



365 GTB/4 "Daytona" Buyer's Guide



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Introduction

Ferrari never officially called the 365 GTB/4 the “Daytona.” The unofficial nickname comes from the 365 GTB/4’s 1-2-3 finish at the Daytona race in 1967. According to legend, Ferrari was going to use the “Daytona” name but dropped it after it was leaked to the press. This did little to stop everyone else from using the Daytona nickname and it is by this name that the 365 GTB/4 is commonly known by today.

Road & Track called the 365 GTB/4 Daytona “the best Sports Car in the World”. Not a lot of ambiguity in that statement and many owners feel it is as true today as it was back then. In a recent look back on their greatest roadtests, Autocar still rates the Daytona as its all time greatest. At launch it certainly was the fastest, stealing that honor back from the Lamborghini Miura by delivering a top speed of 174 mph. Not bad for a car that was originally seen by many as a stop gap model, filling out the model line until Ferrari was ready to introduce a mid engine supercar. Ironically, today the model that it was bidding time for, the 365 GT4BB, has a market value of about half that of the average Daytona. The Daytona would be Ferrari’s last 2 seat front engine 12 cylinder GT for 29 years until this concept returned with the 550 Maranello. Furthermore, in its day the Daytona was the “king of the road”, with performance still surpassing more “contemporary” designs. The Daytona is a relatively strong and reliable Ferrari. It is a car that could, and did, compete in 24 hour endurance races in basically stock trim. It was also the

last Ferrari road car developed prior to Fiat’s involvement.

The development of the Daytona was driven by a variety of different forces, all coming together at the same time. The 275 GTB/4 was getting a bit long in the tooth and was being eclipsed in terms of performance by new models from other manufactures. Lamborghini had introduced the radical mid engine Miura, claiming both the top speed crown and the public’s imagination, a situation which was clearly unacceptable in Maranello. And finally, Enzo Ferrari’s reluctances to put a tricky handling 12 cylinder mid engine supercar in the hands of his private clients. This was despite the fact that Ferrari was already producing the 6 cylinder mid engine Dino and had been producing 12 cylinder track cars for several years now. Hence the core of the Daytona development brief; front engine, higher top speed than the Miura, and more modern body than the 275 GTB/4. It had to be beautiful, frighten fast, and handle able near the limit by the mere mortals.

The Daytona body was developed by Pininfarina’s design chief, Leonardo Fioravanti with the 330 GTC chassis in mind. The objective was to design a highly aerodynamic, slender car able to carry the engine mounted well back in the front bay to provide optimum weight distribution. The first formal drawings were completed in December 1966 with the first prototype being built in the 2nd half of 1967 (s/n 10287). This prototype looked very similar to the 275 GTB/4 from the hood forward but looked like the final Daytona from the windscreen wipers to the tailpipes. Upon re-

view by Ferrari, it was decided that a more radical frontal design was needed. It is believed that the second development prototype (s/n 11001) was built at this time. Of the two development prototypes, only the first has survived. Out of Enzo’s challenge was born the new front end treatment with the headlights concealed behind the wrap around transparent Plexiglas strip. Once the final design was approved, a final 3 prototypes were constructed in red, white, and blue. The Red prototype served as the show car for the 365 GTB/4’s official launch at the Paris Show in 1968.

While Pininfarina styled the Daytona’s bodies, they were built by Scaglietti in Modena. From the side, the Daytona’s body starts with the huge front hood featuring twin air vents, slopping up gently from the wedge shape nose and ending with a rear lip which served to hide the windshield wipers at rest. At a glance the front hood seems to take up more than half the length of the car and leaves you with the impression that the Daytona is larger than it actually is. The A pillars are raked back sharply and the cabin lines flow smoothly onto the short rear trunk lid. The back panel is taped forward for the first time on a Ferrari and a small spoiler runs the length of the trunk lip. The lower half of the body is cut by a semi circular indent that runs from the back of the front tire wells through to the tail. This design feature would later be sharpened and reappear on the Boxers. The overall impression is one of elegant aggression.

A year after the 365 GTB/4’s launch, Ferrari introduced a spider version at the Frankfurt



Motor Show, the 365 GTB/4. Only 122 Daytona Spiders were produced over the remaining 4 years of the Daytona's production run. Today original factory Daytona Spiders command premiums of 200%-300% over the Daytona Berlinettas. In the 1980's, as Daytona values started to rise dramatically, a not insignificant number of berlinettas were converted to spiders. The conversions, even if done properly, do not command a premium over berlinettas today. The Daytona Spider has a folding soft top which sits just ahead of the now flat trunk lid.

The Daytona's body is constructed of steel with an aluminum front hood, trunk, and doors. Very late in the production run, the doors were changed from aluminum to steel on US spec cars so that side impact bars could be incorporated. The body sits on a tubular steel chas-

sis. The chassis construction has been compared to that of a "bridge" structure, and consequently cars that have "met with disaster" are typically repaired to continue on. In several instances during the 1980's, some of these damaged cars were converted into spider configuration by shops in the United States and Europe. The wheel base at 2400mm is the same as the 275 GTB/4 but both the front and rear tracks have been increased to 1440mm and 1453mm respectively for added high speed stability. The floor pan, footwells, and firewalls are all fiberglass. Power was provided by a 60 degree 12 cylinder dry sump engine producing 352 bhp at 7500 rpm. Power is transmitted via a rigid torque tube containing the propshaft to the rear mounted 5 speed transaxle. The Type 251 engine is feed by six Weber carburetors, delivered a top speed

of 174 mph, a 0-60mph time of 5.8 seconds, and propelled the Daytona to 100 mph in a very quick 12.5 seconds. Cooling was provided by the front mounted radiator with twin electric fans. Performance was top of class in 1968 and 37 years later it still would place the Daytona well within the modern Supercar pack. The Daytona was the last Ferrari 12 cylinder 2 seat GT to use chain driven camshafts.

The suspension is typical Ferrari, unequal length A arms, tubular shock absorbers, coil springs and anti-roll bars front and rear. The brakes had vastly improved stopping power vs. the 275 GTB. The brakes are four pot caliper ventilated discs on all four corners. Twin master cylinders with vacuum servo assist feed opposing pairs of cylinders on each wheel. Original tires are Michelin XWX 215/70 VR 15 on both front and rear which sat on

Specifications

General:

Number Made:	365 GTB/4: 1,383 365 GTS/4: 122
Chassis:	Tubular with steel metal reinforcements. Tipo 605
Transmission:	Dray single-plate clutch, 5-speed gearbox + reverse, limited slip differential
Steering:	Rack and pinion

Engine:

Type:	Tipo 251: Front longitudinal 60° V12, light alloy cylinder block and head; 2 valves per cylinder
Power:	352 bhp @ 7,500 rpm
Displacement:	4390 cc
Bore & Stroke:	81 x 71 mm
Compression Ratio:	8.8:1
Torque:	318 ft/lbs (44 kgm)

Suspension:

Front:	Independent, double wishbones, coil springs, anti roll bar
Rear:	Independent, double wishbones, coil springs, anti roll bar

Dimensions:

Wheelbase:	2,400 mm (7ft 11in)
Front/Rear Track:	1,440/1,453 mm (4ft 8in/4ft 9in)
Weight:	1,280 kg (2,820 lbs)
Tires:	Michelin 215/70 VR 15 X
Fuel Tank:	100 liters
Length:	4,425 mm (14ft 6in)
Width:	1,760 mm (5ft 10in)
Height:	1,245 mm (4ft 1in)

Performance:

Acceleration:	0-60 MPH in 5.9 seconds
Top Speed:	175 MPH (280 KMH)

Our Rating: 4.5 Stars

Cromordora alloy 7.5 x 15 inch five spoke wheels. With its unassisted worm and roller steering, driving a Daytona for long periods of time at low speeds in the city will result in forearms larger than your thighs. It was a car designed for the new highways crossing Europe and weekend racers. A single dry plate mechanically operated clutch is heavy and requires skill to master. The 5 speed gearbox is laid out in a racing pattern. First gear is a dog leg down to the left with reverse up on the left, second thru fifth gear form an H pattern to the right of first gear. Gear changes in the open metal gate are short and precise.

In 1971, the trademark fixed Plexiglas headlights were replaced by twin retractable headlights to meet new US regulations. Initially, to try to maintain the visual impact of the former Plexiglas arrangement, the nose was painted in a satinized metallic aluminum finish. This idea was dropped in late 1971 and the final Daytona's produced sported noses that were the same color as the rest of the body. Of interest is the fact that only one Daytona Spider was produced with the original fixed Plexiglas headlights.

The Daytona sport's a leather trimmed classic interior. The single piece seats are well padded and comfortable with an adjustable tilt. The seats move fore and aft along the runners and have adjustable head restraints. The seating position is low but visibility is excellent given the slim pillars. Center cloth inserts were available as a special order. The three point static seat belts were replaced by inertia reel seat belts in 1972, again due to changes in US regulations. The high geared 4.4 liter

V12 provides plenty of power for high speed highway cruising, with outstanding acceleration across the rev range. The dashboard is covered in either black vinyl on early Daytona's or non-reflective mousehair on later cars. The Veglia instruments are easily readable with white lettering on black background. The dials are laid out logically directly in front of the driver. In-between the speedometer and tachometer, four smaller gauges covering water & oil temperature, oil pressure, and ammeter are positioned. All other controls are within reach of the driver with the ventilation controls mounted in the center of the dashboard. The gear lever sits in its metal gate on the left hand side of the transmission tunnel, and per standard Ferrari practice it did not change position for either right and left hand drive cars. The radio sits up and to the right of the gear level and is mounted longitudinally to the transmission tunnel. The elegant wood rimmed Momo steering wheel was replaced by a leather trimmed wheel on later cars. Electric window are standard and a pair of luggage restraining straps are fitted to the rear shelf behind the seats. Optional equipment was very limited and included Borrani wire wheels, a Blaupunkt or Voxson radio, cloth seat inserts, and air-conditioning.

Trunk room is excellent when compared to later 12 cylinder GT's. It is sufficient to carry enough luggage for two passengers for a week or two. The spare tire and soft roll tool kit are stored in a recess in the trunk floor.

Production started in late 1968 and ran for 1284 GTB's (plus 19 competition Berlinettas)



and 122 GTS' through the end of 1973. As the Supercar of its day, the number of Daytona's produced is especially impressive when it is taken into account that only 1311 F40's were sold over a similar 5 year production run 20 years later. The Daytona was replaced by the 365 GT4 BB in the Ferrari line up in 1973

Driving Impressions

Everything about Daytona is an exercise in sensory stimulation. Pull gently on the slim door handle and the large heavy door swings open smoothly. You then carefully lower yourself into the slim one piece bucket seats. From the outside, the seats look narrow and hard but once your rump is nestled into them, they are surprising comfortable and enveloping, prov-

ing instant confidence that you will be kept firmly planted behind the wheel regardless of cornering speed. Now suitably ensconced in the snug cockpit, the first impression you have when you sitting in a Daytona for the first time is pure intimidation. Looking straight through the windscreen, visibility is excellent and the hood seems to disappear a long way from where you are planted. The size and power of the engine tucked under the hood come instantly to mind. Angle your eyes down a few degrees and through the large steering wheel, the no nonsense instrument panel comes into view. On one side sits the 180 mph speedometer and on the other a tachometer with a 7500 rpm redline. If the size of the hood did not convey the seriousness of purpose of the 365 GTB/4, then the two major gauges should now have made it abundantly clear.

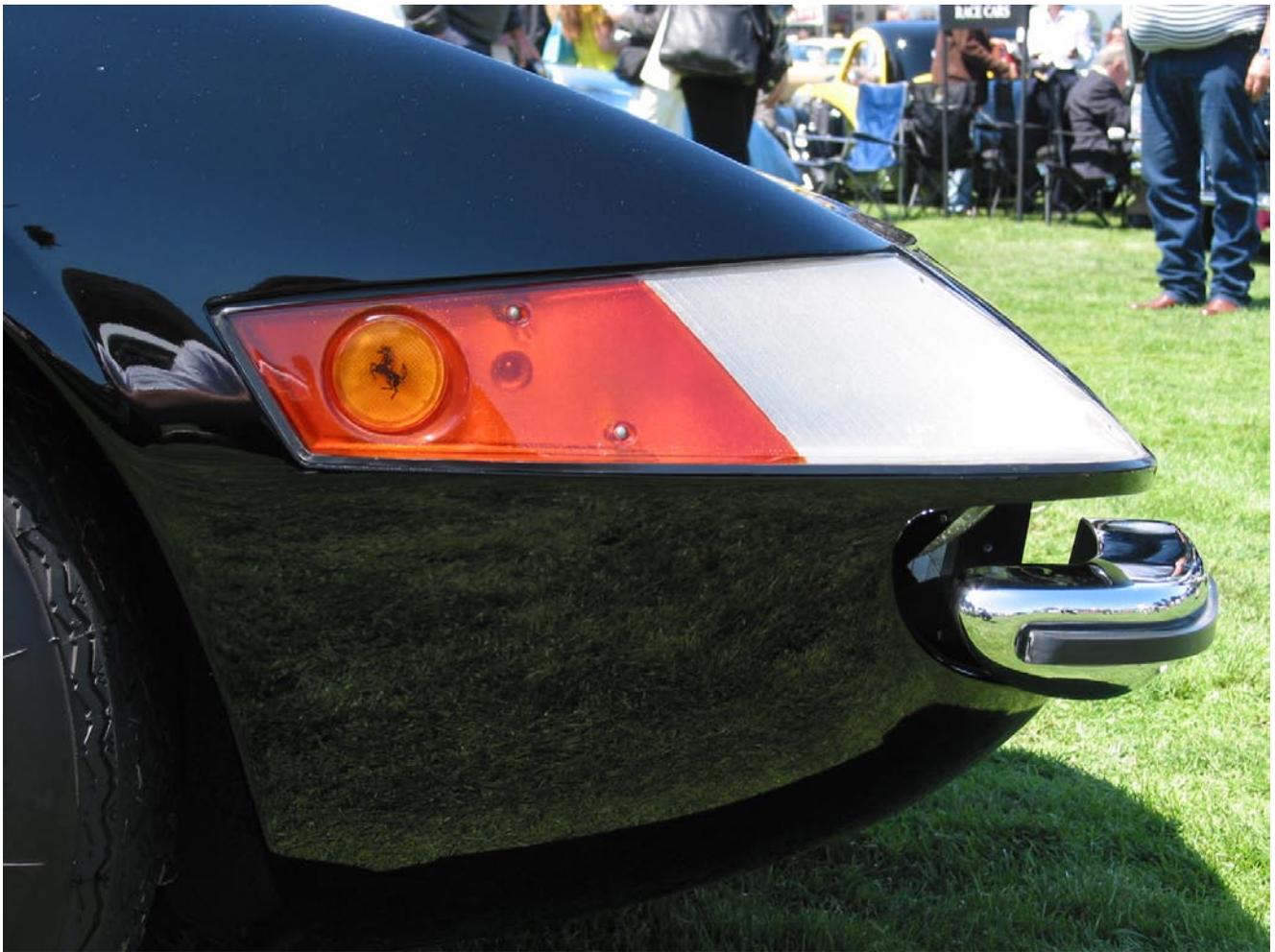
Push in the firm clutch, make sure the gearbox is in neutral, and turn the ignition key to the second position. The twin electric fuel pumps will start feeding the massive V12. Wait until you hear the clicking slow down, pump the gas pedal twice, and then turn the key one more notch. With a loud growl it all comes to life and settles into a well bred smooth idle. It is wise to give the Daytona a few minutes to warm up. At this point, close your eyes and let your hearing swim in the events taking place forward of the steering wheel. If you listen carefully, you can identify the hissing of the Webers, the spinning of the chains, and a multitude of other wonderful mechanical noises emulating from the hand made engine.

After a few minutes of soaking up the experience, time to slot the black ball topped gear lever down and into 1st. When

cold, this requires a fair amount of determination and even when warm, it is a transmission which requires skill to operate smoothly. Like all Ferraris of this vintage, forget 2nd gear until the transaxle is warm. The clutch is firm and precise, and around town will quickly build thigh and calf muscles. Gear changes in a Daytona are deliberate acts. Moving off, the steering is heavy and requires work. Parallel parking in a Daytona is not for the frail. After 5 – 10 minutes, the Oil temperature needle will have begun its journey north and you can start to push past 3000 rpm without fear of accelerating the due date for an engine rebuild.

Two things that become abundantly apparent after spending a few minutes on the road: massive amounts of power are available across a huge range and the steering lightens up quickly at speed. It is an eas-





Pros

- Stout design
- Strong and durable engine
- Classic appearance
- A pleasure to drive, especially at speed
- Simple electrical system
- Best seat design in a Ferrari (note the often referred to "Daytona style" seats in others)
- Over-designed cooling system
- Timing chain cam drive rather than costly to replace belt drives found in later cars
- A real usable Vintage Ferrari Supercar
- Excellent trunk space
- Almost all are fitted with air-conditioning
- Almost all parts are still available
- Most maintenance can be done by the owner
- Last Pre-Fiat, Ferrari road car
- Classic V12 Ferrari soundtrack

Cons

- Corrosion commonly found in lower door skins and quarter panels
- Damaged transaxle synchros, especially 2nd gear
- Faded "mouse hair" dashboard covering
- Parts availability is becoming an issue
- Corrosion of the exhaust resonator sections from condensation
- Air conditioning system rather ineffective due to outlet position and non-tinted glass
- Some complain of heavy steering effort at low speed
- Brakes are marginal for track use
- High service and running costs
- Restoration costs are staggering
- Repairing or replacing major components can be amazingly expensive



ier car to drive at 70 mph, than 20 mph and this realization only serves to urge you forward with increased haste. Push the accelerator and you can instantly feel the rear tires bite into the tarmac, lifting the Prancing Horse on the nose skyward. You can feel the speed building and the engine noise drops several octaves of purposeful rage. The Daytona puts on speed so competently that it is easy to forget how fast you are now going. On the twisty stuff, the Daytona is a car which wants to be pushed. It

feels better moving quickly and smoothly through the bends. The car is set up for a bit of understeer so a slow in fast out approach using accelerator to balance the car on exit works well. Despite some body roll, once you get used to driving a Daytona it all flows naturally.

More than anything, more than even 0-60mph in 5.5 seconds and 0-100mph in 12.5 seconds, it is the span of the performance that is enticing. First runs to 56 mph at 7700rpm, second to 81, third to 108, fourth to

127, and fifth to 173. Going up those gears is just one smooth thrust forwards. Then there is the pure in gear performance, where that incredible torque provides, 70-90mph in just over 3 seconds in third. Even at 140mph there is a solid push in the back. And all the while you feel secure, never feeling that the Daytona is trying to get away. It just has too much inner certainty to be nasty or fussy.

As aggressively as the Daytona is able to put on speed, you need to be careful when it



comes time to shed speed. The brakes are adequate by today's standards and require both firmness and feel to work properly. While they will bring the car to a stop, it does take more space than first impression might suggest. With experience, it is easy to get used to the difference in stopping ranges. For those used to driving Vintage cars, the Michelin XWX's provide plenty of traction and you can feel via the small of your back when they are starting to let go. With the massive torque of the V12, if not

careful, this can happen rather suddenly with one overly aggressive shove of the right foot at the wrong place on a bend.

Driving a Daytona is always an event and the experience never gets stale. To do it properly requires concentration and skill. Spend some time in one and it is easy to imagine driving from Rome to Paris in a day.

Living With A Daytona **Bill Badurski on Long-Term Ownership**

I have been fortunate in owning three different examples of the model, beginning in 1977 and continuing on through today. The first two were coupes, while the last and present one is an example of the aforementioned spyder conversions, this particular car being done by Bacchelli Sport Auto in Modena, Italy. After nearly 30 years of ownership of these cars, the

Daytona remains my favorite. Although I have owned other models, I always seem to gravitate back to another Daytona. Furthermore, over this long period of ownership, I have performed just about every type of service or overhaul associated with the model, including engine, gearbox, and suspension rebuilds.

So what's it like to own one of these cars? That's easy, it's a fantastic experience! The Daytona owner is rewarded with one of the best, if not the absolute best, sounding Ferraris of all time. Want more? How about the most comfortable and form-fitting seats ever put into an automobile? Have you ever noticed how many Ferraris after the Daytona are described as having "Daytona seats"? Some may come close, but they're all imitations. A friend once said, "You can tell how many bills are in your wallet the way these seats hug you." On top of all that you get stellar performance, even by today's standards. Engine power is impressive, handling is quite good, and the brakes are more than adequate for high-speed road use and decent for track use. In the case of the latter though, vehicle weight can take its toll on brake pads and rotors under extreme circumstances. Mix in the serviceability of a simple and basic design, uncanny reliability, a classic "stiletto" profile, and you have the Daytona.

Owning a Daytona

As with any Ferrari ownership, the Daytona rewards one with the sights, sounds, smells, driving thrills, and sense of pride that come with the knowledge of having a truly unique and rare piece of automotive history.

Just walking past her sitting in the garage brings a sense of how fortunate one is. The Daytona, to this writer, is one of the most beautiful cars ever designed. A simple dusting off prior to taking the Daytona out for a run conjures up thoughts of this most famous of marques and all the history behind it, especially when gazing at that Ferrari nose badge, but I digress.

The Daytona is reliable, a short statement that really doesn't do justice. This writer has owned several models over the years, but the confidence that a Daytona instills is deeply satisfying. This is a car that can be relied upon to always start, play hard, and be ready and waiting for the next event. It is the last of the true dual-purpose Ferraris. For many years, the coupe I'd owned saw this type of service and never let me down. She was used for pleasure driving on bright sunny days, entertainment runs with curious friends as passengers, and track duty. I often packed the boot with luggage, made the 180 mile trip to Road America, competed in weekend long racing events, and then reloaded the gear to make the trip home, all without incident.

Daytonas really require only the most routine maintenance to deliver on these promises. It is an easy car to service yourself, requiring few if any specialized tools. It is a treat to drive, and once properly set up will remain that way indefinitely. This is a car that responds to even a reasonably skilled driver with outstanding performance. It begs to be driven fast, and comes alive at speed.

How to Live with a Daytona

Keeping in mind all the points

mentioned above, life with a Daytona takes little effort. Below is a short list of recommendations.

Change the fluids on a regular basis. The oil capacity is considerable, at approximately 16-18 quarts depending on how thoroughly you drain both the sump cover and oil tank. This writer prefers to use fully synthetic 15W50 motor oil to minimize start-up wear and maximize internal parts protection under all operating temperatures. The two oil filters required are readily available from Fram, Baldwin, or UFI.

Coolant should be changed every two years, or five years if using the long-term coolant now available. Brake fluid should be completely drained and flushed every year or immediately prior to any track event. This will minimize the chance for corrosion within brake calipers and pipes. Also, as many older Ferraris are infrequently driven, watch the age of gasoline left in the large capacity fuel tanks (two).

Spark plugs can foul if the car is routinely started and then stopped without a hard run. This is especially true for cars without electronic ignition or with conventional spark plugs. The old "Italian tune-up" routine will generally keep the plugs clean. However this writer has found that use of the NGK Iridium fine wire plugs will eliminate fouling in this engine. Depending upon your driving style, heat range "6" (hotter) or "7" (colder) should provide good results. Bear in mind that this manufacturer's numbering system is reverse of others, in that higher numbers are colder plugs.

The ignition system is

quite reliable and requires infrequent attention. Breaker points last a very long time, but when replacement becomes necessary bear in mind the previous discussion about synchronization of both sets in the Euro version distributors. Rotors and caps are rather expensive, but fortunately also are long-lasting components.

The fuel filters are strangely located under the chassis alongside the left rear wheel. One is a large metal canister type that serves as the primary filter immediately after fuel leaves the tanks. The other is a secondary filter placed in line after the dual electric pumps. This second filter is smaller and has a glass bowl with lever operated latch. Atop this filter is an integral pressure regulator. Both filters are readily available, however the square-cut O-ring seals are not. This poses a problem, as seal deg-

radation here can lead to fuel leaks directly over the left-hand exhaust pipes. At the time of this writing, the author is searching for generic alternative seals.

The clutch will provide tens of thousands of miles of trouble-free service, so long as properly adjusted. The Daytona clutch is cable actuated, and the cable has an adjustment range that should be left alone. The clutch adjustment mechanism adjacent to the bell housing has a wide range of settings, and combined with the cable variables it is possible for an improperly adjusted clutch to actually have so much travel as to force the driven disc into the back of the throw-out bearing. The shop manual gives a precise clearance specification between the bearing face and pressure plate. So long as this is adhered to you should expect no clutch issues.

Under the category of

"minor considerations", there are a couple of other recommendations. The vent window latches are attached with an adhesive, and frequently pull off the glass if too much force is exerted. When operating these windows, it is best to relieve latch tension by squeezing the glass tightly shut along the back edge before rotating the latch. In closing the vent, the same applies. Another consideration relates to the previously mentioned corrosion issues. This writer uses low pressure compressed air from a blow gun following car washing and towelling off. Air blown into areas such as door lock cylinders, the bottom edges of the doors, along chrome trim, the trough along the front fenders under the hood, and the wire wheels if so-equipped, will go a long way towards keeping the car corrosion free.



Maintenance & Repair

There are several common issues found on many Daytonas. As they were all hand-made, build quality varied from car to car and rust is an almost universal problem. Given the severity of the rust problem, checking the body for filler is highly recommended. Many Daytonas suffered from inadequate maintenance or were stored at some

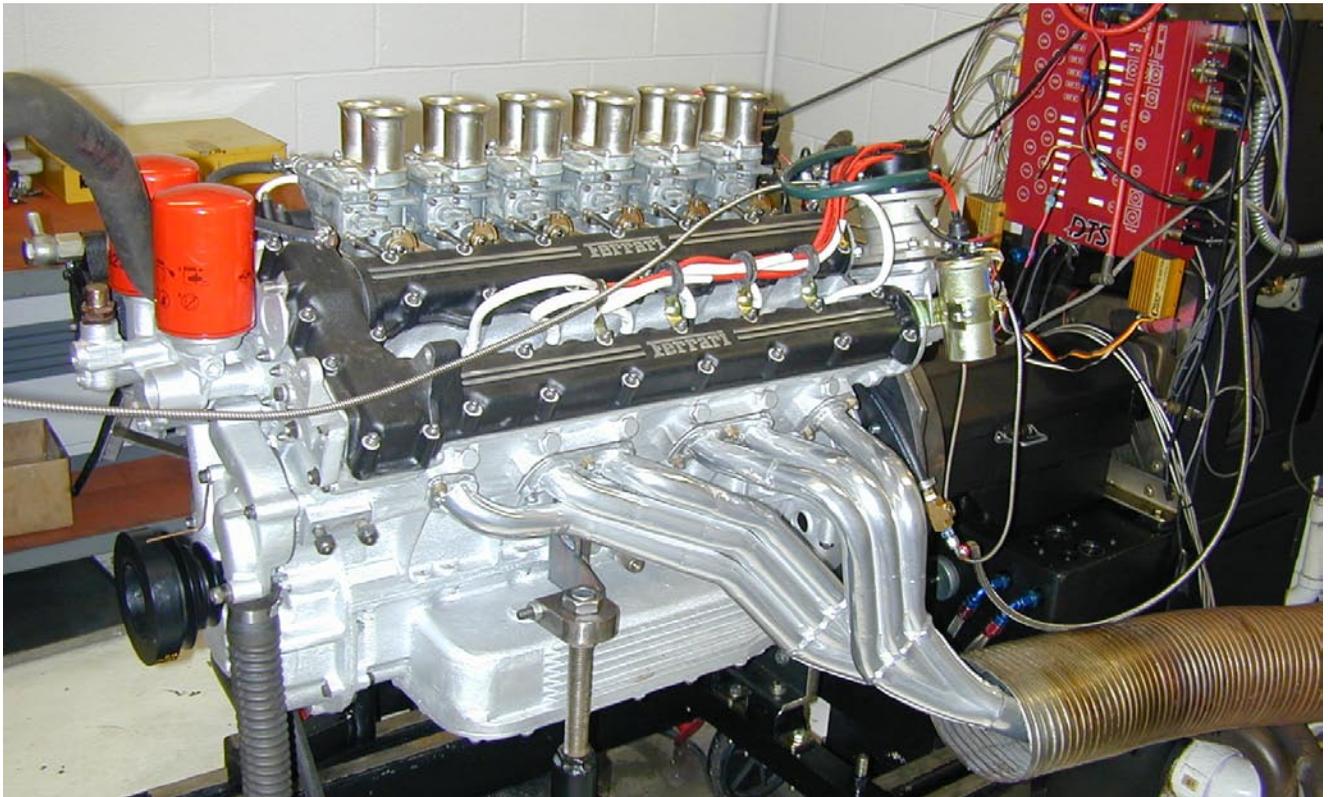
stage in their lives so reviewing service history is important. Almost all have also have been subjected to some restoration work so reviewing the quality of work done is important.

Several general areas that should be checked are:

- Check the tension on the timing chains. Excessive “stretch” may lead to the point where

it will jump a tooth leading to dire consequences for the valves. Overly tight chains cause cylinder head damage to cam bearing bores.

- Abused 2nd gear synchros
- Abused, worn clutch
- Cracked rear casing on the transaxle
- Paint work is fragile
- All things electrical. Connections corrode and motors wear out.



- Slow windows are a Ferrari trademark
- Camshaft, Valve, and Guide wear

Other potential issues:

- Out of round cylinder bores, smoky engines
- Corroded cooling systems, overheating
- Poor oil pressure
- Oil & Water leaks
- Gauge accuracy
- Exhaust systems rust out
- Collapsed engine mountings
- All hoses and rubber seals corrode and leak with age
- Accident damage and improper repair
- Flat spotted tires
- Seized distributor advance mechanism
- Sticky brake caliper pistons on garage queens
- Cracked brake discs, weight of the car takes its toll on the brakes.

Issues: Detailed Report

Engine

Although the Daytona is a relatively simple example to maintain, occasionally cars are found to have a variety of services "botched". However, even these "sins of the past" are correctable by a qualified technician. One of the most frequent problems found in my experience is that of improperly tensioned timing chains. The chain actually requires very little attention, and access to the chain tensioner is difficult, especially in cars with the air conditioning option, as the engine must be lifted from the right motor mount for good access to the device. I've found tensioners that were damaged from shortcut loosening tech-

niques using long screwdrivers or chisels for example. Additionally, over-tightened chains can cause extreme wear in the front camshaft bearing surfaces within the aluminium cylinder heads. This can be repaired with the installation of removable bearing shells after machining the damaged bores. Finally, the timing case is often found fractured at the chain cover studs, again due to inept servicing. This results in a major oil leak that requires engine removal in order to repair the case through welding.

Although tuning the Daytona is relatively simple to one familiar with older Ferraris, this area often needs attention in order to sort out previous work. The six dual-throat Webers perform well and look beautiful, although proper synchronization and adjustment is essential. One other area often in need of correction is that of warped or distorted carburetor bases. The carbs are retained to the inlet manifolds by three studs each, and over time the re-tightening of the stud nuts tends to bow the carb bases down at the sides, resulting in an inlet tract leak. This can be corrected with removal of the carbs and resurfacing of their bases.

The two ignition distributors use conventional breaker points, two sets in each. However, the USA cars use only one set of points for engine operation. A primary operation set known as "R1" is used throughout the off-idle speed range, and a secondary set known as "R2" operates from an external switch located on the right bank inlet cam cover to retard ignition timing while idling. This concession was made for emissions regulations, and most cars have the R2 set

disabled or removed entirely by now. The European model uses a true dual-point arrangement in each distributor. In these cars the synchronization of the two point sets is essential to smooth engine operation.

Due to close piston ring to ring land clearance specifications, piston rings are often "cold stuck" on cars that sit stationary for long periods. Consequently a compression or leak-down test with such a condition present will result in an indication of a problem. However, the rings will "unstick" themselves simply by warming the engine up and then driving the car for a few miles. Consequently, for whatever the reason, when doing either of these tests, bear in mind that low compression is not an immediate red flag.

Body

As corrosion protection was basically non-existent during the Daytona's production, rust may be found in the doors and rear quarter panels. Although aluminium skinned doors were initially used in the Euro model, the later and USA spec cars used steel. In these doors, the outer skin may be damaged, generally in the lower half. This is more prevalent on USA models with the side impact beam, which can trap and hold moisture between the beam and inside of the door skin. The quarter panels generally suffer corrosion damage in the area between the quarter glass cabin vent and the rear wheel arch. In more rare cases corrosion may be found in other areas, such as chassis "outriggers" under the floor pan. Finally, USA cars used a series of steel panels under the standard fiberglass floor tub for cabin heat insulation. This was done as the

US-mandated Air Injection Reactor (A.I.R.) system employing a “smog air pump” tends to heat the exhaust pipes as a result of injecting air into the headers. These steel panels are often rusted heavily, although since the tub is made of fiberglass there is no structural damage to the car itself. In my experience, the steel panels do little if anything, hence operating without them poses no problem.

Transaxle/Gearbox

Second gear transmission synchronizers are often referred as “weak”. However, all the gearbox synchronizers are of the same design, and consequently no single one of them is more prone to damage than another. The “crunch” heard when going into second gear (or any other for that matter) is typically a worn synchro damaged through either poor driving technique, or a mis-adjusted clutch. Fortunately replacement synchros are both readily available and relatively inexpensive, however transaxle removal and the subsequent overhaul to install the replacement parts typically costs around \$3000 at the time of this writing.

Exhaust

Due to the upward tilt of the exhaust outlets, the rear resonator section of the system often rusts through at the bottom. This is especially the case with cars which are regularly started but not driven enough to blow out the condensation and moisture that forms within the system. As these sections were originally made from mild steel, the life expectancy as described above is about three years. A permanent solution to this problem is replacement of the resonators,

and even the muffler sections, with stainless steel components. These are readily available, and though cost approximately twice as much as standard replacement items, they are a worthwhile expense if long-term ownership is planned.

The USA cars also used smaller diameter exhaust headers on the engine. These were wrapped with a glass-type insulating material, and then skinned over with steel. These header outer skins are frequently corroded. Once again, unless originality is a concern, these rusty skins may be removed with no adverse effect on vehicle operation.

General

As with any older car, rubber components such as hoses need routine attention. In particular, the fuel supply system should be maintained. The dual electric fuel pumps are located inboard of the left rear wheel, as are the canister fuel filter and glass bowl filter with integral pressure regulator. As these components are all situated more or less directly above the left-hand exhaust pipes, degradation of the rubber hoses and square-section filter seal rings can lead to disastrous consequences. The same attention should apply to the long rubber fuel line that runs through a metal sheath under the left door sill to the engine compartment, and also the fuel hoses underhood.

Daytonas need to be cared for and driven. Use and service it regularly and a Daytona will provide hours of reliable exhilarating driving pleasure. Sit it in a damp garage un-used for months on end and all sorts of things go wrong. Overall the Daytona is a strong robust car

that needs to be driven hard.

Maintenance Costs

Although amounts will vary with regional labor rates as well as skill levels of technicians, the listing below should provide reasonable averages for common operations at the time of this writing, late 2005. Also, as the old saying goes, “It’s \$10 to tap it with a hammer, and \$50 in knowing where to strike it.” With any older Ferrari, experience and familiarity is both essential and relatively expensive.

- Oil & filters changed (~18 quarts with two oil filters) - \$200
- Tune-up, including plugs, points, carburetor adjustments- \$775
- Valve clearance check- \$500
- Clutch replacement- \$1500
- Engine overhaul- routine (includes R & R, rings, bearings, chain, carb overhauls) - \$25,000
- Engine overhaul- as above but also new valves, springs, and seats required- \$30,000
- Gearbox overhaul- (includes R&R) synchros only- \$3000- \$3500
- Exhaust system replacement- \$4000

Owner’s Manual Scheduled Maintenance

The Owner’s Manual contains a vast amount of information, from simple familiarization issues to excellent drawings of service-related items such as where to find drain plugs, and how things function. Also included are scheduled maintenance charts, where you’ll find how often various parts or systems require attention. These charts are categorized for separate systems, such as a lubrication chart, engine service chart,



etc. For example:

- Brake fluid change every six months
- Gearbox oil change every 6,000 miles
- Replace spark plugs every 6,000 miles
- Service water pump every 12,000 miles

Actually, many of these service intervals are a bit overly ambitious. There's certainly no harm in following them, but the intervals are rather short in terms of practical use. While changing the brake fluid at least once a year is good practice, rebuilding the water pump for no reason other than its accumulation of

12,000 miles is a bit over the top. Furthermore, changing the gearbox oil more often than annually or even bi-annually is not really necessary. Finally, today's spark plug technology with the advent of fine wire electrodes and use of exotic metals has resulted in plugs that can actually live in the Daytona for 12-15,000 miles or beyond. While the author is not endorsing deferred maintenance, it is worth mentioning that these cars survive fine with a little more practicality applied to published schedules.

Finally, maintaining a Daytona is actually relatively inexpensive. Compared to contemporary Ferrari models using timing belts which require

frequent and very expensive replacement, the "old" Daytona requires only basic service operations easily performed by an owner with minimal tools and a basic understanding of automobile maintenance.

General Buying Rules

1. Demand to see the Service book and Maintenance History file. Make sure you have solid answers to at least any major holes in the recent history (10-15 years). If the car has been restored, ask to see the pictures documenting the work and talk to the garage who did the work. If this information is not forthcoming, move on.

2. Get the car inspected by a Ferrari trained mechanic. He will find things you miss. Given the age and value of all Daytona's this is absolutely critical and will help you negotiate the purchase price with the seller. When looking at the PPI report, make sure engine compression is normal.

Engine rebuilds are hugely expensive. Also check the body for filler, chassis for rust, and under the car for oil and water leaks. Make sure the panel fit is good

3. If the asking price is very low, there is a reason for it. Major restoration work on a Daytona can match the purchase price of the car. If you are buying a project car, get a good idea of restoration costs before proceeding with the purchase. There are very few true bargains in the Daytona world.

4. Never buy the first car you see, look and test drive several. Make sure that the 2nd gear synchromesh works and there is not excessive noise coming from the transaxle. Take the car for a

good solid test drive on several types of roads. Make sure everything works as it should with the engine properly warmed up and at speed.

5. Make sure the car has all the original Books, Tools, and Records. These are very expensive and difficult to replace later. Also check the condition of the Borraris (if fitted), body trim, chrome, and interior. Replacing or repairing all will cost several thousand dollars.

6. Talk to other owners; join FerrariLife.com, Tom Yang.net, and Daytona Registry.com.

7. Talk to the Mechanics that have historically serviced the car.





Ferrari Ownership: Experience & Expectations

When you purchase a Ferrari, you are not buying a car but rather a work of engineering art and a piece of history. A Ferrari has a soul and character unique in the automotive world. A Ferrari comes filled with Italian passion, for both better and occasionally worse. Driving a Ferrari is never boring. It is engaging. You are always involved and interacting with the car across a multitude of senses. While driving, this includes the constantly changing sound track as the engine moves through the rpm range, the heavy but exact clutch, and the metallic click with every gear change. There really is nothing else on the road that sounds like a Ferrari. Until you have driven one, it is

impossible to appreciate the totality of the experience. It is this emotional link between car and owner that sets Ferrari's apart from other sports cars

Two other cars that many first time Ferrari owners consider are Lamborghini and Porsche. Lamborghini has similar roots in the Modena area. It however does not have the racing heritage or, for the majority of its life, the single minded guidance of a brilliant owner. Lamborghini's ownership history has included everyone from Chrysler, an Indonesian Conglomerate, to Audi. This is reflected in the history of the models. Lamborghinis tend to be overly flamboyant, difficult to drive, and highly temperamental. Porsche, on the other hand, is efficient, reliable, and an engineering masterpiece. It is also highly predictable and after a time, can be construed as

boring. A Porsche does everything with extreme competence, to the extent that you begin to wonder if you, the driver, are really needed.

The fact is Ferrari's are expensive to maintain and less reliable than many other cars. This is simply a small part of the deal that comes with being a member of the small and special club of Ferrari owners. The Porsche is a cold rationale machine, a Lamborghini is pure emotion, and a Ferrari gives you both.

Purchasing Options

Pre Purchase Inspections (PPI) by Tom Yang

Not meaning to offend anyone in the business of selling exotic cars, but to protect people



who are ready to buy, always remember whether it is a Ferrari or a Honda we're still in the realm of used car sales. Everyone has a right to make a living, but there are also plenty of people in this business that practice less than honest means to separate you from your money.

A buyer can be especially vulnerable when the emotions of realizing the dream of owning a Ferrari are involved. A pre-purchase inspection, by a third party mechanic is one step that I highly recommend you have done on a car you are about to purchase. Many dealers and shops will offer mechanical inspections or compression numbers, but these numbers can be easily doctored to favor the sale of the car. Hiring a third party mechanic that

you know or trust gives you an objective eye towards buying the car. In some cases, dealers have commissions arrangements split between their salesmen and mechanics which can result in more favorable opinions, so having someone who is not involved with the sale is your defense in not having later unpleasant surprises. The cost of a few hundred dollars or pounds can well be the best money you spend on your new Ferrari.

In general most Ferrari Buyers purchase their cars through one of four channels:

- Official Ferrari Dealers
- Independent Specialist
- Private Sellers
- Auctions

Each has its own strengths and weaknesses. In summary:

Official Ferrari Dealers

Purchasing through an official dealer will provide the most piece of mind when making the rather considerable investment in a Prancing Horse badged automobile. In almost all cases the car will come with some sort of warrantee, a comprehensive service history, and a clean bill of health. All of this comes with a cost and you will likely pay a 10-20% premium vs. other options. One other limitation is that dealers normally only stock the current, plus 1-2 generations of prior models. As a result, dealers are really only an option for the modern (1990's -) model enthusiast.

Independent Specialist

Independent Specialist Dealers can provide both outstanding service and a wide range of models to choose from, covering all price ranges. Reputation is critical and so is doing your research on an Independent Specialist Dealer before writing out a check. Information and insights on different Specialists can be obtained both through your local Ferrari Owners Club members and via posts on the Ferrari Forum. Like official dealers, many specialists can provide warranties (via 3rd parties) and on-going maintenance facilities. The quality of the maintenance for modern models can be on par with the official dealers as many independents employ Ferrari trained mechanics. For modern models though it is critical to confirm that the service center has the necessary diagnostic equipment and software (SD1 or SD2) for your model. For Classic and Vintage Ferrari's, independents may be your only, or best (for more recent models) option. Prices at Independent's should be 5-20% less than Official Dealers.

In most countries, purchasing from either an Official Ferrari Dealer or an Independent Specialist will provide you with the strongest legal rights should anything go wrong.

Private Sellers

Caveat Emptor. Buying from a private seller is both the lowest cost and highest risk option. In all Ferrari purchases, a Pre Purchase Inspection (PPI) by a specialist is recommended, in the case of a private purchase, it is critical. Purchasing well privately is both a matter of form and substance. First the form which is mostly related to general ap-

pearance and presentation:

- Check the condition of the interior, is the leather conditioned and cleaned
- Pull up the mats, check the condition of the under carpet
- Spray water on the car, make sure it beads up immediately
- Look in the engine bay
- Is the owner a member of the local Ferrari Owner's Club

Positives on the above are an initial indication of a careful owner, but could also be the result of a pre-sale clean up. Then move onto the substance:

- Review the service records, a comprehensive file is always a good sign
- Check the history of the car, make sure it has always been well cared for
- Always check that the mileage on the odometer matches the other records
- Confirm that the seller is the car's owner and that the title is clear
- Spend time both test driving the car and talking to the owner. No car is perfect, does the owner point out both the good points of the car and the issues needing attention ?

Buying from a private seller will provide both the lowest cost of acquisition and the highest risk should any major undisclosed issue emerge post purchase. Doing your homework properly is critical and in many cases it is a rewarding and enjoyable experience for both parties. Private classified ads are available on both www.ferrariforum.com and www.tomyang.net.

Auctions

As a very broad guideline, cars that appear at auction are either very high value recent models (example – Enzo) or models no longer carried in the Official Dealer network. As per purchasing from a private seller, it is critical to do your homework ahead of time. All auction houses provide for pre-sale viewing but it is very unlikely that a PPI or test drive will be permitted. Both need to be included in the buyers purchase risk consideration. Auction Houses act as agents on behalf of the sellers so your legal protection in many countries is not much greater than in the case of a private sale. On the positive side, auctions provide both the opportunity to acquire very rare, unique cars with important histories and other models at a potentially outstanding value. As many Independent Specialist Dealers attend auctions, it is critical that a private buyer understand the environment that he is competing in. Fee schedules differ significantly between the different auction houses, so it is strongly advised that these be reviewed ahead of time. Currently the most famous Ferrari Auction is Bonhams December Auction in Gstaad, Switzerland. Other well know auction houses include: Christies, R&M (North America), Barlett Jackson (North America), Barons (UK), H&H (UK), Coys (UK), and Artcurial (France).

Available Vintage Guides

250 GTE/330 America
330 GT
365 GT
365 GTC/4 (Coming Soon)

14 modern guides from the 246 GT - 360 Modena also available.