

# Technical Explanation of Mainboard Stepcraft 300 / 420 / 600

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### Parallel Port LPT-Adapter (X1)

Connection of the computer to the main board via parallel module (optional)

signal	Pin
relay 1	1
direction X	2
step X	3
direction Y	4
step Y	5
direction Z	6
step Z	7
direction 4th axis	8
step 4th axis	9
tool length sensor	10
emergency stop	11
reference switch X/Y/Z	12
reference switch 4th axis	13
relay 2	14
n.a. (In)	15
relay 3	16
n.a. (out)	17
GND	18-25
PE	shed
5V/VCC	

### External Signal (SUB-D 15) (X2)

Connection of external devices to the mainboard

Signal	Pin
+24V	1
GND	2
+5V/VCC	3
direction 4th axis	4
step 4th axis	5



Signal	Pin
relay 2	6
n.a. (Out)	7
tool length sensor	8
+24V	9
GND	10
disable	11
reference switch 4th axis	12
relay 1	13
relay 2	14
n.a. (In)	15
PE	shed

## 4th axis (SUB-D 9) (X101)

Connection of stepper motor and reference switch of the 4th axis

Signal	Pin
Winding 1A	1
Winding 1B	2
n.a.	3
n.a.	4
Reference switch 4th axis	5
Winding 2A	6
Winding 2B	7
n.a.	8
GND	9
PE	shed

#### LED

LEDs of the mainboard (assembled, view from rear side)

Signal	Technical Meaning
LED1 (right)	Power on / 5V
LED2 (left)	Sharing ok, output stage switched on, emergency switch switched off