

hardly be justified when known methods of fuel technology ordinarily followed in coal-burning countries make possible a far less wasteful use of the national supply. It is within the domain of research on forest products to work out ways of conservation of fuel, not only in forests but in the citizen's home, the cumulative value of which will mean an

enormous saving of an essential commodity. It is to be hoped that the authorities in charge of forestry will formulate comprehensive plans of investigation on all aspects of the problem and insist on their execution with the same speed as other technical and industrial schemes are favoured with.

EDITORIAL NOTES

MORALITY OF SCIENCE

UNTIL before the atom bomb, Science was considered non-moral. The search for the laws of nature and the knowledge of them was thought to be the right of every one who would seek it. No discrimination in gaining such knowledge and training for further discovery was tolerated. But the burst of the atom bomb on Hiroshima and Nagasaki has suddenly awakened the scientist's conscience and sense of responsibility. It has made him doubt if Science is, after all, outside the purview of human ethics. Prof. Norbert Weiner of the Massachusetts Institute of Technology voiced the opinion of all thinking men when he raised serious objections against freely imparting his findings on controlled missiles. In his letter to a fellow-worker—probably on a war weapon—he questions the current morality of disseminating all knowledge indiscriminately. "In the past, the comity of scholars has made it a custom to furnish scientific information to any person seriously seeking it," writes Prof. Weiner. "However, we must face facts: The policy of the government itself during and after the war, say in the bombing of Hiroshima and Nagasaki, has made it clear that to provide scientific information is not a necessarily innocent act, and may entail the gravest consequences. One, therefore, cannot escape reconsidering the established custom of the scientist to give information to every person who may inquire of him. The interchange of ideas, one of the great traditions of science, must of course receive certain limitations when the scientist becomes an arbiter of life and death.

"The measures taken during the war by our military agencies, in restricting the free intercourse among scientists on related projects or even on the same project, have gone so far that it is clear that if continued in time of peace this policy will lead to the total irresponsibility of the scientist, and ultimately to the death of science. Both of these are disastrous for our civilisation and entail grave and immediate peril for the public."

Continuing, the professor writes, "The experience of the scientists who have worked on the atomic bomb has indicated that in any investigation of this kind the scientist ends by putting unlimited powers in the hands of the people whom he is least inclined to trust with their use. If, therefore, I do not desire to participate in the bombing or poisoning of defenceless peoples—and I most sincerely do not—I must take a serious responsibility as to those to whom I disclose my scientific ideas."

These contentions of Prof. Weiner and men like him—who are many—strongly remind us of the age-old Hindu precept which enjoins the *Guru* to be careful, circumspect and severely strict in choosing his successor who will be called upon to carry forward the torch of Knowledge. And to-day we are driven to think on almost exactly similar lines, that all men could not be trusted with the power for evil.

The importance of psychological fitness for the respective professions is being increasingly recognised. In this era of the atom bomb, therefore, a huge responsibility devolves on the scientist in imparting to the world at large new scientific information, especially information of the kind likely to be misused as a weapon of war. It is clear that the profession of science can only be entrusted to those who entertain such an abhorrence of war and human suffering that they would rather sacrifice science as a career than co-operate with the war-monger in any form. Another and more practical way of preventing the abuse of science is for the scientists, as a class, to refuse, in the words of Sir J. C. Ghosh, to be the camp followers of politicians. We trust the urgent realisation of the gruesome consequences of the use of the atom bomb will swell the volume of opinion in favour of humane and rational science taking the lead in the management of world affairs. For it is abundantly clear that current politics has woefully failed to keep pace with the progress of science which has broken barriers and erased man-made frontiers. We wish the Atomic Scientists, led by Professor Einstein, every success in their efforts to rationalise the application of science for the promotion of human happiness.

FACTORY TRAINING FOR INDIAN STUDENTS OVERSEAS

WE are receiving repeated complaints from our scholars in the United Kingdom and United States that facilities for practical training are lacking in both the countries. While the universities and technical schools have extended a warm welcome to Indian students, the factories and industrial plants have failed to encourage them. Mr. Krishnamurti from Akron, Ohio, writes in a letter to *The Hindu*, "With great difficulty I was able to arrange and complete three months' training in the Firestone Tyre Company ... I have been trying to arrange for further practical instruction,