AERONAUTICS

Dispersal System

➤ FOGS will hold no terror for incoming pilots to the Los Angeles Airport when the new thermal dispersal system being installed is completed. Burning diesel oil will provide the heat to "lift" the fogs to a high enough ceiling to permit clear visibility of the runways.

The first unit of the thermal dispersal system is already completed. Other units will follow rapidly. It is the first commercial installation of a system of this sort, although it has already been used in fields of the armed services. Familiarly, it is known as Fido, the name being British. Fido (fog intensive dispersal of) was developed and put into use in England during the war to permit the safe landing of war planes returning to British bases after missions over enemy country.

The system under installation in Los Angeles is an improved Fido. This one uses cheap oil for fuel, and the burners are controlled electrically by a single operator. Proper placement of the burners has been determined by study and experimentation. It was developed by the Todd Shipyards Corporation and its installation is sponsored by the U. S. Civil Aeronautics Administration and the Los Angeles Department of Airports.

The principle behind the operation of the thermal dispersal system is simple. By the application of heat, the saturation point of the atmosphere is raised to absorb water vapor over and in the immediate vicinity of the runway. Three high-pressure jet-atomizing nozzles are mounted in each of 392 burners erected about two feet above the ground. The oil is ignited by electricity, and electrical control regulates release of oil and thus the intensity of the flame.

The installation there is designed to give a 300- to 400-feet ceiling in the 2,000-foot approach zone, 250-foot ceiling in the 1,000foot touchdown zone, and a ceiling of 200

feet in the remaining 3,000 feet of runway. The 392 burners, or "triads," parallel both sides of the main east-west runway and approach path for 6,000 feet.

Fido is only one of five navigation aides to be installed at the Los Angeles port to permit bad-weather landings. The others include high-intensity elevated runway lights, the new CAA "Slope-line Approach System," surveillance radar to locate all planes in the neighborhood and precision approach radar, a ground-controlled-approach (GCA) equipment.

Science News Letter, March 5, 1949

ENGINEERING

National Plumbing Code Sought by Committee

➤ A SINGLE national plumbing code is the objective of various organizations which will be represented in Washington early in March to perfect a code for voluntary adoption by state and local authorities, it was revealed.

Invitations to the meeting, which were extended jointly by the U. S. Department of Commerce and the Housing and Home Finance Agency, have been sent to six organizations. They are the American Standards Association, Building Officials Conference of America, Western Plumbing Officials Conference, American Society of Sanitary Engineers, Conference of State Sanitary Engineers and the Uniform Plumbing Code Committee.

When the Coordinating Committee is set up, it will become the standing committee on a national plumbing code. It will supplement the work already under way of the Uniform Plumbing Code Committee in hopes of an eventual agreement on a single national set of regulations. It will assist municipalities on problems arising in the adoption or revision of codes.

Tests and other work necessary for revision and expansion of housing codes to an overall code have already been carried out by government departments. The setups for the tests are at the National Bureau of Standards. They include the complete equipment for the systems used in small houses and in two-story duplex dwellings. The arrangements provide the means of studying three major problems. These are self-siphonage of fixture traps, stack-vented and wet-vented installations.

Science News Letter, March 5, 1949

SCIENCE NEWS LETTER

VOL. 55 MARCH 5, 1949 No. 10

48,500 copies of this issue printed

The Weekly Summary of Current Science, published every Saturday by SCIENCE SERVICE, Inc., 1719 N St., N. W., Washington 6, D. C., NOrth 2255. Edited by WATSON DAVIS.

Subscription rates: 1 yr., \$5.50; 2 yrs., \$10.00; yrs., \$14.50; single copy, 15 cents, more than x months old, 25 cents. No charge for foreign postage.

Change of address: Three weeks notice is required. When ordering a change, please state exactly how magazine is now addressed. Your new address should include postal zone number if you have one.

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Printed in U. S. A. Entered as second class matter at the post office at Washington, D. C. under the act of March 3, 1879. Established in mimeographed form March 18, 1922. Title registered as trademark, U. S. and Canadian Patent Offices. Indexed in Readers' Guide to periodical Literature, Abridged Guide, and the Engineering Index

Member Audit Bureau of Circulation. Advertising Representatives: Howland and Howland, Inc., 393 7th Ave., N.Y.C., PEnnsylvania 6-5566 and 360 N. Michigan Ave., Chicago, STAte 4439.

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