1913

1913-1914 The Normal School Bulletin

Southern Illinois State Normal University

Vol. VIII. No 2.

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Southern Illinois State Normal University

April, 1914

Catalog Number

Published Quarterly in
January, April, July, October
CARBONDALE, ILL.

1874 1914

Vol. VIII No. 2

THE NORMAL SCHOOL BULLETIN

SOUTHERN ILLINOIS

State Normal University

CARBONDALE

APRIL, 1914

Catalog Number 1913-1914

ANNOUNCEMENTS FOR 1914-1915

PUBLISHED QUARTERLY BY THE UNIVERSITY
January, April, July, October

Entered as second-class matter March 27, 1907, at the post office at Carbondale, Illinois, under the Act of Congress, July 16, 1894

DANIEL BALDWIN PARKINSON, A. M., Ph. D.,
President Emeritus

BOARD OF TRUSTEES

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CARBONDALE

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Ex-officio, SPRINGFIELD

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W. W. Williams,
BENTON

George McGahey,
OLNEY

Herbert Piper,
SUMNER

C. E. Hamilton - - - - - - - - *Treasurer*
CARBONDALE

FACULTY

1914-1915

Henry William Shryock, Ph. B., President

Department of English,
Martha Buck, Grammar,
Lily Gubelman, Ph. B., Grammar,
Helen Bryden, A. B., Composition, Literature,
Jennie Mitchell, A. B., Dramatic Art.

Carlos Eben Allen, Ph. D., Vice-President, Registrar, and Business Agent.

Department of Languages,
J. M. Pierce, A. M., French, German,
Emma L. Bowyer, A. B., Latin.

Drawing and Design,
Matilda Finley Salter,
Grace L. Burket.

Civics and History,
George Washington Smith, A. M., Secretary of Faculty.

Geography and Physiography,
Frank H. Colyer, A. B.

Mathematics,
William Troy Felts, Ed. B.
Ward H. Taylor, A. M.
Mary M. Steagall, Ph. B., Ed. B.

Psychology and Pedagogy,
George D. Wham, Ed. B.

Music,
*Floyd A. Powers,
Glenn C. Bainum, A. B.
Lydia G. Parsons,
Julia Dickerman Chastaine, Violin,
Raymond Moore, Cornet.

Chemistry,
George Mervin Browne.

Physics,
Simeon E. Boomer, A. M.

Biology,
John P. Gilbert, A. M.
W. M. Bailey, M. S.
†Isabel Clegg,
†Raymond Parkinson,
†William Brandon, M. D.

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*Resigned.
†Special Teachers.

Agriculture,
Renzo Muckelroy,
H. B. Piper, S. B.

Manual Training,
Louis C. Petersen, S. B.

Household Arts,
Grace E. Jones,
Lucy K. Woody.

Commercial,
Richard V. Black, M. Accts.
Anne McOmber,
Charles R. Ismert.

Physical Training,
Inez L. Hollenberger, Ph. B., Girls,
William McAndrew, A. B., Boys.

Bureau Rural School Work,
W. O. Brown.

Training School,
W. A. Furr, A. M., Superintendent.

Principal High School,
F. G. Warren, A. B.

Assistant,
Myrtle R. Coker, A. B.

Grades Seven and Eight,
Elizabeth K. Wilson,

Grades Five and Six,
Fadra Holmes,

Grades Three and Four,
Alice Parkinson,

Grades One and Two,
Florence King.

Librarian,
Mary B. Day, Ph. B.

Associate,
Louise Marshall.

Museum, Curator and Floriculture,
George Hazen French, A. M.

Secretary to the President,
Kate W. Youngblood.

STANDING COMMITTEES

Degree Courses:
C. E. Allen, Ph. D.
J. M. Pierce, A. M.
J. P. Gilbert, A. M.
Simeon E. Boomer, A. M.
Ward H. Taylor, A. M.

Social Life Students:
Inez L. Hollenberger, Ph. B.
Fadra R. Holmes.
Helen Bryden, A. B.
William McAndrew, A. B.
W. T. Felts, Ed. B.
F. G. Warren, A. B.

Appointments Committee:
G. D. Wham, Ed. B.
W. A. Furr, A. M.
Anne McOmber.

Boarding Places:
G. W. Smith, A. M.
F. H. Colyer, A. B.
Mary M. Steagall, Ed. B., Ph. B.

Summer Term, 1914, closes Friday, July 17.
Fall Term opens Tuesday, September 15, 1914.
Fall Term closes Wednesday, December 23, 1914.
Winter Term opens Tuesday, January 5, 1915.
Winter Term closes Thursday, March 18, 1915.
Spring Term opens Tuesday, March 23, 1915.
Spring Term closes Wednesday, June 9, 1915.
Summer Term, 1915, opens Monday, June 14.
Summer Term, 1915, closes Friday, July 23.

CALENDAR 1914, 1915.

1914

JULY

S	M	T	W	T	F	S
..	.	..	1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	●	18
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AUGUST

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SEPT.

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OCTOBER

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NOVEMBER

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DECEMBER

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1915

JANUARY

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31	..	..	..	..	..	..

FEBRUARY

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MARCH

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APRIL

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MAY

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JUNE

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JULY

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AUGUST

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SEPT.

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OCTOBER

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24	25	26	27	28	29	30
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NOVEMBER

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DECEMBER

S	M	T	W	T	F	S
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12	13	14	15	16	14	18
19	20	21	22	23	27	25
26	27	28	29	30	31	..

■ Opening day of term ● Closing day of term.

◜ Thanksgiving interim.

HISTORY

An act of the General Assembly of the State of Illinois, approved April 20, 1869, provided for the establishment of this Normal School. By this act it was ordered that five trustees should be appointed by the Governor of the State, who should fix the location, erect the buildings, and employ teachers for the school. The trustees located the school in the town of Carbondale, on a lot of twenty acres, three-fourths of a mile south of the station of the Illinois Central Railroad. The cornerstone was laid on the 17th day of May, 1870, with impressive ceremonies, by the Masonic fraternity. The building was finished in time to be dedicated July 1, 1874; the first faculty commenced the work of instruction in the new building July 2, 1874, at which time a summer session of four weeks was opened, with fifty-three students attending.

On the sixth day of September, 1874, the regular work of the Normal University commenced.

On the afternoon of November 26, 1883, at 3 o'clock the beautiful building was discovered to be on fire, and before 5 o'clock p. m., despite the efforts of the faculty, students, and citizens of Carbondale, the entire building was in ruins. By the heroic labors of students, teachers and citizens, the library was saved, and most of the furniture; also the physical and chemical apparatus. All the material in the museum was lost.

The citizens kindly offered the use of rooms in some of the business blocks, which the trustees accepted, and the school went on with regular recitation work, with an actual loss of less than two days. In the meantime a plan was proposed for a temporary school building, and in less than sixty days a building was completed containing fourteen rooms, and the Normal School began its wonted studies in this, its temporary home.

The General Assembly, by an act approved June 27, 1885, appropriated $152,065 to replace the first building, then lying in ruins. The foundation and stone walls of the first story were utilized, thus saving from twelve to fifteen thousand dollars.

This building, which is the main one of the entire plant, is a magnificent structure, in many respects superior to the one destroyed by fire. It was dedicated Thursday, February 24, 1887, and occupied by the school with much rejoicing on the following Monday.

The Science Building was provided for by an act of the General Assembly in the winter of 1895, appropriating $40,000 for the purpose. It accommodates the physical, chemical and biological

laboratories, the museum, gymnasium, manual training and agricultural Department. It was completed in the fall of '95, and was dedicated in '96. It also provided for the library till May 14, when the books were transferred to the new Library Building, now known as the "Wheeler Library;" so named in honor of the late Judge S. P. Wheeler.

The Library Building was erected in the fall and winter of 1903-4 at a cost of $30,000. It was dedicated June 7, 1904.

The Forty-fifth General Assembly made an appropriation of $50,000 for the erection of a Modern Model School Building. This building was completed within the appropriation late in December, 1908, and adds very much to the material equipment of the Institution. It was dedicated with appropriate exercises on January 11, 1909. This building is named in honor of the late President, Robert Allyn.

The Forty-seventh General Assembly made an appropriation of $75,000 with which to establish a Woman's Building. This structure, now known as Anthony Hall, was completed in the fall of 1913 and was dedicated with impressive ceremonies on October 23. For the first two terms after the opening there were a few vacant rooms in the Hall, but with the opening of the spring term 1914, every available room was in use and there was a waiting list.

AIMS

Educational institutions may be divided according to their aims into four classes:

First: The public schools, whose aim is the promotion of good citizenship by securing to all people the intelligence, morality and patriotism which are essential to the existence and progress of the State. Second: Colleges and universities, whose object is the general and full development implied in complete manhood and in the best preparation for professional life. Third: Professional and polytechnic schools, in which the student is helped in his preparation for his chosen lifework. Fourth: Such institutions as the Royal Society of Great Britain, the Sorbonne of France, and our own Smithsonian Institute, which have for their special object the advancement of science and art. This Normal University belongs to the third class; it aims to give the best physical, mental and professional equipment for teaching.

The State Normal school holds an important relation to the system of public schools. It helps to create and sustain a high standard of educational work. It should serve as a driving force and a balance wheel to the whole system. Sanctioned and supported by the State, it can institute those investigations and experiments which result in much good to all the schools. It brings school facilities within the reach of many who otherwise would be uneducated and enables them to repay the State by teaching in the public school. If the State needs a great university which shall be a center of educational forces, if an agricultural college should be sustained on account of the importance of agriculture, much more, and for similar reasons, should the normal school receive the care and benefactions of the State. Man is more than all things else, and whatever contributes to his better development is of the highest use.

If the graduates of normal schools shall take high rank as superintendents, principals, and teachers in the public schools, they must possess three elements of success: A full development of mental power, a thorough mastery of the sciences involved, and a thorough training in methods of instruction and school management. If the normal school should neglect the first and second, the graduates would be supplanted by those of other schools; and if they fail in the latter, there would be no good reason for the existence of these institutions. Hence, we aim, first, to insure a broad and thorough culture; and, second, to give special prominence to the professional work peculiar to a normal school. Under the present conditions of Southern Illinois, this school must hold itself ready to do more or less academic work. As the better grades of high school are created in the patronizing territory of the school, the need of the academic phrase of the institution will become less and less, and the professional side will be more and more emphasized.

GENERAL INFORMATION

You are asked to note carefully the following sections from "An Act to provide for the certification of teachers."

Sec. 6. County certificates granted by the county superintendent and the requirements for the same shall be as follows:

First—A third grade elementary school certificate, valid for one year in the first eight grades of the common schools of the county in which it is issued and in no other county. This certificate shall be renewable once only and on evidence satisfactory to the county superintendent of three months' successful teaching or six weeks' professional training. Applicants for this certificate shall be examined in orthography, civics, Illinois history, physiology, penmanship, reading, grammar, geography, United States history, arithmetic and the principles and methods of the State course of study. This certificate shall not be issued the second time to the same person.

At the option of the county superintendent this certificate may be issued without examination to persons who have successfully completed two years of work in a recognized normal school, or one year of such work if the applicant is a graduate of the tenth grade.

Second—A second grade elementary school certificate valid for two years in the first eight grades of the common schools of the county and in the ninth and tenth grades when endorsed for the same by the county superintendent. This certificate shall be renewable on evidence satisfactory to the county superintendent of six months' successful teaching or twelve weeks' professional training, and a second time if in the period following the date of issue the holder shall have acquired eighteen weeks' professional training in any recognized school providing such training. The applicant for this certificate shall be examined in orthography, civics, Illinois history, physiology, penmanship, reading, grammar, geography, United States history, arithmetic, elementary science, pedagogy, and the principles and methods of the State course of study.

At the option of the county superintendents this certificate may be issued without examination to persons who have completed the junior year's work in a recognized normal school, or its equivalent.

Third—A first grade elementary school certificate, valid for three years in the first ten grades of the common schools of the county, and in the high school when endorsed for the same by the county superintendent. This certificate shall be renewable indefinitely for periods of three years, upon evidence of successful teaching and professional growth satisfactory to the county superintendent.

The requirements for this form of certificate shall be: (1) graduation from a recognized high school, or an equivalent preparation; (2) six months of successful teaching, and (3) an examination in orthography, including spelling, civics, Illinois history, physiology, penmanship, reading, grammar, geography, United States history, arithmetic, pedagogy, English, algebra, general history, and any three of the following natural sciences: Botany, zoology, physics, chemistry and physiography. *This certificate shall be issued to graduates of a recognized normal school, or from an institution offering an equivalent preparation, provided the applicant has had one year of successful practice teaching, and applies for the certificate within three years after graduation.*

Fourth—A high school certificate, valid for three years in the high schools of the county. This certificate shall be renewable indefinitely for periods of three years on evidence satisfactory to the county superintendent of successful teaching or supervision and professional growth.

The requirements for this form of certificate shall be: (1) Graduation from a recognized high school, or an equivalent preparation; (2) a certificate showing the completion of at least two years' successful work in any recognized higher institution of learning, and (3) an examination in English, pedagogy, and six high school subjects, three majors and three minors, chosen from a list prescribed by the examining board hereinafter provided for: *Provided, however, that graduates of a recognized normal school, college or university may offer within three years after graduation, certified credits in lieu of examination in the above subjects accompanied by faculty recommendations of ability to teach in the high school.*

Fifth—A supervisory certificate valid for three years for supervisory work in any district in the county and for teaching in the schools supervised by the holder. This certificate shall be renewable for three year periods on satisfactory evidence of successful teaching or supervision, and of professional growth. The requirements for this certificate shall be: (1) Graduation from a recognized high school and at least two years' work in a recognized higher institution, *one of which shall have been in a normal school,* or an equivalent preparation; (2) two years' successful teaching or supervision, and (3) a successful examination in English, educational psychology, the history of education, and school administration.

Location, Etc.

Carbondale is a thriving little city, healthful and beautiful, of over 5400 inhabitants, with many refined people. It is easy of access, and offers inducements for board and social advantages beyond

most places of its size. It has, perhaps, fewer temptations to idleness, and combines religious and educational privileges in a degree greater than the average of towns and cities of its size. Carbondale has no saloons. Parents may be assured that their children will be as safe as in any school away from home, and students may come here and feel assured that economy and industry will be respected and honored by their fellow students and by the faculty. The Illinois Central Railroad affords ample facilities for convenient access, three of its branches passing through Carbondale.

University Calendar

Fall Term begins Tuesday, September 15, and closes Wednesday, December 23, 1914.

Winter Term begins Tuesday, January 5, and closes Thursday, March 18, 1915.

Spring Term begins Tuesday, March 23, and closes Wednesday, June 9, 1915.

Summer Term of 1915 begins Monday, June 14, and closes Friday, July 23.

Length of Terms: Fall, 15 weeks; Winter, 11; Spring, 12; Summer 6.

Commencements: For 1914, Wednesday, June 3; for 1915, Wednesday, June 9.

Terms of Admission

All applicants for admission must present evidence of good moral character and, to secure free tuition, they must agree to teach in the public school of the State for a time not less than that covered by their attendance on the school. This agreement should not be entered upon unless the applicant fully intends to teach. It may become void, however, if engagement to teach cannot be secured by reasonable effort. In case of a permanent change in plan, the individual is expected to pay to the registrar of the Institution the difference between the regular tuition for the entire time and the incidental fees he has paid.

Those who hold scholarships under the Lindley Bill are not expected to sign the agreement to teach and are admitted without the payment of any fees.

Eighth grade graduates enter the preparatory department. Persons holding lowest grade certificates, or with evidence of completion of ninth grade work, are admitted to the first year of the normal. Teachers holding second grade certificates are admitted to the second year of the regular normal course. Graduates of accredited high schools enter with junior standing. Reasonable credit will be given for work done in other schools, provided satisfactory evidence is presented.

Expenses

TUITION

To those who sign the agreement to teach, tuition is gratuitous; but the ruling of the Board of Trustees of the Institution requires that there shall be an incidental fee charged. At present this fee is $3 for the term of fifteen weeks, and $2 for the term of eleven and twelve weeks, and $1, for the summer term. The rates of regular tuition in the different departments are as follows:

Department.	Summer Term.	Fall Term.	Winter Term.	Spring Term.
Normal (Residents of Illinois) ...	$3.00	$8.00	$6.00	$6.00
Training School	No tuition	4.00	3.00	3.00

BOARDING

Board can be had in good families in Carbondale at rates varying from $3.00 to $4.00 per week; and by self-boarding, or by boarding in clubs, the cost may be reduced to $2.25 per week. By strict economy the whole expense of boarding and tuition may be reduced to less than $100 per year.

For the accommodation of the students a bank is maintained in the office of the Registrar, and the students are urged to transact their business through this bank provided they have not already established relations with one of the local financial institutions.

ANTHONY HALL

With the beginning of the Fall Term, 1913, the Woman's Building, Anthony Hall, was opened. This model school home for girls will accommodate about seventy students. It has been erected and furnished at a cost of $75,000, and every possible provision has been made for the comfort, safety and well-being of its inmates. Board and lodging in this ideal boarding house will be furnished at $4.00 per week, except for summer term.

The free instruction in Violin and other stringed instruments, and Coronet and other brass and wind instruments, has proved a wonderful success, and the management has been encouraged to add the offer of free piano instruction. With the opening of the fall term it is hoped that we shall have three music rooms, each provided with a piano, where any student who wishes to prepare himself to lead the music in his school with either organ or piano, may be accommodated.

Literary Societies

Zetetic and Socratic

During the first term of the first year of the Institution, September, 1874, the Zetetic Literary Society was organized. Later in the year a sister organization was planned for, and in due time was

thoroughly established and christened the Socratic Literary Society. These have a large membership and are well attended.

The more elaborate exhibition of what these societies are able do is annually given to the public on Monday and Tuesday evenings of Commencement week.

The varied programs of these literary societies from week to week add very materially to the work of the English department in securing additional practice in the delivery of original and other matter, and in the opportunity for becoming acquainted with parliamentary usages, thus fitting the Normal student for more intelligent service in the communities in which he may labor.

The Faculty and Board of Trustees foster, with much care, the best interests of the valuable adjuncts to the literary work of the Institution. Their usual time of meeting is on Friday evening of each week in the halls provided by the University.

Attendance Upon Church

Students are urged to identify themselves at an early date after entering the Normal school, with some church of the city. It is assumed, of course, that the student will affiliate with the church to which he belongs at home, or with which he is most in sympathy as to doctrine and modes of worship.

Christian Association

The Young Men's Christian Association and the Young Women's Christian Association each has a well-conducted organization, which meets weekly in a room fitted for their use on the second floor in the Library Building. Their committees look after new students upon their arrival, and those who may be sick while attending school, and in many ways minister to the wants of their fellow students. Several classes in Bible study are maintained by these societies. The State college secretaries of each of these branches of Christian work pay the Institution a visit twice a year, or oftener, for conference and direction of work. New students upon their arrival may recognize the representatives of these associations by special badges worn, indicating their willingness to render their kindly services whenever needed. These persons may be trusted implicitly in directing strangers to boarding houses and clubs.

Departments

The Normal University forces are organized into two general schools—the Academic and the Professional. The purely academic work is cared for in the Normal University High School, which of-

fers as wide a variety of courses and as thorough a training as is provided in the best secondary schools anywhere.

The Professional school is organized into two separate bodies: first, the Normal School proper; second, Teachers' College. A graduate from the Normal School proper receives the usual diploma, and the school offers the following courses: 1. A special two-year course for graduates of four-year high schools. 2. An English course of four years. 3. A German course of four years. 4. A Latin course of four years. 5. An Art course of four years. 6. A course in Manual Training of four years. 7. A course in Household Arts of four years. 8. A course in Agriculture of four years. 9. A Business course of four years.

The Teachers' College offers a choice of three courses: one leading to the Ed. B., another to the Ph. B., and the third to the A. B. degree. A graduate from the regular Normal School may finish the degree course within two years. A graduate from a reputable college may receive the degree at the end of one year.

COURSES OF STUDY

English Course

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	B Geography (4, 7)	B Drawing (2, 4, 6)
B Grammar (2, 4, 6)	B Reading (3)	A Reading (3)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys. Tr. (5)
School Management (2, 3, 6)	B History (2, 3, 6)	Civics (2, 6)
D. Algebra (1, 5, 7)	B Arithmetic (1, 3)	Indust. and Com. Geog. (1)

Second Year

C Literature (4)	Elocution (6, 7 or Bl. Drawing (6, 7)	A Grammar (1, 4)
A Geography (2, 7)	A History (4)	A Arithmetic (4, 5)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
El. Music (5)	Prin. of Teaching (5)	Practice
El. Construction (6)	Woodwork (7)	Bench Work (6)

Third Year

Rhetoric (2)	C Physics (3-4)	B Physics (3-4)
C Algebra (1, 3)	B Algebra (2, 4)	A Algebra (1, 2)
General History (5)	General History (5)	General History (5)
Practice	Prin. of Education (1)	Music Methods (2)
Phys. Tr.	Phys. Tr.	Phys. Tr.

Fourth Year

English History (6)	English Prose (6)	English Poetry (4)
Geometry (3, 5)	B Geometry (2, 3)	A Geometry (3) or Trigonometry (7)
Chemistry (7-8)	Chemistry (7-8)	
Hist. of Education (4)	Practice	Comparative Grammar (1)
Astronomy (3) or A Physics (1)	History of Art (2, 3)	Geology (6)

Latin or German Course

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	B Grammar (2, 6)	B Drawing (2, 4, 6)
Latin 1 (1, 2, 7) or German 1 (7)	Latin 2 (2, 4, 7) or German 2 (7)	Latin 3 (1, 7) or German 3 (7)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	A Reading (3)
School Management (2, 3, 6)	B History (2, 3, 6)	Civics (2, 6)
D Algebra (1, 5, 7)	B Arithmetic (1, 3)	B Geography (4, 5)

Second Year

C Literature (4)
A Geography (2, 7)
Zoology (1-2, 7-8)
El. Music (5)
Latin 4 (3, 6)
or German 4 (3)

Elocution (6, 7) or
Bl. Drawing (6, 7)
A History (4)
Physiology (1-2, 5-6)
Music Methods (6)
Latin 5 (3, 5)
or German 5 (3)

A Grammar (1, 4)
A Arithmetic (4, 5)
Botany (3-4, 7-8)
Prin. of Teaching (2)
Latin 6 (3)
or German 6 (3)

Third Year

Rhetoric (2)
C Algebra (1, 3)
Latin 7 (4)
or German 7 (4)
C Physics (5-6)
Phys. Tr.

General History (5)
B Algebra (2, 4)
Latin 8 (4)
or German 8 (4)
B Physics (7-8)
Phys. Tr.

General History (5)
A Algebra (1, 2)
Latin 9 (4)
or German 9 (4)
Prin. of Education (6)
Practice

Fourth Year

Latin 10 (5)
or German 10 (5)
History of Education (4)
Chemistry (7-8)
Practice
C Geometry (3, 5)

Latin 11 (5)
or German 11 (5)
English Prose (6)
History of Art (2, 3)
Practice
B Geometry (2, 3)

Latin 12 (5)
or German 12 (5)
English Poetry (4)
Geology (6)
A Geometry (3)
or Trigonometry (7)

TWO YEAR COURSE.

First Year

Fall

B Grammar (2, 4, 6)
Zoology (1-2, 7-8)
B Drawing (4)
Rhetoric (2)
A Physics (1)
or Astronomy (3)

Winter

B History (2, 3, 6)
Practice
Prin. of Teaching (5)
B Arithmetic (1, 3)
Elocution (6, 7) or
Bl. Drawing (6, 7)
Phys. Tr.

Spring

A Arithmetic (4, 5)
A Reading (3)
B Geography (4, 5)
Prin. of Education (6)
A Grammar (1, 4)

Second Year

English History (6)
History of Education (4)
Chemistry (7-8)
A Geography (2, 7)
El. Music (5)

A History (4)
English Prose (6)
History of Art (2, 3)
B Algebra (2, 4)
Practice

Practice
English Poetry (4)
Music Methods (2)
A Geometry (3)
or Trigonometry (7)
Latin 12 (5)
or *Geology (6)

*Graduates of Latin High School Course will take Latin 12; others will take Geology.

AGRICULTURAL COURSE

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys Tr. (5)
B Grammar (2, 4, 6)	B Reading (3)	Civics (2, 6)
D Algebra (1, 5, 7)	B History (2, 3, 6)	B Arithmetic (7)
Chemistry (1-2)	Chemistry (1-2)	Chemistry (1-2)
Crop Production (3)	Crop Production (4)	School Management (4)

Second Year

C Literature (4)	Prin. of Teaching (5)	Indust. and Com. Geog. (1)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
C Algebra (1, 3)	B Algebra (2, 4)	A Algebra (1, 2)
Dairy and Beef Cattle (2)	Sheep and Swine (3)	Horses (4)
Physics (5-6)	B Physics (7-8)	Breeding Farm Animals (5)

Third Year

Rhetoric (2)	Prin. of Education (1)	Practice
Chemistry (3-4)	Chemistry (3-4)	Chemistry (3-4)
General History (5)	General History (5)	General History (5)
Soil Physics (7-8)	Soil Physics (7-8)	Farm Management (6)
Dairying (6)	Practice	Poultry (7)

Fourth Year

Prin. of Fruit Growing (5)	Small Fruit (5)	Gardening or Orcharding (6)
C Geometry (3, 5)	B Geometry (2, 3)	Farm Mechanics (2)
Adv. Soil Fertility (7-8)	Adv. Soil Fertility (7-8)	Soil Bacteriology (3)
History of Education (4)	Practice	Ornithology (5)
Entomology (6)	Feeds and Feeding (1)	Market Classes and Grades of Live Stock (1)

ART COURSE

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	Bl. Drawing (6, 7)	B Drawing (2, 4, 6)
B Grammar (2, 4, 6)	B Reading (3)	A Reading (3)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys. Tr. (5)
School Management (2, 3, 6)	B History (2, 3, 6)	Civics (2, 6)
D Algebra (1, 5, 7)	B Arithmetic (1, 3)	B Geography (4, 5)

Second Year

C Literature (4)	Prin. of Teaching (5)	Practice
El. Design (5)	Clay Modeling (3)	Cast Drawing (1)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
Mechanical Drawing (2)	Mechanical Drawing (4)	Bench Work (6)
El. Construction (6)	Elocution (6, 7) or Instr. Music (6, 7)	El. Music (5)

Third Year

Rhetoric (2)	Practice	Prin. of Education (6)
C Algebra (1, 3)	B Algebra (2, 4)	Music Methods (2)
General History (5)	General History (5)	General History (5)
Practice	C Physics (3-4)	B Physics (3-4)
Charcoal Drawing (7)	A Drawing (7)	Adv. Design (1)

Fourth Year

History of Education (4)	English Prose (6)	English Poetry (4)
C Geometry (3, 5)	B Geometry (2, 3)	Comparative Grammar (1)
History of Art (1)	Adv. History of Art (1)	Picture Study (5)
Adv. Water Color (5)	Int. Design and Home Economics (4)	Life Sketching (6)
English History (6)	Mechanical Perspective (3) or Harmony (3)	A Geometry (3) or Trigonometry (7)

COMMERCIAL COURSE

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	B Reading (3)	B Drawing (2, 4, 6)
B Grammar (2, 4, 6)	B History (2, 3, 6)	Civics (2, 6)
Adv. Penmanship (6)	School Management (4)	Indust. and Com. Geog. (1)
D Algebra (1, 5, 7)	Mental Arithmetic (1)	Com. Arithmetic (3)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys. Tr. (5)

Second Year

C Literature (4)	Prin. of Teaching (5)	Practice
Com. Arithmetic (3)	Rapid Calculations (6)	English (6)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
Typewriting (2)	Typewriting (7)	Typewriting (2)
Shorthand (1)	Shorthand 2 (3)	Shorthand 3 (1)

Third Year

General History (5)	General History (5)	General History (5)
C Algebra (1, 3)	B Algebra (2, 4)	Prin. of Education (6)
Book-keeping (2)	Actual Business (7)	Book-keeping (7)
Typewriting (3, 5)	Typewriting (1)	Salesmanship (4)
Shorthand 4 (4)	Shorthand 5 (4)	Economics (2)

Fourth Year

Rhetoric (2)	English Prose (6)	English Poetry (4)
C Physics (5-6)	B Physics (7-8)	Practice
History of Education (4)	B Geometry (2, 3)	Office Practice (3)
C Geometry (3, 5)	Commercial Law (5)	Commercial Law (5)
Banking (7)	Corporations (2)	Auditing (1)

HOUSEHOLD ARTS COURSE

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	B Reading (3)	B Drawing (2, 4, 6)
B Grammar (2, 4, 6)	B History (2, 3, 6)	Civics (2, 6)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys. Tr. (5)
Chemistry (1-2)	Chemistry (1-2)	Chemistry (1-2)
D Algebra (1, 5, 7)	School Management (4)	B Arithmetic (7)

Second Year

C Literature (4)	Dec. Design (1)	Indust. and Com. Geog. (1)
C Algebra (1, 3)	B Algebra (2, 4)	Prin. of Teaching (2)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
El. Construction (6)	C Physics (3-4)	B Physics (3-4)
Sewing and Textiles (2-3)	Sewing and Textiles (7-8)	Sewing and Textiles (5-6)

Third Year

Rhetoric (2)	Household Chemistry (3-4)	Chemistry of Foods (3-4)
General History (5)	General History (5)	General History (5)
C Geometry (3, 5)	B Geometry (2, 3)	Bacteriology (2)
Cookery (7-8)	Cookery (7-8)	Cookery (7-8)
Design and Dress Making (1)	Dress Making and Pattern Making (1)	Prin. of Education (6)

Fourth Year

History of Education (4)
Practice
Adv. Cookery (5-6)
Book-keeping (2)
Methods (3)

English Prose (6)
Practice
Nutrition (3)
History of Art (2, 3)
Home Economics (4)

English Poetry (4)
Practice
Dietetics (5-6)
Home Economics (2)

Two Year Course in Household Arts

Pre-requisites

High School Diploma
1 year Chemistry
1 year Biology
1 year Art
1 year Physics

First Year

Fall	*Winter*	*Spring*
Rhetoric (2)	Prin. of Teaching (5)	Prin. of Education (6)
B Drawing (4)	Household Chemistry (3-4)	Chemistry of Foods (3-4)
El. Construction (6)	Physiology (1-2, 5-6)	Bacteriology (2)
Cookery (7-8)	Cookery (7-8)	Cookery (7-8)
Sewing and Textiles (2-3)	Sewing and Textiles (6)	Sewing and Textiles (1-5)

Second Year

History of Education (4)
Practice
Adv. Cookery (5-6)
Methods (3)
Dress Making and Design (1)

English Prose (6)
Practice
Nutrition (3)
Home Economics (4)
History of Art (2-3)
or Dress Making and Pattern Making (1)

English Poetry (4)
Practice
Dietetics (5-6)
Home Economics (2)

MANUAL TRAINING COURSE

PREPARATORY

Fall	*Winter*	*Spring*
History (1, 3)	Music (5)	Illinois History (3)
Arithmetic (2)	Arithmetic (7)	Algebra and Geometry (1)
Geography (1, 3)	El. Science (3)	El. Science (2)
Reading (5, 7)	Composition (1, 2)	Grammar (7)
Penmanship and Spelling (4)	Penmanship and Spelling (4)	Drawing (4)
Phys. Tr. (6)	Phys. Tr. (6)	Phys. Tr. (6)

NORMAL

First Year

C Drawing (1, 3, 4)	B Reading (3)	B Drawing (2, 4, 6)
B Grammar (2, 4, 6)	B History (2, 3, 6)	Civics (2, 6)
English and Phys. Tr. (5)	English and Phys. Tr. (5)	English and Phys. Tr. (5)
D Algebra (1, 5, 7)	B Arithmetic (1, 3)	Indust. and Com. Geog. (1)
School Management (2, 3, 6)	B Geography (4, 7)	Carpentry (7)

Second Year

C Literature (4)	C Physics (3-4)	B Physics (3-4)
C Algebra (1, 3)	B Algebra (2, 4)	A Algebra (1, 2)
Zoology (1-2, 7-8)	Physiology (1-2, 5-6)	Botany (3-4, 7-8)
El. Construction (6)	Dec. Design (1)	Prin. of Teaching (2)
Wood Turning (7)	Wood Work (7)	Bench Work (6)

Third Year

C Geometry (3, 5)	B Geometry (2, 3)	A Geometry (3) or Trigonometry (7)
A Physics (1)	History of Art (2, 3)	General History (5)
General History (5)	General History (5)	Cabinet Making (8)
Forge Work (8)	Pattern Making (6)	Mechanical Drawing (4)
Mechanical Drawing (2)	Mechanical Drawing (4)	Prin. of Education (6)

Fourth Year

Chemistry (7-8)	Chemistry (7-8)	Metallurgy (6-7)
Rhetoric (2)	English Prose (6)	English Poetry (4)
History of Education (4)	Mechanical Perspective (3)	Con. Design (3)
Practice	Practice	Practice
Art Metal (5)	Machine Shop (5)	Machine Shop (5)

COURSES LEADING TO THE A. B., PH. B., OR ED. B. DEGREE

Rules governing the degree courses:

Graduate courses in which a class meets daily for one term shall be given one credit or unit.

Twenty-four units are required for any baccalaureate degree, these units to be in addition to those required for the normal diploma. No duplication of credits is permissible.

No member of the faculty may admit to any degree course any student who is not a graduate of the school, without having such registration approved by the president.

Any subject *required* in any degree course may be offered as an elective in any other degree course. Any subject found in the senior year of our several courses may, upon approval by the president, be offered as an elective, provided it has not been used for graduation.

The A. B. Degree

Candidates for the A. B. degree must meet the following requirements: Four years of Latin, and two years of Greek are required of all candidates for this degree. All of the Greek and the last two years of Latin may be taken with other degree courses and counted as part of the required 24 credits. In addition to these requirements, the following credits must be made:

Mathematics .....3 units
History .....3 units
High School Education.....1 unit
High School Practice.....1 unit
Psychology .....1 unit
English .....1 unit
Biological or Physical Science.....2 units

Electives are offered as follows:

Latin (additional) .....6 units

or

Modern Language .....6 units
Mathematics (additional) .....3 units
Biological or Physical Science.....4 units
English .....2 units
Geology.....1 unit
Astronomy .....1 unit
Art.....3 units

The Ph. B. Degree

Six units in one line or department of work shall constitute a major. Three units in one line or department of work shall constitute a minor.

Upon entrance to this course each student shall elect (through consultation with the heads of the departments concerned) one major and at least one minor, to be chosen from the following:

Mathematics	6 units	(1 major, 2 minors)
Biological Science	6 units	(1 major, 2 minors)
Physical Science	6 units	(1 major, 2 minors)
History	3 units	(1 minor)
Earth Science	3 units	(1 minor)

(The biology consists of a year each in botany and zoology; the physical science of one year of chemistry and one of physics.)

All candidates are required to complete:

Modern Language	6 units
English	1 unit
High School Education	1 unit
High School Practice	1 unit
Psychology	1 unit

The five elective units needed to complete the work for a degree may be chosen from any major or minor group except the group in which the candidate has chosen his major.

The Ed. B. Degree

Candidates must meet the following requirements:

Psychology	1 unit
Sociology or History of Education	1 unit
Child Development or School Administration	1 unit
High School Education	1 unit
High School Practice	2 units
English	1 unit

The electives in this course are to be chosen from at least five departments in which graduate work is offered leading to the A. B. and Ph. B. degrees.

Program of Exercises

Fall Term

	Shryock	Buck	Salter	Smith	Allen	Colyer	Pierce	Felts	Browne	Hollenberger
1	.....	.....	Hist. rt.	Prep. Hist	.....	Prep. Geog.	.....	C Alg.	Chem. 1	.....
2	Rhetoric	B Gram.	.....	.....	.....	A Geog.	.....	.....	Laboratory	.....
					ASSEMBLY EXERCISES					
3	.....	.....	.....	Prep. Hist	Greek 1	Prep. Geog.	Ger. 4	C Alg.	Chem. 7	.....
4	C Lit.	.....	C Draw	.....	Latin 7	.....	Ger. 7	.....	Laboratory	.....
					NOON RECESS					
5	.....	.....	Ad. Wat Col.	Gen. Hist.	Latin 10	.....	French 4	.....	.....	1st yr.Phy.Tr
6	.....	B Gram.	.....	Eng. Hist.	Greek 4	.....	French 1	Trig.	.....	Prp.Phys.Tr.
7	.....	.....	Ch. Cl. Draw	.....	.....	A Geog.	Ger. 1	D Alg.	Chem. 1 B	.....
8	.....	.....	.....	.....	.....	.....	.....	.....	Laboratory	.....

Winter Term

1	.....	.....	Ad. Hist Art.	.....	.....	.....	.....	B Arith.	Chem. 2	.....
2	.....	B Gram.	Hist. Art	B Hist.	.....	.....	.....	B Alg.	Laboratory	.....
					ASSEMBLY EXERCISES					
2	B Read.	.....	.....	B Hist.	Greek 2	.....	Ger. 5	.....	Chem 10	.....
4	.....	.....	.....	A Hist.	Latin 8	B Geog.	Ger. 8	B Alg.	Chem. 4	.....
					NOON RECESS					
5	.....	.....	.....	Gen. Hist.	Latin 11	.....	French 5	.....	.....	1styr.Phy.Tr
6	Eng. Prose	.....	.....	B Hist.	Greek 5	.....	French 2	College Alg.	.....	Prp.Phys.Tr.
7	.....	.....	Bl.Bd. Draw.	.....	.....	B Geog.	Ger. 2	A Alg.	Chem. 2 B	.....
8	.....	.....	.....	.....	.....	.....	.....	.....	Laboratory	.....

Spring Term

1	.....	A Gram.	Cast Draw	.....	.....	Ind.&Com. G	.....	A Alg.	Chem. 3	.....
2	.....	.....	.....	Civics	.....	.....	.....	A Arith.	Laboratory	.....
					ASSEMBLY EXERCISES					
3	A Read.	.....	.....	Prp. ll. Hist.	Greek 3	.....	Ger. 6	.....	Chem. 11	.....
4	Eng. Poetry	A Gram.	B Draw	.....	Latin 9	B Geog.	Ger. 9	A Arith.	Chem. 5	.....
					NOON RECESS					
5	.....	.....	P'ture Study	Gen. Hist.	Latin 12	B Geog.	French 6	.....	.....	1st yr.Phy.Tr
6	.....	.....	B Draw	Civics	Greek 6	Geology	French 3	.....	Metallurgy	Prp.Phys.Tr.
7	.....	Prep. Gram.	.....	.....	.....	.....	Ger. 3	Trig.	Laboratory	.....
8	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....

Program of Exercises

Fall Term

	Black	Bryden	Wham	Steagall	Balnum & Parsons	Petersen	Burket	Jones	Gilbert	Boomer
1	.....	.....	Child Devel.	D Alg.	.....	.....	C Draw.	.....	Zoology	A Physics
2	Bk. Keeping	.....	Sc'l Manag.	Prep. Arith.	.....	Mech. Draw.	.....	.....	Laboratory	.....
					ASSEMBLY EXERCISES					
3	Com'l Arith.	.....	Sc'l Manag.	.....	.....	.....	C Draw.	Methods	.....	Astronomy
4	Prp.Pen.&Sp.	.....	Hist. Edu.	.....	.....	.....	B Draw.	.....	.....	.....
					NOON RECESS					
5	.....	1st yr. Eng.	Psychol.	D Alg.	El. Mus.	Art Metal	El. Design	Ad. Cookery	.....	C Physics
6	Adv. Pen.	.....	Sc'l Manag.	.....	.....	El. Const.	.....	Laboratory	Entomology	Laboratory
7	Banking	.....	.....	.....	.....	Wood Turn.	.....	Cookery	Zoology	Physics 6
8	.....	.....	.....	.....	Bnd. & Orch.	Forge work	.....	Laboratory	Laboratory	.....

Winter Term

1	Men. Arith.	.....	Prin. Ed.	B Arith.	.....	.....	Dec. Design	.....	Physiology	Physics 7
2	Corporations	.....	.....	B Alg.	.....	.....	.....	.....	Laboratory	Physics 7
					ASSEMBLY EXERCISES					
3	.....	.....	.....	B Arith.	Harmony	Mec. Persp.	Clay Model	Nutrition	Prep. El. Sci.	C Physics
4	Prp.Pen.&Sp.	.....	Sc'l Manag.	.....	.....	Mec. Draw.	.....	Int. Ds.H.Ec.	.....	Laboratory
					NOON RECESS					
5	Com'l Law	1st yr. Eng.	Prin. Teach.	.....	Prep. Music	Mac. Shop	.....	.....	Physiology	.....
6	Rapid Cal.	.....	.....	.....	Music Meth.	Pattern M'g.	B Draw.	.....	Laboratory	.....
7	Actual Bus.	.....	.....	Prep. Arith.	.....	Woodwork	A Draw.	Cookery	.....	B Physics
8	.....	.....	Sociology	.....	Bnd. & Orch	.....	.....	Laboratory	.....	Laboratory

Spring Term

1	Auditing	.....	.....	Prep. Alg.	.....	.....	Adv. Design	.....	.....	.....
2	Economics	.....	Prin. Teach.	.....	Music Meth.	.....	B Draw.	Home Econ.	Bacteriology	Prp. El. Sci
					ASSEMBLY EXERCISES					
3	Com'l Arith	.....	.....	.....	.....	Con. Design	.....	.....	Botany	B Physics
4	S'lesmanship	.....	Sc'l Manag.	.....	.....	Mec. Draw.	Prep. Draw.	.....	Laboratory	Laboratory
					NOON RECESS					
5	Com'l Law	1st yr. Eng.	H. S. Edu.	.....	El. Music	Mach. Shop	.....	Dietetics	Ornithology	.....
6	.....	English	Prin. Edu.	.....	.....	Bench work	Life Sket.	Laboratory	.....	.....
7	Bk. Keeping	.....	.....	.....	.....	Carpentry	.....	Cookery	Botany	.....
8	.....	.....	.....	.....	Bnd. & Orch	Cab. Making	.....	Laboratory	Laboratory	.....

Program of Exercises

Fall Term

	Muckelroy	Woody	Bowyer	Taylor	Piper	McOmber	McAndrew	Moore & Chastaine	Ismert	Gubelman	Mitchell
1		Dgn. & Dr. Mtg.	Latin 1			Shorthand 1					
2	D'ry&Bf.Ctl.	Sew. & Textiles	Latin 1	Prep. Arith.		T'pew'ting 2					
					ASSEMBLY EXERCISES						
3		Sew. & Textiles	Latin 4	C Geom.	Crop Prod.	T'pew'ting 1					
4						Shorthand 4				B Gram	
					NOON RECESS						
5				C Geom.	Prin. Frt. Gr	Typewriting	Phys. Tr.		Shorthand		Prep. Read.
6	Dairying		Latin 4	Solid Geom.			Phys. Tr.		Typewriting		
7	Adv. Soil Fert.		Latin 1		Soil Phys.		Phys. Tr.				Prep. Read.
8	Laboratory				Laboratory		Phys. Tr.				

Winter Term

1	Feeds & Fdg.	Drng. & Ptrn. M.		B Arith		Typewriting					Prep. Comp.
2			Latin 2	B Geom.	Crop Prod.	Shorthand 5			Shorthand		Prep. Comp.
					ASSEMBLY EXERCISES						
3	Sheep&Swine		Latin 5	B Geom.		Shorthand 3		Typewriting			
4			Latin 2		Crop Prod.	Shorthand 5			Shorthand		
					NOON RECESS						
5			Latin 5		Small Frts.	Typewriting	Phys. Tr.				
6		Sew. & Textiles				Shorthand	Prp.Phys.Tr.			B Gram	Elocution
7	Adv.SoilFert.	Sew. & Textiles	Latin 2		Soil Phys.		Phys. Tr.				Elocution.
8	Laboratory	Sew. & Textiles			Laboratory		Phys. Tr.				

Spring Term

1	M.C.&Gr.L.S.	Sew. & Textiles	Latin 3	Prep Geom.		Shorthand 3				Comp. Gmr.	
2					Farm. Mech.	Typewriting					
					ASSEMBLY EXERCISES						
3			Latin 6	A Geom.	Soil Bact.	Office Prac.					
4	Horses										
					NOON RECESS						
5	Bdg.F.A'mls.	Sew. & Textiles				Typewriting	1st yr. Phy. Tr.		Shorthand		
6	Farm Mgmt.	Sew. & Textiles		Plane Anlt.	Or. or Gard.	Shorthand	Prep.Phy.Tr.		Typewriting		
7			Latin 3	B Arith	Poultry		Phys. Tr.			Prep. Gram.	
8							Phys. Tr.				

RHETORIC, READING, ELOCUTION AND ENGLISH LITERATURE

HENRY W. SHRYOCK
HELEN BRYDEN
JENNIE MITCHELL

English 1 and 2. (Preparatory), Two term course. Five recitations a week.

The basis of the work is the eighth book in the Reading-Literature series. The work begins with a number of type studies as follows: Poetry, Tennyson's Gareth and Lynette and Wordsworth's Michael; oration, Webster's Bunker Hill Address; the story, Hardy's Three Strangers; the drama, Tennyson's The Falcon of Ser Federigo. Section two of the book provides ample drill in oral reading, and the third furnishes abundant examples of story-telling, description and explanation. From beginning to end the work addresses itself to the ear, and the selections are all read aloud in class. Running parallel with these reading lesssons is a series of composition exercises.

English 4. (First year composition.) Three term course, two class recitations a week.

A study of paragraphing, syntax, and punctuation, with a thorough study of the three elements of composition—unity, coherence and emphasis. Practical work in the writing of compositions. The class studies Charles Dickens' Tale of Two Cities, and this is used as the basis of some composition work.

English 9. (Rhetoric). Text, Forms of discourse, Cairns. This class meets five times a week through the fall term.

Reading

English 5. (B) Selections studied, Lady of the Lake and Silas Marner. While the emphasis is placed upon literary analysis of the two masterpieces studied, the elocutionary drill is not neglected.

English 6. (A) This class concerns itself with the pedagogy of reading, and in the main the work follows the outline in the state Course of Study.

Elocution

English 8. One term's work provided for; text, Cumnock's Choice Reading.

Literature

English 7. (C) Texts, Swinston's Studies in English Literature; Johnson's History of English and American Literature. Translations from Old English Prose, Cook and Tinker; Translations from Old English Poetry, Cook and Tinker.

English 10. (B) Technique of poetry; texts, Lanier's Science of English Verse and Corson's Primer of English Verse; supplementary studies, Macbeth, Paradise Lost, Idylls of the King, Princess.

English 11. (A) The Essay; texts, Clark's Manual of English Prose Style; illustrative material drawn from the works of DeQuincy Macaulay, Carlyle, and Lowell.

Degree Course Work

English 12. (A) Public Speaking.

English 13. (B) Special course in Fiction based on the following works: Bride of Lammermoor, Vanity Fair, David Copperfield, Adam Bede, Kidnapped, Last of the Mohicans, Marble Faun.

GRAMMAR

MARTHA BUCK
LILY GUBELMAN

The terms in the Normal department have grammar as one of the required branches. Before entering these classes pupils pass an examination equivalent to that for a second-grade certificate. For the benefit of pupils below this grade in grammar, a preparatory term is offered. In this class the simple sentence with its elements, and the parts of speech with their inflections are studied. A thorough review of the simpler constructions is given with much practice in forming illustrative sentences.

(B) In this term a rapid review of the simple sentence and parts of speech is given from the view-point of the teacher. As the elements are studied, the parts of speech of which they are composed are reviewed, with their properties and inflections. The value of each principle as a guide to correct English is tested as it is applied in answering the questions asked by the class. Infinitives and participles are given careful study, also capitalization and punctuation. How to make this work plain to others is the central idea.

(A) This term's study is given to compound and complex sentences. In this term abridgment is treated and its grammatical changes noted, with the principles which underlie them. A part of the time is given to the idioms in good use and the figures of syntax. The remainder of the term is used in a special study of methods. The work begins with the first language lesson, and takes up grade by grade through grammar to the close of a high school course. What is suitable to each grade, and how to adapt the teaching to the capacity of the pupils, are the central points for consideration. Thus a complete review of both language and grammar is incidentally obtained. Method work is done in connection with illustrative work in the Training Department. The outline in State Course is used in this class.

Comparative and Historical Grammar

The aim of this course is to furnish the student with a historical background for the study of English grammar. English, an almost uninflected language, is compared with Latin, a highly inflected language, in order that the pupil may understand the devices used to offset the loss of inflections. The student is also taught the history and growth of the language, especially as reflected in the forms and constructions of modern English.

LANGUAGES

C. E. ALLEN
J. M. PIERCE, ASSOCIATE
EMMA L. BOWYER, ASSISTANT

The Latin and German Courses provide for four years of Latin or German, and pupils are advised to choose one language and take four years of it. Credit is given, however, for four years of foreign language study, with the condition that not less than one year of any language shall be accepted. With this condition pupils may offer French or Greek as well as Latin and German.

Latin

Eleven terms of Latin are required of all those who take the Latin Course, the twelfth term being optional. An advanced course of two years is now offered. This course is designed primarily to meet the demands of those preparing to teach Latin in the high school.

Latin, 1, 2, 3. Hale's First Latin Book is used as the text throughout the first year. Quantitative pronunciation is taught and pupils are required to mark long vowels in all written work.

Latin 4, 5, 6. The second year is given to the study of Cæsar and prose composition. Five books of the Gallic War are read, and prose composition based on the first four books is taken from Hale's Latin Composition. Hale and Buck's Latin Grammar.

Latin 7. Orations of Cicero. First three against Catiline with selections from Sallust's Catiline and prose composition.

Latin 8. Cicero. The fourth against Catiline with selections from Sallust, the orations for the Manilian Law and the poet Archias. Daniell's Prose Composition.

Latin 9. Ovid. Selections, about 1,500 verses. Greek and Roman Mythology.

Latin 10. Virgil's Aeneid. First three books. Scanning and Mythology. Study and recitation on Sellar's Virgil.

Latin 11. Six books of the Aeneid completed. Sellar's Virgil.

Latin 12. Cicero, Essay on Old Age. Phormio of Terence.

Advanced Courses in Latin

Latin 13. Livy (Books XXI, XXII).

Latin 14. Horace (Satires and Epistles).

Latin 15. Tacitus (Germania and Agricola) Suetonius (Julius Cæsar and Augustus).

Latin 16. Virgil, (Eclogues and Georgics).

Latin 17. Juvenal.

Latin 18. Review and Methods.

Greek

Greek 1 and 2. Burgess and Bonner's First Greek Book.

Greek 3, 4 and 5. Xenophon's Anabasis, Books I-IV. Bonner's Greek Composition.

Greek 6. Homer, Iliad I-III.

German

First year (1, 2, 3). The Hoelzel pictures, with text. Simple stories. Manley's Ein Sommer in Deutschland. Poems and songs. English and German cognates: Historical and linguistic relations to each other.

Second year (4, 4, 6). Hillern's Höeher als die Kirche. Gerstaecker's Germelshausen. Der Prozess und Einer muss heiraten. Aus Nah und Fern. Kullmer's Sketch Maps of Germany. Poems and songs. Germanic Etymologies from Webster and Century Dictionaries.

Third year (7, 8, 9). Riehl's Der Fluch der Schoenheit. Freitag's Die Journalisten. Schweitzer's Deutschland. Selections from Goethe and Schiller. Aus Nah and Fern. Indo-European and Germanic Etymologies. Grimm's Laws. Umlaut and Ablaut.

Fourth year (10, 11, 12). Sudermann's Frau Sorge. Schweitzer's Kulturgeschicte. Readings from literary and scientific magazines. Selected works of Heine, Wildenbruch, Heyse, Riehl.

French

First year (1, 2, 3). Snow and Le Bon's Easy French. La-Tache du Petit Pierre. Talbot's Le Francais et sa Patrie. English, French and Latin: Their historical and linguistic relations to each other; derivatives and doublets.

Second year (4, 5, 6). Mérimée's Columba. Daudet's LaBelle Nivernaise. Erckmann-Chatrian's Madame Thérése. Romantic etymologies in English.

ART

MATILDA F. SALTER
GRACE L. BURKET, ASSISTANT

Realizing the cultural value of Art study and the fact that drawing is one of the best means of mental development, a certain amount of work in this department is required in all courses. Advanced study is offered for those who wish to become supervisors of drawing or who are particularly interested in Art.

Drawing

(Art 16). Preparatory. Free hand drawing from nature and from still life. Out of door sketching. Pencil and ink are the mediums used.

(Art. 1). The principles of perspective are studied and application is made in the drawing of objects singly and in groups; drawings are made also from nature, using as subjects: flowers, fruits, trees and simple landscapes. Some sketching from life. Mediums used are pencil and crayons.

(Art 3) A term in blackboard sketching is offered to meet the demand that the teacher shall be able to draw on the blackboard rapidly and clearly for the purposes of illustration. Practice will be given in drawing from objects, from memory and from imagination.

(Art 8). Drawing in charcoal, from still life and from casts. Out of door sketching.

(Art 14). Continued work in charcoal from casts of flowers, fruits, animals and the human figure.

(Art 15). Life sketching. Study of the proportions of the human figure. Drawing from pose in costume.

Methods

(Art. 4). Public school art in its relation to American life will be discussed. Talks by the students on the different phases of art illustrated by numerous drawings. Methods of teaching art in the grades. Students will be required to make out a course of study in drawing for the first eight grades.

Watercolor

(Art 2). Work from nature and from still life. Study of the theory of color and of color harmonies. Application to the problems of home decoration and of dress.

(Art 10). Studies from nature and from still life. Out of door sketching.

Design

(Art 6). This course includes a study of the principles of design, balance, rhythm and harmony; and of the terms, tone, measure and shape. By problems the student is led to a practical application of these terms and principles. General principles of lettering. Letter forms and proportions.

(Art 7). Continuation of the study of the principles of design. Practical application of these in the making and applying of designs for different materials and purposes. Principles of conventionalization applied to natural forms. Theory of color in its application to design. Design is studied in its relation to manual training, commercial life and art in the home.

(Art 9). Clay modeling. This course includes the making of type forms and objects based on them, simple animal forms, modeling from casts, tiles and hand built pottery. Some instruction in firing and glazing of pottery.

History of Art

(Art 5). A study will be made of Architecture, Sculpture and Painting in order that the student may become familiar with the masterpieces in these subjects. The school owns a large collection of pictures and some good lantern slides. These are used and talks are given. Each student will be required to make a note-book to cover the work of the term.

(Art 11). History of Architecture and Sculpture. Similar work to Art 5 but more time will be given to the study. A text book will be used as the basis of instruction but this will be supplemented by talks, readings and pictures.

(Art 12). History of Painting. A study will be made of the art of the different countries of the great artists and their paintings.

(Art 13). Picture Study. Composition and the principles of art will be studied in their relation to pictures. The subject of how to judge a picture will be discussed. Individual pictures will be studied, using as a basis the Illinois Course in Picture Study.

Degree Courses

(Art 17, Art 18). History of Art. The art of a country will be studied in relation to its geography, history and political and social life. The library has an excellent collection of books which will be used for reference. Two terms required.

Design or Watercolor

(Art 19, Art 20). Advanced work will be given in either water color or design. One term of either required.

HISTORY

GEORGE W. SMITH

Preparatory Department

(C) *Course 1. Text, Montgomery.* This course is intended to supplement the work of the 8th grade, and will cover all subjects in United States History up to and including the Revolutionary war.

Illinois History. Course 4. Text, Smith. Illinois history is a part of the history of the United States. While this is kept constantly in view, the pupil is brought to a realization that this history was made at our very door. Some attention will be given to the spirit of local history and to the method of investigation.

Normal Courses

(B) *Course 6. Text, Channing.* The work in this class will begin with the political separation of the American Colonies from Great Britain, and will consider as general topics the following: The Formation of the State Governments; The Continental Congress; The Confederation; The Constitutional Convention; Organization of the Government Under the Constitution; Rise of Political Parties; Internal Development.

Civics. Course 8. Text, ————. A course in Civics will be given the Spring Term of the first year. The machinery of our federal and state governments, as well as local governmental matters, will be considered. Attention will also be given to present civic problems.

(A) *Course 9. Text, Mace.* In this course the general subjects for discussion are: the general nature of the subject matter of history; the principles and processes of its organization; the phases of elementary history work; and a study of the periods of United States history.

Grecian History. Course 10. Text, West. While the history of Greece will occupy a large share of the time, a brief summary of the oriental nations will be taken.

Roman History. Course 11. Text, West. This term will be devoted to the period from the founding of Rome to the time of Charlemagne.

Mediaeval Europe. Course 12. Text, Robinson. European history will occupy the time of the class the spring term. The length of the term is such that only a general summary can be taken. Emphasis will be given to the relation of European history to American history.

English History. Course 13. Text, Cheyney. English History follows the three terms of general history of the Junior year. The value of this course lies in its relation to American History. Special emphasis will be given to the origin and growth of those institutions which has been transplanted to our own soil.

Degree Courses

Advanced Greek. Course 15. Text, Bury. This course is offered the fall term. Attention will be given to sources; migratory movements; city-state government; confederations; art, literature, and other sources of Greek culture.

Roman Political Institutions. Course 16. Text, Abbott. In this course we take a comprehensive survey of the political institutions under the Monarchy, the Republic, and the Empire. Whenever the opportunity offers, comparisons will be made between Roman institutions and those of more recent times.

The French Revolution. Course 17. Text, Mathews. The work in this course begins with Lowell's Eve of the French Revolution, and Young's Travels in France, as a background after which the text is used as a basis of discussion.

GEOGRAPHY AND GEOLOGY

F. H. COLYER

Geography No. 2. (C Geography.) It is the plan of this course to give a general survey of the principles of geography, followed by a more intensive study of North America. Special attention will be given to the study of geography of the United States.

Geography No. 3. (B Geography). It is the plan of this course to take up alternately the seventh and eighth year's geography as outlined in the State Course of Study. Special attention will be given to the relation of the physical and economic conditions to all human activities. In the preparation of daily lessons and special reports abundant drill will be furnished in the use of works of reference and the magazines.

Geography No. 4. (A Geography.) This course will not be open to any who have not taken Geography 2 and 3, or their equivalent. The purpose of this course is primarily to discuss the underlying principles and methods of teaching geography in the various grades in the public schools. However, the first part of the term will be taken up with a study of the essentials of physical geography.

Geography No. 5. (Commercial and Industrial Geography.) Text, Robinson. No students will be admitted to this course who have not taken Courses 2 and 3, or their equivalent. The aim of this course is to consider the more important principles governing industries and commerce. Considerable attention will be given to economic principles involved in modern industrial life.

Geology No. 8. It is the aim of this course to give a general survey of the dynamic, structural and historic geology. A few of the more important rocks and minerals will be studied to enable the student to do successful field work. A general view of the subject is the aim of this course rather than a detailed study of some one phase of geology.

Degree Course and Geology

Geology No. 9, 10 and 11. Text, Chamberlain and Salisbury. All students selecting geology as a minor should have at least a working knowledge of physics, chemistry, botany and zoology. It is the aim of the three terms in geology to make a much more detailed study of the subject than in geology 8 and to sufficiently cover the ground to prepare students to teach this subject in high schools. In addition to a fairly detailed study of dynamic, structural and historic geology, a considerable time will be given to a

study of dynamic, structural and historic geology, a considerable time will be given to a study of rocks and minerals. It is also planned to do a considerable amount of field work in some nearby region.

PSYCHOLOGY AND PEDAGOGY

GEO. D. WHAM.

Education 1. School Management.

The following topics indicate the nature of the course: The first day of school; the organization of the school; the making of programs; discipline and moral training; securing and holding attention; the technique of the recitation; school equipment; sanitation and decoration; the teacher's relation to parents, school board, community and profession.

Bagley's Class-room Management, or its equivalent, is the text. Additional readings as the topic demands.

Education 2. Principles of Teaching.

This is a course in elementary educational psychology. The various principles that underlie effective teaching are developed, illustrated by concrete exercises and problems, and then exemplified by illustrative lessons taught by the critic teachers of the Training School.

Colvin and Bagley's "A First Book in Psychology," or its equivalent, is the text. Assigned readings in James' Talks to Teachers, Colvin's Learning Process, and McMurry's How to Study.

Education 3. Principles of Education.

This course is a systematic study of the fundamental principles of education as they are derived from the basic sciences of biology, physiology, psychology, and sociology. The principles thus derived are, throughout the course, applied in the interpretation and criticism of current and proposed educational theories and practice.

Bagley's Educative Process, Bagley's Educational Values, Ruediger's Principles of Education, Horn's Philosophy of Education and Spencer's Education are the books studied and read.

Education 4. History of Education.

The chief aim of this course is to afford the teacher the sanity of judgment that comes only by seeing present day education in perspective against its historical background. It traces in the history of nations the evolution of educational ideals and practice in response to social needs and to the contributions of philosophic

and scientific thought. The important periods are studied as they are represented by noted writers and reformers.

Monroe's History of Education is the text. Additional readings in Graves' History of Education, Quick's Educational Reformers, and Painter's Great Pedagogical Essays.

Education 5. Advanced Psychology.

This is intended to be an advanced course in pure psychology without special regard to its application to teaching. It attempts to equip the student with an organized knowledge of the facts and laws of mental life. It further attempts to train the student in the art of introspection in the study of his own mental processes and thus to increase his power to discern and control the mental processes of others. Throughout the course introspection is aided by experiment.

Titchener's Text-book in Psychology, or its equivalent, is the text. Seashore's Experiments in Psychology is used for experimental work.

Education 6. Sociology.

This course includes the consideration of the origin and nature of society and of the greatest and of the great social institutions of family, church, state, and school. It makes a special study of the relation between society and the individual, and of the practical problems, industrial, governmental, and educational, growing out of the complexity and rapid development of modern society.

Ellwood's Elements of Sociology and Ross's Social Psychology are used as texts. Assigned readings throughout the term.

Education 7. High School Education.

This course purposes the study of such topics as adolescence; the history, aims, and methods of secondary education; the organization of high school courses of study; high school equipment; and the problems of discipline and management peculiar to the high school.

The texts used are Brown's The American High School, and Johnson's High School Education. Assigned readings of addresses, reports and bulletins on high school subjects.

Education 8. Child Development.

This course attempts to trace the stages of physical and psychic growth from infancy to maturity, and thus to secure a more intelligent basis for organization, course of study, discipline, and teaching in the different grades of the elementary and high school.

Among the books studied and read are Tanner's The Child, King's Psychology of Child-Development, Kirkpatrick's Fundamentals of Child-Study, Swift's Mind in the Making, and Hall's Youth.

Education 9. School Administration.

The primary aim in this course is to give a comprehensive view of the elaborate organization and specialization of educational forces in the United States, and a corresponding appreciation of the educational machinery through which these forces operate. Following a brief review of the development of the American Public School System is the study of such topics as, units of organization and supervision, school finances, courses of study, school plant, grading of pupils, measurement of results of teaching, improvement of teachers, and adjustment to community needs.

Dutton and Snedden's Administration of Public Education is the text. Additional readings as demanded by the topic studied.

MATHEMATICS

WILLIAM TROY FELTS
WARD H. TAYLOR
MARY M. STEAGALL

The work in this department is primarily to give an understanding of the processes and forms of expression in the several branches of mathematics offered; to secure expertness in operations; to train the pupils in his power to select features of prime importance, exercise individual judgment in formal reasoning and choose logical steps in demonstration; to see the practical and business aspect of topic when practicable; and to present the history and pedagogy of each to such an extent as seems practical. To accomplish these ends the following courses are offered.

NORMAL COURSES

Arithmetic

Sensenig and Anderson

Preparatory. Two courses are offered for students just out of eighth grade, and who need more thorough grounding in the fundamentals before taking up the regular normal courses.

First term, Math. 1. (D Arith.) A thorough review and drill in the elementary processes, g. c. d., l. c. m., common and decimal fractions, with a view of fixing principles.

Second term, Math. 2. (C Arith.) Percentage and its more useful applications with particular attention to business applications, customs and usages. This is an enlargement of the work of seventh grade as outlined by the State Course.

Normal Department. First year, second term, Math. 10. (Arith. B) Mensuration, metric system, specific gravity, and air

pressure. This is an enlargement upon the work of eighth year as outlined in the State Course.

Second year, third term, Math. 30 (Arith. A) The pedagogy of arithmetic in the grades and interpretation of the arithmetic of the State Course. Pre-requisites, Pedagogy B, and Math. 10.

Algebra

Well's Essentials of Algebra

Preparatory. (No text) Third term, first half, Math. 3. One half term will be devoted to the development of the x-equation and its application in the solution of such problems in arithmetic as yield naturally to that form of solution.

Normal. First year, first term, Math. 14. (D Alg.) The rudiments of algebra including the elementary processes, factoring, g. c. d., l. c. m., and fractions; simultaneous equations in two unknowns involving integers and fractions. Pre-requisites, Math. 3.

Third year, first term, Math. 15 (C Alg.) A comprehensive review of Math. 14, involving literal exponents, simple equations and simultaneous equations in two and three unknowns involving integral, fractional and literal coefficients. Pre-requisite, Math. 14.

Third year, second term, Math. 16 (B Alg.) Inequalities, involution, evolution, theory of exponents, logarithms, radicals, and quadratic equations. Pre-requisite, Math. 15, or one full year of high school algebra.

Third year, third term, Math. 17 (A Alg.) Simultaneous equations involving quadratics, theory of quadratic equations, zero and infinity, ratio and proportion, variations, progressions, binomial theorem, indeterminate coefficients. Pre-requisite, Math. 16, or one and a half years of high school algebra in an accredited high school.

Geometry

Well's Plane and Solid Geometry

Preparatory. Third term, second half, $(\text{Math. } 3.)_2$ Beginning geometry; congruence, parallels, similar figures and proportion; all the usual constructions of plane geometry. The approach is from the constructive side. Assumptions are freely made, formal proofs being presented when a felt need arises on the part of the student.

Normal. Fourth year, first term, Math. 20. (C Geom.) Half of plane geometry completed. Less freedom of assumptions than in Math. 3. Emphasis in accord with Report of Committee of Fifteen. Pre-requisite, Math. 3.

Fourth year, second term, Math. 21 (B Geom.) Plane geomtry completed. A survey of plane geometry as a whole is made, with discussion of alternative proofs, order of theorems, a possible minimum number of assumptions, etc. Pre-requisite, Math. 20.

Fourth year, third term, Math. 22 (A Geom.) Solid Geomtry. Mensuration is emphasized. This course is elective with Plane Trigonometry. Pre-requisite, Math. 21.

Degree Courses

As occasion demands courses will be offered for graduate units in the following:

Plane Trigonometry. This may be selected in lieu of solid geometry in graduating from any of the normal courses in which solid geometry is required. When so used, solid geometry may be used as a graduate credit in lieu of it.

College Algebra. Amplification of most of the topics of Math. 17 with variables and functions, mathematical induction, complex numbers, theory of equations, limits, infinite series, probability. Pre-requisite, Math. 17. Text, Rietz and Crathorne.

Plane Analytics with enough of the elements of solid analytics give a foundation for calculus. A few high plane curves discussed.

Differential and Integral Calculus, with emphasis on the former. The approach is by the theory of limits. Applications to laws of physical science. Two units of work will be offered in calculus with the stress upon the integral in the second unit; maxima and minima, curvature, definite integrals, multiple integrals, area and volume by integration, first and second moments, infinite series, etc.

Pedagogy of Secondary Mathematics. Dicussion of the methods of presentation of algebra, geometry and trigonometry; recent movements in the field of secondary mathematics, etc.

PHYSICAL TRAINING AND ATHLETICS

INEZ L. HOLLENBERGER.

WILLIAM MC ANDREW

The course in Physical Training aims to provide for the physical welfare of the student in order to increase his capabilities for mental effort, and to furnish him with a practical system of gymnastics for use in his later professional work. It aims also, in addition to affording daily health and recreation, to make possible that confidence and ease which comes from the sense of a strong body brought under perfect subjection to the will through systematic training.

A large gymnasium, well equipped with light American apparatus and with Swedish and German stationary apparatus, affords every opportunity for indoor exercise, and the large campus and Bayliss Field meet the need for track athletics and out-door games. The basket-ball, volley-ball, captain-ball, and others, make them an important feature of the work in this department. The young men have representative teams in foot-ball, tennis, base-ball, and basket-ball, all of which are subject to the rules and regulations of the department. The young ladies play a series of basket-ball games during the winter term, each class in Normal being represented by a team.

All students from the 8th grade and all preparatory Normal students are required to take physical training three periods a week. The work is required of all students in the English course throughout the first year. The first year Latin course students take the work throughout the fall and winter terms. In the first year of the Commercial courses, physical training alternates with an English course. Graduates of High Schools, who in scholastic standing are really third year students, are required to take physical training during the winter term.

No student is allowed on the gymnasium floor for work without gymnasium shoes. Young men are asked to provide themselves with the regulation gray gymnasium trousers and quarter-sleeve jerseys, and the young ladies with the black blouses and divided skirts. The special costume is to allow perfect freedom of movement during exercise and to save the ordinary apparel from the unusual "wear and tear."

During the past five years the Department of Athletics under the direction of the Institution has invited the High Schools of Southern Illinois to participate in an Intellectual and Athletic Meet. This year twenty-five High Schools were here with a total of two hundred eighty-three contestants. This meet has proved to be a very pleasant and interesting occasion for the school people of this section of the state.

MUSIC

FLOYD A. POWERS. *
GLENN C. BAINUM.
LYDIA G. PARSONS, ASSISTANT.
JULIA DICKERMAN CHASTAINE, VIOLA, CELLO.
H. RAYMOND MOORE, BRASS WIND INSTRUMENTS.

The several courses provide for definite study of the theory and practice of music, and aim to train the individual to appreciate good music and to prepare the prospective grade teacher for teaching the subject.

Music 1 (Preparatory)

The work of this term aims to train the eye, ear and voice and to lay a foundation for Music 2. Several songs are taught by rote and Italian syllable names applied later; through these songs all facts of pitch, interval, rhythm, etc., are presented. The study of theory is incidental. No outside preparation is required. Students who have studied vocal music through the grades are not required to take this course. One year of instrumental music may be substituted.

Text: Supplied.

Music 2 (Elementary)

Although designed for grade teachers this course is equally valuable to students in voice, piano or orchestral instruments. It includes the study of the symbols of notation, major, minor and chromatic scales, measures in common use, rhythmic patterns, musical terms, syllable singing, song study, etc.

To complete elementary music, students must pass written test in the theory of music and be able to sing at sight, with words or Italian syllables, music of the degree of difficulty of "America."

Pre-requisite: Music 1.

Texts: School Song Book, McConathy.
Music Notation and Terminology, Gehrkens.

Music 3 (Advanced)

Music 3 is a combination of advanced theory, history, biography and methods. Theory continues the study of diatonic and chromatic scales, key relationship and modulation employing chromatics as members of the dominant seventh chord, common chords, terminology, sight-reading, and song analysis. Assigned topics in

*Resigned.

history and biography are presented by members of the class. Methods include the systematic study of at least one course in public school music, outlines of the music as presented in the Training School, care and training of the child-voice, monotones, class organization, rote songs and song interpretation. The Victrola is used for purposes of illustration.

Pre-requisite: Music 2.

Texts: Readers supplied.
Music Notation and Terminology, Gehrkens.
Manual of School Music, Rix.
Children's Voices, Curtis.

Music 4 (Harmony and Music Appreciation)

Music 4 is an optional subject in the Art Course but is a valuable course for those who desire advanced work in theory. Two days each week are devoted to the study of melodic and harmonic structure of simple four-part music. Students are required to write simple melodies and harmonize same in common and dominant seventh chords. Three days each week are given to music appreciation including musical form, history, and biography. Through the use of the Victrola special emphasis is given to the study of opera and oratorio.

Pre-requisite: Music 3. By permission from the department, students may enter this course and take Music 3 as a parallel course.

Texts: Harmony, Clark. Musical Form, Cornell. First Studies in Musical Biography, Tapper. History of Music, Fillmore.

Instrumental Music

Class instruction in orchestral instruments is elective; one credit, (two terms), may be substituted for Music 4. Classes recite three days each week.

Music 21, 22, 23 (Violin First Year)

The subject matter of the text used is correlated with the singing lesson wherever possible. Emphasis is placed upon the mechanics of the instrument by employing: (1), Short and easily memorized exercises in rhythmic form, for the development of the bow hand and arm; and (2), technical exercises suitable for young beginners, designed for the purpose of training the left hand.

Pre-requisite: Music 2.

Text: Mitchell's Public School Class Method, Book 1.

Music 24, 25, 26 (Violin Second Year)

The work of the second year provides for the presentation and development of the third position, the more difficult keys, rhythms, bowings, and the easier harmonies; during the latter part of the year the seven positions in scale form are used.

Pre-requisite: Music 23 (Violin).

Text: Mitchell's Public School Class Method, Book 2.

Music 31, 32, 33 (Brass Wind Instruments First Year)

Instruction is offered in all brass wind instruments,—four years in cornet, trumpet and all other valve instruments played from treble staff, and two years in trombone, baritone, euphonium, tuba and all other valve instruments played from bass staff. Students who have some training in the technic of these instruments will be examined and graded according to their ability.

Music 31 is the class for beginners and includes tone production and lip development through simple exercises in three keys. Students are required to take music 2 as a parallel course.

Music 32 provides for the training of the diaphragm, breathing exercises, and scales and exercises in three additional keys.

Music 33 includes sight-reading of simple finger exercises and the study of the more difficult keys.

Text: Langey.

Music 34, 35, 36 (Brass Wind Instruments Second Year)

The work of the second year consists of exercises for velocity and the perfecting of tones in the higher register; solos and duets of medium grade of difficulty are used.

Text: Langey.

Music 37, 38, 39 (Cornet and Trumpet Third Year)

During the third year some practice in band and orchestra is given. The technical exercises include the study of appogiature, mordent, gruppetto, trill, etc.—preparation for solo playing. No student will play in public without permission from the instructor.

Text: Arban.

Special

The University maintains a choir, band and orchestra. Students who are especially interested in music are urged to apply for membership in at least one of these organizations.

CHEMISTRY

GEORGE M. BROWNE.

The facilities for the study of chemistry have been much improved during the past few years. The laboratory has been equipped with lockers for eighty students and each locker supplied with ample apparatus.

All courses in chemistry require both text and laboratory work; two periods of laboratory are required for each period of recitation omitted.

Chemistry 1

A course for beginners is offered in the Fall Term. This course is designed to meet the requirements of the agriculture and domestic arts courses. It is the chemistry of air, water, salt, solution, and common things. Two periods of recitation and six of laboratory required weekly.

Chemistry 2

Chemistry 2 is a continuation of the work begun in chemistry 1, which is a pre-requisite. It is largely the study of metallic compounds in common use. This course may be used by the Latin course students as a substitute for Chemistry 1 B. Offered in the Winter term only.

Chemistry 3

Chemistry 3 is a continuation of Chemistry 2, which is prerequisite. This course is largely work with those carbon compounds which are of special interest to the students of agriculture and of domestic arts. Three periods of text-book and four of laboratory are required. This course is offered in the Spring term only.

Chemistry 4

Household chemistry is required of 3 year students of the domestic arts course. It is largely quantitative and qualitative laboratory practice with various substances used as foods or in their preparation, and those used as cleansing agents. Chemistry 3 or its equivalent is a pre-requisite. Offered in the Winter term only.

Chemistry 5

Chemistry 5 is a continuation of the work begun in Chemistry 4. Offered in the Spring term only.

Chemistry 6

Not offered in the year 1914-1915.

Chemistry 7

Qualitative analysis of the more common base forming elements is offered in the Fall term. Text: The Elements of Qualitative Analysis, by W. A. Noyes.

Chemistry 10 and 11

Quantitative Analysis will be begun in the Winter term of the year 1914-1915 with gravimetric methods. In the Spring term the work will be largely volumetric. Chemistry 7 is a pre-requisite.

Chemistry 1 A, 2 A, 3 A; 1 B and 2 B

Owing to the large number of students in the beginning terms it is usually found convenient to place in separate classes those Juniors and Seniors in the various courses thus giving to each group the chemistry best suited to their needs. The "A" divisions taking college preparatory work, while the "B" division devotes its time to those chemical topics of most interest to those who are to teach geography, physiology, etc., in the public schools, and can devote only the Fall term to the work.

PHYSICS

S. E. BOOMER.

MYRTLE COKER.

The lecture room and laboratory are well equipped for the work offered. The laboratory fee is one dollar in each course except numbers one and fiva in which there is no fee.

1. This course is given in preparatory, but it is required of all those in the normal department who have never studied physics. It deals very largely in a qualitative manner with the common phenomena of every day life. It intends to develop the habit of observation and intelligent interpretation of these phenomena, to make for efficiency in the nature study work of the common schools, and to prepare for those sciences which precede the more advanced courses in physics.

Many demonstrations and about twenty-five simple laboratory exercises with a well kept note book constitute the experimental work.

2 and 3. Together these form a complete course in general physics. The aim is to give an appreciation of the physical laws of nature, to study their industrial applications, and to develop the scientific habit of thought. The former, which is given both the fall and winter terms, covers mechanics and heat. The latter, which is given both the winter and spring terms, covers magnetism, electricity, sound, and light.

Pre-requisites: Physics 1, Math. 3, 14. Math. 15 must precede or accompany course 2.

Texts: A First Course in Physics (Revised), Millikan and Gale. A Laboratory Course in Physics, same authors.

4. Some of the more difficult problems in the above courses receive fuller treatment. The library is used extensively, assignments of reading being adapted to the purposes of the individual. Four hours per week recitation, two hours per week laboratory.

Texts: Several of the leading high school texts and manuals are used, but each member purchases one text and one manual.

5. Laboratory Assistant. Pre-requisite: Equivalent of courses 1-4. Practice in setting up and manipulating demonstration and laboratory apparatus, repairing apparatus, assisting in one section of laboratory work, assigned readings on the pedagogy of the subject. Practice credit allowed.

Degree Courses

6. Mechanics and Heat. Fall term.

Pre-requisites: The equivalent of courses 1-3. Trigonometry must precede or accompany this course.

7. Magnetism and Electricity. Winter term.

8. Sound and Light. Spring term.

Courses 6, 7 and 8 constitute a one year course of college physics. Recitation three hours per week, laboratory four hours per week.

Astronomy

The course is largely descriptive, formal mathematics being reduced to the minimum. The relation of the earth to the heavenly bodies, the changing seasons, the varying forms of the moon and the planets, units of time and distance receive attention. It is intended to be helpful in teaching mathematical geography.

Fall Term. Text: Todd.

BIOLOGY

J. P. GILBERT.
W. M. BAILEY.
ISABEL CLEGG.
RAYMOND PARKINSON.
G. H. FRENCH, CURATOR OF MUSEUM.

Biology 1

This is a first course in Zoology for those who have no credit for the subject in a good high school. The course will cover the general field of Zoology, using type studies as a basis for the larger group studies, and as a means of training in method of approach to the study of animals. Considerable emphasis will be placed on field studies as well as on the laboratory and recitation work.

Biology 2—Invert. Zool.

This course in Invertebrate Zoology is for advanced students who wish to teach the subject. Animals will be studied in detail as to the structures and functions of organs. As far as time will permit, studies in morphology, physiology, relation to environment, and the inter-relation of organisms will be assigned to individual students in the laboratory and field. The student is expected to gain some knowledge of methods of research. Historical methods taught as required.

Required: Zoology 1, or equivalent.

Biology 3—Vert. Zool.

The course in Vertebrate Zoology for advanced students is a continuation of Zoology 2, and it will follow the same general plan. Students may take this course before taking Zoology 2, yet they are advised that the better plan would be to follow the order as printed in the course of study. Histological methods and studies emphasized as needed.

Required: Zoology 1, or equivalent.

Note.—Students are advised to take entomology and ornithology before they take Zoology 1 or 2.

Biology 4—Physiology

This is a course in elementary general physiology, hygiene and sanitation. The structure, work and care of the organs of the body will be studied. Diseases will be studied as to causes, spread, pre-

vention and treatment. Home and school sanitation will be discussed.

Biology 6—Entomology

Insects will be studied as to their life histories, adaptive structures, relation to environment, economic importance, and as agents for the spread of disease. The locust, the honey bee, the housefly and other forms will be studied in detail as to their habits, external structures and adaptations, internal anatomy, etc. The relation of insects to crops, truck garden, fruit, lawn, and shade tree injury will be studied and remedies and preventive measures discussed at length. Much emphasis will be placed upon field studies. In presenting the subject it will be borne in mind that Entomology is especially adapted to teaching in the public schools.

Biology 5—Ornithology

This class will be expected to learn to recognize practically all the common birds of the season, and to this end frequent field trips must be made. For bird anatomy the English sparrow or the pigeon will be used. The economic importance of birds in insect and weed seed destruction, in relation to crops and seed dispersal, will be emphasized. A bird calendar wil be kept by each student, and bird protection will be discussed.

Biology 7—Apiculture

The honey bee will be studied as to its adaptive structures, the history of a bee colony, the making of new swarms, comb and extracted honey production, and bee diseases and treatment. Various types of hives will be set up in the laboratory. Colonies of bees will be available for work and the instructor will demonstrate queen rearing, etc., for the class. Colonies will be available for the use of individual students who desire to do the practical work of the bee keeper. The relation of the bee to fruits and flowers and the profits of the bee keeper will be discussed. Types of hives and methods most suitable for the professional or business man or farmer, who wishes to have an attractive and profitable "side" business of a few colonies of bees, will be given especial attention.

Biology 8—Comparative Embryology

The chick embryo will be studied in some detail, while eggs of the frog, squash bug and other forms will be studied in comparison. The "recapitulation theory" will be discussed in this connec-

tion. The course will, of necessity, be brief and elementary, but it should be of great value in giving the student of Biology and Agriculture some insight into one of the most fertile sources of our knowledge of animals and their various adaptive structures.

Biology 9—Elementary General Biology

This is a general course for preparatory students and it will deal with elementary general principles of plant life and animal life. The student will be expected to learn to recognize and know some characteristics and adaptations of the most familiar plants and animals. Elementary human physiology will form a part of the course. Topics in the State Course of study will be used in part of the work.

Biology 21—Elementary Botany

A first course in botany. This course presents a general view of the field of botany, and includes an elementary study of the more common types of plants, their structures, functions and life relations. The student is introduced to some of the elementary and important facts concerning the life processes as they may be seen in plants. Attention is also given to presenting the practical and economical phases of the subject. Recitations, laboratory and field studies.

Biology 22—Adv. Botany

A study of the thallophytes. A systematic study of the morphology of this group, including such problems as evolution of the plant body, origin and evolution of sex in plants, life-histories of the different forms. Attention is also given to the physiology and life relations to these plants. The food-making processes are studied, and saprophytism and parasitism are considered in connection with the fungi. Attention is given to the economic relations of bacteria and fungi. Recitations and laboratory studies. For those taking degree courses or advanced work.

Pre-requisite: Botany 21.

Biology 23—Adv. Botany

A study of the bryophytes and pteridophytes. A continuation of Course 22. The morphology, physiology and life-relations of these groups. A consideration of the problems of "alternation of generations," the gametophyte, evolution of the sporophyte, heter-

ospory, etc. The study of these groups is considered largely from the standpoint of the evolution of the plant kingdom. Recitations and laboratory studies. For those taking degree courses or advanced work.

Pre-requisites: Botany 21 and 22.

Biology 25—Adv. Botany

A study of the Spermatophytes. A continuation of Course 23. The morphology, physiology and ecology of the seed plants. A study of the vascular anatomy and reproductive organs of the sporophyte, the gametophytes, pollination and fertilization, the flower, the embryo, the development and structure of seeds, and other problems. A study of the functions of the different organs of the seed plant. The ecological groups and their relations. Some attention is given to the identification and classification of seed plants. Recitations, laboratory and field studies. For those taking degree courses or advanced work.

Pre-requisites: Botany 21, 22 and 23.

Biology 24

Bacteriology. A study of the morphology, life relations and distribution of bacteria, and their relations to human interests. Attention is given to the study of such phases of the subject as the relation of bacteria to decay to the fertility of the soil, pathogenic bacteria and their relations to disease and to public health, methods of making cultures, methods of disinfection and sterilization, food preservation, prevention of disease, hygiene and sanitation. Recitations and laboratory studies.

AGRICULTURAL DEPARTMENT

RENZO MUCKELROY.

H. B. PIPER.

The aim of the Agricultural Course is first to reach the country boy in the country school by giving to the teachers a fair conception of the subject matter that they in turn may present the work and second to make the teaching and demonstration so practical that those who do not care to teach may find safe and profitable employment on the farm.

The last two General Assemblies have appropriated $24,000 for the purchase and equipment of a 60 acre farm and the furnishing of laboratories for instructional purposes. The farm lies just south of the campus and is a typical Southern Illinois farm. On this farm the principles of scientific farming in relation to systems of permanent agriculture will be demonstrated. Systems of grain and live stock farming, horticulture, gardening, poultry keeping, dairying, and pure bred live stock production will be taught.

The following is a brief description of the several courses offered:

Soil Physics—Fall

The work in Soil Physics will be a study of matter and force, nature, origin and waste of soils, chemical and mineral nature of soils, soluble salts with the physical effects, typical nature of soils, soil moisture, amounts available and required by plants.

Winter

This term takes up the physics of plant breathing and root action, movements of soil water—gravitational, capillary and thermal—modes of controlling soil moisture, relation of air to soil, soil temperature with influencing conditions, objects, methods and implements of tillage, principles of farm drainage with practice in laying out drains.

Advanced Fertility—Fall

This course includes a more intensive and extensive study of the fundamental facts and principles of soil fertility, elements and their compounds, plant food and growth, soil formation, classification and composition, soil survey and analysis by the United States

Bureau of Soils, crop requirements for nitrogen, phosphorus, potassium and calcium, rotation systems for grain and live stock farming, and uses of phosphorus in various forms.

Winter

The work of this term includes a study of the soil investigations by culture experiments of the Rothamsted field and of the leading Universities of the United States and the Canadian field, various fertility factors, manufactured and commercial fertilizers, critical periods in plant life, farm manures, analyzing and testing soils, factors in crop production, and systems of crop rotations as related to permanent agriculture and successful farming.

Crop Production—Winter

The first course in crop production takes up an elementary study of the soil as a medium for root development, soil formation, elements of plant food, soil water, drainage, irrigation, external factors in soil management, tillage, common weeds, and means of eradication, insect pests and methods of combating them, indicate in a general way the territory covered.

The courses will consist of lectures, quizzes and laboratory work.

Spring

The work of this course is a study of the various crops of the farm in relation to their value to the farmer in systems of crop rotation, principles of rotation, cultivation, tillage, forage and fiber crops, grasses in the United States, value of seed selection, testing and judging, methods of combating the pests of farm crops.

Some time will be given to practical exercises and laboratory work.

Farm Management

Farm Management is a study of the business principles in farming, or the science of organization and management of a farm enterprise for the purpose of securing the greatest continuous profit. This course is planned with the above purpose and includes a study of such topics as the characteristics desirable for a farmer, cost of living on a farm, types of farming, maintaining the fertility, live stock problems, size of farms, capital, methods of renting land, farm labor and equipment, marketing products, records and accounts, choice of a region and buying a farm.

Farm Mechanics

The subject of Farm Mechanics is intended to bring the student into a fair conception of some of the simple things surrounding farm life. A few principles of architecture such as strength of materials, warmth, lighting and ventilation, principles of construction, etc., will be studied before taking up the elements of Farm Mechanics embracing the principles of draft, construction and maintenance of country roads, farm motors and farm machinery.

Agricultural Bacteriology

Agricultural Bacteriology is elementary in character, taking a survey of the general forms and structures of bacteria, nature of microörganisms and their activities, fermentation, petrification and decay, bacteria in soil and water, nutrification and dentrification, soil inoculation, bacteria and soil minerals, bacteria in milk and related products, relation to miscellaneous farm products and parasitic bacteria.

Emphasis will be placed on the beneficial and harmful bacteria with ways and means to promote and prevent their respective growths.

Gardening

The work in gardening embodies a study of the general plan of the place, the execution of some of the landscape features, handling of the land, handling of the plants, protection of plants from things that prey on them, making hot beds and cold frames, growing the vegetables, growing the ornamental plants, and growing of the fruit plants.

Poultry

The work in Poultry will consist of the historic development of the various types and varieties in relation to their native home and breeding that the foundations for good poultry practice by true scientific principles may be followed. Basis and beginning the business, principles and practice of breeding, incubators and incubation, brooding, growing chicks, foods and feeding, parasites and diseases, housing and fencing, marketing, exhibition, scoring and judging, records, accounts and advertising and general methods of management will constitute the larger part of the work. Several varieties of the best breeds will be available for scoring and judging, incubators will be run in the laboratory to demonstrate the latest methods in incubation and chickens kept to illustrate the principles of balanced rations.

Animal Husbandry—Fall

Dairy and beef cattle will be the beginning of the year's work in Animal Husbandry. Characteristic types and breeds, historic developments, native homes, adaptation to climatic and local conditions, judging and scoring, and the production of each class for market conditions, will constitute the larger part of the work.

Winter

Sheep and swine will be studied principally from the feeder's view point, and as to their place in systems of farming for Southern Illinois. The characteristic types and breeds will receive due attention. Practice will be given in judging and scoring.

Spring

Types and breeds of horses will constitute the work of this term. The principal aim of this course is to lead the student to see the better methods of improving the breeds of horses, and the selection of the right type of horse for the work to be done. Lessons in in judging and scoring will be given.

Market Classes and Grades of Farm Animals

The work will be principally from the production side. The student will be led to see the importance of knowing the market classes and grades from the market standpoint, buying and selling, grading, etc. The class will be expected to visit the stock yards in St. Louis at least once during the term, where the expert may be seen at his work.

Feeds and Feeding

This course includes the more elementary and fundamental principles of the relation of plant and animal life, chemical elements of nutrition, compounds of animal nutrition, composition of the bodies of animals, digestion of food, conditions influencing digestion and the laws of nutrition. The analysis of feeds, commercial feeding stuffs, together with their relative value as based upon a maintenance ration as applied to animals of various ages either at rest or doing light or heavy work, will be studied. Balanced rations for milk and meat productions with the various animals will be carefully noted.

Dairying

The aim of the course in Dairying is to study conditions as they exist in Southern Illinois and to make the work as practical as possible. Students will have an opportunity to study and work out the general problems of milk production, feeds and feeding, secretion, composition and testing, ferments and fermentations and their control, marketing milk, separation, ripening and churning of cream, finishing and marketing butter, varieties of cheese, general by-products of the dairy, statistics and economics of the dairy industry.

Selection and Breeding

That the student may better appreciate some of the products of plants and animals in their growth towards man's standards of perfection, a discussion of the subject is embraced in this course. The work embodies the origin of domesticated races (plants and animals), how they came to be domesticated, needs of improvements, natural and artificial selection, unit characters, variability, transmission of characters, heredity, environment, prepotency, hybridization, and some of the practical problems involved.

Horticulture—Fall

The work in this course will consist chiefly of the elementary problems which arise in the care and management of a young orchard from the time it is set out until it comes into bearing age.

Extensive studies will be made of the following topics: The selection of an orchard site, planting of the fruit grounds, choice of varieties, selection of plants, setting young plants, tillage of fruit lands, cropping and fertilizing the orchard, cover crops.

Much time will be devoted to practical exercises and laboratory work.

Bush Fruits—Winter

The object of this course is to acquaint the student with the different classes of bush fruits and the management of each.

Studies will be made in training, spraying, pruning, harvesting and marketing.

The location of the fruit and leaf buds and the manner of bearing will be given some consideration.

Some time will be given over to practical exercises and laboratory work.

Orchading—Spring

This course is a continuation of the Principles of Fruit Growing and deals primarily with the care and management of a mature orchard.

Much stress will be laid on the following points, methods of training trees, pruning and methods of healing wounds, spraying and orchard pests, tillage, marketing the crop. Methods of rejuvenating old orchards will be dealt with rather liberally.

The course consists of lecture quiz and laboratory work.

Agricultural Extension

Agr. Ext.—C—The aim of the first course in Agricultural Extension is to give a few elementary principles of the science of agriculture. The course includes a series of forty-four lessons on soils and crops with outlines, demonstrations and references that will aid the teacher in presenting the subject. The work is for a six months' term in the country schools and covers such topics as soil formation, classification, soil type areas, physical properties of soils, elements of plant food, sources and uses to the plant, limiting elements, value of crop rotation, growing legumes, seeding and care of farm crops, seed selection and judging, beneficial and harmful birds and insects.

Agr. Ext.—B—This course is planned to cover a six months' term in the country schools on animal life. The same general plan is taken up as in the soil extension. The work will include a study of types and breeds of horses, cattle, sheep, hogs and poultry, their care, feeding and general management. Lessons on the use of the score cards will be given.

Agr. Ext.—A—Since the Normal course includes more material than may used in High School work, and since students may be interested in planning such courses, the work of this term is for the special purpose of organizing such parts of the agricultural work as may apply to High School courses, meeting sectional demands and also college entrance requirements. A careful study of the Illinois Educational Commission's report will be made together with the recommendations of the best State Universities, students taking this course will have a fair conception of the general field of High School Agriculture.

HOUSEHOLD ARTS

GRACE E. JONES.
LUCY K. WOODY, ASSISTANT.

Household Art 1, 2, 3

Textiles and Sewing:

Household Arts 1. This course which is offered in the fall term only is designed to give a knowledge of the fundamental principles in handwork applied to useful articles, the articles chosen being such as would furnish suggestions to those desiring to teach the subject.

The work in textiles covers the history of the industry and the study of wool.

Household Arts 2

The winter term introduces machine work in garment making. The garments are planned as to style, suitability of material and trimming, and economical purchase of materials. The work involves the alteration of commercial patterns, fitting, and the various ways of setting in trimming.

The work in textiles in this course embraces the study of cotton and silk.

Household Arts 3

This course offered in the spring term consists of planning and making a house dress and a school dress; a study of the lines of the figure and the elaboration of plain patterns together with a study of color combination in dress and choice of materials.

In textiles the work covers the study of linen, the dyeing of fabrics, hygiene of clothing, laundering and the economic and social aspects.

Household Arts 14
Design and Dressmaking

This course, which is offered in the fall term only, embraces the making of a wool dress and a silk waist after original designs and patterns worked out from simple commercial patterns.

Household Arts 15
Dressmaking and Pattern Drafting

Pattern drafting will be taught in the winter term, the patterns drafted used in making undergarments and a tailored shirtwaist suit. In this course machine attachments will be used.

Household Arts 5, 6, 7, 8
Cookery

The work in cookery tin to give a working knowledge of cooking processes, to give practice and to develop skill and efficiency in handling materials and household apparatus.

Principles are deducted from experiments, showing the effect of heat, cold, fermentation upon food and applied to its preparation. The comparative cost of fuels and materials used is studied.

In connection with the courses in cookery are recitations and assigned reading references regarding the composition, nutritive and economic value, as well as the production and manufacture of food materials used in the laboratory.

Household Arts 5 Fall Term

The study of the cooking processes with reference to temperature with comparative cost and efficiency of fuels. Experiments with tea, coffee, fruits, starches, and sugar. Application is made in the cooking of vegetables, starchy puddings and cream soups, and candy. Milk, cheese, and eggs are also studied in this term.

Household Arts 6 Winter Term

Meats, poultry, fish, stock soups, gelatin, salads, deserts, and meat substitutes.

Household Arts 7 Spring Term

Cereals, macaroni, breadstuffs, beginning with the batter and advancing to dough in appropriate sequence.

Household Arts 8 Fall Term

In the early fall the laboratory work consists of canning and preserving fruit with pickling and jelly making, to be followed with a more extensive study of working processes in an experimental way with special reference to economy and efficiency. The planning and serving of meals with table service and decoration. Demonstration cookery, and the lunch problem for school children and cafeteria, with practical work along both lines.

Household Arts 9
Methods

This course is a consideration of the teaching of Household Arts in the elementary school. The course of study and its relation to the school curriculum with the planning and presentation

of lessons. Also the study and planning of equipment with cost of same and of maintenance.

The practical work consists of observation, practice teaching and assistance in the management of the departmental housekeeping.

Household Arts 10, 11

Nutrition: Winter Term

Dietetics: Spring Term

These courses aim to give the fundamental principles of nutrition with varying conditions, age, sex, and occupation. The subject matter includes the study of chemistry and physiology of digestion, the nutritive value of food principles, the study of dietary standards with application to the practical problems of the home.

Text books: Stile's Nutritional Physiology; Rose's Laboratory Manual and Dietetics.

Pre-requisites: Physiology, Chemistry, and Household Arts 5, 6, 7, 8.

Household Arts 12, 13

Home Economics: Winter Term

Introductory to the course is a brief survey of the evolution of the home. The selection, surroundings, construction, hygienic, economic and artistic conditions of the modern home. The planning of the house in reference to good proportion and convenience, the problems of artistic economic and hygienic furnishing are other topics considered.

Housewifery: Spring Term

The organization and systematic planning of the work of the home with the expenditure of time, labor and money. A study of labor-saving devices and efficiency methods of business as related to the home. The household budget and systems of keeping household accounts, also marketing and buying supplies.

Laboratory Work: In connection with the study of cleaning agents, practical application is made in the care of floors, woodwork, kitchen apparatus, pantries, dining room and table linen, bed rooms and bath roms.

Text books: Bevier, The House; Elliott, Household Hygiene; Terrill, Household Management; Taylor, The New Housekeeping; Bruere, Efficiency in the Home.

MANUAL TRAINING

LOUIS C. PETERSON

The Normal Schools aim to supply the increasing demand for teachers who are prepared for the industrial arts. The teaching of this branch of education is based upon pedagogical principles and should be taught by teachers who have had special preparation. The notion that an unprepared artisan can teach Manual Training as it should be taught is erroneous. The result would be, in such a case, that a trade only would be taught instead of that broad industrial education which develops the child's intellectual faculties. Manual Training means developing of power to observe, to investigate, to analyze, to reason, to discriminate, and to combine.

Special emphasis is laid on the correct processes, care of tools and bench, and the right attitude in approaching the subjects of industrial problems.

Mechanical drawing is an important feature of the work. Planning of problems in hand-work together with methods of presentation and working out of courses will be discussed fully in connection with this work.

Required in the English course throughout the second year.

The department offers the following course in Manual Arts. The satisfactory completion of this course entitles the student to a diploma from the university of equal rank with those to a diploma from the university of equal rank with those from the regular English and Language courses.

Required in the English course throughout the second year.

The department offers the following course in Manual Arts. The satisfactory completion of this course entitles the student to a diploma from the university of equal rank with those from the regular English and Language courses.

Equipment: This department is equipped with twenty benches, twelve lathes and power saws for shaping and turning woods and metals. The tools, benches and machinery are of modern type and ample for the needs of the work of the department. Excellent facilities are provided for acquiring practical experience in shaping materials into useful articles, in principles of construction, in operating power-driven machinery and in the processes and methods employed by manufacturing and building industries.

Course 1.—Elementary Construction

This course consists of exercises suitable for the lower grades. Paper folding and cardboard construction, cord knotting and braiding, weaving and basketry, bookbinding, and rebinding, study of textiles, papermaking, bookmaking and primitive industries.

Course 2.—Wood Work

This course includes work in thin-wood exercises suitable for intermediate grades. The study of simple tools, practice in the use of the rule, knife, coping-saw, try-square, compasses, plane, spoke shave, hammer, etc.; problems in simple wood-fastenings and finishes, and study of common woods.

Course 3.—Joinery

The student will construct useful articles involving the various joints such as are used in furniture construction and interior house finishing, panel work, door and window framing. Wood finishing will be studied and applied in practice. Instruction pertaining to the structure of wood, the method of converting the tree into lumber, seasoning, characteristics of good timber, defects, methods of preserving lumber, etc.

Course 4.—Cabinet Making

This course includes a series of lessons in practical cabinet work, instruction in the use of such fastenings as are employed by cabinetmakers, glue dovetailing in its various forms, blocks and dowels. There will be lessons in carving, veneering, inlaying, rubbed glue joints, scraping, filing, varnishing and polishing. Study of structure and design of furniture.

Course 5.—Wood Turning

This work consists in the care and operation of the power-driven wood-turning lathe. A careful study is made of the method of handling the tool for each cut. The practice exercises include turning straight cylinder, squaring ends and cutting shoulders, long taper cuts, "V" cuts, bead or short convex cuts, concave cuts long convex cuts, inside and outside screw face plate work, face plate and chuck work, reversing work in chuck, etc. Articles made are such as furniture parts, Indian clubs, dumb bells, darners, ro-

settes, cups, trays, candlesticks, goblets, napkin rings, towel rings, pulleys and wheels. The shop is equipped with eleven 12-inch wood turning lathes, one 36-inch band saw and other necessary tools for this course.

Course 6.—Pattern Making

This course includes the study of draft and shrinkage (fillets and round corners), finish and double shrinkage, simple coring, simple split pattern, difficult core box construction, building up loose piece patterns and sectional patterns. Problems are such as ribbed patterns, bracket, tool post slide, face plate, cone-pulley, ring, hand wheel, flat wrench, crank arm, gland, stuffing box, simple pipe fitting, pillow block, arm pulley, gear wheel, globe valve, etc.

Foundry methods will be studied. Practice in molding simple castings.

Course 7.—Forge Work

This course is designed to give training in the working of iron and steel. In dealing with the heated metal the student learns that the material must be treated instantly. Rapid blows, quick thinking, and a sure blow are required to get the desired result.

The student is taught how to manage the fire and to recognize the grades of heat necessary for the working of the different materials, the use of tools and appliances, the effects of the different kinds of blows and forging operations, such as drawing, bending, upsetting, forming, straightening, twisting, welding and tempering. The exercises consist of various pieces, involving the practical steps, as follows: Hooks and staples, stirrups, chains, tongs, chisels, center punches, hammers, Venetian iron work and a finished set of tempered tools for iron turning in the machine shop.

Course 8.—Art Metal Work

A study is made of the properties of metals, the principles of structural and decorative design and the methods of construction. The work includes such operations as making angles, forming curves, binding, punching, riveting, filing, sawing, drilling, beating, annealing, soldering, etching, and coloring by heat and chemicals. Problems are: pen tray, sconce, tea mat, desk stand, tin cup, funnel, paper cutter, lantern, bracket, door plate, watch fob, escutcheon, hinges, plate, bowl, box, and electrical apparatus.

Course 9, 10.—Machine Shop Practice

The equipment for the purpose of giving students a practical training in machine work and toolmaking has recently been extended by addition of some valuable machines and tools. With these improved facilities this course offers exceptional opportunities for the study of metals, alloys, machine design, construction and operation. The exercises are as follows: chipping, filing, sawing, drilling, thread cutting with taps and dies, fitting, polishing, tool-making, center work, drive on centers, setting tools, face ends to length, turn to size, caliper accurately, cuting speeds, roughing and finishing cuts, taper work, face-plate work, screw setting, chuck work, assembling of machine parts.

During the past year the students have built several complete gasoline engines and other machines. The installation of the new machinery has been done entirely by the students. The work provides a practical training in modern machine methods.

Course 11, 12, 13.—Mechanical Drawing

One year of mechanical drawing is required in the Manual Training Course.

The work to be done comes under the headings as follows: The use of instruments, applied geometry, lettering, orthographic projection, developed surfaces and intersections, pictorial representation, working drawings, technical sketching, architectural drawing, duplication and drawing for reproduction, strength of materials and specifications.

COMMERCIAL DEPARTMENT

Bookkeeping, Banking, Business Arithmetic, Penmanship, Commercial Law, Stenography and Typewriting

RICHARD V. BLACK.

ANNE MC OMBER, ASSISTANT.

CHARLES ISMERT, ASSISTANT.

Equipment

The Commercial department is equipped with a bank and wholesale room for the work in actual business.

The typewriting room is equipped with the latest improved desks, and the new Underwood typewriting machines. Other makes of machines will be added as required.

A new Burrough's Adding and Calculating machine is to be added this summer thus giving the students an opportunity to become familiar with the operation and use of this very important labor saving device in the work of accounting.

Stenotype machines are to be installed this summer and will be ready for the opening of the fall term, September fifteenth.

Penmanship 1

Two things are sought in penmanship, legibility and rapidity. The work in this course is devoted to the rapid muscular movements and a study of the small letter forms. The letters are studied in groups and drills given that will develop each group.

Penmanship 2

Drills in movement. Ovals, direct and indirect. Straight line. Single and combination letter drills. Word drills and dictation exercises to establish uniform tempo. Special drill on business capitals and their combinations with small letters. Figures. Business forms and business letters.

Commercial Arithmetic 1

Short methods in dealing with the fundamentals. Aliquot parts of 100. A mastery of the 45 combinations. Tables of denominate numbers. Fractions. Formulas used in percentage and its applications. Formulas used in mensuration. Solving and analysis of problems by mental processes.

Commercial Arithmetic 2

Denominate numbers. Bills. Statements. Account Sales. Shipments. Cash account. Bank account. Closing and ruling ledger accounts. Daily balances. Percentage. Profit and loss. Interest. Bank discount. Trade discount. Brokerage commission. Premium. Stocks. Bonds. Insurance. Taxes. Negotiable paper. Partnership. Annuities. Building and loan.

Commercial Arithmetic 3

Mensuration. Lumber. Building. Plastering. Papering. Carpeting. Painting. Land measure. Base line. Principal meridian. Township section, and its divisions. Distance. Surfaces. Solids. Capacity, Ratio and proportion. Longitude and time.

Commercial Arithmetic 4

A mastery of single column addition. Some time will be given to double columns addition. Short cuts in dealing with the fundamentals. The single equation method of stating and solving problems. Methods employed by expert accountants in solving problems and checking results. Arithmetical problems in business.

Bookkeeping 1

This course is introductory book-keeping and is planned for those who have never studied the subject. The work is taught on the laboratory plan. The double entry system is introduced in the beginning and all the laws governing the debit and credit of business transactions are fully explained and mastered. The journal, day book, cash book, sales book, purchase book and the auxiliary books are introduced and their use in accounting fully demonstrated. A complete line of business transactions are placed in the books of original entry, posted to the ledger, trial balance taken, inventories entered, and accounts closed. Loss and gain account and financial statement are worked out, and the entire ledger summarized in the balance sheet.

Bookkeeping 2

This course in bookkeeping constitutes the actual business practice. A bank and a wholesale room have been installed which gives special opportunity to learn the banking and wholesale business, as well as the retail business. In the retail business each stu-

dent becomes a proprietor. He is given a cash capital in college currency. The work in detail is as follows: Selects a place of business. Leases a building. Opens an account with the bank. Buys merchandise from the wholesale house. Trades with fellow students. Writes checks, notes, drafts, and other business papers. Buys and sells for cash, on account, note, draft, and in combination. Writes trades in books of original entry, posts to the ledger, making daily trial balances and cash reports. After four weeks trading ledger is closed and business opened as a partnership. More advanced and new lines of trading are introduced. More skill and greater rapidity required. After four more weeks of trading the books are again closed and opened as a corporation. The work in trading is continued for two more weeks, when a final closing is made.

Bookkeeping 3

Special sets in the different lines of business are offered. Grocery, Lumber, Hardware, Farm, Wholesale Dry Goods, Boot and Shoe Manufacturing Commission. In all these lines of business the latest systems of accounting are presented. In the Actual Business Practice each student has been taught to rely on himself, and to see clearly the workings of the varied business transactions, so that in the advanced sets little difficulty will be met in comprehending the trades that are made.

Banking 4

This course deals primarily with Bank accounting. Actual practice in handling bank book-keeping is offered in the actual business practice. The latest improved systems of accounting as employed by the best city banks are taught. A working knowledge of the following books is required for credit in this course: Depositors' Ledger, Discount Register, Correspondents' Register, Collection Register, Bond Register, Certificate of Deposit Register, Draft Register, Teller's Cash Register, Collection and Discount Tickler, Daily Statement, Certified Check Register, Journal.

The history and organization of our banking system. Private Banks. State Banks. Trust and Savings Banks. National Banks. The Reserve Banks created by the recent banking laws. The Clearing House. The Bank as an economical institution in a community.

Corporations 5

Corporations: Organization, Purpose, Government Supervision, Kinds of Stock. Stock Certificates. Bonds. Earnings, Sinking Fund. Imprest Fund. Dividends. Surplus. Assessments.

Stockholders. Officers: Directors, President, Secretary, Treasurer. New York Stock Exchange. Comparative Value of Stocks and Bonds. Investments. Manipulation. Trusts. Syndicates.

Manufacturing: Raw Materials, Finished Goods, Production, Disposition. Factory System: Organization and Efficiency, Manufacturing Activities. One or more sets in Manufacturing Accounting required for credit.

Auditing 6

Object, Term, Kinds, Duties, Working Papers, Order of Procedure, Method, Detection of Errors, Proving Cash Balance, Audit of General Cash Book, Petty Cash Book, Sales Book, Purchase Book, Journal, Return Books and Voucher Register, Adjustment Entries, Preliminary Trial Balance, Profit and Loss Statement, Financial Statement, Conclusion, Balance Sheet, Auditor's Report. Sets worked out by students in former courses will be used in giving practical experience in this course.

Commercial Law 1

Definition, Moral Law, International Law, Municipal Law, Constitutional Law, Ecclesiastical Law, Common Law and Equity, Statute Law, Criminal Law, Civil Law.

Contracts: Parties, Consideration, Subject Matter, Mutual Assent, Time, Conditions. Kinds: Formal Contracts, Simple Contracts, Oral Contracts, Written Contracts, Express, Implied, Executed, Executory, Mutuality, Construction, Mistake, Fraud, Duress, Statute of Limitations. Insanity, Infancy, Married Women, Statute of Frauds, Sales of Goods Act, Discharge of Contract, Legal Tender, Bankruptcy, Sale of Personal Property: Sale and Barter, Bailment, Personal and Real Property, Fixtures and Chattels, Parties to a Sale, Factor, Pledgee, Potential Existence, When Title Passes, Chattel Mortgage. Warranty: Express, Implied, Rights of Vendors, Rights of Vendee, Stoppage in Transitu.

Negotiable Instruments: Statute Law, Essential Elements, Negotiable in Form, Notes, Checks, Drafts, Bills of Exchange, Indorsement, Acceptance, Certified Checks, Presentment, Waiver, Protest, Accommodation Paper, Forgery, Interest, Usury.

Commercial Law 2

Agency: General Agent, Special Agent, Relation of Principal and Agent, Power of Attorney, Obligation of Principal to Agent, Obligation of Agent to Principal, Obligation of Principal to Third

Party, Obligation of Agent to Third Party, Liability of Principal for Torts and Wrongs of Agent, Termination of Relation of Agent and Principal.

Bailment: Benefit of Bailor, Benefit of Bailee, Mutual Benefit, Lien, Innkeepers, Common Carriers, Carriers of Passengers, Baggage, Partnership, Articles of Co-Partnership, Oral Partnership, Implied Partnership, Rights of Partners, Capital, Good Will, Liability to Third Party, Remedies Against the Partnership, Dissolution, Joint Stock Companies.

Corporations: Public Corporations, Private Corporations, Powers and Liabilities of Corporations, Dissolution, Membership, Stockholders, Common Stock, Preferred Stock, Management, Rights of Creditors of Corporations.

Insurance: Organization, Fire, Tornado, Life, Casualty, Employer's Liability Insurance, Fidelity, Credit, Title, Plate Glass, Elevator, Steam Boiler.

Real Property: Corporeal and Incorporeal, Fee Simple, Life Estate, Tenant for Life, Emblements. Estates by Marriage: Courtesy, Dower, Homestead, Sale, Deed, Quitclaim, Warranty, Mortgages, Landlord and Tenant.

Courts and their Jurisdiction, Pleading and Practice.

Salesmanship 1

Definition: Elements that Insure Success, Adaptation to Local Conditions, Securing the Confidence of the Public, A Knowledge of Values, A Knowledge of Goods, Giving Value Received, A Study of Human Nature, Value of Experience, Natural Qualifications, Honesty, Courtesy, Ability to Aid in Selection, A Satisfied Customer, Classifying Trade Cause of Failures, How to Become Successful, What Constitutes a Good Sale, A Good Salesman, Advertising.

SHORTHAND

Shorthand 1.

A study of the principles given in the Gregg Shorthand Manual, Lessons I to IX; elementary sounds and their shorthand representatives; word building; word signs; phrasing; abbreviation; reading and writing simple sentences; supplementary reading from shorthand plates.

Shorthand II.

A continuation of Shorthand I; completion of the Manual; word building; derivatives; advanced phrasing; short vocabulary; shorthand penmanship; practice in writing and reading simple business letters; supplementary reading.

Shorthand II. (a)

Dictation practice for the purpose of acquiring skill in executing shorthand outlines and for additional drill in phrasing.

Shorthand III.

Review of the fundamental principles and phrases through practice in writing exercises especially arranged for their application; drills in writing proper names and derivatives. Text, Gregg Speed Practice.

Shorthand III. (a)

Dictation of business letters, legal forms, and miscellaneous matter for the acquirement of a general shorthand vocabulary.

Shorthand IV.

Dictation from various phases of commercial work for speed practice; supplementary reading for the purpose of cultivating a correct idea of form and proportion, and to acquire smoothness in reading from notes.

Shorthand V.

History of Shorthand; methods of teaching shorthand; study of pedagogical works on the subject of shorthand; practice teaching; practice in writing consecutive matter other than correspondence.

Office Practice

Office Practice. Text, Office Training for Stenographers, Sorelle. Open only to students who have completed Shorthand V and Typewriting V.

This course emphasizes the most important phases of office practice—deportment, the mail, systems and equipment, follow-up systems, business and legal papers, binding and indorsing legal documents, filing cabinets, card indexing.

Typewriting I.

Instruction in correct habits of position, touch, fingering, and care and manipulation of the machine.

Typewriting II.

A study of correct forms of letters writing and artistic arrangement of material; especial attention is given to proper arrangement of business letters, addressing envelopes, writing on cards.

Typewriting III.

Carbon duplicating; copying legal forms; rough draft copying; tabulating; transcribing from shorthand notes; additional exercises for accurate finger and wrist movement. This course affords a working knowledge of the machine.

Typewriting IV.

Transcribing from shorthand notes; practice in copying from miscellaneous matter for speed and accuracy; use of the mimeograph and neostyle.

Typewriting V.

Speed practice; machine dictation; study of various machines in common use; proof reading. Actual correspondence, programs, outlines, carding, etc., furnished by the different departments of the school afford a great part of the material for the work.

Typewriting V.

Methods of presenting typewriting to beginners; study of various machines in common use; machine dictation; transcription of notes; speed practice.

Stenotypy.

Beginning with the fall term of 1914 instruction will be given in Stenotypy. The courses in Stenotypy may be substituted for those in Shorthand.

Text: Rational Typewriting, Cutler & Sorelle.

TRAINING SCHOOL

The training School is organized on the following plan:

1. An *elementary* school consisting of the first six grades.
2. A *secondary* school consisting of the second six grades.

The *elementary* school is organized into two units. The first three grades constitute the *primary department,* and grades four, five, and six, the *intermediate department.* Each of these units is under a supervising critic and assistant critics. The supervising critic devotes her time to the work of supervision, the observation, plan writing, and practice of the student teachers. The assistant critics teach regular classes for observation of student teachers, and give model recitations for the observation of students in the department of pedagogy.

The *Secondary* school is also organized into two units. Grades seven, eight and nine constitute a *Junior High School,* and grades ten, eleven and twelve a *Senior High School.* There are no head critics in either of these units. The completion of units of work on the departmental plan is characteristic of the work in these units, and is taught by regular critic teachers and student teachers under close supervision of the critic teachers.

Normal School students who have completed a minimum of two units of pedagogy, and whose efficiency in the lines of work which they shall undertake to teach, is vouched for by the teachers under whom they have had the work, are admitted to work in the Training School. Their *first term's* work will be devoted to observation under close supervision, to plan writing, and to an amount of teaching determined by their relative efficiency in observation and plan work. The *second term's* work will be devoted to teaching, to plan writing, and to observation work done by the critic teacher whenever she shall decide to take the class for illustrative purposes. The *third term's* work will be devoted almost wholly to teaching under sympathetic supervision. Plan work and observation work will be required only when it seems necessary.

It is advisable for a student teacher to do work in each of the several departments of the Training School. But opportunity will be given to specialize in any one department. The work in the Senior High School will be limited to those students of maturity, experience, and efficiency who expect to do work in our best secondary schools and are taking the degree courses.

While there will be general uniformity in plan writing, yet each critic teacher or supervisor will use her own individuality in working out the details. Consultation periods, and special meet-

ings will be worked out independently by each critic teacher. *No practice teacher, however, should have work in another department at the eighth hour,* as this will interfere with practice work.

The larger supervision of the work of the Training School will require general meetings of all critic and student teachers. This work will be in charge of the superintendent. At such meetings a discussion will be made of the particular course of study—its origin in life, its unification, its lines of work, their function and unification in the twelve year course, the adaptation of the course to the child at different levels of his growth, etc. Special or division meetings will be held at which time only those teachers immediately concerned will attend. At these meetings the details of work will be considered.

The equipment of the training school is such as to offer superior opportunities for the training of teachers. The school is housed in a modern building of semi-fireproof construction. The building is equipped with every sanitary convenience, including modern drinking fountains. Through co-operation with the departments of Domestic Economy, Physical Education, Manual Training, Music and Art, we are enabled to offer typical programs of work in all of the newer subjects. A school garden, a textile room equipped with a large loom, and a large number of exhibits contributed by many manufacturing companies furnish abundant material for the interpretation and study of industries.

Note—Write for Manual and Course of Study for grades one to six.

JUNIOR HIGH SCHOOL

Tentative Course

Notes. 1. There is no differentiation of courses in this unit, but there will be a persistent effort to discover individualities, that intelligent choice of course may be made on entering the Senior High School.

2. Departmental work, under close supervision, and promotion on completion of units is contemplated.

3. In passing from Junior to Senior High School the lower work must be considered first in making assignments.

4. Alternation of work by terms will be made if necessary.

Seventh Year (Period 45 M. Rec. 35 M.)		*Eighth Year* (Period 45 M. Rec. 35 M.)		*Ninth Year* (Period 45 M.	
English	5	English	5	English	5
Arithmetic	5	Arithmetic	5	Mathematics	5
Geography	5	U. S. History-Civics	5	General Science	5
Grammar	2	Grammar	5		
U. S. History	3	Physiology	3		
Writing-Spelling	3				
	23		23		15

Elect 2 or 3		*Elect 2 or 3*		*Elect 1 or 2*	
Art	2	Art	2	Art—	
Sewing	2	Cooking (90 min.)	2	Color—Design	3
Manual Tr.	2	Manual Tr.	2	Anc. History	5
Phys. Tr.	3	Phys. Tr.	3	Manual Tr.	3
				Domestic Sci.	3
				Gymnasium	3
				German or Latin	5

Chorus work three days.

SENIOR HIGH SCHOOL

Notes. 1. A pupil should choose one of the various courses offered and should then not shift to another course without consent of parents, principal and superintendent.

2. Elections are largely by courses, but for sufficient reasons substitutions within certain limits may be made.

3. In the junior and senior years a modification of courses will be granted to satisfy any particular college entrance requirement.

4. For those who do not select a special course a general course will be provided. The minimum requirements of this course shall be *three* years of English, *two* years of science, *two* years of history, and *two* years of mathematics.

5. In any course (including the 9th year) fifteen units (years) of credit are required for graduation.

6. Four years (including 9th) work will be offered in Latin, German and Mathematics.

7. Chorus work and two years physical training are required in each course.

COLLEGE PREPARATORY

First Year (10th)

First Semester	*Second Semester*
English	English
Mathematics	Mathematics
Latin or German	Latin or German
*Ancient History or Biology	Ancient History or Biology

Second Year

English	English
History—English or Modern	History—English or Modern
Mathematics	Mathematics
Latin or German	Latin or German

Third Year

U. S. History and Civics	U. S. History and Civics
Physics or Chemistry	Physics or Chemistry
Latin or German	Latin or German
Elective	Elective

COMMERCIAL

First Year (10th)

English	English
Com. Arithmetic	Com. Arithmetic
Writing—Spelling	Writing—Spelling
Geography (Phys.)	Geography (Com.)

Second Year

English	Bus. Forms and Correspondence
Beg. Book-keeping	Actual Business.
Stenog.—Tpwr.	Stenog.—Tpwr.
History of Commerce	Industrial History
Rapid Calculations	Elective

Third Year

Stenog.—Tpwr.	Stenog.—Tpwr.
U. S. History and Civics	U. S. History and Civics
El. Sociology	El. Economics
Adv. Book-keeping	Commercial Law
Elective	Elective

MANUAL TRAINING

First Year (10th)

English	English
Geometry	Geometry
Manual Training ½	Manual Training ½
Elect from—	Electives
History	
Science	
Art	
Latin or German	

Second Year

English	English
History of Commerce	Industrial History
Mechanical Drawing	Mechanical Drawing
Physics	Physics

Third Year

U. S. History and Civics	U. S. History and Civics
El. Sociology	El. Economics
Mathematics	Mathematics
Manual Training ½	Manual Training ½
Elective	Elective

AGRICULTURE

First Year (10th)

English	English
Biology	Biology
Commercial Arithmetic	Commercial Arithmetic
Commercial History	Industrial History
Manual Training ½	Manual Training ½

Second Year

English	English
U. S. History and Civics	U. S. History and Civics
Book-keeping	Actual Business
Domestic Animals	Feeding Domestic Animals

Third Year

El. Sociology	El. Economics
Soils	Farm Crops
Chem. or Phys.	Chem. or Phys.
Elective	Elective

HOUSEHOLD ARTS

First Year (10th)

English	English
History—English or Modern	History—English or Modern
Biology	Physiology and Hygiene
Garment Making	Garment Making

Second Year

English	English
U. S. History and Civics	U. S. History and Civics
Chem. or Physics	Chem. or Physics
Cookery	Cookery

Third Year

Art (History)	Art (History)
Dietetics and Household Management	Dietetics and Household Management
El. Sociology	Child Development
Juvenile Literature	Juvenile Story Telling

LIBRARY SCIENCE

MARY B. DAY

The Library

The Wheeler Library possesses a working library of some 25,000 books and 800 pamphlets. It is classified according to the Dewey decimal classification. There is a dictionary card catalogue with full analytical cards (author, title, subject, etc.) The books have been selected with reference to the needs of the various departments. They comprise standard works in literature, travel, history, science, philosophy, pedagogy and art, and general works of reference, including dictionaries, encyclopedias, year books, atlases and books of quotations. All periodical literature, that has permanent value, is bound and made accessible by Poole's index, the reader's guide, etc. The library subscribes to over a hundred of the best current periodicals, and receives daily many newspapers from surrounding towns and counties. The library contains much bibliographical material on children's literature, many beautifully illustrated books for children by well known illustrators, lists of children's books, etc. Many of the government's reports are catalogued, such as the U. S. Department of Agriculture, Farmers' Bulletins, U. S. Commissioner of Education, etc.

The library is open daily during school hours, and on Saturday mornings.

General Course in Library Methods

MARY B. DAY, LIBRARIAN

The modern curriculum demands that, for successful school work, the library must be used by teachers and pupils. The laboratory method of instruction makes the library the vital center of the school course of study. Educators are coming to require of teachers a first hand knowledge of books for children, and of sources of information. The teacher of to-day must know how to use a library intelligently, how to teach her classes to use it and must be able to direct the children's reading.

Since the library has become the supplement of the school course of study and the necessary laboratory of teacher and pupil, instruction in the schools in the use of the library is indispensable.

Elementary course in library science for normal school students and teachers who may have charge of small school libraries in rural communities and small towns.

The aim of the course is not to train librarians, but to acquaint teachers with library indexes and helps invaluable in the prepara-

tion of their work, to prepare them for selecting books for supplementary work, for directing the children's reading, and making the school library valuable to pupils.

The following is an outline of the course:

A. Care and treatment of books—structure of a book, binding, repairing, etc.

B. Intelligent use of a book—what may be learned from the title page—full title, information about the author, date, publisher, etc., what may be learned from the preface, table of contents, etc.,—aim, scope of work, subdivision of subject, value and use of index.

C. Book selection.

D. Card catalogue—use of card catalogue as the index to the library—arrangement of the catalogue; how to locate books; arrangement of books in library.

Description of catalogue from the standpoint of the user.

Objects of a dictionary card catalogue.

1. To enable a person to find a book of which either—
   (a) the author is known.
   (b) the title is known.
   (c) the subject is known.

2. To show what the library has—
   (a) by a given author.
   (b) on a given subject.
   (c) in a given kind of literature.

3. To assist in the choice of a book—
   (a) as to its edition.
   (b) as to its character.

E. Classification system and book numbers. Short account of the growth of the Dewey Decimal Classification system, which is used in 80 per cent of the libraries in the U. S. Its scope, advantages and disadvantages. Explanation in detail of the "second summary." Each student to have a typewritten copy.

F. Reference books. Merits, scope and characteristics of the reference books in the library.

1. Encyclopedias.—New International.
   Britannica, 11th edition.
   Monroe, Cyclopedia of Education.
   Americana.
   Champlin.
   Bailey, Cyclopedia of American Agriculture, etc.
   What are the essential qualities in a modern encyclopedia.

2. Dictionaries.—Century.
   Webster.
   Standard.

3. Handbooks, yearbooks, etc.
   Britannica Yearbook.
   Chicago Daily News Almanac.
   Who's Who.
   Who's Who in America.
   World Almanac, etc.

4. Indexes.
   Periodical—Poole's Index—Reader's Guide.
   "A. L. A." index to general literature.
   Salisbury & Beckwith, Index to Short Stories.
   Granger, Index to Poetry and Recitations, etc.

G. Special subjects, such reference books as, Baker, Guide to the Best Fiction.

Baedeker's guide books for various countries.

Biographical Dictionaries—Century Book of Names, Appleton's Cyclopedia of American Biography, National Cyclopedia of American Biography, etc.

Chambers, Books of Days.

Harper's Dictionary of Classical Literature and Antiquities.

Moulton, Library of Literary Criticism.

Walsh, Curiosities of Popular Customs, and of Rites, Ceremonies, etc.

H. Periodical literature—Its value and scope, as current literature, as reference works, when bound.

I. Children's literature.

1. History of children's books.
2. Selection of children's books.
3. Books on children's literature.
4. Valuable lists for the teacher.
5. Famous illustrators of children's books—Walter Crane, Jessie Wilcox Smith, Howard Pyle, Kate Greenaway, etc.
6. Story-telling—adaptation of stories—what constitutes a good story—selection and presentation of stories.

J. Organized library factors.

National. Congressional Library, N. E. A. American Library Association, U. S. Bureau of Education.

State. State Library, State Library Commission, State Teachers' Association, State Historical Society, State University Library, Traveling Libraries, etc.

Rural. State library schools, State library laws, rural post.

Civic. Public library, special libraries, endowed, city library associations, city teacher's associations.

K. Preparation of a bibliography.

PERIODICAL LIST FOR 1914

The following magazines are received in the Wheeler Library:

American Library Association Book-list.
Advocate of Peace
American Boy
American Carpenter and Builder
American Educational Review
American Historical Review
American Journal of Psychology
American Magazine
American Mathematics
American Physical Education Review
Annals of the American Academy
Annals of the American Academy, supplement
Annuals, Politiques et Litteraires
Arts and Decoration
Arts and Progress
Association Men
Association Monthly
Atlantic Monthly
Blackwoods Magazine
Bookman
Book Review Digest
Boston Cooking School Magazine
Breeders' Gazette
Bulletin of the American Geographical Society
Century Magazine
Chautauqan
Classical Journal
Classical Philology
Contemporary Review
County Life in America
Craftsman
Cumulative Book Index
Dial
Edinburg Review
Education
Educational Bi-Monthly
Educational Review
Elementary School Teacher
Fliegende Blätter
Fortnightly Review
Garden Magazine
Gleanings In Bee Culture
Good Housekeeping
Harper's Monthly
Harper's Weekly
House Beautiful
Independent
International Studio
Johns Hopkins University Studies
Journal of Education
Journal of Educational Psychology
Journal of Geography
Journal of Illinois State Historical Society
Kindergarten Review
Kolnische Zeitung
Ladies' Home Journal
Library Journal
Life
Literary Digest
Little Folks
Living Age
London Times
McClure's Magazine
Manual Training Magazine
Mind and Body
Missionary Review
Musical Courier
Nation
National Geographic Magazine
Nature Study Review

New England Magazine
Nineteenth Century
North American Review
Outing Magazine
Outlook
Overland
Pedagogical Seminary
Popular Electricity
Popular Mechanics
Popular Science Monthly
Primary Education
Primary Plans
Printing Art
Psychological Bulletin
Psychological Review
Public Libraries
Publisher's Weekly
Quarterly Review
Reader's Guide to Periodical Literature
Review of Reviews
Rural Education
St. Louis Republic
St. Nicholas
Saturday Evening Post
School and Home Education
School Arts Book
School News
School Review
School Science and Mathematics
Scientific American
Scientific American Supplement
Scribner's
Survey
Teachers' College Record
Technical World
Torrey Botanical Club Bulletin
Tribune, Chicago Daily
Vocational Education
Western Teacher
Westminster Review
Woman's Home Companion
World's Work
Youth's Companion

STUDENTS 1913-1914

The catalog for 1913-1914 was issued in May, but the supply was soon exhausted, and it became necessary to have a second edition printed. This second edition is like the first, except that the roster of students has been omitted. The following summary gives the number of students enrolled in the various departments of the institution:

General Summary Normal and Academic Departments

Summer Session,	1913	Normal and Third and Fourth Years High School.....	482
Fall Term,	1913	Normal and Third and Fourth Years High School..... ..	481
Fall Term,	1913	First and Second Years High School.	102
Winter Term,	1914	Normal and Third and Fourth Years High School.....	511
Winter Term,	1914	First and Second Years High School.	86
Spring Term,	1914	Normal and Third and Fourth Years High School.....	742
Spring Term,	1914	First and Second Years High School	78
			2482
		Names counted more than once	1024
		Number of individual students enrolled during the year exclusive of Training School..	1458

Training School (Grades 1--8)

Summer Session	1913	.....	72
Fall Term,	1913	.....	183
Winter Term,	1914	.....	166
Spring Term,	1914	.....	169
			590
		Names counted more than once	358
		Number of individual students in Training School.....	232
		Entire enrollment of individual students in all Departments.	1690

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