



USER'S MANUAL

2 Axis Panel MPG16 Rev. 1

JULY, 2013

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TABLE OF CONTENTS

Page #

Contents

1.0	FEATURES.....	1
2.0	SPECIFICATIONS	1
3.0	WARNING.....	1
4.0	PANEL DESCRIPTION.....	2
4.1	Front Panel Description	2
4.2	Back Panel Description.....	2
5.0	CONFIGURATION	3
5.1	Guide for setting up over LTP2 using Mach3	3
5.2	Guide for setting up over Pokeys using Mach3	4
6.0	WIRING DIAGRAMS.....	5
7.0	DIMENSIONS.....	6
	DISCLAIMER.....	6

1.0 FEATURES

- On-Panel Emergency Stop Push Button (E-Stop).
- Two-Panel Rotary Manual Pulse Generator (MPG).
- 3 Positions Rotary switch for Resolution selection.
- Buttons for Cycle Start, Feed Hold, Spindle On/Off, Coolant Pump On/Off.

2.0 SPECIFICATIONS

Main Voltage Input (VDC)	5VDC
Digital inputs (LOW)	-0.5V - 0.8V
Digital inputs (HIGH)	2V-5V

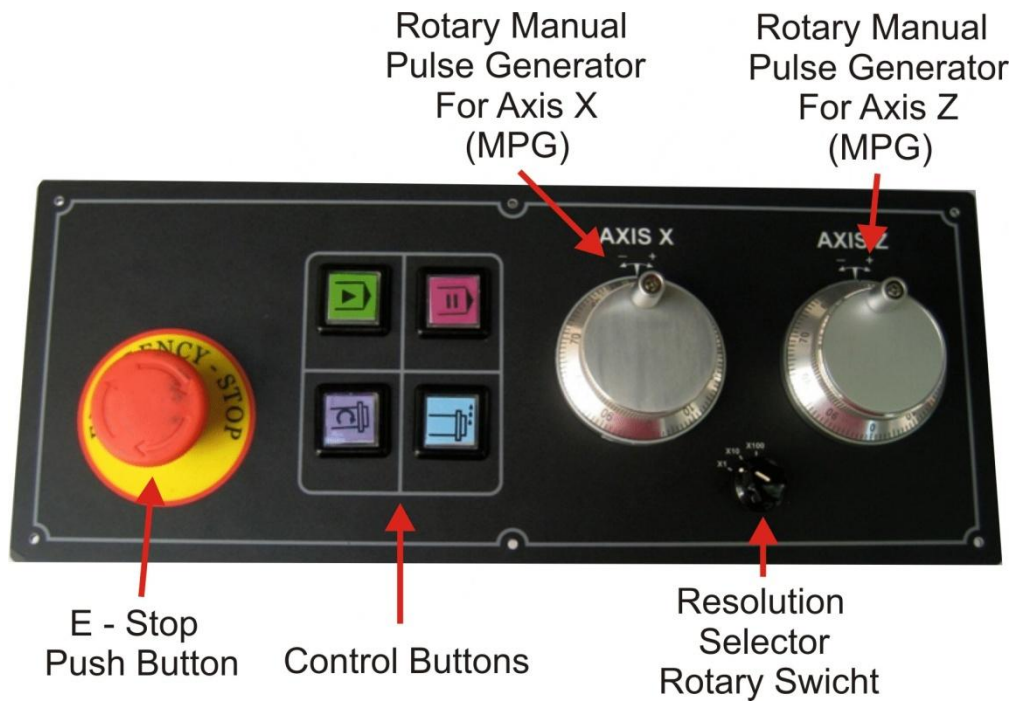
3.0 WARNING



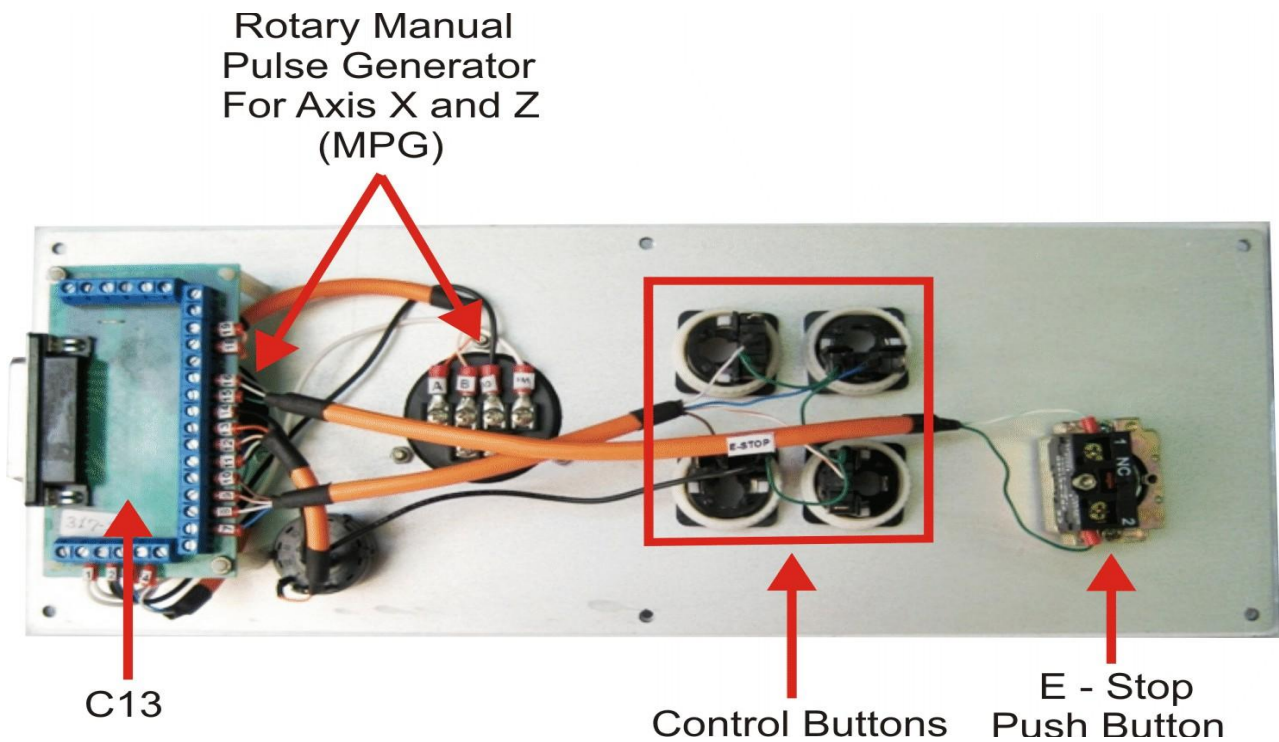
Read and follow instructions on the manual.

4.0 PANEL DESCRIPTION

4.1 Front Panel Description



4.2 Back Panel Description



5.0 CONFIGURATION

5.1 Guide for setting up over LTP2 using Mach3

1. Pinout:

PORT	PIN	PANEL FUNCTION	MACH FUNCTION
2	2	ENCODER A (AXIS Z)	MPG#2 A-Pin
2	3	ENCODER B (AXIS Z)	MPG#2 B-Pin
2	4	CYCLE START	OEM Trig #1
2	5	FEED HOLD	OEM Trig #2
2	6	SPINDLE ON/OFF	OEM Trig #3
2	7	FLOOD TOGGLE	OEM Trig #4
2	8	X100	OEM Trig #5
2	9	X10	OEM Trig #6
2	10	X1	OEM Trig #7
2	12	ENCODER A (AXIS X)	MPG#1 A-Pin
2	13	ENCODER B (AXIS X)	MPG#1 B-Pin
2	15	E-STOP	OEM Trig #8

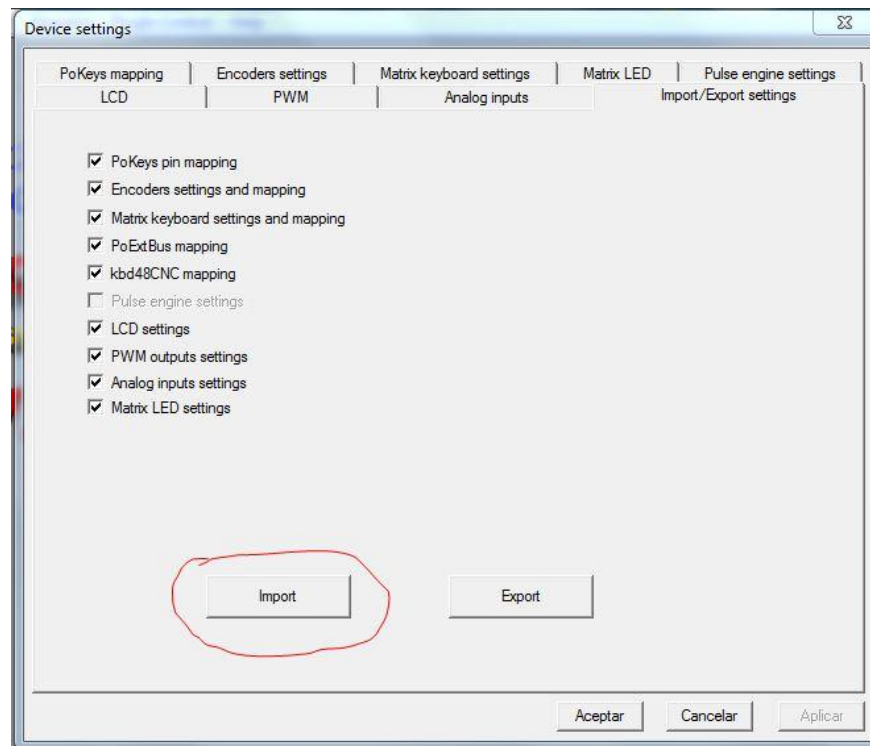
2. Download the Brain files "[MPG16 LPT2.zip](#)", extract it and load into: "C:\Mach3\Brains". Then enable the brains.

5.2 Guide for setting up over Pokeys using Mach3

1. Pinout

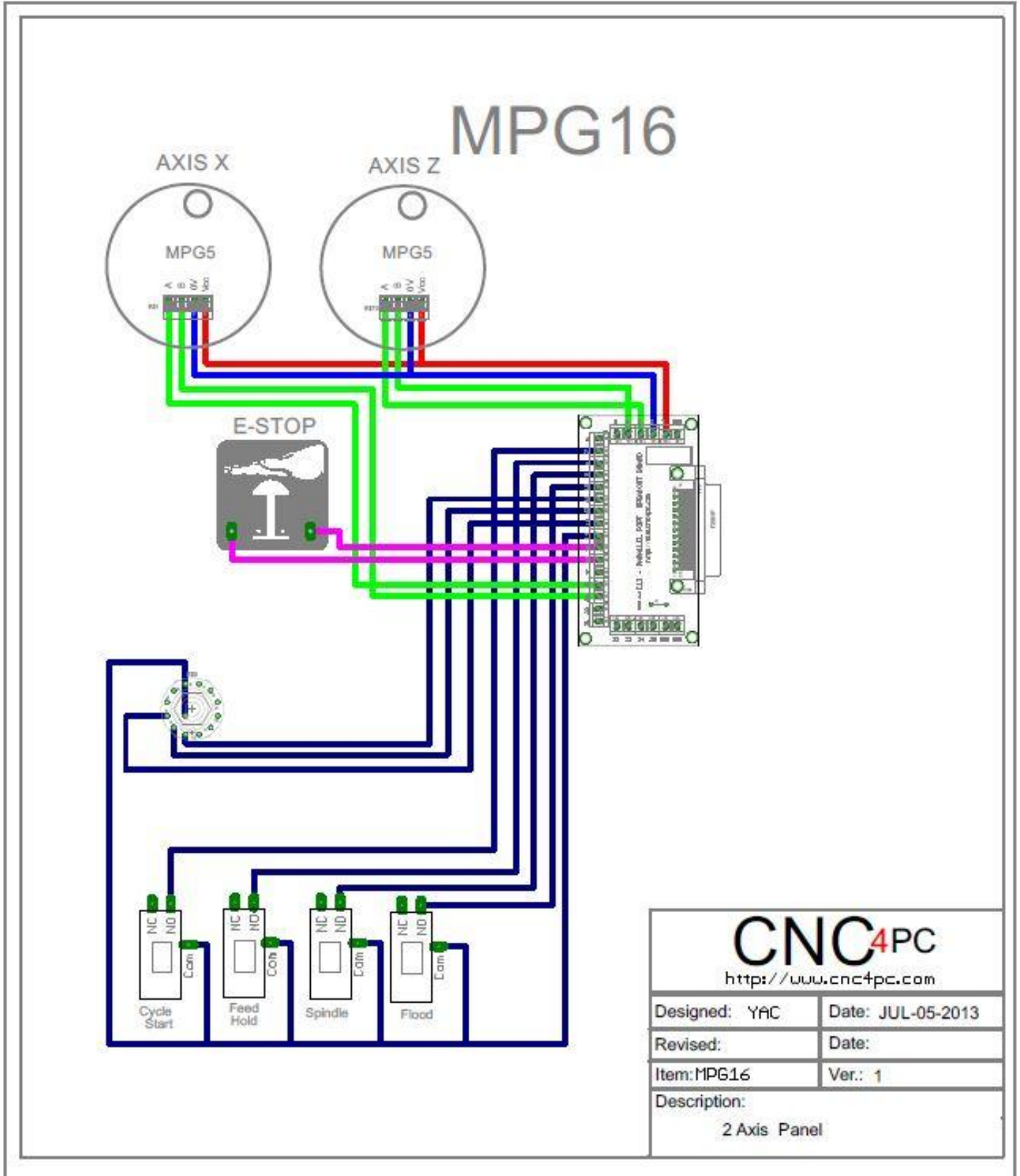
I/O	POKEYS PIN	POKEYS I/O	INVERT
I	1	ENCODER 1A	DISABLE
I	2	ENCODER 1B	DISABLE
I	13	ENCODER 2A	DISABLE
I	23	BUTTON 110	ACTIVATED
I	24	BUTTON 113	ACTIVATED
I	40	BUTTON 191	ACTIVATED
I	41	BUTTON 192	ACTIVATED
I	42	BUTTON 1000	ACTIVATED
I	46	BUTTON 194	ACTIVATED
I	51	BUTTON 1001	ACTIVATED
I	53	ENCODER 2B	DISABLE
I	55	INPUT E-STOP	ACTIVATED

2. Download the XML files "[MPG16 PK.zip](#)", extract it and load into: "C:\Mach3".
Go to Plugin Control/configure Pokeys56U/Import/Export Settings. Enable all and import.

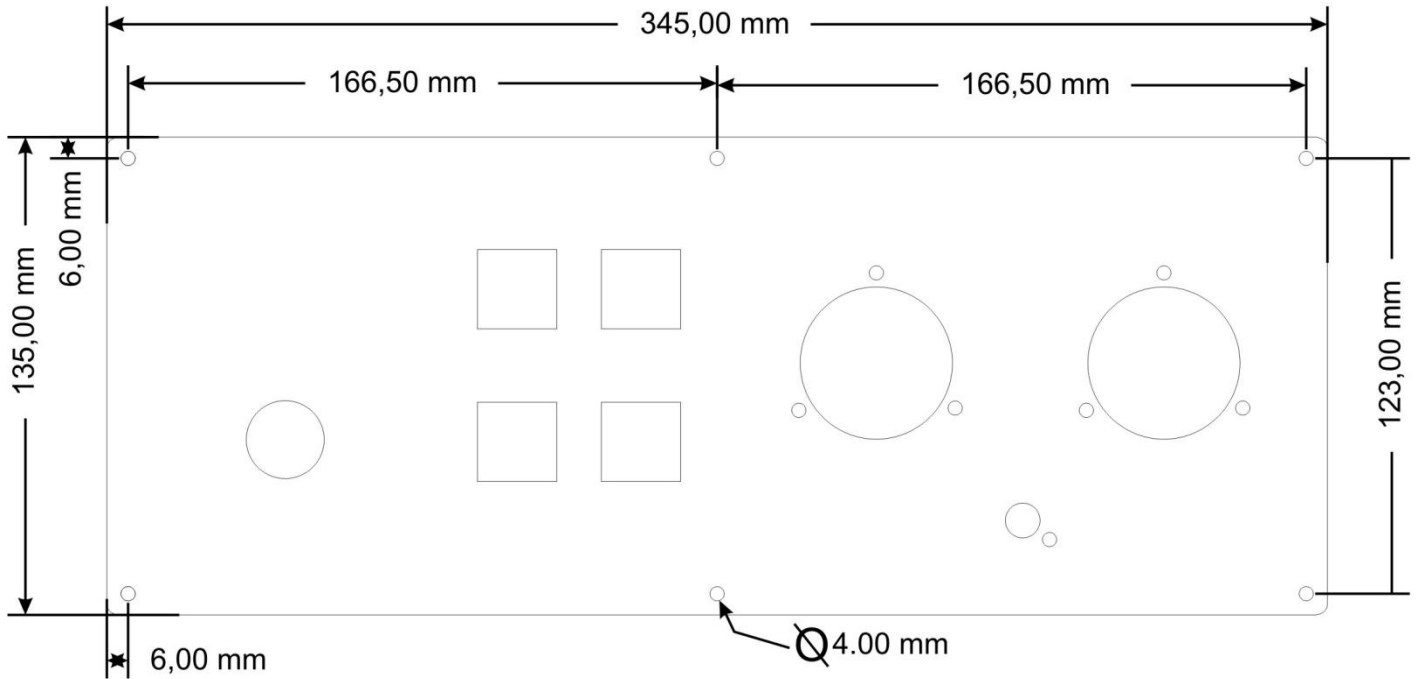


3. Import the file from its location and accept.

6.0 WIRING DIAGRAMS



7.0 DIMENSIONS



DISCLAIMER

Use caution. CNC machines could be dangerous. DUNCAN USA, LLC or Arturo Duncan are not liable for any accidents resulting from the improper use of these devices. This product is not fail-safe device, and it should not be used in life support systems or in other devices where its failure or possible erratic operation could cause property damage, bodily injury or loss of life.