software? Or would it suggest that some organizations will find nothing on the market of real value to them?

Pollard replied, "I'd rather see ways of allowing potential users to dabble with different possibilities, some of which they might create."

Kaufman, again trying to get the group to recognize that programmed videocassettes are a kind of electronic publishing, too, said that hundreds of cassettes now exist to meet the needs of the business community, but important other segments--citizen groups, social services, the arts--are not similarly served by this medium. Funds should go into production and distribution to show how cassette programs can meet their needs as well.

"This is all reminiscent," Eileen Connell remarked, "of cable access conferences where everyone assumed--quite falsely, as it turned out--that access to a medium constituted access to an audience."

The more apt comparison, the moderator suggested, might be to conferences like one the Aspen Institute sponsored some years ago that first introduced small non-profit groups to what they might accomplish with the desktop computers then becoming available: Their principal activities may have stayed the same afterward, but their effectiveness at recruiting members was exponentially enhanced.

The assumption of this project is not that everyone should be a publisher (though some participants entertained that vision) and not that electronic publishing deserves promotion for its own sake (though some confessed to a faith in the possibilities that would justify exactly that--"I can't accept," said one of the true believers, "that we're all demented").

More modestly, our guiding interest is to discover oppor-tunities for society to benefit from electronic publishing not only in the realm of commerce, but also in the other uses and pursuits of knowledge that make for a civilized community.

The next conference (in Fall 1987) will focus on just two or three aspects of this interest, as framed by papers to be commissioned expressly for the purpose. It too will be the subject of a FORUM REPORT, and copies of the final complete texts of the commissioned papers will be available on request.

Aspen Institute Project
for
Enhancing the Social Benefits of New Electronic Technologies

ELECTRONIC PUBLISHING
Planning Meeting
February 25-26, 1987
Wye Woods Conference Center
Queenstown, Maryland

PARTICIPANTS

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Gregory W. Harper, President, ComTech Communication Technologies, Inc.
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    City
Michael Rice, Director, Program on Communications and Society, and
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ABSTRACT
                This report examines the process of planning library
services for off-campus students that was undertaken by the Vermont
State Colleges (VSC) in 1982, and considers the implications of the
plans for the system as a whole as well as for the Community College
of Vermont (CCV), a non-campus, non-traditional college without a
library. Following a brief background discussion, the detailed
assessment of the VSC library and information services is summarized;
the activities and recommendations of the system-wide Library
Assessment Group (LAG) are described; and the implementation of the
plans to date is discussed. In addition, a consideration of the
implications of the plans for CCV describes CCV's problems in
securing the educational resources to provide equal opportunity to
students throughout the state; VSC's proposed statewide educational
resource system; CCV's appointment of a Resource Task Force designed
to help students, instructors, and staff to do effective research;
and the proposed publication by the Resource Task Force of a
Resource/Bibliographic Instruction Manual. The attempts of CCV and
the Resource Task Force to develop an internal, supplementary
resource system in response to VSC's plans are also described. Maps
depicting the fall 1984 CCV enrollment by site office and VSC
enrollment by county are provided. (KM)

DEVELOPMENT OF OFF-CAMPUS LIBRARY SERVICES

IN THE VERMONT STATE COLLEGES

by

Dennis Lindberg
Vermont State Colleges

and

Eileen Chalfoun
Community College of Vermont

Developing library services for off-campus students in the Vermont State Colleges has been conceived as an integral part of the development of library services generally in the system. Concern for services not on campuses has led to choices which emphasize technology, coordination, and cooperation between existing college libraries. This paper examines the planning process and its results first in the system as a whole, and then in the Community College of Vermont, a non-campus, non-traditional college without a library.

Background

The Vermont State Colleges (VSC) is a public corporation which includes three four-year institutions with small graduate programs in education (Castleton, Johnson and Lyndon State Colleges), a two-year technical college (Vermont Technical College---VTC), and the Community College of Vermont (CCV). Total headcount is about 7,500 and FTE about 5,000.

The Community College operates state-wide from 12 site offices and does not have campuses or fulltime faculty. With about 2,500 students it is the largest in headcount, but the smallest in FTE (about 750). The four campus-based colleges also operate off-campus programs, involving in several cases significant numbers of students. The four campus colleges have libraries that provide services on campus. The Community College does not have a library or librarians working as librarians.

Though blessed with a romantic image, one reality of Vermont is that it is a small, rural and relatively poor state. State support for the State Colleges is the lowest in the nation while tuition levels are the highest in the nation for such colleges. VSC receives a one line appropriation from the legislature which in recent years accounts for about 28 percent of total revenues. The balance is from student charges and Federal grants.

The system experienced a major financial crisis in the late 1970's as reality intruded upon the dreams of the 1960's and early 70's. New, tough-minded managers were brought in to get the system back on its feet. After the roofs were fixed, the life-safety problems corrected, underenrolled degree programs pruned, damage to accreditation statuses controlled and corrected, common financial and personnel systems put in place, and adequate, if unsophisticated, administrative computer systems installed, it was time, in 1982, to deal with the "library problem" and begin the process of improving academic quality generally.

With the fires out, the late Chancellor Richard E. Bjork reorganized his office in the summer of 1982. Recognizing the convergence of information technology, Bjork gave one person (Lindberg) system-wide responsibility for computing, library development and institutional research. He saw that the library problem was large, that it would take time to correct, and that investment in information technology might reduce the need for additional fixed assets like books and buildings for their storage.

Planning Process

To produce real results, planning cannot take place in a vacuum. It is not enough to figure out what ought to be done. In Vermont at least, a plan of action, and the assumptions underlying it, need to be perceived as reasonable, rational, practical and soundly conceived. The realities of the structure, politics and personalities of one's own organization are a factor in planning, as are the realities of the relationships between one's organization and the external environment.

The Library Assessment Group

For these reasons and because other issues were at center stage in the fall of 1982, the library project began quietly. A system-wide Library Assessment Group (with the unfortunate acronym LAG) was assembled by the Chancellor to conduct a detailed assessment of VSC library and information services. Members were the four librarians from the campus colleges, an associate academic dean from one college who has an M.L.S., the Director of CCV's Northern Region who chaired the college's Resource Committee, a staff member from CCV (Chalfoun) also an M.L.S. but not working as a librarian, and Lindberg as chair and staff.

The assessment took nearly a year. Librarians reported in detail their judgments of the quality, quantity, adequacy, appropriateness, currentness, and rate of use of the collection supporting each degree program and the college's general education program. Reference and bibliographic instruction programs,

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automation and technical processing, staffing and facilities were also described.

Two peer groups were developed, one of about 25 smaller, public, four-year institutions (all members of the American Association of State Colleges and Universities) and another of about 12 smaller, state-supported, two-year technical colleges. No non-campus community colleges with preuominately classroom-based, coursework instruction could be found. CCV appeared to be unique and truly without peers. A two-page questionnaire was developed asking about enrollment, number of degree programs offered, reference and bibliographic instruction staffing and services, automation and technical processing, and facilities. Librarians were also asked to attach the most recent HEGIS survey with its data on holdings, staffing and expenditures.

In July 1982, the Group produced a 38 page report for the Priorities (Executive) Committee of the Board of Trustees. Copies were distributed to all Trustees and senior VSC administrators. The report was low-key and measured in tone, but candid and frank. It confirmed in detail what many knew to be generally true. Several presidents were concerned that the report not get into the press and affect recruiting.

The report concluded that collections are generally small, have significant gaps, are of uneven quality, often inappropriate, and not particularly current. Students come to VSC institutions knowing little about the use of libraries and there are few requirements built into the curriculum for students to use libraries. Bibliographic instruction is rudimentary and professional reference services are minimal at three of the four libraries. There is some use of online searching in the libraries, but no other significant use of information technology. Technical processing is not automated. Virtually no library services are provided to non-campus and off-campus students who make up about one-third of the system's students on a headcount basis.

VSC institutions are weak when compared to ACRL standards. The four year institutions are also weak when compared to their peers. VTC looks strong in comparison to the other technical colleges, but only because, as a group, their libraries are so poor. Applying standards, CCV ought to have 95,000 volumes and three professionals in its library. Instead, it has claimed to rely on local public libraries, which in Vermont vary widely in size and quality, are generally unsuitable for supporting college level work, and are open an average of 17 hours per week. While awarding CCV the maximum 10 year renewal of its accreditation, it is not surprising that the New England Association had library support first on its list of problems to be addressed by the college before the next visit.

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The Priorities Committee received all the Task Force materials, including background readings. Written and verbal progress reports were made at monthly meetings of the full Board. The Chairman of the Board was particularly interested and began early to prepare the Board for what he knew would come. "Listen up folks," he said at one meeting. "Fixing this problem is going to cost real money."

In August 1984 the Task Force's recommendations were submitted to the Board. Major points were:

a. appropriate information competencies in general education and degree programs.

b. parity between on-campus and off-campus programs in requirements for and use of library/information resources.

c. a single, joint online catalog as one node in a network also including the University of Vermont, Middlebury College and the State Department of Libraries. OCLC will be implemented and retrospective conversion performed on existing collections. The system will be accessible for off-campus and non-campus students and faculty through dial-up lines and will have full Boolean capabilities.

d. increased reference services including reference librarians for the Community College of Vermont (CCV). CCV will have responsiblity for references services for off-campus students system-wide and will have incoming WATS lines.

e. a joint serials list, increased use of online searching especially at CCV, and digital fax transceivers for the four libraries and the three CCV regional offices.

f. a five year coordinated collection catch-up program to add 15,000 volumes per year to system holdings, including small reference collections for CCV site offices.

g. increased funding for collection renewal to reduce the book replacement cycle from 32.3 years at present to 20 years at the four-year colleges and 12 years at the technical college.

Costs are projected to be $2.6 million in one-time (capital) funds and increments to the annual operating budget totaling $561 thousand. The report was received by the Board and endorsed in principle.

The decision to combine the catalogs in a single on-line system is particularly important for non-campus and off-campus students and faculty as there will be one point of access for all VSC holdings and electronic mail capability within the system for ordering materials.

Implementation.

Implementation is under way. Tasks have been divided into three categories: those requiring little or no funds, those covered in the FY1985 budget, and those requiring additional funding---including FY1986 tasks needing $766,000 for full funding. Non-economic tasks include academic policy issues and cooperation between libraries to develop the joint serials list (done), target collection development efforts (in process) and developing a common policy for on-line searches (in process). Budgeted funds exist in FY1985 to implement OCLC, contract for recon, and install digital fax machines. The former has begun.

State appropriations have been requested for the full amount of the project. Initial signs are mixed. The need is understood and accepted by the Governor-elect. She is, however, working to eliminate a budget deficit left by her predecessor. Revenue collections through March will affect success. Prospects for support in FY1987 are much better. Fund raising from private sources is also underway and tuition increases may also be sought.

While full implementation of the recommendations is down the road, the planning process has also stirred the pot in each of the colleges. The Community College of Vermont, particularly, because of its accreditation report and the system-wide process has begun to rethink its approach to delivering library and information services to its students.

Community College of Vermont

How to provide library services to the Community College of Vermont was one of the principal questions driving the VSC library development project. Founded in 1970 as a non-campus college, CCV has always seen itself as in the vanguard of higher education. It has received national recognition as one of the most creative, innovative, nontraditional institutions in the country.

One of the basic assumptions underlying the structure of this new institution was that many of the educational needs of the citizenry, particularly the rural and disadvantaged, could be met through the utilization and coordination of existing resources. No new buildings were to be constructed, no library to be purchased, and no cafeteria services provided. Resources within local communities were to be used to accomplish the college's mission. Thus, flexibility became its greatest strength.

The problem which has constantly faced CCV is how to secure the educational resources to provide equal opportunity throughout the state to all of the students. Given a limited budget and minimal staffing, how can the college provide students the opportunity to

fulfill its goals: a variety of choices, use of community resources. individually-designed programs, transferability to other institutions, vocational guidance, recognition of experiential learning, staff development, alternative educational programs, regular evaluation, developmental programs and student support services. The list is replete with expensive items demanding careful and creative attention.

In order to explore creative answers to the college's problems, one must understand the structure of the institution. CCV site offices stretch from the Canadian border in the north to the Massachusetts stateline in the south, and hug the borders of New Hampshire and New York on either side. Newport, St. Albans, Brattleboro, Bennington and White River Junction are the visible markers that outline the college's boundaries within the state. Within the state are many other site offices which maintain communication with central administration in Waterbury.

Few site offices are within comfortable reach of research facilities and the college maintains no permanent library collections. In truth the public library system is the college's library system. With branches in virtually every Vermont community, students, in theory, have access through interlibrary loan to 1,000,000 titles in the state including those held in the twenty-two college and university libraries. But sharing the woes of Tantalus, a student has little means of identifying relevant materials and usually finds the inter-library loan process slow if not painful. Students throughout the state do not have equal access to the resources needed to do college-level research. Those writing a term paper may indeed have to wait a term in order to do a bibliographic search and access materials.

The college has attempted to develop a collegewide resource system to help instructors and students identify and locate print, audiovisual and human resources identified in college records. Distance and poor communication facilities have prevented that system from ever being used effectively. By the time information was collected, stored and disseminated, it was archaic.

In 1982 a concerted effort was made to share professional materials and create an educational resource system which could benefit off-campus students all over the state. Not just CCV, but also off-campus students from Johnson, Castleton, and Vermont Technical College were able to benefit from the preliminary efforts to collect and store information relevant to the classes they were taking in local communities. The system still awaits full development and implementation.

VSC library development plans are important to CCV. In the proposed system, each student will have access to a single, joint online catalog in a network which includes the libraries of Castleton

State College, Johnson State College, Lyndon State College, Vermont Technical College as well as the University of Vermont, Middlebury College and the State Department of Libraries.   It also means participation in a joint serials list, increased use of online searching, and digital fax tranceivers in each of three CCV regional offices. At some time in the near future, through automation each CCV student, instructor and staff member may be able to know what all VSC libraries hold and have on order. Interlibrary loan within the joint system should improve in efficiency and volume. In summary, automation will provide some of the answers to how the college can provide access to information and materials not normally available locally.

CCV's initial attempt to implement the VSC goal of insuring that all graduates will be able to make efficient and effective use of information resources has led to the formation of a Resource Task Force designed to help students, instructors and staff do effective research.

Formed in the summer of 1984, the Task Force will publish a Resource/Bibliographic Instruction Manual in March 1985. It will complement the college's degree program manual which sets the following expectation for students' research skills:

   ---develop appropriate topics or questions as a basis for the
      research;

   ---locate and use resource materials such as library catalogs,
      bibliographies, indexes, abstracts, and computer databases;

   ---set up a research paper in correct form using an outline,
      footnotes, and a bibliography.

The manual will cover the following topics in order to help students develop these skills:

1. The self-reliant learner: The essential difference between CCV
    and many other colleges lies in what CCV believes about
    education and learning, and most particularly, in what it
    believes about students. Self-reliant learners are people who
    can assess what they know and what they need to learn; they can
    use learning skills; and they can plan their studies to meet
    educational and career goals. In short, they are in charge of
    their own learning.

    a. What is the importance of research to this goal.

    b. What are the expectations for the college-educated person.

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2. The reasons for seeking information.

    a. How does one form a research question.

    b. What is the relationship between research questions and the individual quest for knowledge.

3. What is information.

    a. How information is collected and disseminated in our society.

    b. The common sources of information: libraries, other organizations, human resources.

4. What are the skills one develops for finding information.

    a. Description of research methods and search strategies.

    b. The difference between quantitative versus qualitative research.

5. The appropriate uses and some of the misuses of information.

    a. A description of the concepts of copyrights and fair use.

    b. A discussion of academic honesty, scholarly apparatus, and plagiarism.

6. The particular skills needed for library research.

    a. The differences between high school and college libraries.

    b. How interlibrary loan systems operate.

    c. A description of OCLC and other search system.

7. Some of the strategies to use in the library.

    a. Familiarity with common reference materials.

    b. The use of catalogs and cataloging systems.

    c. Ways to use library resources to both formulate and answer research questions.

8. The relevant aspects of computerization and databases.

9. A glossary of terms related to information, research, and libraries.

10. Sample diagram of a local resource information center.

11. Index.

The library manual will be approximately fifty pages, and designed to be used by all CCV degree students as part of a course entitled "Degree Planning Seminar." This seminar is designed to take students step by step through the process of developing an individualized degree. In addition, it will be strongly recommended as a supplementary resource in selected curriculum offerings. The manual will further strengthen the institution's philosophy that education is an on-going process and that one's studies help with the development of thinking skills and learning skills. It is designed to help students determine how they learn best, and how to locate the appropriate resources for learning.

Since the VSC system plan is based on the notion of sharing information state-wide, it is important for CCV to find ways of collecting, classifying, and making available for use the educational resources used by staff, instructors, and students throughout the state. The college has attempted to develop an internal, supplementary resource system to include a collection of college-level textbooks, programmed materials, occupational and career journals and newspapers, filmstrips, slides, ERIC microfiche, audiovisual equipment, catalogs of books, films located at other institutions, bibliographies and staff development materials. The attempts have failed primarily because once collected and classified, the educational resources rested in their respective locations never to be resurrected. The present Resource Task Force hopes that an automated system using Zenith 100 computers, and an Infostar data base will allow the staff to enter and retrieve data efficiently and conveniently, and that the system will be used daily throughout the state.

The college's instructional resource system rests on the assumption that much information related to instructional effectiveness has been collected college-wide, and much more needs to be collected, classified and made available for distribution. A computerized system for accomplishing this task is sorely needed. The content is to be used primarily to improve instructional methods in every CCV class throughout the state, particularly in those rural and economically deprived areas which might otherwise have no access to current educational resources.

The system can be described as:

1. Easy to use, requiring minimal staff training to input and access information.

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2. Equally available to students, instructors and staff in all site offices.

3. Classified by use of Library of Congress subject headings.

4. Reviewed, updated and changed easily.

5. Designed to encourage search strategies.

6. Not coordinator-dependent.

7. Having the capacity to transmit a file.

8. Interfaced with a broader-based communications system.

9. Preserving hierarchical sorts while having clear, simple points of entry.
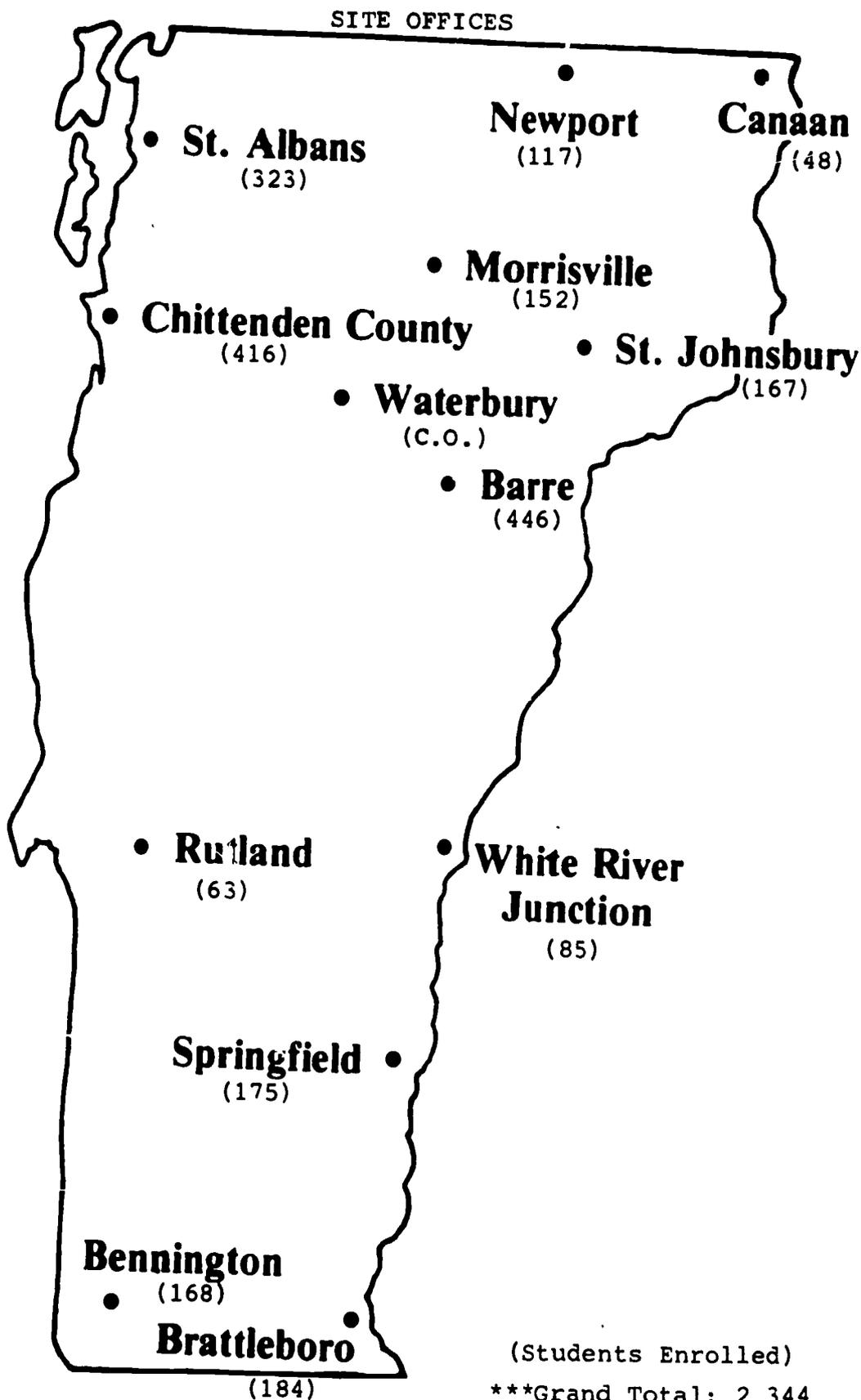
10. Storing course as well as topical information.

The general structure of the CCV data base system will include CONTENT, FORM, USE, IDENTIFICATION and ANNOTATION. Information will be entered and sorted in a variety of fields and a user manual will be prepared to ensure early success. The process will be structured to encourage an increasing sophistication in search strategies. In the ideal the system will have tutorial capacity.

Members of the Resource Task Force have developed a format to be used for entering data into the file. There now remains the task of collecting information currently on hand, entering the data, training the staff, and final implementation in each CCV site office. The staff is hopeful that the system will grow to be a useful and exciting learning tool for the entire college community. It will allow users to share "best teaching practice techniques" in standardized college courses throughout the state. Since the college's collections are particularly rich in books and articles related to current theory on adult learning, this material should be shared throughout the greater VSC system as part of CCV's continuing efforts to contribute as well as use resources in the larger network.

In addition to the publication of a library manual and development of a computerized resource file, the college is planning to build small reference collections in each of its site offices. Plans and funding for this project have been outlined in the VSC Task Force Report. It will be the next task of the Community College Task Force to plan for the selection and purchase of those collections as well as cataloging. Increased reference service is to include two reference librarians for the college.

Inclusion in the Vermont State College system's plans for library development has monumental implications for Community College of Vermont. Working alone to raise the funds for automation would make it impossible for the college to share in a state library network. Combining its efforts with four other colleges makes possible the impossible dream of securing the educational resources to provide equal opportunity throughout the state to all of the students who wish to take CCV courses. It means that instructors in small communities can do the research necessary to prepare for and teach their courses. It means that staff at a reasonable cost, and a minimal amount of inconvenience can work toward improving the college curriculum. In summary it means that the college community can work continually to improve the quality and quantity of its course offerings to those rural, disadvantaged Vermonters for whom the college was founded.

COMMUNITY COLLEGE OF VERMONT
FALL ENROLLMENT
as of October 12, 1984

SITE OFFICES

St. Albans
(323)

Newport
(117)

Canaan
(48)

Morrisville
(152)

Chittenden County
(416)

St. Johnsbury
(167)

Waterbury
(C.O.)

Barre
(446)

Rutland
(63)

White River
Junction
(85)

Springfield
(175)

Bennington
(168)

Brattleboro
(184)

(Students Enrolled)
***Grand Total: 2,344

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VERMONT STATE COLLEGES
CREDIT HOUR ENROLLMENT BY VERMONT COUNTY WHERE TAUGHT
FALL 1984

FRANKLIN 1,751

ORLEANS 1,005

ESSEX 27

GRAND ISLE 0

LAMOILLE 14,296

LYNDON STATE COLLEGE

JOHNSON STATE COLLEGES

CHITTENDEN 2,605

CALEDONIA 14,435

WASHINGTON 2,398

VERMONT TECHNICAL COLLEGE

ADDISON 160

ORANGE 11,485

CASTLETON STATE COLLEGE

RUTLAND 22,931

WINDSOR 1,355

BENNINGTON 984

WINDHAM 886
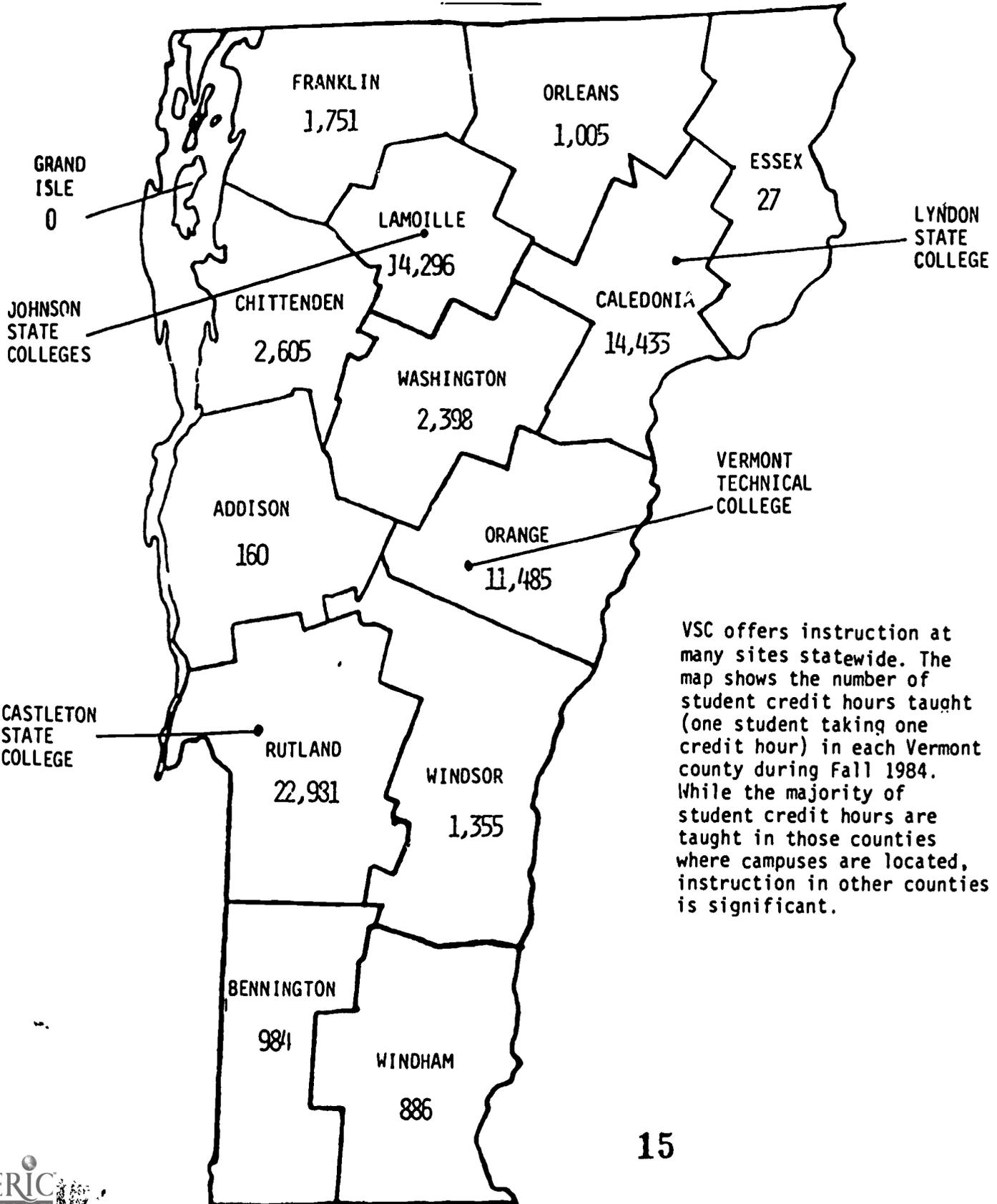
VSC offers instruction at many sites statewide. The map shows the number of student credit hours taught (one student taking one credit hour) in each Vermont county during Fall 1984. While the majority of student credit hours are taught in those counties where campuses are located, instruction in other counties is significant.

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