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OVERSEAS TRAINING OF SCIENTIFIC PERSONNEL

THE appointment of a Committee by the Government of India to review the working of the Scheme for Overseas Training of Scientific Personnel will be warmly and widely welcomed. The step is indicative of the appreciation of certain inherent defects in the scheme as well as of the awareness that it is capable of further improvement. We are not acquainted with details of the terms of reference to the Committee, but we hope that they are comprehensive enough to cover all aspects of the scheme including those pertaining to a proper utilisation and harnessing of scientific and technological man-power, now being trained in England and America.

We have had occasion to write before about the recruitment of students for training overseas, and the difficulties of admission and living accommodation in U.S.A. and U.K. We had suggested that admission might also be sought in universities of other countries, like Australia, New Zealand, Sweden and Russia.

Most of the recommendations have been accepted, and efforts are being made to improve the living conditions of students deputed to U.K. Maulana Azad, Member for Education, has made it clear that the Government of India are selecting students for training on the basis of merit and qualification alone. There can hardly be any dispute, both from the short and long-range view, on the soundness of such a procedure.

It is now two years since the scheme was inaugurated. The first batch of "Dalal Boys" are due to arrive within a few months. Arrangements are to be made to receive them and place them in congenial positions. We are painfully aware of lost opportunities and languishing talents in the past. This, we hope, will not happen again. Our men and women must have the full opportunity, the freedom, the stimulating and the contented atmosphere in which they can work and contribute their best to the common cause.

In preparing for the reception of our young men it might be of help to remember the atmosphere, background and method of training in foreign countries. Guided by eminent scientists with sympathy and understanding in laboratories equipped with the latest types of labour-saving devices and precision instruments, they would be returning home on the eve of the long-cherished liberation of our country from bondage. Life in a free country, however short, is sure to have fired them with patriotic fervour and enthusiasm, to do their little bit for the regeneration of their motherland even as their counterparts are doing elsewhere.

These people, it must be admitted, will find on their return the same ill-equipped laboratories and a general lack of co-ordination of activities and co-operation in research which they had left behind them when they went abroad. Even the meagre equipment in our laboratories have not been, owing to severe restrictions on imports, replaced and much less added to, for the last seven years, when the pace of scientific advancement in other countries, has been particularly rapid. Our backwardness in establishing, during the war, a scientific instrument industry is equally responsible for the slow advancement of science in India. All the same there is no reason why the enthusiasm of the newcomers should not be carefully nurtured and directed into fruitful channels, or all possible facilities and freedom should not be given to them to carry out work after their own heart. With all our limitations, the elder scientists are in a position to extend to them the very necessary encouragement and co-operation in their efforts to establish a sound, creative atmosphere of science. The incoming young men, on their part, cannot naturally expect to revolutionise Indian scientific research overnight. They have to build up bravely and patiently, at times against odds, the scientific edifice of their dreams. We are confident that both the young and the old will work hand in hand in the cause of science and national progress.

As a measure of replacement of the present scheme of training students abroad, with obvious saving in money and time, the suggestion of Mrs. Ellen Watmull cannot be too strongly recommended. "At the present time it costs

from Rs. 30-50 thousand to educate one young person in the United States", writes Mrs. Watmull, "and slightly less in England. Multiply this by 600, the number of Indian students in U.S.A., and you have an impressive sum, Rs. 180-300 lakhs spent every two to three years in U.S.A. alone. Why not send half the number of students, or even less than that, abroad" she rightly asks, "and spend the rest of the money in developing Indian Universities?" Continuing, she writes, "An electron microscope costs about Rs. 25,000, less than the cost of higher education abroad of one Indian student for two years. And what a blessing it will be to have such a microscope in every medical school and technological institute! Similarly laboratory facilities will enable India's scientists to do research second to none in the world."

In such a scheme of expansion and equipment of universities and research institutions in the country, which is also contemplated on a small scale by the Government of India, we would urge on the Government the policy of inviting technical experts and eminent men of science from abroad to train up our young men to the level of efficiency which would bring our academic institutions and, in general, our scientific front, on a par with the best in the world. We could, for instance, invite experts in fisheries and marine industries from Japan, chemical technologists from Germany, mining and metallurgical engineers from Italy, Russia, Canada and America. A measure of the benefit we could gain from such a scheme can be gauged if we remember the enviable place the United States have attained in Science and Technology owing largely to the policy of welcoming refugee intellectuals from foreign lands. It is also worthy of note that Russia is studiously importing German experts to man her laboratories and industries. The United Kingdom, which has in many respects remained highly conservative, has not hesitated to take this salutary step. We should indeed be losing a great opportunity if we do not follow the example even as our immediate neighbour, Australia, is now doing, without running the risk of condemning our country to remain for a considerable time in the backyard of modern civilisation.