FIRST REPORT: FERRARIS FOR '62 - FORMULA 1, SPORTS & GT



TECH REPORT: 95 HORSES FOR BMC's NEW JUNIOR



1962

FORMULA 1 SPORTS GRAN TURISMO

BY BERNARD CAHIER

T IS A TRADITION FOR ENZO FERRARI to hold a press conference each year at which he shows, openly, the full line of his cars which will participate in the coming racing season. As we all suspected, Ferrari is far from retiring from competition, as he said he would after the Monza accident, and in fact we have never seen such a variety of competition cars and engines on the eve of a racing season.

For Formula I, Ferrari will be using basically the same car as last year but with a longer, lighter chassis and shorter body. Two types will be used: the short chassis (91.25 inches) equipped with the four overhead cam V-6 at 65 degrees and the longer wheelbase chassis (92.4 inches) with the four overhead cam V-6 at 120 degrees. The V-6 at 65 degrees has been noticeably improved in power in the middle range, about 20 horsepower more, while 5 to 10 hp have been gained in the upper range, and at a maximum rpm of 9.400 the power claimed is 190. This V-6 at 65 degrees, mounted on the short wheelbase chassis, will be used mainly on the slow and medium fast circuits, such as Monaco and Zandvoort. For the fast circuits the V-6 at 120 degrees will be used, and Ferrari has announced that this engine is now giving that magic figure of 200 horsepower at 10,000 rpm, meaning 10 horses more than last year. The power of this engine, too, has been improved all the way using four valves per cylinder instead of two. The rumored desmodromic valve system has been dropped, for the time being anyway. The V-6 at 120 degrees is now mounted forward into the middle of the car and is slightly tilted down in the rear. Another interesting detail is that the gearbox is now mounted in front of the differential. The gearbox, incidentally, will now have six speeds forward instead of five. Another modification to this new Formula

I model is that the tubes of the chassis are now being used as water and oil pipes, Lotus fashion.

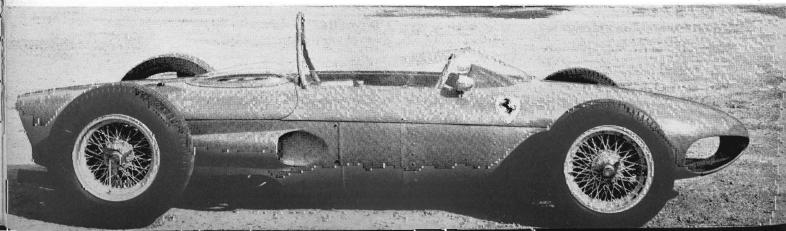
From the outside, the 1962 Formula I Ferrari looks

slimmer and more compact and this is confirmed by its lowered overall height (it is nearly 2 inches lower and also by the scales which indicate that the 120-degree V-6 car now weighs 970 pounds, instead of the 1060 pounds it weighed last year, while the V-6 at 65 degrees now weighs about 1000 pounds, against 1100 last year. Powerful, basically well-proven already, and beautifully prepared, the 1962 Formula I Ferraris are going to be formidable contenders again this year and really the car to beat.

For sports car racing Ferrari has developed, furthermore, his rear engined sports car of last year, but apparently without keeping the four o.h.c. 2.5-liter V-6 which, our readers recall, was basically the Grand Prix engine of the 1960 season. Compared to last year, the new sports car looks considerably lower and definitely more streamlined than the previous model. The overall length is 160 inches. while the wheelbase is the same as the short-chassis Formula I, 91.25 inches, and the height is a very low 38 inches. The weight of this car has been noticeably reduced too and varies from 1330 pounds to 1410 pounds, depending on the engine used. That is where the major change comes in for the 1962 Ferrari sports car. Indeed, while they will apparently use the same car throughout the season, three new and different type engines will be adapted to it. One is a V-6 at 60 degrees, of two-liter displacement but with only two overhead cams instead of four. What it is, really, is half of the Super America engine and the horsepower given for this interesting, light and compact powerplant is 210. Ferrari has actually had this engine out for at least three years and it was even used a few times in competition, particularly in Italy, but in a front-engined sports car. The fact that Ferrari intends to race it now officially is interesting because in that class he will compete directly against the Porsche, which has had things pretty easy in this class so far, and there is no doubt that the appearance of the two-liter Ferrari does not make the firm of Stuttgart particularly happy. Incidentally, Porsche is working very hard to bring out their new two-liter eight-cylinder sport racing car.

The second Ferrari sport engine presented is an entirely new powerplant and has a displacement of 2,458 cc. It is a V-8 at 90 degrees, with one o.h.c. per bank of cylinders, and its components are very much like those of the three-liter, 12-cylinder sports car engine of last year. The V-8 also seems to be a very interesting engine because of its lightness, as it is about 50 pounds lighter than the 2.5-liter four-o.h.c. of last year, and is said to have better torque. The horsepower, however, is lower than the four-o.h.c. V-6, with 250 hp at 7,400 rpm, while it had about 270 before.

The third engine is a V-6 at 60 degrees, with a displacement of 2862 cc, and is actually a bigger version of the



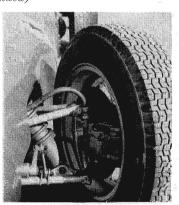
two-liter. Its power is given at 260 hp at 6,800 rpm, and is at the present, the most powerful sports car engine Ferrari intends to use this season unless he changes his mind again, which is always possible (see Pg. 54). Webers are used on all of the cars, Formula I and sports — three double throat ones for the Formula I V-6 at 65 degrees, six single throat ones for the FI V-6 at 120 degrees, three double throat ones for the two-liter and 2.8-liter V-6, and four double throat of a new type for the V-8.

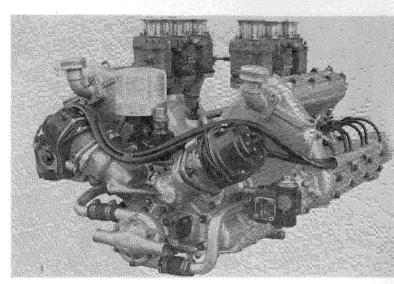
As we can see, Ferrari seems to have dropped not only his reliable 12-cylinder, three-liter Testa Rossa sports engine, which won so many races, but also his powerful 275 hp four-o.h.c., 2.5-liter V-6, which was so spectacular last year in the rear engined car, especially at the Targa Florio where Von Trips won with it after a tremendous battle with the Porsches. No real explanations were given for these changes and I believe that the main reasons for this are, first and foremost, that Ferrari is quite rightly confident that his new engines are powerful enough to win the sports car races again this year because, in spite of a drop of horsepower, his new sports cars are noticeably lighter and better streamlined. Second is the practical and, we can say, economical side. Indeed, any of the three new engines fits in the same car, they are cheaper to make than the four-o.hc. and, except for their differences in horsepower and displacement, they are basically the same.

For GT racing Ferrari presented his new streamlined, lightweight three-liter Berlinetta, whose prototype was first seen in September during the practice of the Italian GP at Monza. Compared to last year's competition GT, the 1962 car is 6.6 inches longer (170 inches overall length) 3.5 inches lower (47.5 inches high) and is lighter by no less than 250 pounds (dry weight 1940 pounds). The wheelbase is identical to last year's car, at 94.4 inches, but the chassis is lighter and made of smaller but more numerous tubes. The front suspension remains identical, with twin wishbones, and so does the rear end, but some coil springs have now been fitted on the rear suspension in addition to the leaf springs. The engine is no less than that of last year's Testa Rossa and its output is a remarkable 300 hp at 7,400 rpm, while the 1961 GT had, in its most powerful version, 280 horses. Six double throat Webers are used for this engine and the wet type sump of last year's GT car has been abandoned in favor of a dry sump. Ferrari expects to build 20 of these cars for very special clients and already we can be sure that this new hot prancing horse, which is actually more closely related to a sports car than to a true GT car, will run away from everything in that field. For those who like figures, this car has already been clocked at over 175 mph and, on a course like Le Mans, it should be as fast as the sports cars. Incidentally, Ferrari, who seems annoyed with the change of regulations in Le Mans allowing prototype cars up to four liters, says that he will not go there because he was warned too late. This is a bit of a joke because we know very well that Chinetti's North American Racing Team will run there if Ferrari doesn't (continued)

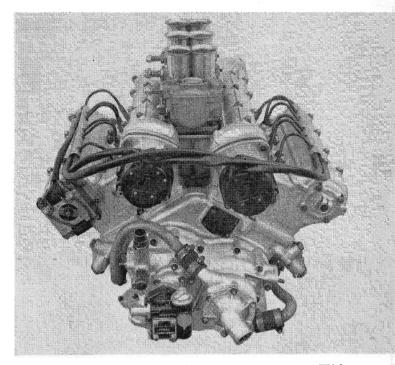
Ferrari's hope for the '62 season in Formula 1 is this new car with the 200-hp, 120-degree V-6. Note air scoop.

Applying the latest techniques and theories, the F1 suspension has angled upper A's, lightened springing and "housed" swaybars. These are high-strength, light assemblies with good geometry.



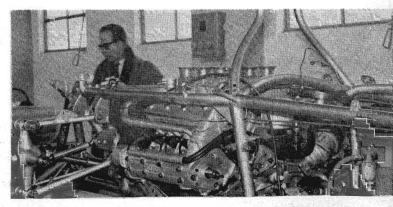


Boasting a fantastic valve area with its four valves per cylinder the F1 engine will turn 10,000 rpm. A top source says, however, that this will be replaced soon by an air-cooled 8!



The 65-degree V-6 develops 190 horsepower at 9400 rpm. With a strong mid-range, this engine will be used in the short wheelbase F1 for the tighter circuits like Monaco, Zandvoort.

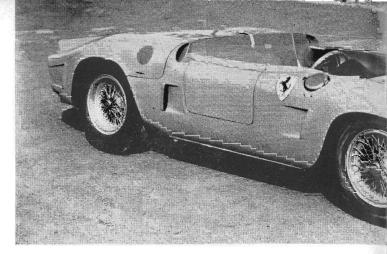
Details of interest in the F1 chassis are the TRIPLE fixedlength arms on the rear suspension, the extremely light hub-carriers, and engine-mounting method; interesting!



FERRARI 1962 (continued)

go himself, with Ferrari's latest type cars and team drivers. I wouldn't be surprised, either, if Chinetti or someone else, like Moss who is going to take delivery of the latest GT, wouldn't fit the four-liter Super America engine into that new streamlined competition GT, as the engine has the same dimensions but has 60 more horsepower, in which case this machine will be capable of speeds of over 180 mph, faster than any sports car at Le Mans.

Ferrari has confirmed that his team of Formula I drivers will include Phil Hill, Baghetti, Bandini, and Ricardo Rodriguez, while his test driver, Mairesse, will also run in some of the Formula I races. Other drivers to be seen at the wheel of Ferraris, but in the sports field, are Gendebien, Pedro Rodriguez and Parkes. Phil Hill will actually be the only team driver to be sure of running in every Grand Prix because, according to Ferrari, it will be up to the good behavior of the other drivers whether they will be at the wheel of Formula I cars or not. Since Ferrari usually runs three cars, and we have five drivers listed for the Grand Prix, we can be sure that there will be a good "fighting spirit" in the team. Ferrari did not mention the departure of his brain staff, and when asked about his future plans for his 1000 cc GT car he said it is running beautifully but that he could say no more, which means apparently that no definite arrangements have been made with anyone yet for the production of this car. This seems too bad since cars, unlike wines, do not improve with age and, after all, the



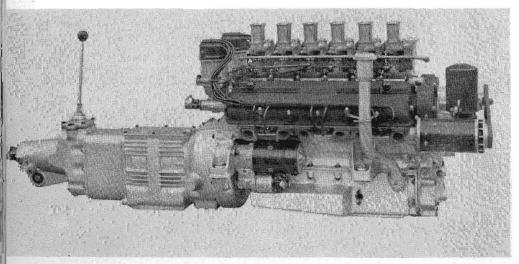
one-liter GT car was created two years ago.

During the visit of the factory we were able to see the modern installation and enlargements carried on in the past year, as well as the impressive production lines of his various GT cars which, incidentally, are all designed by Pininfarina. There was an air of prosperity in the factory and during his entire conference the Commendatore seemed quite relaxed and happy, which means that business must be good and that at 64 years old this fighting figure is still going stronger than ever and looking at the future with optimism. One thing is certain, after what we saw that day

(continued on page 74)

1962 FERRARI MODELS

MODEL	Formula 1 (120°)	Formula 1 (65°)	Sports 196SP	Sports 248SP	Sports 286SP	Grand Touring Berlinetta
Chassis Type	Monoposto	Monoposto	Spyder	Spyder	Spyder	Coupe
Motor Position	Rear	Rear	Rear	Rear	Rear	Front
Motor Type	120° V	65° V	60∘ V	90∘ V	60∘ V	60∘ V
Bore x Stroke	73 x 58.8 mm	67 x 70 mm	77 x 71 mm	77 x 66 mm	90 x 75 mm	73 x 58.8 mm
No. of Cylinders	6	6	6	8	6	12
Displacement	1476 cc	1480 cc	1983 cc	2458 cc	2862 cc	2953 cc
Comp. Ratio	9.8	9.8	9.8	9.8	9.5	9.8
Peak RPM	10,000	9400	7500	7400	6800	7400
DIN Horsepower	200	190	210	250	260	300
No. Forward Gears	6	6	5	5	5	5
Brake Type	Disc	Disc	Disc	Disc	Disc	Disc
Overall Length	149.5 in.	149.5 in.	160 in.	160 in.	160 in.	170 in.
Body Width	34 in.	34 in:	58.3 in.	58.3 in.	58.3 in.	63 in.
Overall Height	26.2 in.	26.2 in.	38.2 in.	38.2 in.	38.2 in.	47.6 in.
Wheelbase	92.5 in.	94.5 in.				
Weight	978 lbs.	1001 lbs.	1320 lbs.	1410 lbs.	1365 lbs.	1935 lbs.
Tire Size — Front Tire Size — Rear	5.00 x 15 6.50 x 15	5.00 x 15 6.50 x 15	5.25 x 15 6.50 x 15	5.25 x 15 6.50 x 15	5.25 x 15 7.00 x 15	6.00 x 15 7.00 x 15



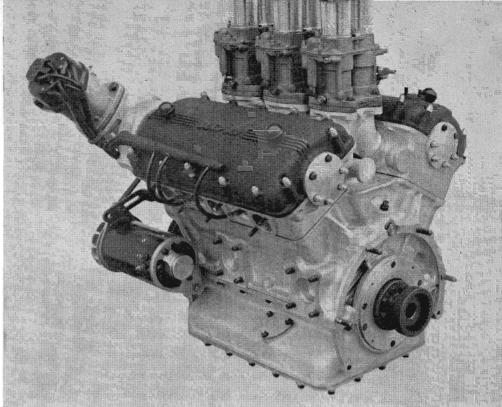
The latest GT engine with the car it powers at right. Output from the 12-cyl. 3-liter is 300 hp at 7400 rpm. Curb weight of the streamlined coupe is 1940 lbs., its 5-speed gearbox helps attain maximum speed of 175 mph. Lube system is dry-sump.

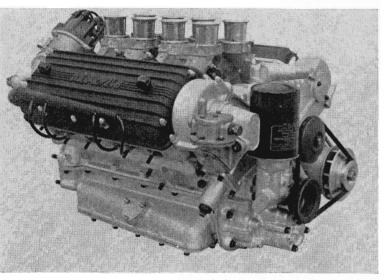


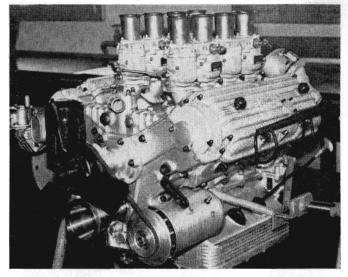


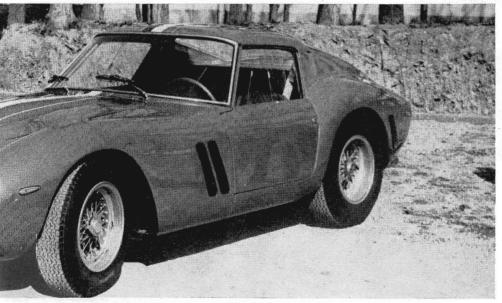
1. Using either a 2-liter, 2.4, or 2.8 engine, the new sports/racing machine will weigh in between 1320 and 1400 lbs.

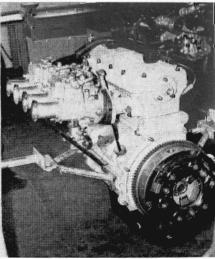
- 2. Derived from the Testa Rossa, this V-6 develops 260 hp from its 2863 cc. Bore and stroke are 90x75 mm. Note Webers.
- 3. New for '62 is this 90-degree V-8 of 2458 cc. It pumps 250 hp at 7400 rpm.
- 4. Another view of the 2.4 powerplant. Ignition is one-plug-per-cylinder with one cam per head. Compression is 9.8:1.











With production date not yet announced, the SOHC powerplant for the "1000 GT" awaits the chance to deliver its 92 hp.