# Less Than \$15,000 Provides Club With Unique Pool 

By WESLEY BINTZ<br>Swimming Pool Designer and Engineer

AN ATTRACTIVE golf course with beautiful lagoons and rustic bridges, artistically arranged clusters of thickets, several tennis courts set in a group of beautiful elms and maple, and a beautiful clubhouse-that is the Meadow Brook C.C. (St. Louis district).

William Berberich, young in years, but owning an unusually successful business in St. Louis, owner of a chain of hotels, and also owner of Meadow Brook, felt that such a beautiful plant was not complete as a profitable pleasure establishment without a swimming pool.

Accordingly the first of this year he called in the writer. Mr. Berberich began to ply me with all sorts of questions on swimming pool details, operation and construction costs, etc., and the writer, through years of experience, found it possible to stroke his chin and after going through a certain amount of abracadabra, pulled the proverbial rabbit out of the proverbial silk hat, in the form of a swimming pool to meet the demands and pocketbook of the owner. The outcome of this discussion was that the writer was to supply the pians and specifications for a swimming pool as hereinafter described, supervise the construction and equipping of same, and keep the cost inside of $\$ 15,000$.

## Ovoid Pool for Less Than $\$ 15,000$

This swimming pool is an ovoid or eggshaped pool 65 ft . x 105 ft . with each end of the pool crushed in just a little to form a squared end 22 ft .6 in . in width. The squared ends are exactly 105 ft . apart and allow four ample swimming lanes. The curved sides make it unusually nice to view aquatic events which will be carried on at this club.

This pool has an area of 5,635 sq. ft ., a volume of $193,500 \mathrm{gal}$. of water and depths of 3 ft . to 9 ft ., with 76 per cent of the pool of wadable depth, namely less than 5 ft . in depth. The pool is 100 per cent swimmable in that no part of it is less than 3 ft . deep.

Around the swimming pool is a concourse or promenade 12 ft . to 19 ft . wide. This concourse floor has an area of 4,394 sq. ft . extends entirely around the pool, and gives the project over-all dimensions of 89 ft . by 139 ft .

On this floor, and opposite the large shallow end of pool, is a little shallow wading pool for the children, all fenced in. This wading pool has a maximum width of 12 ft ., a maximum length of 34 ft . 6 in ., and has a depth range of 6 in . to 12 in . The kiddies' pool has its own inlets, four of them (one in each corner) its own outlet and is directly connected with the filtration plant, so that the water in it is continually being filtered along with the pool. As will be seen from the picture, the children's pool is artistically fenced in with a gate at each end and worked out in such a way that from five or six ft . away parents can be in water 3 ft . deep and still have an eye on their children.

## Eliminates Wasted Area

This particular arrangement of swimming pool and wading pool makes it possible to eliminate that area of water in the ordinary designed swimming pool between 12 in , or 18 in . deep up to 36 in . deep, which is almost 100 per cent wasted. The reason for this is that children play sitting down. When children become seven or eight years old, they begin to emulate their elders and stand up to play, and a child who has reached that age can immediately get into three feet of water, although it does sometimes come a little above his waist line. And of course every one knows that adults want water which is waist deep, which the pool gives them without any wasteful shallow areas.

The pool is very well equipped. It has a guard rope and floats, which are placed at the 5 foot depth, where it breaks into deep water. There are eight depth signs which can be read clear across the pool or right where you are standing, indicating the


Above is a general view of Meadow Brook's new 65 ft . $\times 105 \mathrm{ft}$. egg shaped pool, constructed at a somplete cost under $\$ 15,000$. The pool is 76 per cent wadable and 100 per cent swimmable.

A close-up of one end, showing the children's wading pool, appears below. This enclosure offers the maximum safety to youngsters and keeps them out of the pool proper.
depth of water opposite. A 14 ft ., 1 meter high spring board has been provided. The usual Bintz high dive, with diving elevations at two foot intervals, has also been added, but in place of the usual wood and steel construction, it has been built up of brick and concrete. There are six ladders, with steps recessed into the concrete wall. And five 25 foot high light poles, each of which carries two 1,000 watt projectors, give the pool and concourse floor ample light.

The pool has been provided with a $10,750 \mathrm{gal}$. per hour sterilization, filtera-
tion and re-circulation plant. This comprises three 60 in . vertical filters, all properly valved, pressure gages, flow indicators, observation glass, strainer system, filtering medium, coagulating and alkalinity devices, hair strainers and re-circulating pump and motor.

Plumbing has been so valved and outlined that it takes the water from three outlets at the deep end of the pool and after passing it thru the filters, introduces this water back into the pool at 3 inlets at the shallow end of the pool. It has also been valved so as to introduce fresh water


The high dive, with diving elevations at two-foot intervals, is constructed entirely of brick and concrete with the exception of course, of the top springboard. Water is 9 feet deep at this point.
at two inlets at about the position of the floats ( 35 ft . from the deep end of the pool). Water coming from the scum gutter can be by-passed to run to waste or can be sent through the filter system. The water in the children's wading pool, as above noted, is rlso connected to and can be individually filtered by the filter plant.

This filter equipment can not be seen in the picture but has been placed under the concourse floor at the deep end of the pool, involving the use of the Bintz patent. This irregular-shaped room has a width of 10 ft .4 ins. to 13 ft .4 ins., a length of approximately 41 ft ., and has an area of 465 sq. ft . which is equivalent to a building $16 \times 30 \mathrm{ft}$. In this room has been placed the above described filters with ample room for other storage. The room in which the filter plant is placed, is of course properly lighted, has the electrical control panels for the flood lights and motor, has continuous floor drain over its length, four large windows, and access by a stairway.

## Gives Cost Data

A few general facts will be of interest to the reader who might be contemplating a pool or as a comparison to the one he has. They are as follows: Cement at $\$ 2.60$ per bbl., sand at $\$ 2.25$ per cu. yd., gravel at $\$ 2.10$ per cu. yd., form lumber at $\$ 40.00$ per M, brick at $\$ 25.00$ per M, common labor at $781 / 2 \mathrm{C}$ per hour, carpenters at $\$ 1.25$, and masons at $\$ 1.50$ are the important material and labor costs. The project has 1400 cu . yds. of earth work, 242.3 cu . yds. of con-
crete work, 15.4 tons of steel, 2,250 brieks, 102 ft . of railing around the children's wading pool, 83 sq . ft . of windows, $1,340 \mathrm{ft}$. of drain and sewer tile and fittings, 10,500 sq. ft . of painting, 630 ft . of expansion joint, along with plumbing, lighting, pool equipment, purification system and miscellaneous details.

Contracts were about as follows: General contract $\$ 7,446$, plumbing and purification system completely installed $\$ 5,185$, painting $\$ 350$, and electrical work $\$ 395$, making a total cost of $\$ 13,376$. The walk connecting the pool with the club house was bid in at 20 c per sq . ft , and added several hundred dollars to the above cost. The entire project including commissions, was kept well inside of the $\$ 15,000$ originally set as top, an easy thing to do when one is entirely familiar with this type of structure and equipment involved.

## Formula for Cut-Worm Control Is Given

DR. RAY HUTSON of the Entomology department, Michigan State college, advises control of cutworms by the use of poisoned bran bait sprinkled over the turf late in the evening.

Formula
1 bushel bran
$1 / 2$ gallon cheap molasses
A little water
1 pound white arsenic or
1 pound paris green
2 or 3 oz . amyl acetate (banana oil or bronzing liquid).
Moisten the bran with the water which carries all the ingredients except the banana oil. Thoroughly mix the bran and other ingredients.
Cutworms have been an important pest on turf during the past season.

THOSE COURSES that have made a practice of maintaining a sod nursery are the lucky ones this season. They have had the necessary turf to patch bare spots on green, tee and fairway brought about by the drought and keep their courses in playable shape.

Other clubs will do well to plan the establishment of a sod nursery at an early date. Admittedly such a plot costs money to cultivate, but a well-conditioned course brings financial returns far beyond the expense of having sod available when it is needed.

