Commission of Conservation
CANADA

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CONSERVATION is published the first of each month. Its object is the dissemination of information relative to the natural resources of Canada, their development and proper conservation, and the publication of timely articles on town-planning and public health.

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AN IMPORTANT CONTRIBUTION

CONSERVATION is indebted this month to Mr. H. L. Baldensperger of the United States National Committee on Prisons and Prison Labour for the valuable article on the utilization of municipal waste, which appears on the first page.

Canadian municipal authorities should investigate more fully the methods by which Chicago has been able to make such great savings from its garbage dumps. Those who wish to do so, can obtain detailed information from the War Bureau, National Committee on Prisons and Prison Labour, Union Trust Building, Washington, D.C.

Wealth in City Dumps

(Concluded from page 41.)

Jewish Charities of New York that in the average family of five there is a household waste of $12.50, not including table waste. Under our present system of handling waste, this material is either carted to the dump by the street-cleaning department or destroyed at the reduction plant. The logical place to retrieve the waste of the community is at the dump.

One reason for the failure to adopt methods of conservation has been the increasing cost of labour. Sorting and preparing of material are practically all done by hand. It is cheaper for the average industry to buy new material than to resort the old. The business methods of the western world of cutting labour costs by scrapping waste commodities have been a persistent drain on the resources of the country. The demand for men in the army will further increase the cost of labour and lead to a greater increase in the amount of material scrapped. Some new method of decreasing labour costs must be found in order to utilize the ever-increasing waste of the scrap pile. It is the incapacitated, those whose mentality makes necessary their maintenance and supervision in public institutions, who can be made the principal factor in solving this problem.

Our correctional institutions are the product of a society that maintains city dumps. We dump our waste man into the institution where he lies undeveloped. Most of our municipal and county workhouses are such in name only. Idleness reigns supreme or, if the inmate is employed, he is usually exploited for the benefit of the few.

The Chicago House of Correction is an exception to this rule. This institution has found the value of the waste man and the waste material. The superintendent, Mr. John L. Whitman, by employing the outcasts of society on the conservation of the city waste, has revealed new sources of revenue. In one year's operation he made a return equal to 50 per cent of the maintenance cost of the institution. The amount received by the city was 900 per cent more than what it derived from the sale of the city waste under the old system.

The year before the establishment of the salvage work at the House of Correction the city received $13,000 from the sale of unclassified waste. The following year the amount received amounted to $136,000, which was utilized as follows: $86,000 was credited to the city departments, $10,000 was turned into the city treasury and over $40,000 was set aside for the relief of the prisoner's families.

Reduction methods employed by commercial dealers destroy many valuable by-products. These materials are conserved at the institution by hand labour. The inmates cut the lead and rubber covering from pieces of conduit wire and, in a year's time, added $11,000 worth of this material to the national supply. The burned-out electric light bulbs are sold by commercial dealers for the brass socket and the flint glass. One inmate of the Chicago House of Correction cut out the platinum used in the lamps, and conserved over $9,000 worth of this material in one year. Over $5,000 worth of waste paper was sorted out and sold in one year.

The Canadian campaign for conservation of such wastes has been limited largely to paper-stock. Canada destroys approximately 250 tons of paper weekly. In order to replace this paper, at least 2,000 trees must be cut. Every ton of paper wasted means that eight trees of mature growth must be cut. By inaugurating a system similar to the Chicago salvage system, the Canadian municipalities should conserve sufficient paper to offset this drain on the national resources.

Canada has dabbled in waste conservation. The waste campaign which has been carried on during the last year has rendered a vital service to the country, but its true service is solely to reveal the possibilities in this field. The present method of a voluntary movement without any government supervision will be partially successful in war time; its success as a peace time movement is problematical. The success of the present movement proves that waste conservation must be continued after the war, but its faults ought not to be incorporated in a well-rounded system of conservation.

It is unwise to permit the women of a country to take work which, thereby, diverts skilled workers to a line of work that is purely mechanical and requires little skill. It is unwise to use the trucks of commercial houses when the vehicles of the city departments can be used more effectively and economically. A logical system which will prove successful both in times of peace as well as war would avoid these weaknesses by making this type of work an integral part of government. This would solve the problem of storage and collection. By employing the mentally and physically unfit in the public institutions, this heretofore unemployable element of society can be afforded an opportunity to become self-supporting at work which does not require any special training.—*H. L. Baldensperger.*

VEGETABLES SHOULD BE PROPERLY STORED

This year, in response to appeals for increased food supplies, Canadians have produced a record crop of vegetables.

That the greatest use may be made of these products it is essential that care be exercised in their storage and preservation. A cool, dry cellar is the best place to store vegetables. Carrots, parsnips, beets, etc., if covered with sand, will not dry and shrivel up. Cabbage are best taken up and hung by the roots individually. Green tomatoes, when too late to ripen outside, should be wrapped individually in paper and kept in a dark place to ripen, and, while not taking on altogether the colour of those exposed to the sun, they are otherwise as satisfactory. Tomatoes thus ripened may be used till Christmas.

Potato supplies, for those who have not grown their own, should be secured this autumn. The farmers have grown large quantities, and in many cases losses will be heavy if they find it necessary to store them. In addition, during several of our winter months, it is not safe to market potatoes, which leaves the consumer dependent upon the middleman for supplies, usually at an enhanced price. By early distribution, the storage problem can be largely solved and much of the waste due to freezing avoided.

If the same patriotic effort is given to the preservation of the 1917 crop as was exhibited in its production, very little waste will occur.

For every passenger killed on steam or electric railways in Canada, more than four persons are burned to death by fire.

British Columbia Fire Losses Heavy

Commission of Conservation's Survey Shows Need for Looking After Burnt-Over Areas

Few people realize the enormous damage which has been caused by forest fires in years past. This damage has taken place in every province of the Dominion. An illuminating example is afforded by the investigation of forest resources of British Columbia, upon which the Commission of Conservation has been engaged during the past four years. This investigation shows that on 95,000 square miles the timber has been useless ly destroyed by fire, mostly many years ago. The amount of timber so destroyed is estimated to be not less than 650,000 million feet, or about twenty-two times as much as the total that has ever been cut by the lumbermen in that province. Putting the loss in another way, this timber is equivalent to almost twice the amount of saw timber now standing in the province, and to nearly as much saw timber as is now standing in the forests of all Canada.

Much of the area burned over contains young forest growth which, if protected from further destruction, will, in time, furnish the basis for enormous industrial development on our Pacific coast. If we assume that the 97,000 square miles of cut-over and burned-over lands should be made to produce an average of only 100 board feet per acre per annum, the total increment would amount to 6,200 million feet per year, or about 5 times the present annual cut. That this estimate is by no means beyond the bounds of reason is shown by measurements of growth which have actually been made.—*C. L.*

HOME FROM OVERSEAS

Bombardier Allan Donnell, of the staff of the Commission of Conservation, who has been invalided home, was given a welcome back in the form of a reception on October 17 by his fellow employees. Bombardier Donnell was wounded in the foot by a gas shell last April.

FIGHTING FORESTERS

Sixty-five men from the Faculty of Forestry of the University of Toronto are fighting overseas. Every graduate of the past three years who is physically fit is serving the Empire in some capacity. Other forestry schools have had a similar experience, with the result that there is, and will be for many years, a great scarcity of technically-trained foresters.

Owing to the shortage of coal, Norway is greatly extending its use of peat for fuel. An output of 100,000 tons is expected this year.