

money is expended, and, at the last, the very supplies essential for the success of the school fail to be furnished. The tools needful for daily work are wanting. Inadequate provision for warming, or taking care of the premises, or making repairs, occurs oftener than in any manufacturing establishment or mechanic's shop.

A competent teacher works successfully, as does a workman in any other business, only as necessary implements and conveniences are provided for his use. If denied them, his efforts are but a partial success at best. What, then, can be reasonably expected of a poor teacher, with poor pay, in a dilapidated house, without conveniences? Weak points in the system, are they all.—*A. Parish, in Connecticut School Journal.*

2. "ADEQUATE SCHOOL ACCOMMODATIONS."

In answer to numerous inquiries as to the law relating to school accommodation, we desire to state that the second section of the School Act of 1871 declares that:—

"Each school corporation (in a city, town, village or rural school section) shall provide adequate accommodations for all the children of school age (from five to sixteen years, resident) in their school division or municipality."

The regulations, which define what "adequate school accommodations" are, suggest a medium or minimum amount of school accommodation to be provided, as compared with the law and regulations on the subject in other countries. Although the law, as quoted above, is *imperative*, yet inspectors will exercise a judicious discrimination in enforcing it.

3. SCHOOL PREMISES AND ACCOMMODATION.

We would request the attention of Inspectors to Note to a of Regulation No. 4 of their "Duties," in which they are directed to call the attention of Trustees to the condition of the School premises. In many School sections the School-house has been allowed to remain in the same state for fifteen or twenty years and longer, often on a bare open space, or on the road-side unenclosed, without a tree or shrub near by to shade it, or any provision being made by the Trustees for the convenience or health of the pupils, or even for their observance of the decencies of life. The Legislature has wisely decided that this state of things shall not continue, but that, as soon as possible, a remedy shall be applied, where necessary. A reasonable time should of course be allowed to Trustees in all cases to set things right; but in the meantime Inspectors will, we trust, not fail to urge upon Trustees the necessity of complying, as soon as possible, with the provisions of the law on this subject.

4. SCHOOL-HOUSE VENTILATION WITHOUT DRAUGHT.

One of the most essential conditions upon which depends the maintenance of health is the ventilation of apartments, whether living rooms, sleeping rooms or working rooms without the introduction of draughts or cold air at unseasonable times and in improper or dangerous directions. If this problem has not been completely solved, at least a most important contribution to its solution has been made by the system devised by Mr. William Potts, of Birmingham, which has during the last three years been introduced into different hospitals, schools, Government buildings, factories, offices, and private dwellings. According to this plan a hollow cornice, by preference made of zinc, runs continuously round the room, as the ordinary plaster cornice does. This metal cornice is divided longitudinally into two channels. The fresh air is admitted into the pure air channel, or lower chamber through openings in the wall, arranged at intervals according to the purpose for which the room is used, and descends into the room near the wall line through the perforation at the back of the lowest member. These perforations are invisible from the front, and being stopped immediately in front of the openings in the wall, the air cannot fall by a direct stream into the room, but is directed along the channel, and descends evenly and gently by its own gravity, and becomes diffused imperceptibly through the room; because, when first admitted, it is heavier than the vitiated or heated air within, and consequently flows freely in, but in descending it becomes warmed by contact with the warmer air, and thus loses gradually its weight and force; and as it flows down it comes each moment into a cooler and denser atmosphere—thus, from two natural causes, it cannot produce a draught when properly checked and distributed. The upper or foul air channel communicates with the smoke flue or air shaft, or other extracting

channel; it is perforated continuously along the face with ornamental patterns, and the ceiling being darkened at the back, these patterns show as stencilled enrichments on the cornice. The vitiated air, whether from combustion or the human breath, rises when given off, to the highest point, is there drawn by the outward current through the perforations into the channel, and conveyed away by the air shaft or flue. It encounters no opposition to its exit, as the cold air coming in descends for a considerable distance close to the wall line and is admitted at a lower level, and so assists instead of retarding the escape of the vitiated air. This description will be sufficient to show the simplicity of the plan, and at the same time to indicate the principles upon which it is founded. The zinc cornices, it may be added, are far more ornamental and at the same time cheaper than the common plaster ones, and admit of every variety of modification in the shape or design in order to meet the varying circumstances under which they may have to be applied. The plan has already been pretty largely brought into operation, and has been applied with success to the rooms of the School Board, in Bridge street, Blackfriars, and to the kitchens in Somerset House. It may also be applied to the ventilation of ships, especially those employed in the cattle trade, and will, if the hopes of the inventor are realized, go far to supersede the use of punkahs in India.—*London Daily News.*

COMPULSORY SALE OF SCHOOL SITES.—DISTINCTION.

The provisions of the law on the compulsory sale of school sites are twofold, although they have been confounded together. The first part of the Section refers, (1st.) to the selection of land for a school site, and (2nd.) to the selection of land for the enlargement of school premises." In these two cases the Trustees can demand an arbitration, should the owner of the selected or enlarged site refuse to sell, or ask too great a price for the land. In the case of the selection of a new School site, the owner can successfully refuse to sell, or even to submit to an arbitration, when the selected site is within 100 yards of his "orchard, garden, pleasure grounds, or dwelling house," but where the Trustees merely wish to enlarge their existing school premises, the owner has no such right. The provisions of the law giving this right limits it merely to the "selection of a site," and not to the enlargement of the school premises. Two things are specifically provided for in the Act, as we have shown, but the right reserved to the owner of the land refers only to one of them—that is to the case of the selection of a new site, and not to the enlargement of the old one.

The provision of the law does not, in any case, (as has been supposed,) apply to other persons whose house, &c., may happen to be within 100 yards of the proposed site, but who are not in any way concerned in the sale of the site.

V. Papers on Scientific Subjects.

1. SOCIAL SCIENCE IN ST. PAUL'S CATHEDRAL.

A new innovation is reported from England. Social science has obtained a footing in the venerable pile, St. Paul's Cathedral, and Canon Gregory has discoursed on the question, "Are we better than our Fathers?" beneath its magnificent dome. The lecture is the first of a series which are to last till the end of the year. There has been a growing dissatisfaction for some time past at the little use to which the cathedral was put, the services held in it occupying but a few hours weekly, and the week day religious services being attended sometimes by less than twenty persons. Canon Gregory had an audience of 1,200—men only being admitted. Canon Liddell will next month explain one of the epistles. The *London Times* points out that these lectures to be attractive must be different from a Sunday sermon, and no doubt the hint will be taken by the Rev. lecturers. At any rate, no objection on this point could be made to the lecture of Canon Gregory, who treated his subject in the broadest manner. One of his remarks on the question was that "an age of comparative violence had been succeeded by an age of fraud,"—which, we fear, has more of truth than poetry in it. The lectures promise to be very successful.

2. CLASSIC VERSE AND NATURAL SCIENCE.

Shall I shock the taste of any whom I address, if, after having written some thousand Greek and Latin verses in my own school-days, I pronounce them waste of time, and protest against them altogether? They do not cultivate the taste, for reverent enjoy-