

***NORTH SHORE
REGIONAL COLLEGE STUDY***

tantalus research limited

***Dr. Walter G. Hardwick
Prof. Ronald J. Baker***

1965

Tantalus Research Limited

121 WEST 26th AVENUE, VANCOUVER 5, B.C. TEL: 683-1111

September, 1965

NORTH SHORE REGIONAL COLLEGE STUDY

tantalus research limited

SEPTEMBER, 1965

Dr. Walter G. Hardwick

UNIVERSITY OF BRITISH COLUMBIA

Prof. Ronald J. Baker

SIMON FRASER UNIVERSITY

RESEARCH ASSOCIATES

E.M.W. Gibson, M.A.

J.R. Wolforth, B.Sc., M.A.

R. Leigh, B.Sc (Econ), M.A.

H.S. Swain, B.A.

Tantalus Research Limited

Publisher - Vancouver, Canada



Tantalus Research Limited

741 WEST 26th AVENUE, VANCOUVER 9, B.C. — TELEPHONE 876-7928

September 1st, 1965

Secretary-Treasurer,
North Vancouver School District #44,
721 Chesterfield,
North Vancouver, B.C.

Secretary-Treasurer,
West Vancouver School District #45,
1735 Inglewood,
West Vancouver, B.C.

Dear Sirs:

We wish to present for your consideration the NORTH SHORE REGIONAL COLLEGE STUDY, commissioned in December 1964 by the Boards of School Trustees of School Districts #44 (North Vancouver) and #45 (West Vancouver). We were pleased to bring together the talents of Dr. Walter G. Hardwick, Professor Ronald J. Baker and the team of research associates, who produced this report.

This submission has been designed to answer the specific questions that prompted the School Boards to initiate the study. In addition it will provide pertinent general information regarding the present structure of the North Shore Community.

Yours very truly,



David F. Hardwick, M. D.
President,
Tantalus Research Limited

DFH:md

TABLE OF CONTENTS

RECOMMENDATIONS

1. A regional college will be desirable on the North Shore by September, 1968.
2. The College should offer a comprehensive program including:
 - an expanded academic program (only partially furnished at present in the Grade 13 program);
 - new program packages unique to the regional college; and
 - functions attractive to large segments of the North Shore population so that the College may assume the role of a focal point for the educational and cultural affairs of the community.
3. The College should be centrally located within the region on a site clearly and visually identifiable by North Shore residents.
4. We recommend that the participating School Boards should initiate a program of public education to inform the community of the need for, and the concept of, the Regional College.
5. We recommend that the School Boards should then petition the Council of Public Instruction for permission to hold a plebiscite to determine whether the voters of the North Shore favour a Regional College. A simple majority is required.

NORTH SHORE REGIONAL COLLEGE STUDY

TABLE OF CONTENTS

	<u>Page</u>
LETTER OF TRANSMITTAL	
RECOMMENDATIONS	
I. OPPORTUNITIES FOR POST HIGH SCHOOL EDUCATION FOR NORTH SHORE RESIDENTS	9
1. Introduction: The present pattern	9
2. The Role of the Regional College	10
II. THE CASE FOR A NORTH SHORE REGIONAL COLLEGE	13
1. A critical review of the Macdonald Report	13
2. Implications of the New Secondary School Curriculum	17
3. The College Population Pool	18
4. Distinctiveness of the North Shore Population	22
III. PROGRAM FOR THE NORTH SHORE COLLEGE	28
1. Curriculum considerations	28
2. The Academic Calendar	30
3. College Faculty	31
IV. COLLEGE LOCATION	33
1. General considerations	33
2. Six Sites	36
3. Recommendations	40
V. A PLAN FOR ACTION	42
APPENDIX - Survey Techniques	44

I. OPPORTUNITIES FOR POST-SECONDARY EDUCATION FOR NORTH SHORE RESIDENTS

1. Introduction: the present pattern

The North Shore will require Regional College facilities as early as September 1968. This prediction is based upon:

- (a) an analysis of the growth in numbers of students now in school, their abilities, and their probable educational goals;
- (b) a recognition of the fact that the new curriculum introduced in the secondary schools, creating six distinctive educational streams, will require post-high school facilities of a broader and more flexible type than are currently available in the universities or vocational schools;
- (c) the apparently insatiable appetite of modern business for trained personnel; and
- (d) the lack of an institution providing a broad spectrum of activities which is open to North Shore students.

A new college program has been initiated in the City of Vancouver which is designed to cater to the various demands generated by the new secondary school program. However, this College will not be open to graduates of the North Shore secondary schools during regular sessions.

The character of the community college with its mixture of academic and vocational training programs in an institution of considerable flexibility is discussed in Part I below. Part II is an argument for the establishment of a regional college on the North Shore. It includes a review of the Macdonald Report, an analysis of the particular qualities of the North Shore population and of the population pool for post-secondary education, and considerations of the changing nature of the secondary school curriculum. Part III discusses the regional college curriculum, and Part IV, the problem of college location.

Institutions for Post-High School Education. Several institutions offering programs beyond the secondary school level are well established in the Lower Mainland of British Columbia: the two Universities, the B. C. Institute of Technology, the Vancouver School of Art, and the Adult Vocational Institutes. Each has its own specialized functions, providing facilities for students with a variety of abilities and educational goals. The traditional institutions - the Universities and the Vocational schools - were designed for those destined for the professions, the skilled technical occupations, and the academic life. In the past, they have drawn from a small segment of the 18-22 year old population and this trend is likely to continue.

In recent years, it has become increasingly apparent that our society demands more training and education for ever larger sections of the population. This general increment in educational level does not necessarily mean that the need for university-trained people, with their commitment to discipline or profession, has increased greatly. It does mean, however, that the university population was swollen by students taking courses basic to many technical and sub-professional jobs in our society. For these sorts of occupations, some training beyond the secondary level in subjects such as statistics and language skills is very necessary. Increasingly, some introduction to the social sciences is mandatory for those destined for leadership roles in the community. No institution has been available in B. C. to meet these varied needs. Such an institution is the Community College as found in several of the United States, or across the Inlet in Vancouver; such an institution is appropriate for the North Shore.

2. The Role of the Regional College

The regional college is a new type of post-secondary institution introduced to British Columbia in Dr. John B. Macdonald's report, Higher Education in British Columbia. It is similar to the Junior College or Community College found in the United States, but its composition and functions have been modified to meet the conditions found in British Columbia. It is basically designed to offer a number of programs which will enable young people

- (a) to find careers in which their abilities will be challenged and which lead to responsible positions in the regional economy and society; and
- (b) to progress to other institutions where formal education can be continued.

The college also has two secondary but vitally important functions. It should

- (c) allow for the broadening and upgrading of educational levels among the community's adults, and
- (d) act as both a catalyst and focus for the educational and cultural affairs of the community.

The program for young people. The academic program, designed for students wishing a broad general education and/or transfer to the Universities, would replace the present Grade 13, now offered on the North Shore and add an additional year. In addition, the college would offer a number of programs leading directly to careers in the community. An example from the Vancouver City College is instructive. Under the general topic of business administration, courses are offered in accounting, finance and investment, salesmanship, and executive secretarial training. Each program requires courses in the student's specialty plus academic courses to broaden the background of general knowledge and technical training necessary to a successful career. Mathematics and English courses are usually required, as well as such varied offerings as Business Psychology or

the Economic Development of British Columbia. Classroom work is supplemented by technical and vocational programs at the Vancouver Vocational Institute and the Art School, both parts of the City College.

The range of programs will reflect the needs of the local community. In greater Vancouver, the largest increases in job opportunities are in the tertiary and quaternary phases of economic activity. As documented by a member of the U. B. C. - Urban Core Project,* these opportunities are largely concentrated in the distributional and service sectors and in the "extra-economic" activities, the catalysts of the modern economy (education, advertising, public relations and so forth).

The regional college, then, is designed to meet important needs of the regional economy as well as to provide for the personal needs of young people and the under-educated adults in the community. The college is not career-oriented per se, but should offer a wide range of subject matter that can be taken in various combinations to provide students with skills that fit a variety of occupations - not particular vocations or academic disciplines.

It is clear to us that the traditional programs offered in the universities are not appropriate to all young people of ability who graduate from secondary schools. On the other hand, it is also clear that most (69%) of the parents of children now in school on the North Shore expect their offspring to get a university degree. This expectation may not be appropriate. However, most of these students could benefit from some college education. The regional college ideally fits their needs insofar as it allows them to start on as strict an academic program as they can handle - testing their abilities without the penalty of early and irrevocable career decisions. Given proper counselling at the College and the increasing maturity gained in their college experience, they may scale their academic ambitions up or down to fit their abilities, or transfer to one of the variety of programs offered in the college that better suits their aptitudes and abilities. It has been documented at U. B. C. that students rarely have clear career goals when they arrive at University. The college experience and the range of opportunities available extends the information base on which students must make wise and realistic decisions regarding their future careers.

Programs for Adults. The Regional College is an adult institution, not an extension of high school. In this respect, it differs significantly from Grade 13. Because of its adult nature it provides for persons who left school early, an excellent means of upgrading their education on a full or part-time basis. That this "salvage" function is extremely important has been amply demonstrated at Vancouver City College. Hundreds of men and women are now satisfying long-dormant ambitions which had been cut off through early marriage, financial considerations, dropping out of high school, or other eventualities. With the expanding pool of

* J. R. Wolforth, Work-Residence Relations in Vancouver, (Unpublished Master of Arts Thesis, U. B. C. 1965).

knowledge and the need for frequent retraining, this function will be increasingly important in the future. Fully a third of the families responding to the questionnaire on the North Shore indicated a desire on the part of at least one adult to upgrade or broaden his education.

In many cases, the individual most desirous of upgrading is the wife and mother. The mothers of the North Shore have on the average considerably less education than their husbands. Many wish to broaden their education particularly in the humanities and social sciences. Beside the personal satisfaction, this upgrading trend has the important social consequence of broadening appreciation for education and social responsibility in the home, since the mother usually has the greater contact with the growing children.

A second major adult-oriented function of the community college might be called "education for leisure". As leisure time and disposable income, already high on the North Shore, continue their long-term upward trend, more and more adults turn to education either as an enjoyable leisure-time activity in its own right, or as preparation for some other leisure-time activity. This function is partly accomplished at present through adult education programs in the schools and through enlightened public library operations. However, it has been noted in the United States that in communities where a large number of people have university degrees, programs with academic content are very often desired, particularly in the humanities and social sciences. This demand stems from the large number of professionals and specialized academics who find, after graduation and immersion in a successful career, that they want some of the liberal education missed in their university days. Writing in Landscape in 1963, Philip Wager points to the economic importance of the "honourary producer" - the man or woman who through leisure-time training gains the skills and motivation to join the ranks of the do-it-yourself builders and hobbyists, stimulating to a surprising degree not only hobby shops, but construction material suppliers, metal shops and a whole wide range of enterprises.*

The College as a community focus. Less tangible, but not less important, is the potential of the college as a focal point for the cultural as well as for the educational life of the community. Such extra-curricular activities as amateur theatre, public lectures and panel discussions all enrich the community as a whole. The campus is a forum for public discussion of community and civic affairs. The community college is the modern version of the Greek agora and the Renaissance piazza: the meeting place of people and ideas, the physical catalyst that speeds the process of social innovation.

* See also "Doing Their Home Work", Newsweek, August 30, 1965, p. 67-70. The article, "Holiday U" Ibid., p. 74, is also of interest.

II. THE CASE FOR A NORTH SHORE REGIONAL COLLEGE

There was no provision in the Macdonald Report for a Regional College on the North Shore. However, on the basis of our analysis we believe there are sound grounds for the immediate reconsideration of some of the conclusions of his Report. Firstly, a review of the assumptions upon which the college priorities were assigned reveals that only gross data were considered. In particular it can be demonstrated that modifications in priorities set out in his report are clearly indicated by a more refined analysis of population numbers and characteristics. Secondly, the new Secondary curriculum instituted by the Department of Education since the report contains implications for post secondary education which could not have been foreseen at the time the Report was written.

1. A critical review of the Macdonald Report

In Higher Education in British Columbia,* usually called the Macdonald Report, Dr. J. B. Macdonald argued that the province should set up a series of two-year colleges. "I see the need for two basic kinds of institutions of higher education: 1. Universities and 4-year colleges offering degree programs and advanced training for those students who have the necessary ability and aptitude; 2. 2-year colleges offering a variety of programs of one or two years of education beyond Grade 12." ...

"Although I expect 2-year colleges to differ from one another in accordance with local needs, I believe that the differences will exist mainly in the non-academic areas of their work. Such institutions could attract very able students and professors by offering courses and facilities of distinctive character: Seminar education, small classes, interdisciplinary studies, close personal contact between professors and students, promotion based principally on accomplishments in teaching, and so forth".

To combine the ideal of providing suitable higher education for all students who can benefit from it with the ideal of equality of opportunity for all students throughout the province wherever possible, provision must be made in 2-year colleges for those students who want to transfer to a 4-year college or a university later on. A 2-year college, therefore, might be designed for those students who plan to continue their education at a degree-granting institution; those who wish to take only one or two years of higher education - technical, academic, or a combination of both; those who are undecided about their educational futures; those who are undecided about their educational futures; those who by preference or for financial reasons wish to remain in their own locality.

* J. B. Macdonald, Higher Education in British Columbia and a Plan for the Future, Vancouver, 1962.

Although each of these two-year colleges would have to design its program to meet the requirements of the area in which it is located, the objectives of 2-year colleges might include one or more of the following: (i) 2-year academic program for students who will either transfer to degree-granting institutions or will complete their formal education at this level; (ii) technological and semi-professional courses designed for students who want formal education beyond secondary school but do not plan to complete the requirements for a degree; (iii) adult education including re-education to meet the changing demands of technical and semi-professional occupations.

President Macdonald also made a specific recommendation for the Greater Vancouver area, namely, that there should be one two-year college serving all the municipalities. He predicted that in 1965-66 such a college might enroll 900 to 1,000 students in first year and 540 in second year.

Since 1963, however, a number of developments have occurred that make necessary a reconsideration of Dr. Macdonald's proposals:

- (a) It has become abundantly clear from the experience of incipient Vancouver City College that the public demand for a comprehensive community college (put forward in a number of briefs to Dr. Macdonald) has been justified. Whereas the Macdonald Report assumed that the two-year college would be fundamentally concerned with students with qualifications for university entrance, the Vancouver College, operating under the name of the King Edward Continuing Education Centre, discovered that there were a very large number of adult students anxious to obtain university entrance standards who were not catered for in the traditional night school program. Many of them were anxious to attend college during the day. Moreover, other students who had partial university entrance were anxious to complete it and continue. The enrollment figures for the King Edward Center in 1964-65, at which time it was giving only pre-university work and first year work, were as follows: 900 in Grade 13, and an additional 700 on secondary completion programs and partial Grade 13. Nearly 9,000 people attended late-afternoon and evening courses.
- (b) The demand for education as revealed above has also been justified in a number of publications relating facilities in higher education to economic growth.* It is increasingly well documented that an advanced society such as our own develops more and more jobs in the so-called tertiary occupations,

* For example, see: F. Harbison and C.A. Myer, Education, Manpower and Economic Growth, McGraw-Hill, New York, 1964; J.J. Stone, "Education and the Upper Midwest Economies", Upper Midwest Economic Study, Technical Paper No. 9, 1964; and E.F. Denison, The sources of Economic Growth in the United States and the Alternatives Before Us. Committee for Economic Development, 1962.

rather than in technological occupations. In other words, the kind of curriculum offered in a comprehensive community college, a curriculum combining the possibilities of traditional academic work with those of liberal education, and with those of sub-professional training, is particularly suited to train people for the areas where most jobs are available - jobs which in turn create more jobs. In advanced societies the rapidity of technological change also demands great flexibility in both the educational system and its students. It is no longer possible to provide a rigid academic program on the one hand, or a highly specialized technical or technological program on the other, and expect that most people will thereby be fitted for the rapidity of change in the working world.

- (c) The King Edward Continuing Education Centre has developed into the Vancouver City College, but it has a number of restrictions on the attendance of students from outside the City of Vancouver. Consequently, Dr. Macdonald's proposal is no longer feasible. Even if it were politically possible to make the Vancouver City College available to all students, its enrollment in 1964-65 indicates that one college is no longer enough, unless it were to be so large that most of the advantages of the community college would be given up.
- (d) It is now proposed that the Vancouver City College will be located on the present Langara Golf Course, a site relatively inaccessible from the North Shore.
- (e) As the survey makes clear, (map 4), the expectation of parents that their children should receive some college education varies widely from area to area - a fact that was not considered in Dr. Macdonald's proposals for the metropolitan area. The expectation of higher education is considerably higher on the North Shore than in other parts of the metropolitan area.
- (f) Similarly, it is now clear that the retention of students in secondary school, and in particular in the academic programs in the secondary school, varies from area to area. Again, retention is higher on the North Shore than was predicted for the whole area.
- (g) The steady increase in university fees has made it necessary to provide other avenues to higher education, especially for those students who are undecided about their academic interests or ability.
- (h) Although Dr. Macdonald's report clearly recommended that a new degree-granting institution in the Burnaby area should offer the more or less traditional academic subjects, it is certain that many people thought that Simon Fraser University would in fact provide avenues to higher education for students who were unable to obtain admission to the University of British Columbia or the University of Victoria. It is now abundantly clear, however, that the standards demanded and the admission requirements at Simon Fraser are fundamentally the same as those at U. B. C. In fact, it is hard to see how it could be a University if this were not so. Even if, as many people believe,

Simon Fraser is flexible in its admission policies, it is still fundamentally concerned with the traditional Arts and Sciences. It appears that it is likely to solve the problem which led to Dr. Macdonald's recommendation that it be set up, namely, that of taking the pressure of numbers from U.B.C. It is also clear that it will not serve as a community college in the sense in which community colleges are understood elsewhere. In fact, were Simon Fraser to satisfy some of the demand for community colleges, it would clearly be failing in its goal as envisaged by Dr. Macdonald.

- (i) Similarly the B.C. Institute of Technology, initiated by the provincial government before the Macdonald Report was published, has proved to be an invaluable addition to the spectrum of institutions of higher education in the province. However, our need for it and its success do not mean that we do not need less specialized institutions. We need technologists very badly, but we need a committant, and perhaps even larger, increase in training for people in the service industries.
- (j) The pamphlet "The Role of District and Regional Colleges in the British Columbia System of Higher Education", published by the Academic Board in January, 1965, clearly accepts the implication of a wider function for the two-year college than the enrollment predictions in the Macdonald Report indicate. The pamphlet points out that "some students who do not meet the stipulated requirements for entrance to a university may, by successfully completing a college academic program, prove their suitability for continuing their education at a university". It also says that "students who transfer from one college program to another would be required to make up any deficiencies in their secondary school subjects by taking college pre-requisite courses. Such pre-requisite courses should not duplicate those of the secondary school curriculum; they should be more intensive, cover a wider scope and progress more rapidly than those at the Grade 12 level". It goes on to say that "because college courses are required by statute to be at a post secondary school level, there is a clear distinction between college technical programs and those given in vocational schools. Some of the courses in a college may be in fields that are similar to some in a vocational school, but they will be at a more advanced level, and will include subjects that encompass border fields of study". In other words, the Academic Board implies that students may well go on to a community college from secondary school programs other than those traditionally leading to university. If the present reorganization of the secondary school system is successful, the number of students taking the purely academic program leading to university entrance should drop relative to the total number of high school students. There is no reason to doubt, however, that many students who in the past would have taken university entrance programs, but who in the future will take one of the other possibilities, deserve, and will profit from, post-secondary education.
- (k) The Academic Board also pointed out in its pamphlet that the two-year colleges should meet the "broad educational demands of the communities they serve". It maintains that "a college should reach out into the community to

extend its educational scope and to make use of the college's facilities and resources for all who can benefit. Such programs usually include: late afternoon and evening courses for credit in the various college programs; non-credit seminars, institutes, workshops and conferences for persons in various professional and occupational fields; lecture series on topics of current interest, and so forth".

To point to the above reasons for a reconsideration of Dr. Macdonald's plans is not to criticize his report. In the first place, the principal authors of this present study were both involved in its preparation and strongly supported it when it was published. Secondly, a number of the points made above are quite clearly beyond the prescience of anyone writing in 1962. The enrollment predictions given in the Macdonald Report are based on the assumption that two-year colleges would cater to the student who had achieved university entrance standing. However, the statement of the purpose of the two-year college, which we quoted on page 13 quite clearly shows that Dr. Macdonald saw some extension of the traditional academic programs as desirable, and also saw an important part of the work of a two-year college as being in adult education. What was impossible to see until the Vancouver City College demonstrated it, was the extent of the demand for pre-college and partial-college training on a full-time basis during regular day-time hours by adult students.

The admirable and unprecedented speed with which the Provincial Government acted on the Macdonald Report has already demonstrated the need to extend facilities in higher education to match the implications in Dr. Macdonald's description of the two-year college.

2. Implications of the New Secondary School Curriculum

Students entering Grade 10 are now required to select a course of study from six new and distinctive programs. As in the past the academic and technical programs are most popular and will normally lead students toward a university program in a special discipline or to the B.C. Institute of Technology. Others, such as the Community Service, Visual and Performing Arts, Commercial, Industrial and Special programs must lead towards the regional college if they are to be widely accepted. Mr. Dean H. Goard in "People, Education, Labour and Natural Resources" in Inventory of Natural Resources of British Columbia (1964) sounds a warning that large expenditures in training teachers and equipping classrooms for the new programs will be wasted unless some post-secondary programs are initiated. Clearly the comprehensive regional college envisioned in this report will offer students a chance for college training as well as a chance to specialize in programs that satisfy the range of talents and abilities of the population. The narrow exclusively academic programs are not appropriate for the majority of college students.

3. The College Population Pool

In predicting the enrollment for a Regional College three stages of analysis are necessary: (1) predicting the number of 18-year olds, (2) determining the propensities for higher education, and (3) estimating the pull of existing institutions.

Growth in School Populations. Both of the North Shore School Districts have recorded sharp annual increases in school population. According to enrollment statistics supplied by the Boards,* growth rates at different levels and in different areas show distinct variations.

In North Vancouver since 1961, nearly all the growth can be accounted for by:

- (a) an increase in the size of the Grade 1 group, and
- (b) a greater retention of students in the high schools.

In the intermediate grades, groups moving from grade to grade show only modest fluctuations (See Table 1). Increases at intermediate levels in North Vancouver are rarely over 1 per cent per year. The explanation of this pattern lies in the nature of the families who are immigrating to North Vancouver. Generally, they are very young families who are purchasing their first houses and who intend to stay in their relatively inexpensive subdivision homes for several years. This hypothesis is supported by the answers given to the questions in recent and planned movements on the questionnaire.

In contrast, West Vancouver's classes grow as they move up through the grades, increasing most rapidly in the intermediate and secondary years. As one official noted in conversation, "West Vancouver is the only school district in B.C. with 115 per cent retention through high school." This seeming paradox indicates one of the major differences between North and West Vancouver. A home in West Vancouver is a favoured destination for the family that has already established an equity elsewhere. It takes considerably more money to move into West Vancouver; consequently, families are older. The influx is noted in the schools in the form of sharp inflows of students in the senior grades. It should be noted that this trend seems to be taking shape in the northwestern areas of North Vancouver also.

Reports of the North Vancouver District Planning Office for the School Board** assess the population growth that can be expected in the next decade. In West Vancouver, studies are currently underway to predict the increases in the number of

* North Vancouver School Board meeting, 26 October, 1964; West Vancouver School Board meeting, 9 November, 1964.

** School Report, 1962-63, Part I: The Western Areas, and Part II: The Eastern Areas. Also the report, Prospects for Growth 1963 by the Planning and Property Department of the District of North Vancouver, deals specifically with this topic.

schools and classrooms required to meet anticipated growth in the upper sections of central and western areas. From these reports, a map (Figure 5) has been prepared for this study showing the actual distribution of Grade 1 children in 1965 and the predicted distribution for an "ultimate" population level, perhaps to be attained by 1980. It indicates that several areas along and above the Upper Levels Highway in West Vancouver will be occupied, whereas substantially greater numbers are expected to move into the eastern sections of North Vancouver. At this date there is no indication whether the proposed Cypress Bowl development by Alpine Outdoor Recreation Resources Ltd. will have appreciable effects on the distribution of population in West Vancouver. The dating of this anticipated population distribution is only approximate. It is clear, however, that West Vancouver is likely to remain the favoured destination for those experiencing upward social mobility. A comparison of Figures 5 and 6 will indicate how radically the retention pattern is expected to shift from Grade 1 to college freshman levels.

Eighteen-year-olds make up the freshman class in most colleges. Therefore, in predicting college enrollments, the number of eighteen-year-olds in the population is used as a base for statistical analysis. The size of the freshman class is expressed as a percentage of this eighteen-year-old group. In the studies prepared for Dr. Macdonald, it was noted that the freshman class would total 42 per cent of eighteen-year-olds in western Vancouver as compared to 21 per cent of those in western Fraser Valley. Not all eighteen-year-olds will attend college. Some of the freshmen may be bright sixteen-year-olds who have been accelerated through school while others may be adults returning to complete their education. Nevertheless the propensity figures indicated above hold true.

The eighteen-year-old populations for 1968, 1972, and 1976 have been projected from students in grades 9, 5, and 1, in 1964-65. Growth rates for North Vancouver are estimated to be 1 per cent per annum (i. e. the five year average), while rates for West Vancouver vary between 3 and 10 per cent depending upon the grade level. There is little reason to expect sharp divergencies in these rates of growth between school districts. There could be changes in the general rates of growth depending upon changing economic conditions.

Nearly 2,000 eighteen-year-olds will be living on the North Shore in 1968; 2,400 in 1972; and nearly 3,000 by 1976.

TABLE 1

Enrollment Changes

North Vancouver

<u>Year</u>	<u>Grade</u>	<u>Enrollment</u>	<u>Percent Average</u>	<u>Grade</u>	<u>Enrollment</u>	<u>Percent Average</u>
1964	9	1,236	+ .7	5	1,508	+1.5
1963	8	1,227	+2.9	4	1,488	-3.2
1962	7	1,192	+2.7	3	1,538	+1.6
1961	6	1,161	-1.2	2	1,513	-2.6
1960	5	1,175		1	1,554	

1959	4	1,164				
1958	3	1,153				
1957	2	1,159				
1956	1	1,158				

Increase averages less than 1 per cent per annum 1960-64.

West Vancouver

1964	9	539	+2.9	5	551	+6.6
1963	8	524	+5.0	4	517	-0.5
1962	7	499	-1.8	3	520	+5.7
1961	6	508	+2.8	2	492	+5.3
1960	5	494		1	467	

1959	4	499				
1958	3	465				
1957	2	468				
1956	1	424				

Increase averages 3 per cent per annum, 1960-64.

The propensity for higher education on the North Shore is very high. This is clear from the record of student performance in the secondary schools, the record of past graduating classes, and from the survey of goals parents presently hold for their children.

The majority of students in secondary school choose academic or university programs. The percentages are extremely high in West Vancouver. Most of the secondary school graduates either go to University or enroll in Grade 13. A few choose the B. C. Institute of Technology, Nurses' Training, the School of Art or other post-secondary institutions. Each year a decreasing percentage is going directly to work from secondary school. Sixty-nine per cent of parents replying to the College questionnaire expected that their child would receive a university degree. The opening of a college will encourage students to stay in secondary school and participate in a college program.

These records lead us to predict that something over fifty per cent of the eighteen-year-olds in North Vancouver would attend college by 1968 while eighty per cent of eighteen-year-olds in West Vancouver would attend. This takes into account high school drop-outs, and the various terminal programs in the secondary school. Not all of these students will attend a North Shore College, but the percentage of eighteen-year-olds participating in college programs on the North Shore would certainly increase as the college opportunities become known. The influence of the college will be greatest on those living in the low-propensity areas of North Vancouver, in view of the already close-to-saturation propensities elsewhere.

The Regional College will absorb immediately the Grade 13 students (a group which has only slightly declined in 1965 even with the opening of Simon Fraser University). About 10 per cent fewer students will attend University. Many students with indefinite goals will attend the Regional College, and through proper counselling be directed into useful and satisfying programs. A number of adults will attend the College full-time either to broaden or to upgrade their education.

Through this analysis we predict an F. T. E.* freshman class of 800 in 1968, 1,050 in 1972, and 1,700 in 1976. Probably 60 per cent would return for second year. (See Table 2).

* F. T. E. meaning "Full-Time Equivalent", is a figure condensing partial enrollments into a standard form for calculating space-cost indices. In this report F. T. E. enrollments do not include late afternoon and evening programs.

TABLE 2

PROJECTED COLLEGE ENROLLMENT:

North Shore Regional College

	<u>1968</u>	<u>1972</u>	<u>1976</u>
Freshmen	-	1,050	1,700
Second Year	-	600	1,050
	<u> </u>	<u> </u>	<u> </u>
Total (F. T. E.)*	800	1,650	2,750
	<u> </u>	<u> </u>	<u> </u>
Late Afternoon and evening**	2,400	4,100	8,200
	<u> </u>	<u> </u>	<u> </u>

* Method of calculating full time student body is discussed in text.

** Studies of Community Colleges in the United States suggest that in communities like the North Shore the number of persons attending regular classes in late afternoon and evening classes is about three times the daytime population. This figure does not include lectures, concerts and other special programs. See publications of Educational Facilities Laboratories Inc. of New York, New York.

A North Shore Regional College could open its doors in 1968 with a daytime enrollment of some 800 students, a student body sufficiently large to launch a full comprehensive 2-year college program.

4. Distinctiveness of the North Shore Population

The residents of North and West Vancouver have some of the highest average levels of education and income to be found anywhere in Canada. More managers and professional people make their homes on the North Shore than in any other section of the metropolitan Vancouver region, with the sole exception of the south Shaughnessy area of Vancouver. Although variations in occupations are not easily gleaned from the Census (which does not identify District Municipalities as incorporated urban places), there is no doubt that the municipalities of the North Shore contribute many of the pacesetters of our society. The potential benefits to our economy and society will be impressive if the young people of these communities are given full and adequate education.

Reliable data on the social and economic characteristics of the North Shore population are not available. While income statistics are published in the Census, most other indices of social class are not recorded, except for the City of North Vancouver. To compensate for this lack of data, the regional college questionnaire was devised. The questionnaire was designed to find out how people perceived themselves, their community, and their mobility within it; specifically, data were collected on the particular family and child. A copy of the questionnaire and an account of survey techniques are included in the Appendix.

Although there are tendencies towards high social status* in all areas of the North Shore, the concentration varies from place to place. The identification of this variation is critical in planning the location of the regional college. Four maps have been prepared, illustrating in general terms the regional variation in socio-economic status. It will be noted that the maps summarize data about the families of children in Grade 5 only. This group is the potential freshman class of 1972, and was selected for presentation because it represents a medial picture between elementary and secondary school levels.

Occupations. (See Figure 1) Half of the responding families indicate that the father is a manager - a startlingly high figure considering that it is roughly four times the metropolitan average. Furthermore, managers tend to be concentrated in the residential districts adjacent to the Capilano River and in Lynn Valley. This is not to suggest that managers are not numerous elsewhere, rather that many more are localized in these particular areas.

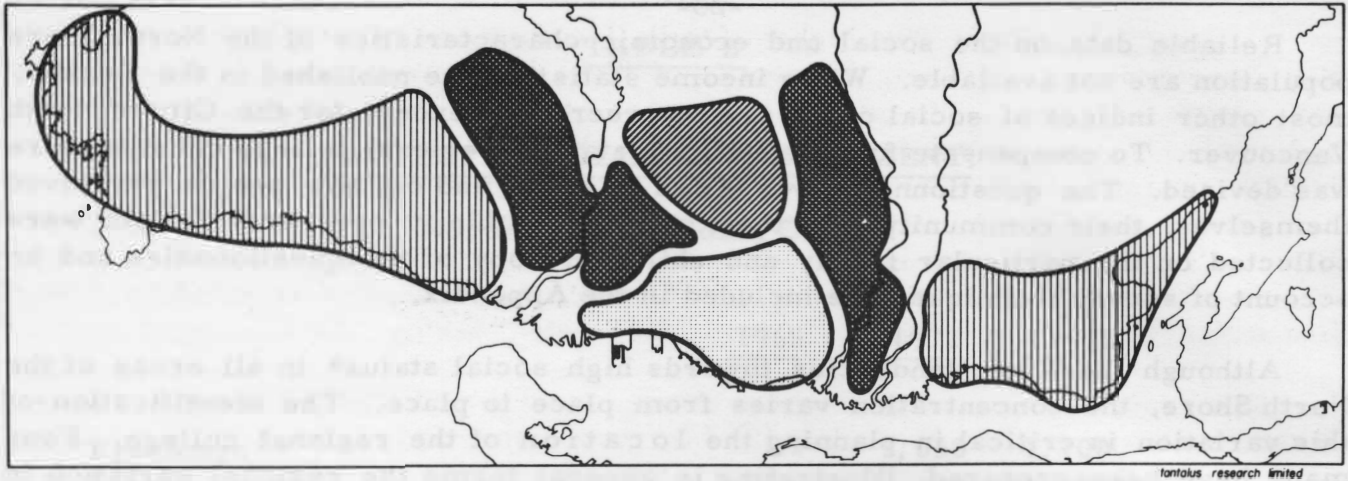
One-fifth of the fathers are classed as professional: doctors, lawyers, engineers, architects, teachers, clergymen and the like. The figure rises to one third in the central and western sections of West Vancouver and in the eastern sections of North Vancouver.

In the Delbrook and upper Lonsdale areas of North Vancouver, a mixture of occupations is encountered. Sales personnel, managers, and professionals are found in approximately equal percentage, with sales slightly predominant.

In the lower levels of North Vancouver, the Norgate area, and in the older sections of the City of North Vancouver, sharp rises are noted in the number of craft and trade occupations.

The number of fathers reporting managerial and professional occupations is very much higher on the North Shore than in metropolitan Vancouver as a whole. For the entire urban region, in 1961, 13.4 per cent of the labour force was in managerial occupations and 9.4 per cent were classed as professionals.

* While it would perhaps have been instructive to measure class on one of the sociologists' index scales (Blishen, for example), neither the Census material nor the questionnaire provided sufficiently complete data.

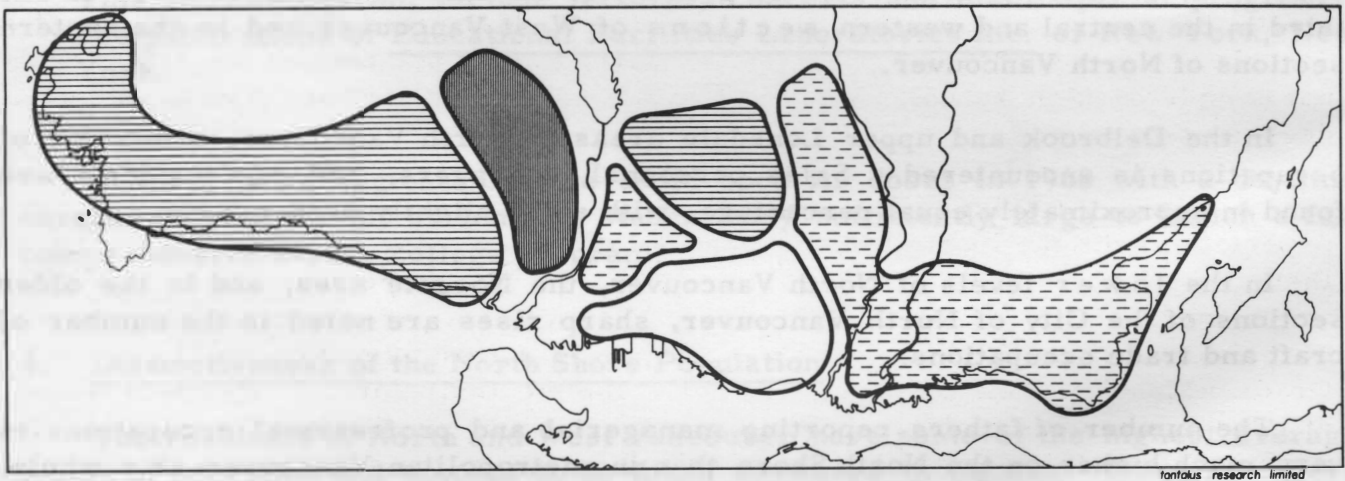


OCCUPATIONS - of fathers of Grade 5 children. Shadings represent significant deviations from the North Shore average



- | | | | |
|---|------------------------------------|---|---------------------------------------|
|  | predominantly managerial |  | sales and professional |
|  | professional and mixed occupations |  | crafts, trades, and mixed occupations |

North Shore average: managerial 58%; professional 19%; crafts and trades 11%; sales 8%; others 4%

Figure 1



FAMILY INCOME - among parents of Grade 5 children

- | | | | |
|---|---------|---|-----------|
|  | low |  | high |
|  | average |  | very high |

North Shore average: \$9,460

Figure 2

Income. (Figure 2) The highest family incomes are reported for the Sentinel Hill-British Properties neighbourhoods of West Vancouver, where 75 per cent of the respondents to our questionnaire indicated a household income exceeding \$12,000. The central and western sections of West Vancouver indicated moderately high incomes, as did the families in Delbrook, Capilano and Lynn Valley, averaging in the \$8,000 - \$10,000 range. In contrast, in the Norgate area below Marine Drive, the majority of the households indicated incomes in the lowest two divisions of our questionnaire. The majority of the families in the older areas of the City of North Vancouver have incomes between \$4,000 and \$6,000.

The concentration of high income groups as well as responsible occupations in West Vancouver and the upper levels of North Vancouver is striking.

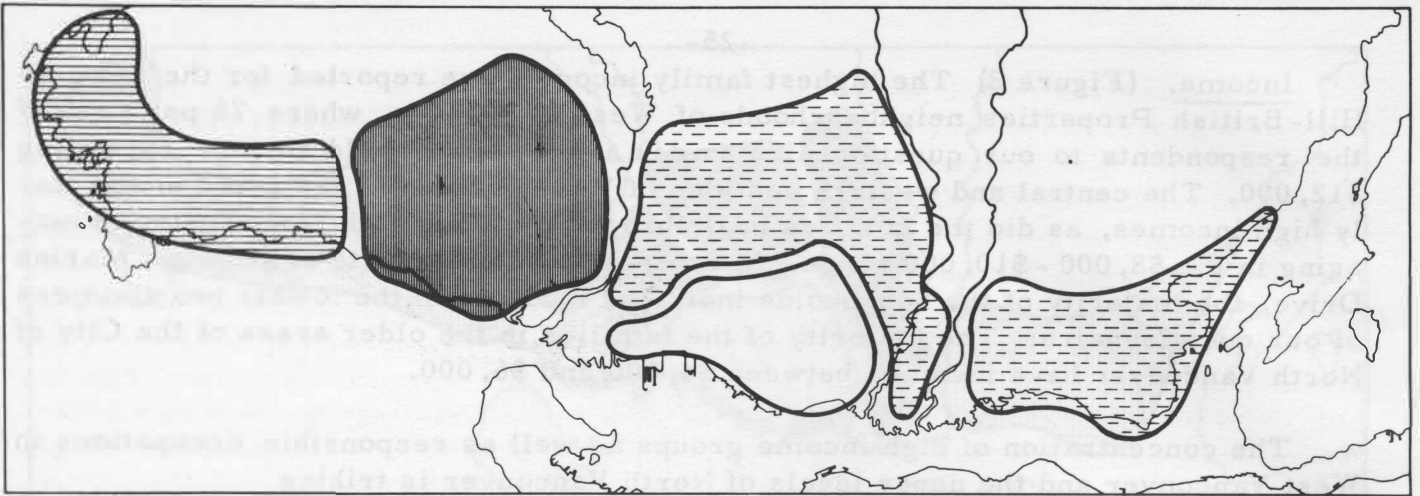
Father's education. (Figure 3) Thirty per cent of the fathers responding to the questionnaire indicated that they had less than high school graduation. An additional 18 per cent had completed high school and had had no further formal education. On the other hand, roughly 47 per cent indicated that they have partial university degrees. This is much higher than the average for the male population in greater Vancouver as a whole.

The areal variation in father's education follows similar patterns to those observed on the other maps. Nearly 75 per cent of the fathers in the Sentinel Hill-British Properties areas hold one or more university degrees. In other sections of West Vancouver, the proportion who are university trained is relatively high. In sections of Lynn Valley, Delbrook and Capilano, most fathers indicate high school graduation plus some specialized training or partial university. In each of these cases, less than the average number indicate a full university education. In contrast, the regions around the Norgate, Queen Mary and Westview Elementary Schools are areas wherein approximately forty to fifty per cent of the fathers have not completed high school. Very few, if indeed any, fathers with a university degree reside there.

Educational Goals. (Figure 4) While some might cavil at including parental expectations for their children's education as an indicator of social class, nevertheless we feel it highly germane here. This is really the primum mobile of the argument; social class is its explanation. North Shore parents expect a great deal of their children. On the average, they expect that 69 per cent (71 per cent in Grade 5 alone) of their offspring will not complete their formal education short of at least one university degree. While these are likely ambitious expectations, they are well above the metropolitan average and far above the average for the Province as a whole.* Again, the areal variation within the region is significant. Expectations are highly correlated with the three variables treated above.

In summary, we have used four indices of socio-economic status to indicate

* At present less than 20 per cent of the 18-21 year population attend University in British Columbia.

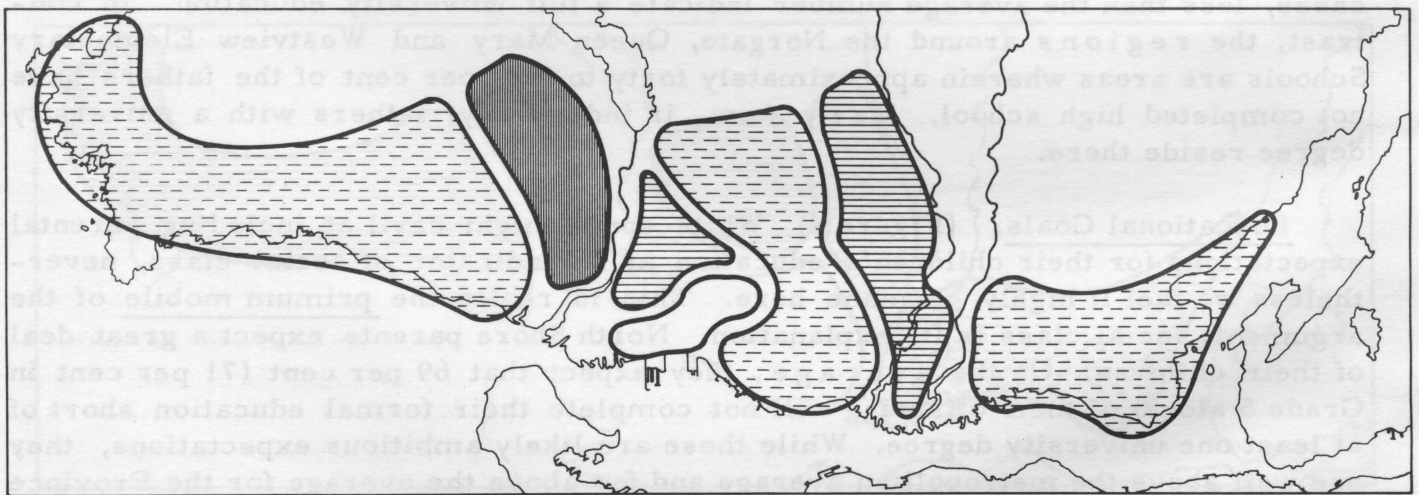


tantalus research limited

FATHER'S EDUCATION: Shadings indicate characteristic level of education attained by fathers of Grade 5 children




- | | | | |
|---|---|---|---|
|  | Most fathers have less than Grade 12 |  | Most fathers have partial university or other post-secondary training |
|  | Most fathers have secondary school graduation |  | Most fathers have one or more university degrees |

Figure 3



tantalus research limited

EDUCATIONAL GOALS: Parents of Grade 5 children who expect their children to attain a university degree

- | | | | |
|---|------------------------|---|--------------------------|
|  | much less than average |  | higher than average |
|  | average |  | much higher than average |

North Shore average: 69%

Figure 4

the unique qualities of the people and the spatial localization of social groups on the North Shore. The residents of the Sentinel Hill-British Properties area show up consistently with the highest incomes, highest levels of education among parents, highest expectations for offspring, and probably the most responsible occupations. Neighbourhoods in central and western sections of West Vancouver, in the Capilano, Delbrook, Forest Hills, and upper Lonsdale areas of North Vancouver are intermediate with respect to levels of education and income. Occupational structures are more varied in those areas. Slightly lower on the composite rating are the areas from Lynn Valley to Deep Cove. Residents of Norgate, Westview and the older and lower levels of the City of North Vancouver consistently show up as having on the average less education and income, and having jobs rated lower on the social scale. Their expectations for their children are correspondingly less ambitious.* The correlation between the education of the father, income, and social class is dramatic, and underlines the basic assertions of Professor John Porter in his recent book, The Vertical Mosaic.

The population of the North Shore approaches that of many regions of interior British Columbia, a fact often obscured by the immensity of the population on the Lower Mainland. The North Shore could base its demand for a Regional College on this simple fact alone. However, a more detailed analysis of the propensities for post-secondary school education, in showing that the potential numbers of college students on the North Shore to be unusually high, reinforces the need for college facilities. Further a socio-economic analysis of the North Shore stresses the distinctive character of the population and accounts in part for these high propensities. Although these facts were obscured in the general analysis of higher education needs by Dr. Macdonald, they must be taken into account in assessing the distinctive needs of the North Shore region for Regional College facilities.

* Age effects. As a footnote, it is interesting to note that there were variations in responses by parents with children in Grades 1 and 5 as against Grades 9 and 12. For example, there are more fathers with university degrees among the parents of the younger children. This is as expected in the light of the tendency towards a longer stay in school in recent years. Conversely, there are increasingly few parents with less than secondary education among the younger adults. In terms of income, there are relatively constant percentages of parents in each bracket for the several age groups, indicating that the older parents, whose children are in secondary school presently, are relatively less well off - again, a phenomenon not uncommon in a society with rapidly rising real incomes. Mean family income among all respondents varied between \$9,000 and \$10,000, the amount increasing with the age of the children. Nearly 60 per cent of the families of the North Shore earn more than \$8,000.

III. PROGRAM FOR THE NORTH SHORE COLLEGE

1. Curriculum Considerations

The College curriculum must be designed to meet the young person's need for general education and specialized training, and also the community's need for an efficient and appropriate labour force and informed citizenry. Since student and community needs change, the college program must inherently be flexible. This flexibility can be assured only if the distinctions between curricula in the Regional College, the University, and the adult vocational school are clearly understood, and appropriate programs are instituted.

The University curriculum is sequential in nature - that is, each year's courses are prerequisite to the next. The end result is competence in a disciplined field of knowledge.

The Regional College curriculum on the other hand offers a group of different, possibly unrelated, courses which in combination provide both skills and background knowledge for general proficiency in sub-sectors of an increasingly complex economy.

The adult vocational schools offer training in specific skills: logging, for instance, or welding.

The Regional College will offer an academic program leading to 'transfer' after the second year to one of the Universities. It may offer some vocational training. However its major role will be to provide the more comprehensive programs leading to employment in any one of a group of related occupations. At University a student would take, say, Mathematics 100, 200, 300, 400 over four years. At the Regional College the student could take Mathematics 100 along with courses in language skills, data processing, economy of British Columbia and Social problems in Canada in preparation for a business diploma. The student is then neither confined to a particular trade or within a particular academic specialty; rather he is fitted to seek employment within a fairly broad range of related occupations.

Academic "transfer" Programs. One function of the College will be to provide the basic subjects given in first and second year Arts and Science at the Universities. As President Macdonald pointed out in his Report, however, it is not necessary that the particular courses be identical with those at the universities. In fact, now that the course programs at U.B.C., the University of Victoria and Simon Fraser are developing differently, it would be impossible to match courses with those of the three Universities. The degree to which individual courses will correspond closely to those at university in subject matter will vary with the nature of the subject. In subjects in which, at this level, there is general agreement on what should be taught, and on the necessary and inevitable sequence of what should

be taught - such as chemistry, physics, mathematics - it is likely that the college courses will be quite close to those at the universities. In subjects which are not so organized, however - English, history, sociology, for example - it is better that the college should choose staff with good qualifications and allow them to develop the courses they think best for themselves. They, like all the department heads, would be well advised to discuss with the various universities the courses they propose, but they should be prepared to make their own decisions in the belief that they will do best that which they are most enthusiastic about.

It should be recognized that it would be unwise and uneconomic for a two-year college to try to provide courses comparable with all of those given at the universities. Provided the college gives the basic courses, students will be able to transfer to university in the main areas of study.

With those reservations, it is likely that the college would want to offer first and second year university courses in economics, English, geography, history, psychology, sociology, modern languages, mathematics, biology, chemistry and physics. In the beginning it is probable that one or two modern languages would be sufficient.

Programs peculiar to the Regional College. It is very much more difficult to advise on that part of the curriculum distinctive to the Regional College than on the purely academic. There is a strong tradition of what constitutes the basic subjects in academic programs; not so in other fields. These others, it should be noted, are not necessarily technical. Some authorities refer to them as "sub-professional", in that graduates perform somewhat less complicated tasks in business and government than the professionals, who are presumably graduates of university academic and professional schools. Normally, a student enrolled on "college" programs would take some core academic subjects, probably in language, mathematics, and social science, plus special courses in fields where employment will be sought, such as business management, accounting, marketing, advertising, and computer methods. Courses in communications, such as journalism, radio and television, photography and graphic arts will also be appropriate. Furthermore, while the demand for more highly specialized technical training may be largely satisfied by the B. C. Institute of Technology, it seems likely to us that the college administration might work with local public and business institutions to develop joint training courses.

The college should provide a wide range of courses designed for the partial student. These will develop from the basic departments, but will almost certainly need to be supplemented by courses relating to the fine arts, music, theatre and recreation. The increased leisure of today has created considerable demand for such courses. Many of them can be taught in the evening by part-time instructors. and many of them need not be repeated every semester. These programs do not significantly increase capital costs, since they represent only greater utilization of buildings needed for daytime use. If the college faculty is alert, it will sense the needs of the community and provide a centre for adult education and recreation.

The 'salvage' function. The college should incorporate into its program the adult secondary school programs currently offered by the school districts. This invaluable service allows individuals, who dropped out of school, an opportunity of completing their secondary school education in a mature adult environment.

In conclusion it cannot be emphasized too often that one of the major functions of the college is to provide comprehensive programs of mixed academic and non-academic nature. It is easy to staff and organize academic programs because there is relatively little room for radical departures from the programs of existing universities. Given the ease of setting them up, and frequently their relative cheapness compared with technical programs, it is easy to imagine that a college administration might be seduced into concentrating all its initial efforts on the academic programs. It would be disastrous if this occurred however. The great opportunity for the college to serve the community will be seized most avidly by those who have the imagination to develop the technical and sub-professional programs so badly needed.

2. The Academic Calendar

Any regional college will be faced with a decision as to what calendar it should operate on. The choice of calendar is very important and is closely related to curriculum. One of the great advantages of the regional college is that it allows students to discover their interests and abilities, and switch where necessary to subjects for which they are better suited. This is best accomplished by having the year divided into several parts. In Canada most universities operate on an academic year, from September to May. Simon Fraser University has adopted a trimester system in which the year is divided into three terms of sixteen weeks. Two semesters of sixteen weeks equal the traditional academic year. Many American colleges use a quarter system, wherein three quarters are normally taken to represent the traditional Canadian academic year, although in fact, the students spend nearly a month longer at their studies.

Arguments about the virtues of the various systems abound. The quarter system has a slightly longer year and may be particularly suitable for students who are undecided about their academic goals, just as the slightly longer year of the traditional Grade 13 in British Columbia has given students an opportunity they may miss at university to settle better into their studies. The great flexibility of the quarter system arises from the fact that students can gradually "find themselves" academically. They may begin by believing that they are bound for university and thus take a traditional academic program. As they discover that either their interests or their talents do not justify their continuing such a program they may switch easily into a combination of academic and sub-professional courses.

On the other hand, there would be advantages in a trimester system. It fits the traditional academic year and the trimester system at Simon Fraser and Vancouver City College somewhat better than the quarter system; moreover, many people believe that the four-month semester is a better unit pedagogically than the

three-month quarter.

We would not recommend firmly either the quarter or the trimester system. We would leave such a decision to the Regional College Council. We would, however, strongly advise against the traditional University academic year. If students must register in September and pursue the courses they have then chosen for a full year at the very least, many of them will drop out; others will succeed, but only at the cost of boredom or anxiety. It is most important that students now be given the flexibility of shorter units of time. It is not a matter of making courses easier for students; there is no reason whatsoever why two or three courses in succession in a subject should not be at least as difficult as a course covering the same amount of material but lasting for one year. It is rather that one of the key functions of a community college is to enable the student to discover his academic and professional interests. He can do this best if he can switch rapidly in his early years.

3. College faculty

The Academic Board has published statements regarding qualifications of academic faculty for regional colleges.* The Board stresses the importance of recent training in graduate schools for academic posts. No clear guidance is given for faculty with technical competence, but similar principles surely apply.

Judging from the experience of Simon Fraser University and Vancouver City College, there should be little difficulty recruiting faculty for a North Shore College. The establishment of a college in a high-income suburb of a major metropolis within a few miles of a major university should appeal to many qualified individuals. The Lower Mainland, in an area particularly well endowed with environmental amenities, has never had difficulty attracting people of intellectual and aesthetic sensibilities.

The selection of faculty, particularly of Principal and departmental Chairmen, will be crucial to the success of the college. These individuals, the pacesetters of the college, must represent and interpret the essence of the North Shore community. In a new kind of institution, they are the innovators. Ultimately, they alone are responsible for making the college an exciting place to study and work.

* "Memorandum to Boards of School Trustees who are considering Establishment of School District or Regional Colleges", August 1964 (signed L.R. Peterson, Minister of Education), p. 2.

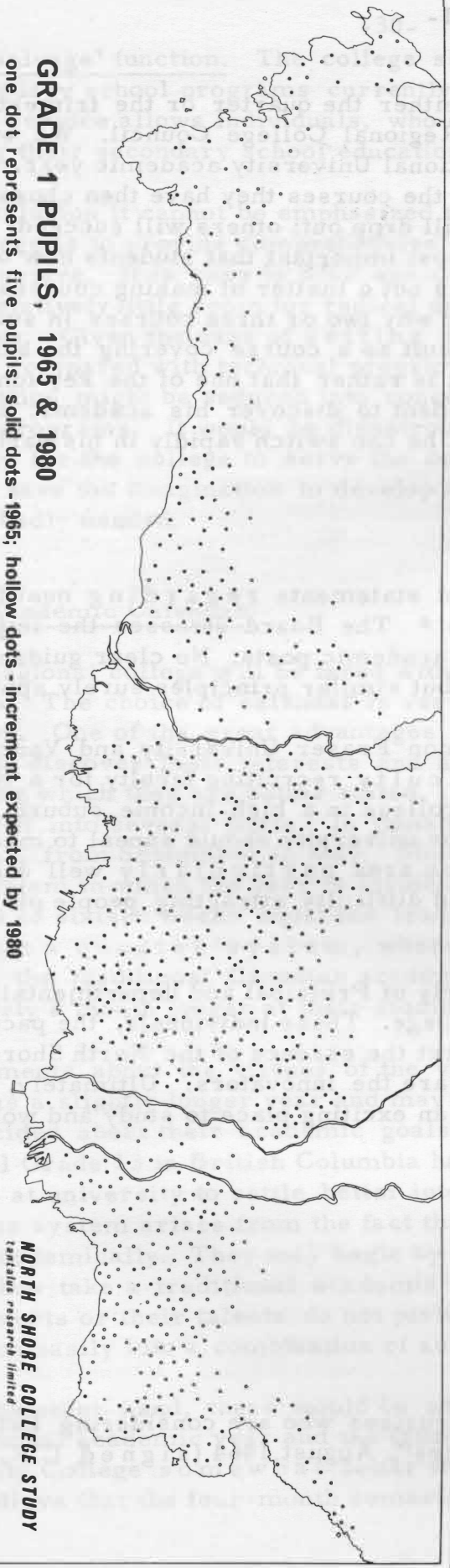


Figure 5

GRADE 1 PUPILS, 1965 & 1980
 one dot represents five pupils: solid dots - 1965; hollow dots - increment expected by 1980

NORTH SHORE COLLEGE STUDY
 Lanfains research limited

three-month quarter

and started looking at the family
 We would not recommend family
 We would have such a relation to the
 west, although advice against the traditional Unitarian
 most regular in September and attend the courses
 year at the very least, many of them
 the cost of education is about 10%
 the point of shorter work of time, the
 the fact that it is the reason why they
 a subject should not be at least an all
 of material and looking for the
 community could be to make the
 social interest. It can be the best
 by a team which makes the

3. College faculty

The Academic Board has pushed
 academic faculty for regional college
 and not looking in graduate schools for
 of faculty will reach a plateau
 of faculty in the 1980s
 looking for a better faculty
 faculty from the 1980s
 College would be able to
 looking for a replacement of a
 continue to give a low level of a
 faculty. The last 10 years, the
 regional colleges, the best
 and academic excellence

The selection of faculty, particularly
 will be crucial to the success of the
 college. First, reputation and
 low level of faculty
 the responsibility for giving the college
 and a high level of faculty
 and academic excellence
 the selection of faculty, particularly
 will be crucial to the success of the
 college. First, reputation and
 low level of faculty
 the responsibility for giving the college
 and a high level of faculty
 and academic excellence

the selection of faculty, particularly
 will be crucial to the success of the
 college. First, reputation and
 low level of faculty
 the responsibility for giving the college
 and a high level of faculty
 and academic excellence

IV. COLLEGE LOCATION

1. General Considerations

There are a number of conditions which a community college location must satisfy in order to be a success.

- (a) In the long-run, minimum aggregate travel for the "customers" is of overriding importance. This results in the minimum possible social cost, both in terms of real costs to individuals and maximum savings to all levels of government by lowering access costs. The college must be located not far from the center of its student hinterland, measured in terms of aggregate travel effort.
- (b) In the short-run, location will determine the degree of community acceptance and recognition. To be successful, the site must satisfy (a), but it must also offer ease of visual identification. It must be distinctively located: it must stand out as a clearly recognized focus of North Shore educational, cultural, and even partisan community life.
- (c) Certain scale effects on location must be taken into account. At small map-scales (that is, the situational level of generality), (a) above is again the critical argument. At large map-scales (site), questions of particular road sites must be analysed. The site chosen should have easy access to the major arterial routes of the region, and it should have at least two major entrance-exit routes to avoid peak-time congestion.
- (d) A minimum of twenty acres of land is necessary. This would break down to approximately 2-4 acres for buildings, 5-10 acres for parking (a necessary adjunct to any commuter college), and 7-10 acres for landscaping, playing fields and so forth. While a competent architect could squeeze the necessary buildings onto a minimally-sized site - at the price of increased building costs - it must be remembered that a college once established in a particular location, is part of the long term cultural landscape of the region. Forty to seventy acres would be desirable to allow for flexibility in future expansions. Since the ultimate growth of population on the North Shore is limited by sea-shore and steep slopes, we see an ultimate enrollment of some 3,000 students for the North Shore Regional College. For a student body presently of this size, Simon Fraser University has allowed about 60 acres. Vancouver City College plans to move onto a 25 acre site on the Langara Golf Course.*

* Questions of physical planning are particularly well discussed in the various publications of Educational Facilities Laboratories, Inc., of New York. Especially useful here is the E.F.L. - financed study, 10 Designs/Community Colleges, Rice University, 1962.

The above conditions may be considered mandatory. Three further considerations which could help immensely, but are not to be taken as necessary, are the following:

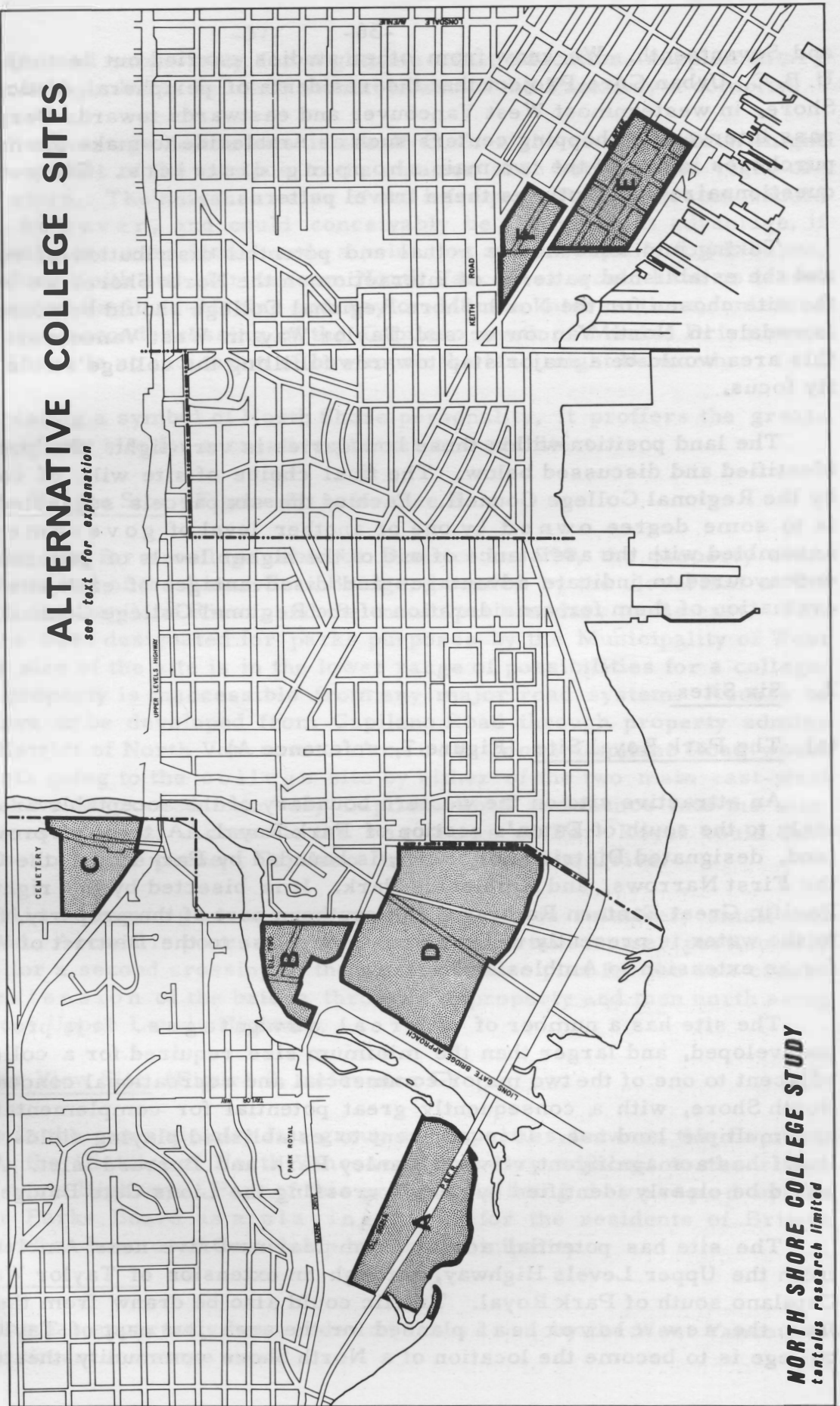
- (e) Sociologically speaking, it is difficult enough to encourage people to participate in novel activities in a well-known and familiar place. The difficulties are compounded if these activities are to take place at an eccentric location reached by unfamiliar routes.
- (f) If the college site is adjacent or close to certain other functional areas in the urban fabric, substantial savings and indeed wholly new benefits can result.
 - (i) Some service facilities, such as eating places, bookstores, stationers, and apparel stores, will be needed on campus or nearby. If the college were built beside an already existing commercial area, the capital cost of the institution could be lowered and the nearby merchants benefitted.
 - (ii) Possibilities exist for some forms of multiple land use. If the site chosen were adjacent to an existing park, for instance, students might use some park areas for extra-curricular activities, while park-users would benefit by the addition of a park-like campus to their usual recreation areas.
- (g) It is always preferable that a site be in only one political jurisdiction.
- (h) Reasonably level land is always cheaper to build upon. Wide tolerances are permissible, but extremely precipitous sites, such as those that straddle North Shore creekbeds will incur ruinous building costs.
- (i) Location within the nexus of urban affairs would be somewhat of an innovation locally. Both existing Universities suffer from what might be termed "Ivory Tower" locations, one on a peninsula and the other on a mountaintop. Such an urban location should be instrumental in making the college an attractive place for the whole family at one time or another.

From the statistical evidence presented in the previous section and summarized in Figure 6, it is very clear that West Vancouver will provide more students per capita for a college program than North Vancouver. Also the participation in any North Shore college by young people from the Howe Sound and Sechelt School Districts would add to the number of people coming to the college from the west. As was suggested in the population analysis, the filling in of the eastern side of North Vancouver, i.e. the area between Seymour Creek and Deep Cove, will probably be slow, accelerating some time in the late 1970's (see Figure 5). So much for the static distribution of people; equally important are the existing patterns of interaction.

From the analysis of intra-urban travel patterns of North Shore residents, it is clear that two major destinations exist for community services other than downtown Vancouver. These of course are Park Royal and Lonsdale between Thirteenth

ALTERNATIVE COLLEGE SITES

see text for explanation



NORTH SHORE COLLEGE STUDY
tanteius research limited

Figure 7

and Seventeenth. We know from other studies carried out in conjunction with the U. B. C. Urban Core Project that the residents of peripheral sections of the North Shore, in westernmost West Vancouver and eastwards towards Deep Cove, will bypass intervening shopping centers such as Ambleside to make the majority of their purchases in one of the two main shopping districts. The evidence from our questionnaire substantiates these travel patterns.

Taking into account the actual and potential distribution of college students, and the established patterns of interaction on the North Shore, we recommend that the site chosen for the North Shore Regional College should be somewhere between Lonsdale in North Vancouver and Taylor Way in West Vancouver. A location in this area would be a major step towards fulfilling the college's role as a community focus.

The land position within these boundaries is very tight. Six possible sites are identified and discussed below. The final choice of site will, of course, be made by the Regional College Council. Each of the six parcels suggested in this report is to some degree owned by one or another level of government or could be assembled with the assistance of one of the higher levels of government. We have endeavoured to indicate advantages and disadvantages of each site and give some evaluation of them for consideration of the Regional College Council.

2. Six Sites

(a) The Park Royal Site (Figure 7, reference A)

An attractive site on the western boundary of the acceptable area lies immediately to the south of Eaton's section of Park Royal. A tract of provincially-owned land, designated District Lot 5521A, is bounded by Park Royal, the Capilano River, the First Narrows, and Ambleside Park. It is bisected by the right-of-way of the Pacific Great Eastern Railway. The southern part of the property, from the tracks to the water is presently under short-term lease to the District of West Vancouver for an extension to Ambleside Park.

The site has a number of very real advantages. It is provincially owned, undeveloped, and larger than the minimum size required for a college site. It is adjacent to one of the two major commercial and recreational concentrations on the North Shore, with a consequently great potential for complementarity of function and multiple land use. It is adjacent to established playing fields. The property itself has a magnificent view of Stanley Park and Burrard Inlet. A college there would be clearly identified by people crossing the Lions Gate Bridge.

The site has potential access from Marine Drive near Ambleside Park, and from the Upper Levels Highway, through an extension of Taylor Way skirting the Capilano south of Park Royal. Traffic could also be drawn from the Upper Levels from the new cloverleaf planned for the area just east of Taylor Way. If the college is to become the location of a North Shore community theatre and cultural

center and if it is used extensively for nighttime adult education, supplementary evening parking could probably be made available within the Park Royal complex.

The major disadvantage to the site is the P.G.E. right-of-way, which might confine the built-up part of the campus to the smaller area between the right-of-way and Eaton's store. The nuisance value of the infrequent P.G.E. trains should not be too great, however, and could conceivably be a significant advantage, if commuter train services were introduced - a point that applies equally to (d) below. Traffic coming along Keith and Marine from North Vancouver would have to travel through the congested Capilano-Marine and Taylor-Marine intersections, unless a relatively expensive second crossing of the Capilano south of Marine Drive were constructed.* There is no indication of how much the land might be worth.

As far as creating a symbol of North Shore personality, it proffers the greatest opportunities of any site for a creative planner and architect.

(b) The Capilano Bridge Site (Figure 7, reference B)

An interesting site for a college could be District Lot 790, the property situated at the northern end of the Lions Gate Bridge, bounded by the cloverleaf at the end of the bridge, the Capilano River, and the municipal boundary to the east. This parcel of land has been designated for parks purposes by the Municipality of West Vancouver. The size of the site is in the lower range of possibilities for a college. At present, the property is inaccessible from any major road system. Access to the site would have to be developed from Capilano Road through property administered by the District of North Vancouver. Access from Capilano Road would mean that students going to the college site by either of the two main east-west arterials would have to proceed onto busy Capilano Road and thence into the site; an awkward business at best. Access to the services of Park Royal could conceivably be by foot over the present Capilano Bridge on Marine Drive.

The major disadvantages are several. The site is relatively small and awkwardly shaped. Access is poor. The site has an uncertain future, particularly related to plans for a second crossing of the Narrows. One plan for the new crossing shows an extension of the bridge through the property and then north along Third Street to the Upper Levels Highway.

(c) The Capilano View Site (Figure 7, reference C)

A third site in the same vicinity is a group of properties between the Capilano View Cemetery, the District of North Vancouver boundary adjacent to the river, and the Upper Levels Highway. Part of this property is being developed by the West Vancouver Parks Board as a playing field for the residents of British Properties. Part has been used as a dump by the Municipality.

* Such a crossing has apparently been under discussion by the West Vancouver Planning Department for some time.

Its future is rather uncertain, again because plans for the interchanges on the Upper Levels Highway linking a new First Narrows crossing may involve part of this property. Its chief advantage would seem to be that in many ways, it symbolizes the essence of the North Shore, being well-treed and bordered on the east by a precipitous drop into the Capilano River. Presumably any plans for interchanges could make provision for proper entrances into this site.

(d) The Capilano Indian Reserve Site (Figure 7, reference D)

The only parcel of land within the areal bounds recommended in this study which approaches the upper limit of land necessary for a college site is on the Capilano Indian Reserve Number 5, immediately east of the Lions Gate Bridge. The land is presently controlled by the Indian band in that area and any agreement on the leasing of land for college purposes would have to be made with the Indian band and their advisors. Land of this quality, adjacent to deep-sea docking facilities and a commercial core sufficiently large to accommodate shopping needs for some time in the future, and without any other major use in sight, should not command too high a price. The great strength of the site is the availability of a large area of level land. It is at present underused. In the event of a second span being built parallel to the present Lions Gate Bridge, a small portion of the Reserve would be taken up by the bridge itself. However, the quantity of land available is such that, even then, an adequate college site could be developed.

If a section of the Capilano Indian Reserve Number 5 were chosen as a site, some access changes would have to be made. Welch Street, coming in from the east, would have to be improved and in all probability would have to be extended along the northern boundary of D. L. 5521 to connect with Marine Drive and Ambleside. This would give access to the college site from the heavily populated sections of West Vancouver and the City of North Vancouver with the major advantage of not involving traffic with the present congested access to the Lions Gate Bridge. This of course would necessitate bridging the Capilano River, but as noted above, such a bridge has been considered for some time to relieve congestion around the terminus of the Lions Gate Bridge anyway. A second advantage of a bridge across the Capilano is that the college site could be linked to the services presently existing in Park Royal and could be integrated into a North Shore community focus. An entrance to the property could easily be developed from Capilano Road and Marine Drive. The site also offers the same sort of positive visual identification from the Lions Gate Bridge as the Park Royal site discussed above.

At the present time the pipelines connecting the Cleveland Dam with the Vancouver water supply network run below this property. Care would have to be taken to ensure that college plans would not conflict with the vital pipeline right-of-way. The disadvantages of this site would seem to be related to the uncertainty of the tenure position for the Indian-controlled land and the proximity of the site to the P. G. E. railway right-of-way and the expansion of the Vancouver Wharves development onto the Indian Reserve shoreline. A parcel of land in this area to the east of the Lions Gate Bridge, part of Block 6 of D. L. 5521, is owned by the Provincial Government, however, and it might be possible to obtain freehold land tenure on

the Provincially-owned land and lease land from the Indian Reserve for parking facilities, playing fields, and other land-extensive college uses.

(e) The North Vancouver Redevelopment Area (Figure 7, reference E)

Recently, a policy of redevelopment has been suggested to the North Vancouver City Council concerning the land between Third Street and Esplanade and stretching from St. Patrick's to the Indian Reserve. This redevelopment area includes the old retail core of lower Lonsdale, a residential area to the east of Lonsdale, and an eight or nine block area to the west with mixed land ownership and mixed uses. The area to the west of Lonsdale, terminating at the Indian Reserve Number 1, could conceivably be an urban site for a North Shore Regional College. The land could probably be assembled and purchased through the provisions of the National Housing Act. As the Act reads, if the land were to be put to college use, a use presumably could not afford the current market price of the land, the Federal Government, through the N.H.A., would subsidize the assembly of the land. This could have real advantages in revitalizing the commercial core of lower Lonsdale and probably of upgrading real estate in adjacent areas.

The disadvantages of this site are those of inaccessibility to the peripheral areas of North and West Vancouver and beyond. Access from the Upper Levels Highway would have to be via Lonsdale, a street which already has relatively heavy traffic, or from the east via Keith Road or Third Avenue and from the west by Marine Drive, also well-travelled routes. If a new waterfront road connected Esplanade to First and then to Welch and a new bridge were built across the Capilano, this could give access from a waterfront route. Again, the site is on the small side, and its development would have to be in terms of an urban type of site which would not characterize the North Shore. It is possible that the City of North Vancouver will have made other plans for the use of reassembled and redeveloped land.

(f) Indian Residential School Site (Figure 7, reference F)

A sixth site for consideration could be the land including and surrounding the Indian Residential School in the City of North Vancouver. It has been suggested that the Federal Government is considering a revision of its policy on Indian education, and it may prove necessary for the Government to abandon the site. The portion of Indian Reserve Number 1 north of Third is much less heavily occupied than the areas to the south, and nearby blocks of residential land are also underused. This parcel of land, obviously on the lower end of our size scale, could be assembled as a redevelopment project.

Both the North Vancouver Redevelopment area and this site would have relatively severe problems of access from the Upper Levels Highway. However, if the second crossing of the First Narrows is terminated on the North Shore near Pemberton Avenue (a development that appears daily less likely), and a connection to the Upper Levels were constructed up the Mackay Creek ravine, then presumably interchanges would be constructed at Marine Drive and Pemberton, a short distance

from the two sites in question. Both sites are on the eastern edge of the area designated as desirable.

A note on eccentric sites. Several sites have been recommended to us which are outside the area discussed above. In particular, two sites have been selected by the Municipal Planner for the District of North Vancouver. Both are in the Inter-river area between Lynn and Seymour Creeks. In both cases, most of the land is owned by the Municipality, and the parcels are in the upper range of site sizes recommended in this report.

We would not recommend that these sites be given high priority. They are isolated from the established foci of North Shore community activity and are remote from the bulk of students who have high propensities for higher education. We believe that the college must be integrated into the community and would caution the Regional College Council about considering exotic and pastoral sites for what is properly an important central function of the urban area. We would reject these eastern sites for a second reason: West Vancouver people do not often penetrate far into North Vancouver, either for social or commercial purposes. If the college is to develop as a community focus, it must be located at least on neutral ground.

Recommendations.

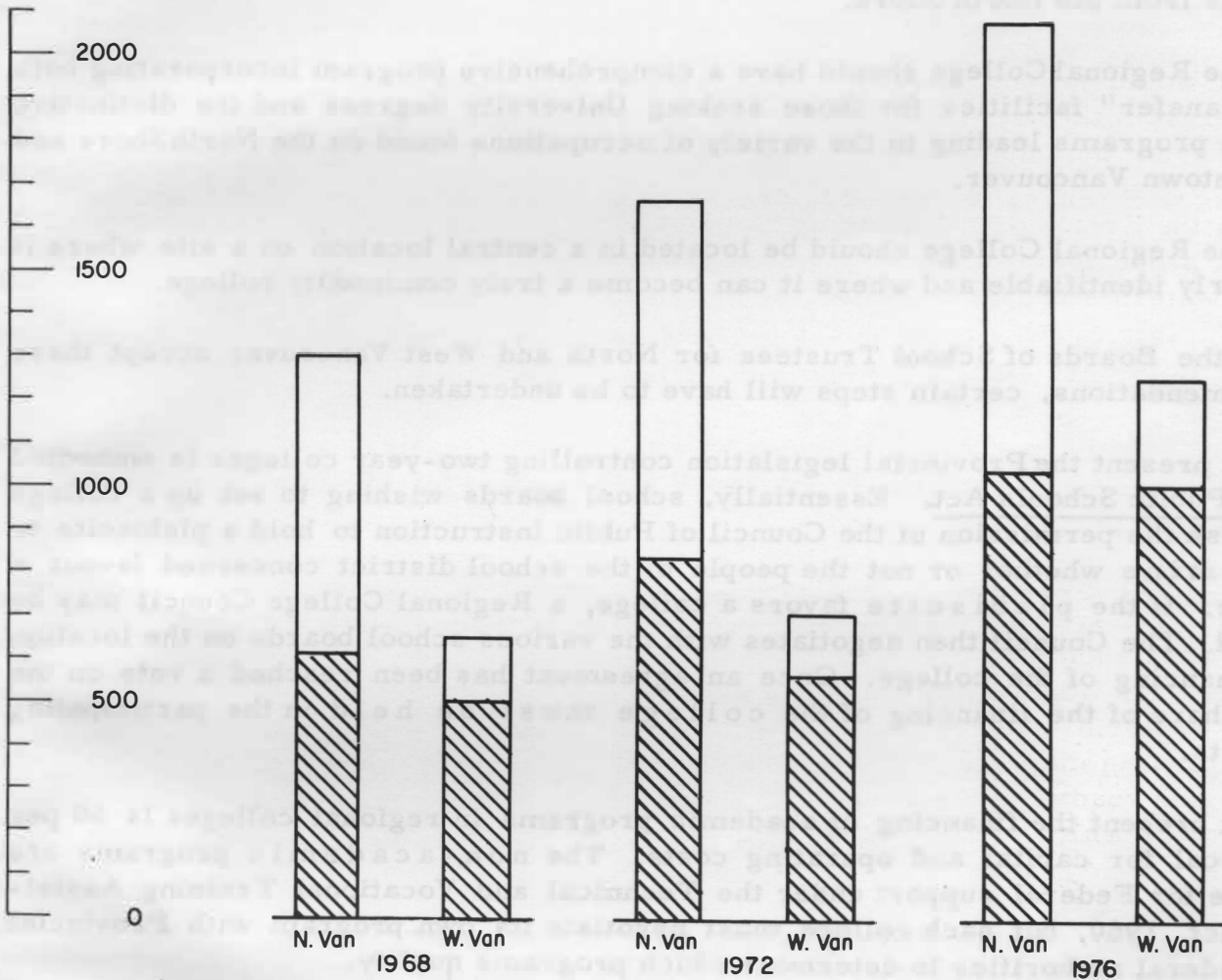
After considering very carefully the six sites within the area between Lonsdale and Taylor Way and noting eccentric location proposals, we believe that only three of the sites should be given consideration by the Regional College Council. These are the Park Royal site, the Capilano Indian Reserve Number 5 property, and the proposed North Vancouver City redevelopment area, designated A, D, and E on the accompanying map. The other sites are rejected because of the uncertainty of bridge and road building sites near the Capilano, and the third because there is no firm policy announced by the Federal Government regarding Indian residential schools.

Some basic decisions will have to be made by the Regional College Council before the final site selection is made. Statements of the role that the college is to play in the day-to-day life of the community must be assessed. Its functions will have to be clearly identified. If the college is to be the center of academic and cultural life on the North Shore, a site must be selected which will enhance the college's chance to fulfill these objectives.

Any of these three sites, on balance, could provide these qualities. In terms of maximum accessibility, the sites adjacent to the bridgehead would have considerable advantages not only for residents of the North Shore but also those from Howe Sound and Sechelt. Whatever the location chosen for a new First Narrows crossing, the fact remains that all routes converge on this bridgehead center. Eccentric locations would add to aggregate travel costs and would severely jeopardize the

chances of the college being readily recognized by all North Shore residents as a common meeting ground.

All in all, it is fortunate that after twenty years of rapid urban growth on the North Shore, three sites can still be recommended for detailed consideration as the home of the North Shore Regional College.



STUDENT POOL FOR FRESHMEN

Figure 6

tantalus research limited

V. A PLAN FOR ACTION

A Regional College will be desirable on the North Shore as early as September 1968. This statement is supported by an analysis of the growth in numbers of students, their abilities and educational goals; a recognition that the North Shore is a very distinctive section of our Province in terms of the talents and aspirations of the population as a whole; recognition that the North Shore is larger than most cities of the province; and by the lack of regional college facilities available to students from the North Shore.

The Regional College should have a comprehensive program incorporating both the "transfer" facilities for those seeking University degrees and the distinctive college programs leading to the variety of occupations found on the North Shore and in downtown Vancouver.

The Regional College should be located in a central location on a site where it is clearly identifiable and where it can become a truly community college.

If the Boards of School Trustees for North and West Vancouver accept these recommendations, certain steps will have to be undertaken.

At present the Provincial legislation controlling two-year colleges is embodied in the Public Schools Act. Essentially, school boards wishing to set up a college must ask the permission of the Council of Public Instruction to hold a plebiscite to determine whether or not the people of the school district concerned favour a college. If the plebiscite favors a college, a Regional College Council may be formed. The Council then negotiates with the various school boards on the location and financing of the college. Once an agreement has been reached a vote on the local share of the financing of the college must be held in the participating districts.

At present the financing of academic programs in regional colleges is 50 per cent local for capital and operating costs. The non-academic programs are eligible for Federal support under the Technical and Vocational Training Assistance Act, 1960, but each college must negotiate its own program with Provincial and Federal authorities to determine which programs qualify.

It must be emphasized that the financing of regional colleges is likely to be reviewed. The whole matter of Federal aid to higher education may change as a result of the Bladen Commission Report due in September 1965.

Because negotiations will be required in the early stages of planning a college, it is important that a key official be appointed as early as possible. The college principal should be appointed early in the planning stages and to this end he might be appointed to the existing Adult Education Department. If not, a college advisor could be appointed as was done in the West Kootenays and in Vancouver, and the

principal appointed later.

The recommendations of this report are obviously only the first stage. When the Regional College Council is established further considerations will have to be undertaken under such headings as (a) staff and organization; (b) physical planning and (c) finance.

The procedure employed to determine the size and composition of the samples that would yield the acceptable level of confidence in the results may be summarized as follows:

- (a) Determining the most appropriate grade levels for projecting developments of a regional college for different times in the future.
- (b) Determining the sample sizes which would reasonably limit the error of estimate for the total of North State students and for the total students at the sample grade level.
- (c) Striving the sample to guarantee representation in proportion to the number of students at each grade level and the ratio between boys and girls.
- (d) Selecting a random sample for each class.

The following table indicates the grade levels appropriate for projection to 1967, 1972 and 1977. It shows that the same table are the number of students in each grade level and the sample size that would limit the error for the 5% error level in the sample grade levels to 5% per year.

Grade	Total Students	Sample Size
1	5,413	270
2	4,127	206
3	4,777	239
4	5,382	269
Total	19,709	1,004

In order to prevent the samples from being biased in favor of any particular racial, economic or academic group, the members of each sample class used for the study and a set of random numbers to select the students to be surveyed.

APPENDIX

SURVEY TECHNIQUES

Data provided by statistical samples can provide quite accurate information on populations where exhaustive interviewing is not feasible. Of course, samples are subject to error: that is, they may not fully represent the universe from which they are drawn. But if the sample is selected according to well-established mathematical laws, the error is not only calculable, but it may also be predetermined. An error of ± 3 per cent is considered more than acceptable in social surveys of this type.

The procedures employed to determine the size and composition of the samples that would yield the acceptable level of confidence in the results may be summarized as follows:

- (a) Determining the most appropriate grade levels for projecting requirements of a regional college for different times in the future.
- (b) Determining the sample sizes which would acceptably limit the error of estimate for the total of North Shore students and for the total students at the sample grade level.
- (c) Stratifying the sample to guarantee representation in proportion to the number of students at each grade level and the ratio between boys and girls.
- (d) Selecting a random sample for each class.

The following table indicates the grade levels appropriate for projections to 1965, 1968, 1972 and 1975. Shown on the same table are the number of students in each grade level and the sample size that would limit the error for the 7,708 students in the sample grade levels to ± 2 per cent.

<u>Grades</u>	<u>Total Students</u>	<u>Sample Size</u>
1	2,413	628
5	2,127	552
9	1,773	460
12	<u>1,395</u>	<u>360</u>
Total	7,708	2,000

In order to prevent the samples from being biased in favour of any particular social, economic or academic group, the teachers of each sample class used class rolls and a set of random numbers to select the students to be surveyed.

REGIONAL COLLEGE SURVEY

The need for a regional college is at present being investigated. In order to determine the characteristics of this college a series of questions has been drawn up to find out the nature of this area and the people within it. As the parent of a child in Grade 1, 5, 9, or 12, you have been selected, at random, to help the college study by answering the following questions. The questions in Part A, those about your neighbourhood, will assist the research team in determining where a college might be located to fit the pattern of family travel now established. The questions in Part B, about your family, will help the team to select the type of programmes that will be suitable for this college bearing in mind the needs and interests of your child and of other children and adults in the community. You, as an individual, will not be identified in any manner. ALL DATA COLLECTED WILL BE TREATED CONFIDENTIALLY.

PART A—ABOUT YOUR NEIGHBOURHOOD AND COMMUNITY

1. Your address (nearest 100 block).....
2. Have you moved in the past five years? Yes..... No.....
3. If yes, list previous addresses (nearest 100 block).....
.....
4. Are you likely to move to a different home in the next five years? Yes No.....
5. If yes, where?.....
6. List the last three social visits made by adult members of your family. From the table below select the type of social relationship involved.

(example)	0000 Keith Road	A		
1.		
2.		
3.		
(A) relative	(B) present co-worker	(C) past co-worker	(D) neighbour	(E) past neighbour
(F) club or organization member	(G) other			

7. Location at which you made your last purchase of groceries with a value in excess of \$10.00
..... (Example: Park Royal or Upper Lonsdale).....
8. List of service clubs, winter club, church or fraternal organization attended at least on a monthly basis by adult members of your family.

Organization (Branch)	Address of Meeting (nearest 100 block)
.....
.....
.....

9. How often do adult members of your family go to each of the following?

	Often	Seldom	Never	If Often, Where? (e.g. Downtown Vancouver)
Library
Live Theatre
Musical Event
Art Gallery
Evening Courses

