TAOⅢ Smart Access : List of Function ① ~ Basic Function [Ver.D2.00~]

Setting Menu	Setting Range	Function Description
Drive Frequency (kHz)	1-64kHz (1kHz step 16-32=2kHz STEP &35・38・42・48・55・64)	Adjust Acceleration. Lower Number (Acceleration : increase / Smoothness : Decrease) Higher Number (Acceleration : Decrease / Smoothness : Increase)
Neutral Brake Frequency (kHz)	0.5kHz & 1-32kHz (1-16=1kHz step, 16-32kHz=2kHz step)	Select the motor neutral brake smoothness when the transmitter throttle is at neutral. Lower Number (Braking : increase / Smoothness : Decrease) Higher Number (Braking : Decrease / Smoothness : Increase)
Brake Frequency (kHz)	0.5kHz & 1-32kHz (1-16=1kHz step, 16-32kHz=2kHz step)	Select the brake smoothness when applying the brake. Lower Number (Braking : Increase / Smoothness : Decrease) Higher Number (Braking : Decrease / Smoothness : Increase)
Full Brake Frequency (kHz) [XARVIS XX only]	0.1kHz-32kHz (0.1-1=0.1kHz step, 1-16=1kHz step, 16-32kHz=2kHz step)	This determines the braking feel during full braking. Lower values result in increased braking force and decreased braking smoothness, while higher values result in decreased braking force and increased braking smoothness.
Initial Speed (%)	0-50% (2% step)	Select the initial speed when accelerating from a stop. Higher number : More sudden start. Because you add load to the motor and drive system, please be careful of overheating issues. Gear your vehicle appropriately.
Neutral Brake(Power) (%)	0-100% (2% step)	Select the motor neutral brake initial power when the transmitter throttle is at neutral. Lower Number : Soft Breaking, Higher Number : Strong Breaking.
Initial Brake(Power) (%)	0-50% (2% step)	Select the initial brakes power when the brake is applied. Lower Number : Soft Breaking, Higher Number : Strong Breaking.
Full Brake(Power) (%)	0-100% (2% step)	Select the maximum brake power when applying full brakes during a run. Lower Number : Soft Breaking, Higher Number : Strong Breaking.
Brake Booster (%) [XARVIS XX only]	-5 ~ +5 (1 step)	Adjust the brake curve. A setting of 0 represents the normal state. Higher values result in stronger deceleration in the mid-range, while lower values result in weaker deceleration.
B/B(Brake Booster) End Point(%) [XARVIS XX only]	0 ~ -100% (5% step)	This setting determines the throttle range in which the brake booster operates (from 0% to this set value).
Forward Speed (%)	50-100% (2% step)	Function that limit the maximum speed at full throttle.
Reverse Speed (%)	25-100% (25% step)	Function that limit the maximum speed while reversing.
Operation Mode	N/F/B ・ R/F/B N/F/B/R ・ R/F/B/R N/F/R ・ R/F/R	Select the direction of the motor, brakes availability, and reverse function availability. N=Normal Motor Direction / R=Reverse Motor Direction / F=Moving Forward / B=Brake / R=Reverse [Important] When applying the throttle in reverse, the item without "B" notation will reverse instantly without pausing between the braking and reversing state.
Cut Off Voltage (V)	NONE & 2.6-3.6V/cell (0.1V/cell step)	The TAO II warns the driver of low battery voltage by cutting the output power to a low level state. This will prevent your vehicle to become uncontrollable. This feature will also protect LiPo users from over-discharging their batteries and potentially damage them.
Rev Limit (rpm)	OFF & 10,000-100,000rpm (1,000rpm step)	This function limits the maximum motor revolution. For limiting the maximum speed regardless of throttle position. It prevent the sudden rise in RPM of low turn motors.
Free Zone Adjust (%)	1-10 (%)	This function adjusts the output characteristics at the moment when the throttle is shifted from neutral to drive. The lower the value, the quicker the output characteristics at the start of acceleration, and the higher the value, the smoother and milder.
Torque Level ※	-5 ~ +5 (1 step)	Setting value 0 is normal. The higher the value, the faster and slower the deceleration with a sense of torque, and the lower the value, the slower the rise and the more rapid the deceleration.
Torque End Point (%) ※	20 ~ 100 (5% step)	Set the throttle range where the torque level function operates (operates from 0% to the set value). Normal output characteristics after the torque end point.
Power Change Level	-20 ~ +20 (1 step)	It is an item to adjust how much the power feeling (drive frequency) after an arbitrary rotation speed (= power change RPM) is changed. ※The feeling of power before the power change RPM is determined by the conventional setting item "drive frequency". ※The feeling of power after the power change RPM changes in the direction in which the drive frequency decreases as the power change level value increases and in the direction in which the drive frequency increases as the value of the power change level increases, based on the "drive frequency". ※The set value "zero" means that there is no change in the feeling of power (drive frequency) (the power change function is not used).
Power Change RPM(rpm)	1,000-50,000rpm (1,000rpm step)	It is an item to set the point where the feeling of power changes.
Power Change Slope (msec.)	10-120msec. (10msec. step)	It is an item to adjust the sudden feeling when the feeling of power is switched. The smaller the number, the more suddenly, and the larger the number, the more gently the feeling of power changes.
Bore Up	1 ~ 15 (1 step)	Increases power and torque uniformly over the entire throttle range. The higher the value, the greater the increase in power and torque. [Note] Excessive settings will place a heavy load on each device, so adjust the value so that heat generated by the ESC and motor is no more than 70℃-80℃.
BEC Output (V) [XARVIS XX only]	6.0 / 7.4	Set the voltage that ESC supplies to the receiver. When selecting 7.4V, be sure to check that each device supplying

※【Important】The torque level and torque end point function normally only when our brushless motor "LUXON AGILE" and "FLEDGE" are used. When using a motor of our company LUXON BS or earlier or a motor of another company, setting is not possible or it does not operate properly

TAOⅢ Smart Access : List of Function ② ~ Boost / Turbo Function [Ver.D2.00~]

Setting Menu	Setting Range	Function Description	Additional Information
Boost Timing (deg.)	0(OFF)-60deg. (1deg. Step)	It is the normal timing effective throughout your throttle range. It affects the motor speed.	Excessive settings will place a heavy load on each device, so please adjust each value so that the maximum heat generated by the ESC and motor is kept to around 70℃ to 80℃.
Boost Activation [XARVIS XX only]	RPM / TH (THROTTLE)	This determines the criteria for when the boost activates. [RPM]: Boost activates based on engine speed. [TH]: Boost activates based on throttle position.	When set to RPM, the "Boost Start TH" and "Boost End TH" are disabled. When set to TH, the "Boost Start RPM" and "Boost End RPM" are disabled.
Boost Start RPM (rpm)	1,000-40,000rpm (500rpm step)	It is the RPM value at which the Boost starts. The throttle stays linear until this RPM is reached.	The Boost Start RPM value and Boost End RPM value should be given enough space for the timing to ramp up smoothly. CAUTION!! When using this function for the first time, start with a setting that keep enough interval between both RPM, and narrow it accordingly to your liking until satisfied. IMPORTANT!! Always set the boost end RPM higher than the boost start RPM.
Boost End RPM (rpm)	10,000-100,000rpm (500rpm step)	It is the RPM value at which the Boost reaches the "full boost digital timing". Beyond this RPM value, the throttle turns linear again.	
Boost Start TH (%) [XARVIS XX only]	0-60% (5% step)	This is the throttle position where the boost kicks in. Up until this position is reached, acceleration is linear with respect to the throttle.	These two factors determine the rate at which the ignition timing advances. The narrower the gap between the boost start throttle position and the boost end throttle position, the more rapidly the ignition timing advances. Conversely, a wider gap results in a more gradual increase in ignition timing advance. [Note] When using this function for the first time, drive with a sufficiently wide gap between both settings, and gradually narrow it to find the optimal point.
Boost End TH (%) [XARVIS XX only]	65-100% (5% step)	This is the throttle position where the ignition timing advance value set in "Boost Timing" is reached. Beyond this throttle position, acceleration becomes linear with respect to the throttle, maintaining the ignition timing advance value set in Boost Timing.	
TH Boost Control	ON / OFF	This feature is to prevent the sudden change of the motor RPM in sudden throttle operation when using the Boost feature.	
Turbo Activation	Full Throttle / RPM / Full Throttle & RPM	It is the deciding factor that triggers the Turbo. [Full Throttle and RPM]---The Turbo is triggered either by Full Throttle or when it reaches the RPM value of the "Turbo Start RPM". [RPM]---The Turbo is triggered when the RPM value of the "Turbo Start RPM" is reached. [Full Throttle]---The Turbo is triggered at full throttle only.	
Turbo Timing (deg.)	0(OFF)-60deg. (1deg. step)	It is the additional timing added to the Boost timing.	Excessive settings will place a heavy load on each device, so please adjust each value so that the maximum heat generated by the ESC and motor is kept to around 70℃ to 80℃.
Turbo Start RPM (rpm)	10,000-50,000rpm (500rpm step)	It is the motor RPM value at which the turbo function starts.	This item is effective only when the Turbo Activation is set in "RPM " or "Full Throttle & RPM"
Turbo On Slope (deg./0.1sec.)	1-50deg./0.1sec. (1deg./0.1sec. Step)	It refers to the Turbo Timing increasing rate. The higher it is, the faster the Turbo Timing increases, resulting in faster acceleration.	This feature is very sensitive and changes drastically with only a 0.1deg change. Adjust this setting slowly until reaching the desired result.
Turbo Off Slope (deg./0.1sec.)	1-50deg./0.1sec. (1deg./0.1sec. Step)	Function that limit the maximum speed while reversing.	As long as the machine's posture is not disturbed by sudden deceleration, in some cases it may be better to increase the turbo off slope value and decelerate to a lower RPM before accelerating again, as this will result in the machine moving forward more stably and giving a better feeling.
Turbo Start Time (sec.)	OFF(0)-1.00sec. (0.05sec. Step)	The time it takes for the turbo to start after the Full Throttle or Turbo RPM value is reached. (ex: if value is 0.50, it will take 0.5sec for the turbo to start.)	This item is effective only when the Turbo Activation is set in "RPM " or "Full Throttle & RPM"
Turbo Off Time (sec.)	OFF(0)-1.00sec. (0.05sec. Step)	The time it takes for the turbo to turn off after the full throttle is released. (ex: if value is 0.50, it will take 0.5sec for the turbo to stop)	This item is effective only when the Turbo Activation is set in "RPM " or "Full Throttle & RPM".

Preset parameter [Ver.D2.00~]

※Please check the preset parameters for XARVIS/MC970CR on the TAOIII.

Setting Item	for XARVIS XX						for RAD/MC971CR					
	DRIFT RWD	DRIFT AWD	TOURING	OFF ROAD 2WD	OFF ROAD 4WD	NON BOOST	DRIFT RWD	DRIFT AWD	TOURING	OFF ROAD 2WD	OFF ROAD 4WD	NON BOOST
Drive Frequency(kHz)	24	20	12	14	14	12	16	12	8	8	8	6
Neutral Brake Frequency (kHz)	16	8	12	2	2	8	16	8	12	2	2	8
Brake Frequency(kHz)	18	8	1	1	1	4	18	8	1	1	1	4
Full Brake Frequency(kHz)	8	4	1	1	1	4	-					
Initial Speed(%)	4	6	0	12	8	10	2	2	0	6	4	5
Neutral Brake(Power)(%)	16	14	0	12	14	10	16	14	0	12	14	10
Initial Brake(Power)(%)	0	0	0	2	2	0	0	0	0	2	2	0
Full Brake(Power)(%)	100	100	68	70	70	100	100		68		70	100
Brake Booster(%)	0						-					
B/B End Point(%)	-100						-					
Forward Speed(%)	100	100	100	85	90	100	100	100	100	85	90	100
Reverse Speed(%)	25						25					
Operation Mode	N/F/B/R						N/F/B/R					
Cut Off Voltage(V)	3.2						3.2					
Rev Limit(rpm)	OFF						OFF					
Free Zone Adjust(%)	3	3	4	5	5	5	3	3	4	5	5	5
Torque Level	+2	+1	+1	+1	+1	+2	+2	+1	+1	+1	+1	+2
Torque End Point(%)	40	60	60	60	60	40	40	60	60	60	60	40
Power Change Level	0						0					
Power Change RPM(rpm)	1000						1000					
Power Change Slope(msec.)	20						20					
Bore Up	0						0					
BEC Output(V)	6						- (Fixed at 6V)					
Boost Timing(deg.)	20	35	50	0	0	0	20	35	50	0	0	0
Boost Activation	RPM						-					
Boost Start RPM(rpm)	12,000	12,000	8,000	8,000	8,000	1,000	12000	12,000	8,000	8,000	8,000	1000
Boost End RPM(rpm)	42,000	50,000	28,000	28,000	28,000	10,000	42000	50,000	28,000	28,000	28,000	10000
Boost Start TH(%)	0						-					
Boost End TH(%)	100						-					
TH Boost Control	OFF						OFF					
Turbo Activation	Full Throttle						Full Throttle					
Turbo Timing(deg.)	5	5	25	0	0	0	5	5	25	0	0	0
Turbo Start RPM(rpm)	42,000	50,000	28,000	28,000	28,000	10,000	42,000	50,000	28,000	28,000	28,000	10,000
Turbo On Slope (deg./0.1sec.)	5	5	18	18	18	1	5	5	18	18	18	1
Turbo Off Slope (deg./0.1sec.)	5	5	3	3	3	1	5	5	3	3	3	1
Turbo Start Time(sec.)	OFF						OFF					
Turbo Off Time(sec.)	OFF						OFF					