21. Case 19: Sweeper 21.1. Purpose

• Build a TPBot sweeper.

21.2. Material



21.3. Hardware Connection

Connect the 360 degrees servo to servo 1 port on TPBot. (Servos are not included in our TPBot kit)

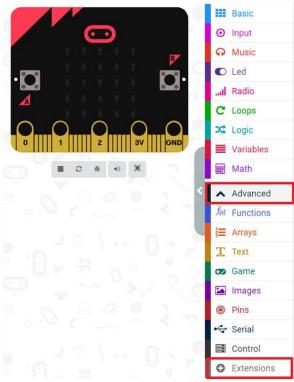


21.4. Software

MicroSoft makecode

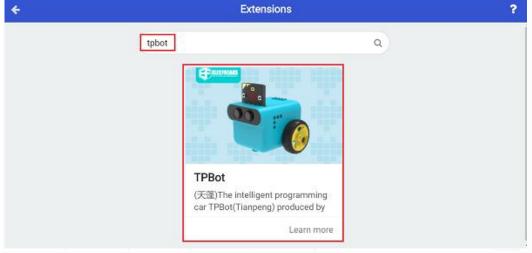
21.5. Programming

• Click "Advanced" in the MakeCode drawer to see more choices.



• We need to add a package for programming. Click "Extensions" in the bottom of the drawer and search with

```
"tpbot" to download it.
```



##Sample

• Drag the show icon brick in the on start and set the car to move forward at the speed of 30%; in forever brick, set the servo connecting to S1 rotate to 180 degrees and pause for 1000ms, and set it rotate to 0 degree and pause for 1000ms.

	indításkor ikon megjelenítése
on start	Set left wheel speed at 30 % right wheel speed at 30 %
show icon Fire Set left wheel speed at 30 % right wheel speed at 30 %	állandóan Set 180° servo S1 ▼ angle to 180 °
forever Set 180° servo S1 ▼ angle to 180 °	1000 v ms szünet
pause (ms) 1000 ▼ Set 180° servo S1 ▼ angle to 0 °	Set 180° servo S1 ♥ angle to 0 ° 1000 ♥ ms szünet
pause (ms) 1000 -	

Link

- Link : https://makecode.microbit.org/ 664VpuAVMcCa
- You may also download it directly below:

----- ## Conclusion ---

The car move forward with the servo rotating.

21.7. FAQ

Q: The car cannot move with the code in this case? A: It might be a lack power of the battery, please add the value of the parameter for the speed of the car and test it.