Such are frequently improvements in surgical operations or medical treatment, which leads to increased practise. Another case is that of serums, etc., which may have been protected and put on the market. Here compensation can not be demanded, and pecuniary rewards are generally unnecessary. On the other hand, honors are often and justly bestowed for such work. C. Discoveries that involve neither gain nor loss to the investigator. This class includes most of the good and sometimes great clinical, pathologic and sanitary discoveries. Here also compensation can scarcely be demanded, and honors are already often given, but pecuniary awards should sometimes be bestowed as an act of grace when the value of a discovery greatly exceeds the emoluments of the investigator. This principle should hold even for men who are directly paid for undertaking the research, especially when such payment is (as usual) small and the discovery great. Special attention is drawn to: (1) men who have refused lucrative posts to complete researches; (2) men who have refused to protect their work for fear of limiting its application, and (3) men who have carried out investigations for governments for little or no payment, on patriotic grounds.

In the public interest, the committee insists on these principles: (1) No medical discovery should be allowed to entail financial loss on him who has made it. (2) Compensation or reward should be assessed as equal to the difference between the emoluments actually received and those which a successful clinician might have received in the same time. Additional reasons for this are that few medical discoveries are patentable, and they seldom give good grounds for promotion or for administrative appointments in the public services. Whether a particular discovery shall receive large or small assessment will depend, in addition, on these considerations: (1) Width of application. For example, the work of many of the older anatomists, physiologists, and parasitologists, of Pasteur and of investigators of immunity, have affected most recent discoveries. Discoveries on widespread diseases, such as the work of Lister, Laveran or Koch, are often more important that those on more limited maladies. (2) Difficulty of the work done. The solution of a difficult problem requires more study and also more time and cost, and therefore deserves more recompense than a chance observation. (3) Immediate practical utility. A strong plea can be made for state remuneration in cases of this kind unless they come under Class B. Curiously, they never receive it, and academic recognition is also often not forthcoming. (4) Scientific importance. Discoveries not of practical utility may become so at any moment and should be included in the scheme if sound and of wide application.

During the last few years, the British government has disbursed an annual grant of about $300,000, under the Medical Research Committee, for subsidizing investigations authorized by the committee and carried on by workers selected by it. This grant does not remunerate discoveries already made, but proceeds on the principle of payment for prospective benefits.

SPECIAL ARTICLES

A POCONO BRACHIOPOD FAUNA

The Pocono formation of the Appalachian Mississippian measures is known to contain marine fossils in places but little has been published on the subject and the information is scattered and difficult to assemble. The writer has recently found two beds of sandstone in the Pocono Series on Laurel Mountain in Tucker county, West Virginia, which contain branchiopod impressions and has assembled the following list of occurrences of fossils in strata which are considered to be of Pocono age. Since the present note is written in the field, full descriptions of these localities and complete citations to the literature are not given.

POCONO FAUNAL LOCALITIES

1. At Altamont, Maryland, on the western limb of the Georges Creek-Potomac Syn-

cline, noted by G. C. Martin, 1903, Maryland Geological Survey, (Report on) Garrett county, pp. 91 and 92; marine invertebrate fauna noted in the Pocono but not described.

2. In the Broad Top Coal Field of Southern Pennsylvania a Pocono fauna has been collected from a black shale by Messrs. David White and G. H. Girty. They have been studied by Dr. Girty and described in manuscript. The fauna consists of only a few genera and species, only three or four species being found at any single locality. In order of abundance the forms noted were: *Chonetes, Camarotœchia, Rhipidomella, discinoids,* and the pelecypod *Cypricardinia* (oral communication from Dr. Girty).
3. At the Beaverhole (ford and limestone quarries) on Cheat River in Preston county, West Virginia, 8 miles east of Morgantown, brachiopoda were found some years ago by Professor S. B. Brown in a dark shale near the base of the Pocono. A small collection consisting of a very few species of brachiopoda was obtained by the writer several years ago, but no list of the forms is at present available.
4. On Laurel Mountain, in Tucker county, West Virginia, brachiopoda have been found in two sandstone beds lying approximately 30 and 90 feet, respectively, below the top of the Pocono. The lower of the two faunal members rests upon a shale which becomes deep red in color a few feet below its top and seems to be the highest red bed at this point below the top of the Pocono. A small assemblage of forms, which are, however, abundantly represented by individuals, was noted. The upper fauna consists of the following forms as noted in the field, given in the order of relative abundance: *Chonetes, Schizophoria, Spirifer* (coarse-ribbed), a gastropod (*cf. Pleurotomaria*), a pelecypod (*cf. Cypricardinia or Grammysia*). The lower fauna contains the following: *Spirifer* (fine-ribbed), abundant, and *Camarotoechia.*
5. On Limestone Mountain in Tucker county, West Virginia, in talus accumulation from the Pocono were found impressions of *Schizophoria* in sandstone.
6. In the Price (Pocono?) Sandstone of Southwestern Virginia brachiopoda have been collected from at least two localities by G. W. Stose, (oral communication), and their presence noted in Bulletin 530 of the U. S. Geological Survey, p. 251.

The study of the Maryland and West Virginia collections is contemplated by the writer and he would be glad to receive through these columns or otherwise additional information concerning Pocono faunas.

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THE AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE

SECTION F—ZOOLOGY

THE Convocation Week meetings of Section F (Zoology) of the American Association for the Advancement of Science were held in conjunction with those of the American Society of Zoologists at Saint Louis, Missouri, December 29, 30 and 31, 1919.

At the business meeting of the section, Professor Caswell Grave was elected secretary pro tem.; Professor George Lefevre, of the University of Missouri, was elected member of the council; Professor B. H. Ransom, of Northwestern University, was chosen member of the general committee; Professor H. B. Ward, of the University of Illinois, was elected member of the sectional committee for five years.

The sectional committee nominated Professor John Sterling Kingsley, of the University of Illinois, as vice-president of the section for the ensuing year.

The address of the retiring vice-president of Section F, Professor William Patten, of Dartmouth College, upon "The message of the biologist" was delivered at the annual dinner of the American Society of Zoologists at Hotel Statler, Wednesday evening, December 31, and is printed in the issue of SCIENCE for January 30.

H. V. NEAL,
Secretary