

DECEMBER 1972

# GRIST

VOLUME 16/NUMBER 7

## GRIST AWARD WINNERS ANNOUNCED

The National Recreation and Park Association recently announced the winners of the 1971 GRIST awards. First prize of \$100 and an award certificate went to R.H. Ahrens, director of the Department of Recreation and Conservation, Province of British Columbia, Canada. The suggestion (see GRIST Vol. 15, No. 3, p. 31) which won Ahrens the first prize award was a combination safety boat-house and alarm. The boat, a lightweight rubber air-inflatable raft, triggers an airhorn when it is removed from its storage area—thus alerting the public of an emergency. The horn also deters would-be thieves as the alarm is triggered to go off anytime the boat is removed. The idea is already in use throughout British Columbia.

Second prize of \$50 went to D.E. Merket, interpretive specialist for the California Department of Parks and Recreation, District Five, for his Junior Ranger program idea. The program (see GRIST Vol. 15, No. 3, p. 27) is designed to increase awareness among California youth and consists of campfire programs and environmental awareness sessions with young campers. The program also provides initiative for the campers to participate in a litter clean-

up program, which Merket says was quite successful the first time it was tried.

One of two third place prizes of \$25 also went to a member of the California Department of Parks and Recreation. Earl Wilder, ranger for the Bothe-Napa Valley State Park, won an award for his garbage can cleaning rack idea (see GRIST Vol. 15, No. 5, p. 60). The rack, which is attached to the rear of a flat bed truck, consists of two cans, one with detergent water and one with rinse water. When a filled can is emptied onto the truck, it is then dipped into the wash can, scrubbed clean, and then rinsed with water from the rinse can. This method enables cans to be cleaned on location without the necessity of removing them to a central cleaning point.

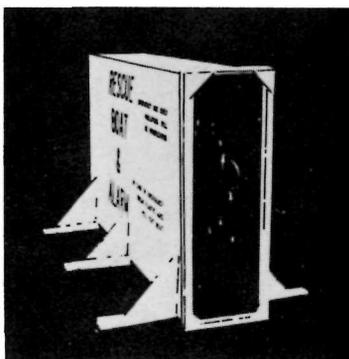
The other third place prize goes to perennial contributor Ed Fahey, senior park manager at the Cherry Creek Recreation Area, Denver, Colorado. Ed's award is based more on the constancy of his contributions than on any single idea. For the six GRIST issues of 1971, Ed managed to suggest something in four of them. Ed will receive a \$25 award and a certificate.

Among Ed's suggestions are the

following: Instead of trying to hide an exposed culvert section, paint it to match the surrounding landscape; (see GRIST Vol. 15, No. 5, p. 54). When there is temporary or seasonal need for a traffic sign, insert a section of pipe in the ground and install a cover on the pipe until you need it, then remove the cover and insert the sign pole — the cover protect the pipe section and prevents it from filling with debris during periods of disuse; (see grist vol. 15, No. 1, p. 2) and an ingenious method of thwarting would-be padlock vandals. This latter suggestion involves the use of three-inch pipe sections to protect the padlock when it is being used (see GRIST, Vol. 15, No.1, p. 12).

We wish to congratulate all four of the 1971 GRIST award winners for their inventiveness, ingenuity and positive efforts toward making park and recreation-related work easier and more efficient. We also wish to thank Messrs. Ahrens, Fahey, Merket and Wilder for their contribution to the Park Practice Program. It is due largely to the efforts of these gentlemen and countless others whose suggestions appear in these pages that this program is so successful. It is

(Continued on page 72)



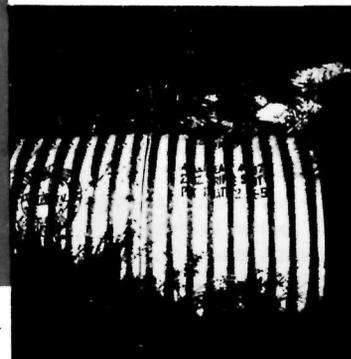
Alarming boat storage alerts emergency and thwarts vandals.

Earl Wilder has clean garbage cans.



Patches help motivate young Campers to participate in litter cleanup.

Ed Fahey says, "Paint it to match the landscape."



## SORBER MATS "DRINK" OIL

Oil spills a problem? Here's a product which absorbs 22 times its weight in oil and only 1 time its weight in water. The product — Conwed Oil Sorbers — comes in sheets, rolls, pads, booms and strips.

Designed for sorption of spilled oil products including all grades of fuel oil and gasoline and oil combinations, the product consists of a felted vegetable fiber mat internally reinforced with a polypropylene mesh to provide rapid and substantial oil sorption, with little water pickup, while maintaining strength and handleability.

The product is useful on lakes or waterways where oil or petroleum products have been spilled, and is equally useful in the shop for sorbing spilled oil from floors and tables.

The fiber component of the product will biodegrade if left out and the plastic netting will decompose by ultraviolet action. The

product is readily burnable, although it has indefinite keeping characteristics with oil sorption amounting to 16 1/2 times the weight of the product after the initial absorption of 22 times its weight. To reuse the sorber, run the fiber mesh through rollers placed 1/16" apart. This method also provides a way of recovering most of the spilled product.

The fiber mesh is waterproof (water absorption is only 4 percent) and floats.

The manufacturer states that the sorbers are extremely fast, with absorption taking place within the first 30 seconds for most petroleum products.

More information; including complete comparison charts for the Conwed sorbers and comparable products, sorption tables, product characteristics and a sample mat; is available from Conwed Corp., 2200 Highcrest Rd., St. Paul, Minnesota 55113 [612-633-8660].



Sorbent Pads pick up from 15 to 20 times their own weight in oil and can be wrung out for reuse.



Beaches are protected with Sorbent blankets, available in 35-inch widths up to 200-foot long.



For oil spills in swampy areas Sorbent Strips are used.

## NEW ANALYZER FOR WATER POLLUTION CONTROL

Weston and Stack's new Model 5000 analyzer provides continuous monitoring of dissolved oxygen in tidal estuaries, industrial plant outfalls, water pollution control plants, and other applications. It is intended for use where salinity as well as temperature of flow or water body varies through a wide range.

The new model provides automated compensation for effects of temperature and salinity changes on the galvanic membrane-type Dissolved Oxygen Probe. Compensation is necessary because diffusion rate through the Teflon membrane is a function of temperature, and diffusional driving force for oxygen in solution is a function of salinity. The electrometer of Model 5000 uses outputs from temperature and conductivity sensors to accomplish compensation of the Dissolved Oxygen reading. This model also provides monitoring of temperature and conductivity.



Although available in any NEMA enclosure, the most commonly furnished is NEMA 4, 20" high x 16" wide and 10" deep. The model is also available on a 19" wide x 8 3/4" high panel-mount installed in a table top console. The console is approximately 21" x 21" x 11" high. If 115V 50/60 hertz power is available, the new model may be used on shipboard.

For a copy of descriptive Bulletin 901 write to: Weston and Stack, Inc., 446 Lancaster Ave., Malvern, PA 19355.

## GETTING YOURSELF INTO HOT WATER

If you are providing hot water convenience for visitors, you may wonder just how much of the water is being used and how much is being wasted. In an article for Campground and RV Park Management, Nov. 71, author Barry Wright states that hot water waste can run as high as 50 percent in camping areas. This gross inefficiency can, and often does, result in costly fuel bills and lack of hot water for users.

However, Wright has discovered an economical and easy method of saving both fuel and hot water. At Modern Camping, a recreation vehicle park located near the Air Force Academy in Colorado, automatic cut-off valves are used in the lavatories. By mixing the hot and cold water at the shower riser, and installing individual cut-off valves for each shower head, the

owners of the camp have reduced waste almost 100 percent.

The only problem, Wright states, is that by mixing the water prior to the shower head it will not suit everyone's tastes. The camp owners reply that "quite warm" seems to be a good compromise, though.

This type of valve, similar to the ones installed in public building washrooms, can be used for showers, washbasins, laundry room sinks or any other place where hot water is needed but waste runs high.

One supplier for the valves and shower heads is the Bradley Washfountain Co., Fountain Blvd., Menomonee Falls, Wisc., 53051 (tel: 414-251-6000). Typical prices for the valve-shower head combinations are \$40.00 for the single outlet and \$300.00 for a 6-outlet shower column.



Booms absorb approximately nine gal. of gas-oil in 120 minutes, less viscous oils up to 20 times weight of boom in 30 minutes or less. Used in series or individually.

## REVEGETATING SKI SLOPES

"Sixty inches of packed snow with 4 inches of powder on top and dotted with flashing skis and colorful clothing over a dense grass base" might describe the ideal ski area. In summer this same slope would blend perfectly with the green of the trees instead of showing bare brown gullies.

It is unfortunate that more attention is paid to the powder and base of a ski slope than the cover beneath the snow. However, with numerous new slopes being planned a growing interest is developing in carpeting the summer slopes with a cover of verdant cushiony grass.

Revegetating these areas is not easy, though. Areas used for ski development are characterized by several features which reduce the chances for quick natural revegetation once disturbed. Their high altitude with low mean temperatures and abundant snow provides a very short growing season. Soils in these areas are normally quite shallow and of recent origin. The soil's fertility immediately below the sur-

face few inches is generally exceedingly low, particularly in nitrogen — an essential plant nutrient.

Recent tests conducted by the USDA Forest Service and a private ski slope in the Cascade Mountain area near Wenatchee, Washington, indicate that revegetation is possible but not without some effort and a great deal of care.

In an article for the January, 1972, issue of Washington Farmer-Stockman, Glen O. Klock, USFS soil researcher, and Walter Hampton, manager of Wenatchee Mountain Ski Area, discuss methods they used to attempt revegetation of a slope. In order to get orchard grass, timothy and hard fescue to grow, the team had to fertilize the ground with nitrogen (in the form of Urea), phosphorus (as Superphosphate), and potassium (as Muriate of Potash). Broadcast planting was attempted on the snow but failed to produce any significant growth.

However, plots which were planted in

August grew, although they were still fragile due to the short growing season.

Results of the tests indicate that fertilizer will almost definitely be required — the amount and composition being determined by accurate soil analysis. The tests also indicated that the manner of planting is perhaps as important as the need for fertilization and the choice of seeds — as broadcast planting failed to produce any appreciable plant growth.

Crested wheatgrass and common ryegrass were also tested. All seed varieties thrived when planted in the fall and given an initial fertilization. All seed varieties failed to mature when broadcast on snow or when a starter fertilizer was omitted.

More information on the tests and results may be obtained from the US Department of Agriculture, US Forest Service, 319 SW Pine St., Box 3623, Portland, Oregon 97208 [503-226-3361].

## BOTTOM WATER OUT!

Visitors to Governor Dodge State Park, Wisconsin, have a surprise in store for them. The 150-acre man-made reservoir there has no spillway. Instead, the overflow water from the Twin Lake reservoir is shunted through a duct and out the bottom of the lake.

According to Russell E. Dunst, water resources research biologist for the state, the method prevents eutrophication — the rapid development of nuisance levels of plant and algae concentrations in the lake as a result of excess nutrients.

By draining the lake from the bottom, where the nitrogen-rich water usually settles due to its weight and water stratification, the nutrients are allowed to pass downstream thereby enriching the entire watershed and saving

the lake. Another advantage of the system is that water is aerated in passing through the effluent duct and provides a much improved environment for fishlife further downstream.

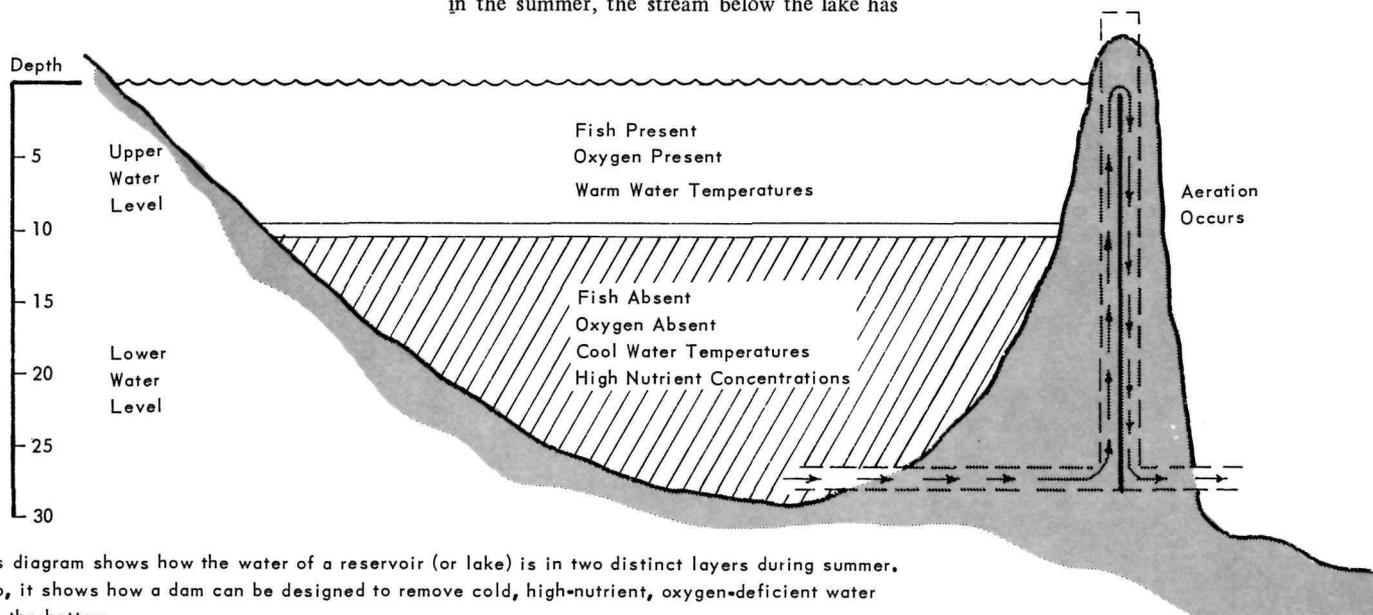
Dunst writing in the July-August 1970 issue of the Wisconsin Conservation Bulletin, explained that in the summer the lake stratifies into two levels separated by an almost impermeable barrier. The top 6 to 10 feet of Twin Lake, because of the sun's action, warms up to 75 to 85° and contains many fish and well oxygenated water due to plant photosynthesis. Below this and extending to the lake's floor is a layer of cold water which is oxygen-poor but nitrogen rich. The bottom layer does not usually contain fish.

Because the effluent is between 45 and 55° in the summer, the stream below the lake has

been stocked with brown trout, which live in cooler waters, and excellent cold-water sport fishing has been established.

Water level is maintained in the lake by a partition in the effluent duct which can be raised or lowered to change the lake level. Dunst said obnoxious gases are present at the outlet duct, but that is only a minor problem.

The continual discharge of water from the bottom of a reservoir is a promising new management tool. It may be feasible to apply it to other watersheds throughout the country where reservoirs are needed for storage or recreation but where eutrophication is a problem. "It is important to find ways to clean some of our waterways which have become too rich for their own good," Dunst said.



This diagram shows how the water of a reservoir (or lake) is in two distinct layers during summer. Also, it shows how a dam can be designed to remove cold, high-nutrient, oxygen-deficient water from the bottom.

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(From page 69)

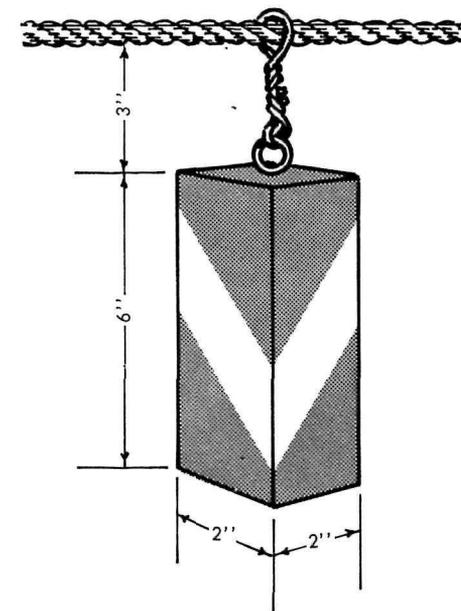
fitting that we should end a year's publications with a note of thanks to our audience which to some degree acts as a far-ranging staff. However, we feel that compliments shouldn't stand alone. We offer, then, this note of caution: The Park Practice Program has suffered periodically from a lack of concern from many of our state readers. This program is a joint effort of the Park Service, the state departments concerned with parks and recreation and the local park commissions and recreation boards. Without the support of our state and local readers, this program stands a good chance of becoming Park Service oriented. In that regard we worry, because one of the surest paths to boredom is to create a sameness in facilities and programs. Lest the program fall short of its goal of cooperation and dissemination—we appeal to you at the state and local level to send us your suggestions, whether for facilities, programs, or for time or money-saving techniques. Keep in mind that the suggestion which worked so well for your area might work even better for someone else. Let's share both the load and the rewards of caring for this nation's park and recreation interests. Parks are for all people.

## CATCHING THE MOTORIST'S EYE

Any device which better alerts the motoring public is worth a try. This idea, suggested by Chester K. Allard, park technician at Roosevelt Vanderbilt National Historic Site, N.Y., will certainly prove useful in getting the motorists attention.

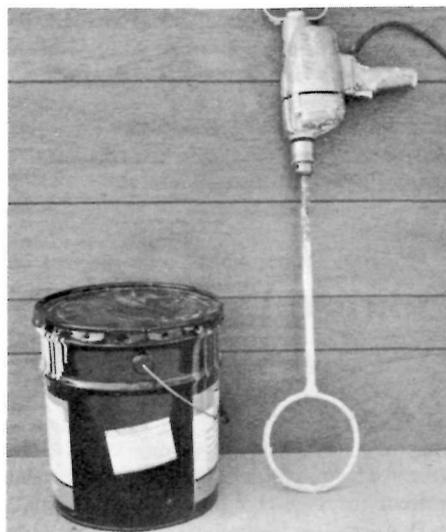
Allard suggests that barrier markers be used on chains, pipes, cables or other gates used to close off roads. To do this, cut up salvaged snow poles which have been painted with fluorescent paint into 6" sections. Into each section screw an eye-bolt and suspend the wood section 3" from the chain using heavy wire or coathangers.

Because the materials are readily available and no expense will be incurred, this suggestion should find easy adoption in the many areas where roads are closed off in the winter to allow for snowmobile or other ORV travel. And, since the idea is not exclusively a winter suggestion, it's possible that use could be made of the barrier markers on park roads which close at dark. For his suggestion, Allard received a \$25 award and a certificate.



ring of 6-8" diameter be used as a stirring rod for heavy mixtures.

After welding the two metal pieces together, they can be inserted into the chuck of a low (or variable) speed electric drill and used to homogenize nearly any textured mixture in three to



## ELECTRIC PAINT MIXER

For mixing paint, plaster and other heavy-textured mixtures, there have been several methods which have proved useful. The best of these is the paint-shaker/mixer machine which most hardware stores use. Unfortunately, this machine often cannot be justified and mixing is done by hand, with the usual mess and aggravation. Lee N. Donegan, maintenanceman at Bent's Old Fort National Historic Site, La Junta, Colorado, suggests that a rod 1/2 or 5/8" in diameter and about 24" long welded to a

four minutes. For his suggestion, Donegan received a \$25 award and an achievement certificate.

## UNDERWATER RESCUE LANTERNS

In the past year two drownings have occurred in fairly shallow water at Delaware Water Gap National Recreation Area. Both of these accidents involved considerable time and manpower spent in search and rescue missions. Helicopters were used by the state and in one of the incidents costs in excess of \$2,000 were incurred.

Karl Theune, park aide at the water gap, suggests an illuminating device be used for underwater searches. Three waterproof lanterns (GSA catalog #6230-936-8080 @ \$2.30 each) can be mounted on a steel bracket and attached to an extension pole. This device will easily enable underwater searches to be carried out to a depth of 20 feet.

Experience has shown that in order to provide a completely watertight seal, the switches of the lanterns must be covered with an additional waterproofing compound.

The use of a device like this would have facilitated rescue attempts for the drowned individuals. It should certainly prove helpful for any future accidents. For his idea, Theune received a \$50 award and a certificate.

## GRIST

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