

FEASIBILITY STUDY OF UTILIZING ST. MARYS
COLLEGE FACILITIES FOR U.S.D. 321

by JGG

BERNARD LEE GIRARD

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Approved by:



Major Professor

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CHAPTER I

INTRODUCTION

Kansas in 1896 had 9,284 school districts. In a pioneer society academic achievement was secondary to obtaining a livelihood from the soil. This type of background developed the one-room rural school which was to become one of the important focal points of the community. It was the one-room school that served as the focal point for box suppers, spelling bees, community sings, and other social actions. Needless to say, in rural Kansas much sentiment became attached to the local school districts and attempts towards unification were met with strong disapproval. It wasn't until 1945 that the first major attempt towards reorganization took place. But as was to happen again in 1961, the legislation towards reorganization was declared unconstitutional by the Supreme Court. The 1963 legislature was determined to enact a sound reorganization law that would be constitutional. The 1963 law provided for incorporating all territory of the state into school districts that offered instruction from grades one through twelve with authority to operate kindergarten and, under certain conditions, junior colleges. Amendatory legislation was to follow in 1965 to correct problems and inequities that could not be foreseen in 1963.¹ As a result of unification of existing school districts there were 330 school districts

¹Adel F. Throckmorton, Kansas Educational Progress 1858-1967, pp. 82-88.

in Kansas on July 1, 1968. Of this number of school districts, 310 were unified and twenty were non-unified.²

Under the minimum requirements of H.B. 377 many advantages of unification were realized. First of all, each district would maintain grades one through twelve with coordination of the total educational program. Previously, elementary and secondary school districts existed as separate entities. Second, the entire school system of each unified district was under the control of one board of education and was administered by a single administrative and supervisory staff. Third, it made all property in the district available to support the entire educational program. Unification also permitted all citizens in the locality to have a voice in the entire educational program. It also fostered more effective use of tax revenue because school funds could be spent more advantageously through limiting competition between elementary and secondary districts; centralized purchasing; and provision of able administration of the finance and business affairs of the district. Through unification, teacher preparation also improved since it enabled specialization with a resulting reduction in the number of preparations. Unification also permitted utilization of special services personnel such as a school nurse; school psychologist; remedial reading specialist; special education teachers for the homebound and the handicapped; counselors; and adult education teachers. Further, through consolidation of schools the students derived the benefits of improved

²George D. Keith, "Unification Report", (Unification Division Kansas State Department of Public Instruction, 1968), p. 1. (Mimeographed.)

libraries, more audio-visual materials, and improved laboratories. Additionally, unification strengthened local control of education through an increase in flexibility of the educational program.³

Although school reorganization has reduced the number of school districts in Kansas from 1,848 in 1963 to 330 in July of 1968 many small, expensive, and inefficient high schools continued to operate. For instance, according to the 1967-1968 Unification Report there were 257 four year high schools with less than two hundred students. Of this number of schools only one was classified as comprehensive, and in this school a large number of classes with from one to five students was required in order to qualify for the rating. The report went on to show that out of a total of 35,515 high school classes in all districts there were 2,253 classes with from one to five pupils and 4,670 classes with from six to ten pupils. Therefore, it was noted that about twenty per cent of all high school classes within the State of Kansas during the 1967-1968 school year had enrollments of ten or fewer students.⁴

The basic philosophy underlying the advantages of school unification has not been achieved within the State of Kansas. Because in studying the 1967-1968 Table of Unified Districts Maintaining More Than One High School, it was noted that seventy-seven districts maintained more than one high school; a high school being defined as including grades nine through twelve. The seventy-seven districts

³"Advantages of Unification", (Unification Division Kansas State Department of Public Instruction, 1964), pp. 1-2. (Mimeographed.)

⁴Keith, op. cit., pp. 3-4.

contained 188 high schools. Of this number, only nine high schools outside of the populated areas of Kansas City, Wichita, and Topeka, which incorporated eighteen separate high schools of various organization, had an enrollment greater than three hundred students. Conversely, during the 1967-1968 school term there were 162 in the category that maintained less than three hundred students.⁵ During the previous school year there were also 146 single high school unified school districts which maintained schools with less than three hundred students.⁶

Kaw Valley Unified School District 321 was one of the seventy-seven unified school districts which maintained more than two high schools during the 1967-1968 school term. Kaw Valley School District consisted of 303 square miles of territory and was formed from ten individual school districts.⁷ The district in 1968 had an estimated tangible valuation of \$11,727,601 with a budget of \$637,936.⁸ Its September 1968 enrollment was 1,084 students. During the 1968-1969 school term Kaw Valley School District maintained elementary schools at Emmett, St. Marys, Delia, and Rossville with high schools at St. Marys

⁵"Table of Unified Districts Maintaining More Than One High School, 1967-1968", (Unification Division Kansas State Department of Public Instruction, 1968), (Mimeographed.)

⁶"Summary of Unified School Districts in Kansas", (Unification Division Kansas State Department of Public Instruction, 1967), pp. 1-12. (Mimeographed.)

⁷Ibid., p. 7.

⁸Louis E. Holaday, "A Report to the Board of Education Kaw Valley Unified School District 321, concerning the 1968-1969 budget", August, 1968.

and Rossville. Also contributing to the enrollment of St. Marys High School was the parochial elementary school at St. Marys.

According to Mr. Holaday, Superintendent of Unified School District 321, "The board is of the opinion that every patron of the district wants an education system second to none in the state. However, this goal cannot be realized without a building program of some sort."⁹ The board also noted that the district was offering a high school curriculum which was geared to the average student, and the curriculum did not have enough vocational education courses. It also did not meet the needs of the six to twelve per cent of the student body that had a level of mental ability below that normally considered sufficient to perform high school work satisfactorily.¹⁰ At the other extreme, the present program did not satisfy the needs of the twenty to twenty-five per cent of the students who were very capable and should be able to do advanced work satisfactorily.¹¹ After considering the above facts and others, such as overcrowded and unsafe conditions, the board voted to work towards one comprehensive high school.¹² Commitment to a building program by the board of education showed that it was concerned about the limited opportunities available to the students of the district. But

⁹News item in The Saint Marys Star, September 19, 1968.

¹⁰Secondary School Committee, "Proposal For The Secondary School Curriculum", (A Report to the Board of Education Kaw Valley Unified School District 321, 1966), p. 1. (Mimeographed.)

¹¹Ibid.

¹²News item in The Saint Marys Star, September 26, 1968.

Kaw Valley School District in trying to accomplish unification realized a difficult task since it did not provide the necessary facilities, and like most districts undergoing unification, lacked the finances necessary to carry out a building program that would meet the philosophical goals of unification.

Statement of the Problem

It was the purpose of this study to (1) evaluate the physical plant facilities of St. Marys College in terms of established educational criteria, and (2) evaluate St. Marys College facilities in terms of criteria established by Unified School District 321.

Importance of the Study

A number of critical situations faced those who were responsible for the educational program of Unified District 321. Some of the problems were brought on as a result of unification of school districts, and others were a result of population growth, and general deterioration of facilities.

One of the basic problems facing the district was the crowded conditions which existed at its attendance centers. For instance, St. Marys Grade School was designed for ninety-two students but during the 1968-1969 school term maintained an enrollment of 185 students. St. Marys High School had a capacity rating of 150-160 students, and during the same term, had an enrollment of 205 students with a projected 1972-1973 enrollment of 221. Rossville High School, which also had a rated capacity of 150-160 students, had an enrollment of 167 students

with a projected 1972-1973 enrollment of 197. Rossville Grade School was under similar crowded conditions and had to purchase a mobile classroom. After adding the trailer it still contained a class of thirty-eight students and a class of forty-two students.¹³

The elementary facilities of Emmett and St. Marys were also in poor structural condition in addition to being overcrowded. For instance, according to the November 8, 1968, State Fire Marshal's School Inspection Report, Emmett Grade School, which was a two-story rock structure, had open-wood stairways with poor electrical wiring. And St. Marys Grade School, which was a two-story rock structure with a basement had three foot open-wood stairways in poor condition, and poor electrical wiring. It also had a general rating of very poor for the old part and fair for the new part with poor exits and poor frame interiors.¹⁴

Adding to crowded conditions facing the district was the questionable status of Immaculate Conception Grade School with its 191 students. On December 12, 1968, the Parents Club met to discuss the questionnaire sent out to determine the wishes of the parents concerning the future of the school so that a plan of action could be formulated.¹⁵

¹³News item in The Saint Marys Star, September 19, 1968.

¹⁴"School Inspection Report", (State Fire Marshal Department State Office Building, Topeka, Kansas 66612), November, 1968.

¹⁵Parents Club meeting, Immaculate Conception Parish Hall, St. Marys, Kansas, December 12, 1968.

Also facing the district were the curriculum proposals submitted by the Secondary School Committee which recommended a comprehensive high school to correct program deficiencies.¹⁶

The school board realized the need for additional facilities and therefore obtained the services of professor John Gilliland of Educational Planning Laboratories of the University of Tennessee to assist them in their planning. With the assistance of professor Gilliland, the high school teachers of the district drew up a set of educational specifications to meet the curriculum needs of the future. By building one comprehensive high school the board of education was attempting to provide for the immediate building needs of the district.

After studying the educational specifications, an architect drew up a preliminary building design for a site between St. Marys and Rossville. A bond proposal for \$2,170,000 was then submitted to the voters of the district in the 1968 general election and was decisively defeated by an unofficial vote of 1,298 against and 450 for.¹⁷ An analysis of the results of the election showed a number of factors were involved in the defeat of the bond proposal. One of the most important was the obvious tax increase which would have been imposed upon the citizenry. A second concern, especially in St. Marys and Emmett, was

¹⁶Secondary School Committee, "Proposal For the Secondary School Curriculum", (A Report to the Board of Education Kaw Valley Unified School District 321, 1966), p. 18. (Mimeographed.)

¹⁷News item in The Saint Marys Star, November 7, 1968.

the concern that not enough information had been given to the possibility of utilizing vacated St. Marys College.

It was the purpose of this study to provide information concerning St. Marys College facilities and the feasibility of using the facilities to satisfy the building needs of the district. As a result, the writer desired to answer the questions of the concerned citizens and thereby assist in remedying the building problems of the district.

Limitations

This study was limited to evaluation of the facilities of St. Marys College in terms of evaluation criteria developed by the College of Education, Kansas State University.

The writer did not possess the architectural competency required to determine the cost of a remodeling program of any existing facility.

Curriculum designs employed within the study were incorporated through recommendations of the Secondary School Curriculum Committee and the Educational Specifications Committee.

Further, this study was limited to the physical plant facilities as they applied to the entire educational program and did not propose to measure total district attitude towards incorporation of St. Marys College.

Definition of Terms Used

As a guide to the reader and to prevent misunderstanding, the following terms are defined according to their use in this report:

Elementary School: An elementary school which offered an educational program for grades kindergarten through eight.¹⁸

High School: A high school which offered an educational program for grades nine through twelve.¹⁹

Comprehensive High School: A program of course offerings of fifty units as outlined by the State of Kansas.

Unified School District No. 321: The school district organized under the authority of Kansas H.B. 377.²¹

St. Marys College: A Jesuit School of Theology, formerly a men's liberal arts college, which was located at St. Marys, Kansas

¹⁸Carter V. Good (ed.), and Winifred R. Merkel, Dictionary of Education, 2nd ed., p. 197.

¹⁹Ibid., p. 268

²⁰Adel F. Throckmorton, Rules, Regulations, Standards, and Procedures for Accrediting High Schools, State Department of Public Instruction Bulletin 201, Revised, 1967, p. 10.

²¹Rev. Stat. Kansas, 1963, H.B. 377, Sec. 2.

REVIEW OF THE LITERATURE

Research for this study was conducted in the library of Kansas State University; the Kansas State Department of Public Instruction Offices; and the Unified School District No. 321 Office in St. Marys, Kansas. In determination of the feasibility of utilizing St. Marys College to satisfy the needs of the District, it was imperative that basic considerations of good plant practice were understood. At the same time, it was also necessary to review the findings of the previous studies conducted within the district in order that their recommendations and suggestions could be given careful consideration.

Basic Considerations

An analysis of the College feasibility, required recognition of the trends in education and construction. Reida, in his discussion of ten significant trends in education, wrote of the two distinct realities which must be realized in planning a building program. He stated that it must be realized that changes have occurred in educational methods and techniques. This does not necessarily mean that the basic goals have changed, since in most cases the new innovations have not changed the educational philosophy. And secondly, it must be understood that tremendous advances have been made in construction technique and building materials.¹

¹George W. Reida, "Trends in Schoolhouse Construction." (School Facilities Section, Kansas State Department of Public Instruction, 1965), p. 1. (Mimeographed.)

One of the basic trends of construction which this study was concerned with was flexibility. Reida discussed the three types of flexibility suggested by Caudill: (1) immediate flexibility was that which consisted of some type of folding partition or divider, (2) overnight flexibility was that which could be easily accomplished by removable partitions, and (3) over-the-summer flexibility was that which could be easily achieved, at some expense, in a few weeks.² Gilliland, in writing of feasibility discussed four types of flexibility: (1) daily flexibility which can be obtained on a moments notice, (2) frequent flexibility which may involve moving heavier and more complex items of equipment and furnishings, (3) infrequent flexibility which could be achieved at somewhat greater expense and would involve changing more permanent equipment and furnishings, and (4) long-range flexibility which could provide for varying conditions with ease through careful planning.³ The need for planning to achieve flexibility was further brought out in a study by Hendry which was concerned with analyzing factors affecting secondary schools utilizing team teaching. In his study he found a significant difference between the needs of team and non-team teachers concerning facilities.⁴

²Ibid., p. 5

³John W. Gilliland, et. al., "Educational Specifications For Kaw Valley High School, St. Marys, Kansas", School Planning Laboratory, pp. 7-8.

⁴William Warwick Hendry, "Faculty Concern About Select Factors in Secondary Schools Utilizing Team Teaching", Dissertation Abstracts, 27: 2783, 1966.

Since buildings should be designed to fit the educational program, this study had to be cognizant of curriculum changes taking place. Allen has stated that there are three kinds of educational innovations:

(1) those consisting of new ideas and approaches to existing problems, (2) those made possible as a result of new technologies, and (3) those arising from needs and demands on the educational system as a result of social change. He went on to mention that we cannot prepare students for jobs and responsibilities that are clearly understood, well-defined, and stable as we know them to exist today.⁵ Cawelti in his national survey of innovative practices in 7,237 accredited high schools identified twenty-seven innovations. From his study he made the following observations:⁶

- (1) The diffusion rate for the acceptance of new ideas is now more rapid than ever before in the history of education.
- (2) Schools and states vary greatly in participation. Cost appears to be a retarding factor affecting their acceptance.
- (3) A search of the literature indicates the effect of different treatments or strategies of learning over a meaningful period of time is lacking.
- (4) The search of the literature also suggests that there are relatively few authentic innovators in the field of education.

⁵Dwight W. Allen, "Innovations in Elementary and Secondary Education", 1965 White House Conference on Education, pp. 136-137.

⁶Gordon Cawelti, "Innovative Practices in high schools: Who does what -- and why -- and how", Nation's Schools, 79:56-74, April, 1967.

- (5) The abandonment rate of some of the new programs stresses the need for careful planning.
- (6) Schools should develop discrete goals, a system for continuous evaluation, and a willingness to acknowledge weakness in planning for change.

In reference to the previous study by Cawelti, the editor of Nation's Schools has said:

Perhaps the most significant statistic in the study shows that the average accredited high school uses six of the twenty-seven innovations listed in the survey. If this study were conducted again in five years, and we hope it is, we'd bet that the average of six would double and probably triple.⁷

Littrell, through analysis of the literature, consultation with subject matter specialists, and discussion with teachers, presented a concise list of curricula practices in existence. In addition he gave judgment on the direction which the present practices appeared to be moving.⁸ It was reiterated that innovations have to be planned very carefully since in some cases they require special spaces and spatial relationships. As brought out by Stahl in his study of cost of programs for the academically gifted, special programs often call for additional money.⁹

⁷Aaron Cohodes (ed.), "Everyone worries about assessment these days", Nation's Schools, 79:55, April, 1967.

⁸J. Harvey Littrell, "Current Practices and Trends in the Elementary and Secondary Curricula", (Kansas State University College of Education Bulletin, 1966 Revision), pp. 1-18. (Mimeographed.)

⁹Martin LeRoy Stahl, "Program Opportunities and Per-Pupil Costs of Services For The Academically Gifted", Dissertation Abstracts, 27-88, 1965.

Another trend which has an effect on a building or remodeling program was the increasing number of summer programs offered. As pointed out by the Research Division Bulletin, there are more and more summer programs each year even though the length of the school year has not increased appreciably within the last five years.¹⁰ This study required that the trend of an extended school year be given careful consideration since it would have an important effect on a program housed within the College facilities.

A second basic consideration of the study that had an effect on the feasibility of utilizing St. Marys College was that of the adaptability of the school site. According to Reida, "a poorly arranged or underdeveloped site, like a badly designed or partially equipped classroom, defeats in part the very purpose for which it was obtained."¹¹ He went on to mention the factors to look for in a good site. Suitable areas for physical education, parking, loading and unloading pupils, outdoor laboratories, drives, walks, recreation, and supplementary space are some factors which had to be considered. Gilliland further noted that the relationships of learning spaces, auxiliary areas and service areas must provide for a free interchange of personnel without conflict of function.

¹⁰"Length of School Year", National Education Association Research Bulletin, 43:103-105, December, 1965.

¹¹George W. Reida, A Manual For Evaluating School Facilities, p. 6.

¹²Ibid., p. 7.

¹³Gilliland, op. cit., p. 14.

A third basic consideration which had to be observed in appraisal of the facilities was that of the building structure itself. Reida said that the gross structure of a building should be durable, fire-resistant and meet national and city building codes.¹⁴ The National Council of Schoolhouse Construction also discussed the factors of school plant safety in respect to structural safety, fire resistance, fire protection, circulation safety and convenience.¹⁵ A point of emphasis most appropriate to this study was that "buildings of three or more stories should be fire-resistive throughout except that wood may be used for floor covering and trim".¹⁶

By determination of the space requirements the study was in essence concerned with the size of the schools. Consequently, the size of the school had to be determined. In his study of optimum school size Ovaitt found that high schools with an enrollment less than four hundred students tends to pay a higher per pupil cost for an inferior educational program.¹⁷ In retrospect, Conant has stated "I early became convinced that a high school must have a

¹⁴George W. Reida, A Manual For Evaluating School Facilities, p. 12.

¹⁵National Council of Schoolhouse Construction, Guide For Planning School Plants, 1964 ed., 94-103.

¹⁶National Council of Schoolhouse Construction, Guide For Planning School Plants, 1958 ed., p. 155.

¹⁷Stanley Wixon Ovaitt, "A Study of the Optimum Size of the High School", Dissertation Abstracts, 27:1229, 1966.

graduating class of at least one hundred to function adequately as a comprehensive high school."¹⁸

Gilliland has related that administrative spaces should be readily accessible to students, teachers, and parents.¹⁹ The Council, in addition, stated that in planning the required spaces for administrative purposes factors such as number of pupils served, type of school, educational program and special services, and community use of the school should be considered.²⁰

Determination of feasibility of utilizing St. Marys College also relied on achievement of optimum standards for general classrooms, laboratories and special classrooms, and central facilities. The Council described those characteristics desirable in functional learning spaces.²¹ An analysis of the educational spaces at the College required the understanding that there is a certain amount of inflexibility inherent in the educational spaces required. Educational Facilities Laboratories wrote of two kinds of inflexibility found within a school. First of all, there are certain rooms such as laboratories which contain facilities that are unique to a particular field of study. And secondly, a high proportion of

¹⁸James Bryant Conant, The American High School Today, p. 14.

¹⁹Gilliland, op. cit., p. 16.

²⁰National Council of Schoolhouse Construction, Guide For Planning Schoolhouse Construction, 1964 ed., p. 72.

²¹Ibid., pp. 32-63.

classrooms are large in size and under loaded.²² The Laboratory also discussed the increased cost of providing for laboratory facilities and suggested ways of overcoming the added expense in terms of space and money.²³ In the area of planning required for the Instructional Materials Center, Hayden presented an overview of the facilities and services available as exemplified by the ten demonstration libraries located throughout the State of Kansas.²⁴

A fourth basic consideration of the study which had to be observed in analysis of the College was the service facilities. The Kansas School Health Advisory Council discussed five environmental factors which create a truly functional school not only from a physical standpoint but also from an emotional point of view.²⁵ Reida also emphasized similar factors and presented, with recommendations, principles affecting good lighting in the school.²⁶ Gilliland wrote about the general environment of the school and stated that the "environmental controls will allow personnel within the school to

²²John X. Jamrich, "To build or not to build: A Report on the Utilization and Planning of Instructional Facilities in Small Colleges", Educational Facilities Laboratories, p. 37.

²³"Educational Facilities Laboratories College Newsletter No. 4", Educational Facilities Laboratories, pp. 2-3, May 1964.

²⁴"See the Demonstration Libraries . . . in Action", Kansas State Department of Public Instruction, pp. 1-31.

²⁵Kansas School Health Advisory Council, "Environmental Committee Report", (Kansas State Department of Public Instruction, 1966), p. 2. (Mimeographed.)

²⁶George W. Reida, "Artificial Lighting For Modern Schools: A Guide for Administrative Use", pp. 1-42.

devote full efforts to creative planning, thinking, working and playing. Physical factors must be subservient to the desires of the people".²⁷ The significance of this philosophy was brought out by McCardle in his study of the effect of thermal environment on learning. He found that there were fewer errors in classrooms designed to meet the recommended standards for a good learning environment.²⁸

Review of the literature brought out four areas of consideration basic to this study. Therefore, analysis of the College facilities required: (1) an understanding of the trends of education as they related to building flexibility, length of school year, and the program of studies; (2) an understanding of the factors affecting site adaptability; (3) an understanding of the factors inherent within the building structure itself; and (4) an awareness of the importance of adequate service facilities.

Previous Studies Conducted for Unified School District No. 321

The 1966 study conducted by the School Plant Study Group from the College of Education, Kansas State University offered the opportunity to review enrollment projections and characteristics of the facilities at the various attendance centers within the district.

²⁷Gilliland, op. cit., p. 28.

²⁸Robert William McCardle, "Thermal Environment and Learning", Dissertation Abstracts, 27:356, 1966.

The study also made contributions in the area of dimensional characteristics of the individual spaces within each particular building.²⁹

The study recommended the scheduling of a remodeling program, of which much has been achieved at the time of this study. It also suggested the development of a Master Plan for the construction of additions and new buildings. In its long range plan, the study group recommended: (1) not more than four elementary, K-6, schools in the District; (2) the development of one good junior high school, 7-9; and (3) the development of one good senior high school, 10-12. As an alternate, the group recommended one new six-year, 7-12, secondary school, in lieu of separate junior and senior high schools.³⁰

The 1966 Study of School Building Structural Soundness with recommendations conducted by Krider analyzed the structural soundness of the individual attendance centers within the District and made the following observations:³¹

- (1) St. Marys High School building was sound and will continue to serve well for many years, but it has been subjected to poor maintenance in its thirty-five years of existence.

²⁹School Plant Study Group, "Enrollment Analysis and Building Appraisal: A Report to the Board of Education Unified School District No. 321", (Kansas State University, College of Education, 1966), pp. 1-55, (Mimeographed.)

³⁰Ibid., p. 29.

³¹Alden Krider, "Analysis of Unified School District No. 321 School Buildings Structural Soundness with Recommendations", A Report to Board of Education Unified School District No. 321", (Unified School District No. 321 Office, St. Marys, Kansas, 1966), pp. 1-18, (Mimeographed.)

- (2) The Vocational Agriculture building at St. Marys should serve as a machine shed. Should any other activity be contemplated, a serious evaluation of the facility should be made.
- (3) The structure at St. Marys Elementary School was sound. Given careful maintenance, the building will fulfill its role for several years. The question of its future role will be determined by the developments concerning the plans for secondary educational facilities, rather than consideration of its soundness.
- (4) Rossville Grade School was in sound condition. Given attention to existing faults and a continuing high level of maintenance, it should serve the community well for a long time.
- (5) Rossville High School building appeared to be sound, quite well-cared for and adequate enough to give many more years of useful service.
- (6) Delia High School building was suitable for many more years of useful service, but there existed many puzzling and disquieting situations.
- (7) Emmett Grade School (old part) has received forty-five years of neglect. Repair of the facility would be a matter of complete renovation of the structure--from footing to the roof.

At the invitation of the superintendent and board of education, a brief survey of educational facilities was conducted in 1967 by the State Department of Public Instruction. The survey consisted of a review of the enrollment trends and school facilities. As a result of its study the consultant made the following suggestions and recommendations: (1) plan to construct a new nine through twelve comprehensive high school for the combined enrollments of St. Marys and Rossville; (2) plan the new high school for an enrollment of four hundred students with provision for expansion as needed; (3) improve the present high school buildings to house the elementary program in St. Marys and to relieve the overcrowded conditions at Rossville; and (4) phase out the elementary buildings at St. Marys and Emmett.³²

The Secondary School Committee was formulated in 1966 to study the secondary curriculum. The group consisted of members of the high schools involved and a consultant from Kansas State University. It conducted interviews with the high school faculties and analyzed apparent trends with the assistance of the consultant. As a result of their study the group recommended:³³

³²L. M. Foster, "Survey Report for Unified School District No. 321 at St. Marys, Pottawatomie County," (School Facilities Services State Department of Public Instruction, 1967), pp. 32-55, (Mimeographed.)

³³Secondary School Curriculum Committee, "Proposals For The Secondary School Curriculum: A Report to the Board of Education Kaw Valley Unified School District No. 321", (Unified School District No. 321 Office, St. Marys, Kansas, 1966), pp. 1-18, (Mimeographed.)

- (1) That secondary education should be defined as extending from grades seven through twelve for the benefit of future studies.
- (2) The housing of grades seven through nine as a separate unit from the elementary and high school.
- (3) A scope and sequence study to provide greater correlation and continuity of school experiences.
- (4) The establishment of a curriculum coordinator or expeditor for specific functions.
- (5) The obtaining of one large comprehensive high school to achieve better education.
- (6) A study of current curriculum innovations to determine their applicability to the schools in the District.

The secondary staff of the District with the assistance of plant and curriculum specialists formulated educational specifications for a comprehensive high school. Plans were developed for a four year high school which could enroll approximately five hundred students. Through their study the group formulated space requirements and space relationships which were considered necessary for a comprehensive program with flexibility. (See Appendix A for specific requirements.) The group and the administration were of the opinion that the educational spaces and space relationships should be developed by those directly concerned with the education of the students. Therefore, this study utilized the requirements determined by the study group as a basis

for evaluation of the spaces and space relationships which existed at St. Marys College.³⁴

State Feasibility Study of St. Marys College Facilities

The State Architect's feasibility study of St. Marys College facilities was conducted through the efforts of a separate architectural and mechanical engineering firm. The report consisted of a description of the campus distribution systems and a general overview of the individual buildings with maintenance recommendations and estimations. The report also made suggestions as to the possible use of the individual buildings. The report concluded:³⁵

- (1) The mechanical equipment has received good maintenance through the years.
- (2) The mechanical system, with the exception of proper ventilation and upgrading of toilet facilities, is generally in good condition. However, greater maintenance must be expected with a system which has some components seventy years of age.
- (3) The electrical work will constitute the greatest cost in updating the facilities.

³⁴John W. Gilliland, et. al., "Educational Specifications For Kaw Valley High School, St. Marys, Kansas", School Planning Laboratory, pp. 16-50.

³⁵William R. Hale, "Feasibility Study of St. Marys College Campus Facilities St. Marys, Kansas", (Architectural Service Division State of Kansas Department of Administration, 1967), pp. 12-4-12-5.

- (4) Some of the buildings have been maintained in a very good condition while others have been allowed to run down in condition.
- (5) The campus could be utilized on a partial basis with renovation phased over a period of years.
- (6) Should the college be purchased, additional land should be acquired to assure access to all facilities such as sewage disposal system, water wells, etc.

Review of the literature brought out a number of basic considerations which were deemed critical in the study. Two of these, flexibility and space relationships, were extremely important since they were potential determiners of the curriculum. Factors concerned with the structure were also critical because they were concerned with student safety, spaces, and movement. Therefore, all factors had to be analyzed as they affected the development of a comprehensive program. It would have been a matter of myopia to look at the individual factors alone rather than as an entity.

Analysis of the previous studies generally showed that one comprehensive high school would satisfy the housing problems of the District. Consequently, through consolidation of the high schools the overcrowded and obsolete elementary buildings could be relieved. Finally, the study concerned with development of educational specifications served as the basis for judgment of the facilities of the college in relation to space and space relationships.

PROCEDURES FOLLOWED

St. Marys College was established in 1869 as a men's liberal arts college. The liberal arts college, which accommodated an enrollment of five hundred students, plus faculty, existed until 1931. It then served as a Jesuit School of Theology until 1967. It was vacated in 1967 as a result of consolidation with the school in St. Louis.¹ At the time of this study the buildings were completely empty with the exception of some minor furnishings. The facilities did receive electrical power but the plumbing was disconnected as part of the winterizing program of the facilities.

Facilities Evaluated

As is characteristic of most college campuses, all of the buildings of St. Marys College were not directly related to the educational program. Consequently, many buildings were supportive of the educational process and were not designed as classrooms. This category included such facilities as dormitories, infirmaries, chapels, storage, libraries, and administrative buildings. This study was concerned with those facilities which were considered suitable for educational purposes by the 1967 State Architect's study.² At the same time, the facility had to be capable of meeting the District's needs for

¹Vincent J. O'Flaherty, "The Former St. Mary's College Properties", (Realtors Brochure of Vincent J. O'Flaherty & Company, Realtors, Kansas City, Missouri, n.d.)

²William R. Hale, "Feasibility Study of St. Mary's College Campus Facilities St. Marys, Kansas", (Architectural Service Division State of Kansas Department of Administration, 1967).

one comprehensive high school. Therefore this study was concerned with an analysis of Bellarmine Hall and the gymnasium complex.

Method of Evaluation

The facilities within this study were evaluated in terms of two criteria. The first criterion was that imposed on the facilities by the needs and requirements established by the Educational Specification Committee. (See Appendix A). The second criterion was that imposed on the facilities by the School Building and Site Observation Check List which was developed by professor Peccolo of Kansas State University. (See Appendix B).

The first step in the evaluation of Bellarmine Hall and the gymnasium complex was the assignment of spaces and space relationships. This was accomplished subjectively on a basis of relationships to outside access, relationships to the overall program, and noise or odor factors. For instance, the industrial arts space was allocated to the lower level because of its requirement for easy outside access and the noise factor involved. After assignment, the spaces were evaluated against requirements made by the Educational Specifications Committee and comments made.

The second step of the evaluation of Bellarmine Hall and the gymnasium was concerned with an evaluation of the total plant facilities applicable to the study. With the exception of space requirements and space relationships, all the spaces were assessed according to the School Building and Site Observation Check List. Items within the check list were designated as being either present or absent, and comments were given to supplement the check list.

To summarize, the procedures involved consisted of (1) determination of facilities applicable, (2) assignment of spaces and space relationships and assessment of the assigned space, and (3) overall evaluation of the applicable physical plant.

FINDINGS

Analysis of Bellarmine Hall and the Gymnasium Complex was accomplished through the School Building and Sites Observation Check List. The check list represented the criteria used to determine the adequacy of the plant facilities in terms of good plant characteristics. Assignment of individual spaces and evaluation of spaces assigned was based on criteria established by Unified School District 321 through its Educational Specifications Committee. The criteria were established to meet the educational program needs of the District.

Dimensions and locations for figures and tables concerning Bellarmine Hall were obtained from blueprints furnished by St. Marys College. Dimensions and locations for figures and tables associated with the Gymnasium Complex were obtained during inspection of the facilities. Characteristics of the individual spaces were supplied through personal inspection of the facilities and data obtained from the study conducted by the State Architect.

Results of School Building and Sites Observation Check List

The summary of the School Building and Sites Observation Check List is found in Table I and includes data for Bellarmine Hall and the Gymnasium complex.

Site. The St. Marys College site, according to Table I, was considered inadequate because its location was not situated near the population center of the district. The campus was also located adjacent to the Union Pacific railroad which carried an average of seven to nine

TABLE I
SUMMARY OF SCHOOL BUILDING AND SITES OBSERVATION CHECK
LIST USED IN ANALYSIS OF BELLARMINE HALL
AND THE GYMNASIUM COMPLEX

	Bellarmine Hall		Gymnasium Complex	
Characteristic	Adequate	Inadequate	Adequate	Inadequate
Site				
Location		X		X
Size		X		X
Physical Feature		X		X
Safety		X		X
Building				
Construction				
Fire Resistance	Not Determined		Not Determined	
Flexibility		X	X	
Durability	X		X	
Stairs (Fireproof, etc.)		X		X
Corridors		X	None Present	
Boiler Room	X		X	
Functional		X	X	
Aesthetic	X			X
Classrooms				
Size	See Tables II-IV			
Lighting		X		X
Chalkboards, etc.	X		Not Applicable	
Sound Control		X		X
Under Ground Level		X	X	
Heating & Ventilation		X		X
Display Area		X		X
Foot-lambert Brightness	Not Determined		Not Determined	
Individuality	Not Determined		Not Determined	
Floor Finish		X		X
Furniture	Not Applicable			X
Special Rooms				
	See Tables II-IV			
Faculty Workroom		X	X	
Faculty Lounge		X	X	
Student Lounge	X		Not Applicable	

trains per day. The campus was also located immediately off U. S. Highway 24. Access was possible from a different direction and would have removed the problem of crossing the railroad track, but the noise factor would remain. The site was not subjected to any obnoxious odors.

As shown in Table I, page 30, the size of the campus was also considered inadequate because the college campus only provided twenty-five acres of land. Suitable acreage previously devoted to recreation, gardens, and golf was adjacent to the campus and for sale by St. Marys College.

As noted in Table I, page 30, the physical features were determined to be inadequate for the following reasons: (1) retainer walls were located around Bellarmine Hall and between the Hall and the Gymnasium Complex; (2) parking at Bellarmine Hall was limited to an area of approximately 10,000 square feet because it was enclosed between Bellarmine Hall and a dormitory with a retainer wall at the open end. Parking did not exist at the Gymnasium Complex, but space adjacent to the facility was available.

Table I, page 30, also shows that the safety factor of St. Marys College was not adequate. Observation of the facilities showed that the plan of walks, drives, play, and bus loading areas was inadequate. Utilization of Bellarmine parking would have required the backing up of school buses. Retainer walls adjacent to walkways also provided a hazardous condition. Driveway access to the front entrance of the Hall did not exist and access required driving up and around an incline of approximately thirty degrees. It was further noted that a walkway did not exist between Bellarmine Hall and the Gymnasium Complex. Passage

between the two buildings was also restricted by a retainer wall which was approximately ten feet in height.

Buildings. Table I, page 30, notes that the fire resistant factor concerning the facilities was not determined in the study. Communication with the State Fire Marshal brought out the fact that St. Marys College was not inspected because it was a private institution.

Flexibility was possible in Bellarmine Hall, but exhaust vent limited the extent of achievement in certain areas as noted in rooms which had partitions removed. Flexibility, when achieved, resulted in long narrow spaces. A certain amount of flexibility was observed in the Gymnasium Complex area which was adjacent to the gymnasiums.

According to the State Architect's study, the facilities within the study were generally in good structural condition with good roofs and good exterior walls. But the report did note that the space between the two gymnasiums, which was multi-story in construction, was in poor condition and its upper floors should be blocked off.¹

The stairs, landings, platforms, and connecting passageways of the facilities were considered inadequate, as they existed, for the following reasons: (1) the stairways and landings found in the Complex were wooden, open, and in some cases, winding; (2) one stairway in Bellarmine Hall was terrazzo but open; (3) another stairway in Bellarmine was wooden and closed, but the doors were not self-closing;

¹William R. Hale, "Feasibility Study of St. Mary's College Campus Facilities St. Marys, Kansas", (Architectural Service Division State of Kansas Department of Administration, 1967), p. 6-1.

(4) multi-story sections within the Gymnasium Complex, which were all wood construction, did not have two remote stairways; and (5) egress from the small gymnasium was limited to one side of the building.

All of the corridors of Bellarmine Hall did not provide ten feet of unobstructed passageway and were therefore considered inadequate. One basement corridor in particular provided only six feet of unobstructed passageway. It was also necessary to be cognizant of space for lockers which would have imposed further restrictions upon the corridors. It was noted that all stairways did provide forty-four inches in the clear.

The boiler room was located in the power plant and therefore did not impose restrictions on spaces within the study. An exposed main steam line was observed in the basement of Bellarmine and in the locker room adjacent to the large gymnasium within the Gymnasium Complex.

The design of Bellarmine, as a four-story structure, did not provide for a functional relationship among all the spaces. Modern plant construction places the instructional material center in close proximity to the rest of the program, but in Bellarmine this was impossible to achieve. Science also should be located near ground level to provide for ready access to the outside, and this was not readily possible in Bellarmine Hall. Other relationships of this nature existed which reduced the functional aspect of Bellarmine. The Complex was, in part, a functional building for the activities which it contained.

The Gymnasium Complex did not present an aesthetically pleasing structure either inside or outside. The Hall, though, did present a

very aesthetic appearance from the outside since it was located on a low hill with large oaks and pine growing around the perimeter.

Classrooms. Space requirements and space relationships for instructional and auxiliary areas were evaluated in terms of requirements established by the District's educational specifications. It was noted that the check list requirements were in agreement with the criteria imposed by the educational specifications. Classroom standards other than space were evaluated by criteria imposed by the check list.

Lighting in the Gymnasium Complex was considered inadequate on the basis of the State Architect's report. The report noted that the electrical system was not expandable. It also noted that the level of lighting was inadequate and the condition of the fixtures was poor. The report also noted that the Complex did not possess a fire alarm system or exit lighting. Bellarmine's lighting was considered as being generally in fair condition.² The writer noted four or five classroom spaces which had incandescent bulbs hanging from the ceiling. Shades, when present, were generally in very poor condition.

With the exception of the assigned art room, all classrooms possessed an adequate number of chalkboards, but were lacking bulletin boards and fixtures for maps and screens.

Sound control was non-existent in Bellarmine Hall and the Complex. In the Gymnasium Complex all floors were either hardwood or cement. The floors of the classrooms in Bellarmine Hall were generally wood with the

²Ibid., pp. 6-1-6-3, 8-3.

halls and corridors being covered with terrazzo material. The ceilings of the classrooms were generally plaster.

All of the areas assigned within the Gymnasium Complex were above ground level. In Bellarmine Hall, the industrial arts area was assigned to a space which was not entirely above ground level because it was the only suitable place the writer could decide upon.

Assignment and Analysis of Assigned Spaces

Bellarmino Hall, erected in 1925, was a reinforced concrete structure with stone exterior walls and either wood or terrazzo floors. The building, along with a dormitory, stood on a hill overlooking the remainder of the campus. The Gymnasium Complex was located to the west of Bellarmine Hall near a small stream. The Complex was a stone wall bearing structure. The two buildings were located about one hundred yards apart, and were separated by a retaining wall approximately six to ten feet in height.

All spaces within Bellarmine Hall were assigned according to space and space relationships established by the Educational Specification Committee. (See Appendix A.) In some cases it was not possible to establish the exact relationships desired by the committee because the criteria were designed for a single story structure and the college facilities represented a multi-story structure.

Level Three Bellarmine Hall. Level three was designated to the science and mathematics programs. For space and space relationships see Fig. 1, page 36, and Table II, page 37.

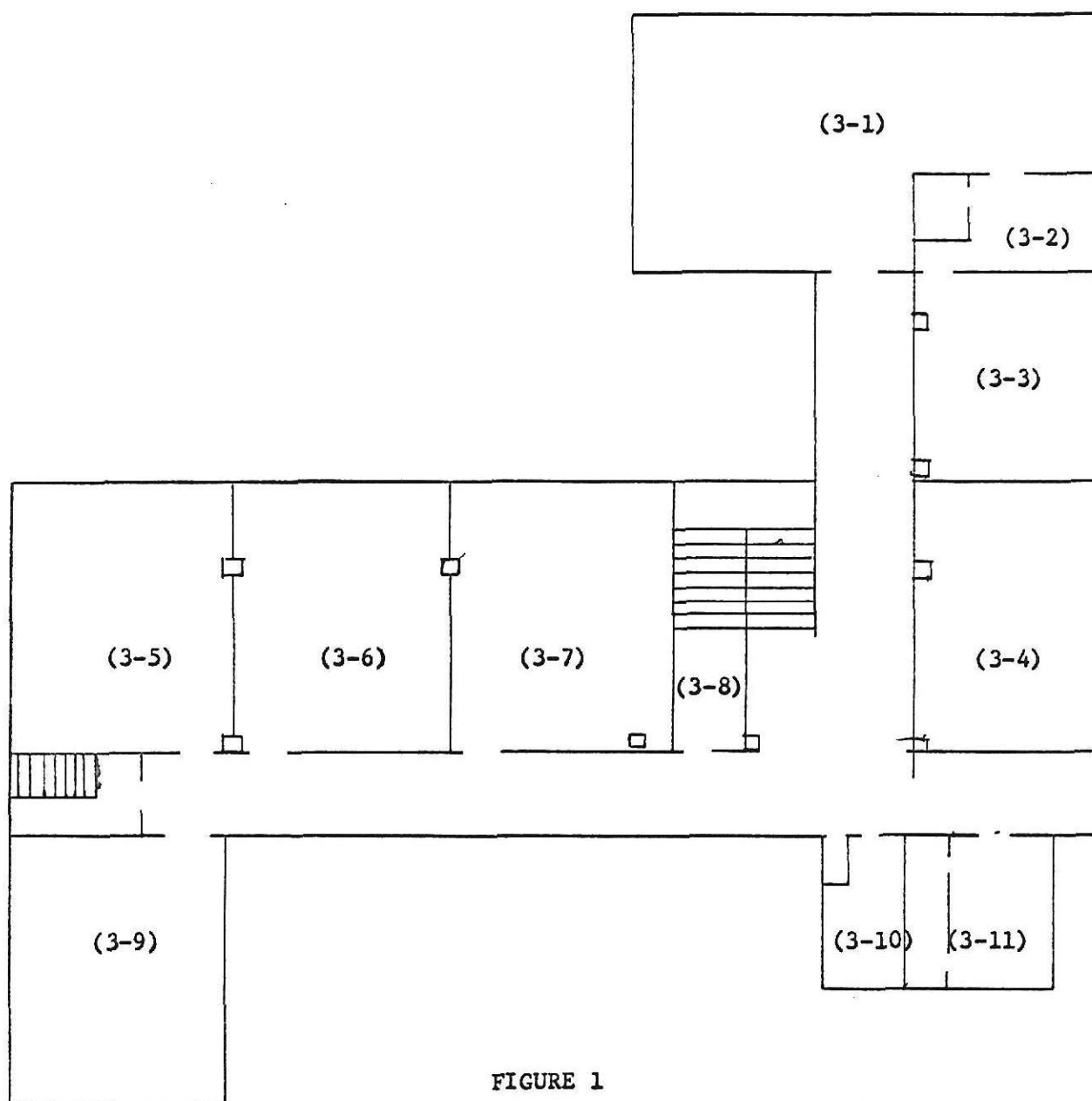


FIGURE 1

SPACE AND SPACE RELATIONSHIPS OF LEVEL THREE
BELLARMINE HALL

TABLE II
 BELLARMINE HALL
 SUMMARY OF THIRD LEVEL EVALUATION OF DIMENSIONS,
 STORAGE, AND MECHANICAL SERVICE

Space Designation	Dimensions	Square Feet	Number of Electrical Outlets	Storage	Plumbing
	32 X 32				
3-1	22 X 21	1024	4	No	Fountain
3-2	13 X 21	273	0	No	No
Dark Room	7 X 7	49	1	N.A.	Sink
3-3	18 X 21	378	0	No	No
3-4	32 X 21	672	0	No	Fountain
3-5	24 X 30	720	0	No	No
3-6	24 X 30	720	0	No	No
3-7	24 X 30	720	0	No	No
3-8	12 X 10	120	0	No	No
3-9	24 X 31	744	0	No	No
3-10	9 X 20	180	0	N.A.	Rest Room
3-11	17 X 20	340	1	Yes	W/ Rest Room
*TOTAL		5940			

* Approximate (Excludes corridors and minor spaces)

The science program was assigned to spaces 3-1, 2, 3, 4, and 7. It would have been more desirable to assign the subjects to a first level location but other relationships imposed restrictions more demanding. For instance, administrative facilities required proximity to the entrance of the building. Hence, there would not have been adequate space for all three on the first level. It was also believed that the instructional materials center should be as centrally located as possible. It was therefore assigned to the second floor. As a result, the third floor was the only remaining place where the program could be placed and still fulfill most of the space relationships desired. Space 3-2 was designated as storage and possessed a darkroom. Space 3-4 was assigned as an earth science room and spaces 3-1 and 3-5 were assigned to the physics program and the biology program. According to Table II, page 37, the spaces did not have adequate storage space, electrical outlets and required plumbing. In addition, the spaces were also short of the required teaching space by 922 square feet.

The mathematics program was assigned to spaces 3-5, 6, and 7 of Fig. 1, page 36. An analysis of Table II, page 37, showed that the spaces lacked storage and electrical outlets. The spaces lacked 216 square feet of teaching space as required by the educational specifications.

Spaces 3-10 and 3-11 of Fig. 1, page 36, were assigned as restrooms and were inadequate in terms of a coeducational program and the number of facilities provided.

Level Two Bellarmine Hall. Level two was assigned to the language arts, foreign language, and the instructional materials center. See.

Fig. 2, page 40, and Table III, page 41, for location of spaces as they appeared and their characteristics.

Spaces 2-1, 2, 4, 5, 6, and 7 were assigned to the language arts and foreign language departments. Space 2-2 was designated as a language laboratory which was shared between the language arts department and the foreign language department. According to Table III, spaces 2-5, 6, and 7 did not possess electrical outlets and none of the spaces provided plumbing facilities or storage. The spaces, as a whole, were 428 square feet deficient in the amount of teaching space provided.

Space 2-3 designated as an instructional materials center lacked storage space, electrical outlets, and plumbing. In addition, the space lacked 2,577 square feet of space required for reading rooms, conference rooms, etc.

Spaces 2-8 and 2-9 were designated as second level restrooms and were generally inadequate in terms of providing required facilities for both sexes.

Level One Bellarmine Hall. This level was assigned to the vocational home economics, business education, social studies departments and the auxiliary services. See Fig. 3, page 42, and Table IV, page 43, for specific details concerning space relationships and space characteristics.

Vocational home economics was assigned to spaces 1-1 and 1-2. The partition separating the two spaces was partially removed. Table IV showed that the spaces did not possess plumbing facilities, electrical outlets or storage. Drain and water piping were located in the adjacent

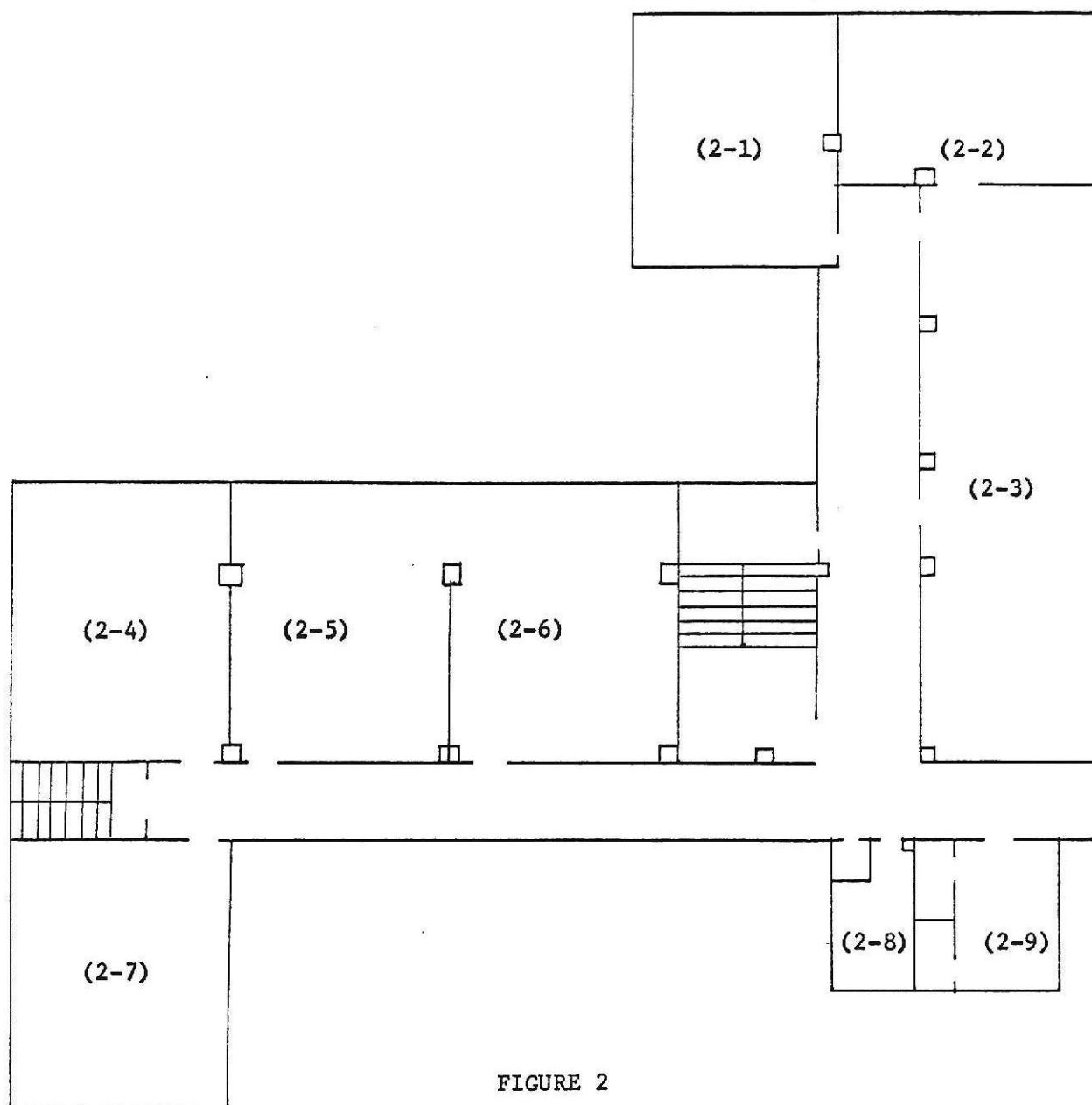


FIGURE 2
SPACE AND SPACE RELATIONSHIPS OF LEVEL TWO
BELLARMINE HALL

TABLE III
 BELLARMINE HALL
 SUMMARY OF SECOND LEVEL EVALUATION OF DIMENSIONS,
 STORAGE, AND MECHANICAL SERVICE

Space Designation	Dimensions	Square Feet	Number of Electrical Outlets	Storage	Plumbing
2-1	21 X 32	672	110 (4) 220 (1) Electrical Stripping	No	No
2-2	32 X 32	704		No	No
2-3	21 X 63	1323	0	No	No
2-4	24 X 30	720	4	No	No
2-5	24 X 30	720	0	No	No
2-6	24 X 30	720	0	No	No
2-7	24 X 31	744	0	No	No
2-8	9 X 20	180	0	N.A.	Rest- Room
2-9	17 X 20	340	1	Yes	W/Rest- Room
	*TOTAL	6123			

* Approximate (Excludes corridors and minor spaces)

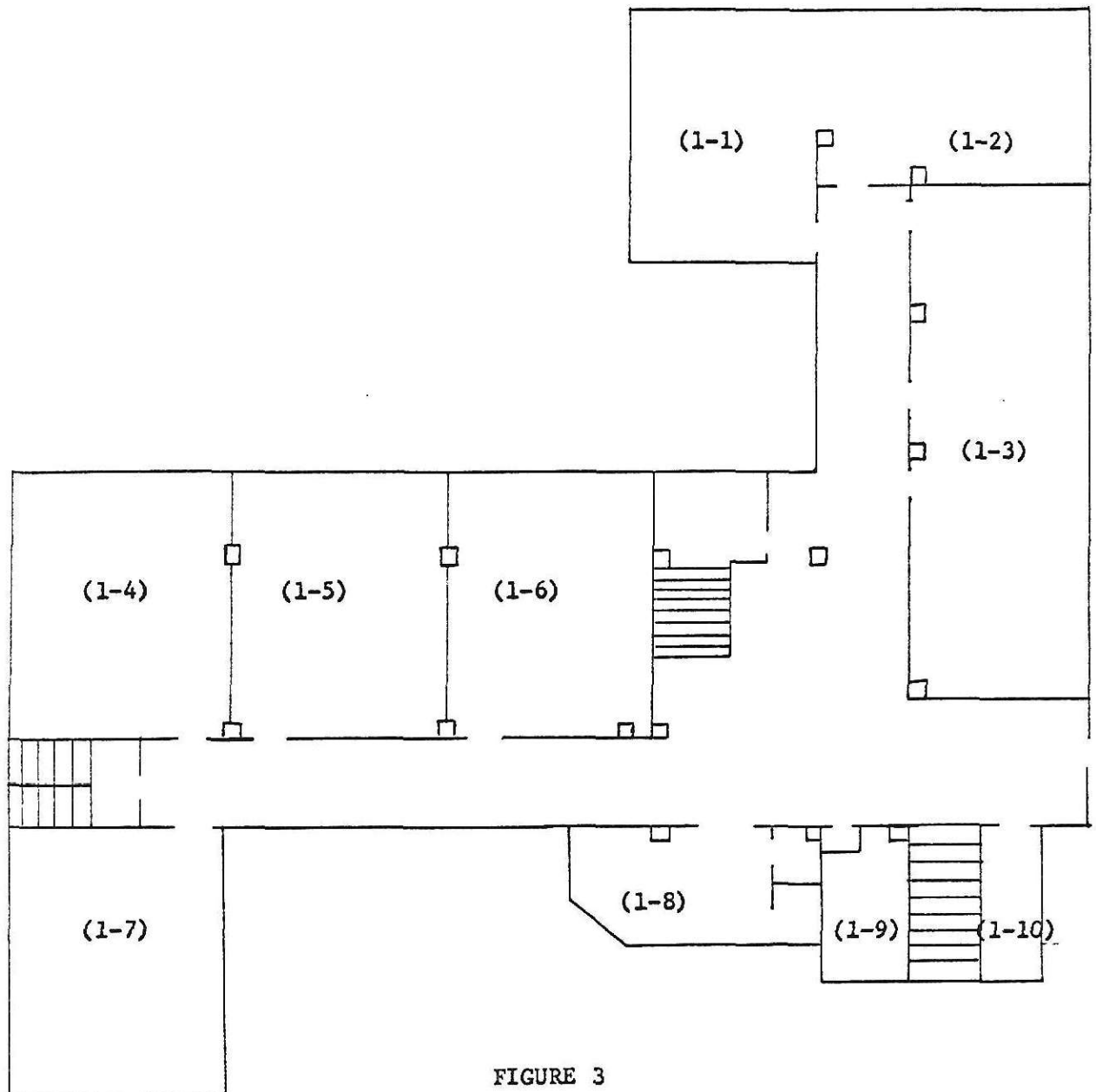


FIGURE 3
SPACE AND SPACE RELATIONSHIPS OF LEVEL ONE
BELLARMINE HALL

TABLE IV
 BELLARMINE HALL
 SUMMARY OF FIRST LEVEL EVALUATION OF DIMENSIONS
 STORAGE, AND MECHANICAL SERVICE

Space Designation	Dimensions	Square Feet	Number of Electrical Outlets	Storage	Plumbing
1-1	21 X 32	672	0	No	No
1-2	32 X 32	704	0	No	No
1-3	21 X 63	1323	0	No	No
1-4	24 X 30	720	0	No	No
1-5	24 X 30	720	0	No	No
1-6	24 X 30	720	0	No	No
1-7	24 X 31	744	0	No	No
1-8	25 X 13	325	1	Yes	W/Rest- Room
1-9	9 X 20	180	0	N.A.	Rest- Room
1-10	9 X 20	180	3	Yes	W/Rest- Room
	*TOTAL	6288			

* Approximate (Excludes corridors and minor spaces)

corridor immediately outside the space. The space was 1,524 square feet deficient in the total amount of space required by criterion imposed by the District's educational specifications.

Space 1-3 of Fig. 3, page 42, was assigned to the business education department and was 1,677 square feet short of space requirements as determined by the educational specifications. The dimensions of the space were sixty-three feet by twenty-one feet and were achieved through removal of three partitions. This gave some idea of the type of flexibility possible within Bellarmine Hall. The space was also short in terms of electrical outlets, storage, and plumbing as noted in Table IV, page 43.

Space 1-6 of Fig. 3 was designated as administrative space and included the principal's office, reception-secretary space, storage and workshop, and conference space. According to criteria imposed by the educational specifications, the space assigned was deficient by 930 square feet. During development of the educational specifications, the committee decided that the teachers lounge and workspace would be derived from the auxiliary space budget. Therefore, the specifications did not require an actual space for the teachers lounge and workspace. Bellarmine Hall was deficient of space required for such activities.

Space 1-9 of Fig. 3 was assigned as a restroom and was inadequate in terms of needs demanded of a coeducational program.

Space 1-10 of Fig. 3 was designated as a health center, or clinic, and was 120 square feet deficient in the amount of space required.

Spaces 1-4, 5, and 6 of Fig. 3 were designated as social studies spaces and were inadequate in terms of electrical outlets and storage as shown in Table IV, page 43. The spaces were also deficient in total amount of teaching space required by 216 feet.

Basement Level Bellarmine Hall. The basement level was assigned to food service, industrial arts, and art with additional space being allocated to custodial service. See Fig. 4, page 46, and Table V, page 47, for space assignments and characteristics of such spaces. Space B-6 was the only space located entirely above grade. The other spaces on the basement level were located under grade or partially under grade. Space B-1 was designated as the kitchen area and included cooler space, dry storage and non-food storage, dish wash area and kitchen space. Plumbing was present in the form of drains and piping, but fixtures did not exist. The space was also deficient in electrical outlets. Immediate access to the outside for loading and unloading was not possible where the space was assigned. According to criteria imposed, the space was 624 feet deficient in required space.

Space B-2 was designated as the commons area. According to established criteria, the space was deficient by 646 square feet. The space also did not provide for direct egress from the area. The space did provide a number of electrical outlets and plumbing facilities. The floor of the area was tiled and the walls were paneled.

Spaces B-3 and B-4 were assigned to the industrial arts program. The space was 763 square feet short of space requirements and was partially under grade. Although plumbing fixtures did not exist, piping and drains

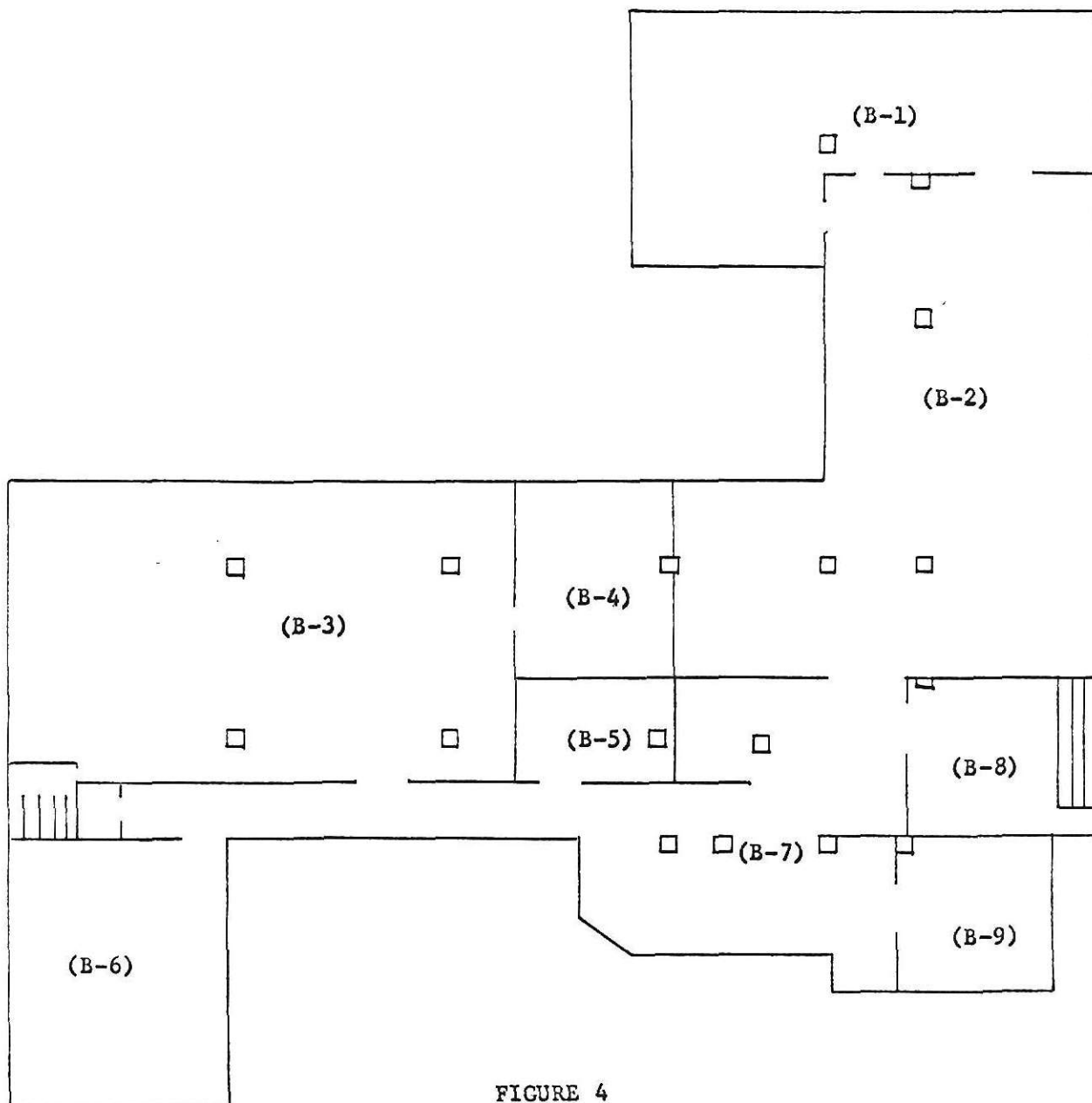


FIGURE 4

SPACE AND SPACE RELATIONSHIPS OF BASEMENT LEVEL
BELLARMINE HALL

TABLE V
 BELLARMINE HALL
 SUMMARY OF BASEMENT LEVEL EVALUATION OF DIMENSIONS,
 STORAGE AND MECHANICAL SERVICE

Space Designation	Dimensions	Square Feet	Number of Electrical Outlets	Storage	Plumbing
	32 X 21				
B-1	32 X 22	1376	0	No	Drains
	46 X 31				
B-2	20 X 21	1846	9	No	Yes
B-3	58 X 34	1972	4	Yes	Drains
B-4	15 X 21	315	Panel	N.A.	No
B-5	15 X 13	195	3	N.A.	Sink
B-6	24 X 32	768	0	No	No
	34 X 20				
B-7	25 X 13				
	7 X 20	1145	Several	N.A.	Yes
B-8	17 X 20	340	1	N.A.	Yes
B-9	17 X 20	340	0	N.A.	Yes
	*Total	8297			

*Approximate (Excludes one corridor and minor spaces)

were present. The area was also limited in its number of electrical outlets it provided.

Space B-6 of Fig. 4, page 46, was assigned to the art program. The space had a tile floor and did not provide chalkboards. It was also deficient in the amount of space required by 732 square feet and did not provide electrical outlets and plumbing facilities.

According to Table VI, page 49, which is a summary of assigned space deficiencies, all of the spaces were deficient in the amount of teaching space they provided in relation to requirements established by the educational specifications. Planning space was also deficient with the exception of foreign language and vocational home economics which had not established planning space per se within the educational specifications. As noted in Table VI, vocational home economics and business education were extremely deficient in teaching space. Whereas, the instructional materials center was extremely deficient in other space which was also a problem concerning auxiliary services. The greatest deficiency was noted in the music and vocational agriculture programs which had to be omitted from the building due to the lack of space. Finally, Bellarmine Hall was 13,695 square feet deficient in instructional and auxiliary space and did not provide for a music program or vocational agriculture program which would have added an additional deficiency of 8,200 square feet.

Gymnasium Complex. The Gymnasium Complex consisted of two gymnasiums. The larger gymnasium, designated G-3, Fig. 5, page 50, was erected in 1900 and contained approximately 11,800 square feet.

SQUARE FOOTAGE DEFICIENCIES OF ASSIGNED SPACES IN BELLARMINE HALL
AS DETERMINED BY EDUCATIONAL SPECIFICATION REQUIREMENTS

Subject	Space Assigned	Space Deficiencies (Square Feet)				
		Planning	Teaching	Storage	Other	Total
Science	3-1,2,3,4,7	+78	-922	-27	-600	-1471
Math.	3-5,6,9	-300	-216	- - -	- - -	-516
Lang.						
Arts	2-1,2,4,5,6,7	-500	-428	- - -	- - -	-928
Foreign Language	2-2	- - -	-196	- - -	- - -	-196
I.M.C.	2-3	-400	- - -	-300	-2177	-2877
Voc.						
Home Ec.	1-1,2	- - -	-1524	- - -	- - -	-1524
Bus. Ed.	1-3	-300	-1377	- - -	- - -	-1677
Soc. St.	1-4,5,7	-300	-216	- - -	- - -	-516
Admin.*	1-6	- - -	- - -	- - -	-930	-930
Guidance	1-8	- - -	- - -	- - -	-175	-175
Clinic	1-10	- - -	- - -	- - -	-120	-120
Kitchen						
Area**	B-1	- - -	- - -	- - -	-624	-624
Commons	B-2	- - -	- - -	- - -	-646	-646
Ind.						
Arts	B-3,4	-100	-678	+15	- - -	-763
Art	B-6	-300	-432	- - -	- - -	-732
Music***	- - -					
Voc. Agr.***	- - -					
Phy. Ed.****	- - -					
TOTAL		-2422	-5989	-312	-4972	-13695

*Includes administrator's office, reception-secretary space, storage and workshop, and conference space.

**Includes walk-in cooler, dry storage, non-food storage, dish wash area, and kitchen.

***Space and space relationship does not exist within the building.

****Assigned to gymnasium complex.

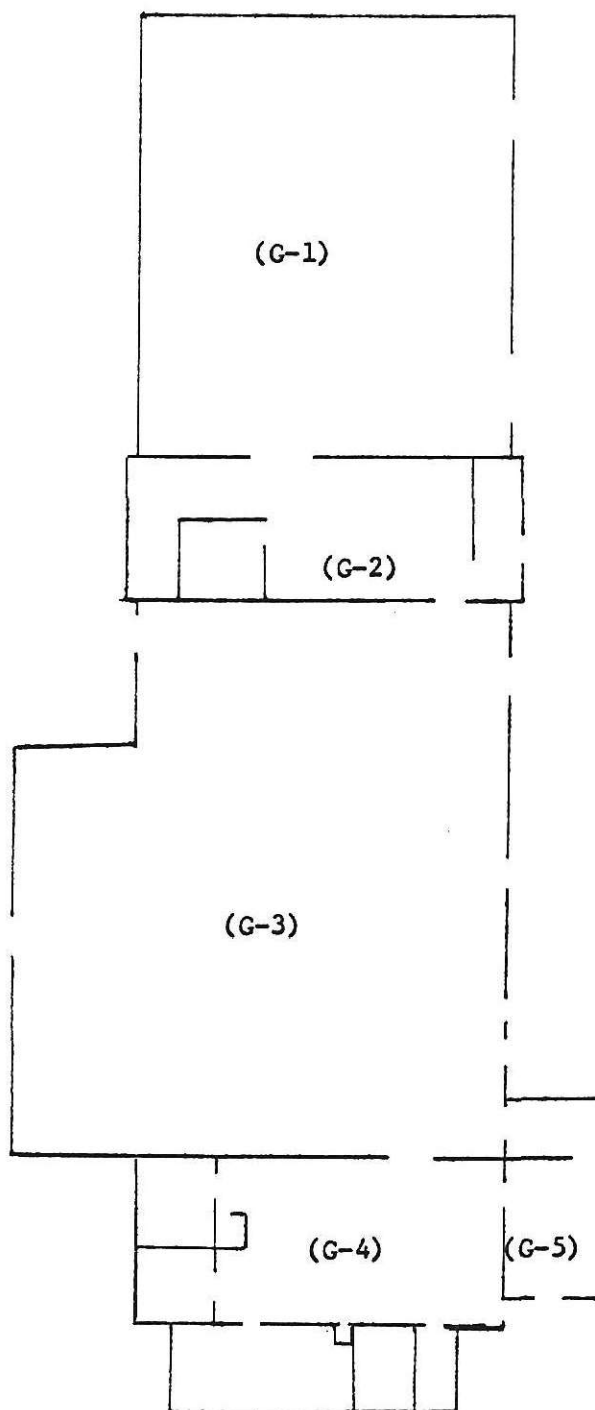


FIGURE 5

SPACE AND SPACE RELATIONSHIPS OF GYMNASIUM COMPLEX

This did not include the three story section, G-2, located between it and the small gymnasium, G-1. The larger gymnasium also had a playing floor approximately 78 feet by 155 feet with a stage along the north side. The stage also had a raised basement below it, but was considered unusable by the State Architect in his report. The showers, locker room and toilet facilities were located in the west end of the building, G-4, and were considered inadequate and antiquated. Adjacent to the shower and locker room was a three-story tower, G-5, which contained an all wooden interior construction with a single, open-wood stairs between levels.³

The small gymnasium, G-1, Fig. 5, page 50, erected in 1914 contained a floor space approximately seventy-five feet by eighty-five feet in size and contained no toilet facilities and provided egress from only one side of the building.

Separating the two gymnasiums was a three-story section, G-2, which was approximately twenty-five feet wide by eighty-six feet long. According to the State Architect's study, the ground floor was suitable for storage, but the upper floors should be closed off or razed.⁴

According to space criteria established by Unified School District 321, the Complex was suitable. According to the State Architect's study, complete renewal would involve: (1) addition of new toilet and shower facilities; (2) refinishing the gym floors; (3) installation of new

³William R. Hale, "Feasibility Study of St. Mary's College Campus Facilities St. Marys, Kansas", (Architectural Service Division State of Kansas Department of Administration, 1967), p. 5-1-2.

⁴Ibid., p. 6-1.

basketball backstops; (4) close-off stage area rendered useless; (5) paint walls; (6) build shelter over entry doors; (7) clean up buildings and close stairs as needed. The mechanical engineers survey within the same report concluded that: (1) the plumbing fixtures are old and in marginal condition; (2) piping is generally in poor condition; (3) the electrical service is not expandable; and (4) the level of lighting is inadequate and the condition of the fixtures poor; and (5) there is no fire alarm system or exit lighting.⁵

⁵Ibid., pp. 5-1-6-3.

SUMMARY

It was the purpose of this study to determine the feasibility of utilizing vacated St. Marys College facilities to satisfy the building needs of Unified School District 321. Determination of the feasibility was accomplished on the basis of established educational criteria and the needs of the school district.

The requirements of the school district were based on the previous studies conducted within the district by professional consultants in the areas of curriculum and plant. As a result of the previous studies, and with their findings, educational specifications were developed to meet the needs of the district. In compliance with the educational specifications and the previous studies conducted for the district, this report was directed towards providing space for a single comprehensive high school to remedy the immediate needs of the district.

The facilities in this study were evaluated in terms of criteria developed by the College of Education, Kansas State University. The facilities of St. Marys College considered appropriate to the needs of the district were Bellarmine Hall and the Gymnasium Complex. The facilities were determined applicable on the basis of the study conducted by the State Architect of Kansas. Excluded from the study were such buildings as the infirmary, dormitories, office buildings, the library, the chapel and various storage spaces.

Conclusion

In accordance with the overall findings of the study, the writer concluded that the facilities of St. Marys College were inadequate to

meet the needs of Unified School District 321. This conclusion was based on findings of the School Building and Sites Observation Check List and the specific spatial needs of the district.

The location of the site was considered critical since the campus was located adjacent to the main branch of the Union Pacific Railroad. The tracks carried an average of seven to nine trains per day and would have presented serious problems to walk-in students and bus transportation. Added to this was the fact that U.S. Highway 24 was also located adjacent to the tracks. Even if an alternate access to the grounds could be accomplished, the railroad and highway would have presented a considerable noise problem to any educational setting. According to the populations of the various attendance centers, the site was not located at the exact center of pupil population.

The site was also considered inadequate from the standpoint of the amount of acreage it provided. A comprehensive high school with an enrollment contemplated by the district of five hundred students would have required thirty-five acres of land. As it existed, the site provided twenty-five acres. In addition, it had to be remembered that much of the existing twenty-five acres was presently contained in buildings of various functions. This problem was not extremely critical since additional land, owned by the Jesuits, was available on two sides of the campus.

Certain physical features of the site were also important in the determination of its inadequacy. There was the presence of high retainer walls adjacent to a walkway near Bellarmine Hall that would have been a

potential site for injury of students. In addition, the retainer wall was located between the Hall and the Gymnasium and would have presented a problem to the handicapped. The site also did not provide ample parking, or suitable access to the main instructional building, Bellarmine Hall. Driveway access necessitated driving up and around an incline of approximately thirty degrees and would have posed a problem in the movement of students by car, or the students would have had to park a considerable distance from the school. The drive, as it existed, would have posed a considerable problem in winter months and would have required careful maintenance.

The second area of the check list which dealt with the characteristics of the building showed that flexibility was limited and inadequate. Flexibility, as it existed at the time of the study, resulted in long, narrow rooms, or rooms with an obstructed view. This factor would have a considerable limiting effect on large group instruction which was desired.

According to the State Architect's study, the buildings appropriate to the study were in good structural condition. This was a classic example of the pride and care which went into the facilities of the campus. It must be recalled that a majority of the buildings were older than fifty years of age and in good structural condition. This had to be a very important characteristic, but it must be reiterated that a number of other factors are also of extreme importance in the total picture.

Certain aspects of the interior structure of the buildings were considered as being inadequate in the analysis. Open stairways existed

within Bellarmine Hall and would have required special attention. The corridors of the Hall were too narrow and would have required a further reduction with the addition of student lockers. The Gymnasium Complex possessed a number of spaces which were reached by open, narrow, and wooden stairways. According to the State Architect's study the spaces of that type would probably have to be abandoned.

Since the boiler room was located in a separate building, it was not considered as a safety problem to the proposed educational program.

Bellarmino Hall was considered as non-functional since it was a four story structure. As a result, area relationships within the curriculum would have presented problems to the school program proposed for the district. Bellarmine Hall was also considered non-functional since it did not provide space for the total program needs deemed necessary by the district. For example, no space existed for the music and vocational agriculture programs. Bellarmine Hall did not possess an elevator, a feature required by applicable building standards within the State of Kansas.

Bellarmino Hall did provide an aesthetic setting from the outside, but according to the State Architect's study, the interior surfaces required a considerable amount of maintenance. The same condition existed in the Gymnasium Complex.

A critical aspect of the building was not determined by the study since the college was a private institution and was not subject to state regulations. This characteristic referred to the fire resistive condition

of the building and would have to be dealt with before contemplating the purchase of the college.

Analysis by the check list showed that the classrooms were generally inadequate in lighting, sound control, heating, and ventilation. As they existed at the time of the study, the classrooms would have posed a considerable problem to an extended school year. Because of the trend in extension of the school year, any building program in Kansas should give careful consideration to the factor of climate control.

In the realm of area provided, it was found that Bellarmine Hall did not possess the space deemed necessary by the district. For instance, the Hall was 13,695 square feet deficient in total area for the programs it was assigned. To complicate matters, space did not exist in the buildings for the music and vocational agriculture programs. The two programs would have required an additional 8,200 square feet of space. If the district was required to house its anticipated program in the facilities studied, tremendous limitations would be imposed on the educational program in the areas of flexibility, space, and space relationships.

To the casual observer, the college presented a picture of abounding space with a very aesthetic setting. This was understandable since the campus buildings and grounds were maintained in a condition that was a reflection of the pride and sentiment bestowed on the institution. Meticulous evaluation showed that the facility was not feasible for the needs required by a modern educational program. Further, it must be brought out that Bellarmine Hall was the only

building which was less than fifty years old, and it was forty-four years in age. Most authorities agree that a school building has reached its peak of effectiveness after it has reached fifty years of age.

This study was an attempt to determine the feasibility of utilizing the college facilities as an educational plant. Hence, the conclusion of this study was based on the needs of an educational program. It was obvious that other needs would dictate other criteria with different results. In retrospect, the community possessed a valuable asset in the college facilities. Therefore, it should continue its effort to locate a responsible organization, or company, which could utilize the vast assortment of buildings to their particular advantage.

Recommendations

As a result of the study, the writer recommends: (1) the development of a master plan by the school district which was in line with its enrollment projections, present building status, and the status of the parochial education program in the district; (2) the orientation of the people of the district to its curriculum and plant deficiencies as previously determined; and (3) the introduction of the findings of this study to the concerned groups through presentation to civic clubs, school meetings, and social gatherings within the district.

It was obvious from the beginning of this study that the people concerned were not fully cognizant of the potential of the college facilities as they were related to the minimum desirable characteristics in modern school facilities. It was also obvious that the people had no understanding of the needs of the district.

In order for the people of the district to fully understand the findings of this study, the concerned citizenry would have to visualize the potential of the college in terms of an overall master plan as it related to the needs of the district. By utilization of school meetings, civic organizations, and social gatherings, the findings of this study could be made known to the concerned citizenry. If the questions of the concerned citizens were not answered sufficiently, and enough citizens were concerned, the district should hire an unbiased architect to conduct a cost analysis of remodeling the college facilities to acceptable standards.

Questions Unanswered in this Study

During the study a number of unsolved questions arose as to the consequences of the purchase of the college for District 321 needs. First, the cost of a renovation program required to bring the facilities up to district and state requirements. Second, the status of the unused buildings would have to be dealt with. What happens to the unused buildings? Would they be sold, maintained, or razed? Third, would it be possible to overcome the apparent hazards and noise conditions? Fourth, what would be the cost of obtaining sewer and water service from the City of St. Marys?

Another question exposed during this study pertained to the unification of schools in the State of Kansas. That question had to do with the amount of financial strain realized by the small schools as a result of unification. For instance, a small school district which

maintained a number of small schools still possessed the inefficient program, but realized an increase in administrative costs. If the small school district was concerned about its total program and decided to consolidate, it became mandatory to erect new facilities with high resulting costs for construction and accompanying increase in pupil transportation cost. Kaw Valley School District fell into the latter category. It seems to the writer that some additional financial assistance should be allocated as a result of the financial strain of unification.

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APPENDIX

APPENDIX A

Recommendations of Educational Specifications Committee

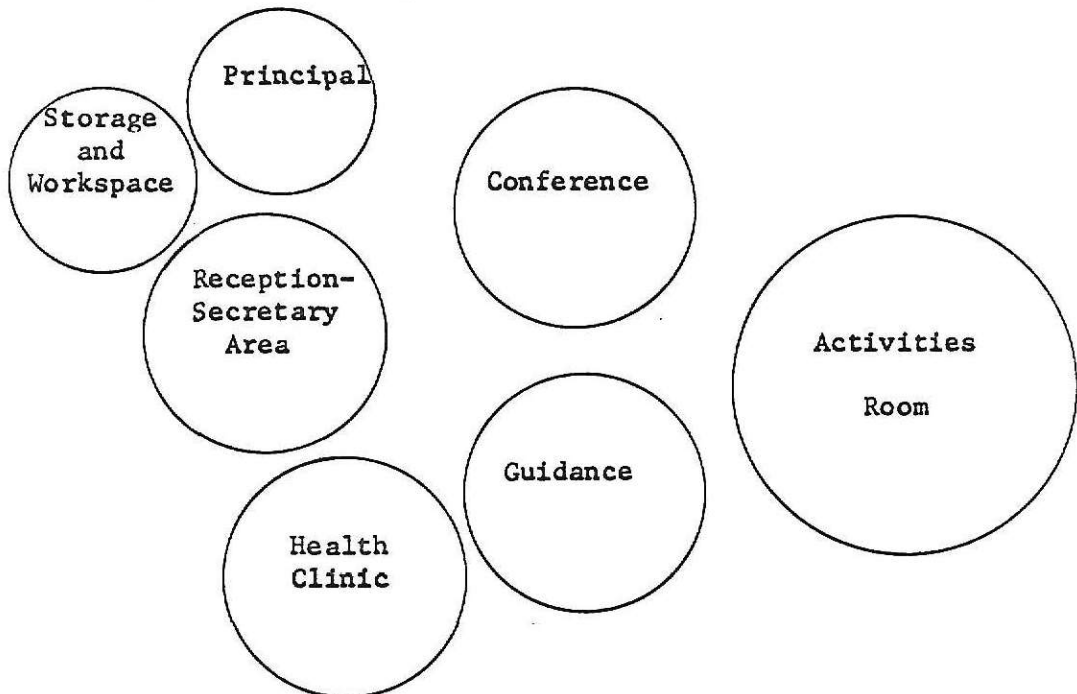
I. Auxiliary Services Requirements:

A. Administrative:

1. Space Requirements:

	<u>Square Feet</u>
a) Administrator's Office	150
b) Reception--Secretary Area	400
c) Storage and Workspace	200
d) Conference	300
e) Guidance	500
f) Health Clinic	300
g) Activities Room	<u>600</u>
TOTAL	2,450

2. Space Relationships



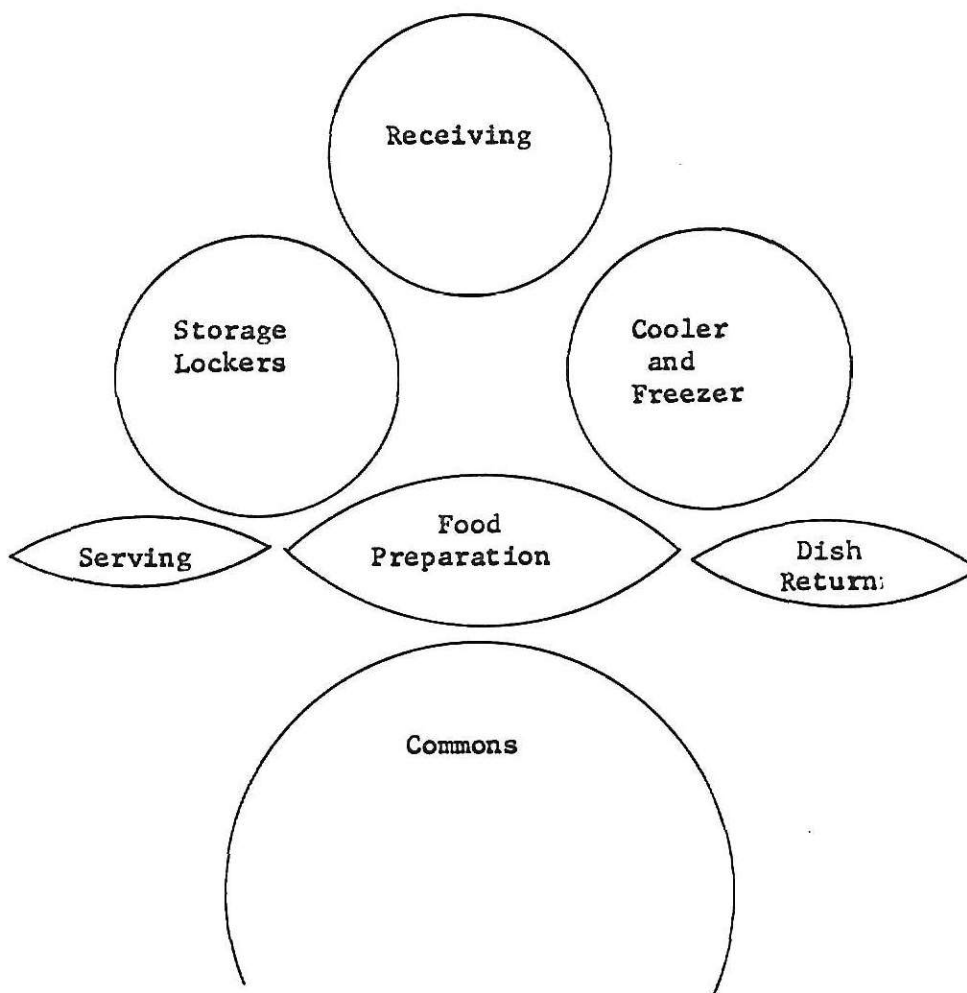
B. Food Service:

1. Space Requirements:

	<u>Square Feet</u>
a) Lockers and Rest Rooms	100
b) Walk-in Cooler 10 x 12 x 7	120
c) Dry Storage	500
d) Non-food Storage	80
e) Dish Wash Area	200
f) Kitchen	<u>1,000</u>

TOTAL 2,000

2. Space Relationships:



II. Instructional Requirements:

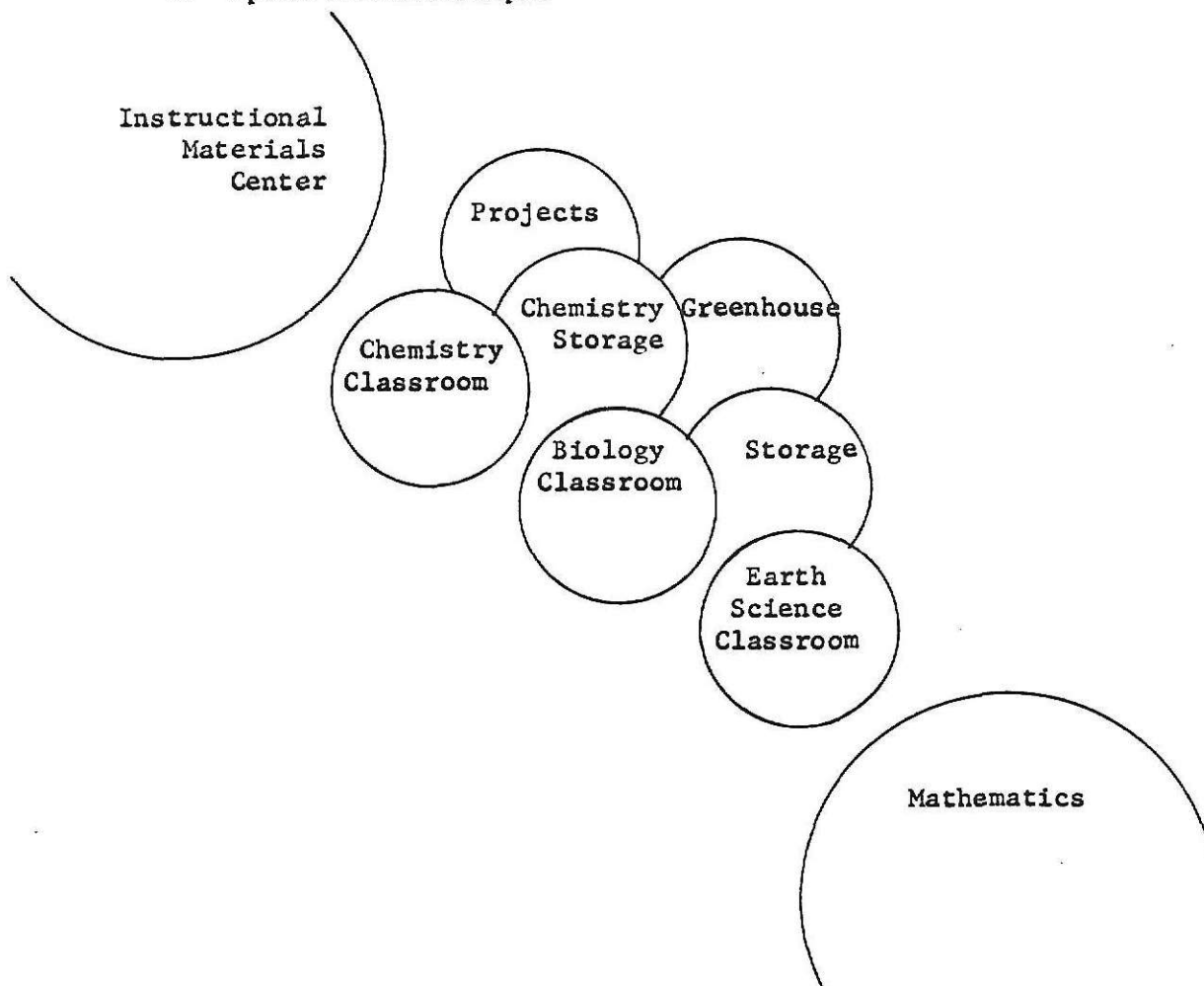
A. Science:

1. Space Requirements:

	<u>Square Feet</u>
a) Teaching Spaces (3) @ 1200 sq. ft.	2,400
b) Teaching Space (1)	1,400
c) Storage and Projects Room	300
d) Greenhouse	300
e) Planning Area (1)	300

TOTAL 4,500

2. Space Relationships:



B. Mathematics:

1. Space Requirements:

Square Feet

a) Teaching Spaces (3) @ 800 sq. ft.

2,400

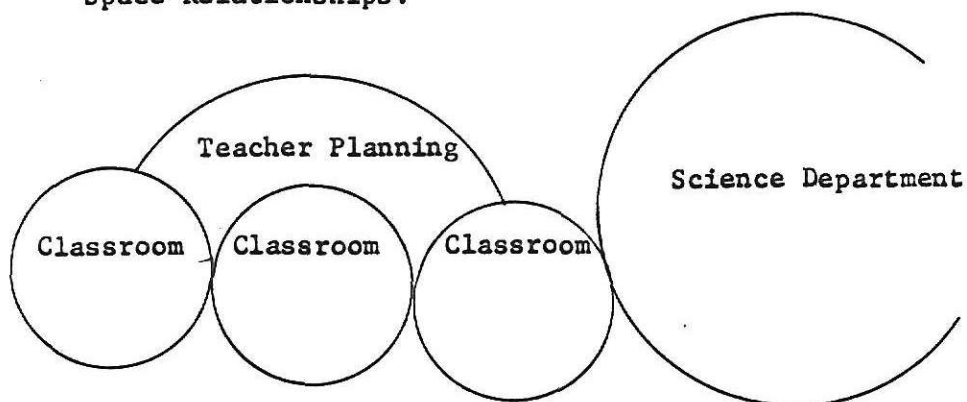
b) Planning Area (1)

100

TOTAL

2,500

Space Relationships:



C. Social Studies:

1. Space Requirements:

Square Feet

a) Teaching Spaces (3) @ 800 sq. ft.

2,400

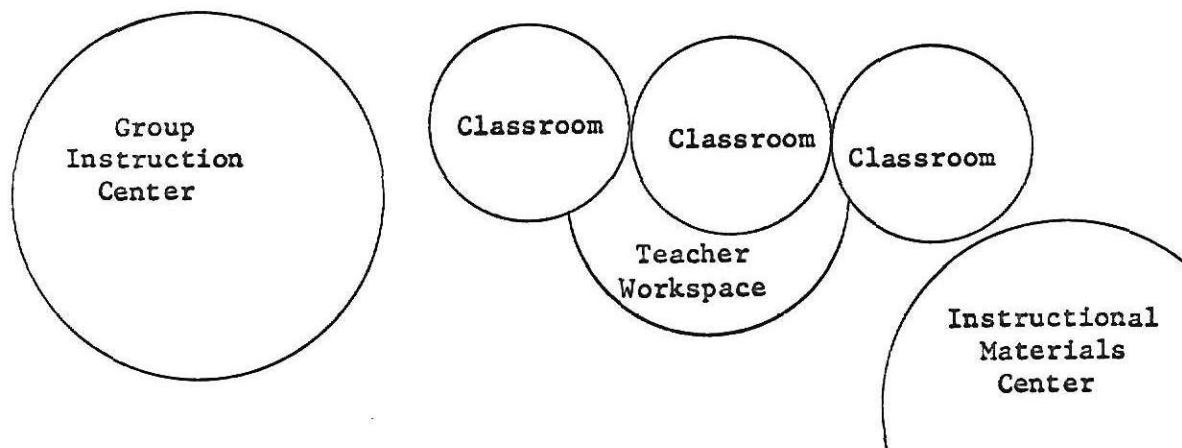
b) Planning Area (1)

300

TOTAL

2,700

2. Space Relationships:



D. Language Arts:

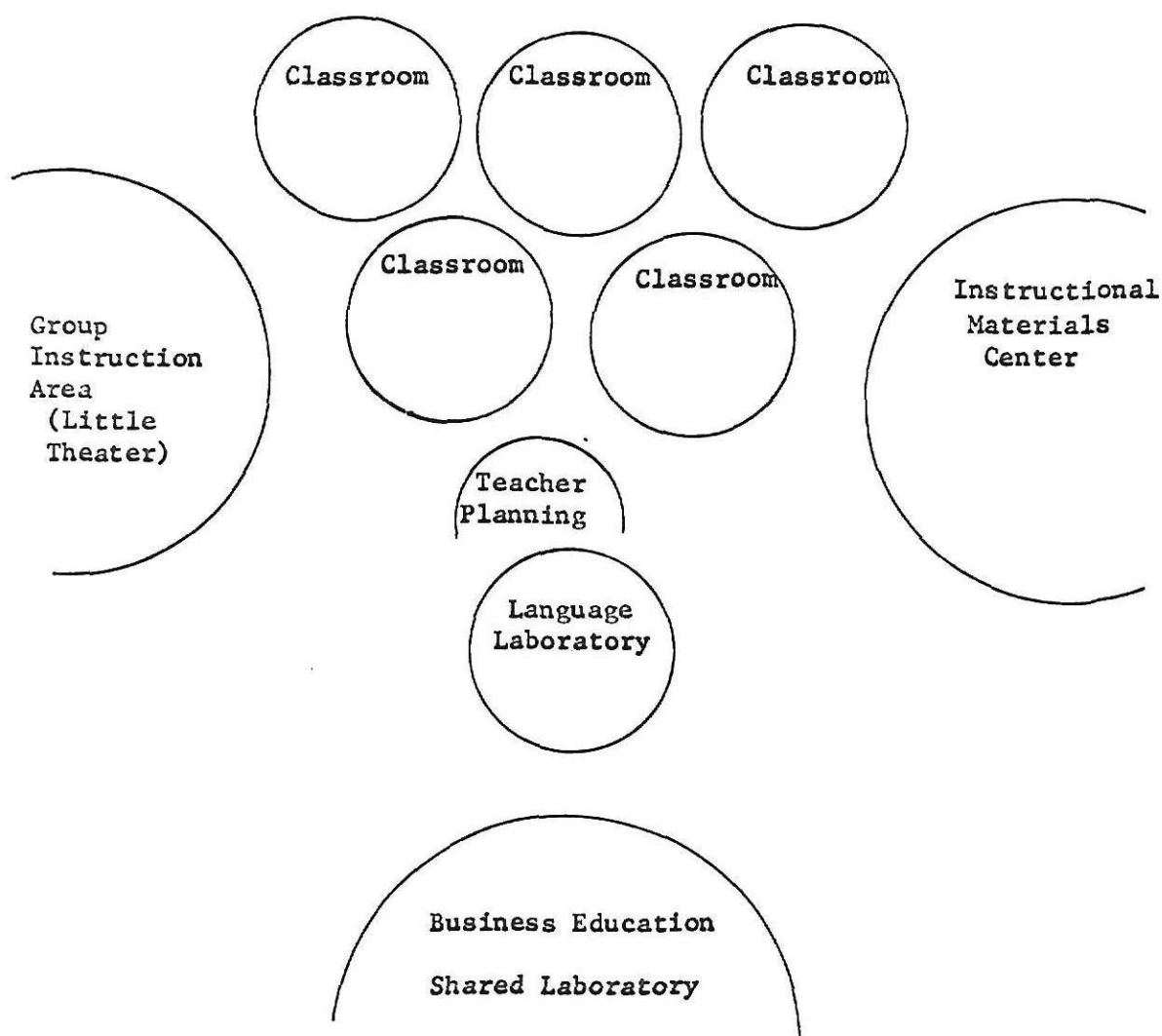
1. Space Requirements:

Square Feet

a) Teaching Spaces (5) @ 800 sq. ft.	4,000
b) Teaching Space (Language Laboratory)	900
c) Planning Area (1)	<u>500</u>

TOTAL 5,400

2. Space Relationships:



E. Foreign Language:

1. Space Requirements:

Square Feet

a) Teaching Space (1)

900

TOTAL

900

2. Space Relationships:

(See Language Arts Diagram)

F. Music:

1. Space Requirements:

Square Feet

a) Band-Orchestra

2,000

b) Choral Space (1)

1,000

c) Storage (1)

500

d) Planning Area (1)

200

e) Practice Space (1)

150

f) Practice Spaces (3) @ 60 sq. ft.

180

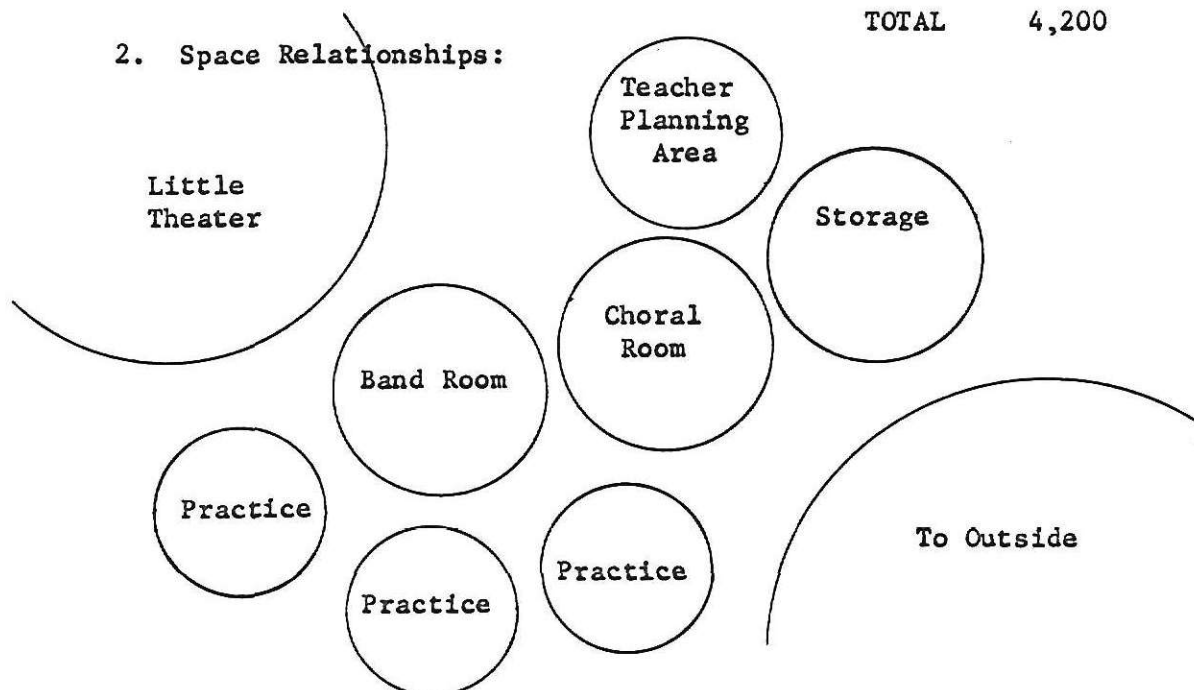
g) Listening Space

170

TOTAL

4,200

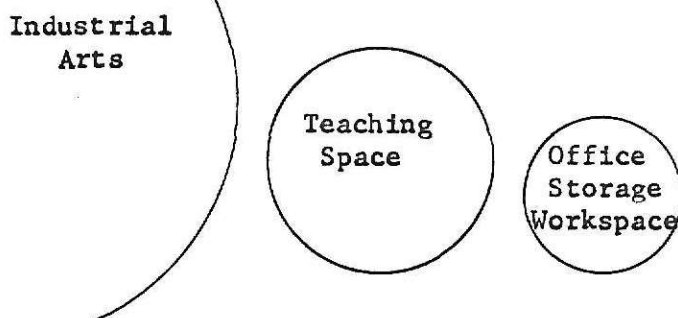
2. Space Relationships:



G. Art:

1. Space Requirements:	<u>Square Feet</u>
a) Teaching Space (1)	1,200
b) Office, Storage, Workspace	<u>300</u>
TOTAL	1,500

2. Space Relationships:



Industrial
Arts

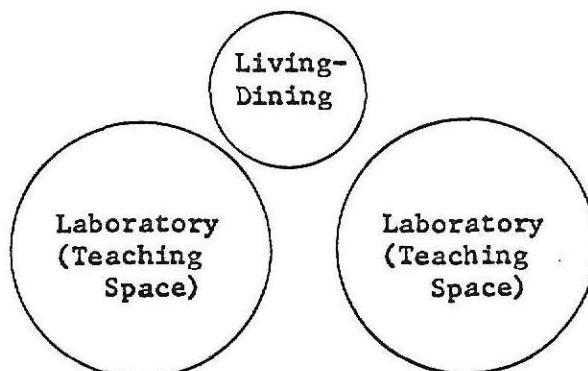
Teaching
Space

Office
Storage
Workspace

H. Vocational Home Economics:

1. Space Requirements:	<u>Square Feet</u>
a) Teaching Space (2) @ 1,200	2,400
b) Living-Dining Area	<u>500</u>
TOTAL	2,900

2. Space Relationships:



I. Business Education

1. Space Requirements:

Square Feet

a) Teaching Spaces (3) @ 900 sq. ft.

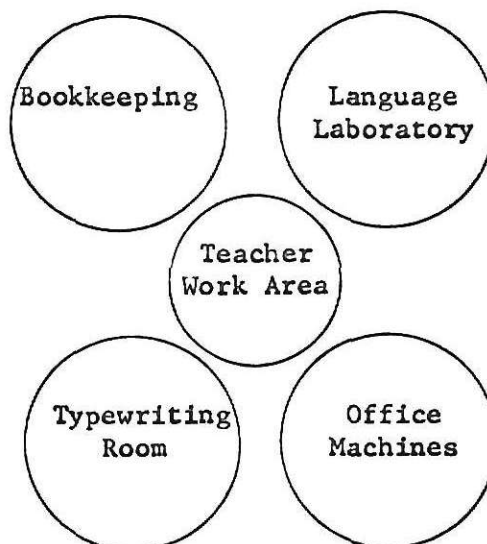
2,700

b) Planning Area (1)

300

TOTAL 3,000

2. Space Relationships:



J. Instructional Materials Center:

1. Space Requirements:

Square Feet

a) Reading Room, Stacks, Reference

2,900

b) Planning Area and Offices

400

c) Audio-Visual Storage

300

d) Conference Area (1)

150

e) Conference Area (2) @ 75 sq. ft.

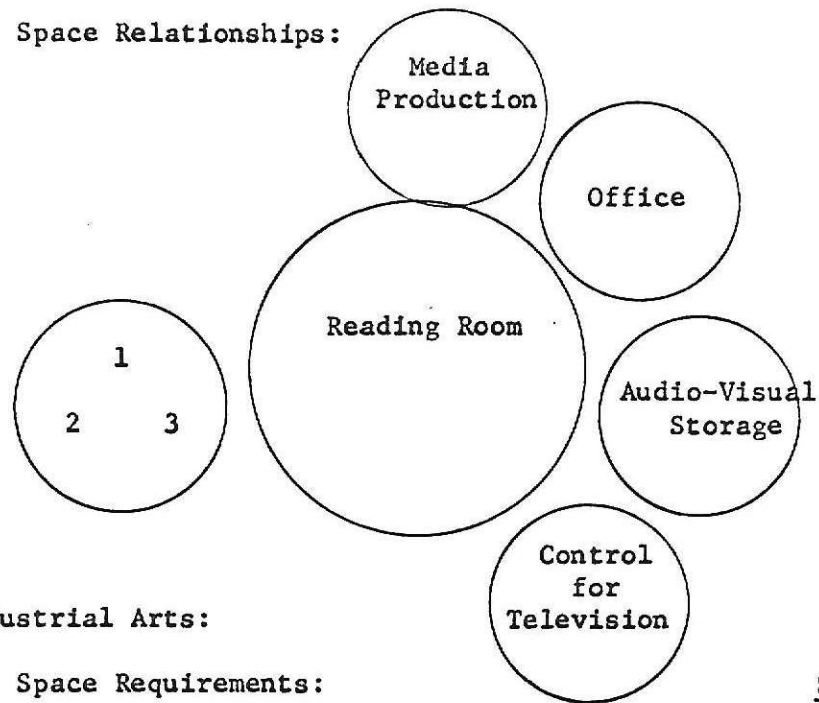
150

f) Media Production

300

TOTAL 4,200

2. Space Relationships:

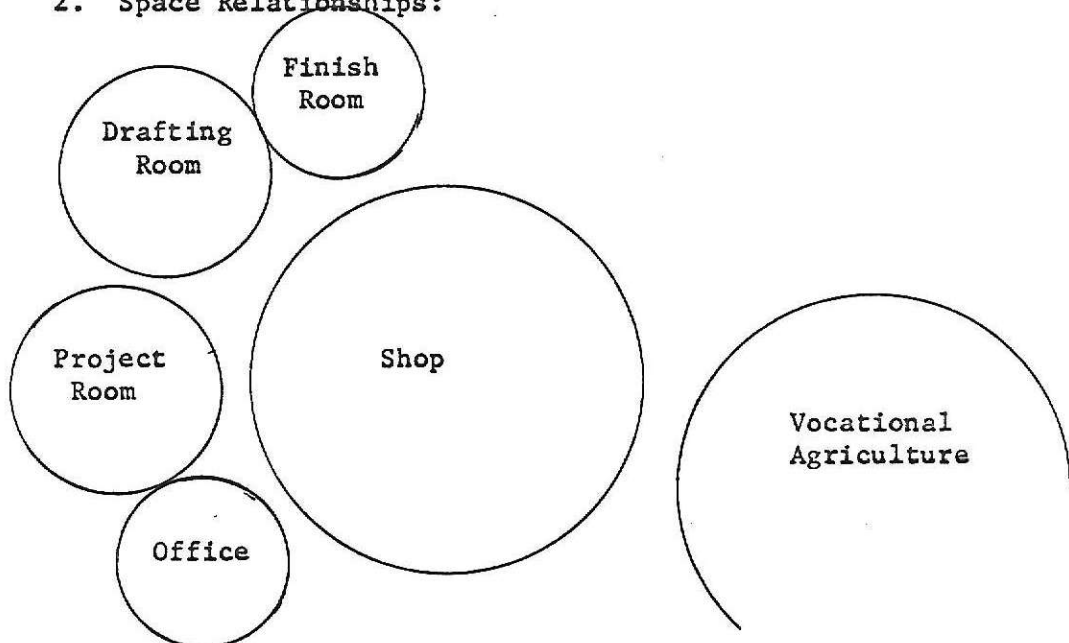


K. Industrial Arts:

1. Space Requirements:

	<u>Square Feet</u>
a) General Shop Area	1,800
b) Drafting Room	700
c) Finish Room	150
d) Project Storage	300
e) Office	100
TOTAL	3,050

2. Space Relationships:

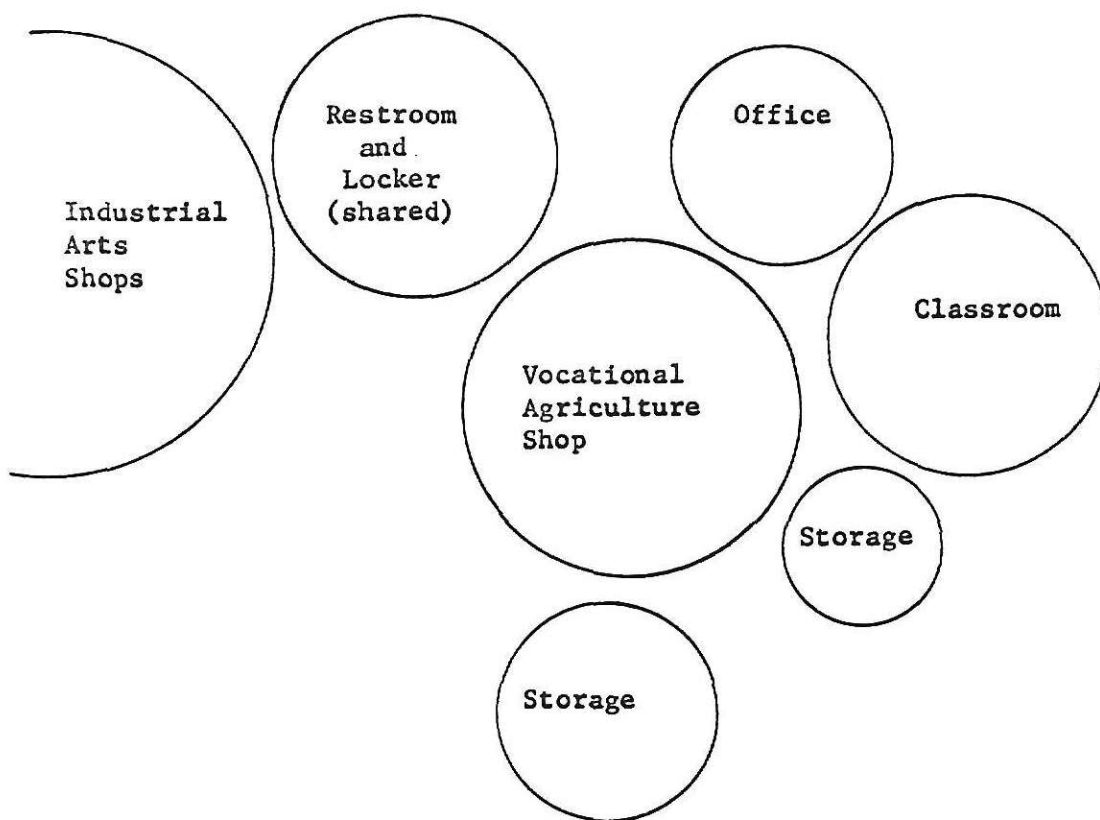


L. Vocational Agriculture:

1. Space Requirements:

	<u>Square Feet</u>
a) Shop (Including Storage)	2,900
b) Teaching Space	700
c) Small Storage	100
d) Locker Space (Shared with Industrial Arts)	200
e) Office	<u>100</u>
TOTAL	4,000

2. Space Relationships:



M. Physical Education:

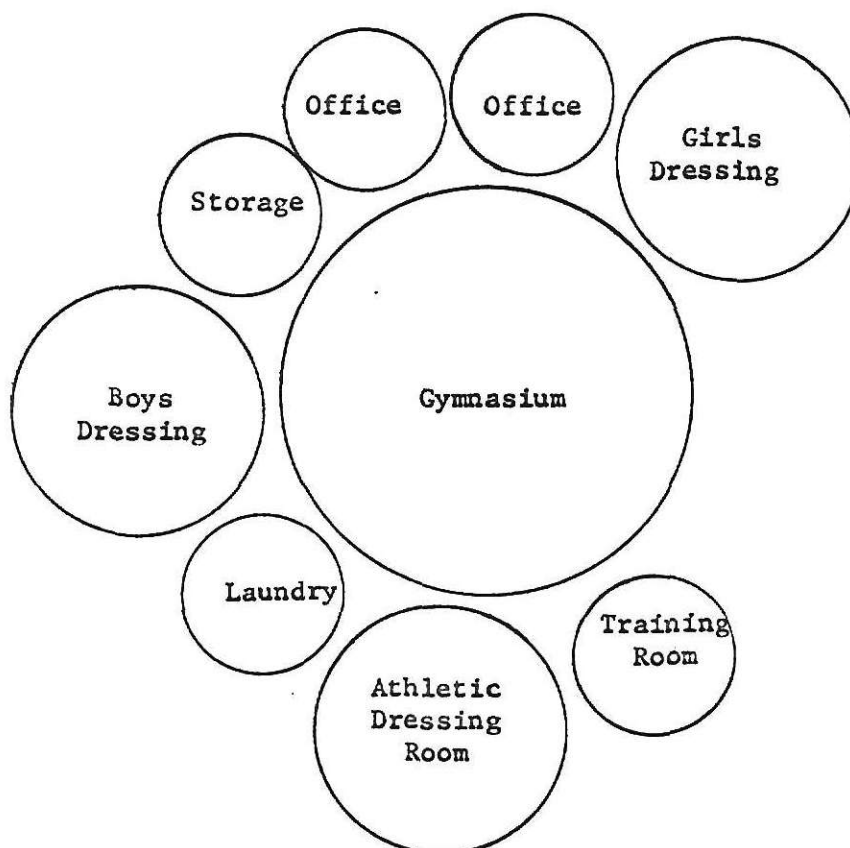
1. Space Requirements:

Square Feet

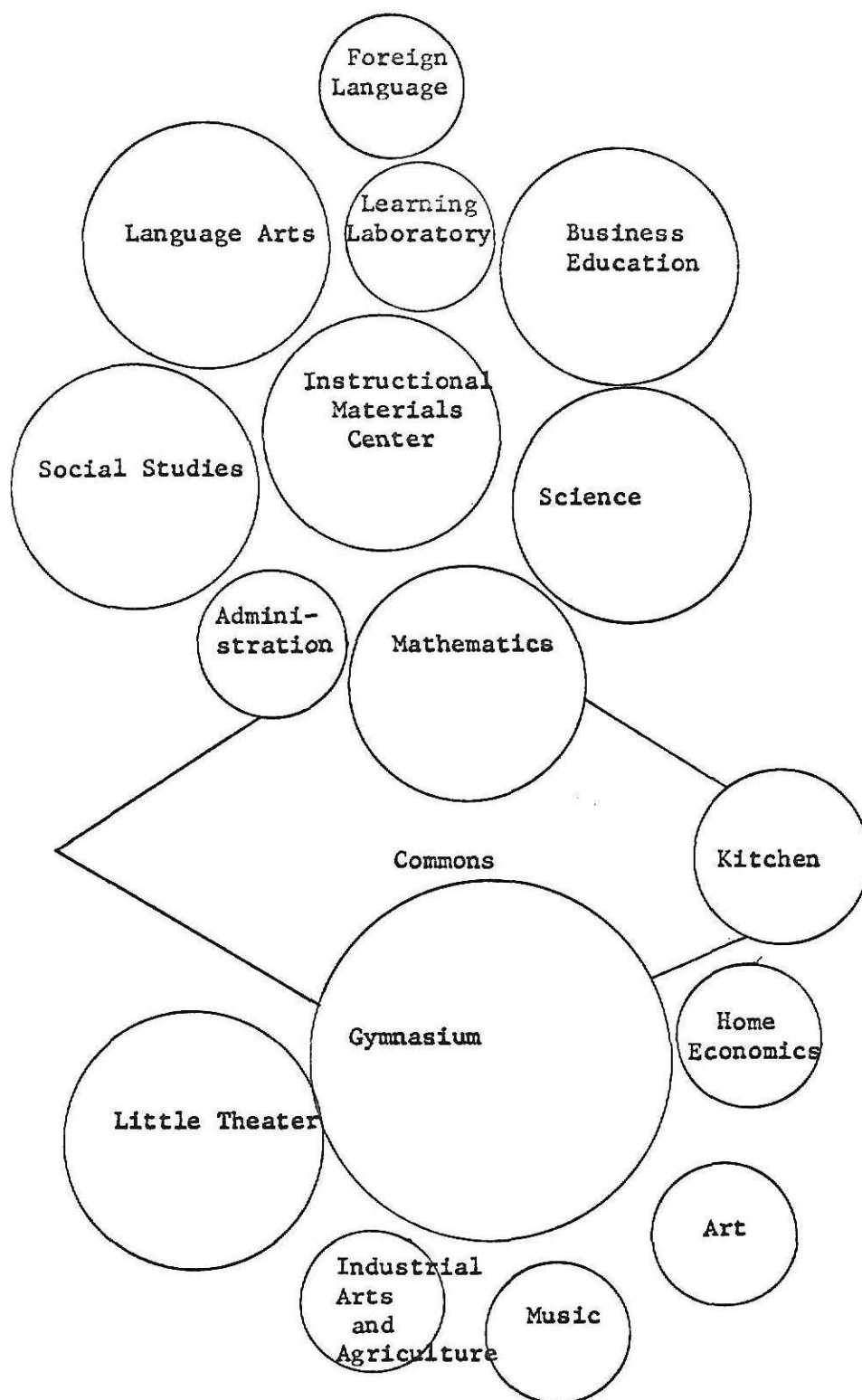
a) Gym with 1500 seating	10,000
b) Boys Dressing Area	1,000
c) Athletic Dressing Room	900
d) Girls Dressing Area	1,000
e) Training Room	200
f) Laundry and Drying Room	200
g) Office (Men)	150
h) Office (Women)	100
i) Storage	<u>450</u>

TOTAL 14,000

2. Space Relationships:



3. The following should be considered:
- a) Football Field - 360' X 160'
 - b) Athletic Fields (3)
 - 1) Football practice
 - 2) Band practice
 - 3) Physical Education practice
 - c) Baseball Field - 400' X 400'
 - d) Tennis Courts (4) - 78' X 36'
 - e) Plans for a future swimming pool
 - f) Plans for a 3-hole golf course



APPENDIX B

SCHOOL BUILDING AND SITES OBSERVATION CHECK LIST (Minimum Desirable Characteristics)

I. Sites

A. Location

1. Is the building site reasonably close to the center of pupil population, and in an area free from hazards of traffic, and free from disturbing noises and obnoxious odors?

B. Size

1. The most important concern is for sufficient space to conduct all educational activities, the related activities and service functions in an unhampered manner.
2. Does each one of the elementary school sites have the above qualities and provide an area of ten acres plus an additional acre for each one hundred predicted ultimate maximum enrollment?
3. Does each one of the junior high school sites have the above qualities and provide an area of twenty acres plus an additional acre for each one hundred predicted ultimate maximum enrollment?
4. Does each one of the senior high school sites have the above qualities and provide an area of thirty acres plus an additional acre for each one hundred predicted ultimate maximum enrollment?

C. Physical Features

1. Do all the sites have the shape, dimensions, suitable elevation and contour, soil characteristics, which permit maximum utilization and attractive development?
2. Is an all weather paved area of 50' X 100' provided for each 150 pupils enrolled?

D. Safety

1. Is the plan of walks, drives, play areas, bus unloading areas free from violations of safety considerations?
2. Is the school outside the approach pattern of an airport?

II. Buildings

A. Construction

1. Are all the buildings highly fire resistive (except for finish, wood floors in the classroom and trim)?
 - (a) If a single story building, is the building constructed with fire-resistive material in its walls, with double egress from all classrooms?
2. Does the structural plan of the building provide for sufficient flexibility to permit easy relocation of partitions at any place?
3. Is the building constructed with strong, durable materials and free from cracks which indicate inadequate foundation footings or weakness in fundamental framework, walls, floors, ceilings and roof construction?
4. Are all stairs, landings, platforms, and connecting passageways of fire-resistive construction?
5. Do all two or more story buildings have at least two stairways remote from each other, with ample doors readily accessible and visible?
6. Do all corridors provide at least ten feet of unobstructed passageway and all stairways forty-four inches in the clear?
7. Is the boiler room located so that it is not directly below spaces occupied by pupils and teachers?
8. Is the design of the building both functional and aesthetically pleasing to the extent that it is compatible with the importance and dignity of the educational enterprise?

B. Classrooms

1. Are all the elementary classrooms at least 750 square feet in area, exclusive of storage and coat spaces?
2. Are all the interchangeable secondary (junior-senior high classrooms) at least 750 square feet in area, exclusive of storage space?
3. Do the kindergarten rooms provide at least twelve hundred square feet in area?

4. Does each elementary classroom have a sink and water? Does each classroom below the third grade have a toilet?
5. Does each classroom provide at least thirty foot candles of uniform light on dull days? Is it free from glare from natural and artificial sources?
6. Does each classroom have chalkboard on one wall, bulletin boards along most of two walls, and fixtures for maps and screens?
7. Are the classrooms and the adjacent corridors treated acoustically for sound control?
8. Are no basement type rooms with floor levels more than three feet below exterior grade level used for regular classroom purposes?
9. Do the heating and ventilating systems provide thermostatically controlled temperature in an appropriate range of comfort and a minimum of three air changes per hour without disturbing air flow draft?
10. Is each classroom made part of the total school by extensive glass areas and display space between the classroom and corridor?
11. Is the foot-lambert brightness of any surface viewed from a normal position in the room less than ten times the foot-lambert brightness of the poorest lighted task in the room?
12. Does each classroom have some individuality with an attractive decorative scheme which is applied with recognition of its psychological effect on children?
13. Is the floor finished with a fairly light or neutral finish in a manner that harmonizes with the rest of the visual environment?
14. Is the furniture and equipment adequate, of proper size for the pupils, and movable to the extent that informality and flexibility may characterize the educational activities?

C. Special Rooms and Areas

1. Does the art classroom laboratory provide a space of one thousand square feet of net floor space exclusive of needed storage space?

2. Is a separate well-equipped auditorium and stage provided in the senior and/or junior high with a seating capacity of not less than five hundred?
3. Do the business education facilities include a teacher's workroom-office and a suite of at least two classrooms, a typing room of a minimum eight hundred fifty square feet, and a combination bookkeeping-accounting-business machines-office practice room with a minimum of nine hundred square feet?
4. Does each building have adequate faculty workroom and conference areas?
5. Is a comfortable teacher's lounge provided in each building with a restroom for the women?
6. Are separate guidance suites containing an adequately equipped office for the counselor with an accessible waiting room provided for the junior and senior high buildings?
7. Is a health suite provided for a nurse in each elementary, junior and senior high building which is adequate as an examination room with space for two or more cots and an adjoining toilet and lavatory?
8. Does the homemaking area provide a minimum of one thousand five hundred square feet of floor space including specially developed areas of the following types and purposes: (a) unit kitchens, (b) clothing construction and selection, (c) living center for home planning, home furnishing and decoration, (d) bedroom center for home care of sick, (e) laundry center, (f) discussion center and teacher's work area?
9. Are libraries provided in both the junior high and senior high which serve as resource centers of instructional material, including audio-visual aids, current newspapers and periodicals, reference books, and information files for the entire educational program?
10. Does the library contain a minimum collection of two thousand classified and catalogued books appropriate for the instructional needs of the pupils? (At least five books per pupil should be provided for each additional pupil over four hundred enrolled.)
11. Is a library reading room adjacent to, but fairly distinct from the library provided in an atmosphere of quiet

surroundings which is conducive to concentration upon the task at hand? Does it have an area of not less than one thousand five hundred square feet?

12. Are adequate food service facilities available for lunch for the pupils who live too far away to go home at noon? Does this include a dining room with an attractive atmosphere conducive to reasonably leisure eating with not less than ten square feet per person for the largest lunch shift, a kitchen area with a minimum of one and one-half square feet per meal served and minimum food storage area of not less than one-half square foot per meal served?
13. Are separate music rooms provided in the junior and senior high schools with suitable acoustical sound control treatment preferably near or adjacent to the auditorium stage?
14. Is a senior high instrumental music room with nearby practice and storage rooms provided? Does the instrumental room provide a minimum of one thousand four hundred square feet of floor space (exclusive of storage and practice rooms)?
15. Is a senior high vocal music room provided for large participating groups with equipment for music appreciation? Does it have at least nine hundred square feet of floor space?
16. Is a well-equipped elementary (K-6) physical education room or gym not less than forty feet by sixty feet provided with a ceiling height of sixteen feet?
17. Is a well-equipped junior high physical education room and gymnasium with well lighted and ventilated locker and shower rooms provided? Does the gymnasium provide a space of at least forty-five feet by eighty feet?
18. Is a well-equipped senior high physical education room and gymnasium with adequately lighted and ventilated locker and shower rooms provided? Does the gymnasium provide a space for interscholastic games at least 76 feet by 96 feet? (Preferably this should be divisible into two 48 foot by 76 foot physical education teaching spaces.)
19. Is an administrative center type office space provided for the principal with adequate work space for a secretary, a waiting space for parents, pupils and visitors? Does it have a place where the principal can work without interruption and conduct interviews in private?

20. Is a junior high general science classroom-laboratory provided with a minimum of eight hundred fifty square feet of floor space provided exclusive of storage space?
21. Is a senior high biological and general science room provided with a minimum of one thousand square feet of floor space exclusive of storage space?
22. Is the senior high physics and chemistry laboratory-classroom provided with a minimum of one thousand square feet of floor space exclusive of storage space? (Separate from biological science room.)
23. Is the shop program planned to adequately meet the general educational and vocational needs of the students and the community?
24. Does the senior high industrial arts shop have a minimum area of two thousand square feet with adequate area layouts for: (a) woodworking; (b) metals--including fairly distinct divisions for sheet metal, casting, welding, forging, and art metals; (c) power mechanics--including fairly distinct divisions for electricity, motors, engines, auto mechanics; (d) planning and drawing; (e) photography and blueprinting; (f) creative arts and crafts, plastics; and (g) finishing.
25. Does the junior high industrial arts shop have at least a one thousand five hundred square foot area with appropriate equipment for exploratory experiences in wood-working, metal working, and arts and crafts?
26. Does the vocational trades and industries shop provide sufficient space and equipment for auto mechanics, machine shop, sheet metal work, carpentry, masonry, plumbing, refrigeration, air-conditioning, and radio?
27. Are special social purpose areas provided in both the junior and senior high schools--preferably a student lounge close to the cafeteria, attractively decorated and furnished with easy chairs, record player, etc.?
28. Does the elementary school have a small room for tutorial groups in speech correction, remedial reading, and the like?
29. If there are a sufficient number of pupils interested in vocational agriculture to offer this instruction, is at least one thousand eight hundred square feet of separate shop area provided with an adjacent specialized classroom for vocational education of not less than seven hundred fifty square feet?

FEASIBILITY STUDY OF UTILIZING ST. MARYS
COLLEGE FACILITIES FOR U.S.D. 321

by

BERNARD LEE GIRARD

B. S., Kansas State University, 1963

AN ABSTRACT OF A MASTER'S REPORT

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MASTER OF SCIENCE

College of Education

KANSAS STATE UNIVERSITY
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The purpose of this study was: (1) to evaluate the physical plant facilities of St. Marys College in terms of established educational criteria, and (2) to evaluate St. Marys College facilities in terms of criteria established by Unified School District 321.

Review of the study conducted by the office of the State Architect showed that Bellarmine Hall and the Gymnasium Complex were the only buildings of the college which were suitable for educational use. Therefore, all other buildings of the campus were excluded from the study.

This study was based on evaluation of the facilities in terms of a School Building and Sites Observation Check List developed by the College of Education, Kansas State University. The particular needs of the school district were represented in its educational specifications.

Analysis of the facilities showed that the site was inadequate from the standpoints of location, size physical features, and safety.

The check list showed that the buildings provided only a limited degree of flexibility. In addition, the interior structures of the buildings were deemed inadequate because of the presence of open stairways, narrow corridors, and unsafe spaces. It was also observed that the classrooms possessed inferior lighting and would have posed problems in the areas of sound control, heating, and ventilation. Further, the facilities did not provide the necessary space required by the district's anticipated program.

Certain basic characteristics of the check list were considered adequate as they existed at the time of the study. It was noted that

the facilities were in good structural condition, and the campus did provide a very aesthetic setting within the community. It was very obvious that the facilities had received excellent maintenance throughout the many years the Jesuits maintained the facilities.

In accordance with the findings of this study, it was concluded that the facilities of St. Marys College were infeasible to satisfy the building needs of Unified School District 321.

It was recommended that: (1) the district should develop a master plan in line with its enrollment projections, present building status, and the status of the parochial education program within the district; (2) the district orientate its people to the prevalent curriculum and plant deficiencies; (3) the district introduce the findings of this study to its concerned groups through presentation to civic clubs, school meetings, and other social gatherings within the district.