

U BC REPORTS

SIX NEW BUILDINGS OPENED

Six new buildings costing more than \$5 and a half million were ready for University of British Columbia students when they returned to the campus September 16 for the 1963-64 winter session.

The most expensive is a \$1,421,343 structure for the department of electrical engineering which took 15 months to complete. The four-storey building contains 75,000 square feet of space. It consists of classrooms and laboratories for undergraduate teaching and advanced research.

The electrical engineering building is the second building on a 15 acre site at the south end of the campus for the faculty of applied science. The first unit, a chemical engineering building, was opened in 1961. The completed development will consist of six buildings.

The largest lecture theatre on the campus seating 450 students is part of a \$1,398,503 addition to the physics building. The addition also contains tutorial rooms and laboratories for 500 students.

A new wing has also been added to the nearby chemistry building at a cost of \$1,039,756. It contains classrooms and laboratories for senior undergraduate work in organic, inorganic and physical chemistry.

A new \$600,000 cafeteria and commissary kitchen will ease the shortage of eating facilities on the campus in the coming year. The top floor of the building features a double-line cafeteria seating 600 students. It is open from 8 a.m. to 6:30 p.m. Monday to Friday, and until 4:30 p.m. on Saturday.

The ground floor of the building is a commissary kitchen which will prepare food for transportation to four other major food centers on the campus.

UBC's new Frederic Wood Theatre—the second unit of the fine arts center—cost a total of \$598,758. It was opened officially on September 19 by President Emeritus Norman MacKenzie a few minutes before the curtain went up for the inaugural performance of the English musical "Salad Days."

The theatre seats 400 persons and also includes three classrooms each seating 50 students. The stage of the theatre features two revolving stages for complex scenery changes.

UBC's new winter sports center at the south end of the campus is now in full operation and contains hockey and curling facilities. The \$500,000 building seats 1500 persons.

Miss Anne Carson,
Library, Sp. Collections,
Campus Mail.

new look for '63 homecoming

A bright new look for UBC's 1963 Homecoming celebrations is forecast by Alumni Association officials organizing the annual return to the campus October 24, 25 and 26.

Returning graduates will be able to choose from sports, social, and academic events designed to give greater meaning to Homecoming.

Alumni officials are cooperating with the UBC extension department to present an academic seminar on space which will feature a Mercury space capsule, the vehicle used in the American manned space program.

The capsule will go on display in the UBC armoury October 16, ten days before the space seminar opens in the auditorium of the new physics building wing. Admission to the armoury is free.

The seminar will be addressed by officials from Canada's Defence Research Board, the National Aeronautics and Space Administration in Washington, and the Institute of Space Studies in New York.

Interested graduates should contact the UBC extension department for registration details.

Some brand new campus buildings will loom large in Homecoming plans.

A Homecoming bonspiel covering the three-day period will be held in the new winter sports centre at the south end of the campus.

Father David Bauer will ice his Canadian Olympic hockey team on Friday, October 25, for a game against the Edmonton Oil Kings.

The new \$600,000 commissary and cafeteria will be the scene of the annual reception and luncheon for graduates on Saturday. Faculty members, leading students and graduates will mingle in the new building at the corner of the west mall and University boulevard.

Throughout Saturday students will guide graduates about the campus on tours of new buildings.

Following the Homecoming luncheon, football fans will be able to see the current edition of the Thunderbirds play the University of Saskatchewan Huskies in the stadium.



R. C. H. "BILL" ROGERS
homecoming chairman

Other feature events are separate golf tournaments for men and women graduates followed by luncheon and dinner in the Faculty Club, class reunions, and the annual Alumni ball, which this year returns to the Commodore Cabaret.

A detailed list of Homecoming events will be found on page two of this edition of "U.B.C. Reports."

three named to UBC board of governors

Three appointments have been made to the UBC board of governors by the Lieutenant-Governor-in-Council under the new Universities Act which came into effect on July 1.

The appointments are Mr. Walter Koerner, Mr. John Liersch, and Mr. Leon Ladner.

Mr. Koerner and Mr. Liersch were members of the previous board appointed by the Lieutenant-Governor-in-Council. Mr. Ladner, formerly a member of the board elected by the Senate, now sits on the board as an appointee of the Lieutenant-Governor-in-Council.

Two other members of the board announced their resignations in August. They are Dr. Percy Bengough of Vancouver and Mr. Robert H. B. Ker of Victoria.

The Senate of the University, meeting on September 20, elected the following persons to the Board: Mr. Nathan Nemetz, Mr. Donovan Miller, and Mr. J. Stuart Keate.

Under the new Universities Act, the Senate elects three persons to the Board for three-year terms.

UBC GETS ODLUM LIBRARY

Major-General Victor Odlum of Vancouver has donated his personal library of 10,000 books to UBC.

The library, which General Odlum collected over a period of 60 years, embraces a wide variety of subjects, including literature, biography, history, philosophy, religion, science and art.

General Odlum's library will be housed in a special room of the UBC library to be known as "The Rockwoods Centre Library." General Odlum will himself recatalogue the books in terms of the UBC system and present a printed copy of the catalogue to UBC as evidence of the gift.

General Odlum is a former newspaper publisher in Vancouver and was Canadian high commissioner in Australia as well as Canada's ambassador to China and Turkey.

General Odlum was an MLA for four years and served on the boards of governors of the University and of the Canadian Broadcasting Corporation.

In 1959 General Odlum donated his five and a half acre estate at Batchelor Bay near Whytecliff to the University for work in the fields of fine arts and public affairs, and approved student activities.

grads increase giving

Contributions to the Alumni Association's 1963 annual giving appeal have increased nearly 100 per cent compared to the same period in 1962, alumni officials have revealed.

Contributions to August 31 this year amounted to \$50,235.28, a leap of 99.7 per cent over the same period in 1962. The number of donors also increased from 1960 in 1962 to 2224 in 1963.

An increase has also been noted in the average donation to the appeal. This year the average gift was \$22.58 while last year during the same period the average was \$14.88.

Last year the total amount subscribed to the appeal over the year was \$36,749.55. This year's goal is \$100,000 from 4,000 donors.

AAG funds are used for a variety of purposes including scholarships, the President's fund, the Library, and recreational facilities. The committee in charge of the appeal is currently investigating the establishment of a senior student loan fund.

Graduates who have not yet contributed should send gifts to the Alumni office, room 252, Brock Hall, UBC, Vancouver 8.

the export of talent

By DAVID M. MYERS
Dean, Faculty of Applied Science

In the many discussions that have been stimulated by the publication of the Macdonald report on higher education in British Columbia, the question is often asked: "Why should we produce graduates to work in other provinces or countries?" This is akin to the question: "When did you stop beating your wife?" It implies an assumption which, if invalid, makes the question meaningless. To put the matter straight, let us examine the assumption. Do we, in fact, lose our graduates to other places? Yes, we do lose a substantial proportion of them, but we also gain many who received their education elsewhere.

The real question is whether our balance of trade in talent is satisfactory; no serious complaint can be made against our exports of talent if they are exceeded by our imports; indeed a healthy interchange of talent is generally regarded as essential in a civilized community.

It is difficult to analyze our trade in trained people, as they do not appear as items in balance sheets or budgets. However, I have attempted a tentative examination on the following bases and assumptions.

(1) If we consider a profession in which British Columbia offers less opportunities than elsewhere, we would expect our ratio of exports to imports to be relatively high. Conversely, if it is not unduly high in such a profession, it is likely to be lower still in others.

(2) Engineering is such a profession. Although in certain areas, such as those related to forestry and forest products, one would expect a net import of talent, the secondary industries are far more widespread and highly developed in the central provinces and in the U.S.A. than in B.C., and the demand for engineers consequently is comparatively low in B.C.

(3) My investigation is therefore confined to the engineering profession, and if it discloses a reasonable relation of exports to imports, then, taken over all areas of activity, the criticism that we are exporting talent would seem to be unjustified.

My data are drawn primarily from the list of members published in 1962 by the Association of Professional Engineers of British Columbia. This list discloses that there are 2895 members registered to practise their profession in B.C., of whom 379 are disqualified by virtue of residence elsewhere; there are therefore approximately 2500 registered practising engineers in the province. There is no simple way of determining how many practising engineers are not registered, but a survey across Canada by the Dominion Bureau of Statistics, about two years ago, led to the estimate that about 65 per cent of engineers were registered in their provincial associations. If we accept this figure for B.C., we conclude that there are 3900 professional engineers practising in the province.

An analysis of the membership list mentioned above shows that of 2895 members, 1281 (44 per cent) received their qualifying degree at the University of B.C.; there is no other institution in the province which gives such a qualification. Making the assumption that the proportion of UBC trained men among those not registered is the same as among those registered, the total engineering population in B.C. consists of:

Trained at UBC : 1720
Trained elsewhere : 2180

Considering now the supply of engineers in B.C., the average time between graduation and professional competency is about four years. Thus, the total output of trained engineers may be estimated approximately by taking the total graduation figures from the University up till 1958. The number is 4037. It is reasonable to suppose that, of these, some 10 per cent have been lost by death or through leaving the profession, and the number enrolled in the profession without a university qualification is small. Thus, the total production to date is approximately 3600.

We can now examine our balance of trade:
Trained at UBC and practising in B.C. ... 1720
Trained at UBC and practising elsewhere 1880
Trained elsewhere and practising in B.C. 2180

Allowing for errors in my assumptions, it may be concluded that the numbers in the three categories are roughly equal. The evidence does not suggest that our exports exceed our imports.

Engineers represent about six percent of the enrolment at UBC. It is reasonable to assume, in the absence of evidence to the contrary, that the tendency for a graduate to leave the province is greater in engineering than in the average of the remaining 94 percent of the University population.

Thus, there appears to be no truth in the suggestion that UBC is training graduates to leave the province; rather, it appears that we are falling a little short of meeting our own needs, and that our imports of talent exceed our exports.

OPPORTUNITY AT SUNDOWN

For 27 years one of the best bargains in British Columbia has been the program of evening classes of the University of B.C.

For a ridiculously few dollars, usually less than the cost of a night on the town, anybody who wishes can take advantage of the province's finest brains and talents to make that wish come true.

It is the modern university's responsibility or even duty to reach out to every level of the community, and UBC meets it most ably. Last year 8,000 attended its night courses and, certainly in many instances, lives were reshaped and destinies dramatically altered as a result.

The calendar for this Fall now has been released, not only for the UBC campus but, to bring the university physically closer to the people, for Burnaby, New Westminster, Richmond and North and West Vancouver.

It is exhilarating reading in itself — between Recorder Flute, Introductory, and Philosophy's What Is Left of Morality, and An Introduction to Digital Computers, there is something in this program for all.

Whatever a person's academic background, the elements of a university education are no farther away than the mailbox. — THE VANCOUVER SUN.

homecoming calendar

THURSDAY, OCTOBER 24

ALL DAY — Homecoming bonspiel in the winter sports centre at the south end of the campus. Mercury space capsule on display in the UBC armoury from 10 a.m. to 10 p.m. Admission is free.

12:30 p.m. — Pep rally in the War Memorial gymnasium. Featured performer is singer Josh White.

7:30 p.m. — Duplicate bridge tournament for graduates in the faculty club.

FRIDAY, OCTOBER 25

ALL DAY — Space capsule on display in the armoury, 10 a.m. to 10 p.m.

9 a.m. — Space seminar sponsored by the extension department opens in the new physics building. Canadian and American officials from the Defence Research Board, the Institute of Space Studies in New York, the National Aeronautics and Space Administration in Washington, D.C., and the Bell Telephone Laboratories will discuss various aspects of the space program. Interested graduates should contact the extension department for full details. The seminar continues until 5 p.m. today and until 12:30 p.m. on Saturday.

9 a.m. — Ladies' golf tournament begins on the UBC golf course. A luncheon will follow at 1:30 p.m. in the faculty club.

11 a.m. — Men's golf tournament begins on the UBC course. A dinner will follow at 5 p.m. in Brock Hall.

EVENING — Reunions — class of '23 and law '53.

7:30 p.m. — Official opening winter sports centre.

8 p.m. — Hockey in the winter sports centre. Canadian Olympic team vs the Edmonton Oil Kings.

SATURDAY, OCTOBER 26

ALL DAY — The Mercury space capsule continues on display in the armoury, 10 a.m. to 2:30 p.m. New UBC buildings will also be open to graduates.

9 a.m. — Space seminar continues in the auditorium of the new physics building.

11:30 a.m.-1:30 p.m. — Homecoming luncheon and reception in the new commissary cafeteria at the corner of the west mall and University boulevard. Graduates will have an opportunity to meet leading faculty members during the luncheon.

12 NOON — Class of '18 reunion in faculty club.

2 p.m. — Football in the UBC stadium. UBC Thunderbirds vs the University of Saskatchewan.

EVENING — Reunions of the classes of 1928, '33, '38, '43, '48, '53, and '58.

9 p.m. — Annual alumni ball at the Commodore cabaret. For information and ticket reservations call the Alumni Association office, 224-4366.

THE FACULTY

PRESIDENT JOHN B. MACDONALD was honoured by the Newsman's Club of B.C. in August as the 12th recipient of "British Columbian of the Year" award.

The honour is awarded on the results of votes by editors of daily and weekly newspapers and radio and television news editors throughout the province.

The first winner of the award in 1952 was president emeritus DR. N. A. M. MACKENZIE.

Dr. Macdonald was also honoured during the summer with honorary membership in the British Columbia Dental Association. The honorary membership is awarded to those who have made a meritorious contribution to the science and art of dentistry.

ARTHUR ERICKSON, associate professor in the school of architecture, was a member of the team which won first prize for the design of the new Simon Fraser University on Burnaby mountain.

In association with Vancouver architect Geoffrey Massey, Mr. Erickson prepared a master plan for the new university in a contest entered by 71 B.C. architects. An international group of judges were unanimous in their choice of the Erickson-Massey design for SFU.

DR. GEORGE R. F. ELLIOTT, professor of preventive medicine and assistant provincial health officer, has been appointed honorary physician to the Queen.

Dr. Elliott was one of a number of army, navy and air force veterans who were recently appointed to the position. His appointment is for two years.

PROF. WALTON J. ANDERSON, head of the department of agricultural economics, has resigned to take the post of director of research of the Agricultural Economics Research Council of Canada.

Dr. Anderson, a member of the UBC faculty since 1947, took over his new post in September. Object of the federal-provincial council is to strengthen Canada's agricultural industry through a long-range research program in economics and rural sociology.

DR. MIKLOS UDVARDY, associate professor in the zoology department, is on a year's leave of absence at the University of California where he has been invited to be their "Lida Scott Brown Visiting Lecturer" for the current academic year.

He will give lectures throughout the fall and spring on topics related to ornithology.

During the summer Dr. Udvardy visited a number of universities in Europe, Canada and the U.S.A., where he lectured and took part in meetings of learned societies.

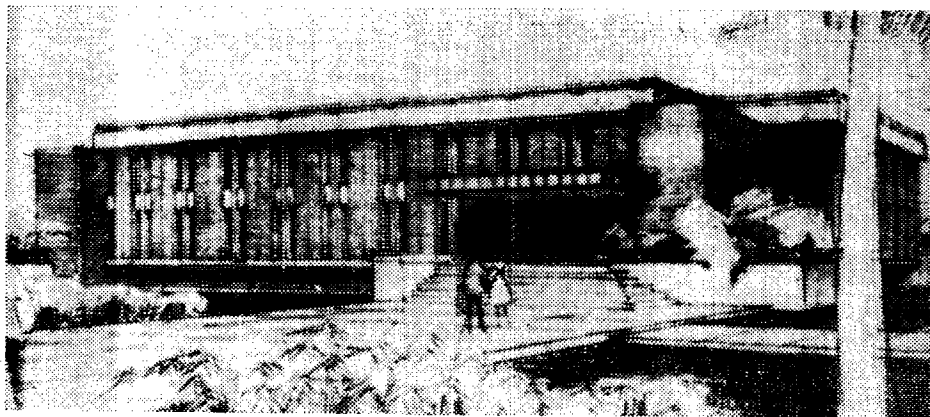
PROF. SAM BLACK, of the faculty of education and the department of fine arts, has been elected second vice-president of the International Society for Education through Art, which met in August in Montreal.

DR. A. J. WOOD, professor of animal husbandry in the faculty of agriculture, was the only Canadian invited to address the sixth international Congress of Nutrition which met in Edinburgh during August. Dr. Wood also visited research laboratories and universities in Great Britain and Iceland before returning to UBC.

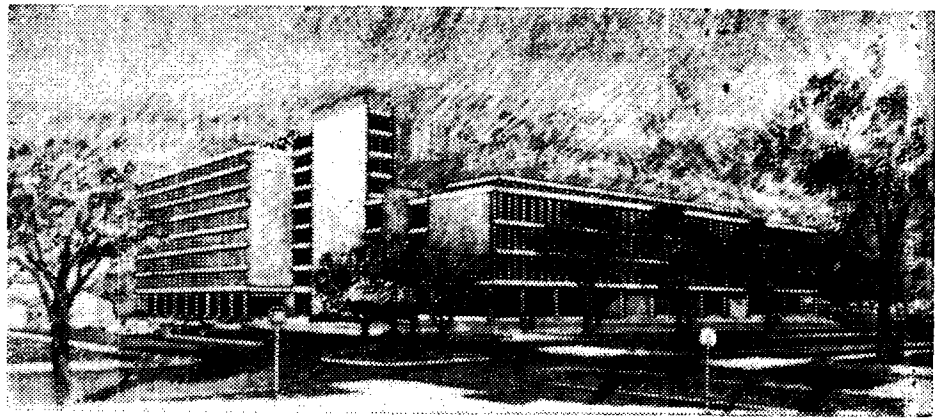
PROF. JOHN E. BIER, of the department of biology and botany, delivered a paper at the World Consultation on forest genetics and tree improvement, sponsored by the Food and Agricultural Organization of the United Nations, in Stockholm in August.

Dr. Bier was the only Canadian university faculty member invited to speak at the conference. This is the fifth consecutive year that Dr. Bier was invited to speak at the meeting of a learned society in Europe.

PROF. D. J. WORT, of the biology and botany department, presented papers at meetings of the American Institute of Biological Sciences in Amherst, Massachusetts, in August, and at the second triennial conference of the European Association for Potato Research in Pisa, Italy, in September.



CONSTRUCTION of the Woodward Bio-Medical Library, above left, on the site of the Health Sciences Centre opposite the War Memorial Gymnasium, has begun. The Board of Governors has approved a grant to match funds contributed by Mr. and Mrs. P. A. Woodward's Foundation. The building will house 100,000 volumes and contain a special room to house the University's history of medicine and



science collection. Tenders have been called for construction of a new \$2 million office and classroom building, above right, to house the faculty of commerce and the social sciences departments of the faculty of arts. The eight-storey office block will front on University Boulevard while a four-storey classroom block will front on the main mall. Architect for both projects is Thompson, Berwick and Pratt.

foundation aids library construction

A \$746,946 contract for construction of the Woodward Bio-Medical Library at the University of British Columbia has been awarded by the Board of Governors to Frank Stanzl Construction Ltd. of Vancouver.

Construction of the three-storey building, which will cost a total of \$950,000, will begin immediately. Expected opening date is the summer of 1964.

Gifts covering half the total cost of the building have been made to the University by Mr. and Mrs. P. A. Woodward's Foundation. A matching grant has been approved by the UBC Board of Governors.

The Woodward Bio-Medical Library will be constructed on the site of the University Health Sciences Centre on University Boulevard opposite the War Memorial Gymnasium.

When completed the Health Sciences Centre will include a 400 bed teaching and research hospital serving the whole of British Columbia, the Faculty of Dentistry, Schools of Rehabilitation and Nursing, and other professional schools in the health field.

The Woodward Bio-Medical Library will combine in one easily-accessible collection all UBC's holdings in the fields of human biology, and pre-clinical health sciences, and with the development of the University hospital, the clinical health sciences.

The building of 35,000 square feet will seat more than 250 readers and house 30,000 to 40,000 volumes initially. Eventually, the Library will house 100,000 volumes.

A feature of the building will be separate study rooms which will be open 24 hours a day for the convenience of students who require study space after normal closing hours.

There will also be a room containing books on the history of medicine and science named for the late Charles Woodward, former M.L.A. and founder of Woodward's Stores. UBC already has a substantial collection of books in this area and it is hoped that additions will be made in the near future.

professor, son die in freak flood

Dr. Roger Clubb, an assistant professor in the UBC English department, and his eight-year-old son, were drowned during August while on holiday in Grand Canyon National Park in Arizona.

Dr. Clubb, 35, and his son, were hiking in a dry creek bed when they were engulfed in a freak flood caused by torrential rains.

Dr. Clubb joined the UBC faculty in 1959 after graduation from Yale, where he received his Ph.D. in 1959 and his M.A. in 1953. He obtained B.A. degrees from London University in 1952 and the University of Kansas in 1950.

Dr. Clubb is survived by his wife, Jean, and a younger son.

new theatre officially opened

Dr. N. A. M. MacKenzie, president emeritus of UBC, officially opened the new 400-seat Frederic Wood Theatre in UBC's fine arts centre September 19.

The official opening ceremonies took place minutes before the curtain went up on the inaugural production in the new theatre, the gay English musical entitled "Salad Days."

It was Dr. MacKenzie who opened the original Frederic Wood Theatre, a converted army hut on the West Mall, in 1952. Dr. Phyllis G. Ross, chancellor of the University, presided at the opening ceremony. Also present at the ceremony was Frederic G. C. Wood, professor emeritus of English at UBC, after whom both theatres are named.

Professor Wood was a member of the faculty when UBC first opened its doors in 1915. In the ensuing years he founded the UBC Players' Club, which staged thirty major productions and innumerable one-act plays during his directorship.

He was renowned among generations of students for his courses on the English novel and playwrighting. He resigned from the UBC faculty in 1950.

Representing the Canada Council, which contributed half the cost of the \$500,000 theatre, was Mrs. W. J. Dorrance.

Other distinguished guests were Dean S. N. F. Chant, representing President John B. Macdonald; Mr. C. I. Taylor, provincial department of education; Mr. G. G. Woodward, president of the Community Arts Council of Vancouver; Mr. E. L. Affleck, president of the Players' Club alumni; John Mason Brown, the distinguished New York drama critic, and Miss Dorothy Somerset, head of UBC's theatre department.

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Vol. 9, No. 5 — Sept. - Oct., 1963. Authorized as second class mail by the Post Office Department, Ottawa, and for payment of postage in cash. Published by the University of British Columbia and distributed free of charge to friends and graduates of the University. Permission is granted for the material appearing herein to be reprinted freely. James A. Banham, editor; Laree Spray Heide, assistant editor. The editor welcomes letters, which should be addressed to the Information Office, U. B. C., Vancouver 8.

former history head dies

Professor Walter N. Sage, former head of the department of history and a member of the UBC faculty from 1918 to 1953, died September 11 following a long illness. He was 75.

Prof. Sage, one of the senior scholars in Canadian history, was associated with the B.C. Historical Association for more than 40 years and made the history of B.C. a subject for serious study by professional historians.

Born in London, Ontario, on August 9, 1888, Prof. Sage was educated at the University of Toronto, where he received his bachelor of arts degree in 1910. He obtained a second BA degree and the master of arts degree from Oxford University where he studied from 1910 to 1913. He also received a diploma in economics and political science with distinction from Oxford.

Prof. Sage was awarded the degree of doctor of philosophy by the University of Toronto in 1925.

Before joining the UBC faculty in 1918, Prof. Sage lectured at Calgary College and Queen's University. Appointed at the rank of assistant professor at UBC, he rose to full professor by 1928.

Prof. Sage was head of the UBC history department from 1932 until he retired in 1953. The Senate of the University granted him the title of professor emeritus of history on his retirement. He served as a special lecturer in the UBC history department until 1955.

Prof. Sage was a fellow of the Royal Historical Society, London, and the Royal Society of Canada, and a past pres. of the Canadian Historical Association and the B.C. Historical Association. He was the first Canadian to be elected president of the American Historical Association, Pacific division.

A prolific writer, Dr. Sage authored more than 120 books, papers, and reviews on historical subjects. Prof. Sage was also a longtime member of the UBC Senate. From 1939 to 1942 and from 1945 to 1963 he was one of 15 members elected by Convocation.

new building will cost \$2 million

The board of governors has authorized the calling of tenders for a new multi-purpose classroom and office building to cost more than \$2 million.

The building, to be constructed at the corner of the Main Mall and University Boulevard, will house the faculty of commerce and the social sciences departments of the faculty of arts.

Expected completion date of the building is the summer of 1965.

The building will consist of an eight-storey office block fronting on University Boulevard and a four-storey classroom block on the Main Mall. Attached to the classroom wing will be two lecture theatres each seating 300 students.

The lecture wing of the block will contain 12 classrooms with seating accommodation ranging from 45 to 100 persons. In addition this wing will contain seven laboratories, ten seminar rooms, six project rooms, and five departmental reading rooms.

Faculty of arts departments which will be housed in the new building are psychology, sociology, anthropology, political science, economics, and the Institute of Industrial Relations.

wings added to education building

A \$1,767,461 contract for construction of phase two of the College of Education building at the University of British Columbia has been awarded to Bedford Construction Co. Ltd.

The contract was awarded by the provincial government's department of public works, which is the architect for the project.

Phase two of the building consists of two wings to be added at the north and south ends of the existing building, which was completed last year.

The north wing will be made up of specialized classrooms for the teaching of mathematics, science, art, music, and other subjects. The south wing of the building will contain offices for members of the Faculty and College of Education.

Expected completion date for the new wings is December, 1964.

A third phase of the building, a small gymnasium, will be constructed in the future.

library grant

A \$280,000 Canada Council grant will enable UBC to proceed with improvements and additions to the Library.

The grant, which covers half the total cost of the work, will be used to complete stack and study space at the rear of the Library.

The space was enclosed but not finished when the south wing of the Library was added in 1960.

SCIENTISTS DIG UP B.C.'s PAST

University of British Columbia archaeologists have pinpointed about 50 sites once occupied by Indians in the lower Fraser Valley, some of which will help to fill in a four thousand year gap in B.C.'s prehistory.

The sites, located between the mouth of the Fraser River and the canyon above Yale, were found by Robert S. Kidd, a UBC graduate now doing postgraduate work at Washington, and Derek Smith, a UBC student taking honours in anthropology.

They examined old river terraces and gulleys leading from higher levels down to the Fraser River and investigated leads from interested citizens who wrote or telephoned Dr. Charles Borden, director of archaeological studies at UBC, and supervisor of four UBC projects during the past summer.

One objective of the survey was to locate sites occupied by Indians between 3000 and 7000 years ago. "Several sites which seem to contain material from this period have been discovered," Dr. Borden said, "but we shall not know for certain until intensive investigations begin."

Some of the sites located seem to date back 8000 to 9000 years or more, Dr. Borden added, which would make them as old or older than anything yet investigated. Funds to carry out the survey came from the National Museum of Canada.

As the result of a second project under Dr. Borden's direction, it has been ascertained that there are no significant archaeological remains in the Peace River basin area which will be flooded by the Portage Mountain dam reservoir.

There are, however, signs of archaeological remains on river terraces above the level of the reservoir pool. These will be investigated in the future.

The flooding which will result from the dam construction at Portage Mountain will actually be an aid to future investigations, Dr. Borden said, since a higher water level will make higher areas more accessible.

Bob McGhee, a University of Toronto honours student, and UBC graduate Michael Lemiski carried out the survey with funds provided by the provincial government under the Archaeological Sites Protection Act of 1960, which provides for the investigation of sites threatened by urban expansion or industrial development.

For the fifth year in a row an eight-man team of archaeologists continued work in the Fraser Canyon north of Yale, where evidence of occupation dating back to 9000 years ago has been discovered.

Further excavation of an Indian pithouse village revealed a series of separate habitation levels and evidence of earlier occupation down to the 20-foot level.

Most of the deposits are prehistoric and contain only Indian artifacts. Overlying these are remains which yielded trade goods, Dr. Borden said. The earliest trade articles, some tubular copper foil beads, come from a pithouse which was probably inhabited in the late 1700's.

At the next highest level, glass beads and iron objects were found which would suggest an occupancy date of about 1810.

A prize find during these investigations was the fragments of a beautifully carved wooden box which had been partially destroyed in a fire. A charcoal sample from the same level will be submitted for accurate dating by the carbon method.

The discovery is significant, says Dr. Borden, because it represents the first wooden carved object ever found in B.C. in a prehistoric Indian site.

Later in the summer the party, led by Donald Mitchell, MA in anthropology, UBC, began excavating a nearby site which may date back more than 12,000 years.

This would make it the oldest site of human habitation ever

found in Canada, Dr. Borden said.

The archaeologists found large numbers of crudely flaked tools made from river cobbles which were used as choppers, scrapers, and gouges.

Dr. Borden said it would be necessary for geologists to assess the age of the site since there were no charcoal or other remains which could be dated by the radio carbon method.

Funds for the latter two projects were obtained from the National Museum of Canada, the UBC research committee, and Dr. H. R. MacMillan.

real estate foundation established

The Real Estate Institute of British Columbia will establish a \$100,000 Education and Research Foundation for the expansion of academic work relating to estate management at the University of British Columbia.

Income from the \$100,000 trust fund will support scholarships, bursaries and prizes to graduate and undergraduate students in the field of estate management, enable UBC to purchase additional library material, and finance research projects in estate management.

The capital sum will be vested in the Vancouver Foundation and the income of approximately \$5000 per year allocated by a grants committee made up of six members from the Institute and three past or present members of UBC's faculty of commerce and business administration appointed by President John B. Macdonald.

Colonel Herbert R. Fullerton, president of the Real Estate Institute of B.C., said "The education and research foundation now being established by the Real Estate Institute will provide, in perpetuity, the necessary scholarship funds to train and educate future teachers in the field of real estate education; to develop new teaching materials and texts, and to provide opportunities for advanced study and research in real estate for Canadians at a Canadian University."

Professor Philip White, head of the division of estate management in UBC's commerce faculty, said the income from the trust fund would provide for further expansion of work in the field of real estate at UBC.

He said funds for aid to students and purchase of library materials were most welcome, but the greatest need lay in the area of research.

"We will now be able," he said, "to expand our program of research in the area of Canadian mortgage policies and the more efficient use of mortgage funds, and begin new work on the structure of real estate markets in Canada and the function of private ownership of real property."



DR. THOMAS L. PERRY

MS RESEARCH PROBES TRACE METALS

Research aimed at unravelling the mysteries of the crippling disease multiple sclerosis has begun at the University of British Columbia.

Dr. Thomas L. Perry, an associate professor in the department of pharmacology, has received a grant of \$12,500 from the Multiple Sclerosis Society of Canada to test a theory that the disease is related to abnormal concentrations of one or more trace metals in the human body.

Scientists have already shown that high concentrations of several trace metals in the brain can cause mental deficiency and other neurological diseases, Dr. Perry says.

He cites as an instance a complaint known as Wilson's disease, which produces loss of intelligence and certain physical symptoms as a result of an excessive concentration of copper in certain areas of the brain and liver.

A disease of sheep which closely resembles multiple sclerosis has reinforced the trace metal theory, Dr. Perry says. The disease, known as "swayback," shows up in lambs born to ewes which have grazed on vegetation containing large amounts of molybdenum and low concentrations of copper.

Studies of the frequency with which multiple sclerosis occurs in various parts of the world have suggested the possibility that the disease may be associated with variations in the trace metal content of the soil.

To test the theory Dr. Perry and his assistants plan to analyse urine samples from multiple sclerosis sufferers and non-sufferers in the same household.

Each of the samples will be tested to determine the concentrations of the 14 trace elements found in the human body.

Six of these elements — copper, iron, cobalt, zinc, manganese, and molybdenum — are essential to humans, Dr. Perry says, because they are components of enzymes which control body functions.

The remaining eight are not thought to be necessary, but some are known to have toxic effects if they are present in excess quantities, Dr. Perry says.

Carrying the theory one step further, Dr. Perry speculates that multiple sclerosis sufferers may possess some inherent genetic defect which prevents them from eliminating one of the metals.

Dr. Perry says his research will have value even if it is found that concentrations of metals in the human body are unrelated to multiple sclerosis, since the direction of future research is often aided by the elimination of one or another possible avenues of research which need to be explored.

Dr. Perry is also doing research supported by the Medical Research Council of Canada which is aimed at discovering if there is a relationship between mental illness and other biochemical processes in the human body.

OFF-CAMPUS CLASSES EXPANDED

UBC's extension department has decentralized its 1963-64 evening class program and is also offering an expanded daytime program on and off campus and in West Vancouver.

In addition to the usual number of courses on the UBC campus, the department is offering 16 evening classes in the areas of music, literature, public affairs, and education in downtown and central Vancouver.

An extension department official said the idea behind decentralizing the program is to give interested adults in the metropolitan Vancouver area more opportunity to take part in the program.

Residents of North and West Vancouver and many living in the eastern sections of the Vancouver area find it more convenient to drive to central Vancouver than to the campus, the official said.

The daytime program, the official added, is aimed at providing adult education opportunities to many persons who are unable to attend night classes because of work or family commitments. The daytime program includes courses in public affairs, psychology, music, literature, painting, pottery, French and Spanish.

Among new courses offered this year are introductory Swedish and introductory Ukrainian conversation; concepts and contradictions of non-violence; the criminal, the judge and the public; unemployment in Canada, and the executive homemaker.

Liberal arts courses cover history, archaeology, film appreciation, literature and history, while the science section includes courses on the mechanism of development, ornithology, and identification of seed plants, ferns and allies.

new parking rules aid to visitors

New regulations designed to help students and visitors park more easily on the University of British Columbia campus have been announced by UBC's traffic director Sir Ouvry Roberts.

The new wrinkle for students is a pay lot at the south end of the campus intended for those who don't have time to obtain an interim permit in advance from the traffic office.

"The purpose of the lot," Sir Ouvry said, "is to provide space for those students who use a second family car occasionally, and those who drive an unregistered car to the campus as the result of breakdowns."

Students who have to use a second car in an emergency can reclaim the 50 cents a day parking charge by reporting to the traffic office and producing their parking receipt and sticker number.

Pay lots for daytime visitors to the campus are another innovation this year, Sir Ouvry said. "We discovered that 10,000 cars used visitor's pay lots when we experimented with them on weekdays only during the past summer," Sir Ouvry said.

Entrances to the pay lots will be manned at all times by attendants who will adjust visitor's parking space to meet the demand. "As a result, we will be able to ensure parking space to all visitors," said Sir Ouvry.

The west mall, from International House to the Fraser River lot is now open to two-way traffic, Sir Ouvry announced. Cars emerging from the Fraser river lot will be able to leave the campus more quickly via Marine Drive as a result of the change.

Students and visitors may park anywhere on the campus in the evening, Sir Ouvry pointed out, except in certain areas which are reserved day and night for faculty members who return to work or teach.