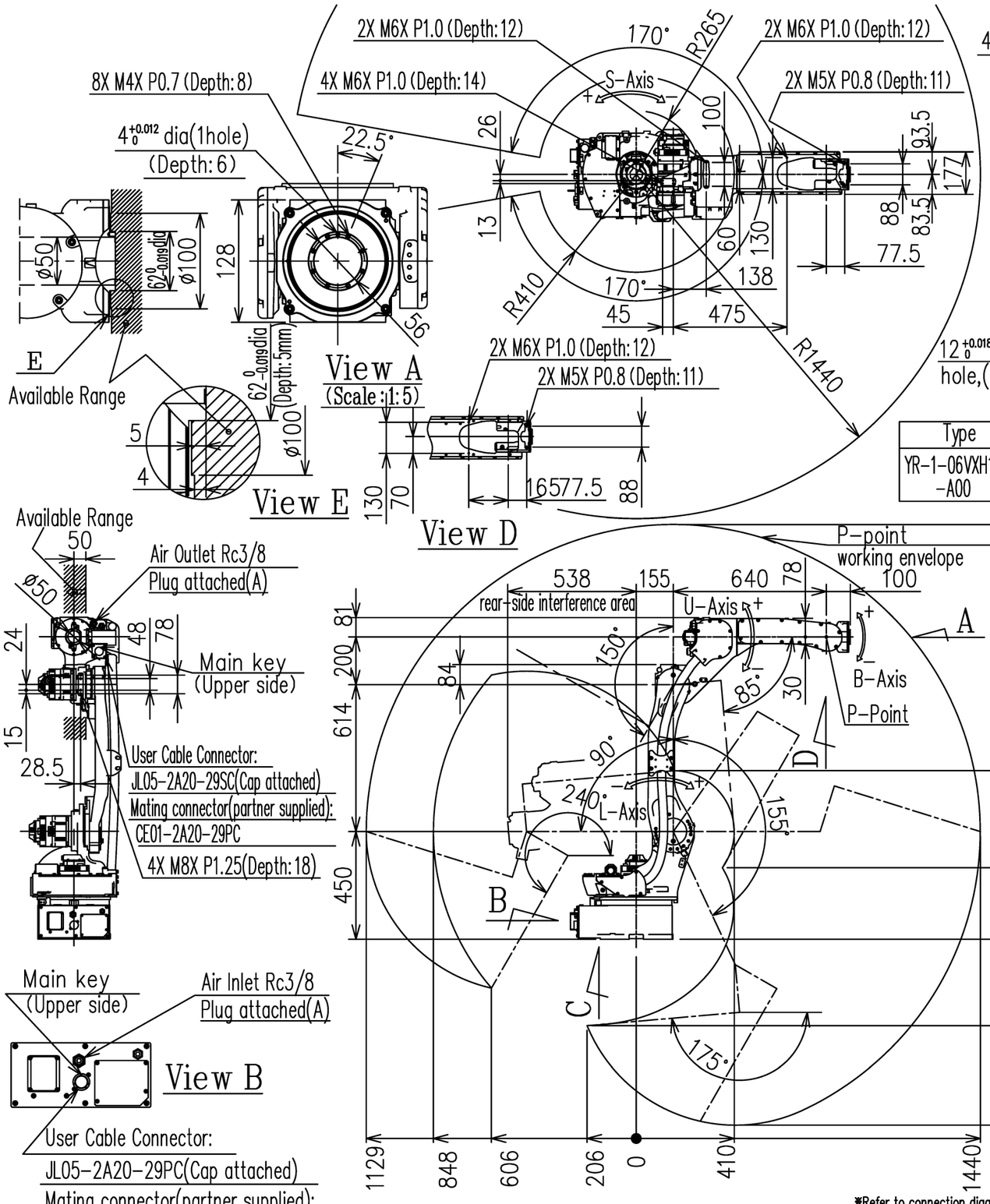

Type	Controller	Model	Specification
YR-1-06VXH12-A00	YRC1000	GP12/AR1440	STANDARD
	YRC1000micro	GP12	

Item \ Model		MOTOMAN-GP12/AR1440
Configuration		Vertically Articulated
Degree of Freedom		6
Payload	Wrist	12kg
	On U-arm (*1)	10kg
Repeatability (*2)		±0.02mm
Range of Motion	S-Axis	−170°– +170°
	L-Axis	−90°– +155°
	U-Axis	−85°– +150°
	R-Axis	−200°– +200°
	B-Axis	−150° – +150°
	T-Axis	−455°– +455°
Maximum Speed	S-Axis	4.53rad/s, 260°/s
	L-Axis	4.01rad/s, 230°/s
	U-Axis	4.53rad/s, 260°/s
	R-Axis	8.20rad/s, 470°/s
	B-Axis	8.20rad/s, 470°/s
	T-Axis	12.2rad/s, 700°/s
Allowable Moment	R-Axis	22N·m(2.2kgf·m)
	B-Axis	22N·m(2.2kgf·m)
	T-Axis	9.8N·m(1.0kgf·m)
Allowable Inertia (GD²/4)	R-Axis	0.65kg·m²
	B-Axis	0.65kg·m²
	T-Axis	0.17kg·m²
Mass		150kg
Protection rating		Body: IP54 Wrist: IP67
Mounting method (*3)		Floor-,Wall-,Tilt-,Ceiling-mounted
Ambient Conditions	Temperature	0°C – +45°C
	Humidity	20%RH – 80%RH(Non-condensing)
	Vibration acceleration	4.9m/s²(0.5G) or less
	Altitude	1000m or less
	Flatness for installation	0.5mm or less
	Others	•Free from dirt, dust, oil soot, or water •Free from explosive and corrosive gas or liquid •Free from excessive electrical noise (plasma) •Free from strong magnetic field
Power Requirements		1.5KVA
Applicable controller		YRC1000/YRC1000micro

※Refer to connection diagram for a reserved cable (DWG No.HW0383298) when using the connector: No.7 or No.8.

Notes:
*1 Load on the U-arm will vary depending on the load weight of the wrist part.
*2 Repeatability conforms to ISO9283. OPTIONAL MOTOCAL REQ'D. Robot must be at operating temperature.
*3 When the manipulator is installed on a slope or a wall, the motion of S-axis will be limited.
*4 The manipulator is in the home position.

Units: mm

TITLE	GP12/AR1440SS
DATE	12/1/2021
	ALL DIMENSIONS IN mm
Size: A3	Scale: 1:20

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Drawing No.	HW1384379PS
Sheet #	1 OF 1
	FOR PARTNER USE
Rev.	0