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VOL. VII. NO.I.



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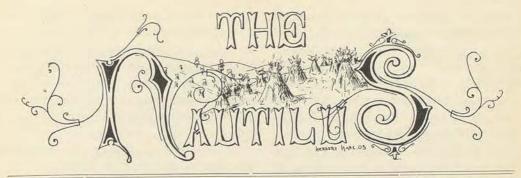
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NOTICE—THE NAUTILUS is published once every two months in the general interest of the Manual Training High School, at Kansas City, Mo.

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THE NAUTILUS,

Manual Training High School,

Kansas City, Mo.

One of the most interesting features of Manual life this year is what is known among the pupils as "the new system."

When the Manual was first started the

recitation periods of the pupils were divided into two parts-A and B dayswhich alternated with each other, placing three A days and two B days in the first week. This changed the next week to two A days and three B days, and so throughout the term. After successfully carrying this arrangement of schoolhours for six years, it has been found necessary to alter the system slightly on account of the increasing demand for manual training in Kansas City. In the new arrangement the main divisions, A and B days, are still retained. These divisions are, however, subdivided into morning and afternoon periods, each of which contains three seventy-minute "hours." The pupil who attends school on the morning of A day, does not report until the afternoon of B day. Another pupil who attends school on the afternoon of A day, is next seen in the class room on the morning of B day. These pupils, then, although they at tend the same school and belong to the same class, are never in the building at the same time. This makes practically two high schools under the same roof, each flourishing and independent of the other. There are many advantages to this new arrangement. The first and greatest is that twice the number of pupils heretofore enrolled may be accom-

modated. Next, it gives us more use of the valuable machinery in the shops per twenty-four hours. And last, it gives the pupil a regular system of studying; that is, he may prepare his lesson which he recites one day in exactly the same time on the day before. For instance, if he has mathematics the first hour, French the second hour, and English the third hour of A day morning, he may prepare these lessons in the same order on B day morning, thus giving him the habit of getting all lessons just twenty-four hours before time to recite them. By this time we think the pupils have gotten into the spirit of the new system, and the few muffled mutterings of discomfort which were at first expressed have dwindled away.

The NAUTILUS would like to say a few words of welcome to those students who have but recently joined us, otherwise known as "freshmen." The freshmen who have entered Manual this year form one of the largest classes that ever entered a high school of this city. There are over seven hundred of them-and all bright youngsters, too. They have already, by closely watching the worthy seniors, accustomed themselves to Manual life. We hope and expect that they will do great deeds before they leave us. And now that the NAUTILUS has been kind enough to notice the freshmen, we hope that the freshmen will be kind enough to notice the NAUTILUS. Contribute articles to be published in it. As you are the largest class in school, we expect the most support from you.

In the midst of the recent vacation we were all saddened by the death of our well-loved schoolmate and friend, Arnold Shawn. We left him at the end of the last school year strong, smiling, and healthy. One short month later we learned of his death. He was the friend of everyone when he was with us. Everyone grieves for him now that he is gone. He has left behind him in our school a community that will never cease to cherish his memory.

We have a new addition to our school this year in the form of a library. We now do not have to journey to Ninth and Locust streets to obtain data for this or that essay. We need simply to go to our own library on the third floor of our own building, obtain the book we wish, step into the reading-room, and devour the sought-for knowledge at our leisure. We hope to see this library grow and thrive, as it is undoubtedly a helpful feature of our school.

THE FRIDAY MORNING PROGRAMS.

One of the most pleasant features in the past school life has been the Friday morning programs, and they give every promise of being the same this year.

The first program of the year was given on September 25, and was very enjoyable. The first number was a piano solo, given by Miss Gertrude Concanon, who is a friend of our school. She has played for us before and is always welcome. Miss Concanon leaves shortly for Germany to study with Madame Careno. A most interesting stereopticon lecture was also given by Mr. J. M. Hansen on what the Associated Charity workers are doing in Kansas City.

The second program was on October 2, and consisted first of a very pretty piano solo "Variation of La Rose," by little Miss Jessie Norris, and an address by the Honorable L. C. Boyle. The address was a bright, stimulating talk, suggesting how to make the best use of one's educational opportunities.

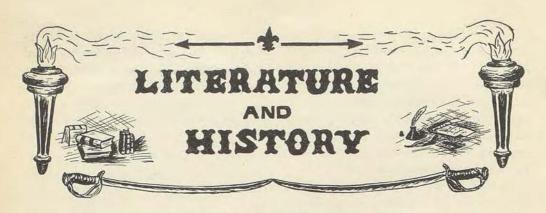
Friday, October 16, witnessed a most profitable exhibition by Professor Y. P. Rothwell. It consisted of physical culture exercises, showing how to use athletics as a means and not an end for strengthening the body and correcting physical defects. An odd feature of the morning was the use of the phonograph for the musical accompaniment.

On October 23 the program was under the auspices of Professor Frank Steele, assisted by some of the best talent among the professional vocalists in Kansas City. Miss Edith Pell sang "Wishes," by Sans Souci; Miss Alice Onelt, "Summer Rain," Willeby; Miss Estelle, "If I Were a Rose," Messeburg. Mr. Frank Steele gave two numbers, "Violets," Nendeburg, and "I Love Thee," Dene; Miss Callie Clark, "The Thought of You," Dundee; Miss Pearl Downing, "Gypsey's Bolero," Aridite; Miss Pell and Mr. Steel, duo, Donzetti.

The entire program delighted the enthusiastic audience and reflected great credit on Mr. Steele as a vocal trainer. His own solos and the "Duo" with Miss Pell were rendered in a very finished manner. A cordial vote of thanks was extended to all who kindly assisted.

When we next assembled in the Auditorium on October 30 we were much pleased to have our friend and teacher, Mr. A. J. Burr, entertain us with an enjoyable cornet solo, "The Lost Chord." A most delightful address on "Truth" was given by the Rev. Chas. Scarrett, pastor of the Melrose M. E. church. The talk was a surprise to the pupils because the subject seemed so broad and sober. The address was enlivened with humor, anecdotes, common sense and good advice. That the audience was thoroughly charmed by the talk was proven by their enthusiastic vote of thanks.





BUT THEN, THIS OFTEN OCCURS.

I.

"What's the matter with Dick? He's all right! Who's all right? Dick! Who says so? Amhurst!"

An annoyed flush swept over Dick Harding's face and crept to the roots of his curly hair. Football brings its heroes, and Dick towered head and shoulders above his fellow players, a mountain of physical strength.

"What's 'troubling you, Harding?" sang out Harvey, the team's joy, their quarter.

"Hello, Dick," and a tall, stalwart fellow, his senior by six years, strode from the crowd of bystanders. He walked straight to Dick and wrung his hand.

"Fellows," said Dick, "I want you to know my brother, captain of '96." A football player is not without honor in his own eleven. Each player was eager to grasp the fist of this past hero of the gridiron. Each possessed a fierce desire to catch some of his swing and to bask in the glance of his critical approval.

Dick was a trifle late at training-table that evening, and he found his brother busily engaged in relating experiences to a table of intent listeners. As he entered the dining room Dick heard his brother yarning of the times when the heroes of his day displayed their prowess before the fair maidens of Westmore Seminary.

"Oh, yes, I say, Dick," bellowed Harvey, "I believe you are interested in Westmore maidens, too. Am I mistaken?"

"Aw, come off, Harvey; don't bawl me out that way before my own brother; the folks will be sending me into the jungles, first thing you know. But, say, fellows, she'll be there tomorrow, and, by Jove, we've got to win."

"Well, old man, I'm your friend, you know," spoke out Simpson, the center; "but keep your eye on Bentleigh. He's a deacon-to-be, but then 'there's many a lurch 'twixt the school and the church,' you know. Any way, he thinks considerable of a certain senior at Westmore. I'll confess he's got the 'right idea' all right." But then Simpson was always giving advice and warnings are cheap.

The talk drifted not far from football. The coach explained to Harding's brother his difficulty in getting the line-up to its present condition, spoke volubly on its strength and deplored its vulnerable part. The simple fare of the training-table was devoured with avidity till Steele, the right tackle, moved to "cut out" the "hot air" and give the "scrubs" time to clean up.

II.

The black and orange of Amhurst had not been lowered to the crimson and blue of Biltmore for many years. Biltmore was a theological school, and her stalwart apostles had fought hard for years against the worldly sons of Amhurst. The eleven of '96, under Dick's brother, had been the first to bring the laurels of victory into the camp of the Philistines. And now he was down here, determined that for anything he could do, Dick's eleven should not be the first to lose them.

Now Westmore did not play football, except within the sacred precincts of her "gymn," for Westmore was a girl's seminary. As usual in such cases, Westmore played an important part in the great turkey day game between Biltmore and Amhurst. Success was doubly crowned, for Westmore smiled on the boys who won, and Amhurst loved those smiles; so did Biltmore.

As may be supposed, the smiles of some of the Westmore girls were prized more highly by some than the smiles of the others. Ethel Dillon, a short, jolly brunette from Georgia, her musical laughter seeming but the echoes of some rippling brook on the sunny slopes of her native land, was particularly attractive to two certain young men. Such a thing often occurs. It has always occurred with more or less frequency and, indeed, it may happen again.

Now fate was most mischievous. This also frequently occurs. She had placed Howard Bentleigh, the only son of a conscientious and wealthy father, with questionable religious tendencies, in the theological seminary. Dick Harding, dashing, jolly and twenty-two, poor yet with excellent prospects, she had dropped in the jovial halls of Amhurst to study law. "So spin the fates."

"Why, you silly boys, of course I will be there," Ethel had told them the Sunday before. "What would possess me to stay away? What are football games for if not for the girls to watch? As for anything else, well—we will see who wins," and with a wholly delightful bow, she left the piazza.

The two gladiators sat as if stunned. This was a revelation. Had the other fellow said it? Each was conscious of a fear that the other had spoken first. Why had she told it this way? But then she was a girl, and girls are—well, they sometimes do not do what you think they will. This, too, had often happened. They rose and went down the steps. A sudden hatred waxed warm within them. The great game was a thing of weight.

III.

Certainly our forefathers little dreamed, when they humbly thanked the Omnipotent One for His manifold blessings, of the magnitude of the latter day celebration. To Biltmore and Amhurst the least consideration of Thanksgiving was the sumptuous feast. Harding and Bentleigh forgot it entirely. However, even we Epicureans can scarcely blame them.

Thanksgiving was ushered in by the glorious orb, attended by the brilliant hues and tints of Aurora's autumnal splendor. We might call this Thanksgiving Day a perfect day. Such days should always be perfect. 'Tis contrary to human nature to be thankful for a gloomy day. To Harding and Bentleigh this day was especially propitious.

In carriages and tally-hos came the crowd from Westmore. Each girl wore her favored one's token, and each girl looked her prettiest for his sake. This often happens. They were a choice load of blossoms from a conservatory,

and the resplendent colors rivaled the sunset.

Yes, she was there. What a disappointment it would have been had she not been there! What a picture, clothed in a natty blue suit, dainty, sweet, entirely lovely! Harding and Bentleigh, play your best. The immortal gods would play for such a prize, and then fall short of deserving it.

Grave professors, expectant children, giggling girls—this often happens among girls—foghorn groups of howling boys; what an assemblage! Did ever Roman Spartacus stand before such a throng? Did ever conquered gladiator bend the knee before such an audience? Surely, never to receive such a reward.

IV.

Boomalack! Boomalack! Rah! Rah!

Watch us make that record score!
Rip, Rah, Ree! Who are we! Biltmore!

Crash and din from the deacons was answered by din and crash as roared forth the war cry of the prodigals.

Sis-boom-ah! Rah! Rah! Football! Football! We are first! Lip, Lap, Long! Amhurst!

"Watch him! Oh, that's great! Rah! Rah! Nice work! Look at the rascals—ten yards! Amhurst! Rah! Rah!" So sang a white-haired judge, who, twenty years before, had sat there and yelled his youthful lungs sore, and for just such a game as this.

The wedge of Amhurst tore through the ministerial defense and carried the ball twenty yards to a "down." They were at it again; they tugged and pushed, piled up and got down. Surging and squirming, rising and falling, they writhed over the gridiron, a heterogeneous mass of legs, yells, leather, and canvas. No one breathed; they were up; some one was dashing madly across the field; the 'levens strung out after him as fox hounds on the chase. He distanced them, stumbled over the line and Amhurst had scored.

Control was entirely lost. Old men and young boys threw hats into the air in joyous abandonment. Dick was lifted to the shoulders of the players and carried across the field to be paraded before the admiring grandstand. She was there and saw him. And, strange to relate, in that vast concourse he saw her, and his colors were on her jacket. Bentleigh saw this, too, and cursed, shocking to tell, the most unoffending waterboy-boy. But then such things come in the regular wages of water-boys, so he did not complain—a most wise course to pursue.

V.

With grim determination Biltmore gritted its teeth for the last half, hoping at least to match Amhurst's early score. Line men and umpires, time-keepers and water-boys were tense with excitement. A whistle sounded, a few numbers cracked forth from a husky throat and like avalanches the teams were upon each other. For a moment they tugged and strained, then with fearful impetus, Amhurst tore through the preachers' line and advanced the ball ten yards to a "down." Higher and higher rose the pile of humanity—but, then, this often occurs on a football field.

Gradually the integral parts of this mortal pyramid disengaged themselves and stood upright. Halves, fullbacks, quarters, tackles, then came Bentleigh and then Dick—but he did not rise. Prone he lay upon the sward, six feet two of elegant manhood. Water-boys hurried to the spot and poured their bottles on his hands and face, surgeons hastened to his

side, and the bleachers rose to its feet and waited hushed.

Gently they lifted him up. Yes, they were gentle on the football field. They carried him to the club house, and the game proceeded, a much inferior "sub" taking his place. Football waits for no man. But in that vast audience there was one who, when Dick did not rise, was choked with pain. Ethel Dillon had wakened to herself.

Now Sammy was the water-boy, and Sammy adored Miss Ethel. For did not his mother cook at the Dormitory, and had not this beloved Miss Ethel given him candy and nickels? And why shouldn't he love Miss Ethel? This had often been done before. He hurried back to the water-barrel in his eager desire to be back at the "line" and to miss nothing; but as he passed the hushed grandstand a sweet voice called "Sammy, Sammv." Miss Ethel was calling, and even football lost its charms in comparison with Miss Ethel. Now Sammy was not alone in this opinion.

She had forgotten her nearness to the other girls as she grasped Sammy and gasped the question, "Sammy, tell me, is Mr. Dick killed?" But she is to be pardoned. A desire to see Amhurst win was her only motive. That was certainly all.

"Naw," replied the flattered Sammy, "he aint killed. He ain't got nothing the matter with him 'cept his collar bone's busted. But, say, ain't it great? Gee, I hope we wins." To Sammy Dick's injury was only the necessary, although unpleasant, means to the desired end, and that end was Amhurst's victory. But his prattle was cut short by his eager questioner.

"Tell me, Sammy, how did Mr. Dick get hurt?" Not content to know how much, she must know how he was hurt. Ah! Bentleigh, a woman may always claim the right to change her mind. This has occurred once or twice before.

"Aw, he just got in the mix up and somebody stepped on him, I reckon. Golly, them fellers has busted our line—five yards—gee, I wish Mr. Dick was there. The umpire gived um five minutes' time out and then they went along wid the game. Gee, look at that; they're just tearin' it up," and over the field there boomed the Boomalack! Rah! Rah! of Biltmore. Biltmore had scored a touchdown and the half was not over yet.

"But, Sammy," persisted Ethel, "who threw Mr. Dick?"

"It's that old Benty, we kids calls him. I don't know his name. He's that tall fellow what I see some times at the 'dermitery' with you." Sammy never knew why Miss Ethel's face grew red just then. He adored her no matter what color her face was. "I don't care," he continued, "he ain't white, he ain't. He just cussed me awful—'scuse me—I mean he—he—he—he said some mighty mean things 'bout thet 'ere Mr. Dick."

"Sammy, Sammy, what did he say?" For the moment Sammy was lost in the intricacies of an end play which seemed to demoralize Amhurst's line and Biltmore gained ten yards, and the question had to be repeated.

He thought it queer that Miss Ethel should care so much about it, but she had asked him and all he knew was freely hers.

"Aw, he just said he guessed he'd see who get her. Amhurst would get licked if he had to kill that Mr. Dick to do it." Blushing, Sammy continued: "He didn't say it just that 'ere way, but it's about as near as I can tell you. But say, I got ter go, cause they will be a wanting some—".

"Wait a minute, Sammy," and as a detaining agent she gave him a bag of chocolates. Now, boys like chocolates and the effect was all that could be desired. She tore the ribbons from her coat and presently pulled Sammy's ear down, whispered something to him, put the ribbons in his hand and Sammy, his face wreathed in expectancy, was gone.

Some minutes later, Dick, reclining in the club house, heard the rasping strains of "Boomalack! Rah! Rah! Biltmore!" float over from the stand. A boy whose face was red and whose lips bore the unmistakable signs of chocolate creams handed him a bunch of orange and black. Nervously Dick unrolled the bunch, and on the orange he read:

"All is *not* fair in love and war."

And Dick understood. But then this often happens.

ALFRED WAGNER, '04.

JEAN VAL JEAN, HERO.

A preacher has said that Hugo modeled Jean Val Jean after the likeness of Christ. In a placing of poverty, degradation, and misery there stands forth this man "clothed with every courage, every heroism, and every virtue, being of goodness all compact."

Jean Val Jean is a poor working boy, an orphan, and is brought up by a widowed sister. For ten years he struggles for her and her little ones, against hunger, cold, and misery, but "despair is surrounded by fragile walls, which all open into vice or crime." One night he breaks a pane of glass in the baker's window, and steals a loaf of bread to carry home to the starving children.

He is tried for burglary and condemned to five years in the galleys. For four years he remains there, then comes his chance to escape. Recaptured, only to escape twice again and be twice again brought back, his sentence is increased, until at the end of nineteen years, he who had entered the galleys sobbing and shuddering, comes out hardened and sullen, with only a yellow passport in his hand, and a bitter hatred of mankind in his heart. Who can tell what he silently suffered in that time, what hours of soulconflict he passed?

But release does not mean freedom, for nowhere can he enter. The vellow passport is as a flaming banner, proclaiming him "a dangerous man." At last he finds welcome in the house of a man of God, but in the early morning hours his hatred, bitter as gall, returns, and seizing a case of silver, he flees. While escaping, he passes a child, who, in dismay, drops a two-franc piece. Quickly Jean Val Jean places his foot upon the money and, unheeding the little one's cries, threatens him until he runs away, breathless and sobbing. Why had he done this thing? He does not know, but suddenly his soul feels a great struggle and he falls to his knees, weeping. After remaining thus for many hours, he turns his face toward the bishop's door, resolved to be again a man. "A conscience long dormant is now become regnant."

Having discovered a way of making jet, Jean Val Jean soon accumulates great wealth. Philanthropy is native to him, and for eight years he lives in happiness, showing gentleness to the helpless, sympathy to the suffering, and

justice to the lowly. Then one morning he hears that Jean Val Jean, former galley slave, has been found and arraigned for stealing. "Suddenly the thought of allowing an innocent man to be condemned in his stead, stands forth a low and hideous crime." With tempest in his brain and terror in his heart, he argues, in his agony, with himself. During that twenty-four hours his hair turns white as snow. He receives "the cup of pain," but his is "the all sufficing mightiness of conscience" and the battle is not lost.

There cannot be in literature a grander passage than the one wherein, divine, majestic, transformed, the convict stands before the judge's bench, and in a voice thrilling, but lamentable, cries, "Release the accused. I am Jean Val Jean." For greater love can no man show than this, that he lay down his life for his enemies. And next Javert, fierce, brutal, impervious seizes him, and he is put in the galleys for life. One day a sailor, trying to furl a sail, is caught by a rope, in midair, and hangs where death seems certain. But Jean Val Jean's is a bravery that never falters, and quickly he springs to the rescue; but even while the throng below shouts applause he has leaped into the river and gained his liberty.

Because of his promise to the poor, dying mother, Jean Val Jean now adopts a little girl of eight, Cosette. His heart is hungry, and never having known any love, he lavishes on her the affections of a heart full to overflowing. For ten years he lives in seclusion, but withal happily, until one day he finds that Cosette loves a poor, young lawyer, Marius. His misery and grief are touchingly pathetic. The sunshine of his life is blotted out, but he hides

his sear from her. And now comes the hour of his supreme greatness. Learning that Marius is wounded and in great peril, this life-teacher, forgetting self, rescues him. For four miles through the oozy quagmire of a sewer, with dangers lurking at every step, he carries the almost lifeless form back to the one he loves. It is martyrdom, but Jean Val Jean, calm, majestic, self-denying, mounts the scaffold without complaint. His code of honor is only "that right is more beautiful than private affection."

The last sacrifice remains. After seeing his daughter married and giving her all his wealth, he reveals to Marius his true life, omitting only the sacrifices, and hides himself in a poor garret. He comes only to the corner each morning, that he may sometimes gaze upon his dear one's face, but how changed he is now; how stooped and aged now! Each day his walk becomes shorter, until one day he is too ill to rise. He can only think, sorowfully, that he will never see Cosette again. But at the last moment Marius learns the truth, learns too late the baseness of his ingratitude, discovers that he who, from circumstantial evidence, he had thought a murderer, is his savior, and with Cosette hastens to the dving man and, weeping, pleads forgiveness, and this hero, "scarred with many wounds, received in noble battles," blesses them with out-stretched hands, says softly, "I see a light," and the two at the bedside fall on their knees, weeping. But the dead white face looks up to heaven, where some angel, mayhap, waits in the starless gloom, to bring this tempest-tossed soul unto its Father.

Julia Simms, '04.



ORIGIN AND OBSERVANCE OF THANKSGIVING DAY.

"The old Thanksgiving—what a power it has to revive the pleasantest reminiscences and recall the brightest scenes of other days in many hearts!"

The custom of setting apart a day or days of thanksgiving is as old as memory itself. To the Israelites it was the "Ingathering" or "Feast of the Tabernacles." It was held in the fall of the year, because then the winter food supply was gleaned. The early Saxons had a celebration at this same time of year, known as "The Harvest Home." The "Cerelia" of the Romans was a similar festival; but it is to England that we owe our love for a day of this kind.

The days of thanksgiving were formerly proclaimed by the church with the special sanction of the sovereign. In Elizabeth's reign it was ordered that no servile labor be performed on such days. Whenever a great victory was won or whenever a royal heir was born to the throne of England the church proclaimed special thanksgiving days. Thus, when the Puritans came to the New World they were imbued with a spirit favorable to public thanksgiving.

As early as 1607 the Popham colonists had a day of Thanksgiving because of their safe arrival into the new country. The day which we consider as being the first American Thanksgiving Day was held in the autumn of 1621, having been proclaimed by Governor Bradford of the colony of Plymouth. Those sturdy Pilgrims, those brave-hearted men and women, had toiled and suffered for one year in a strange, new land until the autumn, when the harvest they gleaned was truly golden. So a day was set apart in which to praise the Creator who had thus sustained that

little band. It was to be a day of feasting as well as of praise, so they called in the Indian chief, Massasoit, and many of his men, to help them enjoy the fruit of their labors.

In the Massachusetts colony the first Thanksgiving Day was held at Boston July 8, 1630, the reason being the same as that of the Popham colonists. The next day of thanksgiving was October 16, 1633. It was proclaimed by the General Assembly, showing the gratitude of the people for a bountiful harvest. Up to 1680 it seems to have been an annual festival. In 1689 nearly all of the colonies kept a day of thanksgiving, because of the accession of William and Mary to the throne of England.

In all the colonies of New England days of Thanksgiving were kept for one reason or another, but the colonies had no one day for the celebration, neither was the autumn festival an annual holiday. Sometimes a day of thanksgiving was proclaimed by the King or Queen, sometimes by the Royal Governor and sometimes by the Home Board of Trade. During the American Revolution it became a national holiday, proclaimed by Congress. But after this it ceased to be national until Washington, as first president, first proclaimed Thursday, November 26, 1789, to be kept by the people of the United States as Thanksgiving Day. At first there was opposition against this measure. but after a short time the people sensibly gave in. It was not until 1858 that the eight Southern states, who had so long opposed this Yankee notion, joined their Northern brothers in celebrating it. Since then, as a nation we have all stood together

under the same constitution, holding as sacred the same Thanksgiving Day.

In the time of the Puritans the term, "Thanksgiving Day," meant exactly what it says-a day of praise and giving thanks. They went to church in the morning and listened to a sermon as many hours long as the minister had wisdom to make it. Then it was that the good elder gave the people spiritual food sufficient to last them a twelvemonth. He freed his mind on politics and philosophy as he never did at other times. After reading several psalms in unison, with thankful hearts they journeved homeward. Of course, they had their sport and merrymaking, such as hunting and shooting at the mark, not to mention the dinner that awaited them after their long tramp through the snow; but on the whole, the day was a sacred one to them. In even the richest of families it was the Puritan mother who prepared the feast which made the table groan beneath its load of wild turkey and quince tarts, the latter taking the place of mince pie. It was she who turned that precious fowl as it lay on the spit before the fire-place. It was the father who brought the bird as a prize of the hunt. The word "cook" as applied to a servant, and the word "gas range" were not found in their vocabularies, but nevertheless many of those same old Thanksgiving dinners have found their

way into verse, though long ago digested.

Today the sturdy urchin who hears Thanksgiving Day mentioned thinks of the "great big turkey we're goin' to have," or "that plum pudding," while the fact that he should be grateful for his blessings seldom, if ever, enters his small brain. A word to those wiser than the little children should be sufficient. The thought uppermost in the mind of the athlete is, "Who will win in that football game?" It does seem that we are losing the true Thanksgiving spirit. Yet there are loyal hearts who do keep this day as it should be kept, who keep it in the good, old Puritan way. As the centuries have passed and as new ones will come and go we will need more than ever this blessing:

"Oh, grandsire! Wheresoe'er you be, reach out and bless me here;

Teach me the simple, kindly ways that gave your life its cheer;

Teach me contentment,—'tis the art that most of us have lost,—

And, losing it, we've sadly learned that we must pay the cost;

Teach me the gratitude that feels His way is ever best;

That goodly deeds are more than gold, and love the final test;

So may I feel and humbly speak, as best a wanderer may,

The thanks that are no formal words, upon Thanksgiving Day."

> —From "The Success." Susie Rackerby, '04.



MY FIRST THANKSGIVING.

It was a very busy time at our house. In fact, it was a busy season for the neighborhood. Pa had been away from home for whole weeks together several times that summer and autumn. and Pat Handsome had been coming to see me every day, and they complained of the same dissipation on the part of their pa. They said, "Pa has been riding round makin' speeches for two months already." Their Ma was cross and nervous a great part of the time; perhaps that was why they visited me so often. Ma was always cheerful and Pa had so much company that I never felt like being away from home. Pa and his company always talked about gold and silver and sixteen to one, and many more things that I could not understand, but I could repeat them to the boys and make them sound big.

The campaign was over now (I heard the big folks say), and everybody called Pa "Judge," and the hired men called me "Judge," but I don't know why. I hated the name. It always made me think of a big, ugly, old fat man with grisly whiskers whom Pa called "Judge," who made a frightful face at me, threatened to cut my ears off or feed me to his namy goat every time Pa took me to the court house.

Well, on this particular day everybody got up early at our house but myself; because breakfast was over when I came down. I heard Ma say, "This is Thanksgiving Day and Pa is going to have Mr. Handsome, the sheriff, and perhaps the rest of the county officers here for dinner." And she was giving orders to the help like the man in the blue uniform gave orders to his men at the Democrat rally. I had to

fix my own breakfast and then be hurried away from it to clean up the front yard, because "Pa would have company to dinner." "The county officers," Ma called them, and that filled me with a feeling of reverence and awe, for I did not know what county officers were then.

Ma sent Dick (that was our stable-boy) to kill six of the finest turkeys in the barnvard and cautioned him that they should all be of this year's brood. I could not bear the thought of seeing those fine, young gobblers killed; they seemed so happy now with their new accomplishmentsthey had recently learned to strut and gobble. So I promised Dick the loan of my repeating Winchester to go hunting with that afternoon if he would let me point out the turkeys that he should kill. He agreed and straightway killed five of the old gobblers (which Pa intended to get rid of at the shooting match) and Grover, which was sister's pet gobbler, and I hated him because he seemed to be first in sister's affection, except—oh! Ma said I mustn't talk about him.

It was now about the time of day for Mike and Pat to be getting over, and they were on time, and as I did not feel comfortable about the house we went down to the stock vard behind the orchard by the corral to play. We made us a den between two fodder ricks, and covered it over with fodder just even with the tops of the ricks. As the day was cloudy and damp and chilly, we naturally thought we must have a fire in the den, so we converted an old tin boiler and a piece of stove pipe into a fire-place before the den door and had a cheery fire going in a very short time. Mike then suggested that we have a Thanksgiving dinner of our own preparation. He said, "Ma's second cousin's step-son is a cow boy and he told me how to roast fish and rabbit and prepare all kinds of good things to eat by the camp-fire." So we went to the house to get my gun.

As we went through the orchard we saw five big turkeys and one little one hanging up behind the smoke-house, their bare skins looking spectral like in the gloominess. I knew the little one was Grover, and he seemed even in death to hold up his head and droop his wings in a graceful yet reproachful manner. looked so pitiful hanging there without any feathers to protect him from that wintry blast and the bits of snow that were flying through the air that I felt guilty for having let Dick kill him; so I climbed up and took him down. He was almost frozen stiff. Then I thought what a precious fowl he had been (and might be yet), and I was very sorrowful, and so I laid him in the ash barrel behind the cave.

Dick was gone with the gun and we were about to give up the idea of a feast when Pat said, "We can take that little turkey out of the ash barrel to roast, and old Aunt Hannah (the colored cook) will never miss it." Glancing up at the remaining five turkeys, Mike added "Sure, there is meat enough for the 'off-ceers' of five counties." That sounded reasonable, so I consented and Pat was soon off to the horse pond to prepare the turkey for cooking. I got some cooking utensils and Mike got a sack of apples and turnips from the cave. He also brought along three bottles (for luck, he said). They were filled with something red, which tasted very hot and bitter, and were labeled "sweet cider."

Two hours later the den was filled with the odor of burning turkey and the sound of apples sputtering in the coals. Mike said, "You would better go to the house and eat some dinner; that will throw off suspicion." I did not know what he meant, but as he was the older and very wise (almost as wise as Grandpa) I thought I should better go, and willingly, too, if it would throw off anything, for I was beginning to feel very heavy and oppressed, and I remembered that the preacher said, "Too much fun is not good for little boys."

I got to the kitchen just in time to hear Ma accuse Monroe (our colored boy) of stealing the turkey, and telling him that unless he returned the turkey he should not have a bite of meat for a whole month, and drove him from the house without hearing his defense. He was very downcast about it, so I told him not to worry, Ma was just a little confused, and I would see that he had plenty of meat, and when Aunt Hannah was in the dinning room I carried to him a large piece of turkey. He was delighted, but a few minutes later I found that same piece of turkey on the door step; hoping to get rid of it, I offered it to Matrimony, our dog. He would not eat it, so I buried it, lest some of the folks find it and make a commotion over it and perhaps hang Monroe.

I then, absent mindedly, wandered into the dining room. I don't know why. I suppose because it is fate for a boy to get into the wrong place.

The men, about a dozen of them, all pretended to know me, and they would "chuck" me under the chin or between the ribs and say I was a fine little man, and that they knew I would be governor some day. I thought someone had told them I was to blame for the old turkeys that were a-steaming away on the table before them, ready to be devoured. I wondered how such a wicked boy as I could ever be governor. Then I thought per-

haps they were praising my dishonesty, and that perhaps dishonesty was a very necessary quality in a governor, but, of course, this was only a childish fancy. I have learned better since. But to return to the dinner. They put me upon a box at the corner of the table and after thanks were returned, they all commenced asking me to say a toast. Now I did not know what a toast was, but I knew I must say something. The only thing I could think of was the words I used to hear the country school teacher say when the big scholars did something wrong, and it used to make the whole school laugh, so I said, "What fools these mortals be."

Mr. Handsome asked me which piece of turkey I would have. I replied, "The foot-handle" (Ma taught me that, to avoid the vulgar term "leg"). After a little laughter Ma came to the rescue and I, like everyone else, got a piece of turkey to leave on my plate. I soon commenced to feel a "saddish" sensation around my heart, and then, too, Ma looked so disappointed, and I never could stand to see her look sad, so I slid off the box and quietly sneaked out of the house. I did not stop to breathe or quiet my throbbing heart until I was in the den, where I found Mike and Pat leisurely munching apples.

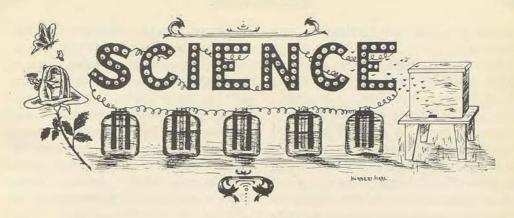
They had dinner ready, so we all sat around the block and I asked Mike to return thanks. He said, "Oh, pard, I can't do it; I never been to Sunday School, but we can take up a collection; that's the way the cowboys do." Then I called on Pat for a toast, and to avoid embarrassment I explained that he must

say "something funny." He told a story which I can not repeat (after three years' study in Manual), but in substance it was this:—A certain man who was very fond of alcoholic drink one cold day, when he had been drinking to keep warm, rushed into the house to a red-hot stove, and the alcohol in him exploded, blowing him into atoms. We laughed, because it was expected, then ate apples, burnt turkey and turnips. And each one emptied his bottle of "sweet cider."

We wrestled and romped until we were quite exhausted. Then I seemingly got lost from Mike and Pat and wandered in a strange land amidst big, fat men with long gray beards, saw row after row of dressed turkeys hanging near my path, and finally met Grover in a lonely part of the woods. I turned and fled, but Grover pursued, flogging me on the head every jump.

In my mad flight I, by happy chance, came upon our den and the welcome sight of the boys, but to my horror and amazement, just as I entered, Pat was blown to pieces in the same manner as was the victim of his story. One of his flying limbs collided with my head, leaving me conscious only of a dreadful pain. I felt a tugging at my trouser leg. I rubbed my eyes, looked up, and there was Pa. He had entered the den through the roof, evidently quite unintentionally. stood there, lantern in hand, sprinkled all over with snow, with one foot in my face and quite bewildered. Matrimony barked furiously. Mike and Pat made a rapid "getaway." I stood up to my meals for the next ten days. W. B. G., '04.





OXYGEN.

Oxygen is a gas that forms about onefifth of the air, eight-ninths of water and about one-half of the earth's crust. While it is so plentiful and surrounds us all the time, we neither see nor smell it.

In its free state oxygen is a non-poisonous, tasteless, odorless, and invisible gas, which is slightly heavier than air. Under high pressure and a low temperature it can be liquified. The point at which it can be converted into a liquid, the critical temperature, is 119 degrees below zero, Centigrade, and its boiling point is 181 degrees below zero, Centigrade.

Oxygen, for experimental purposes, can be obtained by heating certain substances which contain it. Some of these are mercuric oxide, potassium chlorate and manganese dioxide. The best way of preparing oxygen is to heat a mixture composed of equal parts, by weight, of manganese dioxide and potassium chlorate. When potassium chlorate is heated, it is liable to give off its oxygen all at once and explode. The manganese dioxide prevents this and makes the operation much safer.

By experiment it has been shown that oxygen has scarcely any effect on substances at ordinary temperatures. But when the substances are heated to higher temperature and then immersed in oxygen, there is an immediate and a spectacular effect. Iron, no matter to how high a temperature it is heated, will not burn continuously in air, but when heated sufficiently and plunged in oxygen it burns with ease, throwing off a shower of sparks.

An experiment showing the action of oxygen was performed in the presence of the class by the instructor. First oxygen was prepared and collected in jars. Into the oxygen were placed successively some sulphur, some charcoal and some phosphorus, all at ordinary temperatures. The oxygen had no effect on the first two substances and scarcely any on the phosphorus, but when these substances were heated to a higher temperature and immersed in oxygen, there was an immediate action, accompanied by an evolution of light and heat. Iron was also burned in oxygen.

In this experiment it will be noticed that the substances had to be heated before the oxygen had any effect. The temperature to which a substance has to be raised before it will burn in oxygen is called the kindling temperature, and substances that burn are combustible substances.

If it is the oxygen in the air which causes substances to burn, then what is the difference between burning in air and in oxygen? When a substance burns in oxygen or in air, it gives off light and heat, the product formed is the same in each case, and the same quantity of heat is given off. A brighter flame is given off in oxygen than in air, less time is occupied in burning and a higher temperature is reached, though the quantity of heat given off is the same. The reason that substances do not burn in air as readilv as in oxygen is due to the presence of another gas, nitrogen, which does not act upon the substances and which hinders the action of the oxygen.

When a substance burns in oxygen, the oxygen goes into combination with it and disappears. An experiment which showed this was where a tube was closed at one end and was placed with the open end under water. In a flask connected with this tube was placed some iron filings. Oxygen from a generator was passed through the tube till the air was expelled and the oxygen alone filled the tube. The supply was then cut off, everything was closed, heat was applied to the iron filings until they glowed in one place.

The oxygen then took effect and the whole mass soon became red-hot. As soon as the iron began to glow, water began to rise in the tube whose mouth, as I have said, was under water. This rising of the water showed that the oxygen was disappearing. The pressure of the oxygen had kept the water down, but when the oxygen began to go into combination with the iron, it left a vacuum. Nature abhors a vacuum, and the pressure of the air forced the water to occupy it.

Oxygen is essential to animal and vegetable life. Every breath one takes brings a new supply of oxygen into the body. This oxygen is carried by the blood to the different tissues of the body. When the tissues are oxidized, heat is given off, and this keeps up the temperature of the body. The products by this oxidizing process are then taken up by the blood and are mostly expelled from the lungs. The principal ones are carbonic acid and water.

Thus it is to be seen that a great many changes which are constantly occuring about us are due to the presence of oxygen. In conclusion, I shall say that the above are some of the facts which a beginner in chemistry is taught about oxygen and its action.

CARSON CHILES.

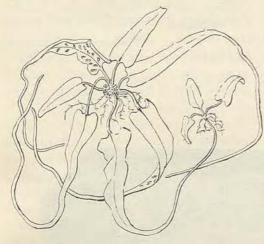
THE WALKING FERN.

"Nature made a fern for pure leaves," says Thoreau. And so well did she succeed in making perfect leaves that she could not make a flower dainty and perfect enough for them, but left them "beauty unadorned, and best adorned."

No plants know so well as ferns how to enhance their charms by their surroundings. "In remote, tangled swamps, overhanging the swift, noiseless brook in the heart of the forest, close to the rush of the foaming waterfall, in the depths of some dark ravine or, perhaps, high up on mountain-ledges, where the air is pure and the world wider and life more beautiful than we had fancied, these wild, graceful things are most at home."

One of the rarest and most interesting

members of the fern family is the Walking Fern. Its odd and suggestive name arouses immediate interest and makes people wonder if, as a little boy once said, it would not be well to take a butterfly-net with them when starting out to hunt it. But it does not step along so rapidly as to need a net or a shot-gun to aid in capturing it. It is, on the contrary, quite firmly rooted upon the rock and allows its descendants to do the walking.



The plants are usually found in large beds, although a few are sometimes found scattered among other ferns. In this locality a few of the plants have been found in Washington cemetery near the lake. and also in Swope park. The most abundant growth of the ferns is, however, in the Coal Mine woods, one and onehalf miles southeast of the Thirty-first and Indiana car line. In a ravine in the depths of the woods, not more than a stone's throw from the path followed by the miners, these quaint little plants may be found. The limestone rock on which grow is almost perpendicular. Enough soil has accummulated on the ledges for the plants to obtain a foothold. The rock faces the north, so the little ferns get a peep at the sun only twice

a day, in the early morning and late in the afternoon. Through the winter they are protected from cold by the blanket of fallen leaves kind Mother Nature gives them.

The leaves, or fronds, of the Walking Fern are simple, rather broad and heartshaped at the base and tapering into a long, narrow, threadlike tip, sometimes branching, but usually simple. Most of the leaves which have very long tips form new plants when the tips touch the ground. Sometimes when a leaf hangs over a ledge a bud is formed on the tip, but it cannot mature unless its roots reach into the ground. The new plant formed on the leaf grows and, in turn, forms another plant. Three of these plant generations, with the leaf connections still unsevered, are sometimes found. It is this odd habit of stepping along which gives the plant its name.

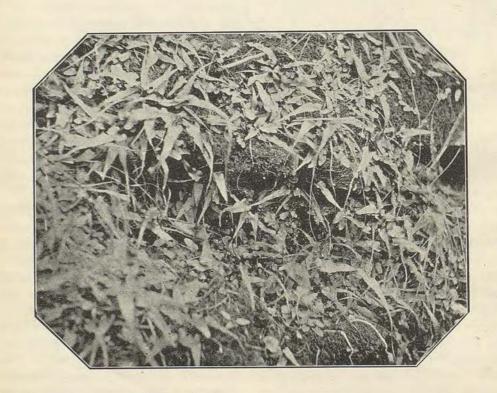
On the lower surface of the fertile fronds, for there are both fertile and sterile fronds, are the brown fruit-dots or sporangia. These little brown spots, irregularly scattered over the surface of the frond, are covered, while growing, by a thin outgrowth of the leaf, the indusium. Each of these brown spots is a collection of many sporangia. These little spore cases look like tiny balls on stems. There is a ridge around each ball which assists in scattering the spores. When moist, it expands and breaks the spore case, scattering spores far and wide. If any spores are left when it dries and contracts they must wait until the next expansion.

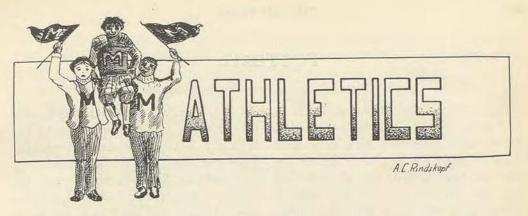
Many people think that ferns grow from the "seeds," or spores, directly into the beautiful plants they know. This, however, is not the case. It is only since 1848 that bontanists have understood the development of the fern. The two stages of growth through which the plant passes are called the sexual and asexual generations. The fern plant, in the beginning, is so unlike the second form that few people would call it a fern.

The spores that fall in moist places germinate and form tiny green plants like green scales. These are usually heart-shaped and about a quarter of an inch across. On the lower side are the rootlets and the cells to form the next generation of fern plants. There are two kinds of these cells, the sperm and the egg cells. A union of the two forms the oospore. Usually only one on each plant matures and this grows up through the notch in the prothallus, forming the fern plant. The fern, in its growth, forms an

underground stem, which sometimes branches and, parting as it grows, forms two new plants where only one had been.

Ferns belong to the Pteridophites, which are world-wide in distribution. In the tropics they grow very large, with upright stalks,—the tree ferns. These are probably higher forms or they may be the original forms, and the small ones degenerate forms. Fossil ferns are found among the earliest forms in the earth's history. This places them on the plant scale before flowering plants and proves that they were among the earliest forms of plant life. Grace Mills, '04.





"Health is best for mortal man; next beauty; thirdly, well gotten wealth; fourthly, the pleasures of youth among friends."—Simonides.

There is no one who will deny the necessity of recreation, although a great many people are opposed to some special forms of exercise which are carried on in our schools and colleges. It must be admitted that in some quarters athletics are carried too far, but we do know that a certain amount of exercise is necessary to health. To athletics should be applied the rule of the ancient Greeks, "Moderation in all things." But, taking into consideration the enthusiasm of the twentieth century toward out-door games, one can hardly be expected to exercise moderation. Again, we hear people say that the studies of the athletic student are sure to be proportionately neglected, but, as a general rule, the best athletes are also leaders in their respective classes. Of course there are exceptions to all rules. People are always hunting for some fountain of life, some elixir. Nowhere is this seen more than in the search for health. You cannot purchase health. It does not come in bottles. The training of the body is as essential as the training of the mind. No matter how intelligent a person may be, if his body is not trained in proportion to his mind, he is not universally admired. We should, therefore, aim to secure a symmetrical development of body and mind

alike. And what greater opportunities have we than right here in our public schools? In former times it was believed that heavy, violent exercise was needed to properly develop the muscles; but now, in this progressive age, it is recognized that lighter work is better. When physical training is properly understood and practiced, a short course in gymnasium work should be of immense value even to those who excel in out-of-door sports. General gymnasium work gives a more uniform development than can be secured by any other exercise. It also brings health and strength to many boys and girls who are naturally too weak and delicate to join with any success in the ordinary games. If gymnasium work is not beneficial why did the early Greeks indulge in exercises of this kind? Who can deny that the most perfect figures are to be found among the Grecian sculptures? The danger of lack of exercise in girls and boys cannot be over estimated. Of course perfect health does not depend wholly on physical training, but along with it we must have wholesome food and a mind healthfully occupied. So it lies with each one whether he or she will have symmetry of mind and body alike. "A man profits by his own exertions; there is no royal road to follow; health must be earned from day to day; eternal vigilance is the price of liberty."

MARY KOOGLE.

FOOTBALL.

The athletic spirit of Manual seems at last to be regaining its former prestige. It has been some time since there have been so many candidates trying for the foot ball team as there were at the first of the year. During the first few weeks of training, we were unable to obtain a place in which to practice, so had to be content with the grounds at Fifteenth and the Paseo. However, this difficulty was overcome and a park was secured. After several games had been played by the team, a popular subscription was started among the pupils to raise enough money to outfit the team. To this proposition the pupils responded with a will and, thanks to their aid, the Athletic Association was able to purchase the much-needed suits. such support from the student body, Manual ought to be able to hold her own on the field against her many rivals.

The foot ball season opened October 3, when Manual journeyed to Leavenworth to play the High School team of that place. While we were defeated 6 to 0, it was not a victory that they could brag of for considering the fact that almost our whole team was composed of players unfamiliar with foot ball tactics, our showing was not so bad. The line up for this game was:

Manual.	Leavenworth.
Clemens L. E.	Crowley
Schenck L. T.	
PratherL. G.	
Keeler C	
Hope-SextonR. G.	
Morgan R. T.	
EdwardsR. E.	
TrowbridgeQ	
Harnden, Capt R. H. I	
MontagueL. H. I	3 Barnes, Capt.
Mann-BottF. B.	

October tenth Manual defeated Kansas City, Kansas, at Exposition Park by the score of 6 to 0. As the score indicates the game was close, and the only touchdown was made by Schenck, who secured the ball on a fumble, and carried it over the line. An easy goal was kicked and so the score stood till the whistle blew for "time up." The line up was the same as before. After this game the Second Team played the Argentine High School boys, and defeated them, 11 to 5. This game was a great credit to the boys, as they had only been out to practice three or four days before the game. In this game Luce did some fine work, and as a reward now plays on the first team.

Outweighed from twenty to twenty-five pounds to a man, Manual was defeated by the Haskell Indian Second team 31 to 0 at Lawrence, Kansas, October 17th. In the first part of the game, the home boys seemed to be afraid of their husky opponents, and it took the Indians only three downs to gain the thirty-five yards that lay between the goal line and the ball. After this they had to fight their way, as Manual took a brace and held them better. In the second half the home boys played a far better game, and had it not been for the fine work of Harnden, Trowbridge, Morgan and Sexton the score would have been larger. For the Indians-Gardner and Tomahawk did good work, being exceedingly fast on their feet.

The following Saturday Manual again played Leavenworth on our home grounds. This time the score was a tie, being 6 to 6. In this game Manual played with a determination to wipe out the stain of the former defeat, and nearly succeeded, but

for a bad play. In the first half Leavenworth was the first to score and things looked bad for the home team, but after this touchdown, Manual took the required brace and evened up matters. In the second half, both teams played fine ball and no score was made. Barnes of Leavenworth played the star game, while Harnden, Keeler and Sexton held the Manual laurels.

Amid the cockle burrs and holes of Emmerson field, the Manual Second team again defeated the Argentine team by a score of 6 to 0. It is said that the "Second Varsity" played with a fierceness that fairly swept the opponents from their feet. Those who did yeoman service for the "Varsity" were Captain Dixon, Lee and Kruse. The line up for this game was:

MANUAL.	ARGENTINE.
K ruse	L. ELindberg
	L. T Harding
	L. G Fuller
Davis	CEckman
Bontecue	R. G Crawford
Winstead	R. T
Elston	R. E Thomas
Hinson	Q Trowbridge
	. L. H. B Rhodes
	F. BJ. McGeorge
Lee	.R. H. B. , W. McGeorge

The game that promised to be the best of the year was against Central, to be played the thirty-first, but on account of rain was postponed until the following Saturday. It has been some time since we have had a game with Central and a great deal of interest was taken in the coming match. It was decided by the management, that the money realized by the sale of tickets in the schools should be given to the respective athletic associa-

tions, the gate receipts to be divided, after all expenses were paid. Manual responded with a will and as a result the base ball team and track team will be outfitted. But to come down to the principal thing, the game, is hard to do; for under ideal circumstances, Central shattered our hopes by a score of 30 to 0 in their favor. This score was not caused by "flukes," but straight foot ball; we were simply outclassed. The boys, however, played hard, Captain Harnden, Virgil Morgan and Milton Luce holding the honors for Manual. One fine thing that must be mentioned in this connection was the support of the student body, who stood by the team until the last down. Of such support Manual feels proud, and if they continue to do this, we shall say, "there'll come a time some day" when they will be rewarded.

One of the greatest losses that the school has suffered this year was in the death of Arnold Shawn. Not only has he been missed by his many friends, but from the Athletic Association as well. Captain of this year's foot ball team, and one of the finest players Manual has ever had, the outlook before him as an athlete was most promising. His loss on this vear's foot ball team has already been felt and will continue to be felt when the time draws near for our other contests. What a lesson is to be learned in this sad event! How little do we know when our time will come! but when it does, let us be ready, so that when the judgment day comes, we will be able to say, "I have done my best."



Moore (Mgr.) Luce

Lee
Dixon Montague Trowbridge Morgan
Keeler Clemens Sexton Prather

Haruden (Capt.) Elston Hall (Coach)
Schenck Edwards Kruse

PLAYING FOR A PURPOSE.

The excitement was every minute growing more and more intense. The gymnasium room was crowded, and even the calm and usually collected referee seemed to be agitated.

This day was to witness a basket-ball game between the teams of the Winchester High School and the little country school of the adjoining county. A prize had been offered to the winning team by a wealthy merchant of Winchester, who in his boyhood attended this country school, and who now had a daughter on the Winchester basket-ball team.

The Winchester team thought that they were able to far outdo these country girls, and that there was no need to make extra preparations. But the members of the other team were much more cautious. Day after day they had left the school-house just as twilight was falling and trudged off to their homes with aching and tired limbs, but with hopeful hearts.

"Mother," said Marion Delmar, one evening as she opened the door of her little home on the hillside, "we're going to win that game with the Winchester High School tomorrow; I know we shall."

"Well, dear, I hope you will, but take off your coat and sit by the fire; you look so cold."

"But won't it be glorious," continued Marion, "if we beat those girls and win that thirty dollars? Just think! thirty dollars to be divided among us six girls. Thirty dollars!" she repeated, and her eyes glistened.

The home into which she had just come, although shabby, was neat and cheerful. The mother seated by the fire corresponded exactly to her surroundings, but the daughter was blithe and gay, young

and active, and the mother's heart quivered as she thought of the many sorrows and heart-breaks still unknown to this fresh young life.

"Marion, Mrs. Clayton was here to-day and said we must be sure to have that rent by the 29th. How I am to get it, I don't know. All three months are due."

A cloud passed over the girl's bright face as she musingly began to count up the days. "Why, mother," she said, "it is due on Wednesday, the day before Thanksgiving, when we ought to be the very happiest."

So the day for the game dawned crisp and cold. Marion and her companions, having arrived rather early at the Winchester High School, were now anxiously awaiting the first half. The tiers of seats were crowded. Mingled with the crimson and white of their opponents, Marion occasionally caught sight of her team's colors, yellow and black.

Soon the whistle sounded. The girls darted to their positions, Marion playing as forward. Up went the ball; the game was on. A scramble, a rush, and a Winchester girl had the ball in her basket. As it was hurled a second time from the hands of the referee, it was seized by one of the country school's centers. Over the heads of the Winchester players it flew, straight into the outstretched arms of the country school's forward, who immediately attempted to toss the ball into her basket, but it was batted back by her opponent. Again she tried. This time the ball landed on the rim of the basket, tottered, rolled and finally slipped down into it. A shout arose from the country school's supporters, and the city girls looked wise. Four more times did the referee toss up the ball and four more times did Marion hurl it into her basket.

Now came the signal for the fifteen minute intermission. The Winchester girls drew off into a group, earnestly discussing their failure, and expressing their regret for not having made better preparation. "Why, I had not the least idea that they knew much more than how to play the game, much less its short cuts," said one. "There is one girl they call Marion who plays as if for her life," said another. "If they win, it will be because she is their forward. We haven't a girl who can match her."

Marion, herself, off in the corner was thinking, "How nice it must be to be rich and pretty like those girls, and have no rent to be worrying about."

But the signal for the second half interrupted her meditations, and in a minute the game was raging, the Winchester girls fast gaining. Soon the score stood 8 to 8. At this point, the country girls seemed to renew their vigor, they reconnoitered their positions, and when the ball was again thrown into the midst of the centers, the hands of the country players were on it like lightning. It was then tossed toward Marion, who threw it into the basket. Five times was this same movement repeated, each time adding to the score of the smaller school.

The game was fast nearing its end. The Winchester team was losing hope, but with a final effort their forward seized the ball and tossed it into her basket. Each following move strengthened the country school's score.

In the midst of all the excitement shrilly sounded the whistle for closing. The score stood 18 to 12.

The Winchester team fell back defeated. The country girls stepped forward, radiant and happy, with the exception of one, Marion Delmar, who, as the whistle sounded fell fainting to the floor. She was quickly lifted and carried to the dressing-room where she lay unconscious for some time. Occasionally those watching her heard her murmur as if in distress.

As Marion dropped to the floor, the audience rushed forward, but were ordered back, and they were now anxiously awaiting the coming of the school principal who would inform them of Marion's condition. At last he came. As he stepped to the front, silence fell over the audience.

"Young ladies and young gentlemen," he said, "there is no cause for uneasiness. The young lady fainted from over-exertion, but will be herself in a short time. We have ascertained that her mother is in sore need of money, and that is the reason, as one of our girl's said, she played as if for her life."

As the principal left the platform an impulsive Winchester youth jumped to his feet and suggested that they make up a purse for the country school's forward. The idea was hailed with enthusiasm and was immediately carried out.

So the burden was lifted from Mrs. Delmar's shoulders, and this, together with the kindness of the boys and girls, made Marion's Thanksgiving the happiest of her life.

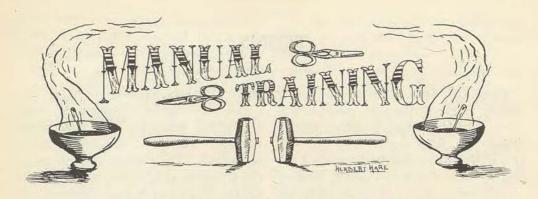
ELIZABETH NOFSINGER, '06

TENNIS.

There has been added to the many athletic events of the year, one that will in the future, it is believed, be as popular as any of the other sports. This is tennis. It was Mr. Miller that first conceived the idea of having a tennis match between Manual and Central, and so arrangements were made with Central to play Saturday, October 3rd, on the Y. M. C. A. courts. Each school was represented by four players, Benson, De Vasher, Luce and Burke for Manual, and Eaton, Sebree, Copeland and Francis for Cen-

tral. It was decided to play the match in regular tournament style, the school producing the best player winning. This honor was won by Eaton of Central. The doubles were played in the afternoon and Central was again victorious, Eaton and Sebree defeating Luce and Burke in the finals. Although the Manual boys were defeated they feel that in part their object was accomplished. They have started an athletic event that will in a short time arouse as much enthusiasm as do the other sports. R. B.





THE MANUFACTURE OF CUT NAILS.

The general definition of cut nails is, that they are slender pieces of iron or wire, usually tapering, having a head and used for fastening pieces of wood together. Nails in a rude form were made by the ancients and in all old ruins we may find examples of their workmanship, which have served their purpose well. Most of these, if not all, were hand-forged and each nail represented the outlay of a great amount of hard labor. But in these days of modern conveniences it would be next to impossible to furnish the required amount of nails if they had to be hand-forged, and all of us should be thankful to William Finch, of Staffordshire, England, whose inventions made possible the manufacture of nails by machinery.

The first nails made by machinery in the United States were made at a small town in New England in 1810. Year by year there has been a steady improvement made on the machinery, till now we have machines that are nearly perfect.

In the manufacture of cut nails the iron is first rolled into plates of the required thickness, and a little wider than the width of the finished article. We now have a long narrow strip of iron, which will bend. If the nail is to be a clinch nail, the iron is rolled so that the grain

of the iron will follow the length of the nail.

This narrow strip is then put into a feeding devise, which is nothing more than a continuous steel belt. This carries the strips towards the cutter and dies of the machine. The cutters go together at an angle of 45 degrees. cuts the strip so as to form a tapering point. This piece is then grasped by a pair of steel jaws, which hold it so firmly that small ridges are formed on the nail near the head. While it is held in this position a punch or "header" strikes the end of the strip with such force as to "upset" the widest end of the nail, leaving a crude head on the strip of iron, which has now assumed the form of a finished nail.

These nails are then placed in a cylindrical-shaped machine, called a "rattler." This machine revolves rapidly and the nails falling against the sides are soon free from iron oxide and comparatively smooth. The nails are then sorted and the best placed in kegs ready for shipment and may eventually reach our own school, where our "born mechanics" (?), the freshmen, may test them. But before closing I wish to remind the boys who take forging that they should be thankful that they do not have to make all

of the nails used by our ambitious freshmen, and at the same time, the freshmen should thank some one that they are not dependent upon the juniors for their supply of nails, because if they were—well, the supply would be limited, probably to two or three a week.

W. H. M., '04.

THE GENERAL CONDITION OF THE MANUAL TRAINING DEPARTMENT.

Visitors to the Manual Training High School in other years, who from their eminence in the educational world should be deemed competent and fair judges of such matters, have marveled at the completeness and up-to-dateness of the manual training equipment. It seemed wonderful to them that a public school system could boast of so perfect a manual training establishment. This is a progressive age, we live in a progressive country and in a rapidly progressing city, and the motto of this school seems to be "progress!" Therefore, each year sees important improvements made where before it seemed all was had that could be desired.

The improvements of this year are not very great or revolutionary, and are in the normal course of the school's development.

The classes are the largest in the school's history. This is due to the large freshman class, the increased interest in manual training and to the new rule which makes the graduate in the future take the full four years' course.

The printing press is proving a great boon, and notes and instructions printed on it are being used in the joinery and machine shops, as well as in other departments. These notes, when supplemented by some demonstration work, prove to be a very satisfactory method of teaching. They induce self-reliance in the student and save the teacher much valuable time, which he formerly expended in repeating oral instructions.

There are twelve joinery classes of twenty-eight pupils each. Practically the same exercises will be made this year as heretofore. The first exercise, the rectangular block, is still being struggled with by the average freshman. It is not generally appreciated that when this exercise has been well made the student has mastered principles governing fully one-fourth the year's work; namely, the use of the plane, the try-square, the gauge and the saw. This year there were added fifty new sets of tools in this shop, and attached to one of the grind-stones is a new machine for trueing the stones. Mr. Knaus and Mr. Myles, the instructors, now grade the exercises handed in with an iron stencil, the impression of which is non-effaceable.

In the wood turning room no very important changes have been made. An exhibition case with a glass front has been made and contains examples of the full year's work made by the students. This is for the edification of visitors. Another case with a closed front is projected by Mr. Arrowsmith, the teacher, which is to contain some of his personal work. This, it is hoped, will inspire emulative efforts in the students and will not be for inspection by visitors. Owing to the crowded condition of the classes,

new ones have been opened for the benefit of recipients of conditions last year, and in the future by giving closer personal attention to the slow-horses, the instructor hopes to greatly lessen the number of conditions.

This year Mr. Cushman has an assistant in the person of James Ellis, a former student, and has charge of eight classes, containing in all about one hundred and twenty-five pupils. To this department, forging, has been added a bolt and heading machine, which will be used both by pupils and teachers in making bolts. The anvil bases are being solidly bolted to the floor, and in this a want of long standing has been filled. Mr. Cushman, who is an expert in this line, spends most of his spare school time in tool-making, and has spent considerable time designing and making cast iron dies for use in making such new exercises as the ladle and tong jaws.

In the machine shop there have been added an electric center-grinder for grinding lathe centers, and a small power press for making blank keys, etc. Several new exercises have been introduced with much success. They are the angle block, V-blocks, drill collet and twist drills.

That the faculty in general is displaying an active interest in the manual training work is shown by the fact that several of both sexes are taking the full regular course. This is not an application of the adage that one is never too old to learn, for this would be an unwarrantable insult to any of the aforementioned individuals, but it does show that the wise appreciate that they cannot have too much wisdom.

A valuable adjunct to the course is the private technical libraries of Mr. Moore, the director of manual training, and of

Mr. Kent, the instructor of steam and electricity, which are constantly receiving valuable accessions, and constitute almost all of the technical works in the school. These libraries are of about three hundred volumes each, and added to these are a score of valuable scientific and technical periodicals. Mr. Moore also has a large case containing about two thousand treatises and catalogs. These are carefully indexed and are small books and pamphlets, which are illustrations of the printer's and engraver's arts at their best. All of this technical and scientific information is accessible to any member of the school, and by its proper use may be of great value to the student.

The manual training idea is gaining hold of the country with wonderful rapidity. Manual training courses are being projected, built, and added to by a great number of institutions of all ranks, graded schools, high schools, colleges, universities, and even to different charitable institutions.

The result of this growth is a great demand for teachers, which far exceeds the supply. Mr. Morrison, our principal, receives calls for manual training teachers all over the country, and has filled several positions with alumni of our school. Frank Berry this year has charge of the manual training in the Pittsburg, Kansas, High School. This year there have been added to our own faculty two more former graduates in the persons of Ivan Hayes and James Ellis. It is with much regret that the announcement of the resignation of Mr. Knaus has to be made. Mr. Knaus goes to Portland, Oregon, where he will enter another line of business. His successor will be appointed at the next meeting of the Board of Education.

HORACE LOVE, '04.

USE AND ABUSE OF COLOR.

In all ages and among all nations color has played an important part in dress. The less civilized the nation, the greater has been the desire for bright colors, and the more crude their arrangement in the attempts of uncivilized man to adorn himself. The early inhabitants of Britain were well versed in the use of various plants, with which they not only dyed their garments, but also painted their bodies in fantastic designs. Their favorite color was blue, which they obtained from a plant called woad. Among the Britons we find also the practice of setting apart certain colors for the exclusive use of certain classes. Their bards, or singers, were allowed to wear blue, green, and white; their priests to wear white only.

In Ireland, on the contrary, the Druids wore colors, and the higher their rank the greater was the diversity allowed. The Irish people showed a great fondness for colors; and long before the Christian era, they had laws restricting the clothing of peasants and common soldiers to materials of one color; that of officers, to two; commanders of clans, to three; and so on. The royal family was allowed seven colors. These restrictions were partly for the purpose of preventing extravagance, to which the people might be tempted by the desire for gaudy clothing, but mainly that there might be a distinction between the dress of the nobility and that of the common people, since, in those days, the rudeness of the tools necessitated simplicity of construction, and in general form, the dress of all classes was alike.

A time, however, when all classes seemed to vie with each other in the display of showy attire, was during the Crusades, in the twelfth and thirteenth centuries. Then, soldiers returning from the Holy Land, brought with them silks and velvets in rich, Oriental colors, which were made into costumes for the lords and ladies of the court. Embroidery ran riot and gold, silver, and jewels were worn in lavish profusion. Some of the young gallants even dressed in particolor, so that one leg was, perhaps, red, the other, green. Moreover, it was the custom for members of various tradesunions to wear liveries of different colors. Certain colors came to be so closely associated with certain classes as to seem inseparable from them. For instance, we still speak of knightly scarlet, and purple has been known as the color of royalty since the time of the Hebrews.

It was in the reign of Edward III. that the custom of wearing a particular color to indicate grief became general. Black or brown was generally adopted, but ladies of rank wore white, and in France the official court mourning was violet. Even now, the ecclesiastical mourning color is violet, and not black.





We open our exchange list this year with promise of success. Already a number of magazines have been sent to us and these have been gratefully received. We think it right and proper that a school should have a large exchange list, so that we may see how other schools are doing in this line, and at the same time spread our paper as much as possible. So if any of our students know of a good school paper and are not sure that it is on our exchange list, we should take it as a favor if they would notify us at once.

"My dear fellow, you are so small that I could stick you into my vest pocket."
"Then," rejoined the abused, "you would have more wisdom in your vest pocket than in your head."

See when the honest farmer packs
His apples up for town,
This is the top row of his sacks,
O O O O O O O O O
And this is lower down,
O O O O O O O O

The Knickerbockers' Club—the freshmen.

A young man began his first letter to his sweetheart after this fashion:—"My dear Julia: When I am tempted to do wrong, I think of you, and I say, 'Get thee behind me, Satan!"

Boy at college writing to his father— Dear dad:

The sky is blue,

The sky is gray,

Send me twenty right away.

The answer—

The sky is blue,
The sky is pink,
Send you twenty, I don't think.

More Cannibalism.

If Edward Everett Hale
I really do not know,
But Henrietta Crossman
And Harriet Beecher Stowe.

The Toledo High School paper, called The *Retina*, has an especially good article in the last edition. It is called "The Tragedy of the Killing Stone."

Little Dolly—"Why is an hour-glass made so small in the middle?"

Little Elsie—"To show the waist of time."

Mt. Blanc spoke up with much bombast, "I know you not, you are too fast."
The Rhone replied, "Of that enough;
I'm pretty sure you're but a bluff."

"Who wrote the most—Dickens, Warren, or Bulwer?" "Warren wrote, 'Now and Then,' Bulwer wrote 'Night and Morning,' but Dickens wrote 'The Year Round.'"

A Senior—Deep wisdom, swelled head, Brain fever—he's dead.

A Junior—Went skating, 'tis said, Floor hit him—he's dead.

A Sophomore—Fair one leaves him, hopes fled,

Heart broken-he's dead.

A Freshman—Milk famine, not fed, Starvation—he's dead.

Mary had a stick of gum; Its name was "Kiss Me Quick;" And everywhere that Mary went That gum she'd surely lick.

She took it to school one day,
Which was against the rule.
The teacher took it away from her
And chewed it after school.

Honesty is the best policy, but it isn't life insurance.

Bum Author—"I find it difficult to express my sentiments—"

Editor-"Send 'em by freight."

Weary—"I'm afraid I'll injure my teeth if I eat this pie."

Kind Lady—"I'll let you understand, sir, that I made pies before you were born."

Weary—"Then this must be one of them."

"You may go," she said, In her iciest tone; "Go back to your friends, And leave me alone."

He clutched at his heart, He rumpled his coat. His face turned pale, His words stuck in his throat.

With a cry of dismay,
She sprang to his side:
"Have I broken your heart?"
In horror she cried.

He pressed her, he kissed her, Then sweetly he spoke: "My heart, love, is safe, "Twas my suspender that broke."

-Lil.

Heigho! Some interesting news for Manual folks! Good or bad? Listen! "The Nautilus" is the name which the Jacksonville High School of Jacksonville, Ill., has taken for their school paper. In a way, we are sorry this has happened, for we would like to avoid all confusion which such an affair might occasion. Yet we are proud to feel that our paper is taken as an example and hope that the Jacksonville Nautilus will keep up with the record of our Nautilus.

"All boys are not homeless, but some boys are home less than others."

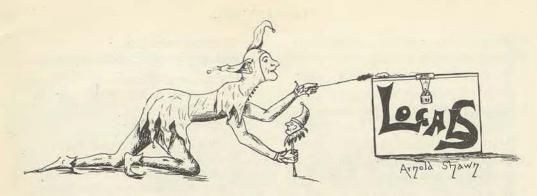
"Where have they gone, the good little girls,

With natural manners and natural curls, Who love their dollies and like their toys And talk of something besides the boys?"

—Ella Wheeler Wilcox.

"Watching the improvement of some classes is like watching the movement of a glacier."





Mr. Cowan—"Cold usually settles in people's weakest parts; when I have a cold it always settles in my head."

George Green—"He can appreciate a good joke. He always laughs at mine."

THE GAME WITH K. C., K.

I.
Half a yard, half a yard,
Half a yard onward,
Into the different plays
Rushed the Eleven.
"Forward the football team;"
"Charge for their line," he said.
Into the struggling mass
Rushed the Eleven.

II.

Men to the right of them,
Men to the left of them,
Men in front of them
Went down and under,
Urged by the high school yell,
Boldly they played and well.
Into the struggling mass,
Into the living swell,
Rushed the Eleven.

Men to the right of them,
Men to the left of them,
Went down and under.
Urged on by high school yell,
While the different players fell,
They that had charged so well
Came from the struggling mass,
Back from the living swell,
Once more victorious.

IV.
When can their glory fade?
O, the great charge they made!
All the school wondered.
Honor with high esteem,
Honor the football team,
Victorious Eleven!

R. M., '04.

Marion Leach—"I will give you some ear-marks so you can tell Helen. By her feet you shall know her."

Miss Williams—"I am in love with the freshmen."

Egbert—"I am a freshman."

Mr. Miller, while using his blow-pipe, said he could not blow while talking, but he knew some people who could.

Miss Sullivan—"How many days are there in a year?"

Freshman—"Three hundred and sixtyfive and a fourth."

Miss Sullivan—"I don't see how there could be a fourth of a day."

Freshman—"Oh, that's the Fourth of July."

His room is a perfect sight; Since my son's been playing football His clothes and things are thrown around As though there'd been a fight.

His nose guard's on the dresser, His shin guard's on the floor; On the bookshelf hangs his stockings, His head gear's on the door.

His sweater gay, with shoulder pads, Across a chair is flung; His short knee pants, with letters red, Upon the bed are hung.

His cap lies in one corner; His room's a perfect "dream," Since the boys have been playing football And my son is on the team.

-His Mother.

Jane Cassey—"Queen Elizabeth was tactful, because she didn't get married."

Mr. Holliday—"What is a cape?"
Freshman—"A cape is a body of land
that objects to the water."

Mlle. Jalagaes wanted to know if there is any difference between saying "I have a donkey" and "I am a donkey."

Freshman—"Depends on who says it."

A mother's parting injunction to her football boy—"Lose the game rather than your head."

Freshman—"Where can I find the locker keys?"

Miss Moffat (in staff meeting)—"What is the difference between the Annual and the other numbers?"

Mr. Elston—"Oh, the Annual will have your picture in it and the others won't."

Senior (when Dick and Florence were elected)—I'll bet they have a committee meeting every night."

Allan Elston—"On the first Nautilus cover they had an extract of Holmes."

Bright Junior—(to Miss Marie)—
"Marie, please cut the cards."

Marie-"I have no knife."

N. B.—A reward of all the pennies found in the local box this year will be offered to any one discovering a point in the above local.

Girl in zoology (looking through microscope)—"Are those my eyebrows I see?"

Freshman—"What is a scaline triangle, and how many sides has it?"

TO L. S. AND L. C.

She was a little senior,
He a P. G. learned,
But in both their hearts
Love's flame most hotly burned.
There would have been more to write about
If her father had not blown it out.

Helen Dickey—"I'm so beastly tired of my name." (We all know she May change it if she Will.)

Secretary of the OZO.'s—"If a man—" Chorus—"Who?"

Freshman composition—"I have just put on long trousers, which add greatly to my appearance."

Freshman (reading)—"The Conqueror Worm—"

Miss Jenkins — "Please read that again. You talk like you have something in your mouth. What is it?"

Freshman (beginning again)—"The Conqueror Worm."

Egbert—"If you write a lie, it is all right, but if it grates on you, it will be great."

Why is Dick's favorite slang expression "Great Scott"?

AN ODE TO THE DEPARTED LUNCH COUNTER.

No more of your choice viands we'll partake,

No more we'll talk of your awful fake; No more of your flannel bread we'll eat, No more watery soup or leathery meat. How to fill our pages we can't tell, You used to do it, O, so well. The local editors we, Will shed the only tears for thee.

Mr. Phillips used to put things he wanted to remember on his looking-glass. He has cultivated a very good memory, he says.

Mr. Dodd—"How much is a bushel?" Margaret Elston—"Oh, two half bushels."

Jean Morrison—"Some of the locals have a period after them so you can see a point to them."

Advanced elocution student, criticising a freshman—"Her reading was faulty, because she let the wind blow through her teeth."

Allan once in a happy dream, Thought he made the football team. But soon he awoke and here was the rub, For he happened to think he was only a Sub.

Dodd's and Chace's method-"After long and faithfully trying to do this problem and failing, you may consult the hint below."

A test of a good local—If it has been told twenty years and still laughed at. (Please don't apply test to these.)

Mr. Phillips — "They sneezed in French."

Holmes must have been local editor when he wrote:

"Try to be serious, be stupid if you can, For it is such a very serious thing to be a funny man."

Mr. Phillips—"I am setting an example of being loud."

Allan—"Mr. Miller made such a bright light in chemistry that you could not see it very well without shutting your

All the poets I love for the pleasure they give,

And I read them day after day. But I hate to read for the things that they

Or the things they didn't say.

And I hate to read them to answer Such questions as are sometimes sent, And I hate to find in the poems they wrote The things they never meant.

Why was the summer sky so blue? Why didn't he make it red? If the hero died in the first act, Why in the last was he dead?

Why did Shakespeare want to eat? And why did Coleridge drink? If Moody wrote our literature, How do we know he wouldn't think?

Why was the cat spelled with a "K"? Why didn't he use a "C"? There are some who can answer these questions. But they are too obtuse for me.

all the girls trim their hats with bows?" Grace Mills—"Because girls of this age

Helen Leach (in millinery)—"Why do

have a peculiar tendency to beaux."

Annual notice to freshmen.—The box with the padlock in the hall, just outside the office, is not a slot machine, or a book-rack, or a mail-box, or a wastebasket, or a Salvation Army collection box, or an excuse box, or a chicken roost, but the place to deposit your bright savings and thereby oblige the local editors.

Freshman to Miss Canny—"I'm late and want an appendix."

After the football game the girls look upon the boys as heroes, but under any other circumstances they would be disgusted with the dear boys for spoiling their beauty so.

We must thank the pupils for putting locals in the box so generously. We have been getting them regularly, one a month.

There is a new rule in the athletic association—The first boy who gets his hair cut has to pay for the hair cuts of all the rest of the team. The boys are going to wear side combs.

Ethel Bone-"I never saw so much lovemaking at Fairmount as the day Herbert and I were there."

Senior Girl-"I've never called a boy up."

Senior Boy-"Well, you have called plenty down."

Ques—"Where is Lee's Summit?" Ans.—"Under his hat."

George Beardsley bought two tickets to the football game Monday. Wednesday he tried to sell one. We wonder why.

Ques.—"Why does a calamity cause the price of eggs to fall?"

Ans.—"Because calamities cause tears. Tiers are layers. Layers are hens. An increase in hens means an increase in eggs. An increase in eggs causes a fall in their price. Q. E. D.

POSITIVELY THE LAST WAIL.

The OZO. Cat,
Oh, let us not forget
Its gentle form.
Would it were with us yet!

But now 'tis gone.
Endeavor as we will,
We can't make live the form,
So strangely cold and chill.

Oh, little pet!
Where have you fled away?
Oh, Pinky-wink, come back,
We'll pet you every day.

Abbreviated form, Little cat, litle cat, Now defunct, Where are you at?

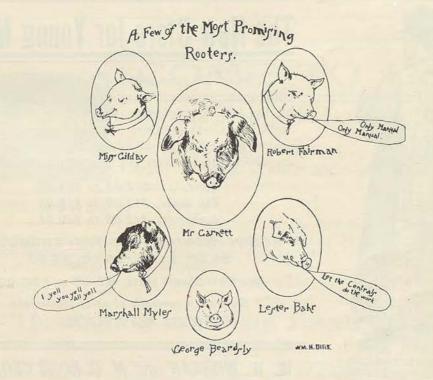
-C. L., '06.

THE GRIEVING FRESHMAN.

I met a little freshman girl, She was twelve years old, she said. She wore a towering pompador Piled high upon her head .

She had a worried, nervous way, Her eyes would fill with tears, I stopped and asked her why she grieved, Grief did not suit her years.

Then did the little maid reply:
"I cannot find my way,
Which doors go in and which go out,
Is more than I can say.
Which stairs go up and which go down?
Oh, stop and tell me, pray."



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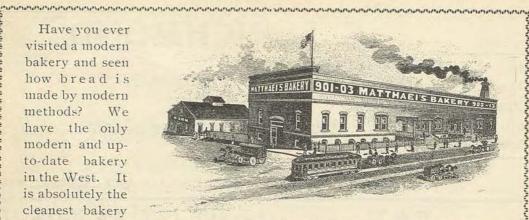
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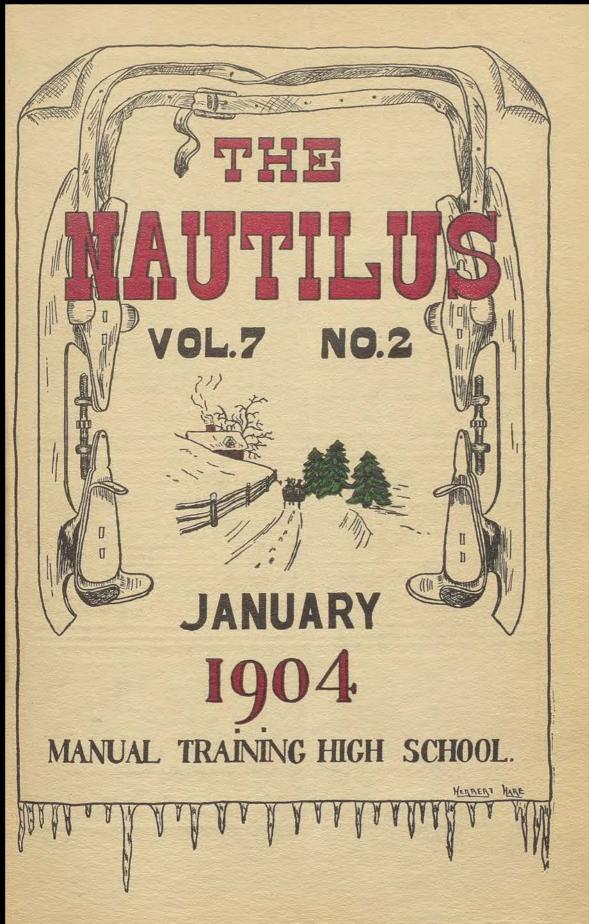
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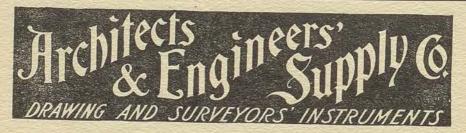
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KANSAS CITY, MO

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The subscription price is 45 cents per year by mail; 40c to pupils of the school. Single copies, 10c.

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Address all communications to THE NAUTILUS,

Manual Training High School, Kansas City, Mo.

The news that Mr. Morrison had decided to leave us and take charge of the William McKinley Manual Training High School, of St. Louis, came like a bomb shell upon us. Not only were the faculty and students of the school saddened by the message, but the citizens themselves heard it with a pang of regret and sorrow. Could it be possible that our wise and just Principal was going away? It proved to be true, and one short week later we were summoned to the Assembly hall to hear his parting words. It was the saddest meeting ever held within the Manual walls. To use Mr. Morrison's words, we all "deserved some credit for being jolly." The pupils, as a testimonial of their appreciation for his past six years of service, gave the departing principal a beautiful reproduction of the "Winged Victory." The gift was presented in a graceful and easy manner by Mr. Alfred Wagner. Mr. Phillips closed the last words of the morning with a "God bless you, Mr. Morrison," and every pupil's heart responded to itself "Amen!"

Everyone and everything connected with the school has already missed Mr. Morrison. The Nautilus especially feels his loss. In past and present times, he has been its critic and adviser. Its success has largely been due to his broad and practical mind. In fact, we have no

words to express our feelings. We can simply say to him in all sincerity: "We thank you."

On Saturday evening, December 19, a farewell reception was given at the school building by the Faculty to Prof. G. B. Morrison, on the occasion of his retirement from the principalship of the Manual Training High School. Representatives of the School Board and of the department of superintendents were present by invitation. The lower corridor was transformed by the Decorating Committee into a beautiful reception hall, by the artistic use of rugs, easy chairs, sofas, center tables, statuary and flowers. The most significant feature of the decoration was the draping of large United States flags behind the heroic bust of McKinley in a suitable alcove, -in honor of the Mc-Kinley High School, at St. Louis, over which Mr. Morrison is to preside.

The crowning event of the reception was the presentation, by the Faculty, of a superb loving cup through the vice-principal, E. D. Phillips, who combined his appropriate remarks with a beautiful and impressive ceremony.

About a year ago, Miss Frances Klunk wrote a prize-essay for the Kansas City World, in which she argued that the art of printing would add more than anything else to the attractiveness of the Manual's course. In a small way, the first step toward realizing this addition has been made, for we have a printing-press now. It seems practical that, as the years progress, this might be enlarged until all the school stationery could be printed on it; and finally, when the equipment becomes sufficiently great, a class in printing might be started. Printing is one of the great vocations of the world. Thousands

are employed in it. We have an excellent forge-shop, turning-room, etc.; why should we not be represented in a branch through which as many men win their bread? A class in printing would undoubtedly find a strong and loval support among the students. We have made use of the printing-press which we have by printing the English Literature critic report blanks, and also the Chemistry experiment blanks. This not only saves time and trouble, but also is a valuable lesson in type-setting to the boys who are asked to set up the type. The Nautilus wishes to congratulate the school on having a printing-press.

We would like to see more articles handed in for publication. Some of the best writers in our school abstain from writing for our school paper. In many cases, this is because the individuals have tried before and have had their articles rejected. The Nautilus "begs" that these people follow the advice of the old adage, which tells what to do,-if at first we don't succeed. We will consider impartially all articles handed in, whether from Freshmen. Sophomores, Juniors, Seniors. We would also consider it a favor if the English teachers would report to us any pupil whom they deem an especially good writer. In this way we may discover some hidden talent among the pupils and also have the columns of our magazine represented by the best of the school.

While good, short, original stories are always in order, our policy is to present a variety of interesting reading matter. We, therefore, hope that our efficient and capable young writers will not hesitate to hand in "matter" simply because they cannot write clever, short stories. Give us the best results of your experience, whether

they be sketches of travel, book-reviews, scientific investigations, or smart, short stories.

Students, it will be worth your time to stop some day in front of Room 27, and peruse the "Book-Lovers'" Magazine which you will find there. Mr. Phillips has hung a copy there, in order that those who are on the lookout for good, profitable reading may know where to get it. The stamp of the "Book-Lovers' Library" is a substantial recommendation for any book. It costs five dollars a year to subscribe to this library; in return for this the subscriber receives a finely bound, profitable book, fiction or non-fiction as is desired. every week during the year. This book is delivered to the door of the reader and is called for at the end of the week. This makes the rent of each book about nine cents. Any pupil wishing to subscribe may find catalogue and particulars in the magazine just outside of the English Literature room, and in connection with the "Literary Bulletin" case.

It seems strange, even culpable, in a country so renowned for patriotism as is the United States, that the songs of the Fartherland should be so little known.

We have had recent proof of this fact in our own school. Not long ago, it was desired that the "Star Spangled Banner" should be sung by all the pupils in "Assembly." Short notice was given and the usual printed slips containing the words of the song were not distributed. The first verse and chorus came with a vim and ring that made one tingle. Presumably during the second stanza, everyone paused to breathe. Again the chorus rang out and again the school took a long, deep breath. Some few hummed along kindly hoping to swell the volume, and when the last measure was finished, the school sat

down thoroughly disgusted. No wonder, for where is the German who cannot shout "Die Wacht am Rhine," or the Frenchman who cannot sing "La Marseillaise?" But everywhere is the American who can only hum the "Star Spangled Banner" or "America."

FRIDAY MORNING PROGRAM.

Since the last issue of The Nautilus, our school has again enjoyed a delightful series of entertainments. The first on November 13, was greately enjoyed and the participants were heartily thanked by the school. Mrs. Marie A. Colton gave some very difficult classical numbers from Beethoven and Schuman with power and expression. Mrs. Colton received her musical education in London and is now settled here to teach. The second number was an instructive and entertaining lecture on the construction and care of the eyes by Dr. Joseph Lichtenberg, who illustrated his lecture with lantern slides. The audience enjoyed his interesting talk very much, as was shown by the applause.

On November 20th, the Rev. Dr. Stephen Northrope gave an enjoyable talk on "Recreation." This was instructive and clevating. It also greatly pleased the audience with its delicate humor. A well-executed piano solo was also given by Miss A. D. Smith, showing splendid technique. A hearty vote of thanks was then tendered Rev. Dr. Northrope and Miss Smith.

One of the most delightful entertainments ever held at Manual, was given on November 27. The active members of the Kansas City "Turnverein," under the direction of Dr. F. Burger, supervisor of physical culture in the Public Schools, provided the program which was as follows:

I. Horizontal Bar Exercises.

Andreas Kemph, Otto Kneer, George

Storz, Harry Smallfield, George Schroeder, William Parry, Edward Pueschell, Carl Wolf.

II. Fencing With Foils.George Storz and Carl Wolf.III. Exercise on Parallel Bars.

IV. Exercise on the Side Horse.

The kindness of these business men in coming at that hour of the morning was greatly appreciated and the school heartily thanks them. And as if that were not sufficient enjoyment, we had the great pleasure and honor of listening to remarks made by three leading men of the times—Admiral Clarke, late of the Battleship Oregon; Governor Montague, of Virginia, and Mr. Webster, of Omaha, Neb. They were accompanied by a delegation from the "Commercial Club" of Kansas City. Each spoke only a few minutes, but their remarks received eager attention and were heartily applauded by the enthusiastic pupils.

A program on December 4th was given by two dear friends of the school, Mr. Joseph Hallinan and Mr. J. P. Raymond. Mr. Hallinan gave, in a superb manner, the "Cantata from Lucia," and was most heartily applauded. A trip through Mexico was then undertaken by the school via the stereopticon with the aid of Mr. J. P. Raymond. It was intensely interesting and many new facts about Mexico were gleaned by the students. At the close of the lecture the American flag was displayed and the "whole" school sang the "Star Spangled Banner."

So greatly was this lecture enjoyed that Mr. Raymond was asked to repeat it on December 11th for the benefit of the other session. He kindly consented to do so and presented an entirely new series of views. The other number on the program was given by Miss Edith Welsh, who has just returned from France. Both

numbers were much enjoyed and we hope to have the pleasure of seeing both Mr. Raymond and Miss Welsh many times again at Manual.

The entertainment provided for December 18, was of a highly classical order. It was a piano recital given by the pupils of Miss Louise Parker. Miss Parker was assisted by Miss Mildred Langworthy, vocalist; Miss Celia Traber, vocalist, and Mrs. E. C. White, accompanist. The program certainly was highly complimentary to Miss Parker, as all the numbers were well selected and splendidly executed.

IN MEMORY OF OUR LAMENTED FRIEND AND EX-SCHOOL BOARD PRESIDENT, MR. R. L. YEAGER.

The Nautilus seeks in vain for the most appropriate words with which to express its sorrow over the recent death of our popular citizen, able lawyer, and cherished friend of our public schools, the Hon. R. L. Yeager.

His long and useful career as president of the Board of Education for twenty years attests both his devotion to the cause of education in Kansas City, and the confidence and esteem in which he is held by our people. But the poignancy of our grief springs largely from the fact that Mr. Yeager was such a tireless champion of the Manual Training High School from the time it was first proposed at a large gathering of citizens at the Commercial Club rooms, down through the period of his retirement from the School Board. It is barely possible that students and patrons do not sufficiently appreciate the sacrifices of time, labor and money, that these grand members of the School Board make in acting as guardians of the cause of education, and for no other compensation than a desire to provide for the educational well-being of our children, in their preparation for the battles of life.

It is not our intention here to repeat

the biographical history of this exemplary man and faithful public servant, which record has already been fully published in our city papers; however, we cannot refrain from calling the attention of our young men and boys to the difficulties that he had to overcome in his boyhood; to the struggles that he endured, almost single-handed; how he persisted in his efforts to study law, and finally acquired a lucrative practice, a spotless reputation as a lawver and responsible offices in publie trust. One of the strongest characteristics of his business character was the exercise of straightforward "commonsense."

One could ask for no more beautiful or substantial proof of the loving regard in which Mr. Yeager is held by the school children of Kansas City than is shown by their universal contribution to the memorial fund which is to perpetuate his name and character in Kansas City. To be thus remembered and revered in the hearts of the people for deeds done while within these walls of time,—is not to die. For such a benefactor of mankind,—

"There is no death! The stars go down
To rise upon some fairer shore;
And bright in heaven's jeweled crown
They shine forevermore."
E. D. PHILLIPS.

THE UNIVERSITY GLEE CLUB OF MISSOURI.



M. S. U. GLEE CLU B, "Columbia Looks to Her Public Schools For Patriots."

Go to hear it when it comes.

One of the strongest and most successful organizations at the University of Missouri is the University Glee Club. Since its organization in 1898 it has grown from eight in number to thirty-six, including an orchestra of sixteen pieces. In 1901 the club was of such great success at the Varsity that they were urged to make a tour of the larger towns nearest Columbia. The results of the trip were so good financially and so valuable to the university as an advertisement that the tour was made an annual event, being heartily encouraged by the university.

The new feature of the club this year is the splendid orchestra which will make the trip also. Out of over thirteen hundred students sixteen of the best instrumental musicians are chosen and they are also put to hard practice. The "Missouri Quartette" is already popular at every point where they have been heard. Besides these features there will be this year on the program solos, duets and double quartettes by members who represent the best amateur talent in Missouri.

The club will give its performance in Kansas City February 4, in the Central High School Auditorium.



HOSPITALITY OF AN OLD DUNKARD.

The Saturday night was a bitter cold one in the middle of winter. Snow had fallen all day and at evening sleet covered the snow. The wind was blowing as if the god of storms had opened his cave and in anger had loosened all of his most fearful and biting gales. They followed one another in rapid succession, wreaking their vengeance on everything and on everybody. At an early hour nature had dropped her curtain of darkness as if, weary of the sights of misery, she wished to hide them from her view.

On a lonely country road, a man stumbled along in the snow. He struggled to withstand the terrible onslaughts of the weather, but it was very hard for him. He was dressed almost in rags and any boy would have promptly called him a "hobo" or a tramp. Strange, indeed, it seemed, however, that he should have been out there in the fierce blasts of the January weather, when most of the tramps—fellows so fond of ease—had gone, earlier in the winter, to places where the cold was less bitter and the wind less piercing.

But it is sufficient that he was out here in the storm, almost exhausted and fast losing hope. At first he had not scemed to mind the cold, but had rather enjoyed it; for he loved nature, not in one, but in all of her moods. He liked the boldness and independence with which she asserted her power over mankind, when in bursts of anger she sent her fierce and awful storms.

As he stumbled along, he became weaker and weaker at each step; a drowsiness began to creep over him so that his one great desire was to lie down and sleep, yet he knew if he yielded to that desire he would never awake again.

Out there in the road, with not even a human habitation in sight, isolated from all mankind and feeling very near to death, almost as a dream his life passed before him. A look of despair and anguish was on his face, for that dream was as a hideous phantasm.

Again he lived over wretched days spent in jail among the vilest of rogues; again he felt the pain and remorse which had come to him in the more wretched hours of the night when he lay awake brooding over that one mistake for which the world could not forgive him. Then he felt again the fresh air upon his face and the keen exhilaration it had produced

upon him, when for the first time in years, he left those stone walls—a free man.

Into the busy city, along the crowded thoroughfares, he wended his way. But it seemed as if he bore the very mark of sin, which told the jostling throng to pass on and heed him not, for he was a jail-bird just let loose. With hungry eyes he watched happy, smiling faces; but no one had a smile for him. He wandered slowly, for he had no particular place to go. Sin tried hard to tempt him back to crime and virtue seemed to pass him coldly by. He was very unhappy and very wretched, for there is nothing makes a man more desolate than to be alone.

"Alone—maybe there never has occurred, A word whose gloom is gloomier than that word!"

It was deadly cold out there in the road, and he was fast growing too numb to think, so that his later wanderings were all confused in his mind. He only repeated over and over, "There is no hope. There is no hope." But hark! what is that sound approaching? There is hope! Arouse thyself and meet thy rescuer, for surely there is the sound of horses' hoofs upon the snow and the rattle of wheels upon the ear.

Back from the depths of despair he turned, yet too numb to care much. Soon a wagon was quite close to him; an old man descended, helped him into it and comfortably ensconsed him there. But he was almost unconscious: the drowsiness was overtaking him so that he was soon too overcome to even wonder where he was going. The old farmer spoke to his horses and they began to go faster; for he knew that unless he soon reached home there would be one more unfortunate standing before that Higher Judge.

As they went along the way the heart of the old Dunkard was touched with pity for the unsconcious one beside him; but not as a duty did he feel compassion, for to him every man was as a brother.

When the wagon stopped in front of the house the farmer's wife opened the door to welcome her husband, but when she saw that there was a stranger with him who neded assistance, with a mother's touch she helped to carry him into the house, and like a ministering angel, worked to restore him to consciousness. Her remedies were only a few simple ones that she had hastily sent her daughter to fetch from the garret. Not for an hour did the man open his eyes, and not then did he realize all that had happened. He was in a large room where there was a warm fire and a cheerful, home-like atmosphere. From the kitchen came the savory smells of the cooking supper.

When a person is helpless in a strange place he is wont to observe closely everything about him; so as he lay there, he noticed even the details in the dress of the old Dunkard and his family.

He saw that his host wore his gray hair three or four inches long and parted in the middle; that there was no collar on his coat and that he wore no necktie. The stranger wondered why he was so eccentric and why he did not dress like other men. He did not know it was a principle in the old man's religion to dress as he did and that had he dressed differently it would have been pride—to the Dunkards a very grievous sin.

Amazed at the kind hospitality, he who had been a wanderer with no place he could even claim as a right to rest in when weary, gazed at the home-like scene about him. When supper was served, the old man helped him to the table and very generously offered him of their repast. In a quiet, genial way the family included him in their conversation, yet did not inquire

into his past. They were satisfied not to know his name, for as M. Myriel in "Les Miserables" has said, "It is before all, the man whom his name embarrasses that needs an asylum."

No pomp, no pride, no worldliness entered that quiet family home; untouched by the storms of prejudices and wrongs that shook the outer world, isolated from contaminating influences, they lived a life that was strangely at variance with the turmoil and strife of the times. The habits of the good people were simple and their wants but few. They had no superfluous education, for that would have been vanity; they were content so long as they could read their Bible and song-book. After the evening work was finished, the stranger was shown to their one spare bedroom.

When morning came, the storm of the night had passed away, though it was still cold. The family began early to make preparations to go to church, for there was a full three-mile drive before them. The stranger was asked to go with them. They were not ashamed of his old clothes, yet they knew not how happy that kind invitation made him; how it filled his heard with joy, that for even one brief while, he might go among his fellow men and yet not be alone.

During the long drive it seemed to him as if the world was much more beautiful than it had ever been before. The pleasure of companionship was to his hungry soul as drops of life-giving water to a drooping flower. It awakened in him a new interest in life and made that sweetest flower, hope, bloom among the weeds of sin and misery in his heart.

Very simple, unpretentious, and almost crude seemed the little church when, at last, they reached its door. They entered a vestibule along whose sides were hooks upon which the men hung their broadbrimmed hats and the women their bonnets; for during service the latter always wore little lace caps. From the vestibule they entered the main part of the church.

After they had been seated a few moments, the minister started the first verse of a hymn and one and all, old and young, joined in the singing. To that congregation it would have semed worldly to have an organ or piano in their church, vet their singing was beautiful, because it was from their hearts. After they had knelt in the old-fashioned way, and asked for guidance and help that they might be able to refrain from pride and sin, the minister began his sermon. It was very simple, yet eloquent in feeling; no canting, no allusions to literature or science, but only a sermon replete with simple faith and absolute trust.

In that church the ladies did not attend to show new creations in gowns, for their clothes were all of the plainest—no frills of fashion nor tucks of pride. There was no going to church to see their neighbors' bonnets, for the latter were almost all alike.

When the service was over and it was time for greetings, an old bearded man approached another, leaned over and kissed him on the cheek. To some people that scene might have appeared ludicrous, but to them it was deeply, solemnly religious; it was "the holy kiss of love and charity." The men always greeted the men and the women greeted the women in that manner when at church. Several of the brethren spoke kindly to the stranger, and his heart overflowed with gratitude, so that he could not trust himself to speak. As the stranger rode, with his newly-made friends, from the church to their home, the conversation was of the sermon they had just heard.

As they sat around the fireplace in the afternoon, he listened, with interest, while they told him of their customs, of their love-feasts and their great camp-meetings. The more he saw of the good people, the more was he impressed by their kindness and hospitality; for their doors were never locked and their hearts never closed to those who needed pity.

He remained with them the remainder of the day and that night, they being unwilling that he should travel on the Sabbath. But the next morning, when the sun shone in all of its glory upon the dazzling snow, he left that quiet home towards which his memory would always turn with helpful thoughts. In the barren wastes of indifference and neglect there would henceforth be that oasis of kindness to remind him that human hearts were not all hard; for in his sin and shame, a fellow-man had called him "brother" and had invited him to the house of God.

BESSIE DINKLAGE, '04.

THE LEWIS AND CLARK EXPEDITION.

Little did the Minister of the Public Treasury of France think of what he was signing away, when for fifteen million dollars he endorsed the papers transferring the almost unknown district of Louisiana, to the struggling young republic of the United States.

It had long been Jefferson's idea to buy and explore this vast district and the chance soon came, for Napoleon needed the money. By means of the "Elastic Clause" in our constitution Jefferson was able to attain one of his ends. By means of a band consisting of twenty-eight resolute men from various states, the President was able to accomplish the second part, viz: the observation of the Indian habits and customs, together with the floral, mineral and animal characteristics of the country through which the band was to travel. So meager was the information regarding this country that even the master mind of Jefferson believed in some of the rumors concerning the strange land.

After many delays, the exploring expedition started from St. Louis on the 21st of May, 1804, on their long journey to the Pacific. In his instructions to Captains

Lewis and Clark, President Jefferson furnished them with drafts which were drawn on the United States consuls, Thomas Hewes, at Batavia in Java, and John Elmslie at the Cape of Good Hope, with the advice that if they needed money or provisions to write to these gentlemen, if possible. All this seems strange to us now, but you must remember that it was said and done one hundred years ago.

The enemies of Jefferson threw all sorts of obstacles in his way. They denounced the expedition as a wicked waste of life and property, and when after several years the little band failed to return even Jefferson feared the worst.

The voyageurs, after leaving St. Louis, soon lost sight of white settlements and began to enter the Indian country, where they stopped frequently, and presented gifts to the various Indian chiefs. These gifts consisted of flags, uniforms, medals, beads and other things calculated to inspire friendliness in the Indian heart.

It took the explorers all of one season to work up to the country of the Mandan Indians, where they prepared to spend the winter. They were now about 1,600 miles

above St. Louis at a point that is now Mc-Lean county, North Dakota, near Bismark.

The party spent all winter settling quarrels among the warlike Indians, and as soon as the ice broke up, a party of men was sent down the river with several packages for the President. These packages contained the last news received of the expedition until its return in 1806. No wonder the croakers declared that the little band had perished miserably in the vast wilds!

On the 8th of April, the main party started westward, and after passing many streams, including the Yellowstone river, together with the Milk and Porcupine rivers, the explorers obtained their first view of the Rocky Mountains, May 26, 1805. Pushing on up the Missouri river the explorers reached its headwaters, in what is now Beaver county, Montana, on August 12, 1805. After incredible sufferings and privations the party managed to cross the Great Divide on August 20th, and descended into the valley of the Columbia at a point that is now Salmon City, Idaho, in Lemhi county. The party had now reached the territory that was not included in the Louisiana purchase, for the Divide was its western boundary.

Sailing down the Lewis river, the party entered the Columbia, October 17, 1805. Proceeding westward after passing the mouths of several small rivers, the explorers observed the action of the ocean tides, November 2, 1805, and on November 8th, they caught their first glimpse of the Pacific Ocean, the goal of all their hopes and struggles.

The Captains record in their journal on that date, "Great joy in camp; ocean in view." It is hard for us, used to being whisked over the continent in Pullman coaches, to realize the joy with which these men hailed their first sight of the sea.

The party now set about making their winter camp. This was constructed of split pine boards and as strongly fortified as their last camp among the Mandans was. Having settled down, the men spent the long, wet winter in reasearch among the Indians.

On the 23d of March, 1806, camp was broken and the expedition started on their long homeward journey. They had almost exhausted their trading stock in coming across the continent and had expected to meet traders on the Pacific and replenish their stores, but they were disappointed.

The passage up the river was easily accomplished and, leaving the river, the men tried to cross the Bitter Root Mountains June 6th, but failed on account of the snow. Another attempt June 26th was more successful and on the headwaters of the Missouri the expedition separated; Captain Lewis with a party of men explored the upper Missouri while Captain Clark and the remainder of the party descended the Jefferson river. The two were to meet at the mouth of the (Jefferson) Yellowstone river.

They pursued their separate ways and after numerous adventures the two captains and their followers were united again August 12, 1806. The day before the Clark party had met two trappers, and these two were the first white men the party had seen besides themselves since 1804.

The united party now set sail down the river. They stopped long enough at the Mandan villages to persuade several chiefs to accompany the expedition back to civilization and to Washington to see the Great White Father, as the Indians called President Jefferson.

On the third of September, the party met the first men capable of giving them information about "the States." They learned from these men that the people believed that the expedition had long since perished in the wilds, and that Jefferson himself had almost lost hope of ever seeing the men again.

On the 23rd of September the boats rounded into the Mississippi river and down to St. Louis where, the journal says, "We received a hearty welcome from the whole village." Thus ended the long expedition that only the master mind of Jefferson could have planned and that only the undaunted perseverance of Captains Lewis and Clark and their followers could have carried out.

The story of the expedition of Lewis

and Clark is the foundation of the history of the Northwest and of the Missouri valley wherein we live. These men and their devoted followers were the first white men to penetrate the solitudes of the Northwest, the first to tread the mountains in which both the Columbia and the Missouri have their sources. "The trade followed the flag" even that long ago, for soon after the return of the explorers, the hardy American emigrant, the trader and the homeseeker, followed in the footsteps of the expedition and laid the foundations of populous and thriving states. Peaceful farms, noble cities and towns are spread over the solitudes through which the little party forced their way one hundred vears ago.

DONALD STOPHLETT, '06.

A LETTER FROM MISS FISHER.

To the Pupils of the Manual Training High School.

Rome, Italy, Oct. 31, '03.

My Dear Young Friends:

Your editor has asked me if I could not write something for The Nautilus. Now if you will not call it writing, but let me imagine that I am having a little chat with you, I shall like it better, for then I shan't be afraid to say I. I should like it still better if you could take part in it by asking me questions. In that case, I should have some clew as to what would interest you most in "Sunny Italy." By the way, it is anything but sunny Italy today. A chilly autumn rain is falling heavily, and at this moment, I should be quite willing to exchange my sunless room with its bare tiled floor for a comfortably carpeted, furnace-heated room in America.

"Why, Miss Fisher!" you are saying, very much shocked, as you ought to be.

"You are in Rome, the Eternal City, and you ought to be able to warm yourself in the memory of the sunlight of centuries." Yes, I know it, but then, I've been here a month, and just now I am very cold. I have seen the Colosseum by moonlight and daylight. I've driven along the Appian Way with the beautiful Roman campagna encircled in hills spread out before me; walked about the ancient Forum and under the arch of Constantine; looked at Trojan's column and marveled at its sculptured figures ascending spirally to the very summit. I have stood in the Pantheon, and with democratic indifference have passed by the tombs of Italy's recent kings to pause in reverence before the marble tablet that records the last resting-place of Raphael Sanzio, Italy's great genius in art. I've wandered through the long galleries of the Vatican, and noted how unerringly the great mas-

terpieces have been selected for admiration out of the hundreds of inferior ones. I have stood in the Sistine Chapel and looked at that marvelous ceiling that Michael Angelo left for the admiration of centuries, and have wondered over the power and expression that could survive the disfigurement of time in the cracked and discolored surface. It is the old lesson, isn't it? In art, as in everything else, the soul, the something that thinks and feels, is far, far greater than its dress. I have enjoyed, too, the panorama of the great city of Rome from the Janiculum and from the dome of St. Peter's Cathedral and with all that, I repeat it, I am cold, and I recall with keen appreciation Hawthorne's wish that he might never pass another winter in a tropical country. He, too, was cold, here. This fact of uncomfortable housing explains a striking characteristic of Italian life—namely, the street life. Among the poorer classes, there is properly no home life whatever. The house is a place in which to sleep and to take shelter from the rain. The street is the home—its sunlight the hearth. At any hour of the day in Rome, and in Naples, until very late in the night, the streets swarm with men, women and children standing or sitting about on curb-stones or on the bases of public monuments, bare-headed, often bare-footed, with a happy indifference to cleanliness that ought to argue a scarcity of water, but doesn't, for water is everywhere abundant.

Coming in from a walk in the outskirts of Rome, the other day, I noticed rows of excavations in the cliffs used as houses,—veritable cliff dwellings, within sight of the dome of St. Peter's and the palace of the Vatican. This street life may explain the undisciplined character of the average Italian. The street is also the

theatre of the itinerant vender, who bawls his wares at the top of his lungs, and incessantly offers them to the passerby. Our peanut-man is represented in Rome at the present season by the vender of chestnuts, hot, roasted or boiled, who calls your attention to them by shouting "Calle! Calle!" (dialect for "Calde! Calde!" meaning "hot! hot!") Though I have a national prejudice in favor of our peanuts, I must confess that the huge, sweet Italian chestnut, big as a buckeye, is no mean substitute. A chocolate-colored paste is made of the meal of the ground-roasted chestnut and displayed for sale in huge pans, and appears to be the particular delight of the small boy. I have not yet had the courage to try it, not being able, unfortunately, to rid myself of another American prejudice in favor of cleanliness which the man with the chestnut pie invariably offends; but I am told that it is very sweet and nourishing.

Another unfamiliar sight to me, but a common one in the streets of Rome, is a huge pig roasted whole, stuffed with fragrant herbs and exposed for sale on tables with the long pole still thrust through it, on which it was suspended over the fire.

But of all street scenes, I think you would most enjoy the streets of Naples on the September festivals of Piedigrotta in honor of the Virgin Mary. Your fall carnivals are a faint reflection of the tumult and Bacchanalian hilarity of Naples at this time. Imagine yourself in a great city whose streets are thronged with men, women and children each of whom has a tin horn or a wooden frame with two movable pieces of hard wood that strike against a central immovable piece with a hard, clacking sound. Imagine all these horns blowing with a monotonous toot! toot! all the pieces of wood clanging,

the stone pavements, the loud cracking of whips, the shouts of drivers, and you have a din that is literally diabolical. Your ears ache from it. The streets are illuminated by colored glasses containing lighted wax candles. These glasses are arranged on wires in ornamental designs arching the streets. Fruit and lemonade venders are lined up in long rows, their tables brightly ornamented with cheap paper flags in the national colors, green, red and white-and with the silky, cream-colored plumes of the pampas grass. Everywhere are children in gay paper hats, conical in shape, with long streamers from the summit: young men crowded in wagons that rattle by decorated with green boughs and Venetian lamps; street cars lined up by scores unable to move an inch on account of the dense throng; carnival parades, sometimes grotesque, sometimes historical, representing mediaeval scenes; in short, an indescribable pandemonium that sets you to wondering what it all has to do with the Virgin Mary, and your wonder

and in addition, the roll of carriages over the stone pavements, the loud cracking of whips, the shouts of drivers, and you have a din that is literally diabolical. Your ears ache from it. The streets are illuminated by colored glasses containing lighted wax candles. These glasses are arrangetime increases next morning when you see men, women and children asleep on the street, women and children, their eyelids swollen and discolored. It seems to you rather a survival of the Greek orgies (for it has kept up all night long), than a festival of the church.

But I am taking up too much of your time, yet I ought to tell you that if you have ever been in Southern California, you have a very good idea of the general appearance of Italy. The same familiar trees greet vou here, the orange, lemon, olive, fig and date palm, among fruitbearing trees, and the eucalyptus, pepper tree, gravilla, live oak and iron-wood among the shade trees. I ought to say, too, that Naples has a situation of unrivaled beauty, and that Rome, in spite of her centuries, is as youthful and beautiful to the eye as if she dated from yesterday. I hope you may all see them both some day and enjoy them as much as

Yours sincerely,

MARY FISHER.

"THE POETRY OF EARTH IS NEVER DEAD." —JOHN KEATS.

While digging in the ruins of ancient Kansas City, some old phonographic records were unearthed. They were thought to be of no value except as curios, and as such I bought them. But my curiosity being only exceeded by that of a woman, I was not satisfied with the mere appearance of the rubber disks, and my imagination began to weave wonderful stories around them.

One day, while rumbling around an old curio shop, I discovered to my inexpressible delight, an old phonograph such, as I was told, my records had been played upon. Not being able to purchase this

treasure, I prevailed upon the shop keeper with much trouble, as he assured me that my records were spoiled, to let me take it for a few days.

The machine being so different from the modern electric devices, I had a difficult time in finding even the first clue to its construction. Finally, after three days hard work, I succeeded in making its wheels turn, and with the free application of oil it really commenced to run. With trembling hands I fitted my first record in position and set the clock work going. The disk commenced to slowly turn around, and as it did so, there was a crack-

ling noise emitted from the old bent horn. This crackling continued for a long time and I began to believe the shopkeeper's statement was correct, but nevertheless, I let it run on. Soon I heard, or thought I heard, the reproduction of a voice. I stopped the machine and let the piece be run over again, and to my delight it was a voice, a low resonant voice, but there was so much crackling that I could not make out what it said.

Having once heard this mysterious noise I was bound to understand it and to learn its ancient words of wisdom. I removed the disk and washed and dusted it carefully, and after working to the best of my ability, in restoring the record, I replaced it in the machine.

It started off with the same crackling but soon this changed to the faint sound of an electric bell, though for only a moment after which the crackling resumed. As the point aproached the place in the disk I had marked as that of the voice, I nervous from excitement, but to my disappointment the voice was again unintelligible. But what was that but the giggle of a girl, and then the low voice spoke and I really understood the ancient voice, for it said in its slow resonance. "We will now listen to Mr. Mann's demonstration." And that was all. Just that one sentence. the rest was a blank. A word to the wise may have been sufficient, but these eight words were not sufficient for me. I also heard the words "son" and "sonny" used repeatedly. I could not connect this with the ringing of the bell and the giggle, so I have long since given up the problem. I pictured them as coming from a judge on his bench to a father, as advice to his giggling daughter; but the bell never found a place in my supposition.

I was better pleased with the next disk.

After careful work it was duly placed in the phonograph, and while there was a great deal of crackling and popping, I could hear the hum of machinery, with an occasional breaking in of a voice, which I could understand only at times. It was high pitched and the few words I could pick out were, "St. Louis" and "Now, you boys." but there were many of these. I concluded that this record was from some St. Louis sawmill and it had been carried to Kansas City by a lover of the former place who had been forced by a cruel judge to leave his beloved home for the "smoky city" on the "big muddy."

The next record was the best of them all, for although I could distinguish but few words, there was a great deal of what I took to be very fast talking. This talking would cease now and then and a woman's voice would break out, "Richard, what I did say?" and "Come to a decision, pupils." I would have given considerable to know what she said, but Richard did not enlighten me in that respect, for there was another series of unintelligible talk. I do not say this talk had not been intelligent, but its record was to me. Besides these sentences there was only one more word I could distinguish and particular stress was laid upon this each time it was repeated. This word was "respectfully," and even in this the "fully" was much the stronger.

I had little hope for my fourth and last disk as it was considerably cut and broken, but nevertheless, I fitted it in the machine with much trouble and plenty of glue. To my surprise, the moment I set the clockwork going, the words "Good morning," sprang cheerily out of the horn, then the point struck a broken place on the record. I moved the disk around and tried to start it at another place, but for some reason the wheels refused to turn. I tried for some time to make it run, and tiring of my bent-over position I took the phonograph on my lap, when it started up and

with it the same voice. This time it said, "As an afterthought I—" Here I arose to put it on the table, but as I did so the record slipped from its position and fell to the floor and was broken into a thousand pieces.

Having broken my best record, or more correctly, some ancient Kansas Cityan's, I took the machine to its owner. He became much interested in my discoveries, but has failed to enlighten me as to the identity of the records or in any way to restore them to their original clearness. Therefore, I solicit the help of any reader who may have a clue to the solution of these matters.

I can be seen at my office, No. 57, sixth basement of the 22 Century Building, from 10 A. M. to 5:00 P. M., or at my room, No. 500, 53d floor, N. Y. Airship Club, from 2:00 to 9:00 A. M.

RICK FILMORE, '04.

BIRD LIFE IN THE CITY.

City girls have not many experiences with birds, but I am going to tell of the few birds that I have had occasion to know.

The bird I know the best is the housewren, to me quite a smart, energetic little bird. We have had a small box on the barn as long as I can remember, and every year a pair of wrens come to build their nest and raise their young in it. rear two broods each summer, and are so faithful in feeding their young that they almost forget to feed themselves, thus making the young ones so big and fat that the latter have a hard time to get out of the hole in the front of the box. This hole we made rather small to keep off the interfering sparrow and the jay. This small opening has most likely saved many of these little birds; for in one especial summer we were raising, besides the wrens, a squirrel and a family of cats, while a cat-bird built in an apple tree, and the jays were raising their young in an oak tree in the front of the yard.

We also rear some martins in a tworoom house on the top of a high pole, out of the reach of cats. Unlike the wrens, these birds come late in the season and raise but one brood, to which they pay less attention than do the wrens. The martins feed their young chiefly on dragon flies, which cannot be gotten as easily as the worms that the wrens can pick from the nearest plant.

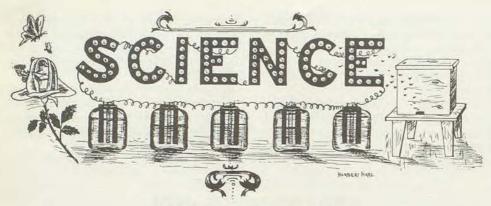
Martins are like people in their tendency to gossip, and they have good opportunity to show us what they can do in this

line; for there is a martin box next door, and the two families visit together, flying from one box to the other, chirping and chattering like little people. Even the little martins try to add to the noise and clatter by sticking their little round heads out of the hole and chirping feebly. I have also noticed that the martin enjoys the company of her friends in a flying trip to the woods more than feeding the young ones at home. The baby martins do not seem to note the distance between their house and the ground, for, in anticipation of their parents return, they often go too near the edge of the little porch and topple over. This causes much trouble, for it takes a steady hand to lift a baby martin into a strawberry box, fastened to the end of a long pole, and then to dump him out on the porch of the house, which is about eighteen feet from the ground.

To distinguish the martins from each other we named the male Charcoal, on account of his jet-black coat, and the female Ash, because of her smooth grey feathers. Charcoal and Ash do not build a nest as do other birds, for the only soft lining they make for their babies to lie on is of a few green leaves from a nearby tree.

But when the martin sings, his domestic deficiencies are forgotten, so beautiful is his song. All of his notes are high and clear, and when eight or ten martins settle on the box early in the morning, they form one of the best of nature's orchestras.

RUTH PHILLIPS, '07.



STORY OF A TOAD.



SUPPOSE you would like to hear my story. I was very happy in my water home while I was a little tad-pole, but when I rose to the dignified position of a toad, my troubles began. The first day that I left my water home, I was sitting in my favorite and most comfortable attitude, on

the bank of a stream, viewing for the first time this great, wide world. Everything seemed very strange to me, for a tad-pole's conception of the world is not very large. As I said, my troubles commenced as soon as I stepped, or rather hopped, upon dry land. For two boys came along and the first thing they said to me was, "Oh! what an ugly toad," and began to throw stones at me, until I was obliged to take shelter in some weeds which grew along the bank. Now this remark just passed upon me, hurt my feelings dreadfully, for I belong to the proud family Bufonidae and pride myself on my appearance. I have often thought since then that if people knew how much good I do for mankind, they would not torment me and make so much fun of me, for I destroy many of the insects and worms that bother man so greatly. I am not very partial to my food, but will eat any living thing that

comes near me, from a caterpillar to a centipede or thousand-legged worm. My tongue is fastened at the front of my mouth, not back in the throat as with men, dogs, cats and most animals. It is so nicely arranged that I can extend it for quite a distance. On it is a sticky secretion, and when I see a nice fat fly go buzzing by, quick as a flash, out goes my tongue, and if it touches the insect, it is caught as if by fly-paper and taken into my mouth.

One day I noticed that my skin was becoming too tight for me—I was quite a large toad by this time—so I decided to change my old suit for a new one. Green being my favorite color, of course, my new clothes must be green. We toads are generally a little bashful at this stage of our lives, so we hunt up some secluded spot and begin operations. Now I suppose you are anxious to know how I change my skin.

If you had seen me at this period of my life, you would have noticed a long crack or tear along my back and in front. I had to keep moving and wriggling to loosen the old cuticle. When it became loose it peeled off my sides. Now to get it off my legs and feet was the first hard problem. I put my hind leg under my arm

or front leg and in that way pulled off the old skin, as if it were a stocking. But when the front legs were to be stripped, the second hard problem confronted me. After studying awhile, as best I could in such a condition, I finally decided to use my mouth, and found it just the thing, for at the last jerk I discovered myself arrayed in a bright new suit. I looked around for a place to put my old clothes, as neatness is a family trait, and finding no available place, I simply rolled them up in a little ball and swallowed them. I felt young and gay once more, for before I really was commencing to feel quite old.

Our family is very cold-blooded; that is, the temperature of the blood is nearly



like the surrounding air. When I begin to feel stupid and inactive, I know that old Father Winter must be on his way and I hunt up some nice soft earth in a protected place and bury myself. I always select a moist place, because if I chose a dry spot, I would wither up and be blown away by the first March winds. If you have ever watched one of us bury himself, I suppose you noticed that we dig backward, not forward. I dig with my hind legs and body and push myself into the hole with my front legs. The earth caves in as I back into the ground, so that there is no sign left on the outside. Once in far

enough to escape the freezing and thawing of winter, I move around until there is a little chamber, slightly larger than my body, and then I draw my legs up close, shut my eyes, put my head down between or on my hands, and am ready for my long sleep. When the warm days of spring come, I wake up, crawl out of bed and begin to take interest in life again. After hibernating for two or three winters. I had a great desire to go back to the pond where I was born. Once there a great number of eggs were laid, perhaps a thousand or two, for a new generation of toads. Thus was my life circle completed. Many insects, some fish, and other animals die after laying their eggs. For such animals, the completion of the life circle ends the life history also. unless the members of our family meet with some accident, we may go back to our land home after laying our eggs and may live in the same garden for years.

Some of the erroneous notions concerning us are that we are deadly poison, that we are possessed of marvelous healing virtues, and worst of all, that hidden away in our heads are the priceless toadstones, jewels of inestimable value. But these are so absurd that it is unnecessary to mention them further. I even remember of hearing my grandmother relate to me one of our romantic fairy tales of a young lady and her lover who died in consequence of eating a leaf of a shrub at the root of which a toad had made its habitation. Remember, I said this was nothing but a fairy tale of Toadland. I suppose you have heard it said that if one takes a toad in his hands or if a toad touches him he will have warts. Now this is not so at all; our skin does secrete an acrid substance, which at all events defends us from dogs, which can seldom be induced to bite a toad twice. We enjoy

kindness and attention as well as you do, and if we are handled gently and petted, soon become quite tame. We have an artistic side to our lives also. Have you not often seen us pictured sitting on a pond lily, or under a toad-stool? By this story I have endeavored to make you feel at home with me and not to run in terror at my approach. Have I succeeded?

MARY KOOGLE, '05.

WATER FROM A CHEMICAL STANDPOINT.

Pure water is an inodorous and tasteless liquid, colorless when in drops but blue when in layers. This is the reason artists may be true to nature when they paint their lakes blue.

Pure water is never found. Rain water, particularly after it has rained some time, is almost pure. But as soon as it comes in contact with the earth, various soluble substances become dissolved in it. Salt and sulphureted hydrogen are common examples. Soda and iron are not so frequent. These are not harmful, but there are some substances which make water unfit for drinking purposes. Organic matter is one of these. There are some simple tests by which these substances may be discovered.

Pure water may be obtained by a process called distillation, which consists in boiling the water and passing the steam into a cool flask where it liquefies. Volatile impurities can not be removed in this

The formula for water is H2O, which means that one molecule of water contains two atoms of hydrogen and one atom of oxygen, or twice as much hydrogen by volume as oxygen. However, since one atom of oxygen weighs sixteen times as much as one atom of hydrogen, there is in water eight times as much oxygen by weight as hydrogen.

Water is widely distributed over the earth in lakes, rivers and oceans and other small bodies. Besides these, all vegetable, animal and some mineral matter contain water. Vegetables contain a large per cent of water. Potatoes contain seventy-five per cent, cabbage eighty-nine per cent, turnips ninety-two per cent, cucumbers ninety-five per cent and lettuce ninety-six per cent. Animal matter also contains a great deal of water. Beef contains seventy per cent, fresh milk eighty-seven per cent and the human body seventy per cent. Thus it will be seen that while we think of water as the cheapest thing in the world it has been said that we sometimes pay as much as five dollars a glass for it.

The water chemically combined in mineral matter is called the water of crystallization. This water is necessary to the shape of some crystals, for where the water of crystallization is driven out, the crystalline shape is lost. Some crystals lose their shape by merely being brought into-contact with the air; that is, the water of crystallization is taken up by the air, causing the solid to fall to pieces and become a powder. This quality is called efflorescence. Sodium sulphate will effloresce. Other solid substances when left in the air for a time take up the moisture from it and liquefy. This quality is called deliquescence. Calcium chloride is deliquescent.

When an electric current is passed through acidified water a decomposition takes place which is represented by the equation H2O=O+2H. The elements become separated. This is a common method of obtaining either oxygen or hydrogen.

Water in cooling contracts until it reaches four degrees, when it expands. The freezing point of water is O degrees and the boiling point is 100 degrees. The specific gravity of ice is less than that of water; hence, ice floats.

It may be said in conclusion that these are only a few of the very interesting things one learns in first year chemistry.

MARY GENTRY PAXTON, '04.

PARASITIC PLANTS.

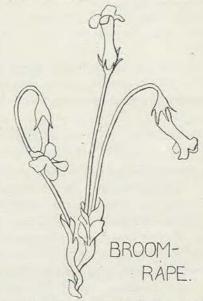
"A parasite?" you say, "O, that's an animal that feeds on some other all its life." This is true in a very limited sense, for there are animal and plant, as well as human, parasites. Those plants which, like uninvited guests, too lazy to make their own food or to obtain it by honest means, draw from the resources of some industrious plant, belong to this class. A few aid the plant in its development, but more merely retard its growth. This article will deal with only a few of the most common kinds.

Parasitic plants are divided, for convenience, into three classes. The first division is composed of minute forms, bacteria being the most common. These tiny, animal-like plants are found in nearly every conceivable form. They live in the body tissues, frequently in the blood of animals.

The second group of parasites is of great economic interest. It is made up of moulds, mildews and rusts, toadstools and similar plants. The members of this class are more highly specialized and send tiny filaments into the food cells of their hosts. Nearly everyone who has seen a wheat field has noticed the spots of black rust or smut on the wheat. These spots are really collections of spores of that destructive parasite, the wheat rust. The filaments of this plant penetrate the wheat, only coming to the surface when a new crop of spores is to be formed. The

various forms of mildews and moulds, although not commonly recognized as parasites, are too well known to need description.

The third and most highly specialized class of these interesting plants is made up of flowering parasites. This group is subdivided into leafless and green-leaved plants, root parasites that grow almost wholly underground, others that merely fasten a bulb-like root to the root of the host, and those plants which, like the mistletoe, have their seeds surrounded by a sticky pulp to aid in their distribution.



Some interesting representatives of this group, which should be well known, are the broom-rape and dodder.

The seed of the broom-rape, in its growth, resembles a white spiral cold with a brown cap on the upper end. The filament continues to twist down through the ground until it finds a living root to which it can attach itself. But if the food stored up in the seed is all used before a host can be found, the seedling dies. At the point where the spiral filament joins the host, a bud, much like a lily bulb, is formed. From this the spike of bloom is raised up into the light. This plant is found growing more abundantly in Union cemetery than in any other part of Jackson county.

Another interesting little parasite is the dodder. Nearly everyone has noticed a tiny plant, like a slender cord, twined about the stem of some plant or perhaps on a slender willow twig. Observed closely, tiny suckers are noticed, extending into the food cells of the host. Through these it obtains nourishment and creeps along the host, producing frequent clusters of tiny, rose-colored flowers. Branches are formed at these flower clusters and the dodder thus spreads rapidly.

Better known and much in demand during the holiday season, is the mistletoe. This parasitic plant grows on oaks, elms,

willows and cottonwoods. It grows on many other trees but seems to prefer Its tiny white seeds, encased in the sticky berries, are left on branches by the birds. The first year the seeds merely sprout and send a rootlet through the bark of the tree into the food cells. The following seasons the plant forms new rootlets and continues to gain a foothold in the tree. Frequently new plants sprout from the rootlets and thus the mistletoe The yellow-green leaves and greenish-white berries are too well known to need description. The mistletoe, although classed as a parasite, is not wholly dependent on its host for food. The fact that its leaves are green proves that part of its food is made in its own kitchen.

Casual observers frequently mistake for parasites plants that are innocent of such a charge. Many times it seems that some plant growing on another is getting its food and drink from the host without making any returns, when this is not the case. Frequently, as in the case of lichens, two plants which obtain food in different ways go into partnership, with mutual advantage. In such a case, they are far from being parasites.

GRACE MILLS, '04.

OUR TERMITES.

In the first "chapter" of the story of "our" Termites in Mr. Kent's room, in the November, 1902, issue, a drawing of the nest on the back of the picture was given. At the same time the writer said: "* * It was found that the ants had not only built a nest on the back of the picture, but had bored through the paper pasted over the back of the picture, into a hollow space within. They had scattered dirt along the inside of the bot-

tom of the picture-frame and had gone farther and bored a hole through another corner of the frame to get out again."

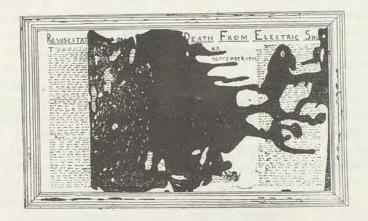
A comparison of figure four, in the former article, and the drawing here given, will show that the nest, then having been started on the back of the picture, has been enlarged very greatly. Its present condition on the back of the picture cannot be ascertained, as the nest at the lower right-hand corner of the

frame holds the picture in place. This nest is the one spoken of in the previous article.

A comparison of the statement with the

direction on account of the obstruction.

The Termites ceased building last year at the approach of cold weather. But, as the room is kept at an even temperature



drawing will further show what progress has been made. The straight line at the left does not indicate that the Termites build in this manner. It probably shows that a board presses up to the glass at this place. The less compact appearance of the clay near this line suggests that the Termites have stopped working in this

and their passages enter from below the ground, it was thought that this was permanent. This year they desisted from work at the same time, thus confirming the supposition that they are inactive during the winter.

INEZ HANSEN, '05.

WHY DO WE STUDY PSYCHOLOGY?

Few people recognize the true value of the study of psychology. Aside from its numerous educational qualities, this branch is one of the most practical subjects in our entire curriculum. Its practical advantages are two-fold: First, that we know and understand ourselves; secondly, that we know and understand others. If we can obtain this second advantage from pursuing the study we are in a fair way of getting along in the world, for we have then acquired the finest of fine arts; i. e., the knowledge of human nature. But, if we succeed in attaining its former advantage, we may then

hope to become a real power in this world, a factor of civilization, a man among men; for as Bacon has said, "Knowledge is power" and Pope, in his Essay on Man tells us that "all our knowledge is ourselves to know." In order to know ourselves we must understand, as far as possible, the little machine which controls our every thought, act and deed.

This "machine" is the human mind. Precisely what it is, we do not know; "what stuff 'tis made of, whereof it is born" we have yet to learn. But psychology is the science which treats of it, and although we may never definitely un-

derstand the mind, or soul, we can, to a certain extent, understand the operations thereof by noting the kinds of mental activities and endeavoring to ascertain the laws which govern them.

Studying trains the mind, and studying the mind improves the power to train it. As the inventor studies his machine that he may correct its defects and improve it, so we should study our mind; for knowing it to be the instrument used in obtaining all knowledge, the study of the mind stands foremost among studies.

There is no man, either great or small, but 'twas thinking that made him so. If he be great it is because he is a great thinker. It is because he knows how to think, and knows how to think rightly. He understands the secret of correct thinking because he has studied his own

brain and knows how to control his thoughts. In other words, he knows how to think because he has thought. Thinking begets thinking. To use the mind to the best advantage we should be able to understand its different functions, its actions and the causes of its actions, its developments and conditions at various times; we should recognize its friends and its enemies; we should learn to use it to the right ends, to guard against its abuse, and to promote its utility. And lastly, we should be able to control it.

And thus, aided by the study of psychology, with skill and with method, we shall be enabled to more correctly round out our educations and to more firmly build up our characters.

E. Bernard Garnett, '04.

THE NERNST LAMP.

As the name, Nernst, indicates, this lamp is of German origin but as to its commercial development, it owes most to America. In 1897 Henry Noel Potter, then in the employ of Mr. Westinghouse, brought or sent some of the lamps over to America. Mr. Westinghouse saw at once the possibilities of the new lamp and instructed Mr. Wurts, also an employee, to experiment and if possible make the lamp practical from a commercial standpoint. Mr. Wurts was assisted in his researches by several other gentlemen and their efforts were crowned by success as the lamp is now on the market.

The complete lamp resembles in external appearance the arc-lights which hang on the street corners, but it is much smaller. It is supplied with a ground glass or opalescent globe, as the light is too intense for interior use, unless soft-

ened by some semi-opaque material like ground glass. As in the incandescent lamp, the light is produced by the heat generated when an electric current passes through a substance which offers considerable resistance to its flow. In the incandescent lamp it is necessary to pump the air from the globe, as air acts on carbon at high temperatures and would soon burn out the filament. In the Nernst lamp the carbon filament is replaced by a short and comparatively thick piece of wire made of some of the rare earths mixed with a substance which makes the wire about as hard as a piece of porcelain of the same size. This wire is not acted on by the air at high temperatures, so it is unnecessary to put it in a vacuum. This piece of wire is called the "glower."

THE GLOWER.

Among the difficulties encountered in

developing the lamp was the contact between the glower and the lead wires which supply it with current. These wires must stand the high temperature which is produced by the glower, and as it expands and contracts the lead wires must follow its motions and keep a good contact. This problem was successfully solved by imbedding beads of platinum in each end of the glower and afterwards fusing the platinum lead wires to these beads. The glower acts in a peculiar way as regards its resistance. When cold it is a non-conductor and must be heated in order to start the current through it. As it begins to take current and get warmer its resistance rises at first, but as its temperature goes on increasing its resistance rises slower and slower until a maximum is reached when the resistance falls so rapidly that some means of controling the current is necessary or the glower would "flash out" as it is technically termed. In order to keep the glower at a proper temperature a resistance is connected in series with it which is called the steadying resistance.

THE STEADYING RESISTANCE.

As the resistance of the glower falls, more current flows through the "ballast," as the steadying resistance is named, and its temperature rises. Now, iron is a substance which offers considerable resistance to a current and this resistance increases rapidly as the temperature rises; so it will be seen that an iron ballast would accomplish just what is desired; that is, it would keep too much current from flowing through the glower by raising its own resistance as the glower's resistance de-Fine iron wire is the material creases. used in the lamp. The wire is inclosed in a glass tube about two inches long, the tube being filled with a gas which does not act on iron at high temperatures.

THE HEATER.

As before stated, the glower is not a conductor when cold, but must be brought up to a sufficient heat to permit the current to flow. This is accomplished by a device known as "the heater." It consists of fine platinum wire wound upon thin porcelain tubes and covered with cement to protect it from the intense heat of the glower. The heater is situated directly over the glower and very close to it so that when the current is turned into the lamp it takes but a few seconds to raise the glower to a proper temperature to let the current start through it. When the glower has become incandescent the heater is no longer necessary and is cut out of the circuit by an automatic switch or "cut-out."

THE CUT-OUT.

This automatic switch, briefly termed the cut-out, consists of a magnet, connected in series with the glower, and wound on a porcelain tube and covered with cement. As all parts of the lamp are subjected to considerable heat any combustible material would not answer. This magnet operates a switch which is suspended from one point, this one point suspension being necessary to keep the switch from buzzing when used on an al-When the lamp is ternating current. not in operation the switch is kept closed by gravity and the magnet has only to raise the moving parts to stop the current in the heater.

The operation of the lamp is very simple. It is lighted like the ordinary incandescent lamp by turning a key at the top. When the current is thrown into the lamp it passes through the heater coils and soon brings them to a red heat. The current then starts through the glower, the ballast, and the magnet which controls the automatic cut-out, and, by the

latter action disconnects the heater, and the lamp is in operation. All the parts of the lamp, with the exception of the glower and heater coils, are inclosed in an artistic sheet-metal covering from which the globe is suspended. The glower is located at the top of the globe and there is nothing under it to cast a shadow downward as in the arc-light.

When it was first discovered that the material from which the glower is made

would conduct a current when hot, it was thought that the lamp would do as well on continuous as on alternating current, but it has been found that electrolytic action takes place in the glower when used on a continuous current and it rapidly deteriorates. This is one of the greatest faults of the lamp, but it may be overcome in time.

BOYD JOHNSON, '04.

HOW TO KILL THE PAPER.

From the Retina.

- 1. Do not buy a copy, borrow your classmate's paper—be a sponge.
- 2. Look up the advertisers and trade with the other fellow—be a chump.
- 3. Never hand in articles, and be sure to criticise everything in the paper—be a coxcomb.
 - 4. If you are a member of the staff,

play tennis or "society," when you ought to be attending to business—be a skirk.

- 5. Tell your neighbor he can get more news for less money—be a squeeze.
- 6. If you can't hustle and make the paper a success—be a corpse,—get the idea?





BRIDGE BUILDING.

Since the flood last June, when all but one of our bridges across the Kaw were washed out, attention has been directed to the great amount of bridge construction which has necessarily been going on. As we watch the construction gangs at work we are naturally (as students at Manual) very much interested, although we understand very little of the work that is going on; the object of this article is to give the reader a better idea of the chief points, at least, in building a bridge.

Every bridge may be divided into two parts, the substructure and the superstructure, and since the substructure is to be built first, we will consider it first. The substructure consists of the foundation, which is usually the bed of the stream, the abutments, which are the supports at either end of the bridge, and the piers, which are the supports of the superstructure between the abutments. The process of building the abutments and piers is interesting. It would seem impossible, perhaps, to one not acquainted with bridge building to build a pier down in the water, but this is easily accomplished. Sheet piles are driven around the proposed site. These sheet piles are made by bolting three large planks together in such a way that the side edge of the middle one projects about three inches beyond the side edge of the other two. This forms a tongue and groove and when these piles are fitted together and driven, they form a water tight box. The dirt is then removed and the concrete or stone blocks are placed in their proper places and cemented together. Concrete blocks are used more often in modern piers than stone.

When all the piers are completed, piles are driven from one abutment to the first pier; they are not driven all the way across as it would block the river. These piles are driven a foot or two below the level of the iron work and if the bank is but a few feet above the water the piles are driven from a barge, while if the bank is high, the piles are driven with an overhead driver. These piles are all finally fastened together and leveled off. A set of timbers is placed on them and on these timbers, rails are fastened. These rails are to support a traveler, which is a device for carrying and setting in place the large iron pieces of the This traveler runs back and forth on the rails mentioned above. There is a narrow track which runs inside the traveler track, and this is for the car which brings the iron to the traveler.

The false work being completed and the traveler on the track, everything is

ready for the erection of the iron work. The iron is delivered to the nearest railroad siding and unloaded from the cars by derricks. The first iron in place is a set of steel rollers which rest upon a plate bolted to the pier. There are from three to eight rollers in a set bolted parallel to each other between two steel strips. These rollers are called expansion rollers and are to allow the bridge to contract or expand according to the weather. They do not move very much, however, two or three inches play being ample for a twohundred-foot span. A section of the lower chord and one of the heavest pieces on the bridge is the first large piece of iron set. On the under side of the chord is placed a steel plate which rests on the expansion rollers. The corresponding lower chord is then set while the end which projects toward the stream rests on the false work. The end posts, or batter posts, are then hoisted into place and the lower ends fastened to the end of the chord. The traveler then picks the first upright post and it bolted to the lower chord. and the batter post is then fitted to the upright post, thus forming a triangle, while from the top of one batter post to the top of another a brace is placed. This is left standing and the second set of lower chords are placed; then the second set of vertical posts. From the bottom of the first set of vertical posts top of the second of posts, braces are bolted: these are called main braces. Another brace is bolted from the bottom of the second set of posts to the top of the first set and these are called counter braces. the first set of upper chords is placed; a brace is then one post of the second to the second post of the same set and the

posts are then counterbraced with the first set. The lower chords, when completed, are higher in the middle than at the ends. This is called the camber and it is to prevent the bridge from giving away in the middle. As the iron work gets nearer the middle of the span the stress becomes greater, for each section has to bear its own stress and also the stress of the one next to it. The same work is carried on with each span, except where there are three spans or more, in which case there are no expansion rollers placed on any but the end spans.

The iron work being well under way a riveting gang is put to work. This gang consists of a heater, a bucker and three or four hammer men. The rivet is heated to the welding heat and thrown to one of the hammer men who catches it in a bucket. It is taken out and placed in the hole and the man who is doing the "bucking" holds a heavy bar, called a dolly-bar, against the head of the rivet. The hammer men then upset the rivet and the heading tool or snap is placed over the rivet; this is hammered on and gives the rivet a smooth, round head. When working on the upper part of the bridge the men work on a swinging scafford. cases where there is a large number of rivets, a compressed air "rivet gun" is used. This process takes a heater, a bucker and the man with the gun.

After the iron work is finished the bridge is painted and the company owning the bridge lays the ties and rails and our bridge is then open for traffic. Of course, we have not entered into detail at all in this short article. We have taken only a few minutes to describe what it takes months and sometimes years to accomplish. We have only tried to acquaint our readers with a few facts which an average student ought to know about this subject, which has come to play such an important part in the commerce and in-

dustry of our nation.

IVAN PRATHER, '05.

A LESSON IN COOKING.

On the fourth floor, in the southeast corner of the Manual Training High School building, is a large, well-lighted room, the cooking laboratory. The unusual interest that centers in this room is shown, not only by the many who visit it, but by the inquiries of strangers and friends who wonder how cooking can be taught at school, and who are anxious, indeed, to see for themselves just what is done. To all strangers and friends a most cordial welcome is extended to visit the cooking laboratory of which the Manual of Kansas City may be justly proud.

This laboratory is one of the most unique and fascinating in the building. Twenty-two desks are arranged continuously around the room, forming a hollow square. Each desk contains a large and a small drawer in which the utensils are kept. There is also a drawer with lock and key for every young lady, in which she places her "cooking uniform," consisting of white apron and white sleevelets.

Small squares of linoleum are placed on the desks, on which to work. Between every two desks is a sink with hot and cold water. The dishpans are kept underneath the sink. A china cabinet containing a set of dishes neatly arranged, reminds the pupils of order, cleanliness, and the lessons received in waitress work. A large pantry, together with an icebox, contain all the supplies. The walls of the room are almost swerve in their plainness, adorned only with appropriate quotations as, "Order is Heaven's first law:" "Cleanliness is next to Godliness;" a few suggestive pictures and charts showing the average composition of common foods and the different cuts of meat. When a class enters the cooking laboratory, the girls don their uniforms and pass to chairs in front of desks for instruction.

There they find a mimeograph copy of the instructions as follows in the lesson on boiled potatoes.

BOILED POTATOES.

UTENSILS.

Vegetable brush, fork, knife, 2 T., Tb., tin cup, 2 saucepans, pie tin, ricer, saucer, saucedish, salt and pepper, toothpick, dishpan for two.

RECIPE.

2 cups water, \(\frac{3}{4}\) T. salt, 2 pieces of potato, 1 Tb. milk, \(\frac{1}{2}\) T. butter, salt and pepper to taste.

DIRECTIONS.

Put two cups of water into the saucepan to get boiling hot, adding threefourths of a T. of salt. Cover. Put the two pieces of potato in a saucepan of cold water to prevent discoloration. When the water is boiling hot, add the potato. As soon as the water again reaches 212 degrees Fahrenheit, turn the gas so low that the water will barely boil. Scrub, pare and rinse a potato, putting it into the basin on the side table for use in the succeeding class. Tell when the potato is done by testing with the toothpick. If soft, drain off the water and return the saucepan to the fire, shaking it gently back and forth until the steam is driven out of the potato, leaving it dry and

Before the pupil can proceed with the work the utensils must be arranged properly on the desk. Thus carefulness and neatness are taught, valuable lessons in themselves and elements of success in life.

In sixty-five minutes, the time given

for a cooking lesson, more can be done than to boil potatoes. Each pupil is kept busy every moment. From the boiled potato, riced potato and mashed potato are prepared. If the pupil wishes, she may eat what she has prepared after the food has been inspected, criticized and marked. Left-over foods not utilized are sent to the different charitable institutions of the city. The girls who work on each side of a sink wash dishes together, taking turns in washing and wiping them. At the close of the cooking lesson each pupil receives a mimeograph copy giving the form in which she is to record her observations and conclusions. This copy is returned for correction at the next lesson after which it forms a part of the notebook.

Mere matter of information is also given the pupils in the form of mimeograph copies instead of stated lectures. Some generalized notes from the science on potato are as follows: Though the potato has not been in common use for more than three hundred years it is a universal favorite. It contains a large quantity of water—about seventy-five per cent. Starch, the chief solid ingredient, amounts to eighteen per cent. When the potato is cooked many changes take place. The effect of the cooking on the starch

and cellulose is shown by the use of the microscope. The solanine of the potato, which is found just underneath the skin, is as poisonous as the nicotine of tobacco. However, it is very volatile and so is dissipated in cooking. Baking is the best method of cooking potatoes, because they lose none of their salts and are more apt to be mealy. Both the new and the old potatoes are not easily digested, the new because the starch granules are only partially developed, the old because they become waxy. The potato is a plant belonging to the Nightshade Order, being related to the tomato, the pepper and the tobacco plant. The tuber, or the enlarged portion of the underground stem, is firm in structure. The potato is a staple article of diet because it may be served in various ways, is inexpensive, and can be combined readily with proteids and fats.

The scientific study of cookery teaches the pupils food values, good combinations, and the correct diet for climate, occupation, health and age. It also develops the artistic taste in arrangement, color, form and proportion. In order to master cookery the principles of chemistry, physics, physiology, botany, and other sciences should be understood. The woman who has mastered cookery possesses a worthy accomplishment.

ETHEL MYERS, '03.

TAPESTRY.

Tapestry was common in the East at a very remote era, when the most grotesque compositions and fantastic combinations were usually displayed on it. It has been supposed by some writers that the invention of tapestry passed from the East into Europe, but others ascribe it to the Netherlanders. The first manufactories of tapestry of any note were those of

Flanders, established there long before the manufacture was attempted in France or England.

The term tapestry is now appropriated solely to woven hangings of wool and silk, although it has been applied to all sorts of hangings, whether wrought entirely with the needle (as originally, indeed, all were) or in the loom, whether

composed of canvass and wool, or of painted cloth, leather or even paper. Tapestry is an ornamental figured cloth, made by interweaving upon a groundwork, or warp of hemp or flax, colored threads of worsted silk, and sometimes gold and silver, or linen and cotton. Among the eastern nations the richest fabrics were studded with rubies, emeralds, diamonds and pearls. Up to the twelfth century, needlework tapestry, like the Bayeux tapestry of Matilda, had been used only for the decorations of altars or in the performance of solemn rites.

"And storied loves of knights and courtly dames, pageants and triumphs, tournaments and games," were woven in tapestry. The Tale of Troy was a very favorite subject for this work, and was found in many noble mansions, especially in France. It has indeed been conjectured, and on different grounds, that the whole Iliad had been wrought in a consecutive series of hangings. Some of the most renowned Knights of the Round Table and their various and wondrous achievements were woven into a series of tales which are known as the "Romances of the Round Table." One of the most marvelous and scarce of these romances, and one of the principal passages of which were frequently wrought into tapestry, was the "Roman du Saint Greal." Charlemagne and his Paladens, Alexander, and the mangled remains of classic heroes also furnished subjects for many of these.

The Bayeux Tapestry is the oldest piece of needlework in the world—the only piece of that era now existing. This magnificent work is 227 feet in length by 20 inches in width, and is now usually kept at the Townhall in Rouen, and is

treasured as the most precious relic. The tapestry is coiled round a reel like that which lets down the buckets to a well, and a female unrolls and explains it. It is worked in different colored worsteds on white cloth, to which time has given the tinge of brown holland. The colors are somewhat faded and not varied. It has always been considered the work of Matilda, the wife of the conquering duke of Normandy, and has become an historic memento of her country.

The manufacture of Gobelins tapestry was introduced by Louis XIV. It was called by this name because the house in the suburbs of Paris, where the manufacture was carried on, was built by brothers, whose names were Giles and John Gobelins, both excellent dyers, and who brought to Paris in the reign of Francis I the secret of dying a beautiful scarlet color, still known by their name. The quantity of the finest and richest works that have been produced by it, and the number of the best workmen bred up therein are incredible; and the present condition of the arts and manufactures of France is, in great measure, owing thereto. The French have had other considerable manufactories at Auvergne, Felletin and Beauvais, but all rank beneath the superiority of the Gobelins, which, indeed, at one time outvied the renown of that far-famed town, whose productions gave a title to the whole species, viz., that of Arras.

Tapestry is now woven in pieces of any desired breadth; but formerly the frames were so narrow that it was necessary to unite different breadths together, and this was done so skilfully that no imperfection was perceived in the design.

GLADYS COATES, '06.

ATHLETICS (S)

FOOT BALL.

October 14 Manual defeated Westport by a score of 12 to 5. After the first kickoff it seemed as if the home team would have a walkover, as they rushed the ball down the field for good gains, soon scoring a touchdown. Harnden kicked goal. Following the next kickoff, however, things changed and Westport soon scored on a fumble. As the touchdown was near the extended side line, Westport punted out, but afterward failed to kick goal. Score at end of first half, 6 to 5 in Manual's favor. In the second half both teams played better ball, most of the playing being done in the center of the field. Near the last of the half the better training of our boys began to show itself, and Westport's line began to crumble under the repeated line-bucks of our team. The last touchdown was scored almost at the end of the half, when Keeler was pushed over the line. Harnden kicked goal. Score, Manual 12, Westport 5. Taken as a whole, the game was uninteresting, being marred by repeated off side plays and wrangling on the part of the officials. The best playing for Manual was done by Harnden, Montague, Morgan, Luce, and Keeler.

The following Saturday, Manual journeyed to Paola, Kansas, to play the team of that place. The expenses of this trip were defraved by our management, we in return receiving all the gate receipts. The game, from all reports, must have been a good one, as the teams were well matched. Manual played her best game in the first half, Edwards doing a big share of the ground gaining. One thing with which the boys had to contend was the rapid back-field and ends of the Paola team. These players repeatedly prevented touchdowns from being made, Culbertson, one of the halfbacks, catching Luce after a run of about seventy yards. The score at the close of the game was Manual 10, Paola 6. Those who did good work for the home team were Harnden, Keeler, Luce and Edwards.

On Thanksgiving day Manual played the Buckner team on their grounds. The Buckner management certainly treated our boys well, giving them a Thanksgiving supper as well as dinner. The following article, copied from the Buckner Tribune, gives a good account of the game:

"One of the prettiest, cleanest foot ball

games played in this city, this year, was that between the Manuals of Kansas City and the home team. It can be truthfully said that when "Greek meets Greek, then comes the tug of war," which was clearly demonstrated in the Manual-Buckner game, as both teams were nearly equally matched in skill and in size. In the first half, Manual kicked off to Buckner who returned the ball for a short distance. Clean, fast foot ball followed and at the end of twenty minutes, Manual scored the first touchdown, after a hard struggle. This was the only point made during the entire game and it was a hard one to make. Manual failed to kick goal. Score, Manual 5, Buckner 0.

In the second half, Buckner kicked off to Manual who punted the ball, and it was secured by Buckner who made steady gains until they were within the five yard line of Manual's goal, and it looked as if Buckner would score; but by hard playing, Manual held Buckner for downs and secured the ball. Time was called with the ball in play about the center of the field. Score, Manual 5, Buckner 0.

This is Buckner's second defeat this

season, and considering the teams played shows that the team is composed of good material. Fully 500 enthusiastic rooters witnessed the game which was exciting throughout.

The Manuals are loud in their praise of the treatment the local team accorded them and cheerfully welcome a return game with Buckner. Mr. Moore of Kansas City refereed the game and Dr. Ravenscraft of this city umpired. The line up follows:

MANUAL.	POSITION.	BUCKNER.
Mann	R. E	Charlton
	R. T	
Kruse	R. G	Hudson
	C	
Prather	L. G Trip	olett, Gossett
Clemens	L. T	McPherson
Dixon	L. E	Peace
Trowbridge.	Q. B I	Ritter (capt)
Edwards	R. H. B	Reber
Harnden (d	capt) .L. H. B	Martin
	F. B	

The visiting team was composed of a fine lot of gentlemanly fellows who behaved themselves accordingly. Martin and Reber of the home team, and Harnden and Keeler of the Manuals were the star players of the game."

INTER-SOCIETY FOOT BALL.

One of the best games of foot ball seen since the season closed was that between the Manual Society of Debate and the I. O. N's. on December 18. The game from start to finish was most exciting. The chances before the game seemed about equal, as both teams were evenly matched. The game started by the I. O. N.'s kicking off to the M. S. D., who advanced the ball for good gains, until it was lost on a fumble. From this time on

the I. O. N.'s had things in their favor, making two touchdowns in the first half and two in the last. One of the strong points in the I. O. N. team was the strong line, which repeatedly held against the line bucks of the Debaters. Those who did good playing for the Debaters were Trowbridge, R. Mann, C. Mann and Beardsley, while Luce, Morgan, Lang and Dixon did good work for the I. O. N's. Score, I. O. N. 23, M. S. D. 0.

TRACK TEAM.

A "gym" class, under the direction of Mr. Hall, will be started next term at 6B for all track team candidates. A movement is on foot to secure a vacant lot near the school in which the track team, as well as the tennis club and basket ball teams may practice. This will be a great thing as we can devote more time to athletics without the loss of so much time traveling to the old training place. the last meeting of the Athletic Association, Egbert Schenck was elected captain of the track team while Roy Neal was chosen captain of the base ball team. Virgil Morgan was elected captain of next vear's football team. Candidates for track team and baseball will see the respective captains for particulars.

This year the big track meet of the Missouri Valley Inter-Scholastic League will be held here under the auspices of Central. Everything in our power must be done to have a good track team for this meet. There are several of last year's team yet in school, and with the fine new material Manual should develop a good team. The events for which one may train are:

100 yard dash
High hurdles.

High jump.
Low hurdles.

220 yard dash
ligh hurdles.

Pole vault,
Hammer throw.
Shot put.

Shot put. Broad jump.

BASKET BALL.

1 mile run

December 28 marked the first event of the school year in girls' basket ball. During the afternoon, six games were played by the class teams, recently organized, and the alumni. These games were:

Junior 1 vs. Junior 2.
Freshman 1 vs. Sophomore 2.
School Team vs. Alumni.
Sophomore 1 vs. Sophomore 2.
Junior 2 vs. Sophomore 1.
Junior 1 vs. Alumni.

Dottie Hewitt, Annie Wynne, Gertrude Warner, Grace Slocomb, Sarah Tudhope, Clara Hoernig, Ethel Walker, and Martha Rouse were the members of the Alumni who played during the afternoon.

The first Junior was one of the class teams in which no substitutes were placed. Those who played were Nellie Hewitt, captain; Mabel Trumbo; Inez Hansen; Willie Williams; Elma Lane, and Marie Warner.

The two features of the afternoon were the games between this team and the Alumni and the first Junior and the Alumni. Of course most of the Alumni team were out of practice and—but to stop "crossing the plain highway of talk," the scores were 3 to 14 and 4 to 9, with the 3 and 4 in favor of the Alumni. Yet they really did strong playing and might have won if it had not been for the number of "ifs." But of course we feel much elated at scoring against an "all-star" team.

There was good work done in the other games, the highest score being made in the game between the two Junior teams. The score was 17 to 0 in favor of the first Junior. In the Freshman-Sophomore game the score was 7 to 3 in favor of the second Sophomore. In the game between the two Sophomore teams the score was 11 to 5 in favor of the first Sophomore. The score of the Junior-Sophomore game was 8 to 3 in favor of first Sophomore.



The William Jewell Student is one of our best exchanges. It contains good material and plenty of it. There is a system about the work, too, which one cannot fail to recognize. A local department would improve the paper and cheer it up.

Little Doris (talking to her doll, whose arm had come off, exposing the sawdust stuffing): "You dear, good, obedient dolly, I knew I had told you to chew your food fine, but I did not think you would chew it so fine as that."—Ex.

"Oh, why do they all spurn my suit?" he murmured sadly. Then he tried another pawnshop.

Professor (discussing organic and inorganic kingdoms): "Now, if I should shut my eyes—so—and drop my head so—and remain perfectly still, you would say I was a clod. But I move, I leap, then what do you call me?"

Voice from rear: "A clodhopper."— Ex.

The Inter-Scholastic Student is making a splendid start.

We would like to inform the *Luminary* that if they are ever deficient again in original editorial cuts we will give them some more of ours. We have plenty.

To the *Graduate Magazine*: Your paper has excellent material, but a few small illustrations here and there would add very much to its attractiveness.

We are very glad to include in our exchange list the *Student*, and wish to compliment it on the good work it has accomplished in so short a time.

The Retina is an old standby. The literary department especially is good.

The *Donnybrook Fair* is another paper which would be improved with illustrations.

The Ottawa Campus lacks an exchange column. Otherwise it is a very creditable paper.

We had a dream the other night When every thing was still; We dreamed that each subscriber Came up and paid his bill.—Ex.

"Here," cried the manager, excitedly, "the leopard has broken loose; if you see him, shoot him on the spot."

"Which spot?" yelled the green circus hand.—Ex.

"I long to be an angel,"
A freshman boy once sighed;
He lined up 'gainst the first team—
His wish was gratified.

Here are some samples of modern advertisements for new musical compositions:

"Come Where My Love Lies Dreaming" (with illuminated cover).

"Trust Her Not" (for 50cents).

"I Would Not Live Always" (without accompaniments).

"See, the Conquering Hero Comes" (with full orchestra).

"When the Sun Shall Set no More" (in C).

"The Tale of the Swordfish" (with many scales).

"Home, Sweet Home" (in one flat).— Ex.

She gave me the turn down yesterday,
Did I wail, and weep, and holler?
Well, no; for she was clerking and
I asked for that kind of collar.

—X-Rays.

Bill had a bill board. Bill also had a board bill. This board bill bored Bill so that Bill sold the bill board to pay his board bill.—Ex.

The college men are very slow,
They seem to take their ease;
For when they graduate,
They do it by degrees.

-Ex.

The world is old, yet likes to laugh,
New jokes are hard to find.
A whole new editorial staff
Can't tickle every mind.
So if you meet some ancient joke,
Decked out in modern guise,
Don't frown and call the thing a poke,
Just laugh—don't be too wise!
—Ex.

The Esquimaux babies, when they die, are fried out by their afflicted parents for oil. Thus ever is human misery made light of.—Institute.

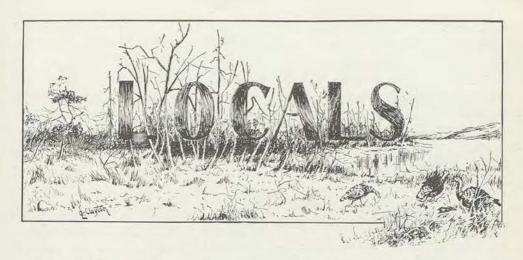
Came to high school Joined the 'Leven, Played one game And went to heaven.—Ex.

I noticed she was pretty,
I thought she smiled at me;
And after I had passed her
I turned my head to see.

A piece of banana peel
My careless heel beguiled;
I cracked the curbstone with my head,
And then I knew she smiled.

-Ex.

The Christmas cover of the *Retina* is the best we have seen. The artist deserves commendation.



Alfred: "Be sure to tell me when you really want me to go."

She (J. M.): "It's a couple of hours too late for that now."

Mr. Phillips: "I found it would cost me twenty-five dollars. That took my breath away; but then, that was not nearly so bad as taking my money away."

Miss Gilday: "The Devil can quote Scripture for his own purpose. Now, Rick, let's have yours."

Mr. Page: "Here's a paper that belongs to someone without any name."

Herbert Hare: The Art Club Rabbit.

Mr. Phillips (as a car passed): "I cannot talk against the Metropolitan."

Mildred said she could study Virgil (M) without knowing Latin.

On the way to school. Freshman: "I am going to be late so I can talk to that little clerk in the office."

It is said Oscar Streighlowe carries a blotter in his algebra to make people think he has a fountain pen.

Harold Trowbridge ate eight pieces of turkey at Buckner and wanted more. Moore, however, objected. Lester Bear: "I want to see about my points."

Miss Williams: "Well, you have to come again. Mr. Greenwood and some distinguished guests are sitting on them."

An interesting conversation being held by young lady and gentleman sitting on back seat, was interrupted by Mr. Small asking: "Is that the problem about the sheep?"

Young Gentleman: "No, it is the one about the goat."

Moral: Don't butt in.

ANOTHER MOTHER'S VERSION.
Since my son's a playing football,
He is an awful sight,
A perfect mass of bruises,
And only one eye's right.

His hand is in a bandage,
And with a limp he walks;
His head is getting hairless,
He, in a whisper talks.

Each evening after practice,
He has a different hurt,
And with a patent liniment
Just rubs off half the dirt.

When time comes for lessons, He tries to do his best, And we all try to help him; To straighten out the mess. Miss Casey: "We don't go up to Central and fight. We are gentlemen."

Some suggested improvements: Colin: Use simple language.

Margaret Pettibone: Turn up her nose less.

Freshmen: Young men, put on long trousers.

Allan: Smile more. Sara: Be nice to Dan.

Egbert: Talk to one girl at a time. They will last longer.

Dick: Say "swell" less.

The average size of the Freshmen increased.

The average size of the heads of the Seniors reduced.

The Sophomore girls made to giggle less.

Lester Bear: Shake hands less.

Ashford Lang broke his nose and did not discover it for some time. Ask him how he nose (knows) it?

Glen Harnden carries a dainty little powder rag in his pocket over his heart. (When did he get sentimental?)

Mrs. Elston (before the Central-Manual game): "Everything will go off peacefully today because we have a band for harmony's sake."

Mr. Miller: "Suppose the sun would strike and wouldn't work any more."

Alfred: "There would be a sun stroke."

Mr. Cowan, criticizing Miss Murray who has just recited a selection from Evangeline: "Don't look down, Gabriel is not in the audience."

OUR BULLETIN BOARD



Ralph Queal was given a cookie to take a bite of, and this is the way it looked before () and after ()

Foster: "If I should sell a lock of my hair to a girl I would be a Shy-lock."

Herr Eshbach, in German, giving a sentence to be translated: "Miss Reiner, take my hand in yours and—"

Harold heard a jingle as of money down stairs and fell down the steps.

Don Stophlet was seen in the cooking room devotedly hovering near a girl making fudge. The girl or the Fudge?

Mr. Dodd: "I believe that is your problem, son."

Freshman: "No, mine is that skinny one."

Miss Williams: "Mr. Peters, what do the initial letters in your name stand for?"

Mr. Peters: "Pretty blame slow."

The business managers are on the fence. If you don't believe it look out of the window of The Nautilus office and see.

A WAIL.

Oh! boys, the time is coming, When parties are the go, And we, the young men gallant, Must own a lot of "dough."

First there comes a carriage, And then a swell bouquet, And, last of all, a dress suit, For which we have to pay.

A Glimpse into the Future.

St. Peter: "Who were you?"

Applicant: "A M. T. H. S. student."
St. Peter: "Were you a subscriber of

The Nautilus?"

Applicant: "Yes."

St. Peter (door open to a crack): "Did you patronize the advertisers?"

Applicant: "Well,—no." (Door closes with a slam.)

Freshman, on a crowded car: "How many people are there on this car?"

Senior: "Oh, one person for every two feet."

Miss Dorothy Hopkins went down town to Jones' store to solicit for a Christmas box and called for the head man. When he saw her he said: "Where have you worked before?"

A pupil in the juvenile department astonished his teacher by describing a circle as "A straight line crooked all the way around."

Teacher and Pupil.

"You will not need to make up-"

"Yes! Yes!"

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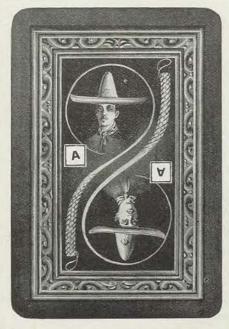
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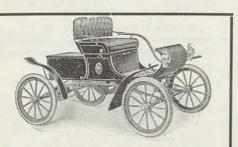
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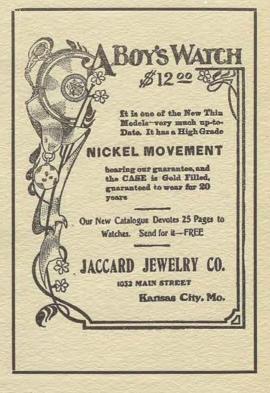
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KANSAS CITY, MO

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a good place to live in and to work in.

In spite of the shock it received in the

departure of its able founder, the school

has been made to feel that a mild but firm

hand is at the helm, and that the watch-

word is still "On and on." THE

NAUTILUS calls upon every loyal teacher

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Many specimens of original work of the teachers will be included in the exhibit, such as Dodd and Chase's text books on mathematics; Mr. Peters's shorthand dictionary; Mr. Kent's, Mr. Page's,

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THE NAUTILUS,

Manual Training High School, Kansas City, Mo.

NOTICE.-THE NAUTILUS is published once every two months in the general interest of the Manual Training High School, at Kansas City, Mo.

The subscription price is 45 cents per year by mail 40c to pupils of the school. Single copies, 10c.

Contributions are requested from all members of the

Mr. Miller's and Miss Bachelor's laboratory notes, and Mr. Phillips' literary laboratory booklet. A large and handsomely framed photograph of Mr. Phillips' literary chart has been made.

The art department has a large and interesting collection of drawings, sketches, and oil paintings, some of which will be mounted or framed, to be hung upon wall space, while the rest will be bound in portfolios. About fifty strong binders, neatly covered with black and red cloth, have been made especially for covering written work and drawings.

One of the attractive features which we will send is the large photographic group of our building and its interior views, accompanied by a brief statement of the character of the school and an itemized account of the cost of its equipments. The handsome oak frame for this group of pictures is 36 inches by 46 inches, and was made by our boys. This frame will hang in the special exhibit office of the Missouri Commissioner of Education.

THE NAUTILUS is pleased to compliment Mr. Woods on his glee clubs. It gives us genuine pleasure to notice that a greater interest is being taken among the students in the study of vocal musicthat subtle charm which has never ceased to charm our race from the days when Beowulf chanted his weird songs over the moors down to this enlightened age, when young men stand up in a row and sing, with all gravity, about bullfrogs and bulldogs and their personal dislikes. We have both a boys' glee club and a girls' glee club at Manual this year. The recent feast of music and flow of song which our good State university tendered us, has shown us what a high degree of excellence in this line practice can assure. Owing to the lack of tenors, our boys' glee club rarely

attempts four-part music. However, both clubs are making splendid progress, and we wish to congratulate Mr. Woods on his success.

Our next issue will be the Annual—that toward which every boy and girl looks forward each year with joy at the thought of possessing. Where else could they procure pictures of all our teachers, of our most potent, grave and revered seniors, of all the members of the various societies and athletic clubs, and last, but not least, of the handsome group of THE NAUTILUS editors?

No pupil can afford to be without this magazine as a souvenir of his school year, and the magazine cannot be published without the hearty and loyal support of the student body. It will be a fine paper, decorated freely with half-tones and zinc etchings, and the reading matter will represent, we hope, the highest talent of the school.

As this year's Annual will be dedicated to the class of 1904, seniors, you should each procure more than one copy—one to keep as a pleasant reminder of your school and classmates and others to mail to your friends to give them an idea of the magnitude and ability of the school from which you received a diploma.

Our infant library is gradually growing to the limits of its present space. Before long new shelves may have to be provided. The students' library committee has been at work, and, as a result, some valuable books have been added. Mr. Glick has contributed seventeen volumes of historical and biographical works. Effic Terry, a former student, has given nineteen volumes of unbound magazines and an historical atlas; Robert McBride, '07, three volumes of standard poetry; B. L. Swofford, two volumes of American

history; Nelson Lewis, '05, one volume zoology; Miss Drake, eleven volumes unbound magazines; T. O. Cramer, nine volumes for literature department; Helen Fillie, two bound volumes of Scribner's Selma Crohn, five volumes; Donald Stophlet, five volumes; Gilbert and Eugenia Jaccard, eight volumes; Ruth Mc-Cluer, one volume. The school is also indebted to Congressman Cowherd for a number of valuable government reports. The students' library committee is composed of the following: Laura Sage, Helen Fillie, Gilbert Jaccard, Eugenia Jaccard, Alma Wade, Selma Crohn, Georgia Gentry, Bessie Dinklage, Ruth McCluer, Nelson Lewis, Egpert Schenck, Ross Flintjer, Horace Love, Herbert Hare, Richard Montague, Lester Baer, Alfred Wagner, George Steinhorst, and Leo Holz.

SCHOLARSHIP AND COURTESY.

Since man is a social as well as an intellectual being, every grace of conduct that can be added to his social accomplishments enhances the worth and power of his scholarship.

Now and then history points to a man of learning whose character was warped. whose influence for good was greatly handicapped, and whose life was rendered unhappy, because he lacked the elements of common politeness. Such was the case with the famous Dr. Samuel Johnson and with the Missouri rustic philosopher of local notoriety, known as "Blue Jeans Williams." Many men of far less learning, but with a rich supply of elegant manners, live a happier life and round out a more successful career.

If men like Doctor Johnson, Frederick the Great, and even Lincoln's war secretary, E. M. Stanton, were made to suffer thus, how much more would people suffer who have not the wealth of learning or the potency of genius to offset their shortage of good manners. It then behooves us, fellow-pupils, while our characters are plastic, to stamp them with the personal graces and accomplishments of social refinement.

As the curved line is the line of beauty in nature and in man's material works of art, so the gentle or sympathetic behavior of people makes their lives beautiful, if not sublime.

While our duties should be performed straightforwardly, still they should be executed in a graceful, if not chivalric manner; for

"Straight is the line of duty, Curved is the line of beauty; Follow the one and thou shalt find The other ever following thee."

While we are laying up a good stock of useful knowledge in science, history, and literature, while we are training our hands and eyes to be skillful with tools and machinery, still, with all this getting, we should get refinement or we will be called lopsided and uncultured.

Furthermore, this mark of culture has not only its practical value, but it also has its aesthetic and spiritual value, which means that the refined business man is sought and prized as a cherished companion after the practical business with him is transacted.

While the better class of people in the old world gladly credit the Americans with being quick, energetic, enterprising, and successful in business, still they consider us as too often blunt or impolite, as if we had neither time nor disposition to be polite. Doctor Harris, one of our ablest educators and our national commissioner of education, says that the typical English gentleman never swerves from the fixed ideals of the Anglo Saxon

gentleman, either in business or in society. Shall we outdo the Englishman in war and in business but allow him to outdo us in the decorum of the home, of the school, of the lecture hall, and of the street?

Two boys were once working for the same busy lawyer. While both boys were equally bright mentally, one was much more refined than the other. The one would noisily move about the room, interrupt people in the midst of a conversation, stumble against the office furniture, and recklessly toss the mail and packages upon his employer's desk; while the other boy would move quietly about the room, speak in a subdued tone, wait for suitable times to address people, and carefully place bundles and letters in neat piles upon his master's desk. Of course, the lawyer noticed these things and when Christmas rolled round, the more polite and faithful boy got a raise in salary, while the smart boy with boorish manners "got fired." If this same difference in manners clings to boys till manhood, it is apt to cause one to succeed and the other either to make a flat failure in business or to be known as a tolerably good business man, which, in the estimation of dealers in eggs, would be just as bad; for who cares to have anything to do with tolerably good eggs? So there is money in politeness, from the errand boy on up to the president of the Bank of England. Good manners often serve as a man's life preserver, even when the gentle civilities are light as air, just as in the case of the air-cushion at the foot of the elevator. The cushion is filled with nothing but air, but it lets down the passengers of a runaway car gently and safely.

Buffon, the eminent French scholar and naturalist, says that manners make

the man; but, of course, the kind of man depends upon the kind of manners which the man makes and practices.

Much has been said and done about making Kansas City a good place to live in. Let us as young people do our best to make the Manual Training high school a good place to study in, an ideal place in which to round out a polished as well as a useful young manhood and womanhood. Then will we derive the most good from our solicitous teachers.

We have a conscious pride that in "Old Manual" there prevails much of the elegance of manners. Those who possess this priceless badge of culture have the pleasure that goes with it; and those who have a hungering desire to acquire it can easily do so and share the pleasures of the ideal gentleman or lady, whom Sir Philip Sidney described as one "who has high-erected thoughts seated in a heart of courtesy."

To those boys who think it funny to stand in line in the hall and knock books out of the students' hands, we would like to express ourselves. We think such actions throw a bad light on the courtesy of our pupils. Neither can we appreciate the humor of such demeanor.

In spite of the additional responsibility on Mr. Phillips, he has not neglected to give us programs as good if not better than usual. Most of the following entertainments have been given by the pupils of the physical culture and elocution classes, and have not only served to amuse and instruct us, but to increase, if possible, our pride in Manual and in our fellow-students:

The program on January 8 included several of our school companions, and Manual is again indebted to Professor Robbins for one of his artistic, varied and finished programs, which reflected credit on both teacher and pupils. He was gracefully assisted by the charming vocalist, Miss Leonnie Dose.

Piano solo, Valse A's Major,—Master Max Block.

Piano duet, La Baladine,—Misses Bertha and Marie Wirthman.

Piano solo, 4th Baricarolle, — Miss Marie Wirthman.

Contralto solo, Her Rose,—Miss Dose.
Piano duet, March, in E Maj,—Misses
Norris.

Piano solo, Impromptu,—Miss Jessie Norris.

Soprano solo, Roses in June,—Miss Allee Barbee.

Piano solo, Hark, the Lark,—Miss Jean Norris.

On February 15 and 22 we were favored with an unusually interesting athletic exhibition under Mr. Hall's direction and by the following students: Frank Bruce, Lynn Hoyt, Edward Searles, James Donovan, Earl Karr, Howard Pauley, John Watkins, Calvert Atchison, Bernard Zwart, Elmer Brooks, Roy Benson, Richard Winstead. Exercises on the horizontal bar, in tumbling, and in forming pyramids were all given with the ease of professionals.

Next, the elocution classes showed us that they, too, are deserving of much praise. Miss Nettie Gallagher gave the "Swan Song" with much artistic finish and feeling. "Columbus" was delivered by Miss Mildred Bell with much force and strength. "Mary Elizabeth" was much enjoyed under Miss Krages' interpretation. "Naughty Zeld" showed in Miss Minister good understanding of the

humorous and pathetic elements. Miss Gentry gave a thirty-minute selection, "Antigene," in twelve minutes, and displayed careful study of the motives of the piece and much skill in cutting. Mr. Cowan's pupils all give evidence of the fact that they are doing good work, in both this program and another given on February 12. A selection from Robert Emmet's "Vindication" was a stirring address by Mr. Carson Chiles, and displayed to good advantage the qualities of his splendid voice. Jean Val Jean, an neroic bit from Les Miserables, was effectively delivered by Mr. Frank Hope. "The One-legged Goose," by Mr. Fred Albertson, was much enjoyed by the audience. Miss Hattie Butler gave the emotional piece, "Helene Thamre," very well and triumphed over a difficult se-In both elocution programs there was music, in the first one Mr. Joe Bren playing a selection from Godard very creditably, and in the second, Mr. Wood rendering "Bandolero" exceedingly well.

That "music hath charms," etc., was proved by the Missouri State university glee club on Feb. 4. All the college songs were much enjoyed and several new songs were introduced. Little Miss Tessie Marshall also delighted the audience with her wonderful elecutionary talent.

Feb. 19 proved a red letter day at Manual. Mr. Vernon Styles sang very delightfully, and there was also an address by Mr. J. J. Vineyard on "War and Peace; Work and Rest."

If we debate with Central this spring, boys, be on hand to try for the team which represents Manual.



TWO ENTANGLEMENTS.

I.

Jack Routledge swung off of a Troost car in front of the "Elsmere," reaching the sidewalk with a few long strides. An extraordinary noisy Winton came rapidly up the Avenue from the south with its exhaust puffing impatiently and the usual notes of warning. The three toots from the auto horn sounded familiar and Routledge glanced back over his shoulder just as he turned into Linwood. Just around the corner he collided with a pretty girl, who was even more surprised than The occupants of the touring-car laughed outright as the machine sped by. The girl was the first to apologize. Routledge's attempt was incoherent.

And she would have passed on had he not detained her. He was wholly unconscious of this detention, but she was quickly aware of it. A stray lock of her wavy, brown hair, flying in the wind, had wound itself firmly around the top button of Jack's coat.

"I—I beg your pardon," stammered Routledge, as both struggled clumsily to disengage the tangled lock. "I'm afraid I have hurt you—awfully sorry—dreadful tangle—here—wait—well, as I live, I—" He left the sentence unfinished.

She made no reply, but bending her head low over his shoulder endeavored to conceal her blushing face in the pretense of aiding in the disentanglement. The awkwardness of both was increased by the confusion of both.

"Very stupid of me," he muttered again.

But the hair only seemed to cling more obstinately to the button. In the fight for freedom, which both tried to participate in, their fingers touched several times, and at each touch a little thrill ran through Routledge. Finally she looked up at him in mute appeal.

A sudden idea struck him and he remembered Alexander and the Gordian knot. "I'll cut it off," he told her.

She gasped.

"I mean the button," he explained, smiling. "Unless—"

"Cut off the button," she said with dignity.

He did so and she was free.

"Thank you," she said.

He lifted his hat and hastened on. At that instant the automobile clattered by on its return trip.

"Try again, Johnny," sang out Harrison Fiske, its owner and Jack's chum.

Routledge started to reply, and not in accents of Christian charity. But Fiske intercepted him, and what Routledge said was rendered indistinguishable by a long blast from the French horn as the Winton disappeared around the corner.

TT.

At a dinner party that evening Harrison Fiske found himself seated by an attractive-looking young woman, who, he remembered, had been introduced as Miss Pemberton. Now Fiske owned a touring-car and liked it immensely; so naturally he began the conversation on a theme which he enjoyed.

"Do you enjoy automobiling, Miss Pemberton?" he asked as soon as he found the convenient opportunity.

Miss Pemberton enjoyed the riding, although the smell of gasoline often caused her a headache.

"Then you are not an enthusiast?" continued Fiske.

No, there were other things she liked better; automobiling seemed such a foolish fad to her. And she thought *some* of the people who indulged in it were perfectly horrid.

Fiske's countenance fell. It is not the most pleasing thing imaginable to have one's pet fad or fancy run down and trampled on.

But the young lady, not observing his look of dejection, even spoke more disapprovingly of automobiling and its followers; she spoke in a sort of languid contempt of these people. When she had finished, she looked up at Fiske and asked him if he didn't agree with her. Naturally Fiske didn't.

"Of course," she said, as if by way of explanation, "I understand that with people in the East it is somewhat different. But here in Kansas City—well, only this afternoon I was so unfortunate and awk-

ward as to collide with another pedestrian out on Linwood boulevard, whereupon some ill-bred people who happened to be passing at the time in a ponderous, red touring-car could not restrain their mirth, but laughed outright."

Now Harrison Fiske had laughed. He had also been in the "ponderous, red touring-car." Could she have remembered his face and recognized him? He thought it extremely improbable, but the tide of circumstantial evidence was setting in strong. And it was against him. His conscience smote him and already he saw himself convicted. He determined to plead guilty.

She looked at him with incredulous amazement while he made his apology and told his story.

"And to think that I was unconsciously reproving the offender all the time," she laughed. "It is almost too good to be true."

"But then, you know, the incident was rather amusing," he said in feeble protest.

Her only answer was a smile, but before the hostess arose from the table Edith Pemberton had told Harrison Fiske her part of the story; and in the laugh that followed he knew that he was forgiven.

TIT.

"Button! button! Who's got the button?" called out Fiske by way of greeting, as Jack Routledge sauntered into the smoking-room of the club s veral days later.

"How in the deuce do you know?" growled Routledge. His face wore a curious expression, half-scowling, half-smiling, with just the glint of forced good humor in his brown eyes that a man usually possesses when the laugh is against him. "How in the deuce do you know?"

"Some one told me," answered Fiske, nonchalantly, grinning wickedly.

"Told you what?" Jack's tone was one of mock curiosity.

"What I know, of course."

"Well, what do you know?"

"Several things. And I can prove them," continued Fiske, tauntingly. "I took two medals, you remember, down at M. S. U., and received an honorable mention at Princeton last—"

Jack's answer to Fiske was an impatient command, expressed in slang, in which Fiske was admonished to curtail his conversation.

"Cut what out?" asked Fiske, feigning surprise. "You asked me what I knew. Oh, you intended to ask whom I knew! I see." And Harrison Fiske broke into a peal of loud laughter; whereupon Routledge, again resorting to the vernacular and speaking figuratively, politely requested him to make another incision.

"Oh, yes, I know the girl," answered Fiske after Routledge had asked him a certain question for the third time. "I met her at a dinner-party out on the South Side the other evening. And a very charming girl she is, too, old man. What's that? Oh, you'd like to meet her so you could apologize. Apologize for what?"

Routledge told him that he was already informed of the incident which made the apology necessary.

"And would I mind saying a word for you the next time I see her and telling her you are a nice fellow? Why certainly not," said Fiske blandly.

Again Jack Routledge said something to his chum in an undertone, which, for the benefit of the bystanders, his chum repeated in louder tones:

"And sometime, after I become better acquainted with her, would I mind asking her if I may bring you out to call? Why, not at all, Jack. I should be delighted. But you are not going up al-

10

ready? Oh, you have a headache and think you'll go up to bed? Well, goodnight, old man. I'm sorry you're feeling out of sorts," said Fiske as Routledge rang vigorously for the elevator.

IV.

It is June and the roses are in bloom. By day the bees work incessantly among the blossoms, the humming-birds flit nervously about the climbing honey-suckles, and the butterflies over on the vacant lot fly irresolutely around the struggling dandelions. By night the fireflies dart hither and thither, the lawn-mower keeps up its clatter until after eight o'clock, and the June-bugs sing the opera of "The Moth and the Flame" under the arc-light over on the corner. Though it is almost dark the gay assembly across the street have not yet ceased their game of croquet.

On the topmost step of the front porch, with her chin resting on her hand, and gazing dreamily up at the stars which are just beginning to peep forth here and there, sits Edith Pemberton. Over to the eastward a soft, silvery light already foretells the rising moon. Edith stirs restlessly, looks about her, then picks up the newspaper at her feet and rises to listen. From up the street comes the sound of the light footfalls of a horse. She hastens into the house to put on her hat and get a wrap, in order not to keep Jack waiting; for the handsome black mare which Routledge drives to the runabout is a young animal and will not stand.

She lightly trips down the steps to meet him, just as Routledge drives up and springs out to help her into the conveyance. He gets in after her just as the restless animal starts off and away they go.

Three hours later the moon is at its height. The black mare has traveled far and fast, and notwithstanding her head is now turned towards home she is content with a walking gait. Edith makes a few attempts at conversation, but Jack is unusually quiet, evidently thinking. They ride on for some time in silence. The rubber-tired vehicle moves noiselessly along the hard macadam road where the shadows of the trees by the wayside lie in long, black strips across the white thoroughfare. The quick, light hoof-

beats of the mare, monotonous in their regularity, and the weird, lonesome call of the screech-owl in the neighboring wood are the only sounds.

Finally Jack receives a certain answer to a definite question, which pleases him immensely; and another little romance ends as other little romances have ended, and still the years go rolling on.

E. BERNARD GARNETT.

A FLAW IN THE TITLE.

From the time that the first settler made his "entry" on the unbroken soil of this state down to this moment, the biography of that piece of land has been systematically recorded and no incident connected with the "chain" of events that constitute its history has escaped the alert eyes of its successive historians.

Such a history is called an abstract, and such an abstract you have all noticed placed on the highest shelf or packed among other valuable papers, bound in its labeled manilla cover, darkened with age, soiled and ragged from handling and coated with dust.

Perhaps you have unfolded and casually glanced upon its stiffened pages and remarked that it is beyond human power to interpret the numerous abbreviations and to connect in chronological order the links of the chain.

The importance of an abstract of title in the commercial world can hardly be overestimated; for upon its examination and as a sole guarantee of the title to all lands, thousands of dollars change hands. By this means one can purchase property and safely pay a large amount of money to strangers.

The history of the laws of real estate

reveals a remarkable development, as the following will illustrate:

Mr. Tiedeman in his books on this subject, described the common law method for selling land by "feoffment." The party selling the land was called the feoffer, and the purchaser the feoffee. He says, "The feoffer, in order to make the conveyance, went upon the land with the feoffee, and in presence of witnesses delivered to the latter a clod of earth, or a twig or some other thing taken from the land which was treated as a symbolical delivery of the land itself. The feoffee, who during this time was standing near the border but on the outside of the land. then entered upon it and the conveyance was complete-no writing was necessary."

Tracing the annals of conveyancing to an earlier date, we find that the methods employed were even more crude, although displaying greater pantomime.

It is not my intention to intrude upon the details of a subject which has filled volumes, and from which technicalities have made libraries, but since leaving the Manual it has been my privilege to carefully examine upward of two hundred of these abstracts, covering lands in Missouri and Kansas, and it is with the idea of explaining what an abstract is, its use and importance, that I gladly comply with the request for an article to be published in a paper in which I have a very deep interest.

The English law made the king the original proprietor of all lands in the kingdom, but in this country, when the dominion of the mother country was thrown off, the United States in its sovereign capacity became the owner of all lands.

The government, under the most liberal terms, sold its lands to the early settlers, and that step forms the first link in the chain of every abstract of title. Such a conveyance is called a patent, being the highest evidence of title known to law, and is usually signed by the President of the United States.

After the patent the title is shown through its various changes down to the present owner. An abstract of title is like an intensely interesting book, being full of characters, history and action. Its first owner may have been an Indian or some poor pioneer seeking a new country,

and it is among these names that we read of men whose fame has been handed down since the early history of this state. Those are characters. It is at this early point that the titles diverge, and the land is transferred over and over again as the years pass by. That is history. sales, foreclosures, death of owners and partition suits among heirs, and other processes appear in the abstract of title, all of which the examiner must minutely scrutinize until the title is found to be in the name of the present owner. Frequently four or five generations of a family must be mapped out to learn how each member has conveyed his interest, and all of the facts that may be relevant That is action. These illustrations may serve to suggest one feature of the many problems upon which the foundation of every house rests.

By analogy you will understand that the omission of a single link or a careless mistake in the important part of any conveyance might destroy the strength of the entire structure and give rise to that ominous statement, "Flaw In The Title."

LEON E. BLOCH, '99.

A DESCRIPTION OF MR. MORRISON'S NEW SCHOOL.

My Dear Friends:—Thinking it will be of interest to my friends at Manual, I will try to give a conception of Prof. G. B. Morrison's new home—the McKinley high school.

As one approaches the new McKinley high school, he is surprised at its size, its architecture and its beauty. It is built of dark, reddish-brown brick, and brown stone. Its walls rise three stories in height and are well pierced with church-like windows, which give it a peculiar look—peculiar, because in this respect alone it differs from the towers of old. At each extremity on the north side of the building as well as to the right and to the left of the main entrance, rise sentinel-like towers overlooking the building. The main entrance, facing the north, is approached by wide and massive granite stairs. The wide entrance is well glazed with leaded glass. Passing through large and heavily mounted doors, one steps across the doorstep of modern architecture.

A glance at the church-like architecture immediately reminds one that he is in a cathedral, not of worship, but of education. A few steps up the marble stairs and one is in the large corridor. auditorium is on the south side of the hall. Leather-covered doors admit one into a beautifully decorated theatre, the stage of which is large and well elevated. A balcony in the back is reached by the second floor. The office is on the north side of the hall and is well equipped with modern fixtures. To the right is Professor Morrison's large and well-lighted private office. The remaining floor space is taken up largely by class rooms. are also laboratories for the science department and the boys' first year manual training department. The laboratories are filled with modern conveniences, and rooms for the apparatus with lockers and The boys' manual training rooms are large and well equipped. Series of seats are arranged at one end, where the class may be given instruction as a whole. The walls are of white enameled brick.

The second floor is a repetition of the first in arrangement of rooms with exception of the library, which is above the main entrance and opposite the balcony entrance on the second flooor. The library is quite large, containing many hundred volumes. The furniture consists of large tables and comfortable chairs. In the north part of the room to the right and to the left are small octagonal rooms, which are shaped by the towers that rise from the sides of the main entrance. The rest of the second floor is occupied by class rooms, art rooms, business departments, girls' domestic art and science departments.

The third floor is a large mechanical drawing room, into which light is ad-

mitted from all sides. Adjoining are store rooms with lockers for material, blue printing room, and a dark room. basement contains lunch rooms, where coffee, ice cream and other eatables may be bought; the boys' advanced manual training department; engine and boiler rooms; and store rooms, are in the dark corners. The building is decorated throughout with burlap. The ceiling and border are a greenish yellow, the walls down to the wainscoting line are a dark green, and the remaining space down to the marble baseboard is done in a rich The beauty of the decorations is heightened by the oak wood work, which is stained black. This brings out the characteristic grain of this beautiful wood. The doors are heavily mounted, each knob having a bust of McKinley embossed upon it. The complete decorations are elegant in color and massive in size. Many conveniences help to make this a great school. A telephone system connects the office with every room. The temperature is automatically regulated. At every turn the beauty of the decorations and the characteristic architecture are apparent. Having gone through the building one can justly call it a "Cathedral of Education."

The St. Louis high school which I attend, has an enrollment of 2,500 pupils. The pupils are very much like those of Manual—they have an abundance of school spirit. A class election or a foot ball game brings out good results. Foot ball, however, has the best support.

Many of you will visit the World's Fair during your coming vacation, and will visit the schools, beautiful parks, drives and other things of interest. Hoping to see many of you this summer, I am,

Most sincerely your friend,
WILLIAM G. FUNCK.



LET THE GIRLS BE THE COOKS, BE THE COOKS.

"Oh, girls! Do listen!" cried Helen Dean, rushing in among a crowd of girls who were assembled at her home, and wildly waving a note. "The postman has just handed me this invitation in which we are all interested."

"What is it? Read it, read it!" they cried in one breath. And Helen read:
"Miss Helen Dean, Sec. of Miss Emerson's Cooking Class:

The boys of the X, Y. Z. society invite the girls of Miss Emerson's cooking class to a dinner to be prepared by the members of the above mentioned society on next Saturday at 6 p. m., at the home of John Armstrong."

"Oh, what fun!" burst forth several girls. "The idea of those boys giving a dinner and cooking it, too. Isn't it surprising the amount of confidence they have in themselves."

"But girls," said Evelyn Noble, "this may be only a joke, for you see, Saturday will be April 1st."

"No, no," said Helen, "I don't believe that can be so, for Tom is always teasing me about the cooking class, and only last night he said, 'We boys will show you some day that we can cook, and without any lessons, too.' He says the boys are tired hearing us talk about that banquet we are going to have in May. I suppose he was thinking of this invitation then."

Saturday arrived, and the girls went in a body to John Armstrong's home. They were met at the door by a small boy who ushered them immediately into the dining room where they were greeted by a young man who bore a striking resemblance to the president of the society, with the exception of the burnt cork on his face. The girls were shown to their seats and, looking at their place cards, saw smiling at them their particular friend among the boys, dressed as a cook in cap and apron with stew-pan in hand.

The center-piece was an immense head of cabbage. Large bunches of parsley were scattered all over the table; even the butter was almost smothered in the green. But most startling of all were small cards laid at each plate which bore these words: "We realize that we are asking a great favor, but on account of the inexperience of our waiters we beg you to be perfectly quiet while the meal is being served." Under usual circumstances this instruction would have been unbearable, but the novelty of the occasion made it less trying. The majority of the guests only tasted the soup course, as it was of a doubtful flavor, and after some whispering and giggling they decided that it might possibly be the Chinaman's favorite dish.

Shouts of laughter greeted the second course. The waiters filed in in a solemn procession, headed by one who bore on a platter a chicken dressed in tissue paper. Even the gravity of the waiters was almost destroyed.

Isabel Meredith, usually irrepressible, had at first astonished all the girls by her quiet behavior; but after this her mischievous spirit conquered her, and as Hal Thornton, the most pompous of the waiters, passed her, she nudged his elbow. Crash! Over his white apron and the table-cloth poured a stream of muddy coffee. The girls, struck by the ridiculousness of the whole affair, fairly shouted and Hal, crestfallen, sneaked back into the kitchen.

After the salad they were asked to adjourn to the next room to enjoy the dessert. On entering the other room, what a scene greeted their eyes! There in the large drawing room was a magnificent mahogany table decorated with flowers, damask linen and cut glass. Over all the candelabras shed their mellow glow. There was John's aunt, a dear, white-haired old lady, smiling and greeting the girls. What a contrast to the other room—one so homely and full of mystery, the other so bright and attractive!

Here ice cream was served, and here in a few minutes the boys presented themselves, bearing distinct streaks of burnt cork on their faces and hands. Nearly every hand was bandaged or tied up in some manner. The girls relieved from the request of maintaining perfect silence and the boys from their responsibility, began an animated conversation. The girls were naturally very curious to know if the boys had really prepared the dinner. By their appearance it seemed possible, but the results had indeed surpassed all their expectations.

Finally, just before the time to ge

home, the president told in a few words the experiences of the day. He said that when they sent out the invitations, they were confident that they could make the dinner a grand success. Each one was to contribute a masterpiece toward the menu. They decided to give the dinner at John's home because his parents were abroad, and they could use the house and disturb no one. They began work at nine o'clock, but they soon found that something was needed beside cook books and brawn. He, himself, had first scald d his hand, which rendered him utterly helpless. The cakemaker, after laborious efforts, burned his cake black. Hal, who really did know how to make salad, spilled the whole contents of the salt box into the dressing as he was putting on the Much to the girls' finishing touches. amusement, he proudly stated that the soup was their own preparation. By four c'clock scarcely anything had been accomplished, and they were tired and discouraged. Finally John's aunt had come in to see how they were progressing, and seeing their plight, told them that she had foreseen the result of their efforts and had prepared some dishes which they could use if theirs failed. She, herself, had prepared the second room according to her own taste. In conclusion, he said that the boys had unanimously voted to hereafter let the girls be the cooks.

And we, as impartial observers of the catastrophe, can but commend the wisdom of their decision.

Attention:—Any person wishing to take a business course in one of the leading Kansas City Business Colleges will please consult the business managers at THE NAUTILUS office immediately.

THE REVOLUTION IN LITERATURE CONTEMPORARY WITH THE AMERICAN REVOLUTION.

While Washington and his heroic army were fighting for freedom, the literature of England was passing through a revolution. It was not a revolution in social ideas as in France, or of philosophical ideas as in Germany, but a revolution in literature from which developed the literature of today. English passion and imagination were aroused from their dormant state and the products of this period were only paralleled by those of the Elizabethan age.

The revolution which poetry underwent was a change in its tone and character. It was the abandonment of the poetry of the seventeenth century, which struggled after classical correctness by conforming to arbitrary rules of art; it ignored external nature, despised all men but the rich and the learned, was devoid of imagination and passion, and dabbled only with intellectual theology. The chief causes which led to this revolution in poetry were: (1) The religious agitations of John Wesley; (2) Study of natural poetry of Chaucer, Elizabethan writers, and of Bishop Percy's collection of English and Scotch ballads; (3) French Revolution; (4) Introduction of transcendentalism from Germany by Coleridge. Democratic and philosophical ideas swept over England from the continent and were combined by the English poets with their own religion and romantic ideas. From this grew a poetry of theology, passion, nature, and universal man. This movement commenced with the publishing of the "Task" by Cowper in 1784, although it had existed in a vague manner in the poetry of Thomson, Grav, Collins

and Goldsmith; it culminated under Wordsworth and ended with Shelley. There were few poets who did not come under the influence of the revolution. George Crabbe's description of rural life in "The Village," "The Parish Register" and "Tales of the Hall" caused him to be ranked among one of the prominent renovators. Robert Southey procured his poetic themes from distant ages and remote races. Thomas Moore's "Lallah Rookh" gave a romantic tale of Persia and India. Coleridge showed the influence of Spenser and old English ballad writers in his "Christabel" and "Ancient Mariner." Percy Bysshe Shelly excelled all, but he carried his ideas so far into the realms of metaphysics as to cause his contemporaries to misjudge him, and not until the succeeding age was he fully appreciated. These men were products of the revolution, which brought poetry before the world in a new light.

This age of revolution witnessed a marked decline in the drama and the advancement of the novel to take its place. William Godwin portrayed the social life of the English at the time, while Mrs. Apie's stories and the novels of Jane Austin were based on English domestic life. Mrs. Trollope, Mrs. Gore, Miss Penier, Miss Anne Radcliffe and Mrs. Shelley, wife of the poet, were popular authors of fiction. Maria Edgworth, one of the greatest novelists of her time, wrote several Irish novels which abounded in fine sketches of natural life and manners. "Patronage," which set forth the evils that arise from dependence on the great, and

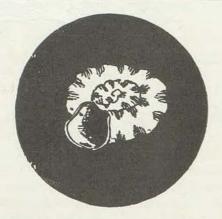
"Absentee," are said to have suggested the Waverley novels to Scott in his attempt to celebrate the scenes and customs of Scotland. The first of the Waverley novels appeared in 1814 and for nearly twenty years Scott held the reading public in suspense and admiration. His successor, Bulwer Lytton, published his first great work, "Pelham," simultaneously with Scott's last powerful novel. In rapid succession followed his romantic, classical and historical novels, which have a world-wide fame.

The historical poetry of Southey, Scott and Bulwer Lytton led to great development in the science of history. Henry Hallam was the first great impartial historian produced by England. His three great works are: "View of the State of Europe During Middle Ages," "Constitutional History of England" and "Introduction to the Literature of England." Hallam was a Whig in politics, but preserved an astonishing calmness and impartiality in his history. Macaulay said, "He sums up with calm, steady impartiality, turning neither to the right nor to the left, glossing over nothing, exaggerating nothing, while the advocates on both sides are alternately biting their lips to hear their conflicting misstatements exposed." Doctor Lingard, in contrast to Hallam, wrote his English history filled with his private prejudices. Other noted historians of the time were Metford, Thurwall, Millman, Tyler and Carlyle.

This period witnessed another important event, which did much for the literature of the nineteenth century. This was the rise of the periodical. Heretofore there were but few magazines, and their contributors have appropriately been called "one-horse lubbers." In 1802 a literary enterprise was undertaken by several young lawyers in Edinburgh, which led to the revolution in journalism. These young men met with Francis Jeffrey one afternoon and organized with Jeffrey as editor the nucleus of the now famous Edinburgh Review. The Review was a success from the first; its boldness and audacity in literary criticism, its able discussions of all matters relating to politics, religion, and life, and the literary splendour of its articles contributed by the most accomplished authors of the age, placed it above all other magazines. The Edinburgh Review fiercely advocated liberal opinions and revived Pitt's policy. The Quarterly Review was started in 1809 under the editorship if William Gifford, a less discriminating critic than Jeffrey. Between these two periodicals a warfare was carried on for nearly half a century. Many of the greatest minds of the age ranged themselves according to their religious and political policy on either side. The Edinburgh Review numbered among its ranks Sydney Smith, Lord Byron, Sir James MacIntosh, Hazlett, Macaulay, Hallam and Carlyle; while The Quarterly was upheld by John Gibson Lockhart, Sir Walter Scott, Robert Southey, Canning and Croker. Following the starting of these periodicals, new ones appeared rapidly. Among some of the important ones were Blackwood's Magazine. The London and The Westminster Review.

From this we can see poetry in a new garb,—the drama declining and the novel rising to take its place, the social study of history commenced, and the establishment of several periodicals which were destined to play a large part in English history.

EDWIN PIERCE, '05.



THE CHAMBERED NAUTILUS.

This is the ship of pearl, which poets feign, Sails the unshadowed main,—

The venturous bark that flings

On the sweet summer wind its purple wings In gulfs enchanted, where the Siren sings,

And coral reefs lie bare,

Where the cold sea-maids rise to sun their streaming hair.

Its web of living gauze no more unfurl; Wrecked is the ship of pearl!

And every chambered cell,
Where its dim dreaming life was wont to
dwell.

As the frail tenant shaped his growing shell, Before thee lies revealed.—

Its irised ceiling rent, its sunless crypt unsealed! Year after year beheld the silent toil That spread his lustrous coil; Still, as the spiral grew,

He left the past year's dwelling for the new, Stole with soft step its shining archway through,

Built up its idle door,

Stretched in his last found home, and knew the old no more,

Thanks for the heavenly message brought by thee,

Child of the wandering sea.

Cast from her lap, forlorn!

From thy dead lips a clearer note is born

Than ever Triton blew from wreathed horn! While on mine ear it rings.

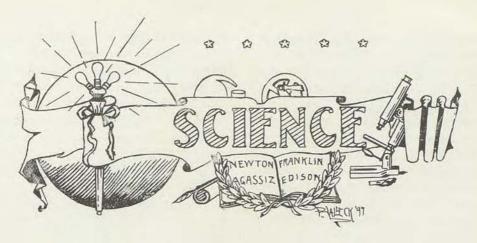
Through the deep caves of thought I hear a voice that sings:—

Build thee more stately mansions, O my soul,
As the swift seasons roll!
Leave thy low vaulted past!
Let each new temple, nobler than the last,
Shut thee from heaven with a dome more
vast.

Till thou at length art free, Leaving thine outgrown shell by life's unresting sea!

-Oliver Wendell Holmes.





FLOWERS OF THE WEST.

Although Missouri acclaims herself of the West, nature has not placed her in that division. The only western states whose flora can be compared with hers are those of the sea coast. But, even in these states, the conditions for plant growth are so much more favorable that our old friends of Missouri can scarcely be recognized. This is especially true of California, where the heliotrope, here so delicate, and the geranium climb to porch tops, and callas serve as hedges. Yet Oregon and even Washington vie with her in favorable conditions. In the former state velvety green lawns, roses and other things typical of a California winter are seen at Christmas and not long after the dogwood and pussywillows blossom.

But the conditions and the flora in the other western states are radically different, and, as they are of the majority, may be considered typical of the West. As the brevity of this article forbids a detailed account of the flora and conditions, I will speak briefly of those states which vary from the general, and then select a characteristic one from each state.

The flora of Arizona, the hottest and driest state in the Union, and New Mexi-

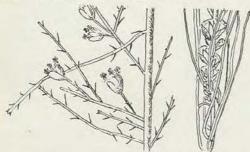
co, its neighbor, is more like that of old Mexico, of which the Spanish bayonet and the century plant are typical. Montana, Utah, Colorado and Idaho have the most favorable conditions-Utah and Colorado the best of all. Their valleys are covered with hardy blossoms and high up on the mountain tops blow lilies that are more delicate than the most fragile of Missouri's flowers. On the very highest peaks in the Wasatch range grow Utah's most beautiful flowers. Among the "children of the hour" is the sago-lily, of crystalline whiteness, with delicate chocolate tint, and the wild China lily swaving on its slender stem. Of the other flowers the "butterfly" form is the most common, but the coloring, sometimes violet, sometimes a delicate shell pink, and sometimes of the purest white, is always the most beautiful imaginable.

Utah, as well as the other states mentioned, borders on the bed of what was an early Eocene lake and is now a desert. In the very heart of this region is the state of Wyoming, which contains the elements making it a typical one for securing an idea of the character of the western flora. First, it possesses a greater variety of

flowers than any other state. Secondly, its almost rainless mountains and alkali plains, with occasional "greasewood regions," are a composite of the conditions in the states typical of the West. Thirdly, its average temperature is a medium between those of the other states.

The first general condition to be noted in Wyoming is that, though there is such a variety of flowers, the growth is very sparse. Often not more than one of a kind will be found within a half-mile radius and you are never treated to such a sight as the poppy fields of California. This practical application of the law of "the survival of the fittest" is the cause of the chief characteristic of Wyoming flowers. Except in the more favorable localities, the plants are what are termed "weeds" and are specialized in almost every part.

The plants which grow on mountain peaks from the crevices in the rocks, or in the thin soil on top of them, are likewise hardy though small. Three specimens will show their general characteristics.



The one that grew from the soil has a very small root and a slender stem an inch long. This stem is covered with trichomes. On it grew tiny leaves opposite each other and flower stems appear from the base of the second and third pair. The flowers are white, with yellow stamens, and a light green calyx. The edge of the sepals of this calyx and of the leaves are white and tissue-like, as are the petals.

The second grew in deeper soil and is rosette in form. The petioles of its leaves are purple. These leaves are more fleshy and of a darker green than those of the first. The flowers grow in heads in involucres, the head being yellow and the involucre purple. The plant as a whole is hardy in appearance.

The third had its root tightly wedged in a cleft in a rock. Two short stems branched out from the root. At the ends of these are bunches of five "spears." Their centers are white and the outer part a light green. Around the edge of each are small but beautiful yellow flowers. And, in its whole appearance, this, as well as the other two, is far more beautiful than the blue lily, the most fragile of Wyomino's flowers.

Down on the mountain sides grow daisylike flowers and larger plants. They may be divided into three groups. The characteristics of the first are a strong stem covered with trichomes; small, narrow leaves; and downy heads of flowers, white with vellow stamens or of a peculiar brownish color. The most prominent characteristic of the second is that the flowers grow in spikes and look much like the leaves. Another characteristic is broad leaves, with two smaller ones, specialized stipules, at the base of the petioles. Two specie of this kind have their leaves covered with trichomes. Their flowers are red, white and pink. The third grows in the more favorable localities and is not so highly specialized. The different specie resemble those of the red root, the primrose, the cornflower, the bluebell. But all are more hardy in appearance and have their stems covered with trichomes.

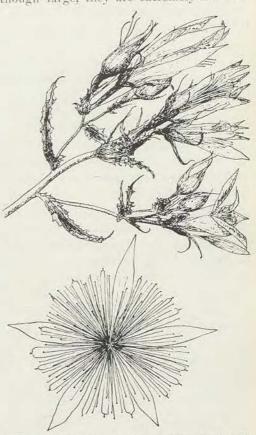
On the plains the plants are more bushlike, with four exceptions. 'The first is the numerous beautiful cacti. The second is a plant about a foot high, having flowers like our water-pink. They grow in leafy spikes. The leaves are scarcely an eighth of an inch wide and are three inches long.

The heads are white with pink tips and are enclosed in a brittle, thorned involucre.



The third is an herb, growing to the heighth of three feet. Its slender stems are enclosed in a thick covering of trichomes to the heighth of six inches. About this distance above they commence to branch. Tiny brown scales at the joints are all that there is of the leaves. At the ends of the light green stems are yellow flowers so small that they are scarcely visible to the naked eye. The fourth is the flowering sage, with its racemes held close up to the stem. The flowers rarely open wide, so the sole visible color is gray.

One of the most beautiful of the bushlike plants is entirely covered with trichomes. The woody stem has a coat of dark gray ones. The involucre surrounding the yellow star-like clusters of flowers as well as the thorny stems on which they are borne has a thick covering of downy white. The largest of the bush-like plants is about four feet high. Its flowers are six inches in diameter. They are star-like in shape and are indeed guiding stars to the insects which it is necessary to attract. The inner side of each petal is of a beautiful satiny yellow, the outer of a dull white. The flowers are closed in the daytime and the leaves are of a green that harmonizes with the surroundings. So, though large, they are extremely har I to



see at that time and are therefore not liable to injury. But at night the flowers open to their full expanse and their lustrous yellow soon attracts a swarm of insects. This would be of little use to the plant if it could not make sure that the insects attracted would scatter the pollen so as to assist in the work of pollenization.

So each flower has numberless stamens in order that the insects attracted cannot help but scatter the pollen. Each succeeding circle of the stamens going outward is wider than the last, showing that petals are even now being changed into stamens. Tight green leaves with long thorns serve as a protection for the flower buds. The color scheme is completed by the white trichomes covering the woody stems.

In this plant are found all of the chief characteristics of Wyoming, and so of western flowers. They are highly specialized and are even now undergoing visible changes to better fit them for their surroundings. They are hardy, but lose little in beauty on this account. They are objects of admiration to the flower-lover because of their form and color. But to the botanist they are the most beautiful of flowers, because they combine with these things such wonderful specializations that they may survive under western conditions.

INEZ HANSEN, '05.

FRAGMENTS OF SCIENCE.

THE WINDOWS OF THE SEA.

Some sixteen years ago Charles F. Holder described a plan to a boatman of Santa Catalina for using a "sea window." In other words, to have a large piece of glass set in the bottom of a boat, so that passengers would be able to see the beauties and wonders of the sea. This plan was tried and found to be so popular that an industry has grown from it. Especially at Avalon, Santa Catalina, is this way of seeing the mysteries of the deep popular, for the water here is beautiful and clear and the beds of kelp and moss are very abundant.

DEATH OF A WELL-KNOWN CHEMIST.

H. Carrington Bolton, well known for his chemical bibliographies and chemical investigations, recently passed away. His numerous contributions to, and intimate knowledge of, the history of chemistry, his gentle and generous sympathy aided and stimulated many active in research or technical applications of chemistry. His monumental bibliographies, put out by the Smithsonian institution, are masterpieces.

COAL OF SIBERIA.

There are now five coal-producing districts in Siberia, not including the Konzentsky basin, the development of which, despite its extraordinarily rich deposit, is prevented by lack of transportation facilities. In 1900 about 10,000,000 pounds of coal were supplied by the Scheremkhovo district, near Irkutsk, as fuel for the Siberian railway. The other coal districts are Soudzenkovo, Ekelbaztouz, Saghalien and the coast of the maritime territory.

THE FIRST BICYCLE WORKS OF JAPAN.

The first bicycle works in Japan are about to be started by a syndicate of eighteen Japanese financiers, with a capital of 150,000 yen.

IMPROVEMENTS OF UNITED STATES RAIL-ROADS.

The improvements under way by the railroads of the United States aggregate nearly \$400,000,000.

A NEW CURE FOR SCARLET FEVER.

At the Carlsbad convention a new cure for scarlet fever was announced. The honor for this discovery must be credited to Doctor Moser, the assistant physician at St. Ann's Hospital for Children at Vienna. The cure consists in the utilization of serum.

A GERMAN INVENTION.

The stunted trees and shrubs of the Japanese have been the wonder and envy of gardeners the world over. But a German chemist now comes along and does

something which even the Japanese could hardly be expected to do. He has prepared a fluid that has the power, when injected into the tissues of a plant near its roots, of anaesthetizing the plant. As a result of this injection the plant does not die but stops growing, maintaining its fresh, green appearance, though its vitality is apparently suspended. Changes in temperature seem in no wise to affect the foliage for the plant blooms in the open as well as in the most carefully constructed hot house. As might be expected, the composition of the fluid is shrouded in the greatest mystery.

SOME FACTS ABOUT RADIUM.

"There is nothing new under the sun—nothing new but what has been forgotten," the sages said. This may have been true two thousand years ago, but times have changed. Today science, in seven-league boots, is making rapid strides along the path to knowledge. Important new inventions claim the attention and even new elements are being discovered.

The discovery of Roentgen rays marked an epoch in the history of science. A new field for investigation had been opened. A few years later the discovery was made that the element uranium emitted rays similar to the Roentgen rays and apparently without losing energy or being changed in any way. "Are there not other elements which possess this power?" scientists began to wonder. It was investigation along this line which led to the discovery of radium.

Science owes this important element to a woman. When Mme. Curie, who occupies the chair of physics in the normal school at Sevres, heard of the discoverv of the radiations from uranium and its compounds, she wondered if there were not some other element which had similar properties. She procured samples of every known element and studied them carefully, and in this manner she found that the element thorium possessed such properties. Furthermore, on examining a specimen of pitch-blende, a uranium ore, she was astonished to find it much more active than uranium itself. led her to conclude that pitch-blende contained something more active in emitting rays than the uranium. The new element was traced to the bismuth obtained from pitch-blende and named radium. task of separating it from the bismuth required years, but well repaid the outlay of money and effort.

Radium is very difficult to separate from its ores and consequently very expensive. The market price is about five thousand dollars a grain—more than one bundred and twenty-five thousand times the price of gold. Not only is radium so

difficult to separate from other substances, but an enormous quantity of pitch-blende is required to make a small quantity of this radio-active element. A ton of the ore left after uranium is extracted contains only from four to seven ten-thousandths of a pound of radium.

The term radio-active may not be generally understood. The radiations of sound and light are familiar to all, for they act directly on the senses. Scientists have known for many years that warm bodies give forth rays similar to light rays, although they do not affect the nerves of sight. Among these invisible radiations are those which affect photographic plates. Such rays are known as Becquerel rays, named for their discoverer, Henri Becquerel. Besides their action on photographic plates they discharge electrified bodies by making the surrounding air a conductor of electricity, and cause many substances, when placed near them, to phosphoresce or glow.

The Becquerel rays pass through bones almost as readily as through flesh, so that sharply defined shadow pictures cannot be obtained. Experiments now being made to determine the value of radium in the treatment of disease seem to be very successful. Two cases of cancer, at least, have been cured by the radium rays. A cure for this terrible disease is well worth years of patient study. A

wide field of usefulness seems opened to radium and its possibilities for the future are wonderful.

The physiological effects of Bequerel rays are interesting indeed. If living tissues are exposed to strong radium rays for only five minutes serious sores result. These do not appear at once, but several days after the exposure. Paralysis and death have been caused by radium in experiments on the lower animals. Bacteria have been either killed at once or retarded in their growth by the rays.

Ordinary glass acquires a violet hue under the radium rays. Salt crystals turn blue. Photographs may be made by the radium rays in less than a minute. An electrified body loses its charge in a fraction of a second. The genuine diamond glows with a clear, bright light in a darkened room if radium is brought near. Imitation stones are not affected.

Radium has not yet been obtained in a completely pure condition. The most common form is a combination of the element with chlorine—radium chloride. It is a grayish-white powder, resembling salt very strongly. But to realize that a pinch of this innocent-looking salt is worth more than a thousand dollars is rather startling. Until within the last few months pure radium salts could not be obtained at any price. Today they may be secured for about three and one-half million dollars a pound.

GRACE MILLS, '04.





TRACK TEAM.

The track team, under the direction of Mr. Hall, is making good progress. There are at least twenty-five candidates who have enrolled in 6B for the preparatory work, and many more are expected to join the squad as soon as outdoor work begins. The work so far has consisted merely in getting the muscles in trim and practicing the form for high and broad jumping as well as for the hurdles. As yet, the Association has not been able to secure a place in which to practice, but we hope to secure the lot across the street, which will enable us to have a small track as well as courts for the tennis team.

In the resignation of Mr. Moore, the Athletic association has lost one of the best managers it has ever had. Last year was the first that Mr. Moore had anything to do with the school athletics, but the success that attended the teams during this time easily showed his business ability. But this was not the only thing that stands in his favor; it was his ability to be one of us when the occasion demanded that made Mr. Moore liked by all the pupils.

BASKET BALL.

On the 19th of February Manual played her first outside game of basket ball of the season with the Kansas City, Kansas, high school team in the Manual gymnasium. The score was 31 to 19 in favor of Manual. Both teams showed excellent training and played well. Much credit is due to the forwards, especially Miss Nellie Hewitt of Manual and Miss Proudfit of the Kansas team, as well as to the rest of the two teams.

Manual did the best playing in the first half of the game, making 19 to 5 for Kansas City, Kansas. On the other hand, the visiting team did much better in the second half, making 14 to Manual's 12.

The line-up was as follows:

Kansas City, Kansas. Manual.

Miss Warren...Forward...Miss Hewitt
Miss Proudfit..Forward...Miss Trumbo
Miss Wilner....Center....Miss Lane
Miss Abraham...Center.....Miss Gross
Miss Gorden....Guard...Miss Warner
Miss Kelly....Guard.Miss Ziegelmeyer

BASE BALL.

Candidates for the base ball team are already in training. Many of them have enrolled in 6B, the noted gym class, and

from all appearances Manual should have a good team. The team this year will be provided with new suits, which will be a decided improvement over the old ones. Those boys who wish to try for the team will please leave their names with Roy Neal, captain. The schedule for this year is as follows:

Manual vs. Westport.

Kansas City, Kas., vs. Central.

Kansas City, Kas., vs. Manual.

Westport vs. Central.

April 9.

April 16.

Central vs. Manual.

Westport vs. Kansas City, Kas.

April 23.

Manual vs. Westport.

Central vs. Kansas City, Kas.

April 30.

Manual vs. Kansas City, Kas.

Central vs. Westport.

May 7.

Manual vs. Central.

Kansas City, Kas., vs. Westport.

May 14.

TRIBULATIONS OF AN UMPIRE.

He was a peace-loving man. So at first he did his best to be truthful, and favored neither side.

But finding that the indignant spectators would not let him escape trouble by any such craven method as this, he changed his tactics and favored both sides. Hastily he switched again. For the supporters of each side swatted and reviled him sorely because he favored the other side.

So he chose the side with the most rooters. Chastened, he admitted his mistake. Only about twelve could get within landing distance of him anyway, so it didn't matter much which side they were on.

Then he tried to resign his place and was nearly killed.

So he resumed business and tried calling each decision exactly opposite to what it should have been. This pacified the spectators for a while, but knowing he must be hoodwinking them some way or they wouldn't be so satisfied, they pitched into him again with renewed vigor and soda pop bottles.

"Play ball," said the umpire.

"Ar-rh!" repeated the spectators.

"Play b——" He did not finish the word. His speech seemed to be impeded. Indeed, it is recognized by all linguists to be a matter of nice difficulty to pronounce a word, no matter of what language, and swallow the big end of a rapidly hurled pop bottle simultaneously. So, perceiving this, the umpire ate the half finished word and most of his teeth. But—

"Play ball," persisted the umpire.

"Ar-rh!" sputtered the opposing teams.

"Ar-rh!" shrieked the populace.

"Play ball," firmly.

He was in no wise surprised at the rush that followed. He welcomed it. He welcomed the first man with a kick in the stomach. * * * In the thick of it he regained consciousness.

"Oh," he groaned, "Oh! If I could but die I think I should be very happy."

Whereupon the players of one side, and the players of the other side, and the spectators, and the police, united and made him so happy.

JOHN CRAIG.



COSTUMES OF EARLY AMERICANS.

When we read of the struggles of the early colonist, and the hardships he endured, we picture a man dressed in plain, homespun garments. On the contrary, fashions and dress were as closely studied by the early colonist as by the native Englishman. The settler observed the modes and fashions, not through vanity or love of self-adornment, but because of "its moral effect upon mankind." Dress in America, as in England, was an important badge of rank. However, as the spirit of independence grew, the rules of dress, a great many of which had been introduced by the dress-loving Elizabeth, were disregarded. The spirit of freedom and liberty, characteristic of our people, shows itself even in this matter.

Through various old records and portraits of our ancestors, we may trace quite definitely the various changes of dress in the colonies. In one section, the Puritans' scorn of fine dress is manifested by their simplicity of custume. In the other, the Cavaliers' easy and extravagant ways find expression in their elaborate attire.

Virginia was perhaps the wealthiest of the colonies. The greater part of her population were the well-to-do cavaliers of England. They had not the Quakers' dislike of fine dress, and shiploads of costly gowns and rich costumes were imported every year. In Maryland there was perfect freedom of dress. There is evidence that rich and costly wardrobes were brought over by the owners of the manors. Here, as was the case in the other colonies at this time, the dress of the gentlemen was made of even finer material and was more costly than the ladies' costumes.

In both Maryland and Virginia the prices of the garments were paid for in pounds of tobacco. In this case it is difficult to fix an exact value on the articles, as the price of tobacco varied from year to year.

There was exceptional elegance at all public meetings and social gatherings in Maryland and Virginia. However, at home, the planters went in negligee costumes. At this date there was the universal prevalence of wig-wearing among all classes of people. Gentlemen, children, soldiers, negroes, slaves, and even convicts, wore this false head-gear. To show how extreme this fashion was, there is the instance of a shipload of convicts who were sent to America to serve their term of years. Before leaving the ships they were supplied with second-hand wigs.

The Southern newspapers contained few advertisements of milliners and assortments of fabrics. The New England housewives took pleasure in their shopping. They might visit haberdashers'

shops, mantua-makers, and have their choice of India gauzes and muslins. The Southern housewives prepared long lists and sent them to the London merchants and then were compelled to wait patiently for the ships that were to bring them year-old styles.

Now the times have changed and fine clothes are no longer an important badge of rank. The spirit of independence, which started its growth among the earliest of settlers, has developed and broadened the minds of all our freedom-loving Americans.

MARJORIE B. WILCOX, '05.

GLASS AND ITS MANUFACTURE.

It would be rather hard to determine as to when and where glass was first discovered. The oldest known specimens are Egyptian, and it would naturally be supposed the Egyptians would be the first to discover it. The first records of glass show its discovery about 1880 B. C., this being the time it was placed in sepulchers recently unearthed. The Egyptian glass was generally opaque, rarely transparent.

According to Chambers' encyclopedia, glass would take under its head several things commonly called pottery, vases, dishes, etc.

Glass, as at present manufactured, may be classed under the following heads: bottle glass, crown window glass, sheet window glass, plate glass, flint glass and colored glass. Until recently crown window glass was mostly used, but now German sheet, English sheet and plate glass are used very extensively. I will only attempt to tell something of sheet window glass.

One of the most essential things in the manufacture of sheet window glass is a good pot in which to melt the substance from which glass is made. This pot is made of a kind of clay found near Worcestershire, England. The pots are all hand made, and made of the very best possible material.

After the pot is in the furnace ready to use, the following substances are placed in it: sand (in this country found near the Great Lakes); sulphate of soda, ground; sub-carbonate of soda; white oxide of arsenic; manganese; anthracite; chalk; limestone; nitrate of soda; and cullet, about 12.5 per cent of the other ingredients. These substances vary in proportion to the manufacturer's taste.

The time required to melt this mixture is generally about eighteen hours, with a very hot fire. In the natural gas belts, natural gas is used for fuel.

After the glass has become melted, the glass blower gets as much of the melted glass as necessary on the end of his blowpipe (a long hollow pipe of iron prepared with valves to keep the blower from sucking the hot air into his lungs), places the end of the pipe with the melted glass into a tub of water and blows it out into the form of a small sphere. He then places the iron blow-pipe with glass on end into the furnace, heats the glass up to nearly melting point, blows it out to a large ball and then begins to swing it back and forth through an open place in the floor till he has blown out a perfectly round cylinder, two feet or more in diameter and about six feet long.

After the cylinder is finished by the blower, it is laid upon a large bench, where the blow-pipe is cracked loose by drawing a string of melted glass around the large part next to the blow-pipe and giving the blow-pipe a light tap with the hand.

The cylinder is next cracked from end to end by a red hot bar of iron being run from one end to the other on the inside of the cylinder.

After the cylinder is cracked, it is placed in another furnace on a large iron table, perfectly smooth and flat, and there straightened out into a sheet about oneeighth of an inch thick and six feet long by six feet wide. The glass is also polished and tempered, as it is called, in this furnace, or oven.

After it is taken out of this furnace and cooled, it is taken to the cutting room and there cut into different sized panes of glass. This glass can be cut only by small glass-cutters made of diamonds set in the very best of steel.

W. H. F., JR.

MANUAL'S MANUAL TRAINING EXHIBIT AT THE WORLD'S FAIR.

The boys in the manual training department are busy making preparations for the St. Louis exhibition, in which we hope the work will rank among the first. Everything that will be sent from here will be made by the students, and some are taking a great interest in the work.

The shops, as a whole, will be best represented by a case, similar to a book-case, which they will all help to make. It is about five and one-half feet high, three feet wide, and twelve inches deep, made of hard oak, with a dark finish. It has glass doors, a drawer at the bottom, which is the full width and about four inches deep. Within this case are four adjustable shelves, one of which will contain the work of the joinery shop, another the turning display, the third the forging exercises, and the fourth the work of the seniors from the machine shop. Therefore, we will be as well represented within the case as we are by the case itself. The boys in the joinery shop are doing the carpenter work on the case, such as joining the sides and bottom. The boys in the turning shop do all the turning. They are making a three-eighth-inch rail, which passes through posts with ball tops. It will be placed around the edge on top of the case. The length of the posts is from two to three inches, arranged so as to form an arch over the front. The boys in the forging shop will make the drawer-pulls, or handles, the hinges and all of the wrought iron trimmings. The rollers, castings, locks and things of this kind are made by the boys in the machine shop. When the case is all finished and filled with exercises, it will represent four years' work, or the work that one student would learn to do by taking the full course in manual training.

Manual will send two sets of exercises
—one for the special exhibit, and one for
the state exhibit.

The exercises from the joinery shop will be T squares, card trays, boxes and different kinds of joints, such as halfjoints, open joints and dove-tail corners. The boys in the turning shop have been glueing different kinds of wood together, and out of this they make goblets, napkin rings, Indian clubs and fruit-stands. The forging exercises will be chains, hooks and weldings of different kinds of metal. The machine shop boys will turn out such exercises as jacks, hammers, face-plates and tools.

Aside from the case and exercises, we are to send a motor made by one of our students last year, Cooper Milnes. It will be an excellent representation of our manual talent. For the special accommodation of this motor and its pattern, a strong, handsome oak cabinet is being made.

C. E. GILMORE, '05.

THE EVOLUTION OF THE BOLT.

The original stock from which bolts are made at the "Nut and Bolt Works" in Sheffield is the scrap iron gathered up by the junk buyers all over the country. It is taken into the rolling mill, which adjoins the bolt works, and thrown into gasheated furnaces and reduced to a molten mass. It is then taken out of the furnace and run through rapidly-revolving rollers, from where it comes out in pieces one hundred feet long and about one inch thick, as compared to its size on entering the furnace of about two or three feet long and seven or eight inches thick. Two men then straighten it out on an iron floor and it is left to cool. When cold, it is cut into short bars, twelve or fourteen feet long, after which it is placed on trucks and taken to the bolt department. Here it is cut into small pieces called blanks, which are merely the straight pieces of stock from which the bolts are made. One of these shears, or powerful cutting machines, can cut seventy-five or a hundred thousand blanks in a day, and when told that several of these machines are kept busy,

you may easily see the daily output of this factory. These blanks are corded in iron boxes by boys, and they are then taken to the furnace, where a boy places them in a roaring furnace heated by crude oil fanned by a powerful blast. He handles these blanks two at a time with a pair of tongs about three or four feet long. They heat very quickly, and when at a white heat he takes them out of the fire and puts two cold ones in their place. In this way the work progresses rapidly. The hot blanks are seized by a man with a small pair of tongs and put in a machine. He quickly pulls a lever and the machinery makes a spasmodic move and the head is made. Another man then shovels the bolts into a wheelbarrow and takes them away to the threading room, where they are dumped out on the floor and left to cool. When cold they are threaded by boys for a cent a thousand on patent threading machines. They are then ready for use, and after being placed in kegs and boxes are shipped to various parts of the United States.

MARION ALLEN, '05.

INDIAN BASKETRY.

In its earliest stage, basketry was a savage industry which reached the distinction of art among the North American Indians. First the primitive people used it because

it could be turned into profitable account, but later, as ideas changed and progressed, it became ornamental.

Its history dates back even before not-

tery, for when daubed with clay the basket was hung over the fire to cook the food of the aboriginal man. When this clay was baked to hardness and separated from the basket it still retained the impression of the latter, so that in a short time pottery was introduced as being more useful than the fragile basket.

With the Red man that once roamed this country at will the basket was burdenbearer—it held the papoose, the food and stores; it was carried to the seashore for the wampum and fish; it held the grain and berries; served as a saddle-bag; it was the dowry of the bride, and last it served as a cooking utensil. So we see it played an important part in all the domestic conditions of the Indian, and it is not to be wondered that this art reached such a stage of perfection with them.

Basketry is divided into two great classes-first there are those that are woven or plaited on a straight foundation; and, secondly, those that are sewed or wrapped on a coiled foundation. The coiled basketry is found among the Indians of the Pacific slope, the Pomos, the Clickatats and the Washoes being expert craftsmen (or craftswomen may be more truly said, as it is the women who do the work). The twined baskets are found among the Alaskan Eskimos, the Aleutian Islanders and all the tribes of the Pacific coast down to the Pueblos. Their only tools are a rude knife and a pointed bone, and when one sees these squaws seated in their dirty hovels, their clothes coarse and themselves unkempt, one wonders how such beautiful work can come from such rough hands. But their minds, their souls, their imagination and their memories are all full of beautiful patterns, and every figure that one may observe on a basket is symbolical of something, although the meaning may only be known

to the weaver. The mountains, the rivers, the lakes, the forests and the myths of their tribes are not forgotten, and one reason of the beauty of the original Indian work is that the spirit and the soul of the maker are put in it.

But the march of civilization caused the decline of this art until it seemed that it would be lost. After searching Europe and Asia for their objects of art, this country at last awakened to an appreciation of the artistic values of this early handicraft when it was almost too late, for the art was fast disappearing. But to prevent this the government decided to take steps, and so the office of the Indian affairs at Washington agreed two years ago to co-operate with the Indian Industries league to the extent of furnishing part of the salaries of a few native teachers to instruct others in this work. Soon plans were made to establish classes in basket weaving at certain national Indian schools; and to make their efforts even more far-reaching, it was decided that instruction should be given in the homes of the Indians so that the mothers of the race might have an incentive to preserve this art. At the same time the educational leaders began to appreciate this work and encourage its adoption in the schools chiefly for use as manual training, and in a short time it began to be taught (in its elementary form) almost universally in the schools. Now it began to appear so attractive that the women of this country began to take it up, so that one did not need to be an Indian maiden seated at the door of her father's tepee to be devoted to this art.

And instead of going westward with the course of empire this art is making its way eastward, where, in the course of its enthusiastic journey, it is welcomed as an ornamental and beautiful work of art.

OLIVE M. THOMAS, '05.



Freshman (caressing a sawed finger): "Here I am a-bleedin' for my points—and they say I am lazy."

Why is Raymond Lee so much like Kansas City? Ans.—Because he is so full of bluffs.

Mr. Woods: "Isn't Miss A. present?"
Pupil: "No."

Mr. Woods: "I was positive I saw her in that chair."

(She was present in his mind anyway.)

Why is it that people who go slowly on food are called fasters?

Intelligent Junior: "People are getting very strong nowadays. I saw two men go out in a boat and pull up the river."

Ques.—Why are rich men and automobiles in the same business?

Ans.—A rich man makes money, an auto makes time, and time is money.

Heard On the Street.

Senior: "Here, Atlas, I'll take a paper."

Junior: "Why do you call the newsboy Atlas?"

Senior: "Because he carries The World, simpleton."

Junior: "By the way, who were those two young ladies I saw with you?"

Sophomore: "Oh, did you see me?"

Junior: "I think I did. By the way, do they paint?"

Sophomore: "One of them does; the other gives music lessons."

Sophomore Girl (to a boy): "This is leap year, so I am going to ask you (consternation on the part of the boy) to lend me your knife." (The boy visibly relieved.)

Sophomores Take Notice: The term "sophomore" comes from the Old English and means, a wise fool. How well you are named, dear children.

Why is a jailor like a locksmith?

One locks the cells, and the other sells the locks.

There was a short senior named White, Who liked to stay out late at night. It seemed quite funny, When he lost all his money, And got home just at daylight.

Our Regal Line.

Egbert, first King of English—Schenck, '04.

Alfred the Great—Wagner, '04.

George I of the House of "Handover" —Beardsley, '05.

Richards III (who is himself again)—Montague, '04.

William Rufus (the conqueror of popup flies in a base ball game)—Botts, '04. Stephen the Handsome—Luckett, '04.

Edward VII (whose ruling is straight—in mechanical drawing)—Van Buskirk, '05.

And King "Dough-Dough," who needs (kneads) it—Miss Bachelor.

Mr. Page: "Can any of you girls tell me why you put salt on the beans when you boil them?"

Mr. Edwards: "I can."

Mr. Phillips: "Have you read Pope's Essay on Man?"

Chester Mann: "No; but I have read Man's essay on Pope."

The "grow-sir" business has been recommended to Eugene Young, Stanley Mullet, Herbert Hare and Colin Lee.

Mr. Dodd: "Here, pupils, I want you to give your attention to Mr. Lee. I want you to see something."

Helen Crandall said she wouldn't mind being caught in the same Webb that Ethel Bone is.

Nettie Galliger, asking for a mineral in minerology: "Mr. Mineral, please give me a Miller."

Mr. Miller: "No, thanks, I'm taken."

Mr. Chase: "What is eight minus ten?"

Freshman: "Two in the hole."

Teacher: "Johnny, how many kinds of potatoes are there?"

Johnny: "Sweet potatoes, Irish potatoes, and spectators."

Edward Van Buskirk: "I belong to a band of mercy."

Dick Montague: "What instrument do you play?"

1.r. Chase: "What is half of B?"
Junior: "D." (-B-).

Mr. Phillips (after the athletic program): "We will now sing 'My Country 'Tis of Thee 'accompanied by Mr. Davis and his two daughters with horns."

Lillian Carnes: "Oh, there's the bell and nobody's come." (Raymond was absent that day.)

Mr. Page: "Nobody is highly elastic."
Bright Senior: "What about the India
rubber man?"

It is suggested that Earl Mill and Herbert Powell cash some of the checks on their overcoats.

Helen: "Where is Nellie Carroll?"

Jean: "With the other boys, I suppose."

Freshman: "Help! Murder! Fire! Police!"

Mr. Claffin: "What is the matter?"
Freshman: "I saw a senior going up

Freshman: "I saw a senior going up the wrong stairs."

The Grave Side of a Dead Language.

Miss Drake (in Latin): "Translate 'rex fugit.'"

Puzzled Pupil: "The king, ah,—the king—oh——"

Helping Classmate: "The king flees."
Puzzled Pupil (brightening): "The king has fleas."

An ascot tie covereth a multitude of soiled shirt-fronts.

Don Stophlet said he wished he were a savage so he would never have to wash his face.

Something has happened. Egbert was seen in the assembly hall without any girls.

Robert Fairman called up Sara and talked to Don five minutes thinking it was Sara. However, Sara has bribed Don, or he might tell us some interesting things.

Pupil: "In ancient Greece the women

were looked down upon and made to take top rows of the theatre."

Miss Steele: "They were looked up to then, weren't they?"

Emma: "How did you get along in history?"

Ethel: "Fine."

Emma: "What was your topic?"

Ethel: "I didn't have any."

Don Moffatt, to a girl in history, who has been staring at him for some time intently: "What are you looking at?"

Girl: "Nothing."

Old Soldier: "Oh, hark, I hear the distant booming of a cannon."

Native of Kansas City: "Nope, that is nothing but a car with a flat wheel."

Our freshmen have set the style of wearing sweaters. Take notice, seniors and sophs.

As the cooking classes were going through Loose-Wiles' establishment someone remarked: "How extravagant they are; they sell the dough they need (knead)."

Jean to Eugenia, in mathematics: "Your hair and brains worked that."

Mlle: "Is my question definite or indefinite?" (Aside) "What is your name?"

Senior: "Definite."

Miss Drake (tapping Robert Allen on the head): "I want you to fill up that dimple."

The Wail of a Freshman Boy.

I have waited for an old cable car when the rope was broken.

I have ridden in elevators that stopped. I have used a party line telephone.

But any of these is easier than keeping a blotter in mechanical drawing.

Cast of Characters of the New Comic Opera Entitled "M. T. H. S."

Note.—There has been some discussion among the patrons of this play as to what the letters "M. T. H. S." signify. Accordingly for all purposes, dramatic and otherwise, it has been agreed to let them stand for "Mighty Throng of Harmless Students."

Sinful Peck, who is,—Mr. Frank Peck, '05.

Harmful Harry, who isn't,—Mr. Harry Havens, '05.

Peaceful Page, who was,--Mr. H. M. Page.

Grinning George, who does,—Mr. George Beardsley, '05.

Enchanting Egbert, who can,—Mr. Egbert Schenck, '04.

Daring Dick, who won't,—Mr. Dick Montague, '04.

A. Fairman, whom "none but the brave deserve,"—Mr. Robert Fairman, '04.

Fancy-free and heart-whole Foster (but it's different with the girls who know him),—Mr. Foster Palmer, '06.

Amiable Allen, who smiles but seldom, —Mr. Allen Elston, '04.

Dainty Dolly, a favorite (who has hers, too),—Miss Dorothy Hopkins, '06.

Merry Merle, who smiles (upon?),—Miss Merle Crandal, '05.

Happy Helen, who especially enjoys small sparks; that is to say, Ion's,—Miss Helen Dickey, '04.

Sassy Sara, who doesn't care who,—Miss Sara Moffatt, '05.

Scientific Selma, a revival of learning,
—Miss Selma Crohn, '04.

Mournful Maude, whose love is in St. Louis,—Miss Maude Chattan, '06.

Laughing Lillian (except when Raymond's away),—Miss Lillian Carnes, '03.

Teachers, freshmen, loafers, students, janitors, etc., etc.

Freshman (looking at an art club pin); "Is that an anti-cigarette society?"

George Beardsley: "I was coming down the street eating a roll when a man asked me what I was doing. I told him I was just taking a roll down the street and he looked rather startled."

A senior being sent to the dictionary to look up the word "wit" replied that he could not find it. "No wonder," murmured someone in the rear, "that is one of the local editors."

Lillian: "Raymond, what are you going to give up during lent?"

Raymond: "Watermelons."

Senior: "The river flew north."

Virgil, looking up at the stars: "The sun said the paper will be out tomorrow."

Sara: "Oh, I've lost my side comb and can't wear my hair to school tomorrow!"

The only thing the matter with the senior class is that they have a "child" (Carson) for treasurer.

There once was a laddie called

Watt.

Who had all his work to

the dot.

Miss Drake wanted to know How he got it all so— With a pony that bad boy she caught.

Out Coasting.

Herbert Rankin was guiding and Robert Fairman was headlight with Herbert's arms around him, but when Sara got on she said, "Oh, Rob, you have the best place on the bob." Was Robert jealous?

There once was a boy called Lee Casey, At Latin he sure was a daisy,

But so naughty was he, Oh, deary, oh me,

He made poor Miss Drake almost crazy.

A Maiden's Prayer.

Now I kneel me down to pray,
I hope my hat's on straight today;
And if it's not before I rise,
I hope it meets nobody's eyes.

For the best short poem and funny drawing we offer each a copy of The Annual. Please everybody try. Mark "Annual," and either drop in the box or give to one of the local editors.

Freshman, seeing Lee, Eyssell and Blakeslee coming down the street: "Are those boys bareheaded?"

Senior: "No; they are just wearing their Debater 'dinks.'"

Mr. Lee is wearing a large campaign button. We judge he is going to support Obediah Zachariah Oaks in the coming election.

Ledwidge Sargent has become a genuine ladies' man.

Mrs. Elston: "Don't use the expression 'ruby lips' so much. Ruby lips are worn out."

The "Debaters," for want of a better way of decorating room 30, have hung their pictures on the wall.

O, what a noble piece of work is Mann (Chester)! (Apologies to Hamlet.)

Professor Monroe, from Indian Territory, on examining one of those dainty broad-brimmed hat frames which the girls in the millinery class were making: "I dislike those broad, protruding hats for ladies; haven't you something of a narrower style?"

Miss Griffith, replying quickly: "No, sir; there is nothing narrow about our girls."



At any rate, The Messenger understands itself. It realizes that in the exchange column it "roasts" more than it "criticises."

The High School Oracle is an enterprising, creditable paper, yet too much space and time are devoted to local news.

"I wish," he said, "you could make the pies Like mother used to make." "And I," said she, "wish that you made The dough pa used to make."—Ex.

Father: "I never imagined your studies would cost so much money."

H. S. Boy: "Yes; and I don't study much, either."—Ex.

The William Jewell Student criticises one of its exchanges for quoting complimentary comments and yet further on down the page does the same thing. Why this thusness?

He smoked the deadly cigarette,
This youth of tender years;
For aught we know he's smoking yet
Beyond the vale of tears.—Ex.

The Daily Maroon, from the University of Chicago, is as newsy and enterprising a paper as any we have received.

At the last Junior party a certain young man, having been refused the privilege of seing a young lady home, remarked:

"You're as full of airs as a music box."

"Maybe I am," replied the girl, "but I don't go with a crank."

To The Graduate Magazine: Your paper abounds with excellent material, yet it would be cheered up and made more attractive and interesting by a few small illustrations or pictures and by a local or humorous department.

The last issue received from *The Purple* and *Gold* was an athletic number, and as such deserves commendation.

Heard in a chemistry laboratory: "Mr. ———, where will I find H 2 O? I've looked in every one of the bottles and it isn't there."—Ex.

The Luminary cover is rather flashy, though it is a good one.

The Lever is a clever little paper, well arranged, containing good stories and an exchange column, besides many other things.

The Donnybrook Fair very kindly says that The Nautilus "still comes regularly and is much enjoyed. The original cuts are good, and all the reading matter is well written up. The exchanges are bright this month." We are thankful to The Donnybrook Fair for its sympathy and encouragement.

Judge (to stuttering prisoner): "What are you charged with?"

Prisoner: "S-s-s-s-s-s-"

Judge (impatiently turning to policeman): "Officer, what is this man charged with?"

Officer: "Sody wather, I guess, yer honor."

We hardly know whether to congratulate Mr. Newmann or the Toledo high school on the excellent paper which they have published; i. e., The Retina. When the editor-in-chief has to furnish material and write up two other departments besides his own, contribute the best stories of the magazine for the literary department, and do it all so beautifully, we must acknowledge that he has a hard place and that he is a worker and a producer. Good luck to him!

"When Shakespeare wrote about patience on a monument, did he refer to doctors' patients, papa?"

"No; you always find them under a monument."—Ex.

Obedient Boys.

Mother: "I gave each of you boys an orange. Charlie, you promised me you wouldn't eat yours before dinner. And you, Jack, said the same. Have you deceived me?"

Charlie: "No; mother. I ate Jack's and he ate mine."—Ex.

The Jayhawker very kindly says that The Nautilus "is a first-class magazine in every respect. We notice that it always has an excellent exchange department." Thanks!

We welcome on our exchange list *The Radius*, from the Prosso preparatory school of this city. Even in this little paper we can see the good influence which Mr. Richardson (our former teacher, now director of this school) always exerts over

his pupils. The paper gives promise of being one of our best exchanges. "The Bridge-Park Flirtation," by Mr. Richardson himself, is a clever little story, and the beautiful little poem called "Persephone" we also recognize from the modest little "K. H." at the end and from the sweetness, earnestness and smoothness that pervades all Miss Hankins' work.

"Our sincerest greeting to the Manual's new principal, Mr. Phillips. By his long and faithful service in the Kansas City schools he deserves the promotion, and everyone who has ever been in his classes loves him and wishes him godspeed."—Radius. And Manual heartily cries "ditto."

The Jayhawker, from Kansas City, Kansas, is a neat little paper with some good stories. An exchange column would undoubtedly improve the paper.

Major Premise: Boys come to school to improve their faculties.

Minor Premise: The teachers are the faculties.

Conclusion: Boys come to school to improve their teachers.—Ex.

Jones (writing home): "Dear Father: I am working hard. My room-mate is preparing to go fishing tomorrow, while I am digging for debate."—Ex.

The Midland is not up to its standard in its last issue. There is too much local news to make the paper of wide interest and there is no exchange department. The literary department is good.

The High School Student says in its exchange column: "We wouldn't like to tell the exchange editor of the

just what we think of his column; it might be embarrassing." Now wasn't there a saying in vogue a long, long time ago something like "Charity begins at home," or even "People in glass houses The High School News is a newsy little paper.

The M. S. U. Independent is to be highly commended. It has excellent material and is well written.

It seems to bring grief to many to have the boys part their hair in the middle, but think of their grief when the girls began to part theirs! For a sample, look at the juniors.—Ex. Applicable.

"Yah" Lost It.

An Irish and a Dutch tramp had one sandwich between them. They divided the bread, but had no way to cut the meat, so they took hold with their teeth to pull at the given signal. "Are you reddy?" says Pat, between his teeth, and instantly the meat was gone as Hans opened his mouth to reply, "Yah."

The Hustler, a weekly paper from Vanderbilt university, is a hustling, enterprising paper.

Lives of students all remind us We should pay no heed to looks, But on passing leave behind us Inter-linings in our books.

Inter-linings which another,
Toiling hard 'midst grief and pain,
Some forlorn and flunked-out fellow,
Reading, ne'er shall flunk again.—Ex.

Kate: "So her second husband is a tenor?"

Fred: "Yes; she says her first was a bass deceiver."

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

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

English teacher: "For tomorrow take paragraphs two, three, four, six, nine."

Foot ball player (absentmindedly): "Change that signal."

Rosie: "Most things that are bought go to the buyer."

Felt: "Yes; all except coal. That goes to the cellar."

Stranger: "Do you know a man around here with one leg named Smith?"

Doctor: "Could you tell me the name of the other leg?"

"What's in here?" asked the tourist.

"Remains to be seen," responded the guide, as he led the way into the morgue.

"I've been spending the summer at a watering place."

"Why, Harry told me you were on a farm."

"Yes, but it was a dairy farm."—Tiger.

His Pa: "Bobby, I merely punished you to show my love for you."

Bobby: "If I was only bigger, pa, I'd return your love."

Friend: "In what course does your son expect to graduate?"

Father: "In the course of time, by the looks of things."—Ex.

Poeticus: "Since I have been living out in the country—next to nature, so to speak—I find that my poems come to me much easier now."

Cynicus: "Yes; I heard that the rural free delivery service has been extended to your district."

-Central High School Monthly.

As Charles was going out one eve,
His father questioned, "whither?"
And Charles not wishing to deceive,
With blushes answered, "with her"
—Stator.

"Brethren and sistern," concluded the Rev. Washington Johnson, "I hab demonstrated obstrusely dat de Lord hates a thief—dat He is not to be propigated by no offerin, thefo' I beg the pusson or pussons who stole yo' pastor's hog to make no contribution at de circulation of de offertory plate." Note.—The collection beat all previous records.—Princeton Tiger.

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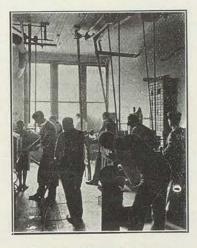
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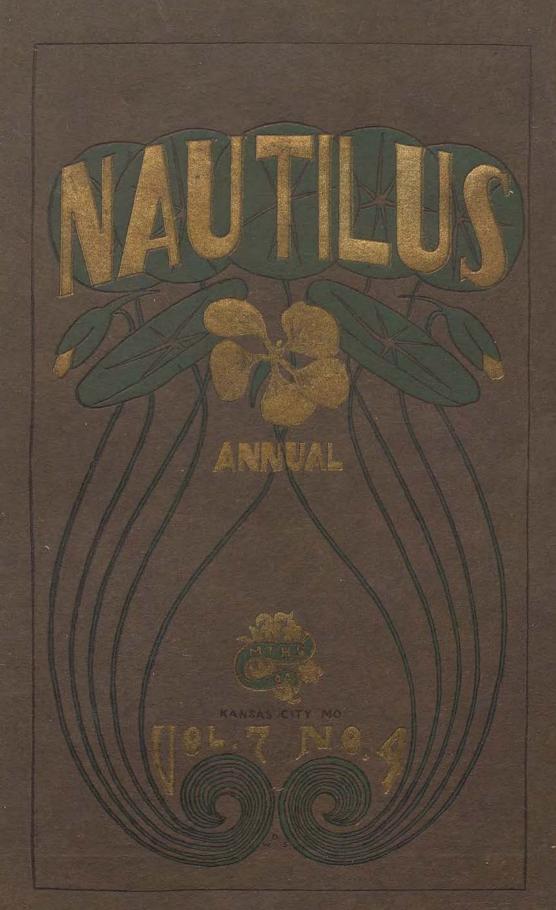
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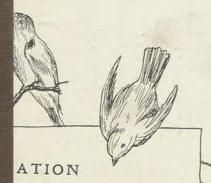


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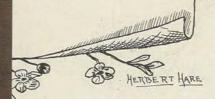
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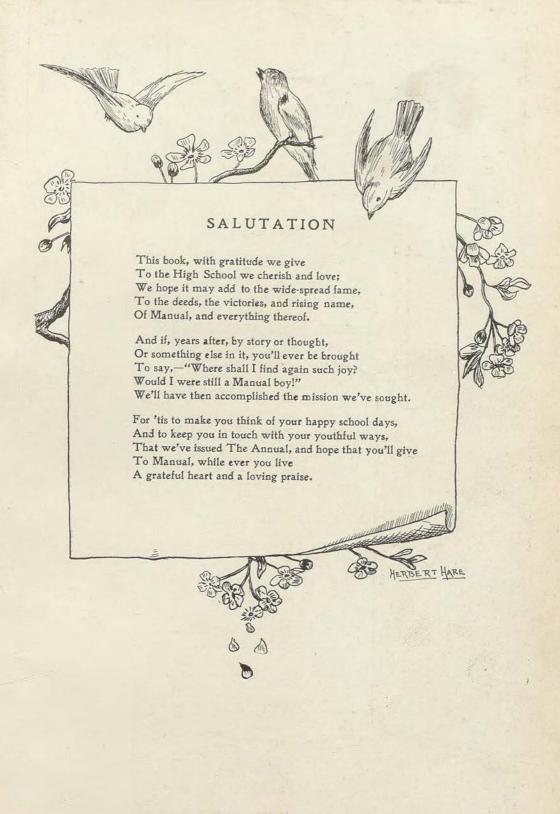
or thought,
'Il ever be brought
d again such joy?
boy!"
d the mission we've sought.

f your happy school days, th your youthful ways, ual, and hope that you'll give live y praise.



To the Seniors

and beauty. Tisturally, our





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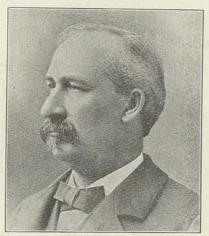
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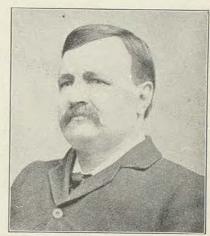
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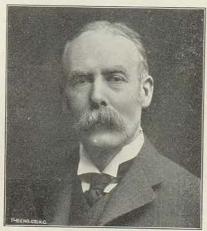
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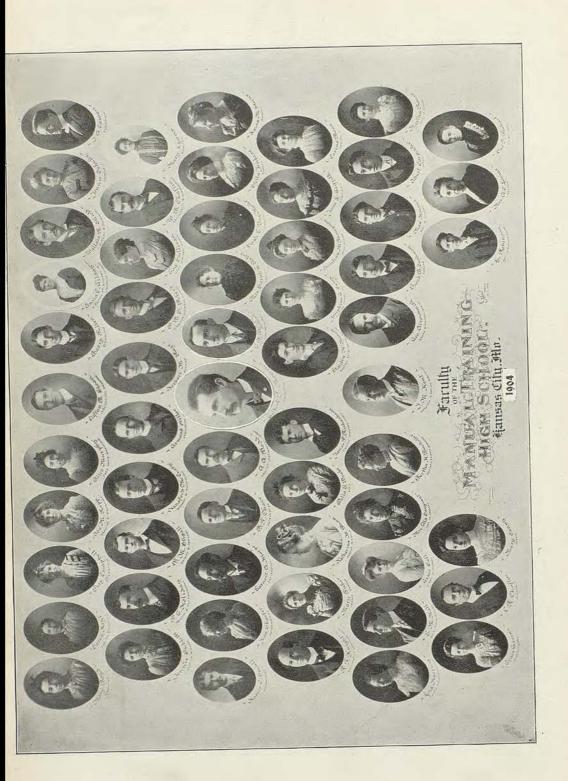
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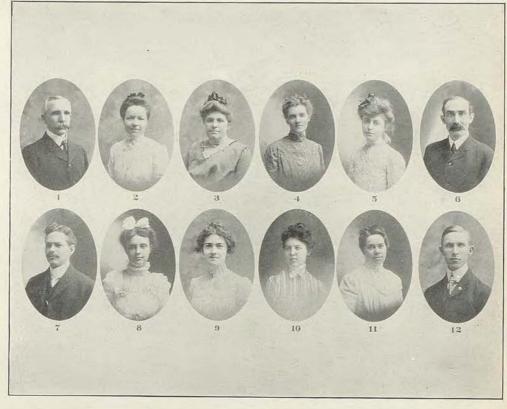
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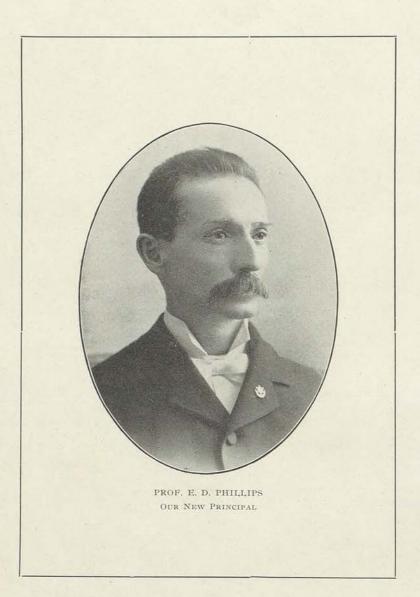
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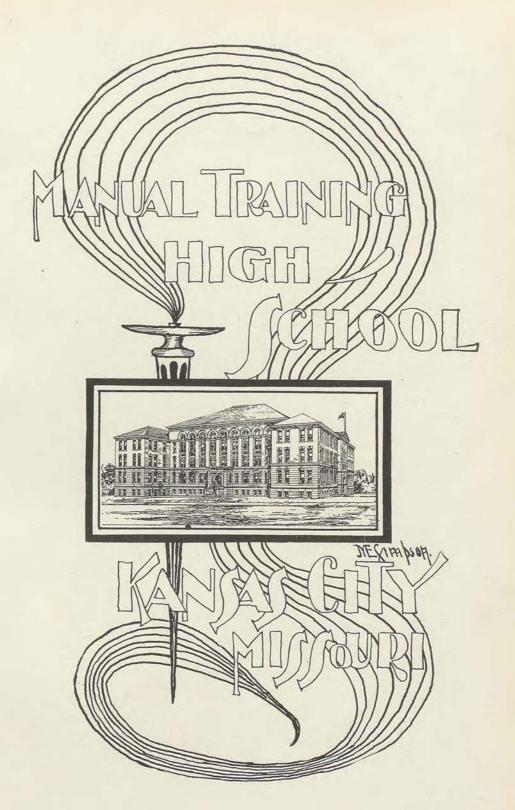
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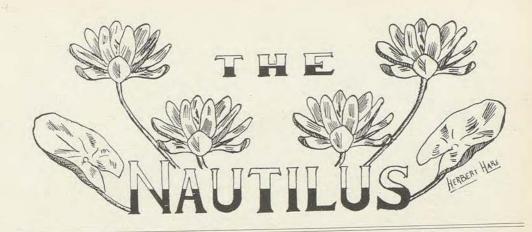




CONTENTS

Salutation						10.7	,
Staff -	-		120	-		-	2
School Boar	d -			-	1(2)	-	3
Faculty		-				15	4-5
E. D. Phillip	os -			(*)	100	1000	6
"Manual"	12	2		74.7	(40)	-	7
Contents -			- 3	-		-	8
Editorials							9
Literature a	nd H	istory		100		-	13
							35
Manual Tra	ining		12	-	2	100	46
Athletics	-				3		54
Exchanges	-		-	-	155	577	64
Locals	-	-	-	(#1)	140		68
Business -				-	14	124	80
Societies			7.	ė,		-	82
Seniors -			+	-	1000	17.	100
Juniors	54E	(14)	(10)		-		111

The End





MR. ALLAN ELSTON Editor-in-Chief



MISS SELMA CROHN ASSOCIATE-EDITOR

EDITORIALS

Our New .
Office

In this, our last issue, we wish to thank the School Board for

our new Nautilus office. There is now plenty of light, plenty of room, and plenty of privacy for the editors. The closet in which is kept all the old half tones and zinc cuts is conveniently at hand. We are greatly indebted to the School Board for the gift and hope that the Staffs of years to come will derive as much keen enjoyment from it as we have.

The tendency of some of the pupils to use our new office as a check-stand has, with the aid of the iron grating, been stopped. It seems that this iron grating has vastly amused some of the less seriousminded pupils, who have been wont to stand and gaze through the bars at the editors with all the instinctive enthusiasm of the born animal lover. Whether this attitude is traceable to the cage-like appearance of our office, or to the clownlike appearance of the editors, is a matter of some question. And now we wish to state for the benefit of all who have not vet been enlightened on the subject, that the small apartment under the side-stairs on the first floor is not an animal cage or a check-stand, but a seat of learning. THE NAUTILUS sign in connection with the office is a present from our principal.

ARTISTS

Mr. Phillips at Mr. E. D. Phillips Missouri State returned from Colum-University bia, Mo., where he went by invitation to deliver an address on "Horace Mann" before the students and teachers of the "Education Department." He is full of enthusiasm over the present fine condition and splendid outlook of the "M. S. U." He found eight or ten of Manual's graduates delighted with the work they are doing at the university. New buildings, new life, and renewed enthusiasm lend the institution the appearance of great prosperity. Mr. Phillips,

New Assistant We have added a new assistant business manager to the Staff

this spring. The reasons for this are plain. First, the prices of paper, labor, and printing material have risen steadily for the last year, making the total cost of printing our magazine more than one hundred dollars greater than the cost of a year or two ago. Secondly, the merchants of Kansas City are still suffering from the losses of the flood of 1903, and are not at all liberal in advertising. Thirdly, the new arrangement of school hours gives the



MR. HERBERT HARE



MISS MARGARET MCCRUM

while in Columbia, was the guest of President Jesse and of Dr. Raymond Weeks.

Honors for Miss Alice Murphy. Miss Murphy director of our art department, who granted a leave of absence in 1902 for two years to study in Paris, has been highly honored by having two of her paintings selected by the jury of awards, to be exhibited in the Paris Salon of the Champ de Mars. More than 4,000 paintings were submitted, of which number only 200, exclusive of those executed by members of the institution, can be chosen. Murphy will return to Kansas City in September.

business manager less time for soliciting than heretofore. In spite of these odds, the two managers have contrived to make the first three issues more than pay for themselves and deserve great credit for so doing. But prudently considering the strain to be too great for The Annual, they have added a helper in the person of Mr. George Beardsley, who has ably shared their burden to the benefit of all.

Lack of We cannot but dePoetry plore the lack of poetry
in our school. Never
till this year has this deficiency been conspicuous. Our exchanges have roundly
criticised us for the lack of verse in our

last three issues. This, of course, does not apply to humorous parodies, etc., but only to serious poems. Does this poetic famine arise from the fact that our minds are focused on the more material things of this scientific age, or because of mere lack of talent in our school for such things? We had sincerely hoped that when the English Literature classes began the study of Wordsworth, their hearts would surely then be touched, and pour forth an overwhelming flood of song to fill our columns. But that time has come and gone, and apparently put no music into the Seniors. Surely we have just passed the Dark Epoch of Manual poetry. Let us hope that next year our poetic souls will rebound from such a stagnant condition, and enliven the school with a spiriting renaissance.

Our Annual On Friday night,
Entertainment April 22, our first pay
entertainment for two

years was given in Assembly Hall. A large crowd attended and the performance was managed smoothly and without a "hitch." The participants were the two glee clubs of Mr. Woods, Miss Hoernig's athletic girls, and Mr. Hall's indoor "Gym" Team.

The Boys' Glee Club and the Girls' Glee Club each gave separately two numbers, and capped their efforts with a rendering in unison of that wild sea-song, "Sailing." The success of the glee clubs is due to the untiring efforts of Mr. Woods, who has voluntarily given his time and attention to them for two evenings a week during the entire year.

The athletic features of the program should call forth pride from every member of the school. The difficult exercises of Miss Hoernig's pupils were gracefully performed without a detectible error. A fencing bout between two of the Junior girls was an exciting number.

The Boys' Tumbling Team, under Mr. Hall, proved themselves to be the best that we have ever had. They executed with ease feats that Manual boys have never before been able to accomplish. The work of Mr. Richard Winstead on the horizontal bar was a feature, while Mr. Roy Nafziger presented a remarkable display of club swinging. Rival schools have more than once beaten us on the diamond, gridiron and cinder track, but we have yet to see the tumbling team of any school that can make a tenable pretense of being the equal of ours. The proceeds were for the benefit of the physical culture and musical departments.

The program was as follows:

- 1. Music, "Estudiantina," Lacome—Girls' Glee Club.
- 2. Step Exercises on Balancing Board, First Year Class; Wand Drill, Second Year Class. Fencing Bout by Nellie Hewitt and Inez Hansen—Girls' Gymnastic Class.
 - 3. Tumbling-Boys' Gymnasium Team.
- 4. Music, (a) "Mr. Pickwick" from the Comic Opera; (b) "Pumping the Pump," Dillon. Solo by Mr. Raymond Lee—Boys' Glee Club.
- Gymnastic Dancing, First Year Class;
 Calisthenics Rings, First Year Class—Girls'
 Gymnastic Class.
- 6. Horizontal Bar Work—Boys' Gymnasium Team.
- 7. Music, (a) "Blow, Soft Winds," Vincent; (b) "Cupid Will Guide," from "The Ameer," Herbert. Solo by Miss Jaunita Bohle—Girls' Glee Club.
- Gymnastic Dancing, Second Year Class
 —Girls' Gymnastic Class.
 - 9. Pyramids-Boys' Gymnasium Team.
- 10. Music, "He Ought to Have a Tablet in the Hall of Fame;" a parody written by Mr. Rick Fillmore. Solos by Messrs. Fillmore, Beardsley, Lee, Elston, Luce, Michaelis, Montague and Hoover—Boys' Glee Club.
- 11. Artistic Work, Third Year Class—Girls' Gymnastic Class.
 - 12. Club Swinging, Roy Nafziger.
- 13. Athletic Groupings—Boys' Gymnasium Team.
- 14. Music, "Sailing," M. Watson—Boys' and Girls' Glee Club.

The Nautilus The designing pupils
Covers have loyally supported
THE NAUTILUS this

year, for which we thank them. A great number of beautiful covers was submitted for all four issues. It was after much deliberation that the choice for The Annual's cover was allotted to Mr. Dean Stringer. Miss Charline Bayha's was judged second best, and Miss Sadie Danciger's was judged third.

Mr. Dodd at Prof. A. A. Dodd
Kansas University attended the first annual conference of superintendents and principals of Kansas, held at Lawrence on Friday and Saturday,

April 15th and 16th. Professor Dodd was on the program to discuss the teaching of mathematics in secondary schools.

Mr. Cushman

Although Mr. Cushman was, last February, suddenly appointed to take charge of the machine shop classes in addition to his forge shop work, he has most ably and efficiently managed both departments, and won the friendship and esteem of the boys. Besides giving the demonstrations to all of these classes and doing double service in supervising the work of his two faithful assistants, Mr. Cushman has since February 29 superintended making all but four of the iron and steel exercises that were sent to the World's Fair.

THE "ALLERLEI"

The Allerlei is a new periodical at Manual, published under the supervision of Miss Von Unworth, our German teacher. It is a year-book. Every word

in it is German, and all is written by Manual pupils. Miss Sadie Dansiger and Miss Nellie Hewitt are the editors-inchief.







MR. LESTER BEAR

/



MISS JEAN MORRISON

My Adventure in Ponil Park

EDITORS



WAS at the callow age of fifteen years when I underwent the following experience. Having never been more than thirty-five miles out of my native town in my life, my head was swimming with great expectations as I climbed on board a west-bound Santa Fe train, starting on a visit to my uncle in

New Mexico. As I felt the train pulling me out of the only world I had ever known, the sensations that came to me were, I judge, somewhat akin to those of the ancient Spaniard who roved about seeking for gold and adventure in the land of Mexico. And, although I did not expect, like he, to find pillars of gold or fountains of youth, I looked upon the West as a veritable wonderland.

I traveled all that day, all night, and until 10 o'clock the next morning before I reached the mining town of Label, New Mexico. This I found to consist of but one two-story structure called a hotel, a blacksmith shop, postoffice, and about four wooden cottages. On the north, west and south, all was trackless plain as far as the eye could reach, except for the solitary line of trees which marked the course of the Costilla river. On the east a spur

of the Ratoon range loomed up. As I descended from the train, a good-natured looking man, dressed after a careless, Western fashion, accosted me:

"Are you Grant?" he asked, bluntly. "Yes," I responded.

"I'm sent for you, then," he said, "Benning's my name"; he held out a brown, hard hand, which I shook. He then led the way to a post where two saddled horses were tied.

To tell the truth, I had never before bestrode four-legged beast, but I thought to conceal this fact from him by attempting to swing myself into the saddle with a careless ease of one used to such labors. But the horse refused to permit me to mount.

"Go around to the left side," said Benning.

I did so, and mounted without difficulty. Thus the first lesson I learned in this new and strange world told me from which side to get on a horse.

"Where does my uncle live?" I ventured to ask.

"Around yonder mountain, in the great Ponil forest."

It was then 10:30 o'clock. "Do you think we can get there by noon?" I asked.



He looked astonished. "If we have good luck, we might get there by sunset."

And so the second lesson I learned was that the ground is so level in the West, and the air so thin and clear, that a mountain may be ten miles off and appear to an Easterner to be less than one.

I will not dwell over-much on the miseries of that day's ride to me. For although the scenery under any other circumstances would have appealed to me strongly, my present condition made me entirely lose sight of it. I was bumped and bounced up and down like a jumpingjack at every trot of the horse. All day I suffered thus, my teeth knocking together as the steed, which tortured me, jogged along. My companion rode ahead of me with an ease that made me admire and envy him. It was dark when we entered Ponil Park forest. After a half hour's riding through this, we arrived at my uncle's house.

I was guided through the yard and into a large front room, where I prepared to meet my uncle. I had never seen this Western relative of mine, but I knew him to be one of the richest cattle owners in New Mexico. My Eastern mind therefore pictured him to be a man dressed after the latest fashion. He came in and seized my hand warmly. His free, openhearted manner immediately made a good impression on me. But he was not the gentleman in a frock coat that I had expected to see. Instead. I found him clad in a faded blue shirt and corduroy trousers. His shoes were large flat articles, more clumsy than any I had ever seen. Could this be my wealthy uncle, on whose money rested the fates of all the banks of Trinidad?

"I've just come in from feeding the hogs," he said, knocking the ashes out of a cob pipe.

He took me in to a supper, and then, seeing my fatigue, showed me to my bed. I had found out a third characteristic of this new country; namely, that the dress is a very immaterial feature of the man in the eyes of the Westerner.

When I rose the next morning, I was so stiff from my yesterday's ride that I could hardly walk. I limped downstairs and out into the yard.*

When I beheld the scene around me I was struck dumb with its beauty. Never had my city-bred mind conceived that this world contained such a picture. I looked across a forest of tree-tops and for miles and miles saw nothing but tree-tops. And finally, in the faraway distance, Mt. Fisher raised his head. Everything in sight was blue. The trees were blue, the sky was blue, and the distant mountain was bluer still. Cooper once described a "sea of treetops," but I can hardly conceive of his forest being as beautiful as the one I saw. He had no towering mountain-peak to set off his picture, and his were mixed trees, some being oak, maple, and walnut, some large and others stunted. But every one of Ponil's forest is a gigantic pine, not with a single exception. All are practically the same size and shape, all waving with apparent uniformity. Such a sight is worth going around the world to see. It gives one, whether he will or no, a greater reverence for the Maker of all such things.

My uncle interested me very much by telling me that a wild horse "round-up" was to be held the next day at a spot some five miles distant. He said that he would take me to see it. He explained to me that small bands of horses, wild as deer, called mavericks, yet roamed our southern West. I was informed that several of these bands had lately been seen in the vast domains of Ponil park. Consequently, a day's sport had been planned among the cowboys and

cattlemen of this vicinity to "round-up" some of these wild creatures in a corral, and "break" them to saddle and bit.

While my uncle was explaining this to me, a cowboy drew rein outside and called out:

"Seen a pinto horse with four white feet go by here? Ole Jack Lane's out again."

"No," called back my uncle, "haven't seen the rascal go ridin' by here."

Jack Lane, I learned, was a horse-thief, the greatest dare-devil in his state. "However," said my uncle, "he was bred in the East and can be as polite and gentle as a dude when he wants to."

The next day we started early to be in time to witness the "round-up." We had not ridden through the trees very far before we met many men with their wives and sisters also going to the "round-up." I was amazed at the marvelous skill with which the girls rode. In fact, I was amazed at nearly everything I saw. The jovial simplicity of the mountain people impressed me. The stimulation which the fragrance of the pine-needles bring to one can hardly be described.

At last we rode out into an immense clearing about a mile in diameter, with a beautiful lake in the middle. This open space was to be the center of operations. It was a grand amphitheatre of nature. On one side of this great opening in the forest were two hills. The sides of these were very steep and the space between them narrowed abruptly. The mavericks were to be driven between these two hills, and at the top of the canon they would find a strong fence. Turning, they would find themselves shut off at the lower end by mounted men. It would then be an easy matter to drive them into a small and strong corral.

The men had scattered through the forests to hunt the wild horses. At last we

at the edge of the clearing heard a loud yell of a cowboy announcing success. the other men spurred their horses toward this point. In a short time, from the far side of the woods, we saw a white horse plunge into the amphitheatre. Close after him, five others emerged from the covering and followed the leader. Never had I seen horses run with such speed. They ran with necks stretched forward and nostrils blowing hard. There was a wild, fearful look in their eyes as they glanced from right to left. Then fifty men and boys on swift horses burst into view in hot pursuit. It was the most thrilling sight I have ever witnessed. The long white mane of the leader flying in the wind, the perfect forms of the flying wild animals, and the chaos of hoof-beats,-all rendered me almost mad with excitement. I jumped up and yelled as I had never velled at football game or track meet. On and on went the brave band straight into the mouth of the canon. The cowboys dashed after them with shouts of triumph. The freedom of six, great, noble mustangs was robbed from them.

We rode by a roundabout way to the head of the canon. There, in a closed and guarded corral, we found the six wild horses. They hovered in a corner like frightened deer. They were the most perfect specimens of horses I had ever seen. Their eyes looked wildly about, and they regarded the men with horror. They could not understand the meaning of all this joking and laughter. At last, we locked the corral and went back to the clearing to eat our dinners. There was much speculating on who was to ride the old, white leader for the first time.

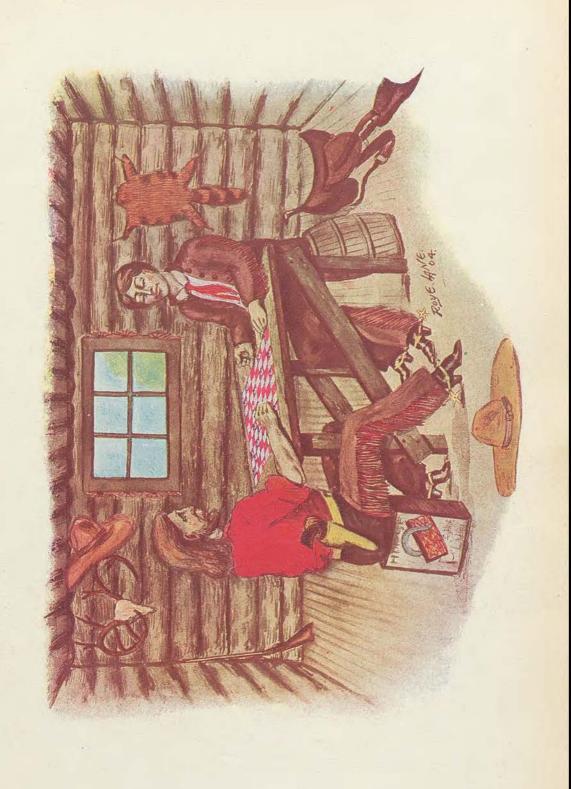
In about two hours, when dinner was over, everyone went back to the corral to see the wild horses "broken." But they were disappointed in this. The gate of the corral was found wide open. Looking out across the open space, we could see the band galloping, their heads turned once more toward their native plains, back to where they could live and be free. Disappointment and surprise reigned everywhere among the ranchmen.

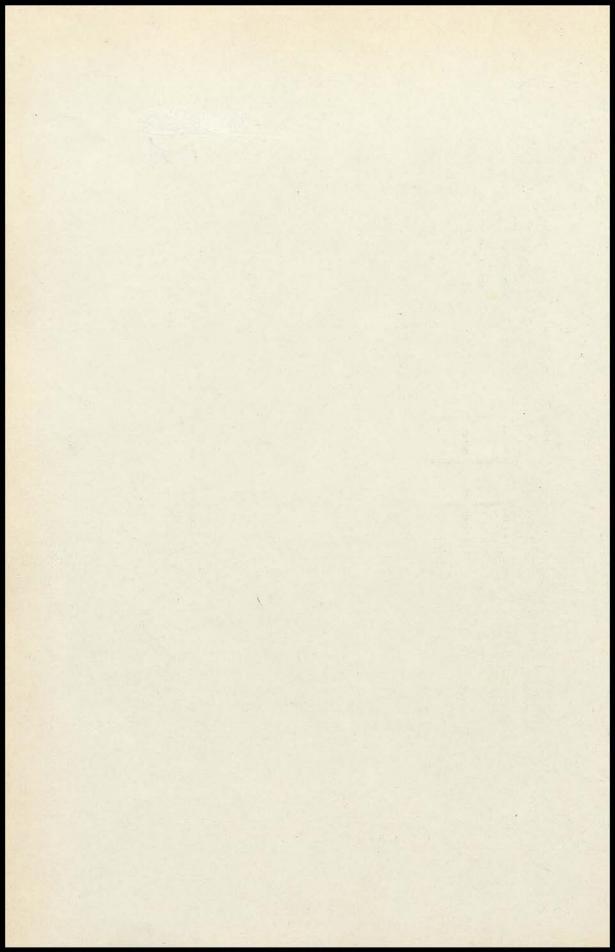
Suddenly one blurted out: "T'll bet this is one of Lane's tricks. Ole man Sargent told me he's in this neighborhood somewhere."

Everybody seemed to agree with this sentiment. Then sullenly and silently the country-people prepared to go home. My uncle sent me back to the clearing to get a rope, which he had left behind, telling me to ride after him. I went back after the rope and had some trouble finding it. But finally I discovered it, and started to return. I thought I saw a way to make a short-cut, and diverging from the regular path of the buggy-wheels, I plunged into the "pathless woods." I soon decided that I had better forsake the short-cut idea and return to the regular route. However, I could not find this immediately and set about systematically to retrace all my steps. Had I been an Indian I might have succeeded, but as it was I could not detect readily my horse's hoof-prints. It annoyed me to see that the sun was sinking behind Mt. Fisher, and I realized that in another hour night would be falling. I came speedily to the conclusion that I was lost.

I wandered about aimlessly for some time, hoping that luck would direct my horse to the road. At last I saw a log cabin through the trees. I dismounted and led my horse toward it. Outside a man was squatting and cooking something over a fire. He looked up, and seeing that it was but a boy that approached him, continued his cooking.

I advanced and told him that I had been





at the "broncho" ride all day, and had lost my way in returning.

"Where do you put up?" he said in a pleasant voice.

"At Cabot's," said I.

"Then you can't get home tonight; stay here with me an' I'll show you there bright and early tomorrow."

I liked his tone and his friendly appearance. Besides, I had no choice.

"Thank you," I responded, "I will."

For supper we ate hard biscuits and nine fine rainbow trout. I never enjoyed a meal more. My companion told me jokes and stories and laughed like a boy. After supper, he took me into the shanty and lighted an old oil lamp. He then got out an old checkerboard and game, remarking, "I haven't played a game of checkers for years, but watch me beat you." And so we sat down, myself and the mountaineer, and played until late into the night. As we played, I had ample opportunity to study my opponent's appearance. He looked to be well nigh forty years old, with a fine mouth and prominent features. His brow was creased, showing that many trials had passed through his life. He wore a red shirt and high boots. As do all Westerners, he wore pistol and belt.

At last, just as we were preparing to stop playing and retire for the night, we heard footsteps outside. Then voices became audible. The whole expression on my companion's face changed. His merry smile gave place to a black frown. He stood up and stared at the door, his fists clenched. He seemed to recognize the sound of the voice that came from without. The cold sweat began to form on his forehead when he heard a hand grasping

for the latchstring. I could hardly believe the same man stood before me.

The door flew open, and three men rushed in. My companion drew his six-shooter and emptied it at his assailants. Only one bullet, however, took effect, and that caused no serious wound. My late checker-adversary was soon overpowered and bound hand and foot. He was Jack Lane, the outlaw.

My next surprise was to learn that the three intruding gentlemen were my esteemed uncle and two of his hired hands. They had become alarmed at my non-appearance and had started out to find me. They had found the place where I had left the trail, and tracked me with lanterns to Lane's cabin. It was thus that I was the means of the capture of the most notorious horse-thief of his time.

Lane was given over to the sheriff the next day. I was regarded for the remainder of my short stay in Ponil park as a sort of hero—one who had played checkers with Jack Lane for three hours. They scoffed at me when I said he was one of the most agreeable gentlemen that I had ever spent an evening with.

"Yes, but he has a devil's heart," said Tom, the Mexican, and I guess Tom was right, for Lane is now in the Colorado penitentiary for life. Among other things to which he confessed, was the turning loose of the band of mustangs whose capture I had witnessed.

When I left Ponil park, I felt a regret and a sorrow. Of all spots on this earth. I most desire sometime to return to it. I regard it as a modern enchanted forest.

A. E.



John Howard and His Work



OHN HOWARD was not a particularly gifted or brilliant person. He received a very limited education, had poor health, and yet accomplished a vast amount of good and was one of the greatest philanthropists the world has ever known. And he did these things through his en-

ergy and his pity for human suffering.

At the age of twenty-nine, he started to visit Lisbon, believing he could alleviate some of the suffering caused there by the recent earthquake. But the ship in which he sailed was captured by a French frigate and he, with many others, was made a prisoner. He endured great suffering and hardship in this captivity, but finally procured not only his release, but also that of his fellow-captives.

For several years after this he lived a secluded life at Cardington and Watcombe, in both of which places he distinguished himself as a kind landlord and "displayed an enlightened philanthropy in raising the condition of the poor by constructing model cottages and building schools."

In 1773 he was elected high sheriff for Bedford, and then his characteristic life work began; for he not only heard the trials in court, but visited the jails to which the prisoners had been condemned. Howard found the jails in such a wretched condition that he determined to devote his life and money to their improvement. One abuse arose out of the practice of not paying the jailors, so that they were forced to get their pay from the prisoners. They demanded large fees and would not free the prisoners, even after they had been dismissed by the court, until these fees were

paid. Through Howard's efforts parliament passed an act which provided that jailors should be paid by the county, and which abolished the fees of jail delivery. There were many other and worse abuses existing in the prisons, among them the unsanitary conditions, the immoral and degrading influences, the lack of occupation for the prisoner, and the unhealthful food.

The remedial measures which Howard proposed were: prevention of crime by education, productive prison labor, graduated punishment, encouraging industrious and well-conducted prisoners by discharge before the expiration of their term, moral and religious instruction, and lastly, the law of kindness.

The last five years of his life were spent on a new mission of philanthropy—the study of the causes and cure of the plague. On this errand he went all over Europe, entering infected hospitals and pest houses where even physicians refused to go. He even took a foul ship so that he could know by experience the quarantine sufferings. His health suffered greatly from this, but he believed he was doing his duty in finding information which would be helpful to others.

In 1790, while he was visiting the lazarettos of Europe, he took the camp fever from a young girl whom he was attending. This proved fatal and he died January 20. He wished to be buried quietly and forgotten, but a life like his could not be forgotten. His work was as high and noble, if not as conspicuous, as that of the most famous statesman or general. He did more than institute reforms in the prisons. He started the great movement of philanthropy which has been felt all over the

world, and through whose influence hospitals and churches have been built and charities endowed.

Bentham says of him: "In the scale of moral desert the labors of the legislator and the writer are as far below his as earth is below heaven. His kingdom was of a better world; he died a martyr after living an apostle."

EFFIE DOW HOPKINS.

The Little Singer's Mission



HOMAS FILLMORE sat in his office, moodily chewing his pencil. The light was last rays of the departing sun and the paper on which he had been idly scribbling was hardly distinguishable. The last rays of the departing sun wrapped the whole town in a dim, sleepy glow and caressed

the bright brass sign on the office across the street. The faint sounds coming up from the street below only served to deepen the gloom on Fillmore's face. It seemed to say "home" to him.

He wondered idly where his home was, and he glanced again at the paper on the desk. He could not see it, so he arose and lit the gas. Yes, he could see the name now. It was Mary. His eyes flashed with a tender light and his stern lips smiled.

He was tall and handsome, possibly too stern looking, but the other men said Fillmore had seen trouble. The heavy lines penciled on his face showed this, and his hair was iron gray, although he was barely forty.

He touched the paper again with a caressive air, and his memory seemed to travel back; back over years of toil and pain to the time when he was young. He could see even now the pretty white cottage in the lane, where the roses bloomed all the summer, and the windows of the house were lost among the profusion of

vines. But the most attractive figure in this scene was the slight, girlish figure leaning over the fence, watching down the lane, always looking for him. And then he awoke from his waking sleep with a start. He did not want to see the rest. Of his parting from her in a foolish fit of anger, he knew this part only too well. How often had it burned itself into his memory until he felt it could never be obliterated! He threw himself into his chair. the despair of a doomed man burning in his eyes. He longed, he prayed for anything to happen to take his mind off that subject. He felt that he would go mad under such a mental stress, and he did not pray in vain.

With his characteristic restlessness he arose and crossed to the window. Thousands of lights illuminated the city. He could see the crescent of the big store down by the bridge. He had often wandered down by the big bridge and sat on bench. He often wondered, too, how many miserable, despairing human wretches just like him, it had given peace. The dark, rushing, swirling waters seemed to fascinate him. Often the little waves would lap against the shore and tell sweet stories of the rest beneath. He felt a strange peace in knowing that in that river he could find the rest he so longed for. One day-but Fillmore would never let his mind dwell on that time. He would resolutely tear his mind away. It was

enough to know that something, he could not tell what, maybe it was her voice, had held him back. Something of this came back to Fillmore as he leaned across the window. He seemed to hear her voice singing his favorite song:

> And for bonnie Annie Laurie, I would lay me down and de

Clearer and louder swelled the words, singing in a sweet, childish voice. It was so real he could hardly persuade himself that it was not true. Fainter and fainter grew the words of the chorus until they died away.

He awoke with a start and stared wildly about him. It was past nine o'clock and the janitor had put all the other offices in order. Fillmore picked up his hat and then dropped it again as the words of the last verse reached his ears. He looked down on the pavement and then rubbed his eyes. He had not seen it there before - that golden-haired vision, who looked so much like Mary. The child had a bundle of newspapers under her arm, and her tattered garments contrasted oddly with the rich dresses of the ladies who surrounded her. He picked up his hat and ran hastily down the steps. The janitor looked after him with a strange pity in his heart. He would rather be in his position than own Fillmore's fine residence on the Avenue and go about with such a sad expression. When Fillmore reached the ground floor such a crowd had gathered that he could not get through. When he was allowed to pass the little goldenhaired singer had gathered up the coppers showered upon her and had disappeared. It was a bitter disappointment to him.

He aged two years that night, and the next morning he was raving with brain fever. For days he tossed feverishly, restlessly about, always calling for the little golden-haired singer. He had the best physicians, but they knew not for whom he called. At last he became so weak that he could not call. His very life was ebbing away, and nothing could be done to stay it. Often he would open his eyes and ask if she had come, and as he always received the same answer he would turn his face bitterly to the wall in despair. One day his physician, hopelessly enough, inserted an advertisement calling upon the little singer to show herself. The response came. The next morning, when Fillmore opened his eyes and asked if she had come, the little girl was led up to his bedside.

From that moment he began to improve, slowly, but steadily. One day he was recalled from the land of dreams by a sweet voice humming his song. He opened his eyes feebly and then started. Could it be? The singer bent over him with a sweet smile. "Thomas," she said, softly. "Mary," he exclaimed, joyfully. Their hands clasped lovingly. Then he glanced at the little figure sitting over by the window. "She brought you to me," he said, his eyes filling with tears, and Mary nodded.

The little white cottage is occupied once more, but there are two to watch at the gate for him now. And often, in the streets of the big city, people look at one another sadly, for they miss the little singer, whose voice brought hope to the despairing and life to the dying.

Laura Grace Sage, 05.



The Land of the Free



UTSIDE it was as windy as only a March night in Russia could be. Inside the hut all was still save for the wretched sobbing of a girl huddled in the corner. Opposite her sat a boy with his head in his hands, staring into space, and on some rags in the corner lay three sleep-

ing children. At last the boy, as a wild thing caged, sprang up suddenly and paced to and fro. The baby in the corner stirred and uttered a sleepy cry. The girl went over to it, sang it a little Yiddish lullaby and then went back to her misery.

"Rachel," the boy said, "we must face things in spite of the dear mother and father scarce cold in their graves. We have but three rubles left."

"No," sobbed Rachel.

"And Father Abraham help me. What can I do? I have brains and can read, but when I ask for books they say, 'What! you a dog of a Jew, want books,'" and he laughed bitterly. "When I ask for work, they answer me in the same way, and sometimes when I find work I earn but five kopels a day. Can that feed five hungry mouths? What can I do? Rachel, we must look it in the face."

"Michael," she said, "I have a plan. Do you remember our cousin who went to America across the seas? I have heard wonderful things about him and the land. Even it is said one may pick up gold on the streets. Before our father died he told me he wished you might go to America, away from this land of cursed bondage, to the land of the free, where all men are equal. In my misery I had forgotten this."

"Rachel, we will go to America."

They went to sleep with their troubled hearts made lighter by one ray of hope.

In the morning, Michael went to the rabbi and told him what he intended to do. The old man embraced him and told him: "My son, your griefs have been many, and you have stood them well. Nothing but trouble can come to you here. If I were younger I would go, too, but I must stay and lighten the sufferings of my people. Go, and peace go with you. Have you money for the journey?"

"Just three rubles," said Michael.

"Then Rachel, your sister, and the little ones must be left."

"Leave Rachel, my sister, to get bread! How can you speak of such a thing?"

"It must be," said the old man. "It's for the best, and if you work as your father and grandfather have worked, you will prosper, for they lived well, even in this wretched country. You soon can send money to Rachel to join you. I will see that they want not in the meantime."

Michael broke the news of the separation to his sister, who bore it bravely, for she was a true daughter of her people.

The cow was sold, and Michael started on his journey with eight rubles. Rachel had gotten his meager wardrobe together into a bundle. With this slung over his shoulder he set out at daybreak. The rabbi blessed him: "My son, may God bless your enterprise and give you strength to live by his teachings wherever you may be, and may He make you worthy of your fathers, and the faith of your fathers."

Two great tears fell from the eyes of the old man on the boy's black head. He kissed the little ones and started, for he had thirty versts to walk before sundown.

Rachel went to the edge of the village with him. As he passed, the early ones called after him, "Farewell and good luck, batnishka!" When they came to the edge of the village Rachel threw her arms around him and murmured, "Michael, darling brother, how can I let you go." He kissed her and gently took her arms from his neck and went on his journey. She watched him till he was out of sight, then sank to the ground, rocking to and fro, and wept to herself.

Michael came to the great city at twilight and spent the night with a kinsman of his father. The next day there was little trouble in securing passage, for Michael was under age and there was no trouble about a passport. In a week he sailed on a great emigrant steamer.

Sometimes on these boats the foreigners are treated well, but on others, merely as so many cattle. The ship Michael was on, was one of the latter. However, this did not keep him from some of his own people who were on the ship and thus it was he met Natasha. Natasha was young and beautiful, with her exquisite coloring and pearly teeth which fairly glistened when she laughed, and this was often in spite of many hardships. So it was not strange that Michael fell in love with her, nor was it stranger that she returned his love, for Michael was a tall, handsome youth with black, curly hair and brass rings in his ears which shook when he laughed. She was alone save for her father, who slept most of the way over, so it was quite natural that they saw a great deal of each other.

The night before they landed they were on deck together. The moon had just risen and Michael was beginning to tell her of his love. "Natasha," he began, "I love you." Just then a great rude sailor came around on the deck. He grinned, went to Natasha and tried to kiss her, but a blow sent him sprawling and an officer came out to see what the trouble was. He ordered them to their berths.

But fate seemed against them, for in the hurry of the landing he saw Natasha no more and had forgotten to ask her where she was going. At the custom house the officers directed him to his cousin's house where he was warmly welcomed and they talked over the old times and friends. Michael was told of the new country, how every one might live as he had not dreamed of, but even here he must work.

Michael, at the end of the week, was given a peddler's pack and fifty cents and told to go as far as he could on the train then get off and sell his goods. He had a price list and a letter telling who he was, for as vet he could speak little English and understand none. The first place to which he went was a little vine-clad cottage where a pretty young woman bought some needles from him. After that, however, people would not or did not try to understand him and when noontime came he had sold almost nothing. The hot July sun beat down on him and at last he lay down near a hay stack to rest and wept in his disappointment. But after that he felt more determined than ever and got up and went on his way. He was in the country now and the people seemed kinder and one old woman took him down in the spring house and gave him a great quart cup of deliciously cool buttermilk. At almost sunset he turned back and with a light heart turned home, for after all his day was more successful than he had thought possible. All night he dreamed of Natasha.

The next day he set out and even better luck waited for him; Friday night when he went home he had nine dollars and he borrowed one more from his cousin and sent a ten dollar bill to Rachel. How proud she was as she read his first letter and the home she dreamed of seemed near! The weeks went by and Michael was too busy to seek out Natasha if he had known where to look. Only on Saturday when he went to the synagogue of the city did he look for her, but never but once did he see her and then it was but a fleeting glimpse and he was not sure. But she had come to his dreams to stay and his heart was troubled.

In the meantime, he prospered and every week his trade was increased and at the end of the year he sent to Rachel four blue slips of paper, and she started out to America with the three children. Coming over, everything went well and Michael met them at the harbor. How he tossed the little ones in his arms, and how he embraced Rachel! It was worth the waiting. How Rachel marveled at the great city and still more at the little fourroomed cottage! She was in love with the new life, but soon she fell in love still more with something else. It was with the huckster across the way. was perfectly happy at first till she saw him and then she met him and he fell in love with her. Before you could draw your breath there was a wedding in the little cottage and Rachel went to live across the way. She took the baby with her and the other two staved with Michael and went to school and learned English.

It was then Michael thought of Natasha again as a vivid reality. She was the creature of his dreams till now. He was lonely. He wanted her more than ever before now. And at last he found her. Rachel had been married for more than two years and Michael's trade was so large now that he had a wagon instead of the pack. He took a new route and as he stopped at a country hotel he saw Natasha's father.

He nearly embraced him, he was so happy, and talked to him a long time before the old man could remember who he was. Then at last the old man told him Natasha's address. It was only six blocks from where he had been living all the time. The day dragged and at last he was free to go home. The horses were tired and he had to walk them all the way. It seemed as though he would never get there. At last he did, however, and found the address given him was a vacant house. He inquired at all the neighbors, but he knew so little to ask for. He did not know her other name even. How he stood this disappointment was more than he could tell. She seemed like a Will-o'-thewisp which, when almost had, was gone, and still lead him on. He took two long walks over the great city. For week after week he walked the great city and at last his search was rewarded. He was on a quiet back street when he came upon a woman weeping on the curbstone. His heart was kind and sought to comfort her or at least to get her to come in from the street, but all she would do was cry and sob, "Natasha, Natasha." He gasped, "Where is she?" and the woman pointed to the house. He rushed in and an old doctor stopped him with, "Hush, she's dying." "She shan't die," said Michael, who went to the bedside. She murmured his name in her delirium and he brokenly cried, "Natasha, I have come." Then by some strange power she opened her eyes and from that time on she lived. But it was many weeks before the fever broke. At last they were married and lived as happily as common mortals do. But they loved each other the more for the waiting. Michael prospered and now as his grandchildren gather around his knee he tells them how he came to the "land of the free." MARY PAXTON, '04.

Tom Johnson at College



HE Johnsons have become famous throughout the universities of the country on account of their peculiar nature. The earliest history of their ancestors shows that they were large in stature and very fond of athletics. With them, there is nothing like the Johnsons, to the

third and fourth generations. "Blood is thicker than water," is one of their pet sayings. They cannot be happy unless they are always meeting one another. During the whole time of their being together, they luxuriate in telling one another their minds on whatever subject turns up; and their minds are wonderfully antagonistic. The family training, too, combined with their turn for combativeness, makes them eminently quixotic.

However, it is time for us to get from the general to the particular; so leaving the great army of Johnsons, who are scattered over the whole country, let us at once fix our attention upon the small nest of Johnsons in which our hero, Tom Johnson, was born, and which was near Vernon Center, Conn.

The Johnson family of today, about whom is being told, were of this same nature. Tom Johnson's parents lived on the farm in the summer, and in the village of Vernon Center, Conn., in the winter. When Tom was on the farm, he received sufficient exercise which he did not dislike, but when he came to the village to reside in the winter, he became somewhat indolent.

When Tom was eighteen years old, his parents were living on the farm. He had worked very hard all summer plowing his father's fields and cutting his father's

corn. Whenever there came a rainy day so that it was impossible to work in the field, he helped his mother prepare fruit for the winter.

One day Tom was out in the cornfield cutting corn, when an old minister of the country church came along in an old buggy that looked as if it had seen its best days. As the minister raised his head, he heard someone sing. After he had driven a distance, he saw Tom cutting corn.

"Hello, Tom. What makes you so happy?" asked the minister.

"Oh, are you here, Mr. Brooks? What are you doing over here?" asked Tom, as he looked up.

"I am on my way home from town. Tom, are you ever going to stop working so hard? Why don't you go to college this fall and learn something? Then you will not have to work at cutting corn all of your life."

"Mr. Brooks," replied Tom, "I have thought something about that myself. I have heard my uncles tell about the good times that they had at college. I do not want to spend all of my life on a farm, but I suppose that unless I go somewhere soon, I shall always remain here."

"You are right, Tom. Do you know that after you graduate, you may be president of the United States? Well, Tom, I must be going now. Good evening."

The minister drove towards home and Tom resumed his labor. This talk with the country minister somewhat encouraged Tom. As he worked on the remainder of the day, he thought over again and again what the minister had said.

As darkness began to approach, Tom strolled towards home. When he came into the house, his mother noticed a great change in his actions and also in his appearance. He seemed to be altogether a different Tom. When supper was prepared, all of the family sat down to the table with their eyes cast upon him.

"Tom, what makes you so active after a day's hard work?" asked his father.

"Why, I do not seem lively, do I?" asked Tom. "Well, when I was out in the field today cutting corn, the Reverend Brooks came along on his way home. I talked to him for about an hour. Then he asked me why I did not go to college this fall. He said that then I would not have to cut corn all my life."

"Well, what has that got to do with such a change of your liveliness? I suppose you are becoming tired of the farm," remarked Tom's father.

"W-we-well, father," replied Tom, "I thought that possibly I might go some day."

After this conversation, the subject was changed. This talk seemed to make an impression upon Tom's father and mother. After supper was over he was called into the parlor.

"Tom, do you want to go to college?" asked his father.

"Yes, father, I would like to go. It would make everything much more pleasant for me. There is nothing that could do as much for me as college."

"You are right, Tom, but do you think we have sufficient money to send you?"

"Father," remarked Tom, "You are the judge of that. Certainly, I do not want to go if you cannot afford it."

Just after this conversation had taken place, Tom's mother came into the parlor where he and his father were. She knew nothing of what had been discussed between Tom and his father.

"Mother, do you object if I go to college?" asked Tom.

"Go to college! Why, what do you mean and why do you ask that?" asked his mother.

"Well, Tom has an idea that he wants to attend college," remarked his father, "and I think it would be a good thing for him. But I don't know whether I am able to afford to keep him there long."

"Oh, that does not make any difference," said Tom. "If I can only get started in college, it is all I want. I think I shall be able to work my way through if there is no other chance."

Mr. Johnson was very much impressed with Tom's determination. He hardly knew what best to decide. He wanted Tom to attend college if it were possible.

"Tom," said the father, "I will see that you go to college if I never do another good act the remainder of my life."

The weekly paper was received a few days later. In one part of the paper there was an announcement that Yale college would open in September. Tom read this to his father.

"Now, my son, get ready to go to Yale," remarked Mr. Johnson.

When Tom was sure that he was going, he was the happiest boy in the district. About a week before Yale opened, he had everything in his trunk that belonged to him and finally he was ready to start for New Haven, Conn. The night before he departed all of his friends were invited to be present at his home. The following day Tom left for college.

"Tom," remarked Mr. Johnson, "I want you to learn all you can when you go there and do not give up the struggle. It means work for you but I am sure that when you get through your school you will appreciate what I have done for you. And when you come home, do not feel ashamed of your dear old father and mother, because you have been in a city. We have done

our best for you and that is all that anyone can do."

"Father, I will take your advice and do my best. Will you please tell Ralph Hunt that I wanted to see him, but I will see him when I come home?"

Tom's mother said a few kind words to him and he was off for Yale college. He went to New Haven with another young man, Fred Crow, who was from the same district. When they arrived at New Haven, there were boys at the station to take them to the college. They became acquainted with a large number of students the first day they were on the college grounds.

The following week the session opened. Tom took his father's advice and studied most of the time. He was liked by the professors and students as soon as he was there a sufficient time to show the kind of man he was. He made good grades and took as much extra work as possible.

One morning Tom was passing through the hall of one of the buildings and he noticed on the bulletin board: "All Freshmen interested in football please assemble in the gymnasium at noon." Then he thought what good exercise it would be for him to play on the football team. As he passed along, he inquired from a student who was standing outside of the building, whom the announcement concerned. Before he could realize the fact, he was in the gymnasium attending the athletic meeting.

When the meeting was begun, candidates were chosen for football players. To his delight, Tom was chosen as one of the candidates and on account of his muscular appearance, he was elected one of the eleven. He did not neglect his studies, but as he was elected one of the players he spent a part of his time for prac-

tice and finally became the best player on the Freshman team.

Now it was coming time to make use of the football team in which Tom was, and finally within six weeks after college opened, there was to be a class game between the Freshmen and Sophomores. He had always heard about the hatred between the Freshmen and Sophomores, so he determined to cripple some of the latter in this coming game.

Every day Tom went out to the athletic field and practiced with the Freshman team until he became a great football player. Every student asked: "Who is Tom Johnson? What is his name? Where is he from? How old is he? Where does he board?" Tom had no idea when he first arrived at Yale college that he would have such success.

Finally the inter-class game came around. All of the students and many people from New Haven came to see this game.

The Sophomores had one part of the seats and the Freshmen had another. Before the game began, both classes kept a continuous roar with class yells that almost raised the heavens. The game was ready to begin. The players were lined up on their side.

"Who is all right?" shouted one Freshman through his megaphone.

"J-o-h-n-s-o-n!" shouted the remainder of the Freshmen.

"To the goal, boys! To the goal!" shouted the Freshmen, as the game began.

This somewhat encouraged the Freshman team, for it performed excellent work, but the Sophomore team did good work also. In the first half of the game, the score stood 0 to 0. When the teams went out into the field for the second half, there could be heard nothing but class

yells. But it had not been played long until a Freshman was crippled so badly that he was removed from the game. This made Tom more eager to make a score for the Freshmen, and after a hard struggle a big, muscular man broke through the Sophomore line, making a sixty yard run. It was Tom.

"Who is all right?" again shouted a Freshman.

"J-o-h-n-s-o-n, of course!" was the reply.

Tom became famous for the day on account of the run which he had made and finally the Freshmen had six points. The Sophomores being determined that their opponents should not score again, began playing roughly. In a short time, during the struggle, one of the players lay on the ground, blood running from his face.

"It is Tom Johnson!" shouted someone. The people arose from their seats. All were sorry to see that Tom was hurt. After he lay there for a few minutes, he arose and took his place in the game. Then the Freshmen gave their vells, and

the Sophomores returned theirs.

Finally the game was over with a victory for the brave Freshmen, 6 to 0. The humble Sophomores went home with their heads down, feeling somewhat dishonored by the defeat. As the crowd dispersed, a large number of students came where Tom was standing and felicitated him; they desired to know how he was feeling after he was hurt on the field.

"Oh, I am feeling all right, except my head hurts just a little where I was kicked. I will be all right tomorrow," was Tom's answer.

Everything was Tom Johnson for the following two weeks. The night of the great day, a reception was given for the Freshman team and Tom was called upon to make a speech. Just before the close of

the reception he complained of feeling so ill that he was excused. He attended school the first day of the following week, but the second day and the remainder of the week he was not able to come to class. He had severe headaches. Every day he was visited by classmates, who brought flowers to him and who treated him their best. Finally Tom's condition became so serious that two students had to remain with him every night. About a week after he was taken sick, some of the professors came to see him and the doctors advised that he be taken home, but he was too weak. It was discovered that his skull was fractured and he had hemorrhages of the lungs. Although he was strong at one time, now he lay on his bed helpless as a little child. He always talked freely with his classmates when they visited him.

"Brothers, if I might call you that, I assisted to win one battle, but I fear that I am going to lose a greater battle alone," was his sad talk.

"What do you mean, Tom?" asked one of his classmates.

"I mean," said Tom, "I hardly believe that I can recover. I did not want our team to have the name of being beaten, and I did my best to prevent it; that is all any one can do."

"Oh, do not think of such a thing. You will be well in a few days. Here comes the doctor now," replied one of his classmates.

"That is all right with me," remarked Tom. "There is a better life than I have known in a surer, purer, sweeter land than this: there is another, a celestial zone, where I shall know of bliss."

"Oh, see, they are coming this way; they are waiting for me!" he exclaimed, as he pointed his hand upward.

Tom repeated to himself some poetry

which he had read some time during his life. It was this:

Life! we've been a long time together,
Through clear and through cloudy weather,
'Tis hard to part when friends are dear;
Perhaps 'twill cost a sigh, a tear;
Then steal away, give little warning.

Choose thine own time;

Say not good-night, but in some brighter clime

Bid me good-morning.

"Good-bye, brothers," whispered Tom with a peaceful smile on his face. He was dead.

As soon as this was reported sadness prevailed throughout the college, and the following day the entire Freshman class was absent. Every Freshman's room was draped in mourning. In the afternoon

short funeral services were held before his body was sent home. The president of the class gave a sketch of Tom's life while at Yale, and he told what a faithful fellow he had been. At the close two stanzas were read from Gray's elegy:

One morn' we missed him on the accustomed hill,

Along the heath, and near his favorite tree;

Another came; nor beside the rill,

Nor up the lawn, nor at the wood, was he.

A youth to fortune and to fame unknown; Large was his bounty, and his soul sincere;

Heaven did a recompense, as largely send:

He gave to misery all he had—a tear—

He gained from heaven—'twas all he wished
—a friend.

OTIS W. HOLMES.

From Boston "Tech"

Boston, Mass., March 14, 1904. THE NAUTILUS editors have asked us, as Manual alumni at Tech, to tell you something about this greatest of all American technical institutions. As graduates of Old Manual we can scarcely expect to be remembered by all of you. With the exception of our former faithful teachers and a few of the students, perhaps none of you may know that Manual has representatives at Tech. If you should come here, however, you would find us in some evidence, for seven is not a small number out of fifteen hundred students from all over the world. These seven graduates of your school are Ben. E. Lindsly, '05; Norman Lombard, '05; Herman C. Henrici, '06; Edward Manson, '06; Alfred W. Hertz, '06; Constant Jaccard, '07.

Lindsly, who is taking the course in mining engineering, will be remembered as one of Manual's old football players and athletic stars. He played tackle on his class eleven at Tech and is a member of the 'varsity track team and holder of the Tech record for the hammer throw.

Lombard, as a Freshman, was president of his class and, this year, is one of the associate editors of *The Technique*, our college Annual. He is taking the course in mechanical engineering and is probably plugging away, at this present moment, on his applied mechanics.

Henrici, in mechanical engineering, Manson, in electrical engineering, and Hertz in architecture, seem to be holding down their work, but, through extreme modesty, hesitate to state what they have accomplished since they have been here.

Jaccard is only a Freshman and, of course, no one expects much of a Freshman. He is a mining engineer and can give his class yell about as well as any other man in the Institute.

Tech is quite different from nearly all other colleges. In the first place, the work is harder and the studies are not elective. In the second place, the school is located in the center of Boston and no campus surrounds the buildings; or rather as Tech men boast, the Institute is the only college with street cars on its campus, for Boylston street is crowded with electric cars. In the third place, the men do not live in dormitories, but dwell, for the most part, in private houses throughout the city.

Because of its strenuous work and its present location Tech may lack, somewhat, that college spirit which goes to make up such a large part of the life in other colleges. But that Tech does possess no small amount of this is evident from the standing of her track and other athletic teams which, with the exception of those of Yale and Harvard, are rated among the foremost in New England, and from her college Annual, *The Technique*, which was the finest college Annual published in the United States.

In still lesser ways is this wholesome spirit manifested—in the annual Field day where Sophomore and Freshman struggle in football, relay race, and tug-o'-war, to gain the supremacy; in the annual Tech show which, last year, surpassed all other private theatricals given in Boston theatres, and in the "Kommers," or dinners, held at the Tech Union, which is the gathering place of the students.

One particular outgrowth of this spirit has been the formation of state clubs by groups of men from the different states. Just a short time ago the *Missouri Club* was formed and held its first Kommers at the Union. A jolly crowd of fellows gathered there, around a generous board, and recalled the days, not long since, when they were back in Old Missouri.

But whatever may be said of college life at Tech, it is the work at Tech which has gained for this institution its unparalleled standing. Today, it is not safe to say that one school or college excels all others of its kind, but certainly the thirteen courses at Tech compare favorably with those of any other school in the world. Its graduates are everywhere recognized as men of ability, of strong initiative, as men who can do. Its general equipment is unexcelled by any other technical school in America and it was, moreover, the first school in America to establish courses in electrical engineering, in chemical engineering, in sanitary engineering, in naval architecture and in architecture.

One cannot speak of the school without mentioning its honored and beloved president, Dr. Henry S. Pritchett, himself a Missourian. He has done more than anyone else to make Tech a good place to work in, to promote good college spirit, and to establish a close relationship between the widely separated students, so that Tech graduates who, as Freshmen, burned their military gloves before Rogers, after the last drill of the year, and, as Seniors, watched the old year out and the new year in on Rogers steps, will look back upon their Alma Mater not only as a place where they learned to work, but as a place where they learned to live.

Probably some of you have been in Boston, have ridden up through the subway into Boylston street and, just before you have passed by Trinity church and the New Public library, have seen the Rogers and Walker buildings of Tech. Should any of you ever enter them as students, their names would soon come to mean as much to you as they do now to your former schoolmates

THE M. T. H. S. ALUMNI AT TECH.

My Party in My Castle in Spain



Y oldest son is nearing the age of eighteen. That may not be very interesting to you, but I have been thinking for the last two or three days that if Obadiah (that's his name) should ever want to get married I should like to take him and his bride to one of my castles in Spain for

their wedding trip and have a house-party for them there.

I have not quite made up my mind yet which castle we should visit, but I think if I could find the way, that I'd like to go to Rosemary castle. It is always summer at Rosemary castle; the sun shines half the time and the moon and the stars illuminate the other half. It never rains. Somehow the vegetation does not seem to need it. The only clouds that are seen there are the little, white, fleecy ones that play "tag" across the sky. All the most beautiful flowers bloom at Rosemary, and the palm and the pine grow side by side. Every little flowerlet has a place in the gardens of this castle in Spain and the vines on the terraces bear the grapes of Smyrna.

The lofty buttresses of my castle command a view of the Alps and the Rockies. The rivers, Rhine and Rhone, meet at the bottom of my south terrace, and the Tower of Pisa is used by the inhabitants as a summer house. From one side door stretches the hanging gardens of Babylon; from another can be seen the statues of Jupiter Olympus at the Capitoline Hills at Rome.

The inside furnishings have not been decided upon. It is hard to tell in which room to hang the Bayeaux tapestry. My original Sistine Madonna shall go in the temple of Diana in my apple orchard. But where to put the last Gibson head I do not know. I much fear that the Colossus of Rhodes must stay out in the wind and the rain and the snow; but as there is no rain or snow and the wind has but the force of a summer breeze, it can scarcely be a hard-ship. The Pyramids I shall leave where they belong, as the Nile flows through my back yard. Of original old masters I have so many that I am seriously thinking of papering all my walls with them.

The floors of my castle are Mexican onyx and the furniture is made of cedar from the forests of Lebanon. As my prospective guests have their various tastes, I would fix a suite for each to suit his liking. Poe should have seven rooms so irregularly arranged that the vision embraced but little more than one at a time. To the right and left in the middle of each wall a tall and narrow Gothic window should look out upon a closed corridor which should pursue the windings of the suite. These windows should be of stained glass and varying in color in accordance with the prevailing hue of the decorations of the chamber into which they opened. The first should be blue, the second purple, the third green. The fourth should be furnished and lighted with orange, the fifth with white, the sixth with violet. The seventh should be closely shrouded in black velvet tapestry that should hang over the ceiling and down the walls, falling in heavy folds on a carpet of the same material and hue. The panes here should be scarlet, a deep blood-red color. In the corridors that followed the suites, should stand opposite to each window a heavy tripod bearing a brazier of fire that should project its rays through the tinted glass and so glaringly illuminate the room. In

the black chamber should stand a gigantic clock of ebony whose chime should be clear and loud and deep and exceedingly musical, but of a peculiar note and emphasis.

Hawthorne should have a study as near like his room in the old Manse as it is possible to make two things alike. Its window should overlook a plain upon which should stand the "Great Stone Face." Concord's Sphinx should have a lovely apartment from which to send forth his declamations of intellectual independence, while Concord's Pan should have a Walden pond and a one-roomed hut. Tom Thumb should have a miniature suite and the Lilliputians should wait on him.

Shakespeare and Henry Irving should talk of plays and players. Rip Van Winkle and Joe Jefferson should come hand in hand, and Caesar, Napoleon, Washington and Grant could talk campaign tactics to their heart's content in the shadow of the Pyramids. Longfellow should find in my castle in Spain that

Between the dark and the daylight,
When the night is beginning to lower,
Comes a pause in the day's occupation
That is known as the childrens' hour.

(From his study he should see in the lamplight)

Descending the broad hall-stair, Grave Alice and laughing Allegra And Edith with golden hair.

Shakespeare and Milton should wander in my magical gardens in Spain, and through Shakespeare's eyes should Milton see while he showed to Sweet William his beauteous soul. King Henry the First should have time to converse with Queen Bess on affairs of state, and Prince Hal should find leisure, not to rob coaches, but to tread a minuet with Cleopatra. Antony should not be jealous, for, beneath the twinkling stars and under the eyes of the Sphinx in my garden, he should have time to make love to Queen Mary.

And among my guests should move my stately Alice, clad in silks and looking like a tall, fair lily with a heart of gold. Like the lily, also, she should not weave, neither should she spin, and have all things done for her. George W. Curtis should have a roof garden from which to look at his Western possessions, and Titbottom should own all the landscapes.

There should be children of all ages in my castle in Spain and no one who did not like them should be invited to my party.

My private theatre should be honored by the greatest actors of all ages, past and future; the scene shifting would be done by magic. Henry the Second should conduct all the legal affairs of which there should be many cases to give him employment.

But even if my son, Obadiah, does not get married, I think I will give a party at my castle in Spain. I have given many before and I hope to give many in the future, to which you may be invited as one of the noted persons of the present time.

HELEN FILLEY, 06.



"It Might Have Been"



HEY had quarreled. There
were no reasons—no more
cause than usually brings
about such differences—and
indeed, as they sat there
silent and stern, even the
ghost of a reason flitted illusively away. But they
were angry—not the slightest doubt remained that such

was the case. A full harvest moon rose in its liquid mellow light, saw them, and hid behind the lilac bushes and from this retreat, unobserved, watched the pair.

He saw a man, chiseled in the form and proud likeness of his ancestral English His handsome chin squared resolutely beneath his full strong lips. Those were the lips that for decades, for centuries, had spoken the clarion voice of Englishmen in the name of constitutional liberty; those were the lips that had spoken for rights from King John; and from such lips as those had come the appeals to a dynasty of reigning despots that had crushed back the groans of extortion and the cry for vengeance till, unable to bear it longer, they had proclaimed the convictions of God-fearing men with a fearlessness "that had cost one English king his head and another his throne."

But this is not alone the story of a man. And anon the full moon, bolder grown, looked down again. There, touched brightly by his cool, rippling rays, sat a woman. Brown eyes beneath black lashes set, and from out those eyes there shone the staunch soul of ages back of Scottish clans.

As quiet as the bleak crests of their thistled hills, pure as the clear air of her ancestral highlands, was this woman. From just such eyes had gleamed the

lightning flashes of fierce determination in Scottish Reformation, those were the eyes that had seen the hated prayer book of the Established church stamped beneath the proud feet of her God-revering countrymen. Such eyes as those had seen with loyal pride Campbell's march with his pipes and pladdies to Lucnow's beleaguered walls. And so, Saxon and Scot, lowland and hills, with inborn pride knew well that each was wrong, yet neither would confess. And here the moon saw, and seeing was wise, and looked not again. The sweet odors of They were silent. jasmin floated to them, mingled with the strains of minstrels in a distant park, but finding no harmony there passed on. And then the moon, consumed with curiosity, came from behind the lilacs and, unabashed, looked on.

Months had faded into happy years in their friendship. It had been a friendship that in those years had grown steadily; it had been her happiness and his strength and inspiration, and a tear quivered in each of her eyes, reluctant to fall. She turned her head and only the moonbeam saw. His lips moved but he did not speak. He turned his head and only the lilacs saw.

She arose and swept across the lawn. He followed her. She ascended a step, then another, and for a moment was in the shadow. Then a restless moonbeam came and rested gently on her face. Another slipped noiselessly over him. Only the moonbeam heard her sigh; only the moonbeam saw his face.

He choked, hesitated and then drew back. She was beautiful. Now the moonbeam knew this, for the man had often said so and it had heard him, and then the moonbeam had seen it for itself. She

held out her hand and he took it. Their fingers clasped, there was a slight pressure, then her grasp relaxed. For a second his fingers remained in hers. He started. Could it be she that he was angry with? He was crazy. God forgive him the thought. She did not understand him. He must speak; he would claim the fault. Yes, he would say it, he would say it now -but she had let his fingers drop from her hand and left him. She had not seen. Only the moonbeam saw and "more's the pity." He ascended a step in his eagerness, then turned and strode down the path. He looked straight ahead, yet there was nothing there.

II.

"Mr. President!"

The speaker had caught the eye of the President of the Senate, whose gavel now pounded loudly as he called the recognition, "The Senator from Mississippi." For the first time since he had taken his seat the junior senator from Mississippi had risen for the privilege of the floor.

That chamber had heard many orators, those men had seen many such a fledgling test his untried powers from behind those desks, and yet they listened. He stood among them, a physical embodiment of the quiet Southern country. Timidity was wanting and he addressed them with the confidence and ease which his years little bespoke. He brought argument to bear on argument on the question which had so divided the House. The bill had been returned under the President's veto, had passed the House by a slim two-thirds majority, and had met with heated opposition in the Senate. Corporation factions had been most vigorous in denunciation of it and a well-organized lobby bid fair to crush it in the Senate. For days the Senate had debated the question in the

Committee. Now, at the last reading, even the unpledged senators had been cautious in their remarks lest antagonism should be stirred up against their subsidy bill, which was next on the calendar.

That the young senator should choose this time to make his initial speech was. at best, unusual. But a few words were sufficient to convince all on which side of the question he was to be counted. Fearlessly he assailed those conditions which made such divisions possible. Both sides listened closely. As he neared the climax of his speech the atmosphere became noticeably tense. Both parties leaned forward eagerly lest any word escape them, the one hopeful, the other fearful. He led them up gradually, past the barrier of state rights, past the danger line of "personal rights," closing with a brilliant picture of the possible future with its most untimely issues.

During his speech the galleries had been hushed. Eager eyes had watched him intently from the throng seated there. In the corner, just within range of the speaker's eye, sat a woman. Not a word did she lose in the long discourse. As he spoke her face had brightened and her youth came out again. She had purposely dressed as she used to. A bunch of lilacs was caught in her hair and it was combed as when a girl.

For a second their eyes met; he paused, but hers drooped while a flood of crimson mounted her cheeks. His heart had bounded till he faltered, but as her lids closed, his man's heart, not knowing, had closed its gates crushing back again that old and ever-present longing. His hesitation was over and he continued. His hearers said he was deeply affected by his effort—but they did not know.

The bill carried and in an uproar of cheers the Senate closed the session for the day. Through an avenue of admiring glances the young Mississippian passed from the chamber. A woman, stately and beautiful, passed eagerly through the crowd, out on the Capitol steps. She stopped and as he emerged from the swinging doors, she turned, shyly expectant, toward him. But for a moment she looked, for there, leaning on his arm, looking into his manly eyes with that Godgiven love-light, was—his mother. The

woman turned, the youth flown from her face, and passed on, as did the rest, mingling with the crowd.

Fiercely her heart raged as she heard his happy laugh, as he pressed his mother's arm in his own, and saw the lovelight in his eyes as he lifted her gently to a seat in the brougham.

They had both seen, but neither understood. Now had the moonbeam seen it all he would have known.

Vacation Reading



OW that the period of intensive study is over for this year, this vacation is coming on with its free outdoor life to allure us from the library, it is in order to make some suggestions about summer reading.

No sensible student will spend three months wholly at

play or wholly at physical labor. Nor should he be content to confine his reading to newspapers and magazines, but he should single out some good companions from the forest of books that will prove to be pleasant and profitable companions, whether he stays at home or goes on an outing. Such sweet companionship would spice the trip, make staying at home more tolerable, and add to the reader's culture and scholarship. It is with this motive that we submit the following list of books for vacation reading:

FICTION

Read "Rudder Grange," by Stockton, to catch a hint how to have a good outing near home.

Read Caroline A. Stanley's "Order No. 11" to get a clear idea of the political and social condition of Jackson county during the war of 1861.

Read Kate Dougles Wiggin's "Summer in a Canon" to learn how to combine literary culture with pleasure.

MISCELLANEOUS

Apropos of the St. Louis World's Fair is Prof. J. K. Hosmer's excellent "Story of the Louisiana Purchase."

Hamilton Mabie's "Under the Trees" furnishes a wealth of inspiring talk upon the beauties and love of nature.

Dr. James Canfield's heart-to-heart talks in his "Going to College" is of inestimable value to young men who expect to take a college course.

William Mathew's "Conquering Success" is as full as a fresh egg with interesting and valuable materials on many phases of life. He brings a wealth of incidents, anecdotes and personal experiences to help the reader to achieve success in the honorable walks of life.

Dr. Wm. A. Quayle's "In God's Out of Doors" revels in the pleasures and philosophy of nature as he fishes, hunts scenery, and otherwise rambles through the woods and over the Western prairies.





MR. EBEN BURROUGH



MISS HELEN DICKEY

Some Common Beetles of Kansas City and Vicinity



all the different forms of insects, probably none are so much desired in a collection as the beetles, which form at least half of the known insects. These insects are the most common, are very easy to collect and preserve, and, as a rule, are handsomely colored.

The beetles are all characterized by the possession of a pair of horny wing covers—the elytra—which fit down snugly over the under membraneous wings. These inner wings are folded both longitudinally and transversely, from a necessity caused by the fact that they are much longer and wider than the elytra. These inner wings are the true organs of flight, the elytra merely serving as a protection to them. In some cases the elytra do not conform to the standard type, and identification is rendered difficult. In such cases the beetles can be determined by the mouth parts, which are fitted for biting, and are generally well-developed. In the case of the stag beetle, the mandi-

bles are so specialized as to resemble the antlers of a stag,—hence their name.

In all beetles the metamorphosis is complete. They all pass through the four stages of development which are characteristic of the higher insects. They pass from the egg to the larva, in which stage they resemble worms having three pairs of legs on the anterior end of the body. From this stage they pass to the pupa, in which condition some of them are known as grub-worms. The next and last change is to the adult, or imago.

The beetles form the order Coleoptera, the most extensive order of insects in existence. It is represented in North America by about sixty families, members of at least twenty of which are commonly met with.

The family Dytiscidae contains some common forms of aquatic, carnivorous beetles. They are oval-shaped, black and shiny, and have a lateral stripe of yellow on the elytra. Their hind legs are well-developed, and are provided with long hairs to aid in swimming. All belong to the genus Dytiscus. D. marginatus is represented in figure 1, and a smaller species in figure 2. These beetles are both beneficial and injurious, for the mosquito larvae as well as small fish. They are attracted to the arc lights, where they may be found from May to September.

The family Scarabeidae is represented by several hundred forms in the United States, most of which are common, and at the same time injurious. The only forms beneficial are the tumble-bugs, which remove waste matter. There are two common kinds of these—Copris carolina, a large black beetle, and Geotrupes splendidus, a beetle of moderate size, and of a greenish tinge. A brightly-colored species of Copris is shown in figure 3. Canthon loevis, another tumble-bug, is also fairly common here.

Among the injurious plant-feeders of this family are the gold-bug, Catalpa lanigera, and the June-beetles, Lachnosterna and Ligyrus. Besides the Junebeetles just mentioned is a green variety, Allorhina nitida, not very abundant in this vicinity, but very numerous farther south. See figure 4.

The next family to be considered is the Carabidae. In this family the antennae are long and filiform, while the legs are fitted for running. These beetles are carnivorous or insectivorous, and hence are all very beneficial. Some common forms belong to the genus Calosoma. C. calidum and C. frigidum are very much alike, the former being covered with brilliant golden spots on a purplishblack background, while the latter has its spots similar, but rather obscure. Both have the same general shape as C. scrutator, a brilliant green beetle having a border of gold, with purple head and legs. This beetle, when disturbed, emits the most sickening odor known to man, and hence is very abundant. C. externum and C. savi are also similar, the former being black with a purple border, while the latter is plain black.

We now come to a family the members of which possess a peculiar desire. It is the Silphidae, and is represented by two genera with many species in the United States. Silpha is flat, with black elytra, which are sometimes spotted with red, and a colored prothorax. These are found eating dead and decaying animal matter. Two common forms are shown in figures 6 and 7. The species of Necrophorus (figure 8 and 9) are found burying dead animal matter, instead of eating it. In the animal thus buried are deposited the eggs by the female, the young larva hatching therefrom feeding upon the decaying matter during most, if not all of their larval period. These species are

generally more brightly colored than Silpha, but are not so flat as the latter.

In another family of beetles, also, the same habit is prevalent as of the species of Silpha. This family is the Staphylinidae, characterized by the exceedingly short elytra, as compared to the length of the body. The species of the genera, Staphylinus, Creophilus, and Leistrophus are common. They have the habit of curling the abdomen up over the back, as if they were going to sting. These beetles are prevalent during all the summer months. See figures 10 and 11.

Sometimes one will pick up a slender beetle, from the abdomen of which oozes a whitish liquid. This liquid, when it comes in contact with the skin, produces a blister. The beetle is the blister-beetle, of the Meloidae, and the liquid is cantharic acid, from which the cantharidin of druggists is manufactured. The beetles are grayish black, with delicate elytra, and are found during the summer feeding on various flowers. Epicauta anerea is shown in figure 12.

Probably the most pretty, agile and graceful beetles in existence are the tiger beetles, of the Cicindelidae. They are of medium size, with geometrical markings of white upon a brown, purple, green or red background. They fly with great swiftness, and do so at the least warning. Their alertness is shown by the fact that in alighting after a short flight they invariably face the intruder. They are most abundant in sandy places and upon mud banks of a stream on a bright, sunny day. Cicindela purpurea is shown in figure 13, and C. hirticollis in figure 14.

A beautiful but peculiar beetle is represented in figure 14. It belongs to the Carabidae, and is somewhat rare. It is found in summer under dry rocks and stones.

The representatives of the Chrysomelidae are all very destructive leaf-beetles.
Their larvae, as well, feed upon the leaves
of plants, especially vines, and are destructive to both wild and domesticated
flowers. Chrysochus auratus is a very
convex beetle of metallic green color; it
destroys the wild flowers more than the
tame. Doryphora decemlineata is the
common potato beetle, so destructive to
the potato plant. These are shown in
figures 16 and 17. Another very destructive species is Coptocyla bicolor. It is
found chiefly upon the leaves of the
morning-glory.

The Buprestidae are wood-borers, and a few very destructive beetles are contained in this family. One of these is a species of Agrilus, shown in figure 18. The beetles of this family are found on the trunks of the trees, in the hotter part of the day. They do not fly, but feign death when disturbed.

The Tenebrionidae consists of the grain-beetles, so destructive to stored grain. There are many kinds found in North America, but only one, a species of Tenebrio, is figured, as all bear a more or less close resemblance to it.

The family Hydrophilidae contains beetles which live an aquatic life, feeding on small fish and mosquito larvae. They are attracted to the arc lights in great numbers, and are easily caught. One form, Hydrophilus triangularis, is very common. Another species, less frequently met with, is shown in figure 20.

The Cerambycidae is represented by hundreds of forms in North America, which, though the most beautiful in color, and the most graceful in form, are rivaled in destructiveness by the beetles of only one other family, the Scarabeidae. The antennae are very long, in some species being four times as long as the body. Cyllene pictus, in figure 21, is the Hick-

ory borer; C. robiniae infests the Locust tree; both do considerable damage. The beetles represented in figures 22, 23 and 24 are commonly met with in sunny locations, upon the flowers of the goldenrod and the thistle. In figure 25 is represented a beetle, very beautiful in life, but whose grandeur fades away and disappears after death. It inhabits the flowers of the thistle as late as the middle of October.

The family Lampyridae contains an interesting assortment of beetles, most of which possess the peculiar power of producing a phosphorescent glow at the end of the abdomen. In some cases both sexes of a species have this power, but in some cases only one sex is provided with it. In some species the female is wingless. Figures 26 and 27 show two species of this family; the former, Chanliognathus pennsylvanicus, is very common, while the latter is rare.

The Lucandinae, noted for the enormous development of the mandibles in some species, is commonly met with in collecting. The species are dark brown or black, and are generally rather large. They are not poisonous, however, as is sometimes supposed, but can inflict painful bites with their sharp jaws. Lucanus dama and L. elephas are found here sometimes, while Dorcus parellelus, shown in figure 28, is fairly common.

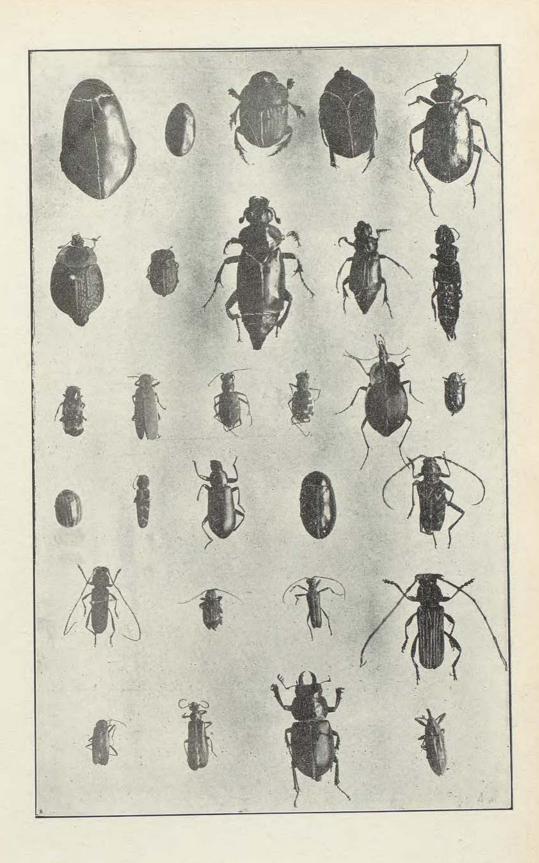
The Curculionidae contains beetles having the head elongated into a snoot, which ranges from one-eighth of the length of the beetle to four times its length. The larvae are known as weevils, and are very destructive to stored grain. There are several families of these beetles, but only the Cuculionidae will be considered. In this family are found enemies not only of grain, but of apples, pears, peaches, plums and various other fruits. A common form, Lixus concavus,

which infests a species of Rumex, is commonly found on the rhubarb plant.

Beetles are found almost everywhere that life exists, from the freezing temperature of the polar regions to the burning heat of the tropics. In the latter zone are found forms gigantic, weird and some even horrible in form, others strangely fantastic in their markings. These range in size from a microscopic form to species exceeding six inches in length. Every variation imaginable in form, size, color, shape and decoration is found in the coleopterous fauna. It has been estimated that there are one million species in existence.

The study of nature reveals forms of life so strange, so numerous, so variable, and so complex, that in its investigation one seems transported from the reality into some fantastic dream. It reveals, also, as knowledge advances, more and more of the links binding together strangely contrasted forms, until there is a well-connected chain, extending from the lowest, simplest protozoan to the highest type of the series—man.

1.	Dytiscus margi-	15.		
	natus.	16.	Chrysochus aura-	
2.	Dytiscus		tus.	
3.	Copris	17.	Doryphora dec-	
4.	Allorhina nitida.		emlineata.	
5.	Calosoma sayii.	18.	Agrilus ——	
6.	Silpha	19.	Tenebrio	
7.	Silpha	20.	Hydrophilus	
8.	Necrophorus	21.	Cyllene pictus.	
	americanus.	22.		
9.	Necrophorus	-23.	Leptostylus acu-	
10.	Leistrophus cin-		lifer.	
	gulatus.	24.		
11.	Creophilus villo-	25.		
	sus.	26.	Chauliognathus	
12.	Epicanta cinerea.		pennsylvanicus.	
13.	Cicindela purpu-	27.		
	rea.	28.	Dorcus parellel-	
14.	Cicindela hirti-		us.	
	collis.	29.	Lixus concavus.	
		LE	LEO LOUIS HOLZ.	



The Narcissus



ancient Greek mythology, Narcissus was the son of a water nymph. He was a youth of extraordinary beauty, and as is frequently the case, he was very vain. One day as he passed by a fountain, glancing downward, he beheld a beautiful face smiling at him through

the water. He loved the fair face, thinking it to be that of a water nymph, but, although he wooed it daily, he could not lure it from the fountain. He finally pined away and died of a broken heart. Thus did Nemesis punish his vanity. But in the place where he stood sprung up the beautiful flower which bears his name. Most people consider this the source of the name, narcissus, although some say it was derived from the Greek word for narcotic, alluding to the narcotic properties of the plant.

Varieties of the narcissus are found in Europe, North Africa and North and West Asia. Thirty or forty wild forms are found in Central Europe and the Mediterranean regions. A different variety is grown in China and Japan. In Europe the narcissus is second only to the tulip in its popularity. It is very extensively grown as a spring flowering blub. It was first cultivated there, in its native home, on account of its natural beauty. From there it was introduced into this country, where it has not yet obtained the popularity it merits.

In the botanist's classification the narcissus is a connecting link between the lily and the iris, possessing many of the characteristics of each. The leaves are long, slender and rush-like, resembling the leaves of the iris. The flowers are sixparted, arranged in a double row. The three petals form the inner row, the sepals the outer one—like the lily blossoms. The distinguishing characteristic of the narcissus is, however, the cup or corona which grows just inside the row of petals. It was once thought a modification of one row of stamens, but now it is considered merely an outgrowth of the coralla.

The flowers on some species are solitary; on others they are arranged in clusters. Both single and double varieties are grown. The flowers are usually white or yellow, or a combination of the two colors. The majority of the bulbs blossom in the spring, although there are some autumn flowering varieties. Almost all kinds are hardy, but a few in the Northern states require protection during the cold winters.

Perhaps the best known variety is the large Trumpet Narcissus, the daffodil or Lent lily, as it is sometimes called. This popular flower comes from Sweden and England. It also grows in Spain and Austria. It is one of the hardiest and most common of varieties. The flowers are solitary, and both single and double varieties are grown. The blossoms are a bright yellow and quite fragrant. The large corona gives this variety its name.

Another familiar variety, usually grown indoors, is the Chinese lily. It is a native of the Canary Islands, Japan, and, as its name indicates, China. The flowers grow in large bunches and are white with yellow cups. This variety of the narcissus is usually grown in water, although this way is very hard on the bulb. It exhausts its strength in producing flowers

and cannot draw nourishment from the water to store away for the following season. Closely related to this plant is the paper-white narcissus. It is a pure white variety, bunch-flowered, and has an almost sickening fragrance.

The jonquil, a favorite with many people, has fragrant yellow flowers. They grow in loose bunches, from two to six in a bunch. An odd feature of the bunchflowered narcissus is the sheath which protects the tiny buds until they are nearly grown. It seems to be a continuation, a thin outgrowth of the stem. It completely encloses the buds while they are small, forming a flat envelope. When they are grown it splits and gradually withers away as the blossoms mature.

One of the daintiest and prettiest of all narcissi is the Poet's Narcissus, or, as it is often called, the Pheasant's Eye. Its flowers are small and solitary. The petals are white and the corona, which is quite short, is yellow with a bright red edge. This coloring makes the flower easy to recognize and gives it the appearance of a bird's eye. There is also a double variety of this flower. It is pure white, a color rare among double narcissi.

In some varieties the flower grows large, giving the plant a very odd appearance. This is true of the Hoop Petticoat Narcissus. It is a near relative of the Trumpet Narcissus, resembling it in color, but the blossom is much larger. The corona widens gradually toward the outer edge, giving the flower the appearance of a hoop-skirt, with the petals for draperies.

The narcissus is not at all exacting in its demands, thriving in almost any situation. It loves its first home perhaps the best, flourishing along the banks of streams and ponds. The plants grow well when planted around shrubbery or in flower borders. They are very effective

planted in the grass, along woodland walks or in beds in open spaces. In a partially shaded location, away from the direct rays of the sun, they retain their beauty and freshness much longer.

The bulbs should be planted late in the summer or in the early autumn. Frequently little knobs appear at the base of the bulb, indicating that growth has commenced. Then no time should be lost in planting them. They thrive in almost any kind of a soil, but a light, turfy loam is best. A slight admixture of clay is sometimes an advantage, but a very stiff clay is bad. Good drainage and plenty of moisture are essentials to success. Care should be taken in preparing the beds, but when once planted, the bulbs may be left undisturbed for several years. They are usually planted about three inches apart, but, as they multiply from year to year, they become crowded and need to be taken up and separated.

It is a good plan to plant seeds of summer-flowering annuals in the narcissus beds to cover the decaying foliage after the flowers are gone. The leaves should not be cut but allowed to die naturally. In this way the food stored up in the leaves is taken up by the bulb and laid away for next year. When the ground must produce a double crop a top-dressing of manure in the fall is essential.

When bulbs need to be transplanted or divided, it should be done in July or August, when they are usually dormant. Then the old roots have died and new ones have not yet commenced to grow. Small bulbs form at the bases of the old ones. These may be removed, planted and allowed to grow for a year, until they are large enough to blossom. Plants are sometimes raised from seed and new varieties obtained in this way, but it is a very slow process.

For pot culture and for cut flowers all varieties of narcissi are suitable. The bunch-flowered varieties are perhaps most satisfactory. The Chinese lily is very popular for indoor cultivation. For bouquets the flowers should be cut as soon as they open. If they are to be sent any distance it is better to cut them just before the buds unfold. They will blossom out in water and last much longer.

Through all the ages the narcissus has been a favorite theme of the poets. Away back in the time of Queen Elizabeth, "rare Ben Johnson" in "Echo's Lament For Narcissus," cries:

"Nature's pride is now a withered daffodil."

Shakespeare, at the same time, sings:

"Daffodils

That come before the swallow dares, and take

The winds of March with beauty."

Evidently their season of blossoming begins earlier in Britain's sunny clime, for here April scarcely sees the narcissus, except through the greenhouse windows.

Later, in Herrick's poem, "To Daffodils," he says:

"Fair daffodils, we weep to see You haste away so soon; As yet the early rising sun Has not attained his noon."

These daffodils did not grow, it seems,

"Beside the lake, beneath the trees, Fluttering and dancing in the breeze,"

as did the ones Wordsworth saw. Would we could all, when we think of the lovely flowers, say with Wordsworth:

"And then my heart with pleasure thrills, And dances with the daffodils!"

GRACE MILLS, '04.





you will bring a net and will come with me for a walk along the shore I will show you some of the treasures which Mother Nature keeps stored in her treasure house under the sea.

Let us cast the net here and draw it up slowly. A waving mass becomes visible

as we haul it near the surface. When drawn above, the net is empty. Let us cast it once more. This time we haul up what appears to be sea-weed with a flower center. It is a brittle star. Here is the explanation for the mysterious disappear-

ance: In some manner we aroused the temper of the first star-fish and it broke to pieces and fell through the net as we hauled it above the surface.

Let us play the fisher again. This time we bring up another star-fish, one of pink and blue stripes and covered with bristles. It is a stand-star, much like the red sun-star.

Let us walk along a little way to a more protected spot. There is a ripple in the water. We draw up a cross-star very unlike the graceful brittle-star. The water is quite clear. Let us find what can be seen at the bottom. There is an object somewhat like the cross-star. A cup

grows on a stem. From the cup wave fine plumes. It is the egg of the lily-star and in appearance is much like the lily.

If you will look about you on the shore you will probably see a brown chestnutlike object. It is a "shell" covered with "bristles." Nearby lies another without "bristles," but covered with knobs, and had found the urchins growing on a rock under the water we would, doubtless, have taken them for fringed flowers. If we are fortunate as we walk we may find a flat, gray, "hair-covered" object about the size of a dollar. On it is the delicate tracing of a star-fish. It is the coat of arms of the sea-dollar, for this young sea-









near it another partly covered. They are all sea-urchins. The bristles fall off on the death of the urchin. When examined the greenish gray shell on which they are borne is seen to be made up of hexagonal plates. Inside is the silky mantle from which these plates are made. The spines are red, brown, pink, or purple. If we

urchin belongs to the same family as the star-fish, the Ray family.

While by the clear water let us look again to the bottom. Down among the red, striped sea-weed you will make out what appear to be chrysanthemums, daisies and dandelions. These are called sea-anemones, but are only animals resem-

bling flowers. There are many other common ones: the thick petalled searose, the sea-pink and the red-and-green anemones.

Nearby are objects like balls, fans, bells, bottles, baskets—in fact, of almost every shape. They are jelly-fish. One is floating on the surface nearby. It can hardly be seen in the daylight, but at night gives off a brilliant light, producing a beautiful effect if there is a school of the fish. The jelly-fish we observe is bell-shaped and has four "clappers," feelers, hanging from its center. These feelers and the eyes around the edge of the bell are covered with cream-colored ruffles resembling old lace. The bell, which opens and closes to give the onward movement, is pink or sometimes blue.

While following the jelly-fish we have been approaching a floating log. Let us examine it. A cluster of shells banded in pink and cream covers one end. Out from the "mouths" come three triangular shells. blue and pink, which open and shut spasmodically. On the opposite end of the log others swing back and forth on long stems, and as the triangular shells part a mass of waving "plumes" appears, then is drawn back again. These are barnacles. The "plumes" are their many feet, nets with which they haul in their food. These barnacles are always attached to something except when young. Then they swim around until they fasten their heads to a rock or log.

There are other shells without occu-

pants nearby. As we came to the log I noticed one. You doubtless thought it a rock. Let us examine it. A tube fully half a foot in diameter is revealed. On close inspection it resembles a giant worm, but it is only the home of sea-worms.

Nearby is a pile of shells. Let us look at them. Here is one like a rose. It doubtless once lay beside a pansy-like animal, both looking like flowers from one's garden. Here is a tiny mussel shell with tissue-like walls and the size of a pea-pod. It is called by that name.

What have you discovered of such rare beauty as to excite such comment? A pearly nautilus shell? Its successive chambers of pearl, the last one inhabited by its wonderful builders, are truly works of greatest beauty. We can easily imagine the "ship of pearl" as it "sails the ununshadowed main," navigated by the royal purple arms of the nautilus. We see a waving mass of red and start to cast our net to secure another "sea-flower" when we catch sight of a pair of eyes gleaming wickedly forth from a bullet-like head and are reminded that the devil-fish guards the treasures of the sea.

Meanwhile, the tide has crept up and we must end our walk with only a glimpse of a few of the common things of the sea and without a look at the snake-star, the electric-sponge, Venus' girdle, or the many more precious treasures that may be seen at the open door of the treasure-house of the sea.

INEZ HANSEN, '05.







MR. RALPH QUEAL

EDITORS



MISS SARA MOFFATT

"We can live without love,
We can live without books;
But civilized man cannot live without cooks."



HE camp fire blazed merrily and the girls seemed never to have looked so pretty before or the boys so handsome as the shadows flickered on their faces. Even Mrs. Hall looked like a girl again. There was a pause and all was still when the far-off cry of a coyote was

heard in the distance and John, jumping up suddenly, answered the weird cry and began a wild dance, the others joining him. Madly around the fire they went till Gilbert as a climax with one leap went to the other side of the fire and the others unable to do this dropped breathless to the ground. "John," said Mrs.

Hall, when she had gotten her breath, "I think one of your ancestors must have been an Indian." "Didn't I ever tell you about my greatgrandmother's uncle? He was chief of the great Pamanchees and at one time when I went to visit him I mentioned that people who painted weren't considered nice and somehow he got offended and danced around me and then tomahawked me. Mother said it was very inhospitable." "John has more wonderful ancestors," said Ellen, "but all the same I wish there were Indians here and they would attract us and the boys would shoot them and the girls reload the guns as it always happens in books. you know."

"We'd all be scalped while the girls were fighting over loading the guns," said Edward; "because, if you remember, we only have one rifle and two revolvers, so I'm glad the Indians are six hundred miles from here. But I wish something would happen. We've been here three days and no one has caught any larger fish than customary or shot anything but a sick rabbit. None of us have had a chance to gallantly rescue one of the girls or eloped or died."

"No, thank heavens, Edward, that nothing of the kind has happened," said Mrs. Hall, "and if I thought it was going to I'd pack you all home this minute."

"I'm tired of loafing in this unexciting manner, too," said Elizabeth, "and tonight let's everyone think of something exciting to do tomorrow." Then as it was late they went to their respective tents after singing the good-night song.

Allen, the colored man, was left to watch the camp, and he rolled up in a blanket by the camp fire. However, he did not sleep, for when at last all things were still, he arose and softly called Lucinda, who was the cook. She came out in hat and coat and together they hitched the horses and after leaving a note on the kitchen table, drove away.

"Goodness," said Ellen, "why hasn't the gong sounded? It's half past nine. I'll go and see what's the matter," and she came upon a very disconsolate looking group of boys, who had evidently just gathered. "Boys, don't make such a racket; Mrs. Hall has a fierce headache. You look as blue as—"

"We feel it," interrupted Philip. "Just listen to this," and as the rest of the girls came up he read Lucinda's note, which said as the place was too lonesome for Allen and her, they had eloped and bor-

rowed the horses and wagon but would send them back in a short time. Then the girls looked at the hungry boys and laughed. "This isn't exciting," said Ellen. "but it won't mean loafing. We'll have to eat things raw as far as I am concerned though, for I never go near the kitchen at home and don't know a thing about working." Madge laughed, "I make fine oyster stew on the chafing dish, but that's all." "We are the best fudge makers in the school," said the twins.

Then the boys turned to Elizabeth. "You went to Manual. Can you save us from starvation?" said John, tragically. "Don't tell us you only took sewing," said Edward. "Relieve our suspense and appoint me first assistant," said Gilbert, coming out of the kitchen with an apron around his neck.

"Yes," said Elizabeth, "I'll undertake the cooking, but you may all have an undertaker visit you before I am through. You will all have to help me; Gilbert may be first assistant. The twins may be dishwashers with Ralph and Edward to help them. Ellen may be table decorator with Don as her assistant. The rest of you may keep from under foot until you're wanted."

"But are you saving some greater honor for me?" said John, kneeling. "I knight you Lord Good-for-Nothing, our court jester. You must amuse us," said Elizabeth, patting his head with a rolling pin.

The rest began their duties and by half past ten breakfast was served. Ellen had scattered blue anemones over the table till Gilbert declared there was no room for anything to eat. But Don praised with the air of an artist. When they were seated Gilbert brought in a great platter of ham and eggs and the twins followed with a plate of toast, and

then came Elizabeth with the coffee pot. They are as they had never eaten before. "All this work has made me hungry," said John, who had been in everybody's way. "If you were Elizabeth or I you might talk," said Gilbert scornfully.

"Do you remember what we said last night? Well some of our wishes have come true: there's been an elopement and we've all quit loafing except John and we couldn't expect that of him even now," said Edward.

"Suppose we were on a desert island and hadn't any way to get home (which is true), and our supplies only last till morning, and Elizabeth would drown."

"Spare us more," groaned Gilbert.
"But seriously, I think I shall walk to town and get horses."

"Twenty miles from here," said Madge. "Father is coming tomorrow afternoon and he will take us home if we want to go, but I don't; he will probably bring us some fresh eggs and fruit."

"Time to wash dishes," said Elizabeth, "and every one who is not cleaning up the dishes, go make up the beds. You are not going to get any lunch." In a half hour they scattered in the canoes for a day's fishing, the girls in their dainty sunbonnets and the boys in great straw hats. The camp was quiet for the rest of the day save for the creaking of Mrs. Hall's and Elizabeth's hammocks.

About five the fishermen came in more

or less heavily laden and as the boys prepared the fish Elizabeth began supper. The table was decorated in oak leaves on a gorgeous red table-cloth. There were fish and baked potatoes and hot biscuits, and baked beans with baked apples and sponge cake and fudge for dessert. Such appetites! They are everything in sight and then went to the kitchen for more.

"John," said Elizabeth, "you are not doing your duty. Remember you are jester."

"Alright," laughed John and began the

"Here's to Elizabeth, queen of cooks, Who causes many jealous looks. The other girls are full of strife, For the boys all want Elizabeth for a wife."

Ellen followed:

"Here's to Manual's cooking class, And we would have had to fast But for a brown-eyed lass, Who took those lessons in the past."

But then Madge shouted, "There's father," and sure enough there stood Doctor King hitching his horse to a tree. They all crowded around him and toid him what had happened. He brought them all kinds of good things to eat and after three days more they went home. Everyone hated to go and this time was remembered as the happiest of their lives. But all of the girls and some of the boys learned to cook.

MARY GENTRY PAXTON, '04.



Apropos

The melancholy days are come, the saddest of the year.



UR boys who have been working for the past nine months in the shops, must soon lay aside their caps and aprons, some for a short vacation, while others do so for the last time. The ambitious Freshman who has passed in joinery will live to "flunk" in turning, and the Junior

may live to see the day when he is "conditioned" in machine shop. But what is the Senior to do with himself?

He has succeeded in passing through four years af manual training work. Some have taken a great interest in the work and have spent much time in extra practice. But still they are not satisfied. They can see that manual training is merely a means toward the end, and they intend to carry their work on farther. Another class think they have learned all they can, and that it is high time that they were quitting. They have taken four years of manual training and are fit to take any position where skill is required. This class is somewhat conceited and appears to be laboring under a vague delusion, but it will soon find that it takes a lifetime to learn any one thing well.

But there is still another class, which is to be pitied. It is composed of discouraged pupils—those who think their time has been wasted. "What fools these mortals be," to think that they should have any misgivings. It is true that manual training has some objectionable features, but they are trivial in comparison with its benefits. Some narrow-minded people have held that the old system of education was satisfactory and as a preparation for the duties of life, it was suffi-

cient. But the system of a decade ago, will not answer for today.

Others of still narrower minds have believed that the effect of the introduction of tool work would be to dwarf and narrow the mind and to lower the aims and ambitions of their children. They are the kind that look upon labor as degrading and consequently we need give them little consideration. Booker T. Washington says that much of the suffering and discontent existing among the people of his race has been due to the fact that they despised manual work and thought that if they possessed a small bit of book-learning they could meet all the conditions and obstacles of life.

We may excuse many of the people who condemn manual training because they are ignorant of what manual training is and what it aims at, and will naturally oppose it. The only way to prove that they are in the wrong is to show them the results of a course in manual training, and may the boys from Old Manual do so, and those of the "Class of 1904" be the first.

Instead of lowering the aims, it has saved many a discouraged boy from an inevitable downfall and given to him a higher appreciation of life and its duties. Some of us know of such cases and if manual training has done this much in a single case, it has done much indeed.

Labor has a dignity of its own, but we trust that those who take manual training will use it as a means toward a higher end and let it become part of a well rounded-out education. Even with all objections vanished, there are still some who persist that one cannot receive

enough training in one branch and that the boys who take the course become "Jack-of-all-trades, master of none."

The above term is somewhat ancient and a "Jack-of-all-trades" is not so bad after all. Some (?) of the Manual girls may find out that a husband who knows something about repairing and fixing around the house, is much better than one who is unable to tell a hammer from a plane. None of us need fear that we will learn too much of any one trade.

Thus, with all its enemies put to flight, manual training stands out supreme as an educational factor of the present day and may it continue to do so for all time is the best wish of all concerned. But we should remember that in times past, there have been systems and institutions as full of promise as manual training and manual training high schools, that have failed because some rebelled or failed to per-

form their duty. Consequently let all of us, graduates as well as undergraduates, strive to further its interests by good work and example and then manual training, safe in the house of its friends, need not fear for its safety. I am sure that all of the "Class of '04" will pledge their support and in time to come will show to the world that manual training is the thing and that the M. T. H. S. of Kansas City, Mo., is the school.

We cannot take all the credit ourselves. Our good faculty deserve much praise and as we part let each and all of us sincerely thank Professor Morrison, our first principal and guiding star, Professor Philips, our new principal and best friend, and the faculty, for their kind guidance during our pilgrimage through Old Manual; and to the "flunker" let us say, "Cheer up, for he who 'flunks' today may live to 'pass' another day."

WALTER H. MILLER, '04.

Pratt Institute



RATT INSTITUTE of New York City should be of interest to the pupils of manual training not only on account of its being the greatest school of its kind, but also because there many of our teachers have gained a large amount of knowledge. This institution was founded

in 1887 and has continued to gain in size and importance year by year. Now almost every branch of learning, from psychology to laundry work, is taught within the walls of its seven large brick buildings. "Its object," as stated in the catalogue, "is to promote manual and industrial education, as well as cultivation in literature, science, and art, to inculcate habits of industry and thrift, to foster all that makes for right living and good citizenship, and to aid those who are willing to aid themselves."

And there in the main building in large,

well-equipped rooms is taught domestic art. There surrounded by books treating of these subjects, fine models in sculpture, photographs, colored plates of costume, and many specimens of fabrics, the pupils are taught sewing, dressmaking and millinery; and there with excellent instruction, and careful perseverence the student is made competent for becoming a teacher and able to carry back to our Western schools the learning gained.

The methods of this school are much the same as the methods of ours. It aims to teach the best way to do even the simplest things, to impress upon the students the value of economy, order, and accuracy, and to bring to bear upon the artistic and scientific principles underlying all good work.

So may Pratt Institute, with its high purposes and aims, continue to prosper, to send to us its well-equipped instructors, and to prepare young men and women to lead happy, useful lives!

Measure for Measure



F cooked too long, ham will become hard and dry. Serve with eggs, fried in the tried-out ham fat," finished Martin.

"Most of those recipes say, "'Serve with whipped cream," commented Howard. "Say, I wish the son of that old German woman who

cooked for us was in Halifax. Just as we're beginning to enjoy ourselves, he has to get sick! And I wouldn't be Howard Dunn if it hadn't fallen to me to do the cooking."

"You're dreadfully abused," said Martin, sarcastically. "Well, hurry up and fry some griddle cakes. No breakfast, a sloppy dinner, and no prospects for a better supper, isn't one of the good points of camping ten miles from the city limits. I feel like I used to at Manual at 2:20 after mathematics."

"When you've had some of this supper you'll feel like you did at 10:50, after cooking," replied Howard.

"Well, I hope so. Now shall I read you the recipe for griddle cakes?"

"Oh, you needn't," confidently; "I guess I haven't forgotten what Miss Bacheller taught me."

"She does teach you a lot about cooking," laughed Martin, "but I wouldn't be too sure I remembered it all, because we took cooking two years ago. Better let me read it to you."

"No, thanks. I guess I know that recipe. Now, if—Caeser! what's that smell?"

For a moment the two sniffed the air suspiciously. Suddenly Martin made a dash for the fire, just rescuing the ham and eggs from the flames. "We won't have any supper, if you don't quit talking," he said, scornfully. Crestfallen, Howard retreated to the supply tent while Martin began to separate the ruined from the edible portion of their meal.

At length, Howard said perplexedly: "There! I've made those batter cakes just as the recipe said, but they don't look right. Wonder why they don't puff up?"

"Oh, they'll be all right,' said Martin, cheerfully. "Get 'em done and then we'll eat."

Soon Howard announced that supper was ready, and the two sat down to eat. Martin did not eat heartily. The ham and eggs were badly burnt, and the batter cakes were very heavy, and tasted peculiar. But Howard ate enough for both.

After supper, the boys sat down by the fire to discuss the events of the day. But somehow, Howard was very quiet, and soon went off to bed. Martin, astonished at his friend's willingness to retire, followed him to the tent. It seemed to Martin that he had just fallen asleep, though it was really midnight, when he was awakened by a heartrending groan.

"Howard!" he exclaimed, starting up. "What is the matter?

"Oh! oh!" came from the pillow beside him. "I'm dying! I've got such a pain! Oh, I'm dying!"

"Nonsense!" exclaimed Martin, half frightened, half angry. "You ate too much supper. Wait till I light this candle, and I'll see what I can do."

But after the candle was lighted, he was truly horrified. Howard, with rumpled hair, flushed face, eyes unusually bright, and hand tightly clasped over his stomach, was tossing about on his cot, uttering the most distressing moans. At intervals he would cry out, "Oh! I'm dying. Take me home."

After the first shock, Martin recovered his usual equanimity. Snatching up a pail, he filled it with water and heated it over the rekindled fire. Wrapped in a towel, this served as a hot water bottle, and when this was applied to Howard's feet, and wet cloths to his head, Martin sank exhausted upon his couch, for, come what might, he had done all he could.

Meanwhile, visions of two cans, nearly alike, but containing articles very dissimilar, danced before Howard's eyes. In preparing the cakes, he had dashed the contents of one of them into the mixture, but—which had he used? He could not remember, but it did not require a very fertile imagination to enable him to guess.

At length, he fell asleep, and it was late in the morning when he awoke.

"I used the wrong can," was his brief explanation to Martin. "I thought it was soda."

"And what was it?"

"Gold Dust Washing Powder!"

MINKA REEFER, '05.

Art, as Applied to Dress



OW often do we hear the remark, "That girl's gown simply sets my teeth on edge!" And often girls' dresses do give one a peculiar sensation. The colors in them are dashing, are not in harmony with the complexion, eyes, and hair of the wearer, and the whole cos-

tume seems in very poor taste. Yet all this discomfort to friends, acquaintances, and even passersby might be averted by a little artistic planning on the girl's part.

Art in dress is not based on the old Grecian idea—that of clinging and statuesque drapery—as so many seem to think, but is founded on purely scientific laws of harmony, whether in construction, material, or coloring, and any person with a reasonable degree of intelligence may cultivate it.

A dress, to be artistic should emphasize the beautiful lines of the figure and should soften the less beautiful ones. It should not, in any way, impede the easy and graceful movement of all the limbs, and anything on a dress that does not seem to be there for a particular purpose is inartistic; as ornaments should always emphasize the construction of a gown, instead of the construction emphasizing the ornaments. In hats it is much the same, and a hat which is perched on the head at an angle that defies all laws of gravitation, and neither shields the head from heat nor cold, is inartistic, because a hat is supposed to serve these purposes.

Fabrics should always be chosen to fit the needs of the wearer, climate, and time of year, and should be suitable for the purposes they are intended to fill. Light fabrics are much more comfortable and artistic than heavy ones, since it is inartistic for any one to look as though she were dragging a weight with her.

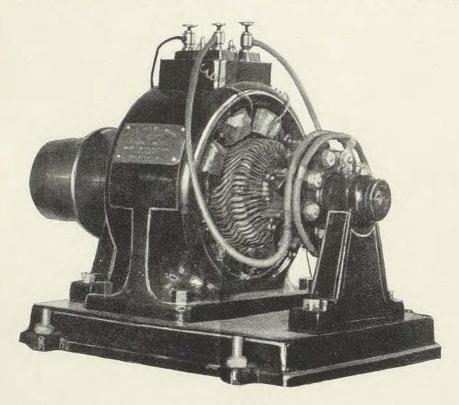
Then the color of a dress is one of the all-important things. It should, above all things be in harmony with the complexion. There are, in reality, three broad classes of complexions: Pure red and white, fair, with the skin probably tinged with a delicate pink, and dark, or dark olive, with or without red cheeks. A clear

red and white complexion looks well with almost any tone of color, or black and white; pale blue is worn most advantageously with the fair type because it harmonizes with the pale salmon pinks in the complexion; generally brown is becoming to persons with red, brown, or auburn hair, for the many persons whose

complexions are muddy, browns, blacks, and grays are the most becoming.

So we see that by giving a little attention to one's figure, hair, complexion and eyes, and to the choosing of proper fabrics, anyone may be, if she so chooses, tastefully and artistically dressed.

DOROTHY HOPKINS.





HE cut shown is a motor made by Mr. Cooper Milnes, '03, and sent to the St. Louis World's Fair as a representative piece of work from our school. The motor is of five horse power, 110 volts, direct current machine and has eight field poles. Under the able direction of Mr. Kent,

our own electrician and engineer, Mr. Milnes worked hard for two years trying

to complete it. He made all the patterns and did all the machine work himself. When our principal was looking for something to send to the World's Fair he thought of this and decided that nothing could represent our school any better. It was sent and will stand there while the Fair lasts, a credit to our school. We are proud of Mr. Milnes and we are proud of his motor, and we all, teachers and pupils, wish him success along this line.

R. W. Q.

The General Condition of the Manual Training Department



HE Freshman boys are taking eighteen exercises this year, while heretofore the course has only called for sixteen. They are also using shop notes in the joinery room, compiled by Mr. Myles and Mr. Elmer, our two joinery teachers. These notes are full explanations of each

exercise, and in many cases an accompanying cut shows the exercise completed. There is also a title page and a preface to these notes, and when collected in note-book form they make a very neat, as well as useful, note-book. One of the boys is making a beautiful music cabinet for his private use.

Mr. Cushman expects to do a good deal of finished work next year, and for this reason the boys in the turning shop are making patterns for tools adapted to this purpose, such as soft hammers, etc. They are also making patterns for pulleys, and couplings.

In the forging room, very little extra work has been done outside of the World's Fair exhibit. A few of the boys will finish a whole set of machine shop tools, while only three or four are required.

When we learned a little before the holidays that our principal, Professor Morrison, was going to leave us, we were filled with sadness. All of us were glad of his promotion, but were sorry to learn that the man who had founded our school, and who had done so much to make it live and prosper, was to leave it in the time of its prosperity. And March 1, when the news came that Mr. Moore, our director of the manual training course, was to go to St. Louis also, our hearts

were filled with sorrow again. Mr. Moore had been with us since the founding of the school, and always proved an ardent friend of the school, and an able director. Mr. Cushman took charge of the machine shop, which left Mr. Ellis in charge of the forging shop.

Much extra work has been done this year for the World's Fair exhibit. Each shop made two sets of its class exercises to send to St. Louis, and the boys deserve much credit for the interest they took in the work and the exercises they handed in. We are glad to state that there will be very few failures in any of the shops this year.

We expect to have three new lathes in the machine shop next year, thus accommodating nine boys in a class, instead of six as heretofore. The boys are also making the special tools and bolts for an eight-inch hand lathe to be used in the shop next year. The course will also be changed a little next year.

The teachers in the mechanical drawing department have been doing the extra work this year. All the drawings have been changed to three-quarters of their original size. This necessitated a change in all the plates. Mr. Burr has introduced a few new drawings into the course. The teachers are also pursuing a new plan with the isometric drawings this year. Instead of giving notes and letting the pupils work from them, the teachers have made orthographic drawings of the objects they wish the pupils to put in isometric drawings and let them work from these. This makes it more interesting for the pupils, and they naturally produce better results.

R. W. Q.





MR. RICHARD MONTAGUE

EDITORS



MISS FLORENCE SCOTT

Baseball



HIS year the High School League seems to be playing under great difficulties. First one thing and then another has caused the postponement of the games, until the baseball enthusiasm has almost died out; yet we hope that all the games will be played.

The first game Manual played was against Westport, April 13. Being un-

able to secure a park the game was played on a vacant lot at 34th and Holmes streets. The first half of the game looked like a walk-away for the Manual team, but the boys grew over-confident and let West-port tie the score in the ninth inning. Thus the game stood until the tenth inning, when Westport scored the winning run, the score now being 11 to 10 in their favor.

April 20th Manual journeyed to Kansas City, Kas., to play the second game of

the league series. Here our hopes for the pennant were shattered by a score of 14 to 6. In this game, it is said, the Manual team were outplayed in every stage of the game, and we hope that this defeat will spur the team to make up for their poor start.

The following day, April 21st, Manual played the team from the Prosso Prep. The game throughout was uninteresting, Manual winning by a score of 26 to 14. Heavy hitting on our part, combined with errors by both teams, tells the story of the large score. During the game, Henry Eyssell, one of the Prosso team, suffered

and when a pedagogue at last succeeded, there stood the runner, grinning on home plate. Thus the game proceeded until the ninth inning, when the score stood 19 to 6, in favor of the Freshmen. Much credit must be given to the Freshman pitcher for the above score.

The next of these games, was between the Faculty and Sophomore teams. The score this time stood 11 to 8 in favor of the teachers, but let us add that the Freshman battery helped the Faculty team to achieve this victory.

The following game was the Faculty-Junior game, which resulted in a score of



TENNIS TEAM

a very severe dislocation of the ankle, and we tender him our sincere sympathies.

The games this year that have proved most interesting to the baseball "fans," have been the Faculty-Class games. The first of these games was between the Faculty and Freshman teams. All kinds of inducements have been offered the athletic editors to withhold the score of this game, but we have refused, thinking this a good time to get even for past wrongs. The game, however, was past all description. Whenever a Freshman hit the ball, there was a scramble to get it,

14 to 3, in favor of the Juniors. It is said that the way the Juniors pounded the ball, will ever be recorded in the athletic annals of the school. The "Profs" seemed unable to withstand the onslaught, and even with the aid of the other team men, were unable to cope with their opponents.

In a two-inning game, a few days later, several of the "Profs" with the aid of the Freshmen, succeeded in tieing the second team by a score of 2 to 2. The history of this game was "luck," the teachers scoring on "flukes," caused by errors that resulted from the unevenness of the ground.

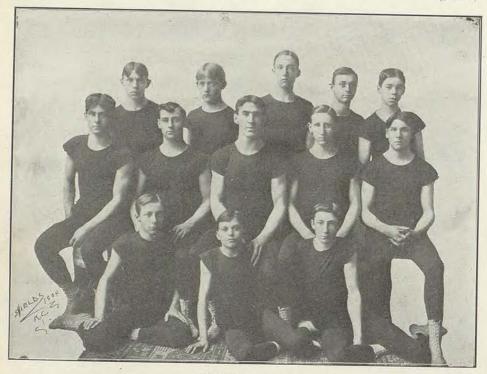
The Indoor Field Meet



NE of the most interesting field meets ever witnessed in Kansas City, was held in Convention Hall, March 18th, between the Universities of Kansas and Missouri. It is the first indoor meet ever held here, and it was a most interesting spectacle. To add local interest to the

meet, the managers arranged for two events between the Kansas City Athletic no hitches whatever, everything moving in regular order.

The event that proved the most entertaining to the local onlookers, was the relay race between Manual and Central. Things looked bad for us at the beginning of this race, for Central had just won both first and second place in the fifty-yard dash. The first quarter of the relay race increased our doom. Webb, our first man to run, while he put forth a good race, considering the man he ran against, lost



GYMNASIUM TEAM

Club and the Y. M. C. A., and two between Manual and Central, and we are proud to say that (owing to the reduced prices) the high school crowds did much towards making the meet a success. As to the management of the various entries, a great deal of praise should be given to the floor directors, as there were practically

by nearly a quarter of a lap. In the next quarter, things did not change, Harnden holding his own, but unable to overcome the lead. The third quarter was more interesting. In this heat, Edwards did some fine work for the Manual team, almost regaining the lost ground before he finished the quarter. The last part of the race was the most exciting. Central had the lead and had her best man last. It was now up to Schenck to win, and win he did. On the second lap, he caught and passed his man, finishing thirty feet ahead. Much credit must be given to the boys for the work they did, and now with the athletic interest this meet has aroused, Manual should have a good track team.

April 30th, Manual and Central held their Fourth Annual Field Meet at the Driving Park. It was an ideal day and, although the crowd was not as large as it third; 5 feet 4 inches.

120-yard hurdles—Minton, Leavens and Parker, all of Central, finished in the order named. Time, 18 3-5.

100-yard dash—Woodbury, Central, first; McConnell, Central, second; Schenck, Manual, third. Time, 11 seconds flat.

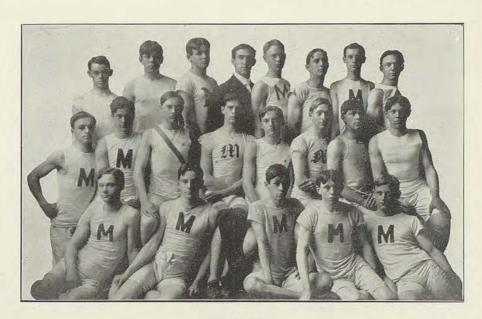
Hammer throw—Prather, Manual, first; Talbott, Manual, second; Minton, Central, third. Distance, 95 feet. Half mile run—Freshman, Central, first;

Half mile run—Freshman, Central, first; Edwards, Manual, second; Parker, Central, third. Time 2:15.

Quarter mile run—Schenck, Manual, first; Minton, Central, second; Freshman, Central, third. Time, 55 seconds.

Shotput—Sanders, Central, first; Charpiot, second; Prather, Manual, third. Distance, 37 feet 3 inches.

220-yard hurdles-Central captured the



TRACK TEAM

might have been, the meet was a success. Although beaten by a score of 81 to 36, we are true sportsmen, and will try again next year to make up for this defeat. The winners of the various events are as follows:

Pole vault—Sanders and Scarritt of Central tied for first place at 9 feet 2 inches; Shoemaker of Manual, third.

Mile run—Donovan, Manual, first; Webb, Manual, second; Quayle, Central, third. Time, 5:24 4-5.

Running high jump—Parker, Central, first; Powell, Manual, second; Combs, Central, event with Minton first, Cooper second, Scarritt third. Time, 28 4-5 seconds.

Running broad jump—McConnell, Central, first; Scarritt, Central, second; Montague, Manual, third. Distance, 18 feet 6 inches.

220-yard dash—Woodbury, Central, first; McConnell, Central, second; Lee, Manual, third. Time, 21 4-5 seconds. Discus throw—Sanders and Minton of

Discus throw—Sanders and Minton of Central tied for first with 84 feet 3 inches; Talbott of Manual third.

We are sorry that the Missouri Valley Interscholastic Meet cannot be reported, as it comes too late to be printed in this issue.





GIRLS' ATHLETIC ASSOCIATION

FOOTBALL



HE football schedule for next year is one of the best Manual has ever had. Mr. Miller, our new manager, was very successful in arranging for the games, and those who "make" the team will have some fine trips. The games arranged are as follows:

Saturday, October 1st, Westport, at Kansas City.

TENNIS

The work of the tennis team is progressing in fine style. There are a great many candidates trying for places and from reports, we will be well represented in this new sport. We regret, however, that the tournament can not be reported in this issue, as it comes too late for printing. The most promising players that will represent Manual are Milton Luce, Ralph Burke, Walter Eyssell, Ray-



FOOTBALL TEAM

Saturday, October 8th, Kansas City, Kas., at Kansas City, Kas.

Friday, October 14th, Paola, at Kansas City.

Saturday, October 22d, Buckner, at Kansas City.

Saturday, October 29th, Paola, at Paola, Kas.

Saturday November 5th, Central High School.

Saturday, November 12th, Buckner, at Buckner, Mo.

Saturday, November 19th, Kansas City, Kas., at Kansas City, Mo.

Thursday, November 24th, Omaha at Omaha, Neb.

mond Lee, John Junkins and Virgil Morgan.

BASKETBALL

The return game of basketball with the Kansas City, Kansas, High School team, was played March 25th, in the Y. W. C. A. Hall on West Ninth street. The score stood: Kansas City, Kas., 24; Manual, 20. The Kansas girls did splendid work, and their score is accredited to their forwards, Miss Warren and Miss Proudfit.



RELAY TEAM

We have heard enough of the praises of our two forwards, Miss Nellie Hewitt and Miss Mable Trumbo, as well as the rest of our team, so nothing further need be said. The game throughout was well played. The line-up was as follows:



GIRLS' BASKETBALL

KANSAS CITY, KAS. MANUAL.

Mable Warren, F.... Nellie Hewitt, F, Capt.

Madie Proudfit, F..... Mable Trumbo, F.

Margaret Gordon, G..... Ella Canny, G.

Edith Scheller, G. Frances Ziegelmayer, G.

Mary Gray, C, Capt.... Hazel Gross, C.

Lillian Abraham, C.... Elma Lane, C.



FENCING CLASS

The Discretion of the Duchess

A Baseball Story



ELLO, Lansing, old man," said Harold Jennings, the ubiquitous, hail-fellow-well-met member of the Dexter high school, as he sauntered into the corner drug store one evening. "Parkhurst beat Farmington 18 to 0." Jennings always had all the news and was ever on the

lookout for someone to whom he could give a portion.

Robert Lansing, his victim on this occasion, looked at him and smiled broadly.

"18 to 0," he repeated. "Why that sounds more like football than baseball." And Lansing laughed outright.

"But don't take it so joyfully, Bob," protested the other; "the victory gives Parkhurst a chance for the cup. They're now tied with us for first place."

"That's so, Jennie; and the game next Saturday will decide, too. It will be a hard game. I must get my wing in shape."

"But you're not going to pitch?" Lansing looked up quickly.

"Why?" he asked in some surprise.

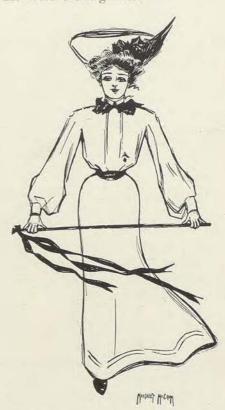
"Haven't you heard, Bob? Kelly gave Duke a try-out last night, and decided to let him pitch Saturday. I think it's a beastly shame myself. Just because Harrisville touched you up for a few hits in the eighth inning last week is no reason for them to take you out now. Even if you did lose that game, there's no reason why you should lose this one. And Winfield Duke! Why, he's no more of a pitcher than I am."

Robert Lansing shrugged his handsome athletic shoulders. He was surprised and hurt that he had lost his place on the team, but he wasn't going to let Jennings know it.

"I don't know," he said slowly, "I guess they did knock me out of the box down at Harrisville; and it's just as well to give Duke a chance, I suppose. They say 'His Grace' has lots of speed."

"But soft you now," the other said in an undertone, "here he is, now." And Winfield Duke stepped into the drug store.

He wore evening dress.



"Evening, fellows," he said carelessly, with just a suggestion of condescension as he bent over the cigar-lighter.

"Hello; how's the 'Duchess'?" responded Lansing, good-humoredly.

"All right, Bob, I guess. Going to take

her to the Phi Theta dance tonight. Get a bid?"

Lansing smiled complacently and shook his head.

Duke feigned astonishment. "Too bad," he said. "Wish I'd known it in time; I'd had 'em fix you up." He swung out of the drug store as abruptly as he had come.

"Oh, how he lo-oves me!" laughed Lansing, when he had gone.

"He hasn't quite forgiven you for that time when you beat him in the track meet, I guess," answered Jennings.

II.

The "Duchess" was Helen Arlington, the mayor's daughter. At least, that is the way she was designated by certain voung men of Dexter among themselves, especially when Winfield Duke was present. The boys thought it teased Duke; but it didn't. His conceit would not allow that; and the boys' calling him "Your Grace," and trying to "guy" him by asking him sundry questions concerning the "Duchess" only served to increase this amount of self-esteem, which was already too large. Winfield Duke was proud of himself, and proud of the "Duchess." For was not Helen Arlington the prettiest girl in Dexter and the acknowledged belle of the town?

But whether or not Miss Arlington enjoyed her title, which Dexter has so ruthlessly thrust upon her, is another matter. Winfield Duke himself might enable us to throw a little light upon this part of the narrative; for one day he had called Helen Arlington "Duchess" to her face. It was only done in jest, but instead of the expected smile from her beautiful brown eyes, Duke had received a cold, angry flash; and for some minutes after he had feared that the title might never apply.

Now, Miss Arlington did like Winfield Duke, but she didn't like him as well as Winfield Duke imagined. Neither did she look down upon Robert Lansing, who since his father's death has spent his vacations in work instead of in Switzerland. For the Lansing family was quite as good an old family as the Duke family, if not better. So once when Duke spoke rather sneeringly of Lansing in Helen's presence, he had received another one of those angry flashes from those eyes, which surprised him not a little.

But money covereth a multitude of shortcomings—at least, I'm sure it may be so in Dexter—and, as before, Duke had at last been forgiven and gone on his way rejoicing.

Notwithstanding her graciousness towards Duke, Helen Arlington was disappointed to learn that Robert Lansing had lost his position on the baseball team. For secretly Helen liked Robert better than she did Winfield. So she was rather pleased when Lansing called her up one evening and asked her to go to the game with him the coming Saturday. "I shall be delighted, Robert," she said.

Robert hung up the receiver and went away whistling.

III.

A heavy rain had fallen Friday night and Saturday morning found the sky still overcast. Anxiously, almost impatiently, the Dexter students watched the clouds; for any more rain would mean a postponement of the game in the afternoon. Great, then, was their relief when shortly after ten o'clock the clouds cleared away and the sun shone forth warm and bright. A few minutes later brought the special trains with the Parkhurst crowd and everybody was happy in the anticipation of witnessing the greatest game of the season.

If Robert Lansing was envious of Winfield Duke that afternoon, as the latter bedecked in a new uniform stood in the shade of the grandstand "warming up" before the game was called, Duke was none the less envious of Lansing, as Lansing, accompanying Helen Arlington,

marched proudly into the grandstand and sat down with her in the center of the stand directly behind the wire netting.

After what seemed to those impatient students an endless delay, the game began at last amid deafening cheers from both sides.

Parkhurst batted first, scoring three runs in the first inning. This lead seemed to dishearten the home team and for four innings they had not succeeded in making one score. Fortune favored them, however, in the fifth inning, and by some good batting coupled with errors on the part of their opponents, Dexter tied the score.

It remained a tie until the last half of the seventh inning. In the eighth something happened which lived in the minds of two boys, at least, for years afterwards. In their half of the seventh a lucky homerun by Duke had put Dexter in the lead by one score. Both teams were playing now with every man strained to the utmost.

A man in the gray of Parkhurst stepped up to bat. Duke, in the pitcher's box, faced him calmly, and with cool deliberation delivered the ball. Crack! The pitcher turned just in time to see the ball soar over the head of his left fielder, come down a foot inside the lime-mark and go rolling down the left foul line to the fence. A figure in a gray uniform with hose striped green and gold raced across the plate. The Parkhurst crowd arose en masse and cheered madly. Again the score was tied.

Winfield Duke turned to the umpire angrily and motioned to his captain.

"That's a foul ball!" he protested hot-

ly.
"I said 'fair,'" returned the umpire

with dignity.

"But it was foul! Wasn't it, Kelly?" (Appealing to his captain.) "He's rob-

bing us!"

The umpire turned his back and took out his watch. Clearly the game was not to be delayed by disputes if the official could prevent them.

"Go ahead and play, Duke; don't mind that. It was fair enough," said Kelly, the

captain.

More incensed, Duke turned to the man with the indicator. The umpire raised his hand restrainingly, but the angry pitcher was upon him. They grappled. The players rushed forward and separated them, and Winfield Duke was ordered from And with the score a tie in the field. the seventh inning with but one man out, Dexter was left without a pitcher.

Captain Kelly held a few minutes' con-

sultation with his team.

"Bob Lansing is in the grandstand," said the shortstop.

"Yes, but he's with the 'Duchess' and wouldn't play if we gave him a chance."

By this time the Dexter crowd had discovered the presence of its former pitcher and was calling loudly for him:

"Lansing! Lansing!"
They saw Kelly climb into the stand and approach Lansing and the "Duchess." Then they saw Robert Lansing smile and shake his head negatively several times: but Kelly still talked earnestly, and finally they saw Lansing arise and say a few words to the girl, lift his hat, and follow Kelly to the field. A mighty cheer greeted him.

IV.

It is six o'clock in the afternoon. The sun shines brightly from a cloudless sky, sending the long, semi-octagon shadow of the grandstand out across the smooth, wellkept diamond. The right fielder of the Dexter team stands quite erect, holding his glove up before his face to shade the rays of the afternoon sun from his eyes. The other two outfielders are in their usual half-stooping position with their hands resting upon their knees, with their eyes alert for any batted ball; the little shortstop moves nervously up and down the line. For it is the ninth inning and the score is still a tie.

In the pitcher's box stands Robert Lansing wearing a new uniform with its bright red sleeves extending from under the looser blouse of blue. He is "the observed of all observers." Anxiously he watches the man on second base, although there are two outs. And but for an error by the shortstop there should have been three. A few minutes before the little infielder had fumbled a sharp grounder, allowing the runner to reach second base. "Don't mind that, Billy," said Robert

Lansing, consolingly.

Lansing knew he was pitching better than he ever had before in his life. And, indeed, he was. For since Duke's successor had taken the position in the center of the diamond, Parkhurst batters had succeeded in making very few hits. Even professional players afterwards complimented Robert Lansing upon his playing that day; and, although he never would admit it to anyone, Lansing knew his steady work was due to a pair of brown eyes which smiled encouragement upon him from the fourth tier of seats in the center of the grandstand. He could remember it vividly for years after.

When Brown, Parkhurst's surest batter, faced him Lansing felt that the crisis of the game had come. A long hit to the outfield would score the runner from second. The pitcher knew that Dexter's fate lay in his hands. It was he that would either win or lose the cup for his

school.

This anxiety caused him to become a little wild in his throwing and he delivered three "balls" in succession. Setting his teeth, he glanced at his catcher, and again looked to the grandstand for encouragement. The "Duchess" saw the look and answered it with a smile.

Lansing slowly swung his arms over

his head and behind him.

"Strike!" said the umpire.

A cheer from the Dexter side shook the stands until they trembled.

Again the pitcher throws the ball.

"Strike!"

Lansing was handsomely rewarded by another mighty cheer—and a smile and frantic waving of colors from one who sat in the fourth tier of seats in the center of the grandstand.

Three balls; two strikes!

A momentous and all-important question now confronts him. What kind of a ball shall he deliver to the batter this time?

He steps forward and gracefully receives the ball from his catcher. He returns to his box, stoops down and rolls

the ball in the white dust at his feet. Then straightening to his full height he raises his arms above his head preparatory to delivering the ball and looks straight ahead. But Robert Lansing does not see the batter who faces him nonchalantly swinging his bat. Neither does he see his catcher. His eyes travel beyond them both, in past the wire netting at their backs to the crowded stands of impatient, expectant students, where the red and blue streamers of Dexter and the green and gold streamers of Parkhurst fly gaily in the breeze. And in all that immense assembly of human beings he sees only one. She sits directly behind the catcher in the fourth tier of seats in the center of the grandstand. And her eves are brown. Lansing can't distinguish their color, but he knows they are.

The deep voice of his first baseman

"coaching" arouses him:

"All the time, Bobbie, old man! Right

at him!

Three balls; two strikes! What shall he throw? He looks askance at his catcher.

The signal is for another high curve. Lansing shakes his head. He will

throw one straight over the plate.

In an instant the hitherto silent and sullen Parkhurst crowd is on its feet yelling madly.

Turning, Lansing sees the ball go soaring far out into the right field. The fielder leaps into the air but the ball passes

a foot over his glove.

The man on second races home and the game is won for Parkhurst. Of course pandemonium breaks loose.

* * *

Slowly and sorrowfully Robert Lansing, begrimed with dust and perspiration, climbed back into the grandstand The crowd had left and Helen Arlington waited for him quite alone.

"I didn't want you to play," she said.
"I did the best I could, Helen," he

muttered.

"But you have lost," said she.

However, a certain expression in those brown eyes told Robert Lansing that he had not lost all.

E. BERNARD GARNETT, '04.





MISS SELMA ETLINGER

With this edition THE NAUTILUS closes its exchange list for the year. We hope that we have made only friends for our paper and that, if our criticisms have ever been harsh, they have accomplished some good. Success to our exchanges. May they have long lives and flourishing careers!

The Kansas State Agricultural College offers a valuable and timely article on "Louisiana."

Coleridge had just finished the "Ancient Mariner."

"But why," asked his friend, "did you have him shoot the Albetross?"

"I suppose," faltered the poet, "that I should have made him put salt on its tail."

Harrowed by this terrible thought, his only consolation was in the fact that he put an old "Salt" in the tale, anyhow.

An illustration of Johnson's style: "An antiquated specimen of material humanity, appellated Mother Hubbard, perambulated to her receptacle of nutriment to obtain for her emaciated canine an osseous and fibrous conglomeration. Arriving at her destination, Mrs. Maternity discovered the receptacle to be vacant. Whereas 'Canine Minor' necessarily refrained from appearing his appetite."

-H. S. Messenger.

The Janus has a highly creditable literary department in its last issue.

Bill looked at Mary,—
"O! what a pretty miss!"
He came a little nearer,
And then bashfully stole—away.
—Jayhawker.

To The Jayhawker: Your editorials are especially commendable and the last issue is a decided improvement over all preceding issues of this year.

An answer in the mouth is worth two in the book.—Ex.

It must have taken the exchange editor of *The Drewry Academe* at least ten minutes to write her exchange department. The rest of the paper is very creditable.

"What is the secret of success?" asked the Sphinx.

"Push," said the Button.

"Take pains," said the Window.

"Never be led," said the Pencil.

"Be up to date," said the Calendar.

"Always keep cool," said the Ice.

"Do business on tick," said the Clock.

"Never lose your head," said the Barrel.

"Do a driving business," said the Hammer.

Mary had a little lamb, And 'twas so very nice, She passed her plate again, "Please, ma'am, I'll take another slice."

-Ex.

The Cascadillian contains one short story, some athletic news, and the rest all jokes. The last number is not nearly so good as some we have received.

A Frenchman in business in New York City advertised that he had a "chasm" for an apprentice. He had looked up the word "opening" in the dictionary.—Ex.

Geometrical Proof That Your Girl Loves You.

Hyp.—"All the world loves a lover."
Proof—You are a lover.
Your cirl is all the world to you

Your girl is all the world to you. Therefore, she loves you.—Ex.

Heard in the Corner Book Store.
"Have you Moore's poems?" asked a sage girl.

"I'll look in a minute," replied the clerk.

"By the way, here's a new story just out. It's called 'Just One Kiss,' and—"

"I want Moore;" she interrupted haughtily.

It is a relief to pick up *The Nautilus* of Jacksonville: it is so clean in appearance. However, that is not all that can be said for the paper.

If the Polanders are called Poles, why are not the Hollanders called Holes?—Ex.

Is she went or are she gone?
Have she left I all alone?
Will she ne'er come back to we,
Or us ever go to she?
It cannot was.

-Ex.

Ma: "John is askin' for more money again in this letter. He wants to take fencin' lessons."

Pa: "Wall, I guess we'd better send it to 'im. It's the first sensible thing he's wanted to study yet, and we can put 'im to work on the back fence when he comes home for vacation."

If college bred is a four year's loaf, (The smart set say it's so), Oh, tell me where the flour is found For us who knead the dough.

-Ex.

Have you seen Al? Al who? Alcohol. Kerosene him last night, but he hasn't benzine since; gaso-line him up against a lamp post and took a naphtha. Gas the petroleum wagon took him up.—Ex.

We welcome on our exchange list *The College Wide-Awake* of Vancouver college (B. C.). "A Night in a Haymow" is an interesting little story, well written, and "Dora Allen" sounds like a very original and also very modern criticism of Tennyson's poem.

Here is encouragement for us. The Hand and Mind of the McKinley Manual Training school, Washington, D. C., says that The Nautilus, "as ever, is one of the best. Many other papers when compared with it seem shallow."

To flunk or not to flunk, that is the question:

Whether 'tis nobler in the mind, to wander In an easy and indifferent fortune,

Or to take arms against a sea of studies, And, by studying, conquer? To rest—to sleep—

No more; and, by that sleep, to say we end The headaches, and the thousand natural ills

That hard study gives us:—it is a reward Devoutly to be wished. To rest!—to sleep;—

To sleep, perchance to dream; —Ay, there's the rub,

For in that sleep, what dreams may come of zeros,

When we go shuffling with some sad, black check

To the office, etc.

-Ex.

The Hand and Mind is an enterprising little paper with good short stories.

The Daily Maroon still comes to us almost every week. It is a plucky, business-like paper and is highly commendable.

SPRING.

It is spring!
Why not bring
To your work and your life
Less of strife?
Why not sing?

It is spring!
Why not fling
From your heart and your joy
All alloy?
Only sing!

-Ex.

"What are you plunging back into the water for, Pat? You just swam ashore."

"Shure, Oi had to save meself first; now Oi'm goin 'to fetch Moike."

"What a gallant person Mr. Dunkley is! He never addresses me without beginning, 'Fair Miss Dorothy.'"

"Oh, that's force of habit. He used to be a street car conductor."

What there is of *The High School News* from Coffeyville, Kansas, is good. It tastes like more.

He: "I am rather more in favor of the English than the American mode of spelling."

She: "Yes?"

He: "Yes, indeed! Take parlour for instance; having U in it makes all the difference in the world.—Ex.

Old Gentleman: "Boys will be boys. They're the same yesterday, today and forever. I remember when I was at school I came near being expelled for locking up a cow in the chapel, and Johnnie here tells me that Billy Jones, next door, has been expelled for bringing a pony into the examination room."—Ex.

The few cuts in *The Mirror* make the paper attractive. Don't "cut out" the cuts, whatever you do, and try to have more. The story entitled, "The Spell of the Serpent," is cleverly written.

The M. S. U. Independent is certainly a leap year number, through and through, and is fine. The paper has always lacked an exchange column, though. Why do you not remedy this since you have been criticised so much on account of it?

The William Jewell is as ever one of our best exchanges. It is a fine example of what a college paper should be.





MR. MILTON LUCE

EDITORS



MISS MARY PAXTON

Our Cooking teacher says she expects to remain a *Bacheller* all her life.

Miss Heyl: "Girls who are making casts must not make eyes."

Accommodating Senior at Shield's photograph gallery: "As you girls are so crowded, Mary may stand on my feet."

Mary: "It would be too great a feat."

Then She Kissed Him.

"You have not kissed me," she pouted, "for fifteen minutes."

"I know it," he said; "I have a very sensitive tooth which is liable to ache."

"What do you mean, sir?"

"Why, you are so sweet, you know."

First Freshman: "Say, let's put something in The Nautilus."

Second Freshman: "No; what for? We don't know anything—but then Freshmen ain't supposed to know anything anyway."

Miss Gilday, comparing a term in English history to athletics: "What is the spring meet?"

(Overheard from the back seat): "Spring lamb."

Miss Douglass (in photograph gallery, seeing a little dog running across the floor): "Oh, there's a little dog."

Mr. Garnett (just coming in): "That's a good one on me."

We, the local editors, wish to publicly thank Mr. Garnett and Mr. Rindskopf for their loyal patronage to our department. If talk is cheap, what are Wordsworth?

Miss Gilday said the moon was good to look at when it was full.

Familar Scene



George Beardsley was asked how he was getting along in mathematics. He replied: "Very well; so well that Mr. Dodd is going to give me an encore."

If any one tells you to go back to the woods, go to room 10, or the music room.

Michaelis asked Eyssell if he had translated Homer's Idiot.

Mr. Cowan to Stephen Luckett: "You are a bright little chap."

Why is Miss Drake's Latin class like a regiment of cavalry?

Ans.—Because it passed in review on ponies.

Why are Senior essays good literature?

Ans.—Because they have stood the test of time.

Why is it best for Roy Neal to play baseball on a hot day?

Ans.—Because even "taffy" will run when it is hot.

Why is a boy in forging like a Senior in his last term?

Ans.—Because both are acquiring considerable knowledge in sparking.

The student sat beside his books, His idle hands at play; His eyes were fixed upon the "thing," His thoughts—they were astray.

The "thing" was a geometry,
'Twas Dodd and Chace's book;
The hints had failed to find for him
The proof for which he looked.

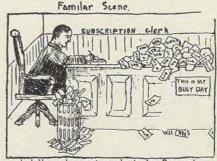
His eyes were fixed upon the "thing;" He could not think it out, He did not altogether know Just what it was about.

And so at length he gave it up, And put the book away; Went on to think of other things, And failed in class next day.

And when the cards were given out, On his was F,—but why? He softly said geometry, And dropped it with a sigh.

A young man of Manual, on seeing a friend remove a long brown hair from his coat lapel, remarked in an under breath: "My! but that was a hairbreadth escape."

"On the light fantastic toe
John and Nell thought they'd go,
But there was trouble in the air
And now to speak John does not dare."



What the subscription clerk does? - not

Miss Stearns: "Robert, what are volcanoes?"

Robert: "Why, they are holes in the ground."

Notice—Robert is a Senior.

R. Mann: "Fern, when will you need this book again?"

Fern: "Not until I become a Mann."

Mr. Claflin: "Have you ever read Washington Irving?"

Miss Rackerby: "No; but I have read (red) hair."

Miss Dunn had a little poodle.

She brought it to school one day,
And Mr. Phillips passing that way
Saw that the poodle was going to stay.
As Mr. Phillips turned up his nose,
Says the poodle: "Can't a fellow come
To learn a little Latin prose?"

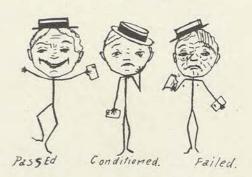
Prima donna to member of the orchestra: "No, I will not accept your bouquet. How dare you speak to me, you bass-viol wretch!"



Mr. Page: "What direction is the north pole from here?"

Student, suddenly: "Why, north of here."

George Beardsley was the last one to leave the Casino after one of the dances. He will learn by experience, and next time will get the number of his carriage.



Lillian (speaking of Earl Mills and Margaret M.): "They have reached the crisis, because they have exchanged pins." [We wonder how long ago she and Raymond reached their crisis, and also what their condition is now.]

Wanda and Lee Talbot were seen sitting with a vacant seat between them. [We wonder what are Lee's feelings toward Wanda; we know hers toward Lee.]

Moroe, on being asked if she had seen Foster, replied: "No, I do not keep track of him," then added—"all the time."

Otis Holmes asked Mr. Phillips if there was any place in the Bible where it said one must not smoke cigarettes. Mr. Phillips replied: "Not that I know of, but if you are not *careful*, you will *smoke*."

Senior, translating: "Nothing was heard but the barking of the dogs and the crowing of the hens."

Ralph B.: "Why is the water at the bottom of Niagara Falls green?"

Bruce Mc.: "I don't know. Why?"
Ralph B.: "Because it has just come over."

but he is terribly interested in French [Mable].

Mr. Arrowsmith, while making a lock, said: "I am making a locksmith out of an Arrowsmith."



MY LANGUAGE COURSE.

To English first I pass-A quite delightful class,

My answer must annoy; "Not ready," ne'er gave joy. "Lazy boy!'

To French I hurry now, With thoughtful, furrowed brow. What! How!

The tardy bell has rung. "Je n 'ai sais ma lecon." "Paresieux garcon!"

To Latin, then, I go; I take my time-go slow, But oh!

Although I seem quite eager, My answers all are meager. "Puer Piger!"

To German next I fly; Alas it makes me sigh-Oh my!

For I must say, "Ich habe Gelernt nicht die Aufgabe." "Fauler Knabe!"

Does Ira Pettibone study German? No; "Caged" is suggested instead of chambered nautilus.

> Two Freshmen walking down the street met two little girls, whereupon one Freshman said: "Look out!" and the little girls jumped, as if something was com-

> (Five years hence): "Who's that tall lady?"

> "Why, don't you know? That's Selma Grown (Crohn)."

A FRESHMAN'S WISH.

I do hate to go a-sneakin' and a-runnin' through the halls,

With floor so smooth and slippery, that you're always sure to fall.

I'd like to see a Senior, when to a pretty girl he speaks,

Just make one little bad mistake and come down in a heap.

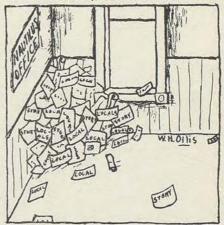
I wish I were a Junior or e'en a Sophomore.

Then as sure as I am living I'd hold my share of floor.

You would never see me sneakin' and a-runnin' through the hall,

Or even calling matron, as if I were going to bawl.

FAMILAR SCENE



The condition in which the Nautilus Office IS'NT.

Wanda and Mamie played their parts in the art club farce like veterans.

Binder pads cost twenty cents; foot pads cost you what you have got.

Miss Gilday says her 4B English class is the best narcotic she knows of. It puts her to sleep.

There once was a person called Margaret, Whose arrows made Fairman the target. Poor Fairman was hit.

And on Margaret got smit,

And his love was returned by Miss Margaret.

Fair Miss Carnes and the brave Raymond Lee

Have a case that is easy to see.

He thinks she's all right,

She thinks he's out of sight,

Now that looks suspicious to me.

Virgil Morgan in misery flees
When a girl within ten feet he sees.
He is scared by the curls

That are worn by our girls,

And their smiles make him shake at the
knees.

What change could be made in the ION society to make it a number one society?

Ans.—Turn it around [ION] thus [NOI].

(With apologies to Wordsworth and Kizer.)

My heart leaps up when I behold a "P" upon my card;

So was it when school life began, so is it now I'm a man (Senior),

So let it be when I quit school— Or let me die.

Senior: "A burglar broke into our house last night."

Junior: "Do you know who it was?"

Senior: "Yes; some photographer."

Junior: "Why?"

Senior: "Sis had her picture taken."

Pupil (translating): "Caesar proposed to bridge it."

Teacher: "Did she accept him?"

Perspective on the Train.

Two people sketching a fire horse. The horse kicks. Does it kick in one or two points perspective?

One of our youngsters says he is not much of an athlete: he is a vegetarian.

We never understood how extremely ridiculous the last part of the title of our first year class was till we saw this year's Freshman class.



EGBERT'S SMILE.

GOLDEN SMILES.

If all your smiles were gold, my dear, If all your smiles were gold,—
I'd have within this very year,
A store of wealth untold.

But all your smiles are smiles, my dear, And only maiden's art; They will surely bankrupt me, my dear, Of all I have—my heart.

Dick. "I took my mare into a harness

shop the other night, to buy her a bridal present, but it was so dark I could not see a bit."

Egbert: "Joke number 781. Next."

What's the difference between a sailor and a floor walker?

Ans.—One sails about the seas and the other sees about the sales.

Dan Bonticue, seeing John going down the hall, remarked: "I thought my ION pin was siek today."

Bright Senior (to chef): "This pepper is half (pea)s."

Chef: "How so?"

Senior: "Well, there are three P's in Pepper."



Sophy Moore: "Why is a politician like a seal?"

Ans.—Because his skin brings money and he stays around the poles.

Joe Hallinan, when asked if he liked ladies' fingers, replied: "Yes, if I can get a hand full."

Mr. Chase requested that all absent members sign their names to the paper.

THINGS TO BE BEHIND.

The poets have been talking
Of the man behind the gun,
Of the man behind the fiddle,
Of the man behind the bow,
Of the man behind the pickaxe
And the man behind the gun;
But of all the things to be behind
They have forgotten one.

The poets have forgotten To talk about the fool Who with an awful recklessness Dares go behind the mule.

SPRINGTIME, AS RECITED BY A MAN WITH A COLD IN HIS HEAD.

The beautiful birds of Spring have cub Seeking a blace do build their hobes, Flitding about from dree to dree Filling the air with belody.

Music Hath Charms.

Visitors passing room 22: "Is this a dormitory? I hear sounds of snoring." Freshman: "That's a 'math' class."

Bernard Garnett, while asleep in room 30, heard the bell for dismissal and thought it was the alarm clock.

Warning, young ladies! Beware of Sargent. He is a lady killer.

The boy stood on the moonlit deck, His mind was all a whirl; His mouth and eyes were full of hair, His arms were full of girl.

Small Freshman in physical geography class: "There is no water in ice."

Sara Moffatt asked Virgil Morgan if he had written an autobiography and Virgil wanted to know of whom.

C. to E. "I'm going to stop teasing Julia about Dan."

Julia: "Oh, I'd die if you did."

Applicable Quotations.

Laugh and be fat like me.—Wm. Fullerton.

I am almost a man already.—Donald Moffatt.

How often the men of greatest genius are lost in obscurity.—Frank Harper.

He seemed a cherub who had lost his way and wandered hither.—Colin Lee.

Observe my ease of manner and match it if you can.—Egbert Schenck.

An infinite deal of nothing.—Raymond Lee.

When I'm big I'll be a soldier.—John Van Brunt.

An image of calm life.—Ira Pettibone. Oh, I beg your pardon, but tell me, are you some one of importance?—Barnard Garnett.

Let the world slide.—Fred Albertson.

What do I care what the books say.— Ralph Burke.



He was in logic a great critic,
Profoundly skilled in analytic;
He could distinguish and divide
A hair twixt south and southwest side.
—Robert Fairman.

His best friend and most ardent admirer is himself.—John Junkins.

He is his father's son.—George Beardsley.

I go with more girls than any one fellow in school.—Dick Montague.

Don't mope; laugh a good deal and do it every day—Allan Elston.

He is headed straight for Congress.— Carson Chiles. Pity it is—I know 'tis sad, 'tis true—My ink ran out before I came to you.

FRED MICHAELIS.

Mr. Miller: "Miss Morrison, what base has sodium in it?"

Elston's manly voice: "Sodium hydroxide."

Mr. Miller: "Miss Morrison has a hoarse voice today."

Teacher: "If some one stole a dollar from you, would the deed inspire you to write poetry?"

Pupil: "Yes, ma'am, blank verse."

Mr. Page: "What may be said of the condition of air when it reaches the dewpoint?"

George: "There is something doing (dewing)."



When the Nautilus comes out

George Beardsley: "I went down town and bought a cap which just fit and went out and was capsized."

Wanda: "If you tell me everything you know I'll tell you everything I know."

Willard: "That wouldn't be fair; you'd get the best of the bargain."

Heard in Sewing.
"Miss Bone, how wide must I stitch this seam?"

"Just as wide as your foot."

THE FLUNKER'S LAMENT.

Dash, dash, dash, 'Gainst the cold, damp pane, O Rain! And I would that my cards would show A clear record once again.

Oh, joy for the football boy,
As he leaps through the line on a dare!
Oh, hurrah for the baseball lad
That he whistles; his mind's free from
care!

And the stately teachers turn in scorn As they swiftly pass me by; But, oh, for the cards I used to get When a Freshman small was I! Dash, dash, dash, 'Gainst the chilling glass, O Rain! But no longer a Freshman wee am I Singing my sad refrain.

Flunk, flunk, flunk, Comes from the teacher's scratching pen, And I am left to mourn alone For I have flunked again.

Flunked, flunked,—
It rings all day in my ear.
My classmates have gone and left me
To flunk again next year.

C. C., '04.

Margaret McCrum: "Egbert, how did you get along washing dishes when you were camping last summer?" "Egbert: "Oh, we didn't wash them

"Egbert: "Oh, we didn't wash them the first two weeks, then the dog died and they were a good deal of trouble."

New Books Received.

"Girls Who Have Been in Love With Me," by Egbert Schenck, illustrated by Margaret McCrum, 1,000 pages. Price, \$2.50.



History Pupil: "Caesar was a coward, for he turned pale in several places." (Laughter.)

"Well, I know he did; I can show you the text."

Senior in library hunting criticism: "Say, who is the old fellow Ibid, so many of these criticisms on Johnson are from?"

Bright Classmate: "Oh, some old Greek philosopher, I guess."



HOW CAN you tell this is george B.

"Reminiscences of a Grafter," by Raymond E. Lee. Price, \$1.35.

"How to Fall in Love, Though Bashful." by Wanda Egbert. Price, \$1.18.

"The Gift of Speech," by Alfred H. Wagner. Price, \$1.18.

"The Practical Use of Dimples," by Foster Palmer. Price, 75c.

"Methods and Manners of a Woman Hater," by Chester Mann. Price, \$1.25.

"A Modern Romeo and His Juliet," by Dan Bonticue. Price, \$1.18. "A Scientific Study of IONS," by Margaret Pettibone. Price, 75c.

"The Sarcasms of Sara," by George Beardsley.

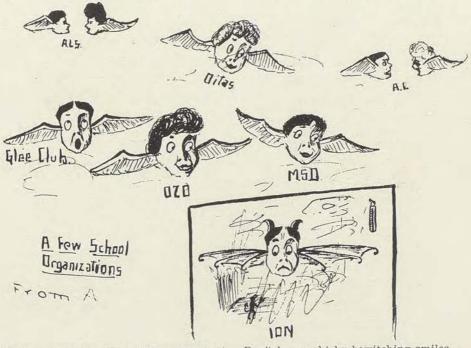
"Pies I Have Known," by Harold Trowbridge.

The Junior treasurer lay asleep, His face was wreathed in smiles, For in his dreams he thought he saw The dollars stacked in piles.

But then this was a lovely dream, As we of course all know; For never has there been a class That had such piles of dough. Alas for me!
The matron no hope could see.
"It's poison you've taken,
Or some worse conglomeration;
You're life is of short duration."

"It's pie he's been taking
Which the girls have been making,
And was spoiled in the baking,"
Miss Bacheller said
As she bathed my aching head.

The worst is over—and say!
I wonder why I did not die—
Though reduced to a skeleton am I.
Heed, oh heed my warning, I pray,
Steer clear of the cooking room, I say!



A VISIT TO THE COOKING ROOM—A MIXTURE OF RHYMES.

I went into the cooking room to get a piece of pie.

It looks so very nice thought I
It will not hurt a piece to try —
But I never meant to die.

The resolve was heroic, The effort was stoic, The result was dire — My brain was afire. Don't be caught by bewitching smiles
Of any cooking room girl,
For if you're ensnared by the entrancing
wiles

Of one who seems as a pear! You may not live to write as I have done. C. C., '04.

Raymond: "It rained so hard today when I was in mathamatics that I thought there was going to be a second flood and took my compass and constructed an arc."

MOTHER GOOSE UP TO DATE.

Little Miss Moffatt sat on the stair, Reading a learned book, Along came George, who found her there, And by her his place he took. (Did Little Miss Moffatt run away? No, indeed!)

TT

There was a little Bear To touch him they did not dare; They put him in THE NAUTILUS cage And left him there to ramp and rage.

III.

Pies very hot, pies very cold, Pies in the cooking room Nine days old. Harold likes them hot; he also likes them cold.

In fact he likes them even When they're nine days old.

IV.

I had a Latin pony, Which served me long and well. I lent it to a little boy To use it "for a spell." He scanned it, he perused it, He used it o'er and o'er. My pony dear was quite worn out. It returned to me no more.

V.

A lad, a lass, and now my story's begun. "A case," a quarrel, and now my story is done

If their love had been stronger My story would have been longer.

A is for Allan, the editor-in-chief; If you want to bow to him he will give you lief.

B is for Bonticue, who was known to write Love sonnets to Julia every night.

C is for Carl, a likely youth, Who is very fond of Theo, forsooth.

D is for Dick, the daring and dear; One can't help loving him when he's near.

E is for Edward, a happy young lad, Who never in his life was known to be sad. And you'll agree 'tis time to stop.

F is for Foster, who turns each girl's head And makes her heart feel just like lead.

G is for George, who has a stock of jokes on hand

Which at all times and places makes him much in demand.

H is for Harold, so fond of pie; If he eats too many he's sure to die.

I is for ION'S, a right loyal set; Not many of their pins have been pawned yet.

J is for Jane, who giggles, you know; But this adds to her charm-Colin thinks so.

K is for Kendal, who's gone away; And Maudie weeps most every day.

L is for Luckett, Stephen the bold, Who runs from a mouse, so it's been told.

M begins the initials three Commonly known as M. S. D.

N is for Nofsinger, a bright Sophomore; And when you know her, you're sure to adore.

O is for OZO and O'ITA, too, Who never fight as the others do.

P is for Pettibone, a proud P. G. He's not as shy as he used to be.

Q is for Queal!

R is for Raymond, a writer of verse; They're very good, for I've read much worse.

S is for Sara, a charming young dear, Who's never so happy as when George is near.

U is for you, the reader of these pages, And as they were written by no wise sages We beg of you to forgive the nonsense And trust that none will take offense.

V is Van Buskirk, solid but sweet; He would be very handsome but for his feet.

W is for Wanda, a Freshman shy (?) If a boy'd speak to her she'd die (of joy).

At X Y Z we'll let it drop,

CALENDAR FOR APRIL.

April.

- 1. All Seniors refrain from eating fudge. (?)
- 2. Freshmen recover from the effects of the first.
- 3. Beardsley calls on Sara.
- 4. Lee springs a new joke.
- 5. Lillian sees the point.
- 6. Mr. Claflin is seen running. Great excitement among pupils.
- 7. Junkins forgets and has his lessons.
- 8. A. L. S. entertain.
- 9. Art Club break the camera at Thomson's.
- 10. Egbert calls on Dick.
- 11. Juniors begin paying up.
- 12. The Nautilus Staff presented with a key to the Staff office.
- 13. Spring fever is still with us.
- 14. First baseball game.
- 15. NAUTILUS "stuff" all handed to editor-in-chief.
- 16. Class field meet.
- 17. The mob goes calling.
- 18. Fred has his tan shoes shined—free.
- 19. Senior treasurer hires an assistant to help catch unwary victims.
- 21. Clara recovers from the measles.
- 22. Five more weeks of school.
- 23. This is Saturday.
- 24. Lee calls on Lillian.
- Garnett heard singing—school is dismissed.
- 26. Van Buskirk's lunch gone—awful threats of vengeance.
- 28. Eugenia loses a nickle-walks home.
- Van Buskirk's lunch gone—reward of 5c for safe return.
- 30. Only four more weeks of school.

THE TALE OF A PIN.

A lad, a little lassie fair— His love grew week by week, And every day he thought he'd dare Of his love for her to speak.

He gazed at her society pin, Wished that it he might wear; But his courage always fled from him When he saw the lady fair.

So time went on, some weeks had past, The love of the lad did not fade; So he screwed up his courage at last To ask her her pin to trade. The next time he met the lassie dear He started the question to "pop." Then he turned pale, looked very queer, And came to a sudden stop.

For pinned on her waist, so white and thin, O'er her heart where all might see Was—some other boy's society pin, As sure as sure could be.

The moral of this is very clear, It is easy indeed to know. If a boy loves a girl let him never fear His liking for her to show.

A ZOOLOGICAL PHANTASMAGORIA.

'Twas midday noon, the sun had set Serenely in the east; The catfish and the cruel cricket Came to their midnight feast.

The turtle, too, with agile jumps
Played leap-frog with a deer.
The latter got some fearful bumps
But never shed a tear.

An elephant with carol gay
Sang blithely in a tree;
And when I met a purple pig
I wished that I were he.

The rabbit croaked his mournful cry To-whit, to-whit, to-whoo; The bull-dog, in a silk plug hat Sprang from his perch and flew.

An angle worm rose up and yelled;
My sentence grim, it spoke.
I shuddered, jumped and hit the floor,
And then, I guess—I woke.

One day as I was thinking
I wished to change my shape
Into an elephant, a bumble-bee,
A turtle or an ape.

So first I thought I'd like to be An elephant so large; Because wher'er I took my trunk There'd be no baggage charge.

But when, at last, I had become An elephant, you know, I found that even that beast had His little tail of woe.

It seemed quite nice to be a bug;
I. e., a centipede,
Until after a trial I found
Ten pairs of shoes I'd need.

Which in my present state of wealth And present price of shoes, Unless I went quite barefoot, would Throw dad into the blues. Therefore, thought I, I'll be a fish
And gambol in the deep;
I then can take my daily bath
During my nightly sleep.

But when I was a finny beast—
I blush, indeed, to say —
I couldn't wear, to save my life,
My pants, in any way.

A zebra then it seemed to me Would settle my complaint, For then, unlike some girls I know, I wouldn't have to paint.

But then I found, unlike those girls, I couldn't switch my blush, As they do in emergencies
With rabbit's foot and brush.

So now I think my present form Is better than all these, Even tho' I, undeservedly, Receive so many C's.

R. E. L.

THE EVOLUTION OF EGBERT.

Oh, muses, I implore your aid For just this one time! For the subject I have chosen Is neither inspiring nor sublime.

Egbert was a Freshman once — Would you believe it now, By the way he chases around And oft stirs up a row?

And he was one of the bashful sort Who would surely run

If a girl would look at him,— No matter how very mum.

But in spite of this He was his teacher's joy; And on the back of all his reports Were: "Such a good little boy."

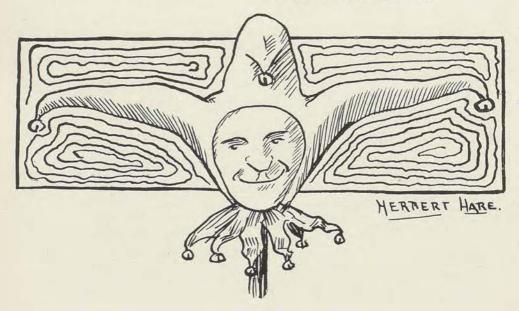
Things went on in this way Until a Junior he got to be, And that he felt quite joyful Was quite easy to see.

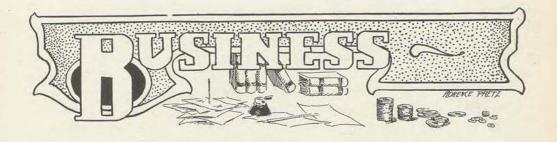
And when he was a Junior, Upon an autumn day, Then he fell in love, I've heard somebody say.

Not with a person of his class, But with a Senior tall; And that may have been the reason why They never got on at all.

Then from these turbulent times Into a Senior he grew. And about all things and then some more He seemed to feel he knew.

I'm a Senior almost gray
And I soon will go away.
My triumphs are over here—
You've scarce begun your bright career.
Other girls may love you —
To them may you be more true.
But I'll forgive all injuries past
If the cords which bind me fast
You'll untie at last.
When a true Prince Charming comes to me
So I'll be
Heart whole and fancy free.







MR. EDWARD VAN BUSKIRK BUSINESS MANAGER



MR. STEPHEN LUCKETT ASSISTANT BUSINESS MANAGER



HERE is nothing in this beautiful world that is at a stand-still; everything is either advancing or retrograding, and the management of this magazine can say with just pride that in the school year now ending The Nautilus has finished one of the greatest strides in its history.

Never have there been so many advertisements, never have there been so many copies sold, and never has there been so much money to spend. At the beginning of the year things looked blue for the management; the effects of the flood were still fresh in the minds of the advertisers, for they all suffered heavily from that disaster. But the merchants are in business to stay, and knowing from past experiences the good returns they have always received from advertising in The Nautilus, they availed themselves of the opportunity of doing so again. The management was given eleven pages to fill in the first issue; it had to beg for three more on account of the many cries for space in this great maga-

zine. And so the story goes on in all the issues, until in the preparing of THE ANNAUAL the business has grown into such proportions that the staff thought it advisable to add another assistant to its already efficient force.

The pupils must be praised for the amount of patriotism shown by them in securing and disposing of so many copies. Most all the students at Manual do not realize the greatness or The Nautilus until brought in direct contact with the work. It is not issued in the hope of making money out of the enterprise, but to promote the interests of the school. In the last year, the printing, engraving and other incidental expenses amounted to about \$125.00 for each of the three, small issues of the magazine, while The An-

NUAL'S expenses are close to the \$600.00 mark. This makes a total of about \$1,000.00 spent this year on the magazine. The management aims to just make the magazine pay for itself by its ads and subscriptions. Thus far it has done so, and it will continue to do so as long as Manual is alive and holds within its bounds pupils like the ones of today.

In closing, the management wishes to extend a hearty vote of thanks and a wish of future prosperity to all the merchants who have responded so generously by giving it ads. May the pupils of Manual always remember and favor them in their transactions, and may they constantly keep in mind our motto: "Patronize those who patronize The Nautilus."

EDWARD JAMES VAN BUSKIRK.



MR. GEORGE BEARDSLEY ASSISTANT BUSINESS MANAGER



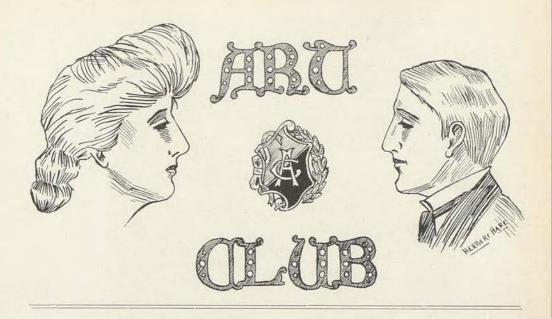
MR. ROBERT FAIRMAN SUBSCRIPTION CLERK



500FBTF85



ART CLUB



Colors: Orange and Yale Blue.

Organized: November, 1897.

OFFICERS

President. Harry Havens.

Vice-President. Theo. Nettleton.

Secretary. Ethel Antrim.

Treasurer. Watt Webb.

Sergeant-at-Arms. John Craig.

Critic. Clara Webb.

Reporter. Mamie Stoller.

MEMBERS

Fred Albertson,
Herbert Hare,
Helen Crandall,
Wanda Egbert,
Helen Gleason,
Richard Montague,
Stanley Mullett,
Eugene Young,

Hazel Hutchinson,
Grace Hutchinson,
Dorothy Oldham,
Theo. Nettleton,
Alice Yates,
Florence Scott,
Lewis Williams,

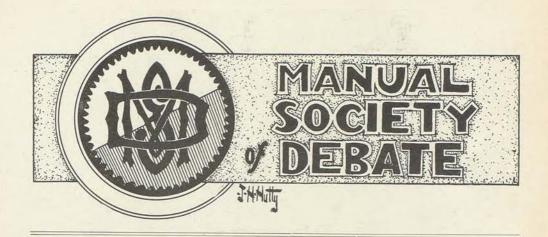
Egbert Schenck,
John Craig,
Ledwige Sargent,
Alex. White,
Ethel Antrim,
Mary Daton,
Marie Confer,
Nellie Hare,

Mamie Stoller,
Mildred Trowbridge,
Watt Webb,
Lottie Williams,
Clara Webb,
Harry Havens,
Irene Verner.



MANUAL SOCIETY OF DEBATE

Photo by Shields



Colors: Gold and Crimson.

Organized: December, 1898.

OFFICERS

President	BRUCE GILMORE.
Vice-President.	. CARLE BLAKESLEE.
Secretary	.Fred Michaelis.
Treasurer	.Herbert Powell.
Librarian	. HERRERT BARR.
Sergeant-at-Arms.	
Critic	

MEMBERS

Allan Elston,

Herbert Barr,
George Beardsley,
Carle Blakeslee,
Lester Charles,
Carson Chiles,
Eli Davis,
Raymond Lee,
Colin Lee.

Eli Davis,
Raymond Lee,
Colin Lee,
Chester Mann,
Ralph Mann,
Fred Michaelis,
Foster Palmer,

Walter Eyssell,
Bruce Gilmore,
Roy Hanna,
Pate Kruse,
Stephen Luckett,
Herbert Powell,
Howard Scott,
John Sherrod,
Harold Trowbridge,
Edward Van Buskirk,

Alfred Wagner.



OZO SOCIETY



Colors: Moss Green and Cream.

Organized: October, 1899.

OFFICERS

President. Margaret Pettibone.

Vice-President. Sara Moffatt.

Secretary. Margaret Mitchener.

Treasurer. Eugenia Hackett.

Sergeant-at-Arms. Mary Paxton.

Critic. Elizabeth Nofsinger.

Reporter. Jane Casey.

MEMBERS

Ethel Bone,
Gladys Coates,
Renee Crohn,
Maud Chatten,
Louise Campbell,
Lillian Carnes,
Selma Crohn,

Eugenia Hackett,
Marion Leach,
Helen Leach,

Elizabeth Nofsinger,
Margaret Mitchener,
Elizabeth Mitchener,
Sara Moffatt,

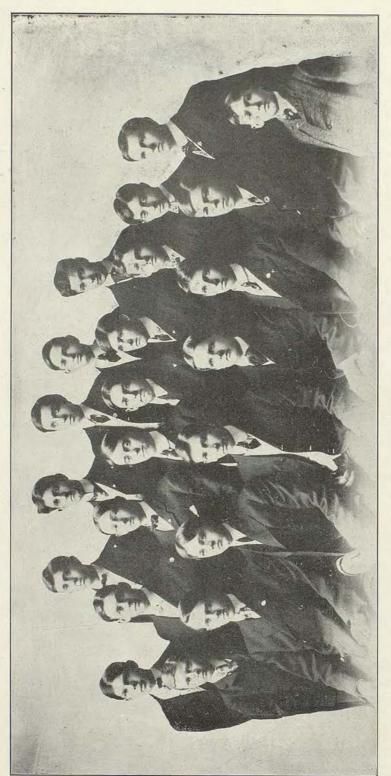
Jane Casey,

Margaret McCrum,

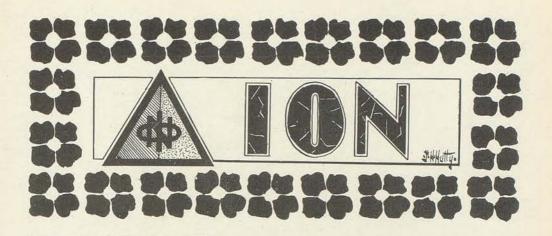
Margaret Campbell,
Margaret Elston,
Charlotte Folson,
Julia Gleason,
Louise Kimball,
Dorothy Hopkins,

Meroe Moies,
Mary Paxton,
Margaret Pettibone,
Louise Ryland,
Mildred Schenck.

Mrs. Sarah Elston......Sponsor.



ION SOCIETY



Colors: Olive Green and Crimson.

Organized: November, 1901.

OFFICERS

Vice-President. Roy NEAL. Secretary. NEALLY WHITE.

MEMBERS

Lester Bear, Ralph Burke, Dan Bontecue, Woodson Dixon, Calvin Edwards, Robert Fairman, Ashford Lang, Don Moffatt.

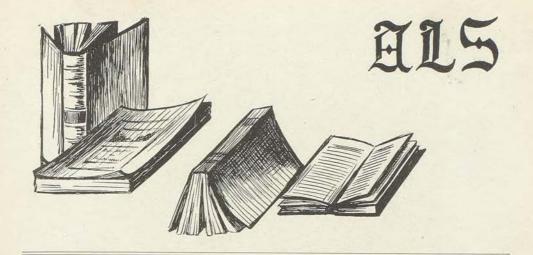
> Virgil Morgan, Earle Mill, Roy Neal,

Joe Hallinan, Glen Harnden, John Junkins. Bert Elmer, Milton Luce, Ira Pettibone. Gus Patrick, Allan Schumloeffel, John Van Brunt, Neally White. Mr. Arthur DoddSponsor.

William Fullerton,



A. L. S. SOCIETY



Colors: Pink and Green.

Organized: November, 1901.

OFFICERS

President	JAMES WITTENMEYER.
Vice-President.	Roy Benson.
Secretary	IRENE GENTRY.
Treasurer	Grace Ford.
Sergeant-at-Arms.	Berenese Lake.
Reporter	CHARLES HOOVER.
Critic	RICK FILMORE.

MEMBERS

Minnie Allen, Grace Ford, Frank Bruce, Beulah Goodson, William Bettis, Ross Higimbotham, Trent Boyer, Georgia Jones, Rick Filmore, Har y Jenkins, Irene Gentry, Grace Gowen, Roy Benson, Charles Hoover, Edwin Lyons, Lila Reed, Joe Lyons, Edith Stone, Berenese Lake, Harry Scow, John Watkins. James Wittenmeyer, Walter Miller, Evelyn Canny, Maud McGee, Alma Zaiss.



O'ITA SOCIETY



Colors: Old Rose and Silver.

OFFICERS

Organized: March, 1902.

President. Julia Simms. Treasurer. Alice Richardson.

MEMBERS

Margaret Burton,

Nellie Caroll,

Helen Dickey,

Pauline Dunlap,

Florence Eliot,

Selma Ettlinger,

Leslie Frame,

Kathleen McClure,

Ruth McClure,

Georgia Milburne,

Jean Morrison.

Claire Morgan,

Emily Morgan,

Helen Filley,

Mabel French.

Effie Hopkins,

Ruth Hunt.

Eugenia Jaccard,

Hesper Kirkpatrick,

Donna Lawrence.

Ethel Richardson.

Alice Richardson,

Julia Simms.

Hulda Simms.

Elizabeth Vernon.



BOYS' GLEE CLUB



 $\begin{array}{c} \text{Executive Committee} \\ \end{array} \\ \begin{array}{c} \text{RICK FILMORE, Chairman,} \\ \text{WALTER EYSSELL,} \end{array}$ RICHARD MONTAGUE.

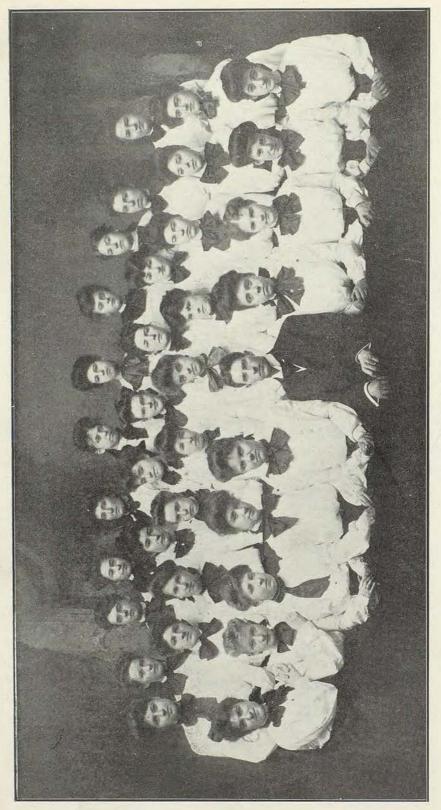
MEMBERS

George Beardsley, B. Ralph Burke, Herbert Barr, Carle Blakeslee, Lester Charles, Earl Davis, Eli Davis, Walter Eyssell,

Milton Luce, Richard Montague, Fred Michaelis, Bruce McEntire, Earl Mill, Edwin Pierce, Herbert Powell, MR. GLEN H. Woods. Director.

Allan Elston, Rick Filmore, Robert Fairman, Chas. Hoover, John Junkins, Chester King, Colin Lee, Raymond Lee,

Alexander Rindskopp, Glen Robertson, Henry Randall, Louis Williams, Alfred Wagner, Neally White.



GIRLS' GLEE CLUB





Executive Committee EDNA BURRISS, IRENE GENTRY, MARGARET STONE.

MEMBERS

Bessie Bragg, Clara Blakeslee, Estella Bancroft, Juanita Bohle, Augusta Bremer, Edna Burriss, Blanche Collings,

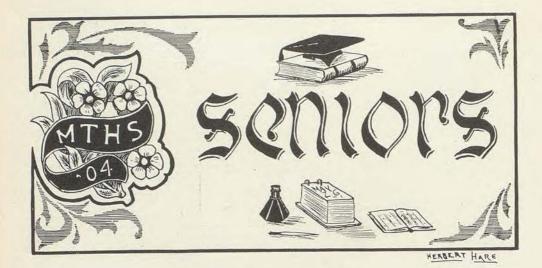
Hazel Kirk, Emma Karges, Mabelle Kenney. Lilly H. Lake, Jennie Lavine, Emma Locke, Jennie Ringol,

Hattie Schott. Margaret Stone, Nellie Slocomb. Sara Tudhope. Bertha Wirthman, Mr. Glen H. Woods...... Director.

Ella Canny, May Diamond, Helen Douglas, Lena Eichenauer, Irene Gentry. Fern Giffe, Edith Hill,

Hazel McCoy, Eva McCollom. Grace Pickett, Jean Norris, Miss A. M. Rapp, Lenore Rankins, Marie Wirthman,

Daisy Winters, Leaze Warrick, Alice Wood, Agnes Wood.



The Class of 1904

"All things are ready."-Henry V.



E, the class of 1904, cannot felicitate ourselves on the fact that we are the first class to graduate from Manual, nor the first to finish a complete four years' course at this institution, nor can we even boast, as classes have done, that we have the largest number of applicants for the

"coveted sheepskins." However, we will console ourselves with the fact that we are "the greatest class that Manual ever knew." [For authority, please see last year's ANNUAL or any member of the class.] Praise of self, we know, is unseemly; but we say this here, not boastingly, but merely as a word of reminder to the Juniors and other classes, if indeed there are any. For now that the moon has ceased to shine, the candle is endeavoring to take upon itself all the glory of at least an arc light. So, as a little advice is not out of order here, we will say to all the pupils of Manual: Follow the footsteps of the class c 1904 and you will

be all right. At least that is the present opinion of the class of 1904.

Soon after the Christmas holidays the class had its first meeting. Officers were elected and a constitution drawn up. Then it did not take long to get started upon real business. The first important event, along this line, was the photographing of the entire class without serious accident to anyone. This important triumph aroused a great deal of class spirit and we now have as much enthusiasm as we can well keep within bounds.

[However, realizing by this time, that the few stragglers who read this article will probably either know all this beforehand or care nothing about it, I will omit all the rest of these important transactions except a very few words concerning Class day and Commencement.] For Class day, which is the Senior's pride, we have planned a very elaborate program, which you can find on the following page, and at the present writing everything seems to point to a successful culmination of our plans. Commencement, too, has every

promise of success. About one hundred and fifty pupils will present themselves for diplomas—unless an adverse fate in the shape of mathematics or English overtakes a few loiterers. Even though this class may be-comparatively small we have the consoling thought that it is quality not quantity that counts. The different nature of the several pieces which compose the Commencement program will give some idea of the versatility of our members.

Commencement day is the 25th of May. On this day we shall feel that our high school days are indeed over and we shall also be filled with that feeling of pleasure and satisfaction that one must have upon the successful accomplishment of a difficult task. There is much that could be said upon the other side, "but that is another story." We know not what the future holds in store for us; our paths that have so long been together part upon this day. Yet come what will, Manual will always have our best wishes and best efforts if the time ever comes when they should be needed.

"Now the fair goddess, Fortune, Fall deep in love with thee; Prosperity be thy page!"—CORIOLANUS.

EGBERT SCHENCK.

PROGRAM

OF THE

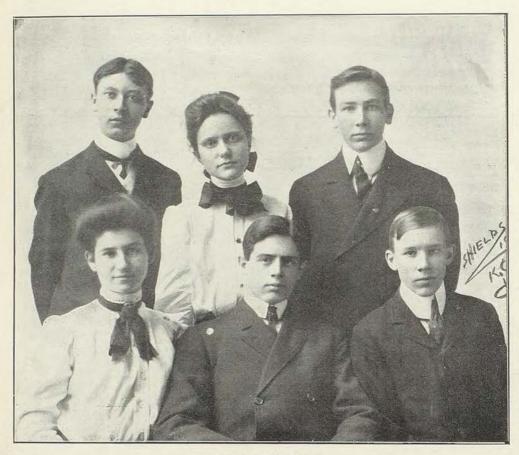
SEVENTH ANNUAL COMMENCEMENT

OF THE

MANUAL TRAINING HIGH SCHOOL

MAY 25, 1904

1.	Invocation		12		Rev.	Dr. Geo. Reynolds
2.	Piano Solo—"To My Well Beloved" -	-		-	-	Selma Ettlinger
- 3.	Essay-"If It Were Done, When It is Done" -					Susie Rackerby
4.	Oration—"Samuel Adams"	-		14	-	Carson Chiles
5.	Essay-"The Ethics of the Common Place" -		500			- Selma Crohn
6.	Piano Solo-"Scherzo in B Minor" (Chopin)	-		-	-	Clara Blakeslee
7.	Essay-"The Future of China"		-			- Lester Bear
8.	Recitation-"The Sacrifice of Antigone" -	77			100	Irene Gentry
- 9.	Oration-"The Dynamics of Progress" -			- 3		Alfred Wagner
10.	Piano Solo-"Valse Caprice" (Rubenstein)	4		147	5,43	Jean Norris
11.	Recitation-"One Who Knows His Fellow Men'	,	18.5	57		Bessie Dinklage
12.	Oration-"Missouri"	4		-	7.5	Edwin Ryden
13.	Recitation-"Sombre"		-	-		Elizabeth Vernon
14.	The Class President's Address	2 -		5	-	Egbert Schenck
15.	Song by the Manual Training High School G	lee C	lubs-	_"Th	e Sold	iers' Chorus'' from
	Gounod's "Faust," accompanied at the piane					
16.	Presentation of the Diplomas, by Mr. J. C. Jan	mes,	Mem	ber of	the I	Board of Education



SENIOR OFFICERS

CLASS DAY PROGRAM

Senior Address			2 .	2 2	2 2 2	2 - 2 - 12	Egbert Schenck
Song					- (4)	40 (40	Boys' Glee Club
Gift Presentation to	o School						Bernard Garnett
Gift Presentation t	o Juniors		5 5		Te	(a) (b) (b) (c)	Selma Crohn
Junior Response	4 4	4		:		2 2 2	Charles Bowman

SENIOR FARCE

CAST

Allan Elston Charles Hoover Jean Morrison
Alfred Wagner Rick Filmore Harriet Berwin
Richard Montague Mary Paxton Bessie Dinclage
Milton Luce Selma Crohn Elizabeth Vernon

PROCESSION AND OFFERINGS BY THE MUSES



THE SENIORS

List of Graduates Manual Training High School

BOYS

Barr, Herbert
Beard, E. J., Jr.
Bear, Lester A.
Bettis, William C.
Blakeslee, Carle Julius
Boyer, Lucius Trent
Burke, Ralph F.
Burrough, Eben M.
Charles, Augustus Lester
Chiles, Carson Wayne
Eastwood, Wilbur La Nere
Edwards, Calvin
Elston, Allan
Eyssell, Walter
Fairman, T. Robert

Fillmore, Waldo Rickert
Flintjer, Ross
Funk, Wade H.
Garnett, Edward Bernard
Gillmore, William Bruce
Hoover, Charles R.
Isitt, Robert S.
Johnson, F. Boyd
Lee, Raymond Eliot
Love, Horace
Luce, Milton H.
Mann, Chester D.
Moffett, F. Carl
Montague, Richard M.

Faris, Ray

Philgren, Wallace A.
Queal, Ralph
Raker, Herbert
Robinson, Robert Edward
Ryden, E. Edwin
Satterlee, William B.
Schenck, Egbert
Snodgrass, T. Burt
Stringer, William!Dean
Trowbridge, Harold J.
Wagner, Alfred H.
Weber, Walter M.
Wingate, Edwin B., Jr.
Wittenmeyer, James L.

GIRLS

Allen, Minnie Albert, Anna Alexander, Marguerite Eleanor Barnes, Cassie E. Bayha, Charline M. Berwin, Harriet Celia Blakeslee, Clara Battelle Boersch, Katherine M. Bremer, Augusta Louise Burriss, Edna Louise Canny, Elenore Kathryn Casey, Clara C. Center, Josephine E. Chace, Alice Chitwood, Edna Cline, Pearl Alice Cosgrove, Clara Montzilla Craig, Bertha Crohn, Selma Dinklage, Bessie Margaret Eschbach, Annetta H. Estill, Mary Judith Ettlinger, Selma Etzold, Lena Eyssell, Mathilda Helen Fisher, Myrtle E. Foster, Eleanor Maude Ford, Grace Alice Gentry, Georgia Irene Goodhue, Eunice Durella

Grant, Blanche D.

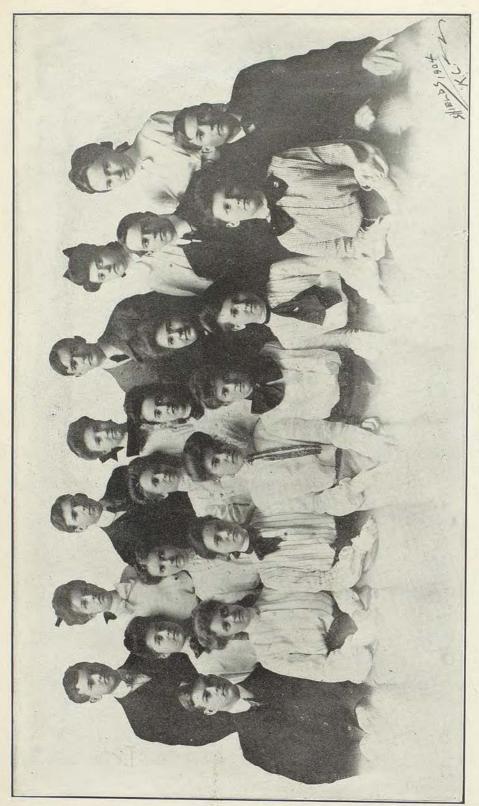
Hayes, Eva Grace

Hull, Katherine M. Humfeld, Nettie B. Jaccard, Eugenie Johns, Lillian Eugenia Karges, Emma Carolyn Keating, Helen Kelly, Helen Marie Klein, Annie Knoch, Clara L. Lamb, Regina Leach, Marion Leach, Helen Leonard, Catherine M. Leonard, Honora Levine, Jennie J. Limsey, Virginia Lofton, Ruth Loewen, Blanche Martin, Erma O. Martiny, Stella McCluer, Kathleen McCoy, Hazel Middlebrook, Frances Mills, Grace Morrison, Jean Morrison, Alice C. Murphy, Ellen Murphy, Mary Josephine Nickerson, Nellie A. Norris, Anna Whittelsey Norris, Jean Austin Norton, Nellie

O'Reilly, Aileen Oviatt, Nina M. Paxton, Mary Gentry Prater, Nellie Rackerby, Susie H. Rankin, Lenore N. Redheffer, Frances Ringol, Jennie Ritterhoff, Ida Mae Shore, Alice May Shryoch, Frances Simms, Julia Smith, Emma Spence, Irma Dorne Standart, Mabel Nina Standiford, Myrtle Price Stearns, Flora W. Stephens, Nellie M. Stone, Margaret A. Thomson, Annie Mabel Vandenburg, Nellie Vernon, Elizabeth Wieman, Alice M. Winters, Daisy A. Wirthman, Bertha M. Wolf, Eva H. Wolfe, Bertha Estella Wood, Agnes Jones Wood, Alice Foster Young, Mabel Vesta Ziegelmayer, Frances

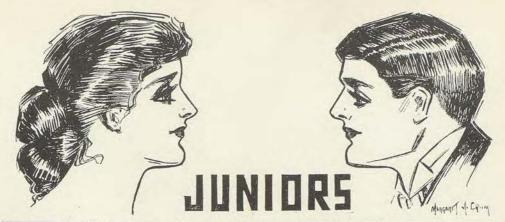


THE SENIORS



THE SENIORS

THE SENIORS





INCE it is not given to the Juniors of any school to take the initiative in a class organization, we are but a lately organized body. However, just as soon as the lordly Seniors formed one grand united whole, we were called to a Junior meeting and immediately proceeded

to business. Great interest and enthusiasm were manifested, and the quiet deliberation and quickness with which we formed ourselves into a working body were commended by all. It might be added that thoughtfulness and earnestness characterized the class of '05.

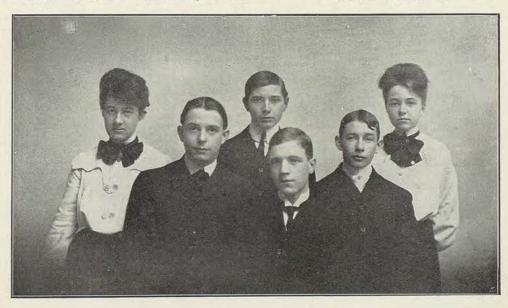
At a second meeting, class colors were selected; also a pin was decided upon. While it was fully realized that beauty unadorned is adorned the most, it was

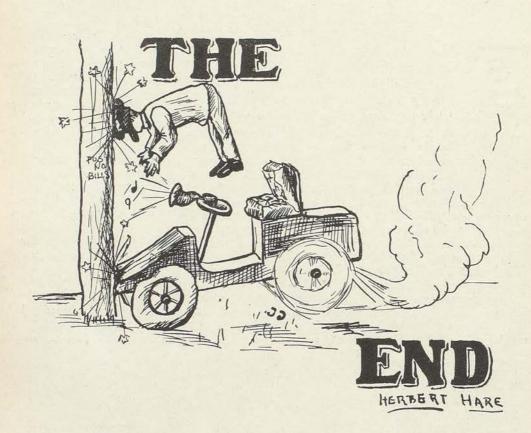
thought best by the more conservative members to take no radical departure from the established order of things. Of the different colors suggested, black and gold were thought to be most appropriate and significant. Then a pin was selected which it is hoped will meet with the approval of all.

The aim of the class has been and will be to gain success by no other than fair and just means. We fully realize that good reputations are the result of fine and honest efforts on the part of good, firm characters. And with this conviction strongly implanted within us, we hope for the sincere respect of ourselves, our parents and our teachers.

We would not forget, in this our first little proclamation, to thank most heartily our instructors for all their goodness and kindness to us in the past three years.

CHARLES ALLEN BOWMAN.





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BEST IN QUALITY

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\$2.25

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Wreaths, Candles, White Books and Rosaries for First Communion

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— In Silver and Glass —

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Choice Dieces



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Commencement

You want all the little details of Genteel Fashion in your Commencement Clothes. We have the proper fitting kinds. They are not CHEAP. We can't afford that sort. But we show you suits from \$10.00 to \$27.50 that have as much STYLE and cleverness about them as the best paid artists can design from the best woolens::::

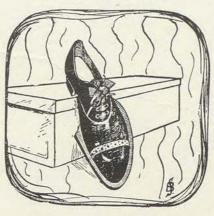
P.S.—Hot Weather Clothes and Furnishings are Ready



Outfitters of Boys and Young Men

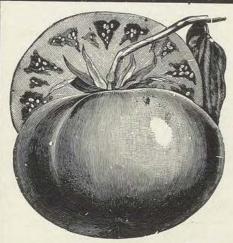
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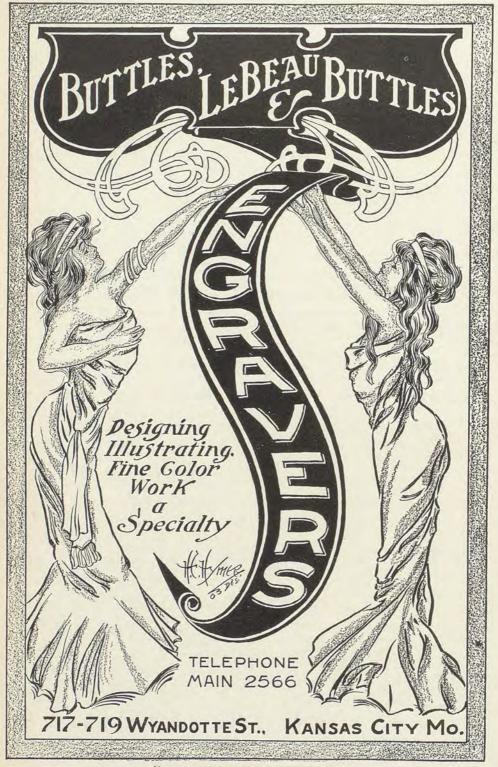
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doesn't know he has digestive organs
-they do their work without worrying
him.

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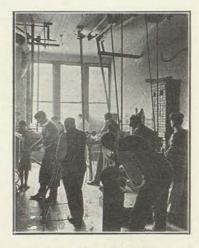
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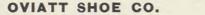
Kansas City, Mo.

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We believe we've come as near Perfection in our Spring Suits as is possible. If you find a failure it is our privilege to make it good

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11th and Main Streets



Fall the starch in this broad land
The very best is the Eclipse brand,
Requires no cooking, is ready for use
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