



## BALANCE OF PERFORMANCE FOR TRACKS C



### 2018 BALANCE OF PERFORMANCE FOR TRACKS C: SHANGHAI

These balance of performance measures are the result of the tests, research, analysis and projections performed by SRO Ltd and are the sole property of SRO Ltd. Other series promoters, race organisers and national sporting authorities cannot use all or part of them without SRO Ltd's prior written consent. Any contravention will result in a legal action.

Make	FIA GT3 Homologation	Model	Min Weight kg	BOP Ballast kg	Final Weight kg *without driver weight	FIA Restrictor Size mm	RH Front Min mm	RH Rear Min mm	Refueling Rig restrictor mm	Comments
Bentley	GT3-049	Continental GT3	1275	+25	1300	none	134	132	34	Max Boost P see table
BMW	GT3-043	M6 GT3	1290	+25	1315	none	89	92	36	Max Boost P see table
Ferrari	GT3-044	488 GT3	1260	+25	1285	none	73	98	32,5	Max Boost see table
Nissan	GT3-048	GTR Nismo GT3	1285	+15	1300	none	124	165	35	Max Boost see table
Porsche	GT3-041	991 GT3-R	1225	+25	1250	2 x 41,5	72	124	30	

1.1 Additional weight must be installed in accordance with article 257A-4.3 – 2018

1.2 Technical drawings of air restrictors for 2013/2014/2015/2016/2017/2018 cars are registered with FIA. Only restrictors in compliance with this registration are allowed

1.3 Use of catalytic converter compulsory

1.4 Notes on boost control :

- Values are absolute pressure for ambient pressure of 1010mbar.
- Competitors must adjust boost pressure relative to ambient pressure at each event
- Control of Pboost strategy see further.

1.5 The SRO Sporting Board is allowed to modify any parameter required to establish the balance of performance.

1.6 Engine reference data (iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is the one collected during BOP tests and will be used for checks. If noted differently in comments the (e.g. iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is set as reference.

Engine speed	Bentley Continental GT3	Ferrari 488 GT3	BMW M6 GT3	Nissan GTR Nismo GT3 2018
RPM	Pboost limit barA @ x Lambda	Pboost limit barA @ x Lambda	Pboost limit barA @ x Lambda	Pboost limit barA @ x Lambda
4000	1.86 @ 0,90	1.47 @ 0,92	1.78 @ 0,92	1,93 @ 0,88
4250		1.49 @ 0,92	1.83@ 0,92	
4500	1.76 @ 0,90	1.51 @ 0,92	1.86 @ 0,92	1,92 @ 0,88
4750		1.53 @ 0,92	1.88 @ 0,92	
5000	1.66 @ 0,90	1.56 @ 0,92	1.92 @ 0,92	1,90 @ 0,88
5250		1.58 @0,92	1.96 @ 0,92	
5500	1.60 @ 0,90	1.60 @ 0,92	1.96 @ 0,92	1,89@ 0,88
5750		1.60@ 0,92	1.96 @ 0,92	
6000	1.55 @ 0,90	1.60@ 0,92	1.90@ 0,92	1,85 @ 0,88
6250		1.60 @ 0,92	1.83 @ 0,92	
6500	1.45 @ 0,90	1.59 @ 0,92	1.73 @ 0,92	1,81 @ 0,88
6750		1.57 @ 0,92	1,66 @ 0,92	
6900				1,79@ 0,88
7000	1.39 @ 0,90	1.54 @0,92	1.65 @ 0,92	1,51 @ 0,88
7250	1.26 @ 0,90	1.49 @ 0,92		
>/7500		1.45 @ 0,92	-	

2. Control of Pboost strategy via SRO DL1 Datalogger and pressure sensors:  
**IF**

- Throttle is > 30% open AND
- RPM is > 3000 AND
- Longitudinal Acceleration is increasing or constant or >/0 AND
- OVERBOOST > "Limit + 15 mbar" is recorded for more than 50ms

**THEN**

- Flag and report to the steward

3. Pboost limits linear interpolation

Make	FIA GT3 Homologation	Model	Min Weight kg	BOP Ballast kg	Final Weight kg *without driver weight	FIA Restrictor Size mm	RH Front Min mm	RH Rear Min mm	Refueling Rig restrictor mm	Comments
Honda	GT3-047	NSX GT3	1240	+50	1290	none	66	66	35	Max Boost P see table
Lexus	GT3-046	RC F- GT3	1300	+10	1310	2 x 38	90	280	33	
McLaren	GT3-037	650S	1240	+30	1270	none	67	74	34	Max Boost see table

1.1 Additional weight must be installed in accordance with article 257A-4.3 – 2018

1.2 Technical drawings of air restrictors for 2013/2014/2015/2016/2017/2018 cars are registered with FIA. Only restrictors in compliance with this registration are allowed

1.3 Use of catalytic converter compulsory

1.4 Notes on boost control :

- Values are absolute pressure for ambient pressure of 1010mbar.
- Competitors must adjust boost pressure relative to ambient pressure at each event
- Control of Pboost strategy see further.

1.5 The SRO Sporting Board is allowed to modify any parameter required to establish the balance of performance.

1.6 Engine reference data (iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is the one collected during BOP tests and will be used for checks. If noted differently in comments (e.g.iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is set as reference.

Engine speed	McLaren 650S	Honda NSX GT3
RPM	Pboost limit barA	Pboost limit barA
4000	1.82 @ 0,88	1,87 @ 0,85
4500	1.80 @ 0,88	1,87 @ 0,85
5000	1.80 @ 0,88	1,96 @ 0,85
5500	1.75 @ 0,88	2,02 @ 0,85
6000	1.73 @ 0,88	2,06 @ 0,85
6500	1.65 @ 0,88	2,06 @ 0,85
>/7000	1.63 @ 0,88	2,02 @ 0,85
>/7500	1.53 @ 0,88	2,00 @ 0,85

2. Control of Pboost strategy via SRO DL1 Datalogger and pressure sensors:

**IF**

- Throttle is > 30% open AND
- RPM is > 3000 AND
- Longitudinal Acceleration is increasing or constant or >/0 AND
- OVERBOOST > "Limit + 15 mbar" is recorded for more than 50ms

**THEN**

- Flag and report to the stewards

3. Pboost limits linear interpolation

Make	FIA GT3 Homologation	Model	Min Weight kg	BOP Ballast kg	Final Weight kg	FIA Restrictor Size mm	RH Front Min mm	RH Rear Min mm	Fuel Rig Restrictor mm	Comments
Aton Martin	GT3-032	Vantage GT3	1230	+95	1325	41,5	75	180	34	2015 restrictor
Audi	GT3-038	R8 LMS GT3	1225	+50	1275	39	65,5	128	30	
BMW	GT3-043	M6 GT3	1290	+25	1315	none	89	92	36	Max Boost P see table
Lamborghini	GT3-040	HURACAN GT3	1230	+55	1285	2 x 39	65,5	128	30	
Ferrari	GT3-044	488 GT3	1260	+25	1285	none	73	98	32,5	Max Boost P see table
Mercedes	GT3-042	AMG GT GT3	1285	+45	1330	2 x 34,5	81	87	33	Lambdan0,93
Porsche	GT3-041	991 GT3-R	1220	+30	1250	2 x 41,5	72	124	30	

1.1 Additional weight must be installed in accordance with article 257A-4.3 – 2018

1.2 Technical drawings of air restrictors for 2013/2014/2015/2016/2017/2018 cars are registered with FIA. Only restrictors in compliance with this registration are allowed

1.3 Use of catalytic converter compulsory

1.4 Notes on boost control :

- Values are absolute pressure for ambient pressure of 1010mbar.
- Competitors must adjust boost pressure relative to ambient pressure at each event
- Control of Pboost strategy see further.

1.5 The SRO Sporting Board is allowed to modify any parameter required to establish the balance of performance.

1.6 Art 82 of the Sporting Regulations : Engine reference data (iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is the one collected during BOP tests and will be used for checks. If noted differently in comments the SRO TD one (iA, Lambda, Fuel inj, Cam In/Out, airbox pressure) is set as reference.

Engine speed	Ferrari 488 GT3	BMW M6 GT3
RPM	Pboost limit barA @ x Lambda	Pboost limit barA @ x Lambda
4000	1.47 @ 0,92	1.78 @ 0,92
4250	1.49 @ 0,92	1.78 @ 0,92
4500	1.51 @ 0,92	1.81 @ 0,92
4750	1.53 @ 0,92	1.84 @ 0,92
5000	1.56 @ 0,92	1.90 @ 0,92
5250	1.58 @0,92	1.96 @ 0,92
5500	1.60 @ 0,92	1.96 @ 0,92
5750	1.60 @ 0,92	1.96 @ 0,92
6000	1.60 @ 0,92	1.87 @ 0,92
6250	1.60 @ 0,92	1.78 @ 0,92
6500	1.59 @ 0,92	1.71 @ 0,92
6750	1.57 @ 0,92	1,66 @ 0,92
7000	1.54 @ 0,92	1.58 @ 0,92
7250	1.49 @0,92	
>/7500	1.45 @ 0,92	-

Control of Pboost strategy via SRO DL1 Datalogger and pressure sensors:

**IF**

- Throttle is > 30% open AND
- RPM is > 3000 AND
- Longitudinal Acceleration is increasing or constant or >/0 AND
- OVERBOOST > "Limit + 15 mbar" is recorded for more than 50ms

**THEN**

- Flag and report to the stewards

3. Pboost limits linear interpolation

Make	Model	Min Weight kg	BOP Ballast kg	Ride Height Front	BOP extra mm	Ride Height Rear	BOP Extra mm	Comments
BMW	M4GT4	1430	+70	124	+15	119	+5	Silver USB Stick
KTM	X-BPW GT4 2018	1025	+110	70	+40	192	+40	ECU 2017 BOP MAP, 2.3 pboost at 1010mb. REV Limit 6500 max Max CAMBER 2,5F/2,5R
McLaren	570S GT4	1425	+105	77	+15	90	+10	ECU BOP 2017
Mercedes	AMG GT4	1400	+75	93	+20	96	+15	SRO MAP ST
Porsche	Cayman GT4 CS MR	1272	+0	75	+0	94	+0	ECU BOP 2017

1.1 Additional weight must be installed in accordance with article 257A-4.3

1.2 The SRO Technical Board is allowed to modify any parameter required to establish the balance of performance at any moment in the event

1.3 Refueling rig restrictor diameter for these cars is 33mm ( FIA standard)

1.4 If P ambient reduces by -20mb vs 1010mb, Turbo cars without adaptable pboost need to add +15kg

1.5 BMW M4 GT4 if patmo is 980mb or lower, red USB stick instead of the silver one