F1 Rivals question Ferrari's engine advantage

MAUTOSPORT

BRITAIN'S BEST MOTORSPORT WEEKLY

24 OCTOBER 2019

MOTORSPORT'S

BIGGEST STATES OF THE PROPERTY OF THE PROPERTY

Moments we can't believe really happened

25
blunders, twists
and scandals

PLUS

Petter Solberg's greatest drives

Silverstone Experience is go! Formula E's testing war







UK'S FIRST ON-TRACK, MOTORSPORT TRADE EXHIBITION RETURNS TO SILVERSTONE 01-02 NOVEMBER 2019 ON TRACK ACTIVITY | TRADE EXHIBITION | TEST DRIVES & EXPERIENCES | LIVE RACING ENVIRONMENT | NETWORKING OPPORTUNITIES | GUEST SPEAKERS | EDUCATIONAL CONFERENCES | PRODUCT, MANUFACTURER & CHAMPIONSHIP LAUNCHES | NEW ENGINEERING+TECHNOLOGY SHOW | PLUS MUCH MUCH MORE | FREE

WWW.MOTORSPORTDAYS.LIVE | TEL: +44(0)1732 642755 | EMAIL: BEN@MOTORSPORTDAYS.COM

EVENT PARTNERS

ASSOCIATED SUPPORT -

















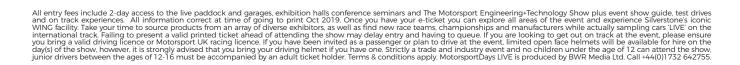






















The moments that caught us by surprise

Which motorsport moment shocked you the most? Pastor Maldonado's out-of-the-blue victory for Williams in the 2012 Spanish Grand Prix (above)? The flying Mercedes at Le Mans in 1999? Toyota being thrown out of the World Rally Championship?

Our initial list for this week's top 25 was about three times longer than that and it was a tough task to decide what to leave out. Turn to page 19 to see which interesting or surprising stories you think are worthy and which ones wouldn't have made your list.

Not in any way shocking was Rene Rast taking his second DTM title in 2019. Tom Errington takes a look at how the Audi driver did it, and answers some other key questions from the season, on p30.

Petter Solberg has been a popular figure on the world stage this century so it seemed right to mark his retirement from top-level motorsport by looking back at his greatest drives (p34). And, typically, the Norwegian was happy to help Autosport select the top 10.

We also recently visited the Silverstone Experience, which is set to open this week (p40). Much more than a museum, the project aims to encourage the next generation of engineers, as well as underline the importance of the British Grand Prix venue.

• This week the 2019 Aston Martin Autosport BRDC Award Young Driver of the Year Award finalists are being put through their paces at Silverstone. How they get on in MotorSport Vision Formula 2, Ligier LMP3 and Garage 59-run Aston Martin Vantage GT3 machinery will help decide which of the four racers receives £200,000, a test in a Red Bull Formula 1 car, a run in Aston Martin's GTE World Endurance Championship challenger, full BRDC membership and an Arai helmet. We wish Enaam Ahmed, Jamie Chadwick, Johnathan Hoggard and Ayrton Simmons the best of luck.



Kevin Turner Editor
kevin.turner@autosport.com

NEXT WEEK
31 OCTOBER

Can Lewis Hamilton clinch
his sixth F1 title in the
Mexican Grand Prix?



COVER IMAGES

Motorsport Images/Patching

PIT & PADDOCK

- **4** F1: Ferrari engine questioned by rivals
- 6 Ticktum set to return to Macau
- 8 Obituary: Andrew Cowan
- 9 Mexican Grand Prix preview
- **10** Formula E testing war
- **15** Opinion: Edd Straw
- 16 Opinion: Marcus Simmons
- 17 Feedback: your letters

INSIGHT

- **19** Motorsport's greatest shocks
- **30** How Rast took his second DTM title
- 34 Petter Solberg picks his best drives
- **40** Inside the new Silverstone Experience

RACE CENTRE

44 World of Sport: MotoGP; NASCAR Cup; Formula Regional European

CLUB AUTOSPORT

- 56 Porsche picks its four junior finalists
- 58 BRDC Formula 3 car changes for 2020
- National reports: Silverstone;
 Donington Park; Snetterton
- 66 Dolan and the Formula Ford Festival

FINISHING STRAIGHT

- **68** What's on this week
- **71** Have-a-go hero: James Thompson
- **72** From the archive: 1921 French GP
- **74** Pit your wits against our quiz

SUBSCRIPTION OFFER

70 Special deals for Autosport Plus

VISIT AUTOSPORT.COM

For other ways to read Britain's best motorsport weekly







TEAMS QUESTION FERRARI EN

FORMULA 1

A number of Ferrari's Formula 1 rivals have written to the FIA for clarity over the legality of design aspects they believe are behind the Italian team's engine advantage. It is understood that Ferrari's competitors are seeking clarification over whether they are clear to pursue similar concepts themselves, or if the ideas fall foul of the regulations.

The requests have come after Ferrari's recent performance breakthrough revealed the full extent of its engine advantage, which is believed to be worth up to 0.8 seconds per lap at some tracks and has been described as 'ludicrous' by one high-level team source.

Since the summer break Ferrari has topped all five qualifying sessions and won three grands prix. A significant car upgrade for September's Singapore GP has helped counter the cornering performance deficit that held the SF90 back through much of the season, and turned its speed advantage into a qualifying edge.

One theory relates to Ferrari's intercooler and how a controlled leak may allow a small amount of oil to enter the combustion process, and produce a power boost for a short period of time. Using oil in the intercooler, which Ferrari is thought to be alone in doing, is permitted by the regulations, although the rules demand that such systems "must not intentionally make use of the latent heat of vaporisation of any fluid with the exception of fuel for the normal purpose of combustion in the engine".

At least one of Ferrari's rivals believes this could be

where part of its qualifying advantage comes from and has sought clarification over whether such a practice would be allowed. Ferrari's energy-recovery system has also drawn attention from a different competitor, which has raised its own query with the FIA. But Ferrari's rivals say they have not had responses to their attempts to gain clarification.

When approached by Autosport over the concerns from Ferrari's rivals, the FIA said it "continues to monitor all parameters relating to conformity of power units in the FIA Formula 1 World Championship to the technical regulations". It also stated it has "received no protest from any competitor regarding any current designs".

The lack of a response from the FIA to specific correspondence has left Ferrari's rivals uncertain about how to proceed, although a protest is thought unlikely as such an action can lead to teams targeting one another and create greater conflict.

Another worry is whether this is among the fall-out from Charlie Whiting's shock death on the eve of the season and the redistribution of his wide-ranging responsibilities. When Whiting held his position as race director, formal and informal queries were a common way of clarifying grey areas and fostered trust that the FIA was on top of sensitive technical matters.

This was the case when the scrutiny over Ferrari's progress started in earnest last year, with an investigation into its ERS that ended with Whiting insisting the FIA was "satisfied". But even that process irked Mercedes, as the FIA identified two of its employees as bringing the issue to its attention.



IGINE LEGALITY

GARY ANDERSON'S VERDICT

The continuous innuendo about Ferrari and its power unit annoys me. Mercedes had without doubt the best power unit in 2014 and 2015, and then Ferrari started to catch up, but Ferrari never really made much noise about it.

It seems that Mercedes and Renault are now asking questions, but sometimes that is just to clarify a grey area. If it is a grey area and the FIA says, 'No, you can't go there', then they will clarify it and Ferrari may have to back off a bit.

But I don't believe Ferrari would be doing anything deliberately outside what is allowed. It will be pushing the regulations to the limit, but then that is what all the power-unit manufacturers should be doing.

As we all know, Mercedes' almost-six-time world champion Lewis Hamilton is no slouch on a qualifying lap, and if he's beaten it's either because someone else has done a hugely impressive lap, or is driving a chassis/engine combination that's simply better. This is what we've seen of late. I can't see anything that would make me feel that Ferrari has any exceptional performance as far as power unit or top speed is concerned.

Perhaps it simply deploys the electrically harnessed energy more efficiently, but Mercedes really does need to look at the overall efficiency of its aerodynamic package. It also needs to get on with the job and improve its performance on new tyres for that critical one lap in qualifying.

SCOTT MITCHELL



Red Bull drops O'Ward – so is he going to McLaren?

INDYCAR/SUPER FORMULA

McLaren has been strongly tipped to snare Red Bull Junior Patricio O'Ward for its new IndyCar programme after the Mexican was stood down for this weekend's Super Formula finale in Japan.

Red Bull-backed Juri Vips will replace O'Ward in the Team Mugen line-up at Suzuka, after finishing fourth in this season's FIA Formula 3 Championship. It is believed that Red Bull will continue to field two drivers in the series in 2020, with Vips in the frame for a full-season seat.

O'Ward, who replaced the axed Dan Ticktum on the Red Bull scheme in July, said on social media: "Soon there will be news about my racing future. I know good things are coming and can't wait to share them with you all."

After starring in early-season IndyCar outings before his SF call-up, O'Ward is expected to slide in next to James Hinchcliffe at Arrow McLaren SP in 2020. The team is sending personnel to this weekend's Mexican Grand Prix with its Formula 1 squad, but denied that any O'Ward announcement was imminent.

Big teams scupper plan for mixed-up grids

FORMULA 1

Formula 1 looks set to abandon attempts to trial the reversed-grid-qualifying-race experiment for next season.

F1 owner Liberty Media was hoping to test the format at next year's French, Belgian and Russian grands prix, with the qualifying-race grid based on reversed championship order, and the result of this forming the line-up for the grand prix.

The matter was discussed at last week's F1 rules meeting in Paris between teams, the FIA

and F1, but it failed to get the unanimous support required. It is understood that some leading teams were against the plan because they believed that it would be too difficult for them to make up enough ground if they started at the back.

There are suggestions that the bigger teams would be open to a qualifying race with grid position for that perhaps set by Friday practice times, but there is believed to be little enthusiasm for this from the series chiefs.

JONATHAN NOBLE



Ticktum bids for Macau hattrick as Ilott returns to F3

FORMULA 3

Two-time Macau Grand Prix winner Dan Ticktum has joined Carlin to bid for a third successive victory in the race, while Ferrari junior Callum Ilott is also returning to the event as he tries for a first win in five attempts.

It will be the first race experience for both British drivers in the new-for-2019 FIA Formula 3 cars. Ticktum started the season as a Red Bull Junior in Super Formula, but was dropped in June and has since only raced in two rounds of the Formula Regional European Championship.

Ticktum, who is expected to compete in Formula 2 next season, has been getting up to speed in the FIA F3 car in this week's official test at Valencia, where he has driven with Carlin on all three days.

Ilott, meanwhile, joins the grid with the Charouz-run Sauber Junior Team for which he has competed in F2 this season. He won the Macau GP qualification race in 2017, but his best result in the final remains his fifth position in 2016.

FIA Formula 3 champion Robert Shwartzman tops the entry list with Prema Racing, which again bears allegiance to Macau's famed Theodore Racing. Shwartzman is joined by fellow Ferrari junior and F3 runner-up Marcus Armstrong, but their full-season team-mate Jehan Daruvala has had to pull out of the race due to a knee injury sustained in training, leaving a seat free at Prema. Hitech GP's Red Bull Junior Juri Vips is also expected to be a leading contender.

Formula Regional runner-up Enzo Fittipaldi steps up to the FIA F3 class for Macau, where he will make his debut at Sauber Junior Team alongside Ilott and David Schumacher.

Jake Hughes leads the HWA attack, and could be joined by Sophia Florsch, who crashed heavily in Macau last year and joined the team in the FIA F3 test at Valencia. ART Grand Prix's Renault junior Christian Lundgaard topped the test after lapping quickest in two of the six half-day sessions.

JACK BENYON

for 2020 away from Corvette Racing," according to a statement from Chevrolet. Magnussen contested more than 150 races with Corvette and won his class in 35 of them. Those victories included a hat-trick of successes at the Le Mans 24 Hours together with Oliver Gavin and Olivier Beretta in his first three seasons

hat-trick of successes at the Le Mans 24 Hours together with Oliver Gavin and Olivier Beretta in his first three seasons on the books at Chevrolet. At that time he contested only the French enduro, the Sebring 12 Hours and Petit Le Mans at Road Atlanta with the team.

Magnussen out

of Chevy squad

Jan Magnussen driving a yellow Chevrolet Corvette has been one of the constants of international sportscar racing for the better part of two decades. But the Dane's tenure of a seat at the factory Corvette Racing squad has come to an end after

Magnussen, father of Kevin and an ex-F1 driver himself, has not been given a new contract by the factory Corvette

Racing squad. The 46-year-old Dane will be "exploring new driving opportunities

LE MANS 24 HOURS/IMSA

16 highly successful seasons.

He became a full-time driver with Corvette Racing in the American Le Mans Series for 2007 and went on to win the GT1 title with Johnny O'Connell in 2008, the duo also taking class honours at Le Mans the following year with Antonio Garcia. Magnussen and the Spaniard won the ALMS GT crown in 2013 and went on to take back-to-back GTLM titles in the IMSA SportsCar series in 2017-18.

"When I joined the programme in 2004, I never thought this would be my home for the next 16 years," said Magnussen. "I'm very proud of the championships and race wins we achieved together against very tough competition."

Magnussen will be replaced by twotime Daytona 24 Hours winner Jordan Taylor in a move that is expected to be confirmed before the end of this year.

GARY WATKINS



MACAU GRAND PRIX ENTRY LIST

TEAM	DRIVERS
Prema	Robert Shwartzman, Marcus Armstrong, TBA
Hitech	Juri Vips (right), Yuki Tsunoda, Max Fewtrell
ART	Christian Lundgaard, Ferdinand Habsburg, Sebastian Fernandez
Trident	David Beckmann, Alessio Lorandi, Olli Caldwell
HWA	Jake Hughes, Keyvan Andres, TBA
МР	Liam Lawson, Lukas Dunner, TBA
Jenzer	Frederik Vesti, Andreas Estner, Charles Leong
Charouz	Callum Ilott, David Schumacher, Enzo Fittipaldi
Carlin	Dan Ticktum, Logan Sargeant, Felipe Drugovich
Campos	Alessio Deledda, TBA, TBA





FORMULA 2

German motorsport giant HWA will join the Formula 2 grid for 2020 after buying the Arden team's entry, cars and equipment.

The team will sit above the HWA Racelab squad that was set up to compete in this year's FIA Formula 3 Championship, after the company had tuned the Mercedes engines used in the previous iterations of F3 for the previous 17 seasons. Jake Hughes took seventh in this year's F3 points, while HWA placed fifth in the teams' standings.

Arden was set up to compete in the Formula 3000 International Championship in 1997 with Christian Horner (above). After he hung up his helmet he became team boss before being recruited by the Red Bull Formula 1 team. Horner's father Garry remains as the principal of Arden. Over the 23 years of its existence, Arden drivers have won 37 times in F3000 International and its successors, GP2 and F2 (see table), most recently the late Anthoine Hubert.

Sergio Perez, Sebastien Buemi, Heikki Kovalainen, Edoardo Mortara and Jolyon Palmer are also among the drivers who competed for Arden in GP2.

Arden F2 team boss Kenny Kirwan will move to HWA to head up the squad.

HWA is best known for its long history with Mercedes. It steered its DTM programme until its conclusion last year, and has also run the Formula E team that has become Mercedes' works operation.

JACK BENYON & MARCUS SIMMONS

ARDI	EN WINNERS F2/GP2/F3000 II	NT'L
POS	DRIVER (CATEGORY)	WINS
1	Vitantonio Liuzzi (F3000)	7
2=	Heikki Kovalainen (GP2)	5
2=	Luiz Razia (GP2/GP2 Asia)	5
4	Bjorn Wirdheim (F3000)	4
5=	Tomas Enge (F3000)	3
5=	Sebastien Buemi (GP2/GP2 Asia)	3
7=	Charles Pic (GP2/GP2 Asia)	2
7=	Anthoine Hubert (F2)	2
9=	Robert Doornbos (F3000)	1
9=	Michael Ammermuller (GP2)	1
9=	Bruno Senna (GP2)	1
9=	Edoardo Mortara (GP2)	1
9=	Norman Nato (F2)	1
9=	Maximilian Gunther (F2)	1

Nanni Galli 1940-2019

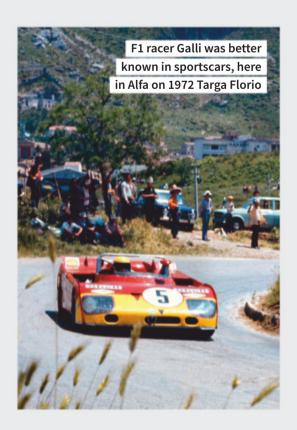
OBITUARY

Giovanni 'Nanni' Galli, who has died at the age of 79, drove for McLaren, Ferrari and Williams during a stop-start Formula 1 career spanning four seasons. None of those teams was at their peak at the time and it was in sportscar racing where the Italian enjoyed his most notable successes.

Galli got his F1 break with McLaren in 1970 on the back of a sportscar and touring car contract with Alfa Romeo. It supplied the V8 engine that powered the M7D he failed to qualify for that year's Italian Grand Prix. The same deal resulted in nine world championship appearances with March the following year, five of them coming with Cosworth DFV power.

A part-season with Tecno in 1972 included a podium finish in an eight-car nonchampionship race at Vallelunga and a call to race for Ferrari in the French Grand Prix in place of the injured Clay Regazzoni. Five more starts followed with the Williams team's Iso-Marlboro machinery in 1973.

Galli's sportscar career included a second place in the Targa Florio and fourth at the Le Mans 24 Hours in 1968, and then another second in the 1971 Sebring 12 Hours, all at the wheel of Alfa T₃₃/₃ prototypes. **GARY WATKINS**



IN THE HEADLINES

TORO ROSSO NAME CHANGE

The request from Formula 1 team
Toro Rosso to be renamed Alpha
Tauri from next season has been
approved, Autosport has learned, in
an F1 Commission e-vote that took
place earlier this month.

CITROEN STYMIED ON AERO

Citroen will not introduce the latest aerodynamic revisions it tested on its C3 WRC this month for this week's Rally Spain as it attempts to boost Sebastien Ogier's World Rally Championship title bid. As was the case with the suspension upgrades timed for Rally GB, the new parts could not be homologated in time and will be shelved until next season.

MAZDA BOSS IN IMSA ROLE

John Doonan, the motorsport boss of Mazda in North America, is replacing Scott Atherton as president of US sanctioning body IMSA. Doonan, the architect of Mazda's Daytona Prototype international programme in the IMSA SportsCar Championship, will work alongside Atherton for the remainder of the year.

MACAU GT LINE-UP

Eleven factory drivers are among the 17-car field for the GT World Cup at Macau next month. Edoardo Mortara, Maro Engel and Raffaele Marciello line up for Mercedes; Earl Bamber, Laurens Vanthoor and Kevin Estre represent Porsche; Christopher Haase, Dries Vanthoor and Kelvin van der Linde are with Audi; and BMW fields 2018 winner Augusto Farfus and Joel Eriksson.

NEW GIRLS JOIN CHADWICK

The top 12 finishers from this year's all-female W Series have all taken up their options to return for 2020, meaning Jamie Chadwick will bid for a second title. Six of the remaining eight drivers have been named following an Almeria test. They are British tin-top/GT racer Abbie Eaton, Brazilian USF2000 contender Bruna Tomaselli, Norwegian Ayla Agren (a former US F1600 champion), plus a trio of drivers from Spanish F4: Belen Garcia, Nerea Marti and Russian Irina Sidorkova.

CORONEL IN THE GAMES

World Touring Car veteran Tom Coronel is a big-name addition to the 20-car Touring Car field at next week's FIA Motorsport Games at Vallelunga. Coronel will represent the Netherlands in a Boutsen Ginion Honda.



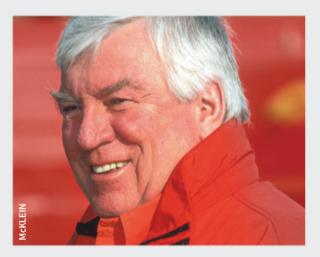
Andrew Cowan 1936-2019

OBITUARY

The time taken to walk from one end of the service park to another is, according to former Mitsubishi Ralliart team manager Derek Dauncey, an indication of popularity in the World Rally Championship. It took Andrew Cowan, team principal of the Ralliart squad that gave Mitsubishi its greatest successes in the WRC and who has died aged 82, a very long time.

A multifaceted career began in the fields and lanes around his family's Borders farm, where Cowan grew up racing fellow Berwick and District Motor Club member Jim Clark. Cowan won the Scottish Rally in 1962 and 1963 in a Sunbeam Rapier. A 1964 Tour de France victory aboard a Ford Mustang demonstrated his ability to win in a variety of cars, but it was his versatility of event success that really caught the eye.

He won London to Sydney twice, in a Hillman Hunter in 1968 and a Mercedes 280E nine years later, and enjoyed yet more success down under with five consecutive



Southern Cross wins in Australia.

Cowan had a real penchant for long-distance rallying, easily able to blend speed with the required mechanical sympathy to nurse a car to the finish. He was fairly adept at nursing other people's cars to the finish too. Roger Clark would likely have missed out on his 1972 RAC Rally win had it not been for Cowan pulling over to offer the Englishman a wheelbearing from his own car to assist Clark's Escort RS1600 from the final stage to a victorious finish.

Once out of the driving seat and behind a desk, he took on and defeated the world with Tommi Makinen and Mitsubishi, as Makinen steered a Lancer to five world titles in four years from 1996-99. That Makinen drew so heavily on his time with Cowan while setting up the current Toyota Gazoo Racing squad came as a source of much satisfaction to the Scot.

Loved around the world, to the Japanese he was 'Papa Cowan'. At home, things remained slightly more formal. Having been unwittingly chased by the police on the Jim Clark Rally a few years ago, he stepped from the 'management' Mitsubishi to be greeted by blue lights and an advancing traffic officer. The policeman stopped in his tracks, touched his hat, offered, "Good morning Mr Cowan," and returned to his car.

"Ralliart," said Dauncey, "was known as the spirit of competition. Andrew was the spirit of rallying." Too true. Autosport offers its deepest sympathies to Cowan's wife Linda, along with his family and many friends all around the world.

DAVID EVANS

F1 MEXICAN GRAND PRIX PREVIEW



UK START TIMES

Friday 25 October

FP1 1600 **FP2** 2000

Saturday 26 October

FP3 1600

QUALIFYING 1900

Sunday 27 October

RACE 1910

CATCH THE RACE LIVE

SKY SPORTS F1 BBC RADIO 5 LIVE

HIGHLIGHTS

CHANNEL 4 2300

TYRE ALLOCATION















CHAMPIONSHIP

Drivere

Di	rivers		C	onstructors	
1	Hamilton	338	1	Mercedes	61
2	Bottas	274	2	Ferrari	43
3	Leclerc	221	3	Red Bull	32
4	Verstappen	212	4	McLaren	11
5	Vettel	212	5	Renault	7



RACE STATS

Previous winners

2018	Max Verstappen	Red Bull
2017	Max Verstappen	Red Bull
2016	Lewis Hamilton	Mercedes
2015	Nico Rosberg	Mercedes
1992	Nigel Mansell	Williams
1991	Riccardo Patrese	Williams
1990	Alain Prost	Ferrari
1989	Ayrton Senna	McLaren
1988	Alain Prost	McLaren
1987	Nigel Mansell	Williams



Mexico City masters

Average points per race at **Mexico City** from the current F1 drivers.

Verstappen 16.00 **Hamilton** 14.25 **Bottas** 11.75 Vettel 10.00 Raikkonen 9.50 Ricciardo 6.25 Kvyat 6.00 Leclerc 6.00 Hulkenberg 5.00 Stroll 4.00



ALEX KALINAUCKAS AND JAKE BOXALL-LEGGE

The biggest ever Formula E field came together in Valencia last week for the official pre-season test of the 2019-20 season. Motorsport giants Mercedes and Porsche are now among the ranks, as are four fresh faces on the driver front. While the modified National layout at the Circuit Ricardo Tormo is pretty useless when it comes to representing city-centre FE tracks, Autosport has nevertheless crunched the numbers and picked out the big storylines from a sunny week of group running in Spain.

DAY 1 TUESDAY

Straight off the bat, the times posted on the first morning were quicker than the best lap from 2018 — a 1m16.977s from then-BMW Andretti driver Antonio Felix da Costa. Maximilian Guenther picked up where da Costa, now at DS Techeetah, left off and put BMW on top in the first session with a 1m15.926s. In the afternoon, Envision Virgin Racing driver Sam Bird set a day's best 1m15.570s to leap up the order, even surprising some of his team to take top spot.

The reason the times were already so much faster was the changes made to the chicane FE instals on the track's start/finish straight to form a sequence of corners designed to add a more representative braking test for the cars and simulate the tight confines of city tracks. For 2019, the chicane was fractionally more open, raising average apex speeds from 30km/h (19mph) to 60km/h. While the chicane's true representation of an FE corner sequence is doubted by many drivers, it proved to be a perilous place for many over the course of the week.

"It's mainly the chicane," DS Techeetah's reigning FE champion Jean-Eric Vergne said of the immediately faster times. "The rest is more or less the same; the car is the same, the power is the



same, so unless somebody has a hidden powertrain, like somebody had last year, we can't go any faster."

Mercedes and Porsche ran into early difficulties. Recently crowned Formula 2 champion Nyck de Vries pulled over at the start of the morning's second hour when a technical issue Mercedes continued to investigate over the week caused a blown battery fuse and stopped him adding to his early total of 13 laps. At Porsche, Neel Jani joined Jaguar's James Calado in crashing at the chicane on the opening morning after completing 30 laps, which he did not add to in the afternoon as Porsche was forced to build up a new tub.

DAY 2 WEDNESDAY

Robin Frijns continued Virgin's fine start by setting the best time of the day towards the end of the three-hour morning session — a 1m15.377s. That time remained unbeaten in the afternoon (all on-track sessions were three hours long), when Virgin encountered





some misfortune when Bird crashed late on at the chicane and caused considerable damage to the right side of his Audi.

Accidents at that spot had been a theme of the day, which also continued the low-key start to FE life for Mercedes and Porsche. First, de Vries's woes continued as he crashed his car — running again from the off on Wednesday – after just 30 minutes of the morning. Then he was joined by Porsche driver Andre Lotterer, who followed team-mate Jani in requiring major repairs.

"It was not a huge mistake but this chicane, it's a bit small, very unusual and a bit useless in terms of a place where we're testing," said Lotterer. "I understand we need one but maybe a bit of a wider one would make more sense because you have zero room. You don't even find chicanes like that on the proper race tracks."

The crash kept Lotterer out of FE's first non-competitive race simulation (see panel, right), which at least gave Mercedes something to smile about, as it was 'won' at a canter with Stoffel Vandoorne.

NEW TWEAKS GET 'RACE' RUNS



There was an awful lot of 'racing' for a test. In 2018, Formula E had staged a race simulation to test its attack-mode raceformat procedures, which were generally a success last season. For 2019, the championship – in conjunction with the FIA and the teams – put on two 'E-Prix Exercises'.

These were necessary because of several sporting-rule tweaks that will come into effect for the new campaign. The rule under most scrutiny at Valencia was the set amount of energy to be deducted from each car – equal to 1kWh per minute for the duration of each caution period – following in-race interruptions.

The first race – after early leader (from pitlane pole) Pascal Wehrlein faded when he couldn't activate attack mode – became a Mercedes/Venturi-dominated affair as Stoffel Vandoorne (above) and Edoardo Mortara stole a march on the opposition, despite several full-course-yellow tests and the appearance of the safety car, before the latter came in late to 'retire'. But any suggestion of upcoming Mercedes domination may have come too early as Mortara explained that "a problem with the calculation of energy" had given the pair an advantage over the 'opposition'.

The second 'race' was added to the schedule after the media day as there had been concerns that the energysubtraction information had not been sent to some teams in time during the first. The last thing anyone wants is the issue detracting from a result in Riyadh, and so, with time available, a second race took place on Friday afternoon.

The Virgin drivers roared from the midfield to the front – edging clear again after a lengthy full-course-yellow pack-up - before pitting with a few minutes remaining, which suggests they were on completely different energy strategies to the rest. Sebastien Buemi came out on top after the Nissans had put on a similar – if less spectacular – rise up the order.

The 'races' may not have been competitive, but the second especially saw lots of close action, lock-ups and contact (as with Massa, below). You can take the FE drivers out of the city...



DAY 3 FRIDAY

After Thursday's 'rest' day had been devoted to meetings and media duties, the drivers hit the track for the final official pre-season running ahead of the season opener in Riyadh — several teams are understood to have outstanding private test days to complete ahead of the powertrain-hardware homologation deadline on 31 October.

Right from the off, the times got quicker and quicker as most squads switched to some kind of performance running — cue more halos flashing purple, the powertrains audibly whistling with purpose, and drivers flirting with more disaster at the chicane.

Pascal Wehrlein improved the best time with a 1m15.190s for Mahindra in the morning running before Guenther returned BMW to its position as FE testing 'champion' with a 1m15.087s that put the manufacturer on top by 0.103s, with Nico Muller taking third for Dragon Racing, just 0.008s behind Wehrlein.

After Sebastien Buemi had taken the non-existent honours in the second, and originally unplanned, second test race (see panel, page 11), the chicane found time to claim a few more victims before the day wrapped up. Dragon's Brendon Hartley caused a red flag by going off into the gravel late in the first sector, before Vandoorne hit the wall on the exit of the chicane and ripped off his front-left wheel fairing. Shortly afterwards, Muller did likewise and Guenther stopped at the same place — albeit with no visible damage — to bring an end to a crunching week of testing.

		TESTING TIMES	
POS	TEAM	DRIVER	TIME
1	BMW	Guenther	1m15.087s
2	Mahindra	Wehrlein	1m15.190s
3	Dragon	Muller	1m15.198s
4	DS Techeetah	da Costa	1m15.293s
5	Jaguar	Evans	1m15.306s
6	Nissan	Buemi	1m15.328s
7	Virgin	Frijns	1m15.377s
8	Venturi	Massa	1m15.504s
9	Audi	Abt	1m15.673s
10	Porsche	Lotterer	1m15.699s
11	Mercedes	Vandoorne	1m15.736s
12	NIO	Turvey	1m16.568s



WHAT THE TIMES TELL US

Deducing this year's pecking order from a largely unrepresentative FE locale is something of a challenge, especially as observers are not exactly privy to the planned test programmes.

Delving into the qualifying simulations and putting together the laps run on the full 250kW allowance of power suggests that 11 of the 12 teams all slot in within a second. But that doesn't tell the full story as the final pieces of the puzzle will only fall into place in the Saudi Arabia opener next month, when the teams will conduct the final bits of set-up work to 'chase the track'.

Getting laps on the clock during testing is the top priority, and drivers are instructed not to risk everything to eke out every single fraction. But there's also a need to understand how the powertrains perform at full power, so there's also no sense in taking it easy.

Stitching together the best sector times from across the test produces the following order:

	THEORETICAL	BEST QUALIFYIN	IG TIMES
POS	TEAM	DRIVER	TIME
1	BMW	Guenther	1m14.985s
2	Mahindra	Wehrlein	1m15.082s
3	Dragon	Muller	1m15.133s
4	DS Techeetah	da Costa	1m15.202s
5	Nissan	Buemi	1m15.217s
6	Virgin	Bird	1m15.233s
7	Jaguar	Evans	1m15.240s
8	Venturi	Massa	1m15.494s
9	Audi	Abt	1m15.512s
10	Porsche	Lotterer	1m15.554s
11	Mercedes	Vandoorne	1m15.641s
12	NIO	Turvey	1m16.209s

Seven of this year's 10 powertrain suppliers are in the top eight, all within a tiny 0.255-second bracket. That's one lock-up's worth of time and, on a tight street circuit, one tiny error could be the difference between making superpole or starting way down the order.

Of the newcomers, Mercedes with its Venturi customer team looks the closest to the established runners in qualifying trim, while Porsche seems to be a little further behind. NIO, meanwhile, is likely to prop up the grid based on these times.





WHAT ABOUT RACE PACE?

The timing data implies race-trim form is a little different and, although there were two test 'races', the nuances in testing run plans make it more difficult to assess this order. But, taking all lap times within a certain window, discounting anomalies and creating an average lap time provides some estimate of each team's position. But there are situational aspects — such as proximity to other cars and attack-mode usage — to consider when reading this assessment.

Using the representative times gathered from Friday's race simulation – not all drivers participated on Wednesday, while Mahindra had attack-mode issues in that 'event' – the average lap time order looks somewhat different to the overall fastest times placing. Virgin used the test very differently to the other teams, lapping on average 1.5s faster than its powertrain supplier, Audi, before pitting, and so its times have been adjusted to reflect this.

POS	TEAM	DRIVER	TIME
1	Nissan	Buemi	1m21.985s
2	Venturi	Mortara	1m22.168s
3	Virgin	Bird	1m22.238s
4	Dragon	Muller	1m22.247s
5	Audi	di Grassi	1m22.258s
6	Mercedes	Vandoorne	1m22.412s
7	Mahindra	Wehrlein	1m22.559s
8	Porsche	Lotterer	1m22.596s
9	Jaguar	Evans	1m22.627s
10	DS Techeetah	Vergne	1m22.731s
11	BMW	Sims	1m22.746s
12	NIO	Turvey	1m23.363s

WHAT THIS COULD MEAN FOR THE SEASON

Given the tiny spread of times from the overall fastest laps, it looks as if FE is in for another tight season. While this shouldn't be a surprise given maximum power is capped at 250kW in the technical stakes, and the sporting rules – especially in qualifying - are designed to ensure mixed-up grids, it is likely good news for a series that had eight different winners from the first nine races last year and would like to see a repeat with two of motorsport's most famous and successful teams on the grid.

The times also appear to suggest that despite the - mainly tongue-in-cheek — suggestions that Mercedes and Porsche would come into FE and dominate, predicting a winner at this stage is again a foolish pursuit. Nevertheless, the long-run analysis and Buemi's race 'win' put Nissan e.dams on top at Valencia. That's remarkable given the FIA banned its 2018-19 twin-motor concept and left it just four months to switch to a single-motor approach.

"We are very happy because this is the first year where we didn't encounter any problem so it's really pretty good," said Nissan team manager Francois Sicard. "We were already looking at performance [after two days] and normally it's not the main focus. But we are in a pretty good situation and have good data."

Behind Nissan comes a mix of closely matched teams, with Venturi, Virgin, Dragon and Audi all figuring strongly. Mercedes will be encouraged by Venturi's form and its own efficiency demonstration to sneak in ahead of Mahindra, Porsche, Jaguar, DS Techeetah and BMW. Reigning champion squad DS Techeetah may not feature highly in this order, but Vergne and da Costa nevertheless figured strongly at the front of the Friday 'race'

before pulling out early. NIO looks to be in for another tough season.

Despite its "unrepresentative" nature, the Valencia track "tells you something", as Virgin team boss Sylvain Filippi explained.

"The cars seem to all be more reliable than they used to be, and they're very close on lap time," he continued. "So, that kind of tells you that there isn't much in it, which should make for an awesome season six." 🦑

NEXT REPORT

DIRIYAH E-PRIX 28 NOVEMBER ISSUE

The FE contenders line up for the first race in Saudi Arabia - will **Mercedes and Porsche** make an impact?

MAUTOSPORT PLUS

Unlimited Access
to the world's best motorsport journalism

Breaking News as it happens

Smart Insight published daily

All the Teams
all the drivers, all the controversies

GET MORE

of the motorsport you (and we) love

Your 7-day FREE Trial

Autosport.com/plus



Missed opportunity

The proposal that F1 should try three reversed-grid races in 2020 was bound to meet resistance from leading teams, but have they missed a chance to improve the show?

EDD STRAW

ormula 1 teams were never going to vote through the proposal for a trio of reversed-grid qualifying races in 2020. That would require a depth of imagination and an appetite for change far beyond them given the need for unanimity.

Regardless of your position on the divisive topic of any kind of reversed-grid race — and the opposition is understandably significant — the proposal wasn't scotched through respect for tradition or any objection to it as a gimmick. Instead, it was pragmatism pure and simple. Particularly for a frontrunning team like Mercedes, the key is to keep things as stable — and predictable — as possible.

The meek offering of an irrelevant mini-grand prix to decide the Sunday grid, which was suggested as a half-baked alternative, wilfully missed the point of the idea. The reversed-grid qualifying race would have injected significant uncertainty and made the path to victory more difficult.

The objective of a race is, at its heart, to sort the cars and drivers into an overall order of quality. The primary determinant in this is car pace, although there are myriad factors that contribute to the overall result. Given that one of the most consistent and strongest criticisms of F1 is that it is predictable and too many races are controlled from the front, it's logical to question whether preselecting the race-starting order based on car pace is the right

"It's logical to question whether pre-selecting race-starting order on pace is the recipe for drama"

recipe for drama.

What F1 teams had the opportunity to do here was to conduct a low-risk experiment. Running three case studies in 2020 at Paul Ricard, Spa and Sochi would have created a huge amount of interest and on-track drama. Some fans have claimed they would boycott such a race, but that is hard to believe.

As for the objections that it would make it more difficult to get to the front — well, obviously. But this is because leading teams were looking at it purely as an exercise in getting to the front on Saturday in a 100km race. What the qualifying race would have done is created a mixed-up grid for Sunday. And mixed-up grids are the only thing that has consistently guaranteed dramatic races in the history of F1.

That F1 strategists, who gathered at Suzuka recently to discuss

the proposal, didn't universally embrace the idea is hardly a surprise. Their job is to create order amid predictive chaos, to find a safe path to the ideal result. This format would have added an enormous number of variables to the equation and made their task far tougher. Again, isn't that the point?

F1 teams today will not, and indeed cannot, accept proposals that could disadvantage them without them being forced to. Fortunately, there is a mechanism that will allow these experimental Saturday races to go ahead in 2021, given the lead time. But what F1 needs now is a spirit of collective strengthening, something the corporate nature of teams militates against.

There was a time when F1 teams were largely controlled by individuals answerable only to their own intellect and ego. It wasn't unheard of for team patrons to vote for measures that actually went against their teams because they saw the bigpicture benefit. But with many teams no longer working to that model, there's less room for manoeuvre.

The teams are not the only problem. Liberty Media came into F1 touted as the perfect, audience-driven American media company ready to drag grand prix racing into the 21st century. While there have been some significant steps forward, the debate surrounding the 2021 regulations shows it hasn't had the courage to take on the biggest teams and address F1's most deep-rooted problems.

Critics who say F1 should focus on other problems rather than the grid formation superficially have a point, but it's a false dichotomy. The division of the revenues paid to the teams will remain inequitable regardless of what happens on Saturday afternoons, and the problems of the aerodynamic regulations and tyres would not be impacted by such an initiative.

What's more, two high-profile critics of the reversed-grid idea (in general terms rather than the specific proposal) in the forms of Lewis Hamilton and Sebastian Vettel have said F1 should focus on bigger problems rather than such a band aid. Yet they are employed by two organisations that stand in the way, for understandable reasons of self-interest, of such changes.

For all the talk about change in 2021, F1 as a whole has never become fully aligned with the objectives. By all accounts, there are some positive steps that should upset the status quo a little, so it's not been a complete failure. But while not approving experimental Saturday races in 2020 is but a footnote to that bigger picture, it does represent a missed opportunity to create not only some real- world data but also proof of concept for an extra race on the weekend that could do much to promote F1.

But at least we can be thankful that the purity of the French Grand Prix will be preserved. The question is, given how such a processional race was pilloried by fans earlier this year, why that's considered to be so important.



A legend bows out

The Dallara F312 Formula 3 car has run its last race. Time to salute a machine that has helped launch more of the current F1 stars' international careers than any other

MARCUS SIMMONS

W

hen the chequered flag fell at Monza recently on the final round of the 2019 Euroformula Open series, it brought a significant era of single-seater racing to a close. After eight years, the 2012-19 generation of Dallara Formula 3 car — the machine that was

largely responsible for launching the international careers of Max Verstappen, Charles Leclerc, Esteban Ocon, George Russell, Lando Norris, Carlos Sainz, Alex Albon, Antonio Giovinazzi, Daniil Kvyat, Lance Stroll, Felix Rosenqvist, Pascal Wehrlein and Colton Herta — has now become obsolete.

On a personal note, I've invested a great deal of heart, soul and passion over the years into recording the exploits of those racing the F312. So I'm sad to see it fading into history, as it has produced so much new talent under the guidance of the experienced hands at the hard-working teams. What a tragedy it would be to see seven decades of excellent tradition — in the form of the long-standing F3 philosophy born in the late 1940s — undone by an unwillingness to use the platform of this past for ongoing service to motorsport. Luckily, the new Dallara 320, which will be introduced to Euroformula and Japanese F3 (in the guise of Super Formula Lights) next season, looks set to continue this winning formula.

But back to the F312. When the car was introduced, I was covering the British F3 Championship for Autosport, but the series was on the verge of collapse and, while staying loyal to the UK series in its

"What a tragedy it would be to see seven decades of excellent tradition in Formula 3 undone"

dying days, I spent more and more time roaming Europe to report on the FIA European championship. And I was on hand at all seven of the Macau Grands Prix for which this car raced from 2012–18. Together with one trip during this era to the Masters of F3 at Zandvoort, two bouts of Japanese F3 action, and a spontaneous trip to this year's Euroformula stop-off at Silverstone with my wife and stepson, I've calculated I've been present at 220 races — the vast majority of them trackside — at 78 different events for the F312.

Let's zip the anorak up a bit further. For races run under FIA-spec engine rules from the 2012-18 period (ie not including Euroformula Open from 2012-18), it can be calculated that 242 drivers started races in the 2012-19 era — 240 in the Dallara, plus Marvin Dienst and Harald Schlegelmilch, who steered the short-lived Russian ArtTech project at the end of 2015. Of those

242 pilots, I reckon I've seen 200 of them in action!

"We've had a fabulous time with the old girl," says Trevor Carlin, whose team was more or less ever-present throughout the era — it took the first pole and win with Jack Harvey at Oulton Park in 2012, and the final pole at Monza with Teppei Natori.

"It's just a classic F3 car, beautifully designed, like a scalpel really — a really precise machine. And the drivers all enjoyed driving it, as they do any older-spec F3 car. You can almost drive it by telepathy — it does everything you want."

Carlin drivers were involved at the forefront in races that count as my favourites of the era. One of them, the Macau Grand Prix of 2017, I count as the most exciting contest I've ever been fortunate enough to attend (see page 22). Running it close is the second race of the Norisring European F3 triple-header from the summer of 2015. Maximilian Gunther took an unexpected maiden win from the middle of the grid, but only after the leading trio all simultaneously ran wide at the Turn 1 hairpin while fighting it out on a late-race restart. That trio? Russell, Leclerc and Albon. They ended up with quite good reputations... "The racing just got better and better," says Carlin, "and I have to say the racing at Monza [for the Euroformula finale] was just stupendous."

Other highlights? The paddock buzz in the Ocon/Verstappen season of 2014, knowing that you were in at the birth of something sensational. And also the Macau 2013 win for Alex Lynn, a driver I'd got to know four years earlier when he was taking his baby steps in Formula Renault UK and had followed every step of the way since. For Carlin, it's understandably Antonio Felix da Costa's second Macau victory in 2016: "Going back after such a tough year in 2016, winning with Antonio, was a highlight. And, of course, winning the FIA championship with Lando [in 2017]. That was a special car — the all-carbon car with the fluoro. That's the one that will go into our museum I'd imagine."

Carlin will move forward into the new era of the 320, which uses a similar platform to the F312-19, but adds the halo safety device. "There's a fair bit of interest for next year in Euroformula, which is great," he says. "And the Okayama guys [from the team Carlin provides engineering support to in Japan] look likely to carry on, so we'll try to take that to the next level." How much interest in Euroformula? "We're getting a lot. We're going to have to peg ourselves back on how many cars we can run and keep it to four. We're quite excited to get our first kit and get on with it."

That's terrific news. The 'F3' tag is now officially on the FIA F3 Championship, which is basically the old GP3 in all but name and has taken over the Macau GP for this year. But even so I, along with my fellow traditionalists in the paddock, are raising a glass to a new era of F3 — even if we can no longer call it that. Let's be thankful that it shall not wither away while it still has so much to offer. **



Let's keep the three-day format, shifting media duties away from the Thursday, and look at qualifying instead. Run practice as normal but introduce a qualifying race

MICHAEL BRIERLEY

Qualifying races can improve F1

I read with dismay comments about changing the format of a grand prix weekend. In a bid to spice up the show, this move won't go down well with purists.

Ever since 1950, we have had some form of qualifying session followed by one race, for which points and thus championships are determined. To separate this into smaller parts, adding extra points here and there, just puts things on an equal footing with junior formulas and lessens the spectacle that is the pinnacle of motor racing.

Let's therefore keep the three-day format, shifting media duties away from the Thursday, and look at qualifying instead.

Run practice as normal but then introduce a qualifying race. The grid here is determined by reverse championship order, to add the jeopardy format, with the last driver on track knocked out after every two laps until a winner is declared. The main race is run as normal from these results.

What you can't do is tinker with events at certain tracks. To be consistent we have to have the same format for all races.

Such a solution forces all drivers onto the track, mixes up grids and provides the more exciting racing craved by all.

Michael Brierley Stalybridge, Cheshire

Jamie Chadwick boosts FF1600

How refreshing to read that reigning W Series champion Jamie Chadwick is going to, again, take part in the upcoming Walter Hayes trophy event (Club Autosport, 17 October), not only to enjoy her racing, but also to help develop her career, by driving a car with more mechanical rather than aero grip.

No one can argue that FF1600 does not provide some of the best wheel-to-wheel racing anywhere in the world, and this can only help aspiring career drivers as they climb the ladder.

Her endorsement will hopefully help FF1600 attract more young male and female drivers, whose finances mean they can't jump straight into higher formulae, giving them a chance to showcase their skills on a more affordable budget.

FF1600 in the past was the essential first rung on the ladder



to a professional career. With Jamie Chadwick championing it, maybe in the future it can be again.

Michael Skeet Southampton, Hampshire

Hamilton's throws his toys out again

Lewis Hamilton didn't win in Japan, and yet again it's toys out of the pram. Straight away, Lewis is on social media saying that "he feels like giving up" and that "the world is messed up", not forgetting his latest passion: being a vegan. Then Damon Hill says he is the greatest UK driver ever! This is debatable, as you cannot compare the different eras or are we forgetting Clark, Hill, Moss, Stewart, just to mention a few?

One thing is certain: he is the worst loser and whinger you could dream of. It is getting tiresome reading about it. Maybe he could do us all a favour and retire, but he won't – he is after all the records and continuing adoration from his fans, not forgetting the £40million-a-year wages! And, as far as his carbon footprint is concerned, I don't think he is in a position to lecture us.

Salvador Valiente Manton, Rutland

HAVE YOUR SAY, GET IN TOUCH

Autosport editorial Autosport Media UK Ltd

1 Eton Street Richmond TW9 1AG















TICKETS: TICKETMASTER.IE



MOTORSPORT'S

BIGGEST STATES OF THE PROPERTY OF THE PROPERTY

Celebrating the amazing, the audacious and the downright weird.

Here are the moments in motorsport history that won't be forgotten.

What makes a shock? Sometimes it's a win against the run of play, or in the face of expectations — Pastor Maldonado's Spanish Grand Prix victory in 2012, for example. Sometimes it's against what is even happening in the race — the 2011 Indy 500 and 2017 Macau Grand Prix bore witness to that. It could be an unbelievable safety car intervention, or even a car with too many wheels. One thing's for sure: we weren't going to include any serious shunts in here. These, instead, are the moments we celebrate — or wince at.

JACK BENYON, DAVID EVANS, MATT JAMES, MATT KEW, DAVID MALSHER, MARCUS SIMMONS, EDD STRAW, KEVIN TURNER AND GARY WATKINS





INDY IN THE 1960s

Jack Brabham had laid the groundwork in 1961 for rear-engined cars returning to the Indy 500, when he qualified 13th and finished ninth in a Cooper with 250bhp – 180 less than the roadsters. Fine handling and a low centre of gravity compensated for the lack of horses.

Dan Gurney then chivvied Lotus owner Colin Chapman into going to Indy with a purpose-built machine. Equipped with 4.2-litre Fords of 375bhp, the Lotus 29s of Jimmy Clark and Gurney qualified fifth and 12th in 1963. The pair lay second and fourth behind leader Parnelli Jones's Watson-Offy into the final quarter of the race, but Gurney would need two more tyre changes. Clark pressured Jones hard, the leader's car dropped oil, but USAC officials didn't black-flag the smoky roadster and Jones ran out the winner. Clark and a disgruntled Chapman would return two years later and dominate, and AJ Foyt's 1964 triumph would be the last at Indy for a front-engined car. DM

24

RAIN HERO CHURCH

The late Frank Church wasn't a favourite for the British Racing and Sports Car Club Italian Intermarque race for modified cars at Brands Hatch over the August Bank Holiday in 1988. The septuagenarian qualified last, admittedly

in of a field of just seven, aboard a roadgoing Fiat 131 Mirafiori Sport that would have been more at home in the earlier race for standard cars.

But the odds turned in his favour as the grid lined up. The heavens opened on a field of cars on slick tyres, with the exception of the little Fiat that Church drove to and from the circuits. On road tyres, he was in the lead inside half a lap and then drove away from the highly modified opposition slithering around on ungrooved rubber. The Fiat, still with the majority of its velour trim in place, ended up winning by more than 40 seconds. The real margin was even bigger: Church had jumped the start and was given a 10s penalty! **GW**



23

CONTEMPT AT DAYTONA

Though it was early in his career, Mario Andretti headed into the 1967 Daytona 500 as a two-time – and reigning – USAC Indycar champion. That meant he was viewed as an outsider by his NASCAR rivals.

Ford – the manufacturer represented by Andretti's Holman-Moody team – felt it too. Andretti was convinced he was being short-changed on power, so he ran a low-drag spoiler to overcome the deficit. He kept lobbying Ford until it handed over a first-rate motor. But he was forced to stick with the low-drag set-up and wild oversteer.

Ford still wasn't done, however, and its stock car racing boss John Cowley instructed the team to delay Andretti's fuel stop to benefit pursuing team-mate Fred Lorenzen. From what was estimated as a seven-second difference, Andretti had to fight past his in-house rival to win NASCAR's biggest race. Victory lane celebrations stayed muted. **MK**





BABY BAYNE WINS FIRST ATTEMPT

The Wood Brothers Racing NASCAR team can count 99 wins among its successes, mostly in the 1960s and 1970s. But by 2011 the Ford-equipped squad hadn't won in 10 years. Trevor Bayne had started only one race in the top-flight NASCAR Cup when the team pitched up for the Daytona 500, where he started 32nd on the 43-car grid.

Superspeedways are usually dominated by the big teams, which use multiple team-mates to draft together, making it more difficult for independents. So it was a surprise when Bayne, pushed by Bobby Labonte, led onto the last lap. After 74 lead changes and 17 cautions, Bayne dived down to the inside to fend off a move from Carl Edwards and become the youngest (20) winner of the Daytona 500 – and only the second to do it at the first attempt since Lee Petty in 1959. It was truly a shock for the NASCAR ages – and Bayne has scored only two more podiums in his 185 starts since. JB



PEUGEOT'S DRAMATIC EXIT

The rebirth of the World Endurance Championship was meant to herald a new era with Audi and Peugeot slugging it out at the front in 2012. Only the rug was dramatically pulled from underneath it when the French manufacturer axed its programme with just two months to go.

Peugeot's campaign with the new 908 HYbrid4 was signed off by the board in mid-January, only for key members of the company top brass to have second thoughts against a backdrop of redundancies and a financial restructuring deal. An extraordinary meeting of the board was called for the following day and the axe fell on an involvement in sportscar racing dating back to 2007.

The problem for the WEC was that it needed two manufacturers to guarantee its world championship status. Toyota stepped into the void. It had been planning a development year with occasional races, but ended up completing every round from the Le Mans 24 Hours on. **GW**

20

FESTIVAL SHOCK

Everyone knew Johnny Herbert was an exciting talent, but no way was he a favourite for the 1985 Formula Ford Festival. After all, Van Diemens had won every major FF1600 race in the UK that season.

Herbert was in the unfancied Quest, and his chances slumped to rock bottom when he crashed at the beginning of qualifying, having to start his heat with a 10-second delay. But he picked his way through to sixth, and progressed to fourth in his quarter-final. When Bertrand Gachot and Paulo Carcasci had a spectacular shunt at the start of their semi-final, that helped Herbert through to second – and a position on the front row for the final alongside Jonathan Bancroft and Damon Hill.

In the end it was anti-climactic, as Herbert got the jump at the start and led Bancroft and Hill throughout. But to emerge on top of a 126-car field, in a Quest, after such a setback, was a true shock. **MS**



19

SECRET ITALIAN BEATER

The rigging of the 1933 Tripoli Grand Prix by leading drivers – for a share of a lottery payout based on the result – almost made this list, but we've gone for the more positive story that took place six years later.

Tired of being beaten in GP racing by the German teams, the Italian authorities changed the regulations for the 1939 Tripoli GP – eight months before the race – from the three-litre regulations to the 1.5-litre rules of the secondary Voiturette class. Mercedes didn't have such a car, and the move seemed to pave the way for an Italian victory, probably by an Alfa Romeo or Maserati. Except Mercedes didn't read the script.

In secrecy it developed and built two new 1.5-litre cars, one of which was finished on the way to the event, and rolled up at the high-speed Tripoli circuit to take on 28 Italian machines. The result was a 1-2 for the W165s, which were never raced again – they'd proved their point. **KT**





TYRRELL'S SIX-WHEEL TEASE

Glitzy car launches at posh hotels weren't the order of the day in F1 in the mid-1970s. So members of the press must have been suspicious when they were summoned by Tyrrell to the Heathrow Hotel in September 1975. Few could have been prepared for what was in store.

Tyrrell had conceived the six-wheel P34 and built a development hack in secret, and that cloak was maintained – quite literally – as the press corps gathered around the sheet-covered machine ahead of the unveiling. The silhouette appeared entirely normal – sitting on top of each pair of tiny 10-inch wheels at the front were cardboard cutouts mimicking conventionally sized rims.

Only when the sheet was whipped off did the true nature of the car become apparent. Tyrrell wasn't committing to racing the avant-garde machine at the time, but it would become a familiar sight on the F1 grid over the next two seasons. **GW**



PANIS WINS IN MONACO

Olivier Panis woke up on the morning of the 1996 Monaco Grand Prix, looked out of the window and saw that it was raining, and then promptly told his wife that he was going to finish the race on the podium. As bold a prediction as this was for a Ligier driver, it came to pass, and then some. He bloody won the thing!

The Frenchman was correct in his belief that he had the pace in the wet and dry aboard his Ligier-Mugen Honda JS43 to make it into the top three – and a timesheet-topping performance in the morning warm-up hinted of that. Retirements for Damon Hill's Williams and the Benetton of Jean Alesi then allowed him to complete an unlikely victory in a car that had qualified only 14th.

Panis was handed a Tricolore for his slowing down lap as he celebrated a first F1 victory by a French car since 1983, one that had appeared implausible to everybody but him. GW

HOW PANIS WON

Olivier Panis owed his solo grand prix victory to his pace in both the wet and dry that day, bold strategy, sheer bloodymindedness and, of course, a couple of slices of good fortune.

He knew he had a good package for a wet race thanks to the torquey Mugen-Honda V10 and some pre-event testing work on driveability. The Ligier had shown pace during free practice, but an electronic glitch in qualifying left him on row seven.

Panis, already up to 10th, really got going as the track began to dry, dispatching Mika Hakkinen and Johnny Herbert in short order as the team got ready to bring him in for slicks. This was where the race was won – and very nearly lost – for Panis. The Ligier had gone to the grid with a full tank of fuel, which would have allowed him to go through the race had it remained wet. He was only given a splash when he stopped, which vaulted him to fourth after everyone had come in for slicks.

He then barged his way past Eddie Irvine at the hairpin, moved up to second when the Renault engine in Damon Hill's Williams let go, and took the lead when Alesi was halted by a broken spring on lap 60. Panis had leapfrogged David Coulthard's late-stopping McLaren in the stops.

The Ligier had the pace but, the team concluded, not the fuel to make the finish. It repeatedly called Panis in, but he ignored the instructions. "I switched the engine to the leanest setting and tried to save fuel," recalls Panis. "Coulthard was closing, so I did one fast lap to show I had something in hand."

So short on fuel was the winning Ligier after it completed a race stopped on the two-hour mark that it wouldn't restart after he'd brought it to a halt adjacent to the podium. GW



TICKTUM'S LATE-RACE RAMPAGE

No one should win the Macau Grand Prix on only their third race in an F3 car, especially when they're in fifth position with two laps remaining. But that's what Dan Ticktum achieved in 2017, after a difficult season - his first since a 12-month ban - in Formula Renault 2.0.

A number of factors converged to make the impossible possible. Hot favourite Lando Norris was jetlagged after McLaren called him up for a test that never happened, while Callum Ilott and Joel Eriksson collided while battling for the lead after an early virtual safety car.

The rubber on long-time leader Sergio Sette Camara's car was clearly wilting, ditto Maxi Gunther, while Ticktum and Ferdinand Habsburg had no such problems. Ticktum divebombed Gunther and Norris in one move. And, when Habsburg tried a do-or-die move on Sette Camara for the lead at the final corner, they crashed. Ticktum found a path through to take the chequered flag in the most exciting Macau GP of all time. MS

JR SHOOTS HIMSELF

The Team Penske cars suffered bad pitstops, Chip Ganassi Racing's fuel strategies weren't right and Andretti Autosport had struggled all month. Now Panther Racing (which had finished second in three previous Indy 500s) was heading

for victory in the 2011 Indy 500 thanks to rookie JR Hildebrand having soft-pedalled his fuel at the start of the final stint. His nearest pursuer was 2005 winner Dan Wheldon, driving a one-off for Bryan Herta's team, which was taking part in only its second IndyCar race.

On the last tour Hildebrand came up to lap Charlie Kimball, but he didn't need to pass because Wheldon was two seconds back. Heading through Turn 4, Kimball kept low and Hildebrand moved to the outside, but his right wheels got into the grey and sent him understeering into the wall. Wheldon won the 500 having led less than a quarter of a lap. And Panther had its fourth straight runner-up finish... DM



14

SAFETY CAR BUNGLE

Perhaps the shock would have been a driver who had never finished higher than sixth in the World Touring Car Championship taking his maiden win around Pau. In the end, bungling French officialdom provided a far bigger one...

Veteran German tin-top pedaller Franz Engstler and his family team weren't a threat to the works outfits but, armed with a BMW 320si, he was a contender for independents honours. Thanks to a points finish in the opening race at Pau, he gained a front-row start for the reversed-grid sequel, and used his rear-wheel-drive traction to outaccelerate the polesitting Chevrolet Cruze of Alain Menu and take the lead.

A variety of first-lap incidents led to a call for the safety car. Out of the pitlane it came, before swerving across the track onto the racing line on the exit of a fast right-hand kink – and into Engstler's path.

The race was red-flagged and Engstler was out. MS





TOYOTA'S TURBO TORMENT

Four world championships don't lie – Juha Kankkunen was one of the world's finest rally drivers. But this didn't make sense. Midway through leg two of the 1995 Catalunya Rally, the Finn's Toyota had found some serious speed to extend a 51-second lead over Carlos Sainz's Subaru.

Questions had been asked a month earlier in Australia, when the Celica GT-Fours were leaving the startline of the Langley Park superspecial and hauling out a 10-metre lead by the time they'd hit third gear. In a tightly regulated formula that simply wasn't possible.

Post-event scrutineering in Spain answered all those questions. Toyota Team Europe had found a way of tweaking the restrictor on the turbo air intake. When the car was stationary it complied with the rules, but once the car was running the plate opened to allow more air in.

Chief engineer Dieter Bulling resigned, all points scored in 1995 were deleted, and Toyota was banned for 1996. **DE**



SURTEES LEAVES FERRARI MID-SEASON

Imagine Sebastian Vettel being one point off the lead in the world championship, armed with arguably the fastest car in F1, and walking out on Ferrari mid-season. That's what John Surtees did in 1966.

Most teams weren't ready for the new three-litre F1 regulations and Ferrari's 312 looked like the car to have. But to say the 1964 world champion and team manager Eugenio Dragoni didn't get on would be a masterpiece of understatement. When Dragoni hinted that Surtees was unfit and decided to give the first stint at the Le Mans 24 Hours to Ludovico Scarfiotti, Surtees walked out.

He joined Cooper-Maserati, immediately outpaced new team-mate Jochen Rindt, and won the Mexican Grand Prix, while Scarfiotti took the Italian GP for Ferrari. But both parties lost out to the pragmatic Jack Brabham and his eponymous team in the final standings. **KT** 1

WOLF'S DEBUT VICTORY

Brawn's debut grand prix victory 10 years ago was impressive, but it was earned with a car upon which Honda had thrown an eye-watering development budget before pulling the plug on its F1 project.

Jody Scheckter's win in the 1977 season-opening

Argentinian Grand Prix for the brand-new Wolf team was something else again. The squad had emerged from the ashes of Austro-Canadian oil magnate Walter Wolf's ill-fated tie-up with the beleaguered Williams team in 1976, with a new car penned by former Hesketh designer Harvey Postlethwaite and ex-Lotus man Peter Warr running the team.

Fuel pick-up problems consigned Scheckter to 11th on the grid at Buenos Aires, but he made steady progress through the field as the furious 40C-plus temperature took its toll on the field. With six laps remaining, Scheckter passed the Brabham-Alfa of Carlos Pace, who was ailing in the heat, and history was made. MS





DING WHEN YOU'RE WINNING

Triple world champion Jack Brabham, then aged 44, and his BT33 made a formidable combination in 1970. After the retirement of Jackie Stewart's March in the Monaco Grand Prix, Brabham took the lead. When Chris Amon's March retired, Brabham held a 13.5-second advantage over Jochen Rindt with 19 laps to go.

But the Lotus driver was inspired and cut into the gap, starting the final tour just 1.3s behind. Brabham seemed to have enough in hand, despite losing time in traffic, until the final right-hander.

"When I got to the braking area I found Piers Courage apparently coasting with a dead engine," wrote Brabham in his autobiography When the Flag Drops. "While I was trying to decide how to cope with this, I passed my braking point by just a few yards."

Live on TV, a rare thing at the time, Brabham slid into the straw bales, allowing Rindt to slip through take victory. **KT**

NICO ROSBERG RETIRES

It was the ultimate mic-drop moment and nobody, least of all bitter rival Lewis Hamilton, saw it coming. Just five days after clinching the 2016 Formula 1 World Championship with second place in the Abu Dhabi Grand Prix, Nico Rosberg announced during the FIA prizegiving gala in Vienna that he was retiring at the age of 31.

"I didn't know if I had the balls," said Rosberg of the moment he had to notify Mercedes team boss Toto Wolff of his intentions in the aftermath of Abu Dhabi. Even though it put the team in the awkward position of needing to find a replacement driver – eventually paying Williams around £10million to release Valtteri Bottas – the time was right. The battle for the title with Hamilton had taken so much out of Rosberg that he wasn't interested in doing it all again.

"I've decided to follow my heart and my heart has told me to stop there and call it a day and go on to other things," he said. **ES**



MCLAREN'S \$100 MILLION FINE

The circumstances that led to McLaren being fined an unprecedented \$100million by the FIA represent one of the most tangled webs ever woven in F1.

It started with suspicions arising concerning Ferrari chief mechanic Nigel Stepney, and the upshot was

that McLaren's Mike Coughlan was found to be in possession of a comprehensive Ferrari design dossier. Key to this being revealed was Coughlan's wife visiting a shop in Woking to photocopy the documents. An employee recognised the nature of it and informed Maranello.

McLaren was ultimately fined \$100million for this information being acquired and used, as well as losing the points scored in the 2007 constructors' championship – which also cost it 'column 2' money for the year. Drivers Fernando Alonso and Lewis Hamilton were not affected since they had cooperated with the investigation and were therefore granted immunity. **ES**





DRIVERS STRIKE IN KYALAMI

The majority of drivers due to take part in the 1982 grand prix season had already signed the new contract necessary for them to be granted a Formula 1 superlicence ahead of the opening race in South Africa in January 1982. But the handful who hadn't pointed out to the rest the implications of the agreement. So all bar one of the 31 drivers present for Kyalami got on a coach and left the circuit. They were officially on strike.

Certain clauses in the new agreement were unnecessarily restrictive, claimed ringleaders Didier Pironi and Niki Lauda. They got the rest of the field, save for March driver Jochen Mass, on their side and decamped to the Sunnyside Park Hotel in nearby Johannesburg. No cars would take to the track on that first day.

A truce was brokered the following morning, while Mass undertook a handful of laps at the start of second practice. He was promptly blackflagged and the action proper got under way an hour or so later. **GW**



PENSKE FAILS TO QUALIFY

The ridiculous power of the pushrod Ilmor-Mercedes units of 1994 had masked the fact that the dominant Penske PC23Bs didn't handle well. Come 1995, the PC24 was running a 'regular' Ilmor-Mercedes.

Neither Emerson Fittipaldi (1989 and 1993 Indy winner) nor Al Unser Jr (1992 and 1994 victor) could get up to speed. Having elected not to even try on Pole Day, Unser borrowed a spare Reynard from Roberto Guerrero, then reverted to the PC24 for the second week of practice. Fittipaldi ran a Lola borrowed from Bobby Rahal – a direction Unser would take come the second weekend of qualifying.

But neither was fast. With half an hour to go on Bump Day, Fittipaldi sat 33rd and Unser wasn't in the field. Little Al's final attempt failed to displace his team-mate, and with only 12 minutes to go Stefan Johansson's Bettenhausen Reynard-Ford bumped Emmo out. Penske had just registered a shocking double DNQ. DM

MALDONADO WINS IN SPAIN

For the seven and a half years before and after the 2012 Spanish Grand Prix, the legendary Williams team failed to win a single race. But on that glorious May day, Pastor Maldonado delivered one of the most unlikely of unexpected victories.

This victory wasn't dependent on rain or a series of incidents and accidents. Save for Lewis Hamilton, who lost pole position thanks to having insufficient fuel to supply a post-qualifying sample, Maldonado had to beat everyone fair and square. He relied on a car that was far better than most of its results suggest, plus his mastery of the particularly capricious Pirelli tyres, to triumph.

Maldonado even lost the lead at the start, slipping behind Fernando Alonso's Ferrari before using a two-lap undercut at the second round of stops to take a lead he never lost. Williams then suffered a terrifying garage fire when a fuel rig blew. ES



EVERYBODY OUT!

Strikes weren't a new thing in F1. All bar a couple of drivers, admittedly with more sympathy from their employers, had initially refused to go out on track at the 1975 Spanish Grand

Prix on the **Montjuic Park** street circuit in Barcelona amid concerns over safety. That strike had been broken by pressure from the authorities, both sporting and municipal.



The key to the success of the Kyalami strike, if indeed it were a success, was stopping the drivers coming under that kind of pressure again. That's why they went to the Sunnyside Park Hotel in Johannesburg and spent the night on mattresses.

"The idea was to stay as a collective unit," recalls John Watson. "If we'd gone back to our own hotels we could have been bullied by our team managers. We went somewhere we couldn't be reached, though I do remember Mo Nunn banging on the window to try to get Roberto Guerrero to come out."

The tactics worked. Only Teo Fabi, who was just starting his F1 career with Toleman, broke ranks and didn't spend the night in what Watson remembers as "some kind of ballroom". That explains the presence of a piano on which Elio de Angelis and Gilles Villeneuve entertained their striking brothers. GI



FAILURE WITH THE FLAG IN SIGHT

Toyota finally had a Le Mans 24 Hours victory in the bag. Sebastien Buemi, Anthony Davidson and Kazuki Nakajima had come out on top in a hard-fought battle with the Porsche 919 Hybrids and were home and dry. Or so they thought.

Early on the penultimate lap, the leading TS050 HYBRID with Nakajima at the wheel suddenly lost power. He limped onto the pit straight and parked opposite his pit as Neel Jani swept through into the lead in the Porsche he shared with Romain Dumas and Marc Lieb.

A connector in the plumbing between one of the turbochargers and its intercooler had failed, with a resulting loss of boost. It wasn't the first time that Toyota had seen victory at Le Mans wrenched from its grasp, but it was the most dramatic. And in one final ignominy, Nakajima's final lap was outside the six-minute maximum and the car went unclassified. GW



SINGAPORE CRASH SCANDAL

When Nelson Piquet spun out of 16th place and slammed into the inside wall on lap 14 of the 2008 Singapore Grand Prix, the race was turned on its head. While one Renault was out, the sister car of Fernando Alonso had already made its first stop and, thanks to a safety car for Piquet's shunt, was now on course for the team's first victory of the season. It was a remarkable slice of good fortune given Alonso looked to have the pace in practice before a fuel-pump failure led to him being eliminated in Q2. But there was more to it than that...

The following year, Renault's decision to drop Piquet from its line-up had far-reaching consequences as it led to what had happened in Singapore being brought to the attention of the FIA. After giving two statements to the FIA, Piquet's evidence was key to the charges. He pointed the finger at team principal Flavio Briatore and executive director of engineering Pat Symonds for requesting he crash to trigger

a safety car – something he agreed to while in a "fragile state of mind". Piquet was subsequently given immunity thanks to his evidence which, along with that of the famous 'Witness X', was key to the case.

Renault opted not to contest the charges, agreeing to pay the costs incurred by the FIA's investigation and committing to making a significant contribution to FIA safety projects. It was given a ban from F1 that was suspended for two years; Briatore and Symonds had already left the team.

The FIA attempted to ban Briatore from FIA events indefinitely – including restricting the ability of drivers he managed to be given a superlicence – while Symonds faced a similar exclusion for five years. These were later challenged legally, and the pair later agreed not to take up roles until 2013 – although Symonds was able to work as a consultant.

Renault lost title sponsor ING as a result of the controversy and subsequently sold the team to Genii Capital, while Ferrari's Felipe Massa blames this incident for costing him the 2008 title as he failed to score after a disastrous pitstop under the resulting safety car. **ES**

SIX CARS START THE 2005 US GP

When the left-rear Michelin on Ralf Schumacher's Toyota failed at 175mph during the second free practice session for the 2005 United States Grand Prix at Indianapolis, it was the start of a sequence of events that would lead to the most farcical race in world championship history. After all, third driver Ricardo Zonta - who would take the injured Schumacher's place in the race line-up that weekend – had also suffered a similar failure without the spectacular consequences.

Come Sunday's race, 14 of the 20 cars peeled into the pits at the end of the warm-up lap,

headed by Toyota driver Jarno Trulli, who had taken pole position with a low-fuel special in full expectation that this would happen. Some drivers wanted to start, but the safety concerns of the seven teams on Michelins overruled that. It left only the Bridgestone-tyred cars to start. Michael Schumacher led home Ferrari team-mate Rubens Barrichello, with Jordan driver Tiago Monteiro an unlikely third for Jordan – and Minardi was the only other team to compete.



So how did it come to this? Michelin's mistake was to misjudge the lateral loads on the tyres on the banking of what is Turn 1 at the regular oval. While this wasn't its first visit there, the track had been resurfaced and diamond-ground since then, and Michelin simply underestimated how demanding it would be for the tyres. Bridgestone, had a better idea thanks to ties with sister company Firestone, which was involved in IndyCar.

Various solutions were suggested, and rejected. The possibility either of a speed limit for Michelin runners, or a temporary suspension of the rule banning tyre changes, were rejected. Even with Michelin bringing in more tyres of similar spec, the solutions were dismissed – including the idea of installing a temporary chicane.

The FIA rejected this as it would circumvent the comprehensive inspection process for circuit safety, meaning it would withdraw support – even if the event were to be run as a non-points race.

This was the weekend on which F1 finally went too far and failed to find a workable solution. F1 at Indianapolis never recovered, while Michelin was soon gone – and grand prix racing in the United States has only recently recovered through the success of the race in Austin. **ES**



MERCEDES FLIPS AT LE MANS

Personal view from Matt James

Le Mans used to be the annual pilgrimage, which started with dad and nine-year-old lad grabbing a tent, packing the car and taking a week to enjoy the Circuit de la Sarthe.

It became a tradition – until the mid-1990s. Joining the staff of Autosport's sister title *Motoring News* (now *Motorsport News*) presented me with the opportunity to go and cover the race. My first one as a journalist was in 1996, so I thought I was an old hand by 1999. By that stage, there was even more reason for me to be excited about the race since drivers I'd grown close to on their way up the motorsport ladder were touching the top table – including Peter Dumbreck, whom I'd known from Formula Vauxhall and Formula 3 days.

He had been picked up by Mercedes after a stint in Japanese F3 and this was his first Le Mans at the wheel of the 5.7-litre, naturally aspirated V8 CLR. Mark Webber, whom I'd known since British Formula Ford days, was on the staff too.

"IT'S JUST AS WELL THERE WAS A SCRUM SURROUNDING HAUG WHEN I GOT THERE"

GT1 had been cancelled, so Merc only planned a limited number of events in 1999. Le Mans would kick off the farewell tour, but selected other races were planned.

The first sign of what was to come happened in qualifying on Thursday night, when Webber's car flipped over going through the Indianapolis section. It seemed unbelievable, even when presented with photographs in the following morning's local newspaper, *Le Maine*. The actual dynamics of what had happened seemed hard to comprehend.

With my colleagues Charles Bradley and Simon Arron, I was snarled up in traffic on the Saturday morning of the event, and

resorted to tuning in to Radio Le Mans as we crawled our way through the broken-down Citroens and Renaults to make our way to the media car park. We listened with incredulity as reports came through of another accident for Webber during the warm-up. This one had been caught by TV cameras.

This was getting serious. The first shunt had been put down to nothing more than a random happening. When the second crash occurred, there was an ominous feeling.

Mercedes placed calls to McLaren, which was in Montreal preparing for the Canadian Grand Prix, so aerodynamics guru Adrian Newey could be consulted. A quick fix was applied in the form of extra diveplanes on the nose section of the CLR. It was a patched-up cure that gave the team bosses, including Norbert Haug, the confidence to let the cars loose in the race (but without the entry for Webber, Jean-Marc Gounon and Marcel Tiemann, which was withdrawn owing to damage).

Almost as soon as Dumbreck got behind the wheel of the #5 Merc, which he was sharing with Nick Heidfeld and Christophe Bouchut, the CLR was airborne again. He had been fighting for second on the run down to Indianapolis, when the front picked up and flipped the car over, high into the trees.

I didn't even wait for any instructions. I ran straight to the Mercedes garage. Surely Dumbreck had been seriously hurt, but I had no information. I wanted to collar Haug and ask him exactly why he would let any driver take to the track when they were in such peril.

My fear for Dumbreck, my anger and the adrenalin got to me. Panic had set in, and it's just as well that there was a huge scrum surrounding Haug by the time I got there. I would easily have lost any scintilla of professionalism at that point.

Thankfully Dumbreck suffered only minor injuries, and the remaining car driven by Bernd Schneider, Pedro Lamy and Franck Lagorce was withdrawn from the race. It was the end of the CLR programme, but it could have been so, so much worse. MJ

SMOKE YOUR TYRES, NOTYOUR ENGINE!



Regardless of whether you are a drifter, a circuit racer, a rally person, or compete in any form of motorsport, your engine needs Driven Racing Oil. Featuring race developed anti-wear ZDDP additives, friction modifiers and super stable base oils, to ensure your engine lasts longer and produces more power.

We offer a huge range of engine oils from 0W to 10W/60, available in both mineral, semi-synthetic and synthetic formulations. A full range of race proven gear and differential oils are also available – check out our product range, and buy online at:

www.drivenracingoil.co.uk





Anglo American Oil Company +44 (0) 1929 551557 www.aaoil.co.uk



ROBBIE DALGLEISH ON TOP OF WORLD AND DAYTONA BOUND





2011 **Aaron** Steel

2012 Lawrence Davey

2013 Lewis **Plato**

2014 Oscar Kruger

2015 Paddy McClughan

2016 Max Bladon

2017 Rick Parfitt Jr. 2018 Kyle Reid

















In a tense battle which went right to the final weekend for five separate championships, Robbie Dalgleish secured a once-in-a-lifetime drive at Daytona as he was also crowned Mini Challenge Cooper Pro champion.

For the second time in two years a Mini Challenge driver has won the 240 Challenge, with Robbie joining an impressive list of previous winners, including 2017 British GT champion Rick Parfitt Jr. and Porsche Carrera Cup GB race winner Lewis Plato.

In January Robbie will take to the famous 31 degree banking for his first experience of the historic Daytona International

For a full list of challenge points scorers visit www.sunocochallenge.com









WHY THIS WAS RAST'S BEST TITLE YET

Audi star Rene Rast's first DTM crown in 2017 was dramatic.
The second came thanks to season-long superiority

TOM ERRINGTON

HOW DOES RENE RAST'S TITLE COMPARE TO HIS FIRST IN 2017?

Rast's 2017 title was a superhuman feat. For starters, he was told to play rear-gunner to Audi hero Mattias Ekstrom's championship bid, not to mention he was a DTM rookie. This year felt like the true arrival of Rast as an all-round star, with very few weaknesses for the opposition to exploit. His average finishing position in 2019 — skewed by reliability problems at Hockenheim and Zolder — is a hugely impressive 3.94, and his qualifying form is mindblowing. He was in the top four on the grid for 15 consecutive races and, discounting the season-opening Hockenheim round, at which he was blighted by technical problems, his qualifying spot was 2.125. Rast is an expert at managing races from the front, shows tenacity in wheel-to-wheel battles and is adept at managing the tricky Hankook tyres. And that makes the Team Rosberg driver the undisputed leading man of the DTM.





DID NICO MULLER HAVE A BREAKTHROUGH YEAR?

The Swiss will argue that he had his breakthrough in 2018, pointing to moments such as being ordered by Audi to move aside from a victory at the Red Bull Ring to support Rast's ultimately unsuccessful title bid. But Muller undoubtedly raised his game in 2019. Those close to him have suggested that he's matured as a driver, and his second DTM career victory at Misano proved timely. Not only did that success end a three-year drought for Muller, but it provided a spur for the Abt team, which had experienced a downturn in form since Ekstrom's retirement at the end of 2017. Another factor was Muller's strong relationship with race engineer Felix Fechner, who had switched to this role for 2018 after previously being performance engineer across the whole Audi squad.

Muller was pushing Rast for the title going into the penultimate round at the Nurburgring, but there were moments there and in other races that showed a weakness in wheel-to-wheel combat. His approach should help – he quickly highlighted qualifying as a weakness this year, and put the focus on balancing qualifying and race set-up across a weekend with success.

As Muller points out, success is difficult when Rast is the benchmark, but he looks best-placed to push the two-time champion to the limit – perhaps beyond the "tension" that ex-Audi champion Timo Scheider claimed existed within the current squad.

WHY DID BMW DISAPPOINT?

This question is currently the focus of BMW's internal review after a seriously below-par 2019. The raw numbers alone show how far the M4 DTM fell from looking the ideal package at the season-opening Hockenheim round to decidedly second-best. Audi sealed the manufacturers' title at the Lausitzring, with two rounds to spare, and the final score reads 1132-550 in Ingolstadt's favour. BMW managed to win six of the 18 races, with certain individuals at the Munich manufacturer keen to use that statistic to sidestep questions about why BMW had been a letdown. Yes, it did win races, but never both on a weekend, and it increasingly found itself behind Audi in both qualifying and race trim.

A key part of the problem stemmed from the fact that BMW, according to motorsport boss Jens Marquardt, "underestimated" the integration of the new-for-2019 Class 1 engine and its inherent vibrations, which could damage the 2018-spec common parts. While Audi quickly got on top of the problems – it never once had to break engine seals – BMW had to apply short-term fixes that added as much as 8kg to the car. That, in turn, made the M4 DTM difficult to set up, with Norisring winner Bruno Spengler the first to raise concerns over this.

Come the penultimate round at the Nurburgring, BMW was using the practice sessions to find a wider set-up window that could work for all six of its drivers, rather than just leading light >>

WHAT WAS THE RACE OF THE SEASON?

Wittmann's drive from the back of the field to victory at Misano. He opted to take the gamble of stopping at the end of the first lap, which left him with 38 laps to manage his tyres on a high-wear circuit, with an early safety car helping his quest. Rast's charge after Wittmann, during which he took 20 seconds from the lead, was edge-of-the-seat entertainment.

WHAT WAS THE LOW POINT OF THE SEASON?

R-Motorsport's decision not to take its Aston Martins to the Fuji joint race next month. As the DTM makes its biggest step towards globalisation with a tie-up with Super GT, it will head to Japan without its most 'international' manufacturer, one that had joined the DTM partly because it saw racing in Asia as beneficial to its road-car strategy. Super GT sidestepped questions about Aston's absence, which felt telling. The decision of R-Motorsport to focus on development for 2020 is the party line and somewhat understandable, but delivering a blow to the DTM at a key moment in its first season in the series was cringe-inducing.



Wittmann

stormed from the

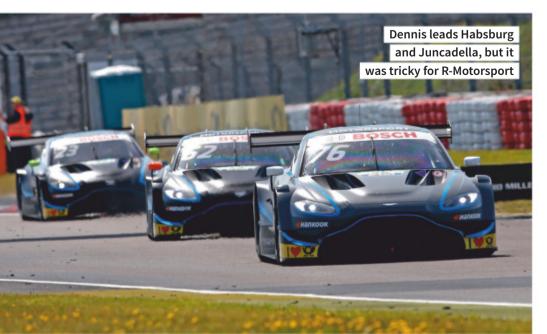
back of the field

to win at Misano

for BMW

WAS R-MOTORSPORT ASTON MARTIN'S FIRST SEASON A SUCCESS OR FAILURE?

Heading into the final stages of the season, you could lean towards saying it was a success, but the end-of-year races led to the return of repeated engine failures. In wet conditions, when it performed well, it seemed that the Aston Martin Vantage DTM was a good car being let down in the dry by the underpowered HWA-built engine. Yes, the car was built in 90 days, but a post-race test after the June Misano event had suggested that reliability was largely under control. By the end of the year, Paul di Resta, Daniel Juncadella and Jake Dennis were usually well-placed to extract points from the car. But with Aston Martin itself talking of podiums in 2020, much will depend on its winter development, and there have been rumours of an alternative engine. If R-Motorsport hits the ground running in 2020 and challenges Audi and BMW, it will be able to justify its painful learning season.



IS THE DTM BECOMING MORE GLOBAL?

The 2020 calendar would suggest so, with the number of German rounds down from five to four following the axing of one of the two Hockenheim dates. The 'foreign' count is up from four to six, thanks to the addition of a round in Sweden and the return to Russia, and this represents the limit of the DTM's internationalisation with a 60:40 split.

In 2019, the return to Belgian track Zolder and the switch of the Dutch round from Zandvoort to Assen proved very popular, and even problem child Brands Hatch had a notable improvement in attendance of 50%. Italy — a key area for the DTM — is still a struggle, but Monza replaces Misano next season, and that's been popular inside the paddock.

The much-heralded Class 1 tie-up remains as murky as ever, even if its first true on-track collaboration at Hockenheim proved exciting with six manufacturers on the grid. Joint-races are expected in 2020, but neither the DTM nor Super GT will commit to an answer as to the long-term goal of Class 1. This is a crucial period for the long-term survival of the DTM.

Eng heads Frijns at Zolder,

a welcome DTM returnee



HOW IMPORTANT WAS ANDREA DOVIZIOSO'S OUTING AT MISANO?

If Dovizioso's Audi appearance gets Valentino Rossi on the grid in the future, as the Yamaha MotoGP superstar promised, it's worth every bit of effort. But Dovizioso's guest drive felt like one last throw of the dice to see if the DTM could remain at Misano – right in Italy's MotoGP heartland – after Alex Zanardi's guest outing in the 2018 night races at the venue fell flat with spectators. Even Dovizioso in the daytime failed to gain traction with Italian media, but it still acted as a perfect demonstration of how difficult the DTM is to master. High-profile names are a good thing for the DTM – look at the wave of enthusiasm for Jenson Button at Hockenheim in his Super GT Honda – but it needs a full commitment from manufacturers. BMW chose not to run guests during a period of struggle, and R-Motorsport doesn't have a spare car, making it a lot to ask of Audi each year.

Dovizioso raced at Misano, but still the





The DTM says it plans its calendar with several different versions in mind, and Silverstone likely featured on one of the early drafts for 2020. That came as a surprise, considering it was just weeks after a successful Brands round in which series boss Gerhard Berger spoke of long-term potential at the Kent track. Berger has always been keen to mix the prestige of current grand prix circuits with "old-school" venues, which is why Anderstorp and Zolder appear on the schedule.

At the time of the Silverstone news, an ITR spokesperson said: "When it comes to the creation of the DTM race calendar, ITR always has to consider alternatives and options. It goes without saying that we want to race in a market as important as the UK next year."

Thankfully for those keen to see the DTM at Brands, it's on the calendar for 2020. It's understood that Silverstone was not impressed by the potential financial agreement between the series and the circuit, as well as concerns over projected crowd numbers. It seems unlikely that Silverstone will feature in the near future.





HOW ARE THINGS SHAPING UP FOR NEXT YEAR?

The driver market is currently very quiet due to several factors. Will BMW's internal review lead to a driver line-up shake-up? Will BMW secure Motopark or another team as a customer and create two extra seats? And will WRT's Audi customer programme find other drivers with budget or keep Jonathan Aberdein and Pietro Fittipaldi? Interest in the DTM from outside drivers is high, as shown by Robert Kubica admitting the series is an option for 2020, while Romain Grosjean considered it before earning a Haas reprieve.

Audi is looking at rewarding Aberdein's rookie season — he outperformed Fittipaldi and starred in qualifying – but will they yield a factory seat when most of its line-up is under contract and Audi boss Dieter Gass has repeatedly praised his six drivers?

Frankly goes Hollywood

Petter Solberg has called time on his top-flight career after winning world titles in front of two tribes. So it's time to relax with the 2003 rally and 2014/15 rallycross king as the man known as 'Hollywood' recalls his 10 best events

DAVID EVANS

PHOTOGRAPHY MCKLEIN MOTOCSPOT





9

RALLY LEBANON

1998

Short on asphalt experience and determined to demonstrate that he was more than a gravel racer, Solberg took his Toyota Celica GT-Four to the Middle East for Rally Lebanon.

"That was a real adventure," he says. "It was such a difficult rally. Mohammed bin Sulayem was a big help for me. I really appreciated that – and the fight we had, it was really good. I got the puncture on the last stage and finished second, but that was a good event."

Finishing second in Lebanon doesn't sound like it should make the

top 10 of a world champion's career, but there are reasons beyond the result: "The rally was good, but it was what happened after that made it really important. I made a video tape after that event and I sent it to Malcolm [Wilson, boss of M-Sport]."

Nothing special in that; lots of drivers do the same. But one evening, after hearing the name 'Petter Solberg' again, Wilson was drawn to play the tape. The call was made soon after. "That rally got me my chance," says Solberg, who was offered a three-year deal by Wilson soon after.

8

RALLY FINLAND

2003

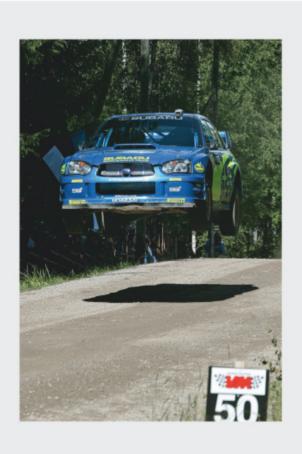
Rally Finland commands 100% commitment and focus. Anything less and you're going to be nowhere – or in the trees. Starting with a temperature of 41 degrees wasn't ideal for a fever-struck Solberg in 2003.

As the event progressed, he started to feel better and was able to pick up the pace in his Subaru. "In somewhere like Finland, you try to drive at 98%," says Solberg. "If you go to 100, then the risks are big there. And if you go over the limit, then the risks are really big."

By Saturday night, Solberg was up to fourth, but just half a second separated himself, Carlos Sainz (third) and Richard Burns (second). "I wanted second," he says. "We pushed harder and harder. We lost the rear spoiler on one stage, which had a massive effect on the car, but we kept going."

Going to the last stage, Solberg was 1.8s down on Burns. "When we left service, I looked at 'Lappy' [Subaru technical director David Lapworth] and I could see the stress on the faces of him and the whole team," he continues. "It was so tense. On the way to the final stage we stopped on the road section and I tried to talk to him [Burns], but he didn't want to talk."

Solberg left nothing behind on the 8.7-mile Mokkipera finale and beat Burnsie by three seconds. The runner-up spot was his.



7

SAFARI RALLY

Solberg couldn't have joined Wilson's Ford squad at a more exciting time. The 1999 season would be the first for the team's all-new Ford Focus WRC. Being very much the team junior, Solberg didn't start the season opener in Monte Carlo and was given a Ford Escort WRC for the second round in Sweden, where he drove sensibly to 11th place. No heroics on his first official outing.

Sitting at home preparing for a Norwegian national event, the call came to say he was needed in Kenya for the Safari Rally. Thomas Radstrom had broken his leg, and Solberg was being promoted to drive a factory Focus alongside Colin McRae.

"That 1999 season was unbelievable," says Solberg. "This was what I had wanted for so long. I remember when things like the team clothing arrived at the start of the year. I opened it and just stared at it. I couldn't believe it. I knew Safari would be tough, I hadn't done anything like that before."

It would be tougher still without regular co-driver Phil Mills. The team was only permitted to change one element of the entry; the car and co-driver Fred Gallagher remained. And preparations in Kenya weren't exactly ideal for Solberg, who went off the road at the pre-event test. But, once the rally was under way, he followed Wilson's word to the letter and delivered an outstanding fifth place.

"That was a good rally," he says. "Colin won in the Focus for the first time and we were in the top five. It was a tough event though. It took a lot to get your head around the fact that you had to drive in first gear sometimes. Then there was the rhino..."

The rhino? "Yes, we kissed him at 220km/h!"







RALLY NORWAY

2009

Being told that Subaru would be pulling out of the World Rally Championship at the end of 2008 floored Solberg. Like the rest of the world, he didn't see it coming. Now what?

"There were not so many seats around at that time," he says. "Only Ford and Citroen were really there and, so late in the year, they both had drivers all sorted for the following year."



Other drivers would have tried to piece together a couple of events for the following season in an effort to put themselves in the frame for a 2010 seat. Not Solberg. "I had to continue," he says. "I just had to. The WRC was my life and I couldn't not be there. I had some offers to go to do things like endurance racing – I tested for Le Mans – but rallying was everything for me."

So Solberg picked up the phone in November and put it down just before the start of Rally Norway the following February: "Honestly, Christmas didn't exist at the end of that year. Me and Pernilla [Solberg's wife] were calling everybody to make this happen."

A Citroen Xsara WRC was sourced and a team created. "We couldn't make it in time for the first round in Monte Carlo," he says. "And it really hurt to see the first round starting without us. But it was nice, the second round was Norway – the first time the WRC ever came to my home."

And Solberg made the perfect start, fastest at the Thursday night superspecial in Oslo. The locals, as you can imagine, went mad. "The emotion at the end of that stage was incredible," he recalls. "I never forget the relief to get to that moment. It was so special."

Unfortunately, engine problems slowed him through the event, and first became sixth at the finish. "But that was the start of a new adventure," he says. "I always wanted to run my own team and maybe it came a little earlier than I thought, but Norway was the start of a journey that would lead me to some great results in the WRC and six World RX titles for my team [two drivers' championships apiece for Solberg and Johan Kristoffersson, and a pair of teams' titles]."

5

RALLY JAPAN

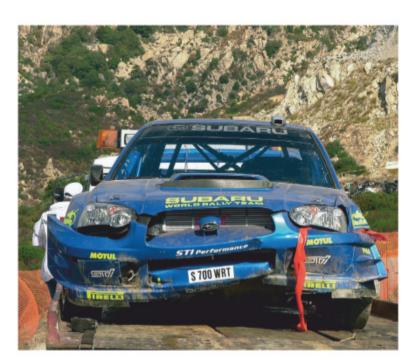
Going into 2004 as reigning champion was a good feeling for Solberg. The Subaru was a great evolution, and he was confident of more success in the year ahead. Two wins and two further podiums early on demonstrated that potential. "I felt I had the chance to win a lot of rallies in 2004," he says. "Everything was working well and looking good."

Then came Rally Germany, where he landed the Impreza WRC 04 on its roof on top of a hinkelstein. "That was a big one," says Solberg, wincing visibly at the memory. "And Japan was the next rally after that. It was the first time it was in the championship and, for a Japanese manufacturer, it was a really big thing for Subaru. We had great support from everybody in Subaru, but there was a big responsibility for me to lead the team on the home rally.

"It was a little bit difficult after Germany. Back in the car again, we had to try to forget about it. I think it was a bit more difficult for Phil [Mills, co-driver], because it was his side of the car that really took the big impact. But Phil was fantastic, he laughed about it because that was the mentality, that was the way to deal with these things. We got in the car and we got on with the job."

Solberg led from start to finish and dominated the rally, beating Sebastien Loeb by more than a minute. "That was a good win," he says. "And it stayed good. We won the next two rallies after that."









TOUR DE CORSE

2003

Talk to Solberg about this one and there's still a wry smile and slight shake of the head. He still can't understand how he pulled it off. He arrived on the island knowing a good result was vital to a sustained challenge for the championship, but there was a nagging concern that, if it stayed dry, his Pirelli-shod Subaru Impreza WRC 03 would struggle against the French force that was Michelin, Loeb and a Citroen Xsara WRC.

All this paled into insignificance when Solberg caught some gravel on the outside of a fast right-hander on the shakedown. The car slid off the road and hit a telegraph pole. The damage to the side of the Subaru was huge, but Solberg and co-driver Phil Mills knew how lucky they'd been; either side of the telegraph pole there was a very steep drop down a Corsican mountain.

"The car came back to the service park and it was so badly damaged," says Solberg. "I was so low. Paul Howarth [Subaru operations director] said, 'No, no, no, we can fix this'. I wasn't sure. I was feeling so shit. I went to bed, but couldn't really sleep."

Through the night the Prodrive mechanics worked to pull the Subaru as straight as possible, effectively putting a new side into the car. It was scrutineered again on Friday morning. It passed.

"I was up really early and went to see the car," remembers Solberg. "I couldn't believe it. The paint was still wet, but it looked amazing. What a team! It was a crazy job, but it showed those guys had the same passion for the championship that I did."

Understandably, Solberg started slowly but built his speed and forced himself into the lead battle. He moved to the front of the field on the final Saturday stage and stayed there through Sunday.

Solberg remembers that Sunday afternoon fondly: "When we came back to the service to celebrate the win, I jumped on the roof and was just jumping up and down! I put some more dents in it, but I didn't care. I just couldn't believe what this incredible team had done. Thursday, we were lucky not to be dead, and four days later we are winning the rally."

3

RALLY GB

The breakthrough first win. "You don't forget those first moments," says Solberg. "I remember the first fastest time, the first time I led a WRC round, and the first podium. But the first win is really something."

Solberg was locked in an intense battle

with his former Subaru team-mate Markko Martin for the duration of what was a very challenging event.

"GB is always such a difficult race," he says. "It's a difficult place to push in the fight because you just don't know what the grip's going to be like. When you have more experience then you can play the game a little bit more, but I was so nervous for the whole event.

"Markko and me both really wanted

that one so bad, we were both chasing for our first win. It was a big deal. All the time I was trying so hard not to think too much about what I was doing and just drive. I kept telling myself this, 'Just drive. Just. Drive.'

"When we won, what was really incredible for me was the way Malcolm [Wilson] was the first to come to me to say congratulations. That meant so much to me." Solberg had left Wilson's team midway through the 2000 season, bound for Subaru.



2

RALLY NEW ZEALAND

2001

All World Rally Championship drivers love New Zealand's fast, cambered roads, but Solberg's mind was anywhere but on the stages during the final day of the 2001 Auckland-based event. He finished seventh and won some stages. But, by the end of the event, his life had changed forever.

Dozing in his hotel room after the event's second leg, Solberg got a call from home to say his wife Pernilla had been taken ill. She was six months pregnant at the time. "I didn't know what to do," he says. "It was so difficult, I was shaking, I just wanted information to know how is Pernilla. What is happening?"

Solberg got up and drove the next

day's eight stages, winning four of them in his Subaru. "It was like I was in a trance," he says. "I came from the stage and went straight to the phone to find out more. I was shaking."

He finished the event and drove straight to the airport. And, on the way, he got news that he'd become a father to Oliver. Wife and son were both doing as well as could be expected for such a premature birth.

"I will never forget that flight home," says Solberg. "Tommi [Makinen] and I celebrated.

"You know that rallying is everything for me, but as time goes on you realise that some things – like my family – are more important. Getting home and seeing Pernilla and Oliver was everything."







Nothing has been left out and there's something for everyone at the new National Lottery-funded Silverstone Experience

KEVIN TURNER

ritain has been one of the world leaders in motorsport for decades, and Silverstone has played a key role throughout. People within the sport know that many teams and companies are based at or near the Northamptonshire venue, but it's a message that hasn't travelled as far as it should. Sally Reynolds, the woman behind the Silverstone Experience, believes it's time to start shouting a bit louder.

Reynolds arrived at Silverstone in 2011 as a consultant to see what could be done to attract more people and quickly saw a big opportunity. "It became apparent that Silverstone has an amazing story behind it, but nowhere at Silverstone were we telling the story of British motorsport, its role in global motorsport and Silverstone's position," says Reynolds, who is now chief executive of the Silverstone Heritage Ltd charity.

"It also became apparent Silverstone couldn't pay for this itself."

Reynolds kickstarted a process that should reach its biggest milestone tomorrow (Friday), when the Silverstone Experience opens. The aims of the attraction — and indeed the charity — are the preservation of motorsport history and education of it, and to inspire the next generation of engineers. To that end, the Experience is much more than a museum — it is a modern, interactive venue, the sort that British motorsport should probably have created many years ago.

A key part of the project was getting the support of the Heritage Lottery Fund (now known as the National Lottery Heritage Fund). Reynolds put together the successful development grant application in 2012, which allowed the project to gather momentum. Despite Silverstone's past, which goes back much further than motor racing and includes ecclesiastical and Second World War history,



Reynolds wasn't sure it would be interested, but the response was enthusiastic.

Case officer Jeremy Fenn underlined how important technical heritage is to the UK while Sir Peter Luff, chair of the National Lottery Heritage Fund, praised the unique and inspiring blend of sport, science and history: "The National Lottery Heritage Fund has an incredible track record when it comes to funding projects that will inspire future generations of engineers and scientists across the UK. We're delighted that our funding for the Silverstone Experience will continue to do just that, while also highlighting some of the incredible feats in British motorsport heritage that this iconic venue is home to."

"It became apparent that we would appeal as a Heritage Lottery Fund project," adds Reynolds. "You needed somewhere all these stories could be pulled together and told."

The second-round application to the Heritage Lottery Fund was completed in August 2016 and was confirmed in November of that year. The process was rigorous, but that helped make the plans watertight — as well as providing £9.1million. Mather and Co, which was involved in the National Football Museum, has been a firm supporter throughout and designed the exhibition from Silverstone's brief. Local councils have also been supportive.

So what can you expect from a visit? >>



Created in the last remaining Vickers Wellington bomber hangar remaining at Silverstone on land provided cheaply by circuit owner the British Racing Drivers' Club, the facility includes a restaurant, education rooms (with views over the old Bridge corner), the BRDC library, plus offices. But the main event is the Experience itself.

There is a time-ticketing system "to deliver the best possible visitor experience" and to avoid queues, and a show car is suspended from the ceiling at the entrance.

Visitors are led upstairs to a starting grid, with screens either side depicting racing cars through the ages, including real sound recordings of their engines. The lights go out, double doors open and the first thing visitors see is a Mark Webber Red Bull. The original 1948 circuit is overhead and the current track on the floor.

The site's early history kicks things off, but you will be able to look down upon some of the racing machinery that is part of the tour later. "Some visitors will be desperate to see cars and bikes, so we want people to know it's coming," says Reynolds. "Then they can relax and enjoy the interactive elements first."

The history of Silverstone's corner names come first, and there are various things for kids to climb through or under. "There's stuff for the kids to do while you read everything," explains Reynolds.

The area's WW2 role is covered, as are the exploits of figures such as war hero and racer Tony Rolt, narrated by leading commentator and longtime Silverstone supporter Ian Titchmarsh.

Silverstone was a training base, so there is a plane simulator, leaflet-dropping game, and a gun simulator. They are the sort of things that will engross kids, and which many adults may find difficult to resist trying too. More poignant are the stories of some of those lost during WW2, which appear alongside former racers who were also killed during hostilities.

Life on Silverstone's farm isn't ignored, and nor is the arrival of motorsport after the war with the Mutton Grand Prix, an unauthorised race that involved an accident with a sheep! That's just one of many stories visitors are presented with, and great efforts have been made to get oral histories from those who have worked at Silverstone over the years. It's interesting enough to entertain non-motorsport fans, while having enough detail to keep diehards happy. Even hardcore motorsport enthusiasts will learn something.

One of the more unusual elements allows you to design a 500cc Formula 3 car, which you can then 'virtually' race to see how competent a job you've done. There's also an ERA E-type replica for kids to climb into, and footage on a loop, which includes ERAs racing towards you to give a flavour of the original 1948 layout. "It's part-museum, part-motorsport specialist, part-child entertainment," says Reynolds, and it's hard to disagree. There's also a healthy budget for updates so that things won't get stale.

The next section is the Heart of Silverstone, which has smells,



such as rubber and engine oil, piped in. You then descend to the cars and motorbikes, which have been lent to the Experience from various places and owners, and which will also change regularly to keep things fresh. The ground floor is more open, giving visitors more freedom in where they decide to go.

It's hard to know where to look first. There's a circuit evolution screen, showing how much the British Grand Prix venue has changed in 70 years, a Race Day section that mimics a paddock, the Race Control area, marshals station, and you can even have a go at commentating. Medical staff and the press aren't forgotten, while dotted around everywhere are Legends stations, focusing on Formula 1 stars such as Stirling Moss, Jim Clark and Lewis Hamilton, as well as tin-top heroes including Jack Sears, Gerry Marshall, Andy Rouse and Jason Plato.

Perhaps the most important room comes next. Championshipwinning designer Mark Williams has helped with the interactive Tech Lab, which provides the important educational element and shows children the sort of exciting jobs they could aim for. "We want to inspire the next generation of engineers," asserts Reynolds. "We're not a museum and we're not just about motor racing."

This section explains how an engine works and has a windtunnel with a plane wing and a racing car rear wing, both of which you can manipulate to see how they react to the airflow. Tyres, gears, brakes, suspension — with simple demonstrations of wheels moving over bumps with no suspension, springs only, and spring and damper set-ups — are all explained in a simple and accessible way. You don't have to be an F1 designer to understand everything and to have a go with the experiments.

As well as ex-Lola and McLaren designer Williams, Sir Jackie Stewart, Karun Chandhok, Martin Brundle, David Croft and Murray



Walker have all made valuable contributions. Added to these are several F1 teams, including Mercedes, Red Bull, Racing Point, McLaren and Williams, along with companies Hewland Engineering, Premier Fuels and Grand Prix Racewear, which have helped in various ways.

"The industry may not fully understand the scale and scope of our ambition, but we've had massive support," says Reynolds, who believes more organisations will assist once they have seen it.

The highlight for many will be the era stations, which go from the 1940s to present. Each one has information screens, memorabilia (some of which are from the BRDC archive), and key machines from that decade. On Autosport's visit, Nigel Mansell's Williams FW14B had just joined an ex-David Coulthard McLaren in the 1990s section, while a Ford RS500 was next door in the 1980s area.

The Future of Motorsport section is next, before visitors head to the grand finale. At the very end, you'll be able to sit down in a cinema-like room to enjoy an Ultimate Lap of Silverstone, being onboard as key moments from the circuit's history take place around you.

The estimate is that visitors will spend a couple of hours there, but some will want to take longer. It's hard to see what more could have been included, but Reynolds hasn't run out of ideas. She wants to subsidise school trips in future and has a folder of other things to add to the Experience.

"Every couple of years we'll be able to build a new part of the exhibition," she says. "Everything we do poses a question. What's the problem and how do we solve it? That's what engineers do. It's the story of human endeavour, whether it's the drivers or aircrews."

The BRDC has been a big supporter, hence the archive being on loan — "hiding all the items away is not the right thing to do, we need to use them to excite people about motor racing" — but it should be noted that the Experience is not owned by the club or Silverstone. "None of the money we will make can, or should, go to Silverstone," says Reynolds. "It's to further our charitable objectives, which are independent."

It's clear that Reynolds, who has experience working at such major attractions as Legoland, has been the driving force behind the project. She does, however, point out that a museum and hotel were apparently discussed at a BRDC board meeting in 1971.

"You could say it's my vision, based on a long-held ambition," confirms Reynolds. "This project feels like my third child and it's definitely the most problematic! I'm so proud it'll celebrate something the UK is really good at. We lead the world at this and we don't tell people enough. I think this will help cement Silverstone's position at the heart of global motorsport."

Reynolds expects the Experience staff will probably end up numbering 30, plus volunteers to provide important stories and anecdotes, but its impact should indeed reach far further. If the Experience reaches its objectives, motorsport will finally have the sort of flag-bearer it deserves — and one that should inspire future generations of designers and engineers.

ROCKY ROAD TO SUCCESS



As is to be expected with a project the size of the Silverstone Experience, it hasn't always been a smooth journey since Sally Reynolds (above, right) applied to the Heritage Lottery Fund for a development grant in 2012. Although that was approved, the team had to raise money amid doubts that "made fundraising tricky", not least of which was the possible sale of Silverstone. "The project was stopped twice due to doubts, because of lack of funds," adds Reynolds.

When work finally began in March 2018, various issues were uncovered too, including hangar erosion.

"Three of the corners were completely eroded," recalls Reynolds. "My advice to anyone is not to refurbish a WW2 hangar! The engineer knew it was caused by acid erosion. For a long time there were just men in there working on aircraft, then there were men working as mechanics, so it was caused by 70 years of men peeing in the corners..."

Perhaps the highest-profile issue was when the main contractor, the Shaylor Group, went into administration. Although "it wasn't anything to do with this project", their problems caused delays and meant that the Experience couldn't open for the 2019 British Grand Prix as planned.

Fortunately, things were quickly restarted, largely thanks to Elmwood Projects, which took over as principal contractor. "We were back up and running in two weeks because of our amazing sub-contractors," says Reynolds. "There was no way it was never going to open."

Another helping hand came from the Heritage Lottery Fund, which lent extra money. "I didn't need a grant because I'll be able to pay it back," asserts Reynolds.

That confidence comes from some impressive numbers. Silverstone already has 900,000 unique visitors every year and 23million people live within two hours of the circuit, so the prediction is that 425,000 will pass through the Experience's gates in the first year.

"The project takes motorsport beyond the niche," adds Reynolds, who expects numbers to grow beyond the initial expectations. "It should appeal across a broad spectrum. I cannot wait to see people's reactions."

EXPERIENCE INFORMATION

Book in advance £20 adult (16+), £10 kids (5-15 years). Four years and under go free **Open every day** 1000-1800, last entry 1600 (closed Christmas day)

Entry to the Silverstone Experience during the circuit's major events is restricted, therefore if you would like to visit during these times you will be required to purchase an event ticket too.



Marquez gives Honda title at home, but Lorenzo

MOTOGP MOTEGI (JPN) 20 OCTOBER ROUND 16/19

If you thought Marc Marquez would sit around as the world goes by in the remaining races of the 2019 season, having secured his sixth MotoGP title previous time out in Thailand, his emphatic domination of the Japanese Grand Prix at Motegi proved you've another think coming.

Marquez still had two jobs left for the year ahead of Honda's home race: to win the all-important manufacturers' title for HRC, and complete its triple crown with the teams' title that he has single-handedly ensured remains achievable for the outfit.

Despite charging to pole, Marquez was wary of the threat posed by satellite SRT

Petronas Yamaha duo Franco Morbidelli and Fabio Quartararo plus works Yamaha rider Maverick Vinales. They stalked him on the grid, and practice pace suggested they were primed to attack.

Marquez got the jump on them off the line, though Quartararo would make a move stick into Turn 7 on the opening lap, having dispatched Morbidelli at the first corner.

The Honda rider retaliated only two corners later, and was thrown an opportunity when Quartararo had a moment on the front end on the way into the Turn 10 hairpin. Marquez built up a gap of over a second on lap two as Quartararo took a moment to recover his rhythm after his scare.

But the truth quickly became apparent as Marquez fired in a 1m45.803s: SRT rookie Quartararo "couldn't go faster" against the "super-fast" Marquez. Quartararo was able

to carve a few tenths out of Marquez's lead here and there, but every time he got the deficit to below a second the Honda rider would find at least 0.3s, before properly pulling the pin. And Quartararo's quest to try to reel in Marquez was only serving to chew up his soft rear tyre, while Marquez could give his medium option a bit more abuse.

Seemingly without effort — though he admitted his fuel situation was marginal, with his RC213V stopping on the cooldown lap — Marquez eased to his 10th win of the season and his 54th in the premier class, equalling five-time 500cc world champion Mick Doohan's total. In doing so, he also clinched the manufacturers' title for Honda, having scored 350 of its 356 points. Celebration erupted in the SRT garage also at the chequered flag, as Quartararo's sixth podium of a sensational maiden season officially crowned him rookie of the year.

Fading grip meant a charging Andrea Dovizioso on the Ducati was able to wipe out a four-second gap late on to put pressure on Quartararo, though he would ultimately have to settle for third behind the customer Yamaha rider. Dovizioso's lack of pace when grip was a luxury in the opening stages thwarted his progress, and he was forced to "brake like a stupid rider" when his pace improved to make up for lost ground. He came under intense threat from Vinales in the second half of the race, but the Yamaha rider could do nothing to





WEEKEND WINNERS

- 71.597 MILES)

MOTO2

Kalex

MOTO3

Honda

MOTEGI (JPN) Luca Marini (below) SKY Racing Team VR46

MOTEGI (JPN) Lorenzo Dalla Porta

Leopard Racing





must go

break Dovizioso's staunch defence, before settling into fourth.

LCR Honda rider Cal Crutchlow denied Morbidelli fifth on the line for his best result since August, with Suzuki duo Alex Rins and Joan Mir and Ducati pair Danilo Petrucci and Jack Miller completing the top 10.

While HRC celebrates its 25th manufacturers' crown, management's thoughts will have quickly turned to this weekend's Australian race. Ousted KTM rider Johann Zarco will step in for the injured Takaaki Nakagami at LCR for the rest of the year. Though not an HRC decision, it will no doubt be watching the rider it really wanted for 2019 intently. Jorge Lorenzo was once again over 40s down on Marquez at Motegi and out of the points in 17th — something which cannot be allowed to continue. Zarco's return may well be the end for Lorenzo at HRC, despite comments to the contrary from all parties.

Yamaha must also have been in a contemplative mood at Motegi. Valentino Rossi once more struggled to match the pace of his Yamaha colleagues all weekend, and was circulating in a lowly 11th when he crashed while chasing Petrucci.

As Quartararo continues to impress, fervent interest must surely be on the horizon from rival teams for 2021. Rossi's status as a MotoGP and Yamaha legend cannot be denied, but it must now call time on this enduring career to begin a new one.

LEWIS DUNCAN

RESULTS ROUND 16/19, MOTEGI (JPN), 20 OCTOBER (24 LAPS -			
POS	RIDER	TEAM	TIME
1	Marc Marquez (ESP)	Honda	42m41.492s
2	Fabio Quartararo (FRA)	Petronas Yamaha	+0.870s
3	Andrea Dovizioso (ITA)	Ducati	+1.325s
4	Maverick Vinales (ESP)	Yamaha	+2.608s
5	Cal Crutchlow (GBR)	LCR Honda	+9.140s
6	Franco Morbidelli (ITA)	Petronas Yamaha	+9.187s
7	Alex Rins (ESP)	Suzuki	+9.306s
8	Joan Mir (ESP)	Suzuki	+10.695s
9	Danilo Petrucci (ITA)	Ducati	+14.216s
10	Jack Miller (AUS)	Pramac Ducati	+18.909s
11	Pol Espargaro (ESP)	KTM	+25.554s
12	Miguel Oliveira (PRT)	Tech3 KTM	+27.870s
13	Francesco Bagnaia (ITA)	Pramac Ducati	+29.983s
14	Mika Kallio (FIN)	KTM	+31.232s
15	Aleix Espargaro (ESP)	Aprilia	+32.546s
16	Takaaki Nakagami (JPN)	LCR Honda	+37.482s
17	Jorge Lorenzo (ESP)	Honda	+40.410s
18	Karel Abraham (CZE)	Avintia Ducati	+43.458s
19	Hafizh Syahrin (MYS)	Tech3 KTM	+46.206s
20	Sylvain Guintoli (FRA)	Suzuki	+50.235s
R	Valentino Rossi (ITA)	Yamaha	20 laps-crash
R	Andrea lannone (ITA)	Aprilia	7 laps-crash
NS	Tito Rabat (ESP)	Avintia Ducati	hand injury

Winner's average speed 100.624mph. **Fastest lap Marquez** 1m45.766s, 101.540mph.

QUALIFYING 2 1 Marquez **1m45.763s**; 2 Morbidelli 1m45.895s; 3 **Quartararo** 1m45.944s; 4 **Vinales** 1m46.090s; 5 **Crutchlow** 1m46.189s; 6 **Miller** 1m46.337s; 7 **Dovizioso** 1m46.410s; 8 **Petrucci** 1m46.427s; 9 **A Espargaro** 1m46.558s; 10 **Rossi** 1m46.558s; 11 **Rins** 1m46.600s; 12 **Mir** 1m46.616s.

QUALIFYING 11 Crutchlow 1m46.695s; 2 Rins 1m46.964s; 3 Nakagami 1m46.998s; 4 Bagnaia 1m47.594s; 5 P Espargaro 1m47.654s; 6 Oliveira 1m47.894s; 7 Kallio 1m47.979s; 8 Abraham 1m48.121s; 9 Lorenzo 1m48.492s; 10 Syahrin 1m48.522s; 11 Guintoli 1m49.186s; 12 Iannone 1m49.243s.

RIDERS' CHAMPIONSHIP 1 Marquez 350; 2 Dovizioso 231; 3 Rins 176; 4 Vinales 176; 5 Petrucci 169; 6 Quartararo 163; 7 Rossi 145; 8 Miller 125; 9 Crutchlow 113; 10 Morbidelli 100; 11 P Espargaro 85; 12 Nakagami 74; 13 Mir 66; 14 A Espargaro 47; 15 Bagnaia 37; 16 Oliveira 33; 17 Iannone 33; 18 Johann Zarco 27; 19 Lorenzo 23; 20 Rabat 18; 21 Stefan Bradl 16; 22 Michele Pirro 9; 23 Guintoli 7; 24 Syahrin 7; 25 Abraham 5; 26 Kallio 2; 27 Bradley Smith 0.

MANUFACTURERS' CHAMPIONSHIP 1 Honda 356; 2 Ducati 270; 3 Yamaha 268; 4 Suzuki 201; 5 KTM 96; 6 Aprilia 68.



NEXT REPORT

AUSTRALIAN GRAND PRIX 31 OCTOBER ISSUE

Will Phillip Island signal a changing of the guard if Quartararo impresses again and Rossi and Lorenzo continue to falter?

Hamlin wins as **Elliott eliminates** Keselowski

NASCAR CUP KANSAS (USA) **20 OCTOBER ROUND 32/36**

Denny Hamlin was victorious in the NASCAR Cup race at Kansas as Chase Elliott edged Brad Keselowski out for the final playoff spot in overtime.

With 10 laps of the scheduled 267 to run, Elliott was three points below the cutoff line for the 'round of eight' stage of the title fight. Keselowski's Penske Ford Mustang sat perilously on the bubble, lacking pace while mired in the midfield but still on course to go through to the next round.

A series of cautions then followed that took the race to overtime, where the first attempt was interrupted by Darrell 'Bubba' Wallace Jr's car shedding a wheel and crashing – causing a chain reaction in which reigning Cup champion Joey Logano went



for a high-speed spin over the grass.

With Keselowski having a messy final restart and falling back to 19th, Elliott's second place got him into the next round by just three points.

Elliott is now the only Hendrick driver in title contention as both Alex Bowman and William Byron were knocked out.

Third and sixth places for Kyle Busch and Martin Truex Jr kept them in the title hunt based on their points from this round.

Erik Jones was seventh ahead of the highest placed Ford Mustang finisher, Clint Bowyer, in eighth – not good enough to prevent Bowyer's playoff elimination.

Bowyer's Stewart-Haas team-mate Kevin Harvick rose from last on the grid, after a driveshaft problem in qualifying, to ninth.

The drivers through to the 'round of eight' are: Hamlin, Truex, Ryan Blaney, Kyle Larson, Elliott, Kyle Busch, Harvick and Logano. **JAKE NICHOL**

Fraga rounds out inaugural Regional series in style

FORMULA REGIONAL EUROPEAN MONZA (ITA) 19-20 OCTOBER ROUND 8/8

Igor Fraga signed off the inaugural Formula Regional season in style with three poles in the dry and two wins in the wet at a processional Monza finale.

The Japanese-born, DR Formula-run Brazilian kept the Prema Powerteam machine of champion Frederik Vesti at bay throughout the opening race. It was just as well that he had a margin, as a lapse at Parabolica on the final lap sent Fraga wide, before he recovered. The



second DR car of Raul Guzman was third, while FIA F3 racer Andreas Estner made a decent Regional debut to claim fourth with Van Amersfoort Racing.

Fraga was absolutely dominant in race two to claim the honours by 13 seconds. That was largely down to a fine defensive drive from Guzman, the Mexican soaking up pressure throughout the race from Prema pair Vesti and Enzo Fittipaldi. The trio were close all race but didn't change order, while Niko Kari – another FIA F3 racer making a cameo, in his case with KIC Motorsport – was not far adrift.

Vesti crowned his season with another win in the finale. Fraga lay second for half the race from Fittipaldi, until the Ferrari junior got past at Parabolica. Fraga retaliated, but they depressingly both fumbled their braking at the Rettifilo and skipped the chicane, before series runner-up Fittipaldi made it stick at Roggia. At the same time, Kari was prising fourth place from Guzman. Fraga's results allowed him to wrest third in the points from a struggling David Schumacher.

motorsport.tv

Relive this race at Motorsport.tv

WEEKEND WINNERS

NASCAR CUP

KANSAS (USA)

Denny Hamlin Joe Gibbs Racing (Toyota Camry)

NASCAR XFINITY SERIES

KANSAS (USA) **Brandon Jones**

Joe Gibbs Racing (Toyota Supra)

FORMULA REGIONAL EUROPEAN

MONZA (ITA)

Race 1 Igor Fraga DR Formula

Race 2 Igor Fraga DR Formula

Race 3 Frederik Vesti Prema Powerteam

BRAZILIAN STOCK CARS

CASCAVEL (BRA)

Race 1 Felipe Fraga

Cimed Racing (Chevrolet Cruze)

Race 2 Atila Abreu

Shell V-Power (Chevrolet Cruze)

TITANS RALLYCROSS

ESTERING (DEU)

Race 1 Jerome Grosset-Janin

(Pantera RX6)

Race 2 Kevin Hansen (Pantera RX6)



For full results visit motorsportstats.com

DRY SUMP



EXHAUSTS



GEARBOXES

Gearboxman.com
COMPETITION TRANSMISSION SERVICES
Gearboxes & Axles for Road, Race, Rally and more
Telephone: 01582 840008 Fax: 01582 840007

HELMET GRAPHICS

Mike Fairholme Designs Sole approved painter of Arai helmets. Silver Birches, Corby Birkholme, Nr Grantham, Lincs NG33 4LE. Tel: 01476 550630. Fax: 01476 550029. email: fairholmedesigns@btconnect.com

www.fairholmedesigns.co.uk

MEMORABILIA



Motor Sport Legal Advice
Tudor Alexander, Ll.B Solicitor

07887 713512

MOTORSPORT LEGAL ADVICE

RACE PARTS





Passionate About Motorsport

| JJC | raceandrally.com

RACE PARTS









RACING







RACEWEAR



TRACK PREPARATION



TRAILERS & TRANSPORTERS



TRAILERS & TRANSPORTERS





MAUTOSPORT

TO ADVERTISE IN THE WEB DIRECTORY PLEASE CALL +44 (0) 20 3405 8109 OR EMAIL ads@autosport.com



HIGH QUALITY TRAILERS FOR CLUB, PRIVATE AND PRO MOTORSPORTS

Woodford covered trailers Superior in design, quality and finish



Woodford Trailers Limited | 14 Great Central Way, Daventry, Woodford Halse, Northants, NN11 3PZ | Telephone 01327 263384



Style and Substance

Introducing the new Race Transporter 6 by Brian James Trailers. An even more stylish and capable enclosed trailer specifically suited to car transportation.

New features include a standard automatic tilt-operation, invaluable for all professional motorsport or transport operations. An extra side access hatch door provides the ability to easily reach in for securing the standard equipment 'over wheel' strap system.

In addition, many new optional features are now available, all designed to offer the latest technology and improved convenience to all operators.

Race Transporter trailers are available from £ 7,699 + vat

Race Transporters are available ex-stock at many UK dealers. Please visit our website or call us for further details.



T +44 **(0)1327 308 833**

For more information and details on the Brian James Trailers range, please contact our head office





MAUTOSPORT

If you wish to advertise your products and services with Autosport in print and online please contact

> Ben.kavanagh@ motorsport.com

> > or call

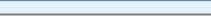
+44 (0) 20 3405 8109

RACE PRODUCTS



RACE PREPARATION









PHONE: 0161 440 7590

quote form on rallycar-insurance.co.uk

Authorised and regulated by the Financial Services Authority

RACE PREPARATION





CAR FOR SALE



MARDI GRAS MOTORSPORT

2A Brunel Close **Drayton Fields Industrial Est** Daventry NN11 8RB

tel: 01327 858006 fax: 01327 858800 email: info@mardigras.co.uk web: www.performanceclutch.co.uk

Distributors and agents for:





















FERODO RACING













FOR SALE



- IVA ready or to race
- Three year build
- Powder coated chassis
- Sierra IRS rear drums
- Sierra discs front
- New or refurbished parts
- Lowered seat pans
- Corbeau fibreglass seats
- Willans four point harnesses
- Type 9 gear box
- OBP pedal box with bias
- Fox racing alloys
- Ford ST 170 engine and shortened sump
- DanST fast road pack throttle bodies
- ME221 ECU
- New loom
- ETB instruments • HYBRID just mapped 225bhp at 7,400 rpm
- Safety Devices full cage

£9,500 o.v.n.o. 07975 602 331 (North Norfolk)

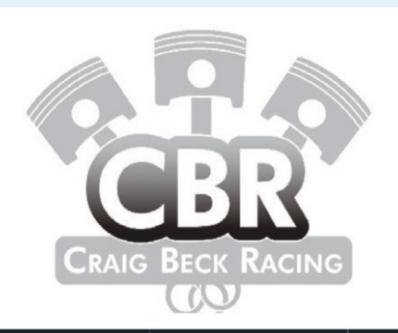
RACE PREPARATION











Historic Engine Specialists

Ford Cosworth BDA/BDG,

Lotus Twin Cam, BMW M10



Craig Beck Racing Ltd

T: 07876 221 932

E: craig@craigbeckracing.co.uk

www.craigbeckracing.co.uk







RECRUITMENT DRIVEN BY PASSION



Find your dream job

Here at Autosport we've been helping people find great jobs in motorsport for over 60 years. Today we're launching a new global motorsport jobs site, where you can:

- Find the latest jobs in motorsport
- Apply for a job with just one click
- Upload your CV and let recruiters find you
- Set up job alerts don't miss out on your dream move

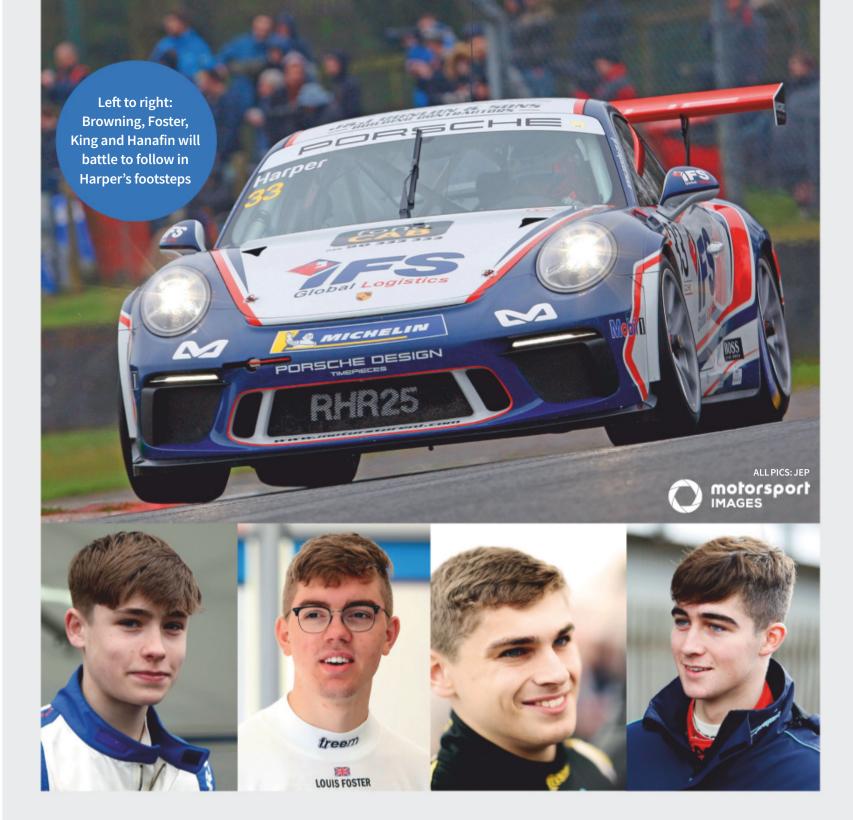
Register at motorsportjobs.com today



motorsport

Motorsport Jobs - A Motorsport Network Company

@AS_National 🖪 @AutosportNational CLUB AUTOSPORI ONAL RACING



PORSCHE GB JUNIOR FINALISTS ARE CHOSEN

PORSCHE CARRERA CUP GB

Four teenaged stars of the British Touring Car Championship's support series have been selected as finalists to become the new Porsche GB Junior.

Luke Browning, Louis Foster, Lorcan Hanafin and Harry King have all been selected to take part in the final shootout at Silverstone next week. Browning and Foster both impressed in British Formula 4 this season, with Foster retaining an outside chance of taking the title at the final round at Brands Hatch earlier this month. Hanafin was a multiple Ginetta Junior race winner this year, while King clinched the Ginetta GT4 Supercup crown at Brands in his second season in the category.

The four were chosen from over 40 applications, with the 10 best having interviews at the Porsche Experience Centre recently.

The previous three Juniors have all gone on to win the Porsche Carrera Cup GB championship. Current Junior Dan Harper was unstoppable on the way to the title this year, winning eight of the 16 races, matching the achievements of Josh Webster and Charlie Eastwood.

"It's a privilege to be in this position," said Foster.

"It should be a good shootout - it will be tough competition but the aim is to win it. I've been a massive Porsche fan all my life and I just love the car. When I saw this opportunity arise, I was quick to jump on it."

Browning is another who has long admired Porsche. "It's a massive honour — they're one of the biggest brands in the world," he said. "Porsches have always been my poster car - it's the only car I have on my bedroom wall, and I've always loved watching the races."

King added: "I've been working my way through the ranks of the TOCA package and I've seen the Carrera Cup cars in the paddock. I've looked up to them and I've always wanted it to be where I ended up. It's going to be really competitive with some really good drivers."

Hanafin is hoping to follow in the footsteps of Harper, who had also graduated from Ginetta Junior. "What Dan did was amazing — it's proven that Porsche do put their faith in young drivers," said Hanafin. "Dan was in the same shoes as me two years ago and it's such an amazing opportunity."

The winner will receive £85,000 towards their budget for the next two Carrera Cup seasons, as well as a wealth of support from the manufacturer.

STEPHEN LICKORISH

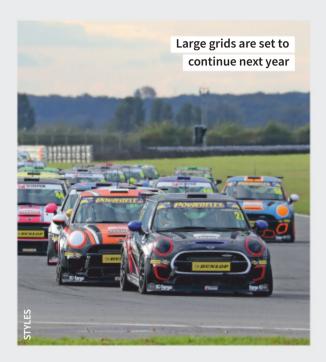
Mini JCW grid already nearly full for 2020

MINI CHALLENGE

The Mini Challenge JCW entry is already almost full for next season, when the category joins the British Touring Car Championship's support bill.

Despite the JCW season only concluding at Snetterton last weekend, over 30 entries have already been received for 2020 after applications opened earlier this month. Organisers have put in a number of incentives to help ensure a full grid for the series' first season on the BTCC package, including drivers competing in the category this year receiving 20% off entry fees for 2020.

"We put in a lot of work this year to spread the message of the Mini Challenge as being the place to race for drivers aiming for a career in touring cars, and all that effort has been rewarded with a near-capacity entry for our first year



as a BTCC support series — and it's not even November yet!" championship promoter Antony Williams said.

Although limited to 34 full-season entries, the series could feature larger grids at venues such as Silverstone and Donington Park next year where grid capacity is less restricted.

The JCW class is set to support the BTCC at eight events next year, while the Cooper category is due to appear at the other two meetings.



BRITCAR ENDURANCE

David Brabham and Will Powell will drive the new Brabham BT62 for its racing debut in Britcar, with the track car set to become a "permanent fixture" of the championship.

The BT62's 5.4-litre V8 will run a power-reducing ECU mode and weight ballast to bring performance in line with GT3 machinery, so the car will stay eligible for Britcar rather than competing in the 9-10 November twilight race on the Brands Hatch Indy circuit as a one-off.

Sporting director of Brabham Automotive and 2009 Le Mans 24 Hours winner David

Brabham said: "Driving a Brabham BT62 on Brabham Straight at Brands Hatch will be a very special moment for me. It will also be an incredible milestone for Brabham Automotive as it brings this iconic marque back to racing."

GT and prototype racer Powell will progress through the company's Driver Development Programme, which trains BT62 owners. "David and I have been doing all we can to prepare," he said. "It's been great to learn from him."

Autosport understands that the BT62 will undertake a full Britcar season in 2020 ahead of a World Endurance campaign in 2021-22.

MATT KEW

TCT BOSSES EYE MORE CURRENT BTCC CAR ENTRIES

TOURING CAR TROPHY

Touring Car Trophy boss Stewart Lines is targeting more entries from currentspecification British Touring Cars as several of the current crop bolstered the TCT grid at Donington Park last weekend.

TCT, which incorporates TCR UK, has struggled for entries this year, failing to reach double figures for any of its first four events. But Lines would like the 13-car Donington round, which was boosted by entries from Team Dynamics, Power Maxed Racing, Team Hard and Ciceley Motorsport, to be a blueprint for the series' future.

"The idea is that next year, if we run this, we run it like a B-series to the main series [BTCC]," said Lines. "Teams like Dynamics can bring their RML cars and then they can run it like a test programme, or maybe for a third driver to give them experience, and it won't interfere with the main series.

"It gives a chance for more drivers to come out, have a club race, and sample the car because it's a lot cheaper to race in this than BTCC."

Team Hard entered three of its Volkswagen CCs at Donington for Ginetta GT4 Supercup driver Darron Lewis and VW Cup racers Josh Coggan and Paul Taylor, while Lines himself was at the wheel of Rob Collard's BTCC Vauxhall Astra run by Power Maxed Racing. Will Neal drove his father Matt's Civic Type R FK8 (below).

A further addition was BTCC driver Adam Morgan, driving a second TCR-spec Cupra for Ciceley to assist James Turkington's successful title bid.

MARK PAULSON





BRDC BRITISH F3

The BRDC British Formula 3 Championship has unveiled the changes it will make to its cars for next year, including an IndyCarstyle fin in front of the driver.

The championship, which is run by MotorSport Vision, will retain the Tatuus-Cosworth cars first introduced in 2016, but they will be modified for next season.

The major change is an 'Advanced Frontal Protection' (AFP) which sits in front of

the driver and will help deflect debris and act as a secondary roll structure. Other changes include revised front and rear wings offering more downforce, bargeboards in front of the sidepods and a new engine cover featuring a shark fin.

MSV chief executive Jonathan Palmer said: "The existing Tatuus chassis has proven itself as a very dependable car with superb performance and our teams are extremely happy to continue using it. Working in coordination with the teams, we have agreed

on this upgrade package that ensures the car will remain at the forefront of European junior single-seater racing, while potentially unlocking a little more performance."

MSV approached teams about the changes, which cost in the region of £8000 to make, after it was decided to keep the car for 2020 instead of switching to a halo-fitted machine.

"We felt we needed to do something [regarding head protection] — we couldn't get the halo so the next best thing was to do that," said Lanan Racing team boss Graham Johnson.

Johnson also admitted that the extra downforce may not help with overtaking. "I don't think it's going to make them any worse [to overtake with] but it's not going to make them any better," he added.

But Douglas Motorsport chief Wayne Douglas believes that the change in bodywork could make it easier to pass. "I think there might be more drag so the slipstream could be bigger and there's more of a chance to pass," he said.

"The problem was on the old configuration we were maxed out on the rear wings 90% of the time, so this gives us a lot of options to change the cars. I don't think it will make a huge difference [to the performance] — you're probably talking a couple of tenths per lap at maximum."

Briton Oliver Clarke has become the second driver to sign up for the series next year, after agreeing a deal to drive for Hillspeed. He has spent the past two seasons racing in US F4.

STEFAN MACKLEY

Russell returns to his Lanan roots at test

Williams Formula 1 driver George Russell was at Donington Park last Thursday to support his former team, Lanan Racing, and offer advice to three potential BRDC British F3 recruits.

The 21-year old won the BRDC F4 title in 2014 with Lanan and returned to his roots by helping three F4 drivers — Australian

Bart Horsten, American Carter Williams and Briton Tommy Foster — at the test.

Russell said: "It's been great to see the Lanan boys again and see what's going on in the F3 paddock. It only feels like yesterday that I was last here! I stay in touch with Graham [Johnson, team boss] and the other guys even now."



Comprehensive motorsport insurance products to keep you on track;

- Accident damage On Track
- Liability
- **Ø** Rally damage On Event
- Personal Accident
- **Storage** and Transit
- Track day

Log on to www.ryanmi.com to obtain your online quote Email – info@ryanmi.com Tel – +44 (0) 1799 524202

Ryan Motorsport Insurance Limited is an appointed representative (557405) of Independent Broking Solutions Limited who are authorised and regulated by the Financial Conduct Authority. Its Financial Services Register number is 312026





Reynard targets more FF2000 outings in his last SF79 chassis

HISTORICS

Adrian Reynard finished sixth and fourth in last weekend's Historic FF2000 championship finals at Silverstone, first time out in his Reynard SF79.

The car is the last SF79 that Reynard built and the Silverstone outing has whetted his appetite, the 1979 Euroseries champion vowing to be nearer the front next year. He had previously raced James Lovett's SF78 at Brands Hatch in 2017.

"A guy called to say he had a chassis with my name on it, but it took me a year to see it," said Reynard. "I discovered it was the last 79 I made and couldn't resist it.

I've had it about six years, then found an engine, gearbox and bits. Ken Thorogood has rebuilt it over nine months."

Reynard tested the car on Friday, before qualifying fifth in the wet and then using Saturday's opening race as a shakedown.

"It was amazing that half the [33-car] grid were Reynards," he added. "Unfortunately, I had oil pouring over my clutch so couldn't get away properly at the starts, and had lonely races. What I did see was some fantastic drivers and I need to find a second a lap consistently to join them. Some of that's in me, some in the car, but I think we'll get there."

MARCUS PYE

Butcher moves into historic racing

HISTORICS

British Touring Car Championship driver Rory Butcher made his debut in the Peter Auto-run 2.oL Cup for early Porsche 911s at Paul Ricard last weekend.

Butcher, who won the 2019 BTCC Independent drivers' title, has previously tested pre-1966 two-litre 911s for marque specialists Tuthill Porsche and Classic Performance Engineering. He made his series debut

alongside William Paul in the Dix Mille Tours du Castellet event, which has been held since 2010.

"It's got just enough power to have a bit of fun," said Butcher, who finished eighth. "The brakes are really solid for a classic car and the balance is lovely. I'm gradually getting a handle on how to drive them."

Butcher and Paul also competed in a 1962 Jaguar E-type in the Sixties Endurance series, but had to retire the car 20 minutes from the end

due to a technical fault, after leading the race outright for over an hour.

The duo have a long-term goal to race at the flagship Goodwood events, if they do not collide with the BTCC calendar. "I'm getting more and more classic work coming my way and I'm keen to get a drive at Goodwood," Butcher added. "It's definitely an ambition of ours. It'll be an honour to get on the grid."

MATT KEW

IN THE HEADLINES

MARTIN SETS UP A TEAM

Aston Martin factory driver Maxime Martin is launching his own team for next season. The Belgian has set up the Martin Racing Team to run a pair of Aston Martin Vantage GT4s in ADAC GT Masters and the GT4 European Series. He has set up the operation with Thomas Matton, a mechanic with whom he worked at the RBM BMW DTM squad and at the Marc VDS team.

SUTTON'S KARTING SUCCESS

British Touring Car Championship racer Ash Sutton enjoyed a dream IAME X30 Super Shifter International Final debut at Le Mans last weekend by taking victory. "Karting was where it all began for me so it was great to go back to my roots and compete," said Sutton.

ADAM WINS ANOTHER AWARD

Four-time British GT champion Jonny Adam was recognised with the Allan Simonsen Award for a second time at series organiser SRO's prizegiving ceremony last weekend. He becomes the first driver to receive the award – for drivers who have shown the same speed and spirit that characterised Simonsen, who lost his life at Le Mans in 2013 – on more than one occasion, having also won in 2014.

THE REVOLUTION GROWS

Experienced sportscar racers Marcello Marateotto and Michel Frey have joined the board of fledgling prototype manufacturer Revolution. This year marked Revolution's first season of on-track racing with several cars competing within the new UK Sports Prototype Cup.

JSCC SCHOLARSHIP OPENS

The Junior Saloon Car Championship (below) has launched its 2020 scholarship, with one driver securing a fully funded season next year along with team support and a year's supply of Dunlop tyres. Drivers do not need an ARDS licence to apply for the scholarship, which is open to drivers aged between 14 and 17.





SILVERSTONE HSCC 19-20 OCTOBER

Silverstone's 1.64-mile National circuit — a triangle with the Brooklands-Luffield loop a sting in its tail — produces thrilling racing. Topped by two sensational Historic Formula Ford 1600 contests, Saturday's including an 11-car lead train, the Historic Sports Car Club Championship Finals event was exceptional. Four wins made Cameron Jackson top gun, to Andrew Hibberd's three, with doubles across the board elsewhere as titles were decided and lap records tumbled on the newly resurfaced track.

Double champ Jackson (Winkelmann),

poleman Linton Stutely (Royale RP3) and Classic Team Merlyn's Pierre Livingston, Ed Thurston and Ben Tusting's order chopped and changed through the opener, with ever more drivers — including Over 50s division stars Ted Pearson and Rob Smith (Merlyns) — linking up. Jackson beat Stutely by just 0.007 seconds, with Thurston, Livingston and O50 winner Brian Morris (Lola T202) in tow. "That was unbelievable; it was only looking back at Luffield that I realised how many were behind me," said Jackson.

Stutely and Jackson did most of the pacemaking in Sunday's finale, restarted after a first-lap *carambolage* approaching Maggotts eliminated Morris, Pearson, Tusting and Danny Stanzl (Elden). Both drafted back from fourth to lead within a couple of

corners. Livingston led onto the last lap, with Jackson, Thurston and Stuteley within 0.115s, but Jackson lunged into Brooklands ahead and held the resurgent Stutely off by 0.042s to add the Chris Mudge Memorial Trophy to his haul. Behind Matt Wrigley and Ross Drybrough, Smith set fastest lap in clinching the O50 title.

The Historic FF2000 counters were won by debutant Jake Byrne, who secured pole in the wet in a Reynard SF79. The Irish hotshoe started cautiously then shot ahead of Benn Simms and Andy Park, who sealed his fourth successive crown before his engine grenaded on Sunday.

Squeezed back to fifth on Saturday, Callum Grant led Sunday's contest brilliantly in father Nigel's Delta T78 and pushed the lap record below the sub-minute barrier, leaving it at 59.975s, only to be denied in a photo finish with Byrne and Ian Pearson (Royale RP30). A broken throttle linkage stopped Simms, while marque founder Adrian Reynard improved from sixth to fourth in a URS-restored sister of his 1979 EFDA Euroseries winner.

Sportscar specialist Ed Morris, another first timer, won the Classic F3 races superbly in Sean Walker's March 783, cutting a 58.737s best on Sunday. Simms (FF2000 Reynard) and the Racing for Britain Ralt-Toyota RT3s of Scots David Thorburn (ex-Martin Brundle) and Fraser Gray









SILVERSTONE WEEKEND WINNERS

HISTORIC FF1600

Races 1 & 2 Cameron Jackson (Winkelmann WDF2)

HISTORIC FF2000

Races 1 & 2 Jake Byrne (Reynard SF79)

CLASSIC F3/URS FF2000

Races 1 & 2 Ed Morris (March-Toyota 783)

XL AURORA TROPHY
Races 1 & 2 Matt Wrigley (March-BDG 782)

HISTORIC ES

Races 1 & 2 Andrew Hibberd (Brabham BT18)

GUARDS TROPHY

Michael & Andrew Hibberd (Lotus 23B)

FORMULA JUNIOR, FRONT-ENGINED

Races 1 & 2 Chris Drake (Terrier Mk4 S1)

FORMULA JUNIOR, REAR-ENGINED

Races 1 & 2 Cameron Jackson (Brabham BT2)

'70S ROAD SPORTS

Kevin Kivlochan (Morgan +8)

HISTORIC ROAD SPORTS

Kevin Kivlochan (AC Cobra)

HISTORIC TOURING CARS

Races 1 & 2 Richard Belcher (Ford Lotus Cortina)

CLASSIC CLUBMANS

Races 1 & 2 Mark Charteris (Mallock Mk20/21)

For full results visit: tsl-timing.com

(ex-Andrew Gilbert-Scott) led Saturday's pursuit. Steve Maxted, who started his Alfa Romeo-engined RT3 from the back then, wrested second from Thorburn on Sunday. In the URS FF2000 contests, Van Diemen RF82-mounted Tony Hancock and champion Ben Stiles each pipped the other.

Saturday's XL Aurora Trophy featured F2 men Tim de Silva (Chevron B35) and Matt Wrigley (ex-Mark Dwyer March 782) taunting Michael Lyons, who gave the series sponsor's hairy ex-David Hobbs F5000 Lola T300 a defibrillation. American de Silva's gearbox failed while leading and Lyons's diff waned, leaving Wrigley out front. Wrigley and the inspired Andrew Hibberd (F2 Brabham BT38) fought for supremacy on Sunday, Wrigley ambushing Hibberd in traffic on the final lap.

Hibberd won the 1000cc Historic F3 races with relative ease in his Brabham BT18 after outgoing double champion Jon Milicevic pulled his BT21 up with ignition problems. Simon Armer (March 703) outran Leif Bosson (BT28) to secure his second title, while Andy Jarvis provided the excitement in his 703.

Charlie Allison (Chevron B8) was first past the post in an entertaining Guards Trophy enduro, but a 30s penalty for exceeding the pitlane speed limit dropped him to fourth, bringing a surprise bonus for Michael and Andrew Hibberd (Lotus 23B). Safety-car timing torpedoed the aspirations of TVR Griffith pair Mike Gardiner and Josh Cook, as class winner Ross Hyett (Lotus Elan 26R) wrapped up the crown.

There were relatively straightforward Formula Junior clean sweeps for Chris Drake (Terrier Mk4), confirmed front-engined champion, and Cameron Jackson (Brabham BT2). Ray Mallock (U2 Mk2) and Tim de Silva (BT2) kept them focused. Andrew Taylor earned the overall FJHRA UK title after Cooper T56 scraps with Guy Sheppard, who pipped him on Saturday, and FIA Lurani Trophy class champion Crispian Besley.

Jumping from Morgan +8 to mighty AC Cobra, Kevin Kivlochan was Road Sports top dog in its '70s and Historic iterations, resetting lap records in both. In double champion Jeremy Clark's absence, and with Julian Barter (Lotus Elan) and Jim Dean (Europa) out early, he still couldn't relax; ex-marshal and Historic F1 racer Dave Karaskas (TVR 3000M), poleman John Williams (Porsche 911SC) and Nic Strong (Marcos 3000GT) mounted a grunty pursuit in the younger set.

Having Morgan Sparrow's lapped 911 between himself and Karaskas in the safety-car crocodile (while Mark Leverett's Elan was cleared from Copse) enabled Kivlochan to scarper at the green. Strong snatched third from Williams on the penultimate lap and shadowed Karaskas over the line. MGB GTV8 stalwart Mark Bennett growled from 20th to fifth.

The Historic race was even better,
Kivlochan knuckling down to shake off
the Morgans of Robin Pearce and Richard
Plant through traffic. Pairs of Elans
(Jonathan Rose and Robert Rowe) and
Ginetta G4s (Mark Godfrey and Shad Eddin)
consolidated into a four-way scrap for
Class C and the minor places. Godfrey
shaded Rose for fourth, while other match
races — the best between Tom Andrew
(Jaguar E-type FHC) and Paul Kennelly
(Austin-Healey 100M) — caught the eye.

Bob Bullen became the first Ford Anglia driver to win the Historic Touring Car championship since Dan Cox in 2005 with measured class victories rather than fighting Lotus Cortinas. Rick Belcher was just beyond reach in his two-litre version, while Bullen's title rival Roger Stanford tussled with David Hall and impressive HSCC debutant Jack Moody in the 1600s.

With the Classic Clubmans A-Sport title sewn up, serial victor Mark Charteris pared the record to 57.488s on Avon tyres. Barry Webb survived a first-race scrape with Roger Waite's Sports 2000 Royale, which tagged second-placed John Harrison, lapping them, to bag his 19th title from under omnipresent Stephen Littler's nose in the FF1600-engined division.

MARCUS PYE

It's another Turkington tin-top title

DONINGTON PARK BRSCC 19-20 OCTOBER

It's been a successful couple of weeks for the Turkington family. Seven days after Colin claimed the British Touring Car Championship title in dramatic fashion, his younger brother James was crowned TCR UK champion, as Adam Morgan and Henry Neal shared the race wins.

Laden with 60kg of ballast as a result of winning the previous round at Brands Hatch, Turkington could only drag his Cupra TCR to seventh on the grid for the first Touring Car Trophy race, slowest of the TCR cars. Chief rival Lewis Kent was also struggling, with 48kg on board his Hyundai i30 N, but produced a lap at the death good enough for fourth. Damage limitation was Turkington's aim in the opening race, but a number of incidents left him running fourth, and second registered TCR UK runner.

First Kent slid into Will Neal after muddying his tyres through the opening turns, then Darelle Wilson turned around polesitter Henry Neal shortly after receiving a drivethrough penalty for moving before the start. As newcomers Morgan (Cupra) and the unrelated Alex Morgan (Renault Megane) eased home first and second, Kent mounted his recovery. He passed Turkington around the outside through the Craners on his way to third, as Turkington – further hindered by an earlier hit from behind – lost out to Henry Neal's NGTC-spec Honda and the TCR Opel of



Wilson in the final yards, slipping to eighth.

"It's better losing one place than not finishing," said a philosophical Turkington. His lead cut, Turkington needed to finish on the TCR podium if Kent won the finale. But fourth in class proved enough as, having finally demoted Alex Morgan, Kent could not catch TCR leader Adam Morgan.

Henry Neal raced to a dominant outright win to make up for his earlier disappointment. "I knew I just had to keep it clean on the first two laps, not get involved in anything silly and keep a couple of the TCR cars behind me," said a delighted Turkington. "I'm chuffed to bits."

But for Aidan Hills's heroics, Luke Herbert's third consecutive Mazda MX-5 Supercup crown might have been celebrated with a hat-trick of wins. Herbert's title rival Jack Harding won race one on the road before being penalised for cutting the chicane as he passed Herbert on the final bend. Harding felt hard done by in race two as well, squeezed onto the grass in a three-wide battle on the Exhibition Straight, as Herbert clinched the crown with victory.

A heavy rain shower in the finale caught out many, as Hills lost the lead to a trip through the McLeans gravel trap. With half the field following suit he rejoined in third, albeit six seconds down on squabbling leaders Simon Baldwin and Herbert. In "the best race of my life", Hills chased them down to win, with Baldwin just edging Herbert for second.

Already crowned Civic Cup champion, Lee Deegan displayed his prowess with two emphatic wins. But Deegan's second win from 10th on the grid was arguably outshone by Bruce Winfield's charge



DONINGTON PARK WEEKEND WINNERS

TOURING CAR TROPHY/TCR UK

Race 1 Adam Morgan (Cupra TCR)
Race 2 Henry Neal (Honda Civic Type R FK2)

MAZDA MX-5 SUPERCUP

Races 1 & 2 Luke Herbert
Race 3 Aidan Hills

CIVIC CUP

Races 1 & 2 Lee Deegan (EP3)

BMW COMPACT CUP

Races 1 & 2 Steven Dailly

PORSCHES

Race 1 James Coleman (Boxster)
Race 2 Garry Lawrence (Boxster)

CLUBSPORT TROPHY

Bruce Winfield (Honda Civic EP3)

ALFA ROMEOS

Races 1 & 2 Graham Seager (GTV)

OSS

Race 1 Mike Jenvey (Jenvey-Gunn TS6)
Races 2 & 3 Patrick Sherrington (MCR Sport)

TRACK ATTACK

Race 1 Richard Hockley (Honda Civic)
Race 2 David Baldwin (Renault Clio)

For full results visit: tsl-timing.com

to second from 21st.

Contact with Daniel Reason had pitched Winfield into the Old Hairpin gravel in race one. Reason, who finished second, successfully appealed his grid penalty and points deduction, then steered clear of trouble to finish fourth in race two, enough for second in the championship.

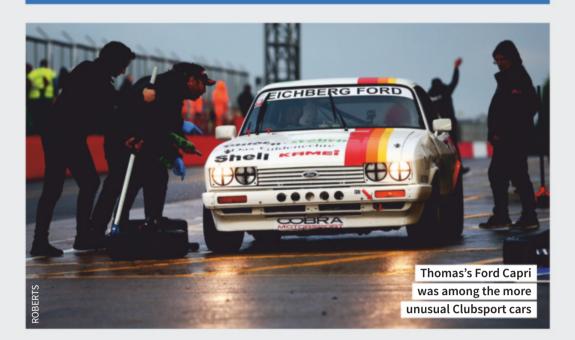
With wins seven and eight of 2019, Steven Dailly clinched a third consecutive Compact Cup crown in convincing fashion. Title contender Ian Jones beat Dailly to pole position but excursions at the Old Hairpin dropped him to an eventual fourth behind Tom Griffiths and Matt Parkes in race one.

Parkes looked set to win second time out until he put a wheel on the wet grass and spun exiting Coppice. He was later excluded from second for failing to release his car for post-season scrutineering. Mikey Doble scored a maiden podium as the Griffiths/Jones battle got physical.

Garry Lawrence secured the Porsche championship by chasing down and passing Richard Avery, in the car started by fellow returning champion Ed Hayes, in the series' first-ever 40-minute mini-enduro, which closed its season. Lawrence had lost out in the sprint race to James Coleman, another of the returning drivers who boosted the entry, with Hayes second.

MARK PAULSON

GOING FROM STRENGTH TO STRENGTH



The second edition of the new Clubsport Trophy proved as popular as July's inaugural event at Brands Hatch and attracted an even more eclectic field.

Among the capacity entry were the rare Caterham 21 of David Fender, and Mark Thomas's Group 1 Ford Capri. "It's 'Group 1.5' at the moment," said Thomas, owing to the three-litre V6 'Essex'-engined machine's uprated brakes, "but it can be Group 1 spec."

He bought the car from Classic Touring Car Racing Club competitor Jeremy Knight and spent a year rebuilding it. Newly resplendent in a livery matching that of the 1982 Nurburgring 24 Hours winner, Thomas debuted the car alongside father Dave, the 1990s Thundersaloon racer, at the Spa 3 Hours in June, before its second outing at Donington.

"It's doing well for an old car," said Thomas, who qualified eighth overall in the 40-car field, before slipping to 17th in the heavy rain of the race, which suffered the weekend's worst weather. "It's 40 years old and it's not easy to drive! I hope it will encourage other people to turn up with different cars."

Thomas plans to contest the full complement of Clubsport Trophy rounds in 2020, with dad Dave likely to bring his



Mk1 Capri too, as well as having an eye on the Gerry Marshall Trophy at Goodwood.

With fewer than 50 examples built to celebrate Caterham's 21st anniversary in 1994, the Caterham 21 was effectively a Series-3 Caterham 7 with fully enclosed bodywork. Fender, a former engineer with MG Rover, started building his example from an insurance write-off when he retired in 2011.

"It's all little bits and pieces of bespoke engineering that's taken me a few years to get to how I like it," said Fender. "It didn't have a hard top and it had a lot of rear-end lift, so I made a hard top for it."

The car runs a Rover K-Series engine and a six-speed Caterham gearbox, delivering around 160-170bhp to the wheels while weighing only around 700kg. Fender, who had previously given the car a handful of outings in the 750 Motor Club's Roadsports series, could only qualify 33rd before a couple of off-track excursions led to his retirement from the race.

The event's pacesetters were drivers doubling up from the Civic Cup. Bruce Winfield made amends for losing out to Paul Sheard's Mazda MX-5 on the final bend of the last lap at Brands Hatch with a resounding victory over Ben Sharpe.

A fast-closing Paul Taylor had to settle for third after running out of laps to make up for the extra time spent in the pits to switch to rain tyres. Top non-Honda was Ben Buckley's Caterham 270R in fourth.

"Brands Hatch was a bit hard to swallow," admitted Winfield, "but [this race] was good fun – apart from not being able to see very well! We're going to be doing Civic Cup next year so if the two are on separate days like they are here then we'll probably do them."

MARK PAULSON



SNETTERTON MSVR 19-20 OCTOBER

A winning double for Nathan Harrison in the Mini Challenge JCW finals at Snetterton still wasn't enough for him to stop the title going to James Gornall.

Ben Palmer extended a lead in the opening race after passing Harrison into the Wilson hairpin on the opening lap. But "it was hard staying out there on my own," admitted Palmer after Harrison closed the gap. After a mid-race battle for the lead,

Harrison stretched out a decisive advantage. Palmer was a clear second, while Gornall spent the final laps holding off a determined Dan Zelos, this duo having formed part of a four-car train for the lead earlier in the race.

Jack Davidson was excluded from fifth after contact, which left Max Bird and Harry Gooding to complete the top six.

With the top seven reversed for the race-two grid, there were bound to be fireworks. Gooding soon went sideways and tumbled down the order, and Davidson had just lost the lead to Harrison when the safety car came out. When the green

flag flew, Harrison eased himself clear for win number two.

After Gornall had made it into second, that left a huge scrap for third. Davidson went off at the Bombhole on lap eight, which allowed Rory Cuff to claim the final podium place from Lewis Brown, Tom Rawlings and Palmer.

There was a masterclass from newly crowned Radical SR1 Cup champion Shane Stoney. Once he had held off Ross Elliott at Riches on the opening lap of race one, he romped away to victory by over 16 seconds. Elliott and Will Hunt held station behind, despite running in close formation with Matt Iones, James Pinkerton and Dean Warriner.

Stoney had to give best to Elliott initially as the second race got under way, but first-corner contact had put Jones out, requiring a one-lap safety-car intervention. There was an immediate break from the green flag, with Elliott, Stoney and Warriner dropping the pursuers. Before the lap was completed, Stoney had stormed ahead of Elliott to build a 20s winning margin over Pinkerton and Warriner, with Elliott fourth.

Despite running wide at Wilson on the first tour of the opening Mini Challenge Cooper Pro/Am race, Robbie Dalgleish had clawed his way back to lead by the end of the lap. Dominic Wheatley pushed him hard, however, and their duel allowed Toby Goodman to join them, with Goodman splitting the duo on lap five of seven.

With a lap to go, Wheatley surged



SNETTERTON WEEKEND WINNERS

MINI CHALLENGE JCW

Races 1 & 2 Nathan Harrison

RADICAL SR1 CUP

Races 1 & 2 Shane Stoney

MINI CHALLENGE COOPER PRO/AM

Race 1 Dominic Wheatley Race 2 Lydia Walmsley

F3 CUP

Race 1 Darragh Daly (Dallara F308) Races 2 & 3 Stefano Leaney (Dallara F317)

RACING SALOONS

Races 1 & 2 Brian Jones (BMW E36 M3) Race 3 Jamie Jeffrey (BMW Z4)

MINI CHALLENGE - COOPER S

Races 1 & 2 Daniel Butcher-Lord

PRODUCTION BMWs

Races 1 & 2 Matthew Swaffer Race 3 Ross Stoner

Races 1 & 2 Jamie Jeffrey (BMW Z4)

For full results visit: tsl-timing.com

past them both on the Bentley Straight to claim victory, with Dalgleish just holding off Goodman, as all three took the flag covered by 0.578s. Archie O'Brien was a comfortable Am winner.

Although it was a lights-to-flag maiden victory for Lydia Walmsley in race two, she had Dalgleish inches behind throughout. Their duel also allowed Goodman to join them. He started the last lap in second, before Dalgleish snatched it back to be crowned 2019 champion. Wheatley grabbed a late third, as both he and Alex Nevill made the most of Goodman's aborted lead challenge, while Andrew Langley topped the Ams.

There was some close racing among a thin F₃ Cup field. Darragh Daly took Shane Kelly on the second lap to win race one, from Stefano Leaney and Cian Carey, before Leaney dominated race two as Daly and Carey disputed second.

Although Leaney took a second win in the finale, he couldn't shake off Carey, who clinched second over Daly to take his second consecutive title.

Brian Jones had waited 10 years for his first win, then took two Racing Saloons victories in his BMW M3, after Cliff Pellin's Ford Fiesta retired from a comfortable race-one lead having lost drive. Jamie Jeffrey's BMW Z4 chased Jones all the way to the flag in race two, before reversing the positions in their third and final race.

PETER SCHERER

DWINDLING NUMBERS DON'T LIMIT THE EXCITEMENT IN THE F3 CUP



The F3 Cup has suffered from diminishing numbers in recent years and, for its season finale at Snetterton, could only muster an eight-car grid.

It's only a few seasons since the equivalent race not only was well into double figures, but also sported Red Bull Juniors Carlos Sainz and Antonio Felix da Costa in preparation for their Macau Grand Prix appearances.

As well as running a BRDC British Formula 3 team, Chris Dittmann is the 2012 F3 Cup champion and has run Cian Carey, who took his second consecutive title over the weekend. "I normally run Cian and three other cars," Dittmann explained. "They are great cars to work on and we have been involved with the championship since I won it in 2012. It's customers that own the cars, though, rather than the team, and we run them, so it's about a quarter of the cost of a BRDC F3 season.

"You can run a Dallara F317 Europeanspec car, but they are mostly the older F312. It's the same basic chassis, really, with a few modifications, but whatever the make of engine, they are all sealed, which helps keep costs down."

Dittmann adds the cars are great to drive. "They're unbelievable to race, proper race cars and the corner speed is mindboggling," he said.

So why are there so few cars on the grid, when the opportunity is there to race the fastest single-seaters in the UK?



CF Racing's Hywel Lloyd, an ex-Formula Renault champion who raced in the original British F3 Championship for a number of years, believes one factor is it takes a while for new drivers to get up to speed. "The cars make it, but the cost, the performance and the chance to race a proper full-spec F3 car that's affordable for the gentleman driver makes it attractive]," he said.

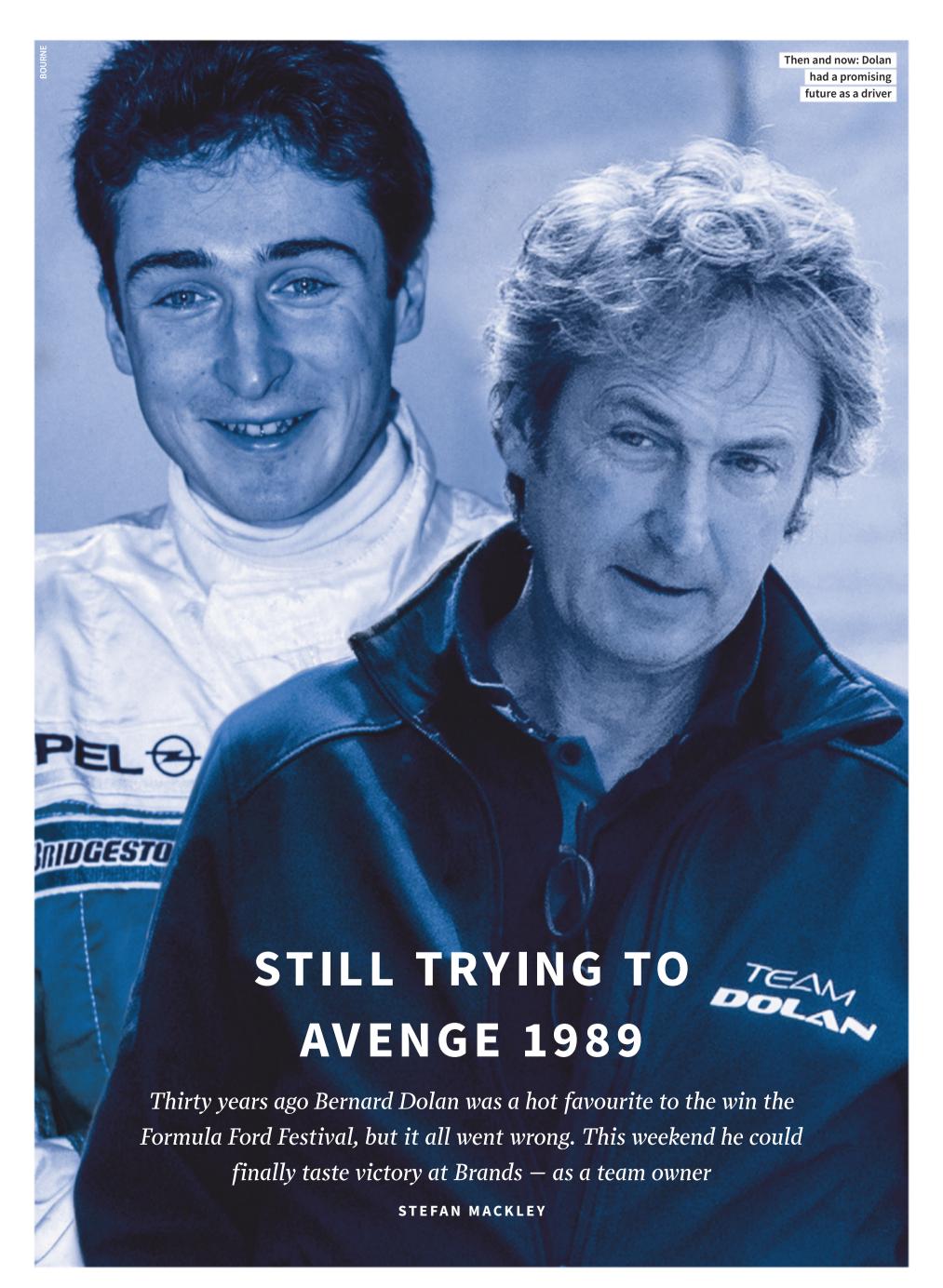
"Some drivers have stuck with it for years, like Stuart Wiltshire and Tony Bishop, but you can't just come in for one year and expect to be champion and move on. It's hard for new people to fulfil their hopes, but if they stick with us they will get there."

The consensus among drivers and teams is that the championship needs promotion. "The plans are hopefully there for next season," Lloyd added. "We know there are enough cars out there and there's a possibility that the current-spec cars will be allowed, as they will be redundant with the **European Championship changing** cars [Euroformula Open will switch to a new Dallara machine next season]."

Other options discussed have been a tweaked class structure to attract owners of F3 cars who may race elsewhere. There has already been a structure in place with a Trophy Class for cars from 1981 to 2007, the Cup Class open to those from 2008 to 2016 and the Open Class for post-'97 chassis. On only a few occasions has anyone raced outside the Cup Class, and at Snetterton all eight cars were in that class.

Regardless of the structure, it's more entries that the series needs. And the teams are adamant that it's still a great place to race. "What else can you drive that fast as a gentleman driver in national racing?" Lloyd concluded.

PETER SCHERER



his weekend one of the best events on the national motorsport calendar takes place at Brands Hatch — even if, as highly anticipated as it is, it isn't as big as it was in its heyday. From the 1970s to the 1990s, the Formula Ford Festival attracted future Formula 1 stars from the UK and abroad, sometimes with as many as 200 drivers battling it out from the heat stages. Among those who won it are Johnny Herbert, Mark Webber and Jenson Button.

Thirty years ago, Irishman Bernard Dolan was one of the Festival favourites, and today he is back on the scene at the event as the chief of his Team Dolan squad. In 1989, Dolan was one of the hottest young prospects in junior single-seater racing, and claimed the RAC British Formula Ford Championship with the works Fulmar Racing Reynard team. But it was victory at the Festival that was his ultimate goal.

"Back in those days, the Festival was probably the most important race to win — a lot of drivers got breaks from winning the Festival," says Dolan. "I know it sounds strange but I put it above the championship, really."

Dolan would be racing against the brightest Formula Ford talents. His team-mate was future Indianapolis 500 winner Gil de Ferran, and also among the field were Van Diemen team leader Niko Palhares — who ultimately won the Festival — newly crowned Junior Formula Ford champion David Coulthard and hard-racing category stalwart Dave Coyne.

Throughout the weekend Dolan was on fire, winning his heat, quarter-final and semi-final, as well as setting the first sub-48-second FF1600 lap of the Brands Hatch Indy circuit. He was on pole position for the final, but then it started to rain...

Instead of switching to softer springs and shocks on his Reynard 89FF, Dolan claims the team was focused on moving de Ferran's engine into another Reynard driver's car, after the Brazilian had failed to make it through his semi. "The team didn't have enough time to change my car to a wet set-up, basically," laments Dolan. "When I was getting bolted in the car we ran through a few things with the mechanic and they said it hadn't been done, so I knew there and then that we weren't on the correct set-up. The traction was so bad, in fourth gear I was getting wheelspin along the straights, and I got left for dead off the startline."

From pole, Dolan dropped down several spots before even reaching Paddock Hill Bend. Any chance of victory was gone and, after an excursion through the gravel, he eventually salvaged sixth place.

"That really hurt, that's probably the biggest one that got away, considering where I was an hour before that — the pace that we had, no one could live with us," says Dolan. "Those opportunities only come once in a lifetime, realistically, and it was gone. I knew that if we won the championship and won the Festival, the likelihood is you would have got picked up by somebody."

His racing career arguably never recovered. Dolan tried to move





"EVEN THOUGH I'M NOT RACING THE CAR, I DO GET A KICK OUT OF IT AND IT GIVES ME A DRIVE TO WIN"

into the British Formula 3 Championship, but the required sponsorship for Dolan didn't materialise. Instead, he moved into the Opel Lotus Euroseries with Peter Thompson Motorsport. He showed sporadic flashes of pace, securing several podiums, but was sacked before the end of the year after discussing options with rival team Draco Racing — which won the 1990 title with Rubens Barrichello — for the following season.

"The rule was that if you finished in the top three [in the standings] you weren't allowed to stay in the championship [the next year]," says Dolan. "The team [PTM] thought, because I'd had discussions with another team, I wasn't putting the effort in, but that wasn't the case at all."

For 1991 he finally got his break in British F3 with Racefax, which was using a Reynard chassis powered by a Mazda engine. But Dolan could never challenge at the front due to the down-on-power Mazda and even persuaded the team to try different manufacturers. Downbeat with the car's performance, he walked away.

"I couldn't raise the necessary finances to continue in it, and it was going to frustrate me if I tried to hang around and try to pick up drives here and there, not try to progress," he says. "It would just basically kill me, so I just walked away from it."

There was one more outing at the Festival in 1993 with Swift, in which he took 10th place, but after that Dolan returned to Ireland and shut himself off from racing. He arguably would have stayed in obscurity had a friend not asked him to help his son in Formula Ford in the early 2000s.

Over the following years, he became more involved in the sport, helping to run cars, and was part of the Motorsport Ireland Young Driver of the Year programme for three years. Last year he moved his Team Dolan squad to the UK, and it's now based at Snetterton in the old Van Diemen factory.

With Niall Murray, the team won the National Formula Ford Championship in 2018 and came within a whisker of winning the Festival, too. Dolan returns to the event this year with Ross Martin having wrapped up the National title, and perhaps nothing could be more fitting than a Festival victory 30 years after the most bitter of defeats.

"Even though I'm not racing the car, I do get a kick out of it [managing a team] and it gives me a drive to win," he explains. "You get that passion to win and you try and get the team to have that drive and passion. I'd never turn my back on Formula Fords — I'll always have a soft spot for them." **



WHAT'S REQUIRED TO WIN?



BOOK
JENSON BUTTON:
HOW TO BE AN F1 DRIVER
RRP £20.00

Jenson Button has proved to be a prolific author in the short time since he stopped racing Formula 1 cars.

Jenson Button: How to be an F1 driver is the follow up to his autobiography,

also released by Blink Publishing. As the title suggests, it focuses less on his individual experience and specific tales from his career — as he points out, there's another book for that — and more on the life of a grand prix driver on and off track.

"It's not a book for kids coming through motorsport to learn what to do to improve themselves to be a Formula 1 driver, although I'm sure it could be, but it's more for adults that maybe understand the sport in a very different way to people that are involved in it," says Button. "It's more about behind the scenes of what a driver goes through. My previous book was very personal to me and this is more of a book about F1."

The book is aimed at a broad audience, although that's not to say it doesn't have something to offer a very knowledgeable fan. The 'how to be a...' style is well-established — chatty, fast-moving, easy to read and covers a lot of ground. You're as likely to learn about how Button once owned an ex-Jimmie Johnson motorhome or how much he paid for his first yacht as you are driving technique and what happens in the garage. But it's all there in snappy chapters.

While it doesn't tell the story of Button's career, there are some revealing snapshots that do add a little insight to specific incidents or campaigns. For example, he mentions that the raised front of the cockpit of the 2014 McLaren compromised his visibility and therefore precision, and also suggests Fernando Alonso's biggest frustration at McLaren in 2007

was Lewis Hamilton cribbing from his data to short-cut the learning process. But overall, the effect is of a more human insight into those in the cockpit.

"It was really fun to write because there are so many memories of the last 17 years and ways I've done things that have been right or wrong that you've learned from," says Button. "It's a book for people to understand the sport better. I think the Netflix programme is very good because it brings people into the sport, they see the personalities. But I think that there are still many areas that people don't get to see or don't understand and they don't know where to ask the question."

This book certainly answers many of those questions, albeit not in enormous depth. As Button himself points out, some of his rival drivers might be surprised at how basic some of the explanations about driving technique are — which in itself reveals the shortfall in the understanding of much of the F1 audience into what's going on behind the wheel.

But there are also fascinating insights, such as Button's admission that he finds it harder to set up his Super GT Honda because it relies far more on mechanical grip than an aero-dependent F1 car does. He also offers a glimpse into the battles inside a driver's head with references to anxiety and the effect of the pressurised environment of F1. In that regard, the book really does deliver on its title by covering a huge amount of ground — many of the chapters could be the basis of a whole book in themselves.

It's not a book for the ages; it's not the definitive work looking inside the mind, techniques and experiences of a world champion — but it's not meant to be. It's a fun, easy-to-read and lively look at what it is to be an F1 driver. And for that reason, it probably has something to offer anyone who enjoys watching a grand prix on a Sunday afternoon regardless of their depth of knowledge — even if the hardcore Autosport reader will likely crave a little more depth.

EDD STRAW



youtube.com/AUTOSPORTdotcom





A Formula 1 test deal catches the eye but doesn't always lead to a more permanent arrangement. Autosport looks at nine particularly high-profile drivers who had a brief try-out with a team, but didn't end up signing a proper deal. Go to bit.ly/oddF1tests



WHO IS THE BEST BTCC DRIVER EVER?





This week on the Autosport podcast, the team makes a case for who they think is the best British Touring Car Championship driver of all time. What's more important: is it the tally of race victories, or the number of championship titles accrued?

WHAT'S ON

INTERNATIONAL **MOTORSPORT**

Mexican Grand Prix

Formula 1 World Championship **Round 18/21**

Mexico City, Mexico

27 October

Live Sky Sports F1, Sun 1830

TV Highlights Sky Sports F1, Sun 2230, Channel 4, Sun 2300

Porsche Supercup

Round 9/9

Mexico City, Mexico

26-27 October

TV Live Eurosport 2, Sat 2015, Sky Sports F1 2100 (delayed), Eurosport 2, Sun 1600, Sky Sports F1, 1615

Rally Spain

World Rally Championship Round 13/14

Salou, Spain

25-27 October

Live BT Sport 3, Sat 0930, Red Bull TV, Sat 1420, BT Sport ESPN, Sun 0730, 1100

TV Highlights Red Bull TV, Fri 2100, BT Sport 2, Fri 2200, Red Bull TV, Sat 2100, BT Sport 1, Sat 2130, Red Bull TV, Sun 2100, BT Sport 1, Sun 2230, 5Spike, Mon 1855

Live coverage on wrc.com All live service via WRC+

World Touring Car Cup

Round 8/10 Suzuka, Japan

26-27 October

Live Eurosport 2,

Sat 0650, Eurosport 1, Sun 0100, 0215

Livestream

Motorsport.tv, Fri 0500, 0730, Sat 0705, Sun 0100

Super Formula

Round 7/7

Suzuka, Japan

27 October

Livestream

Motorsport.tv, Sun 0500

Formula Renault **Eurocup**

Round 10/10

Yas Marina, UAE 25-26 October

European Le Mans Series

Round 6/6

Algarve Circuit, Portugal 27 October

Australian Supercars

Round 13/15

Surfers Paradise, Queensland, Australia

26-27 October

Live BT Sport 1, Sat 0500, BT Sport ESPN, Sun 0500

NASCAR Cup

Round 33/36

Martinsville, Virginia, USA 27 October

Live Free Sports, Sun 1830

NASCAR Truck Series

Round 21/23

Martinsville, Virginia, USA 26 October

MotoGP

Round 17/19

Phillip Island, Victoria,

Australia

27 October

Live BT Sport 2,

Sun 0330

TV Highlights BT Sport 3, Sun 1300

UK **MOTORSPORT**

Oulton Park BARC

26 October

Britcar Endurance, Clio Cup, Sports/Saloons, **Mighty Minis**

Silverstone 750MC

26-27 October

Birkett Six-Hour Relay, BMW Car Club Racing, Classic Stock Hatch, Club Enduro, Hot Hatch, Roadsports

Brands Hatch BRSCC

26-27 October

Formula Ford Festival: FF1600, Classic FF1600, Sports 2000, Irish Supercars/ Global Lights, Ford Fiestas, Fiesta Junior

Donington Park CSCC

26-27 October

Jaguar Saloons and GTs, Tin Tops, Swinging Sixties, Future Classics, Magnificent 7s, Modern Classics, Classic K, New Millennium, Turbo Tin Tops



THE WORLD OF MOTORSPORT DIRECTLY TO YOU



Unlimited Access

to the world's best motorsport journalism

Breaking News

Smart Insight

published daily

Enhanced Experience website at full performance

All the Teams

all the drivers, all the controversies

SUBSCRIBE TO OUR PRINT BUNDLE

Printed + Digital Magazine + Autosport Plus

£42.99 a month

SUBSCRIBE ONLINE:

www.autosportmedia.com/offer/ASP19ONE

SUBSCRIBE TO AUTOSPORT PLUS

Read magazine features online with Autosport Plus for just

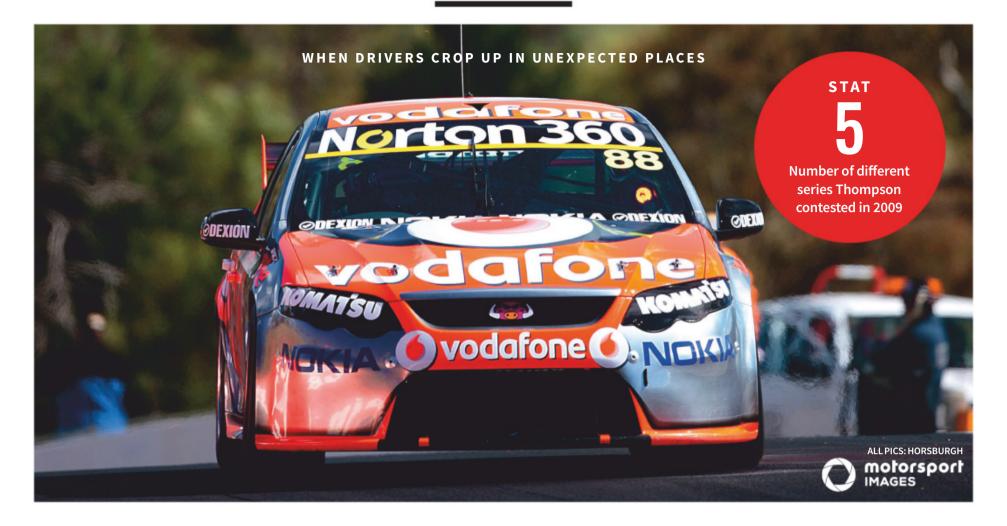
£4.99

a month

SUBSCRIBE ONLINE:

autosport.com/plus





JAMES THOMPSON

A forgettable result that will live long in the memory

MATT KEW

ames Thompson at the wheel of a tin-top — it hardly has the makings of a classic Have-a-go Hero entry.

This venerable touring car ace raced with a roof over his head from 1994 through to 2018. But within that, there are two notable anomalies.

In 2000 he undertook a part-time campaign in the DTM, as Thompson's family ties to Foss-Tech — which developed the first-year Audi TT-R — affording him a seat in rear-wheel-drive machinery for the first time since his 1992 Formula Vauxhall Junior campaign.

Then, in 2009, he was enlisted for the Bathurst 1000 to drive a Ford Falcon with the late Allan Simonsen for Triple Eight.

"I had a few things going on but Roland [Dane, team co-owner] saw I wasn't doing a full programme at the time," says Thompson. "He just asked me if I'd be interested in doing Phillip

"FIRST LAP OUT IT'S,
'OH MY GOD, WHERE
THE HELL DOES THIS
GO?' SIMULATORS
CAME LATER..."

Island and Bathurst. Everybody talks about Bathurst and I said I'd love to go and do it."

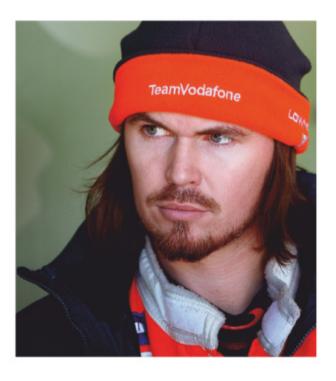
The enthusiasm didn't quite translate, as the Mount Panorama circuit is notoriously unkind to Australian Supercars rookies. "It's a bit of a shock to the system, to be honest," Thompson adds. "We had a great time, but the reality for me was that there was no way you could be prepared for that, unless you'd been down there and done it a few times. I'd just felt that I'd bitten off more than I could chew."

Thompson was given a handful of laps at Sandown to acclimatise to the car, and was then thrust into a race at Phillip Island. He and Simonsen finished the 500km bout in 21st, two laps down on winners Will Davison/Garth Tander and the sister Triple Eight car of 2008 Bathurst 1000 victors Craig Lowndes and Jamie Whincup. Then it was over to New South Wales.

Thompson and Simonsen were the fastest international duo in practice, and qualified 17th out of 32. But with nine laps until the chequered flag, they were forced out of the race with engine issues.

"It wasn't like I was struggling, but having enough miles to be comfortable and sharing a car with somebody when you're not a GT driver... The first lap out you're like, 'Oh my god, where the hell does this go?' Obviously I'd not done simulators or stuff like that — that came later.

"The reality was – and it being an



incredible experience — there was no way without having a couple of years at it that you could be competitive."

Thompson never raced in Supercars or top-flight rear-drive machinery again. Simonsen, though, returned and in 2011 switched to Kelly Racing and a Holden Commodore. He and Greg Murphy rounded out the podium.

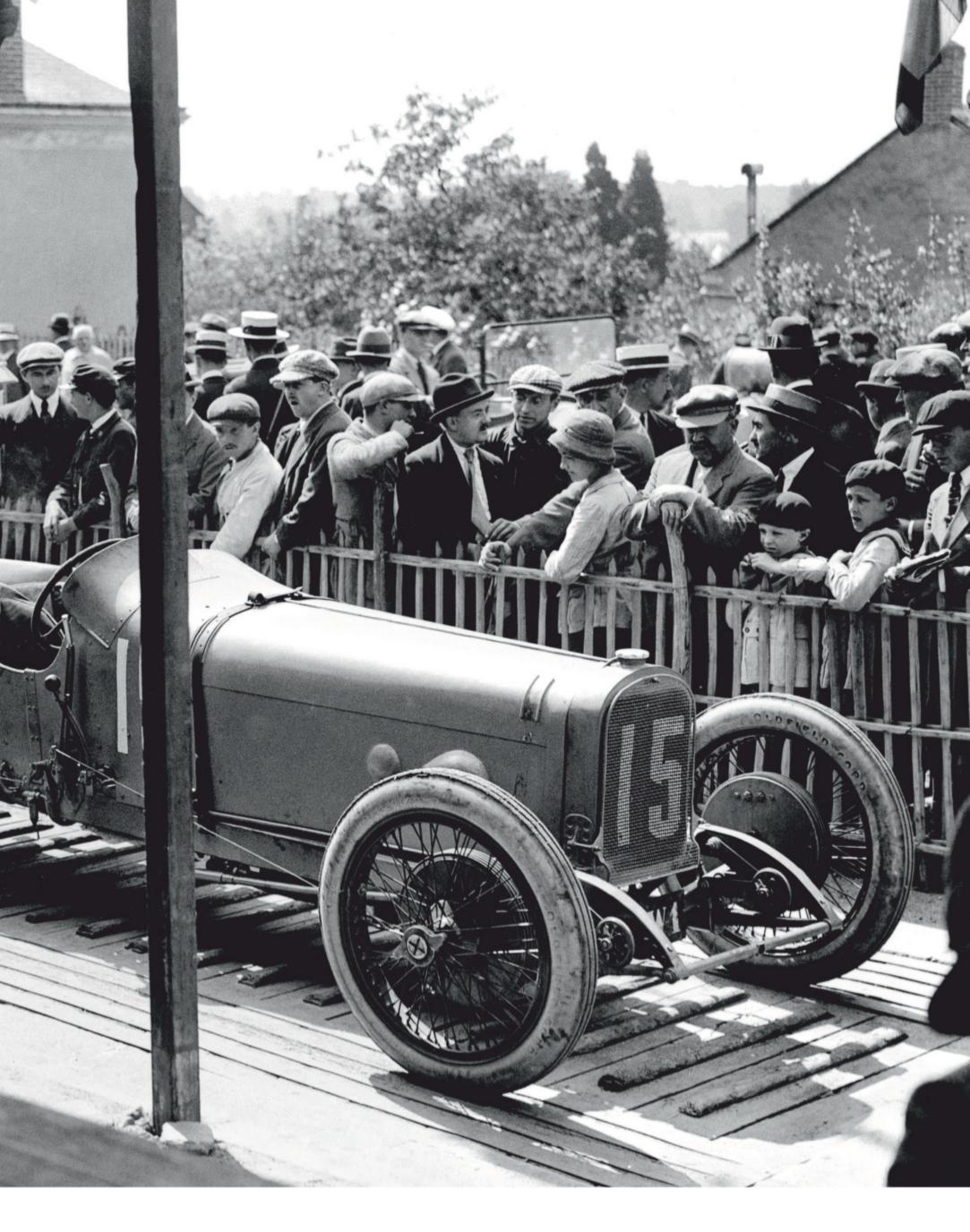
But Thompson knew early on that the odds were stacked well against them. He was determined to make the most of the experience, but in his own way: "We had lots of fun away from the track! It'll be forever in my memory."



FROM THE ARCHIVE

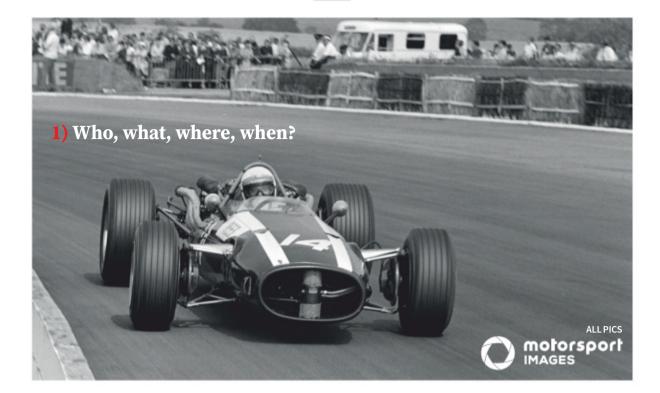
The Sunbeam-Talbot-Darracq of Andre Boillot is presented for scrutineering ahead of the 1921 French Grand Prix at Le Mans. The Frenchman's machine was part of what was meant to be a six-car Franco-British STD factory effort, variously labelled Talbot-Darracqs, Talbots and Sunbeams, although the two Sunbeams were not ready to make the start. Boillot finished the gruelling race – marked by multiple punctures and flying stones – in fifth place, almost half an hour behind the victorious Duesenberg of US driver Jimmy Murphy.







QUIZ



2) Who is this?

This underrated national hero earned the right to don his father's colours.

After labouring to regional success on two wheels, he had to go back to school to make the switch to four.

Having attained some success in the blue oval he stepped up the ladder and carried on his winning ways. But money was tight and options were limited so he took what he could. An opportunity to go against the grain gave him a chance to shine, although wins were elusive.

The dominant force liked the cut of his jib, while a fading giant offered him a road to nowhere.

Old animosity gave him an unlikely break and he quickly went from zero to hero. An eerie family resemblance thrust him into the limelight and he got his just deserts in the end. He nearly broke one famous duck, before taking another.

3) On this day...

A Which three Japanese drivers made their world championship Formula 1 debuts on this day in 1976 at Fuji?

B Which marque claimed its first F1 win on this day in 1965?

C Jo Siffert died on this day in 1971. With whom did he share the winning car in the 1968 Sebring 12 Hours?

D Which Spanish venue hosted the final round of the Superleague Formula series on this day in 2010?

E Which Australian Supercars race winner finished seventh in the Champ Car race at Surfers Paradise on this day in 2004?

4) Name the helmet



LAST WEEK'S ANSWERS Who, what, where, when? Robert Wickens, Virgin-Cosworth MVR-02, Yas Marina, 11 November 2011. Who is this? Gilles Villeneuve. On this day 1) Bruno Giacomelli. 2) 1984 Brazilian GP, 1989 Canadian GP. 3) Fifth. 4) Eighth. 5) Mark Taylor. Name the helmet Jacques Villeneuve.





Autosport Media UK Ltd, 1 Eton Street, Richmond, TW9 1AG **Tel** +44 (0) 20 3405 8100 **Email** autosport@autosport.com Individual email firstname.surname@motorsport.com Website www.autosport.com Twitter@autosport

SUBSCRIPTIONS

UK +44 (0) 344 848 8817 **Overseas** +44 (0) 1604 251451 Email help@asm.secureorder.co.uk Back issues 0344 8488817

EDITORIAL

Editor Kevin Turner **Deputy Editor Marcus Simmons** Grand Prix Editor Edd Straw F1 Correspondent Scott Mitchell Technical Editor Jake Boxall-Legge Chief Sub-Editor Peter Hodges **Executive Editor Stuart Codling** Performance and Engineering Editor James Newbold Rallies Editor David Evans Editorial Assistant Matt Kew Art Editor Lynsey Elliott Senior Designer Michael Cavalli Origination/Repro David Sternberg

AUTOSPORT.COM

Editor Matt Beer Autosport Plus Editor Alex Kalinauckas News Editor Jack Cozens International Editor Jack Benvon Social Media Editor Joshua Folks Technical Team Leader Geoff Creighton Lead UX Designer Prad Patel

Video Content Editor Glenn Freeman





motorsport

Photography

Glenn Dunbar Sam Bloxham **7ack Mauger** Jakob Ebrey Mark Sutton

Special Contributors

Ben Anderson Gary Anderson Alan Eldridge Tom Errington Matt James Stephen Lickorish Stefan Mackley David Malsher Jonathan Noble Marcus Pye Nigel Roebuck Gary Watkins

CORRESPONDENTS

Argentina Tony Watson Australia Andrew van Leeuwen Austria Gerhard Kuntschik **Belgium** Gordon McKay **Brazil** Lito Cavalcanti Finland Esa Illoinen Germany Rene de Boer Greece Dimitris Papadopoulos Italy Roberto Chinchero Japan Jiro Takahashi New Zealand Bernard Carpinter Russia Gregory Golyshev Spain Raimon Duran Sweden Tege Tornvall USA Jeremy Shaw UK & Ireland Stephen Brunsdon, Dom D'Angelillo, Kerry Dunlop, Anna Duxbury, Kyran Gibbons, Rachel Harris-Gardiner, Graham Keilloh, Mark Libbeter, Dan Mason, Lucy Morson, Jason Noble, Mark Paulson, Brian Phillips, Hal Ridge, Peter Scherer, Ian Sowman, Ian Titchmarsh, Richard Young

ADVERTISING

Tel +44 (0) 20 3405 8106 Email autosport.ads@motorsport.com Sales Director James Robinson Display Advertising Nick Gavigan, Karen Reilly, Josh Kerley Creative Solutions **Don Rupal** Classified Advertising Ben Kavanagh, Balvin McKenzie Online and Agency Sales Chris Hermitage

ADVERTISING PRODUCTION

Production Controller Ben Webster

Autosport, ISSN number 0269946X, is published weekly by Autosport Media UK Ltd, 1 Eton Street, Richmond, TW9 1AG, United Kingdom. Airfreight and mailing in the USA by agent named Air Business Ltd, c/o Worldnet Shipping Inc., 156-15, 146th Avenue, 2nd Floor, Jamaica, NY 11434, USA. Periodicals postage paid at Jamaica NY 11431. Subscription records are maintained at Autosport Media UK Ltd, 1 Eton Street, Richmond, TW9 1AG. Air Business Ltd is acting as our mailing agent

MANAGEMENT

CEO Motorsport Network Yavor Efremov President, Motorsport Network

Editor-in-Chief, Autosport Media UK James Dickens Head of Publications Sunita Davies

Special Events Manager Laura Coppin We abide by the Editors' Code of Practice

and are committed to upholding the highest standards of journalism. If you think we haven't met those standards and want to make a complaint, contact 0203 405 8100.





CIRCULATIONTRADE **ENQUIRIES**

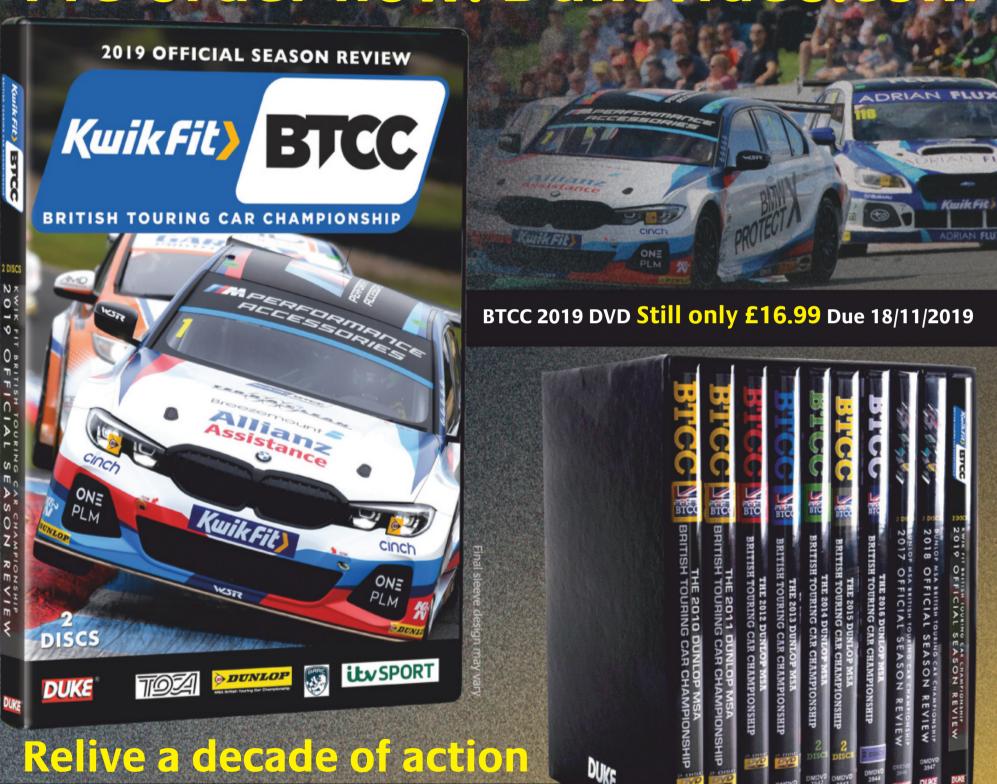
Seymour Distribution Ltd, 2 East Poultry Avenu London, EC1A 9PT Tel: +44 (0) 20 7429 4000. Printed by William Gibbons & Sons Ltd, 28 Planetary Road, Willenhall, Wolverhampton WV13 3XT. ISSN 0269-946X. Autosport is published weekly by 1 Eton Street, Richmond TW9 1AG.

©2019, AUTOSPORT

Trading as Autosport Media UK. Publishing, trade and further subscription details on www.autosport.com. While due care is taken to ensure the contents of the publishers and printers cannot accept liability for errors and omissions Advertisements are accepted for publication in Autosport only upon Autosport Media UK's Standard Terms of Acceptance of Advertising, which are available from the Advertising Department



The ultimate review of a superb season Pre-order now: Dukevideo.com



Buy now at dukevideo.com or call +44 (0)1 624 640 011



BTCC 2010-19 £79.99 Coming soon, pre-order now