

CALENDAR

OF

Dalhousie College and University,

HALIFAX,

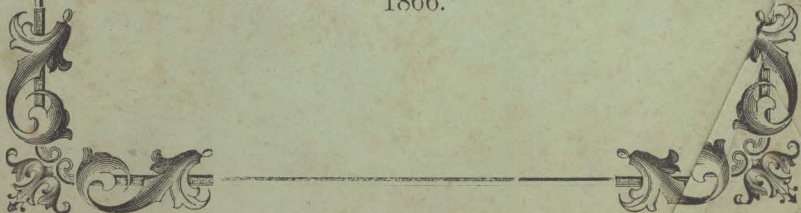
NOVA SCOTIA.

---

SESSION 1866-7.

---

HALIFAX,  
PRINTED FOR THE UNIVERSITY,  
AT THE "CITIZEN" STEAM PRESS.  
1866.





# CALENDAR

OF

Dalhousie College and University,

HALIFAX,

NOVA SCOTIA.

---

SESSION 1866-7.

---

HALIFAX.

PRINTED FOR THE UNIVERSITY,

AT THE "CITIZEN" STEAM PRESS.

1866.

CALENDAR

OF

Yale College and University

YALE

NOVA SCOTIA

SESSION 1890-7

YALE

PRINTED FOR THE UNIVERSITY  
AT THE "GILTNER" STEAM PRESS

1890

## ACADEMICAL YEAR, 1866-67.

1866.

October.

- |         |                                       |
|---------|---------------------------------------|
| Oct. 19 | Meeting of Governors.                 |
| “ 24    | <b>Opening of Winter Session.</b>     |
| “ “     | Matriculation Examination, at 3 P. M. |
| “ 25    | Matriculation Examination continued.  |
| “ 26    | Matriculation and Registration.       |
| “ “     | Supplementary Examination.            |
| “ 29    | Lectures begin.                       |

November.

- |        |                                  |
|--------|----------------------------------|
| Nov. 5 | Meeting of Senate.               |
| “ 7    | Final Matriculation Examination. |

December.

- |        |                           |
|--------|---------------------------|
| Dec. 3 | Meeting of Senate.        |
| “ 20   | Christmas Holidays begin. |

1867.

January.

- |        |                       |
|--------|-----------------------|
| Jan. 2 | College re-opens.     |
| “ 7    | Meeting of Senate.    |
| “ 25   | Meeting of Governors. |

February and March

- |         |                    |
|---------|--------------------|
| Feb. 4  | Meeting of Senate. |
| March 4 | Meeting of Senate. |

April.

- |         |   |
|---------|---|
| April 1 | Meeting of Senate.                      |
| “ 10    | Lectures close.                         |
| “ 11    | <b>Sessional Examinations commence.</b> |
| “ “     | Examination in Natural Philosophy.      |
| “ “     | Examination in History.                 |

1867.	April.
April 12	<b>Sessional Examination</b> continued.
" "	Examination in Chemistry.
" 15	Examination in Classics.
" 16	Examination in Classics.
" 17	Examination in Mathematics.
" 18	Examination in Modern Languages, 4th yr.
" "	Examination in Metaphysics.
" "	Examination in Logic and Psychology.
" 19	GOOD FRIDAY.
" 22	Examination in Ethics.
" "	Examination in Political Economy.
" "	Examination in Rhetoric.
" "	Examination in Modern Languages, 3d yr.
" 23	Meeting of Senate.
" 24	CONVOCATION DAY.
" 29	<b>Opening of Summer Session.</b>
" "	Lectures begin.
	May.
May 6	Meeting of Senate.
" 24	Queen's Birth Day.—Holiday.
	Jan.
June 3	Meeting of Senate.
" 20	Ascension of Queen Victoria.—Holiday.
" 21	Founding of Halifax.—Holiday.
" "	Meeting of Governors.
" "	Lectures close.
" 24	<b>Sessional Examinations.</b>
" 25	Sessional Examinations.
" 26	<b>End of Summer Session.</b>

# Dalhousie College and University.

HALIFAX.

---

## GOVERNORS.

HON. WILLIAM YOUNG, Chief Justice of Nova Scotia,  
*Chairman.*

HON. CHARLES TUPPER, M. D., Provincial Secretary.

HON. J. W. RITCHIE, M. E. C., Solicitor General.

HON. S. L. SHANNON, M. P. P.

HON. JOSEPH HOWE.

REV. GEORGE M. GRANT, M. A.

JAMES F. AVERY, M. D.

ANDREW MACKINLAY, ESQ.

CHARLES ROBSON, ESQ.

---

JAMES THOMSON, ESQ., *Secretary and Treasurer.*

---

## SENATE.

VERY REV. JAMES ROSS, D. D., *Principal.*

REV. WILLIAM LYALL, LL. D.

CHARLES MACDONALD, M. A., *Secretary.*

JOHN JOHNSON, M. A.

GEORGE LAWSON, Ph. D., LL. D.

JAMES DEMILL, M. A.

1867  
 April 12 Examinations continued  
 " Examinations in Chemistry  
 " Examinations in Classics  
 " Examinations in Natural History

**Dalhousie College and University**

April 11 Examinations in Mathematics  
 " Examinations in Natural History  
 " Examinations in Natural History

**GOVERNORS.**

- Hon. WILLIAM YOUNG, Chief Justice of Nova Scotia
- Hon. CHARLES TUPPER, M. D., Provincial Secretary
- Hon. J. W. RITCHIE, M. E. C., Solicitor General
- Hon. S. L. SHANNON, M. P.
- Hon. JOSEPH HOWL
- Rev. GEORGE M. GRANT, M. A.
- JAMES F. AVERY, M. D.
- ANDREW MACKENZIE, Esq.
- CHARLES ROSSON, Esq.

JAMES THOMSON, Esq., Secretary and Treasurer

**SENATE.**

- VERY REV. JAMES ROSS, D. D., President
- Rev. WILLIAM HALL, D. D.
- CHARLES MACDONALD, M. A., Secretary
- JOHN JOHNSON, M. A.
- GEORGE LAWSON, Ph. D., LL. D.
- JAMES DEMILL, M. A.



## Officers of Instruction.

---

VERY REV. PRINCIPAL ROSS, D. D.,  
Professor of Ethics and Political Economy.

REV. WILLIAM LYALL, LL. D.,  
Professor of Psychology and Metaphysics.

CHARLES MACDONALD, M. A.,  
Professor of Mathematics.

JOHN JOHNSON, M. A.,  
Professor of Classics.

GEORGE LAWSON, Ph. D., LL. D.,  
Professor of Chemistry and Mineralogy.

JAMES DEMILL, M. A.,  
Professor of History and Rhetoric.

JAMES LIECHTI, ESQ.,  
Tutor of Modern Languages.

---

MR. ERROL BOYD, *Curator.*

Officers of Instruction.

---

VERY REV. PRINCIPAL ROSS, D. D.,

Professor of Ethics and Political Economy.

REV. WILLIAM JYALL, LL. D.,

Professor of Psychology and Metaphysics.

CHARLES MACDONALD, M. A.,

Professor of Mathematics.

JOHN JOHNSON, M. A.,

Professor of Classics.

GEORGE LAWSON, PH. D., LL. D.,

Professor of Chemistry and Mineralogy.

JAMES DEMILL, M. A.,

Professor of History and Rhetoric.

JAMES LICHT, Esq.,

Tutor of Modern Languages.

---

MR. HEROL BOYD, Censor.

## Faculty of Arts.

### SECTION I.—SESSIONS.

In each Academical Year there are two Sessions:—the first, a Winter Session, and the second a Summer Session.

The Winter Session for 1866–67 will commence on Wednesday, October 24th, 1866, and end on Wednesday, April 24th 1867.

The Summer Session will commence on Monday, April 29th, 1867, and end on Wednesday, June 26th, 1867.

### SECTION II.—ADMISSION OF STUDENTS.

Applicants for admission will present themselves at the College on the opening day of the Winter Session, at 3 P. M.

Students may enter either,

1st, as *Undergraduates*, with the intention of applying for the Degree of B. A. at the end of the course; or,

2nd, as *Occasional Students*.

Students entering as Undergraduates of the first year are required to pass the Matriculation Examination at the opening of the Winter Session, and to take the regular classes prescribed for the Arts course.

Students may also enter as Undergraduates of the second year, by complying with the conditions specified in Section No. 3.

Occasional Students are not required to pass any preliminary examination, and may attend any classes they choose.

No person can be admitted as an Undergraduate after ten days from the opening of the session, without the special permission of the Senate. Occasional Students will be admitted at any time during the Session.

Undergraduates from other Universities will be admitted to similar standing in this University, on producing satisfactory certificates, if on examination they be found qualified to enter the corresponding classes.

### SECTION III.—MATRICULATION EXAMINATION.

#### For the First Year.

The subjects of examination for entrance into the first year are,—

#### I. In Classics.

Latin Grammar, Greek Grammar, one easy Latin, and one easy Greek Author.

The following Authors are recommended :

#### *Latin.*

Cæsar, one book ; Virgil, one book ; Cicero, three Orations ; Horace one book of Odes.

#### *Greek.*

Xenophon, one book ; Homer, one book ; Lucian's Dialogues ; New Testament, one Gospel.

#### II. In Mathematics.

Arithmetic ; Euclid's Elements, Book I.

#### III.

In English Grammar.

History of England.

Geography.

English Composition.

#### For the Second Year.

In order to enter as Undergraduates of the second year, it will be necessary to pass an examination,—

1st, in the *Classics* of the first year as specified in Section 11, or their equivalents.

2nd, in the *Mathematics* of the first year as specified in Section 11, or their equivalents.

3rd, in *English Grammar, English History, Geography* and *Composition*.

N. B.—Students who enter the second year must attend the Lectures on *Rhetoric*.

#### SECTION IV.—COURSE OF STUDY.

The Undergraduate course extends either,

1st, over four Winter Sessions, or,

2nd, over the Winter and Summer Sessions of two Academic years, and an additional Winter Session.

In order to enter upon the latter course, Students must be able to pass the Entrance Examination of the second year, and must take the classes prescribed by the Senate in the Summer Session.

##### I. Winter Session.

###### FIRST YEAR.

Classics, Mathematics and Rhetoric.

###### SECOND YEAR.

Classics, Mathematics, Chemistry, Logic and Psychology.

###### THIRD YEAR.

Classics, Metaphysics, Modern Languages, Natural Philosophy (Mathematical and Experimental Physics), Chemistry, Mathematics (optional), and Practical Chemistry (optional).

###### FOURTH YEAR.

Ethics, Political Economy, History, Modern Languages, Natural Philosophy (Experimental Physics), and Classics or Mathematics.

## II. Summer Session.

Classes will be opened for instruction in the following subjects :

- Classics.
- Mathematics.
- Logic.
- Optics.
- Botany.
- English Literature.
- Modern Languages.

## SECTION V.—FEES.

Tickets are issued, and Fees payable on the first day of the Lectures.

The Fee to each Professor, whose class or classes a Student attends, is *six dollars* for the Winter Session; and *four dollars* for the Summer Session; or *eight dollars* for both. Any Undergraduate who has paid fees twice, either to the Professor of Classics or Mathematics, may attend the classes of such Professor during the remainder of his Undergraduate course without paying an additional fee.

Occasional Students pay a fee for every class they attend. (This rule does not apply to those Occasional Students who entered previous to the Winter Session of 1866-67.)

Experimental Chemistry is an optional class, the fee for which is *six dollars*.

In addition to Class Fees, there is a Matriculation Fee of *two dollars*, payable by Undergraduates. Occasional Students pay an annual Registration Fee of *one dollar*.

The fees of Undergraduates who take the complete course in this University are as follows:

Classes of First year, and Matriculation.....	\$20
“ Second “ .....	24
“ Third “ .....	12
“ Fourth “ .....	6

## SECTION VI.—GRADUATION IN ARTS.

## Degree of B. A.

The Degree of B. A. may be obtained by attending the prescribed courses of Lectures, extending over four Winter Sessions, or three Winter and two Summer Sessions, and by passing the following Examinations, the Candidate maintaining throughout the period a good moral character :—

1st. Matriculation Examination at the beginning of the first or second session.

2nd. Examination at the close of the first session, in Classics, Mathematics and Rhetoric.

3rd. Examination at the close of the second session, in Classics, Mathematics, Logic and Psychology, and Chemistry.

4th. Examination at the close of the third session, in Classics, Natural Philosophy, Modern Languages, Metaphysics and Chemistry.

5th. Final Examination for Degree, at the close of the fourth session, or subsequently in Modern Languages, Ethics, Political Economy, History, Natural Philosophy, and either Classics or Mathematics, at the option of the Candidate.

In no case shall a Student be entitled to a Degree who has not passed in every subject of the course.

Fee for Diploma *five dollars*, payable before the Final Examination.

## Degree of M. A.

Bachelors of Arts of at least three years' standing, maintaining meanwhile a good reputation, shall be entitled to the Degree of M. A., on producing an approved Thesis on a literary, scientific, or professional subject.

Fee for Diploma *five dollars*.

### SECTION VII.—REGULATIONS FOR EXAMINATIONS.

1. If an Undergraduate absent himself from any University Examination, except for such cause as may be held good by the Senate, he will lose his year.

2. If an Undergraduate fail to pass in any Examination, he will be allowed a Supplementary Examination on the first Friday of the following Winter Session, on giving notice to the Secretary of the Senate.

3. Failure in more than two subjects will involve the loss of the year. N. B.—In the application of this rule, Classics and Mathematics will each be reckoned as two subjects.

4. In all cases where a Student presents himself for Supplementary Examination, except on the day mentioned in Rule 2nd, he will be required to pay a fine of *two dollars*.

5. Students are forbidden to bring any books or manuscripts into the Examination Hall, unless by the direction of the Examiner, under penalty of losing their Examination.

6. Students who pass the Examination in the several subjects of their respective years, are arranged in three classes, according to the merit of their answers on those subjects.

7. A position in the First or Second Class will be considered honorable.

### SECTION VIII.—SCHOLARSHIPS.

#### 1ST. HALIFAX SCHOOLS.

A Scholarship entitling to free attendance on all the classes of the Undergraduate course, (provided the holder of it maintain throughout, a first or second class position) is offered by the Professors for competition this year, to Pupils from the Halifax Schools;—the competition to take place at the Matriculation Examination.



Pupils from the Halifax Schools must intimate to the Secretary of the Senate their intention of competing, on the opening day of the Session.

#### 2ND. PICTOU ACADEMY.

A Scholarship of equal value, and to be held under the same conditions, is offered this year for competition to Pupils attending the Pictou Academy; the award to be made after examination by the Principal of the Academy.

#### 3RD. YARMOUTH ACADEMY.

A Scholarship of equal value, and to be held under the same conditions, is offered this year for competition to Pupils attending the Yarmouth Academy, the award to be made after examination by the Principal of that Academy.

These Scholarships can be competed for only by Pupils who have attended the schools from which they come, for a period of not less than one year previous to the competition.

In all cases successful competitors must be able to pass creditably the Matriculation Examination of the College.

Should the Principal of either of the above Academies decline to examine, an examiner may be appointed by the Senate of Dalhousie College.

It is intended to offer Scholarships for competition next year to the pupils of the

HALIFAX SCHOOLS.

PRINCE OF WALES COLLEGE, Charlottetown.

NEW GLASGOW ACADEMY.

### **SECTION IX.—PRIZES AND CERTIFICATES OF MERIT.**

#### **I. Prizes.**

##### **1. UNIVERSITY PRIZES.**

Prizes will be awarded to those Undergraduates who occupy the first place in the examination in any of the following subjects, provided they stand in the first or second class, and pass in the other subjects of the year.

Classics.  
 Mathematics.  
 History.  
 Modern Languages.  
 Chemistry.  
 Natural Philosophy.  
 Rhetoric.

## 2. THE GRANT PRIZE.

A prize of \$20 is offered by the Rev. G. M. GRANT, M. A., for the best Essay on the following subject:

*"The genius and character of the Roman People."*

Competition is open to all Students of the years 1865-66 and 1866-67.

The Essays are to be sent in before the First of January, 1867, signed with mottoes, and accompanied by sealed envelopes containing the name of the competitor.

## 3. THE YOUNG PRIZES.

The following Prizes are offered by the HON. THE CHIEF JUSTICE of Nova Scotia:

*1st Prize* \$25.—To the most eminent Student of the third and fourth years, to be decided by the votes of the Students of those years.

*2nd Prize* \$15.—To the most eminent Student of the first and second years, to be decided by the votes of the Students of those years.

### Certificates of Merit.

Certificates of Merit will be given to Students who have obtained a first or second class standing in all the branches of study proper to the session.

In publishing the names of Students of the first and second years who obtain Prizes and Certificates of Merit, mention will be made of the Schools in which they received their preliminary education.

**SECTION X.—ATTENDANCE AND CONDUCT.**

1. All Undergraduates and Occasional Students attending more classes than one, are required to provide themselves with caps and gowns, and wear them in going to and from the College. Gowns are to be worn at Lectures, and at all meetings of the University.

2. Attendance upon all the classes of the year, except those which shall be announced as optional, shall be imperative on all Undergraduates.

3. A Class Book will be kept by each Professor in which the presence or absence of Students will be carefully noted.

4. Professors will mark the presence or absence of Students immediately before commencing the exercises of the class, and will note as absent those who enter thereafter, unless satisfactory reasons be assigned.

5. Absence or tardiness without sufficient excuse, and inattention or disorder in the Class Room, if persisted in after due admonition by the Professor, or the discipline proper to the class, will be reported to the Senate.

6. The amount of absence or tardiness which shall disqualify for the keeping of a Session will be determined by the Senate.

7. Injuries to the Building or Furniture will be repaired at the expense of the party by whom they have been caused, and such other penalty will be imposed as the Senate may think proper.

8. While in the College, and going to it or from it, Students must conduct themselves in an orderly manner. Any Professor observing any improper conduct in a Student will admonish him, and if necessary report to the Principal.

9. When Students are brought before the Senate and convicted of a violation of any of these rules, the Senate may reprimand privately or in the presence of all the Students, or report to the parents or guardians, or

disqualify for competing for Prizes or Certificates of Merit, or report to the Governors for suspension or expulsion.

10. Students not residing with parents or guardians must report to the Principal their places of residence within one week after their entering College, and the Principal may disallow such residence if he see good cause. Any change of residence must also be reported.

11. It is expected that every Student will attend divine service on Sunday.

## SECTION XI.—COURSE OF INSTRUCTION.

## CLASSICS.

JOHN JOHNSON, M. A., PROFESSOR.

## First Year.

LATIN.

Cicero, Pro Lege Manilia.

Virgil, Æneid, Book VII.

Prose Composition.

GREEK.

Xenophon, Anabasis, Book V.

Demosthenes, Olynthiac I.

## Second Year.

LATIN.

Livy, Book XXI.

Horace, Epistles, Book I.

Prose Composition.

History of Rome.

GREEK.

Herodotus, Book I.

Homer, Book VI.

Prose Composition.

History of Greece.

## Third Year.

LATIN.

Terence, Heautontimoroumenos.

Plautus, Miles Gloriosus.

Horace, Ars Poetica.

Prose Composition.

GREEK.

Euripides, Hippolytus.

Æschylus, Prometheus Vincetus.

Prose Composition.

Greek Drama.

**Fourth Year.****LATIN.**

Tacitus, Annals, Book I.

\*Juvenal, Satires, I, III, X, XIII.

Prose Composition.

**GREEK.**

Demosthenes, De Corona.

\*Æschines, Contra Ctesiphontem.

Comparative Philology.

**MATHEMATICS.**

CHARLES MACDONALD, M. A., PROFESSOR.

**First Year.**

Algebra.—To the end of Progressions.

Geometry.—Six books of Euclid, with Deductions.

Trigonometry.—Solution of Plane Triangles.

**Second Year.**

Algebra.—Binomial Theorem, Logarithms, Life Annuities, Probabilities.

Geometry.—Eleventh Book of Euclid, 21 Props.

Trigonometry.—Analytical, Plane and Spherical.

**Third Year.**

Angular Analysis.—DeMoivre's Theorem.

Theory of Equations; Conic Sections analytically;  
Differential Calculus. Mechanics.**Fourth Year.**Differential and Integral Calculus, and Conic  
Sections, with Application to Mechanics.  
Mechanics,

---

\*Additional for Prizes.

## BOOKS RECOMMENDED.

\*Young's Elementary course of Mathematics. Cassell's or Potts' Euclid.

The books in Weale's Series on Trigonometry, Conic Sections and Calculus.

Todhunter's Differential and Integral Calculus.  
Galbraith and Haughton's Mechanics.†

## ETHICS AND POLITICAL ECONOMY.

VERY REV. PRINCIPAL ROSS, D. D., PROFESSOR.

Fourth Year.

## ETHICS.

*Text Books.*—Stewart's Active and Moral Powers of Man.  
Whewell's Elements of Morality.

## POLITICAL ECONOMY.

*Text Books.*—Mill's Political Economy.  
Wayland's Political Economy.

## LOGIC, METAPHYSICS AND ESTHETICS.

REV. WILLIAM LYALL, LL.D., PROFESSOR.

Second Year.

## LOGIC AND PSYCHOLOGY.

*Text Books.*—Sir William Hamilton's Lectures on Logic.  
Prof. Lyall's "Intellect, the Emotions, and the Moral Nature."

\*Suffices for the course, except Geometry.

†For Students of the first year, the Mathematical Books used in the Schools for the most part are sufficient.

BOOKS USED.  
**Third Year.**

**METAPHYSICS AND ESTHETICS.**

*Text Books.*—Sir William Hamilton's *Lectures on Metaphysics.*

Mansel's *Metaphysics.*

Lewes' *Biographical History of Philosophy.*  
Cousin on the Beautiful.

Allison's *Essay on the Nature and Principles of Taste.*

**ETHICS AND POLITICAL ECONOMY.**

VERY REV. PRINCIPAL ROSS, D. D., PROFESSOR.

**CHEMISTRY AND MINERALOGY.**

GEORGE LAWSON, PH. D., LL. D., PROFESSOR.

**Second Year.**

**JUNIOR CHEMISTRY.**

*Text Book.*—Chambers's *Chemistry* by Macadam.

**Third Year.**

**SENIOR CHEMISTRY.**

*Text Book.*—Fownes' *Chemistry*, (or Gregory's).

**PRACTICAL CHEMISTRY.**

*Laboratory Books.*—Fresenius's *Qualitative and Quantitative Analysis.*

Bowman's *Medical Chemistry.*

**MINERALOGY AND GEOLOGY.**

Nichols' or Dana's *Mineralogy.*

Dana's *Manual of Geology.*

Dawson's *Acadian Geology.*



## NATURAL PHILOSOPHY.

### EXPERIMENTAL PHYSICS.

VERY REV. PRINCIPAL ROSS, D. D., PROFESSOR.

#### Third Year.

*Text Book.*—Lardner's Handbook.

#### Fourth Year.

*Text Book.*—Lardner's Handbook.

### MATHEMATICAL PHYSICS.

CHARLES MACDONALD, M. A., PROFESSOR.

#### Third Year.

*Text Books.*—Lardner's Handbook.

Galbraith and Haughton's *Mechanics*.

---

## HISTORY AND RHETORIC.

JAMES DEMILL, M. A., PROFESSOR.

#### First Year.

### RHETORIC.

*Text Books.*—Whately's *Elements of Rhetoric*.

Campbell's *Philosophy of Rhetoric*.

Latham's *Handbook of the English Language*.

Essays once a fortnight.

#### Fourth Year.

### HISTORY.

*Text Books.*—Gibbon's *Decline and Fall of the Roman Empire*.

Hume's *History of England*.

Martin's *History of France*.

Hallam's *Middle Ages*.

Sismondi's *Italian Republics*.

Taylor's *Manual of Modern History*.

*Books  
Recommended.*

Guizot's History of Civilization.  
Michelet's History of France.  
Hallam's Constitutional History.

---

**MODERN LANGUAGES.**

JAMES LIECHTI, ESQ., TUTOR.

**Third Year.**

FRENCH.

Pujol's Grammar, (first part.)  
Peschier's Entretiens Familiars.

GERMAN.

Ahn's Grammar, (Meissner.)  
Adler's Reader.

**Fourth Year.**

FRENCH.

Pujol's Grammar, (second part.)  
Peschier's Causeries Parisiennes.

GERMAN.

Otto's Conversation Grammar.  
Adler's Reader.  
A Play of Schiller.

## List of Graduates, Undergraduates and Occasional Students.

### GRADUATES.

#### DEGREE OF B. A.

Chase, Henry J., Cornwallis.  
Shaw, Robert, New Perth, P. E. I.

### UNDERGRADUATES, 1865-6.

#### FOURTH YEAR.

Burgess, Joshua A., Cornwallis.  
Chase, Henry J., Cornwallis.  
Shaw, Robert, New Perth, P. E. I.

#### THIRD YEAR.

Cameron, J. J., Georgetown, P. E. I.  
Lippincott, Aubrey, New Glasgow.  
MacDonald, J. H., Cornwallis.  
MacNaughton, Samuel, Pictou.  
Ross, Alexander, Pictou.  
Sedgewick, Robert, Middle Musquodoboit.  
Smith, David, Truro.

#### SECOND YEAR.

Carr, Arthur F., St. Edwards, P. E. I.  
Creighton, James G. A., Halifax.  
Gordon, Æneas G., Scotch Hill.  
Forrest, James, Halifax.  
McKenzie, J. W., Pictou.  
Meek, John C., Rawdon.

#### FIRST YEAR.

Annand, Joseph, Gay's River.  
Campbell, Donald, East River, Pictou.  
Campbell, John, Lake Ainslie, C. B.  
Campbell, Gordon, Sherbrooke.  
Cameron, Alexander H., New Glasgow.  
Fraser, Alexander, New Glasgow.  
Fraser, Duncan, New Glasgow.  
MacKenzie, John J., Green Hill.  
Richard, John J., West River, Pictou.  
Sutherland, John R., West River, Pictou.  
Thompson, Alexander F., Antigonishe.  
Webster, Barclay, Kentville.

## OCCASIONAL STUDENTS.—1865-6.

NAME.	RESIDENCE.	SUBJECTS.
Archibald, Howard	Truro.	French.
Christie, Thomas	Yarmouth.	Clas. Math. Logic.
Crowe, Eutyclus	Halifax.	Chemistry.
Dickie, Alfred	Maitland.	Clas. Eth. & P. Econ
Fraser, Charles	Cavendish, P.E.I.	Logic, Clas. Eth. Fr
Faetwell, R. J.	Halifax.	French.
Gow, John	Lunenburg.	Class. Math. Meta. Nat. Phil.
Grant, Edward	Pictou.	Clas. Ethics, Chem. Mod. Lang.
Grant, William	Pictou.	Clas. Chem. Ethics.
Gunn, Samuel	Pictou.	Classics, Ethics.
Johnstone, Wm.	Pictou.	Clas. Math. Chem.
Kelly, Fred. W.	Stewiacke.	Clas. Math. Rhet.
Layton, Jacob	Londonderry.	Clas. Eth. Pol. Eco.
Leishman, John	Richibucto, N.B.	Clas. Logic, Meta.
Maxwell, Arch.	Pictou.	Clas. Rhet. Chem.
McDonald, J. F.	Gay's River.	Rhet. Chem.
Murray, Hezekiah	Mabou, C.B.	Clas. Math. Rhet.
Nelson, J. W.	Shubenacadie.	Chemistry.
Parker, Samuel	Halifax.	Lat. Mat. Rhet. Fr.
Robinson, W. S.	Baillie, St Jas. N.B.	Nat. Philosophy.
Scott, Hugh	Sherbrooke.	Clas. Math. Rhet.
Seeton, Parker	Halifax.	Latin, Rhet. Prac. Chemistry.
Smith, Edwin	Truro.	Clas. Mat. Met. His.
Smith, J. P.	Pictou.	Clas. Chemistry.
Stairs, J. F.	Halifax.	Chemistry.
Urquhart, Alex.	Elmsdale.	Math. French.
Waddel, Sherburne	Sheet Harbor.	Clas. Mat. Mo. Lan.
Young, Alex.	Halifax.	Clas. Rhetoric.

## EXAMINATIONS, 1865-6.

## Prize List,

## UNIVERSITY PRIZES.

## Fourth Year.

Classics.	Shaw, Robert.
Ethics and Political Economy.	Shaw, Robert.
History.	Shaw, Robert.
Chemistry.	Burgess, Joshua C.

## Third Year.

Classics.	Ross, Alex.
Mathematics.	Ross, Alex.
Natural Philosophy.	Ross, Alex.
French.	McNaughton, Samuel.

## Second Year.

Classics.	Gordon, Aeneas, Pictou Academy.
Mathematics.	Carr, Arthur F., Prince of Wales College, Charlottetown, P. E. I.
Logic & Psychology.	Carr, Arthur F.

## First Year.

Classics.	McKenzie, J. J., Durham, West River, Pictou.
Mathematics.	McKenzie, J. J., West River, Pictou.
Rhetoric.	McKenzie, J. J., " " "

## CERTIFICATES OF GENERAL MERIT.

## Fourth Year.

Class I.—Shaw, Robert.

## Third Year.

None.

Second Year.

Class I.—None.

Class II.—Carr, Arthur F., Prince of Wales College.  
Gordon, Æneas, Pictou Academy.

First Year.

Class I.—McKenzie, J. J., Durham.

Class II.—Annand, Joseph—Private Study.

Fraser, Alexander, New Glasgow.

Fraser, Duncan C., Normal School, Truro.

Sutherland, John M., New Glasgow  
Academy.

GRANT PRIZE.

The Grant Prize of Five Pounds for the best Essay on  
"Hume's Argument on Miracles" was awarded to  
Chase, Joseph Henry.

Pass List.

Examination for Degree of B. A.

Chase, Joseph Henry, Cornwallis.

Shaw, Robert, New Perth, P. E. I.

Examination of Third Year.

McNaughton, Samuel.

Ross, Alexander.

Examination of Second Year.

Carr, Arthur F.

Forrest, James.

Gordon, Æneas.

Examination of First Year.

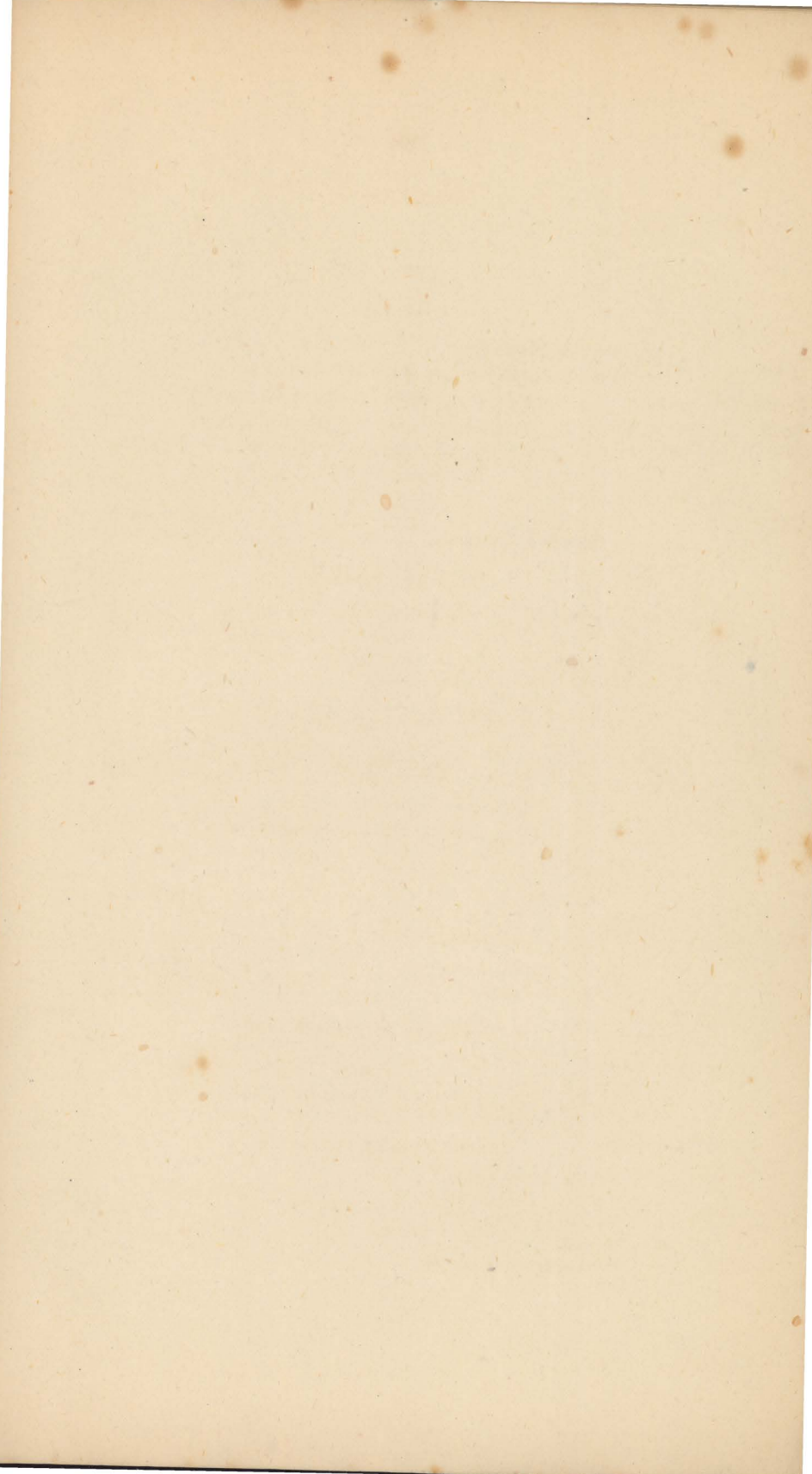
Annand, Joseph.

Fraser, Alexander.

Fraser, Duncan.

McKenzie, J. J.

Sutherland, John M.



## Second Year.

Class I.—None.

Class II.—Carr, Arthur F. Prince of Wales College,  
Gordon, Bucks, Picton Academy.

## First Year.

Class I.—McKenzie, J. J. Darham.

Class II.—Annand, Joseph—Private Study.

Fraser, Alexander, New Glasgow.

Fraser, Duncan C. Normal School, Traquair.

Sutherland, John M., New Glasgow  
Academy.

## GRANT PRIZE.

The Grant Prize of Five Pounds for the best Essay on  
*Hume's Argument on Miracles* was awarded to  
 Chase, Joseph Henry.

## Pass List.

## Examination for Degree of B. A.

Chase, Joseph Henry, Cornwallis.

Shaw, Robert, New Perth, P. E. I.

## Examination of Third Year.

McNaughton, Samuel.

Rose, Alexander.

## Examination of Second Year.

Carr, Arthur F.

Forrest, James.

Gordon, Angus.

## Examination of First Year.

Annand, Joseph.

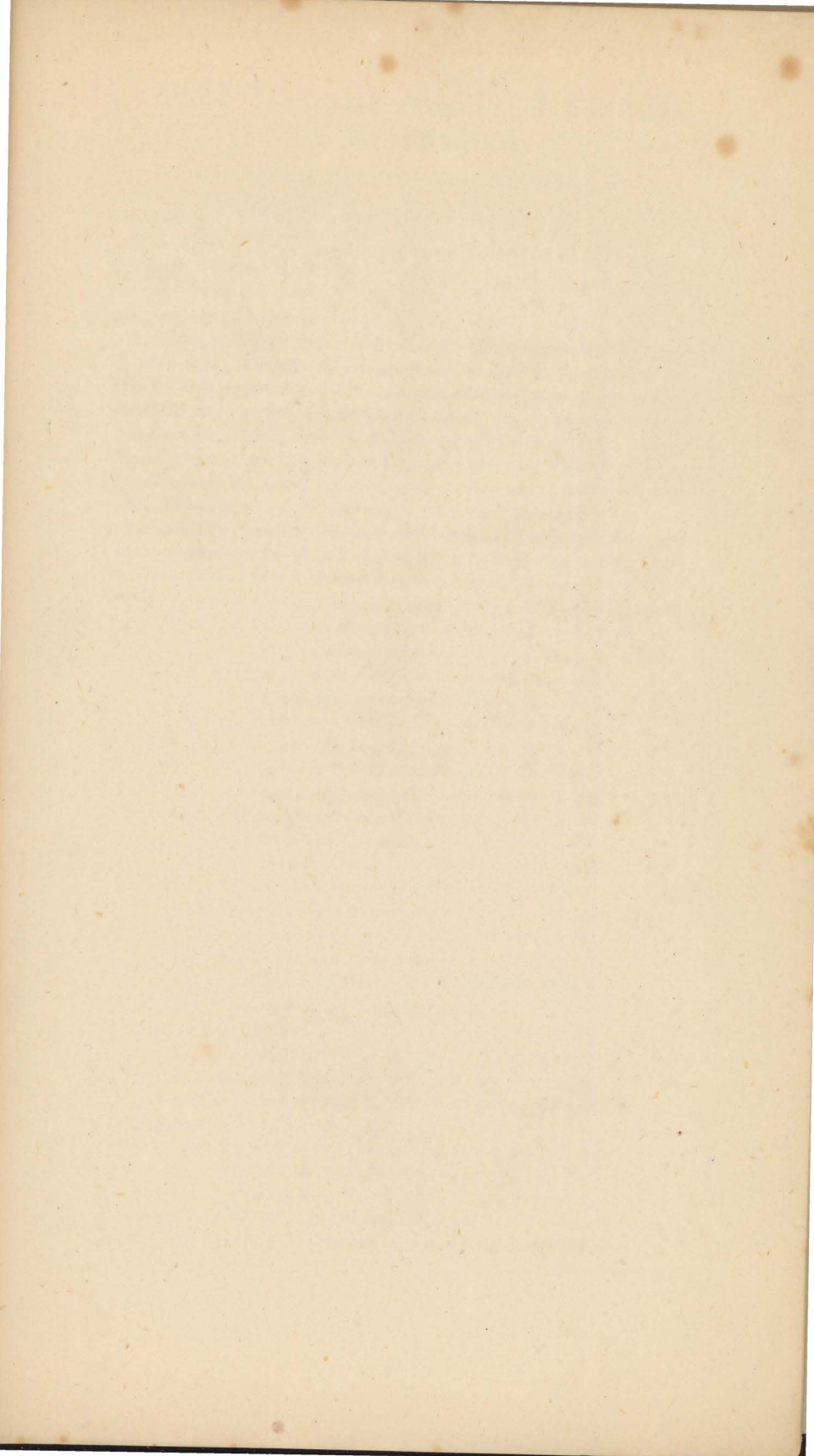
Fraser, Alexander.

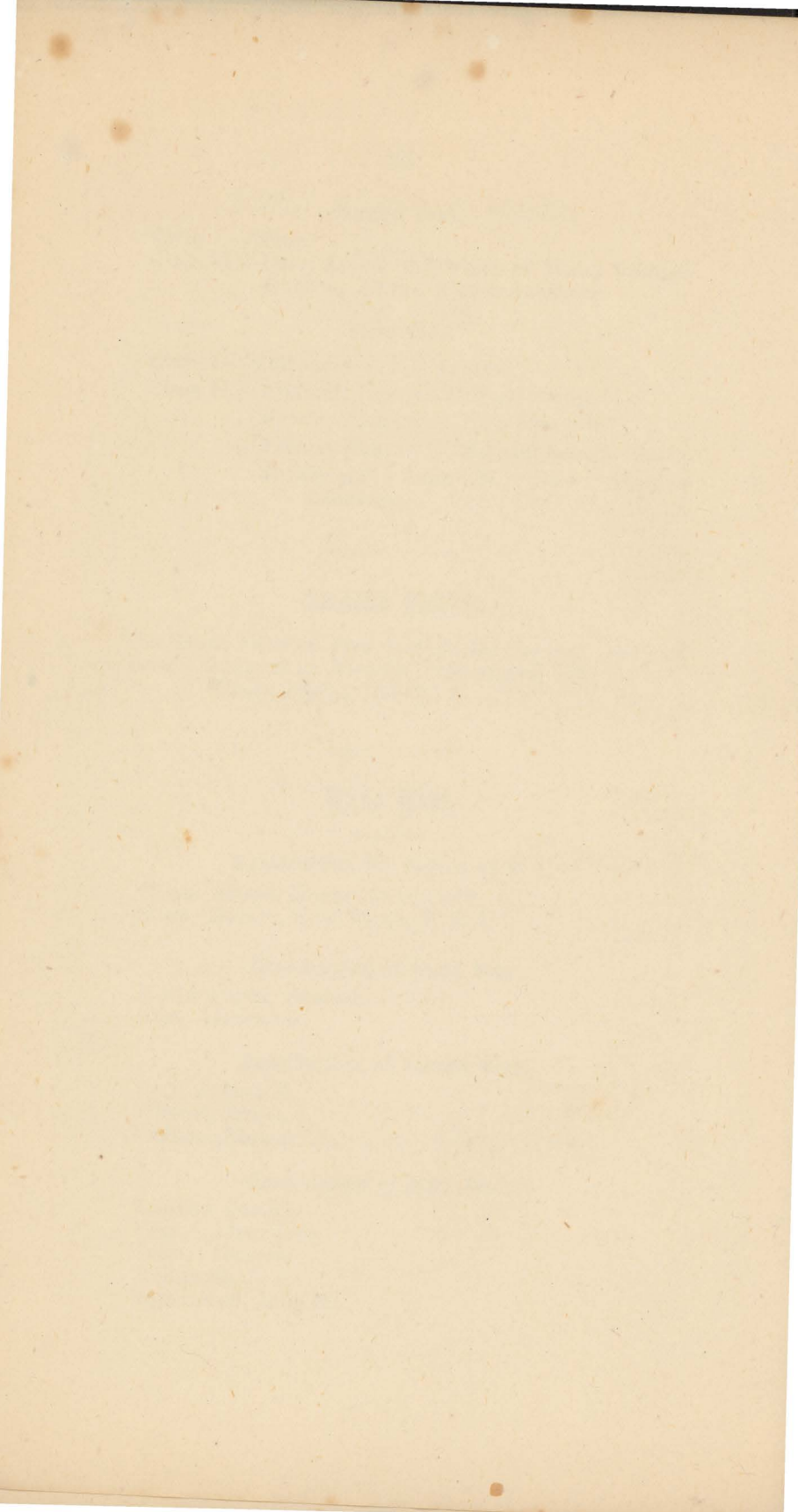
Fraser, Duncan.

McKenzie, J. J.

Sutherland, John M.







DALHOUSIE COLLEGE AND UNIVERSITY  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS  
MAY 1884

1883-84 - THIRD YEAR  
PHYSIOLOGY

I. a. The student is to write a paper on the following subjects: -  
1. The function of the heart.

2. The function of the lungs.

3. The function of the liver.

4. The function of the stomach.

5. The function of the intestines.

6. The function of the kidneys.

7. The function of the bladder.

8. The function of the uterus.

9. The function of the vagina.

10. The function of the ovaries.

11. The function of the fallopian tubes.

12. The function of the placenta.

13. The function of the umbilical cord.

14. The function of the milk glands.

15. The function of the mammary glands.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, MARCH 26, 9 A. M., to 1 P. M.

LATIN.—FIRST YEAR.

CICERO; ORATIONS AGAINST CATALINE, I. IV.—VIRGIL; ÆNEID,  
BOOK VI.

1. *a.* Translate:—Etenim quæro, si quis paterfamiliaz, liberis suis a servo interfectis, uxore occisa, incensa domo, supplicium de servi non quam acerbissimum sumpserit, utrum is clemens ac misericors an inhumanissimus et crudelissimus esse videatur? Mibi vero importunus ac ferreus qui non dolore ac cruciatu nocentis suum dolorem cruciatumque lenierit. Sic nos in his hominibus, qui nos, qui conjuges, qui liberos nostros trucidare voluerunt, qui singulas unius cujusque nostrum domos et hoc universum reipublicæ domicilium delere conati sunt, qui id egerunt ut gentem Allobrogum in vestigiis hujus urbis atque cinere deflagrati imperii collocarunt, si vehementissimi fuerimus, misericordes habebimur, sin remissiores esse voluerimus, summæ nobis crudelitatis in patriæ civiumque pernicie fama subeunda est.  
*Orat. in Cat. IV. 6.*

*b.* Incipit Æneas heros: Non ulla laborum.

O virgo, nova mi facies inopinave surgit:

Omnia præcepi atque animo mecum ante peregi.

Unum oro: quando hic inferni janua regis

Dicitur et tenebrosa palus Acheronte refuso,

Ire ad conspectum cari genitoris et ora

Contingat; doceas iter et sacra ostia pandas.

Illum ego per flammam et mille sequentia tela

Eripui his hœmeris, medioque ex hoste recepi;

Ille meum comitatus iter maria omnia mecum,

Atque omnes pelagique minas cœlique ferebat,

Invalidus, vires ultra sortemque senectæ.

Quin, ut te supplex peterem et tua limina adirem,

Idem orans manadata dabat. Gnatique patrisque

Alma, precor, miserere; potes nam omnia, nec te

Nequiquam lucis Hecate præfecit Avernis.

Si potuit Manes arcessere conjugis Orpheus,

Threicia fretus cithara fidibusque canoris,

Si fratrem Pollux alterna morte redemit,

Itque reditque viam totiens—quid Thesea magnum,

Quid memorem Alciden? et mi genus ab Jove summo.

*Æn. vi. 163-123.*

2. Parse the first sentence of extract (*a*), and the lines "Quin ut te . . . Avernis," giving the rules for case and mood.

3. Supply the ellipses in the sentences "Mibi vero . . ." (*a*), "Si potuit Manes . . ." (*b*). Explain the use of different moods in the relative sentences "qui non dolore . . . lenierit," "qui liberos trucidare voluerunt."

4. Decline: "paterfamilias", "domo", "conjuges", "liberos" "reipublicæ", "cinere"—"virgo", "ora," "mille", "maria", "pelagi" "minas" "cœli".

5. Conjugate: "Incipit", "surgit" "peregi" "dicitur", "contingat", "pandas", "ferebat" "petcrem" "arcessere" "redemit" "memorem".

6. a. Give the meaning and derivation of these words: *nudiustertius*, *hodie*, *sempiternus*, *conjux*, *judico*, *egregius*, *provincia*, *alienigena*, *negligo*, *Avernus*, *exanimis*, *comes*, *securis*. b. Scan vss. 103-106.

7. Relate the myths alluded to in vss. 119 123.

8. When and where was the Fourth oration against Cataline delivered? What object did Cicero gain by it? What became of Cataline? How old was Cicero at the time of his Consulship? When and where did he die? What facts are known about Virgil?

9. In what respects did the higher magistracies of Rome differ from those of modern States? When and why were Censors first appointed? Describe their duties.

10. When is a sentence beginning with *that* translated by the *acc.* and *inf.* in Latin? When by the *subjunctive* with *ut* and *ne*? How is the tense determined in the latter case? When is the English *infinitive* translated by the *subj.* with *ut* or *ne*? How are *simple* and *double interrogative* sentences introduced? What verbs are followed by the *dative*? Explain the phrase *mea refert*.

1. The first part of the book is devoted to a general introduction to the subject of the history of the world. It discusses the various theories of the origin of the world and the different views of the progress of civilization. It also touches upon the different stages of human development and the various forms of government.

2. The second part of the book is devoted to a detailed account of the history of the world from the beginning of time to the present. It covers the different periods of human history and the various events that have shaped the world as we know it today.

3. The third part of the book is devoted to a discussion of the different forms of government and the various theories of political philosophy. It examines the different types of government and the principles that should guide the conduct of a state.

4. The fourth part of the book is devoted to a discussion of the different forms of religion and the various theories of the origin of the world. It examines the different religions and the principles that should guide the conduct of a religious community.

5. The fifth part of the book is devoted to a discussion of the different forms of art and the various theories of the origin of the world. It examines the different forms of art and the principles that should guide the conduct of an artist.

6. The sixth part of the book is devoted to a discussion of the different forms of science and the various theories of the origin of the world. It examines the different forms of science and the principles that should guide the conduct of a scientist.

7. The seventh part of the book is devoted to a discussion of the different forms of philosophy and the various theories of the origin of the world. It examines the different forms of philosophy and the principles that should guide the conduct of a philosopher.

8. The eighth part of the book is devoted to a discussion of the different forms of literature and the various theories of the origin of the world. It examines the different forms of literature and the principles that should guide the conduct of a writer.

9. The ninth part of the book is devoted to a discussion of the different forms of music and the various theories of the origin of the world. It examines the different forms of music and the principles that should guide the conduct of a musician.

10. The tenth part of the book is devoted to a discussion of the different forms of dance and the various theories of the origin of the world. It examines the different forms of dance and the principles that should guide the conduct of a dancer.

11. The eleventh part of the book is devoted to a discussion of the different forms of drama and the various theories of the origin of the world. It examines the different forms of drama and the principles that should guide the conduct of a dramatist.

12. The twelfth part of the book is devoted to a discussion of the different forms of poetry and the various theories of the origin of the world. It examines the different forms of poetry and the principles that should guide the conduct of a poet.

13. The thirteenth part of the book is devoted to a discussion of the different forms of painting and the various theories of the origin of the world. It examines the different forms of painting and the principles that should guide the conduct of a painter.

14. The fourteenth part of the book is devoted to a discussion of the different forms of sculpture and the various theories of the origin of the world. It examines the different forms of sculpture and the principles that should guide the conduct of a sculptor.

15. The fifteenth part of the book is devoted to a discussion of the different forms of architecture and the various theories of the origin of the world. It examines the different forms of architecture and the principles that should guide the conduct of an architect.

16. The sixteenth part of the book is devoted to a discussion of the different forms of engineering and the various theories of the origin of the world. It examines the different forms of engineering and the principles that should guide the conduct of an engineer.

17. The seventeenth part of the book is devoted to a discussion of the different forms of medicine and the various theories of the origin of the world. It examines the different forms of medicine and the principles that should guide the conduct of a physician.

18. The eighteenth part of the book is devoted to a discussion of the different forms of law and the various theories of the origin of the world. It examines the different forms of law and the principles that should guide the conduct of a lawyer.

DALHOUSIE COLLEGE AND UNIVERSITY

MALIBAX, N. S.
REGIONAL EXAMINATION
MAY 1911
LATE - SECOND YEAR

PHYSICS PART I - THE MECHANICAL PRINCIPLES

1. A particle of mass m moves in a straight line with a constant acceleration a. It starts from rest at the origin of a coordinate system at time t = 0. Show that the distance s travelled in time t is given by s = 1/2 at^2. Also show that the velocity v at time t is given by v = at.

2. A particle of mass m moves in a circle of radius r with a constant angular velocity omega. Show that the centripetal acceleration a is given by a = omega^2 r. Also show that the velocity v is given by v = omega r.

3. A particle of mass m moves in a parabolic path y = ax^2. Show that the acceleration a is constant and directed towards the vertex of the parabola.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, MARCH 26TH, 9 A. M. to 1 P. M.

LATIN.—SECOND YEAR.

LIVY: BOOK XXI. CHAPS. 1-40. HORACE: EPISTLES  
BOOK I.

1. *a.* Translate:—Hannibal, Sagunta capto, *Carthaginem* novam in hiberna concesserat. Ibi *quæ auditis*, quæ *Romæ*, quæque *Carthagine* acta decretaque forent, sequi non ducem solum, sed etiam causam esse belli, partitis deventisque reliquiis prædæ, nihil ultra *differendum* ratus, Hispani generis milites convocat: 'Credo ego vos,' inquit, 'socii, et ipsos cernere, pacatis omnibus Hispaniæ populis, aut finiendam nobis militiam exercitusque dimittendosque, aut in alias terras transferendum bellum: ita enim hæ gentes non pacis solum, sed etiam victoria, bonis floreant, si in aliis gentibus prædam et gloriam quæremus. Itaque, quum longinqua ab domo *instet* militia, incertumque sit, quando domos vestras, et quæ cuique ibi cara sunt, *visuri sitis*, si quis vestrum suos invisere vult, commeatum do. Primo vere, edico, *adsitis*; at, Diis bene juvantibus, bellum ingentis *gloriæ* prædæque futurum incipiamus.

*b.* Si potes Archiacis conviva recumbere lectis,  
Nec modica *cœnare times olus* omne patella,  
Supremo te sole domi, Torquate, manebo.  
Vina bibes *iterum Tauro* diffusa palustres  
Inter Minturnas Sinuessanamque Petrinum.  
Si melius quid habes arcesse vel imperium fer.  
Jamdudum splendet focus et tibi munda supellex.  
Mitte leves spes et certamina divitiarum  
Et Mosehi causam: cras nato Cæsare festus  
Dat veniam somnumque dies; impune licebit  
*Æstivam* sermone benigno tendere noctem.  
*Quo vihi fortunam*, si non conceditur uti?  
Parcus ob heredis curam nimiumque severus  
Assidet insano: potare et spargere flores  
Incipiam, patiarque vel inconsultus haberi.  
Quid non ebrietas designat? operta recludit,  
Spes jubet esse ratos, ad prælium trudit inertem;  
Sollicitis animis onus eximit, addocet artes.  
Fecundi calices quem non in paupertate solutum?  
*Hæc ego procurare et idoneus imperor* et non  
Invitus, ne turpe toral, ne sordida mappa  
Corruget nares, ne non et cantharus et lanx



Ostendat tibi te, ne fidos inter amicos  
 Sit qui dicta foras eliminat, ut coeat par  
 Jungaturque pari. Butram tibi Septicumque,  
 Et nisi cœna prior potiorque puella Sabimur  
 Detinet, assuman; locus est et pluribus umbris:  
 Tu quotus esse velis rescribe, et rebus omissis  
 Atria servantem postico falle clientem.

2. Parse the words which are printed in Italics and illustrate unusual constructions by similar examples.

3. Write notes on the following words: "Archiacis lectis," "vina diffusa," "cras nato Cæsare," "cœna," "umbris," "atria," "postico," "clientem."—*Mancipia, fasces, curule ebur, Cœrite era digni, mediastinus, grammatici.*

4. a. Decline "reliquiis," "vere," "olus," "supellex," "nares," "locus." Conjugate "invisere," "juvantibus," "arcesse," "tendere," "potare," "operta," "eximit," "corruget," "falle."

5. Give the etymology and meaning of these words: *cœna, atrium, curule, supellex, arcesso, mediastinus, cheragra, sodes, compesco, ampullor, fomentum, designator, quadrigæ, annonæ, comitia, consul.*

6. Mention the immediate causes of the Punic Wars. How long did each last? Which were the chief battles in the Second? Give their dates. When did Rome complete the conquest of Italy? On what principles did the Romans govern it? Trace Hannibal's march to Italy.

7. Where and when was Horace born? Why did he go to Athen? What caused him to leave it? What style of poetry did he introduce into Latin literature? What title did he give himself in consequence?

8. Turn Hannibal's speech in extract (a) into the form of the *oratio obliqua*. How are questions asked in *or. obl.*?

9. Mention the principal cases in which the relative is followed by the *subjunctive* mood.

10. Translate into Latin:—So great alarm was carried to Rome from this defeat, that they believed the enemy would come at once to the city; and that there was no hope or help by which they might prevent an attack on the gates and city. When two consular armies were defeated, what other generals (said they,) what other armies were there to be summoned?

...the ... of ...  
...the ... of ...  
...the ... of ...  
...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...

...the ... of ...



DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, MARCH 26, 9 A. M., to 1 P. M.

VIRGIL; GEORGICS I. IV.—TERENCE; ADELPHI.—HORACE; ARS  
POETICA.

LATIN.—THIRD YEAR.

I. Translate :—

a. Si quando sedem angustam servataque mella  
Thesauris relines, prius haustu sparsus aquarum  
Ora fove, fumosque manu prætende sequacis.  
Bis gravidos cogent fetus, duo tempora messis,  
Taygete simul os terris ostendit honestum  
Plias et oceani spretos pede reppulit amnis,  
Aut eadem sidus fugiens ubi Piscis aquosi  
Tristior hibernas cœlo descendit in undas.  
Illis ira modum supra est, læsæque venenum  
Morsibus inspirant, et spicula cœca relinquunt  
Adfixæ venis, animasque in vulnere ponunt.  
Sin duram metues hiemem parcesque futuro  
Contunsoque animos et res miserabere fractas :  
At suffire thymo cerasque recidere inanis  
Quis dubitet? Nam sæpe favos ignotus adedit  
Stellio et lucifugis congesta cubilia blattis  
Immunisque sedens aliena ad pabula fucus.

GEOR. IV. 228 244.

b. \* \* \* \* \* *Syrus.* Timet :  
Injeci scrupulum homini. *Sannio.* O scelera : illud vide,  
Ut in ipso articulo oppressit. emptæ mulieres  
Complures et item hinc alia quæ porto Cyprum.  
Nisi eo ad mercatum venio, damnum maximumst.  
Nunc si hoc omitto ac tum agam ubi illinc rediero,  
Nil est ; refrixerit res : ' nunc demum venis ?  
Quor passu's ? ubi eras ?' ut sit satius perdere  
Quam aut nunc manere tam diu aut tum persequi.  
*Sy.* Jamne enumerasti id quod ad te rediturum putes ?  
*Sa.* Hocine illo dignumst ? hocine incipere Aeschinum ?  
Per oppressionem ut hanc mi eripere postulet ?  
*Sy.* Labascit. unum hoc habeo : vide si satis placet :  
Potius quam venias in periculum, Sannio,  
Seruesne an perdas totum, diuiduom face.  
Minas decem conradet alicunde. *Sa.* Ei mihi,  
Etiam de sorte nunc venio in dubium miser ?

ADELPH. II. ii 227-242

c. *Sy.* Edepol, Syrisce, te curasti molliter  
Lauteque munus administrasti tuom.  
Abi. sed postquam intus sum omnium rerum satur,  
Prodeambulare huc lubitumst. *Demea.* Illud sis vide  
Exemplum disciplinæ. *Sy.* Ecce autem hic adest

Senex noster. quid fit? quid tu es tristis? *De.* Oh scelus.  
*Sy.* Ohe jam: tu verba fundis hic, sapientia?  
*De.* Tu si meus esses . . . *Sy.* Dis quidem esses, Demea  
 Ac tuam rem constabilisses. *De.* Exemplo omnibus  
 Curarem ut esses. *Sy.* Quam ob rem? Quid feci? *De.*  
 Rogas?

In ipsa turba atque in peccato maximo,  
 Quod vix sedatum satis est, potasti, scelus,  
 Quasi re bene gesta. *Sy.* Sane nollem huc exitum.

AD. IV. viii. 763-775.

- d.* Neve minor, neu sit quinto productior actu  
 Fabula, quæ posci vult, et spectata reponi.  
 Nec Deus intersit, nisi dignus vindice nodus  
 Inciderit: nec quarta loqui persona laboret.  
 Actoris partes choras officiumque virile  
 Defendat; neu quid medios intercinat actus,  
 Quod non proposito conducatur, et hæreat apte.  
 Ille bonis faveat que, et consilietur amicis,  
 Et regat iratos, et amet peccare timentes:  
 Ille dapes laudet mensæ brevis; ille salubrem  
 Justitiam, legesque, et apertis otia portis;  
 Ille tegat commissa: Deos precatur et oret  
 Ut redeat miseris, abeat fortuna superbis.

HOR. A. P. 189 200.

2. Write notes where the grammatical construction or different readings in these extracts seem to you to require explanation.
3. Explain the dramatic rules laid down by Horace in extract *d.*
4. *a.* Analyze these words and give others of similar formation: *præterea, illum, ain, scilicet, uspiam, quorsum, quoniam, istuc, Sis.*  
*b.* Derive *nego, meridiæ, arcesso, reprehendo, silicernium, purgo.* Trace the meanings of *puto, despondeo, cerno, censeo, expergiscor.*
5. In what metre were the early Roman ballads written? Give a scheme and an example of it. By whom and when were Grecian metres introduced into Latin literature?
6. What metres are used in Terence? Two methods have been proposed for overcoming certain difficulties in the scansion of them? Scan the first six lines of (*c.*)
7. When did *Histriones* first come to Rome? Describe their performances. Name the principal Latin dramatists. When was the *Adelphi* first performed? What was the chief difference between a Grecian and a Roman Theatre?
8. A spurious epitaph briefly describes Virgil's life and writings? What authors did he imitate in the *Georgics*?
9. Translate into Latin:—Whilst these occurrences were taking place in Italy, the war was proceeding no less vigorously in Spain: but up to this time more favorably for the Romans. When Publius and Cnæus Scipio had divided their forces with each other, in order that Cnæus might conduct the war by land, and Publius by sea. Hasdræbal, the Carthaginian General, not having sufficient confidence in either kind of his forces, kept aloof from the enemy, until four thousand infantry and five hundred cavalry were sent from Africa to reinforce him.

177

1. What notes does the experimental constitution of different  
 metals in their states of purity you are to be prepared to  
 explain the present state of the art in the history of  
 2. A Analyze these notes and give an account of the  
 progress of the art in the history of the art in the  
 3. Trace the progress of the art in the history of the art  
 4. In what manner was the art of the art of the art  
 science and of the art of the art of the art of the art  
 names introduced into the art of the art of the art of the art  
 5. What names are used in the art of the art of the art of the art  
 proposed for the naming of the art of the art of the art of the art  
 6. How the first six names of the art of the art of the art of the art  
 7. When did the art of the art of the art of the art of the art  
 performance. Name the principal parts of the art of the art of the art  
 the art of the art of the art of the art of the art of the art of the art  
 a Greek and a Roman. Name the art of the art of the art of the art of the art  
 8. A question which is the art of the art of the art of the art of the art  
 What authors did the art of the art of the art of the art of the art of the art  
 9. Describe the art of the art of the art of the art of the art of the art of the art  
 given in this art of the art of the art of the art of the art of the art of the art  
 put up in the art of the art of the art of the art of the art of the art of the art  
 and (and) being published in the art of the art of the art of the art of the art of the art  
 the art of the art of the art of the art of the art of the art of the art of the art  
 the art of the art of the art of the art of the art of the art of the art of the art  
 the art of the art of the art of the art of the art of the art of the art of the art  
 in order that the art of the art of the art of the art of the art of the art of the art  
 toward the art of the art of the art of the art of the art of the art of the art of the art  
 the art of the art of the art of the art of the art of the art of the art of the art of the art

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, MARCH 26, 9 A. M., to 1 P. M.

LATIN—FOURTH YEAR.

TACITUS: ANNALS, BOOK I.

1. Translate *a.* Chap. XXVII.  
*b.* Chap. XLIII.  
*c.* Chap. LXIV.
2. Describe the administration of the *Provinces* in the time of Augustus. What were the boundaries of the Empire at his death?
3. Trace the changes in the enlistment and organization of the Roman armies?
4. What are the *elements* of Language? How many kinds are there? How are languages classified with respect to them.
5. What is meant by the *genealogical* classification of Languages? What tests are to be employed in this classification? Arrange the following languages by *Family* and *Class*:—*English, Irish, French, Hungarian, Hebrew, Greek, Hindustani, Cuneiform Inscriptions of Ninevah, Gipsy.*
6. State in a general form *Grimm's Law*. What is meant by the *law of divergent articulation*? Give an example of it.
7. Give words in Latin and Greek cognate to these:—*who, that, same, bier, yesterday, garden, child, king, wit, hound, foot, be, can*: mentioning the laws of the changes.
8. Trace back these words to their originals:—*chamber, gender, bishop, piano, page* (an attendant), *age, chief, leisure, meagre, mais, autre, choux, feu, queue, malgre, y, encore, epitre, etat*. In each case give another example of similar changes.
9. Enumerate the cases of the Sanscrit noun? To which of them does the Latin *Dative* probably correspond? What was the original termination of the *Nom. Sing* of *Mas.* and *Fem.* nouns in Latin and Greek? Why are the *Nom. Acc.* and *Voc.* of *neuter* nouns alike? There is a trace of the old termination of the *Abl. Sing.* in classical Latin.
10. Analyse these verbal forms and explain clearly the origin of each part: *sumus, eram, fio, audiebat, monui, suasit, cecidimus*;—*loveth, am, hears*;—*a t-il, jetais, nous chanterons*.
11. Translate into Latin:—It had been Cæsar's policy to spare the wealth of the provinces which he wished to attach to his side, and his system was directly opposed to the confiscation of his enemies' estates, but his want of ready money was urgent, and it was in arranging the quarrels of a dependent kingdom that the best opportunity might be found for exacting it. This undoubtedly was the urgent motive which impelled him to intrude on the affairs of a jealous people, in which his principal designs were in no way implicated.

ADDITIONAL FOR PRIZE: CICERO DE OFFICIIS LIB I.

Translate Chap. XXXIV.

1. Transcribe in Latin XXVII

2. Class XXVIII

3. Class XXIX

4. Describe the administration of the Province of the Rhine at the time of Agricola. What were the functions of the Praefectus of the Rhine? How did Agricola change the relations of the Emperor and the Province?

5. What was the character of Agricola's policy? How many tribes did he subvert? How did Agricola's conduct with respect to the

6. What is meant by the geographical position of Agricola's Province? What was the character of the Province? How did Agricola's policy

7. What was the character of Agricola's policy? How did Agricola's policy

8. What was the character of Agricola's policy? How did Agricola's policy

9. What was the character of Agricola's policy? How did Agricola's policy

10. What was the character of Agricola's policy? How did Agricola's policy

11. What was the character of Agricola's policy? How did Agricola's policy

12. What was the character of Agricola's policy? How did Agricola's policy

13. What was the character of Agricola's policy? How did Agricola's policy

14. What was the character of Agricola's policy? How did Agricola's policy

15. What was the character of Agricola's policy? How did Agricola's policy

16. What was the character of Agricola's policy? How did Agricola's policy

17. What was the character of Agricola's policy? How did Agricola's policy

18. What was the character of Agricola's policy? How did Agricola's policy

19. What was the character of Agricola's policy? How did Agricola's policy

20. What was the character of Agricola's policy? How did Agricola's policy

21. What was the character of Agricola's policy? How did Agricola's policy

22. What was the character of Agricola's policy? How did Agricola's policy

23. What was the character of Agricola's policy? How did Agricola's policy

24. What was the character of Agricola's policy? How did Agricola's policy

25. What was the character of Agricola's policy? How did Agricola's policy





DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX.

SESSIONAL EXAMINATIONS, 1866.

TUESDAY, MARCH 27TH.

GREEK—FIRST YEAR.

XENOPHON'S ANABISIS, BOOK IV.

1. Translate :—

a. οἱ μέντοι πολέμοι οὐδὲν ἐπαύσαντο δι' ὅλης τῆς νυκτὸς κυλίνδοντες τοὺς λίθους· τεκμαίρεσθαι δ' ἦν τῷ ψόφῳ. οἱ δ' ἔχοντες τὸν ἡγεμόνα κύκλιον περιβύοντες καταλαμβάνουσι τοὺς φύλακας ἀμφὶ πύρ καθημένους· καὶ τοὺς μὲν κατακάνοντες τοὺς δὲ καταδιώξαντες αὐτοὶ ἐνταῦθ' ἔμενον ὡς τὸ ἄκρον κατέχοντες. οἱ δ' οὐ κατεῖχον, ἀλλὰ μαστὸς ἦν ὑπὲρ αὐτῶν παρ' ὃν ἦν ἡ στενὴ αὐτῆ ὁδὸς ἐφ' ἧ ἑκάθητο οἱ φύλακες. ἔφοδος μέντοι αὐτόθεν ἐπὶ τοὺς πολεμίους ἦν οἱ ἐπὶ τῇ φανερᾷ ὁδῷ ἑκάθητο. καὶ τὴν μὲν νύκτα ἐνταῦθα δέηγον· ἐπεὶ δ' ἡμέρα ὑπέφαιεν, ἐπορεύοντο σιγῇ συντεταγμένοι ἐπὶ τοὺς πολεμίους· καὶ γὰρ ὀμίχλη ἐγένετο, ὥστ' ἔλαθον ἐγγὺς προσελθόντες.

b. Ἐντεῦθεν δ' ἐπορεύθησαν σταθμοὺς τρεῖς διὰ πεδίου παρασάγγας πεντεκαίδεκα· καὶ Τηρίβαςος παρηκολούθει ἔχων τὴν ἑαυτοῦ δύναμιν ἀπέχων ὡς δέκα σταδίους· καὶ ἀφίκοντο εἰς βασιλεία καὶ κόμας πέριξ πολλὰς πολλῶν τῶν ἐπιτηδείων μεστάς. στρατοπεδεομένων δ' αὐτῶν γίγνεται τῆς νυκτὸς χιῶν πολλή· καὶ ἔωθεν ἔδοξε διασκηνοῦσαι τὰς τάξεις καὶ τοὺς στρατηγούς κατὰ τὰς κόμας· οὐ γὰρ ἔωρον πολέμιον οὐδένα καὶ ἀσφαλὲς ἐδόκει εἶναι διὰ τὸ πλῆθος τῆς χιόνος. ἐνταῦθα εἶχον πάντα τὰ ἐπιτήδεια ὅσα ἐστὶν ἀγαθὰ, ἱερεῖα, σίτον, οἶνους παλαιούς εἰώδεις, ἀσταφίδας, ὄσπρια παντοδαπά. τῶν δὲ ἀποσκεδαννύμενων τινὲς ἀπὸ τοῦ στρατοπέδου ἔλεγον ὅτι κατίδοιεν στράτευμα καὶ νύκτωρ πολλὰ πυρὰ φαίνονται.

c. ἐνθα δὴ Πολυκράτης Ἀθηναῖος λοχαγὸς ἐκέλευσεν ἀφίεσθαι ἑαυτόν· καὶ λαβὼν τοὺς εὐζώνους, θέων ἐπὶ τὴν κόμην ἦν εἰλήχει Ξενοφῶν καταλαμβάνει πάντας ἔνδον τοὺς κομήτας καὶ τὸν κομάρχη, καὶ πῶλους εἰς δασμὸν βασιλεῖ τρεφομένους ἑπτακαίδεκα, καὶ τὴν θυγατέρα τοῦ κομάρχου ἐνάτην ἡμέραν γεγαμημένην· ὁ δ' ἀνὴρ αὐτῆς λαγῶς ὄχετο θηράσων καὶ οὐχ ἦλθ' ἐν ταῖς κόμας.

2. How may subordinate clauses be classified? Explain the names of the classes. Give an example of each class from the preceding extracts, shewing the words to which it is related and the relation existing between them. Translate into Latin the last sentence of extract (b).

3. Parse :—τῷ ψόφῳ, κύκλιον, τοὺς μὲν—τοὺς δὲ, ἑκάθητο, τὴν νύκτα, σιγῇ,—δέκα σταδίους, τῶν ἐπιτηδείων, φαίνονται.

4. Decline the following Nouns and Adjectives:—ὀπλίτης, στάδιον, χιών, γυνή, πλῆθος, εὐώδης, μέγας, οἶτος.

5. Parse these verbal forms and conjugate the verbs they come from:—ἐπαύσαντο, καταλαμβάνουσι, ἔμενον, κατεῖχον, ὑπέφαινεν, συντεταγμένοι, ἀφίκοντο, ἔδρων, ἔλεγον, ἐκέλευσεν, θέων, ἦλω.

6. a. Write the Fut., 1 Aor., Perf., and (if used) 2 Aor. Act., Pass. and Mid. of these verbs:—τρέπω, πλέκω, δέρω, κρίνω, τιμάω, θηράω.

b. Write out the 1 Aor. and 2 Aor. of all the Moods of the Act., Pass. and Mid. voices of λειπώ.

c. Give the Present Tense of the Moods of εἶμι, εἶμι, ἴημι.

\*7. Translate and explain the following passages:—προσβάλλουσι πρὸς τὸν λόφον ὀρθίοις τοῖς λόχοις.—εἶλκον δὲ τὰς νευρὰς ὁπότε τοξέουεν πρὸς τὸ κάτω τοῦ τόξου τῷ ἄριστερῷ ποδὶ προβαίνοντες.—Ἐχρῶντο δὲ αὐτοῖς (sc. τοῖς τοξέυμασι) οἱ Ἕλληνες, ἐπεὶ κάβοιεν, ἀκοντίοις ἐναγκυλῶντες.—παρήγγειλε τοῖς λοχαγοῖς κατ' ἐνωμοτίας ποιήσασθαι ἕκαστον τὸν ἑαυτοῦ λόχον, παρ' ἀσπίδας παραγαγόντας τὴν ἐνωμοτίαν ἐπὶ φάλαγγος.—(παρήγγειλε) ἀναστρέψαντας ἐπὶ δόρυ ἡγεῖσθαι τοὺς οὐραγούς.—θέσθαι τὰ ὄπλα.

8. Explain these terms:—φάλαγξ, λόχος, ἐνωμοτία, ἀσπίς, ὄπλον, πέλτη. Give the etymology and meaning of:—ὀπισθοφύλαξ, ἀνλίζω, ἐνεδρεῖω, ἐγχειρίδιον, στρατηγός, τὰ ὑπόζυγια, τὰ σκευοφόρα.

9. What was the object of Cyrus' expedition? When did it take place? What was the cause of its failure? Trace the route of the army during its advance and retreat. What tribes now represent the Καρδοῦχοι? What has caused some doubt about Xenophon's age then?

THE HISTORY OF THE UNITED STATES OF AMERICA

CHAPTER I. THE DISCOVERY OF AMERICA

1. The first voyage across the Atlantic Ocean was made by Christopher Columbus in 1492.

2. Columbus sailed from Spain in August 1492, and after a long and dangerous voyage, he discovered the island of San Salvador in the West Indies on October 12, 1492.

3. Columbus's discovery of America opened the way for European exploration and settlement of the New World.

4. The first European to set foot on the mainland of North America was Juan Ponce de Leon in 1492.

5. Ponce de Leon discovered the Florida peninsula and named it Florida in honor of the Spanish monarch.

6. The first European to explore the Gulf of Mexico was Hernan Cortes in 1499.

7. Cortes discovered the Yucatan peninsula and the city of Mayan in 1499.

8. The first European to explore the coast of Central America was Christopher Columbus in 1492.

9. Columbus discovered the island of Cuba in 1492.

10. The first European to explore the island of Hispaniola was Christopher Columbus in 1492.

11. Columbus discovered the island of Puerto Rico in 1493.

12. The first European to explore the island of St. Thomas in the Virgin Islands was Christopher Columbus in 1493.

13. Columbus discovered the island of St. John in the Virgin Islands in 1493.

14. The first European to explore the island of St. Kitts in the West Indies was Christopher Columbus in 1493.

15. Columbus discovered the island of Nevis in the West Indies in 1493.

16. The first European to explore the island of Antigua in the West Indies was Christopher Columbus in 1493.

17. Columbus discovered the island of Barbados in the West Indies in 1493.

18. The first European to explore the island of St. Vincent in the West Indies was Christopher Columbus in 1493.

19. Columbus discovered the island of Grenada in the West Indies in 1493.

20. The first European to explore the island of St. Lucia in the West Indies was Christopher Columbus in 1493.

21. Columbus discovered the island of St. Martin in the West Indies in 1493.

DARTMOUTH COLLEGE AND UNIVERSITY

is now and shall be continued to be held in the name of the Trustees of Dartmouth College and University.

ARTICLE II

Section 1. The Trustees of Dartmouth College and University shall have the honor and privilege of conferring the same on such persons as they may think proper to receive.

Section 2

Section 2. The Trustees of Dartmouth College and University shall have the honor and privilege of conferring the same on such persons as they may think proper to receive.

Section 3. The Trustees of Dartmouth College and University shall have the honor and privilege of conferring the same on such persons as they may think proper to receive.

Section 4. The Trustees of Dartmouth College and University shall have the honor and privilege of conferring the same on such persons as they may think proper to receive.

Section 5. The Trustees of Dartmouth College and University shall have the honor and privilege of conferring the same on such persons as they may think proper to receive.

Section 6. Explain the construction of the following sentence.

# DALHOUSIE COLLEGE AND UNIVERSITY,

## HALIFAX.

SESSIONAL EXAMINATIONS, 1866.

TUESDAY, MARCH 27TH.

GREEK—SECOND YEAR.

HERODOTUS, BOOK II. SEC. 1-100.

1. Translate :—

a. Ἀλλὰ Ἑλλήνων μὲν τινες, ἐπίσημοι βουλόμενοι γενέσθαι σοφίην, ἔλεξαν περὶ τοῦ ὕδατος τούτου τριφασίας ὁδοῦς· τῶν τὰς μὲν δύο τῶν ὁδῶν οὐδ' ἀξιῶ μνησθῆναι, εἰ μὴ ὅσον σημήναι βουλόμενος μῖνον· τῶν ἢ ἑτέρη μὲν λέγει τοὺς ἔτησις ἀνέμονος εἶναι αἰτίους πληθύνει τὸν ποταμὸν, κωλύοντας ἐς θάλασσαν ἐκρέειν τὸν Νεῖλον; πολλάκις δὲ ἔτησιαι μὲν οὐκ ὦν ἐπνευσαν, ὁ δὲ Νεῖλος τῶντ' ἐργάζεται· πρὸς δὲ, εἰ ἔτησιαι αἰτιοὶ ἦσαν, χρῆν καὶ τοὺς ἄλλους ποταμοὺς ὅσοι τοῖσι ἔτησισι ἀντίοι βέουσι ὁμοίως πάσχειν καὶ κατὰ τὰ ἀντὰ τῷ Νείλῳ, καὶ μᾶλλον ἐτι τοσοῦτω, ὅσῳ ἐλάσσονες ἔντες ἀσθενέστερα τὰ ρεῦματα παρέχονται· εἰσὶ δὲ πολλοὶ μὲν ἐν τῇ Συρίῃ ποταμοὶ, πολλοὶ δὲ ἐν τῇ Λιβύῃ, οἱ οὐδὲν τοιοῦτο πάσχουσι οἷον τι καὶ ὁ Νεῖλος.

b. Χρηστηρίων δὲ πέρι, τοῦ τε ἐν Ἑλλάσι καὶ τοῦ ἐν Λιβύῃ, τότε Αἰγύπτιοι λόγον λέγουσι· ἔφασαν οἱ ἱρέες τοῦ Θηβαίου Διὸς “ δύο γυναικας ἱρήσις ἐκ Θηβέων ἐξαχθῆναι ὑπὸ Φοινίκων· καὶ τὴν μὲν αὐτέων πνέσθαι ἐς Λιβύην πρηθεῖσαν, τὴν δὲ ἐς τοὺς Ἑλληνας· ταύτας δὲ τὰς γυναικας εἶναι τὰς ἰδρυσάμενας τὰ μανθία πρώτας ἐν τοῖσι εἰρημένοισι ἔθνεσι.” εἰρομένου δὲ μὲν, ὁκθὲν οὕτω ἀτρεκέως ἐπιστάμενοι λέγουσι; ἔφασαν πρὸς ταῦτα, “ ζήτησιν μεγάλην ἀπὸ σφῶν γενέσθαι τῶν γυναικῶν τούτων· καὶ ἀνευρεῖν μὲν σφῆας οὐ δυνατοὶ γενέσθαι, πνέσθαι δὲ ἕστερον ταῦτα περὶ αὐτέων τάπερ δὴ ἔλεγον.”

c. Ἄγραι δὲ σφῶν πολλὰ κατεστέασι καὶ παντοῖαι· ἢ δὲ ὦν ἐμοὶ γε δοκεῖ ἀξιωτάτη ἀπηγήσιος εἶναι, ταύτην γράφω· ἔπεδν νῶτον ἴδς δελεάση περὶ ἀγκιστρον, μετίει ἐς μέσον τὸν ποταμὸν· αὐτὸς δὲ ἐπὶ τοῦ χεῖλεος τοῦ ποταμοῦ ἔχων δέλφακα ζῶν, ταύτην τύπτει· ἐπακούσας δὲ τῆς φωνῆς ὁ κροκόδειλος ἴεται κατὰ τὴν φωνήν, ἐντυχὼν δὲ τῷ νῶτῳ καταπίνει· οἱ δὲ ἔλκουσι· ἔπεδν δὲ ἐξελευσθῆ ἐς γῆν, πρώτον ἀπάντων ὁ θηρευτῆς πηλῶ κατ' ὦν ἐπλασε αὐτοῦ τοὺς ὀφθαλμοὺς· τοῦτο δὲ ποιήσας, κάρτα εὐπετέως τὰ λοιπὰ χειροῦται· μὴ ποιήσας δὲ τοῦτο, σὺν πόνῳ.

2. a. Parse the following words which occur in the preceding extracts :  
—σοφίαν. τῷ Νείλῳ. ὅσῳ. πρηθεῖσαν. δυνατοί. ἀπηγήσιος. τῆς φωνῆς.  
τῷ νῶτῳ.

b. Translate into Latin :—τῶν ἢ ἑτέρη μὲν \* \* \* \* ἐκρέειν τὸν Νεῖλον.—ἔφασαν οἱ ἱρέες \* \* \* \* ἐς Λιβύην πρηθεῖσαν. ἔφασαν πνέσθαι ἕστερον ταῦτα περὶ αὐτέων.

c. Explain the construction of εἰ μὴ ὅσον σημήναι κ.τ.λ.

3. What relations are expressed by the Dative case? What case follows verbs of physical or mental perception in Greek and what in Latin? How may the difference of usage in the two languages be accounted for? What exception is there to the rule in Greek?

4. a. Parse (giving the principal parts) these verbal forms:—*μνησθήναι*, *ἐκρέειν*, *πάσχουσι*, *ἐξαχθήναι*, *γενέσθαι*, *ἐντυχών*, *κατέπλασε*, *κατέστέασι*.

b. Write out the 2 Aor. of all the Moods, Act. and Mid. of *δίδωμι*, *τίθημι*, *ἴημι*, *ἔχω*, *γινώσκω*.

5. a. Write the Attic forms of these words:—*ἀπικνέεται*, *ἀπηγήσιος*, *ἰρέες*, *ἔών*, *ὄν*, *ὄκότε*, *τριφάσιος*, *τόντό*, *πολλόν*, *κεχύαται*.

b. Accent the cases of *Χεῖρ* and *ὄρμη*. Accent *τυπτει*, *ἐτυπτομεν*, *φιλει*, *εφιλει*, *ποιειτον*, *λιπειν*, *λιπων*, *λειφθηναι*, *ἔλθε*. Distinguish *ποιῆσαι*, *ποίησαι*, *ποίησαι*—*ταῦτα*, *ταῦτά*—*εἶμι*, *εἶμι*, *εἶς*, *εἶς*, *εἶς*, *εἶς*—*ῆ*, *ῆ*, *ῆ*, *ῆ*, *ῆ*.

\*6. What three causes were assigned for the overflowing of the Nile in summer? What is Herodotus' opinion? How did the Egyptians symbolize this overflow? What oracles are alluded to in the second extracts? What account did the Grecian priests give of the origin of their oracle? How does Herodotus explain it?

\*7. What mention does Herodotus make of Homer and Hesiod? Describe some similar customs of the Egyptians and Jews. Different names have been given to Egypt by different peoples?

8. Mention the chief events in the life of Herodotus.

9. What is the force of the Aorist tense in the several Moods? Distinguish the use of the Present, Aor. and Perf. Imperative. Write the four principal forms of a conditional proposition.

10. Write in Greek:—He says that he is present to see the battle. He said that he was present to see the battle. When he saw this he went away. Whenever he sees this, he goes away. Whenever he saw this, he used to go away. When he sees this, he will go away.





DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX.

SESSIONAL EXAMINATIONS, 1866.

TUESDAY, MARCH 27TH.

GREEK—THIRD YEAR.

EURIPIDES; HECUBA—SOPHOCLES; ANTIGONE.

1. Translate:—

a. EK. ὦ θήγατερ, οὐκ οἶδ' εἰς ὅτι βλέψω κακῶν,  
πολλῶν παροντων· ἦν γὰρ ἄψωμαί τινος,  
τόδ' οὐκ ἔρ' με· παρακαλεῖ δ' ἐκείθεν αὐ  
λύπη τις ἄλλη, διάδοχος κακῶν κακοῖς.  
καὶ νῦν τὸ μὲν σὸν, ὥστε μὴ στένειν, πάθος  
οὐκ ἂν δυνάμην ἐξαλείψασθαι φρονέσ·  
τὸ δ' αὐ λίαν παρείλες, ἀγγελθείσά μοι  
γενναῖος. οὐκ οὖν δεινὸν, εἰ γῆ μὲν κακῇ,  
τυχοῦσα καιροῦ θεόθεν, εὖ στάχιν φέρει,  
χρηστὴ δ', ἁμαρτοῦσα ὧν χρεῶν αὐτὴν τυχεῖν,  
κακὸν δίδωσι καρπὸν; ἀνθρώποις δ' αἰεὶ  
ὁ μὲν πονηρὸς οὐδὲν ἄλλο πλὴν κακός·  
ὁ δ' ἐσθλὸς ἐσθλός, οὐδὲ συμφορᾶς ὑπο  
φυσιν διέφθειρ', ἀλλὰ χρηστός ἐστ' αἰεὶ;  
ἄρ' οἱ τεκόντες διαφέρουσιν, ἢ τροφαί;  
ἔχει γε μέντοι καὶ τὸ θρεφθῆναι καλῶς  
δίδαξιν ἐσθλοῦ· τοῦτο δ' ἦν τις εὖ μάθην,  
οἶδεν τό γ' αἰσχρὸν, κανόνι τοῦ καλοῦ μάθων. Hec. 583-600.

b. EK. ὁ χρυσὸς, εἰ βούλοιο τάληθῆ λέγειν,  
ἐκτεῖνε τὸν ἐμὸν παῖδα, καὶ κέρδη τὰ σά.  
'επεὶ δίδαξον τοῦτο· πῶς, ὅτ' ἠτύχει  
Τροία, πέριξ δὲ πύργος εἶχ' ἔτι πτόλιν,  
'εζη τε Πρίαμος, Ἐκτορός τ' ἦνθει δόρυ,  
τί δ' οὐ τότ', εἰπερ τῶδ' ἐβουλήθης χάριν  
θέσθαι, τρέφων τὸν παῖδα, κὰν δόμοις ἔχων,  
ἐκτεῖνας, ἢ ζῶντ' ἤλθες Ἀργείοις ἄγων;  
ἀλλ' ἠνίχ' ἡμεῖς οὐκέτ' ἡμεν ἐν φάει,  
καπνῶ δ' ἐσήμαιν' ἄστρῳ πολεμίων ὑπο,  
ξενον κατέκτασ' σὴν μολόντ' ἐφ' ἐστίαν;  
πρὸς τοῖσδε νῦν ἀκουσον, ὡς φανεῖ κακός·  
χρῆν σ', εἰπερ ἦσθα τοῖς Ἀχαιοῖσιν φίλος,  
τὸν χρυσὸν, ὃν φῆς οὐ σὸν, ἀλλὰ τοῦδ', ἔχειν,  
δοῦναι φέροντα πενομένοισι τε καὶ χρόνον  
πολλὸν πατρίδας γῆς ἀπεξενωμένοισι·  
σὺ δ' οὐδὲ νῦν πω σῆς ἀπαλλάξαι χερὸς  
τολμᾶς, ἔχων δὲ καρτερεῖς ἔτ' ἐν δόμοις. Hec. 1188-1205.

\*c. Χορός. Πολλὰ τε δεινὰ κούδεν ἀνθρώπου δεινότερον πέλει.

τοῦτο καὶ πολλοῦ πέραν  
πόντου χειμερίῳ νότῳ  
χωρεῖ, περιβρονχίσισιν  
περῶν ἔπ' οἰδμασιν,  
θεῶν τε τὰν ὑπερτάταν, Γᾶν  
ἄφθιτον, ἀκαμάταν ἀποτρύεται,  
ἰλλομένων ἀρότρων ἔτος εἰς ἔτος, ἰππεῖ—  
φ γένοι πολέων.  
κουφονόων τε φύλον ὀρνίθων ἀμφιβαλὼν ἀγει  
καὶ θηρῶν ἀγρίων ἔθνη.  
πόντου τ' εἰναλίαν φύσιν  
σπείρασι δικτυοκλώστοις,  
περιφραδῆς ἀνήρ  
κρατεῖ δὲ μηχαναῖς ἀγραύλου  
θηρὸς ἄρρσιβάτα, λασιανχενά θ'  
ἵππον ἄζεται ἀμφίλοφον ζυγὸν οὐρεῖ—  
ὄν τ' ἀκμήτα ταῦρον.  
καὶ φθέγμα, καὶ ἀνεμῶεν φρόνημα, καὶ ἀστυνόμους  
ὄργας ἐδιδάξατο, καὶ δυσαίλων  
πάγων αἴθρια καὶ  
δύσομβρα φεύγειν βέλη, παντοπόρος  
ἄπορος ἐπ' οὐδὲν ἔρχεται  
τὸ μέλλον· "Αἶδα μόνον  
φεύξιν οὐκ ἐπάξεται· νόσων δ' ἀμηχάνων φυγᾶς  
ζημιπεφραστὰι.

ΑΝΤΙΓ. 332-366.

\*2. What question is proposed in the line beginning ἄρ' οἱ τεκοντες κ.τ.λ. Quote Horace's opinion on the subject, or give the substance of it. The passage (590-600) is characteristic of Euripide's style? The line καπνὴ δ' κ.τ.λ. may be translated in different ways? Explain the construction in each. What emendations have been proposed in the sentence λασιανχενά θ' ἵππον κ.τ.λ.? What difference will they make in the translation? Why is the present reading considered corrupt?

3. Parse:—ἄψωμαί τινος. ἐξαλείψασθαι φρενός. τὸ δ' αὖ λίαν παρεῖλες. ὦν χρεῶν αὐτὴν τυχεῖν.—ἐπεὶ δίδαξον τοῦτο. χρόνον πολλὸν πατρῴας γῆς ἀπεξενωμένους. ἔχων δὲ καρτερεῖς.—κρατεῖ δὲ μηχαναῖς ἀγραύλου θηρὸς ἄρρσιβάτα. "Αἶδα μόνον φεύξιν οὐκ ἐπάξεται.

4. Account for the accents of ἄψωμαί (584), χρηστὴ δίδωσι, συμφορᾶς ἵπο, χρηστός ἐστ' αἰεῖ, οἶδεν τό γ' αἰσχρὸν, σὺ δ' ἔλθε. Distinguish μένειν, μενεῖν—οἴκουν, οἰκοῦν—ἀλλά, ἄλλα—εἶπε, εἶπέ. What words have no accent?

5. Give a scheme of the Tragic Iambic Senarius. Scan the first five lines of extract (a). Anapaestic Metre differs in one respect from all others?

6. What was the origin of Attic Tragedy and Comedy? What is the etymology of the names? What improvements did Aeschylus introduce? Where and when were the three Attic Tragedians born? How did a Trilogy of Aeschylus differ from one of Sopocles?

7. How many Bacchic festivals were yearly celebrated at Athens? Who bore the expenses of the theatre? By what entrances did the Actors and Chorus come into the theatre, and what positions did they occupy in it? There can have been no acting and little variation of voice on the Athenian stage; why?

\*8. Temporal clauses may be divided into three classes? What relative adverbs are used with each class? What moods may follow *πριν*? Why is *τοῦτο ποιήσω πρὶν ἔλθῃ* incorrect, but *τοῦτο οὐ ποιήσω πρὶν ἔλθῃ* correct? Distinguish *ἀρ'οὐκ ἔστιν ἀσθενής*; *ἀρα μὴ ἔστιν ἀσθενής*? How are indirect compound questions introduced?

9. Translate into Greek:—Cyrus having crossed this river made a day's march through Phrygia to Colossæ, a wealthy, large and populous city. He remained there three days: and Menon the Thessalian arrived with a thousand heavy-armed soldiers and five hundred targeters. There was a palace of Cyrus there and a large park, full of wild animals, which he used to hunt on horseback, whenever he wished to exercise himself and his horses. Here it is said Apollos flayed Marsyas having conquered him in a contest of musical skill, and hung up his skin in the cave, whence this river flows.

THE HISTORY OF THE UNITED STATES

What was the right of the people? What was the right of the people? What was the right of the people?

How did the people feel? How did the people feel? How did the people feel? How did the people feel?

What was the result? What was the result? What was the result? What was the result?

How did the people feel? How did the people feel? How did the people feel? How did the people feel?

What was the result? What was the result? What was the result? What was the result?

How did the people feel? How did the people feel? How did the people feel? How did the people feel?

What was the result? What was the result? What was the result? What was the result?

How did the people feel? How did the people feel? How did the people feel? How did the people feel?

What was the result? What was the result? What was the result? What was the result?

How did the people feel? How did the people feel? How did the people feel? How did the people feel?

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX.

SESSIONAL EXAMINATIONS, 1866, TUESDAY, MARCH 27TH.

GREEK—FOURTH YEAR.—THUCYDIDES, BOOK II.

1. Translate :—*a.* Chap. xx.  
*b.* Chap. xxxix.  
*c.* Chap. lxxiv.

2. *a.* Translate into Latin :—*τοὺς Ἀθηναίους ἠλπίζε παρασκευασμένους ἐς πόλεμον ὡς οὐπω πρότερον ἴσως ἂν ἐπεξέλθειν.—οἱ Ἀχαρνῆς οὐ περιώψασθαι ἐδόκουν τὰ σφέτερα διαφθαρέντα.*

*b.* Explain the construction of these clauses :—*ἀλλὰ ὄρμησεν καὶ τοὺς πάντας κ.τ.λ.—τοὺς γὰρ Ἀχαρνέας ἐστερημένους \* \* \* \* κινδυνεύειν, chap. 20. διαφέρομεν δὲ καὶ ταῖς κ.τ.λ.—περιγίγνεται ἡμῖν τοῖς τὲ μέλλουσιν ἀλγεινοῖς, κ.τ.λ., chap. 39.*

\*3. How was any particular year designated at Athens? Into what seasons and months was the year divided? How were the days of the month denoted? Explain the terms *νομηρία, ἐνη καὶ νέα, μὴν κοῦλος, μὴν πλῆρης, μὴν ἑμβολιμαῖος*. When were Olympiads first employed for marking the years? From what event were they counted? What year B. C. corresponds to Ol. 95. 1.

4. What means did Pericles employ to extend the power of Athens? What was the original object of the Confederacy of Delos? What were the causes of the Peloponnesian war? How long did it last and what was its issue?

5. When was Thucydides born? Why was he banished from Athens? When did he return? Name the authors, sculptors and painters who flourished in Greece in the fifth century B. C.

\*6. What public duties of an Athenian citizen are comprehended under the term *Λειτουργία*?

7. What words in Latin and English are cognate to these :—*ὄς; ἡδύς; κίων; ὕδωρ; φωνή; δίδα;—θύρα; γίγνομαι; θήρ; φηγός.*

8. From whom did the Greeks receive their alphabet? How many letters did it contain at first? When did the Athenians first employ the Ionian alphabet of 24 letters? What is meant by the term *βουστροφάδου* applied to writing?

9. Translate into Greek :—The Persians having slain the Magi and cut off their heads, left the wounded of their own party there on account of the guard of the Acropolis; but the other five of them, carrying the heads of the Magi ran out with shouting and clamour, and then called upon the rest of the Persians, relating what they had done, and showing them the heads; and at the same time they slew every one of the Magi, that came in their way. The Persians informed of what had been done by the seven and of the fraud of the Magi determined themselves to do the like; and having drawn their daggers, they slew every Magus they could find.

DALHOUSIE COLLEGE AND UNIVERSITY

HALIFAX

TERMINAL EXAMINATION 1906 (FIRST YEAR)

PHYSIOLOGY

1. How does the respiratory system function?

2. How does the circulatory system function?

3. How does the digestive system function?

4. How does the excretory system function? Describe the structure and function of the kidney.

5. How does the nervous system function? Describe the structure and function of the brain and spinal cord.

6. How does the endocrine system function? Describe the structure and function of the thyroid and adrenal glands.

7. How does the reproductive system function? Describe the structure and function of the male and female reproductive organs.

8. How does the immune system function? Describe the structure and function of the white blood cells.

9. How does the skeletal system function? Describe the structure and function of the bones and joints.

10. How does the muscular system function? Describe the structure and function of the skeletal muscles.

11. How does the integumentary system function? Describe the structure and function of the skin.

12. How does the sensory system function? Describe the structure and function of the eye, ear, nose, tongue, and skin.

1. In a triangle, the sum of the interior angles is equal to two right angles.

2. In a triangle, the exterior angle is equal to the sum of the two interior angles not adjacent to it.

# BALHOUTSIN COLLEGE AND UNIVERSITY

HALIFAX, N. S. CANADA

SESSIONAL EXAMINATIONS, 1900

Wednesday, March 29th, 9 A. M. to 12 Noon

1. Two sides of a triangle are together greater than the third side.

2. If a straight line falling upon two other straight lines make the alternate angles equal to one another, these two straight lines are parallel.

3. Parallels cut by a transversal, the corresponding angles are equal.

4. If a straight line be divided into two equal parts, and also into two unequal parts, the rectangle contained by the two unequal parts together with the square of the line between the points of section is equal to the square of half the line.

5. The angle in a semicircle is a right angle.

6. The angle in a segment of a circle is double the angle in the alternate segment.

7. In equal circles, equal chords are equidistant from the center.

8. The angle at the center of a circle is double the angle at the circumference, standing on the same arc.

9. In equal circles, equal chords subtend equal angles at the center.

10. The angle in a segment of a circle is double the angle in the alternate segment.

11. Prove, algebraically, the mean and harmonic proportions of the means of a series of numbers.

12. Two straight lines intersect, show that the four angles formed are equal to two right angles.

13. If on one of the equal sides of an isosceles triangle a circle be described, the circumference will bisect the base.

14. A right-angled triangle is inscribed in a circle, the right angle is at the center of the circle.

15. Prove that the area of a triangle is equal to half the product of its base and height.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

WEDNESDAY, MARCH 28TH, 9 A. M. TO 12 NOON,

MATHEMATICS.—FIRST YEAR.

1. Any two sides of a triangle are together greater than the third side.

2. If a straight line, falling upon two other straight lines, make the alternate angles equal to one another, these two straight lines are parallel.

3. Parallelograms on the same base and between the same parallels are equal to one another.

4. If a straight line be divided into two equal parts, and also into two unequal parts, the rectangle contained by the two unequal parts together with the square of the line between the points of section, is equal to the square of half the line.

5. If a straight line passing through the centre of a circle, bisect a chord which does not pass through the centre, it cuts it at right angles; and if it cut it at right angles, it also bisects it.

6. The angle at the centre of a circle is double the angle at the circumference, standing on the same arc.

7. In equal circles, equal chords cut off equal arcs, the greater equal to the greater, and the less equal to the less.

8. Describe a circle about a given triangle.

8. Prove, algebraically, the ninth and tenth propositions of the Second Book of Euclid.

10. If two straight lines bisect each other, the four lines joining their extremities form a parallelogram.

11. If on one of the equal sides of an isosceles triangle a circle be described, its circumference will bisect the base.

12. ABC is a triangle, right-angled at C. From A, a straight line AD is drawn to the middle point of BC. Prove that  $AB^2 = 4AD^2 - 3AC^2$ .



AFTERNOON, 2 to 5 P. M.

1. Write as a decimal fraction 5 thousandths, 7 millionths, 56 thousand-millionths.

2. In reducing a vulgar fraction to a decimal, you add ciphers to the numerator, and divide by the denominator.

&c. Prove the rule: and reduce  $\frac{1}{1024}$  to a decimal fraction.

3. If  $c$  be a measure of both  $a$  and  $b$ , prove that it is a measure of  $ma \mp nb$ ,  $m$  and  $n$  being whole numbers.

4. Simplify the expression  $a - \left\{ b - (a - \overline{b - (a - b)}) \right\}$

and divide  $\frac{x}{x^2 + y^2}$  by  $\frac{(x-y)^2}{x^4 - y^4}$ .

4. Show by the rules of division that  $a^0 = 1$ , and  $a^{-m} = \frac{1}{a^m}$ ; explain the meaning of fractional indices; and find the cube of  $a^{\frac{1}{3}} + b^{\frac{1}{3}}$ .

6. Prove that  $\frac{2\sqrt{5} - \sqrt{3}}{\sqrt{5} + \sqrt{3}} = \frac{1}{2} (13 - 3\sqrt{15})$

7. Solve the equation  $\frac{x-5}{3} + \frac{x}{2} = 13 - \frac{x-28}{4}$

8. If  $x + \sqrt{5x - 10} = 8$ , find the values of  $x$ .

9. Given  $\left. \begin{array}{l} x + y = 7 \\ x^3 + y^3 = 133 \end{array} \right\}$  to find the values of  $x$  and  $y$ .

10.  $x^2 + px + q = 0$ : solve the equation, and find the condition that the two roots may be equal.

11. The first term of an Arithmetical series is 6, and the fifth is 94: find the intermediate terms.

12. A middle-aged gentleman, being asked his age, answered enigmatically, that, if from the number of his years its square root were subtracted and the remainder divided by 7, the number obtained would be one less than the square root of the number of his years. Find his age.

13. Shew that, if  $s$ ,  $a$ , and  $d$ , in an Arithmetical series, are given to find  $n$ , there are generally two values of  $n$ ; and give an explanation of this result in the case where these are positive whole numbers.

14. If the first term of an infinite decreasing geometrical series be equal to  $n$  times the sum of all the succeeding

terms,  $r = \frac{1}{1+n}$ .

15. There are two Arithmetical series, of which the first terms are 1, the number of terms the same, and the 3rd term in the first is equal to the 4th in the second. Also, the sum of the first series is to the sum of the second, as 7 to 5. Find the two series.

1. Write a decimal fraction 5 thousandths, 7 millionths, 50 thousand millionths.
2. In reducing a vulgar fraction to a decimal, you add ciphers to the numerator, and divide by the denominator. Do you know the ratio and value of a decimal fraction?
3. Let  $a$  be a number of half-pence and  $b$  pence. Express in a number of ounces, in and a vulgar whole number.
4. Simplify the expression  $\frac{a^2 - b^2}{a^2 + b^2} \cdot \frac{a + b}{a - b}$  and divide  $\frac{a^2 - b^2}{a^2 + b^2}$  by  $\frac{a + b}{a - b}$ .
5. Show by the rule of division that  $a = k$  and  $w = \frac{1}{2}$  explain the meaning of fraction  $\frac{a}{k}$  and find the ratio of  $a$  to  $k$ .
6. Prove that  $\frac{\sqrt{a^2 + b^2} + \sqrt{a^2 - b^2}}{\sqrt{a^2 + b^2} - \sqrt{a^2 - b^2}} = \frac{a + b}{a - b}$ .
7. Solve the equation  $\frac{\sqrt{a^2 + b^2}}{a} = \frac{a + b}{a - b}$  in the same manner as you solved the last exercise.
8. If  $x + \sqrt{y^2 - 1} = 2$ , find the values of  $x$  and  $y$ .
9. Given  $x + y = 7$  find the values of  $x$  and  $y$  if  $x^2 + y^2 = 13$ .
10. If  $x + y = 0$ , solve the equation and find the condition that the two roots may be equal.
11. The first term of an Arithmetical series is 5 and the 10th is 47; find the intermediate terms.
12. A middle aged gentleman, being asked his age, answered, "I am generally that 1/2 of my number of the year; if you subtracted and the remainder divided by 7, the number obtained would be one less than the square root of the number of his years." Find his age.
13. Show that 3, 4 and 5 in an Arithmetical series give a sum and a product which are generally two values of  $a$  and give an explanation of this result in the case where these are positive whole numbers.
14. If the first term of an infinite decreasing geometrical series be equal to a times the sum of all the succeeding terms,  $r = \frac{1}{1 + a}$ .
15. There are two Arithmetical series of which the first terms are 1, the number of terms the same and the 5th term in the first is equal to the 10th in the second. Also, the sum of the first series is to the sum of the second as 7 to 5. Find the two series.

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

... of the ... of the ... of the ... of the ...

HALIFAX, N. S.

UNIVERSITY COLLEGE AND UNIVERSITY

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

WEDNESDAY, MARCH 28, 9 A. M., TO 12 NOON.

MATHEMATICS=SECOND YEAR.

1. If two triangles have one angle of the one equal to one angle of the other, and the sides about the equal angles proportionals, the triangles shall be equiangular, and shall have those angles equal which are opposite to the homologous sides.

2. If three straight lines be proportionals, the rectangle contained by the extremes is equal to the square of the mean; and, conversely, if the rectangle of the extremes be equal to the square of the mean, the three straight lines are proportionals.

3. Similar rectilinear figures are to one another as the squares of their homologous sides.

4. To draw a straight line perpendicular to a given plane, from a given point above it.

5. Inscribe, geometrically, a square in a given triangle.

6. If the base and vertical angle of a triangle are constant, and the vertex be moved through its successive positions, the centre of the circle circumscribing the triangle will move in a circle: so, also, that of the inscribed circle of the triangle.

7. If BC and BD, the two sides of the triangle BCD, be produced to F and G, so that  $CF=CB$  and  $DG=DB$ , and be also bisected respectively in H and K, prove that CD is trisected by FK and GH.

---

8. Given the radius of a circle=10ft., and a chord=20ft.; find the height of the less arc cut off by the chord, and the chord of its half.

9. Given the area of a circle=50.26 sq. yds: find the number of degrees &c., in an arc of 6ft.

10. Draw an irregular space to represent a field, and shew how you find its area.

11. If the height of a cone= $\sqrt{3}$  times the radius of the base, find the height of a cylinder of same base, so that the whole surface of the cone: that of the cylinder as 1:2.

AFTERNOON, 3 TO 5 P. M.

1. Find the value of  $\cos A$  in terms of the sides of the triangle ABC.

2. Assuming the formulæ for  $\sin(A+B)$  and  $\cos(A+B)$ , find  $\sin 2A$  and  $\cos 2A$ : and find  $\tan 2A$  in terms of  $\tan A$ .

3. If  $\tan A = 1\frac{1}{2}$ : find the values of the other five trigonometrical functions of the angle.

4. If  $A+B+C=180^\circ$ , prove that  $\tan A + \tan B + \tan C = \tan A \tan B \tan C$ .

5. If  $\tan A = \operatorname{cosec} 2A$ : find the values of  $A$ .

6. In finding the logarithmic functions of angles involving seconds, the proportional parts for seconds are sometimes to be added and sometimes to be subtracted. Give the rule and the reason.

7. In any triangle,  $\frac{\sin(A-B)}{\sin(A+B)} = \frac{a^2-b^2}{c^2}$ .

8. To what distance can a swimmer, in a sea perfectly calm, see over its surface, supposing his eye one foot above the water. (Take the radius of the earth = 4000 miles.)

9. In a right angled triangle, given  $p$  the perpendicular from the right angle on the hypotenuse, and the ratio of the sides  $m : n$ ; find the sides.

10. Prove  $\log mn = \log m + \log n$ , and  $\log \frac{m}{n} = \log m - \log n$ ; and write the series from which common logs. are calculated, explaining its application.

11. A person undertakes to throw ace in a single throw with three dice; find the odds against him.

12. If  $A+Bx+Cx^2+\dots = a+bx+cx^2+\dots$ , for all values of  $x$ , the coefficients being independent of  $x$ , prove  $A=a$ ,  $B=b$ , &c.

13. The difference between the squares of two consecutive odd numbers is divisible by 8, without remainder.

14. Find a number between 200 and 300, such that, divided by 11, it leaves a remainder 10; and by 14, a remainder 3.

15. A sum of money multiplies itself  $n$  times in  $t$  years: shew that the rate per cent =  $\log \frac{-1 \log n}{b} - 1$ .

YIJSYVIB WITWONK SYZON P JISHUJLAB

1. The first section of the report deals with the history of the

2. The second section deals with the present situation of the

3. The third section deals with the future prospects of the

4. The fourth section deals with the conclusions of the

5. The fifth section deals with the recommendations of the

6. The sixth section deals with the appendixes of the

7. The seventh section deals with the bibliography of the

8. The eighth section deals with the index of the

9. The ninth section deals with the list of figures of the

10. The tenth section deals with the list of tables of the

11. The eleventh section deals with the list of abbreviations of the

12. The twelfth section deals with the list of symbols of the

13. The thirteenth section deals with the list of units of the

14. The fourteenth section deals with the list of definitions of the

15. The fifteenth section deals with the list of acronyms of the

16. The sixteenth section deals with the list of footnotes of the

17. The seventeenth section deals with the list of references of the

18. The eighteenth section deals with the list of sources of the

19. The nineteenth section deals with the list of authors of the

20. The twentieth section deals with the list of titles of the

21. The twenty-first section deals with the list of subjects of the

22. The twenty-second section deals with the list of keywords of the

23. The twenty-third section deals with the list of terms of the

24. The twenty-fourth section deals with the list of concepts of the

25. The twenty-fifth section deals with the list of ideas of the

26. The twenty-sixth section deals with the list of theories of the

27. The twenty-seventh section deals with the list of models of the

28. The twenty-eighth section deals with the list of methods of the

29. The twenty-ninth section deals with the list of techniques of the

30. The thirtieth section deals with the list of procedures of the

DALHOUSIE COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1888.

Wednesday, March 28, 1888.

MATHEMATICS—TRIGONOMETRY.

The circle inscribed in the triangle ABC touches AB in E and AC in G. Prove that  $\sqrt{AE} + \sqrt{AG} = \sqrt{AB} + \sqrt{AC} - \sqrt{BC}$ .

Prove that  $\cos x + \sqrt{1 - \sin^2 x} = \cos y + \sqrt{1 - \sin^2 y}$  when  $x + y = \pi$  and show that this property can be extended to the form of any number of similar factors, which may be written  $M = \cos x + \sqrt{1 - \sin^2 x}$ .

Develop  $\cos x$  in a series of powers of the cosine and sine of  $x$  and show that the coefficients are  $\frac{1}{2^n} \cos^n x$  and  $\frac{1}{2^n} \sin^n x$  respectively.

1. Prove that  $\cos^2 x + \sin^2 x = 1$  and prove by higher order derivatives that  $\frac{d^2}{dx^2} \cos^2 x = -2 \cos x \sin x$ .

2. Solve by De Moivre's Theorem the equation  $x^5 = 1$ . Hence, the series  $\cos 2\theta + i \sin 2\theta + \cos 4\theta + i \sin 4\theta + \dots$  infinitely.

3. The plane section of a sphere is a circle and the angle subtended by a chord at the center is  $2\theta$ . Assuming  $\cos \theta = \cos \theta - \cos \theta$  in a spherical triangle prove  $\cos A + \cos B \cos C = \cos A + \cos B \cos C$ .

4. Prove that in a spherical triangle  $\sin^2 B \cos^2 C = \sin^2 B \cos^2 C$ .

5. Given the day of the month and the latitude of the place, to find the time of sunrise and the length of the day.

11. Two points in the same latitude have latitudes of longitude  $\lambda$  and  $(1)$  their distance on a great circle and  $(2)$  their distance on the parallel of latitude; and express in an equation the difference of the distances in going from one point to the other.

**DALHOUSIE COLLEGE AND UNIVERSITY,**  
**HALIFAX, N. S.**

SESSIONAL EXAMINATIONS, 1866.

WEDNESDAY, MARCH 28, 9 A. ., TO 12 NOON.

MATHEMATICS=THIRD YEAR.

1. The circle inscribed in the triangle ABC touches AB in F, and AC in G: prove  $FG=(b+c-a)\sin\frac{1}{2}A$ .

2. Prove that  $(\cos x + \sqrt{-1} \sin x)(\cos y + \sqrt{-1} \sin y) = \cos(x+y) + \sqrt{-1} \sin(x+y)$ ; and shew that this property can be extended to three, four, or any number of similar factors.

3. Develope  $\cos nx$  in a series of powers of the cosines and sines of  $x$ , and hence find  $\cos 7x$ .

4. Prove  $\cos x = 1 - \frac{x^2}{1.2} + \frac{x^4}{1.2.3.4} - \&c.$ , and prove, by differentiation,  $\sin x = x - \frac{x^3}{1.2} + \frac{x^5}{1.2.3.4.5} - \&c.$

Solve by DeMoivre's Theorem the equation  $x^3+1=0$ .

6. Sum the series  $a \cos y + a^2 \cos 2y + a^3 \cos 3y + \&c.$ , to infinity.

7. Any plane section of a sphere is a circle.

8. Assuming  $\cos A = \frac{\cos a - \cos b \cos c}{\sin b \sin c}$  in a spherical triangle, prove  $\cos a = \frac{\cos A + \cos B \cos C}{\sin B \sin C}$

9. Prove that in a spherical triangle, if C be a right angle, the sides  $a$  and  $b$  are of the same affection as angles A and B.

10. Given the day of the month and the latitude of the place: to find the time of sunrise and the length of the day.

11. Two ports in the same latitude  $l$ , have a difference of longitude  $d$ : find (1) their distance on a great circle, and (2) their distance on the parallel of latitude; and express in an equation the advantage of the former course in going from one port to the other.



AFTERNOON, 2 TO 5 P. M.

1. If any rational integral function  $f(x)$  is divisible by  $x-a$  without remainder,  $a$  is a root of equation,  $f(x)=0$ .

2. Every equation of an odd degree has at least one real root, whose sign can be determined from the sign of the last term of the equation.

3. Find limits to the positive and negative roots of the equation,  $x^4+x^3-10x^2-x+15=0$ .

4. Prove that one of the roots of the equation  $2x^3-3x-6=0$  lies between 1 and 2, and shew that it is equal to 1.783 nearly.

5. Given  $x^3+px^2+qx+r=0$ , whose roots are  $a, b, c$ . Find the equation (1) whose roots are  $ab, ac, bc$ : (2) whose roots are  $\frac{1}{a+b}, \frac{1}{a+c}, \frac{1}{b+c}$ .

6. If P be a point in a parabola whose focus is S, and if the tangent at P meet the directrix in Y, prove SY perpendicular to SP. Make some important deductions from this property.

7. Prove that the subnormal of a parabola is constant, and equal to 2AS, A being the vertex and S the focus,

8. If a circle be described on the major axis of an Ellipse, and any ordinate be drawn meeting the Ellipse in P and the circle in Q, prove QN : PN in a constant ratio.

9. Prove that the equation to the hyperbola is

$$\frac{x^2}{a^2} - \frac{y^2}{b^2} = 1.$$

10. Prove that the hyperbola has asymptotes, and shew how to draw them.

11.  $\frac{0}{0}=0$ . Is this equation true? Illustrate and defend your answer.

12. Prove that if  $u = \frac{P}{Q}$ ,  $\frac{du}{dx} = Q \frac{dP}{dx} - P \frac{dQ}{dx} \frac{1}{Q^2}$ , P and Q

being functions of x.

13. Differentiate

$$u = \frac{x^3}{(1+x^6)^{\frac{1}{2}}}, u = \cos 2x \sin \frac{1}{x}, u = \log \left| \frac{1 - \cos x}{1 + \cos x} \right|$$

14. Of all rectangles having the same perimeter, the square is the greatest.

15. Prove that the greatest cone that can be cut out of a sphere, has its height  $= \frac{2}{3}$  of the diameter of the sphere, and its volume  $= \frac{8}{27}$  vol. of sphere.

1. If any rational integral function  $f(x)$  is divisible by  $x^2 - a$  without remainder,  $a$  is a root of equation  $f(x) = 0$ .

2. Every equation of an odd degree has at least one real root, whose sign can be determined from the sign of the first term of the equation.

3. The sum of the positive and negative roots of the equation  $x^2 + px + q = 0$  is  $-p$ .

4. Prove that one of the roots of the equation  $2x^2 - 3x - 1 = 0$  lies between 1 and 2, and show that it is equal to  $\frac{3 + \sqrt{17}}{4}$ .

5. Given  $x^2 + px + q = 0$ , show that the roots are  $\frac{-p \pm \sqrt{p^2 - 4q}}{2}$ .

6. Find the equation (1) whose roots are  $ab, ac, bc$ ; (2) whose roots are  $\frac{1}{a}, \frac{1}{b}, \frac{1}{c}$ ; (3) whose roots are  $a^2, b^2, c^2$ .

7. If  $P, Q, R$  are three points whose coordinates are  $(x_1, y_1), (x_2, y_2), (x_3, y_3)$  respectively, show that the area of the triangle formed by them is  $\frac{1}{2} |x_1(y_2 - y_3) + x_2(y_3 - y_1) + x_3(y_1 - y_2)|$ .

8. If  $P, Q, R$  are three points whose coordinates are  $(x_1, y_1), (x_2, y_2), (x_3, y_3)$  respectively, show that the lines joining each vertex to the midpoint of the opposite side are concurrent at a point called the centroid.

9. Prove that the perpendicular bisectors of the sides of a triangle are concurrent at a point called the circumcenter.

10. A parabola has its vertex at  $(2, 3)$  and passes through the point  $(4, 7)$ . Find its equation.

11. The major axis of an ellipse is 10 units long and the minor axis is 6 units long. Find the equation of the ellipse in standard form.

12. Prove that the equation  $ax^2 + bx + c = 0$  has two real roots if  $b^2 - 4ac \geq 0$ .

13. Prove that the hyperbolas  $\frac{x^2}{a^2} - \frac{y^2}{b^2} = 1$  and  $\frac{y^2}{b^2} - \frac{x^2}{a^2} = 1$  are conjugate hyperbolas.

14. Is this equation  $2x^2 - 3x + 1 = 0$  a quadratic equation? Illustrate and defend your answer.

15. Prove that  $\frac{d}{dx} \left( \frac{u}{v} \right) = \frac{v \frac{du}{dx} - u \frac{dv}{dx}}{v^2}$ .

16. If  $u = x^2 + 1$  and  $v = x - 1$ , find  $\frac{d}{dx} \left( \frac{u}{v} \right)$ .

17. Differentiate  $y = \frac{x^2 + 1}{x - 1}$  with respect to  $x$ .

18. Find the area of the region bounded by the curves  $y = x^2$  and  $y = x$  from  $x = 0$  to  $x = 1$ .

19. Prove that the greatest cone that can be cut out of a sphere has its height equal to  $\frac{2}{3}$  of the diameter of the sphere.

20. The volume of a sphere is  $\frac{4}{3}\pi r^3$  and its surface area is  $4\pi r^2$ . Show that the rate of change of volume with respect to radius is equal to the surface area.

BALFOUR COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSIONAL EXAMINATION, 1904

MATHEMATICAL PHYSICS

1. State the fundamental axiom in Statics respecting two equal forces acting at a point. Show that this axiom is only an application of a Metaphysical law.

2. If  $P, Q, R$  be forces at a point, keep each other in equilibrium, prove  $P:Q::\sin(QR):\sin(PR):\sin(PQ)$ .

3. Prove the conditions of equilibrium for any number of forces acting at a point in a plane  $\Sigma P \cos \alpha = 0$  and  $\Sigma P \sin \alpha = 0$ .

4. Find the resultant of two parallel forces  $P, Q$  acting at the extremities of the line  $AB$ , and determine the point of its application.

5. Forces of 21, 7 and 6 lbs. are placed severally at the ends and the middle of a straight lever  $ABC$ , and a 10 lb. weight. Place the fulcrum so that the lever may remain horizontal.

6. Find the centre of gravity of a triangular disc.

7. State the fundamental law deduced by experiment of static friction, and prove the formula  $\tan i = \mu$ .

8. A body lying on a plane inclined at an angle  $\alpha$  is prevented from sliding down by a force pulling up the plane and parallel to it. If  $\mu$  be the coefficient of relative friction, prove  $\mu = W \sin \alpha - m \cos \alpha$ .

9. Draw any system of pulleys, and find its mechanical advantage.

10. Find the space described in four seconds by a body projected vertically downwards with a velocity of 20 ft. per second.

11. If the body in the last example strikes directly an equal inelastic body at rest, at the end of the fourth second, determine the succeeding motion.

12. Prove that for a projectile, if  $v$  be the velocity per second, and  $\alpha$  the angle of projection, the greatest height above the horizontal plane is  $\frac{v^2 \sin^2 \alpha}{2g}$ , and the range on

$\frac{v^2 \sin 2\alpha}{g}$

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATION, 1866.

FRIDAY, MARCH 23, 9 A. M. TO 1 P. M

MATHEMATICAL PHYSICS.

1. State the fundamental axiom in Statics respecting two equal forces acting at a point. Shew that this axiom is only an application of a Metaphysical law.

2. If P, Q, R, acting at a point, keep each other in equilibrium, prove  $P : Q : R :: \sin(Q, R) : \sin(P, R) : \sin(P, Q)$ .

3. Prove the conditions of equilibrium for any number of forces acting at a point in a plane,  $S(P \cos a) = 0$ ,  $S(P \sin a) = 0$ .

4. Find the resultant of two parallel forces P, Q, acting at the extremities of the line A B, and determine the point of its application.

5. Forces of 21, 4, and 6 lbs. are placed severally at the ends and the middle of a straight lever 4 ft. long and 5 lbs. weight. Place the fulcrum so that the lever may remain horizontal.

6. Find the centre of gravity of a triangular disc.

7. State the fundamental law, deduced by experiment, of statical friction, and prove the formula,  $\tan i = m$ .

8. A body lying on a plane inclined at an angle  $a$ , is prevented from sliding down by a force pulling up the plane and parallel to it. If  $m$  be the coefficient of relative friction, prove  $F = W (\sin a - m \cos a)$ .

9. Draw any system of pulleys, and find its mechanical advantage.

10. Find the space described in four seconds by a body projected vertically downwards with a velocity of 20 ft. per second.

11. If the body in the last example strike directly an equal inelastic body at rest, at the end of the fourth second, determine the succeeding motion.

12. Prove that, for a projectile, if  $u$  be the velocity per second, and  $a$  the angle of projection, the greatest height above the horizontal plane  $= \frac{u^2}{2g} \sin^2 a$ , and the range on it  $= \frac{u^2}{g} \sin 2a$ .

13. A pendulum, intended to beat seconds, beats only 8600 times in 24 hours : given  $l$  its length ; find by how much it must be shortened.

14. Prove that the surface of a fluid at rest is level.

15. Shew how to find the specific gravity of a substance heavier than water by the hydrostatic balance, and prove and explain the formula  $\text{Sp. Gr.} = \frac{w}{w-w'}$

16. A body floats in a fluid. Shew geometrically the condition of the equilibrium being stable.

17. A vol. of gas presses 15 lbs per square inch, at the temperature  $60^\circ$ . Suppose it heated to  $212^\circ$  and reduced to half its vol., what will be the pressure per sq. inch ?

18. A man runs round in a circle of radius  $r$  with velocity  $v$  ; find the angle at which his body must be inclined to the vertical. And

19. Give the coefficient of friction of his feet with the ground, find the greatest rate at which he can venture to run.

20. Shew geometrically *when* a water-embankment, coherent throughout, is on the point of being overthrown by the water pressure.

13. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

14. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

15. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

16. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

17. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

18. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

19. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

20. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

21. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

22. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

23. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

24. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

25. A body floats in a liquid. Show that the volume of the body submerged is equal to the weight of the liquid displaced. (10 marks)

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29th, 9 A. M., to 1 P. M.

LOGIC AND PSYCHOLOGY.

1. State Sir Wm. Hamilton's arrangement of the Mental Sciences founded upon Kant's Distribution of Mind.

2. How may the phenomena of the mind be classified? Give Sir Wm. Hamilton's classification.

3. What is the function of the Intuitions? of the Laws of Mind respectively? What are the Practical Processes? and on which of the Intuitions do they severally depend?

4. What is an Inductive as distinguished from an Abstractive Generalization? or what is Generalization as distinguished from Classification simply?

5. What laws of mind are concerned in the formation of Concepts? Give the Predicables arising out of these.

6. Of which of the practical processes is the Syllogism the formula?

7. What determines the figure of a Syllogism?

8. Under what two quantities may Concepts be regarded? and what two kinds of reasoning emerge accordingly?

9. Into which figure, according to the quantity of Extension, and into which, according to the quantity of intension, or comprehension, does reasoning properly fall?

10. How may the latter reasoning be more properly regarded?

12. Why can we only have a negative conclusion in the 2nd figure of the Syllogism? State the nature and purpose of the 3rd figure.

12. What are the two kinds of Conditional Syllogisms? Give the "modus ponens tollens," and vice versa. State the rules of the hypothetical Syllogism.

13. In which figure is the "Sorites" for the most part expressed? Is this reasoning proper, or simply the analysis of a concept?

14. Give a "Sorites," according to the alphabetical symbols, first in the *progressive*, and then in the *regressive*, form, and show the change in the figure, and in the nature of the reasoning as respects the quantity.

15. What is an Enthymematic Syllogism? Is reasoning always fully expressed, or is it for the most part enthymematic?

16. What are the three divisions of the doctrine of Method, or Methodology? and what logical perfection of thought is secured, or aimed at, in each?

DALHOUSIE COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSIONAL EXAMINATION, 1904

Faculty of Arts and Sciences

LOGIC AND PSYCHOLOGY

1. State the two main branches of the study of Logic.
2. How may the phenomena of the mind be classified? Give the main divisions.
3. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
4. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
5. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
6. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
7. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
8. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
9. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
10. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
11. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
12. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
13. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
14. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
15. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
16. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
17. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
18. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
19. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?
20. What is the function of the intellect in the process of knowledge? - What are the main divisions of the intellect? - What are the main divisions of the intellect?



DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29. h, 9 A. M., to 1 P. M.

METAPHYSICS AND ESTHETICS.

1st. What is the argument founded upon the relativity of thought as respects the knowledge of existence?

2nd. What is the proper reply to a sceptical philosophy?

3rd. What is the fallacy in Mansel's application of the Philosophy of the Conditioned, as propounded by Sir Wm. Hamilton?

4th. State the doctrine of the Realists, the Nominalists, and the Conceptualists, respectively, on the subject of general ideas and general terms. What harmonizes these views, or how may the Nominalist be shown to be a Conceptualist, and the Conceptualist a Realist, in the proper sense of the term?

5th. How may the question respecting the Resurrection be ontologically regarded? What infers personal identity? What *a priori* principle does Butler employ to prove the immortality of the soul?

6th. State the principle on which any classification of the Emotions should be based, and the classification accordingly adopted. Show how the Esthetic Emotion may be included under the second generic class of Emotions.

7th. Give Cousin and Allison's theories of the Beautiful, showing in what respects they agree, and in what they differ.

8th. Give the classification of the Desires following upon that of the Emotions. Analyse the Desire of Value. Show its influence among the other Desires.

9th. How does Butler vindicate the disinterested affections against the selfish system of morals. To what higher ground may the question be transferred?

10th. Show what the different Theories of Morals have in common, and which of them brings out most accurately and completely the data of the moral consciousness?

11th. What is Butler's view of Conscience? What is Sir James Mackintosh's? And what view may be taken supplementing the defects of each?

12th. What is the relation of the active principles to Action, and what new phenomenon now evolves?

13th. What is the question regarding the Will? and how may it be viewed, or to what solution do both sides of the controverted question seem to lead?

14th. What question emerges in respect to the origin of Evil?

15th. What was the Manichean doctrine?

16. Is there any possible solution of this question? In defect of a solution is there any practical recourse? and what is our wisdom?

BALBOUSIE COLLEGE AND UNIVERSITY

HAIFA, N. S.

PROFESSOR OF EDUCATION

THEORY OF EDUCATION

EXERCISES AND QUESTIONS

1. What is the purpose of education?
2. What is the purpose of a school?
3. What is the purpose of a teacher?
4. What is the purpose of a student?
5. What is the purpose of a curriculum?
6. What is the purpose of a syllabus?
7. What is the purpose of a lesson plan?
8. What is the purpose of a lesson?
9. What is the purpose of a lesson plan?
10. What is the purpose of a lesson?
11. What is the purpose of a lesson plan?
12. What is the purpose of a lesson?
13. What is the purpose of a lesson plan?
14. What is the purpose of a lesson?
15. What is the purpose of a lesson plan?
16. What is the purpose of a lesson?
17. What is the purpose of a lesson plan?
18. What is the purpose of a lesson?
19. What is the purpose of a lesson plan?
20. What is the purpose of a lesson?

DALHOUSIE COLLEGE AND UNIVERSITY

Faculty of Arts

Department of Chemistry

Final Examination

1905-1906

Chemistry

1. Write a note on the following: (a) Atomic weight, (b) Molecular weight, (c) Valency, (d) Chemical formulae, (e) Chemical equations.

2. Write a note on the following: (a) Law of conservation of mass, (b) Law of conservation of energy, (c) Law of conservation of momentum.

3. Write a note on the following: (a) Dalton's atomic theory, (b) Avogadro's law, (c) Gay-Lussac's law, (d) Avogadro's number.

4. Write a note on the following: (a) Atomic structure, (b) Atomic number, (c) Atomic weight, (d) Atomic mass.

5. Write a note on the following: (a) Periodic table, (b) Mendeleev's periodic table, (c) Modern periodic table.

6. Write a note on the following: (a) Properties of acids, (b) Properties of bases, (c) Properties of salts.

7. Write a note on the following: (a) Oxidation, (b) Reduction, (c) Oxidizing agent, (d) Reducing agent.

8. Write a note on the following: (a) Combustion, (b) Combustion products, (c) Combustion reactions.

9. Write a note on the following: (a) Corrosion, (b) Corrosion products, (c) Corrosion reactions.

10. Write a note on the following: (a) Electrolysis, (b) Electrolysis products, (c) Electrolysis reactions.

11. Write a note on the following: (a) Galvanic cell, (b) Galvanic cell products, (c) Galvanic cell reactions.

12. Write a note on the following: (a) Electroplating, (b) Electroplating products, (c) Electroplating reactions.

13. Write a note on the following: (a) Electrorefining, (b) Electrorefining products, (c) Electrorefining reactions.

14. Write a note on the following: (a) Electrolysis of molten salts, (b) Electrolysis of molten salts products, (c) Electrolysis of molten salts reactions.

15. Write a note on the following: (a) Electrolysis of aqueous solutions, (b) Electrolysis of aqueous solutions products, (c) Electrolysis of aqueous solutions reactions.

16. Write a note on the following: (a) Electrolysis of dilute acids, (b) Electrolysis of dilute acids products, (c) Electrolysis of dilute acids reactions.

17. Write a note on the following: (a) Electrolysis of dilute bases, (b) Electrolysis of dilute bases products, (c) Electrolysis of dilute bases reactions.

18. Write a note on the following: (a) Electrolysis of dilute salts, (b) Electrolysis of dilute salts products, (c) Electrolysis of dilute salts reactions.

19. Write a note on the following: (a) Electrolysis of concentrated acids, (b) Electrolysis of concentrated acids products, (c) Electrolysis of concentrated acids reactions.

20. Write a note on the following: (a) Electrolysis of concentrated bases, (b) Electrolysis of concentrated bases products, (c) Electrolysis of concentrated bases reactions.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATION, 1866.

THURSDAY, MARCH 22, 9 A. M.

ELEMENTARY CHEMISTRY.

1. Explain what is meant by the term "Element" in Chemistry.
2. Explain briefly the Laws of Combination by weight.
3. What is meant by the term Equivalent Number? What are the equivalent numbers of the following Elements:—O, H, N, C, S, P, Ca, Fe, Hg. How is the equivalent number of a compound body found, and what is the equivalent number of  $\text{Al}_2\text{O}_3$ ,  $3\text{S O}_3 + \text{K O}$ ,  $\text{S O}_3 + 24\text{H O}$ .
4. What is the nature of the process of Combustion, and what are its usual products?
5. What is meant by the following terms:—Acid, Alkaline, Basic, Neutral. What is a Salt? What is an Alloy? What is an Amalgam?
6. Explain the nature of the action of Nitric Acid upon such of the following metals as are affected by it, viz.:—Ag, Cu, Sb, Au, Sn, Pt.
7. What rules are to be observed in the construction of Chemical Formulæ?
8. What is the chemical constitution of the Atmosphere, and what provisions are there for maintaining its purity?
9. What is the composition of Water? State fully the chemical characters of the Elements of which it consists, and describe their mode of preparation, with reactions.
10. Enumerate the principal impurities contained in rain, river, lake, sea and mineral Waters. What is the cause of Hardness in water, and how may it be remedied?

PRACTICAL CHEMISTRY.

1. Explain fully in what way you would proceed to test for and separate the Bases of the different groups, giving the group tests and reactions.
2. Explain how you would estimate the amount of Silver in a sample of Galena.
3. Give satisfactory tests for the following Bases, viz.:—Fe O,  $\text{Fe}_2\text{O}_3$ ,  $\text{Cr}_2\text{O}_3$ , Mn O, Cu O, Pb O, Hg O,  $\text{Hg}_2\text{O}$ , Sb  $\text{O}_3$ .
4. Describe the more ordinary processes for detecting impurities in waters.
5. Describe Marsh's process for detection of Arsenic, also Reinsch's Test, and state in what way you would estimate the amount present, noticing the necessary precautions and calculations.
6. How would you recognize the presence of the following Acids:— $\text{PO}_5$ , HCl,  $\text{NO}_5$ ,  $\text{ClO}_5$ , HI, HCl,  $\text{SO}_3$ ,  $\text{CO}_2$ .
7. Determine the Bases present in the Solution placed before you for analysis.

CHEMISTRY, (SENIOR).

1. Point out the more remarkable chemical properties of Heat, Light, Magnetism and Electricity, and show the relation of these forces to Mechanical Force and to Chemical Affinity. Explain Groves's Theory of Correlation of the Physical Forces. Whence comes the electric force during Voltaic action, and in what way would you estimate its amount?

2. What are the constituents of Gunpowder? Explain the chemical change that takes place during its combustion, and show by calculation the proportions of pure materials required for perfect combustion.

3. Explain the process of Gold Amalgamation, particularly with reference to the use of Sodium Amalgam.

4. Describe the various Oxides of Manganese, and point out their basic, neutral or acid properties, noticing fully any circumstance or theory that serves to explain these properties.

5. Describe the process of manufacture of Sulphuric Acid.

6. Describe Phosphoric Acid, with special reference to its mode of combination with bases.

7. Explain the chemical changes involved in each of the following processes, and the resulting products of each:—(1) Eremacausis. (2) Putrefaction. (3) Fermentation.

8. What is Oxalic Acid? In what manner is it produced? and what are its properties?

9. Define (1) Distillation, (2) Fractional Distillation, (3) Destructive Distillation. State the general nature of the bodies to which Destructive Distillation is applied, and the more important chemical products of the process.

10. What is meant by the term Compound Radical? Give varied examples of Radicals. What is a Derived Radical? Give examples, Enumerate some of the more important compounds containing a Radical having the general formula  $(C_n H_{n+1})$ , and likewise those of a Radical  $= (C_n H_{n-1})$ . Explain the difference between Homologous and Heterologous Series.

11. Describe the more remarkable chemical properties of the Alkaloids; give a theory to explain their chemical constitution, and notice the manner in which some of them act upon the animal system.

12. Describe Albumen and the principal forms of Albuminoid Substance found in plants and in the fluids and solid parts of the animal body, with special reference to the process of growth and reparation of tissues.

13. Describe Starch, Sugar, Cellulose and Lignine, and point out the nature of the chemical changes that take place during the ripening of fruits and the formation of woody matter.

14. What is Soap? Explain the chemical constitution of a fat or fixed oil, and the nature of the process of saponification.

1. Point out the more remarkable chemical properties of lead, copper, magnesium and bismuth, and show the relation of these to their mechanical properties. Explain Goussier's theory of the constitution of the physical forces. Whence comes the electric force during Volta's action and in what way would you estimate its amount?

2. What are the constituents of propyl ether? Explain its chemical change that takes place during its combustion, and show its relation to the properties of gas materials required for perfect combustion.

3. Describe the process of lead amalgamation, particularly with reference to the use of potassium cyanide.

4. Describe the various Oxides of Arsenic and point out their basic, neutral or acid properties, including fully any circumstances that may arise in explaining these properties.

5. Describe the process of manufacture of sulphuric Acid, and illustrate its properties and its use in combination with bases.

6. Mention the essential changes involved in each of the following processes, and the resulting products of each:—(1) Decomposition of Potassium Chlorate, (2) Neutralization.

7. What is Oxalic Acid? In what manner is it produced, and what are its properties?

8. Define (1) Distillation, (2) Fractional Distillation, (3) Liquefaction, (4) Sublimation. State the general nature of the bodies to which these processes are applied, and the more important chemical changes that occur in the process.

9. What is meant by the term Compound Radical? Give several examples of Radicals. What is a Binary Radical? Give examples. Enumerate some of the more important compounds containing a Radical, giving the general formula (Oxide, Sulphide, Chloride, Nitride, etc.). Explain the difference between a Radical and a Suboxide.

10. Describe the various remarkable chemical properties of the Alkali Metals, and explain their relation to their atomic weight and their position in the periodic system.

11. Describe the physical and chemical properties of Ammonia, and point out its relation to the acids and alkalis, and its position in the periodic system.

12. Describe the physical and chemical properties of Carbon Dioxide, and point out its relation to the acids and alkalis, and its position in the periodic system.

13. Describe the physical and chemical properties of Sulphur Dioxide, and point out its relation to the acids and alkalis, and its position in the periodic system.

14. Describe the physical and chemical properties of Sulphur Trioxide, and point out its relation to the acids and alkalis, and its position in the periodic system.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29, 2 to 6 P. M.

THIRD YEAR.—FRENCH.

1. Translate:— Extract from Clâteaubriand's. "Voyages en Amérique."

a. Explain the syntax of "dont" in the first sentence, when it is to be used in this form, and for which words it stands.

b. Give the rule for the use of the Infinitive "soutenir," and note some verbs governing the Inf. without preposition.

c. What is "celui;" give the fem. sing., masc. and fem. plural; also the different forms of the conjunct pronoun.

2. Form the Fem. of the following adj.: Béain, blanc, caduc, épais, favori, frais, grec, long; sec, vif, doux, franc, (2 forms), sot, beau. Compare: Bon, mauvais, petit; and translate: My brothers and sisters have left.

3. Translate: he recommends it to me; he recommends me to him; give it to me; do not give it to me; he will take (porter) some thither. State the rule for the place of personal pronouns.

4. Give the French for: One often speaks of himself; somebody knocks at the door; if they strike you, tell me. Explain the difference between: *il y a* and *c'est* with an example for each form; translate "it is" in three different ways, and state how they are to be applied.

5. Translate: The ladies have perished; our friends have set out for Paris; here are the letters which I have read. Give the rules for the agreement of Participles.

6. Explain how the aux. of mood: do, shall, will, should, ought, would, could, to be to, are rendered in French, and give an ex. of each form. Translate: I want you to be more careful (*avoir soin*); I wish you were more careful. State the rule regarding these forms.

7. Compare the Adverbs: bien; mal, peu. Name the preposition which Adv. of quantity require, and state the exception with an ex. Point out the four diff. expressions in English for "combien."

8. State the difference between: *Je ferai le trajet en 15 jours*, and *je ferai le trajet dans 15 jours*. What mean: *Je vais a la campagne* and: *je vais me mettre en campagne*. Translate: I am going to England, to London, to my friends.

9. What mood of the verb is required after Prepos. and which is the exception; illustrate the two forms by ex. What compound conj's. govern the same mood: ex. Speak instead of being silent (*se taire*).

10. Translate: Rousseau has rendered three great services to his century and to ours. In Politics, he sought in the national right a solid base for power; in morals, he awakened the feeling of duty, and preached with eloquent conviction the existence of God, and the spirituality of the soul; finally, as a consequence of these noble principles, he renewed the sources of poetry, and taught it to see, to love nature.

BALHOUTS COLLEGE AND UNIVERSITY

MAY 1911

REGIONAL EXAMINATIONS

THIRD YEAR - 1911

1. The student is required to read the following books and to prepare an answer to the questions asked.

2. The student is required to read the following books and to prepare an answer to the questions asked.

3. The student is required to read the following books and to prepare an answer to the questions asked.

4. The student is required to read the following books and to prepare an answer to the questions asked.

5. The student is required to read the following books and to prepare an answer to the questions asked.

6. The student is required to read the following books and to prepare an answer to the questions asked.

7. The student is required to read the following books and to prepare an answer to the questions asked.

8. The student is required to read the following books and to prepare an answer to the questions asked.

9. The student is required to read the following books and to prepare an answer to the questions asked.

10. The student is required to read the following books and to prepare an answer to the questions asked.

11. The student is required to read the following books and to prepare an answer to the questions asked.

12. The student is required to read the following books and to prepare an answer to the questions asked.

13. The student is required to read the following books and to prepare an answer to the questions asked.



DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29th, 2 to 6 P. M.

FOURTH YEAR.—FRENCH.

1. Traduisez: "Le songe d' Athalie." Acte II. Scène V. de la tragédie "Athalie" par "Racine."

a. A quelle source Racine a-t-il emprunté le sujet de la tragédie "Athalie?" Ecrivez un précis de cette scène en prose française.

2. Quand la forme verbale en *ant* est-elle part. prés. et quand adjec. verbal? Corrigez les phrases suivantes: "Une humeur plaisant n'est pas celle des vieillards souffrant. Les bombes éclatantes portent autour d'elles la mort et l'incendie.

3. La forme verbale en *ant* est-elle variable ou invariable, lorsqu'elle est précédée de la prépos. *en*? Traduisez: 'Tis not to be unhappy to occupy your mind sleeping and waking.

4. Ecrivez correctement les part. passés dans les phrases suivantes: Il est plus aisé de dire des choses nouvelles que de concilier celles qui ont été dit. La justice et la modération de mes ennemis nous ont plus nuis que leur valeur. Expliquez les règles d'accord pour ces participes passés.

5. Quelles dures vérités ils se sont dit. Elles se sont parlé! Corrigez les fautes dans ces phrases, s'il y en a, et dites comment s'accordent les part. p. des verbes pronominaux?

6. Le participe *fait* suivi d'un infinitif est-il variable ou invariable. Traduisez: The kindness (pl.) which you have made me feel, gives me the right, to make use of so tender a name.

7. Quelle différence y a-t-il entre: plus et davantage; entre et parmi; durant et pendant. Traduisez: One must love his country more than his family. Vanity is dangerous, idleness is more so. Thunder was heard during the storm. He lived as a Christian during his whole life.

8. Qu'est-ce que le pléonasme? Quand peut-il être admis? Corrigez les phrases suivantes, où le pléonasme est vicieux: Il n'y a que le seul Racine qui soutienne constamment l'épreuve de la lecture (Voltaire). Eh! que m'a fait, à moi, cette Troie où je cours? (Racine). Peut on plus dignement mériter la couronne? (Corneille). Le prince en montant au trône a combé les malheureux de mille grâces.

9. Traduisez en français:—"The conversation of Scott was frank, hearty, picturesque and dramatic. A vein of strong, shrewd common sense ran throughout it, as it does throughout all his writings; but was enriched and enlivened by incessant touches of feeling, of fancy and humour. He had a natural turn for narration, and his narratives and descriptions were without effect yet wonderfully graphic; he described the appearance and characters of his personages with that spirit evinced in his writings."

WASHINGTON IRVING.

DALHOUSIE COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSIONAL EXAMINATIONS 1902

THURSDAY, MARCH 27th 1902

FOURTH YEAR—PHYSICS

1. The following is a list of the names of the students who have taken the course in Physics during the session 1901-2.

2. The following is a list of the names of the students who have taken the course in Physics during the session 1900-1.

3. The following is a list of the names of the students who have taken the course in Physics during the session 1899-0.

4. The following is a list of the names of the students who have taken the course in Physics during the session 1898-9.

5. The following is a list of the names of the students who have taken the course in Physics during the session 1897-8.

6. The following is a list of the names of the students who have taken the course in Physics during the session 1896-7.

7. The following is a list of the names of the students who have taken the course in Physics during the session 1895-6.

8. The following is a list of the names of the students who have taken the course in Physics during the session 1894-5.

9. The following is a list of the names of the students who have taken the course in Physics during the session 1893-4.

10. The following is a list of the names of the students who have taken the course in Physics during the session 1892-3.

11. The following is a list of the names of the students who have taken the course in Physics during the session 1891-2.

12. The following is a list of the names of the students who have taken the course in Physics during the session 1890-1.

13. The following is a list of the names of the students who have taken the course in Physics during the session 1889-0.

14. The following is a list of the names of the students who have taken the course in Physics during the session 1888-9.

15. The following is a list of the names of the students who have taken the course in Physics during the session 1887-8.

16. The following is a list of the names of the students who have taken the course in Physics during the session 1886-7.

17. The following is a list of the names of the students who have taken the course in Physics during the session 1885-6.

18. The following is a list of the names of the students who have taken the course in Physics during the session 1884-5.

W. A. [Name]

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29th, 9 A. M., to 1 P. M.

GERMAN : THIRD YEAR.

1. Translate :—

a. *Willst du dich selber erkennen, so sich wie die.*

*Andern es treiben ;*

*Willst du die Andern verstehn, Ulick' in dein eigenes Herz.*  
"Schiller."

b. The three first stanzas of Goethe's Poem "Erlkönig."

(1.) State the imperf. and p. part of all the verbs in the above aphorism. Give the rule for the formation of the p. part of regular and irregular verbs.

(2.) Give the gender and nom. plural of the following nouns : *Nacht, Wind, Vater, Kind, Kuabe, Gesicht, Nebelstreif*. Mention how the gender of comp'd Subst. is ascertained.

(3.) Decline *liebes Kind* in all its forms, sing. and plural, and state the rule for the declension of Adject.

2. Compare *Gut, viel, gern, gross, hoch, bald*. Explain the use of *der reichste* and *am reichsten*. Give an ex. for each case.

3. Give the four cases sing. of : *Ich, du, er, sie, es* ; translate : Who are these men ? they are soldiers.

4. Write in German : The book you have read. The King whom I have seen. Explain the position of the verb.

5. State the verbs which reject the syllable *ge* in the p. part, and name the prefixes of such verbs.

6. By what preposition is the infinitive of German verbs preceded ? and which verbs reject this prepos. Write an ex. for each form.

7. How are compound verbs formed in German ? how many kinds are there ? and what is the construction peculiar to them ? Give ex.

8. Write the three persons sing. present tense, the imperf. and p. part of the verbs : *sein, werden, binden, ziehen, reiten, befinden, ausgehen*.

9. *Wahrend, mit, fur, auf, nach, in*. State the different cases these prepos. require ; point out those which govern two cases, and show by short ex. when they are to be used in the one or the other case.

10. Render into German : I have lost my book : and that of my sister. Which is the highest mountain in America ? Schiller was born at Marbach on the 11th November, 1759 (in letters). Whose house is this ? Of which poet (*Dichter*) do you speak ? Do you know who has translated Schiller's poems ? (*Gedichte*). Tell saved (*rettete*) Baumgarten's life, by ferrying him (*übersetzen*) over the lake. How long have you been in Germany ? (*Deutschland*). I remained (*blieb*) there but a short (*kurz*) time.

DAFFODIL COLLEGE AND UNIVERSITY

HALLMARK, M. S.

REGIONAL EXAMINATION, 1962

University, Hyderabad, N. S. 19, 1962

GERMAN, THIRD YEAR

1. Translate -  
 a) Was ist das Ziel der Arbeit, die Sie machen?  
 b) Was ist die Bedeutung der Arbeit, die Sie machen?  
 c) Was ist die Aufgabe der Arbeit, die Sie machen?  
 d) Was ist die Verantwortung der Arbeit, die Sie machen?  
 e) Was ist die Wichtigkeit der Arbeit, die Sie machen?  
 f) Was ist die Notwendigkeit der Arbeit, die Sie machen?  
 g) Was ist die Dringlichkeit der Arbeit, die Sie machen?  
 h) Was ist die Wichtigkeit der Arbeit, die Sie machen?  
 i) Was ist die Notwendigkeit der Arbeit, die Sie machen?  
 j) Was ist die Dringlichkeit der Arbeit, die Sie machen?

2. Compare the two following sentences and explain the difference in meaning.  
 a) Ich habe die Arbeit gemacht.  
 b) Ich habe die Arbeit gemacht lassen.  
 c) Ich habe die Arbeit machen lassen.  
 d) Ich habe die Arbeit machen lassen lassen.

3. Write in German: The first part of the work is finished. The second part is still in progress. Explain the position of the verb.

4. Name the verb which agrees with the subjects in the following sentences and write the correct form of each verb.  
 a) Die Arbeit, die Sie machen, ist die wichtigste Arbeit, die Sie machen.  
 b) Die Arbeit, die Sie machen, ist die interessanteste Arbeit, die Sie machen.  
 c) Die Arbeit, die Sie machen, ist die schwierigste Arbeit, die Sie machen.  
 d) Die Arbeit, die Sie machen, ist die langwierigste Arbeit, die Sie machen.

5. How are the two parts of the sentence in German? How many words are there? And what is the grammatical function of each part? Give an example.

6. Write in German: The first part of the work is finished and the second part is still in progress. Explain the position of the verb and the part of the verb which agrees with the subject in each sentence.

7. Write in German: The first part of the work is finished and the second part is still in progress. Explain the position of the verb and the part of the verb which agrees with the subject in each sentence.

8. Write in German: The first part of the work is finished and the second part is still in progress. Explain the position of the verb and the part of the verb which agrees with the subject in each sentence.

9. Write in German: The first part of the work is finished and the second part is still in progress. Explain the position of the verb and the part of the verb which agrees with the subject in each sentence.

10. Write in German: The first part of the work is finished and the second part is still in progress. Explain the position of the verb and the part of the verb which agrees with the subject in each sentence.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29th, 9 A. M., to 1 P. M.

FOURTH YEAR — GERMAN.

1. Translate:—Schiller's "Wilhelm Tell" Act I. Scene 4th. "Melchthal's Grief."

a. What part of Speech is *keines* in the 12th verse. State by ex. the difference between *kein* and *nicht*.

b. *Himmelsgabe, Lebensblut*. Which are the compounds of these subst. State their gender, and give the rule for its formation. Name exceptions.

c. Write the 2<sup>nd</sup> and 3<sup>rd</sup> pers. sing. of the pres. tense; the imperf. and p. part. of the verbs: *sitzen, sterben, ansehen, hinfahren*.

2. Correct the following sentences: *Die Stadt ist von dem Feinde niedergebrannt gewesen. Die jungen Baume sind im Fruhling gepflanzt. Das Glas wurde zerbrochen, ehe ich in's Zimmer kam.* Explain how the passive voice is to be rendered in German.

3. Whoever considers (*bedenkt*) too much, will perform (*leisten*) little. Whatever is just, deserves (*verdient*) praise. Write "whoever" and "whatever" in two different ways.

4. Give: *Es friert mich* in three different forms; illustrate by ex. how "it is" and "there is" are to be translated; and express in the active and passive voice the sentence: They sing and dance much in Germany.

5. What influence have conj. on the position of the verb? Name the conj. which cause no alteration of the construction; state an ex. for each case.

6. By what words in German is the English conj. "when" to be rendered in the following sentences: Tell me when you come. When I am at work, (*Arbeit f.*) I don't like visitors (*Besuche*). When I was ill, I sent for (*nach- . . . schicken*) the physician.

7. State which verbs are separable, and which inseparable. Name a few verbs of each of the two classes of compound inseparables.

8. How is the English Pres. Part. to be rendered in German. State Examples.

9. Motion to and from the speaker is expressed by which particles? Give some short examples.

10. Translate into German: I have hitherto (*bis jetzt*) known nothing of true virtue. I have spent (*zubringen*) my life in darkness and error. Not all my power and honours (*Wurden* pl.) are sufficient (*genugen*) to produce love. I cannot boast (*sich rühmen*) of having gained a single friend in the course (*während*) of a reign (*Regierung f.*) of thirty years; and yet these two persons in private life (*im Privatleben*) love one another tenderly, are mutually (*gegenseitig*) happy, and ready (*bereit*) to die for each other (*einander*).

DALHOUSIE COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSION OF EXAMINATIONS 1906

TRINITY MATHEMATICS, &c., &c.

FOURTH YEAR—GERMAN

1. Theorem: ...

2. ...

3. ...

4. ...

5. ...

6. ...

7. ...

8. ...

9. ...

10. ...

11. ...

12. ...

13. ...

14. ...

15. ...

16. ...

17. ...

18. ...

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATION, 1866.

FRIDAY, MARCH 23, 9 A. M., to 1 P. M.

RHETORIC.

FIRST YEAR STUDENTS.

1. Give a definition of *Rhetoric*, and state its proper province, and different departments.
2. Explain what is meant by *Purity*, and show the most frequent ways in which it is violated.
3. Describe the process of *Investigation*, and give illustration.
4. What is the relative importance of *Analysis* in composition.
5. Explain what is meant by *Point of View*, and give illustration.
6. Explain the process of *Classification*.
7. What are the chief divisions in arranging the *Order of Thought*, and the chief law to be observed?
8. What are the rules to be observed in the treatment of the *Introduction* and the *Conclusion*?
9. What effect is produced by the use of the definite rather than the indefinite, and concrete rather than the abstract?
10. Give an example of Inversion of the order of words, and in the order of thought.
11. Define *Antithesis* and state what may be its importance. Change the following sentence so that the idea may be expressed antithetically:—*Appearances often deceive*.
12. What is the difference between *Comparison* and *Simile*; *Metaphor* and *Trope*; give example of each.
13. Distinguish between the following, and give an example of each:—*Metonymy*, *Melalepsis*, *Synecdoche*.
14. Distinguish between the provinces of Rhetoric and Logic respectively, in reference to *Argument*.
15. Give an example of *Argument from Cause to Effect*, and show how it differs from argument from *Sign*.
16. Explain and illustrate the argument from *Induction*.
17. Give some examples of *false analogies*, in common use.
18. Explain the argument from *Contraries*.
19. What are the chief sources of the *Sublime*?
20. Define *Wit* and *Humor*, and show the distinction between them.

WALDOUGGE COLLEGE AND UNIVERSITY

HALIFAX, N. S.

SESSIONAL EXAMINATION, 1924

Faculty, March 22 & 23, 1924

RHETORIC

FIRST YEAR STUDENTS

1. Give a definition of *epithet*, and state its proper position, and different departments.
2. Explain what is meant by *parallelism*, and show the most important ways in which it is related.
3. Describe the process of *personification*, and give illustrations.
4. What is the relative importance of *imagery* in composition?
5. Explain what is meant by *metonymy*, and give illustrations.
6. Explain the process of *metonymy*.
7. What are the chief devices in arranging the Order of Thought, and the chief law to be observed?
8. What are the rules to be observed in the treatment of the Introduction and the Conclusion?
9. What effect is produced by the use of the definite rather than the indefinite, and concrete rather than the abstract?
10. Give an example of inversion of the order of words, and in the order of thought.
11. Define *chiasm*, and state what may be its importance. Arrange the following sentences so that the best way be expressed satisfactorily:—*Aggravation often follows.*
12. What is the difference between *comparison* and *metonymy*?
13. Explain and illustrate the following, and give an example of each:—*Metonymy, Simile, Synecdoche.*
14. Distinguish between the processes of *metonymy* and *chiasm*, and give an example of each.
15. Give an example of *agreement* from *Case* in *English*, and show how it differs from *agreement* from *Gender*.
16. Explain and illustrate the agreement from *inflection*.
17. Give some examples of *poetic* metaphors in common use.
18. Explain the agreement from *Construction*.
19. What are the chief sources of the *epithet*?
20. Define *metonymy* and *chiasm*, and show the distinction between them.



DALHOUSIE COLLEGE AND UNIVERSITY.

HALIFAX, N. S.

EXAMINATION

IN THE HISTORY OF THE BRITISH EMPIRE

1884

1. Trace the history of the British Empire from the reign of Elizabeth I. to the present time, and show the character of each.

2. Give an outline of the reign of Elizabeth I. and show the character of her reign. Trace the history of the British Empire from the reign of Elizabeth I. to the present time, and show the character of each.

3. Give an outline of the reign of James I. and show the character of his reign. Trace the history of the British Empire from the reign of James I. to the present time, and show the character of each.

4. Give an outline of the reign of Charles I. and show the character of his reign. Trace the history of the British Empire from the reign of Charles I. to the present time, and show the character of each.

5. Give an outline of the reign of Charles II. and show the character of his reign. Trace the history of the British Empire from the reign of Charles II. to the present time, and show the character of each.

6. Give an outline of the reign of James II. and show the character of his reign. Trace the history of the British Empire from the reign of James II. to the present time, and show the character of each.

7. Give an outline of the reign of George I. and show the character of his reign. Trace the history of the British Empire from the reign of George I. to the present time, and show the character of each.

8. Give an outline of the reign of George II. and show the character of his reign. Trace the history of the British Empire from the reign of George II. to the present time, and show the character of each.

9. Give an outline of the reign of George III. and show the character of his reign. Trace the history of the British Empire from the reign of George III. to the present time, and show the character of each.

10. Give an outline of the reign of George IV. and show the character of his reign. Trace the history of the British Empire from the reign of George IV. to the present time, and show the character of each.

11. Give an outline of the reign of William IV. and show the character of his reign. Trace the history of the British Empire from the reign of William IV. to the present time, and show the character of each.

12. Give an outline of the reign of Victoria and show the character of her reign. Trace the history of the British Empire from the reign of Victoria to the present time, and show the character of each.

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

THURSDAY, MARCH 29th, 9 A. M. to 1 P. M.

HISTORY.

1. Divide Modern European History into periods; and state the characteristic of each.
2. Consider the History of France by centuries; and mention the leading events in each.
3. State the causes of the decline of the Roman Empire. Enumerate the Barbarian tribes, their conquests, and final settlements.
4. Show the extension of Christianity among the Barbarians; in what way; and under what form. Mention the causes that led to the supremacy of the Pope; and the Temporal Power.
5. Give an outline of the rise of Mohammedanism;—its conquests;—its decline;—and the effects of Arab civilization on that of Europe.
6. Account for the rise of Feudalism.
7. Show the origin of the Holy Roman Empire. Name the chief Monarchs of the Hohenstaufen line. Give an outline of the reign of Frederic Barbarossa.
8. Enumerate the different Crusades, with dates, and show their effect on European civilization.
9. Write a short account of the following:—Abelard; Saint Bernard; The Assassins; The Vehm—gericht.
10. What circumstances influenced the advancement of the Commons? Consider in connection with this the rise of the Third Estate in France; the Parliament in England; and the Hanse League in Germany.
11. Mention the chief dynasties in the Greek Empire. What important purpose was effected by Constantinople? By whom was it captured; and when; and what results followed in Europe from its fall?
12. Enumerate the great events of the 15th century and point out their effects respectively.
13. Give a brief account of the rise of the Dutch Republic; with dates.
14. Describe the career of Richilieu; and explain his policy.

15. Describe the English Revolution. Show genealogically the connection of the House of Brunswick with the British throne.

16. Show the policy of Louis 14th. Classify the wars of his reign, and point out their purpose and result, respectively.

17. Give an account of the chief campaigns in the American Revolution.

18. Enumerate the causes of the French Revolution.

---

19. In the history of the church, explain the Greek schism. Show why the Popes took up their residence at Avignon; and point out the results of this: first, on the European world, and secondly, on the church itself.

20. Show the origin of modern literature in Spain, in France, and in Italy. Distinguish between the Troubadours and Trouveres. What circumstance gave a great impetus to Italian art? Give a short sketch of Cimabue.

1. The first part of the book is devoted to a general survey of the history of the French Revolution.

2. The second part is devoted to a detailed account of the events of the Revolution, from the storming of the Bastille to the execution of Louis XVI.

3. The third part is devoted to a study of the political and social changes which took place during the Revolution.

4. The fourth part is devoted to a study of the literature of the Revolution, and to the influence of the Revolution on the arts and sciences.

5. The fifth part is devoted to a study of the legacy of the Revolution, and to the influence of the Revolution on the world.

6. The sixth part is devoted to a study of the French Revolution in France, and to the influence of the Revolution on the French people.

7. The seventh part is devoted to a study of the French Revolution in Europe, and to the influence of the Revolution on the other nations of Europe.

8. The eighth part is devoted to a study of the French Revolution in the world, and to the influence of the Revolution on the other parts of the world.

9. The ninth part is devoted to a study of the French Revolution in the present, and to the influence of the Revolution on the present world.

10. The tenth part is devoted to a study of the French Revolution in the future, and to the influence of the Revolution on the future world.

11. The eleventh part is devoted to a study of the French Revolution in the past, and to the influence of the Revolution on the past world.

12. The twelfth part is devoted to a study of the French Revolution in the present and future, and to the influence of the Revolution on the present and future world.

13. The thirteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

14. The fourteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

15. The fifteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

16. The sixteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

17. The seventeenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

18. The eighteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

19. The nineteenth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

20. The twentieth part is devoted to a study of the French Revolution in the past, present, and future, and to the influence of the Revolution on the past, present, and future world.

UNIVERSITY OF TORONTO LIBRARY

UNIVERSITY OF TORONTO LIBRARY

UNIVERSITY OF TORONTO LIBRARY

UNIVERSITY OF TORONTO LIBRARY

UNIVERSITY OF TORONTO LIBRARY

1. How the different departments of the University of Toronto are organized?
2. Give a definition of "University".
3. What is the purpose of a university?
4. To what of these purposes does the University of Toronto contribute?
5. How does the University of Toronto contribute to the progress of the world?
6. What is the purpose of the University of Toronto?
7. What is the purpose of the University of Toronto?
8. What is the purpose of the University of Toronto?
9. What is the purpose of the University of Toronto?
10. What is the purpose of the University of Toronto?
11. What is the purpose of the University of Toronto?
12. What is the purpose of the University of Toronto?
13. What is the purpose of the University of Toronto?
14. What is the purpose of the University of Toronto?
15. What is the purpose of the University of Toronto?
16. What is the purpose of the University of Toronto?
17. What is the purpose of the University of Toronto?
18. What is the purpose of the University of Toronto?
19. What is the purpose of the University of Toronto?
20. What is the purpose of the University of Toronto?

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, APRIL 2nd, 9 A. M. to 1P. M.

ETHICS AND POLITICAL ECONOMY.

1. State the different opinions of Philosophy on the "Freedom of the Will."
2. Give a definition of "Conscience."
3. Explain the mental process by which it is preceded.
4. Classify the theories of Ethical writers respecting the nature of virtue.
5. To which of these classes does Epicurus belong? To which Plato? Hobbes? Smith? Butler? Wayland? Chalmers?
6. In what does virtue consist? and what is the standard of virtue?
7. What constitutes rectitude in an action?
8. What is necessary in order to virtue in the agent?
9. State briefly Dr. Clarke's famous "A priori" argument for the existence of the Deity.
10. Exhibit the syllogistic form the "A posteriore" argument.
11. By what general principles are we guided in our endeavors to ascertain duty by the light of nature?
12. Apply these principles to prove that benevolence is a virtue.
13. Explain the difference between allowable self love and selfishness.

- 
1. What is value? and how is it created?
  2. In what respect are teachers productive laborers?
  3. By what means may the productiveness of human labor be increased?
  4. What benefits accrue from the division of labor?
  5. What circumstances necessarily limit the application of this principle?
  6. What state of Society presents the strongest inducements to productive labor?
  7. On what principle do men proceed in making exchanges?
  8. What is the function of money in exchange?
  9. Why should "coining" be retained in the hands of the Government?
  10. What dangers are to be apprehended from the issue of paper by Banks?
  11. How are they to be prevented?
  12. What principles should regulate the imposition of taxes?
  13. What kind of property can bear the largest amount of taxation without interfering with these principles?

DALHOUSIE COLLEGE AND UNIVERSITY,  
HALIFAX, N. S.

SESSIONAL EXAMINATIONS, 1866.

MONDAY, APRIL 2nd, 9 A. M. to 1 P. M.

EXPERIMENTAL PHYSICS.

1. What is the main object of Natural Philosophy?
2. State the principles which should guide us in our search after causes?
3. Why does a bullet thrown at a pane of glass smash it in pieces while, fired from a rifle, it makes merely a circular hole in it?
4. What is the first law of motion?
5. Explain the nature and use of friction wheels?
6. What kind of lever is generally employed by nature to move the limbs of animals.
7. What are the advantages and disadvantages of this kind of lever?
8. What is the fundamental principle in Hydrostatics?
9. With a given area, what shape must an orifice have to discharge the largest quantity of liquid?
10. Explain the modus operandi of the "Air Pump"?
11. What is the difference between *Free* and *Latent* Heat?
12. Why does snow protect the earth from frost?
13. Give the law which regulates the intensity of light?
14. Why is a room with white walls more easily lighted than a room with colored walls?
15. Give the rule for finding the focus of a plano-convex lens when the incident rays are parallel?
16. State the order in which the colors appear on the solar spectrum?
17. When are colors said to be complementary?
18. In what part of the spectrum is actinism exhibited with greatest intensity?
19. In what relation do notes, called Octaves, stand to each other?
20. State the different electrical theories.
21. Explain the different parts of the electrical plate machine.
22. How are buildings injured by lightning? and how may the danger be averted?
23. Explain the nature of magnetic variation and its different kinds?
24. How is the magnetic pole indicated?
25. Explain the process of magnetizing by *double touch*.

HARVARD COLLEGE AND UNIVERSITY

MASSACHUSETTS

DEPARTMENT OF PHYSICS

PHYSICS

THE EXPERIMENTAL PHYSICS

1. To determine the value of the acceleration due to gravity by observing the motion of a falling body.

2. To determine the value of the acceleration due to gravity by observing the motion of a pendulum.

3. To determine the value of the acceleration due to gravity by observing the motion of a projectile.

4. To determine the value of the acceleration due to gravity by observing the motion of a body on an inclined plane.

5. To determine the value of the acceleration due to gravity by observing the motion of a body in a fluid.

6. To determine the value of the acceleration due to gravity by observing the motion of a body in a vacuum.

7. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density.

8. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density.

9. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity.

10. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity.

11. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity, and known temperature.

12. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity, and unknown temperature.

13. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity, and known temperature, and known pressure.

14. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity, and unknown temperature, and unknown pressure.

15. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity, and known temperature, and known pressure, and known humidity.

16. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity, and unknown temperature, and unknown pressure, and unknown humidity.

17. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity, and known temperature, and known pressure, and known humidity, and known magnetic field.

18. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity, and unknown temperature, and unknown pressure, and unknown humidity, and unknown magnetic field.

19. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of known density and known viscosity, and known temperature, and known pressure, and known humidity, and known magnetic field, and known electric field.

20. To determine the value of the acceleration due to gravity by observing the motion of a body in a medium of unknown density and unknown viscosity, and unknown temperature, and unknown pressure, and unknown humidity, and unknown magnetic field, and unknown electric field.



