

chest forward in a stooping posture; sliding off the front edge of the chair, so as to rest upon the lower part of the back, thus bending the whole spinal column into a semicircle. The delicate and feeble ones of the flock should be the objects of special care.

Every occupation requiring the joint use of the hands and eyes, should be so pursued as to prevent continued stooping. Frequent change of position is demanded in the school-room, and to this end, the exercises should be so timed and arranged as to call the children from their seats as often as every half hour, and in the primary school, every fifteen or twenty minutes. The practice of a system of calisthenics twice in the course of the school session, in addition to the regular out-door recess, will do a vast deal towards preventing the evils complained of, and driving off the drowsiness and restlessness which would otherwise ensue.

We would here interpose a word in behalf of the little sufferers in our primary schools; and, in this particular, we hold the teachers, in a large degree, blameless. We allude to the want of desks for the children. The reason assigned for this deficiency is, that children between four and nine years of age do not write. We see no objection to their being taught the use of the pencil at this early age; we know they can, and we think they ought to be; but we claim the introduction of desks in the primary school as a SANITARY measure. The class of evils to which we have alluded, begins in the primary school, when the bony frame is exceedingly pliable. There the child is subjected to far greater discomforts than in the higher school, being compelled to sit most of the time upon a bench or chair, without any means for resting its book except upon its lap, which "tired nature" is sure to do when the eye of the rigid disciplinarian, who prides herself on the uniform array of little statues, happens to be averted. In concluding these remarks, we would reiterate our injunction to primary school teachers no less than to others,—see to it, that disease and deformity are neither engendered nor fostered in the school-room. Keep your little troop moving. We abhor remarkably still primary schools, because they are unnatural. You, who are able to bear it, would think it harsh treatment, were you compelled to take the places of your pupils.

In what we have said, we do not feel that we have exhausted the subject. We have only seized upon some of its salient points, sufficient to show the teacher's responsibility in the matter. To meet this responsibility efficiently, implies a ready knowledge of Anatomy, Physiology, and Pathology, with the principles of Natural Philosophy and Chemistry, and a determination to carry it out.—*Mass. Teacher.*

SCHOOL ARCHITECTURE—(Continued.)

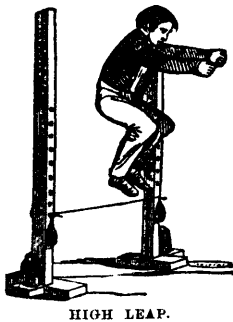
EXTERIOR OF THE SCHOOL-HOUSE.

GYMNASTICS AND CALISTHENICS.

MEANS OF EXERCISE.—In the country school sections, where the play-ground is extensive, and suitable for the use of bats, balls, hoops, stilt, jumping sticks, &c., which the pupils will themselves furnish in abundance, it will render any special provision in this respect less necessary. But in case the grounds are small, and in towns where greater variety of means is required, additional arrangements should be made for such physical exercise as may secure proper muscular development.

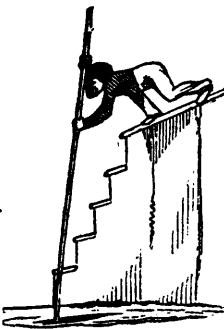
Amongst boys, running and leaping are favorite pastimes, and both are conducive to health. For running, no other preparation of the ground is needed than that there shall be space enough, and that the surface be sufficiently level to be safe.

Some kinds of leap require preparation. The long leap, along the surface of the ground, only needs a level space for the run, and ground not too hard for the leap itself. The high leap may be made a useful and safe exercise by means of a proper leaping cord or bar, so constructed as to be elevated in proportion to the increase of the youth's activity by practice, yet so arranged as to prevent the injury by striking the feet against the cord or bar.



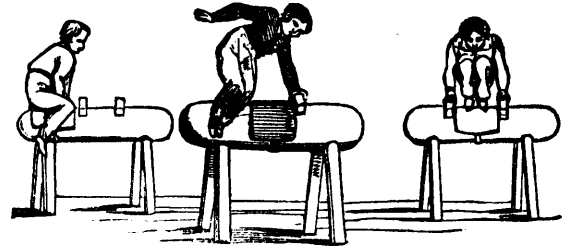
HIGH LEAP.

The pole leap brings the muscles of the hands and arms into play as well as those of the lower limbs; and if it be cautiously practised and gradually increased, will give a degree of confidence and activity to the performer, which may be valuable to him in the dangerous and trying positions of after life.



POLE LEAP.

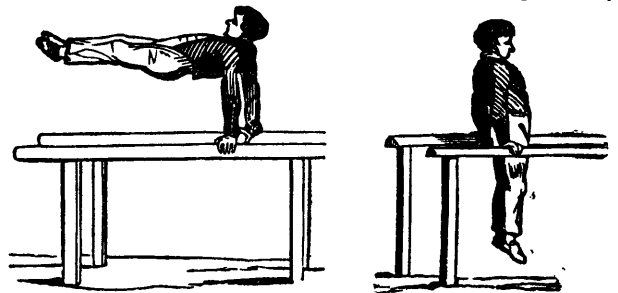
Vaulting is another kind of exercise which strengthens the muscles of both upper and lower limbs. The power to swing oneself over a



VAULTING.

fence too high for a leap, in times of danger or great haste, is desirable. Rapid and graceful mounting on horseback may also be thus taught. The necessary fixtures cost little and add to the variety of the play-ground.

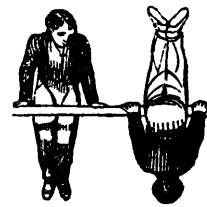
The parallel bars are admirable contrivances to exercise and strengthen the arms, and open and expand the chest. If of different heights and sizes, they may be used by pupils of all ages. They possess the advantage of being perfectly free from the possibility of



PARALLEL BARS.

PARALLEL BARS.

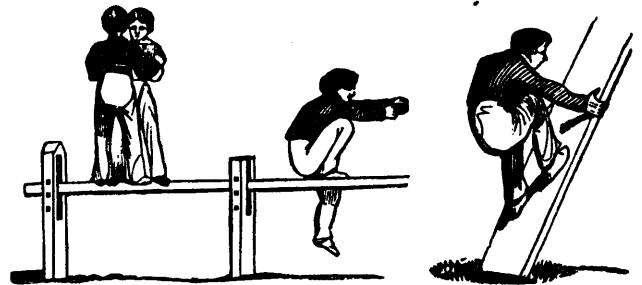
accident to the smallest boy who uses them; and should therefore be among the first means for exercise introduced upon the play-ground.



HORIZONTAL BAR.

The horizontal bar is for lads of more advanced age, and its use, besides strengthening the hands and arms, affords the opportunity of placing the body and limbs in a great variety of positions, and of thus strengthening many muscles not ordinarily called into action.

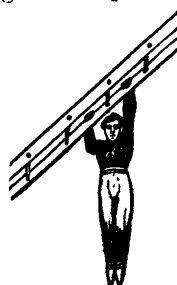
The balancing bar is so constructed as to admit of elevation from the ground in proportion to the pupils' confidence in himself and skill in using it. It is admirably fitted to give strength to the lower limbs, steadiness to the brain and self-possession to the mind. The constant practice of balancing the person with exact reference to the centre of gravity



BALANCING BAR.

INCLINED BOARD.

must also have a beneficial and graceful effect on the figure and general deportment.



THE LADDER.

Climbing the ladder, the rope, and the inclined board, are all calculated to add strength to the limbs, activity and health to the body, and variety to the exercises of the play-ground. They can be provided for at slight expense, and will be found, in common with other similar arrangements, to increase love for school, by rendering it attractive.

No gymnastic apparatus combines greater variety of healthful and pleasant exercise than the rotary or flying swing. (See engraving on the first page.) It combines running, leaping,



THE ROPE.