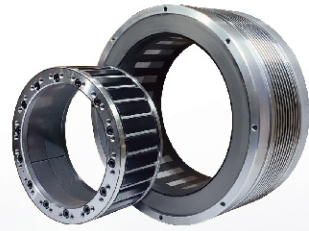


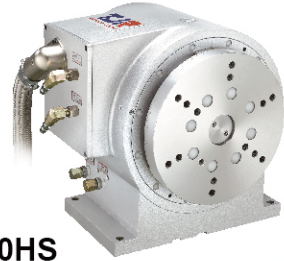
## The 4th & 5th Axis Direct Drive Motor Series The 4th Axis Direct Drive Motor Series

- Pneumatic Brake

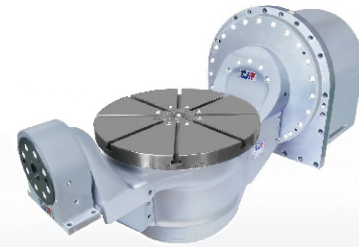


D.D. Motor

**AD-250HS**  
(super high speed: 2000 rpm)  
Can work as a mill / turn component



**FAD-300F-HS**  
Tilt axis : 50 rpm  
Rotary axis : 2000 rpm



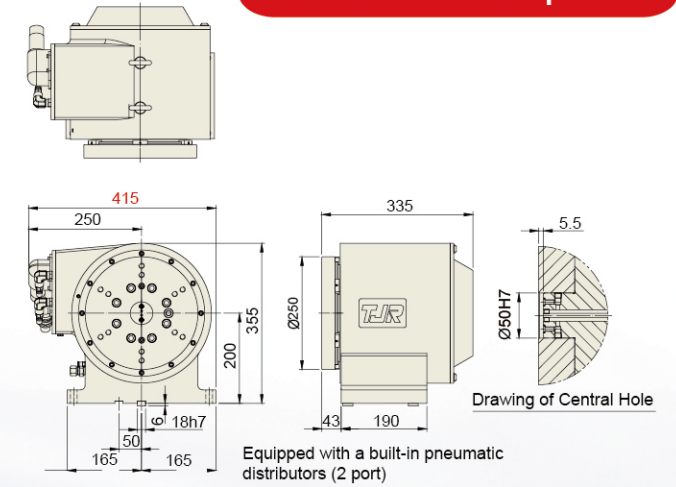
FAD-500FHS-AD500i-480



**FAD-400HS-AD500i-420**  
(The faceplate can be customized.  
Please refer to the below drawing for the standard faceplate.)

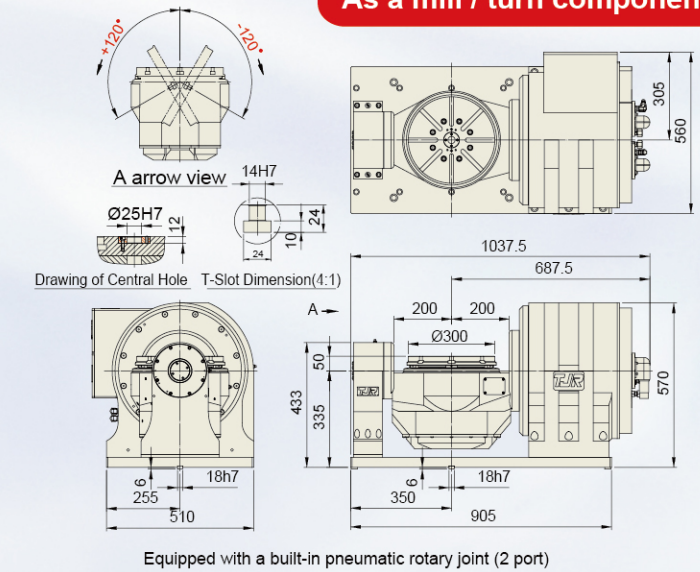
### AD-250HS (2000 rpm)

As a mill / turn component



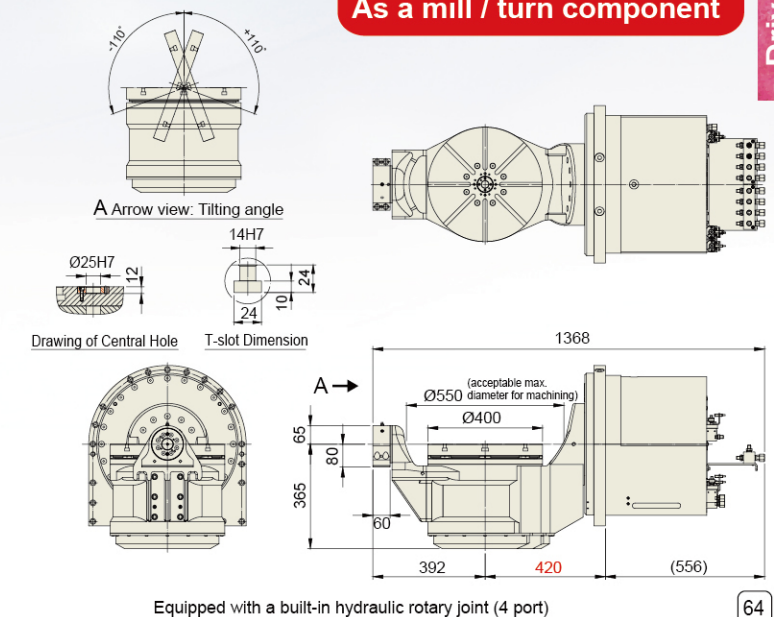
### FAD-300F-HS (2000 rpm)

As a mill / turn component



### FAD-400-HS (1200 rpm)

As a mill / turn component



Item	Unit	As a mill / turn component		Two D.D. Motors : 2000 rpm As a mill / turn component		FAD-400HS-AD500i-420 / FAD-500FHS-AD500i-480	
		AD - 250HS	FAD-300F-HS	FAD-400HS-AD500i-420	FAD-500FHS-AD500i-480		
Table Diameter	mm	Ø250	Ø300	Ø400 / Ø500			
Diameter of Table Central Hole	mm	Ø50H7 x 5.5 deep	Ø25H7 x 12 deep	Ø25H7 x 12 deep			
Inner Diameter of Mandrel Sleeve	mm	-	-	-			
Diameter of Center Through Hole	mm	-	-	-			
Center Height (Vertical)	mm	200	-	-			
Table Height (Horizontal)	mm	335	385	-			
Table T-slot Width	mm	-	14H7	14H7			
Guide Block Width	mm	-	14h7	-			
Axis	-	-	Rotary axis	Tilt axis ±120°	Rotary axis	Tilt axis ±110°	
Cooling System	-	Water Cooling	Water Cooling	Water Cooling	Water Cooling	Water Cooling	
Transmission Mechanism	-	D.D. Motor	D.D. Motor	D.D. Motor	D.D. Motor	D.D. Motor	
Min. Increment	deg.	0.001	0.001	0.001	0.001	0.001	
Indexing Precision (while tilt 0°~+90°)	sec.	20	20	30	20	25	
Repeatability	sec.	4	4	4	4	4	
Clamping System (Pneumatic)	kgf/cm <sup>2</sup>	6	6	6	6	6	
Clamping Torque	Nm	450 (Powerful)	430	730	850	2000	
Servo Motor Model	-	DD Motor	DD Motor	DD Motor	DD Motor	DD Motor	
Speed Reduction Ratio	-	Direct Drive	Direct Drive	Direct Drive	Direct Drive	Direct Drive	
Rated / Max. Speed	r.p.m	1100 / 2000	818 / 2000 (600VDC)	50 / 50	596 / 1200 (Ø400) or 596 / 800 (Ø500)	50 / 50	
Rated / Max. Cutting Torque	Nm	113 / 169	113 / -	554 / 741	402 / -	1217 / 2120	
Allowable Inertia Load Capacity (Horizontal)	kg·cm·sec <sup>2</sup>	3.1	-	-	40 (Ø400) / 62.5 (Ø500)		
Allowable Workpiece	kg	-	100 (Rated Speed)	-	200 (balanced load)		
Load (dynamic)	kg	Vertical 50	100 (Rated Speed)	-	100 (balanced load)		
Allowable Load (with clamping)	F	N	10000	-	15000		
	FxL	Nm	1150	730	2000		
	FxL	Nm	550	430	850		
Net Weight (D.D motor included)	kg	158	730	-	- (Ø400) / 914 (Ø500)		
<b>Electrical Specification</b>							
Encoder	-	Subject to demand and controller		Renishaw or Heidenhain		Renishaw or Heidenhain	
Voltage (Back E.M.F)	Vrms/100rpm	33		Rotary axis : 33		Rotary axis : 45.55	
Rotor Poles	-	22		22		44	
Rated / Max. Current	Arms	26.5 / 50.2		26.5 / 50.2		Rotary axis : 66.9 / 151	
Power Rating	KW	9.9		9.9		4.7	

Driven by Direct Drive Motor

Driven by Direct Drive Motor