

printer.cfg

```
[include mainsail.cfg]
[include macros/*.cfg]
[include display.cfg]
[include ebbcan.cfg]
[include led_progress.cfg]

[virtual_sdcard]
path: /home/pi/printer_data/gcodes
on_error_gcode: CANCEL_PRINT

[mcu]
#serial: /dev/serial/by-id/usb-Klipper_rp2040_45503571288F4C98-if00
serial: /dev/ttyAMA0
restart_method: command

[printer]
kinematics: corexy
max_velocity: 200
max_accel: 2500
max_z_velocity: 15
max_z_accel: 300
square_corner_velocity: 6.0

[input_shaper]
shaper_freq_x: 75.2
shaper_type_x: mzv
shaper_freq_y: 54.4
shaper_type_y: zv

#####
# Neopixel and LED configuration
#####

[neopixel bead_rgb]
```

```
pin: gpio24
chain_count: 1
color_order: GRB
initial_RED: 0.1
initial_GREEN: 0
initial_BLUE: 0
```

```
[led bauraumlicht]
white_pin: gpio18
```

```
#####
# Temperature configuration
#####
```

```
[temperature_sensor pi_zero]
sensor_type: temperature_host
min_temp: 10
max_temp: 100
```

```
[temperature_sensor pico_board]
sensor_type: temperature_mcu
min_temp: 0
max_temp: 100
```

```
#####
# Fan configuration
#####
```

```
#[heater_fan Hotend_Fan]
#pin: gpio18
#kick_start_time: 0.8
#shutdown_speed: 0
#off_below: 0.1
#max_power: 1.0
#fan_speed: 0.6
#sensor_type: temperature_host
#control: pid
#min_temp: -40
#max_temp: 85
#max_delta: 5.0
```

```
#pid_kp: 1.0
#pid_ki: 0.5
#pid_kd: 2.0
#min_speed: 0.1
#max_speed: 0.6
#target_temp: 38

#[heater_fan controller_fan]
#pin: gpio17
#heater: extruder
#max_power: 1.0
#heater_temp: 30.0

[fan_generic filter_fan]
pin: gpio20

[temperature_fan board_fan]
pin: gpio17
max_power: 1.0
sensor_type: temperature_host
control:watermark
target_temp: 38
min_temp: 0
max_temp: 90
off_below: 0.10
kick_start_time: 0.50
max_speed: 0.6
min_speed: 0.3

#####
# X-Axis configuration
#####

[stepper_x]
step_pin: gpio11
## Refer to https://docs.vorondesign.com/build/startup/#v0
dir_pin: gpio10 # Check motor direction in
link above. If inverted, add a ! before gpio10
enable_pin: !gpio12
rotation_distance: 40
```

```

microsteps: 32
full_steps_per_rotation: 200 # Set to 400 for 0.9°
degree stepper motor, 200 is for 1.8° stepper motors
#endstop_pin: ^gpio4
endstop_pin: tmc2209_stepper_x:virtual_endstop
position_endstop: 120
position_max: 120
position_min: 0
homing_speed: 20 # Can be increased after
initial setup, Max 100
homing_retract_dist: 0
homing_positive_dir: true

[tmc2209 stepper_x]
uart_pin: gpio9
tx_pin: gpio8
uart_address: 0
interpolate: False
run_current: 0.5
stealthchop_threshold: 999999
diag_pin: ^gpio4
driver_SGTHRS: 70

#####
# Y-Axis configuration
#####

[stepper_y]
step_pin: gpio6
## Refer to https://docs.vorondesign.com/build/startup/#v0
dir_pin: gpio5 # Check motor direction in
link above. If inverted, add a ! before gpio5
enable_pin: !gpio7
rotation_distance: 40
microsteps: 32
full_steps_per_rotation: 200
#endstop_pin: ^gpio3
endstop_pin: tmc2209_stepper_y:virtual_endstop
position_endstop: 120
position_max: 120

```

```

position_min: 0
homing_speed: 20 # Can be increased after
initial setup, Max 100
homing_retract_dist: 0
homing_positive_dir: true

[tmc2209 stepper_y]
uart_pin: gpio9
tx_pin: gpio8
uart_address: 2
interpolate: False
run_current: 0.5
sense_resistor: 0.110
stealthchop_threshold: 999999
diag_pin: ^gpio3
driver_SGTHRS: 75

#####
# Z-Axis configuration
#####

[stepper_z]
step_pin: gpio19
dir_pin: !gpio28 # Remove the ! before
gpio28 if motor direction is inverted.
enable_pin: !gpio2
rotation_distance: 8 # For T8x8 integrated lead
screw
microsteps: 32
endstop_pin: ^gpio25
position_endstop: 120
position_max: 120
position_min: -1.5
homing_speed: 20
second_homing_speed: 3.0
homing_retract_dist: 3.0

[tmc2209 stepper_z]
uart_pin: gpio9

```

```
tx_pin: gpio8
uart_address: 1
interpolate: False
## For OMC (StepperOnline) 17LS13-0404E-200G 0.4A
#run_current: 0.2
## For LD0-42STH25-1004CL200E 1.0A
run_current: 0.37
sense_resistor: 0.110
stealthchop_threshold: 0

#[safe_z_home]
#home_xy_position: 117,85 # Change coordinates to the center of your print bed
#speed: 50
#z_hop: 10          # Move up 10mm
#z_hop_speed: 5

#####
# Bed configuration
#####

[heater_bed]
heater_pin: gpio21
sensor_type: EPCOS 100K B57560G104F
sensor_pin: gpio26
#control = pid
#pid_kp = 59.345
#pid_ki = 2.327
#pid_kd = 378.326
min_temp: 0
max_temp: 83

#####
# Bed Mesh Settings
#####

#[bed_mesh]
#speed: 100
#horizontal_move_z: 10
#mesh_min: 10, 5
#mesh_max: 113, 135
```

```
#probe_count: 4, 4
#mesh_pps: 2,2
#fade_start: 1
#fade_end: 10
#fade_target: 0
```

```
### <----- SAVE_CONFIG ----->
```

```
### DO NOT EDIT THIS BLOCK OR BELOW. The contents are auto-generated.
```

```
###
```

```
### [heater_bed]
```

```
### control = pid
```

```
### pid_kp = 60.659
```

```
### pid_ki = 2.527
```

```
### pid_kd = 363.956
```

Revision #2

Created 2025-01-02 12:22:56 UTC by sylvio

Updated 2025-01-02 12:24:09 UTC by sylvio