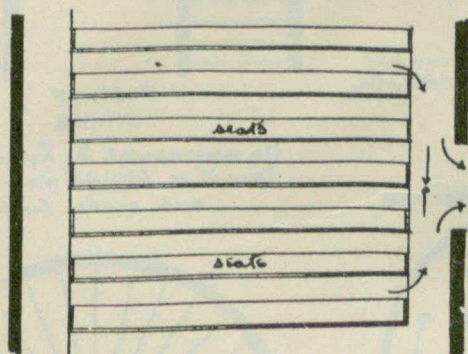
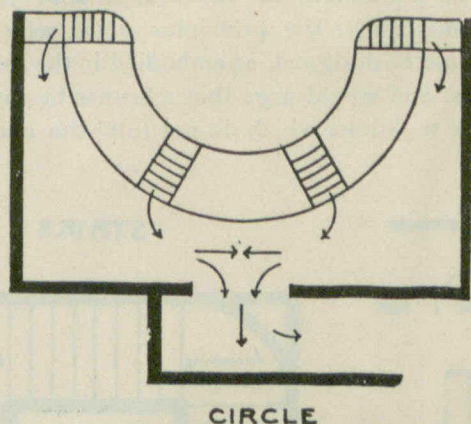


SUGGESTIONS FROM NEW ZEALAND ON THEATRE PLANNING.*

The following is an abstract of a paper read by Mr. S. Hurst Seager, architect, of Christ Church, New Zealand, at the Australasian Science Congress held in January last at Dunedin. The abstract of the paper was forwarded to us along with the accompanying diagrams. The paper had special reference to the provision of exits and escapes at theatres and places of amusement. No more important problem presented

EXITS FROM SEATS



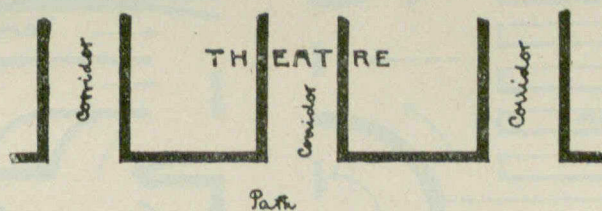
STALLS
showing pressure at doorways

Fig. 1.

itself to the architect, said Mr. Seager, than this, yet there was none which he had less successfully solved. The problem was not to design a building in such a way that an audience might leave it without discomfort under ordinary circumstances, but to design one which would be free from danger in times of panic, arising either from alarm of fire, earthquake, or other cause. It had to be borne in mind very clearly that the problem was not to be solved by demanding on the part of the audience a certain course of action under any unusual circumstances, for at that time they were incapable of thought and incapable of determining what action to take. The problem therefore was to plan a building which should be so arranged that without choice irresponsible people would be compelled to move in a certain direction, and that that direction should be absolutely free from all resistance. Without resistance there could be no pressure; without pressure there could be no danger. It was the neglect of this fundamental principle which had been the cause of such sad loss of life in the past, and its continued neglect would be responsible for all that took place in the future. The first impulse of most of the audience at the time of imagined danger was to rush from their seats towards the entrance from which they approached (see Fig. 1). That at once made it perfectly clear that the usual en-

trance must in all cases be the exit, and safety did not depend at all upon any number of so-called special "escape doors." These were simple delusions, and should not be provided. There must be entrances, carefully calculated as to number and width, leading to different parts of the building, to be used both as entrance and exits for that part only, and the greatest care should be taken that each entrance should give uninterrupted communication between that portion of the building for which it was designed and the open street. It could not be too firmly insisted upon that there must never be any connexion whatever between one corridor of communication and another. Each entrance and exit should be perfectly independent of all others. To carry this principle out fully every building of entertainment should stand wholly detached with sufficient space round it to prevent any chance of blocking. Very many Continental theatres were so placed, and most decidedly no new building should be licensed which had not a perfectly free, even space on at least three sides.

These spaces should be kept free during a performance. Carriages should always be drawn up sufficiently far away to allow of a free rush of people from the exits, for a very great source of danger existed in allowing carriages to stand on the edge of the pavement directly opposite the only means of egress. Gutters just opposite and steps just outside entrances were also sources of danger which should certainly be got rid of. Special provision should always be made for those us-

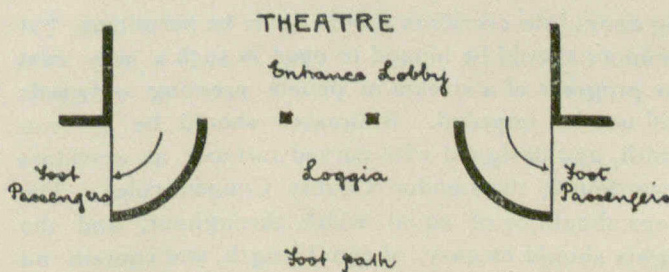


Path

Gutter

Roadway

Plan of front of Theatre showing exits into path from which free progress is blocked by carriages



Foot path

Carriages

very slight rise to footpath

Plan showing method of preventing crushing at entrances.

Fig. 2.

ing conveyances, so that they could reach them without interfering with the flow of foot traffic or of being inconvenienced by it (Fig. 2). In order to avoid any resistance in passing from the seats to the corridor or doorway, provision should be made so that the streams of people approaching the doorway from different directions could be directed through it without conflict with the opposing streams. This could be affected by means of curved barriers, which he had designed (Figs.