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Making of a Bible" appeared in a recent issue, and in the January number will be found "The Making of a Newspaper." Among cthers to follow will be "The Making of a Highway," and "The Making of a Hymn Book."

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## The Educationall Jounrinall

And Practical Teacher

Vol. X.
TORONTO, JANUARY 15, 1897.
No. 16

## Editorial.

Mr. J. W. Johnson, F.C.A., one of the principals of Ontario Business College, author of the "Canadian Accountant," and other useful treatises on bookkeeping, accounting, etc., and an occasional contributor to The Educational Journal, has been elected mayor of Belleville by acclamation.

We presume that the great majority of our subscribers preserve all their copies of The Journal. By doing so they will have, in the course of a few years, a series of volumes of pedagogical literature of the most practical and helpful kind. But we would especially advise all teachers to put on file, where they can be turned to at any moment, the last two copies, those, viz., for December i5th, 1896 , and January Ist, 1897. The leading articles on "The New Regulations" contain, in a clear and condensed form, the substance of all the changes affecting teachers and their work which weie made during the last vacation, and which will hold good during the next five years. The frequency with which we are always asked for information of this kind shows clearly the need of putting it in permanent form in The Journal, as we have thus done.

## THE NATIONAL SANITARIUM ASSOCIATION.

THE above noble charity is one in the success and progress of which the teachers of Canada, in common with
all other good citizens, can hardly fail to feel a deep interest. The object of this association, as our readers are doubtless aware, is to establish a public institution or institutions for "the isolation, treatment, and cure of persons affected with pulmonary diseases."

To Mr. W. J. Gage belongs the credit of having inaugurated the movement for the establishment of a sanitarium for the care and treatment of consumptives in Canada, and to his very liberal initial subscription of $\$ 25,000$, and his energetic and persistent advocacy of the project, is mainly due the fact that so good progress is being made in the erection of such an institution near Gravenhurst, Muskoka. A most eligible site, comprising about forty acres of well-timbered land, has been secured at that place. Another friend of the movement has also subscribed $\$ 25,000$. The municipality of Gravenhurst has voted a bonus of \$10,ooo. Mr. Wm. Davies, of Toronto, and family have undertaken to furnish a cottage adapted for four patients, and others are contributing liberally. The plan agreed on seems an excellent one. The central administrative building is now in process of erection. Several other cottages in connection with it are provided for, and the prospects are good for the opening of the sanitarium for the treatment of patients, applications from whom are already being received every week, in a few months. But the two facts that the numbers of those whose sad condition appeals powerfully for the aid which such an institution is designed to give is very large, and that the process of treatment

# The Educational Journal 

## SEMI-MONTHLY.

A JOURNAL DEFOTED TO LITERATURE, SOIENCE, ART AND THE ADVANOEMENT OF THE TEACEing profersion in oanada.
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J. E. Wells, M.A., Editor.

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is necessarily in most cases protracted, make it desirable that the facilities provided shall be on a large scale. Hence an appeal is being made for an immediate endowment of $\$ 250,000$. The teachers of Toronto have been asked to provide for the maintenance of a bed in the sanitarium, and it is proposed, we understand, to make a similar appeal to the teachers of the Province to maintain one or more beds for the same purpose. The beds so provided may, we presume, be set apart for the use of members of the teaching profession. The object cannot fail to commend itself very powerfully to the sympathies of teachers, and they will, we are sure, respond liberally when called upon.

WHAT IS THE IDEAL NATIONAL SYSTEM ?

THE ideal of a national educational system which is kept in view in some of the countries in which most attention is given to public education is that of a series of graded schools extending from the primary school to the university. It is usually claimed as one of the chief merits of our Ontario system that it so nearly attains to this ideal. The guiding and controlling idea in the schools of each grade is to prepare the pupils for that next higher. The High School Entrance Examination is the goal of the Public School course ; the Matriculation Examination that of the High School course. One or two important exceptions are made, it is true, as in the case of those taking the course for Comercialists' Certificates, and especially in the case of those students who are being prepared for one or another of the Departmental examinations prescribed for those preparing for teachers' certificates ; but this is, perhaps, not properly so much a part of a regular educational system as a special training for a particular occupation or profession, such as nothing but a special necessity can justify, in any public institution.

Leaving aside the latter question, we should like to elicit the opinions of some of our experienced and thoughtful educators, whether in University, High School, or Public School, on the question whether the ideal we have indicated is really the one best adapted, all things considered, to promote " the greatest good of the greatest number," which may be taken as, by common consent, the sound democratic principle to be kept in mind in the framing and management of all public institutions. The question is a legitimate one for discussion. Put in its simplest and most practical form, it might read somewhat as follows: In view of the
fact that a very large majority of all the children who enter the Public Schools receive, and must continue, at least for a long time to come, to receive, the whole of their education in those schools, never entering the High School, could the course of study and instruction in those Public Schools be made more practically useful to those children if it were planned and carried out with special or sole reference to their needs in relation to their future lives? Again, having in mind the fact that but a small percentage of those who enter the High Schools ever enter the University, much less complete a University course, could the High School course, regarded as the completion of the education of this great majority, be made more practically useful were it divorced from its subordination to the University matriculation, and its courses arranged and carried on with chief or sole reference to its highest usefulness as "the People's College" ? In both cases, we mean by " more practically useful," useful not merely from the point of view of earning a future livelihood, but also from the point of view of good citizenship, and still more from that of mental and moral development, and all the higher utilities which should be the chief ends in all educational processes, whether primary or advanced. We should like much to have the briefly expressed and briefly supported opinions of a goodly number of our friends upon this question, which has always seemed to us to be one of the very first importance.

## THE TEACHING OF LITERATURE.

THERE are some expressions in Mr . O'Hagan's letter in last number which, on first teading, puzzled us not a little. We began to wonder if it could be that, under Dr. Corson's guidance, our valued correspondent had discovered a
short and easy way to enter the temple of literature and revel in its delights, without climbing the heights, or even passing through the doors. But as we read we came upon the following, which, to a certain extent, dispelled the illusion: "For this reason only a few leading questions should be asked, such as will lead to a deeper, fuller, and more sympathetic insight, and make clear intellectually any line or lines which may have dimmed the impression or import of the poem as an organized whole."

This suggests, and in a manner admits, what seems to us the crucial difficulty. If there are any educators who hold, as Prof. Corson suspects, "that intellectual conceptions are the only measure of true education," we should be as far as possible from agreeing with them. But if there is any other way in which a student can be led into the realm of the spiritual, to which the higher literature admittedly belongs, save through the medium of the intellect, we confess not only that we have been unable to find that way, but that we are unable to conceive it. Neither Mr. O’Hagan nor Dr. Corson will, we think, attempt to maintain that it is possible for the most poetic or æsthetic student to "assimilate the informing life" of any great poem without first comprehending the conceptions which are bodied forth in it, and which, in themselves and their relations to each other, constitute it. It is true that Prof. Corson seems to hint at the opposite when he says that it is all important that "in the domain of the spiritual (to which the higher literature belongs) indefinite impressions (derived, for example, from a great creation of genius) should long be held in solution, and not be prematurely precipitated into barren abstractions which have no quickening power." The figure does not seem to be a very satisfactory one, as the question under discus-
sion just now is how the impressions, not being presented in solution, are to be first got into that state. Does Prof. Corson mean, as his words seem on their face to mean, that the danger to be guarded against is that of the student's too soon getting a clear idea of the writer's thought?

We venture to say that the greatest trial which meets every teacher of literature, in the earlier stages of student-progress, arises from the tendency on the part of so many to give their minds up to the influence of the rhythmic charm, and rest contented with extremely vague conceptions of what the writer is really driving at. It is sometimes distressing to note the number of readers who fancy they know a portion of a work of genius, when, as a matter of fact, they know only the sounds which should convey itsdelicate and subtle thoughts and fancies to the inner ear. We cordially admit, as we believe most of the despised High School teachers of literature will readily do, that the pupil may have, with or without the aid of much study and close analysis, or many questions rightly put, got clear intellectual conceptions of the poem as a whole, and of the thoughts, and shades and turns of thought, fancy, imagination, sentiment, etc., which compose it, without having in any adequate degree made his own the spiritual quality which is the "informing life" of the poem. But we can by no means concede the opposite. We cannot conceive of the possibility of anyone entering into the spirit or enjoying to the full the "informing life " of a poem without having first gained at least a fair mastery of the thoughts and conceptions of the poem itself.

Does not Mr. O'Hagan-we hesitate to add, " and Prof. Corson"-forget that literature is printed matter? The spirit of poetry pervades the universe in a thousand forms, wherever there are living spirits to perceive and appreciate it. It may enter
through a beautiful landscape or a beautiful face, through the rolling reverberations of the thunder, or the placid sky and sea of a summer's sunset, into the receptive soul, though the receiver may never have read a noble poem in verse or prose in his life. The power to feel and appreciate and enjoy is not necessarily dependent, certainly not wholly dependent, upon intellectual culture. But when the spirit of poetry is imprisoned in literature, it is only by the study and mastery of the forms and the matter of the literature that it can be set free. And there is no key to literature but that furnished by intellectual culture. The finest, most spiritual soul in the universe cannot read literature without the application of the intellectual faculties. That something else, something even higher, more ethereal, is required after intellect has done its part,we have already admitted. But literature is conveyed through the eye to the mind by letters; letters are built up into words, or symbols of words, if you choose ; words are combined into clauses and phrases and sentences and paragraphs; and it is by the right interpretation of each of these word-symbols; in its relation to clauses and phrases and sentences, and each of these in turn in its relation to other parts and to the complex whole, that the intellect is enabled to turn over this network of beautiful creations, shadowing forth, as they do, the emotions of one living spirit, in such a way as to rekindle these emotions, and probably create by suggestion a thousand new ones in another human spirit.
It requires some courage to say it, but we will even venture to add that, as a part of the process, and for the purpose indicated, we believe the much-ridiculed paraphrastic method is often found one of the most effective methods, and the putting of judicious questions, touching even syntactical relations, another.

## nlinatbematícs.

Communications intended for this department should be written on one side only, and with great distinctness; they should give all questions in full, and refer definitely to the books or other sources of the problems, and they ahould be addressed to the Editor,
C. CLARKSON, B.A.,

Seaforth, Ont.

## PROBLEMS FOR SOLUTION.

1. By J N.H. What rate of discount taken off twice in succession is equivalent to 20 and 25 per cent. off?

- 2. If $a+b$ varies $a s a-b$, then $a^{2}+b^{2}$ varies as ab.

3. Through a given point without a circle draw a straight line to cut the circle so that the part of it within the circle may be equal to a given line not greater than the diameter of the circle.
4. Two chords $A B$ and $A C$ are drawn from the point $A$ on the circumference of a circle. They are produced to D and E so that the rectangle $\mathrm{AC} . \mathrm{AE}=\mathrm{AB} . \mathrm{AD}$. If O is the centre of the circle, prove that AO is perpendicular to DE .
5. A person invested $\$ 8,420$ in 8 per cent. stock on the 7 th day of January, at $109 \frac{1}{2}$, and on the 12th day of February of the same year sold it out at ${ }_{117} 1 / 2$, paying $1 / 4$ per cent. brokerage on each transaction. Find his gain per cent. on what the stock cost him-money being worth 8 per cent. per annum ( 360 days). H.S.A., p. 358, Q. 3.
6. F our points, moving each at uniform speed, take $198,495,89$, and 1155 seconds respectively to describe the length of a given straight line. Suppose they start together at the same end of the line, and move from end to end continuously, how many minutes must elapse before they are all together again at the starting point? H.S.A p. 329, No. 98.
7. Skilled workmen and laborers are employed on a work, a skilled workman receiving $\$ 1.75$ per day more than a laborer. The average of their daily wages is $121 / 2$ cents more than it would be if skilled workmen and laborers were employed in equal numbers. If 6 men of each kind were discharged, the average of the daily wages would be raised by 5 cents. Find the number of men of each kind employed? H.S.A., p. 370, Q. 3.
8. Sulphuric acid contains $\frac{100}{49}$ per cent. of hydrogen. When zinc is put into the acid all the hydrogen is set free and zinc sulphate is left which contains 40.32 per cent. of zipc. If 50 cubic inches of hydrogen weigh one grain, how many grains of zinc would be necessary to prepare suffi-
cient hydrogen to fill a (spherical) balloon ten feet in diameter? H.S.A., p. 328, No. 88.
9. $\mathrm{A}, \mathrm{B}, \mathrm{C}$, and D together do a work for which $A$ by himself would require two hours less than $B$. $A$ and $B$ together do it in $\frac{50}{81}$ of the time $C$ and $D$ together would take; $A$ and $C$ in $\frac{56}{7} \frac{6}{5}$ of the time $B$ and D would take; and B and C in $\frac{85}{85}$ of the time $A$ and $B$ would take. Find the time each personsingly would require to do the work. H.S.A., p. 371, No. 6.

Io. A grocer sold 60 lbs . of coffee and 80 lbs . of sugar for $\$ 25$; but he sold 24 lbs. more sugar for $\$ 8$ than he did coffee for ten. What was the price of a pound of each? H.S.A., p. 331, No. 115. N.B.-These last nine were sent by W.H.V., Manitoba.
11. By T. J., Courtright, Ont. A rectangular stick of timber is $16 \times 20$ inches at the base, and trims to a point at 36 feet. Find the number of cubic feet in it.
12. By L.F.S., Elmbank, Ont. ABC is any triangle, E and F are the mid-points of the sides $A B$ and $A C$. A perpendicular is drawn from $A$ on $B C$. Prove the angle $F D E=$ angle $B A C$.
13. By D.R., Clinton. A man and a boy are engaged to harvest a field of potatoes for $\$ 10$. The boy can pick the potatoes while the man digs the hills; but the man can pick the potatoes three times as fast as the boy can dig the bills. Divide the money equitably between them.
14. W.Y.E., Purple Ridge, Man. If 26 hurdles can be placed in rectangular form so as to enclose 40 sq . yd. of ground, and 24 of the same can be placed so as to enclose a rectangle of 120 sq . yd., find the length of each hurdle.
15. By R.W.D., Sunderland. When first after 5 o'clock will the minute hand be midway between the figure III. and the hour hand! H.S.A., p. 213, No. 20.
16. By M.M., Ailsa Craig. An article was marked at a certain per cent. above cost ; the same rate of discount was allowed, giving a loss of $\frac{1}{64}$ of cost. What was the rate of discount? H.S.A., p. 144, No. 30.
17. A mercbant gives a discount of 10 per cent., but uses a yard measure .72 of an inch too short. What rate of discount would allow him the same amount of gain, if the measure were correct? H.S.A., p. 144, No. 23.
18. An agent received $\$ 6,360$, with instructions to invest in sugar at 5 cents a pound, retaining bis commission at 2 per cent., and paying in advance the freight at 20 cents per cwt. How much sugar does he buy? H.S.A., p. 151, No. 27.
19. Company No. I insured a building and its
stock for $\frac{2}{3}$ of its value, charging $\frac{3}{4}$ per cent. They reinsured in Company No. $2 \frac{1}{4}$ of the risk at $1 \frac{1}{2}$ per cent. ; building and stock being destroyed by fire, the second company lost $\$ 49,000$ less than the first. What amount did the owners lose? H.S.A., p. 156 , No. 27.
20. A man received $\$ 495$ as dividend at $41 / 2$ per cent. on his bank stock. He sold 40 shares ( $\$ 100$ ) at $143 / 4$, and the remainder at $1441 / 2$, paying $1 / 8$ per cent. brokerage. What were the net proceeds of the sale? P.S.A., p. 171, No. 19.
21. A capitalist had $\$ 20,000$ to invest. He purchased $\$ 8,700$, par value, of Canadian 4 per cent. bonds at 103 , and $\$ 7,300$, par value, of Canadian $31 / 2$ per cent. bonds at $93^{1 / 2}$, and invested the balance as far as he could in bank stock (shares \$1oo) at 14914, paying half-yearly dividends of 4 per cent. each. What was the gross amount of his investment, he paying $1 / 8$ per cent. brokerage for buying each class of securities? What was his annual income from these investments? What average rate per cent. per annum did he receive on these investments? P.S.A, p. 171, No. 20.
22. On September ${ }^{13}$ th a broker bought for a customer 500 shares ( $\$ 100$ ) of railroad stock at $783 / 4$, and the customer deposited with the broker $\$ 500$, as a "margin" for the latter's security against loss by a fall in the price of the stock. On October 7 th the stock was sold at $75 \frac{1 / 2}{2}$. How much of the margin remained after the sale if the broker charged $1 / 5$ per cent. brukerage on each transaction, and interest at 6 per cent. for the exact number of days on the money used in excess of the deposit? P.S.A., p. 171, No. 24 .
23. If money be worth 5 per cent., what should be the price of 6 per cent. bonds which are to be paid off, at par, three years after the date of purchase, the interest on the bonds being payable half-yearly? P.S.A., p. 171, No. 25.

## §cience.

## CORRESPONDENCE.

Question (1) from last Julys Sen or Leaving paper in physics was sent for solution.

The problem and solution are given below.
(i) A falling body passes two points to feet apart in $\frac{1}{2}$ second; it subsequently passes two other point; io feet apart in $\frac{1}{10}$ second. Find the distance between the first and the last of these four
points. $(g=32$.

Let $\mathrm{u}=$ initial velocity at first point ; then $\mathrm{u}+16$ $=$ velocity at second point, and $(2 u+16) \div 2=$ average velocity; and $\{2 \mathrm{u}+16 \div 2\} \times \frac{1}{2}=$ to feet. From which $u=12$.
Similarly let $u^{\prime}$ be initial velocity at third point; then similarly to above $\left\{\left(2 u^{\prime}+\frac{3}{1} 8\right) \div 2\right\} \times{ }_{1}^{10}=10$ feet, and $\mathrm{u}^{\prime}=98.4$. $\therefore$ body since leaving first point has acquired 98.4.-12 feet per second $=$ velocity $\therefore$ time to do this $=86.4 \div 32$.
Whole time of flight from first to fourth point $=$ $86.4 \div 32+\frac{1}{10}$ second $\therefore$ space $=12\{(86.4 \div 32)+$ $\left.\frac{1}{10}\right\}+16\left\{(86.4 \div 32)+\frac{1}{10}\right\}^{2}$.
D. McEchern asks to recommend a suitable text-brok on methods in science tearhing.
The Editor of this department does not know of any single book devoted to this work. A number of text-books on physics and chemistry, notably Gage and Chute's works, contain in their prefaces hints to the teacher of these sciences. Longman's Object Lessons has a suggestive preface, and McMurry's "Special Method in Science" has many valuable hints. The latter is devoted to nature study, as taken in the Public Schools of the United States.
"Teacher of Continuation Classes" asks for
(I) Any simple apparatus to illustrate experimentally Archimedes' principle.
(2) Suitable winter work in botany.

Answer. (2) The latter of these questions has been discussed several times in The Journal. Headings alone are now given. The study of a pea or bean pod and seed ; the same seed during early stages of growth; study of leaves previously pressed ; the study of the method of branching of plants, ie.e, trees and shrubs. Seed dispersion may also be studied if the teacher has taken the precaution to lay, in the previous fall, such types as the dandelion, basswood, bur, elm, and maple.
(I) The following simple apparatus may be used: A spring balance, a large pail and a smaller tin one, a good-sized stone.

Find weight of stone; lower it while attached to the balance into the water in the large pail, noting previously the height of the water; mark the height of the water when the stone is wholly immersed and the new apparent weight of the stone in water. What was the apparent loss of weight of stone in water. Pour into the smaller pail (previnusly weighed) water sufficient to fill up the space between the marks on the large pail. Weigh this amount of water. How does it compare with the apparent loss of weight of stone? What volume of water was poured into the large pail?

## TOPICS FOR NATURE STUDY.

Mrs. L. McMurry suggests the following as topics suitable for nature study during the first school year of the child :

FALL TERM.
I. Preparation of large buds of trees, e.g., hickory, buckeye, balm of Gilead, horse-chestnut, for winter rest, associated with gathering of autumn leaves.
2. Life story of dog and cow.
3. Sheep by comparison with cow.
4. Squirrel-its home life.
5. Rabbit and mouse by comparison with squirrel.

## WINTER TERM.

I. Pine.
2. Horse.
3. Chicken-types of birds.
4. English sparrow and chickadee by comparison with (3).
5. Cat.

## SPRING TERM.

I. Plant Lima beans, corn. Watch development.
2. Robin.
3. Buds, blossoms, and fruit of apple, cherry, plum.
4. Duck-type of water bird.

Children draw the objects studied.
BOOKS USEFUL FOR NATURE STUDY.
Teachers frequently ask for books which will assist them in making a start with nature study. The following list, though somewhat long, contains the books which are believed to be most suitable for beginners.

PROFESSIONAL.
"Special Method in Science for Common Schools." McMurry. Public School Publishing Co., Bloomington, Ill. $50 c$.
"Nature Study." Jackman. Holt \& Co., New York, Publishers.
"One Hundred Lessons in Nature Study." Payne. Kellogg \& Co., New York.
"An Outline of Nature Study." Scott, C.B., Osweyo, N.Y.

## IN FORMATIONAL.

"The Child's Book of Nature," 3 parts. Hooker. Harper Bros., New York.
"Nature Stories for Young Readers," 2 parts. D. C. Heath \& Co., Boston.
"Sharp Eyes." Burroughs. Houghton, Mifflin \& Co., New York.
"The Stories of the Trees." Mrs. Dyson. Thos. Nelson \& Sons, New York.
"Little Brothers of the Air." O. T. Miller. Houghton, Mifflin \& Co.
"Simple Experiments for the Schoolroom." Woodhuli. Kellogg \& Co., New York.
"Home Studies in Nature." Treat. American Book Co., New York.

## HOW SHOULD PHYSIOLOGY BE TAUGHT IN THE PUBLIC SCHOOLS?

Since physiology is the only subject on the Public School programme (except physical geography) which may be designated a science subject, a discussion of the methods of teaching it may not be out of place, and may prove suggestive to teachers. It is not expected that any considerable degree of harmony may be reached, for various reasons. Some teachers luok upon the subject as an intruder, usurping time and energy which should be devoted to other branches. There are other teachers who regard it as dry and uninteresting in itself, and who consequently devote to it merely the minimum amount of time required for examination purposes. A few supersensitive creatures are disgusted at having to refer to such horrid things as intestines, kidneys, duodenum, pancreas, and so forth. However, the subject is on the programme, whether advisedly or not is not under consideration, and the earnest teacher is not doing his duty unless he seek the best methods of teaching the subject.

Human physiology deals with the nature and function of the various organs which unitedly constitute the physical man. In hygiene the laws of health, so far as they are known, are to be inculcated. Very little real progress can be made in either until the form and relation of the various organs are known. Anatomy, therefore, precedes physiology. How best may young pupils acquire correct ideas of form and location? Were a teacher desirous of having his pupils acquire an accurate conception of a cube or cone, he would place models of these before them. A pyramid or cone may readily be cut from wood or moulded from clay or putty. Pictures of these objects, while more valuable than word descriptions, are less so than are the models.

All science teaching requires that the object studied shall, wherever possible, be brought before the pupils for their observation. Now, what can be done by the teacher in regard to the various organs found in the human body? If a teacher is in earnest about his work he may easily procure (a) representative teeth, i.e., an incisor, canine, præ-molar, and molar from any dentist ;
(b) borrow a skull, leg and arm bnnes, hand and wrist bones, etc., from a doctor. These will give a fair idea of the internal bony skeleton, and a chart will show the relationship of the various parts. Now, in reference to the softer parts and internal organs, what shall be done? The answers of Entrance candidates show that there is very little real knowledge possessed by them regarding the form, size, and location of these internal structures. Models might do, but these are expensive ; charts show location, but give little real help in knowing size and form. The scientific way, and the only way to secure an accurate knowledge, is to dissest some animal in which the organs may be readily seen and their position located. For this purpose a superfluous kitten, a rat, or puppy, answer admirably. This point appears to be the crux. Most female teachers and many male teachers object to dissection for several reasonsladies, that it is offensive to their sense of delicacy, and many that it produces a "hardening" effect on the pupils. It is to be apprehended that much of this feeling, in both cases, is due to prejudice, or a distorted imagination. It is not the intention, however, to ridicule these notions. Those who hold them must still continue to use the text-book as a cram book, and remain as far as ever from the process of true education. In many cases the present text-book is responsible for this condition of affairs.

In regard to physiology, which deals also with the functions of the various organs, it must be admitted that there is a much greater difficulty in following the ideal plan of science-teaching, especially with young pupils and untrained teachers ; yet here, too, there are many simple experiments which may be devised to secure fuller appreciation of the use of organs whose form and location have been, in the previous method, accurately made known.

In comparing the results reached in Ontario with those of many American States, where the subject is at once more important and more popular, it must be admitted that we have great cause for self-reproach. If we are to keep pace with our progressive American fellow-workers, we must review our methods, and that quickly, and lend our efforts towards securing a suitable text-book. Pedagogically, the method of the book now in use is entirely unsound.

The riches of the commonwealth
Are free strong minds, and hearts of health; And more to her than gold or grain, The cunning hand and cultured brain.-Whittier.

## Epecial 『apers.

THE GOUIN METHOD APPLIED TO FRENCH.

BY J. H. C
It is now sixteen years since M. François Gouin first published his "Art of Teaching and Studying Languages." The first English edition of that work appeared in May, 1892, and now, after about four years, we have accessible, in an American edition, the practical application of the method to the study of French.* It is much to be regretted that the gifted author who has given his name to the system should not have been longer spared to see the improvements in the teaching of languages which his efforts, along with those of other reformers, are steadily andirresistibly bringing about. His death was announced in the Maître Phonétique for October ; but it seems to have attracted so little notice that even the Review of Reviezus, which gave the method such unusual publicity three years ago, has not yet inscribed the name of Gouin in its obituary.
The book in question has been prepared by Bétis and Swan, the two translators of Gouin's book on languages, who have introduced the method into England and the United States. (Bétis is now at the head of the Boston School of Languages, while Swan remains in London.)
At the first glance it is evident that the arrangement of the famous "series" is no longer that formulated by Gouin. The authors in departing from the original plan have apparently aimed at an economy of time and effort. Their object is substantially one with Gouin's; that is to say, it aims at translating into a foreign language the whole of the ordinary experiences of life. But instead of minutely analyzing each process of action or thought into its smallest elements, to form a long series of steps in chronological sequence, the authors of "The Facts of Life" only adhere to the principle of sequence inas much as it affords an organic framework upon which to arrange, in an easily retainable order, the expressions of the ordinary language of life. These expressions they wish to present in their living form, instead of the detached and lifeless condition in which they are stored up in the ordinary dictionaries.

[^2]They regard their work as a dictionary of a new sort, of which they speak in these terms in the introduction :
" I . It is a dictionary of the phrases and sentences of a language; it includes the collection of all the ordinary instances in which any word is employed in the habitual language of life; all the phrases, that is to say, 'consecrated by usage.' . .
" 2 . These sentences are connected together one with the other, so as to form readable matter.
" 3. The sentences are classed, not in their alphabetical order, but in an 'encyclopædic' order ; which is yet, as will be seen, so familiar to everyone that researches are as easily made in it as in the ordinary alphabetical dictionaries.
" 4. This dictionary is, further, one which can be learnt and assimilated; that is, it can be learnt and studied page by page, provided always that a suitable method of teaching is followed."

To show the practical value of the work when employed as a dictionary, it is pointed out that by turning to the chapter or subsection containing the expressions among which the pupi! expects to find the word that he wishes to have explained he not only finds the word there doing actual duty in the sentence, but he meets a whole series of expressions more or less intimately connected with the act, state, or relation with which he is more immediately concerned. It will be evident that this way of employing the book will depend very largely in part on the range of variation in the use of the given word which is incorporated in this "ordinary" language "consecrated by usage," and in part on the completeness of the alphabetical index in both the languages which is to be published when the various subdivisions of the work are completed.

If the authors had set out to construct their new dictionary on the same basis as that laid down by Gouin, who estimated the limits required for the full elaboration of the linguistic material at 100,000 sentences or 4,000 pages, the prospert would be very different from what it is. By their remarkable condensation, they give in four or five sentences the substance of a Gouin series containing from twenty to twenty-five sentences. They necessarily sacrifice many of the details, as may be seen by comparing Gouin's series of "The Fire," No. IV. ("The servant lights the fire"), with the same subject in Bétis and Swan; but they have evidently thought it wiser to cover the field much more rapidly than their master, by omitting all but the essential steps and by avoiding numerous repetitions. They have even taken care to print the most important sentences in the series in heavy
type, so as to form an elementary course for those who desire it.

This abridgment, besides making the system more alluring, is probably an improvement in actual practice, for the following reason: While every teacher of French will find the work fill of information and aid, it is only those who have some real command of French conversation that will be able to apply it successfully in its entirety, and to such persons the minutely exhaustive series of Gouin's earlier models would tend to grow tedious, in comparison with the rapid movement of the later series, which can be expanded as desired at any point by everyone capable of conducting an average colloquy.

The system, its authors are careful to tell us, will give its good results only when employed as they intend it to be. They lay great emphasis on certain psychological principles which they affirm to be the distinguishing mark of their methods; indeed, they speak of their "psychological meth. ods" as being in opposition to "classical methods" and "natural methods." So important and so new do they consider their methods to be that they have taken the precaution to copyright them so that the methods and the lectures designed to initiate the profane "can only be employed by their authorization," whatever that may mean. Among the works they mention as expository of the system one finds the "Method of Mental Evocation" (the calling up of mental representation), a "Symbolic Grammar," a " Grammatical Synthesis," and even a "Literary Method of Reinvention," based on " a long and careful psychological investigation carried out on the works of the great writers of various languages," "a method which may easily lead the student from literary analysis on to literary composition, and eventually to the study of the very highest problems in literature."

These are great pretensions, and although they remind one of the "Physiological Memory," patented and copyrighted a few years ago in New York and London, they may really be worth looking into. Our day is one of such madness in our methods that it sometimes looks as if it mattered little that pupils learn nothing, so long as the method is brand new, inédite, noch nicht da gezesen. We bave suffered enough from this craze in Ontario. But if anyone can bring us a useful aid to reform our teaching of languages; to make a foreign language as attractive as it might be made from the first moment of approaching it ; to make every step of progress in it a delight to the ear and the eye, as well as to the intellect; to awaken that curiosity about foreign countries and
peoples and their literatures which is a neverfailing spring of delight-if there is a man with a "method," or without one, who can help us to this, then we must be ready to learn of him.

Tested by this criterion, what is the value of the book before us? Taking it, all in all, in spite of the curious blending of esoteric revelations with distinctly commercial ambitions which one finds in the introduction, and notwithstanding certain pedagogical whims-such as the complete rejection of pictures and object lessons of every sortit is safe to say that the "Facts of Life" is one of the most serviceable books yet published with the aim of supplying living language material to the teacher or student. The amount of this material compressed into the book is remarkable. There are 115 long pages, many of which contain from twenty-five to thirty separate statements, usually without repetition of more than a word or two. The book is divided into four chapters: I. "Home Life." The events of the day in a French home. Dress in general and in detail. Toilet operations of various sorts. The many operations of housekeeping: the kitchen, the meals. II. "School Life." The school day, the school week and year. Reading, writing, spelling, grammar, composition, arithmetic. Games, etc. III. "Travelling." Writing and despatching a letter. Departure on a journey : horses and carriage ; railway, etc. Bicycling : mounting, riding, accidents. etc. IV "Plants." Wheat and its cultivation; its manufacture into bread. The vine, its cultivation and products, etc.

The above analysis suffices to show the ground covered. One who could actually use all the phrases given in the book would have made great progress in the language. But it will not do to learn them by heart merely. A language can never be acquired in that way. Nor do the authors mean their book to be so used. "The teaching," they say, " must be chiefly oral, skilfully carried out, and based upon psychological principles." And again, "on the methods of teaching, for which this dictionary is adapted, the printed sentences are not seen by the pupils until the whole is correctly and thoroughly known beforehand." What a radical change would come over the teaching in most schools if this desideratum could be secured even in its narrowest and most mechanical realization! Do we yet realize what it means to teach a language mainly by the ear? With purely oral instruction, aided by phonetic transcription, elementary classes could accomplish far more than they ever do now, and in considerably less time than it takes them to learn badly the little that they and we think they know. The demonstration of this fact is now accessible in the reports
of experiments with the reformed methods, and these reports are now quite numerous. J. H. C.
Note.-In the Neueren Sprachen for October, an announcement of Gouin's death is made by Kron of Quedlinburg, who add the information that the Gouin school of languages is to be continued by Mme. Vve. Gouin, at Neuilly-sur-Seine, and also that three parts of the French (Gouin's own series) have been published in France, the last of which contains abuve 4000 phrases relatives.

SUPERINTENDENT A. H. MACKAY.
A. H. MacKay is a name familiar in all educational and scientific circles in the Atlantic Provinces. It may not be amiss, however, at the present, in connection with his retirement from one of the editorial chairs of the Review and his elevation to the highest educational position in his native province, to refer to a few of his more prominent characteristics, and give with dates a few of the chief events in his career.

He was born on the 19th of May, 1848. In his early boyhood he began his scientific investigations amid the scenery of a romantic mountain home in Pictou county, Nova Scotia.

Through the labors of Sir William Dawson, then Superintendent of Education, the applications of science to agriculture were beginning to attract attention, and Johnson's Agricultural Chemistry and other such works awakened and stimulated many youthful minds at that time, and his among the rest.

Assisting on the farm in summer and studying at a school two miles distant in winter, he made rapid progress in building up a physical constitution which never failed him under the severest mental strain, and in acquiring so much knowledge that at seventeen years of age he became master of the district school, instead of being a pupil. The next eight years were spent in alternately teaching and studying, until at the age of twenty five he graduated from Dalhousie College with honors in mathematics and physics.
For sixteen years he was principal of Pictou Academy and common schoois, and for two years principal of Halifax Academy. During all this time he devoted himself most enthusiastically to the study of science. First he mastered our Nova Scotia flora. Then he turned his attention to insects and became an accomplished entomologist. He was the first and only authority on Nova Scotia fresh-water sponges, several species of which he discovered, and some of which in their specific names will perpetuate the name of their discoverer.

Although apparently so much engrossed in pure science, he seems to have bad time enough for many other kinds of work. He was fond of military drill ; investigated microscopically the causes of rinderpest ; discussed thenlogical questions with the kirk session ; took lessons on the piano ; mastered Volapuk; cultivated microbes; conducted a Sunday school; and took a leading part in many scientific and literary societies.

Being possessed of the true scientific spirit, he is somewhat slow in arriving at conclusions--particularly in matters outside the physical sciences. Long ago he discovered that one of the highest results of true culture is the power to put oneself in the place of another, to see and feel as he does, to louk at things from his standpoint, and to know
all the facts relating to the subjects, before coming to a conclusion. In cultivating this faculty, characteristic of the truly great, Mr. MacKay has been remarkably successful. Hence his broad and generous sympathies with every one he meets, and with all classes and creeds. What he may lose in intensity and immediate results he will gain in the correctness and abiding qualities of his work.-:

One point more. For his present position he has had an ideal training. Compelled to work his way up from the ranks, he has practical knowledge and experience extending over twenty-three years of every grade of educational work, from the small country school to the biological classes of Dalhousie University. He has met and studied all classes of our citizens in country and city. The gentle Acadian farmer need not fear that he will be neglected, nor may the dominant Pictonian expect to wrench undue favors from his hands.

His life, as a whole, illustrates the proverb: "Seest thou a man diligent in business ? He shall stand before kings."

DATES OF PRINCIPAL EVENTS IN SUPERINTENDENT MACKAY'S LIFE.

1848 Igth May, date of birth.
1865 Began teaching in Dalhousie, Pictou.
1866 Studied at the Normal School, Truro.
1868 Entered Pictou Academy.
1869 Matriculated into Dalhousie College.
1870 Appointed an editor of the Dalhousie Gazette.
1873 Graduated from Dalhousie College a B.A.
1873 Appointed principal of Pictou Academy.
1874 Elected president of the Provincial Educational Association of Nova Scotia.
1876 Visited leading schools of the United States.
1880 Tonk the degree of B.Sc., Halifax University.
1881 Built the new Pictou Academy.
1882 Married Maude Augusta Johnstone, only daughter of Dr. G. M. Johnstone, M.R.C.S.
1884 Elected member of the Biological Section of the British Association.
I 886 Appninted Fellow of the Society of Science, Letters, and Arts, London.
1887 Started the Educational Review with G. U. Hay.
1887 Elected president Summer School of Science, N.S.


Mr. A. H. McKay.
1887 Elected vice-president N.S. Institute of Science.
1888 Elected member Natural History Society, Montreal.
1888 Appointed a governor of Dalhousie College.
1891 Appointed lecturer on Zoology, Dalhousie College.
1891 Appointed secretary Dominion Botanical Club.
1891 Appointed lecturer in Bacteriology, Halifax Medical College.
1891 Appointed Superintendent of Education for Nova Scotia.

Life is a leaf of paper white
Whereon each one of us may write
His word or two, and then comes night ;
Though thou have time
But for a line, be that sublime :
Not failure but low aim is crime.-Lowell.

## The Entrance Journal

A SEMI-MONTHLY JOURNAL
Decoted to the High School Entrance and Public School Leaving work in the Public Sihools of Ontario.

Subscription Price, 25 cents a year, or in clubs of ten or more to one address 10 cents a year.
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11/ $\frac{1}{2}$ Richmond St. W., Toronto.

## CHAT WITH OUR READERS.

Compositions are still pouring in. Miss $L$. Overend says, I have tried your plan of sto:y. writing, and find it very successful as well as beneficia.. Miss Overend enclosed an excellent compcsiti:n, written by Master R. J. Sheehan, on the "Sleering Apple." It came too late for publication.

Miss Belle Lamb, while enclosing a very suberior composition written by Master A. Wailer Westgate, which was also too late for publication, says: "Such work is not entirely new to my little folks, and I find it helps them greatly in composition and language. I like The Journai very much. I could not do without it.'

We were glad to hear from our old trienas a S. S. No. 14, Hay, Huron county again. The work rom this school is very cieditable indeed. Susan S. We'r, who wrote' The Lost Scholarship," publishe'i in our issue of December ifth, again leads with "Canada's Greatest Hero," a most deserving composition on our historical picture given in the issue of December rst. We would like to give it publication, but the lateness of its receipt and lack of space forbids. Very good work is also sent by Mary Weir and Nora Pretty of the same school.

Very deserving compositions are also to hand from Jennie Baxter, who says: "I am very much pleased with your paper, The Entrance JourNAL, as it has helped me many a time," and from Miss B. E. Irwin, British Columbia. Let us hear from our litile Pacific sister again.

Subscriptions are rolling in. Our five-cent rate for The Entrance Journal from January to July is attracting the teachers and pupils. Send in your club lists now.

Mr. J. K. Cranston, Galt, Ont., says: " Received January number of Entrance Journal. It is a beauty, and will be sure to succeed in your hands, and be a great help to teachers and scholars of

## Drawing.

BY A. C. CASSELMAN.

## handles.

To place a handle on a pail, cup, or basket requires a perfect knowledge of the construction of the object.

Let us consider first the appearance of a handle on a cylindrical cup. The top of the cup appears as an ellipse when below the eye level. Place a small stick in the top of the cup to represent the diameter of the top. Place one end of the st ck at the point where the handle is fastened to the cup. Rotate the cup on its axis so that the handle will appear in different positions. The stick will always be a dianeter of the circular top. Draw the bociy of the ctip and the handle in profile, as shown in position I, figure i. Enclose the curved

i. andle by avertizal and a horizontal line meeting at I. If the cup is rotated on its axis the point 1 , will describe the circumference of a circle, which may be represented as an ellipse. Suppose it is required to represent the handle in position 3 . Make the point 3 on the side of the cup. Draw the diameter of the top by drawing a line from 3 through the centre of the top. The centre is on the short axis of the ellipse that represents the top, a little beyond the point where the axes cross each other. Produce this line to meet the large ellipse. The lowest part of the handle will also describe a circle, which is represented by an ellipse. Draw from 3 a vertical line to meet this last ellipse. From the outer ellipse at the top draw another vertical line. Draw the handle be-

tween these vertical lines. The handle in position 4 is obtained in the same way.
Figure 2 shows a saucepan, with the handle in
different positions. Notice that the top of the saucepan is lower than the top of the handle. Draw an ellipse to represent the top of the pan if it were on a level with the top of the handle. Find on this ellipse a point vertically above where the handle is fastened to the pan. Proceed as before to draw the handle.

Figure 3 shows a kettle with the bail in two positiows. The cn!y new thing to find is the position of the lip. The lip is at the end of a diameterwhich is at right angles to the diameter joining the points where the handles fasten on the top. It is very difficult to locate this second diameter without some device. Below the object draw a semicircle as large as half the top. Draw a half diameter 1,2 to represent half the diameter o. tre ketile, and rom 2 draw another halt ciameter 2,3 a: right angles to 1,2 . From 3 diaw a verticat ine to meet the ellipse that represents the top of the ket ie. This is the location of the lip.


The handle of the kettle would not rest in either of the upright positions, and should never be represented in that position. At rest it would be either on the lip or against the side, as shown by the dotted balf ellipse.
The device of a semicircle below may be used to show the apparent width of staves in a tub, barrel, or pail.

The devire given above is not of great material benefit if the object is before you while drawing it. Then you can by observation locate the principal points. If the drawing is from memory, the above devices are useful.

Draw a basket, a teapot, a pail, a pitcher, and a sugar bowl in such a position that the handle does not show in profile.

## Grammar.

The following questions will be fully answered in our next issue. Have your class prepare model answers, and compare the result with the answers given in our next :

1. When a mounting skylark sings In the sunlit summer morn, I know that heaven is $u p$ on high, And on earth are fields of corn.
But when a nightingale sings In the moonlit summer even,
I know not if earth is merely earth, Only that heaven is heaven.
-Christina Rossetti.
( d) Analyze the exirict se as to shew the clauses of which it is composed. stating their kind and connection.
(b) Classify the words in italics, and give their functions.
(a) Select the (I. adjectival clauses, (II.) adveibial clanse:, and show clearly their grammatical relat on to the wards with which they are connected in sense.

## ANSWERS TO QUESTIONS IN LAST ISSUE.

## I. DETAILED ANALYSIS.

In giving full analysis, in the Entrance class, dividing sentences into their six chief parts should be considered sufficient.
(a) Bare subject.
(b) Attributive modifiers of the bare subject.
(c) Verb or verb phrase.
(d) Predicative modifiers of the subject.
(e) Direct object with its modifiers.
(f) Adverbial modifiers of the verb.

The sentence, "Why should not these three great branches of the family, forming one grand whole, proudly fourish under different systems of government?" would, therefore, be analyzed as follows:
(a) Branches.
(b) I , These three great; 2, of the family ; 3 , forming one grand whole.
(c) Should flourish.
(f) 1 , Why not ; 2, proudly ; 3 , under different systems of government.

## 1I. PARSING.

Why. Relation-Why should flourish.
Classification-Adverb, interrogative, simple.
Function-Used in asking a question.
Should fourish. Relation-Branches should flouish.
Classification-Verb, intransitive, weak, finite, active, simple.
Inflection-Indicative mood; present, indefinite, conditional tense; third person ; plural number.

Function-Used to ask a question about branches.
These. Relation-These branches.
Classification-Adjective, pronominal, demonstrative, simple.
Function-Used to point out or limit branches.
Branches. Relation-Branches should flourish.
Classification - Noun, common, concrete, simple.
Inflection-Plural number, nominative case.
Function-Used subjectively, the subject of should flourish.
Forming. Relation-Branches forming.
Classification - Verl, imperfect participle, transitive, weak, infinite, active, derived.
Function-Used appositively, as an adjective. loosely connected with the noun branches
Under. Relation-Should fourish under systems.
Classification-Preposition, place, simple.
Function-Shows the relation between should fourish and systems.

## III. PhRASES.

The phrases, other than prepositional phrases, which might be found in an extract, would be :
I. Preposition phrases, that is, two or more words having the value of a single preposition, as "He came from out the sea." Notice the distinction between a prepositional and a preposition phrase.
2. A participial phrase, that is, a participle followed by all words depending on it, as "The general, having defeated the enemy, returned." Dis. tinguish particitial and participle phrases.
3. Verb phrases, that is, two or more words having the value of a single verb, as "Wilfrid had roused him to reply."
4. Adverb phrases, that is two or more words having the value of a single adverb, as "He came by stealth."
5. Conjunction phrases, that is, two or more words having the value of a single conjunction, as "John as well as James may go."
The phrases in this sentence, other than prepositional phrases, are :
I. Should fourish, a verb phrase used in asking a question about branches.
2. Forming one grand whole, a participial phrase used as an appositive adjective, loosely connected with the noun branches.

[^3]
## Entrance Literature.

## THE LANDING OF THE PILGRIMS.

To properly understand this lesson the pupil must be made acquainted with the history of the Pilgyim Fathers. In the reign of Elizabeth there were people in England who thought that the form of worship in the English Church was unscriptural. These people were called Non-conformists, Separatists, or Brownists. They would not take the sacraments of, nor worship in, the Established Church, and were therefore persecuted to force them to conform. To escape this persecution one congregation fled to Holland, but finding it difficult to maintain themselves there as a separate community, they decided, in the reign of James, to find for themselves a home in the New World. Returning to Southampton, they set sail on September 6th, 1620, in the Speedwell and Mayflower, for their new home. At Plymouth, the last place in England they saw, the Speedzell was left, on being declared unfit for sea, and the whole party-one hundred and two-were taken on board the Mayfower.

They landed on the coast of Massachusetts in December, 1620, at Plymouth-so named in memory of the last English port they had touched. The place is marked to this day by a huge boulder of granite, Plymouth Rock, which is held in great veneration by their descendants.

We are sure that our readers will appreciate the following description of Plymouth Rock, written by Mr. J. L. Hughes, Inspector of Public Schools, Toronto, who has visited the spot, and writes of what he has seen. You will also be pleased with the photogravure of the Rock itself, produced from a negative taken by Mr. Hughes and now in his private collection, and kindly loaned to THE JOURNAL for the benefit of our readers.

## PLYIIOUTH ROCK.

By J. L. Hughes, I.P.S., Toronto.
I was never more surprised than when I first saw Plymouth Rock.

My preconcesved ideas were entirely different from the reality. I had pictured in my imagination a rocky shore, with one projecting ledge forming a natural wharf on which the pilgrims landed with all their goods and chattels, but found that the shore was really a sandy beach at the foot of a hill, and that Plymouth Rock was just a common boulder. The large stone lay in the shallow water close to the beach when the pilgrims


Plymouth Rock.
came, and it formed a stepping stone between their heavy rowloat and the beach. In 1775 it was decided to fill in the beach where the stone lay to form a wharf, and an attempt was made to raise the stone. The upper half was broken off and placed in the town square, where it remained nearly sixty years. It was then taken to Pilgrim Hall, and kept there till 1880 , when the two parts were p'aced in their present position, and cemented so as to make the boulder as nearly as possible what it was when the pilgims first stepped on it. It now lies not far from the spot in which the pilgrims found it, and is covered by a beautiful granite canopy.

The accompanying picture I made standing on Cole's Hill, the hill on which the pilgrims lived during their first winter in America, and on which neariy half of them were buried during that dreadful year.

The sandbar beyond the bay makes Plymouth harbor one of the safest in America. The land seen overthe white storehouse is Clark's Island, on which the pilgrims spent their first Sunday in the new world.

The landing on the mainland from the Rock took place on Monday, December 21 st, 1620.
"The great thing to be minded in education is what habits you settle."-Locke.

THE LANDING OF THE PILGRIMS,

ANSWERS TO QUESTIONS IN OUR LAST ISSUE.

1. The subject of the poem is the coming of the pilgrims, the circumstances and the cause.
II. The topic of each stanza is:
I. The scene at their landing.
2. The manner of their coming.
3. The welcome they received.
4. The "pilyrim band" described.
5. The cause of their coming.

This shows a " natural order of development," for we commence with the first event in their coming, that is, their landing, and proceed from their manner of coming to their welcome, and then from a description of the pulgrims to the cause of their coming, which is the climax of the poem.

STANZA I.
You will notice that the omission of these words, while not to any great degree changing the meaning of the lines, takes from them all the vividness of the picture, that is, robs them of their "picturesqueness." Such words are called "ornamental epithets." They are the chief means by which an author can become " picturesque."
"Breaking waves." This refers to the breakers dashing on the shore.
"Stern and rock-bound coast." The coast is described as broken and rocky, surrounded by hills, the shore covered with giant trees. This is true of the New England coast as a whole, especially to the north of where the pilguims landed, but at Plymouth the description is not at all applicable, for the shore is there a succession of low sand hills covered with stunted trees.
" Woods." A wood is a large and thick collections of trees, and is preferable to "trees" here, because the poet is speaking of the woods as a whole. It has also a fuller and deeper sound.
"Stormy sky." A dark, lowering sky, covered with scudding clouds.
"Giant branches tossed." You see the forest agitated by the stormy wind, with the branches of the great trees tossing to and fro.
"Heavy night hung dark." The night was over. cast with low, threatening clouds.
"O'er." An example of poetical contraction. See "parting life" and "passing rich" in the Deserted Village.
" Band of exiles." The exiles or pilgrims were a band of persons who refused to worship according to the form laid down by the English Church, and who emigrate 1 to America to escape religious persecution.
" Moored their bark." Anchored their ship.
"Wild New England shore." Wild means inhospitable, rugged, unexplored.

The "breaking waves," etc., are introduced in the first stanza to arouse our sympathies for the pilgrims under their trying circumstances.

The "vividness" of the description in the first stanza is caused by the use of "ornamental epithets." See the first question on stanza i.

## STANZA 11.

"Conqueror comes." The conqueror comes with drums and trumpets proclaiming his victory.
"True-hearted." They are called "true-hearted" because they were faithful to their religious convictions.
"Roll of stirring drums." "Roll" most aptly describes the sound of drum, and "stirring" the mental effect the sound has on those who hear it.
"Trumpet that sings his fame." The trumpet that is blown on the coming of the conqueror to spread to all his fame and glory.
The second line of this stanza describes the coming of the conqueror as mentioned in the first line.
" Fiying come." "Flying " means those escaping from justice. They would come secretly, in silence, and with fear of being found.
"In silence and in fear." This means without
noise, secretly, and fearful of being seen or known. This clause shows the manner of the coming of the "flying," as mentioned in the first clause in line 3 .
"Shook the depths." Roused the silence of the deep woods. "Depths of the desert's gloom." The silence of the deep woods. "Depths." Deep woods." Desert's gloom." The silence and dimness of the forest. "Desert's gloom" is expressed as "aisles of the dim woods" in the next stanza.
"Hymns of lofty cheer." The hymns, which expressed their faith in God, consoled, inspired, and cheered them, even amidst such discouraging surroundings.

The force of this stanza consists in the strong contrasts brought out between the coming of the "conqueror" and the "flying" and the coming of the pilgrims.

## STANZA III.

"Amidst the storm." The storm was referred to in the first two lines of the first stanza.
"The stars heard and the sea." The figure in this line is a "personal metaphor." The "stars" and the "sea" are given the attributes of persons; they see and hear. It is peculiarly pleasing to us because even the inanimate things-the "sea" and the "stars"-are made to sympathize with, and take an interest in, the "pilgrim band."

The poet uses "alliteration" in this line, as seen in storm, sang, stars, and sea, all commencing with the same sound. This adds to the " melody' of the poem.
"Sounding aisles." Aisles are the divisions of a church between the rows of pillars, which rise like the trunks of trees, hence the aisles here spoken of are the opening in the forest between the rows of trees." 'They are called "sounding aisles" because the songs of the pilgrims were echoing through them. You will notice how the figure of a church is maintained in the use of the word "anthem."
"Dim woods." This was expressed before as "depths of the desert's gloom." The woods are called dim because their foliage shut out the light.
"Anthem of the free." Song of the pilgrims.
"Ocean eagle." The ocean, sea, white-headed, or bald-headed eagle, which has become the emblem of the United States, is a bird about the same size as the common eagle ; it has dark-brown plumage, the head, neck, tail, and belly white. Its favorite nesting place is on the ledges of precipitous rocks, on the sea-coast, where it feeds on fish.
The fact of the eagle's becoming the "emblem" of the United States would be sufficient reason for
its introduction here, but it also adds to the w d . ress of the scene.
"White waves foam." This was expressed in the first line as "breaking waves tashed nigh." This description is not a true one, for while the ocean eagle does nest among precipitous rocks he could hardly be thought to nest among the sand hills of Cape Cod.
"Rocking pines roared." Notice first the alliteration in "rocking" and " oared." Notice further the "onomatopœia" (on'-o-mat'-o pe-ya), that is, the assimilation of the word sound-with the sound of the object the word represents. How the rolling " r 's" imitate the sound of the "roaring" wind.
"This was their welcome home." The dash is used to show the break in the sense. After the enumeration of the "hearing" of the stars and the sea, the "sounding" of the forest's aisles, the "soaring" of the eagle, and the "rocking" of the pines, all is summed up in "this was their welcome home." "This" is put in the singular number because the poet regards the things before enumerated as one. The poet speaks of inanimate nature sympathizing with, and feeling for, the pilgrims, the stars and sea listen, and the aisles of the forest echo to their anthem, the pines roar their welcome, and the eagle, as representative of the country, comes to receive them. This is truly their "welcone" to the new home.

The "strength" and "force" of this stanza is secured by its figurativeness, the personal metaphor, that is, the inanimate objects are given the attributes of persons. The stars heard, the aisles rang, the pines roared.

## STANZ. IV.

"Hoary hair." White hair, showing their great age.
"Pilgrim band." This means sojourners in a foreign land. They were before called a "band of exiles."
" Wither here." This means to die here. This thought is introduced to show the self-sacrificing spirit of the old men, for, while the young men might have bright hopes for the future in this new land, such hopes were denied to these old people, who could look forward to nothing but death.
"Childhood's land." England is meant.
"Woman's fearless eye." The women, with more faith than the men, had firm confidence in the future, and are, therefore, described as having "fearless eyes." You will also notice how the visidness of the picture is increased by the definiteness of the description, "woman's fearless eyes.' Substitute the general term, "brave women," and note the result.
"Lit by deep love's truth." " "Lit means illuminated and "deep love's truth" is her faithfulness to husband and to God.
"Manhcoa's brow serenely high." This line $s$ 'ggests the confidence oi men, in the prime of li.e, to overcone a. 1 their difficulties.
"Fiery heart of youth." The impulsive, passionate spirts of the young.
The persons are introduced in a natural order. First, the weak, old men; next, the faithful women; and, last, the confident and impulsive men and yot ths.

## STANZA V.

An autho: always gains strength or force by putting thoughts in the interrogative form. Thus, "What sought they thus afar? bright jewels of the mine?" is far more forcible than the declaratory form of the same thought, "They did not seek the jewels of the mine." You will notice that no answers are expected to these sentences. They are only interrogatory in form, not in meaning. Such sentences are called "rhetorical questions," and they are used to give strength and vigor to the author's style.

The author probably refers to the Spanish, who in South and Central America sought the wealth of the mines, and to the French, who, in Canada and Newfoundiand, sought the wealth of sea and forest.
"Bright jewels of the mine" refers to the gold and silver, and, it may be, precious stones.
"Wealth of seas " refers to pearls, etc., got from the sea.
"Spoils of war." Plunder obtained in war.
The dash is used after "war" to show the complete change of sense. From stating what they did not seek the poet turns to state what they did seek, "A faith's pure shrine."
"Faith's pure shrine." A place of sacred worship.
The force of these two lines consists in the "rhetorical questions."
"Call it holy ground." They coald call it holy ground because there they had freedom.
"Left unstained." They found there freedom, and they left it "unstained," that is, they allowed every person complete freedom.

This is true of the "pilgrims," but is not true of the "Puritans," who followed them in Massachusetts, and who persecuted those who would not do as they thought was right.
"Freedom to worship God." This phrase is in apposition with (that is, it means the same as) "what they had found."

## Composition.

Owing to the great success and the many letters acknowledging the helpfulness of our last rep-oduction story, "The Sleeping Apple," we this issue give another. Let every boy and girl try. Write the story in your own words, and send the best results in for publication.

## The Glow Worm.

"Of what use is my light or who sees it down here ir the grasses?" sighed the glow worm. "If I could shine up there in the sky now like that beautiful moon or the stars, or even if I could fly about in the arr as the fireflies do, I might brighten the world a little, but what good can I do here?
-"I will curl myself up here and sleep and nobody will miss me."

So the glow worm lay in his bed two whole nights and days.
"Heigho!" he sighed at the end of the second day, "I am tired of this. I believe I will light my lamp to-night and go out once more for a stroll.;
"Oh, here you are!" cried the cricket. "I missed your light last night, didn't enjoy my practising half as much as usual."
" Glad to see you !" cried the daisies and grasses. "The fireflies flit over our heads, but no one but yourself thinks of lighting our feet. Where have you been?"
"Oh, we are so glad that you have come!" cried a voice, and the Canada lilies rang a merry chime to welcoméhim. "We are so glad you" have come. We know the stars are overhead and the fireflies fitting about above us, but we cannot see them, for we cannot lift up our heads, our necks are so slender. So you see we always watch for your cheery light down in the grass. You light up our" faces, too, and make them almost as beautiful as the daylight does ;" and all the li'y bells pealed another chine gay enough for a fairy wedding.
"Well, well!" thought Glow Worm, "I will let my light shine after this; there is something for every one to do."

## Physiology.

Below we give ten carefully-graded questions for the Entrance class.

1. Describe the evil effects of the habitual use of alcoholic dilinks on the blood.
2. Give three reasons why we should be total abstainers from intoxicating drinks.

3. What three good reasons are there why all persons, and more especially young persons,should not use tobacco in any form?
4. Name the three chief circulatory organs, and describe each.
5. In case of a cut, from which blood is freely flowing, how can you tell whether a vein or an artery is severed? Which is the more dangerous to wound, and why? How should we treat each ?
6. How does alcohol affect the circulation ?
7. How would you deal with fainting, scalds, burns, bruises?
8. Explain how the blood becomes impure, and how it is again made pure.
9. What should be done with a person apparently drowned, until the doctor comes?
10. Show how the ventilation of a room affects the purity or impurity of the blood.

## ANSWERS TO QUESTIONS IN OUR LAST ISSUE.

I. (a) The heart is enveloped in a fibrous case known as the pericardium. This is lined with a membrane which secretes a fluid called serum, which permits the heart to move fietly and without friction. (b) Elasticity of the ar:eries enables them to accommodate themselves to the various movements of the body; the tough, fibrous material of the walls enables them to sustain impulses of the heart withoit rupture.
2. Tight-lacing contracts the spare whicli the lungs occupy, and does not give them room to expand to their full extent.
3. Because fresh air is more healthful and the excitement of contention is more stimulaling.
4. Nitrogenous.-fibrin, casem, and albumen. Non-nilrogenous.-fat, sugar, starch.
5. Because the skin is another organ of excretion, the activity of which is increased by active perspiration.
6. (a) To furnish a passage for the blood from the right ventricle into the lungs; to convey certain products of digestion to the liver from the blood vessels of the intestinal villi.
7. It irritates and weakens the action of the heart.

## Arithmetic.

Test examination for the Entrance class. Answers will be given in our next issue.
I. (a) $7 / 8$ is what per cent. of $4 / 8$ ?
(b) What is $1 / 3$ of I per cent. commission ?
(c) What fractional part of anything is $16^{2 / 3}$ per cent.?
(d) What per cent. of $\$ 60$ is $\$ 45$ ?
(e) What decimal part of a number is $3 / 8$ per cent.?
2. A, after he has done $3 / 8$ of a work alone in 6 hours, is assisted by B , and together they finish the work in 4 more hours; in what time could B alone do the work?
3. Find the sum, difference, and product of 1.001 and .001; and divide .0045 by .09 of 900 . Give answers in decimal form.
4. I sell goods for $\$ 12$ and gain 20 per cent. What per cent. would I have gained or lost bad I sold them for $\$ 11$; and for $\$ 8$ ?
5. I insure my house for $\$ 2,000$, my furniture for $\$ 800$, and my books for $\$ 200$, paying $\$ 24$ for a a three years' policy. What was the rate per annum?
6. An agent receives $\$ 9.33$ for selling goods at $1 / 2$ per cent. commission. How many dollars' worth did he sell?
7. Toronto, June 19th, 1890. W. A. Simpson borrows $\$ 450$ from H . Gibson, and gives his note at 3 months in payment. Interest at 7 per cent.
(a) Write the note, and make it payable to order.
(b) When will it be due ?
(c) What will be the amount at maturity?
8. What will it cost to plaster a room 25 feet by 18 feet and 15 feet high, at 20 cents per square yard, allowing $1 / 10$ off for doors and windows?
(9) Find the cost of excavating a cellar 6 feet deep for a house 25 feet by 4 feet at 15 cents per cubic yard for the first 3 feet in depth, and 20 cents per cubic yard for the remainder.

ANSWERS TO QUIESTIONS IN OUR LAST ISSUE.
I. A factor is a number which will divide the given number.

A multiple is a number which wall contain the given number.

A measure is a number which will divide the the given number.

It will be readily seen that the product of the G.C.M. and the L.C.M. of two numbers must be equal to the product of the numbers.
2. $\mathrm{I} 47 \frac{601}{1830} ; 3,5,0$ o lbs ; 4, 92.5625; 5, 19 of a


## SOLUTIONS.

6. To lose so per cent., you must get 90 per cent. of cost.

To gain $121 / 2$ per cent, you must get $1121 / 2$ per cent. of cost.
$\therefore 90$ per cent. of cost is $\$ 3,200$.
And $112 \frac{1}{2}$ per cent. of the cost is $\frac{3200 \times 112 \frac{1}{2}}{90}$ $=\$ 4,000$.
7. $\$ 100$ in $41 / 2$ years at 8 per cent. simple interest amounts to $\$ 136$.
$\therefore 136$ is the amount of $\$ 100$.
And 1,200 is the amount of $\frac{100 \times 1200=}{136}=$ $\$ 882.35{ }^{\frac{5}{17}}$.

## Spelling.

The following twenty-five words were chosen from a weekly paper and will be found useful for a spelling test. Get your class to prepare a set of twenty-five. Send your best results in for publication. Give date and name of paper, also pupil's name, S. S., township, and county. Address Editor Entrance Journal, if $1 / 2$ Richmond Chambers, Toronto.

| 1. author. | 13. texts. |  |
| :--- | :--- | :---: |
| 2. edition. | 14. corrupt. |  |
| 3. autobiography. | 15. valid. |  |
| 4. prefaced. | 16. peremptory. |  |
| 5. reminiscences. | 17. inhabiting. |  |
| 6. century. | 18. intense. |  |
| 7. elements. | 19. revision. |  |
| 8. permanent. | 20. majority. |  |
| 9. endeavor. | 21. intrench. |  |
| Io. policy. | 22. effective. |  |
| 1I. disfranchise. | 23. victin. |  |
| 12. conservative. | 24. significant. |  |
| 25. restriction. |  |  |

## English.

The pupils of this grade should be carefully taught paragraph-writing. The following exercises, taken from "The Problem of Elementary Composition,' Spalding, published by D. C. Heath \& Co., Boston, which may be had through this office, and which The Journal can most confidently recommend to all its readers, will be found very useful to those who have not had pleasure from the composition hour.

Suppose you select for the topic of a paragraph, "It was a beautiful morning," and you proceed to question the class about the morning until you get the following data : a soft air, a warm sun, swelling buds, crocuses, and snowdrops in garden, and suppose this list to have been written on the blackboard.
Now we may connect this data and form a simple paragraph, thus:
" It was a beautiful day in early spring, with a soft air and a warm sun. Buds had begun to swe'l on many of the trees, and, in some sunny gardens crocuses and snowdrops were up. It was just the day for our ride up the river."

Try this plan with your class. Write paragraphs on the following.

1. A beautiful autumn day.
2. A beautiful winter day.
3. A beautiful orchard.
4. The river presented a picturesque appearance.
5. The black well (ink well).
6. The $k$ tchen looked inviting.
7. A sunset on the lake.

Send in the best results for publication. Give S. S., township, county, and pupil's name. Address Editor Entrance Journal, it $1 / 2$ Richmond Chambers, Toronto. If any teachers find this remarkably successful, please send in the complete development of the paragraph, that is, the questions asked, data received, and best resulting paragraphs.

## Public School Leaving.

## LITERATURE-_" GO WHERE GLORY WAITS THEE."

QUESTIONS TO BE ANSWERED IN OUR IIEXT ISSUE.

1. In a phrase or short sentence express the main idea contained in this poem.
2. Into how manv natural divisions mav the poem be separated? State the subject of each. Show that a natural order has been observed in their introduction.
3. Who is supposed to be speaking in the poem? And to whom? Why was this form adopted in the pnem?
4. Upon what does the chief merits of this poem rest? Explain and exemplify fully.

STANZA I.
" Go where glory waits thee." Who is supposed to be speaking in this verse? Quote from the poem in support of your answer. For whom does "thee" stand? Write the verse in your own words.
"Fame elates thee." What is meant ?
"Meetest." Supply another word meaning the same.

## STANZA II.

"Rovest." Which do you prefer here, "Rove," "Stray," or "Ramble," and why?
"Star thou lovest." What is the force of this phrase?
"Bright we've seen it burning." Why is this line introduced?
"Summer closes." What is meant?
"Lingering roses." What is there beautiful in this use of the word "lingering"?
"Her who wove them." Explain fully.
STANZA 111.
"Gay health." Why is "gay" an appropriate word?
"Music, stealing all the soul of feeling." Explain fully.
"Draw one tear from thee." What is meant?
"Let memory bring thee." Put this in your own words.
"Strains." What does this mean?

## ARITHIETIC.

Exumination test for the leaving class. Answers and solutions in our next issue.
I. Simplify $\left\{2 \frac{1}{2} \times 4.75 \div \frac{9}{2}\right.$ of $\left(4 \frac{3}{4}-3^{\frac{2}{5}} \frac{5}{5}\right)+\frac{1.75}{3 \frac{1}{2}}+$ $\left.\frac{4 \frac{3}{10} \times 2 \frac{7}{10}}{21.5 \times 13 \frac{1}{2} \div .25}\right\}$ of ( $3 \frac{4}{8} \times \frac{9}{62} \div .9$ ) of $£ 5,165$., 8d.
2. A Toronto dealer sent his agent in Montreal 3,000 bushels of wheat, which was sold at $80 c$ a bush. The agent deducted his commission and also a 4 per cent. commission in advance on tea purchased for his employer. The two comnissions amounted to $\$ 200$; find the rate of the first one.
3. A man invested 40 per cent. of his capital in $31 / 2$ per cent. stock at 90 , and the remainder in 4 per cent. at 95 , and his income was $\$ 1,745$ per year. What was the amount invested ?
4. A dealer shipped 200 barrels of apples to Liverpool, the cost being $\$ 3.75$ per barrel. For what sum must he have the apples insured at $9 / 10$ per cent. pre. to guard against all loss in case of shipwreck, his other expenses being $\$ 75$.
5. A note for $\$ 876$, dated April 2oth, for 90 days, and bearing interest at 6 per cent. per annum, is discounted at the bank on May toth at 7 per cent. Find the proceeds.

## ANSWERS TO QUESTIONS IN OUR LAST ISSUE.

1, Book Work ; 2, \$244.16; 3, \$5.60; 4, \$400-, $\infty 0 ; 5, \$ 4$ per gallon ; 6, A., $\$ 240$; B., $\$ 250$; C., $\$ 240$.

## GRAMMAR.

Both the Entrance and the Leaving class will find work suitable to them in this column. We intend to fully treat the parsing of each part of speech as the noun is treated below.

You will find dividing the work into the four heads given below very helpful to the class. Then if the pupil is asked to give "The Relation and

Function," or "The Classification and Inflection," of certain words, he can readily use the columns asked for, and omit the others.

## NOUN.

Relation: A noun may have for its relation,-

1. A verb, as John runs, or I struck John.
. A preposition, as he came to town.
2. A noun, as Milton, the poet, was blind.
3. Or a noun may stand in no relation to any other word,

As Spring returning, the swallows appear, or,
Plato, thou reasonest well.
Classification: A noun may be classified according to its meaning into, -

1. Proper and common.
2. Abstract and concrete.
3. Collective, gender, and diminutives.

And according to form into,-

1. Simple, derived, and compound.

Inflection: The inflections of the noun are,-
I. Number and case.

Function. - The functions or uses of the noun are,-
I. A noun may be used subjectively, as, John ran away.
2. A noun may be used objectively, as, He struck fames.
3. A noun may be used attributively, as, John's cap is torn.
4. A noun may be used appositively, as, Milton, the poet, was blind
5. A noun may be used predicatively, as, Iron is a metal.
6. A noun may be used absolutely, as, Spring returning, the swallows appear.
7. A noun may be used adverbially, as, He came home.
8. A noun may be used as the nominative of address, as, Plato, thou reasonest well.

Never be guilty of classifying nouns into proper, common, and abstract. Proper and common is a complete classification, that is, it embraces all nouns. All nouns are either proper or common. Abstract and concrete is also a complete classification. For the distinctions between them see High School Grammar, chapter V., section 24. Collectives, gender, and diminutives is not a perfect classification, as all nouns are not embraced under these heads. In classifying the noun man, we should say " Man is a common, concrete, gender noun. (Man, woman)."

For what nouns are gender nouns, and what nouns are not, see High School Grammar, chapter V., section 14: Note that only nouns occurring in pairj, as boy, girl, or hero, heroine, are gender
nouns. Discuss the question, "Is gender a matter of derivation or of inflection?"
We used to say the inflections of the nouns were person, gender, number, and case. Why have person and gender been left out? Note that an inflection is "A change in the form of a word to show a difference in meaning or in use." There are no different forms of the English noun to show a difference of person.

The function column is by far the most important. For full treatment of :

Attributive use, see High School Grammar, chapter xiii., sections 62,64 , and 59 .

Appositive use, see High School Grammar, chapter xiii., section 57 .

Predicative use, see High School Grammar, chapter xiii., section 24 .

Absolute use, see High School Grammar, chapter xiii., sections 79 and 80 .

Adverbial use, see High School Grammar, chapter xini., section 73 .

The examples given below may make this treatment of the noun plain.

In the following sentences parse the italicized nouns:

1. Jane looked an angel.
2. The master taught the boy grammar.

3, My friend, the soldier, was born in Canada.
4. John's horse ran home.
5. They sat side by side.
6. Cassius, I am armed in honesty.
. Jane. Relation-Jane looked.
Classification-Noun, common, concrete, simple.
Inflection-Singular number, nominative case.
Function-Used subjectively, the subject of looked.
Angel. Relation-looked argel.
Classification-Noun, common, concrete, simple.
Inflection-Singular number, nominative case.
Function-Used predicatively, helping to make the assertion, looked an angel, and meaning the same as Jane.
2. Boy. Relation-Taught boy.

Classification--Noun, common, corcrete, gender noun (boy, girl), simple.
Inflection-Singular number, objective case.
Function--Used adverbially, the indirect object of taught,
Grammar. Relation-Taught grammar.
Classification-Noun, common, concrete, simple.

Inflection--Singular number, objective case.
Function-Used objectively, the direct object of taught.
3. Soldier. Relation-Friend soldier.

Classification-Noun, common, concrete, simple.
Inflection-Singular number, nominative case.
Function-Used appositively, in apposition with friend.
4. John's. Relation-John's horse.

Classification - Noun, proper, concrete, simple.
Inflection--Singu'ar number, possessive case.
Function-Used attributively, modifying horse.
Home. Relation-Ran home.
Classification-Noun, common, concrete simple.
Inflection--Singular number, objective case.
Function-Used adverbially, the adverbial object of ran.
5. Side. Relation-None.

Classiñcation-Noun, common, abstract, simple.
Inflection -.. Singular number, nominative case.
Function-Used absolutely, depending on the participle being (understood).
6. Cassius. Relation-None.

Classification-Noun, common, concrete simple.
Inflection-Singular number, nominative case.
Function-Useti as a nominative of address.

## WILLIAM EWART GLADSTONE.

Mr. Gladstone is beyond question the greatest English statesman who haz appeared during the reign of Queen Victoria. From the point of view of the influence gained by intellectual and moral, as well as purely states:nanlike qualities, he is the foremost man in the world to-day. He is an Englishman by birth, having been born in Liverpool on the 29th of December, 1809 . But be is a Scotchman by descent, his father, Sir John Gladstone, Bart., having been descended from an old Scottish family named Gledstanes. Mr. Gladstone was educated at Eton and at Christ Church, $\mathrm{Ox}^{-}$ ford, graduating in 1831 with highest honors in both classics and mathematics (a double first). He entered Parliament in 1832, in the first election after the passage of the Reform

Bill, as Tory member for Newark, a "pocket" borough of the Duke of Newcastle. With the exception of about a year and a half, he sat continuously in the House from that date until March, 1894, when he retired on account of his advanced age, though his mental force was and is still seem ingly unabated. His exceptional political abilities gained speedy recognition, as may be seen from a bare enumeration of the successive stages through which he rose from office to office, until, on December 9th, 1868 , he reached the highest dignity attainable by a British subject-that of Prime Minister. These stages were as follows : $1834-5$, First Junior Lord of the Treasury, then UnderSecretary for the Colonies; 1841, Vice-President


Board of Trade ; 1843, President Board of Trade, with seat in the Cabinet; $1845 \cdot 6$, Secretary of State for the Colonies; 1852, Chancellor of the Exchequer ; the latter office, in which he achieved some of his most wonderful successes, he held first in Lord Aberdeen's Coalition Ministry (Whigs and Peelites) ; again, for a few weeks, in Lord Palmerston's Liberal Ministry, in 8855 ; and a third time --after an interval, during which he was sent by the Conservative Ministry on a special mission as Lord High Commissionter Extraordinary to the Ionian Isles-in the Ministry of Lord Palmerston and Earl Russell, from 1859 to 1866 . During this latter term, after Lord Palmerston's death, he was leader of the House of Commons. He was Prime Minister of England no less than four times, viz.:

December, 1868, to February, 1874 ; April, I880, to June, 1885 ; February to July, 1886 ; and August, 1892, to March, 1884, when, as above noted, his final retirement took place. During these periods the history of his Ministries is the history of the British Empire. In one respect his political history is probably unique. Entering Parliament as a pronounced Tory, his whole course was one of more or less gradual mental transition, until he became the most powerful exponent of that advanced Liberalism with which his name has been so closely identified for many years past. Some of the most Radical measures, such as the disestablishment of the Irish Church, the later Reform bills, the two defeated bills for giving Home Rule to Ireland, etc., were, directly or indirectly, his, in large measure. Notwithstanding his herculean political labors and achievements, Mr. Gladstone's literary studies and productions have been extensive enough, one would think, to have employed to the full the energies of any ordinary man. Of his classical and theological writings and researches, his voluminous contributions to magazines, and the more permanent works which have been added to English literature by his pen, we have no room to speak. Take him all in all, his name cannot fail to go down to future ages as that of one of the most wonderful men in all history, and one no less conspicuous for unimpeachable integrity and exalted virtue than for extraordinary ability.

## GEOMETRY.

The following questions will be answered in our next issue :

1. Distinguish between a problem and a theorem.
2. Distinguish between a postulate and an axiom.
3. When is a straight line said to be drawn at right angles, and when perpendicular to a given straight line?
4. Define a triangle. Show how many kinds of triangles there are according to the variation both of the angles and of the sides.
5. What two tests of equality are assumed in geometry
6. How would you cut off from a straight line, unlimited in both directions, a length equal to a given straight line ?
7. To form a triangle with straight lines, any two of them must be greater than the third. Is a similar limitation necessary with respect to the three angles?
8. Is it possible to form a triangle with three lines whose length are $\mathrm{I}, \sqrt{2}, \sqrt{3}$ ?
9. State the converse of the second case of Proposition 26 Book I.

## SIGHT LITERATURE .

Teachers of the P.S.L. work are aware that the paper on Literature is based partly on "sight work." To help the teachers with this part of their course The Journal will give in each issue a suitable passage for "sight" work, with questions thereon. Full answers will be given in our next issue. Allow your class to try without aid from you, and then compare their answers with those published.
Clear, placid Leman ! thy contrasted lake, With the wild world I've dwelt in, is a thing
Which warns me, with its stillness, to forsake Earth's troubled waters for a purer spring.
This quiet sail is as a noiseless wing
To waft one from distraction ; once I loved
Torn ocean's roar, but thy soft murmuring
Sounds sweet as if a sister's vorce reproved,
That I with stern delights should e'er have been so moved.

It is the hush of night, and all between
Thy margin and the mountains, dusk, yet clear, Mellowed and mingling, yet distinctly seen,
Save darkened Jura, whose capt heights appear
Precipitously steep; and, drawing near,
There breathes a living fragrance from the shore,
Of flowers yet fresh with childhood ; on the ear
Drops the light drip of the suspended oar,
Or chirps the grasshopper one good-night carol more.

He is an evening reveller, who makes His life an infancy, and sings his fill;
At intervals, some bird from out the brakes
Starts into voice a moment, then is still.
There seems a floating whisper on the hill, But that is fancy, for the starlight dews All silently their tears of love instil, Weeping themselves away, till they infuse Deep into nature's breast the spirit of her hues. -Byron.
I. Give in a single phrase or short sentence the subject of this extract.
2. What does the extract itself reveal of the circumstances of time, place, and mood under whicb it was written? Quote from the extract in support of your answer.
3. What does the extract itself reveal of the personality of the author?
4. "Byron showed by his earlier works that a vivid interpretation of nature was by no means inconsistent with correct versification, and by his later works that fidelity to nature must far transcend mere correctness of expression." In your
opinion, is this estimate of Byron as a poet established by this extract? Point out reasons for your answer.
5. "Byron was intensely subjective." Point out proof of this from the extract.
6. "Warns me to forsake

Earth's troubled waters for a purer spring.' :
Write this in your own words.
7. Explain: "Capt heights," " breathes a living fragrance," " lowers yet fresh with childhood,"
"starts into voice a moment," " floating whisper,"
"tears of love," and " nature's breast."
8. What would the whisper spoken of in "floating whisper" be?

What is the connection in sense between:
"For the starlight dews
All silently their tears of love instil, Weeping themselves away till they infuse Deep into nature's breast the spirit of her hues, ${ }^{\text {," }}$
And
" There seems a floating whisper on the hill, But that is fancy"?

## PHYSIOLOGY.

Below we give eight carefully graded questions of physiology and hygiene, which will be found adapted to this grade.

1. Name the organs of respiration and the results accomplished by respiration.
2. What is animal heat? Why is animal heat better maintained when we breathe pure air than when we breathe foul air?
3. Name the three different organs or parts of the body which are composed largely of cartilaginous tissue.
4. Of what chemical elements are the living tissues, when analyzed, found to be composed? How does exercise affect digestion? respiration?
5. How many and what are the vital organs?
6. Give four important hygienic rules that pupils should be taught to observe.
7. Describe the effects of alcoholic liquor on the heart and smaller blood vessels.
8. What are stimulants? What are narcotics? Is the same thing ever both a stimulant and a narcotic? Give examples.

## COMPOSITION.

First preparing an outline or plan, and attaching it to your composition, write the story suggested by the lines quoted below :
Up this seashore, in some briars, Two guests from Alabama-two together,

And their nest, and Your light green eggs, spotted with brown,
And every day the she-bird, crouched on her nest, silent, with bright eyes ;
And every day 1 , a curious boy, never too close, never disturbing them,
Cautiously peering, absorbing, translatıng.

Till of a sudden,
May-be killed unknown to her mate,
One forenoon the she-bird crouched not on her nest
Nor returned again that afternoon, nor the next,
Nor ever appeared again ;
And thenceforward, all summer, in the sound of the sea,
And at night, under the full moon, in calmer weather,
Over the hoarse surging of the sea,
Or flitting from briar to briar by day,
I saw, I heard at intervals, the remaining one, the he-bird,
The solitary guest from Alabama.

## - Walt Whitman.

We shall ever be glad to receive work from our boy and girl readers. This is your paper ; use it.

## BOOKKEEPING.

This issue we reproduce the P.S.L. Bookkeeping paper for 1896 ; in following issue it will be fully answered. Each issue of The Journal will contain an exercise in bookkeeping solved. We hope this will prove useful to our readers.

Work the following set in single entry, using daybook, cash book, and ledger :

Toronto, 1896.
January ist. I bought out the plant and goodwill of C. Tedford's blacksmith shop for $\$ 300$, paying him $\$ 100$ cash and giving him my note, endorsed by P. Johnson, for the balance, payable at the Molsons Bank here in three months without interest. I also rented the shop from C. Tedford at $\$$ io per month.

January 2nd. Removed 4 horseshoes (4) roc. each, set 3 new shoes @ 25 c . each, and repaired a cutter, $\$ 1.25$, for L. Turnbull. The cash receipts to-day were $\$ 3.25$.
January 3rd. Set 4 new shoes © 25 c . each, and made a set of gate hinges, 75 c ., for R. Beattie. The cash receipts to-day were $\$ 2.50$.

January 4th. Bought of Harland Bros., coal and iron as per invoice, $\$ 25.75$. The cash receipts to-day were $\$ 3.75$.

January 6th. Ironed a cutter for Harland Bros., $\$ 8.25$, and set 7 new shoes at 25 c. each for $L$. Turnbull. The cash receipts to-day were $\$ \mathbf{2} .25$. Hired a horse and cutter from L. Turnbull, $\$ 1.25$.

January 7th. Repaired a cutter, $\$ 2.25$, and a cooking range, 75 c ., for R . Beattie. The cash receipts to-day were $\$ \mathrm{I} .75$.

January 8th. The cash receipts to-day were $\$ 5.75$.

January 9th. R. Beattie gave me his check, payable to my order, on the Molsons Bank here, for the amount of his account. The cash receipts to-day were $\$ 4.85$.

January roth. Removed 7 shoes @ Ioc. each and set I new shoe @ 25 c . for L. Turnbull ; and bought of him old iron at 75 c . The cash receipts to-day were $\$ 4.25$.

January ifth. L. Turnbull gave me an order on Harland Bros. for the amount of his account. The cash receipts to-day were $\$ 2.75$.

January 15 th. Sold the plant and good-will of the shop to W . Seeley for $\$ 350$, receiving $\$ 200$. cash and his note for $\$ \mathrm{I} 50$, payable in two months.

Paid C. Tedford half a month's rent, and he agreed to accept W. Seeley as tenant in my stead.

## GRAMMAR.

The following questions will be fully answered. in our next issue :

The task was left to whittle thee away
With his sly scythe, whose ever-nibbling edge Noiseless, an atom, and an atom more, Disjoining from the rest, has unobserved Achieved a labor which had far and wide, By man performed made all the forest ring."

> -Cowper, "Address to Yardley Oak."

1. Divide into clauses, and give the classification and relation of each.
2. Classify the prepositional and infinitive phrases according to their granmatical value, and give the relation of each.
3. Classify the following words as parts of speech, and give the relation of each : Noiseless, more, disjoining, unobserved, wide, performed, ring.
4. Is had made indicative or subjunctive? Give your reasons.
5. Is forest the object of had made, or the subject of ring? Give your reasons, and show clearly by other examples that the infinitive mood may have a subject in the objective case

## Fntermediate $\mathbb{D} \cdot \mathfrak{T}$. Department.

Designed specially for teachers of Second and Third Class.

## SELECTIONS FROM TENNYSON.

## M. A. WATt.

Many of Tennyson's poems are very well suited to be used in our supplementary reading tor even young children, and I have selected several which will be easily read and understood by juvenile students of literature. They read those we have in the readers with good appreciation, and will, no doubt, be pleased to learn others if they are properly introduced to them.

> FROM "IN MEMORIAM," CXI.

The churl in spirit, up or down,
Along the scale of ranks, thro' all,
To him who grasps a golden ball,
By blood a king, at heart a clown ;
The churl in spirit, bowe'er he vell
His want in forms for fashion's sake,
Will let his coltish nature break
At seasons thro' the gilded pale :
For who can always act? but he
To whom a thousand memories call,
Not being less but more than all
The gentleness he seemed to be,
Best seemed the thing he was, and joined
Each office of the social hour
To noble manners, as the flower
And native growth of noble mind ;
Nor ever narrowness or spite,
Or villain fancy fleeting by,
Drew in the expression of an eye,
Where God and nature met in light ;
And thus he bore without abuse
The grand old name of gentleman,
Defamed by every charlatan,
And soiled with all ignoble use.
"Flower in the crannied wal!, I pluck you out of the crannies ;-Hold you here, root and all, in my hand, Little flower-tut if I could understand What you are, root and all, and all in all, I should know what God and man is."

The frost is here
And fuel is dear,
And woods are sear,
And fires burn clear,
And frost is here
And has bitten the heel of the going year.

Bite, frost, bite !
You roll up, away from the light,
The blue wood louse and the plump dormouse,
And the bees are stilled, and the flies are killed, And you bite far into the heart of the house, But not into mine.

Bite, frost, bite !
The woods are all the searer,
The fuel all the dearer,
The fires are all the clearer,
My spring is all the nearer.
You have bitten into the heart of the earth, But not into mine.

NOTHING WILL DIE.
When will the stream be aweary of flowing Under my eye?
When will the wind be aweary of blowing Over the sky?
When will the clouds be aweary of fleeting ?
When will the heart be aweary of beating? And nature die?
Never, O never ! nothing will die :
The stream flows,
The wind blows,
The cloud fleets,
The heart beats,
Nothing will die.

IN THE CHILDREN'S HOSPITAL. EMMIE.
I.

Our doctor had called in another, I never had seen him before,
But he sent a chill to my heart when I saw him come in at the door,
Fresh from the surgery schools of France and of other lands-
Harsh red hair, big voice, big chest, big merciless hands !
Wonderful cures he had done, $O$ yes, but they said, too, of him,
He was happier using the knife than in trying to save the limb.
And that I can well believe, for he looked so coarse and red,
I could think he was one of those who would break their jests on the dead,
And mangle the living dog that had loved him and fawned at his knee-
Drenched with the dreadful oorali-ihat ever such things could be !

## II.

Here was a boy-I an sure that some of our children would die
But for the voice of love, and the smile, and the comforting eye一
Here was a boy in the ward, every bone seemed out of its place-
Caught in a mill and crushed-it was all but a hopeless case :
And he handled him gently enough ; but his voice and his face were not kind,
And it was but a hopeless case, he had seen it and made up his mind.
And he said to me roughly, "The lad will need little more of your care."
"All the more need," I told him, "to seek the Lord Jesus in prayer ;
They are all His children here, and I pray for them all as my own."
But he turned to me-"Ay, good woman, can prayer set a broken bone?"
Then he muttered half to himself, but I know that I heard him say,
"All very well-but the good Lord Jesus has had His day."
iII.

Had ?-has it come ? It has only dawned. It will come by and by.
Oh, how could I serve in the wards if the hope of the world were a lie?
ow could I bear with the sights and the loathsome smells of disease
But that He said, "Ye do it to me when ye do it to these"?
iv.

So he went. And we passed to this ward where the younger children are laid:
Here is the cot of our orphan, our darling, our meek little maid;
Empty, you see, just now ! We have lost her, who loved her_so"much-
Patient of pain, tho' as quick as a sensitive plant to the touch ;
Hers was the prettiest prattle, it often moved me to tears,
Hers was the gratefullest heart I have found in a child of her years-
Nay, you remember our Emmie; you used to send her the flowers;
How she would smile at 'em, play with'em, talk to 'em hours after hours !
They that can wander at will where the works of the Lord are revealed
Little guess what joy can be got from a cowslip out of the field;

Flowers to these "spirits in prison" are all they can know of the spring,
They freshen and sweeten the wards like a waft of an angel's wing ;
And she lay with a flower in one hand and her thin hands crost on her breast-
Wan, but as pretty as heart can desire, and we thought her at rest,
Quietly sleeping-so quiet, our doctor said, " Yoor little dear,
Nurse, I must do it to-morrow ; she'll never live thro' it, I fear."
v .
I walked with our kindly old doctor as far as the head of the stair,
Then I returned to the ward; the child didn't see. I was there.
vi.

Never since I was nurse had I been so grieved and so vext !
Emmie had heard him. Softly she called from her cot to the next :
"He says I shall never live thro' it, O Annie, what shall I do?"
Annie considered. "If I," said the wise little Annie," was you,
I should cry to the dear Lord Jesus to help me,for, Emmie, you see,
It's all in the picture there: ' Little children should come to me.'"
(Meaning the print that you gave us, I find that it always can please
Our children, the dear Lord Jesus with children about His knees.)
'Yes, and I will," said Emmie ; "but then, if I call to the Lord,
How should he know that it's me? such a lot of beds in the ward!"
That was a puzzle for Annie. Again she considered and said:
"Emmie, you put out your arms, and you leave 'em outside on the bed-
The Lord has so much to see to : but, Emmie, you tell it Him plain :
It's the little girl with her arms lying out on the counterpane."

## VII.

I had sat three nights by the child-I could not watch her for four.
My brain had begun to reel ; I felt I could do it no more.
That was my sleeping night, but I thought that it never would pass ;
There was a thunder-clap once, and a clatter of hail on the glass,

And there was a phantom cry that I heard as I tost about,
The motherless bleat of a lamb in the storm and the darkness without.
My sleep was broken besides with dreams of the dreadful knife,
And fears for our delicate Emmie, who scarce would escape with her life;
Then, in the gray of the morning, it seemed she stood by me and smiled,
And the doctor came at his hour, and we went to see the child.

> ©vint.

He had brought his ghastly tools; we believed her asleep again-
Her dear long, lean little arms lying out on the counterpane.
Say that His day is done! Ah, why should we care what they say?
The Lord of the children had heard her, and Emmie had passed away.

These are a few selections out of many which crowded themselves upon my notice. A very good way of impressing them upon your class is to prepare them with a. view to having a "Tennyson afternoon," at which these may be recited, and the "Bugle Song," "Crossing the Bar," and other songs, may be sung, while one pupil reads an. original essay on "Tennyson."

## CAN THEY REASON? <br> S. Y. G.

Let your advanced pupils write answers to the following:
I. A limb of a tree, about ten feet from the ground, was broken near the tree, but was still hanging to the trunk. Around it was tied a piece of weather-beaten, broken rope, about two feet from the trunk. About the same distance above the limb, a similar fragment of rope was tied around the tree. How do you explain the phenomena?
2. If I unwind a yard of thread from a spool, and holding the spool firmly in one hand and the end of the thread in the other steadily pull on the thread until it breaks, and, if on repeating this fifty times or more I find that it always breaks near the middle of the yard thus put under tension, what two theories will account for the fact?
3. In case 1 unwind sections of irregular length, two feet, four feet, three feet, eighteen inches, etc., and still find the break occurs near the middle of the section, what do I conclude?

- 4 . Will the fact that the tree in No. I was a fruit tree or a maple tree affect the conclusion reached?
int 5. State three possible explanations of the finding of the bones of elephants in Arctic regions.

Which one of the three seems to you the more probable? Why?
6. A pair of car wheels are fastened firmly to an axle, so that when the axle turns the wheels turn. A rope is coiled several times around the middle of the axle, and comes off tangent to the lower side. If the rope is held in a horizontal position, and one should pull on it, would the wheels roll toward him or from him?
7. Suppose the rope is held at an angle of $45^{\circ}$ to the horizon, which way will the wheels roll when the rope is pulled upon?-Western Journal.

## SOME USEFUL EXERCISES.

Write the words of your last reading lesson in columns, making four columns. Arrange the words of your last reading lesson alphabetically; that is, copy first those words which begin with a, then with $b$, and so on. Arrange the words of your last reading lesson in columns, placing in the first column words of one syllable, in the second words of two syllables, and so on. Arrange the words of your last reading lesson in columns, placing in the first words of two letters, and in the second words of three letters, and so on. Copy from your reading lessons all the words beginning with capital letters. Copy from your reading lesson all the name words. Write on your slate the number of lines in your reading lesson. Write on your slate the number of periods in your reading lesson; the number of commas; of question marks; of semicolons ; of hyphens; of apostrophes.

## BUSV WORK IN NUMBER.

I. How many pupils in the schoolroom? If there were ten more how many would there be? If there were eight less?
2. How many panes of glass in one window? How many in all the windows?
3. Write the name of the month. How many days in the month? How many days in last month? How many in next month?
4. How many hours in a day? In two days?
5. Draw five lines across the slate, and draw five more lines across them. How many blocks on your slate?
6. How many children in the row you sit in? How many feet have you all? How many fingers? How many noses?
7. There are seven bones in each of your fingers, and two in your thumb. How many bones have you in one hand? In both hands?
8. Draw a clock on your slates. How many numbers on its face? In how many ways can you write the numbers? Make the hands 4 o'clock. Make them say noon. Midnight. Six o'clock.
9. How many meals do you eat in one day? How many in three? How many in a week?

Io. How many Sundays in this month? How many days, not counting the Sundays? How many school days?
11. How old are you? How old will you be in 1897? In 1900?
12. How many eggs in a dozen? In three dozen? What is the difference between two dozen and a half-dozen?-Wisconsin Journal of Education.

## ARITHMETIC EXERCISES.

## LESSON XCVII.

1. If John pays $\frac{\ddot{3}}{5}$ of a dollar for his breakfast, twice as much for his dinner, and $\frac{1}{4}$ as much for his supper as for his dinner, how much does he pay a week for his board?
2. Add $41_{4}^{3}, 72 \frac{4}{5}, 67 \frac{5}{6}$. From $108{ }^{7}$ take $98 \frac{4}{2}$.
3. How many squares 3 in . on a side can be cut from a board 12 ft . long and 9 in . wide?
4. How many years in 4,380 days?
5. Bought $\frac{1}{4}$ ream of paper at $\underset{\sim}{2}$ cent a sheet, what did it cost?

6 . $\frac{7}{9}$ of $\$ 8,645.94+\frac{3}{8}$ of $\$ 4,562.72-\frac{1}{7}$ of $\$ 9,-$ $876.30=$ ?
7. Write by the Roman Notation 530, I. 306 , 1,6I8, 5,46I.
8. It a pair of shoes cost $\$ 3.50$, how many pairs can be bought for $\$_{42}$ ?

## LESSON XCVHII.

I. At 10 cents an ounce what will $1 \frac{1}{4}$ lbs. of thubarb cost?
2. At 5 cents a foot, what will $15^{\frac{1}{2}}$ yards of wire cost ?
3. What must be paid for 4 tons and 6 cwt. of hay at $\$ 20$ a ton?
4. What will it cost to paint a board fence 6 ft . high and 63 ft . long at $\$ .35$ per sq. yd ?
5. A man has a farm of 80 acres, he planted 20 acres with corn; what part of his farm did be plant with corn? What per cent. of it? What per cent. remained for other purposes?
6. Bought 450 sheep at $\$ 4.75$ apiece, sold half of them for $\$ 5$ apiece, and the remainder for $\$ 20$ less than cost ; did I gain or lose, and how much?
7. The divisor is 1064 , the dividend $532 \times 864$, what is the quotient?

8 . If 24 oranges cost 48 cents, what will 96 oranges cost ?

## LESSON XCIX.

I. From three million nine thousand take two million eighty-six hundred and five.
2. If 15 apples are worth 25 cents, how much are 45 apples worth ?
3. A milkman buys 3 cans of milk, each containing 10 gallons, at 16 cents a gallon, and retails it at 3 cents a pint, how much does he gain ?
4. 15 per cent. of 120 are how many times $\frac{2}{3}$ of 9 ?
5. If 8 of a pound of raisins cost 10 cents, what will $2 \frac{1}{2}$ pounds cost?
6. If you have a quarter mile to school and walk home for your dinner, how many feet will you walk in a month of 20 days school?
7. Add $\$ 47 ., \$ 6.87, \$ .95, \$ 45.02, \$ 9 ., \$ 18.04$, and $\$ .79$.
8. At $\$ 2$ a yd., how many yds. of cloth can you buy for $\$ 4 \frac{4}{5}$ ?

## I.ESSON C.

I. A boy walked $15 \%$ miles the first day, $14 \frac{1}{2}$ the second, and $173_{3}^{2}$ the third, how far did he walk in 3 days?
2. Lucy picked $35 \frac{3}{8}$ quarts of berries in 3 days and her brother picked $24 \frac{4}{3}$ quarts in two days, how many more quarts did he pick in a day than Lucy?
3. 3 of 4 of $\frac{5}{1}$ of 72 cents are how many times $\frac{2}{3}$ of $\frac{3}{4}$ of $\frac{4}{5}$ of 10 cents?
4. Io per cent. of 40 chickens is $\frac{2}{5}$ of the number Willie has, how many has he ?
5. Frank exchanged 4 bushels of chestnuts at 6 cts. a quart for peanuts at 8 cts a quart, how many quarts did he get?
6. A fence is 96 rods long, how many inches is it long?
7. 640 weeks $=$ days $=$ hours $=$
8. 84 times $\$ 9177+16$ times $\$ 9.74-69$ times $\$ 97.63=$ ?
9. $(7364 \times 486) \div 972=$ ? $9876 \div 914=$ ?

1o. How much will it cost to plaster a room 24 ft . long, I 5 ft . wide, and I 2 ft . high, at $\$ .40$ per sq. yd.?-The Teachers' Institute.

## IRREGULAR PLURALS.

We'll begin with a box, and the plural is boxes.
But the plural of ox should be oxen, not oxes;
One fowl is a goose, but two are called geese,
Yet the plural of mice should never be meese.
You may find a lone mouse or a whole nest of mice,
But the plural of house is houses, not hice.
If the plural of man is always called men,
Why shouldn't the plural of pan be called pen?
Cow in the plural is cows or 'tis kine,
But a bow if repeated is never called bine, And the plural of vow is vows, never vine. If I speak of a foot and you show me your feet, And I give you a boot, would a pair be called beet?
If one is a tooth, and a whole set are teeth,
Why shouldn't the plural of booth be called beeth?
If the singular's this and the plural is these,
Is the plural of kiss k-e-s-e kese ?
One may be that and three may be those,
Yet hat in the plural should never be hose,
And the plural of cat is cats, and not cose.
We speak of a brother, and also of brethren,
But though we say mother, we never say methren ;
The masculine pronouns are he, his and him,
But imagine the feminine she. shis, and shim,
So the English, I think you all will agree,
Has the most awkwark spelling you ever did see.
--Selected.

## SIMPLE ERRORS.

1. He has got a very fine house.
2. You may have heard tell of my uncle.
3. There is no doubt but what he will come.
4. The servant cleared off the table.
5. The creek has overflown its banks.
6. James jumped off of the roof.
7. They calculate to leave the city to-morrow.
8. On which street does the man live on?
9. The door must be closed shut.

## Drimary $\boldsymbol{D}$ epartment.

READING: FURTHER SUGGESTIONS.

RHODA LEE.
r. Every lesson in phonic reading should be well prepared. I have found the following devices of great assistance :
(a) A Phonic Notebook. In this book, which should be of a fair size, devote a page to each sound. Make up lists of words, sentences, and suggestions for introducing and impressing the sound. Seat work may be noted. Review work should also receive a share of attention in the book.
(b) Reading Cards. All that is necessary for these is a supply of old concert tickets, or other cards, with blank backs. These are cut up into a convenient size, and on them is written a sentence or two, when sufficient words have been learnt. This is a much better plan for sight-reading than that of writing on a blackboard, Thirty cards will be sufficient for a class of ordinary size. No two stories should be exactly alike.
(c) Printed Stories. The successful teacher of reading should always be on the lookout for children's stories. They may be found in children's magazines, Sunday-school papers, daily papers, and elsewhere. They should be mounted on pasteboard, and kept in boxes arranged according to their difficulty. If trouble is experienced in obtaining such stories, use those that the children themselves write. Rewrite these on cardboard, adding, when possible, an illustration, and you will have excellent material for sightreading.
2. The teacher should not sound the the letters with the children. If she does she will not be able to detect errors that may be made by the pupils. Sound for them, but do not sound with them.
3. Avoid sounding the consonants too long. The contact of the organs of speech should be momentary. Bad habits are formed by allowing the children to drawel
out sounds such as those of $m s, l$, and others.
4. Pupils must do independent work. In the "eye problem" (recognizing words on the blackboard) each child must whisper the word or sentence to the teacher. Do not depend on answers from the class as a whole, for in that case the backward pupils are sure to depend on the others for assistance. In the "ear problem" (writing words on the slate) the teacher should examine every slate. If a little care and watchfulness be exercised, there need be no copying. Train the children to rely on themselves.
5. As soon as the pupils are familiar with all the small letters, capitals may be used, when proper.
6. After a few weeks of phonic teaching let the pupils have the First Reader in their hands. The first use made of it has already been described in an article on "Script and Print."
7. Review lessons should be given frequently. In general each new lesson reviews those given before, but sometimes a more definite form of review is desirable. It will be found convenient to keep on the blackboard a list of the letters taught the different classes, adding new ones as they are given.
8. A list of the unphonetic words should be kept on the blackboard. Exercises of various kinds calculated to impress these words should be given frequently.
9. As soon as practicable urge the children to read their story books at home. Occasionally they may bring them to school, on a Friday afternoon, for instance, and read to their teacher.
10. Difficult words may be divided into syllables, and diacritical marks used. This should be done when the word is first presented to the pupils, and it may be necessary to do so a second time, but afterwards the word should be recognized without any such aid. The only markings we have used are the dash denoting the long sound of the vowels ( $\bar{a}$ ), the cedilla denoting the soft sound of $c(\zeta)$, and the dot over the letter $g$ also to indicate the sound $(\dot{g})$. A letter which is silent is so characterized by having a stroke through it.

SEAT WORK IN READING.

| mat | Sam | station <br> rat |
| :--- | :--- | :--- |
| sent | present, etc. |  |

RHODA LEE.
I. Write words containing certain sounds.

Ex.-(a) Write ten words containing "sh."
(b) Write ten words containing "ar."
2. Find words in the reader containing a particular sound.

Ex.-Find and write out all the words containing " o ," containing " e ," etc.
3. Make as many words as possible out of the letters in the wheel. See Lesson IV.
4. Make words by prefixing letters to a syllable, such as it, et, ing, etc.

```
p-et
n-et
s-et
g-et
l-et, etc.
```

5. Affixing letters to a syllable to form words:

$$
\begin{aligned}
& \mathrm{mi}-\mathrm{t} \\
& \mathrm{mi}-\mathrm{x} \\
& \mathrm{mi}-\mathrm{st} \\
& \mathrm{mi}-\mathrm{nt} \\
& \mathrm{mi}-\mathrm{k}, \text { etc. }
\end{aligned}
$$

6. Prefixing and affixing letters to a syllable to form words :
en
r-en-t
b-en-t
sp-en-d
1-en--d
7. Make internal changes in a word. The word " pat" is given, and is changed as follows:
```
pat
pot
pit
pet
pest
past
pant, etc.
```

8. Make short words from long ones, such as Mediterranean, misrepresentation, and international:

Words from misrepresentation :

| mit | sat | tent |
| :--- | :--- | :--- |
| met | sap | stamp |

9. Make sentences with words containing some particular sound:

Words with which to form sentences: See, tree, bee, green, steep, deep, cheese.

Sentences formed:
I see a tree.
The tree is green.
I see a bee in the tree.
That is a steep hill.
The well is deep.
I have a bit of cheese.
10. Write sets of words on the blackboard. Do not name these, but ask the pupils to form sentences with them.

Words :
birds baby flowers butter saucer Fred Christmas garden pound milk crumbs stocking summer store cat

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## 'Ibints and•lbelps.

## SOME THINGS TO AVOID.

The study of human things unsuited to the physical development; for example, a young child cannot learn fine penmanship-it has not control of its muscles.

Or things unsuited to its mental development ; for example, grammatical definitions-in fact, all abstract definitions; avoid the whole brood of these.

Or searching for knowledge drawn at wrong sources; f,r example, second-hand knowledge. Pestalozzi's pupils were learning from a book about a window. One of the boys suygested studying the window itself. ("He is right," said Pestalozzi; " I am wrong.")

Causing over-effort; for example, bolding the attention of young children longer than fifteen minutes on one thing, as arithmetic. Dr. MacAlister relates a visit to a primary school in Philadelphia where the children were being drilled in arithmetic, all other studies being laid aside, the teacher declaring that she "would drill it into them if it took all day." Such wrongs are common!
Appealing to improper motives; as offering prizes to the one who should learn the most verses in the Bible. This is one of the most common errors. Gold watches, gold medals, and the whole business of prize-giving, is to be rondemned. Let the teacher ask if Jesus graded His disciples ac. cording to the amount each could recte of His Sermon on the Mount. The old "marking system," for the purposes it was once used, is bound to disappear; pupils were forced to sudy to get good marks. General Granis marks at West Yoint were such, according to his teachers, as should have put him at the tail end of the army.

Not aiming solely at the memory, but developing the comprehending powers; for example, an Indian school recited the Twenty-third Psalm in concert, bu "the largest boy could not tell the meaning of "Shepherd." This tremendous error is beins slowly corrected. To be able to spell "heterngeneous," "indefatigable," etc., was once thought the proper work of primary children, but intelligent teachers do so no longer.-New York School Journal.

## EXERCISES FOR THE VOCAL ORGANS.

1. Gaze on the gay gray brigade.
2. The sea ceaseth, and it sufficeth some.
3. Say, shouid such a shapely sash shabby stitches show?
4. Strange strategic statistics.
5. Give Grimes Grimy Jim's gilt gig-whip.
6. Sarah in a shawl shovelled soft snow softly.
7. She sells sea shells.
8. A cup of coffee in a copper coffee pot.
9. Peter Pipers peck of pickled peppers.

Io. Smith's spirit-flask split Phillp's sixth sister's fifth squirrel's skull.

Life is rich in what it gives, And not in what it gets.

## JBook Nhotices.

[^4]Our Own Country. Canada, Scenic and Descriptive. By W. H. Withrow, D.D., F.R.S.C. Toronto: William Briggs. Price $\$ 3$.
This is another book from the pen of Dr. Withrow, already well known as the author of "The History of Canada," "The Catacombs of Rome," "A Canadian in Europe," etc. If a vigorous style, a vivid descriptive power, and the ability to sustain interest throughout, can give attractiveness to a bonk, we should predict that this volume would at once become a favorite. It contains over 600 pages, is printed on excellent paper and embel. lished with 360 engravings, many of them full page, illustrating all that is picturesque and historic in "our country" from Halifax to Vancouver. Starting with Nova Scotia, and passing through Prince Edward Is'an I, Newfoundland, New Brunswick, Quebec. Ontario. Manitoba, and the Northwest to British Columbia, the author describes all in a most interesting and graphic manner. This book should be in the hands of every intelligent citizen of our land, and will be found a most useful aid to every teacher.

Sea-Side and Way-Side. By Julia McNair Wright. Boston : D. C. Heath \& Co. 1896.
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Teaching the Language-Arts. Speech, Reading, Compnsition. By B. A. Hinsdale, Ph.D., LL.D., Professor of the Science and the Art of Teaching in the University of Michigan. Price, \$1. Vol. 3t, International Education Series. New York: D. Appleton \& Co. Toronto: Geo. N. Morang, manager for Canada.

This is one of the best books on the teaching of English which we have yet seen. It is eminently suitable to both Public and High Schools. The "Language-Arts" are clearly defined and the value of the "yernacular" as an instrument in education is plainly laid down in the opening chapters. Chapters 4,5, and 6 are devoted to "Child Study," and these will prove of great value to all progressive teachers. Chapters on "The Art of Reading," "Teaching Composition," "Teaching English Literature," "The Function of Rhetoric," and "The Function of Criticism" follow, and all are treated in a thoroughly philosophical manner, the author grappling with the fundamental principles, and at the same time not forgetting the student's difficulties in the real work of the classroom. It is the work of an original thinker, who can put his thoughts in just such form as to be of
most use to his reader in the solution of the pressing problems in an exceedingly important department of education. Every leacher should read this book.

A Primer of English Verse. Chiefly in its Æsthetic and Organic Character. By Hiram Corson, LL.D, Professor of English Literature in the Cornell University. Boston: Ginn \& Co., 1893. Price \$1.1o.
The readers of The Journal will be pleased to know that through this book they may bave the privilege, hitherio enjoyed by the enthusiastic group of students assembled in Professor Corson's class room, of listening to a teacher of exquisite poetic taste, with delicate appreciation of poetic harmonies, and the most sympathetic interpreter of poetry in the colleges of to-day. All will remember Professor Corson as the author of "The Voice and Spiriual Culure," so highly spoken of by Mr. John Seath, Inspector of High Schools for Ontario, in a recent number of The Journal. The poetic unities, foot, verse, and stanza, with their combining principles, accent, melody, and harmony with rhyme, are fully discussed in chapters 1 and 2. Chapters 3 and 4, on "Effects Produced by Exceptional and Vailed Metres," and "Effects Produced by the Shifting of the Regular Accent," will be found of very especial value to the teacher who has been puzzled in trying to fathom the purposes of a poet in varying or modifying his manifestations. The chapters on the "Stanza of Tennyson," "Spenserian Stanza," "The Sonnet" and "Blank Verse" will be eagerly read by all who wish to fully understand the organic character of English verse. We strongly recominend the book to every teacher of poetic literature in our schools.

Shakespeare, the Boy. With sketches of the home and school life, the games and sports, the manners, customs, and folklore of the time. By William J. Rolfe, Litt. D., illuitrated. New York: Harper \& Brothers, publishers. 1896.
This is a charming bonk. Its authorship and tab'e of contents have only to be named to cause almost every reader of Shakespeare to feel at once that it is a book which he must have. The name of Dr. Rolfe affords such guarantee of accuracy, judgment, and good taste, that no further question will be asked on that score. And when we have added an outline description of the method and contents of the volume we shall have given ample assurance that the subject-matter is of such kind, and is presented in such form, as is best adapted to mingle largest profit with keenest pleasure for the reader. It is true with respect to every writer of an earlier day, and is true in a special sense and measure of Shakespeare, viz., that one of the very best keys which can be had to the thought and spirit of the author is that afforded by an intimate acquantance with the customs and modes of thought of his time and place durng the formative period of his life. This is not to say that the environment makes the author, or is even the most potent influence in shaping his deeper self, but that the writer who is true to nature expresses his thoughts and imaginings in forms of speech which are moulded by the pioduct of early influences and
associations, and which need, for their full understanding and enjoyment, an intimate familiarity with the speech and customs of those amongst whom he was reared, which speech and customs formed, to a large extent, the moulds in which the forms of his thought and language were cast. This auxiliary knowledge is what the many learned annotators of the text of Shakespeare have striven so earnesily, and with so much success, to supply. But when we have, in one connected treatise, an introduction to the native town and neighborhood of the poet; when we are enabled, by means of clear and graceful description, and well chosen illustration in the best style of the bookmaker's art, to revisit the very scenes in Warwickshire, and permitted to gaze upon the castles and churches and landscapes in Stratford-on-Avon and vicinity, among which his boyhood days were spent; when we are permited to view even the furniture of the schools and the home, the food and drink, the popular books, the indoor and outdoor amusements, the games and sports, reugh and cruel as these sometimes were, the holidays, festivals, and fairs, amidst which he grew up, we are getting these invaluable helps in the very best form. All this is here given us by Dr. Rolfe, and when to all he adds thirty or more pages of historical, biographical, and critical notes, he has laid us under a weight of obligation which we can hardly too gratefully acknowledge. We wish every teacher in Canada had a copy of Rolfe's "Shakespeare, the Boy."

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