

Prop size

26 inches

Arducopter 4.0 and later

ACRO_YAW_P	1.4	
ATC_ACCEL_P_MAX	30600	
ATC_ACCEL_R_MAX	30600	
ATC_ACCEL_Y_MAX	12600	
ATC_RAT_PIT_FLTD	9.5	
ATC_RAT_PIT_FLTE	0	
ATC_RAT_PIT_FLTT	9.5	
ATC_RAT_RLL_FLTD	9.5	
ATC_RAT_RLL_FLTE	0	
ATC_RAT_RLL_FLTT	9.5	
ATC_RAT_YAW_FLTD	0	
ATC_RAT_YAW_FLTE	2	
ATC_RAT_YAW_FLTT	9.5	
ATC_THR_MIX_MAN	0.1	Set to 0.5 after test flights
INS_ACCEL_FILTER	20	Set lower for high vibrations
INS_GYRO_FILTER	19	Leave at 20 – see caveat below
MOT_THST_EXPO	0.78	
MOT_THST_HOVER	0.2	Hover Learn will fix this

Arducopter 3.6 and earlier

ACRO_YAW_P	1.4	
ATC_ACCEL_P_MAX	30600	
ATC_ACCEL_R_MAX	30600	
ATC_ACCEL_Y_MAX	12600	
ATC_RAT_PIT_FILT	9.5	
ATC_RAT_RLL_FILT	9.5	
ATC_RAT_YAW_FILT	2	
ATC_THR_MIX_MAN	0.1	Set to 0.5 after test flights
INS_ACCEL_FLTER	20	Set lower for high vibrations
INS_GYRO_FLTER	19	Leave at 20 – see caveat below
MOT_THST_EXPO	0.78	
MOT_THST_HOVER	0.2	Hover Learn will fix this

INS_GYRO_FLTER will need to be higher than 20 for smaller frames BUT also r

LiPo Battery

12 Cells

BATT_ARM_VOLT	44.3	
BATT_CRT_VOLT	42	3.5 x no. of LiPo cells
BATT_LOW_VOLT	43.2	3.6 x no. of LiPo cells
MOT_BAT_VOLT_MAX	50.4	4.2 x no. of LiPo cells
MOT_BAT_VOLT_MIN	39.6	3.3 x no. of LiPo cells

After test flights and hover learning

ATC_THR_MIX_MAN	0.5	
PSC_ACCZ_I	1	2xMOT_THST_HOVER
PSC_ACCZ_P	0.5	Enter MOT_THST_HOVER here

Suggested settings

BATT_FS_CRT_ACT	1	
BATT_FS_LOW_ACT	2	
FENCE_ACTION	3	
FENCE_ALT_MAX	50	
FENCE_ENABLE	1	Wait for valid GPS 3D fix
FENCE_RADIUS	100	
FENCE_TYPE	3	

requires more manual tuning of PIDs