

Dry-Farming and the Congress

Lethbridge, October 21-26

By JOHN T. BURNS, Executive Secretary-Treasurer

Dry-Farming is the science of agriculture as applied to farming operations in regions of limited or uncertain rainfall. This in general applies to all arid and semi-arid regions, and is more specifically applicable where the annual precipitation is less than 20 inches, evaporation deducted, but it is a mistake to suppose that the principles underlying it are only applicable to arid and semi-arid countries. While they are necessarily more needed in those sections, nevertheless the same ideas and lines of action need to be impressed upon cultivators of land wherever there is likely to be a deficiency in the rainfall at any time of the year, and this means practically every country in the world.

Dry-farming is better farming—it is scientific farming—but scientific farming is not always dry-farming. It is a profitable system for every farmer upon every farm in the world. It is not farming without moisture, but it is the method by which the natural rainfall is conserved in the soil, by which soils are enriched and drought-resistant plants are developed, with the object of saving the moisture.

Develops the Best Farmers

Dry-farming is the successful cultivation of the soil that has been handled for the purpose of conserving the moisture, the intensive operation thereof, the rotation of crops and the adoption of summer fallow, it being necessary on much of the dry land of the desert plains and prairies so to cultivate that a crop is assured every year on one-half of the land operated, thus avoiding the frequent and oftentimes continuous crop failures due to successive seasons of drought. Dry-farming practice develops the best farmers on earth. The best grains for milling and baking purposes, and the best fruits are those raised by dry-farming methods.

Nearly six-tenths of the earth's surface receives an annual rainfall of less than 20 inches, and can be reclaimed for agricultural purposes only by irrigation and dry-farming. Scientists have computed that a perfected world's system of irrigation will convert about one-tenth of this vast area into an incomparable fruitful garden, leaving about one-half of the earth's land surface to be reclaimed, if at all, by the methods of dry-farming.

Utah Was the Pioneer

The noble system of modern agriculture has been constructed almost wholly in countries of abundant rainfall, and its applications are those demanded for the agricultural development of humid regions. Until recently, irrigation was given scant attention, and dry-farming, with its world problem of conquering one-half of the earth, was not considered. The pioneers in irrigation in the Western States, and particularly in Utah, the first to adopt irrigation (in 1847), were not long in discovering that wheat production on irrigated lands, considering the cost of water, did not return a fair interest on the capital invested, and they turned their thoughts to the scientific farming of the dry land, and in time dry-farming became a fixed principle and a practical method. Today the United States Government has twenty-five of its experiment stations devoting their entire attention to dry-farming experiments, and to the educating of the farmers in the use of drought-resistant plants and the modern tillage methods that are bringing success to all who are trying them.

Many states are also doing a wonderful work along the line of encouraging the extension of dry-farming methods. At the dry-farm experimental stations conducted under the auspices of, or in conjunction with, the state agricultural colleges, tests are being made in the open in the growth of oats, wheat, corn, barley, alfalfa, rye, potatoes, fruit and

vegetables, and the results of these experiments are published and distributed without charge to all who are interested.

Its Possibilities Stupendous

Desert lands, as a rule, receive less than 10 inches of rainfall, and seldom as much as 20 inches in one year, and often times the rainfall is all in one season, during the winter months, in the form of snow, and dry-farming has been successfully proven as the only means of conserving this moisture of one season and retaining it for the use of growing throughout the next season and successfully reaping a harvest. In order to coax from such parts of the soil as the desert lands with 5 to 10 inches of rainfall in one year a sufficient quantity of farm products to pay for the trouble and yield a profit, scientific methods must be followed. It is not enough to turn the crust and plant the seed. The soil must first be analyzed—the seed must be tested and it must be planted and cultivated with due regard to the character of the soil, the average precipitation in the locality being cultivated and the needs of the variety of grain being grown.

The possibilities of dry-farming are stupendous, according to Dr. John A. Widtsoe, who is one of the leading authorities. In a recent treatise from his pen we read:—

"In the strength of youth we may have felt envious of the great one of old: of Columbus, looking upon the shadow of the greatest continent; of Balboa, shouting greetings to the resting Pacific; of Father Escalante, pon-

blossoming fields, with churches and homes and schools, and, in the distance, with the vision is heard the laughter of happy children. The desert will be conquered."

Success Depends Upon Brains

The past two years have been severe tests to dry-farming theories in many sections, because of the low precipitation, and yet where brains have been utilized as well as brawn success has been attained, and often times most marvellous crops have been raised. There are certain basic principles, such as deep plowing, a surface mulch and the deep harrowing of the growing crops, seed and crop selection, time of seeding and amount of seed used that are always applicable in successful dry-farming, but as to the depth of plowing, either fine or coarse mulch, whether soil should be packed or left to pack itself, and many other problems, these are local and incidental, and each farmer has to study his own conditions and know which is best for himself from the results obtained by other men working under the same conditions in other parts of the world.

The International Dry-Farming Congress is an altruistic organization, and it has been one of the wonders of modern organization. It is devoid of politics or religion; it caters to all, for the good of all, and its mission has been carried out in a wide-open policy of advancing agriculture to the high plane it worthily deserves, elevating the farm home and increasing the crop yield through systematic, scientific tillage

an idea, and it never wavered therefrom.

The growth of the Congress has been almost marvellous. Starting from the small beginning of a mere handful of men in Denver, Colo., in 1905, it has broadened out and grown to upwards of 15,000 members, with working branches in sixteen countries of the world, and with individual members scattered throughout fifty nations. Its membership stretches from the far north to the far south, and from east to west on both hemispheres, and it is daily increasing.

Six Annual Sessions Held

Six annual sessions have been held successively in Denver, Salt Lake City, Cheyenne, Billings, Spokane and Colorado Springs, each addressed by the most learned agricultural instructors and progressive men of advanced thoughts in the world, coming from as far south as Australia, from Algiers, Hungary, India, Russia, Turkey, France, Germany, Italy, Brazil, Peru, Mexico and other countries, while the educators of nearly every state in the United States and every province in Canada have participated in the deliberations of the Congress.

Its former presidents have been the late Fisher Harris, of Salt Lake City; ex-Gov. B. B. Brooks, of Wyoming; Gov. Edwin L. Norris, of Montana; Congressman Frank W. Mondell, of Wyoming, and Dr. John H. Worst, president of North Dakota Agricultural College.

Membership and Officers

The members of the Congress are those who have paid the annual \$1 fee, and delegates who are appointed under a call issued each year by the officers. Heads of governments, departments of agriculture, agricultural schools, agricultural societies and civic bodies are permitted to name delegates. The organization is made up of a president, executive secretary-treasurer; honorary vice-presidents, who are former presidents; three American vice-presidents; international corresponding secretaries; a board of governors; an executive committee, and a local board of control selected by the state or province of the county in which the session is being held.

This year the congress is officered as follows: International president, Dr. John A. Widtsoe, president of Utah Agricultural College, Logan, Utah; chairman foundation fund, Dr. J. H. Worst, Fargo, N.D.; executive secretary-treasurer, John T. Burns, Lethbridge, Alberta, Canada; board of governors, George Harecourt, Edmonton, Alberta, Canada, chairman; F. B. Linfield, Bozeman, Mont.; Daniel Morgan, Spokane, Washington; C. R. Root, Denver, Colorado; A. F. Mantle, Regina, Saskatchewan; Dr. John A. Widtsoe, Logan, Utah; John T. Burns, Lethbridge, Alberta, Canada; executive board of control, Fred W. Downer, Lethbridge, chairman; Mayor George M. Hatch, H. J. Goode, J. W. McNicol, A. V. Gibbons, E. A. Cunningham and G. R. Tinning, all of Lethbridge. In addition there are 125 representative men of the Dominion of Canada and of the four Western Provinces of Canada who are honorary members of the Canadian Board of Control, of which the honorary president is Hon. Duncan Marshall, minister of agriculture of Alberta, and the honorary vice-president, Hon. W. R. Motherwell, minister of agriculture of Saskatchewan.

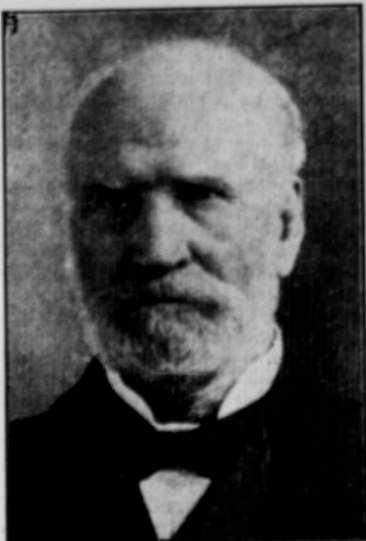
Pioneer Organizations

The pioneer Dry-Farming organization was a scientific association, with headquarters in Denver, of which J. L. Donahue and C. C. Williams, the latter a former Denver newspaper man and then editor of the Scientific Farmer, were the moving spirits. This association gained several hundred members in Colo-

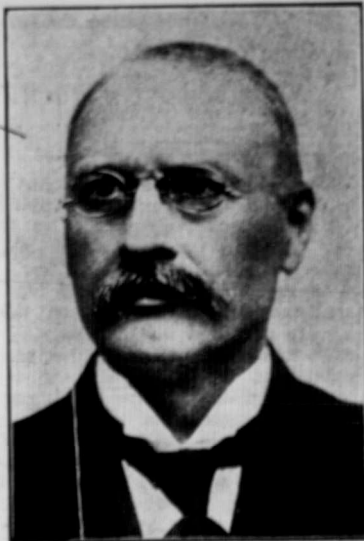
Continued on Page 18



SIR THOMAS SHAUGHNESSY
President C.P.R., who will address the Seventh
Dry-Farming Congress, Lethbridge, Alta.,
October 21-26



HON. JAMES WILSON
U.S. Sec'y of Agriculture, who will represent
President Taft at Dry-Farming Congress



DR. J. H. WORST
President North Dakota Agricultural College,
Vice-President and Chairman Foundation Fund of
Dry-Farming Congress

dering upon the mystery of the world, alone, near the shores of America's dead seas. We need harbor no envyings, for in the conquest of the non-irrigated and non-irrigable desert are offered as fine opportunities as the world has known to the makers and shapers of empires. We stand before an undiscovered land; through the restless, ascending currents of heated desert air the vision comes and goes. With striving eyes the desert is seen covered with

and conservation of the moisture. Men and women pay its nominal dues of \$1 a year, leave their business and travel long distances, merely for the development of an idea, that a system of farming may result for the benefit of future generations. Nearly every other large organization that has attempted a world-wide campaign of any nature has had an underlying current of self-interest. The Dry-Farming Congress has always stood fast to an ideal and