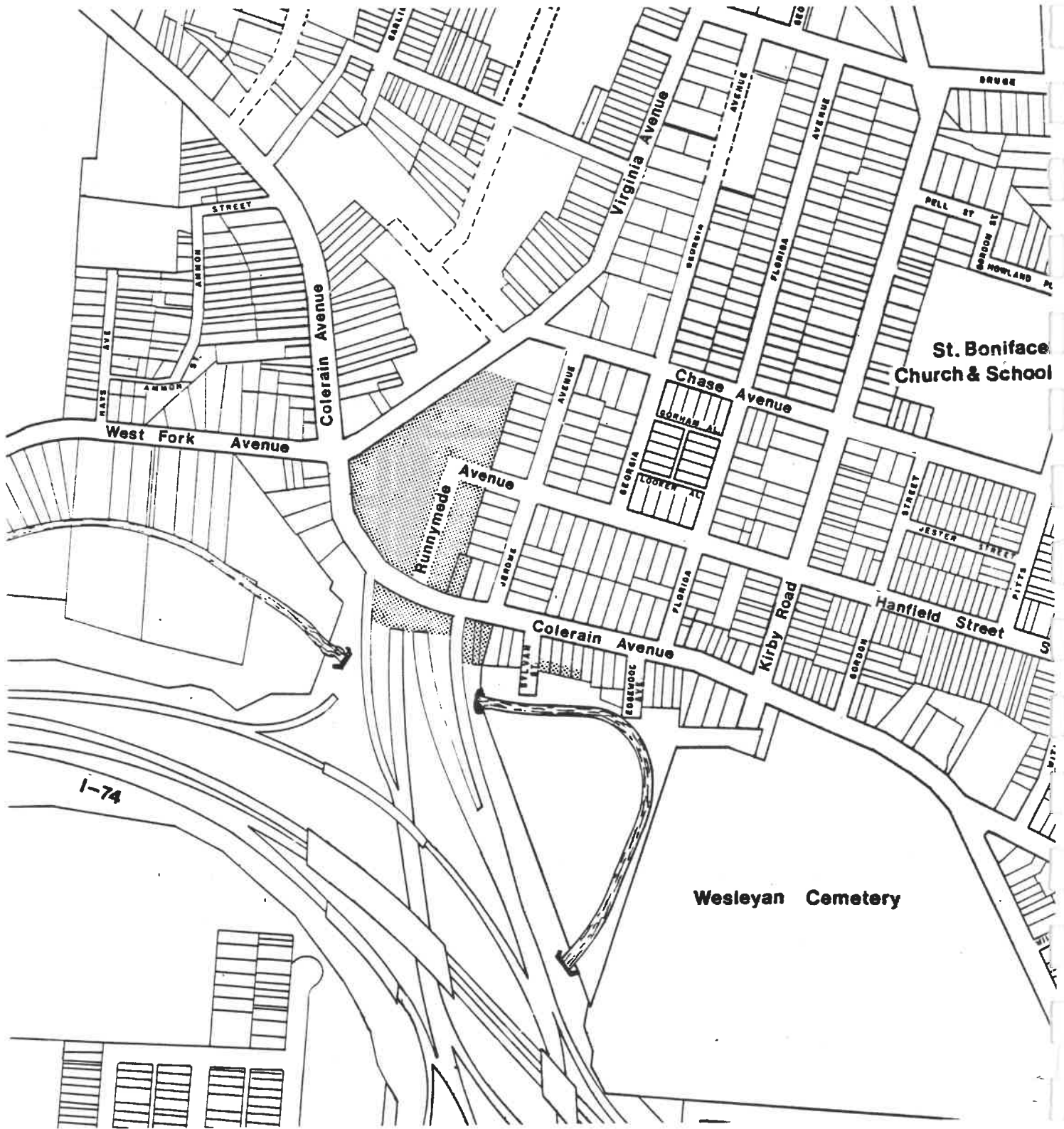
Virginia Ave., Washburn St., Colerain Ave., Leeper St., Lambston St., and Chase Ave.

Recommendation

Land bank for possible transportation use. *Not approved by CPC in 1983
Recommended use is premature.*

Reasons *as of 9/21/88*

Several transportation alternatives considered in the Colerain Corridor Study use this land to complete a connection between I-74 and Colerain Avenue. Detailed design and environmental impact analysis will select a single highway alternative and determine more exactly which land will be used for highway purposes.



Colerain Corridor Study

Study Area 9: Runnymede Avenue

Department of Public Works
 Department of City Planning
 Cincinnati, Ohio May, 1983



Existing Conditions

Study Area 9

Location

North of Colerain Ave. and east of Virginia Ave.

Acreage

+ 5.1 acres

Ownership

City of Cincinnati (0.05 acres) and State of Ohio (5.05 acres)

Existing Land Use

Vacant

Adjacent Land Use

Vacant to the north, single and two family residences to the east; vacant and I-74 to the south, vacant, single and two family residences and commercial uses to the west.

Existing Zoning

B-1 east of Virginia Avenue; B-4 at the intersection of Virginia and Colerain; B-3 north of Colerain Ave.; and R-5(T) west of Runnymede, and R-5 west of Hanfield Street.

Topography

Ranges between 525' and 500'.

Soils

Urban Land-Martinsville Complex (UmB)

Landslide Susceptibility

Moderate

Vegetation

None

Sewerage

Available

Water System

Adequate

Access

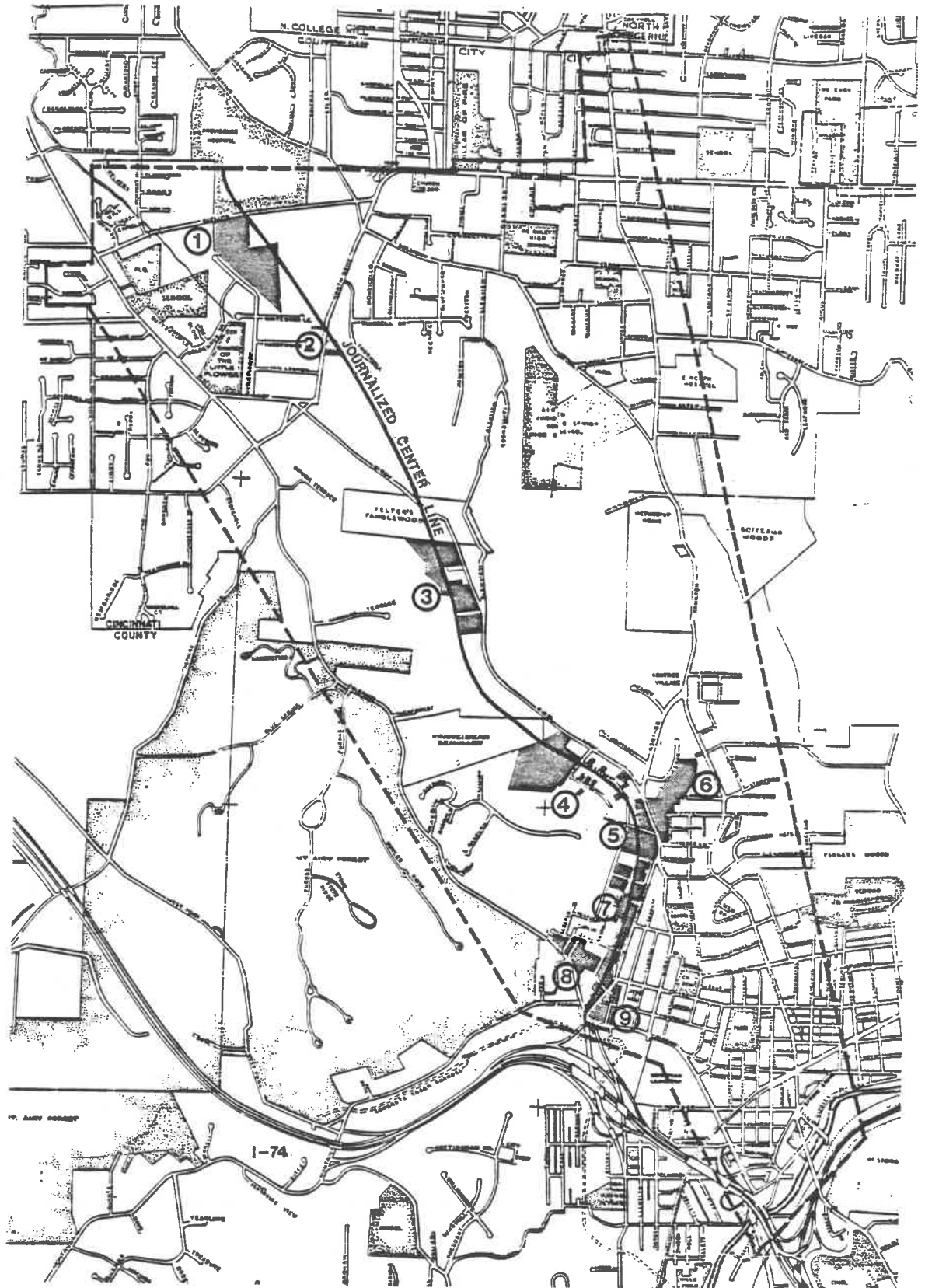
Virginia Ave., Chase Ave., Colerain Ave., and Hanfield.

Recommendation

Land bank for possible transportation use. *Not approved by CPC in 1983,*

Recommended w/o premiture
Reasons *as of 9/21/88*

Several transportation alternatives considered in the Colerain Corridor Study use this land to complete a connection between I-74 and Colerain Avenue. Detailed design and environmental impact analysis will select a single highway alternative and determine more exactly which land will be used for highway purposes.



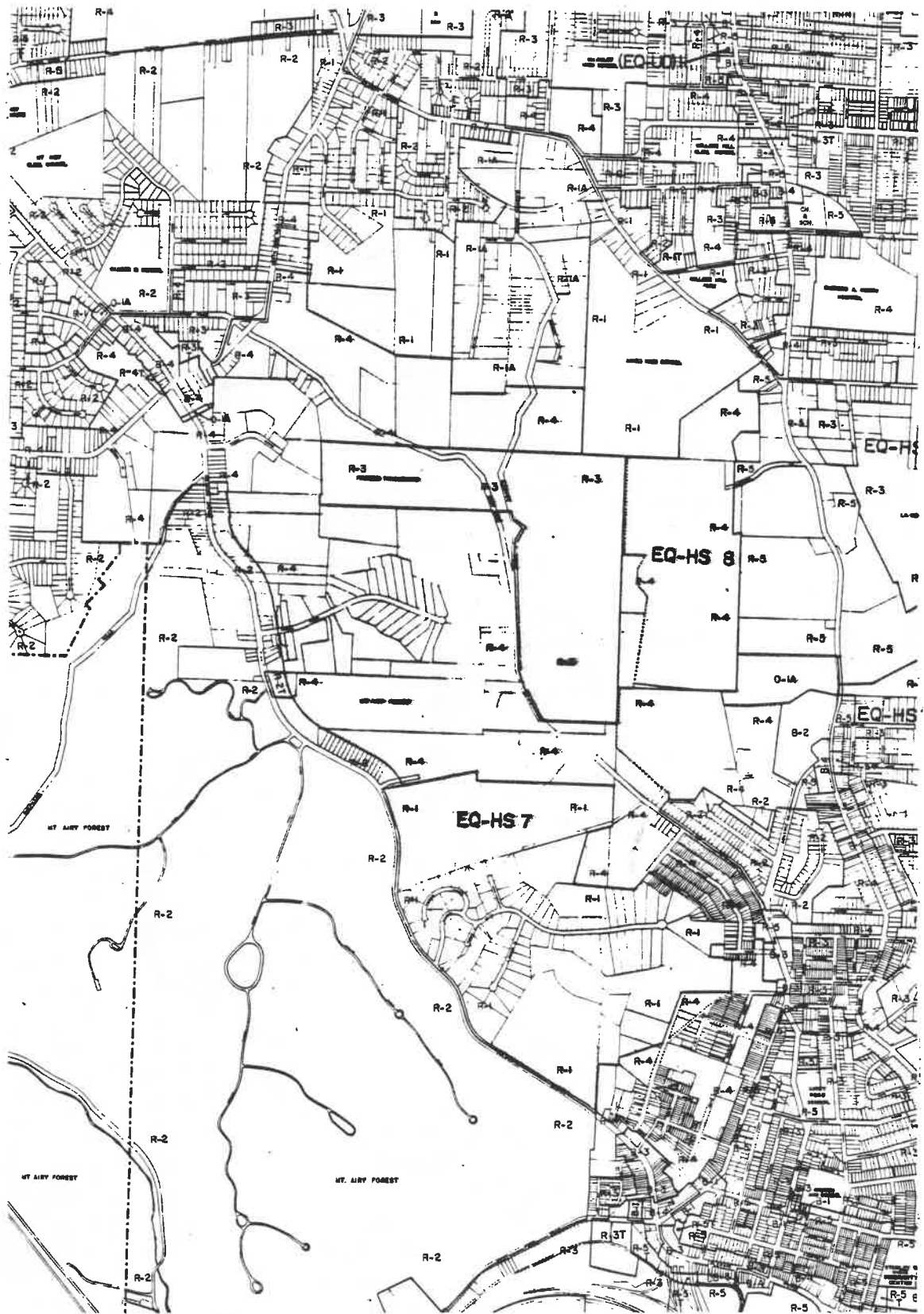
Colerain Corridor Study
Land Use Study Areas

① Site Identification Number



0 1000 2000 3000
 Scale in feet

Department of City Planning
 Department of Public Works
 Cincinnati, Ohio May, 1983



Colerain Corridor Study
Zoning

Department of City Planning
 Department of Public Works
 Cincinnati, Ohio May, 1983

Legend

Environmental
 Quality Districts 7 & 8



MAP 16
 Scale in feet 0 366 732 1100