to the widespread Dakotan and Algonquian stocks, and thus we find the aborigines carrying the culture of this noted tropical plant up to the northernmost limits of its possible propagation.

THE GROOVED STONE AXE.

THE statement is occasionally made in lectures and articles on the American aboriginal stone industry that the grooved and polished axe, so common in our collections, is an artefact peculiar to our continent.

It is true that in its special shape it is rare in European collections. They have the grooved maul or pounder, but not often the polished axe with the groove running round near the butt and with a sharpened edge. A fine example, however, from southern Italy, is described and figured by Dr. Schoetensack in the 'Zeitschrift für Ethnologie' (Heft I., p. 9, 1897). That it was of local origin was proved by the kind of stone of which it was made. He refers to its similarity to American specimens, and quotes other instances where they have been found in the Old World. This is but another example where the artificial products of early man reveal striking similarities in all continents.

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NOTES ON INORGANIC CHEMISTRY.

IN the last proceedings of the Chemical Society (London), A. E. Munby describes a Bunsen burner for acetylene which has proved very satisfactory in his hands. The tube is only five millimeters in diameter, or a slightly wider tube may be used, provided the mouth be curved inwards. With a larger opening there is a tendency for the flame to strike down. The gas jet is very small, delivering only one foot of acetylene per hour, under six inches of water pressure. The air holes must be large, and with sufficient air a non-luminous flame is given. The heating effect of the acetylene gas is large, and seems to be about twice that of coal gas. Mr. Munby suggests that the use of such a convenient source of heat should do much to stimulate research in country places, where, coal gas not being procurable, heretofore no good source of heat was available.

IN the same number Heycock and Neville, who have done so much to further our knowledge of alloys, describe the study of the sodium-gold alloys with the X-rays. Sodium is much more transparent to the rays than gold, and X-ray photographs of thin sections of the alloy show its crystalline structure very clearly. The authors point out that other alloys may be similarly studied, and are at present engaged of those of aluminum. It is possible that by this method our knowledge of alloys may be materially extended.

IN a graduating thesis at Washington and Lee University, Mr. J. R. K. Cowan takes up the question of the presence of tin in canned goods, and his results confirm those of previous investigators along this line. He finds tin present in every can examined, including tomatoes, peaches, apricots and sweet potatoes, in quantities of from 60 to 150 miligrams per kilo. Granting that this tin is present in a form which can be acted upon in the human system, and considering the large consumption of canned goods, it seems to follow that tin is less toxic than has been supposed and that it cannot be a cumulative poison. The maximum dose of tin is given as half a grain of chlorid, but the amount of tin corresponding to this might often be taken into the system during a single meal. Very few cases of supposed tin poisoning from eating canned goods have been reported, and it is probable there is little danger from this source. In no instance did Mr. Cowan detect the presence of lead.

IN the last *Chemical News* Delafontaine gives an account of further researches on the more deeply colored of the rare earths. This recent work was with Fergusonite from Bluffton, Texas, and he confirms the existence of the element philippium, discovered by him nearly twenty years ago, but whose independent existence as an element has been questioned by Roscoe and other observers. It is more closely related to terbium and cesium than to other rare earths, but is distinguished from both by marked reactions and the deep color of its oxid and subnitrate.

J. L. H.

SCIENTIFIC NOTES AND NEWS.

THE BRITISH ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE.

THE officers of sections at the Toronto meeting have now been selected, although others may subsequently be added to the list. All the officers expect to attend the meeting and American men of science who are able to be present will thus have the privilege of meeting many of the leaders in science of Great Britain. The officers are as follows:

A.—MATHEMATICAL AND PHYSICAL SCIENCE.

President, Prof. A. R. Forsyth, M.A., D.Sc., F.R.S.
Vice-Presidents, R. T. Glazebrook, M.A., F.R.S.; Prof. A. Johnson. M.A., LLD.; Prof. O. J. Lodge, D.Sc., F.R.S.
Secretaries, J. C. Glashan; Prof. W. H. Heaton, M.A. (*Recorder*); J. L. Howard, D.Sc.; Prof. J. G. McGregor, D.Sc., F.R.S.E.

B.—CHEMISTRY.

President, Prof. W. Ramsay, Ph.D., F.R.S.
Vice-Presidents, Prof. H. B. Dixon, M.A., F.R.S.; W. R. Dunstan, M.A., F.R.S.; Prof. B. J. Harrington, Ph.D., F.G.S.; Prof. W. H. Pike, M.A., Ph.D.; Prof. W. C. Roberts-Austen, C.B., F.R.S.; T. E. Thorpe, Ph.D., F.R.S.
Secretaries. Prof. W. H. Ellis, M.A., M.B.; Arthur Harden, Ph.D., M.Sc. (*Recorder*); C. H. Kohn, Ph.D.; Prof. R. F. Ruttan.

C.—GEOLOGY.

President, Dr. G. M. Dawson, C.M.G., F.R.S., F.G.S.
Vice-Presidents, Prof. C. Le Neve Foster, D.Sc., F.G.S., F.R.S.; Dr. H. Woodward, F.R.S., F.G.S.
Secretaries, Prof. A. P. Coleman, Ph.D.; G. W. Lamplugh, F.G.S.; Prof. H. A. Miers, F.R.S., F.G.S. (*Recorder*).

D.—ZOOLOGY.

President, Prof. L. C. Miall, F.R.S., F.L.S.
Vice-Presidents, Prof. W. A. Herdman, F.R.S.; Prof. R. Meldola, F.R.S.; Prof. E. B. Poulton, F.R.S.; Prof. R. Ramsay Wright, M.A., B.Sc.
Secretaries, W. Garstang, M.A., F.Z.S., (*Recorder*); W. E. Hoyle, M.A.; Prof. E. E. Prince, B.A.

E.—GEOGRAPHY.

President, J. Scott Keltie, LL.D., Sec. R.G.S.
Vice-Presidents, President N. Burwash, LL.D.; Major L. Darwin, Hon. Sec. R.G.S.; E. G. Ravenstein, F.R.G.S.
Secretaries, Col. F. Bailey, Sec. R.S.G.S.; Capt. E. Deville, H. R. Mill, D.Sc., F.R.G.S. (*Recorder*); J. B. Tyrrell, M.A.

F.—ECONOMIC SCIENCE AND STATISTICS.

President, Prof. E. C. K. Gonner, M.A., F.S.S.
Vice-Presidents, Prof. W. Clark, M.A., LL. D.; Sir C. W. Fremantle, K.C.B.; Prof. J. Mavor.
Secretaries, E. Cannan, M.A., F.S.S.; H. Higgs, LL.B., F.S.S. (*Recorder*); Prof. Adam Shortt, M.A.

G.—MECHANICAL SCIENCE.

President.—G. F. Deacon, M. Inst.C.E.
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