The Spectrum.

Published by the Students of the Nor b Dakota Agricultural College.

Vol. IX.

OCTOBER 15, 1904.

No. 1.

Extract from the Life of Benjamin Bummer By VAN.

My name is Benjamin Bummer, although some people, in fact most people, call me simply hobo. You may think it strange that a mere tramp like myself should have a sufficient vocabulary to chronicle any part of his life, but that mystery is easily cleared up. I am a graduate of one of the prominent universities of this country. It is no uncommon thing for an educated man to be on the road. I know of several such cases. For my part, I have such a decided aversion to any kind of labor that the mere thought of such a thing is abhorrent to me. Therefore, on leaving school, I adopted the life of a tramp and have, with a few exceptions, found it eminently satisfactory.

I had always wanted to visit the West, so, after my graduation, I started to travel by easy stages to that part of the country. I arrived in North Dakota about three weeks before harvest. Gentlemen of my guild were very numerous about this time and everybody seemed to be against us. There was also an unusually large number of dogs in the section of the country where I was stopping. You may wonder how I could manage to get enough to live on under these adverse conditions. To enlighten you, gentle reader, on this point I will outline a typical day's foraging. One bright, sunny morning I entered a small village. The first house I came to looked as though it might belong to some prosperous individual, so I turned in. I approached the house from the front gate and so had almost reached the back door before I observed a large placard which bore this startling announcement:

"Beware of the Dog."

I had just deciphered this warning when, with a ferocious snarl, an animal bounded around the corner of the house. This dog certainly had a terrifying aspect. He was almost seven inches high and his curly tail wagged fiercely. When I saw the size of the animal I was reassured and started toward the house again. At this the dog set up a series of heartrending yelps. This unearthly racket brought the lady of the house to the door.

"What are you doing to my doggie, you heartless villain? If he is hurt I'll have you put in the calaboose."

"Kind lady," said I, humbly, "your pet was set upon by a large dog which I drove away. Were it not for my timely assistance the intelligent looking little pet of yours would now be naught but mangled remains."

At this monstrous lie her stern features relaxed. "Won't you come in and have some breakfast?" she invited cordially.

Would I! I couldn't get into that kitchen quick enough. She prove me a good meal, too, only there wasn't enough of it for a real hungry man, but it helped some. After finishing everything in sight, and thanking her profusely, I stuck a toothpick in my mug and strolled up town.

I had gone but a short distance when I met a fat, sleek looking priest. He seemed to be extremely well fed and accordingly I judged him to be good natured.

There was still a spot in my anatomy which felt the need of replenishment. My morning meal had not touched it at all. This looked like a good chance to supply a long felt want, so, putting on a mournful and dejected air, I addressed the reverend gentleman thusly:

"Good Father, could you kindly give a poor hungry man, without work, a dime to get something to eat?"

He looked at me a minute, then he questioned: "Young man, what are you doing with that toothpick?"

This was a poser. I had forgotten all about the toothpick, which was still sticking in the corner of my mouth. The churchman was vastly tickled with his acumen, and smiled broadly at my discomfiture.

I was not going to give up without a struggle, however. I had once read of a fellow roadsman who had been caught in the same predicament, and I used his reply to extricate myself from my present position.

"Good Father," said I, "I am just playing a joke on my stomach."

The day was mine. His bulging paunch fairly rippled with mirth. Reaching down into his pocket he drew forth a wallet which seemed to be about as well filled as its owner, and, with great deliberation, extracted a ten-cent piece therefrom.

He held out the coin and I lost no time in possessing myself of it. As the jolly ecclesiast went his way, his sides were still shaking spasmodically.

I immediately repaired to the drug store and expained at great length to the druggist just why the doctor had prescribed a small drink of whiskey every night before retiring to knock a bad attack of lumbago, adding that as my time of retiring was very uncertain I was forced to take three or four doses at a time.

The druggist displayed no hesitation at all about filling my order, and I was forced to the conclusion that customers with ailments similar to my own were not infrequent.

After leaving the drug store, I hied me over to the lumber yard, and, after finding a nice, sunny spot, laid down and went to sleep.

It was nearly 5 o'clock when I awoke. I felt very miserable. The place where my digestive apparatus should have been situated seemed to be an aching void. I had been dreaming of magnificent suppers and sumptuous repasts, and this prosaic awakening was very painful. However, I arose to my feet and started off to look for a hand-out. I had not gone far before I came to a residence which looked promising. I shuffled up to the back door with that mournful expression which is so much affected by my class of beings. This expression suddenly underwent a lightning change. The new one was terror, and the cause was the deep, menacing growl of a huge, black dog. He wasted no time in formalities, but proceeded immediately to business, namely, myself.

(To be continued.)

My Autobiography. By ORPHEUS.

They say I must tell a story, "a funny one," they say, and so I guess I'll tell my autobiography. It ought to be funny, for I am the most peculiar object that ever happened on this terrestrial spheroid. I am like the fellow that old Bill-Shake-His-Beard, or whiskers, or something like that, tells about: "When I ope my lips all the pups whine."' It's a way they have of expressing their admiration, I suppose. Mark Twain, Bill Nye and Josh Billings all take a back seat when I get one of my funny streaks. Even the funny men of the Fargo municipal campaign gaze wistfully at me and then go sadly home. I guess it reminds them of a funeral.

I don't know much about an autobiography. I know more about an automobile, or ought to turn down the gas at 10 o'clock Sunday evening, and ought to make hay while the sun shines—I mean, while the gas is low.

But everybody writes autobiographies now-a-days, great men and men who are not great. I belong to the middle class, I expect to be great-I mean gratefulif I get out of this alive. That's why 1 write my autobiography now; if I become great, I may not have time; if I don't, I won't have a chance. I don't like to take chances. I am like Snyder, who got a lively egg for breakfast at a restau-He said: "I takes no chances. rant. I eats him anyhow. If I leaves him, dey sharge me 50 cents for spring chicken." I won't tell you the rest, you might charge me with liarceny.

If I were a great man, do you know what I'd do? I'd travel incognito. Now, I have to travel in trains or in the daytime. I've also traveled a lot in Fargo. I peddled books once. I came to a place where they had a cattle-dog—no, it wasn't a cattle-dog, it was one of them fellows with wrinkles on his nose, and no goldfilled teeth, you know what I mean—and I traveled—that is, some of me traveled. Some of me never traveled again. It's probably gone into a stew by now—veal stew or sausage. It was from a calf.

It's lots of fun to be a book agent. You see so much of the world, and the world sees so much of you. Sometimes you seize too much of the world, then the police seize you, and you see things from the inside. If you imbibe too much of the world, you see snakes, or see sea serpents.

This is a funny world anyway. Did you ever stop to think—the world never does. If it did, what a revolution it would cause in our digestive tract—but did you ever stop to think where you would be if there were no world? We'd all have to live in the spirit. I'd rather live in faith, or in hope, or on charity.

Speaking of tracts, I knew a young man once who was attracted by a tractable young lady, who, after succeeding in extracting all his valuable, retracted what she had contracted which so distracted the young man that he contracted a contraction of the cricoarytenoideus lateralis by means of a rope, and now he resides in tracts unknown. If you subtract anything from this statement it will detract so much from my tractability that I will make tracks for the street car company.

But, as I said before, I was going to write an autobiography. If I do, I ought to begin at the beginning, with my family tree. My family tree is a pine. It is dead now, and is used for a trolley pole. That's how it happened to become my family tree. It was in the good old days when Dakota was young—I was young too then—but that has nothing to do with Dakota. My brother-in-law's father-inlaw's father, that is to say, my great grand

father's son on my sister's side, was walking along the prairie one day when he accidently caught his foot on a piece of rope that was stretched across the path. Now, you all know how provoking it is to catch your shins on a rope when you are not expecting it, perhaps you have helped to put up such ropes. I have. It's great fun to see how quickly people will humble themselves. Now, my brotherin-law's father-in-law's father on my sister's side was a very philanthropic man. He always had the interests of his fellow citizens at heart. So he picked up that rope for fear someone might fall over it and hurt someone's feelings. Now seme illustrous individual saw my brother-in-law's father-in-law's father on my sister's side pick up that piece of rope, and he told some of the neighbors about it. My worthy relative could not make those narrow-minded people believe that he had acted for the best interests of all concerned and the consequence was that he rose in the world by means of that same rope and the aforementioned family tree. I forgot to mention that there was a horse attached to the other end of the rope, but that is a minor matter, and, as I am a very modest man, I never brag of my ancestry.

There is one of the peculiar things they have now-a-days—family trees. What an argument Darwin could have made out of it if he had only thought of it. In the golden age when we were all monkeys—some of us are yet, but we don't like to own up—everybody had a family tree. They used it for shelter, food and elothing. Now they use it to measure distances with—how far they are above the rest of the world.

Now that I have completed my family tree, I will begin with my auntcestry. When Cæsar, king of Roumany, crossed the Alps to slew Hannibal and his Scottish chiefs, he forgot to slew one man. This man afterwards had a son who became Henry V of Holland. Henry, or Hal, as he was commonly called, had a grand-daughter who married a farmer in South Carolina. My aunt's greatgrandfather's uncle worked for this farmer, so you see I am quite intimately connected with the royal houses of Europe.

That ount of mine, by the way, is quite a remarkable woman. She has been married six times—prospectively,—but the the fellow always got away before she got him to propose. The seventh time she married a lawyer, and now he is consulting all his brother lawyers about how to get rid of her. She don't keep cats, but she drinks—soda water, tea and milk.

That's about all the ancestors I ever had. The rest of them never amounted to much. One of them was prime minister of England about the year 800, and baptized all the heathens in the creek down by London; another was master of ceremonies at the court of Louis XIV, and still another would have been a millionaire if his schemes had panned out as well as Rockefeller's and Morgan's, but they never rose to such heights in the world as my afore-mentioned brother-inlaw's father-in-law's father on my sister's side. But, yes, one of them did. He was blown up. He tried to light the fire with gasoline.

I was going to tell you something about myself, but, really, I never amounted to much, and, as I am a very modest man, I don't like to talk about myself. If I don't forget, I'll come back and tell you about it next year, but it is very likely that I'll forget, for I haven't got much memory, and what little brain 1 have got is filled with visions of the lovely faces I see before me. I hope you have felt awfully bored, for I have, and if they had told me that we would have no chewing I never would have moved. But, I'm awfully glad I came, anyhow. It reminds me of the time when I was a little boy, and spoke pieces Friday afternoon. That reminds me: Pa told me not to stay out late tonight, so I've got to go home.

The A. C. Power Plant.

The need of a modern heating plant at this institution has long been felt by students and faculty, but up to this year the appropriation by the state has not been sufficient to warrant the construction and equipment of such a plant. The old plant was enlarged from year to year at no small cost; but on account of improperly constructed conduits enclosing the long steam pipes and the increased radiating surface, it was found to be entirely inadequate and very expensive to operate as the enormous fuel bills of the past two or three years testify.

This year, however, we find an entirely different state of affairs. A complete modern plant has been constructed, and beyond a doubt before spring the board of directors will be satisfied that they have promoted economy by a judicial expenditure of public money.

The boiler house of the new plant is a brick structure, 45 feet wide by 84 feet long, with a coal shed 25 feet by 98 feet long, extending across the south end. Plans and specifications for this building were furnished by Architect Bebee of this city. The contract was secured by Bowers Brothers, who carried on the work with all possible care and expedience. Although there were several bids on the plant equipments, this contract was also secured by a local firm, Fargo Plumbing & Heating Co. The system used, known as the vacuum system, consists essentially in having the steam pressure on the radiators below atmospheric pressure, the water in the return pipes being pumped back to the boiler house by two vacuum pumps which also exhaust the air from the radiators. Power is furnished by three 125 H. P. tubular boilers, which deliver steam by means of suitable reducing valves to the 14-inch

low pressure header extending across the three boilers and connected to the two main steam pipes. These steam pipes, varying in size from 8 to 12 inches in diameter, and amounting to 2,300 feet in length, carry the steam to the varicus buildings on the campus. There are, of course, the same number of feet of smaller pipe (4 inch to 8 inch) in the returns for carrying the condensed water back to the boiler house. Another header which is also connected to the boilers. furnishes steam for operating the draft fan, a boiler, feed pumps and vacuum The arrangement for draft is pumps. an interesting feature of the plant. Instead of depending entirely on the natural draft smoke stack, which, as everyone knows, depends largely on atmospheric conditions, they have installed what is known as an induced draft appartus. That is: The gases of combustion, instead of passing direct to the stack, may, by the use of suitable dampers, be drawn into a large fan, 72 inches in diameter, and forced into the stack at a high velocity. The fan must draw all its air through the boiler furnace, thus creating a draft that could not be gotten except by building a very high smoke stack to replace the 60-foot stack now used. Another interesting feature of the plant equipments, and one that may be of great value to the engineering students, is the fact that there are two styles of boiler settings used. One boiler is mounted in a standard setting, used by nearly all mechanical engineers, while the other two are mounted in what is known as the "Russell" setting, so called after the inventor, Mr. Russell, of Dickinson, N. D. The characteristic feature of this setting is that the flame, which is nothing but carbon particles heated to incondescence. does not strike the boiler until after all

of the carbon is burned. The advantage claimed is that the gases passing under the boiler and through the tubes are not only hotter than they would be if allowed to strike the relatively cold boiler plate before combustion is complete, but there is very little or no carbon left unburned to settle as soot in the tubes, thereby preventing the hot gases from coming in direct contact with the heating surface. These settings are particularly designed for using North Dakota coal, a fact which should not be overlooked. The cost of these settings is somewhat more than that of two standard settings would have been, but the installing en-. gineer, Mr. Price, used them, thinking if the comparison proved satisfactory, the

extra cost would be allowed by the authorities in charge.

Although it is not our purpose to advertise the firms that did the work on the new plant, it is interesting to note that in no particular has there been present the tendency to "shave" the job as is often the case when government contracts are taken. On the contrary, the Fargo Plumbing & Heating Co. has expended a considerable amount of money on boiler settings and boiler equipments that were not specified in the contract, in order to make the plant as near perfect as possible. The cost of the plant completed is about \$35,000, and the state has, beyond a doubt, received a "square deal."

SAGE SAWS.

Hitch your trolley to a star, but mind you keep your ground wire in working order.

If you can't move the whole world, try a wheelbarrow full; it'll keep up your appetite.

Don't be a pessimist; if the Lord had intended you to balk, He'd made you a mule. 'Taint the feller wot jumps now an' den wot gits there; it's him wot keeps a-crawlin'.

It's mighty nice to get a handout when you need it; but it's nicer to be able to give a handout.

Laugh and the world basks in your sunshine; weep rivers and you are the one that gets stuck in the mud.

NAPOLEON'S GRAVE.

Here sleeps he now alone;

Not one of all the kings whose crowns he gave Bends o'er his dust; no wife, no son

Has ever seen or sought his grave.

- Alone he sleeps; the mountain cloud That night hangs o'er him and the breath
- Of morning shatters is the shroud That wraps the conqueror's clay in death.

The only, the perpetual, dirge

That's heard here is the seabirds' cry, The mournful murmur of the surge.

The clouds' deep voice, the winds' low sigh. —Selected.

Scientific Notes.

That trees, like human beings, can be fed and treated for diseases may at first thought seem strange and even absurd, yet this is really being done at our Experiment Station. Spraying trees for insect pests has long been practiced, but the practice of feeding them medicine internally of definite strength and in definite quantity is quite novel as well as interesting.

It is not the object of this article to give a detailed discussion of the subject, for the reason that as yet it is only in the experimental stage, but later a fuller account may be given.

For the past few years, trees in the orchard and grove at the college have been dying from the effects of an internal parasitic fungus, which is spreading in its destructiveness, and which no methods of spraying reach. Professor Bolley, Experiment Station botanist, conceived the idea of feeding and medicating these trees as a physician would his patients. It is quite probable that the reader is now asking himself the question, "How is the medicine to be given in required quantities?'' Professor Bolley solved this, however, with even better success than the physician, for, regardless of the taste, the professor's patients take their medicine regularly and in the prescribed quantities, whereas the faithfulness of the physician's patients is sometimes questionable.

A common brace-and-bit is used to bore a hole into the heart of the tree about two feet above the ground. The entrance to this hole is covered by pushing in a rubber stopper through which is passed a short glass tube. Just above the hole is fastened an inverted bottle, the mouth of which is connected by means of a rubber tube to the glass tube which passes through the stopper. A small hole is drilled in the side of the bottle near the top. It is now only necessary to pour the medicine in whatever strength or quantity is required into the hole in the bottle, whence it passes into the mouth of the bottle and through the rubber tubing into the glass tube and to the heart of the tree. The medicine is then carried by capillarity, diffusion and osmosis into every branch, twig and leaf of the tree. It thus comes in contact with the organism that produces the disease.

So far the success of this doctoring has been very gratifying; three apple trees seem to have been cured during the past scason, and a large number of the grove trees, besides some fruit trees, are believed to be greatly helped. Gradually it is being learned just what effects certain substances have upon the growth of trees, how actively they act, and many other interesting facts which later may give yaluable clues as to what to use in preventing such diseases as apple blight.

From the bark of trees and shrubs the Japanese make scores of papers, which are far ahead of ours. The walls of the Japanese houses are wooden frames covered with thin paper, which keeps out the wind but lets in the light, and when one compares these paper-walled "dollhouses'' with the gloomy bamboo cabins of the inhabitants of Java, or the smallwindowed huts of our forefathers, one realizes that, without glass and in a rainy climate, these ingenious people have solved in a remarkable way the problem of lighting their dwellings and, at least in a measure, of keeping out the cold. Their oily papers are astonishingly cheap and durable. As a cover for his load of tea, when a rainstorm overtakes him, the Japanese farmer spreads over it a tough, pliable cover of oiled paper,

which is almost as impervious as tarpaulin and as light as gossamer. He has doubtless carried this cover for years, neatly packed away somewhere about his cart. The "rikisha" coolies in the large cities wear rain mantles of this oiled paper, which costs less than 18 cents and lasts for a year or more with constant use. An oiled tissue paper, which is as tough as writing paper, can be had at the stationer's for wrapping up delicate articles. Grain and meal sacks in Japan are almost always made of bark paper, for it is, not easily penetrated by weevils and other insects. But, perhaps the most remarkable of all the papers which find common use in Japanese households are the leather papers of which the tobacco pouches and pipe cases are made. They are almost as tough as French kid, so translucent that one can nearly see through them, and as pliable and soft as calfskin. The material of which they are made is as thick as card board, but as flexible as kid.

On Sept. 5 the department of agriculture opened a chemical laboratory for the examination of imported food products. The laboratory is located in the Appraiser's Stores Building of the treasury department in New York. Five expert chemists will be engaged.

++++++

FORMER STUDENTS.

Miss Spenser is teaching in Montana.

Miss Anna Stapleton, '03, is teaching at Lisbon High School.

Miss Aldyth Ward, '02, has taught at Lisbon during the past year.

Miss Dorothy Berry is traveling in Ohio for a Chicago music house.

Mr. Hugh McGuigan was a recent visitor. He is teaching at the Chicago University.

Miss Mabel Leininger, '03, left recently for the Northwestern, where she will take up post-graduate work.

Messrs. L. B. Greene and O. A. Thompson visited college Sept. 22. L. B. is studying medicine at Ann Arbor, Mich., and O. A. is still director of the Edgeley sub-station.

THE SPECTRUM extends its sympathy to Dr. Merton Field on the loss of his wife. She died from consumption last July, and the body was brought to Fargo for burial.

Miss Katie Jensen, '04, is teaching the intermediate grades at Dazey, N. D.

A. W. Fowler, '01, who has occupied the position of private secretary to Congressman Spalding, has been spending some time in Fargo.

Married: Prof. Thomas F. Manns, '02, and Miss Alys Reid. Mr. and Mrs. Manns are spending their honeymoon in the Philippines, where they both occupy government positions as teachers.

Miss Angela M. Gibson, graduate of Fhiladelphia College of Elocution, also pupil of Byron W. King, Pittsburg, and public entertainer for over two years, will teach elocution and physical culture in Fargo, beginning in October. Class and private instruction. For terms address Union City, Pennsylvania.—Fargo Forum.

Miss Gibson graduated from the A. C. with the class of '98.

Agricultural Notes.

E. G. Schollander, assistant in the plant breeding nursery, has resigned and gone back to his Stutsman County farm. Mr. Schollander has accomplished splendid results in his department, and his many friends regret exceedingly that his home interests compelled him to take the step that he did.

This year the agricultural department has two additions to its faculty. Mr. O. O. Churchill, '03, Michigan Agricultural College, has succeeded Mr. Schollander in the plant breeding work. After graduation, Mr. Churchill remained one year at his college as instructor in the agronomy department and comes to his work here highly recommended.

Mr. W. B. Richards, the new assistant in animal husbandry, is a classmate of Professor McDowell, graduating from Wisconsin University in 1903. Last year he was engaged as instructor in animal husbandry at the university in Madison, and, with his present experience, should prove a valuable addition to the teaching staff of the Agricultural College.

Some four years ago a movement was started among the students of several of the Agricultural Colleges in the central West to further the interests of agriculture among their respective institutions. To this end an organization was formed, called the American Federation of Students of Agriculture, whose purpose, as its constitution states, was to unite in work and fellowship the students of agriculture in America. Any school of agriculture in the United States and Canada was declared eligible to join and about fifteen are now members of An annual meeting the organization. is held during the session of the Interna-

tional Live Stock Show in Chicago in December. Each college is required to send delegates to this meeting. A good program in which all the state institutions take part is one of the features of the convention. This year the North Dakota Agricultural College has charge of the meeting, and it is desired that as large a representation as possible go from North Dakota. Last year forty students left Fargo in a special car bound for the International. It is not necessary to speak of the educational value a visit to the world's greatest live stock show holds forth. Every student that possibly can should make it a point to attend the show in Chicago this fall. All former students who are interested in live stock are also urged to attend. An extremely low rate of \$12 for the round trip can be secured and the total expenses need not exceed \$25. All those who wish to go or want more information on the subject should see or write to Professor Richards of the animal husbandry department, who will make the necessary arrangements for the trip.

During the past three or four years the largest club or society, in point of attendance, on the campus has been the Agricultural Club. Heretofore it has only held sessions during the winter months, owing to the fact that the membership is largely made up of the short course students. As the new short year course begins on the 15th of October, a big influx of students to the college is expected, and since most of these men do not care to join one of the literary societies, it has been suggested that the Agricultural Club hold regular meetings during the fall term. We would like to hear what the members of the club now in college think of this plan.

The Spectrum

Published Monthly by the Students of the North Dakota Agricultural College.

Entered at the Postoffice at Agricultural College, N. D., as second-class mail matter.

TERMS.

e addressed to Business Department, "THE SPECTRUM," Agricultural College, N. D.

EDITORIAL STAFF.

A. M. Mikkelson, '05, - Editor-in-Chief Norman Ellison, '07, - Business Manager Chas. W. Van Horn, '07, Ass't Business Mgr. Editor-in-Chief

ASSISTANT EDITORS

Chas. W. Van Horn, '07Literary
Daniel Glomset, '08Literary
Emily May, '06 Science
John T. Weaver, '07Science
Genevieve Holkesvig, '08 Local
John A. Swenson, '06Local
Christian Gunness, '07 Local
Oliver W. Dynes, '07Agriculture
Elmer M. May, '05 Mechanical Notes
Rufus B. Lee, '06Athletics
Prof. L. R. Waldron, '99 Alumni Notes
Robert M. Dolve, '05 Exchanges

Editorial.

With this issue the present editorial staff makes its initial bow to the public. To some of us the work is entirely new, and none of us have had a great deal of experience in a journalistic line. It is, therefore, natural that we should make mistakes, but we shall try to profit by them and not make the same mistake twice. We shall try to treat every one fairly, but, if we should inadvertently tread on somebody's toes, kindly remember that, "To err is human, to forgive, divine."

While we make no promises as to what we shall do or not do, it shall be our aim at all times to make the paper as interesting and instructive as possible. To this end we need the assistance of the entire student body. Remember that it is your paper more than it is ours. Remember that it is published by the students of the North Dakota Agricultural College, and not by the editorial staff and the business manager. Bring in your jokes and news items. Write articles for publication. If you do not succeed the first time, try again. You are the one that is benefited. We may not always be able to print all, but we we shall always print the best. We shall always be glad to have your co-operation, be it in the form of criticism or suggestion. And above all: Subscribe for the paper.

The enrollment of students as yet is very small, barely 140. The season on the farm is very late, and this is delaying the return of many of our best students. If we might offer a suggestion: Could not the board of trustees consider the plan of opening school about two weeks later in the fall and continue that much later in the spring? Of course, the plan has its drawbacks, as most other schools and colleges open about the middle of September, but would not the advantages overbalance the disadvantages? Most of our students come from the The fall is the farming communities. busy season on the farm, while in the spring the spring's work is already completed before school closes, and two weeks more would make no material difference. It would, to be sure, cut down our football season, but our baseball season would be that much longer.

The increasing popularity from year to year of the four year course in agriculture is one of the encouraging features of the work in the agricultural department: Students are begining to realize the value of the opportunities which are held out to the men who specialize in this line. Although we do not wish

to under-rate the value of the short courses, it is a self evident fact that the longer course, which admits of more time devoted to the culture subject. tends to cultivate and broaden the student's mind to a much greater degree than the shorter course, which is devoted to purely technical subjects. It might be well to state that never before has our college been so well prepared to teach students in the science of agriculture than at the present time. Dean Sheppard and his corps of able assistants are making their department what it by right should be-the strongest in the college.

OUR NEW INSTRUCTORS.

As we come back to college this fall, we notice with sorrow the absence of several of our former instructors and assistants. Professor Lindsey has accepted a position in a High School in New York City. Professor Manns has accepted a government position in the Philippines, and Mr. Norton and Mr. Schollander have also left for new fields of activity. But, however much we miss them, it is still a source of gratification to know that their places have been filled with men possessing the very highest qualifications for the work expected of them.

Archibald E. Minard of Allston, Mass., assistant professor of English and philosophy, is a native of Nova Scotia, where he spent the first eleven years of his life. He then removed to Boston, Mass., where he spent the next twelve years, and went through the grammar school and the Boston Latin School, one of the soldest, if not the oldest, institution of its kind in the United States. In 1898 he entered Yale, and in 1901 graduated from that institution with the degree A. B. During his senior year he specialized in philosophy, and the next year received the degree A. M. He then took two years' work at the post-graduate department of the Chicago University. Being a fluent and convincing speaker, he possesses excellent qualifications for training orators, and during the next year will employ part of his time in teaching the seniors and juniors what little they do not already know of the art of Demosthenes.

Fred J. Pritchard, who fills the position formerly occupied by Professor Manns, is a citizen of the West, claiming Iowa as his native state. He received his preliminary training at the Woodbine (Iowa) High School, and after graduating from there took a course in the Omaha Commercial College. While completing this course, he spent four summers doing general office work in the office of the Burlington Railroad in Omaha. In the spring of 1904 he graduated from the University of Nebraska with the degree B. S. His course was general agriculture with botany as a specialty. He also acted as assistant at the University of Nebraska Experiment Station, and his experience while there will make him a valuable assistant to Professor Bolley. He is an athlete of some repute, having been a member of the Nebraska football squad, and daily dons a suit to help build up the defense of the A. C. football team.

Clifford D. Holly, assistant chemist, was born in Farmington, Me., the state of pure food and prohibition. He graduated from the State Normal School in Farmington in 1896, and at once entered the chemical course of the University of Maine, from whence he graduated with special honors in 1900, receiving the degree B. S. During 1901 he acted as chemist at the Maine Experiment Station, and in 1902 received the degree M. S. for post-graduate work at the univer-In 1903 he was manufacturing sity. chemist for the Dr. Hand Phosphated Condensed Milk Co. of Scranton, Pa. During 1903-04 he took post-graduate work at the University of Michigan. This year he will assist Professor Ladd in preserving the health of the people of North Dakota.

Athletic Department.

A. C. 0, Alumni 5.

The A. C. opened the football season Saturday, Oct. S, at Broadway Park, with Fargo High School Alumni, and, sad to relate, were defeated after a fiercely contested game. The teams were very evenly matched, and had it not been for a costly fumble by the A. C. the score would doubtlessly have been 0 to 0.

FIRST HALF.

. Nelson of the A. C. kicked off at 3:55 to Alumni 5-yard line. The Alumni made their first down, and the next try made a gain of 20 yards by an end run. By gains of 4-5 yards the steadily carried the ball to the A. C. 35-yard line. Repeated gains by Corbett, and a 10-yard gain by Anderson, carried the ball to the A. C. 7-yard line, and a touchdown seemed imminent. But here the farmers braced, and two trials at the line netted but two yards. Alumni were held for By line-plays by Dynes and downs. Fowler, the A. C. carried the ball to the 55-yard line where they were forced to punt. Corbett caught the ball on Alumni 50-yard line and was downed. After a few plays the Alumni was penalized and held for downs.

Time called, 4:18.

SECOND HALF:

Alumni kicked off at 4:30 to A. C. 25-yard line. Ball was returned 10 yards. On a fumble the Alumni secured the ball on A. C. 37-yard line and after eight minutes of play pushed Anderson over for a touchdown. Failed to kick goal.

Alumni kicked off to A. C. 10-yard line and ball was returned 5 yards. A. C. held for downs. Alumni made first down but on a fumble A. C. got the ball. A. C. were tackled for a loss. A second attempt produced no gain and we were forced to punt. Alumni were held for downs when time was called. The Alumni stars were Corbett, Anderson and Turner. For the A. C. team all the men did good work, considering their lack of experience. The line held well, but the ends were outclassed by their heavier and more experienced opponents. The game will, however, be valuable in showing where the men are weak, and giving an opportunity for strengthening these weak spots.

Officials: Referee, Fowler; umpire, Stout; linesman, McGuigan; time-keepers, Pritchard and Nesbit.

The A. C. football schedule has not all been arranged yet, but will, as far as arranged, be as follows:

Oct. 8-F. H. S. Alumni, at Fargo.

Oct. 12-Fargo College, at Fargo.

Oct. 15-St. Cloud Normal, at Fargo.

Oct. 19-Probably Fargo High School, at Fargo.

Oct. 22-R. R. V. U., at Fargo.

Oct. 29—Probably Valley City Normal, at Fargo.

Nov. 5-Superior or Macalester, at Fargo.

Nov. 9-R. R. V. U., at Wahpeton.

Nov. 11—Probably Hamline U., at Hamline.

Nov. 16-Probably Fargo College, championship game.

Nov. 19-Probably Carleton.

Nov. 24-S. D. A. C. at Mitchell.

Student's, let us introduce to you our new coach, Mr. Marshall.

Mr. Marshall was a member of the University of Wisconsin first team for two years before coming here, during which time he played in the position of halfback and quarterback respectively.

He is duly qualified to teach you Wisconsin tactics, which for the past two years have spelled "victory" for our own football eleven.

Of last year's football men but two were here to greet Mr. Marshall upon his arrival, and the outlook was anything but promising.

New material, and some of the old men, have been slowly coming in until now we have material which bids fair to make a strong team.

However, fellow students, let us remember that our coach, the Athletic Association and the team needs our most ardent support for "United we stand, divided we fall."

Since there are, at present, no intercollegiate league relations between the colleges of the state governing athletic matters, we think it proper to make a statement of the position that the A. C. takes.

Last year matters governing athletic contests were thoroughly reorganized, and rules were adopted conjointly by the faculty and Athletic Association of the Agricultural College to govern the eligibility of individuals and teams.

The sum and substance of some of these rules is as follows:

First. The minimum of requirement shall be two full subjects or its equivalent, and a maintenance of the regular required class standing, as reported at the weekly faculty meetings. Second. In each term of previous attendance at the institution the student must have two full credits.

It is further specified by the rules that no instructor or official of an institution can be fecognized as a student.

And, further, that in case an athlete of one or more years' standing in one of the colleges of the state should change institutions, it will be necessary for him to show one full term's class standing in his present institution before he can be recognized upon a team in contest with the Agricultural College team.

The Agricultural College management also holds that four years or seasons of play in any football team or teams of the colleges of the state shall constitute the limit of amateurism in that sport. And until such time as a properly organized inter-collegiate league is formed in the state, the A. C. management is scheduling games with such teams of the colleges of the state as can meet the requirements of the foregoing rules.

Two members of the faculty and three student members of the Athletic Association constitute the final board of appeal in all matters of eligibility at the A. C. The football management has therefore decided to require an exchange of eligibles for each game, at least one week previous to the date of the contest.

OUR EXCHANGE TABLE.

We are aware that the current school year has but just begun in most of the institutions throughout our land, and, therefore, with this issue of THE SPEC-TRUM no complaint can reasonably be made because scarcely a single college paper or magazine has as yet reached our exchange table. On consulting last year's exchange list we found that it contained the names of a great number of college magazines—many of which represent the leading institutions of our country. To the different editors of those papers—many of whom undoubtedly edit a paper for the first time—THE SPEC-TRUM extends its good will and greeting with the kind request for exchange.

The census embraces seventeen million women. How would you like to be the census?—Ex.

Local Happenings.

Football!

Get into the game!

Are we in it? Well, I guess.

Dig into it, you lumberjacks!

"Salute your superiors!" saith the president.

Mr. Grant is taking up historical geology—occasionally.

The girls are beginning to put in an appearance at college now.

The advanced class in cooking served a Board dinner on Oct. 6.

Roy Cook has been entertaining a fester on his chin the last few days.

Dolve (admiringly)—"These pansies always remind me of basketball girls."

Sloan (before going out to practice)-"Is there a looking glass around here?"

Teresa Fields, a member of the junior class, has entered the university at Madison.

Senior (after the game)—"I never knew I was to push that man out of the way."

W. H. Westergaard, '04, is considering the question of taking up post-graduate work here.

Owing to the late return of some of the local editors this number is a little weak on quality and quantity of locals. We hope to make the local department stronger and more interesting in the future.

The freshman class is groaning under the burden of daily and fortnightly themes.

Every day brings some of the older students back. Harry Slingsby is one of the latest arrivals.

Professor Bolley—"Our football stock is down just now, but people like it better down than up."

Miss Mary Hill, a prominent member of the senior class, has entered the Northwestern to complete her course.

Fred Hegge, who had to leave last fall on account of sickness, has returned to take up the work with his class.

There is joy among the footballists over the return of Drum Major Swenson, center of last year's second team.

Dr. Batt (in French)—"Can anyone give me a definition for 'devant?""

Miss T. (eagerly)—"Doesn't it mean sofa?"

The girls are organizing a basketball team now-a-days. They want as many teams as they can get so as to enable the first team to have plenty of practice.

Saturday evening, Oct. 8, a social was given in Francis Hall for the benefit of the Athletic Association. About thirty couples enjoyed four hours of games and merriment. The program consisted of progressive games, refreshments and dancing. The head prize was won by Miss Grace Lofthouse, the foot prize by Elmer May. It was the first social affair of the season, and afforded a splendid opportunity for the young people to get acquainted.

Sept. 29, 1904, was a red letter day. A sudden thaw struck the institution. We got steam from our new heating plant.

Hammond Greene, popularly known as "Cupid," has entered the University of Minnesota. All the girls are sorry to miss you, "Ham."

Grace Lofthouse returned to her work at the college the first part of the month, after having spent her vacation visiting friends and relatives in Wisconsin.

Look out for a winning girls' basketball team this winter. They are already practicing hard and will make their opponents go some to keep up the pace.

Ernie Schollander was a visitor at the college the first part of the month. Ernie reports everything lovely out on the farm. Grain threshed, plowing in progress.

Captain Ulio's Home Guards will soon be in position to take care of any labor strikes or other disturbance that may occur in the vicinity. They are at present occupied in punching holes in the atmosphere around the target butt.

The Edith Hill Girls' Club elected officers at their meeting on Wednesday, Sept. 28. Ruth Ash was elected president; Laura Ueland, vice president; Emily May, treasurer, and Clara Kirk, secretary. The girls intend to have some jolly times at their fortnightly meetings, and all girls are invited to come along and get acquainted. At the first meeting they greatly enjoyed being allowed to embroider patches on the knees of the football boys' pants; later, they made a number of fluffy yellow chrysanthemums with which to be patriotic at the season's games.

The domestic science classes are increasing in size. Miss Reid has twentyfive in her cooking classes, while Miss Nichols' pupils in sewing number over twenty.

Prof. in Logic—''Now, Mr. Lockerby, you have been here three or four days. Have you got hold of anything?''

Mr. L.—"Yes, but I don't know what you want me to say."

Mr. Dolve has returned, much to the delight of the Seniors, who for a time feared that fair Northwestern, or rather, the Northwestern fair would prove to much of an attraction for him.

The girls are contemplating the organization of an Athletic Association along the same lines as the boys' Athletic Association, to have charge of girls' athletics and physical culture.

Young boy at gymnasium—"I want to get a ball."

Worst and Allen (in charge)—""Want to get a ball! You don't go to school here."

Little Boy-"'No, but Miss Wilson, the drawing teacher, is my sister."

W. and A.—''Sure, little fellow, you can have whatever you want. Why didn't you tell us so half an hour ago?''

Now is the time to get a rooters' club organized to root for our team at the football games. In former years our rooters, especially the girls, have won half of the games for us. Shall we be less patriotic because we have this year a raw team, or shall we show them that we are proud of them, even if they do not win every game? It has always been a source of unfavorable comment that our college spirit has not approached anywhere near to that of other institutions. There have been individual attempts now and then to rouse it, but no success has been attained. Why not make a good beginning now? Let us all go to the games and yell in concert instead of each one singing a little solo on his own hook when things go our way and keeping as still as an owl when things go against us.

The latest order issued by the military department is that when a student meets a professor he must salute. If you meet a lady professor, tip your hat with your right hand, salute with your left and if she makes a motion as if to shake hands, hold your hat between your teeth and present arms.

Wise "Freshy" taking Soph. Zoo.---"Amœba is spelled A-m-æ-b-a."

Sophomore-"'No 'Freshy,' the dipthong is œ.''

Freshy—"'I guess not, there is no œ dipthong in the Latin language. I ought to know, for I have already had three lessons in Latin."

Dr. Hult's "kindergarten" class is progressing nicely and will soon be able to speak plain English. It is confidently expected that before another month has gone by it will be possible to put them in long pants.

A young lady was heard to remark the other day that there was no longer any need of her remaining single when there were so many handsome young professors in the faculty.

Hulberg and Dolve are still on the lookout for a steady company for the coming year. Girls, wake up! You can't get a senior every day.

What's the matter with the literary societies? Wake up, folks, and get busy. Now is the time to get ready for the declamation and oratorical contests. The literary societies are not the least important of your work while at college. Dr. Hult is prepared to give full recognition to any English work that you do in the societies. Any oration delivered before the literary society will receive a credit the same as if it had been delivered in public. Five years ago the societies were more wide awake than they are now. What is the trouble? Are cur students losing their literary ability and patriotism, or have we a less intellectual lot of young Americans on our hands?

This year's chapel exercises are beginning finely. Monday, Sept. 25, the students enjoyed a most interesting talk on "Why I Like My Christian Faith," by Dean Burleson. The dean is a most entertaining and instructive speaker and all were very attentive and interested. At the next convocation, Dr. Hult read a most edifying essay on "An Obsolescent Art." He certainly made an impression on many of the students who will probably pay more attention to their choice of reading matter in the future.

Prof. in Latin-"'Mr. F., you may translate this sentence, 'Agricol est filia.' "

Mr: F. (after some hesitation)—""The farmer is—a—a—daughter."

"Did you stop him?"

D.—"Yes, he put his finger in my eye, and I closed the lid on him."

An Older Classman—"'It gives me a pain to see the number of 'knee-panters' there are here."

The band boys report a very enjoyable trip to Mandan, where they furnished the music at the fair.

Prof. Waldron (in Zoology)—"Give the characteristics of a fish."

Senior-"A fish is a cold blooded ani-

mal which breathes with a two-lobed heart.'"

Have you noticed Professor Minard's evil eye? He has it set on his desk to keep the Prep. rhetoric class in fear and trembling.

Mr. S. (in English)-"'Ye-es, sir!"

There are many changes for the better, but Emily still has the Worst man at the college.

Coach Marshall is doing fine work with the boys, considering the material he has got to work with.

H.-" 'Oh, where is Sopha!"

WIT AND HUMOR.

Sambo—''I'se an oculist in er hotel.'' Rastus—''You doan mean it?''

Sambo—''Yes, I cut de eyes out of de potatoes.''—Ex.

"Evolution," quoth the monkey, "Makes all mankind our kin;

There's no chance about it,

Tails we lose and heads we win." -Ex.

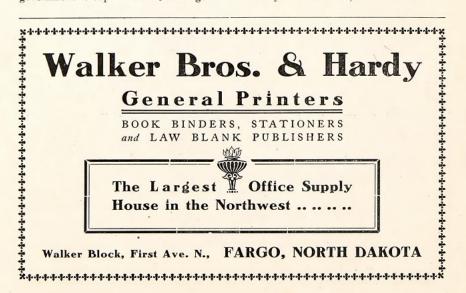
Another battle in Uraguay between the government troops and the insurgents. Problem—Given a president, a gold laced uniform and a South American republic, find the number of revolutions per minute.

"I wish," he said, "you could make pies like mother used to make."

"And I," said she, "wish that you could make the dough like pa used to make."—Ex.

Freshman Girl-"How do you get your hair up so nicely?"

Lofty Senior-"'Oh, rats!"-Ex.



Musical Department.

The department of music opens the new year with an encouraging outlook. The backward season on the farms has kept a number of the members of the band from entering college, yet many of the old members are back and some new ones. The band numbers twenty at present, fifteen enrolled as students and five taking band work who will enroll in a week or so.

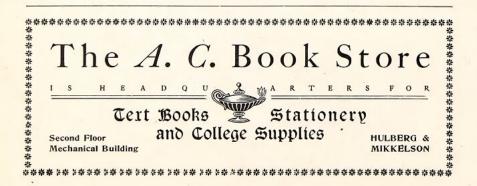
The Cadet Band, augmented to twentyfive pieces, furnished the music for the State Fair at Mandan this year. The delayed appearance of some of the old members made the proper filling of the instrumentation a difficult task, yet, with some help from down town, Casselton and Kindred, a strong band was taken on the trip. The band left the eity Sept. 26, and returned Oct. 1, having played three days at Mandan and a concert at Valley City. The boys had an enjoyable trip and made a decided hit whenever they played.

At the Valley City concert the audience was not large, but was enthusiastic. Each number was heartily encored, and the boys, although tired and with sore lips, were willing to respond to each call, and played with a snap and phrasing that was the wonder of musicians in the audience. Mrs. Burnam and Mrs. Wheeler assisted in the concert and were warmly greeted. The young cornet and trombone soloists, P. M. Rudd and W. G. Allen, made distinctive hits, and were compelled to respond to hearty encores. The entire trip was a great musical success, and a decided advertisement for the coflege.

It is with regret that we announce the fact that Miss Carter cannot return to her A. C. teaching this year. Her place as piano instructor has been filled by engaging Professor T. O. Arsenault, a young man of several years' experience as a teacher and well qualified for the position.

Dr. Putnam has begun his vocal teaching—having several private pupils. His down-town work is enlarging he having taken the direction of the music at the new Broadway Methodist Church, and organized to direct and manage Putnam's Band of Fargo, a professional band, composed of the best instrumental players in the city.

Professor Nerhaugen has several pupils in violin and mandolin.



A Desperate Effort.

I've hunted high, I've hunted low, I've tramped in weather sloppy, I've read to all my tale of woe: Lord, send me quick some copy.

I have assistants by the score, To me they meekly listen; They promise me much stuff of yore, Alas, it turns up missin'.

The printer says: "Four galleys still I must have ere tomorrow, Or I can not the paper fill."

I bow my head in sorrow.

I've searched my trunk, I've racked my brain, Till pains attack my liver;
I am so weary I would fain Go jump in the Red River.

One eve I had, O, such a dream!

I thought I was in heaven,-An editor's heaven it did seem-

Much copy I was given.

But as my hand I stretched to clasp That Ms. to me quickly,

The printers' devil it did grasp, The sight it turned me sickly.

But, O, my friends, a heaven on earth You quickly here could make me, If you would just relieve my dearth Of stuff, and not forsake me.

And while these lines you've plodded through, And wondered what's the caper,I've neatly turned the trick on you: It's all to fill the paper.



