Scenes of the exciting indoor midget race sponsored by the Bay Cities Racing Association in the large Oakland Exposition Building, Oakland, Calif. Every Fri. and Sat. night for 6 weeks drivers vie for acclaim on the one-eighth mile track before capacity of 2000 or more spectators. Many builders will recognize this as scene of famous National Roadster Show.

INDOOR MIDGETS

There's thunder in the house when the Bay Cities Racing Association unlimbers the muscles of the mighty midgets inside the Oakland Exposition Building with never a care about possible inclement weather outside

by PETE BIRO and WALT MAHONEY

When you take nearly 50 midget racing cars and run them indoors on a one-twelfth-of-a-mile flat asphalt track you can expect, and will assuredly get, more than the usual amount of action.

The cars, standard size midgets with either V8-60 or Offenhauser engines and anywhere from 140 to 170 horsepower on tap, (capable of speeds up to 140 miles-per-hour) are normally run outdoors on a quarter-mile track with plenty of elbow room. But indoors it's a different story. Hardly a race is run that there isn't a couple of multi-car miscues bringing the crowd to its feet. When the cars get tangled on the first lap, a complete re-start is called, otherwise the cars are stopped under the caution flag and the cars involved in the tangle start at the rear of the pack.

The midgets, now called 110 Offys, run every winter in Oakland, Calif., at the Exposition Building near Lake Merritt. There the Bay Cities Racing Association simply moves its speedway, full size midget race cars indoors to stage a series of shows worthy of any-road's attention - racing enthusiastic or not. Scene of the action is the main floor of the huge building where each Friday and Saturday night for six weeks the RCRA midgets battle it out. The concrete floor of the building serves as the racing surface over which the cars run. The outer edge of the track is fitted with a sturdy steel guard rail and chain link fence that provides complete protection of the stands surrounding the oval. Truck tires lining the inner edge of the track prevent cars from bounding into the track's infield.

Spectator enthusiasm has become so great in the Bay Area that driver fan clubs have been organized and many groups arrive aboard specially charter ed buses. Periodically throughout the evening it is necessary for the announcer to request the crowd to tighten itself up so that more spectators can gain entrance to the building.

Every race night the cars are individually timed electronically for starting positions. They run a series of heat races, being divided up according to their times. Heat winners then compete in the 16 lap semi-main event. The main event is composed of the fastest 12 qualifiers each night, with the fastest cars starting at the rear. The pole position car, though not the fastest in any event, usually has the advantage on such a tight track, but a consistently fast car with good qualifying times can accumulate more overall championship points by having fast time of the night as well as by passing cars during the race. No it's not always the nightly winners found climbing toward the championship. As a matter of fact, the 1961 champion Tommy Copp of Fresno, California, didn't place first in a single event, proving that fast qualifying times and smooth driving coupled with the ability to pass on a tight track are what it takes to bring home an indoor championship.

Copp actually clinched his title the final night of the season driving Jim Clark's V8-60 to a fifth overall in the main event, totalling up 378 points for the 12 night series. Behind Copp on the final placings were: Johnny Baldwin of San Carlos, 4 times past indoor champion with 361 points; and tied for third with 350 points each, rookie Bob De Jong from Hayward, and Chuck Lawler of Belmont. 1955 Indianapolis winner Bob Swellert was the first indoor champion and at one time or another such Indy 500 veterans as Fredly Aguabashian, Johnny Boyd, Shorty Templeman, Johnny Parsons, Bob Yeith and Ed Elsian have competed.

(Continued on page 49)

TOP — Popular Mike McGreevey keeps V8-60 Ford engine winning. He was opening night main event and got several heat victories during past season.

SECOND PHOTO — Fast-draw action is commonplace at indoor bashers. Driver at left holds up hands to signal incoming drivers that he will not move.

THIRD PHOTO — 1961 Indoor Champion Tommy Copp of Fresno, Calif., and his high flying Clark V8 engine placed first in any of the twelve night races.

BOTTOM PHOTO — Copp inside remote shifter and Glen Duenas astorytelling ace in a convincing story of cornering technique.

JULY, 1961
Things can sometimes get a bit sticky in the short corners and a tire in the lap isn’t too uncommon. Such situations are handled quickly by well oriented BCRA officials, crews.

The Carl Rogers Chevy V4 is 283 engine cut in half, center portion of crankshaft used to give 180 degree firing. Extra powerful engine shows lots of promise and popularity.

Ah, the accessibility of these economy cars. Walt Reiff’s Offy powered car is tipped up for a closer view of a problem. Car has engine amidsit alongside the driver's legs.

Cockpit of Reiff’s car shows offset to right of driveline, flexible Bell steering wheel. Tubing between lower nerfing bar and roll bar helps keep stray machines out of office.

INDOOR MIDGETS

Lineup for heat race places fastest qualifiers in rear. Although driver sitting in pole position has best chance to win the race, faster cars can pick up points for the championship by passing other cars. Champ Tommy Copp, No. 2, starts in last place.
A few modifications are necessary to adapt a midget to indoor racing. Gear ratios are much lower—approximately nine to one as opposed to the more conventional six to one used when competing on outdoor quarter mile tracks. Most of the cars have the suspensions altered to run indoors, and the first few nights are quite interesting as the drivers experiment with different handling combinations. One driver recently commented, “I wish I could get this to handle as good as my kart.”

Fuel is restricted to methyl alcohol which produces exhaust gases harmless to occupants of the building. As a safety measure all cars must be fueled before they are wheeled into the building. Prior to the opening of the track many drivers tool their racers around the big parking lot outside in order to warm up the engines and make necessary adjustments.

Because the indoor course is much smaller than the standard outdoor tracks, drivers find themselves with much less room in which to maneuver their cars. As a result bent radius rods, crushed exhaust headers and caved in tailsections are among the more frequently damaged parts. Pit crews have become quite adept at hastily repairing such damage so that their cars can remain in competition throughout an evening’s program. Some owners choose to equip their racers with sturdier, if somewhat unattractive, bumpers to stave off damage incurred by their rough and tumble competitors. Despite the many accidents that occur during a single night’s show, injuries are held to a minimum and have always been of a minor nature, except for the one time a driver suffered a broken shoulder. This safety record has been the result of BCRA’s never-ending campaign against poorly equipped cars and careless drivers. The midgets are fitted

(Continued on following page)

TOP — Spectacular flip on short straightaway fouled young Johnnie Dillman on short end of the matter. Unsoaked, he raced later on in the night’s events.

CENTER LEFT — To eliminate water from hot radiators from spilling onto track, overflow is routed to exhaust pipe where it becomes steam. Later, as engine cools in pit, steam condenses.

CENTER RIGHT — To say the indoor thunderbolts are fashionable in the San Francisco Bay Area would be a gross understatement. Fan clubs have been formed to cheer their favorite driver.

BOTTOM — Johnny Baldwin has been Indoor Champ four times in the past, finished in 2nd place in ‘61 standings.

Photos by Walt Mahoney,
Pete Biro, John Kelly
INDOOR MIDGETS  continued

with suitable roll bars, seat belts, flexible type steering wheels that will not break under impact and various other safety features.

Indoor racing has proved to be a great equalizer of engines. The potent Offys of the outdoor circuits find themselves as second place favorites to the Ford V8-60’s that constitute the majority of BCRA powerplants. These two types of engines are augmented by several other makes including Ford Ferguson tractor engines and Harley-Davidson motorcycle engines that have been fitted with special waterjackets to aid in cooling. Among the more interesting engines to be found is Carl Roger’s unique Chevy V4. Originally built by Joe Lynch of San Francisco, this severed V8 has several heat races and a main event win to its credit—much to the skeptics’ amazement. Starting with a 283 cubic inch Corvette engine, the rear half has been removed, leaving 141 ½ inches, well under the 150-inch maximum. The crank is made from a stock Chevy using the two center throws, giving a 180 degree crank. Carburetors are a combination of Stromberg 97’s and 81’s, using the base and inners of the 81’s and the tops of 97’s with venturi sleeved.

One aspect peculiar to indoor racing on a short track is the fact that hot tires provide better traction and consequently faster qualifying times. After practice or warmup laps are taken and before the time trials begin the more seasoned drivers promptly cover their tires with blankets to retain the heat generated. Some drivers deliberately spin out their cars and mash down on the throttles after being pushed off for their timing runs thereby “breaking loose” and creating hotter tires. This procedure is credited with trimming an all important half-second from a one lap qualifying time.

The fastest lap ever turned on the indoor oval was recorded by Bob Machin with a time of 8.59. The record for thirty laps is held by Danny “Termitite” Jones of Long Beach, Calif. Midwinter midget racing is here to stay in Oakland where the sellout crowds at every show have made auto racing a very popular indoor sport.

Offenhauser engine in the Reiff car sits to right side of driver’s legs, is supported by a chassis constructed of 1-inch chrome moly tubing. Midgets use Methyl Alcohol fuel.

Lightweight and snappy acceleration are the characteristics of the 85 cubic inch Harley-Davidson motorcycle engines. Special water jackets help to cool the screamers.