that the soma exercises no influence on the germ-plasm. Hence I am unable to accept the proposition that somatogenic characters are not transmitted, and I cannot but think that they form an important factor in the production of hereditary characters.

To reject the influence which the use and disuse of parts may exercise both on the individual and on his offspring is like looking at an object with only a single eye. The morphological aspect of organic structure is undoubtedly of fundamental importance. But it should not be forgotten that tissues and organs, in addition to their subjection to the principles of development and descent, have to discharge certain specific purposes and functions, and that structural modifications arise in them in correlation with the uses to which they are put, so as to adapt them to perform modified duties. It may be difficult to assign the exact value which physiological adaptation can exercise in the perpetuation of variations. If the habit or external condition which has produced a variation continues, then in all probability the variation would be intensified in successive generations. But should the habit cease or the external condition be changed, then, although the variation might continue to be for a time perpetuated by descent, it would probably become less strongly marked and perhaps ultimately disappear. One could also conceive that the introduction of a new habit or external condition the effect of which would be to produce a variation in a direction different from that which had originally been acquired, would tend to materialize the influence of descent in the transmission of the older character.

By accepting the theory that somatogenic characters are transmitted, we obtain a more ready explanation, how men belonging to a race living in one climate or part of the globe can adapt themselves to a climate of a different kind. On the theory of the non-transmissibility of these acquired characters, long periods of years would have to elapse before the process of adaptation could be effected. The weaker examples, on this theory, would have had to have died out, and the racial variety would require to have been produced by the selection of variations arising slowly, and requiring one knows not how many hundreds of thousands of years to produce a race which could adapt itself to its new environment. We know, however, that this process of dying out of the weakest and selection of the strongest is not necessary to produce a race which possesses well-recognizable physical characters. For most of us can, I think, distinguish the nationality of a citizen of the United States by his personal appearance, without being under the necessity of waiting to hear his speech and intonation.

Man is a living organism, with a physical structure which discharges a variety of functions, and both structure and functions correspond in many respects, though with characteristic differences, with those which are found in animals. The study of his physical frame cannot, therefore, be separated from that of other living beings, and the processes which take place in the one must also be investigated in the other. Hence we require, in the special consideration of the physical framework of Man, to give due weight to those general features of structure and functions which he shares in common with