SEBECOMP009

SHOP MANUAL

KOMATSU®

COMPONENT OF ENGINE

APPLICABLE COMPONENT

TURBOCHARGER

AIR COMPRESSOR

FUEL INJECTION PUMP

FUEL INJECTION PUMP GOVERNOR

FUEL SUPPLY PUMP (COMMON RAIL TYPE)

WATER PUMP

FUEL PUMP

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SPECIFICATIONS

Machine model		HD785-3, HD985-3
Engine model		SA12V140-1 (Mounts 2 fuel injection pumps)
Fuel injection pump type		KFE6S135R-1
Dimensions (length x width x height)	mm	526 × 139 × 320
Weight	kg	30.0 (Not including flyweight) *1
Direction of rotation		Clockwise
Firing order		1 – 5 – 3 – 6 – 2 – 4
Injection interval		60° ± 20'
Plunger diameter	mm	13.5
Cam lift (plunger stroke)	mm	13.5
Prestroke *2	mm	4 – 6
Delivery valve cracking pressure	MPa (kg/cm²)	1.70 (17.3)
Equal pressure valve cracking pressure (built into delivery valve)	MPa (kg/cm²)	9.80 (100)
Delivery valve retraction volume *3	mm³/st.	—

*1 : The flyweight mentioned here is the small flyweight connecting the fuel injection pump and the engine.

*2 : With this pump, the prestroke automatically varies within the range shown in the chart. (This is called the prestroke control and is a special function of the fuel injection pump with electronic governor.)

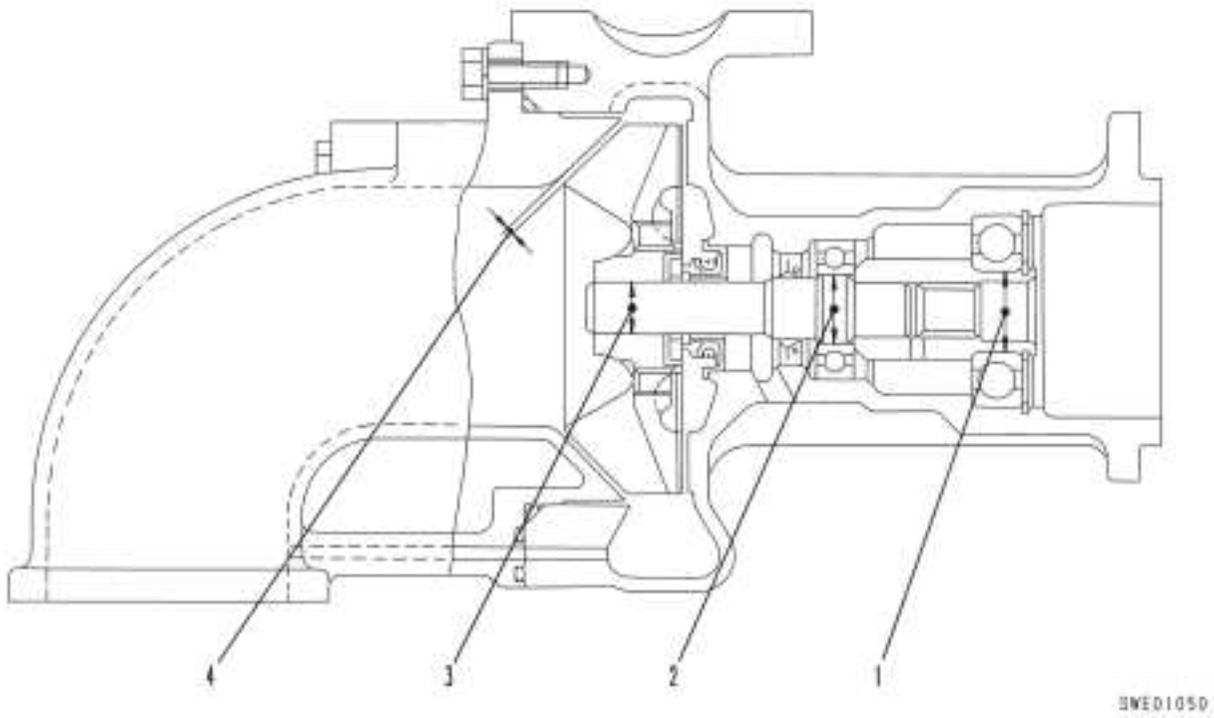
*3 : The delivery valve on this pump is an equal pressure type, so it differs from the normal equal volume type, so it does not have a retraction function. However, the ability to stop the flow of fuel after the completion of injection is good in the same way as the equal volume type.

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170 SERIES

S(A) 6D170 SERIES



Unit: mm

No.	Check item	Criteria				Remedy
		Basic dimension	Allowance		Standard interference	
			Shaft	Hole		
1	Interference between front shaft and bearing	30	+0.015 0	0 −0.010	0 – 0.025	Replace
2	Interference between rear shaft and bearing	25	+0.010 0	0 −0.010	0 – 0.020	
3	Interference between rear shaft and impeller	19.9	+0.020 +0.005	−0.025 −0.05	0.030 – 0.070	
4	Clearance between impeller and connection	Standard clearance		Allowable clearance		
		0.23 – 0.66		—		

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