

### 3.4 Machine Specifications

#### a. Mechanical specifications

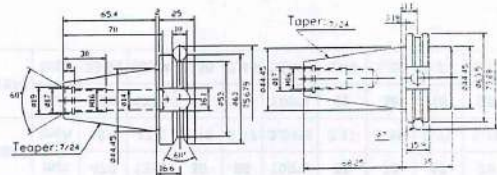
ITEM		UNIT	VMC850	VMC1020	VMC1270		
Table	Working surface	MM	1000*450	1200*470	1370*600		
	T-slot (size * number * pitch)	MM	18*4*100	18*4*100	18*5*100		
	Max. Table load	Kg	500	650	950		
Travel	longitudinal travel (X-axis)	MM	850	1020	1270		
	Cross travel (Y-axis)	MM	510	510	635		
	Vertical travel (Z-axis)	S type	MM	510	510	515	
		A type	MM	630	630	635	
	Distance from spindle end to table	S type	MM	93~603	85~595	100~615	
		A type	MM	93~723	85~715	100~735	
Distance from spindle center to column	MM	550	550	655			
Spindle	Spindle nose taper			#40			
	Spindle speed	Gear Pulley	R.P.M. R.P.M.	40~8000 60~8000			
Feed	Cutting feed rate		MM / MIN.	1~12000	1~12000		
	Rapid traverse	X, Y axis	MM / MIN.	18000	20000	20000	
		Z axis	MM / MIN.	16000	16000	20000	
ATC(Automatic tool changer)	Tool storage capacity	S type	PCs	20			
		A type	PCs	20/24			
	Max. tool weight		Kg	6			
	Max. tool size (diameter * length)	S type	MM	90*250			
		A type	MM	90*250/76*250			
	Tool selection			Random			
	Tool change time (approx)	S type	SEC.	7			
		A type	SEC.	5			
	Tool shank			BT40/CAT40			
	Tool stud bolt			MAS-P40T-1			
Motor	Spindle drive motor (30 min rating)	KW(HP)		7.5 (10)	11 (15)		
		KW(HP)		7.5 (10)	11 (15)		
	X, Y, Z axis drive motor	MITSUBISHI		HA80	HA100	HA100	
		FANUC		α 6	α 12	α 12	
HEIDENHAIN			QSY090B				
Other	Required air pressure		Kg/cm <sup>2</sup>	6.5			
	Electric Power consumption		KVA	18.55	23	29	
	Electric Power consumption (HEIDENHAIN)		KVA	27	27	27	
	Machine Weight	S type		Kg	5400	5600	7000
		A type		Kg	5600	5800	7200

### 3.5 Tool Specification

#### (1) Tool Shank And Pull Stud Bolt Drawing

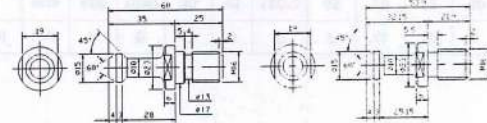
Tool Shank (BT-40)

Tool Shank (CAT-40)

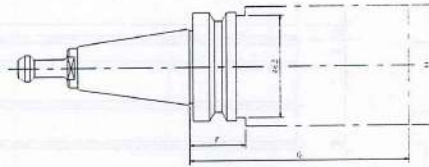


Pull Stud Bolt (P40T-1)

Pull Stud Bolt (For CAT40 Use)



#### (2) Limitation Of Tool Length And Wwight



Machine	Tool shank	Pull stud bolt	F	G	H	Weight
VMC 1270	BT-40	P40T-1	30mm	250mm	90mm	6kg
	CAT-40	CAT-40	(1.181")	(9.842")	(3.0543")	(13lb)