

Letters to the Editor.

[The Editor does not hold himself responsible for opinions expressed by his correspondents. Neither can he undertake to return, or to correspond with the writers of, rejected manuscripts intended for this or any other part of NATURE. No notice is taken of anonymous communications.]

Biological Terminology.

WHEN one is appealed to by name throughout two whole pages of NATURE (October 6) to answer various questions, it would be churlish to give no reply. But, now the holidays are over, Sir Archdall Reid must forgive me if I do not take up all his points. It is the more easy to escape gracefully, because one can refer him to the clear and thoughtful address of Prof. Goodrich to Section D of the British Association, which seems to put in more acceptable form the ideas that Sir Archdall is struggling to impress on us.

To confine myself to the sentence, "Variation is the sole cause of non-inheritance, etc.," Sir Archdall Reid accepts my description of it as an identical proposition, and admits that the words "the sole cause of" are redundant. The second part of his sentence I represent by "etc.," because I agree with him that it means the same as the first part. If Sir Archdall Reid asserts that these statements are also the same in meaning as the sentence, "apart from variations, offspring tend to recapitulate the parental development," we must accept his interpretation, merely pointing out that it has no great bearing on the alleged phenomenon usually known as recapitulation.

These matters being agreed on, I would ask what is gained by this laborious insistence on the statement that "variation" and "non-inheritance" are two words for the same thing? Surely the problem before us remains the old one: What is the cause of variation? In this question the words "the cause of" are *not* redundant. Suppose we accept the whole Mendelian apparatus of separate factors and regard each as a minute portion of a chromosome, admitting all the mechanism of their transmission as worked out by T. H. Morgan and his school, we have still to ascertain why and how one or more of these units should change. Is the change always sudden, and only the representation in the characters apparently gradual? Or may the change of the unit itself be gradual? Is the change produced solely by some action in the germ-cells, or may it be the result of a modification in the parental body? If the latter alternative be proved, can we explain the further apparent fact that the change in the factor or factors induces a change of character harmonising with the environmental modification?

These are a few of the questions that assail us, and I have tried to express them without using any of the terms to which Sir Archdall Reid objects. It is hopeless to answer them by speculation alone; we must learn how the mechanism works. Sir Archdall Reid is right in emphasising the need for crucial experiments, but, so far as I can see, my biological colleagues do not need the lesson. What we all should like would be some suggestions of practicable experiments or observations that would decide some of the questions exemplified above. But that, even Sir Archdall Reid must admit, would be something other than "biological terminology."

F. A. BATHER.

Wimbledon, October 16.

NO. 2713, VOL. 108]

Indian Land Mollusca.

IN an undated letter, without address, published in NATURE of October 6, p. 180, under the title "Indian Land Mollusca," Dr. Annandale states that he wrote offering the loan of the material of the Indian Museum to help in the preparation of Mr. Gude's work on these molluscs. This is the first intimation that the author or the publisher or the editor of this volume has had of the offer. Dr. Annandale states definitely that the "offer was ignored or refused." It is impossible to ignore or refuse an offer which never arrived.

It is also impossible to make those who stayed at their work in India during the four years of the war realise the difficulties and straits under which we in Europe were living. Had Dr. Annandale been nearer the seat of the war he might, perhaps, have realised that a very large number of ships coming from India were sunk in the Mediterranean by submarines. It is not unlikely that the offer is still lying at the bottom of the sea in the hold of some sunken vessel.

A. E. SHIPLEY.

Christ's College Lodge, Cambridge,
October 15.

Safeguarding of Industries Act, 1921.

PROF. ARMSTRONG'S letter in NATURE of October 24 conveys the impression that he has become suddenly aware of the potentialities for evil of the above Act in its present form. Protests have, however, appeared in the Press over the signatures of Sir Clifford Allbutt, Sir Ernest Rutherford, and Sir G. Sims Woodhead; and in the House of Commons Major Barnes and Mr. F. D. Acland attempted to have inserted in all applicable clauses exemptions for articles required for scientific research. In this action Major Barnes and Mr. Acland were guided by the expressed wishes of the National Union of Scientific Workers, which has also fought the clauses of the Dyestuffs (Import Regulation) Act, 1920, and the German Reparation (Recovery) Act, 1921, which penalised research in this country.

We agree that if we believe in our craft we must be militant in its protection, though we are not sure that scientific workers would get much shrift if they adopted the policy Prof. Armstrong advocates. We agree that as an expedient in the present state of the English Constitution a strongly worded and unanimously supported memorial to the Prime Minister might throw into welcome relief the unhappy plight of science, and we therefore invite Prof. Armstrong, and those in agreement with him, to support this union and the British Association of Chemists, the bodies which have taken the initiative in directing the attention of Parliament to the disastrous effect that the above measures will have on research unless they are speedily modified. They might help us also to back up Major Barnes in his efforts to get the promised committee for the investigation of complaints against the working of the Act appointed without further delay.

We suggest that Prof. Armstrong should add to his motion before the council of the Chemical Society the recommendation that that body should lend us their aid.

L. BAIRSTOW,
President.
A. G. CHURCH,
Secretary.

National Union of Scientific Workers,
25 Victoria Street, Westminster,
London S.W.1, October 25.