Ferrari DAYTONA SP

PRODUCT INFORMATION

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MARANELLO, 20.11.2021



INDEX

1. PRODUCT CONCEPT

2. <u>TECHNICAL DETAILS</u>

ARCHITECTURE

POWETRAIN

AERODYNAMICS

DESIGN

- **3.** <u>PERSONALISATIONS</u>
- 4. <u>7 YEARS MAINTENANCE</u>
- 5. <u>TECHNICAL SPECIFICATIONS</u>

PRODUCT CONCEPT



PROLOGUE

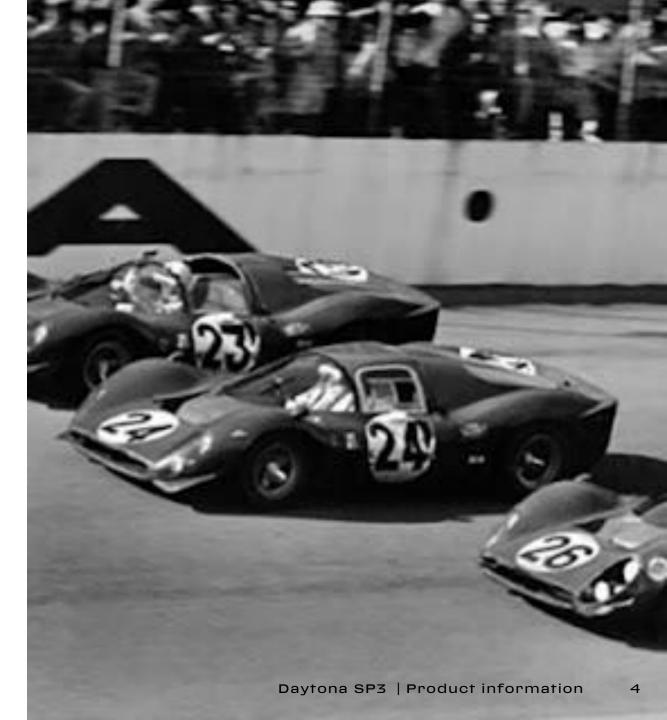
It was the evening of February 6th 1967, Ferrari had just pulled off one of the most spectacular feats in its competitive history by winning the 24 Hours of Daytona, the opening round of that year's International World Sports Car Championship. But this was much more than just a victory, it was a huge triumph that saw three Ferraris^{*} dominate the podium after an astonishing side-by-side finish past the chequered flag in the home of the marque's great rival, Ford, which had dominated the 1966 season.

The Prancing Horse's comeback weapon had a name: the 330P4.

Starting from the excellent platform of the previous season's 330P3, engineer Mauro Forghieri designed a completely uncompromising car capable of significantly improving each of the three fundamentals of any racing car: **engine**, **chassis** and **aerodynamics**.

The P4 boasted a V12 directly derived from the 1966 F1 car and complete with mechanical injection, twin overhead cams and three valves per cylinder. It also unleashed 450 hp, a massive 30 hp more than the P3's engine. The car's suspension and gearbox had also been completely redesigned and its aerodynamics were hugely sophisticated, the product of endless hours of testing in not one but two wind tunnels. The result? It delivered completely unprecedented levels of efficiency.

Thanks to the design team's hard work, the P4 proved competitive throughout the entire season and ensured Ferrari snatched back the International World Sports Car Championship title in 1967.



PROLOGUE

The 330 P4 is, without a shadow of a doubt, the car that most brilliantly encapsulates the spirit of the sports prototypes of the 1960s, the undisputed golden age of covered wheels racing.

It and other cars from the day remain a touchstone for generations of racing car engineers and designers.



CONCEPT Design

The Daytona SP3 is the second iteration of the **Icona concept** and, as is clear even from its name, was designed as an homage to the world of 1960s Sports Prototype racing and the cars that contributed so powerfully to turning the Ferrari name into a motorsport legend.

The concept of taking inspiration from a particular time in history, one of the core elements behind the concept of every icona* car, should not however be seen as a mere "modernisation" and reuse of past styling cues. Rather it is an attempt to "distill" the very essence of an era and to use it as the springboard to create new concepts with a life all of their own and the potential to become icons in their own right for future generations.

The Daytona SP3 's design was shaped by that philosophy and is a harmonious interplay of contrasts: extremely sculptural, voluptuous surfaces alternate with the kind of sharper lines that revealed the burgeoning importance of aerodynamics in the design of racing cars of that time. The likes of the 330 P4, the 350 Can-Am and 512S are, of course, a testament to that transition.

Its Sports Prototype inspiration also paved the way for the bold decision to give the Daytona SP3 **targa type body** and a removable hard top: the result is a car with twin souls capable of giving its driver a range of unique emotions, whilst simultaneously boosting its versatility of use.



CONCEPT Technical

From a technical perspective, the Daytona SP3 takes its inspiration from the sophisticated engineering solutions and formal purity of the 1960s: today as back then, maximum performance was achieved by working on the aforementioned three fundamental areas.

- ENGINE The Daytona SP3 sports a naturally aspirated V12, midrear-mounted in typical racing car style. The V12 is undisputedly the most iconic of all Maranello's engines and in this car appears in its most powerful iteration ever: derived from the 812 Competizione's V12, it unleashes 840cv of power, 697Nm of torque and maximum revs of 9500rpm.
- **CHASSIS** Made entirely from composite materials using Formula 1 technologies which have not been used on a road car since Maranello's last supercar, the LaFerrari. The seat is integrated into the chassis to reduce weight and guarantee the driver a driving position closer to that of a competition car.
- **AERODYNAMICS** Just like the prototypes that inspired it, aerodynamics research and design focused on achieving maximum efficiency purely using passive aero solutions. Thanks to sophisticated new features, such as chimneys that extract lowpressure air from the underbody, the Daytona SP3 is the most aerodynamically efficient car ever built by Ferrari without resorting to active aero devices.



CONCEPT Technical

As a result of the clever integration of these technical innovations, the car can accelerate from **0 to 200km/h in 7.4s** and from **0 to 100km/h** in just 2.85s.



Exhilarating performance, an extreme driving set-up, and the intoxicating V12 soundtrack that transmits its vibrations directly into the driver's back, deliver completely unparalleled driving pleasure.



A NEW ICON DEDICATED TO OUR BEST CLIENTS

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Sports prototype INSPIRED

Pinnacle of Ferrari TECHNOLOGY and DESIGN

> Our most exclusive ever MODEL

FERRARI ICONA

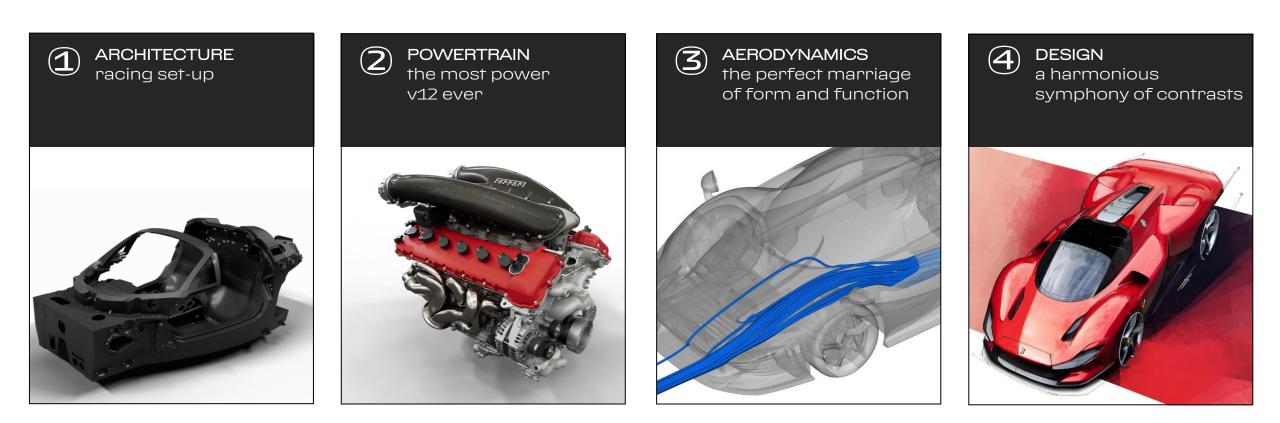
Ferrari Icona was launched in 2018 to Ferrari history by reinterpreting the timeless styling of the marque's most iconic cars to radically modern effect using the most innovative materials and technologies available today.

The first examples of this new concept were the Ferrari Monza SP1 and SP2, cars inspired by the legendary racing barchette of the 1950s that helped earn the Ferrari name legendary status in motorsport.

Icona cars are characterised by exclusive solutions not typically available on the rest of the range and are aimed solely at Ferrari's top collector clients: individuals that adore performance and design, proud Ferrari ambassadors and members of that most exclusive of families.



SIGNATURE ELEMENTS How an Icona is born



SIGNATURE ELEMENTS How an Icona is born

ARCHITECTURE



AERODYNAMICS the perfect marriage of form and function



DESIGN a harmonious symphony of contrasts

- Racing car ergonomics with seats integrated into chassis and a reclined driver position
- Chassis made from composite material, produced using motorsport-derived technologies: minimum weight, maximum stiffness
- New HMI with touchscreen steering wheel and curved 16" display: «eyes on the road, hands on the steering wheel»

• 840 cv

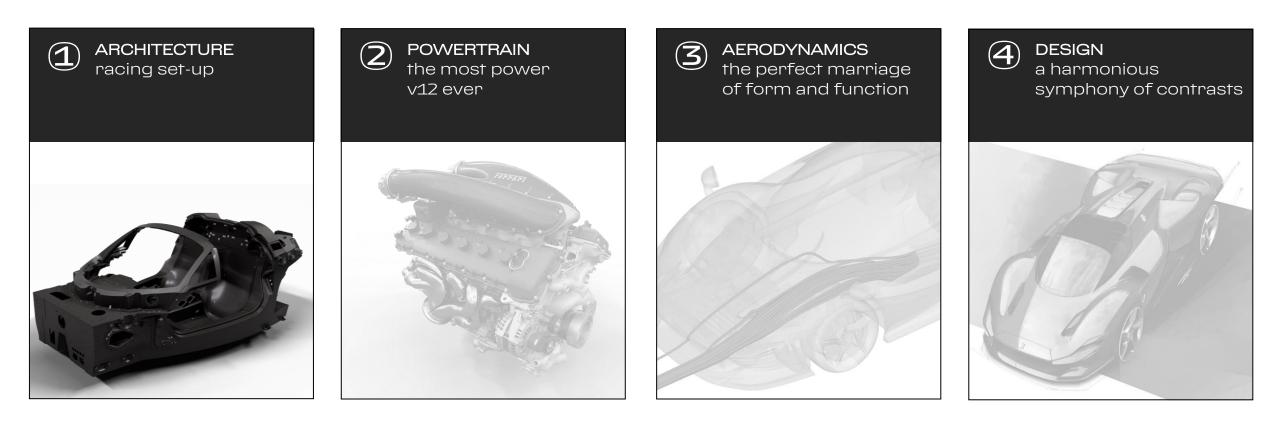
- Titanium conrods, lighter pistons and crankshaft: maximum responsiveness and max. revs of 9500rpm
- 80% of maximum torque available at just 2500rpm
- Uniquely enthralling soundtrack

- Aero design focused on achieving maximum aerodynamic efficiency
- Sophisticated solutions that also reflect the car's principle of formal purity
- Highest ever efficiency and downforce achieved on a Ferrari with no active aero devices
- Sensual, aggressive lines inspired by the sports prototypes of the 1960s
- Dramatic impact achieved by melding curved surfaces and sharp lines
- Driver-focused interior, minimal, sophisticated cockpit that is the perfect sports prototype-Grand Tourer hybrid

TECHNICAL CONTENTS



SIGNATURE ELEMENTS How an Icona is born



ARCHITECTURE

RACING SET-UP

The return of the mid-rear V12

CHASSIS IN COMPOSITE MATERIALS

Formula 1 technology for weight reduction and maximum stiffness

BUILT AROUND THE DRIVER

the ergonomics of a racing car with seat integrated into the chassis and reclined driver position



ARCHITECTURE Main elements

COMPOSITE CHASSIS

Built by laminating pre-preg composites, which are then cured in the autoclave, as per Formula 1. Three fibres are used:**T800**, **T1000**, **Kevlar** ®

DRIVER POSITION

Lower and more reclined for improved driving ergonomics and also to reduce car height, through:

- Seats integrated into chassis
- Adjustable pedal box

ARCHITECTURE Driver position

As is the case with a racing car, the Daytona SP3 driver will feel completely at one with the car: this extraordinary result was achieved by literally building the car around the driver and drawing on Ferrari's Formula 1-derived ergonomic expertise.

The fact that **the seats are completely integrated** into the chassis allowed the driving position to be lower and more reclined than in a normal production car, making it more similar to a typical single-seater design. This set-up also reduced weight and kept the car's height to 1142mm, which in turn reduced drag.

Thanks to an adjustable **pedal box**, each driver will be able to find the right leg angle and use the brake and accelerator pedals as efficiently as possible.

The **steering wheel** is adjustable in depth and height, and has been specifically shaped with two horizontal slashes in its upper and lower sections to optimise visibility and prevent interference with the driver's legs during manoeuvres.

The driving position also integrates the **new HMI** from the range, which turns the "hands on the wheel, eyes on the road" philosophy into practice, thanks to two main factors:

- Steering wheel with touch controls which allow 80% of functions to be controlled without the driver's hands moving from the wheel
- 16" curved high resolution driver display that makes all drivingrelevant information available to the driver without causing distraction



ARCHITECTURE Chassis and bodyshell in composite

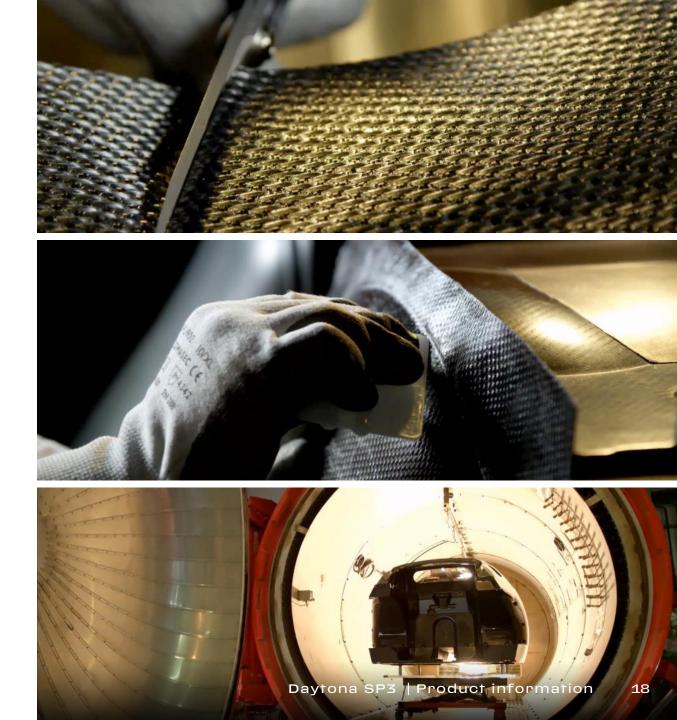
The Daytona SP3 's chassis and bodyshell are made entirely from composite materials, a technology derived directly from Formula 1 that delivers weight reduction and structural efficiency (rigidity/weight ratio) values that simply could not be achieved with any other materials.

In order to reduce the car's weight to an absolute minimum, lower the centre of gravity and guarantee compact architecture, several functional components, such as the seat structure, were integrated into the chassis.

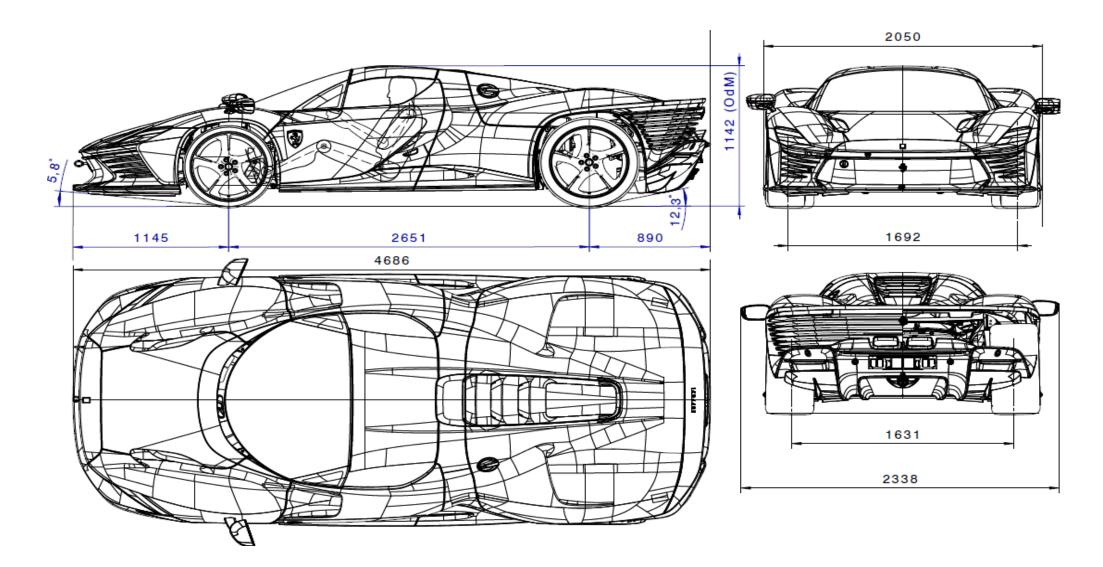
Just as is the case in F1, aeronautical industry-derived "pre-preg" composites are used. These include for instance:

- T800 fibre for the tub, both in fabric and unidirectional form strategically layered to guarantee energy is dispersed along predetermined force lines. The carbon fibres are hand-laid, a process that ensures the correct amount of fibre for each individual area.
- T1000 fibre is used both in fabric and unidirectional forms in areas critical to cockpit protection, such as doors and sills. Its high energy absorption characteristics make it ideal for exceeding restrictive side impact regulations
- Thanks to its impact resistant properties, Kevlar[®] is used in areas subject to impacts

The «curing» process in the autoclave is exactly the same as in F1, carried out in two separate phases at 130 and 150 degrees, with components vacuum-bagged to prevent any lamination defects.



DIMENSIONS



PERFORMANCE

The decision to use a mid-rear-mounted ICE architecture to celebrate the iconic purity of the naturally aspirated V12 and to also combine it with a composite chassis, has kept the car's weight down and optimised weight distribution between the axles, by concentrating the masses towards the car's centre of gravity.

These architectural choices and the work done on the engine itself ensure the Daytona SP3 delivers record-breaking figures in terms of its weight/power ratio, 0-100km/h and 0-200km/h acceleration for an ICE-powered car.

 $\frac{1485^{*}Kg}{840cv} = 1.77 Kg/cv$

0-100 km/h= 2.85 s

0-200km/h=7.4s

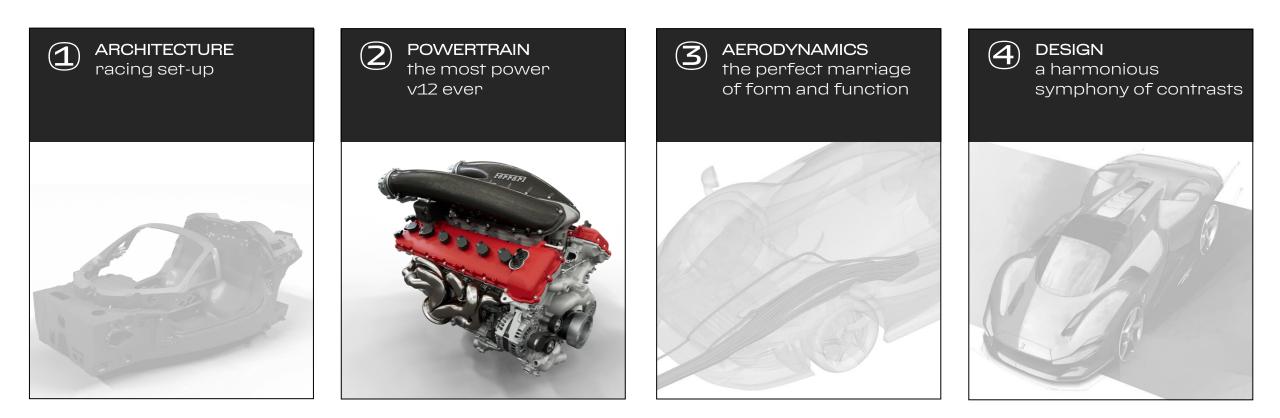


43.7%

56.3%

Fig. 1 - Front/Rear weight distribution

SIGNATURE ELEMENTS How an Icona is born



POWERTRAIN

• 840cv

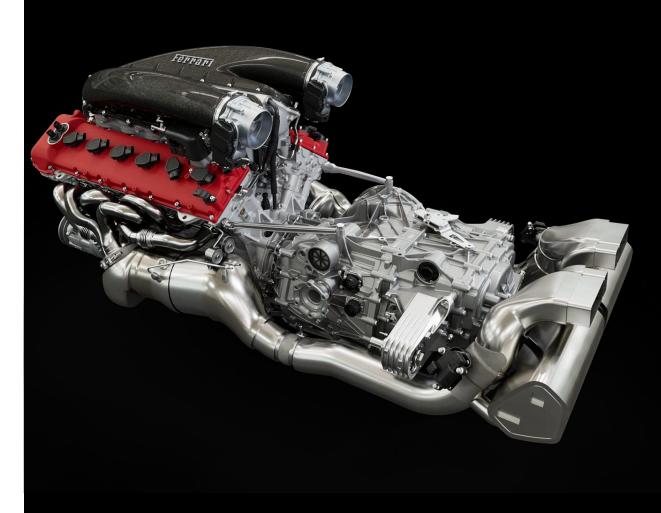
The most powerful V12 ever built by Ferrari

BOUNDLESS POWER AND ACCELERATION

maximum revs of 9500rpm and a power curve that rises with revs Regime

INSTANTLY-RECOGNISABLE FERRARI V12 SOUNDTRACK

| Туре | V12 - 65° - Dry Sump |
|-----------------------|----------------------|
| Total Displacement | 6496 cm ³ |
| Max. power output* | 840 cv @ 9250 rpm |
| Max. torque | 697 Nm @ 7250 rpm |
| Specific power output | 129 cv/l |
| Max. revs | 9500 rpm |
| Bore and stroke | 94mm x 78mm |
| Compression ratio | 13.6 : 1 |



POWERTRAIN The most powerful V12 ever

OPTIMISED COMBUSTION GDI 350bar

Multi-spark ignition

EBANAN

REDUCED INERTIA

More responsive and quicker to achieve max. revs of 9500rpm thanks to::

- Titanium conrods
- Lighter pistons
- Lighter crankshaft

OPTIMISED FLUID DYNAMICS

- Both intake manifold and plenum are compact to deliver power at high revs
- Variable geometry inlet tracts and variable intake and exhaust valves timing to maximise dynamic charge in the cylinder at all revs

SLIDING FINGER FOLLOWERS FOR VALVE ACTUATION

- To reduce mass and avail of more high performance valve profiles
- Cams and sliding finger followers have DLC coating to reduce friction
 - Formula 1-derived technologies

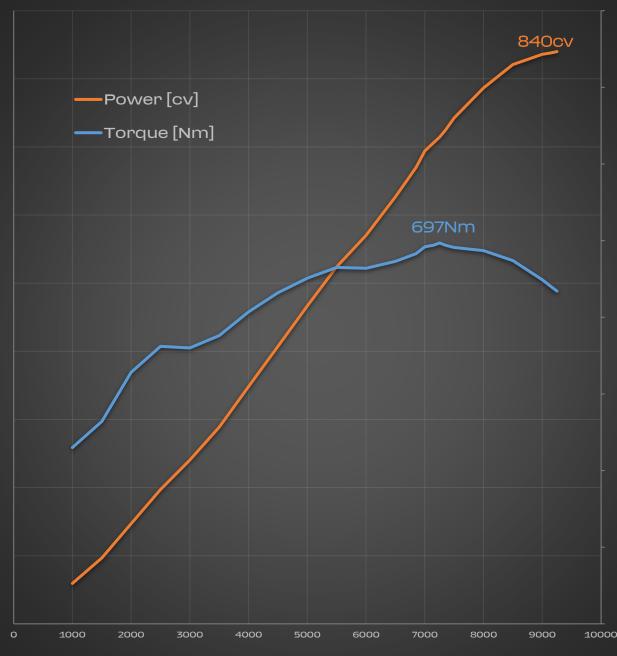
POWERTRAIN Concept

The challenge the engineers faced with the new Daytona SP3 was to deliver **the most exhilarating and compelling V12** on the market. This ambitious result was achieved by using the 812 Competizione's engine as the starting point, but relocating it to the mid-rear position to allow the design of an intake and exhaust layout that would maximise its fluid-dynamic efficiency. The result is the most powerful engine ever built by Ferrari which flanks a massive 840 cv with the exhilarating power and sound typical of a Prancing Horse V12.

840CV +10CV compared to the 812 Competizione

The F149HC, to give the Daytona SP3 's engine by its design name, has a 65° angle between its cylinder banks and retains the 6.5-litre capacity of its predecessor from the 812 Competizione. It has inherited all the upgrades made to the 812 Superfast from the F140HB (812 Competizione) engine.

Specifically, these improvements combine to boost the performance of an engine that sets the new benchmark in terms of sheer driving pleasure and exhilaration, thanks in no small part to an exhilarating soundtrack created through targeted interventions on both the intake and the exhaust tracts. Important too was its coupling with a 7-speed gearbox itself upgraded by the adoption of extreme driveability strategies.



POWERTRAIN 9500 rpm

The maximum revs have been raised to **9,500 rpm**, while the shape of the torque curve, which rises rapidly all the way up to maximum revs, gives occupants the feeling of boundless power and acceleration.

Also fundamental to the latter was reducing the weight and inertia of the components. As a result, the **conrods** are now made from titanium, which is 40% lighter than steel but delivers the same mechanical resistance. The final con rod design was the result of myriad calculation loops and tests designed to achieve the best weight/reliability compromise.

The material used to make the **pistons** was also changed to reduce their weight, while targeted actions such as piston pins given a Diamond Like Carbon treatment (DLC, which reduces the coefficient of friction to improve performance and fuel consumption), guarantee a higher fatigue limit than a standard piston. In addition to the reduced weight of the con rods and pistons, the crankshaft has not just been newly balanced but is lighter overall (-3%).

Valve opening and closing is by way of **sliding finger** followers, derived from the world of F1 and developed specifically for this engine with the aim of reducing mass and availing of more high performance valve profiles. The sliding finger follower has a Diamond-Like-Carbon (DLC) coating and its job is to transmit the action of the cam (which also has a DLC coating) to the valve using a hydraulic tappet as the pin for its movement.

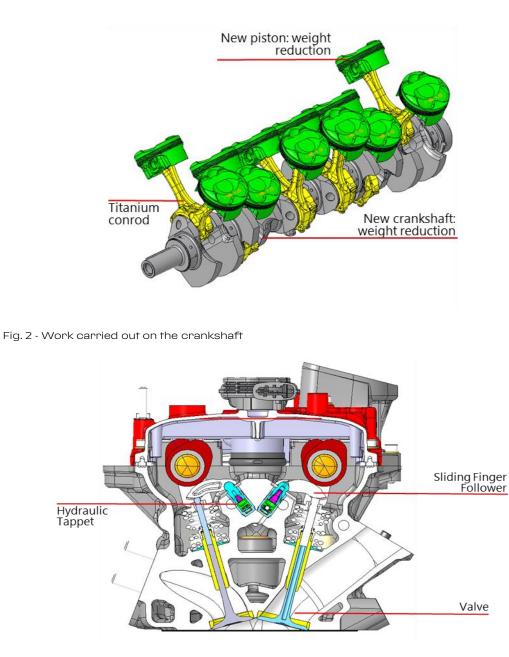


Fig. 3 - Work carried out on distribution

POWERTRAIN Intake and exhaust fluid dynamics

To ensure that the engine "breathes" correctly right across its range of operation, the intake system was radically redesigned. The manifold and the plenum are now very compact to reduce the overall length of the tracts to create power at high revs, while the torque curve is optimised at all engine speeds by a **system of variable geometry inlet tracts**.

The system enables the length of the intake tract assembly to be continuously varied, adapting it to the engine pulsations to maximise the dynamic charge in the cylinder. A dedicated hydraulic system governs the actuators and is controlled by the ECU in a closed loop, adjusting the inlet tracts' length position on the basis of the engine's load.

Combined with optimised cam profiles, the variable valve timing system creates an unprecedented system of equal height pressure peaks required to obtain power at high revs without sacrificing any torque at low and medium revs. The result is the sensation of continuous, rapid acceleration culminating in astonishing power at maximum revs.



Fig. 4 - Intake assembly

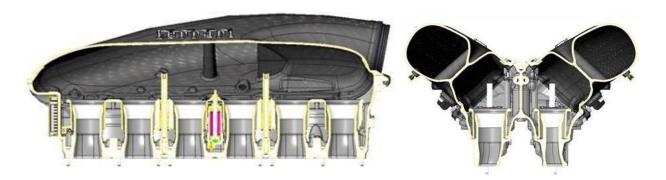


Fig. 5 - Variable geometry intake tracts

POWERTRAIN Combustion

The management strategies for the gasoline direct **injection system** (**GDI at 350 bar**) have been further developed to reflect increasingly stringent emissions and fuel consumption requirements. The GDI system comprises:

- two petrol pumps
- four rails with pressure sensors that provide feedback to the closed loop pressure control system
- electronic injectors that can also control up to three injections per engine cycle.

Calibration of the timing and amount of fuel injected at each injection and an increase in injection pressure have made it possible to reduce polluting emissions and particulate formation (-30% in the WLTC cycle), particularly in warm-up phases when the engine is cold and combustion can produce larger amounts of polluting substances.

The **ignition system** (coils and spark plugs) is constantly monitored by the ECU (ION 3.1) which has an ion-sensing system that measures **ionising currents** to control ignition timing. It also has a single and a multi-spark function for when multiple ignitions of the air-fuel mixture are required to prevent it being only partially burned, which is a source of polluting emissions. All of this results in smooth, clean torque delivery.

The ECU also controls combustion in the chamber to ensure that the engine is always working in peak thermodynamic efficiency conditions. This is also achieved thanks to a sophisticated strategy that recognises the RON of the fuel put in the tank.

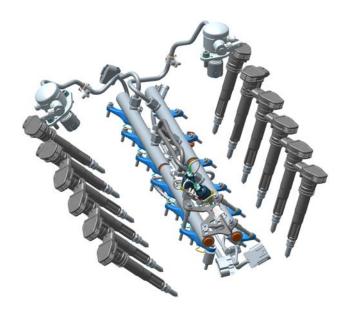


Fig. 6 - Injection and ignition system

POWERTRAIN Reduced friction

Reducing friction and mechanical losses inside the engine was one of the main drivers for the designers and developers alike. Weight reduction and the introduction of innovative materials for certain key engine components (DLC for pin, cam, sliding finger follower) have already been discussed in the previous paragraphs. However, in order to reduce the engine's fuel consumption, a completely **new variable displacement oil pump** was also developed that allows oil pressure to be continuously controlled right across the engine's entire operating range. A **solenoid valve**, controlled by the engine ECU in a closed loop, is used to control the pump's displacement in terms of flow and pressure, delivering only the amount of oil required to guarantee the functioning and reliability of the engine at every point in its functioning, whilst simultaneously saving energy on driving it.

Importantly also, in order to reduce friction and improve mechanical performance, a less viscous engine oil (Shell Helix 5W40) was used than in the previous V12s, and that the entire oil scavenge line was permeabilised from the cylinder block to the tank and the tank to the engine.

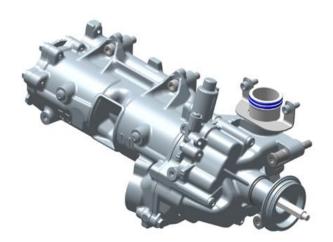


Fig. 7 - Variable-displacement oil pump

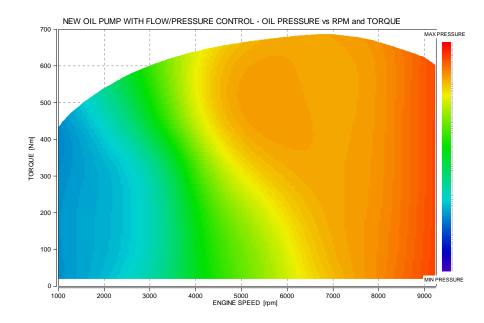


Fig. 8 - Oil-revs/torque pressure regulation

POWERTRAIN Sound

The Daytona SP3 's soundtrack is designed to add an extra layer of sophistication to the timbre of the Ferrari naturally aspired V12, the perfect marriage of harmony and intensity.

Exhaust headers tuned like the pipes of an organ and the fun profile of the primary duct of the new central twin tailpipe emphasise the Ferrari V12's harmonics which, combined with the car's extraordinary performance, make for a completely immersive and enthralling driving experience.

The integrated design of the intake system – the plenum, its resonator system and the air intake located at the centre of the lid – all mean that the sound from the very heart of the engine is channelled back into the cabin, further enhancing the already intoxicating sense of progression as the revs rises and the torque is unleashed.

The baritone sound at low revs, the dynamism of the medium revs and the instantly recognisable shriek at high revs give the new Ferrari V12 its own unique voice and the driver a completely unparalleled acoustic experience.

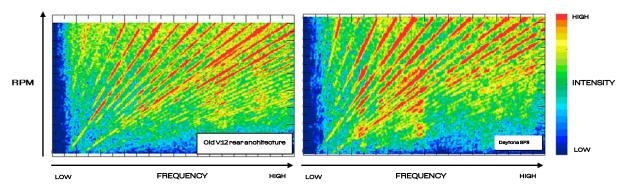


Fig. 9 - The sound pressure spectrum in the cabin as revs rise. The unusal intake layout lends the classic harmonics of the Ferrari V12 a greater intensity in mid frequencies, yielding a signature timbre that only adds to the car's sporty allure



Fig. 10 - Twin-tailpipe exhaust system

POWERTRAIN Gearbox

The Daytona SP3 sports a 7-speed dual clutch transmission with SPORT ratios, which delivers the very pinnacle of shifting performance, whilst also yielding a unique sound during upshifts unmatched by any other Ferrari.

This was made possible by adopting the most sophisticated gearshift and driveability control strategies, honed on both road and track, just as was the case with the 812 Competizione, in addition to interacting with the engine control to achieve complete driver involvement.

The new gearshifting strategy guarantees a clean, metallic shifting sound, while blisteringly fast rev blip helps reduce overall shifting time by 5%.

The Daytona SP3 's F140HC engine also benefits from the dynamic limiter threshold introduced on the 812 Competizione's V12 and thus boasts shifting on the very edge of 9500 rpm.

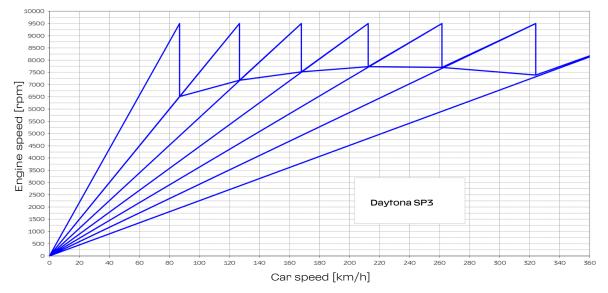
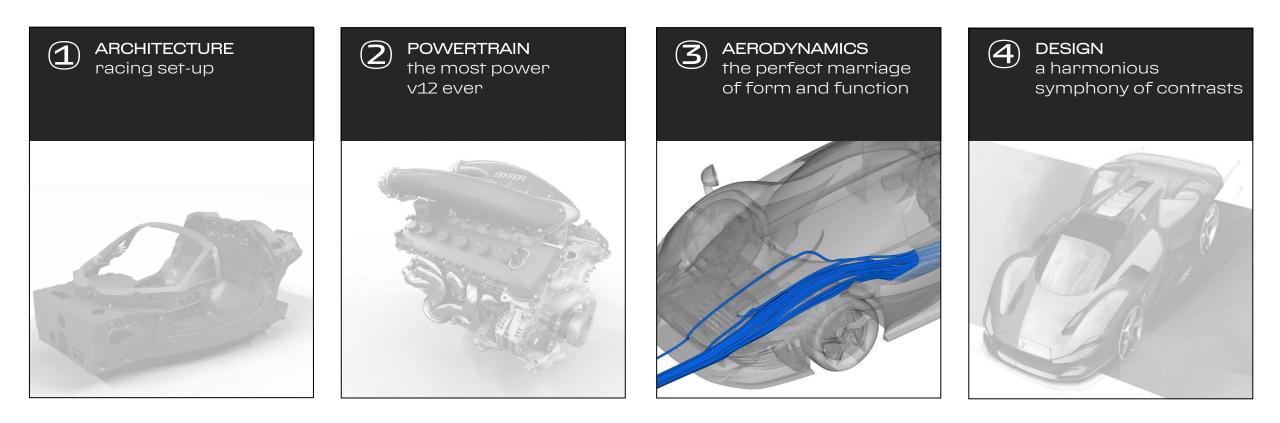


Fig. 11 - Gear ratios

SIGNATURE ELEMENTS How an Icona is born



AERODYNAMICS

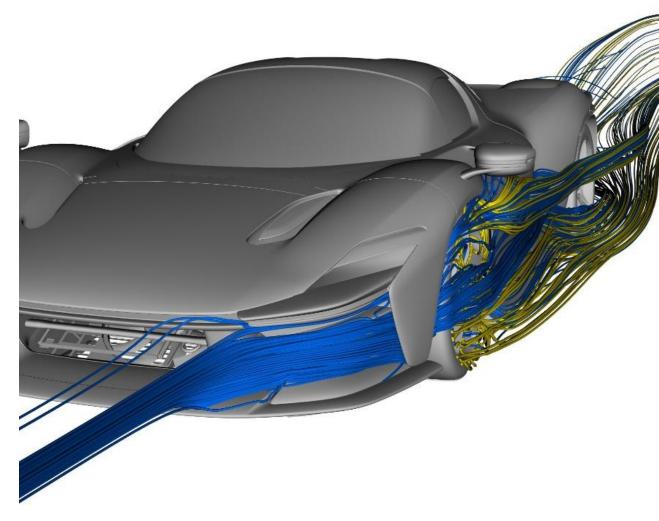
Design focused on

ACHIEVING MAXIMUM AERODYNAMIC EFFICIENCY

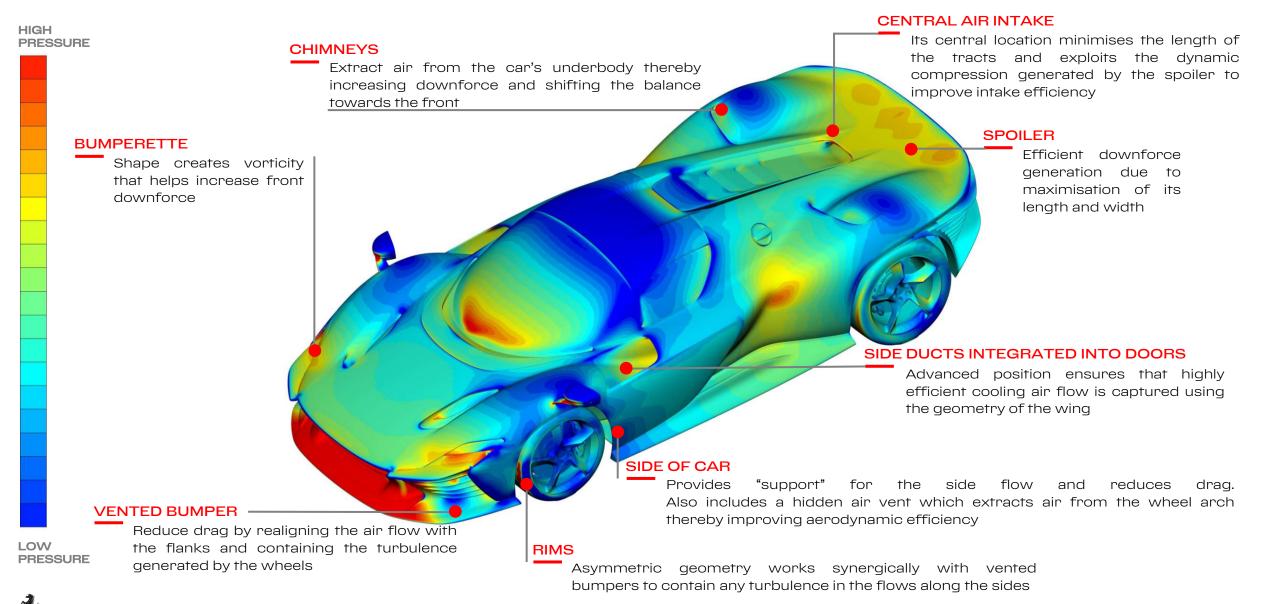
• USE OF SOPHISTICATED NEW SOLUTIONS that reflect the car's principle of formal purity

PURELY PASSIVE AERODYNAMICS

with highest level of efficiency and downforce ever delivered by Ferrari



AERODYNAMICS Main elements – upperbody



AERODYNAMICS Main elements – Underbody

HIGH PRESSURE

SPLITTER VORTEX GENERATOR

Generate vorticity which increases downforce on the underbody thanks to the suction generated

DOUBLE CENTRAL DIFFUSER

The fact that the exhausts are higher up allowed a split-level diffuser to be introduced that increases the efficient downforce generated at the rear

SEALED UNDERBODY

The vortex generator near the front wheels acts like a Formula 1 bargeboard: the vorticity created shields the underbody from the effect of the wake of the front wheel, allowing it to maintain high depression levels (downforce)

CHIMNEYS

Increase the amount of air flowing under the underbody, thereby increasing downforce and shifting the balance to the front

LOW PRESSURE

AERODYNAMICS Index of contents

HEAT

- Water cooling
- Engine and gearbox oil cooling
- Engine intake
- Engine bay cooling

FRONT

- Upperbody: S-Duct, bumperettes, vented Sides
- Side flow management: wheels with asymmetric geometry, vented sides
- Lower body: lower underbody, vortex generator splitters, sealed central underbody

REAR

- Upperbody: spoiler
- Chimneys
- Lower body: rear underbody

CABIN COMFORT

AERODYNAMICS Heat 1/2

The introduction of the most powerful ever V12 on the Daytona SP3 meant that more heat needed to be dissipated and so the cooling system spec also had to be boosted.

Increasing the radiating surfaces would have had a detrimental impact on the car's packaging, by reducing opportunities to develop its aerodynamics and imposing huge constraints on its styling. The main aim of the cooling system's design was thus to make it as efficient as possible.

Engine water cooling (central radiator)

Development here focused on three areas:

- Maximising the air flow striking the radiating surfaces, by eliminating all obstacles between it and the central intake (e.g. structural pillars)
- Boosting the permeability of the radiating package: using a single intake housing and a single fan delivered an increase in cooling flow when the car is moving equal to that which can be drawn in at idle.
- Evacuating heat on the front underbody: optimising the hot air extraction profiles created a virtuous circle in which the increase in suction (and thus downforce) boosts the air extraction capacity of the radiator compartment.

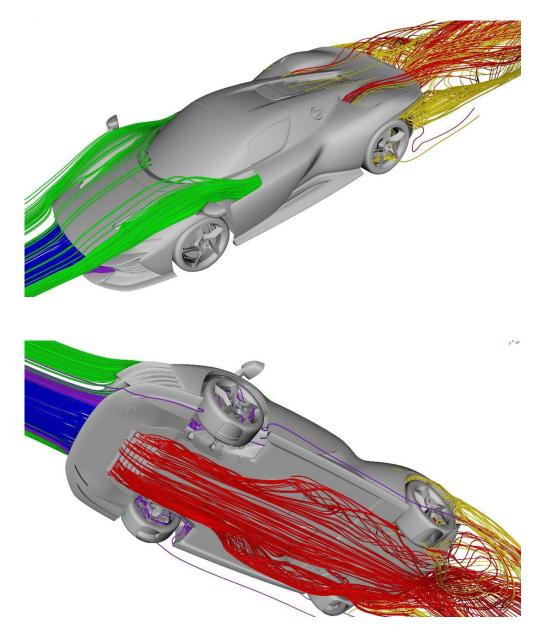


Fig. 12 – Car cooling flows and heat evacuation: blue/red engine and air con water, green/yellow enginegearbox-clutch, purple brakes

AERODYNAMICS Heat 2/2

Engine and gearbox oil cooling (side-mounted radiators)

The radiating masses aboard the Daytona SP3 have been shifted towards the centre of the car, paving the way for the aero and stylistic development of the whole side of the car. It also laid the foundations for the integration of side ducts into the doors and allowing the intake ducts for the oil radiators to be moved forwards in the chassis to near the quarterlight. As a result, the front wing creates an ideal section for the intake ducts and captures fresh air that is also highly efficient in terms of capturing extremely fresh air flow for cooling the radiators.

Engine intake

The main job of the backbone design on the Daytona SP3 's signature engine cover is to channel fresh air into the engine intake which has been positioned centrally to exploit the spoiler's dynamic compression and also shorten the intake tracts.

Engine compartment cooling

The backbone also a further important function: the longitudinal slots that separate the backbone from the single-piece rear bodywork also dissipate engine heat when the car is not moving and capture fresh air when it is underway thanks to their interaction with the apertures between the blades on the rear bumper.

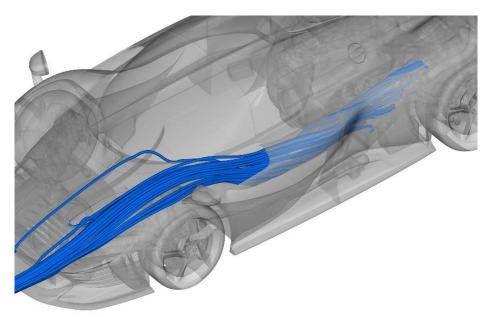


Fig. 13 - Side radiator intakes integrated into the doors

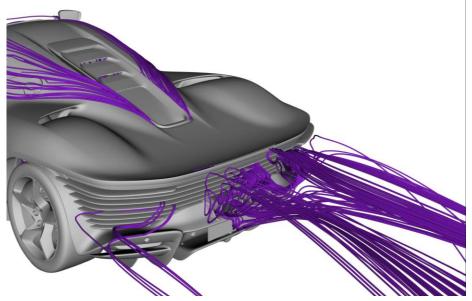


Fig. 14 - Interaction between the apertures on the sides of the backbone and the rear grille to guarantee the required cooling flow to the engine compartment

AERODYNAMICS Front

The front of the Daytona SP3 is a strikingly harmonious melding of form and function: every single element is logically positioned in terms of its function, and the modelling of its volumes and its relationship to the other elements brilliantly express its performance.

S-Duct

The upper intake located above the brake ducts is connected to the vent on the bonnet. This creates a blown duct which helps generate front downforce by modifying the momentum of the air flux.

Bumperettes (aero flicks)

The protrusion of the bumperettes, which are integrated in the "claw" beneath the headlights, means they act as aero flicks, generating vorticity and thus downforce.

Vented side pumper

The vertically stacked winglets on the edge of the bumper guides the airflow into the wheel arch, reducing drag by:

- Realigning the flow along the flanks
- Containing the turbulence generated by the wheel wake.

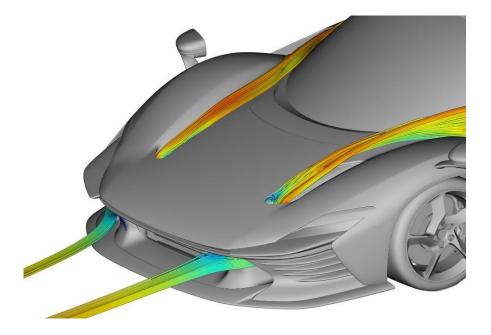


Fig. 15 - Blowing along side of bonnet: flow lines created by ducts

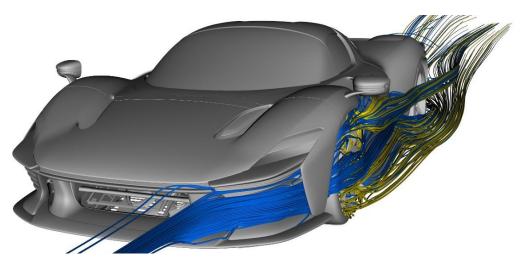


Fig. 16 - Synergy between vented side bumper and wheel to manage the flow along the flanks: the flow continues to hug the car's flanks, reducing the size of the car's wake

AERODYNAMICS Management of flow along car's flanks

Correct management of the aerodynamic flow along the car's flanks or sides was fundamental to maximising efficiency as this limited drag.

Wheels with asymmetric geometry

The wheels' unusual profile boosts flow extraction from the wheel well, thereby improving the functioning of the front underbody and brake ventilation. It also improves interaction with turbulence generated by rotation of the wheels themselves and realigns the flows with the external ones, by channelling them along the car's flanks.

The flanks

The unusual shape of the car's flanks means there is a wide side surface which is also one of the car's signature styling cues and makes a significant contribution to cutting drag by reducing the transverse size of the wake. The car's flanks also hide a genuine aero channel, which vents ahead of the rear wheel and increases air extraction from the wheel well. This channel maximises air extraction from the wheel well which has a direct positive impact on both drag and downforce: the front underbody benefits from reduced blockage of the underbody – the flow under the front underbody is increased, boosting downforce generation capacity at the front.

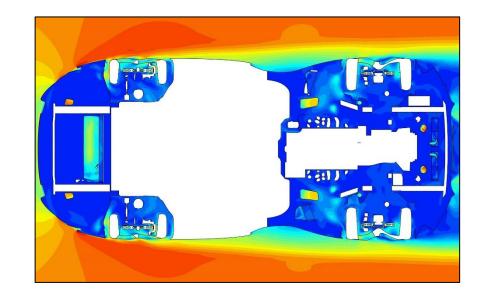


Fig. 17 - Synergy between the vented side bumpers and wheel to manage the flow along the flanks: the flow hugs the flanks, reducing the car's wake

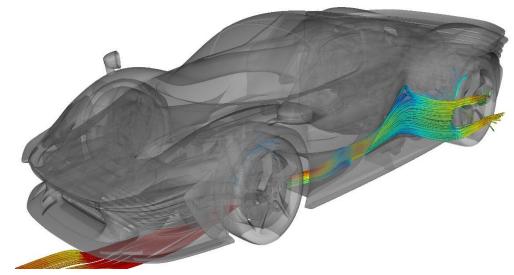


Fig. 18 - Close-up of the evacuation of the overpressure in the wheel well in the duct under the flank

AERODYNAMICS Front underbody

The work carried out on the underbody focused on generating extremely efficient downforce through the use of devices that create localised vorticity.

Lower underbody

The fact that the underbody is 10 mm lower than cars with similar architecture means it delivers near peak suction, boosting the efficiency of the devices that exploit ground effect.

Splitter vortex generator

Two pairs of curved profiles ahead of the front wheels act as splitter vortex generators and exploit their relative angle to the air flow to generate powerful yet stable vortices which develop downforce at the front thanks to a high level of suction created on the underbody.

Sealed central underbody

The position of the pair of vortex generators inside the front wheels virtually was designed to virtually seal the front underbody. The outer vortex generator has the same effect as a Formula 1 barge board: the vorticity created shields the underbody from the effect of the wake of the front wheel, thereby reducing interference with the more efficient flow created by the central section of the floor.

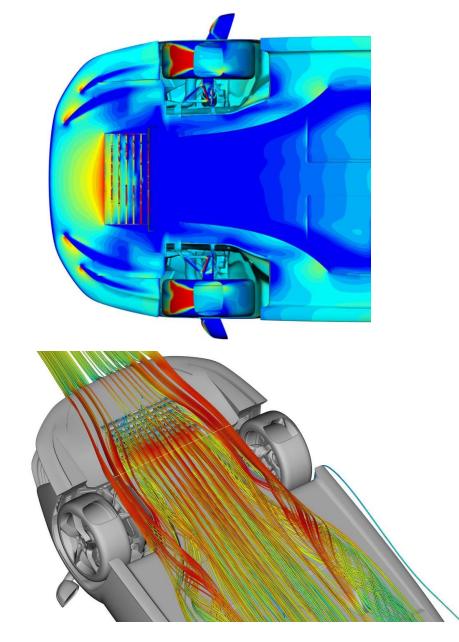


Fig. 19 - Aerodynamic sealing effect of the vortex generator on the front underbody

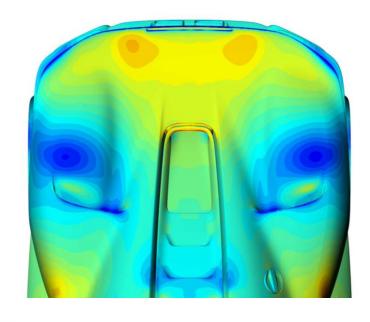
AERODYNAMICS Tail

The Daytona SP3 's tail design is extremely clean and iconic as it was inspired by the most illustrious V12 prototypes from Ferrari history. The hunt for maximum downforce and the best compromise with drag, both essential to maximising the car's overall efficiency, thus did not involve resorting to any active aero devices, focusing instead on optimising the bodywork volumes and surfaces.

Spoiler

The most important development work done in terms of downforce generation was the modelling of the rear spoiler. To correctly split the downforce between front and rear axle and guarantee performance, a spoiler that extends right across the entire width of the car was added.

Its active surface was maximised by extending its lip to the outer edges of the rear wings, a pivotal factor in boosting downforce without increasing drag i.e. in achieving maximum efficiency.



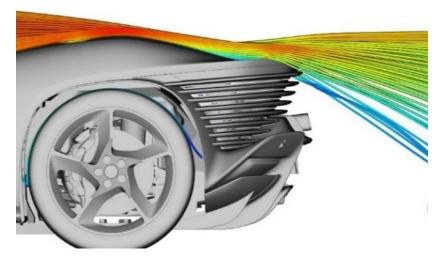


Fig. 20 - Pressure distribution on the rear bodywork and the flow to the spoiler

AERODYNAMICS Underbody chimneys

The Daytona SP3 's rear underbody features an innovative aero solution which is also one of the car's signatures: **underbody chimneys**.

These are connected to two integrated horizontal louvres in the rear wings by a vertical duct, creating a fluid-dynamic connection between the underbody and the upper bodywork.

The position of the chimney vents, made possible by moving the engine air intake on the central backbone, was chosen deliberately.

The natural suction created by accelerating the flow on the curve of the wing volume acts as a "pump" to maximise the amount of air in the ducts, which is also used to cool the rear brakes. The connection between these two otherwise very different areas of the car produces two direct aero benefits:

- 1. It reduces the blockage of the underbody by increasing the flow under the front underbody, increasing downforce and shifting the aero balance forwards to improve turn-in
- 2. It increases rear downforce by directing the air from the chimneys over the rear wings to the spoiler.

The shape of the intakes was designed to accelerate the flow in the area of the kickline of the rear diffuser which generates a powerful suction in that area and increases rear downforce.

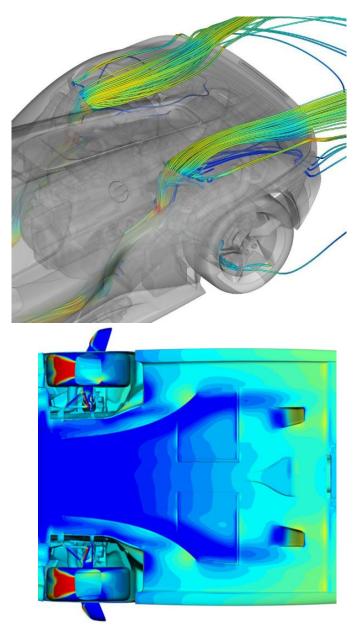


Fig. 21 - Suction generated on the underbody by the shape of the intakes: the front ramp is similar in shape to a diffuser

AERODYNAMICS Rear underbody

The underbody plays a crucial role in achieving maximum aerodynamic efficiency because it can deliver both high levels of downforce and low levels of drag at once.

To make the underbody as efficient as possible, it was necessary to increase in the diffuser's expansion volume, to draw more air under the car, resulted in the repositioning of the exhaust pipes to a higher, central position, thus freeing up space in the lower part of the bumper. The full-width spoiler essentially amplifies the downforce generated by the diffuser.

A mix of CFD simulations and sessions in the wind tunnel produced a diffuser that stretches right across the space between the two rear wheels, thereby maximising the expansion capacity of the flow horizontally as well as vertically. The full-width spoiler thus essentially amplifies the downforce generated by the diffuser.

The space freed up at the centre has been used to introduce a solution similar to a double diffuser, which creates flow expansion on two levels and characterises the design of the rear, creating a central 'bridge' structure. This means the flow that passes outside the central channel energises the one inside, boosting the efficiency of the diffuser as a whole.

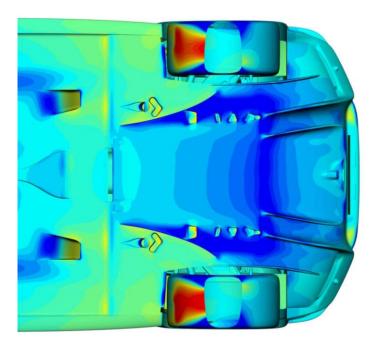


Fig. 22 - Pressure distribution on rear diffuser: space freed up between the wheels is used to expand the flow from the underbody in the diffuser



Fig. 23 - Double central diffuser: the central bridge is flanked by a more external diffuser volume that enhances its efficiency

AERODYNAMICS Cabin comfort (open-top configuration) (1/2)

To ensure occupant comfort, it is crucial to prevent flows from reentering the cabin as much as possible. These flows are determined by two distinct phenomena:

- **1**. the wake from the windscreen header rail
- 2. the vortices rolling from the pillar area on the upper edge of the side windows.

With regard to the former, the Daytona SP3 has a prototype-style bubble windscreen in which the glass extends all the way to the start of the removable hard top.

To control the direction in which the flow detaches from the windscreen header rail, a nolder has been integrated into the upper seal of the windshield. The height of the centre and sides of the nolder has been calibrated differently to force the flow in a very clearly defined direction. In addition to this device, the middle of the roll hoop area dips to follow the shape of the rear bodywork and the engine cover and thus minimises the possibility of the wake deflected towards the rear header rail tumbling back into the area between the seats.

This solution also highlights the car's perfect melding of form and function as this dip at the leading edge of the rear engine cover allows the central backbone to be perfectly integrated into the volume of the rear.

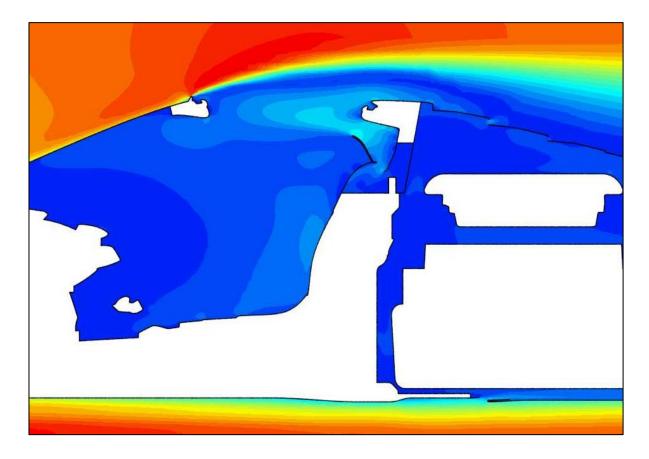


Fig. 24 - Interaction between the windshield nolder and the cabin: the turbulent wake is deflected upward to prevent it re-entering the rear area of the cabin

AERODYNAMICS Cabin comfort (open-top configuration) (2/2)

Avoiding the impact of vortices re-entering the area at the rear of the side windows demanded meticulous management of the flows inside the cabin. These are "captured" and then channelled into areas that won't irritate occupants by the rear trim behind the head rests towards a centrally recessed slot protected by the windstop so that it is vented outside the cockpit.

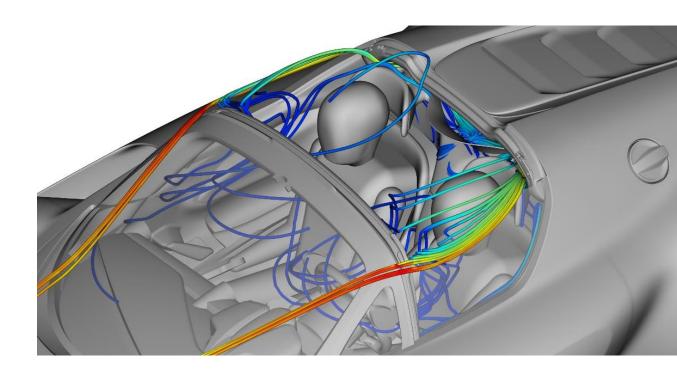
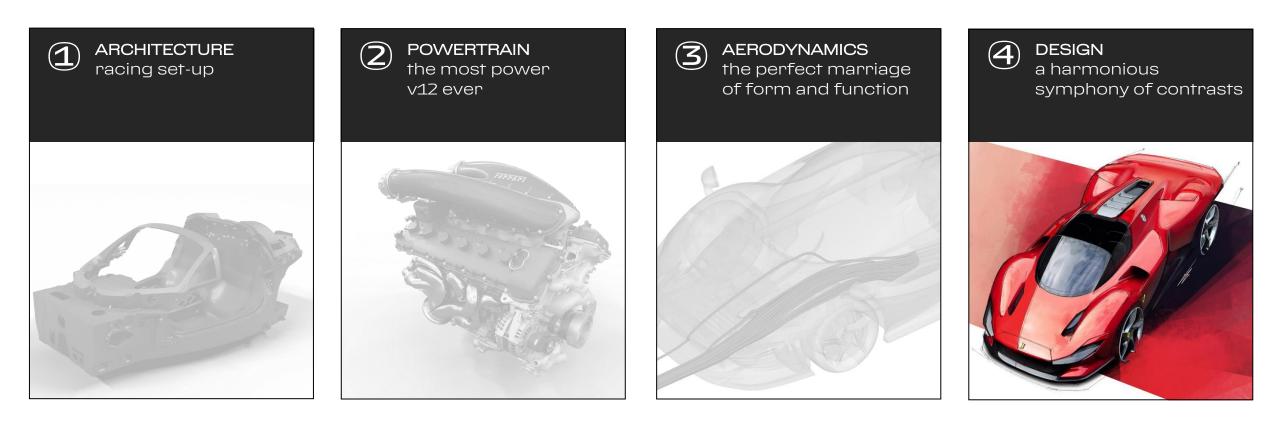


Fig. 25 - Turbulent flow captured by the central windstop and vented through slots in the upper trim

SIGNATURE ELEMENTS How an Icona is born

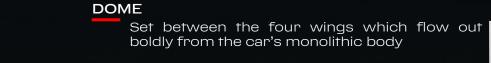


DESIGN A harmonious symphony of contrasts

SENSUALITY AND AGRESSION

DRAMATIC IMPACT OF MELDING OF CURVED SURFACES AND SHARP LINES

INSPIRED BY THE WORLD OF THE LEGENDARY SPORTS PROTOTYPES OF THE 1960S AND 70S



INTEGRATED AIR INTAKES

The door also acts an air box, channelling air to the radiators located inside the flanks

MUSCULAR WHEEL ARCHES

Lend the car a sense of huge dynamism and eagerness

FLANKS

Beautifully balanced contrasts between voluptuous geometries and sharp lines. Their shape helps to manage the air flow from the wheel, thereby improving efficiency

S-DUCT

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A. A.

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Aside from doing their aerodynamic job, the two S-Ducts add to the sculptural power of the two double-crested wings, underscoring yet again Ferrari's signature effortless melding of form and function in its designs

BUMPERETTES

Heritage Sport Prototypes. Help generate downforce at the front

Daytona SP3 | Product information 49

UPPER MOBILE PANEL

Aggressive stance, minimalist design

BACKBONE

Inspired by the 330 P4, this a monolithic structure comprised of a series of slots. It plays a fundamental role in the intake and evacuation of hot air from the engine bay

PINCHED WAIST

A sensual sculptural effect created by the intersection of the outward curve of the door volume and the powerful rear muscle, made possible by repositioning the radiators inside the car.

CHIMNEYS

These extract air from the underbody, thus improving downforce and aerodynamic efficiency. They are seamlessly integrated into the rear styling, improving both its character and threedimensionality

BLADE DESIGN

The futuristic, evocative look of Ferrari DNA. The grilles between the blades work in synergy with the backbone to manage the heat coming from the engine compartment.

RAISED CENTRAL TAILPIPES

Free up space for a rear diffuser, thus helping to generate downforce. Their shape and location also visually widens the tail.

DESIGN Exterior – Architecture

The design of the competition cars of the 1960s and 70s was absolutely unique and, although it draws on the main elements of a specific reference stylistic language, the Daytona SP3 is clothed in undeniably original, modern forms. Its sculptural power celebrates and interprets the sensual volumes of sports prototypes to wholly contemporary effect. It goes without saying that a design this ambitious demanded a meticulously planned and executed strategy.

From the wraparound windscreen back, the Daytona SP3 's cabin looks like a dome set into a sensual sculpture with sinuous wings emerging boldly either side. The car's overall balance is underscored by solid monolithic volumes that are a powerful articulation of the long-appreciated skills of Italian coachbuilding at its finest. The fluidity of its masses melds effortlessly with sharper surfaces, to produce the sense of effortless aesthetic balance that has long been a signature of Maranello's design history.

The feeling is of gazing upon an object of unprecedented beauty as the fluidity of its masses melds effortlessly with sharper surfaces, to produce the sense of effortless aesthetic balance that has long been a signature of Maranello's design history. Extremely sculptural surfaces and sharp lines coexist in complete harmony, efficiently communicating their clear functional nature and turning the car into a designer object.



DESIGN Exterior – Flanks (1/2)

The clean, modern double-crested **front wings** are a nod to the sculptural beauty of past Ferrari sports prototypes of the likes of the 512 S, 712 Can-Am and 312 P. The shape of the **wheel cutouts** efficiently connote the geometry of the flanks. At the front, they are more structural and, by not completely following the circular profile of the tyre, create a powerful link between wheel and well.

The rear flank swells out from the sylph-like waist giving rise to a powerful rear muscle that wraps around front of the wheels, then tapers back towards the tail, lending a powerful dynamism to the three-quarter view.

Another key element is the **butterfly doors** which also play a pivotal role in the car's aerodynamics:

- They have an air box integrated into them to channel air to the sidemounted radiators; the resulting sculptural forms give the doors a pronounced shoulder housing the air intake that is visually linked to the vertical cut of the windscreen.
- The surface of the door also helps to manage the air flow emerging from the wheel, improving the car's aerodynamics. This surface treatment also closely recalls that of cars such as the 512 S which partly inspired the Daytona SP3's stylistic code





DESIGN Exterior – Flanks (2/2)

The rearview mirrors are forward of the doors because of the need to guarantee maximum visibility through the quarterlight and also for aerodynamic purposes as it improves the air flow along the door surfaces.

The three-quarter rear view of the car is even more significant as it fully reveals the Daytona SP3 's original styling. The door is a sculpted volume which generates a pronounced dihedral form. Together with the powerful muscle of the rear wing, it creates a completely new, sculptural pinched-waist look, reminiscent of the "coke bottle effect" of old.

The door acts to extend the surface of the front wheel arch and counterbalances the imposingly voluptuous rear, resulting in a sort of dynamic imbalance that visually transposes the volume of the flank and lends the car a more cab-forward look.

The location of the side radiators, the product of constantly interaction between the Ferrari Centro Stile and the Technical Department, allowed this architecture to be adapted to suit a sports car.





DESIGN Exterior - Front

The front of the Daytona SP3 is dominated by two imposing, sculptural fenders that feature outer and inner crests: the latter dive into two air vents on the bonnet, making the fenders look wider.

The relationship between the perceived mass of the fenders and the aerodynamic role of the two **S-Duct**s underscores the way in which styling and technology are inextricably linked in this car.

The **front bumper** has a generous central grille framed by two pillars and a series of stacked horizontal blades framed by the outer edge of the bumper. Their aim is to improve the car's aero efficiency but they are also a very distinctive styling theme.

The headlight assemblies are characterised by an **upper mobile panel** that recalls the pop-up headlights of early supercars, a theme dear to Ferrari tradition that lends the car an aggressive, minimalist look. Two **bumperettes**, a reference to the aeroflicks featured on the 330 P4 and other sports prototypes, emerge from the outer edge of the headlights, adding a further expressiveness to the front of the car.





DESIGN Exterior - Rear

The rear bodywork highlights the powerful appearance of the fenders by the use again of the twin-crest theme and the aerodynamic vent, a Formula 1 favourite, that boosts its threedimensional volume and character in addition to extracting air from the underbody.

The cockpit, which is very compact and tapered at the rear, combines with the fenders to create a powerful tail with a monolithic louvred backbone element, inspired by the 330 P4. It has several function, not least drawing cool air into the engine and venting hot air from the engine compartment. The naturally aspirated V12, the living beating heart of the new Ferrari Icona, is revealed in all its glory at the end of this backbone.

A series of **horizontal blades** complete the rear, creating the impression of a light, radical, structured monolithic volume that lends the Daytona SP3 a look that is both futuristic and a nod to signatures from Ferrari's "dream car" DNA.

The taillight assemblies are made up of a horizontal light bar beneath the spoiler and integrated into the first line of blades.

The twin **tailpipes** are positioned centrally in the upper part of the diffuser, adding to its aggressive character and completing a design that visually broadens the car, giving the tail a powerfully unique style all of its own.





DESIGN Sporty driver-oriented interior

MINIMALIST YET SOPHISTICATED

SEATS INTEGRATED INTO BODYSHELL in seamless continuity with the surrounding elements: sports car – gt mix

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WRAPAROUND EFFECT



"PADDED" EFFECT

So beautifully crafted that they seem to drape cloaklike over the bodywork, the seats, doors and tunnel are all designed as a single seamless element, creating the wraparound, cocoon-like effect of a modern lounge.

DIVISION OF CABIN

The cut of the windscreen header rail creates a vertical plane that divides the cockpit in two, separating the functional area of the dashboard that hosts the instrumentation from the seating. This architecture means that the emphasis can be either sportier or more GT-oriented, depending on the materials selected (Alcantara, leather).

SEATS

Integrated into the bodywork, the ergonomic wraparound seats were designed as a GT-racing hybrid, straddling both worlds. They recall the typical upholstered cushions that on the sports prototypes that were directly attached to the chassis.

DASH

Minimalist look with a slender, taut main body. The upper trimmed shell seems to float above the lower one that plays host to all of the technical controls.

TUNNEL

Signature blade set beneath the connecting trim between the seats and also houses the new gearshift gate

HMI

The Daytona SP3 has inherited the new generation HMI from the range with touch screen controls and a 16" curved screen.

DESIGN Interior – Architecture

Even the Daytona SP3 's cockpit takes its inspiration from historic Ferrari racers such as the 330 P3/P4, the 312 P and the 350 Can-Am. Starting with an idea of a high-performance, functional chassis, the Centro Stile designers crafted a meticulously refined sports prototype-style cockpit that also delivers the comfort and sophistication of a modern Grand Tourer whilst keeping the styling language extremely minimalist.

It retains the philosophy behind certain styling codes: the dash, for instance, is minimalist and functional yet also entirely contemporary in feel.

The typical upholstered cushions that on the sports prototypes were directly attached to the chassis have been radically transformed into modern, elegant seats integrated into the body, creating a seamless textural continuity with the surrounding trim.

Several important exterior elements, including the windscreen, positively influenced the interior architecture. Seen from the side, the cut of the windscreen header rail creates a vertical plane that divides the cockpit in two, separating the functional area of the dashboard that hosts the instrumentation from the seating.

This architecture neatly lends itself to being either extremely sporty or very elegant depending on the upholstery, trim and colours selected.



DESIGN Interior – Cockpit

The Daytona SP3 's interior aims to guarantee both driver and passenger a snug driving environment by drawing on styling cues typical of competition cars.

The main idea was to broaden the cabin visually by creating a clear break between the front area with the dashboard and the two seats. The latter, in fact, are part of a seamless textural continuity, their trim extending all the way to the doors, reproducing a hugely elegant take on the padded upholstery typical of sports prototypes. Seats, doors and tunnel were designed as a single continuous element.

This same extension of the trim can also be seen on the sill area when the doors are open.

The dashboard follows the same philosophy: here the Daytona SP3 's structure means that the trim extends all the way to the quarterlights, hugging the entire area connecting with the windscreen, visually widening the space. The slender, taut dashboard seems almost to float within the upholstery.

All of these solutions are designed to create the wraparound yet extremely light environment demanded by a sports prototype yet given a Grand Tourer-inspired reinterpretation.

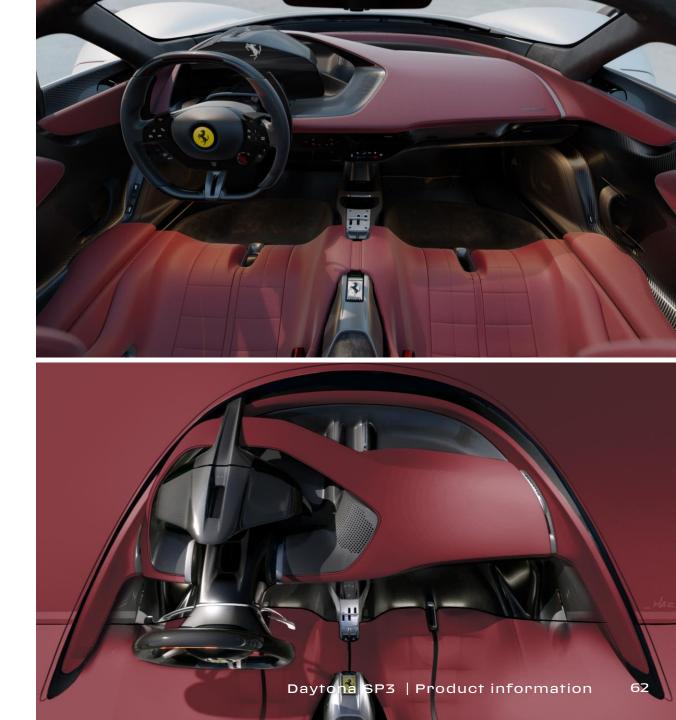


DESIGN Interior – Dashboard

The aim with the dash design was to pare the complexity of the forms and tech content back to a minimum by achieving extreme formal purity. The presence of voids lightens the structure, creating a "seethrough" effect.

The dashboard itself is extremely taut and slender. Its styling theme develops on two levels: the upper trimmed shell, which has a clean, sculptural look, is separated from the lower one with a clear textural and functional dividing line. All of the Human-Machine Interface (HMI) touch controls and aero functions are clustered below this line in a black-screen-effect band.

Lower down, there is a central bridge with satellites inherited from the SF90 Stradale's innovative interface system. Considerable attention was paid to honing and perfecting the precise hierarchy of the various volumes and functions to group the controls in specific areas, highlighting certain functions over others, all with the aim of delivering absolute formal purity.



DESIGN Interior – Seats

The seats were crafted as a GT-racing hybrid, straddling both worlds. They have the ergonomic wraparound design typical of highperformance cars, but also the kind of meticulous detailing that makes them feel almost whisked from a very modern, very elegant lounge.

Completely integrated into both the carbon-fibre body and chassis, their design demanded in-depth analysis of the structure and its constraints. These elements drove the development of their styling even more so than in other projects with the result that it was possible to underscore the theme on several levels. In fact, the textural connection between the seats and the extension of the theme to the adjacent trimmed areas as well as certain sleek volumetric effects, were all possible because of the integrated structure and the adoption of an adjustable pedal box, which in turn allowed a fixed seat configuration.

The clear break between the technical area of the cockpit and the occupant area also allowed the seat volume to be extended all the way to the floor, so that the seats cradle their occupants and also have a refined "chaise longue" aesthetic.

Even the headrests reference their extreme competition counterparts but while in the latter they are integrated into singlepiece seats, in the Daytona SP3 they are independent, almost floating. The fixed seat and adjustable pedal box architecture meant they could be anchored to the rear trim. This lends the seats a look of overall lightness and sleekness within the cabin.





DESIGN Interior – Door panel and tunnel

The door panel design also significantly helps to visually widen the cockpit. Some trimmed areas have been added to the carbon-fibre panels: leather padding on the door panel at shoulder height completes the design of the upper part of the seats and further accentuates the wraparound effect. Lower down, however, the surfaces feel like an extension of the seat itself.

The tunnel has a signature blade set beneath the connecting trim between the seats, with its functional elements at its extremities.

In its front section in particular is the gearshift gate reintroduced to the range on the SF90 Stradale. Here, however, it is raised and feels almost suspended over the volumes around it. The structure ends in a carbon-fibre central pillar that seems to support the entire dash. This imbues the whole element with a sense of extreme lightness.



PERSONALISATIONS



PERSONALISATIONS Personalisation pack

The Daytona SP3 includes a pack that allows the client to select a series of car personalisation content at no extra cost:

- «Scuderia Ferrari» shields on door
- Coloured brake callipers
- Carbon-fibre hard top, available in black painted or carbon look versions
- Carbon look lower bodywork instead of black
- Shiny liquid silver rims
- Four-point seatbelt*, to underscore the car's racing stance
- Black Alcantara interior (seats, dash, door panels, mats, windshield arch), with option to configure seats and door panels in red and in the new electric blue also
- Front lift system
- Front parking camera and sensors



PERSONALISATIONS Seats

The Daytona SP3 's seats are integrated into the body: clients can find the perfect driving position to suit their particular size and shape as there is a choice of two Sea and Backrest sizes (M and L) as well as different tilt angles.

| TILT ANGLE | SIZE M | SIZE L |
|-------------|--------------|--------------|
| 25° | \checkmark | |
| 27 ° | \checkmark | \checkmark |
| 29° | | \checkmark |
| 32 ° | | \checkmark |

Clients will be provided with a bracket kit to use to make the correct angle adjustments* for the selected seat size.

The passenger seat is one-size - L-32° configuration.



PERSONALISATIONS 4-point seatbelt

Clients seeking an even more exhilarating driving experience on both road and track can opt for brand-new completely redesigned 4-point seatbelt.

Design-wise, the new seatbelts underscore the car's track-oriented character, thanks in part also to a new safer buckle with an even faster release, and a lighter exposed carbon-fibre structure. Taken as a whole these features bring numerous advantages in terms of ergonomics and containment capacity when cornering, braking and accelerating.

The new 4-point seatbelts can be **personalised in a selection of four colours**:

- Black
- Red
- Yellow
- Blue



PERSONALISATIONS Capsule

To create an even stronger, more personal bond between owner and car, Ferrari also designed an exclusive capsule collection for Daytona SP3 clients.

The race suit

Every line of the suit has a direct connection with the composing elements of the car: the waist is accentuated by an internal elastic band, lateral pockets refer to the sliced sides, cuts on both sleeves and side panels follow the main silhouette of car. The interiors are interpreted thanks to a very high level of leather craftsmanship and anatomical details such as the embossing on the back of the suit, perfectly resembling the seats quilting. The color scheme follows the sportive configuration, where Red and Blue give life to a vibrant contrast. The construction of the object and the materials selection are made always taking into account performance: the ultra-light and yet resistant leather is combined with an ultra-comfort jersey fabric, that was strategically placed in all those areas that most need comfort, to ensure the best driving experience possible.

Gloves

Realized in bicolor leather, gloves are infused with the highest performance values possible. The ergonomic construction improves the fit and helps the driving grip, touch microfiber was added on the palm and fingers for smartphone use, the seamlessly padded portion on the back adds extra protection to the knuckles area. The metal Prancing Horse is found at the center of a retro-injected leather plaque inspired by the "backbone" of the car.



PERSONALISATIONS Capsule

Backpack

The Daytona SP3 silhouette adapted to this object results in an elongated, ergonomic backpack, that follows the curves of the human anatomy. The iconic shape is enhanced by the embossed, blue side panels. Inspired by the details on the livery, the central retro-injected plaque perfectly frames our metal Prancing Horse. The conscious leather chosen for the suit is here reinforced and thickened to make the object durable and sturdy. The back of the backpack is padded following the seating quilting for a higher comfort feel. Leather shoulder straps embrace the top of the shoulder blades and are adjustable thanks to our exclusive metal buckles. Two bellows pockets on the side add for esthetics and functionality.

Duffle Bag

A new duffle bag inspired by the Daytona SP3 iconic shape. Its unique, unprecedented volume gets slimmer at the center, and is accentuated by two projecting pockets on the side, referring the car sides, and a central retro-injected detail, where stands our Prancing Horse. The double-zipped openings are connected by a puller handle, to facilitates the use of the bag.



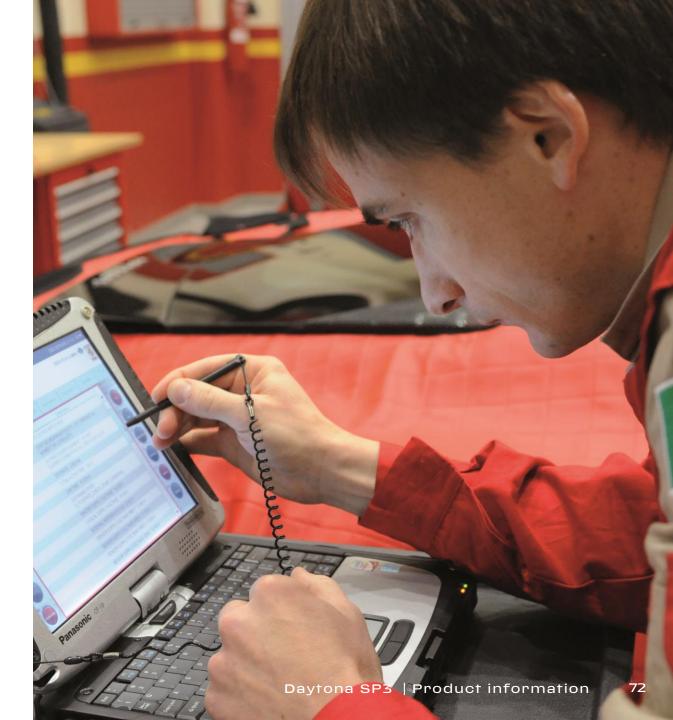
7 YEARS MAINTENANCE

7 YEARS MAINTENANCE

Ferrari's unparalleled quality standards and increasing focus on client service underpin the extended seven-year maintenance programme offered with the Daytona SP3. Available across the entire range, the latter covers all regular maintenance for the first seven years of the car's life. This scheduled maintenance programme for Ferraris is an exclusive service that allows clients the certainty that their car is being kept at peak performance and safety over the years. This very special service is also available to owners of pre-owned Ferraris.

The main advantages of the Genuine Maintenance programme are regular scheduled maintenance (at intervals of either 20,000 km or once a year with no mileage restrictions), original spares and meticulous checks by staff trained directly at the Ferrari Training Centre in Maranello using the most modern diagnostic tools. The service is available on all markets worldwide and from all Dealerships on the Official Dealership Network.

The Genuine Maintenance programme further extends the wide range of after-sales services offered by Ferrari to meet the needs of clients wishing to preserve the performance and excellence that are the signatures of all cars built in Maranello.



TECHNICAL SPECIFICATIONS



DIMENSIONS AND WEIGHT

| Length | 4686 mm | 184,6 in |
|---------------------|--------------------------|---------------------------------|
| Width | 2050 mm | 80,7 in |
| Height | 1142 mm | 45,0 in |
| Wheelbase | 2651 mm | 104,4 in |
| Front track | 1692 mm | 66,6 in |
| Rear track | 1631 mm | 64,2 in |
| Dry weight* | 1485kg | 3274 lb |
| Weight distribution | 43.6% front - 56.3% rear | |
| Fuel tank capacity | 86 l (18 reserve) | 22,7 US gallon (2.9 reserve) |
| TYRES | | |

| Front | 265/30 ZR 20 J9.0 |
|-------|--------------------|
| Rear | 345/30 ZR 21 J12.5 |

BRAKES

| Front | 398 x 223 x 36 mm | 15,7 x 8,8 x 1,4 in | |
|----------------------------|----------------------|---------------------|--|
| Rear | 380 x 253 x 34 mm | 15 x 10 x 1,3 in | |
| INTERNAL COMBUSTION ENGINE | | | |
| Туре | V12 - 65° - Dry Sump | | |
| Total displacement | 6496 cm ³ | 397 cu in | |
| Bore and stroke | 94 x 78 mm | 3,7 x 3,1 in | |
| Maximum power output** | 840 cv @9250 rpm | 618 kW @7250 rpm | |
| Maximum torque | 697 Nm @ 7250 rpm | 514 lb ft @7250 rpm | |
| Specific power output | 129 cv/l | 1,56 kW/cu in | |
| Maximum revs | 9500 rpm | | |
| Compression ratio | 13.6 : 1 | | |
| | | *) • (:+! +: | |

*With optional content

**Includes 5 CV of dynamic ram



PERFORMANCE

| Maximum speed | >340 km/h | >211 mph |
|--------------------------|---|------------|
| 0-100 km/h | 2.85 s | |
| 0-200 km/h | 7.4 s | |
| Dry Weight/Power | 1.77 kg/cv | 5,30 lb/kW |
| TRANSMISSION AND GEARBOX | F1 Dual Clutch Gearbox, 7-speed | |
| ELECTRONIC CONTROLS | SSC 6.1: eDiff 3.0, F1-Trac, SCM-Frs, FDE | |

FUEL CONSUMPTION AND EMISSIONS

| Fuel consumption | under homologation |
|------------------|--------------------|
| Emissions | under homologation |

