believes in investment; at least I know of no other who has for eight years tried to force on public attention the fact that the certainty of investment, partial or complete, follows the *possibility* of invasion as surely as night follows day.

Consider for one moment on what the presumption of possible invasion rests. It rests on this—the loss, temporary or permanent, of the command of the waters surrounding the British Islands. But remember that the lines of communication *all* radiate from these waters; the loss, therefore, of our command *here* cuts every one of the imperial lines; and what is this *but* investment?

The statesmen who could, in a magazine, speak complacently of an opposing force "scouring our coast at twelve, fifteen or sixteen miles an hour," must surely have forgotten that the hearts of the Empire thus cut off from its sources of supply must cease to beat. Hardly a mile could be so traversed in triumphant defiance without injury, in a greater or less degree, to some artery or nerve, producing in some far-off member of the body politic of Empire results more or less disastrous. It might be but a nervous tremor produced by a temporary disarrangement of the free course of trade, or it might be paralysis caused by a prolonged interuption of the vital power of communication. The question of results is but a question of time.

As regards the safety of communications, it must be borne in mind that the greatest danger to which they can be exposed is that which threatens the greatest number at one and the same time. Geographically speaking, this can only happen at the point of convergence or radiation, which in our case is the Channel.

The Royal Commission of 1859 discarded the Channel Fleet as a first line of defence against an invasion, because "Were a undue proportion of our fleet tied to the Channel," our enemy's "would be proportionably set free, to the great danger of our colonies and to the injury of a commerce which becomes of more vital importance with every step of national progress. But I desire to observe that, though it may not be our first line of defence against invasion, it is our first line of defence against investment, and, further, the front of our first line of colonial defence. Of what avail is it if our Colonies, though protected in their own immediate neighbourhood, are "locked out" from the mother country by a force in the Channel, against which we are unable to contend? Of what use is it protecting our commerce on distant seas if it is to be destroyed within sight of the shores of England? Surely, in reckoning up our means of defence, we should not forget that if our enemy confines his operations to an attack on our communications, and we are unprepared to resist it, the forces we have created for the special purpose of repelling invasion will be after all but harmless host of spectators of a ruin they are powerless to avert.

I do not for a moment underrate the immense importance and absolute necessity of being prepared to render invasion impossible by purely military forces. If we are not so prepared we stake the fate of the Empire on, perhaps, a single naval engagement. A temporary reverse at sea might (by the enemy following up his advantage) be converted into final defeat on land, resulting in a total overthrow of all further power of resistance. It is necessary for the *safety of the Channel* that invasion be efficiently guarded against, so that should our home fleet be temporarily disabled we may, under cover of our army, prepare and strengthen it to regain lost ground, and renew the struggle for that which is essential to our life as a nation, and our existence as an empire—the command of the waters of the United Kingdom.

We are all so keenly alive to the necessity of rendering invasion impossible, that this part of the subject may now be dismissed. I may also pass from the front of the first line of colonial defence with the remark, that the fleet required to maintain it must not be confused nor mixed up with the cruising force necessary for the safety of the distant lines of communication. To hold our supremacy of the Channel we require a force composed of vessels adapted to the combined action of fleets, and of a strength equal to that which may possibly be brought against it. This remark also applies to the protection of the line of communication passing through the Mediterranean. But on a more distant seas, for the protection of such lines, a special class of cruisers, capable of keeping at sea for long periods of time, is required; the strength of this patrolling force on each line being in proportion to the value of the line, and to the force against which it may have to contend. The fleets necessary for the safety of the Channel and Mediterranean are not adapted to the protection of distant lines, nor are the vessels suited to the defence of those lines of any value as a reserve force to be called in to aid in the defence of the Channel and Mediterranean.

But the defence of our communications is not secured by the mere presence of sufficient naval force at home or in the Mediterranean; for as there are two modes of attack on the United Kingdom, so there are two ways in which our lines of communication may be destroyed—1st. By direct attack on the point of convergence. 2nd. By a variety of attacks on one or more lines at points far removed from the place where they all meet. Assuming provision for meeting the first to have been made, I will now deal with the means to be adopted to this other mode of attack; and this is the most interesting portion of my subject.

Communications, whether sea or land, whether long or short, *can only be secured by a firm grasp of the points which command them.* The greater the extent of the line, the greater is the number of defended points necessary for its safety. In order to cut a line of communication, the first thing to be done is to seize the point which commands it, and in defending a line the point which commands it is the last to surrender. Such points are the minor bases of operation of forces acting in defence of the line. The relative importance of such points to the line, and to each other, can only be estimated by the circumstances of their geographical position and their distance from the main base from which the line springs.

There is the difference, however between the defence of sea as compared with land communications. Naturally in the second, a purely military force only is required, but in the case of sea lines the employment of a purely military as well as a purely naval force is necessary. The navy furnishes the patrolling or skirmishing force, while the army secures to its bases or arsenals. To leave the naval force responsible for the protection of its base would be to tie its hands. It would be "using the fleet to maintain its arsenals, instead of the arsenals to maintain the fleet."(*a*) Some years ago a governor of an eastern Colony proposed to leave such places almost exclusively to naval protection, and the late Sir John Burgoyne thus speaks of the value of the proposition: "Under the system proposed, a small squadron, with 3,000 or 4,000 troops in eastern seas in time of war, would take the Mauritius and Hong Kong, and destroy the naval arsenal and means at Trincomalee, if it did not capture the whole island of Ceylon."(*b*)

The force thus alluded to might be Russian or that of some other power. In any case, how would the loss of Ceylon affect our military position in India? It is likely that aggression would stop there? Might it not gather strength, and migh not Ceylon be a conveinent base of operation for an attack on Australasia? If, therefore, we trust the protection of our lines exclusively to a purely naval force, by imposing on our fleets the defence of the points which command them, we risk nay we court a general attack, not on England, not on the Channel, but on "our vast Colonial empire, our extended commere, and interest in every quarter of the globe."

It is now time to ask what are these points? and, in an attempt to reply, I will take each line separately:—

1. The line to Canada. The only point is a terminal one—it is Halifax.

2. To the West Indies. Here we have Bermuda, the Bahamas, Jamacia and Antigua. The strategic value of Bermuda was fixed by Sir John Burgoyne.(*c*) Jamaica, from its central position and capacious harbour, is of considerable importance. I add Antigua for two reasons—(1) because Jamaica is far to leeward to be of value as a coaling station or arsenal for cruisers acting in the defence of communications to the Eastern Islands; such vessels would burn a quantity of fuel in steaming up to their station from Jamaica againt the trades; (2) vessels bound for the greater Antiles and Gulf of Mexico generally pass between Antigua and Guadaloupe.

3. To India, the East, and Australasia, by the Mediterranean. The ponits here are Gibralter, Malta, Aden, Bombay, Cape Comorin, (*d*) and King George's Sound on the main line, with Trincomalee, Singapore, and Hong Kong on its northern branch.

Of all the Imperial roads this is the most difficult to defend, owing to its want of continuity. The most commanding position—the Isthmus of Suez—is not in our possession. Here our line can be most easily cut, and here we have least power to prevent the contingency. So long as the canal is neutral or in the hands of a neutral power, so long is it at the disposal of friend and foe alike. Were it in the hands of our enemies, it is only open to them and not to us. To make this line safe, the occupation by military force of the Isthmus might, under certain conditions, be a necessity. Are we prepared for that?

(*a*) Vide Defence Commission Report, 1859.

(*b*) See Appendix to "Life of Field Marshal Sir J. Burgoyne." (*c*) Ibid.

(*d*) Although there is now not any harbour of importance at Cape Comorin, those who have read the paper on "Indian Harbours" by General Sir A. Cotton, will understand the stragetic importance of the positson, and the possibility of creating a harbour at "Colachul" in its vicinity.

(To be continued.)

The railway viaduct at Toquella, Spain, fell and thirty-eight workmen were killed.