Expressing the hope that you will lecture before the Academy, when passing through Naples, I felicitate you upon this well-merited distinction from abroad, and remain,

Faithfully yours,

FRITS HOLM,
LL.D., D.C.L., D.Lit.
Vice-President for the Americas

To H. E. Lt.-Gen., Prof., Dr. Frits Holm, Duke of Kolachine, G.C.G., Vice-President of the Academy of Letters and Sciences of Naples, Chamberlain to His Royal Highness the Count of Casertia,

5, Place Vendôme, PARIS.

Excellency:—

In response to your recent communication I take pleasure in accepting the distinction of membership in the Academy of Naples, so graciously tendered by the Academic Senate through you.

Of the three forms of membership, namely Protector ($250.—for life), or Honorary Academician ($60.—for life), or Corresponding Academician ($25.—for life) I accept the grade of

and I do myself the pleasure of inclosing herewith bank-draft on Paris in dollars (or bills) for the amount in question, in the expectation, that you will cause my diploma and medal to be forwarded registered to the above address as soon as convenient after election.

I enclose a visiting-card, and *print* below the manner in which I desire my name and titles to appear in the diploma, and I express through you, Excellency, my thanks to the officers and members of the Academy of Letters and Sciences.

Faithfully yours,

EUGENOTHENICS

PROFESSOR HERBERT S. JENNINGS, in his timely little volume "Biology and the Advancement of Man," points out that "Heredity and environment have proven so inextricably mingled in the result that in practically no case can we claim with certainty that either alone is responsible." Since it is next to impossible to isolate the effect of heredity from that of environment, or *vice versa*, there is developing a great demand for a word which will apply to both fields of study. Since the term *eugenics* is usually construed to mean the science which deals with the improvement of the human race by selecting better hereditary qualities, and *euthenics* the study of race improvement by the regulation of the environment, neither of these terms is applicable when both fields are being considered. The term *eugenothenics* (u-jen'-o-then'-iks), which is merely a combination of the terms eugenics and euthenics, seems to supply the long-felt need. *Eugenothenics, then, is the study of race improvement by the regulation of both heredity and environment.* Many so-called courses in eugenics deal as much with environmental factors as they do with hereditary principles. They are in reality eugenothenical courses. One who is well versed in the science of eugenics and euthenics, and especially in their relationships, is a eugenothenicist.

WILLIAM M. GOLDSMITH

QUOTATIONS

RESEARCH AND TEACHING

ON the importance of promoting scientific research in America there can be no serious difference of opinion. There may, it is true, be doubts as to whether it can be "promoted," in the popular sense of the term. Certainly the qualities of mind which make research fruitful can not be manufactured to order, nor can the physical equipment which money will buy be substituted for the intellectual and spiritual gifts of nature. But such doubts furnish no ground of argument against doing all that it is possible to do. Money can not create genius, but it can give genius its tools and its opportunity. The proposals of the new "National Research Endowment," announced on February 1 by a board of trustees of which Secretary Hoover is chairman, and of which Professor A. B. Lamb, of Harvard, is a member, will, it is hoped, receive a wide and effective support. Although the published "declaration" was limited to general principles, it is said that the trustees of the endowment intend to raise a fund of $50,000,000, and that it is a part of their plan to endow research professorships at American universities. The Milton Fund for Research at Harvard, whose distribution for the next academic year is announced in our present issue, serves a similar purpose. It enables members of the faculties at Harvard to secure the time and the means of conducting research while continuing as members of an institution for higher education.

There have been signs in recent years of a tendency to establish independent agencies for research, and thus to divorce research from teaching and from the university environment. There is reason to believe that such a tendency, if carried far, would be a serious mistake. The university is the natural breeding-ground for scientific interests. In the long run the teachers will have to be relied upon to furnish the scholars, both in their own persons and in the pupils to whom they impart their spirit and method. To build up a new personnel for research would leave the teaching profession as overburdened as ever, and would cut off one of the principal hopes of relief. To accentuate the division between teaching and research would be equally bad for the mere teacher and for the mere man of research. The former would lose in freedom and incentive and in the power to

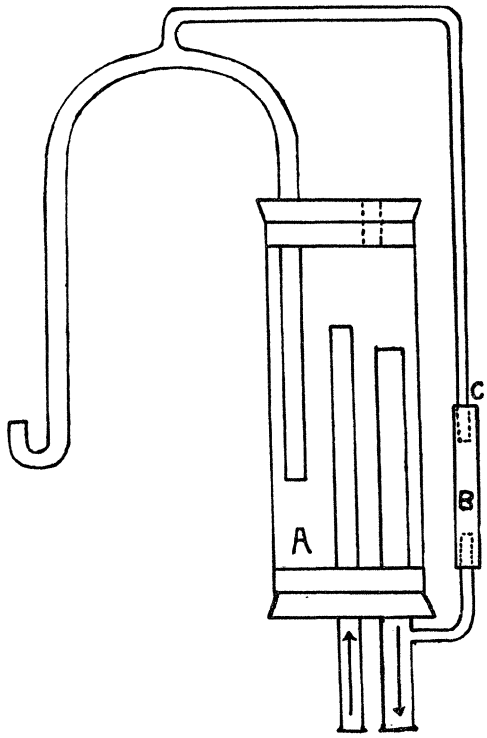
impart the spirit of creative inquiry. The latter would lose his contacts with the great intellectual tradition, with his colleagues in allied branches of knowledge, and with students who furnish both criticism and discipleship. The university is the proper center of scholarly endeavor, where are focussed the influences of history and culture, and where the achievements of maturity are renewed by the enthusiasm and forward-look of youth.

It is quite true, as asserted in the declaration of the National Research Endowment, both that facilities for research are inadequate, and that the demands of teaching and administration in American universities are excessive. It is to be hoped that both the problems will be met at the same time, and that the public interest in promoting research will be so directed as to improve the lot of those whose duty it is to teach and administer.—*Harvard Alumni Bulletin.*

SCIENTIFIC APPARATUS AND LABORATORY METHODS

A MODIFIED CONSTANT-LEVEL REGULATING DEVICE

ABOUT a year[1] ago a satisfactory device for maintaining a constant liquid level in any open vessel



such as a beaker was described. Employing the same principle the construction may be simplified so as to require a minimum of glass blowing. The accompanying figure elucidates this adequately. Tube A is one inch by three inches and the outlet tube is somewhat larger than the inlet. Tube C is of small bore. To start the regulator the small bore rubber tube B is removed and suction applied at C. Once the siphon is started the rubber tube is replaced.

R. L. STEHLE

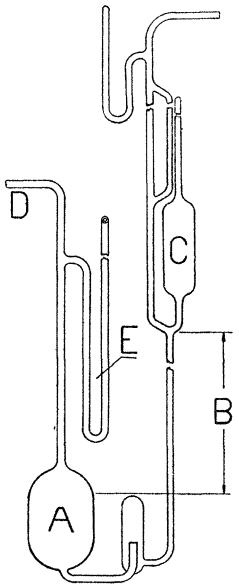
MCGILL UNIVERSITY

[1] *Journal of Industrial and Engineering Chemistry*, 17, 466 (1925).

AN IMPROVED MCLEOD GAUGE

THE writer recently had occasion to install a McLeod gauge in a production unit. Having, in the past, experienced some trouble with the usual flexible tubing type and having learned from experience that the average workman is incapable of handling the Bailey[1] model, a modified form was made. This gauge has the advantage of being all glass, does not require an aspirator and is simpler to operate than certain other models.

Referring to the figure, the gauge proper is of the usual construction. A is a reservoir containing sufficient mercury to completely fill the gauge. The distance B is made about thirty-one inches, slightly more than atmospheric pressure.



In operation, the mercury is forced into the chamber, C, by the application of air pressure through a three-way stop-cock (not shown) attached to pipe D. In the present instance the low pressure air supplied in the factory was used with a reducing valve. In order to preclude any possibility of mercury being forced into the system being exhausted, open arm manometer E was designed to act as a safety valve.

[1] Austin Bailey, *Phys. Rev.*, Vol. 15, No. 4, page 314, April, 1920.