

FF120 Specifications

ABOUT FF SERIES

The FF range of hybrid machines encompass the benefits of electric drive with the practicalities of hydraulic operation, resulting in the perfect blend of efficiency and value. The FF series uses servo motors for absolute accuracy with the combination of hydraulic movements for linear movements such as carriage movements and core pull sequences. Optimising the drive method for the movement is where this range of machine really appeals.



FEATURES

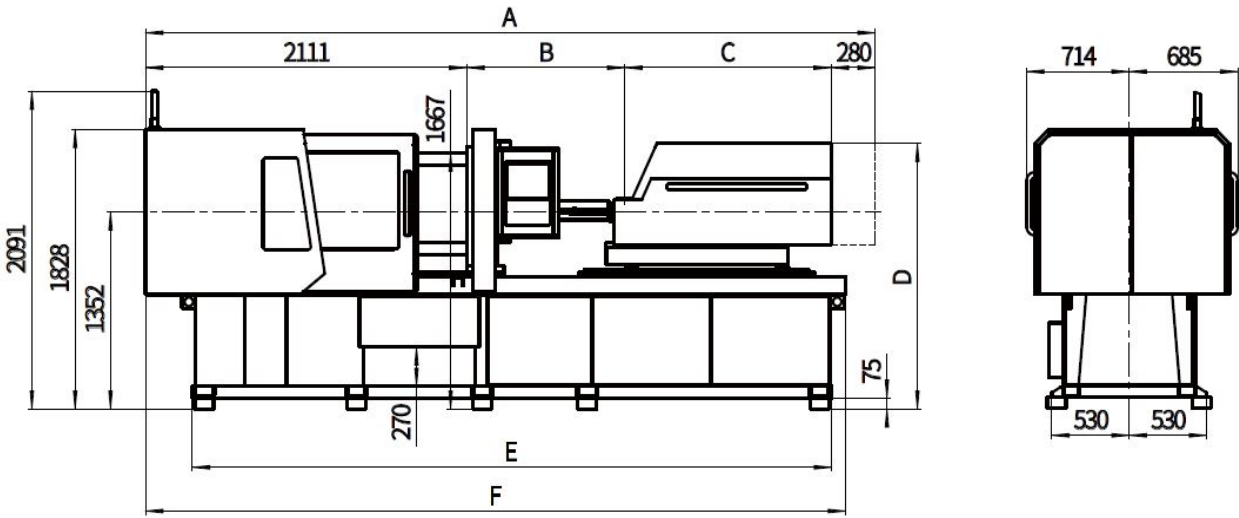
- › Electric and hydraulic hybrid machine.
- › Three servo motors control injection, plasticising and clamping.
- › KEBA 12-inch colour touchscreen
- › Hydraulic Double core pull.
- › Double air blast.
- › Semi-auto start on flying lead.
- › Euromap 67 interface.
- › Choice of change over to holding pressure by position, pressure, speed or time.
- › Anti-vibration mounts.
- › Industry 4.0 ready.
- › Each machine supplied with small spares package.
- › Tool kit to suit machine.
- › Linear bearings on the injection unit and clamp unit give improved alignment, eliminate stiction, reduce lubrication contamination, and offer increased accuracy.
- › Automatic mould height adjustment.
- › Platen with T-slots, mould mounting holes, and full set of mould clamps.
- › Monitored central lubrication system.
- › Hydraulic ejector with ejector plate and though holes and quick release coupling.
- › Contact free tie bars give improved platen parallelism, reduced energy consumption and a contaminant free moulding area.
- › 24-month warranty supported by STV Machinery's own in-house, UK team of Yizumi trained engineers.

OPTIONAL EXTRAS

- › Bi-metallic plasticising unit (ask us about the grades available to suit your material).
- › Gas injection interface.
- › Interface for magnetic platens.
- › Interface for mould cavity pressure transducer.
- › Increased maximum mould height option.
- › Shut-off nozzle (hydraulic or pneumatic).
- › Infrared heater bands.
- › KEBA controller upgrade options
- › Turnkey packages including robots & ancillaries.
- › Remote login support for rapid process assistance and fault finding.
- › Integrated hot runner controls.
- › Conversion to full electric.

INJECTION UNIT		IU200 / IU200h			IU320 / IU320h			IU430 / IU430h		
		A	B	C	A	B	C	A	B	C
Screw diameter	mm	26	30	35	30	35	40	35	40	43
Shot volume	cm ³	74	99	135	117	159	207	164	214	247
Shot weight	(PS) (g)	68	91	124	107	146	191	150	197	227
Injection pressure	MPa	266	200	147	272	200	153	261	200	173
Holding pressure	MPa	213	160	118	218	160	123	209	160	138
Injection rate	cm ³ /s	106	141	192	141	192	251	192	251	290
Injection speed	mm/s	200 / 350			200 / 350			200 / 300		
Screw speed	rpm	400			400			400		
Screw stroke	mm	140			165			170		
Screw L/D ratio	L/D	22	22	20	24	20	20	24	20	20
Stroke bore ratio		5.4	4.7	4.0	5.5	4.7	4.1	4.9	4.3	4.0
Nozzle contact force	kN	20			30			40		
Heating power	kW	5.64	6.94	7.54	6.92		7.8	8.97		
CLAMPING UNIT										
Clamping force	kN	1200								
Platen size	mm	705 x 705								
Distance between tie-bars	mm	480 x 480								
Mould thickness (min - max)	mm	150 - 480								
Max. opening stroke	mm	370								
Ejector stroke	PCS	100								
Ejector force	mm	40								
No. of Ejectors	PCS	5								
GENERAL										
Total power	kW	34.9 / 37.3			36.7 / 52.7			48 / 56.9		
Total current	A	59 / 63			62 / 89			81 / 96		
Oil pump motor	kW	10								
Max. system pressure	MPa	16								
System flow	L/min	50								
Oil tank capacity	L	106								
Machine weight	kg	4800			4940			5400		

MACHINE DIMENSIONS



Model	A(A/B/C Screw)	B(A/B/C Screw)	C	D	E	F
IU200	4375/4481/4540	721/827/886	1263	1820		
IU320	4735/4735/4810	866/866/941	1478	1822	4386	4821
IU430	4853	1007	1455			

PLATEN DRAWINGS

