



LINEAR ROBOTICS > X/Z HEAVY DUTY GANTRY ROBOTS > MGS-UC1

# MGS-UC1



## MGS-UC1 OPTIONS

### X AXIS NOMINAL STANDARD TRAVEL (MM)

- 1000
- 1500
- 2000
- 2500
- 3000
- 3500
- 4000
- 4500
- 5000
- 5250
- Custom

### Z AXIS NOMINAL STANDARD TRAVEL (MM)

- 250
- 500
- 750
- 1000
- Custom

### OPTIONS FOR:

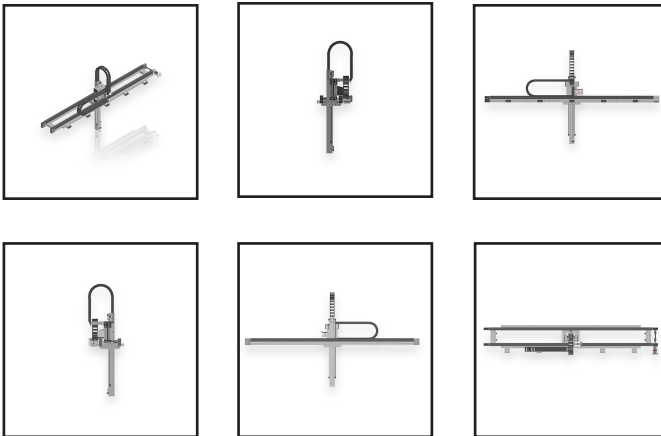
Sensors      Gearbox Ratios

### HOW TO BUILD YOUR MGS-UC1:

MGS - UC1 - **X** - x - **X**



Note: See mounting notes below for mounting relationship to payloads.



### Macron Solutions Since 1987

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### Macron Guarantee

All Macron actuators and belt drives are covered by our  
1-Year Warranty



# MGS-UC1

## MOUNTING NOTES AND PAYLOAD RELATIONSHIP TABLE

X Axis Travels (mm)	Mounting Style	Acceptable Payload (lbs)
1000	<b>'X' Axis Beams Mounted At Ends of Actuators</b>	150
1500		100
2000		58
2500		20
3000	<b>'X' Axis Beams Require Supporting Structure Over Actuator Length</b>	150
4000		
4500		
5000		
5250		

## SPECIFICATIONS

Specifications	
Maximum Speed - mm/sec - X Axis [Z Axis]	<b>5080 [10160]</b>
Unsupported X Axis Travels - mm (in steps of 500mm)	<b>1000 to 2500</b>
Unsupported Payload - lbs. (Dependant on X Axis travel)	<b>20 to 150</b>
Supported X Axis Travels - mm (in steps of 500mm)	<b>3000 to 5500</b>
Maximum Payload - lbs.	<b>150</b>
Z Axis Travels - mm (in steps of 250mm)	<b>250 to 1000</b>
Repeatability - mm	<b>+/-0.025</b>
Positional Accuracy - mm / meter	<b>+/-0.4</b>
Acceleration Max. - G's (dependant on payload)	<b>1 to 10</b>

## SPECIFICATIONS

Motor Sizing Information	
Weight of single shafted 40-25 drive pulley- 11.3oz.	<b>X &amp; Z axis</b>
Weight of double shafted 40-25 drive pulley- 17oz.	<b>X axis</b>
Weight of 40-25 idler pulley - 7.7oz.	<b>X axis</b>
Weight of single shafted 40-50 drive pulley- 28.4oz.	<b>N/A</b>
Weight of 40-50 idler pulley - 26.4oz.	<b>N/A</b>
Weight of Z Axis Beam - lbs. (dependant on travel)	<b>16 to 30</b>
Weight of Complete Z Axis - lbs. (dependant on travel)	<b>31.5 to 84</b>
Travel per Revolution - mm	<b>150</b>
Pulley Pitch Diameter - mm	<b>47.74</b>
Pulley Material / Width - mm	<b>steel / 25</b>
Rolling Resistance - lbs. (worst case with max payload)	<b>0.32</b>
Weight	
Weight - lbs. (dependant on travels)	<b>92 to 175</b>
<b>Sizing</b> - See mounting notes and payload relationship table for guidance	
X Axis Nominal Length Standard Unsupported - m	<b>**2.5</b>
X Axis Nominal Standard Travels - mm	<b>*1000 to 5250</b>
Z Axis Nominal Standard Travels - mm	<b>*250 to 1000</b>
* note: axes may be configured in lengths shorter or longer than standard ** note: for lengths longer than standard contact Macron for a MacBUILT option	

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