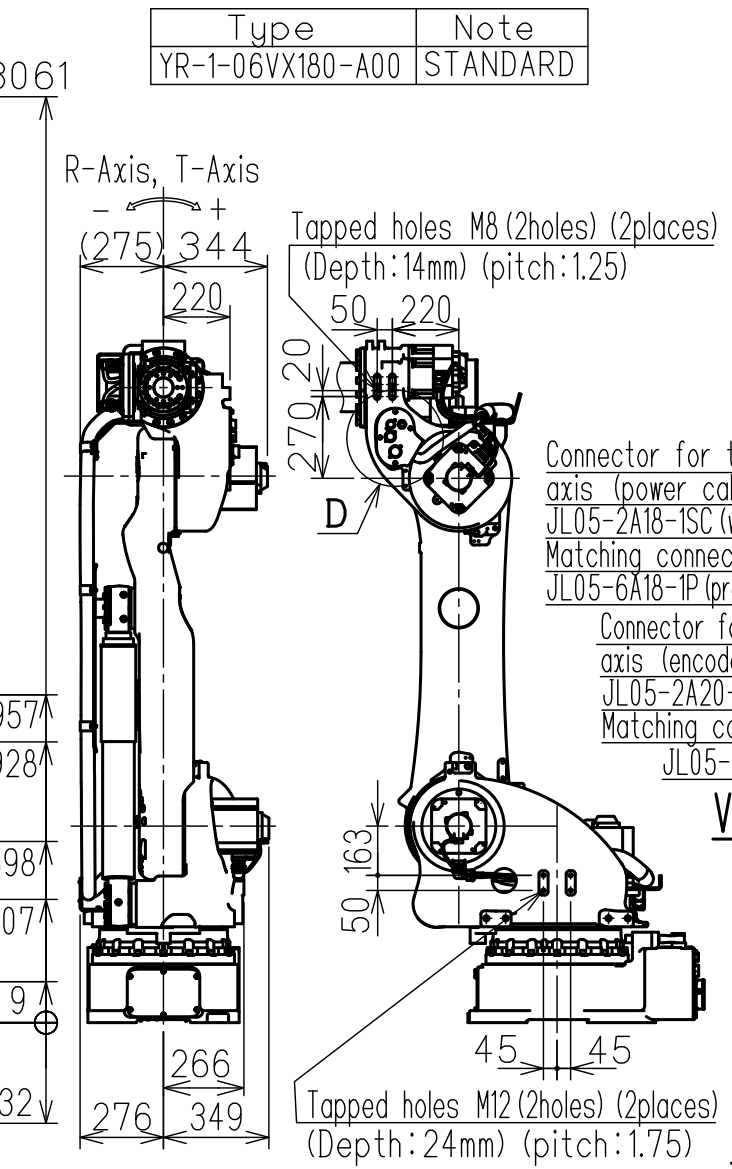
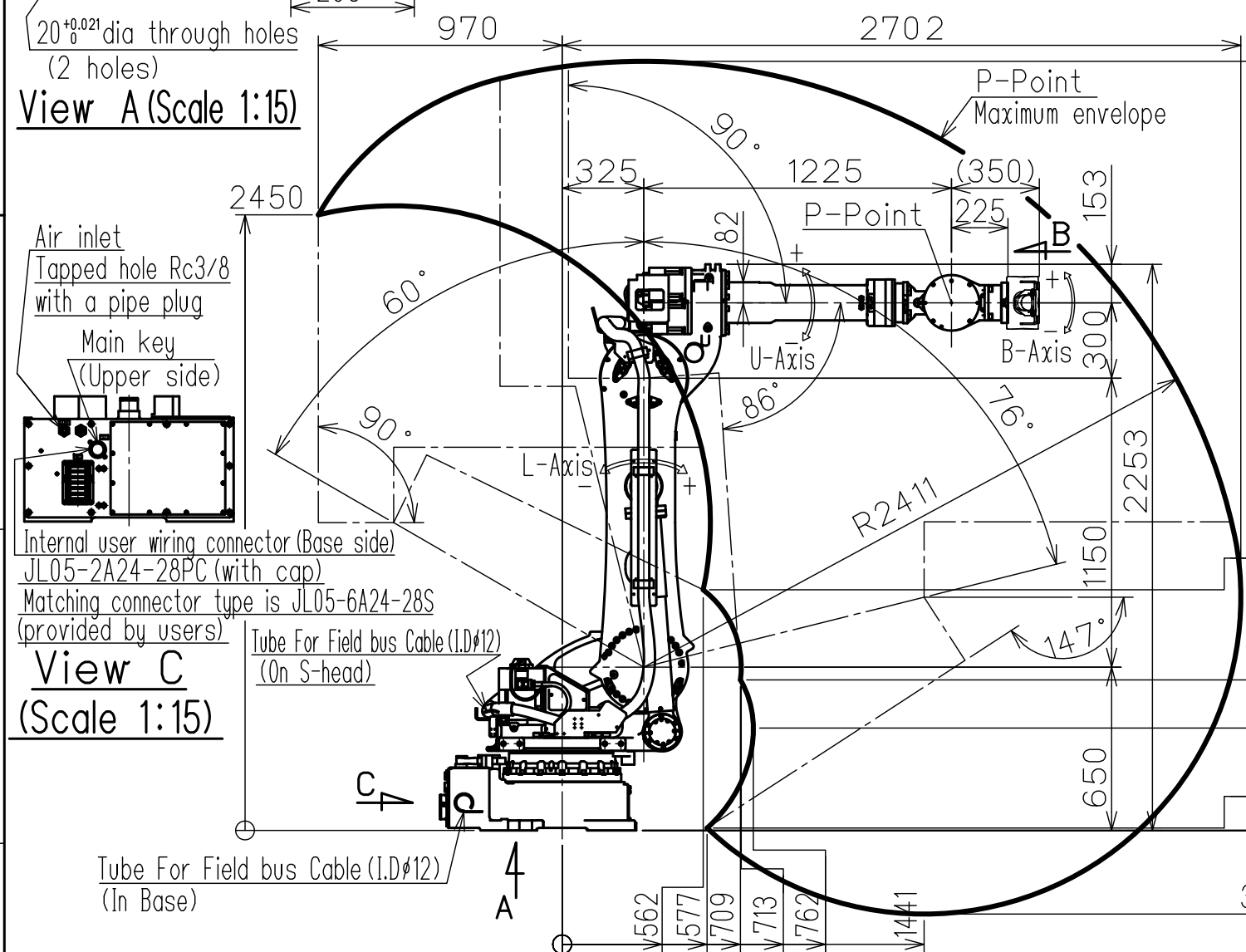
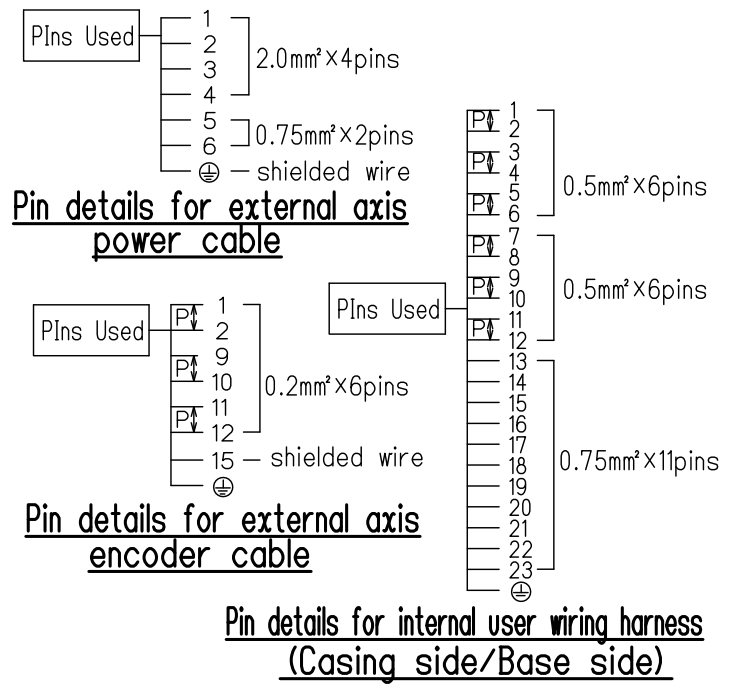
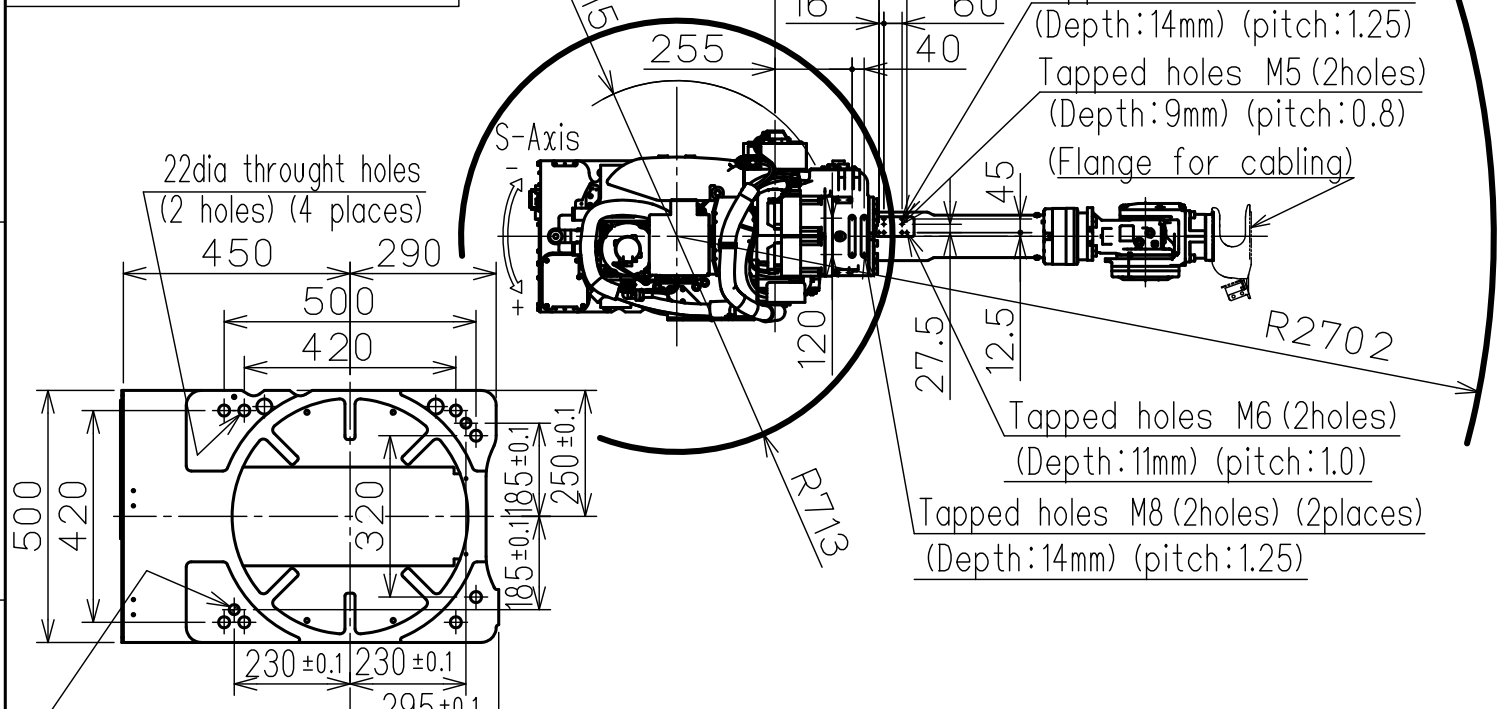
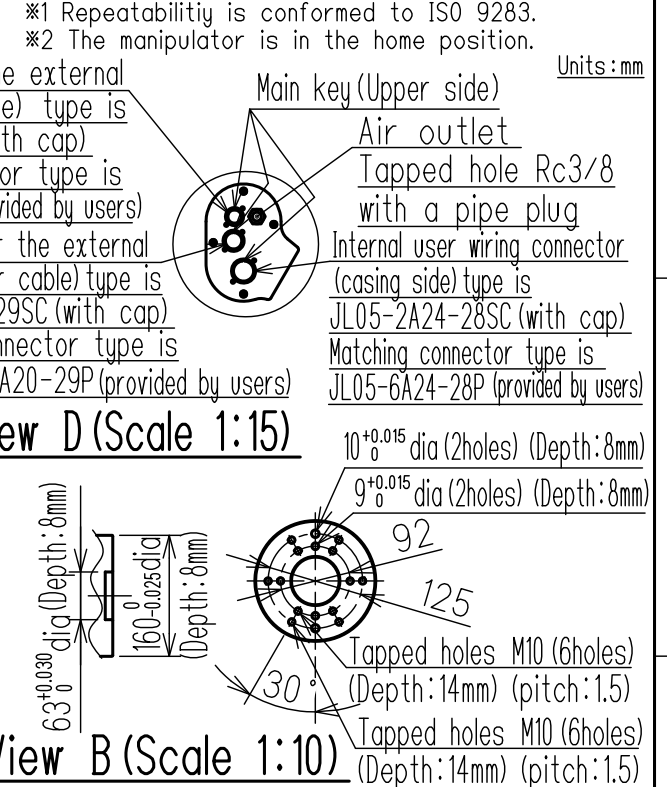


DWG.NO. HW1385422

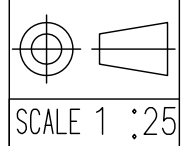


Item	Model	MOTOMAN-SP165
Flange for Cabling	not-equipped	equipped
Configuration	Vertically articulated	
Degree of Freedom	6	
Payload	Wrist	180 kg
	On U-arm	30kg
Repeatability (※1)	0.05 mm	
Range of Motion	S-Axis (Turning)	-180° - +180°
	L-Axis (Lower Arm)	-60° - +76°
	U-Axis (Upper Arm)	-86° - +90°
	R-Axis (Roll)	-360° - +360°
	B-Axis (Pitch/Yaw)	-210° - +210°
Max Speed	B-Axis	-130° - +130°
	T-Axis	-360° - +360°
	S-Axis	2.18 rad/s, 115° /s
	L-Axis	2.01 rad/s, 115° /s
Allowable Moment	U-Axis	2.18 rad/s, 125° /s
	R-Axis	3.18 rad/s, 182° /s
	B-Axis	3.05 rad/s, 175° /s
	T-Axis	4.63 rad/s, 265° /s
Allowable Inertia (GD²/4)	R-Axis	1000 N·m (102kaf·m)
	B-Axis	951 N·m (97kaf·m)
	T-Axis	618 N·m (63kaf·m)
Approx. Robot mass	1020kg	
Protected structure	Body:IP54 Wrist:IP67	
Mounting method	Floor-mounted	
Ambient Conditions	Temperature	0 to +45°C
	Humidity	20 to 80%RH (Non-condensing)
	Vibration	4.9m/s² (0.5G) or less
	Altitude	1000m or less
	Others	• Free from explosive or corrosive gas and liquid. • Free from dust, soot, oil, or water. • Free from electrical noise. • Free from strong magnetic fields.
Power Requirements	5.0kVA	
Controller	YRC1000	



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3. No warranty is given in relation to the data including the specification.  
4. We are not responsible for any damages or loss caused by the use of the data.

FOR STUDY PURPOSE ONLY



**YASKAWA**  
株式会社 安川電機

Reference Drawing

TITLE MOTOMAN-SP165  
DIMENSION DIAGRAM

DRWN DATE Oct.03.'17  
DWG.NO. HW1385422

SIZE A3