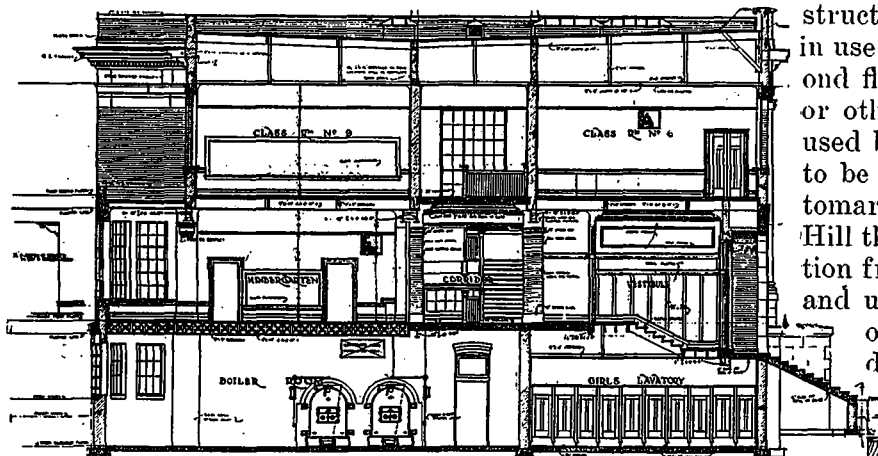


and in summer time the large double doors opening on the colonnade may be thrown open. In village and country high schools there is as much or more need, comparatively speaking, for assembly halls, as in cities with more pretentious buildings.

The chemical and physical laboratories are combined in one room on the second floor.

All things considered, I am persuaded that physical and chemical laboratories are better placed on the second or top floor than on the first. Sky lighting can be obtained, better ventilation, and less danger of fumes reaching class rooms, less noise, are the main advantages. In a high school where one teacher is expected to teach both these sciences, one supply room of ample dimensions and of proper construction can be made to suffice, and by using a combined physical and chemical desk for the students, much room can be saved. The dark room is ventilated and equipped with plumbing. The walls below grade are of concrete and are waterproofed, the floors are under-drained, are of concrete, and made impervious to dampness. Walls above grade line rest on a damp course of waterproofed cement, and are composed of hollow tile, faced with red pressed brick laid in lime mortar.

The building contains two hundred and thirty-eight thousand seven hundred cubic feet, and cost \$30,000, or 12½¢. per cubic foot. The contracts were closed about the first of June last



SECTIONAL VIEW, BEAMSVILLE HIGH SCHOOL.

year. This is, in the writer's opinion, one of the most economical plans ever designed for a rural school.

MANY HOSPITALS BEING BUILT

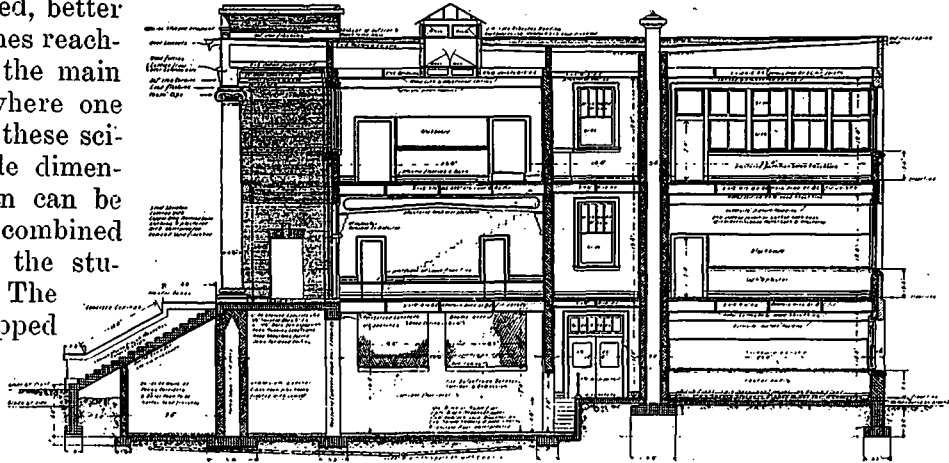
Present indications are that Canada's hospital accommodation will be more than doubled during the next year or two, the need largely resulting from the effects of the war in Europe.

The Canadian Military Hospital Commission is erecting a large number of hospital buildings

to standard plans worked out to meet the needs for caring for mental, tubercular and surgical cases, these hospitals being located in every province of Canada.

The Provincial Governments and the Municipal Councils also recognize the increased need for hospital accommodation, and the desirability of selecting the best materials and most modern equipment.

The several hospitals illustrated in the June issue of CONSTRUCTION are excellent examples of



SECTIONAL VIEW, BEAMSVILLE HIGH SCHOOL.

the progress that is being made in hospital construction in Canada, and in the August issue the special type being erected by the Military Hospital Commission will be described.

HISTORY OF WINDOW DESIGN

In a recent address Dr. Vernon E. Hill reviewed the history of window design and construction, and showed that windows were in use in ancient Egypt, at least on the second floors of buildings, but without glass or other protection. That they were also used by the Greeks and Romans is known to be a fact. Instead of glass it was customary to use pieces of colored glass. Dr. Hill then took up modern window construction from the standpoints of first cost, care and upkeep, loss of wall space, admission of flies and other insects, admission of dirt, weakening of walls and injury to building, entrance for burglars, increase of heat waste, interference with mechanical ventilation, increased liability to fire and fire panic and nuisance from noise. Under the last heading he showed that in office buildings, in the congested districts of large cities, the noise from electric cars, passing trucks, etc., entirely prevents the use of windows for ventilation on the first, second or even third floors. This is also a serious objection in the cases of hospitals and schools. Dr. Hill spoke at length of the window requirements of factories and workshops, this part of the paper being accompanied by illustrations of typical designs.