

Access to Educational Opportunity in Rural Communities: Alternative Patterns of Delivering Vocational Education in Sparsely Populated Areas

***Volume 6: Glencoe, Lester Prairie, Brownton
A Centralized Non-Center Agreement***

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ACCESS TO EDUCATIONAL OPPORTUNITY IN RURAL COMMUNITIES:
ALTERNATIVE PATTERNS OF DELIVERING VOCATIONAL EDUCATION
IN SPARSELY POPULATED AREAS

- Volume 1: Problem, Study Design and Procedures, Findings, Conclusions, and Recommendations. Thomas, R. and Peterson, R.
- Volume 2: The Heartland Vocational Center: A Decentralized Center. Thomas R.; Peterson, R.; Anderson, M. J.
- Volume 3: The Northwest Multi-District: A Mobile Facilities Center. Peterson, R.; Thomas, R.; Anderson, M. J.
- Volume 4: The Inter-District Cooperative Center: A Centralized Center. Peterson, R.; Thomas, R.; Rabideau, R.; Anderson, M. J.
- Volume 5: The Clay-Wayne County Joint Agreement: A Decentralized Noncenter Agreement. Thomas, R.; Peterson, R.; Rabideau, R.
- Volume 6: Glencoe, Lester Prairie, Brownston: A Centralized, Noncenter Agreement. Peterson, R.; Thomas, R.; Rabideau, R.

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Superintendent David Klepel, Brownton, MN
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CHAPTER I

STUDY BACKGROUND, PURPOSE, AND METHOD

The Glencoe, Lester Prairie, Brownton case study is one of a series completed between 1980 and 1983 under a project sponsored by the University of Minnesota Agricultural Experiment Station. These case studies were begun in 1978 to address the problem of access of rural students to vocational education through inter-school district cooperation.

The purposes of the case studies were to: 1) identify, describe and analyze means of delivering vocational education in sparsely populated rural areas that involve cooperation among school districts; 2) provide an information base relevant to state and local policy questions regarding such programs; 3) make recommendations regarding the appropriateness of each form of cooperation studied for various community and geographical settings; and 4) generate concepts and hypotheses to guide further study and development of educational delivery in sparsely populated rural areas. Each case study addressed the following questions:

1. What are the essential features of this form of inter-school district cooperation?
2. How does the cooperative arrangement work, and what factors seem to facilitate or impede its operation and the maintenance of cooperation between school districts?
3. How does the cooperative arrangement fit with the characteristics of its setting (i.e., with geographical, community, and school district characteristics)?
4. What consequences does the cooperative arrangement have for educational access and quality?
5. How might the cooperative arrangement be modified?

While there are several existing and potential approaches to delivering vocational education in sparsely populated rural areas, the case studies in this series are limited to approaches that are managed by school districts, serve secondary students, and involve cooperation among school districts. The portion of the case studies concerned with specific vocational programs focuses on agriculture and home economics.

The general model describing approaches and patterns for delivering Agricultural and Home Economics programs was developed in 1981. These case studies were developed to examine one of that model's alternatives. The general model is presented in Figure 1. Only the portion of Figure 1 which concerns cooperative school patterns is addressed by this series of studies. The Glencoe, Lester Prairie, Brownton case studies are an example of the noncenter centralized variation of the cooperative school pattern. Relevant literature was reviewed and the model presented in Figure 1 was formulated in an earlier publication (Peterson, et al., 1981).

Case study methodology was used for developing a general understanding of inter-school district cooperation because it provides detailed description based on in-depth observation and can uncover underlying factors unlikely to be discovered using less intensive methodologies. However, it also limits the generalizability of the data. The tradeoff seemed appropriate given the goal of understanding the patterns of inter-school district cooperation, and sparse knowledge regarding the delivery of vocational education in rural areas. Potentially critical variables must be identified before they can be studied using research methods that lead to broadly generalizable results.

Instruments and data collection procedures were developed to address the variables listed in Figure 2. These variables were selected on the basis of a literature review presented earlier (Peterson, et al., 1981).

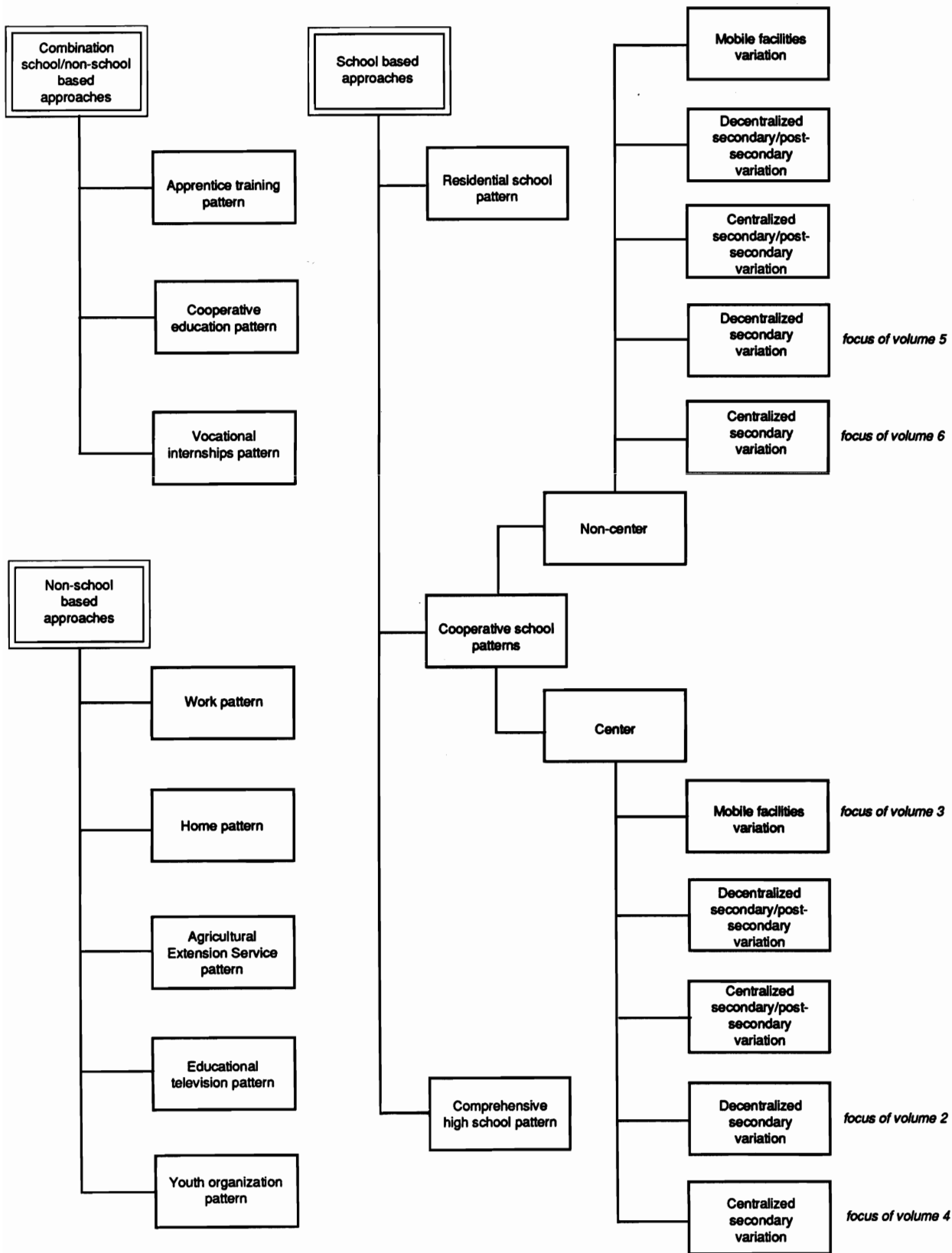


Figure 1. Conceptual model of approaches, patterns and variations for delivering vocational education.

curriculum	governance	size
program size	total curriculum	population density
travel involved	school size	geographical location
facilities	school facilities	cultural ethnic character
student	students	socioeconomic character
age	college/vocational	tax base
attitude	orientation	unemployment rate
grade level	families	poverty level
prior education	special needs	average age
dropout rate	dropout rate	educational level
ethnicity	school district	mobility
program administration	administration	employment opportunity
program staff	budget resource base	educational opportunities
size	school staff	
qualifications	size	
attitudes	qualifications	
teaching loads	attitudes	
cost	policies	
schedules		
advisory groups		
student organization		
policies		

STUDENT OUTCOMES

skills and abilities
attitudes
future plans
future placement

COMMUNITY OUTCOMES

trained personnel
program and school
knowledge
program and school
relationships

=====

Figure 2. Input and outcome variables relevant to vocational education delivery patterns.

One set of instruments, which required data from records and other descriptive information, was sent to the site for completion prior to the site visit. A second set of instruments was used to guide on-site observations and interviews with school personnel and community members. Instruments, study design, and procedures were pilot-tested in February and March, 1980. The relationships among the research questions, data collected, data resources, and the data collection methods are presented in Table 1.

Study sites with delivery systems fitting the conceptual model in Figure 1 were located through a state and comprehensive national survey, the latter portion having been used for topics covered in other volumes of this series. The pool of potential sites was limited to small rural school districts which offered both agriculture and home economics programs, since the delivery of these vocational programs in sparsely populated areas was of particular interest. Further site selection criteria included cooperation of school officials and others at the site, and accessibility within resource constraints of the project.

All selected sites contacted agreed to participate, although in some instances individual school districts did not participate in the full-scale data collection. Interviews were scheduled by school personnel in advance of the site visit.

Site visits involved a team of three researchers spending one to three days conducting interviews and observing the cooperative arrangement. Interviewed were vocational directors, school superintendents, principals and board members, vocational program advisory committee members, home economics and agriculture teachers, school counselors, and parents of students.

Table 1. Research questions, data to be obtained, source(s) of data and method of data collection.

Research Questions	Data to be Obtained	Data Source(s)	Method of Data Collection
1. What are the essential features of this form of inter-school district cooperation?	1. Number of facility locations	Cooperative arrangement administrator(s) and direct observation	Interviews, on-site observations
	2. Type of governance structure	Cooperative arrangement administrator(s) and governance documents	Interviews, on-site observations, document analysis
	3. Structure, responsibility and role of administrative staff	Cooperative arrangement administrator(s) and governance documents	Interviews, document analysis
	4. Structure and responsibility of teaching staff	Cooperative arrangement administrator(s) and teaching staff	Interviews, questionnaires
	5. Financial structure(s)	Cooperative arrangement administrator(s), policy-makers and agreement documents	Interviews, questionnaires, document analysis
	6. Nature of legal agreements between schools	Agreement documents	Document analysis
	7. Approval mechanisms	Agreement documents, State Dept. of Education	Document analysis, interview
	8. Transportation patterns	Cooperative arrangement administrator(s)	Interviews, questionnaires
	9. Vocational curriculum	Cooperative arrangement administrator(s), student handbook	Interviews, questionnaires, document analysis

Table 1. (cont'd.) Research questions, data to be obtained, source(s) of data and method of data collection.

Research Questions	Data to be Obtained	Data Source(s)	Method of Data Collection
2. How does the cooperative arrangement work? What factors seem to facilitate or impede its operation and the maintenance of cooperation between school districts?	1. Communication networks among schools	Cooperative arrangement administrator(s) teachers, agreement documents	Interviews, questionnaires document analysis
	2. Perceived need for cooperation	Cooperative arrangement policy makers, school administrators, community members, teachers	Interviews, questionnaires
	3. Perceived benefits from cooperation	Cooperative arrangement policy makers, school administrators, community members, teachers	Interviews, questionnaires
	4. Transportation	Cooperative arrangement school administrators	Interviews, questionnaires
	5. Schedules	Cooperative arrangement school administrators	Interviews, questionnaires
	6. Enrollments	Cooperative arrangement school administrators, state reports	Questionnaires, reports analysis
	7. Attitudes	Cooperative arrangement school administrators, policy makers, teachers, community members	Interviews, questionnaires
	8. Resources	Cooperative arrangement school administrators, policy makers, state reports	Questionnaires, interviews report analysis

Table 1. (cont'd.) Research questions, data to be obtained, source(s) of data and method of data collection.

Research Questions	Data to be Obtained	Data Source(s)	Method of Data Collection
3. How does the cooperative arrangement fit with the characteristics of its setting (i.e., with geographical, community and school district characteristics)?	1. Attitudes toward education	School administrators, teachers, policy makers, community members, students, parents	Interviews, questionnaires
	2. Resources provided to school	State-generated reports	Report analysis
	3. Future education and career plans of high school graduates	School counselors, students, parents	Interviews, questionnaires
	4. Community demography, cultural and ethnic background	U.S. Census, Dept. of Economic Security	Document analysis
	5. Community resources	State Dept. of Economic Security, local telephone book, direct observations	Document analysis, on-site observations
	6. Community economic patterns	Dept. of Economic Security, U.S. Census	Document analysis
	7. Community health statistics	Dept. of Public Health	Document analysis
	8. Physical geography	Direct observation	On-site observation
	9. Transportation systems available	State Dept. of Economic Security, maps	Document analysis
	10. School district enrollments, class size	State reports, school administrators	Report analysis, questionnaire
	11. School district income, expenditures	State reports	Report analysis, questionnaire
	12. School district faculty and administration size, qualifications	School administrators	Questionnaires

Table 1. (cont'd.) Research questions, data to be obtained, sources(s) of data and method of data collection¹.

Research Questions	Data to be Obtained	Data Source(s)	Method of Data Collection
	13. School district facilities	School administrators, direct observation	Questionnaires, interviews, on-site observation
	14. School district schedules	School administrators	Questionnaires, interviews
	15. School district curricula	Student handbook	Document analysis
	16. School district student transportation patterns	School administrators	Questionnaires, interviews
4. What consequences does the cooperative arrangement have for educational access and quality?	1. Access		
	a. Number of students enrolled in cooperative delivery mechanisms	Cooperative arrangement and school administrators, teachers	Questionnaires, interviews
	b. Curriculum available to students	Cooperative arrangement and school administrators, handbooks, reports	Questionnaires, interviews document analysis
	c. Transportation requirements for students	Cooperative arrangement and school administrators	Interviews, questionnaires
	d. Schedules	Cooperative arrangement and school administrators, faculty	Interviews, questionnaires
	2. Quality		
	a. Student organization functioning	Cooperative arrangement and school administrators, teachers	Interviews
	b. Faculty qualifications	Cooperative arrangement and school administrators, faculty	Interviews, questionnaires
	c. Facilities	Cooperative arrangement and school administrators, faculty, direct observation	Interviews, questionnaires, on-site observation

¹Research question five is not included in the table since it involves extension from and interpretation of the data rather than data collection.

State guidelines and legal structures were obtained from State Department of Education staff. A profile of the setting was constructed on the basis of data obtained from the U.S. Census, state agencies, on-site observations, and pre-site visitation questionnaires. Data from the 1980 U.S. Census was not available at the time site profiles were developed, so 1970 census data was used and supplemented by more recent data from state and other federal agencies. In some instances, comparable data across years and communities was unavailable.

Data presented here in this report was collected in April, 1982. This study represents an in-depth description of a centralized non-center delivery pattern for providing vocational education in sparsely populated rural areas. A comparative analysis of all five case studies is presented in Volume 1 of this series (Thomas, R., et al., 1984). It provides an analytical discussion of the significance and implications of the descriptive information contained in each of the case studies.

CHAPTER II

SETTING

Minnesota State Structure

Minnesota joint exercise of process statute, (Minnesota Statutes, section 471.59) provides for cooperative activity between two or more governmental units such as school districts. Under this statute, governing bodies of school districts may enter into agreements to jointly or cooperatively exercise any power common to the contracting bodies. This statute provides for one or more districts to exercise powers on behalf of the other participating units. Such agreements may, but are not required, to include joint boards.

The statute specifically indicates that governmental units (including school districts) may enter into agreements to have services that the unit itself is authorized to provide, provided by another unit on its behalf.

The joint exercise of powers statute together with a 1974 Minnesota Law which provides for the establishment of Vocational Education Cooperative Centers (Chapter 252-H.F. No. 1489, Section 1 [123.351]), form the legal basis for cooperation between school districts in providing educational and other services.

School districts have the right to contract with each other or in groups, or to establish a more formal structure, such as a vocational center, for their cooperative efforts. During the 1970's, vocational education received special emphasis at the state level and state goals were set for the establishment of secondary vocational centers throughout Minnesota. These centers were to provide expanded vocational education curricular offerings to Minnesota students who, largely because of their geographic location, did not have access to a range of vocational curricula.

In response to pressures and incentives provided by the state, 61 centralized centers were established. But through the late 1970s and the early 1980s, student populations at the secondary level were declining and financial resources at both state and local levels were shrinking. Some school districts withdrew from the centers and a substantial number were dissolved. However, the notion of interschool district cooperation introduced did not necessarily die with the dissolution of the center or withdrawal of a school district. A number of variations of inter-school district cooperation emerged, not involving a center structure, but based on school districts experiences in a center. The Glencoe, Lester Prairie, Brownton case is one example of cooperation which developed in the aftermath of center participation.

Geography

The Glencoe, Brownton, Lester Prairie, Minnesota Cooperative Unit began in 1976. The non-center centralized agreement was initiated by the superintendents of the three schools following the break up of a secondary vocational center at Hutchinson, Minnesota. Glencoe, Brownton and Lester Prairie school districts are located in McLeod county in central Minnesota, approximately 50 miles southwest of Minneapolis/St. Paul. Figure 3 shows the location of the communities relative to the metropolitan Twin City area.

The area possesses a rich, fertile soil that may be described as flat to gently rolling. Agriculture in the area is somewhat diversified. Dairy is the primary livestock enterprise. Corn, soybeans, hay and small grains are the principle crops. Soil is generally well-drained and intensely farmed. Average farm size is about 180 acres with about 85-90 percent of the land in farms. The countryside is densely populated with farm building sites in good condition and appearing to be well kept. Land values averaged about \$2,200 per acre during the time of the survey in 1982, according to the vocational agriculture teachers.

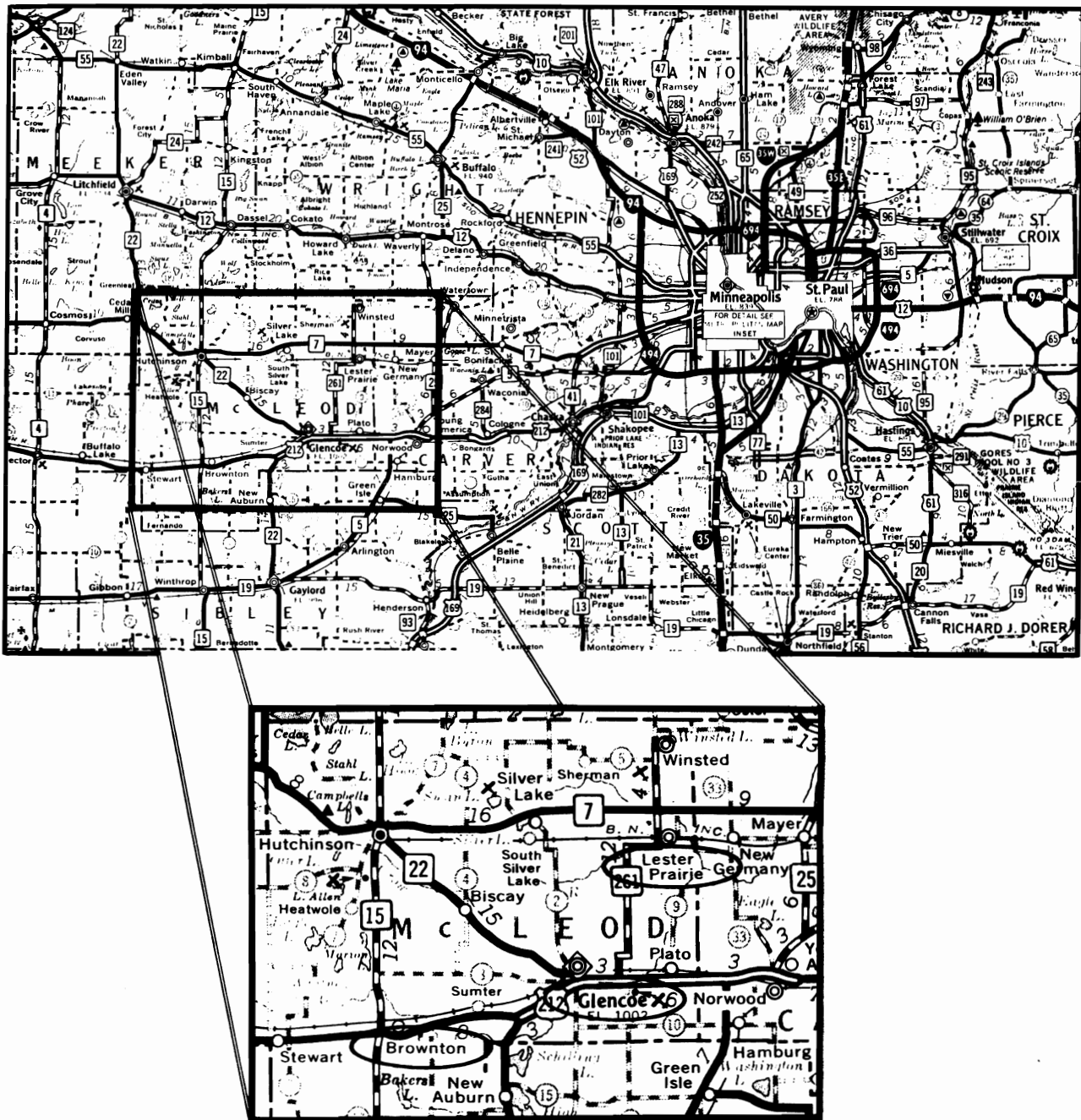


Figure 3. Location of the Glencoe, Brownton and Lester Prairie Cooperative Unit in the State of Minnesota.

Glencoe (population 4,200) is the McLeod county seat, however, Hutchinson (population 9,500) is the largest city. A number of small towns exist throughout the county including Brownton, Stewart, Lester Prairie, Winsted and Silver Lake, plus the villages of Sherman, Biscay, Fernando, Sumpter, Plato and Heatwole.

Population Size, Age and Sex Characteristics

Table 2 shows the steady increase in the population of McLeod County. There was a slight slowdown in the rate of growth in 1980, however, population projections from the Minnesota State Demographer's office estimate that the increase will again attain the rate of growth of approximately one percent per year as noted in 1960 and 1970. During the 50 year period shown in Table 2, the population increase of McLeod county is estimated to be greater than 40 percent, about 15,000 people. The table also shows a Total county population of 29,657 in 1980.

Table 2: Number and percentage change in population (Trends and projections for McLeod County, Minnesota, 1950-2000.)

<u>County Population Trends and Projections, McLeod County</u>			
<u>Year</u>	<u>Number</u>	<u>Change</u>	<u>Percent Change</u>
1950	22,198	-	-
1960	24,401	2203	9.0
1970	27,662	3261	11.8
1980	29,657	1995	6.7
*1990	33,800	4143	12.3
*2000	37,400	3600	9.6
1950-2000	-	+ 15,202	+ 40.6

*Projection Source: U.S. Census and Population Projections for Minnesota Counties, Minnesota State Demographer, 1980.

Table 3 shows population trends for the communities of Glencoe, Lester Prairie and Brownton, as well as those for McLeod County. Glencoe most closely matches the county trend, with sizeable increases in 1960 and 1970, and a large drop in 1980. Lester Prairie experienced a sharp decrease in the rate of population growth. Brownton's population remained stable across the 30 year time period.

Age and sex estimates for the population of McLeod County are in Table 4. It shows 54.3 percent of the population between the ages of 18-64 in 1975, with 32.7 percent under age 18.

Table 5 presents information regarding the classification of the county population into the city and township categories. Approximately 64 percent of the population is classified as city and 36 percent as township.

and McLeod County, Minnesota, 1950-1980.

Population Trends	Town and County Populations			
	Glencoe Township	Lester Prairie	Brownton	McLeod County
1950	3,542	663	696	22,198
1960	4,073	966	698	24,401
1950-1960 Percent Change	13.0	31.4	0.3	9.0
1960	4,073	966	698	24,401
1970	4,935	1,162	688	27,662
1960-1970 Percent Change	17.5	16.9	-1.5	11.8
1970	4,935	1,162	688	27,662
1980	5,057	1,229	697	29,657
1970-1980 Percent Change	2.4	5.8	1.3	6.7

Source: U.S. Census of Population, General Population Characteristics and Minnesota State Demographer, 1980.

Table 4: Age and sex population estimates for McLeod County, Minnesota, 1975.

Age Range	McLeod County Population by Sex Classification					
	Male		Female		Total	
	N	%	N	%	N	%
Under 18	4900	51.6	4590	48.4	9490	32.7
18-64	7710	49.0	8020	51.0	15,730	54.3
65 and Over	1710	45.4	2060	54.6	3770	13.0
TOTAL	14,320	49.4	14,670	50.6	28,990	100.00

Source: Age Estimates for MN Counties, Minnesota State Demographer, April 1975.

Table 5: Number and percentage of the city and township populations in McLeod County, 1980.

County	City		Township		Total	
	N	%	N	%	N	%
McLeod	18,906	64.0	10,751	36.0	29,657	100.00

Source: U.S. Census, 1980. General Population Characteristics.

births exceed deaths by 1,500 and immigration is up by 400, for a total of 1,900, a seven percent increase over the eight years from 1970-78.

Table 6: Factors affecting population change in McLeod County, Minnesota, 1970-78.

Population Factors	McLeod County	
	N	Percent
Births	3700	-
Deaths	2200	-
Total Change	1500	5.5
Migration	400	-
Total Change	+ 400	1.5
<hr/>		
Population Change 1970-1978	1900	7.0

Source: Population Estimates for Minnesota Counties, Office of State Demographer, State Planning Agency, 1978.

Economic Characteristics

In this section, a number of economic and employment characteristics are reviewed regarding McLeod County, Minnesota. Table 7 shows the median income of families living in the county. The median income of \$19,674 compares to \$21,321 for all Minnesota families. McLeod County has 10.2 percent of its families with incomes below the poverty level as compared to 10.7 percent for the state. Also, 69.7 percent of Minnesota families have incomes of \$15,000 or more as compared to McLeod County's 67.7 percent.

Table 7: Median income and percent of family income at selected levels for McLeod County Minnesota, 1979.

County	Income Totals		Selected Income Levels			
			- \$7,499		+ \$15,000	
	# of families	Dollars	#	%	#	%
McLeod	7,968	\$19,674	814	10.2	5391	67.7
Minnesota Average	1,016,480	\$21,321	108,918	10.7	708,189	69.7

Source: U.S. Census, General Population Characteristics, 1980.

Table 8 shows what percentages of the county's population are employed in various occupational categories. The table shows that 32.6 percentage of employed persons are in manufacturing industries, 3.8 percent in transportation, 4.0 percent in wholesale, 15.0 percent in retail, 2.7 percent in finance, 21.0 percent in service occupations and 1.6 percent in public administration.

selected occupational categories.

Manufacturing		Transportation		Wholesale		Retail		Finance		Service		Public Admin.	
#	%	#	%	#	%	#	%	#	%	#	%	#	%
4436	32.6	512	3.8	545	15.0	2035	15.0	361	2.7	2858	21.0	225	1.6

Source: U.S. Census, General Social and Economic Characteristics, 1980.

Table 9 shows the number of employed and unemployed rural farm and rural non-farm workers in McLeod County. The table shows a total of 3,230 persons in the farm labor force, with about two percent unemployed. The table also shows 2,964 rural non-farm persons in the workforce, with about three percent unemployed. While percentages of males and females represented in the total population of McLeod county are approximately equal, more than twice the number of males are represented in the work force as compared to females.

Table 9: Number of employed and unemployed farm and non-farm workers in McLeod County, Minnesota, 1980.

Employment	McLeod County			
	Rural Farm		Rural Non-Farm	
	N	%	N	%
Males 16 or older				
Employed	2268	97.8	1868	98.3
Unemployed	52	2.2	25	1.3
Total Male Labor Force	2320	100.00	1893	100.00
Percent of Males in Labor Force	-	71.8	-	63.9
Percent of County Labor Force	-	37.5	-	30.6
Females 16 or older				
Employed	896	98.5	1016	94.9
Unemployed	14	1.5	55	5.1
Total Female Labor Force	910	100.00	1071	100.00
Percent of Females in Labor Force	-	28.2	-	36.1
Percent of County Labor Force	-	14.7	-	17.2
Total County Labor Force	3230	100.00	2964	100.00

Source: U.S. Census General Social and Economic Characteristics, 1980.

Table 10 presents data concerning the number of workers employed and unemployed for McLeod County 1979. It shows employment ranging from a low of 14,935 in December to a high of 17,984 in August, and unemployment ranging from a low of 2.2 percent in August and September to 4.7 percent in December. This reflects the impact of some seasonal labor employed by the Green Giant Canning Company in Glencoe.

McLeod County, Minnesota, 1979.

Month	Total Labor Force N	Employment N	Unemployment N	Unemployment %
January	16,784	16,149	640	3.8
February	15,908	15,357	551	3.5
March	16,031	15,540	491	3.1
April	16,374	15,866	308	3.1
May	16,628	16,143	435	2.6
June	17,910	17,314	596	3.3
July	17,584	17,145	444	2.5
August	18,391	17,984	407	2.2
September	17,780	17,392	388	2.2
October	15,883	15,482	401	2.5
November	15,726	15,197	529	3.4
December	15,675	14,935	740	4.7

Source: Minnesota Department of Economic Security, 1979.

In general, agriculture was the principle industry and economic activity in each community. Businesses in each town either manufacture agricultural equipment, process agricultural products or provide services to farmers in communities.

Education Characteristics

Table 11 shows the median school years completed for rural farm and non-farm populations 25 years of age and older in McLeod County. That median, for those on farms, was 8.9 years of schooling. The median was 9.4 for persons classified as non-farm.

Table 11: Median school years completed for rural farm and non-farm populations 25 years of age and older in McLeod County, Minnesota, (1980).

County	Farm	Non-Farm
McLeod	8.9 years	9.4 years

Source: U.S. Census, General Population Characteristics, 1980.

Post-secondary institutions are readily available to students in this area. Hutchinson A.V.T.I. is located about 10-15 miles from Glencoe. Brownton and Lester Prairie. Normandale

Campuses and Mankato State University are all about 55 miles from the three communities. Gustavus Adolphus, a private liberal arts college, is located about 45 miles from these communities in St. Peter, Minnesota. And, two church affiliated colleges, St. Paul Bible College and Dr. Martin Luther College, are located within 20-30 miles, at St. Bonifacius and New Ulm respectively.

The McLeod County Agricultural Extension Service provides a wide range of informal education programs for farmers, homemakers, families, community members and youth.

Social and Health Characteristics

The communities of Glencoe and Hutchinson provide hospital, medical and dental services to these communities. Glencoe has a 54 bed hospital and a 77 bed nursing home facility. There are six doctors and five dentists in Glencoe and one doctor in Brownton.

Table 12 presents information regarding general marital characteristics of residents 15 years of age and older in McLeod County. Of the residents 15 years of age or older, almost 67 percent were married, 25 percent were single, 7 percent were widowed, 2 percent were divorced, and less than one-half percent were classified as separated.

Table 12: General marital characteristics of residents 15 years and older in McLeod County, Minnesota, 1980.

Marital Status	Males	Females	Total	
			N	%
Single	1,841	1,091	2,932	24.7
Married	3,953	3,942	7,895	66.6
Separated	16	21	37	.3
Widowed	148	620	768	6.5
Divorced	126	99	225	1.9
TOTAL	6,084	5,773	11,857	100.0

Source: U.S. Census, General Population Characteristics, 1980.

Community Services and Recreational Opportunities

The communities of Glencoe, Brownton and Lester Prairie offer residents a wide range of activities and together with nearby Hutchinson, feature a wide range of recreational opportunities. The area has a number of lakes for water leisure activities. Each community has a number of Protestant and Catholic churches. And, their close proximity to the metropolitan area also provides relatively easy access to that area's wide variety of social and recreational activities.

Glencoe was served by the Milwaukee Road railroad, various truck lines, and a bus line. Federal highway #212 and state highway #22 link Glencoe with the other towns in the area. It also had an airport with a 3,400 foot sod runway.

Brownton was served by the Milwaukee Road railroad service, as well as various truck lines and a bus line. The community did not have an airport but Hutchinson, 10 miles away, had a 3,200 foot paved runway with UNICOM and runway light navigation aids. Federal highway #212 and state highway #15 connect Brownton to surrounding communities.

Lester Prairie was served by various truck lines. State highways #7 and #261 linked it to the surrounding area. It had no rail service.

Cultural attractions and festivals in Glencoe included the Buffalo Creek Players Performing Artists Series, high school concerts and plays, and the Glencoe Days Festival. Glencoe also had a private nine-hole golf course, eight tennis courts, two swimming pools, four municipal parks and one county park. The community was served by two weekly newspapers.

Cultural attractions in Brownton and Lester Prairie include an annual festival plus high school plays and concerts. School athletics are also major attractions within the communities. The communities have a variety of parks and recreational facilities, including tennis courts and ball fields. School facilities are used by various community groups, and each community has a number of service organizations involving a substantial number of citizens. Weekly newspapers served the immediate communities.

Both Glencoe and Brownton have public libraries and each community has a post office.

Agricultural Characteristics

A review of the agricultural statistics and personal observation shows these communities as being heavily oriented to agriculture. Table 13 compares the number and size of McLeod County farms to statewide statistics. It shows that the average McLeod County farm was somewhat smaller than the state average, reflecting the relatively large number of smaller farms. Although 189 farms vanished between 1976 and 1982, it was reported that the pattern in the Glencoe area was one of stable farms with no rush to larger operations. This pattern existed, at least in part, because farms tended to stay in families rather than being sold to operators of large farms. Seasonal employment available to farmers' wives was reported to be a factor in maintaining the small family farm concept.

Table 13: Number and average size of farms in McLeod County, 1976-1982.

	Number of Farms		Total Land in Farms Thousand Acres		Average Size	
	1976	1982	1976	1982	1976	1982
McLeod County	1,859	1,670	305	296	164	178
STATE TOTAL	104,000	103,000	30,000	30,000	291	295

Source: Minnesota Agricultural Statistics, 1978.
Minnesota Agricultural Statistics, 1984.

Table 14 provides data on sources of cash income for farmers in McLeod County. Livestock was the greatest source of cash income, and farmers did not receive a large proportion of their income from government payments.

Table 15 shows production levels for the major crops grown in the county. Their yields in corn, soybeans, alfalfa, hay and wheat, are higher than state averages for the year noted.

Table 16 notes the number of dairy cows and amount of milk production in McLeod County. McLeod County ranked 10th in the state in total milk production in 1978.

Table 17 shows the numbers of various kinds of livestock raised in McLeod County. It may be noted that a relatively small number of cattle and sheep are on feed.

County, 1975, 1977, 1982.

Income Source	1975	McLeod County	
		1977	1982
Crops	21,006	23,886	37,305
Livestock	33,816	37,742	61,954
Government Payments	152	848	990
TOTAL	54,974	62,476	100,249

Source: Minnesota Agricultural Statistics, 1978.
Minnesota Agricultural Statistics, 1984.

Table 15: Various production levels of the major crops grown in McLeod County, 1982.

Crop	Acres Planted	Acres Harvested	Yield Per Acre	
			State	McLeod County
Corn	105,600	94,400	113.0 bu.	122.0 bu.
Soybeans	80,300	78,400	35.5 bu.	37.0 bu.
Oats	18,800	17,700	66.0 bu.	75.0 bu.
Hay	-	23,900	2.9 tons	3.5 tons
Alfalfa Hay	-	19,700	3.2 tons	3.6 tons
Wheat	20,700	19,700	39.8 bu.	41.0 bu.

Source: Minnesota Agricultural Statistics, 1984.

Table 16: Milk cows and production in McLeod County, 1978.

County	Milk Cows on Farms Number	Production Per Cow lbs.	Total Production lbs.
McLeod	20,500	11,500	235,000,000
State	837,000	10,900	9,089,000,000

Source: Minnesota Agricultural Statistics, 1980.

Types of Livestock or Produce	Total Number	Production	
		State	McLeod County
All cattle and calves	48,300	-	-
Cattle and calves on feed	2,400	-	-
All stock sheep and lambs	1,500	-	-
All hogs	53,700	-	-
Sows farrowed	15,300	-	-
Pig Crop	121,200	7.39	7.92 Pigs/sow
Hens & Pullets	90,000	-	-
Eggs	21,900,000	243.00	243.33 eggs/hen

Source: Minnesota Agricultural Statistics, 1980.

Summary

McLeod County, which contains the communities of Lester Prairie, Brownton and Glencoe, is predominantly rural. Dairy farming is the number one source of cash income for farmers, however, hog production also adds to farm livestock income. The primary crops are corn, soybeans and hay. Most of the hay is alfalfa, a valuable crop in dairy farming.

Glencoe and Hutchinson are the major shopping cities in the county. However, each small town had a variety of businesses serving the immediate supply and service needs of farmers. Business tended to be limited to those serving farm families. Unemployment was relatively low.

County population, about 30,000, was experiencing a varying but moderate six to eleven percent growth rate. Glencoe had population growth rates of 13 and 17 percent in the 1950s and 60s. During the 1970s Glencoe's growth rate was 2.4 percent. Lester Prairie experienced growth rates of 31 and 17 percent in the 1950s and 60s, and 5.8 percent in the 1970s. Brownton experienced practically no change in total population between 1950-1980. Over half the population was between 18 and 64 years of age with a third of the population under 18 years of age. About 64 percent of the population was classified as city, with 36 percent township (rural). Births exceeded deaths by about five percent. Considering births, deaths and in-migration, the population of McLeod County rose about seven percent from 1970-78.

Median family income in McLeod County was \$19,674 per year as compared to \$21,321 for the state of Minnesota. About 10.2 percent had incomes below the poverty line as compared to 10.7 percent for the state. Employment was found: 32.6 percent in manufacturing, 21 percent in service occupations, 15 percent in retail, 4 percent in wholesale work, 3.8 percent in transportation, 2.7 percent in financing and 1.6 percent in public administration. Unemployment in McLeod County ranged from 2.2 to 4.7 percent.

The median school years completed by adults in McLeod County were 8.9 and 9.4 years respectively. A wide range of post-secondary schools were within 60 miles of the three communities. Residents in these communities also have access to a wide range of social, cultural, and recreational activities.

Agricultural production centers around dairy production, with substantial hog production. Livestock is the major source of cash income to farmers. Corn, soybeans and alfalfa hay are the major crops grown.

CHAPTER III

SCHOOL DISTRICTS

This section provides an overview of each of the school districts involved in the centralized cooperative non-center agreement. Similarities and differences between the districts are discussed. Sources of data were state agency reports, on-site interviews with school district officials and area residents, and on-site observations in Glencoe, Lester Prairie, and Brownton. Interviews and observations occurred in April, 1982.

School districts are described in terms of size dimensions, educational facilities, financial resources and expenditures, governance structures, management, instructional staff, curricula, scheduling practices, and student characteristics.

Size

Table 18 compares the number of square miles included in each district. Glencoe is the largest, twice the size of Brownton and almost four times larger than Lester Prairie.

Table 18. Number of square miles in the Glencoe, Lester Prairie, Brownton school districts.

School District	Square Miles
Glencoe	157.25
Lester Prairie	41.9
Brownton	78.8

Source: School superintendents in each district.

Glencoe operated 18 school buses. Sixty percent of the K-12 students were transported by bus to school.

The total Glencoe school district population was 8,500, in 3,000 households. School age children were in 1,004 households. The average number of K-12 students transferring into the district per year was 22. A total of 34 had transferred out in the two years prior to the interviews.

Size of the three school districts in terms of student enrollment is presented in Table 19, for the years 1976-1980. It should be noted that the table reflects a change in the reporting procedures for enrollment. Prior to October 1, 1977, enrollment counts are presented. Beginning in 1978-79, resident average daily membership (ADM) figures are used. ADM is the average number of pupils (unweighted) in membership during the school year. Pupils do not need to be in attendance to be counted in ADM but they must be currently enrolled in the district.

Enrollments differ considerably. Glencoe's was three times larger than Lester Prairie's and four times larger than Brownton's. These size relationships were consistent across the four years.

school districts on an average daily membership (ADM) on October 1 basis, 1976-1980.

School Grade Levels	<u>1976-1977</u> October 1 Enrollment	<u>1977-1978</u> October 1 Enrollment	<u>1978-1979</u> ADM	<u>1979-1980</u> ADM
Glencoe				
Kindergarten	105	117	133	83
Grades 1-6	623	621	608	600
Grades 7-12	921	925	920	880
TOTAL	1658	1663	1661	1563
Lester Prairie				
Kindergarten	35	40	43	46
Grades 1-6	216	221	221	214
Grades 7-12	248	241	238	230
TOTAL	499	502	502	490
Brownton				
Kindergarten	35	28	31	27
Grades 1-6	174	185	183	174
Grades 7-12	167	178	179	181
TOTAL	376	391	393	382

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

No dramatic enrollment trends were evident. There were slight fluctuations in total enrollments between 1976 and 1980. Glencoe exhibited a net decline of 4.9 percent, Lester Prairie a decline of 1.9 percent, and Brownton an increase of 1.6 percent. Intervening years showed slight enrollment increases, and the overall total enrollment could be characterized as fairly stable for Lester Prairie and Brownton, with Glencoe experiencing some decline.

Examining kindergarten and elementary enrollments is a way of estimating future secondary enrollments. In Glencoe, elementary and kindergarten enrollment trends parallel the total enrollment pattern - stability for 1976-79 and drop in 1979-80. The high school pattern reflects the same profile. This suggests that enrollment decline in 1979-80 might be due more to out-migration (which school officials indicate now exceeds in-migration, in contrast to earlier years) than to change in the birth rate pattern. The severe kindergarten decline in 1979-80 suggests that total enrollments may be likely to decline dramatically in future years.

In Lester Prairie, combined kindergarten and elementary enrollments showed a very slight increase. This suggests enrollment stability in the immediate future. In Brownton, secondary enrollments increased slightly while elementary enrollments remained fairly stable.

To consider student population geographical concentration, a pupil density ratio was calculated for each school district. This ratio was obtained by dividing the total number of pupils (ADM) by the number of square miles in the district. Table 20 presents these ratios for each school district. Pupil density (ADM/square mile) ranged from 11.69 for Lester Prairie to 9.94 for Glencoe and 4.85 for Brownton. These ratios indicate that Brownton's students are more distant from each other geographically than are Glencoe's and Lester Prairie's. The density ratios have implications for a school district's transportation demands.

School District	1979-80 ADM	Number of Square Miles in School District	Pupil Density Index (ADM/No.Sq.Mi.)
Glencoe	1563	157.25	9.94
Lester Prairie	490	41.9	11.69
Brownton	382	78.8	4.85

Source: Minnesota Department of Education, School District Profiles, 1979-1980.

Facilities

Glencoe school district facilities include two elementary schools (one 30 years old and the other 19 years old), a middle school (50 years old with a 25-year-old addition), and a high school (12 years old). All buildings were located in the city. The high school and one elementary school were located across the street from each other. Plans for facilities were to maintain them and remodel as needed to fit programs.

Facilities in Lester Prairie housed the K-12 program in adjacent buildings at one central location. The school district also owned a house across the street from the school which provided additional classroom space, and office space for the guidance program and special education facilities. The elementary facility was 26 years old, the high school 18 years old, and the house about 30 years old. There were no plans for improvements or additions.

Brownton facilities consisted of one central building housing the K-12 program. The building consisted of several years of additions with each housing different grade levels. High school classrooms and administrative offices were housed in a 59-year-old section of the building. Some secondary classes were being held in three elementary additions. Brownton had no plans for future improvements or additions.

Finances

Table 21 indicates the proportion of school district revenues coming from local, state and federal sources. Local sources of revenue represent monies from taxes, tuition and fees, sales and assets, payments from other school districts and all other local sources. State sources primarily reflect state aids. The federal portion includes the identifiable federal sources that reach local schools. Though all the federal monies flow through the state, certain proportions of aids are identifiable as coming from federal sources.

Table 21 shows stability in the proportions of revenues coming from each source over the years presented. State and local revenue patterns for Glencoe and Brownton are similar to each other and to the Minnesota average. Lester Prairie's pattern reflects a higher proportion of revenue from state sources and a lower proportion from local sources.

Federal dollars were consistently a minor source of revenues in all three districts, and similar in proportion to the Minnesota average. The proportion of federal dollars as a source of revenue for the Glencoe district was slightly below that for the other districts, which were similar to the state average.

Tax rates and property values provide one view of the economic resources available to school districts. Table 22 details tax rates in terms of auditor and EARC mills. These are measures of the burden of property taxes for school purposes, for taxes payable in the year indicated in the table. EARC mills refers to the mill rate of school taxes based on the district's adjusted assessed value, as computed by the Equalization Aid Review Committee (EARC). When comparing the tax rates among school districts, it is more valid to use EARC mills than auditor mills. The EARC rate is adjusted to partially compensate for differences in local assessment practices.

Revenue Source	<u>1976-1977</u> Percent	<u>1977-1978</u> Percent	<u>1978-1979</u> Percent	<u>1979-1980</u> Percent
Glencoe				
Federal	3	4	4	4
State	56	56	55	55
Local	41	40	41	41
Lester Prairie				
Federal	5	6	5	5
State	64	61	62	62
Local	31	33	33	33
Brownton				
Federal	6	6	5	6
State	55	47	53	50
Local	39	47	42	44
Minnesota Average				
Federal	5	6	6	6
State	54	52	52	52
Local	41	42	42	42

Source: Minnesota Department of Education, School District Profiles, 1973-80.

Table 22 can be interpreted in a more meaningful way when state trends in taxes and property valuation are known. In general, property values increased sharply in Minnesota since 1973. In an attempt to constrain property taxes for school districts, which would rise directly as a function of increased valuation, the state legislature lowered school district tax rates. The net effect of rising property values and declining tax rates has been actual tax increases for individual property owners. Decreases in rates have not kept pace with increases in valuation. These trends are apparent in the table. Minnesota trends since 1973 show steadily increasing property values (EARC valuation) and steadily decreasing tax rates (EARC mills).

The rate of increase in valuation between 1976 and 1980 for each of the three school districts was less than that for the state as a whole. In fact, property values turned downward in all three districts in 1979-1980 while the state average continued to climb. Differences between the districts in EARC valuation are apparent but are not dramatic. Glenwood and Lester Prairie had a per pupil unit EARC valuation that was consistently similar to the state average in the years shown. Brownton's per pupil valuation was consistently higher than the other two schools and the state average.

Like the state average, EARC mills tax rates for each district declined between 1976 and 1980.

In addition to resources, a picture of expenditures is needed to ascertain the nature of a school district's financial condition. Tables 23-27 present each school districts expenditure pattern in various categories.

Table 23 lists total expenditures, state and local operating costs, bonded debt, and unappropriated operating fund balances. Total expenditures per pupil unit is a summation of expenditures for tuition (i.e. transfers), student activities, food service, fixed charges (including abatements), plant maintenance, plant operation, transportation, attendance and health, instruction, and administration for a school year divided by total pupil units.

School Districts	1976-1977	1977-1979	1978-1979	1979-1980
Glencoe				
Auditor Mills	60.84	59.97	62.88	62.42
EARC Mills	37.29	34.25	35.65	32.52
EARC Valuation per pupil unit	21002	23591	25608	24100
Lester Prairie				
Auditor Mills	53.30	52.59	53.13	51.18
EARC Mills	33.15	30.77	30.66	26.26
EARC Valuation per pupil unit	17156	19129	21925	20288
Brownton				
Auditor Mills	52.09	50.94	50.67	46.29
EARC Mills	28.60	27.15	27.72	21.85
EARC Valuation per pupil unit	30786	33756	34883	30984
Minnesota Average				
Auditor Mills	54.16	53.53	51.88	48.04
EARC Mills	39.71	36.39	34.81	32.19
EARC Valuation per pupil unit	18977	21922	25051	25861

Source: Minnesota Department of Education, School District Profiles, 1977-1980.

Total expenditures per pupil unit rose in all of the districts during the period 1976-80. Glencoe's per pupil expenditures in each year were nearest the state average. Per pupil expenditures for Brownton and Lester Prairie were consistently below the state average.

State and local operating costs, sometimes referred to as the "per pupil maintenance costs," represents the cost per pupil of educating the district's children. It excludes federal financing, transportation, community services, revenues from the sale of lunches, materials and student activities, and, since 1976-77, capital outlay and debt service. Like total expenditures, state and local operating costs show increases in all districts throughout the time period displayed. Glencoe's figures are consistently highest, followed by Lester Prairie and Brownton.

Bonded debt, a measure of a school district's debt, ranged from \$1,304 per pupil unit in Glencoe to \$732 in Lester Prairie and \$125 in Brownton in 1979-80. Glencoe's figure was consistently the highest across all four years and was higher than the state average in all years shown. Brownton's debt level was the lowest. The figures for both Brownton and Lester Prairie were consistently below the state average. These figures reflect Glencoe's more recent construction of new facilities.

Unappropriated operations fund balance is a measure of a school district's financial condition and of resources available for future years. The unappropriated operating funds balance is positive and rises steadily for Brownton over the four year period. Lester Prairie's remains steady and positive, and Glencoe's rises from a negative figure to a small positive balance. The pattern for the state as a whole shows a steady increase throughout the period.

Table 23: Per pupil measure of school district financial characteristics.
 Total expenditures, state and local operating costs, bonded debt,
 unappropriated operating fund balance, and change in fund balance,
 1976-1980.

School Districts	1976-1977	1977-1978	1978-1979	1979-1980
Glencoe				
Total Expenditures State and Local	1386	1424	1526	1763
Operating Costs	1190	1208	1275	1472
Bonded Debt	1370	1335	1293	1304
Unappropriated Operating Funds Balance	-188	153	77	75
Change in Fund Balance	-43	38	57	-5
Lester Prairie				
Total Expenditures State and Local	1207	1357	1516	1677
Operating Costs	984	1107	1246	1364
Bonded Debt	839	797	766	732
Unappropriated Operating Funds Balance	208	232	222	245
Change in Fund Balance	38	33	-16	16
Brownton				
Total Expenditures State and Local	1214	1253	1374	1592
Operating Costs	932	973	1137	1275
Bonded Debt	305	244	178	125
Unappropriated Operating Funds Balance	150	278	477	569
Change in Fund Balance	148	135	152	123
Minnesota Average				
Total Expenditures State and Local	1384	1505	1654	1872
Operating Costs	1160	1243	1363	1525
Bonded Debt	1071	1035	1050	1065
Unappropriated Operating Fund Balance	50	94	257	316
Change in Fund Balance	3	47	50	54

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

two of the four years in Glencoe, three years in Lester Prairie, and in all years for Brownton.

Table 24 lists expenditures for capital outlay and debt service. Capital equipment refers to expenditures for equipment and all other capital items except for buildings and sites. Together, expenditures for capital equipment and buildings and sites make up capital outlay. Total capital outlay varies from year to year for each district. Glencoe shows a pattern of slight but steady increase, Brownton experiences a general increase, and Lester Prairie fluctuates from year to year.

Table 24: Per pupil unit expenditures. Capital outlay and debt service, 1976-1980.

Capital Expenditures/ Debt Service	1976-1977 Dollars	1977-1978 Dollars	1978-1979 Dollars	1979-1980 Dollars
Glencoe				
Capital Equipment	49	30	49	46
Buildings & Sites	25	49	48	54
Total Capital Outlay	74	79	97	100
Debt Service	130	117	111	114
Lester Prairie				
Capital Equipment	172	43	29	17
Buildings & Sites	3	32	85	51
Total Capital Outlay	175	75	114	68
Debt Service	83	75	76	86
Brownton				
Capital Equipment	17	30	13	29
Buildings & Sites	43	55	122	70
Total Capital Outlay	60	85	135	99
Debt Service	72	69	64	64

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

Debt service refers to expenditures for retirement of bonds and state loans. Glencoe has a consistently higher per pupil level of indebtedness than the other two districts as indicated by the debt service figure, reflecting the district's recent building program. Debt service varied only slightly for each school district during the time period examined.

Expenditures for plant operation and maintenance are identified in Table 25. Plant operation refers to expenditures for salaries, contracted services, fuel, utilities, supplies, and other expenses for operation of the school plant. Glencoe's plant operation figure is consistently higher than Lester Prairie's and Brownton's in the period indicated, to some extent reflecting the greater number of school buildings run by Glencoe.

Plant maintenance expenditures include expenditures for salaries, contracted services, and other expenses for maintaining the school district plant and premises. Lester Prairie's per pupil expenditures for plant maintenance are consistently below those for the other schools over the period indicated. Brownton's figures exhibit the widest fluctuations.

Table 26 shows per pupil unit expenditures for transportation, fixed charges, tuition, and community services.

Transportation includes expenditures for salaries, contracted services, insurance, fuel, vehicle maintenance and other items associated with the transportation of pupils. The fixed charges category includes expenditures for employee retirement, insurance payments, rental of land and buildings, interest on loans, unemployment insurance costs, severance pay, abatements on refunds

secondary vocational center. Tuition includes total payments to other school districts for district pupils being educated outside the district. This may include payments to vocational centers, special education cooperatives, or other schools in Minnesota or other states. Community services refers to expenditures for recreation, civic activities, adult education, and other community services. In general, these are community education programs not directed toward regular elementary-secondary education.

Table 25: Per pupil expenditures. Plant operations and plant maintenance, 1976-1980.

School District	1976-1977	1977-1978	1978-1979	1979-1980
Glencoe				
Plant Operation	\$142	\$146	\$161	\$192
Plant Maintenance	20	15	17	20
Lester Prairie				
Plant Operation	91	99	112	103
Plant Maintenance	6	7	12	12
Brownton				
Plant Operation	118	112	124	126
Plant Maintenance	9	10	17	47

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

Table 26: Per pupil unit expenditures. Transportation, fixed charges (including abatements), tuition and community services, 1976-1980.

School District	1976-1977	1977-1978	1978-1979	1979-1980
Glencoe				
Transportation	86	74	94	113
Fixed Charges	57	83	89	110
Tuition	7	8	7	11
Community Services	36	45	46	63
Lester Prairie				
Transportation	91	99	111	139
Fixed Charges	66	83	90	102
Tuition	34	28	34	34
Community Services	5	4	2	3
Brownton				
Transportation	126	120	122	140
Fixed Charges	70	53	73	76
Tuition	27	40	36	61
Community Services	11	17	24	33

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

higher than those for Glencoe in the years presented in the table. No clear pattern showed with respect to fixed charges. Glencoe's expenditures for community services were consistently higher than those for Lester Prairie and Brownton. Lester Prairie consistently expended the lowest amount per pupil in this category.

Table 27 displays expenditures for administrative and instructional salaries and for other items associated with administrative and instructional functions. Administrative expenditures are for salaries and other expenses of the school board, the superintendent, and district-wide administrators. Instructional salaries are expenditures for salaries of teachers, consultants, coordinators, librarians, guidance and counseling personnel, psychologists, and other instructional personnel. Other instruction refers to expenditures for salaries of paraprofessionals, aides, secretaries and clerical personnel, and for textbooks, some library costs, audio visual materials, and instructional supplies.

Table 27: Per pupil unit expenditures. Administrative and instructional salaries, instructional supplies and materials, 1976-1980.

School District	1976-1977	1977-1978	1978-1979	1979-1980
Glencoe				
Administrative Salaries and Expenses	44	47	48	58
Instructional Salaries	800	812	853	960
Other Instruction	104	97	98	122
Lester Prairie				
Administrative Salaries and Expenses	78	81	91	108
Instructional Salaries	686	750	833	924
Other Instruction	74	95	100	110
Brownton				
Administrative Salaries	83	84	87	78
Instructional Salaries	597	597	646	739
Other Instruction	74	87	107	139
Minnesota Average				
Administrative Salaries	47	52	58	66
Instructional Salaries	770	826	891	992
Other Instruction	123	131	147	168

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

Glencoe consistently maintained lower per pupil expenditures for administration than did either Lester Prairie or Brownton in the years represented. These figures reflected, to some extent, differences among the school districts in scale of operation. Glencoe's figures were also consistently below the state average for per pupil administrative expenditures.

the state as a whole, but declined in Brownton. With respect to instructional salaries, Brownton's expenditures were consistently below the other districts and all the districts were below the state average except in 1976-1977. Instructional salaries and other instruction increased in all districts and in the state as a whole during the time period presented.

Table 28 provides school expenditure data for the 1980-81 school year. The table shows Glencoe spending \$1,721 per pupil unit for maintenance (instruction, materials, utilities, supplies, administration), with Lester Prairie spending \$1,825 and Brownton \$1,745. Glencoe spending in all categories equals about \$4 million whereas Lester Prairie's is about \$1.1 million and Brownton \$903,000.

Table 28: School district expenditures for 1980-1981.

Expenditure Category	Glencoe	School District Lester Prairie	Brownton
Per Pupil Maintenance Cost	\$ 1,721	\$ 1,825	\$ 1,745
Capital Outlay	145,104	43,153	55,151
Debt Service	264,940	48,735	27,088
Total School District Expenditure for Participation in Vocational Programs Involving Cooperation with Other School Districts	105,086*	0	0
Total School Expenditures, All Budget Categories	4,070,738	1,110,109	903,067

*Expenditures for Agriculture, Home Economics and Industrial Arts.

Governance, Management and Legal Structures

Each school district functioned as an independent school district, with its own curriculum, facilities, teaching and administrative staff. It was reported that once per year the three school boards met together to discuss legislation.

The Glencoe school board had six members, five male and one female. Their occupations were farmer (3), mail carrier, homemaker, and assembly worker. This board approved budgets and major curricular changes or additions.

Overall management of Glencoe schools was carried out by the superintendent. Day-to-day supervision and management was provided by administrators in charge of each component of the school structure: high school grades 9-12, middle school grades 5-8, and elementary school grades K-4.

The Lester Prairie school board had six members, four male and two female. Occupations of board members were homemaker, office worker/homemaker, two farmers (one a part-time farmer with a full-time supervisor position at Honeywell), concrete products business owner, and an engine repair shop owner.

board members were nonemaker, store clerk, insurance agent, farmer, JM supervisor and truck driver.

Brownton schools were organized on a K-6, 7-12 division. The schools were administered by a high school principal, a half-time elementary principal and a superintendent of schools.

Staff

The size of teaching staffs in Glencoe, Lester Prairie and Brownton is shown in Table 29. Total staff FTE is defined as the total number of professional staff employed by the district measured in full-time equivalents. This figure includes administrators, classroom teachers, and all other licensed personnel. Pupil total/FTE is the total number of pupils served in grades K-12 per full-time equivalent staff member.

Relationships between the districts on total staff FTE have remained constant over time, reflecting student enrollment relationships between the districts. Glencoe's pupil total/FTE staff was consistently above Lester Prairie and Brownton. Total staff FTE declined in Glencoe, increased in Brownton, and remained fairly constant in Lester Prairie.

Table 29: Number of professional elementary and secondary staff in terms of FTE, for Glencoe, Lester Prairie, and Brownton, 1976-1980.

School District	1976-1977	1977-1978	1978-1979	1979-1980
Glencoe				
Total Staff FTE	109	104	104	103
Pupil Total/FTE	15.5	15.9	16.0	15.2
Lester Prairie				
Total Staff FTE	35	36	38	36
Pupil Total/FTE	14.8	13.9	13.2	13.3
Brownton				
Total Staff FTE	25	24	28	29
Pupil Total/FTE	14.9	15.7	14.0	13.2

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

Administrative staff for the three school districts is shown in Table 30. Lester Prairie's and Brownton's administrative staffs were about 40 percent of the size of Glencoe's.

Table 30. Administrative staff profile, 1981-1982. Glencoe, Lester Prairie, Brownton.

School District	Middle or			District	Total
	High School	Junior High	Elementary		
Glencoe	2	1	1	2	6.0
Lester Prairie	1	-	.5	1	2.5
Brownton	1	-	.5	1	2.5

Source: School superintendent from each district.

Table 31.

Table 31. Number of FTE teachers by grade level, 1980-1983. Glencoe, Lester Prairie, Brownton.

School District	Level			Total
	High School	Junior High	Elementary	
Glencoe				
1980-1981	38.5	28.4	26.0	92.9
1981-1982	37.5	27.4	25.0	89.9
Lester Prairie				
1980-1981	19.0	-	15.0	34.0
1981-1982	18.0	-	15.0	33.0
Brownton				
1980-1981	10.0	-	11.5	24.5*
1981-1982	10.0	-	9.5	22.5*

*3.5 FTE teachers representing special education, library, and music are included in total.

Source: School superintendents from each district.

Glencoe teachers were described as ranging in age from 36-45 and having 11-15 years of teaching experience. About 25 percent of Glencoe's teachers were reported to have masters degrees. Both Lester Prairie's and Brownton's teachers were described as being from 22-35 years of age with 6-10 years of experience.

Some faculty salary ranges are presented in Table 32. Minimum levels for Glencoe and Brownton do not differ widely. More variation between these districts appears at the maximum levels. Glencoe's is considerably above the maximum for Brownton at both the bachelors and masters levels.

Teacher schedules and work loads are shown in Table 33. Total student day is the total number of minutes students spend in school from the time the first scheduled period begins until the last scheduled period ends. Number of periods per day is an indicator of the number of the number of courses students may take in the school. Teacher load is the number of periods per day for a high school teacher carrying a normal class load including study halls.

At the time of the interview, Glencoe had an eight period day. (Plans for the following year were to move to a seven period day). Teachers had a class load, including study halls, of seven periods and one preparation period. Lester Prairie had a 405 minute, seven period school day, with 50 minute class periods. Teachers in Lester Prairie had a load of six class periods and one preparation period. Brownton had a 410 minute seven period day with 50 minute class periods. Brownton teachers had a load of six class periods and one preparation period.

Scheduling and Curriculum

In Glencoe, 130 courses were offered to students in grades 9-12. Most courses were semester length. Students were required to register for a minimum of five subjects per semester, and had a maximum of two study halls per day available. Ninth grade students had five required subjects and could choose from three electives. Tenth graders took three required courses and could choose between five electives for the remainder of their course load. Juniors and seniors each had two required courses and could select from six electives.

Salary Factors	Glencoe	Brownton
1977-1978		
Bachelors		
Minimum (dollars)	9650	9400
Maximum (dollars)	15040	12400
Steps	11	10
Masters		
Minimum (dollars)	10830	10100
Maximum (dollars)	17690	13100
Steps	14	10
1978-1979		
Bachelors		
Minimum (dollars)	9970	9600
Maximum (dollars)	15470	12800
Steps	11	10
Masters		
Minimum (dollars)	11170	10300
Maximum (dollars)	18170	13500
Steps	14	10

Source: School superintendents in each district.

* Salary schedule for Lester Prairie was not available.

Table 33. Classroom, teacher workday and class load for a high school teacher, 1978-1979.

Teacher Load Factors	Glencoe	Lester Prairie	Brownton
Total Student Day at School (minutes)	410	405	410
Number of Periods per Day	8	7	7
Preparation and/or Free (minutes)	50	50	50
Noon Lunch (minutes)	30	60	70
Length of Class Period (minutes)	50	50	50
Teacher Class Load	7	6	6

Source: School superintendents from each district.

All students grade 9-12, met individually with counselors twice per year to plan their schedules. Ninth graders made a three year tentative plan that could be adjusted annually. Students were encouraged to think ahead, plan ahead and plan thoroughly, so they could have necessary prerequisites for courses they wanted to take. The most intense post-high school planning was done by students and counselors in twelfth grade but students were encouraged throughout their high school planning to anticipate their post-high school education and/or career plans.

programs were available. These included a work experience program enrolling four senior boys and two senior girls, a supervised employment program enrolling four senior boys and six senior girls, and an agricultural occupations experience program enrolling seven senior boys. Glencoe also offered adult education classes.

Curricular decisions in Glencoe were made by the principal and counselor if they were within a department. Changes involving the school system (e.g. change from eight to seven periods) required school board approval.

Lester Prairie seemed to focus on a high school curriculum emphasizing a general education background rather than specializing. School officials viewed programs in science and English as particularly strong. Lester Prairie required ninth grade students to take six periods of classes with one elective course and one free period. Tenth grade students were required to take four courses with two electives and one free period. Juniors and seniors each had two required courses, four electives and one free period. Students took at least 24 year-long periods of courses in their high school experience, out of 28 available.

All Lester Prairie courses were semester length. Scheduling occurred once a year, with ninth and tenth grade students meeting with the counselor individually. Eleventh and twelfth graders met with their counselors and classroom teachers. Students were encouraged to make four-year plans. Post-secondary planning started in the eleventh grade and carried on through the senior year. Students participated in college fairs and post-secondary visits.

Brownton had semester length courses. Students planned their schedules one year at a time.

It was reported that the counselors in the three school districts did not meet regarding the functioning of the cooperative agreement but that the shared school program idea was viewed by counselors as beneficial for students.

The schedule for each school is presented in Table 34. For course scheduling, Glencoe reported using a system whereby student interest in courses was first ascertained, and then the schedule was built accordingly. Although Glencoe had been on an eight period day schedule, the district was cutting back to a seven hour day starting in the fall of 1982-83 school year. This meant a reduction in the number of offerings available and some staff reductions.

Table 34. Yearly school calendars and daily schedules.

School District	# Days per Year	Fall Start	Spring Close	Daily Starting Time	Daily Ending Time	# Periods Per Day
Glencoe	173	1st wk. in Sept.	1st wk. in June	8:15 am	3:05 pm	8
Lester Prairie	175	last wk. in Aug.	Fri. before Memorial Day	8:15 am	3:00 pm	7
Brownton	176	Aug. 31	May 28	8:15 am	3:03 pm	7

Source: School superintendents from each district.

Lester Prairie and Brownton were operating on a seven period day. Lester Prairie maintained a 175 day school year and Brownton maintained a 176 day school year.

schedules had similar starting and ending times.

Students

Students are described in this section with respect to numbers of minorities, attendance rates, proportion transported to and from school, post secondary activities, drop out rates and extra-curricular participation. Table 35 presents data for three of these variables.

Minority is defined as the percentage of the district's total enrollment which is considered to be of American Indian, Black, Oriental or Spanish-speaking origin. Attendance is presented as the percentage of days attended by all pupils during the school year in relation to the total days these pupils could have attended. Transported is defined as the number of pupils transported to and from school twenty or more days, as a percentage of the district's average daily membership.

Table 35 shows that minorities comprised an extremely small portion of the student body. Attendance rates were very similar for the three districts and are near 100 percent, although a slight steady decline in this rate was evident for all districts.

The proportion of students transported was highest for Brownton in most years. Glencoe's proportion increased each year and eventually surpassed Brownton's in 1979-80. A smaller proportion of Lester Prairie students were transported than was the case for the other two districts.

Table 35. Percentage selected student characteristics. Minority, attendance, transportation to and from school.

School District	1976-1977 Percent	1977-1978 Percent	1978-1979 Percent	1979-1980 Percent
Glencoe				
Minority	0.1	0.3	0.3	0.3
In attendance	96.3	95.7	95.9	95.1
Transported	59.9	58.7	60.4	66.9
Lester Prairie				
Minority	0.2	0.2	0.2	0.2
In Attendance	97.2	96.1	95.8	95.5
Transported	49.2	49.6	47.8	48.1
Brownton				
Minority	2.9	3.1	3.1	2.3
In Attendance	97.3	96.3	95.9	95.5
Transported	63.4	64.3	62.6	62.8

Source: Minnesota Department of Education, School District Profiles, 1976-1980.

The student dropout rate was reported to be 3 percent in Glencoe and 2 percent in Lester Prairie. Career planning activities were conducted for students in all three schools and included college fairs and visits to post-secondary institutions. Activities of the 143 Glencoe graduates one year following their 1981 graduation were reported as: further education (70.7 percent), armed services (7 percent), farming or other agricultural related employment (5.6 percent), full time work other than agriculture (14 percent), married (1.4 percent), parent (0.7 percent). Of Lester Prairie's 38 graduates, 67 percent were reported in further education, 30 percent in full-time employment other than agriculture, and 3 percent in farming and agricultural related positions.

extra-curricular school activities. The average number of activities these students participated in was two. Both Brownton and Lester Prairie schools were small and provided most students an opportunity to participate in numerous extra-curricular activities. There, heavy student involvement caused conflicts for some programs.

Perceptions of School Personnel and Community Members

Glencoe school officials indicated that the school district was in a very tight financial situation. One official commented, "Another year like this financially and we'll be cutting classes. We are against the wall right now."

Voter turnout for Glencoe school elections represented a relatively small segment of the community. One official reported that only five percent of the eligible voters typically voted in school elections.

Lester Prairie school officials reported that their communities supported school programs and took pride in their schools. They were very sure the community would strongly support any type of action that would improve its educational programs. It was clear that the community would fight to the bitter end to maintain a public high school. Administrators were not sure, however, that the school was the center of social activities in the community or that a high turnout of voters was likely for school matters requiring a public vote.

Summary

The three schools involved in the cooperative noncenter agreement have both similarities and differences. The schools are similar in terms of governance structures and management, daily school schedules, length of school year and student characteristics. All schools seem to be operating under financial constraints and pressures.

Differences between the districts focused largely on size. Glencoe was a larger school than either Lester Prairie and Brownton. It was reported that some Lester Prairie and Brownton students feared going to the larger school for special classes or were not comfortable attending class in the large school. Glencoe officials and teachers reported an awareness of this concern and efforts to make the out-of-town students feel accepted at Glencoe were seen as part of the teacher, counselor and administrative roles.

There were also differences in facilities available in terms of age and size. And there were differences in the size of instructional staff and curricula available to students. Since Glencoe was larger, students had a broader base of course offerings available than did Lester Prairie and Brownton students. In terms of financial support, Glencoe was spending about \$2,721 per pupil unit to educate students whereas Lester Prairie was spending \$1,825 and Brownton \$1,745. Glencoe was spending about \$5 million for schools whereas Lester Prairie spent about \$1 million and Brownton \$900,000. Glencoe compared very closely to the state average.

Each school district was relatively small geographically, with Glencoe covering about 157 square miles, Lester Prairie about 42 square miles and Brownton about 80 square miles. From 50 percent to about 70 percent of the students were transported to school by bus.

In terms of future plans, about 65 to 70 percent of the graduates were going on to some type of post-secondary education. Those students not going on to school were working. About three percent were identified as being engaged in farming and agriculture-related businesses.

Nearly all students were caucasian and about 50-70 percent were from homes where farming was a full or part-time occupation.

CHAPTER IV

CENTRALIZED NONCENTER

History

The cooperative non-center agreement instituted by the Glencoe, Lester Prairie and Brownton School Districts was initiated in the fall of 1976 in the aftermath of participation by all three districts in a vocational center located in Hutchinson.

The three districts moved away from the center after two or three years of participation, reportedly as a result of concerns about the effectiveness of the center administration, and a fire which destroyed the building housing the center. A major concern of these schools involved their input into the centers' operation. One school official stated: "Schools had no feeling of ownership; we felt like the center was coming down on us. In the center, they never said, 'Now what is the situation and what can we do together, or how can we best do something that is appropriate?' They just said, 'This is how it's going to be' without any concern for the situation. The monthly center meetings of participating school principals (who met separately from superintendents and board member representations) was primarily an approval affair. Things had been worked out ahead of time. It wasn't a time for generating ideas." Another official described the center as "Hutchinson-oriented."

A second concern centered on finances. According to one school official, "We were paying approximately \$40,000, excluding transportation, for participation in the center. We could hire an instructor, rent a building, buy materials and still have money left at that rate." One individual indicated that the center was planning to rebuild and the districts were concerned about increased costs.

A third concern related to a conflict in educational philosophy. An official from one of the school districts described the prevailing philosophy in the district as one of exploration. "High school's a place for exploration. Job training comes later." The center was viewed as being oriented more toward job training, similar to an A.V.T.I., than toward the high schools' philosophy of exploration.

A fourth concern was scheduling. The two hour block of students' time required by the center was viewed as a major disadvantage "reducing flexibility." The non-center agreement formulated by the three schools was designed to serve the needs of students for courses such as had been available from the center, but on a one hour per day time basis.

Several observers reflected their individual experiences and perceptions of the center in their comments. One commented that representatives from Glencoe, Lester Prairie, and Brownton seemed to take the same positions on center issues. It was also reported that students, including the most academically able, were dropping out of center programs, or not even enrolling because they didn't like the bus ride and missed too much of their home school program. One school reported that students who were not academically motivated tended to go to center courses. Their interpretations were that these students chose the center, "because they missed four classes in the home school," and because there was a tendency for a school to send this type of student. One perception of these center participation trends was that the "mix of students became less varied in classes both at the center and at the home school."

Another criticism was that the center schedule would not work on a local school's computer scheduling system. Students spent the morning traveling to and from the center and participating in center courses and then after lunch had just three home school periods in which to meet English and social studies graduation requirements. Center students had to choose between elective courses at their home high school and center courses.

by Lester Prairie and Brownton students in Glencoe vocational and non-vocational programs. The Glencoe district charged Lester Prairie and Brownton fees for providing educational services to students. Brownton and Lester Prairie students were transported to Glencoe to participate in courses during the first period of the day. In this delivery mechanism, Glencoe students remained in their home schools.

One industrial arts teacher was added at Glencoe when the cooperative arrangement began. Curriculum materials shared were limited to those associated with Glencoe courses in which Lester Prairie and Brownton students were enrolled. Materials did not leave Glencoe but were simply used in the course taught to students from all three districts.

Special education specialists were also shared between several neighboring schools through a special education cooperative. This made travel between the districts a familiar concept and coordination of transportation with these programs possible in some instances. Administrators from the schools involved were reported as including a shared elementary principal, between Brownton and the neighboring Stewart school district.

Governance, Management, Policies and Legal Structures

No formal written agreement existed between the school districts. In the beginning, resolutions were adopted by each school board to start the arrangement and express commitment to it. Each school board approved an annual budget and expenditures for participation by their school.

No separate director was employed to manage the cooperative arrangement between the school districts. The high school principals in the three districts handled the logistical coordination of schedules, student enrollments, transportation, and staffing. The Glencoe counselor and principal worked out the schedule at Glencoe so that it accommodated Lester Prairie and Brownton students.

An informal arrangement was identified when the cooperative effort was initiated. This structure included the superintendents, principals and one board member from each district. The three board members had no voting power, they simply made recommendations. Reports varied as to the degree to which this group functioned. Some indicated that the group met in the first years of the arrangement but had not met regularly in later years. Since administrators saw each other frequently, logistical details had become more routine and could be handled by phone. It was reported that phone calls between the schools were not long distance calls so this form of communication worked well. The need for meeting to provide an opportunity for planning and development discussions regarding the cooperative arrangement was expressed by some officials. Others felt that the lack of communication was hurting the agreement and lowering students' participation.

One official indicated that changes in administration in participating schools over time influenced communication patterns between the schools and the degree to which students from participating school in enrolled Glencoe courses.

Policies were summed up in one Glencoe school official's comment: When in Glencoe, Lester Prairie and Brownton students are entitled to anything Glencoe has to offer and are subject to our discipline rules. Glencoe's counseling services, school library, and audio visual equipment were reported to be available for use by Lester Prairie and Brownton students. Lester Prairie and Brownton students reportedly participated in Glencoe's co-curricular clubs and field trips.

Facilities

No separate or special facilities were connected with the cooperative arrangement between the three schools. Shared facilities were all located in Glencoe, and were concentrated in the high school. The exception was a separate building, located in Glencoe, that was rented for the auto mechanics and building trades programs.

Financing and Costs

Glencoe established a tuition rate at the beginning of a two year period. This rate was

involved. For programs that were located in the Glencoe high school, the cost formula was as follows:

Glencoe per pupil maintenance cost	-	Glencoe debt service and capital outlay expenditures per pupil	-	Vocational reimbursement received by Glencoe for Brownton and Lester Prairie students	=	Base cost figure
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The base cost figure was then multiplied by 2/6 for Brownton students (since they spent two hours per day in Glencoe) and 1/6 for Lester Prairie students (since they spent one hour per day in Glencoe) to arrive at the proportion of the per pupil maintenance cost charged to Brownton and Lester Prairie as tuition.

For the auto mechanics and building trades programs located in rented facilities, costs were figured differently. The following formula was used for these programs:

Cost of instructor	+	Facility rental cost	+	Depreciation on new equipment purchased for program	=	Total program costs
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<u>Total program costs</u>	=	Cost per student
<u>Number of students enrolled</u>		

The cost per student was multiplied by the number of students enrolled from Lester Prairie and Brownton to arrive at the total costs incurred by Lester Prairie and Brownton students. Vocational reimbursement received by the Glencoe district for Lester Prairie and Brownton students was then subtracted from the total costs figure for Lester Prairie and Brownton; the remainder was charged as tuition to Lester Prairie and Brownton. These charges were subject to approval by the Lester Prairie and Brownton school boards.

With these financial arrangements, no foundation aids were removed from the participating schools. All charges were on a fee for services basis and the higher the participation rate for a school, the more the school was charged. At the same time, the more students enrolled in a program, the lower the per student cost was likely to be. Glencoe had more financial resources available to run its programs and better chances of meeting minimum enrollment requirements in its courses with Lester Prairie and Brownton students involved in its programs. Lester Prairie and Brownton students had programs available to them at a lower cost than if these districts had had to provide facilities, equipment, materials and instructors on their own.

Scale was obviously a factor in the financial incentives associated with this approach to financing. Paying tuition to another school was an acceptable practice until tuition costs began to exceed costs of providing the program themselves.

Size

Enrollments in courses totaled 31 Brownton students and 14 Lester Prairie students during the fall semester of 1981 plus 11 Brownton students during the spring 1982 semester. It was reported that the number of students coming to Glencoe from Brownton had been stable and that the number from Lester Prairie had been diminishing over time. Fall semester enrollments from Lester Prairie and Brownton were reported to be typically larger than spring semester enrollments. Average class size in the shared programs was reported to be 16.5 students and the average student/teacher ratio 16.5/1.

Lester Prairie students were slowly withdrawing from participation in Glencoe courses. Factors reported as contributing to this decline included Lester Prairie students' lack of information about Glencoe courses, lack of active recruitment, and teachers not encouraging Lester Prairie students to enroll in Glencoe courses. Also, the bus ride to Glencoe, and a negative perception on the part of Lester Prairie students regarding their status in the Glencoe schools, both contributed to enrollment decline.

mixed and contradictory depending on the source of information. It should also be noted that students themselves were not interviewed. Consequently, the extent to which these perceptions actually reflect those of the students is not known. It was evident that Lester Prairie's school administration was not emphasizing cooperation.

Staff

No staff were specifically connected with the cooperative arrangement. School principals coordinated the logistics, the Glencoe counselor and principal did the scheduling after the enrollment preferences of Lester Prairie and Brownton students were known. Glencoe teachers taught the courses as part of their regular teaching contract with the district.

One staff member, an industrial arts teacher, had been added when the cooperative arrangement was initiated. One informant suggested that this addition would probably not have occurred without the cooperative arrangement. Since its initial inception no additional staff had been employed.

The Glencoe principal had held his position for 13 years and had been involved in the initiation of the cooperative arrangement between the three schools. The Lester Prairie principal was new and was completing his one and only year. He was very enthused about sharing many courses with Glencoe such as languages but his philosophy did not prevail among all involved in the Lester Prairie schools. Consequently, Lester Prairie was not intending to participate in the arrangement cooperative in the future.

Curriculum

All courses offered in Glencoe were potentially available to Lester Prairie and Brownton students. Curriculum areas in Glencoe that Lester Prairie and Brownton students had elected in 1981-82 including data processing, stenography II, clerical office practice, small engines, auto tuning, basic metals, plants and soils, technical school math, German, Spanish, military history and American communications, and ceramics. More students were enrolled in the vocationally oriented courses (specifically, in the business, agriculture and industrial courses) than in the language and communications courses. It was reported that over time the language and auto courses had been in most demand by Lester Prairie and Brownton students. The language areas involved full year courses whereas the auto mechanics course was one semester in length.

Lester Prairie's students came for one course, one hour per day. Brownton students came for two one-hour courses or one two-hour course. Since Glencoe did not have many two hour courses, Brownton students typically took two courses. No students were reported to take one course in Glencoe and then attend a study hall during the second hour.

Courses added at Glencoe since the initiation of the cooperative arrangement between the school districts emphasized vocational areas and included auto mechanics, small engines, carpentry, and some business courses. It was reported that when cooperation between the three schools was initiated, Lester Prairie and Brownton had more input into curricular decisions (e.g. auto and building trades offerings). More recently, a pattern had evolved with Glencoe indicating to the other schools what was available.

The philosophy of high school being exploration versus job preparation that was reported in Glencoe was reflected in the one-hour length courses. Two-hour courses were perceived to limit students' range of exploration to one area rather than allowing and encouraging them to explore several areas. One school official's comment expressed the essence of this mixture of vocational and academic courses available through the cooperative arrangement: "Brownton students can take both auto and Spanish in their trip to Glencoe."

In general, Brownton and Lester Prairie required that courses taken by their students in Glencoe be those that were not available in Brownton and Lester Prairie. Some flexibility was reported, however, in a case where students could not enroll in a home school course that was scheduled during the time they were in Glencoe.

One problem mentioned by Glencoe school personnel was the difficulty in helping Lester Prairie and Brownton students understand the Glencoe curriculum. This problem was also indicated by Lester

Glencoe school counselor had gone to Brownton for the first time to explain the Glencoe offerings to students.

It was not reported that students missed activities, classes or school experiences in their home school due to the cooperative arrangement.

Scheduling

Jointly enrolled courses were scheduled first and second hours of the day. Since there was not a set of courses specifically designated as "shared courses" and since the shared courses could vary from year to year, the scheduling procedure started with the plans and preferences of students from all three schools. Student enrollment plans for the following year were generated in all schools during second semester. Lester Prairie and Brownton forwarded to Glencoe the intents of students to register in Glencoe courses. Based on this information and that from Glencoe's own students, Glencoe courses were scheduled. All courses in which Lester Prairie students came to Glencoe were scheduled first hour only. All courses in which Brownton students wished to enroll were scheduled first and second hour. Some discrepancy in reports about scheduling were apparent. In Brownton, it was reported that the number of Brownton students enrolled in Glencoe courses depended on the number of available or open courses.

Glencoe reported that occasionally the cooperative arrangement resulted in their offering a course or section they would not otherwise have offered. This situation occurred because the additional enrollment allowed them to offer courses in which they would not have had sufficient enrollment alone.

Brownton and Lester Prairie students were scheduled into courses first. Then Glencoe students were scheduled. If a course filled before all Glencoe students could be scheduled, another section was added but could be scheduled later in the day. All Glencoe courses were one hour long with the exception of cabinetry, which met for two hours.

Lester Prairie students returned to their home school for five hours of the school day. Both Brownton and Lester Prairie students who enrolled in Glencoe classes were reported to miss two class periods in their home school.

School calendars were not synchronized. Glencoe indicated that the schools didn't worry about the small discrepancies in their calendars and that these had not been a problem. For example, Brownton started school in the fall two or three days before Glencoe. Brownton students enrolling in Glencoe courses were held in Brownton until school started in Glencoe.

One problem associated with scheduling noted by Glencoe was changes in plans by Lester Prairie and Brownton students between spring, when classes were scheduled, and fall when students came to attend classes: "One year we had planned for 15 students to come and had worked especially hard to schedule two students into the courses they wanted. In the fall, we had 15 different students wanting different things and the two students didn't come."

Transportation

School buses with hired drivers transported Lester Prairie and Brownton students to Glencoe. No Glencoe students and no teaching staff traveled between the schools.

Distances between the three communities are diagrammed in Figure 4. Lester Prairie students traveled 24 round trip miles from their school to the Glencoe school, a trip requiring 35 minutes travel time. Brownton students traveled 22 round trip miles in 40 minutes. Five round trips between the schools were made each week, one trip per day.

Students

All Brownton and Lester Prairie students in the appropriate grade level for a course were eligible to participate in Glencoe courses. Participants were described as being 100 percent Caucasian.

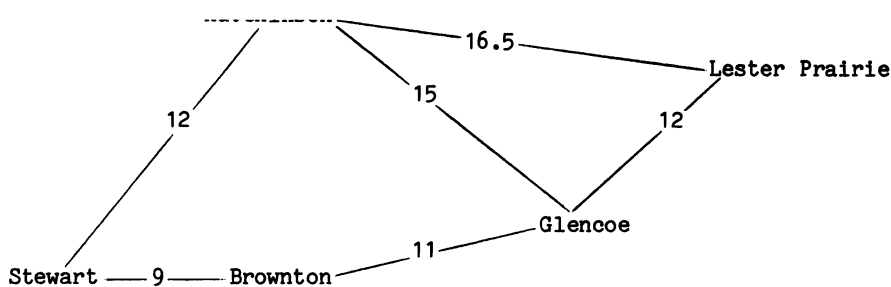


Figure 4. Distances between communities in miles

Reports concerning the integration of Lester Prairie and Brownton students into the Glencoe student body varied. Two responses indicated that Brownton and Lester Prairie students tended to cluster together and not mix with Glencoe students. One individual attributed the decline in Lester Prairie student enrollment in Glencoe courses to Lester Prairie students feeling they were "second class citizens" in Glencoe. However, another individual reported Lester Prairie and Brownton students blended well with Glencoe students, came back to Glencoe after school for activities, and that students from the three towns interacted outside of school.

The student situation was described by more than one person as not being a type of rivalry. The schools were described as "not direct sports competitors." Glencoe, Lester Prairie and Brownton were all in different athletic conferences. Glencoe officials, however, indicated they thought there probably was some resentment toward Glencoe by Brownton and Lester Prairie because of size (i.e. the "big town" and "big school" of Glencoe). This perception was echoed in other interviews.

It was reported that Brownton and Lester Prairie students were given a brief orientation to the Glencoe school. In addition, Glencoe reported that acceptance of Lester Prairie and Brownton students by Glencoe students was a priority concern and that home rooms had been used to facilitate student body integration.

Discipline problems were reported to be minimal. Several sources indicated that only two problems had occurred in the seven years of the cooperative arrangement. One involved a student who had come to Glencoe but had not returned to his home school. Truancy was not reported to be a problem. A possible factor in the lack of disciplining problems was Glencoe's attendance policy, which Glencoe officials described as strict. Students who had four unexcused absences failed a course. Lester Prairie and Glencoe students were treated as Glencoe students when in Glencoe and were subject to Glencoe's absenteeism and discipline policies.

The Glencoe principal indicated that he related the same to Lester Prairie and Brownton students when they were in Glencoe as he did to Glencoe students. Any problems that arose would be handled by Glencoe and, in addition, reported to the student's home school. One individual thought that the time of day classes were offered had something to do with the lack of problems: "Kids are at their best the first two hours of the day." Another possibility was the reported careful screening of students who were sent from Lester Prairie and Brownton to Glencoe, and the reported perception of the visiting students and their schools by Glencoe. It was stated that "Brownton and Lester Prairie students are highly motivated. We think we help Brownton and Lester Prairie by expanding their curriculum. We respect these schools; they are excellent schools."

Making sure that Brownton and Lester Prairie students understood what they registered for was reported to be a problem, as discussed in connection with curriculum and student enrollment.

No student dropout rates were reported for jointly enrolled courses.

Perceptions Regarding the Delivery Mechanism

Perceptions of Glencoe school officials concerning the cooperative arrangement could be described as generally positive. Perceptions of Glencoe teachers and the community were also

...when the arrangement was introduced was reported but this was viewed as having disappeared and been replaced by supportiveness.

Glencoe school officials indicated that they thought further opportunities for cooperation existed and that they would be open to expanding the shared offerings. Factors they saw as important to the cooperative arrangement were shared value systems and similar educational philosophies among the three communities. One official said there were no hidden agendas in the cooperative arrangement, no motives toward school consolidation. Comments extended to the financial aspects of the arrangement: "We aren't concerned about getting every penny out of this. We feel it benefits us and Brownton and Lester Prairie students, and are more concerned about keeping the good feelings we have between the schools than the money."

Glencoe school officials saw few disadvantages in the arrangement. They saw it as an opportunity to build good will among the schools. They viewed the cooperative arrangement as a way to both offer programs to Lester Prairie and Brownton and to keep some programs going at Glencoe that may have had to be dropped without the sharing structure: "Brownton and Lester Prairie students are filling in extra slots and we're getting some extra dollars." Further, they viewed the approach as a way to avoid the problems they perceived to be associated with membership in a center and, at the same time, gave students more opportunity to explore areas of potential interest to them.

One Glencoe school official viewed the arrangement this way: "Glencoe is the center now." Communication between the three schools was reported to be better under the current structure than under the center structure because "only three versus nine schools were involved." One official reported there was more opportunity for entire school boards to meet together under the current non-center arrangement. Another school representative reported that under the current arrangement students were more mixed with respect to academic ability and gender than they were in the center.

One Glencoe school official summed up his feelings saying: "The sharing is absolutely no hassle to anyone. Identity of each school remains strong and students have an array of curricular options."

In Brownton, some concern was expressed about the relative informality of the arrangement, specifically described as "lack of anything in writing." Other perceptions of Brownton officials that "the number of students who attend Glencoe is dependent upon the number of available or open courses," appears to not reflect the procedure described by Glencoe for scheduling courses and students. Brownton recommended that better coordination of schedules and future plans be discussed between the schools.

Generally Brownton officials indicated that most decisions regarding the cooperative effort were made by their board based on the school administration's recommendations. They also felt that small school districts must make cooperative arrangements such as the one they were involved in if the schools are to survive. One Brownton official indicated that their students had more elective choices by going to Glencoe.

Lester Prairie school officials were concerned that as they cut budgets due to declining enrollment, they were taking away elective course opportunities for their students. Consequently, they accepted the costs for the program as long as feasible. A Lester Prairie official reported strengths of the cooperative agreement were primarily the exposure of Lester Prairie students to a different school environment and the opportunity students had to take expanded course offerings.

Lester Prairie school personnel could also see the value of Glencoe teachers recruiting students into their classes. However, they also felt such recruitment was an unpopular idea with Lester Prairie teachers. Lester Prairie aimed to keep their home school programs strong and felt that if students had some variety in their home school they would not go to Glencoe. At the other extreme, another Lester Prairie official felt Glencoe had not promoted their courses and Lester Prairie was having to initiate all the interest.

Both Lester Prairie and Brownton referred to the time involved and student attitudes toward riding the bus to Glencoe. They expressed concern about the amount of time taken out of the school day for bus travel and the time taken from the day at the home school when students were involved at another school and in travel for two of the home school scheduled hours. Both school districts reported negative student attitudes toward riding the bus to Glencoe. One also questioned the

indicated that if the cooperative arrangement would enable students to miss only one hour per day in their home school fewer scheduling conflicts for students would arise.

One individual expressed concern that the cooperative agreement allowed Glencoe to maintain small classes. Glencoe's responses indicated that this was indeed the case. There were some courses that could not be offered if participation by Lester Prairie and Brownton students did not occur. While Glencoe appeared to view this as a positive feature of the arrangement for all the schools since more curricular offerings were available to students, there was some evidence that the other schools felt they were contributing to inefficiencies by enabling these courses to continue.

CHAPTER V

CONSUMER HOME MAKING PROGRAM

History

All three school districts offered a consumer homemaking program. Home economics courses offered the first two hours of the day in Glencoe were available to Lester Prairie and Brownton students, as was any other class in Glencoe. No visiting students were registered in Glencoe home economics courses at the time of the interviews. This was a pattern reflecting Lester Prairie's and Brownton's own programs, and their reported policies of enrolling their students only in Glencoe courses they themselves did not offer.

Size

The enrollment for Glencoe home economics courses was approximately 225 students per semester, distributed across nine courses and sections as shown in Table 36. Annual enrollment in home economics courses was 449. Approximately 27 percent of the students eligible to enroll were reported enrolled.

Lester Prairie's home economics program had 169 students enrolled for the 1981-82 school year. Brownton's enrollment was 133.

Facilities and Equipment

Home economics facilities in Glencoe consisted of two rooms, a larger food lab (960 square feet) and a smaller classroom (750 square feet). Both were located in the high school building.

Glencoe home economics facilities and equipment were described as generally adequate, but needing improvement for the child development course.

Home economics facilities and equipment in Glencoe were not used by other departments in the school during the day, but were used for adult education offerings in the evenings.

It was thought that home economics facilities might be shared with other Glencoe programs in 1982-83 with a cutback of one teacher from full to part-time. It was not known which other program might occupy the facilities some of the time.

Brownton's home economics facility was a single 800 square foot room. The facilities were not used by other departments in the Brownton school.

Lester Prairie's facility was a single 1,320 square foot room. It was not used by other programs in the school.

Finances

Costs for the home economics programs in 1980-81 and 1981-82 in four categories are presented in Table 37. In general, with programs well established and facilities in place, major expenditures go for salaries and supplies. Glencoe's costs are about \$47,300, Lester Prairie's \$17,300 and Brownton's \$12,800. The expenditures substantially reflect differences in staff sizes, with the Brownton teacher being 70 percent part-time, Lester Prairie having one full-time teacher and Glencoe two full-time teachers.

in Glencoe, Lester Prairie and Brownton in 1981-82.

School District	Course Title	Enrollment, Grades 9-12		
		M	F	Total
Glencoe	Home Economics I	--	52	52
	Home Economics II	3	54	57
	Creative Living Space	1	34	35
	Toward Adulthood	1	60	61
	Child in the Family	1	36	37
	Consumer Education	3	20	23
	Creative Foods	53	57	110
	Culinary Arts	15	43	58
	Clothing	--	16	16
	TOTAL	<u>77</u>	<u>372</u>	<u>499</u>
Lester Prairie	7th Grade	22	15	37
	8th Grade	21	19	40
	9th Grade	18	22	40
	Foods	22	9	31
	Creative Clothing	--	10	10
	Family and Child	--	11	11
	Consumer Awareness (Not offered in 1981-82)			
	Consumer Housing and Home Interiors			
	TOTAL	<u>83</u>	<u>86</u>	<u>169</u>
Brownton	Child Development	8	--	8
	Basic Chef	6	9	15
	Consumer Economics	--	8	8
	Consumer Clothing	5	6	11
	Family Living	1	10	11
	9th Grade Home Economics	--	18	18
	8th Grade Home Economics	21	8	29
	7th Grade Home Economics	14	13	27
TOTAL	<u>55</u>	<u>78</u>	<u>133</u>	

Source: Home Economics teachers in Glencoe, Lester Prairie and Brownton.

Program

Glencoe high school offered nine elective semester courses in consumer oriented home economics, each offered once per year. Course titles are presented in Table 36. No occupational home economics courses were offered. Home economics also was required at the middle school level in Glencoe.

Adult home economics offerings were also taught in the high school facility.

Both Glencoe teachers were very positive about their program. They considered it to be strong despite funding cutbacks that would result in fewer sections of some courses in the next school year. They thought they could offer program depth and an array of community resources to Lester Prairie and Brownton students, but they expressed concern about the fate of those programs if students came to Glencoe for home economics courses. It was reported that no communication concerning shared programs had occurred between home economics teachers from the three communities.

School District and Expenditure Category	Year	
	1980-81	1981-82
Glencoe		
Salaries	\$40,826	\$42,280
Supplies	3,090	3,400
Equipment	695	550
Facilities*	<u>1,000</u>	<u>1,100</u>
TOTAL	\$45,611	\$47,330
Lester Prairie		
Salaries	\$12,000	\$12,478
Supplies	2,200	2,400
Equipment	1,200	2,500
Facilities	<u>----</u>	<u>----</u>
TOTAL	\$15,400	\$17,378
Brownton		
Salaries	\$ 7,791	\$ 9,353
Supplies	1,332	1,825
Equipment	2,111	965
Facilities	<u>----</u>	<u>----</u>
TOTAL	\$11,552	\$12,853

*Utilities

Source: Superintendents from each school.

One Brownton individual indicated that a workable sharing model might be for a Glencoe teacher to go to Brownton or Lester Prairie to teach a particular class.

One administrator mentioned that he thought the potential for sharing between schools existed with respect to the home economics program.

Glencoe did not perceive that any changes had occurred in their home economics programs as a result of the sharing arrangement between the three schools.

When individuals were asked what they saw as the main problems associated with implementing a sharing arrangement in the home economics programs, responses included: 1) scheduling - it locks you in; 2) student identity and acceptance; 3) the time and busing that would be involved; and 4) enrollment would be a problem in home economics programs in the home schools.

Comments also noted that: 1) money could be saved if teaching materials were shared between districts; 2) money might be saved through staff reductions at some schools; and 3) it would be important to determine that what you could obtain by sharing was better than what you presently have.

At Lester Prairie the feeling was noted that students were offered an excellent home economics program and that no added benefits would come to students by sharing. Facilities were perceived to be excellent and there were positive feelings toward the program. Although at least one community person said that students should not be discouraged from going to another school for a course they wanted, a school official in Lester Prairie felt they had a good home economics teacher and students were not interested in going to Glencoe for a class.

course in Glencoe. Home economics students or programs were not being shared with Glencoe beyond this isolated instance.

CHAPTER VI

VOCATIONAL AGRICULTURE PROGRAM

History

The agriculture program at Glencoe had been in existence for at least 40 years. Brownton also offered an agriculture program to its students, but Lester Prairie did not. Students from both Lester Prairie and Brownton had registered in Glencoe agriculture courses since the sharing between the schools had begun. However, Lester Prairie seemed to be deemphasizing the cooperative venture. They seemed to feel that the best way to keep their school strong was to keep students at home.

There was a strong concern in Lester Prairie that the tight school budget put the cooperative venture high on the list of activities that could be eliminated. Program costs had been accepted by the community, but in times of financial crisis the program was expendable. It was stated that if students had some variety in their home school, they would not be interested in going to another for courses.

Brownton reported having a positive feeling toward the cooperative arrangements. They liked the opportunity for students to explore various occupations in the present arrangement rather than the intense specialization that existed in the previously experienced vocational center concept.

Size

Average enrollments for agriculture courses in Glencoe was reported to be 19. Average non-vocational class size was 25. The percentage of students eligible to take agriculture who actually enrolled was reported to be about 20 percent.

Minimum enrollment required for Glencoe agriculture courses was 12. Current total semester enrollment in agriculture courses was reported to be 193. This enrollment was distributed across courses as shown in Table 38. Two of the courses were offered once every two years.

The table shows six Lester Prairie and two Brownton students enrolled in the Plants and Soils course in Glencoe. Three Brownton students took a Small Gas Engines course for a total of five students in the Glencoe program in 1981-82. Brownton was attracting 153 students in their own vocational agriculture program.

Facilities and Equipment

Agriculture facilities at Glencoe included an office, storage room, classroom (896 square feet), and agricultural mechanics laboratory (2400 square feet). All facilities were located within the school building. No land laboratory was available.

Facilities were not shared with any other group or curriculum at the time of the interviews but it was reported that the laboratory would be shared with industrial arts in the following year when courses in small engines and welding currently taught by the agriculture department would be taught by the industrial arts teacher.

The office was described as too small and the laboratory as adequate but sometimes crowded when many students were working on projects.

Future plans for the facilities included maintaining present space, and likely continued sharing of facilities with industrial arts. Equipment was described as adequate, but future plans included the addition of a microcomputer.

agricultural mechanics laboratory (1,920 square feet). All were located within the existing school building.

Table 38. Number of students Grades 9-12 enrolled in agriculture courses offered in Glencoe and Brownton in 1981-1982 or most recent offering.

School District	Course Title	Enrollment by School District			Enrollment by Sex		
		Lester Prairie Students	Brownton Students	Glencoe Students	M	F	TOTAL
Glencoe	Exploring Ag I A			43	41	2	43
	Exploring Ag I B			48	39	1	40
	Animal Science I			25	21	4	25
	Animal Science II			25	21	4	25
	Farm Management I			15	12	3	15
	Farm Management II			16	15	1	16
	Plants & Soils	6	2	16	22	2	24
	Plumbing, Elect. Conc.			45	45		45
	Ag Buildings			13	13		13
	Ag Power & Equip.			32	32		32
	Beginning Welding			31	30	1	31
	Advanced Welding			14	14	0	14
	Small Engines		3	20	23	0	23
	TOTAL	6	5	335	328	18	346
Brownton	Pre Ag 7		28		15	13	
	Pre Ag 8		30		21	9	30
	FFA & Crops 9		11		11	0	11
	Shop & Livestock 9		14		11	3	14
	Soils & Concrete 10		10		10	0	10
	Livestock Feeding & Welding		10		10	0	10
	Farm Credit, Marketing & Management 11						
	Farm Machinery & Animal Diseases 11						
	Farm Buildings & Agribusiness 12		24		24	0	24
	Materials Handling & Shop		26		26	0	26
	TOTAL		153		128	25	153

Source: Vocational agriculture teachers in each school.

Finances

Costs for the agriculture programs in 1980-1981 and 1981-1982 in the three districts were as presented in Table 39. In general, the agriculture program was well established in both Glencoe and Brownton. Facilities were in place, and the major expenditures were for salaries and supplies. Glencoe employed three teachers, two high school and one full-time adult farm management teacher. Brownton employed one full-time high school teacher. Both schools were considering reducing the eleven month positions of their vocational agriculture teachers to 10 or 10.5 month contracts.

Table 39. Agriculture program expenditures.

School District and Expenditure Category	Year	
	1980-1981	1981-1982
Glencoe		
Salaries	\$35,996	\$40,153
Supplies	2,366	2,366
Equipment	727	700
Facilities*	<u>1,500</u>	<u>1,650</u>
TOTAL	\$40,529	\$44,869
Lester Prairie	None	None
Brownton		
Salaries	\$20,317	\$25,055
Supplies	2,916	2,635
Equipment	1,515	1,878
Transportation/Travel	<u>2,513</u>	<u>4,025</u>
TOTAL	\$27,261	\$33,593

*Utilities

Source: Superintendent of schools in each school.

Management

Responsibility for the day to day management of the three-teacher Glencoe agriculture department was assigned to the senior teacher (adult farm management) who served as the department chairperson.

In Brownton the management responsibilities were handled by the vocational agriculture teacher.

Staff

The Glencoe agriculture department was a three teacher department. One taught the adult program, the others taught at the high school level. One high school position was being cut for 1982-83, but until then, both high school teachers were employed full time in vocational agriculture on 11 month contracts. Their employment was considered 100 percent vocational.

The senior secondary teacher had seven years of teaching experience, all of them at Glencoe. The second high school teacher was in his first year of teaching.

The senior secondary teacher taught ninth grade exploratory agriculture, soil science, agricultural buildings, farm management, agricultural power and equipment, and a course in plumbing, electricity and concrete. His teaching schedule included two sections of ninth grade agriculture, one section of farm management, one of agricultural power and equipment, one study hall, a preparation period, and one period of occupational experience supervision. He also advised the Future Farmers of America Chapter (FFA).

The most frequent communication patterns reported by this teacher were with community people, followed by other teachers and administrators. In his communications with teachers, most were with his department colleague followed by agriculture teachers at other schools and teachers at other educational levels were the most frequently used communication channels.

his school followed by the superintendent. Among community people, the most frequent communication occurred with parents of agriculture students followed by advisory committee members and other community members.

The second high school agriculture teacher taught two sections of small engines, two sections of beginning welding, supervised one study hall, and had one preparation period. He also advised the FFA Chapter. This teacher's position was to be eliminated as a result of program cutbacks for the following year.

The adult farm management teacher spent his full-time working with farm families in the community with farm accounting, farm business analysis and farm business reorganization problems. He also offered enterprise classes to farmers periodically.

The vocational agriculture teacher at Brownton was employed on a full-time eleven month basis devoting 100 percent of his time to the program. He had 13 years of experience with seven years in his present position at Brownton.

His seven period day included a seventh and eighth grade pre-agriculture course, a one period freshman exploring agriculture course (including FFA, crops, shop and livestock), and one period of sophomore agriculture course (including soils, concrete, livestock feeding, and welding), and a two period junior-senior agriculture course (including farm buildings, agribusiness, materials handling, and shop on alternate years with farm machinery, animal diseases, farm credit, and marketing and management). One preparation period and one period for supervision of students' occupational experience programs completed his daily schedule. In addition to these responsibilities, he served as the FFA advisor and was a wrestling coach.

Materials

In Glencoe, the agriculture teachers reported sharing teaching materials with each other but not beyond the department. Future plans for materials included maintaining the present range of materials, replacement, and the addition of a microcomputer.

In Brownton the agriculture teacher did not share teaching materials and equipment with anyone. He felt that if materials were needed the school would provide them. Future plans were to maintain the present range of materials and equipment.

Scheduling and Program Planning

Glencoe offered 13 semester agriculture courses. Two were offered every other year. Several courses had multiple sections when offered. Courses are identified in Table 40. Some courses had prerequisites but it was reported that there was an effort to eliminate these whenever possible.

Several changes in the program were planned for the following year, with implementation of the seven period day and the reduction of one teacher. Three courses, small engines, and beginning and advanced welding would be shifted from agriculture to industrial arts. The agriculture curriculum focus would be reoriented toward a traditional Ag I, II, III, IV program. The semester structure would be modified to establish a full year sequence. Table 40 depicts the new structure of the Glencoe agriculture program.

Perceived consequences of the new structure for the agriculture program were less flexibility and students taking fewer classes. Some speculation was expressed that, with the curriculum change, Brownton students may not come to the Glencoe agriculture classes because they could get Ag I, II, III and IV in Brownton. However, since Brownton students were coming to Glencoe primarily for the small gas engines course, they were already largely not enrolling in the regular vocational agriculture courses.

Through an arrangement coordinated by the agriculture teachers, summer programs in agriculture were available for students in Lester Prairie, Glencoe and Brownton. This program involved trips and special events. The three schools had coordinated these for two years. Prior to that, Brownton and Hutchinson had cooperated to provide this kind of program. The number of students involved was not reported.

Course	Grade Levels
Exploring Ag I A	9-10
Exploring Ag I B	9-10
Ag II A	10-12
Ag II B	10-12
Ag III A	11-12
Ag III B	11-12
Ag IV A	12
Ag IV B	12
Ag Buildings	11-12
Ag Power and Equipment	11-12

Source: Vocational Agriculture Teachers, Glencoe.

The Glencoe department head reported that major influences on his decisions of what to teach included students' future plans for education and work, textbook content and reference materials, instructor interest and knowledge, facilities and equipment available, contests students would enter, students' supervised occupational programs, and student needs. Moderate influences on curricular decisions included state curriculum guides, the type of industries and businesses in the community, administrative decree, advisory committees, standardized tests, and community values, norms, and conditions. School district curriculum guides were reported to have little influence.

An agriculture advisory committee guided the program. This committee of parents, school administrators, farmers, homemakers, business and industry representatives and students, met once or twice per year.

Changes that had been observed in the agriculture program since the implementation of the cooperative arrangement between the three schools included: 1) a decline in the number of students enrolling from Lester Prairie, and 2) changed patterns in course offering schedules. Plants and soils science, animal science, agricultural power and equipment, plumbing, electricity and concrete were the courses repeatedly offered during the first and second hours of the school day in Glencoe, reportedly in response to the demand for these courses by the visiting students.

Brownton was not making or planning to make any changes in their present schedule or curriculum for vocational agriculture. They had shifted from a program emphasis on agricultural mechanics to an exploratory, general agriculture emphasis focusing on many areas of agricultural production. Consequently, students with mechanical interests were utilizing the cooperative effort with Glencoe by enrolling in the small engines course.

The Brownton teacher indicated there was considerable support for the agriculture program. The teacher indicated that suggestions from parents, school curriculum guides, types of business and industry in the community, facilities and equipment, an advisory committee, community values and norms and student needs had much influence in determining what was to be taught. The teacher felt that state curriculum guides, contests, students' supervised occupational experience programs, administrative decree, teacher knowledge of the subject matter, teacher interest, textbook content and students' future plans had some influence on what agricultural subject matter was taught.

Parents, farmers, students and representatives from agribusiness were represented on the advisory committee for the Brownton vocational agriculture program. This committee met twice a year.

Students

Glencoe, Brownton and Lester Prairie high school agriculture students were described as 100 percent Caucasian, primarily middle class, and as mixed but predominantly average in academic

Glencoe, two-thirds to three-fourths of the students enrolled in the vocational agriculture program lived in the country and most of the students were engaged in farming. The reputation of the Glencoe program was reflected in the fact that about 75 percent of the students' parents were reported to have previously enrolled in agriculture courses. About 77 percent of the students were dues paying members of the FFA. Agriculture courses were available to any students who wanted to take them. All courses were considered elective in the Glencoe curriculum.

The year following graduation, Glencoe agriculture students were reported to be involved in the following situations (percentages do not total 100, and some categories may overlap): attending further schooling (20 percent); employed full-time (40 percent); armed services (5 percent); parent (5 percent); farming (25 percent). Students who attended further schooling to pursue agriculture typically enrolled in the two year agricultural school at Waseca or the vocational institutes at Alexandria or Willmar. Students who pursued further education in fields other than agriculture tended to enroll in Southwest State or Mankato State universities. Those entering farming usually did so on the family farm.

Factors cited in the recruitment of students living in the city of Glencoe were the student grapevine and presentations that were made to younger students. It was reported that students were encouraged to enroll in agriculture as freshmen. Courses had been titled to appeal to the interests of both students who lived in city as well as those who lived in the rural areas. The teacher felt that the movement back to Ag I, II, III, IV titles altered the appeal courses had for students and student interest in enrolling in these courses. It was noted that the guidance program at the middle school had been eliminated in 1981-1982. This action was perceived by the teacher to be related to the drop in the number of freshmen enrolling in agriculture from 35 to 17 for 1982-1983.

It was reported that students who came from Lester Prairie and Brownton to take Glencoe's agriculture courses were juniors and seniors. The senior secondary teacher reported having enjoyed Lester Prairie and Brownton students. His expectations when the arrangement began were "that problem students would be sent." Instead, student interest had been the basis for students selection and enrollment in shared courses. His assessment was that, "high caliber students have come and discipline has not been a problem."

Students were reported to use what they learned in agriculture courses in their employment and in their farming endeavors. Other functions which the agriculture courses were thought to serve for students were career and interest exploration, a stepping stone to further education and skill development.

Enrollment in agriculture was required for FFA membership. Barriers to student participation in FFA were said to be its "farming" image and peer pressure. Glencoe FFA membership was available to Lester Prairie students but none were reported to have joined. Brownton had its own chapter with 100 percent membership from agriculture course students.

In Brownton, the students with a farm background constituted 74 percent of the enrollment. The teacher perceived that academic performance of students enrolled in agriculture was mixed: 25 percent high academic achievers, 50 percent middle, 25 percent low. Consistent enrollments were maintained in the program from year to year.

The year following graduation, Brownton vocational agriculture students were reported to be (total is more than 100 percent because of some multiple activities): attending further schooling (64 percent), taking full-time employment (20 percent), farming (20 percent), and entering the armed forces (8 percent). It was reported that a high percentage of students who continue their education did so at an A.V.T.I.

It was reported that there was some discussion about reducing the teacher's contract time and eliminating or reducing the summer employment.

In Lester Prairie there was concern about student recruitment for the agriculture program in Glencoe. It was felt that teachers and some administrators would resent having the Glencoe vocational agriculture teacher recruit Lester Prairie students. However, some school personnel did not feel Glencoe had really tried to attract their students. They could see no problem with a Glencoe teacher contacting students and making them aware of opportunities in the curriculum. Generally, there was little opportunity reported for Lester Prairie students to learn of course possibilities in Glencoe.

Agriculture offerings in Glencoe were perceived as adequate. As one school official said, "This is an agriculturally oriented community. Agriculture is important here - both to people living in town and the country."

Benefits to students enrolling in agriculture courses were seen as the array of offerings from which choices could be made and the orientation and background the courses provided for students in pursuing the agribusiness career opportunities that were available to them. It was observed that fewer offerings next year could reduce this opportunity for diversity.

Perceptions of administrative support for the program were that, in general, vocational areas were being cut back (agriculture, business, home economics, and industrial arts were reported cut back for the following year). At the same time, it was acknowledged that one foreign language course was being dropped.

In general, other teachers were perceived as supportive of the agriculture departments in both Glencoe and Brownton. It would seem that, with the exception of a few people contacted, there was enthusiasm for vocational agriculture.

In both Glencoe and Brownton, a number of citizens were involved in the agriculture program. They served on advisory committees and provided supervised occupational experience work stations. In Glencoe, improvements were thought needed in community involvement. One instance was cited in which agriculture students had sponsored a coffee hour, inviting 25 business persons as guests. Only three came! They felt improvements were needed in relating to the business community.

The common perception that agriculture meant farming was contrary to the view the teacher and others wanted students, parents and others to hold. Concern was expressed that Lester Prairie students were getting a specific course that did not necessarily add up to experiencing a full agriculture program.

CHAPTER VII

SUMMARY, CONCLUSIONS, RECOMMENDATIONS

Summary

The centralized noncenter agreement pattern of inter-district cooperation was represented by the Brownton, Glencoe, Lester Prairie agreement. It included the following characteristics:

1. An informal, self-identified governance body of participating school superintendents and principals who had been given the authority to serve in this capacity by their school boards. No formal constitution or bylaws were involved. A legally binding written resolution or agreement was not used to authorize the terms of cooperation.
2. Each school district was a fiscal agent for its own portion of the cooperative enterprise, assessing other districts for services rendered and received direct payments from each district. Glencoe simply billed the other districts for the services they provided.
3. No additional administrative or instructional staff was involved. The existing Glencoe school district's teaching staff conducted and supervised the shared courses. The shared courses were administered by the Glencoe principal.
4. Programs or courses offered to Brownton and Lester Prairie were a specifically identified, stable set of offerings. Shared offerings were limited to available courses in Glencoe.
5. In this centralized center, programs were located in the Glencoe high school building, and in one rented building.
6. Students from the Brownton and Lester Prairie districts were bused to Glencoe daily at a cost to their home districts. All shared courses were scheduled first two periods to consolidate transportation activities.

A summary of the data associated with each of the questions that guided the case study is presented in the following section:

1. What are the essential features of the centralized noncenter pattern?

a. Governance

- The "non-center" was organized around an informal agreement (resolution) between three school districts with the largest district, Glencoe, making its course offerings available to students in the other two schools.
- There were no formal organizations such as boards or governing bodies.
- The agreement was approved annually by each participating school board.
- The principals met to initiate the agreement. Since that time, they had held informal sessions at various administrative meetings.
- The state joint powers act makes the cooperative arrangement legal.
- Each school district makes its own policies. Students traveling to another school to attend a course must abide by that school's policies.

b. Funding and Budgets

- Each school district budgets independently.
- The course providing district bills the cooperating districts for the actual costs per student enrolled.

- Each district receives state aid on vouchers in order to cover the cost of the program.

c. Staff

- The principal of the offering school is the primary administrator, assisted by counselors, principals and superintendents of cooperating districts.
- Teaching staff consisted of the existing teachers in the central district. In this case, there were two vocational agriculture teachers involved, no home economics teachers, and an industrial arts teacher. Others involved were some special education teachers and non-vocational teachers.

d. Services

- The vocational programs were made available, by the providing district, to students in cooperating school districts.

e. Facilities

- Three permanent school buildings and one rented facility were available to house programs.
- The centralized facility had sufficient space to accommodate additional students.
- The existing facilities were fully utilized in the centralized agreement.
- Existing administrative facilities were sufficient.
- No adaptation of existing facilities was required.

2. How does the centralized noncenter work?

a. Financing, costs and cost distribution

- The teaching staff salaries were determined by the central school district according to their salary schedule.
- State vocational aids were received by the school district which offered the program.
- State foundation aid flowed to central school district for period of time students are away from home district. Home district lost that portion of foundation aid.
- Central school district assessed cooperating districts for services provided depending on number of students enrolled, and according to established formulas.
- Administrative costs were contributed by participating school districts.

b. Scheduling

- One or two periods per day were shared by the cooperating schools.
- All courses were semester length.
- The first and second periods of day were designated for shared courses and time schedules were appropriately synchronized.
- Yearly schedules were not synchronized.
- The first period time schedule was synchronized among schools.
- Emergency interruptions in the school schedule were not synchronized.

c. Transportation

- Five trips were made each week.
- The school buses traveled 35 to 40 minutes for the round trip.

d. Students

- Students were screened by home school.
- The centralized non-center teachers were not allowed to recruit or make courses available or known to students in participating schools. It was felt other teacher positions could be threatened if center teachers became too active in recruitment.
- The grade levels participating was a decision of the participating schools, though generally juniors and seniors were the only students with sufficient scheduling flexibility.

a. School district characteristics.

- The participating schools range in size from 382 students to 1,563.
- The centralized school is the largest of the participating districts.

b. Geographic characteristics.

- The area served by the participating school districts equaled about 278 square miles.
- The pupil densities varied from 4.85 to 9.94 pupils per square mile in member districts.
- The distance between participating districts ranged from 11 to 15 miles.

c. Social characteristics.

- The local business and industry was available to provide relevant occupational experiences.
- Communities and school districts have similar philosophies and values.
- Academic education carried a higher priority than vocational education.

4. What consequences does the centralized noncenter have for educational quality and access?

a. Quality.

-- Strength:

1. Teacher and program continuity were possible, and students and schools could depend on the program being available.

-- Weaknesses:

1. Staff limited to the central school faculty.
2. No advisory committee or means was provided to monitor program quality.
3. No open communication existed among faculty of participating schools.
4. No real incentives to update or upgrade curriculum or facilities were provided.

b. Access

-- Strengths:

1. Shared courses increased the number of programs available to students in agriculture.
2. Unique program, resources and strengths were shared among school districts.
3. School district could expand curriculum without bearing the full cost.
4. Low enrollment in one school was improved by cooperation among three schools.

-- Weaknesses:

1. Student travel was required.
2. The teacher was not allowed to actively recruit students from the cooperating districts.
3. Mixing students from other districts was viewed as threatening, creating anxiety in attending classes in a larger school district.
4. Requirement to schedule shared courses only during the first two class periods of the school day.

5. How might the centralized noncenter be modified?

a. Administrative leadership could be specifically assigned to one principal on a continuous or rotational basis to schedule, promote, coordinate and be generally responsible.

b. Videotapes, interactive video or other distance delivery systems could be used so that travel might be reduced and more courses in a program included. The first periods of the day and transportation problems could be alleviated with courses available at other times and students remaining physically in their home school buildings.

c. The formation of a satellite youth organization in each school, with each treated as subchapters

- e. A unique expertise in a non-central school could be made available to students in both the central and other cooperating districts, possibly through an alternative distance delivery system.

Conclusion

The centralized noncenter pattern has the potential to be one of the easiest concepts to put into practice. Larger centrally located school districts could do surrounding small districts a real service by initiating and encouraging this pattern. It has some favorable features which make it an attractive alternative.

Individual school district flexibility and autonomy is greatest in the centralized noncenter pattern. Schools make small dollar investments and the arrangement is more reversible since agreements and structures are less formal and only existing personnel is generally used. Cooperation leading to more complete enrollments in specific courses would also more fully use existing faculty and resources.

School districts sense of ownership in the cooperative arrangement is likely to be strong because it is not modified by intervening organization. However, the sense of ownership could also be quite low in cooperating schools who are sending their students out to the central district.

School districts may have a good perception of costs and benefits. There are costs, but their total is likely to be low. There are no added costs for additional personnel and facilities. Transportation costs may be high on a per student basis, however, because the number of students served may be somewhat low due to the limited number of courses and programs involved in the cooperative effort. Conversely, the usage-based cost principle used with this pattern was a positive feature. With positive perceptions originating from the central district not duplicating existing courses, decision-making did not appear to be associated with the usage rate.

It appeared evident that the school district offering the shared program had the most incentive to cooperate. The district offering the program receives income from other districts, experiences an increase in enrollment in its programs, utilizes its facilities and equipment most efficiently. The central district students do not have to travel. It also has district control over the program.

The cooperating districts have access to an expanded curriculum without bearing excessive costs. Enrollment in their programs may decline slightly due to the loss of students to other programs. These districts' control over the quality of shared programs is limited. All they can do is stop enrolling students.

The centralized noncenter pattern seems to best fit situations where the distance between cooperating schools is short. With the need for student travel, distances of more than 12-15 miles become prohibitive due to the time demands for students.

Communication between school administrators, counselors and the teaching staff is an essential aspect of the success of this pattern. However, irregular and infrequent communication among school administrators can characterize these centralized noncenters. The screening of students to enter this program is also an important feature. Since students from the cooperating schools must travel, they need to be able to discipline themselves and be worthy of this investment in their education.

The leadership aspect is the area that is most neglected in this pattern. It's clear that no one is specifically in charge of the program. The administrator (principal) offering the program may take the primary leadership role. However, there is no formal structure vesting leadership in that position. An aggressive leader may not be well received by other districts.

The student organizations for each program is an aspect of this pattern that does not function well. Meetings held at the central location, plus the identification with the offering school tends to reduce participation.

The supervised occupational experience program required of students in programs is also difficult to develop in the schools sending students to the central site. Teachers must travel great distances to make individual instructional visits and it tends to be difficult to manage and

The development of a program focusing on the needs of a participating community could be somewhat limiting. Needs of the school offering the program may prevail and the students from the participating districts only have available what is offered.

In summary, the strength of the centralized noncenter is its ability to expand the number of educational programs available to students in several school districts at a relatively low cost. It provides appealing incentives to the offering school district, and for the other participating districts, it reduces several of the disincentives associated with centers. Its chief advantages are in its efficiency, reversibility and relatively low cost. Disadvantages are in quality (ambiguous leadership role and potential for less-than-ideal facilities) and the need for one of the group of participating schools to have sharable programs. There is no reason that sharable programs could not be added if none exist, but to add them would increase costs, thereby reducing the cost advantage of this pattern.

Administrator turnover and similarity of participating community philosophies appear to have particular importance in this pattern. Also relevant is the likelihood that the offering school will be larger than the other participants (i.e. a school with sharable programs that other schools do not have is likely to be larger), and therefore unlikely to be a direct competitor, in areas such as sports. The financial condition of participating districts may also be different, however, since schools are not business partners but rather providers and purchasers of services, this factor is not as crucial as in the center patterns.

Recommendations

The centralized noncenter pattern merits consideration because it has features which should make it very appealing and worthy of wider consideration. It expands the programs available to some students at a relatively low cost, and it allows schools easy reversibility. They are not committed by legal binding documents to remain or leave a cooperative arrangement. Consequently, if circumstances change in a district, they retain the flexibility to alter their participation.

The primary problems in this pattern is the lack of a designated leader and the need for student travel. Generally, no administrator has been identified as being in charge. Consequently, an administrator, probably the superintendent or principal in the school offering the program should be formally identified as the coordinator or administrator. This person should be required to report on a regular basis to the administration and school boards of each of the cooperating districts.

The administrator in charge should be given authority to promote and encourage student participation. This person should also be given responsibility to handle discipline and transportation issues, to monitor and supervise to assure program quality, and to expand, develop or revise offerings. Teaching staff supervision must also be the coordinator's responsibility.

If possible, programs should be designed to meet the needs of students in all participating schools and not simply the school offering the program.

Schedule synchronization should be a priority among the schools. Starting and ending times regarding each days activities should be synchronized. The starting and ending dates, holidays, and inservice days for the year should also be coordinated among all the schools.

The possibility of not requiring students to travel every day merits consideration. The use of distance delivery techniques may be an alternative worth considering. The value of interaction among students and teachers is of value but it may not need to occur everyday.

Finally, the formation of mini student organizations in each school, as parts of larger centrally located and neutrally named groups should be considered. The name of a larger group should reflect all the schools involved, not merely the central offering school.

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