CEBM025205

Shop Manual

KOMATSU®

PC360LC-10
PC390LC-10

HYDRAULIC EXCAVATOR

SERIAL NUMBERS **PC360LC-10 A32001 and up**
PC360LC-10 K64001 and up
PC390LC-10 A30001 and up

ENGINE **6D114E-5**

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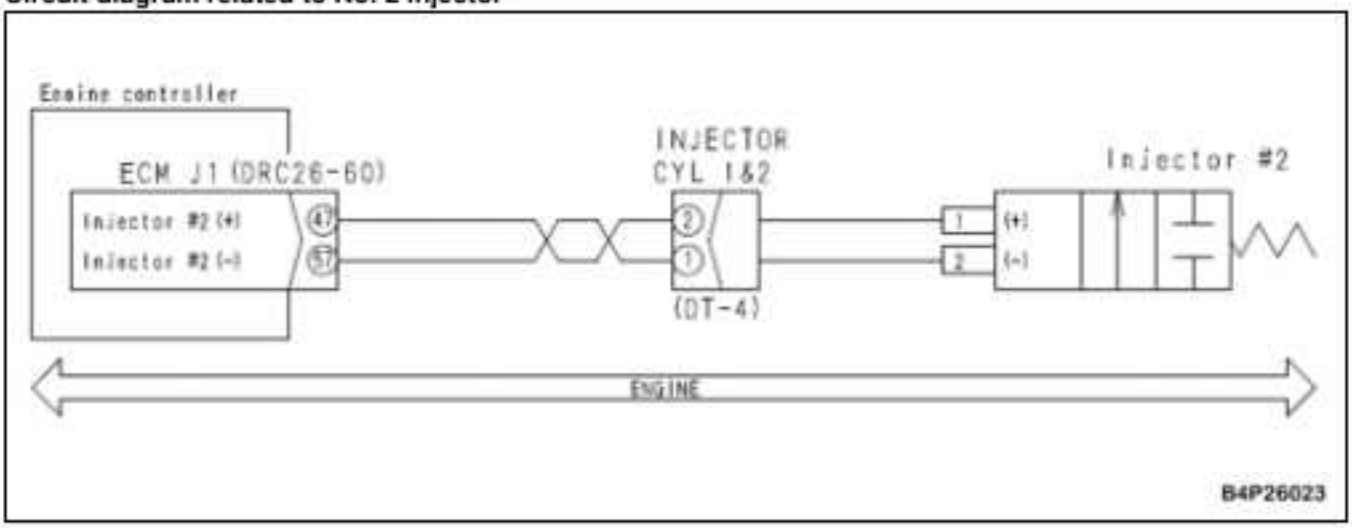
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Machine model	PC360LC-10	PC390LC-10
Serial number	A32001 and up	A30001 and up
Boom cylinder head pin	56 kgs (124 lbs)	56 kgs (124 lbs)
Arm cylinder bottom pin	21 kgs (46 lbs)	21 kgs (46 lbs)
Arm cylinder head pin	17 kgs (38 lbs)	17 kgs (38 lbs)
Boom and arm connecting pin	42 kgs (93 lbs)	42 kgs (93 lbs)
Bucket cylinder bottom pin	13 kgs (29 lbs)	13 kgs (29 lbs)
Bucket pin	30 kgs (66 lbs) × 2	30 kgs (66 lbs) × 2
Bucket link pin	27 kgs (60 lbs) × 2	27 kgs (60 lbs) × 2

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6	Short circuit in wiring harness	1. Turn starting switch to OFF position. 2. Disconnect connectors ECM J1 and INJECTOR CYL 1 & 2, and connect T-adapters female side of ECM J1. ★ Check by using multi meter in continuity mode.		
		Continuity	Between ECM J1 (female) (47) and each pin other than (47)	No continuity (no sound is heard.)
			Between ECM J1 (female) (57) and each pin other than (57)	No continuity (no sound is heard.)
7	Defective injector of other cylinder	If failure codes for other injectors is also displayed, perform troubleshooting for them, too.		
8	Defective injector harness of other cylinder	If failure code for other injectors is also displayed, perform troubleshooting for it first.		
9	Defective engine controller	If no failure is found by above checks, engine controller is defective. (Since this is an internal defect, troubleshooting cannot be performed.)		

Circuit diagram related to No. 2 injector



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CA3251 - KDOC Inlet Temp High Error

Action level	Failure code	Failure	KDOC inlet temperature high error (Engine controller system)
L03	**CA3251**		
Details of failure	The KDOC inlet temperature is continuously high.		
Action of controller	• Closes EGR valve. • Limits engine output and allows engine to run • A default value (250°C {482°F}) is substituted for the KDOC inlet temperature.		
Problem on machine	Engine output lowers.		
Related information	**WARNING!** Since the temperature of the KDPF and KDOC will become higher than 500°C {932°F}, take care not to get burn injury. • Signal voltage from the KDOC inlet temperature sensor can be checked by using monitoring function. (Code: 47301 (V)) • Temperature sensed by the KDOC inlet temperature sensor can be checked by using monitoring function. (Code: 47300 (°C)) • Signal voltage from the KDOC outlet temperature sensor can be checked by using • monitoring function. (Code: 47401 (V)) • Temperature sensed by the KDOC outlet temperature sensor can be checked by using monitoring function. (Code: 47400 (°C)) • Signal voltage from the KDPF outlet temperature sensor can be checked by using monitoring function. (Code: 47201 (V)) • Temperature sensed by the KDPF outlet temperature sensor can be checked by using monitoring function. (Code: 47200 (°C)) • The KDOC inlet temperature, KDOC outlet temperature, and KDPF outlet temperature at idle (not regenerating) will all be approximately 100 - 250 °C {212 - 482 °F} and the difference between these temperatures will be approximately 10 °C {50 °F} (KDOC inlet temperature > KDOC outlet temperature > KDPF outlet temperature). 1) If misfire occurs at the injector, the combustion is impaired causing high exhaust temperature. 2) When there is a problem in any of the cylinders, fuel injection at other cylinders may be increased to compensate for the torque drop, causing high exhaust temperature. • Method of reproducing failure code: Starting switch: ON [Clearing failure codes] • Start the engine and run at low idle for approximately 10 minutes. • If an error code is displayed, run the engine at high idle for two more minutes.		

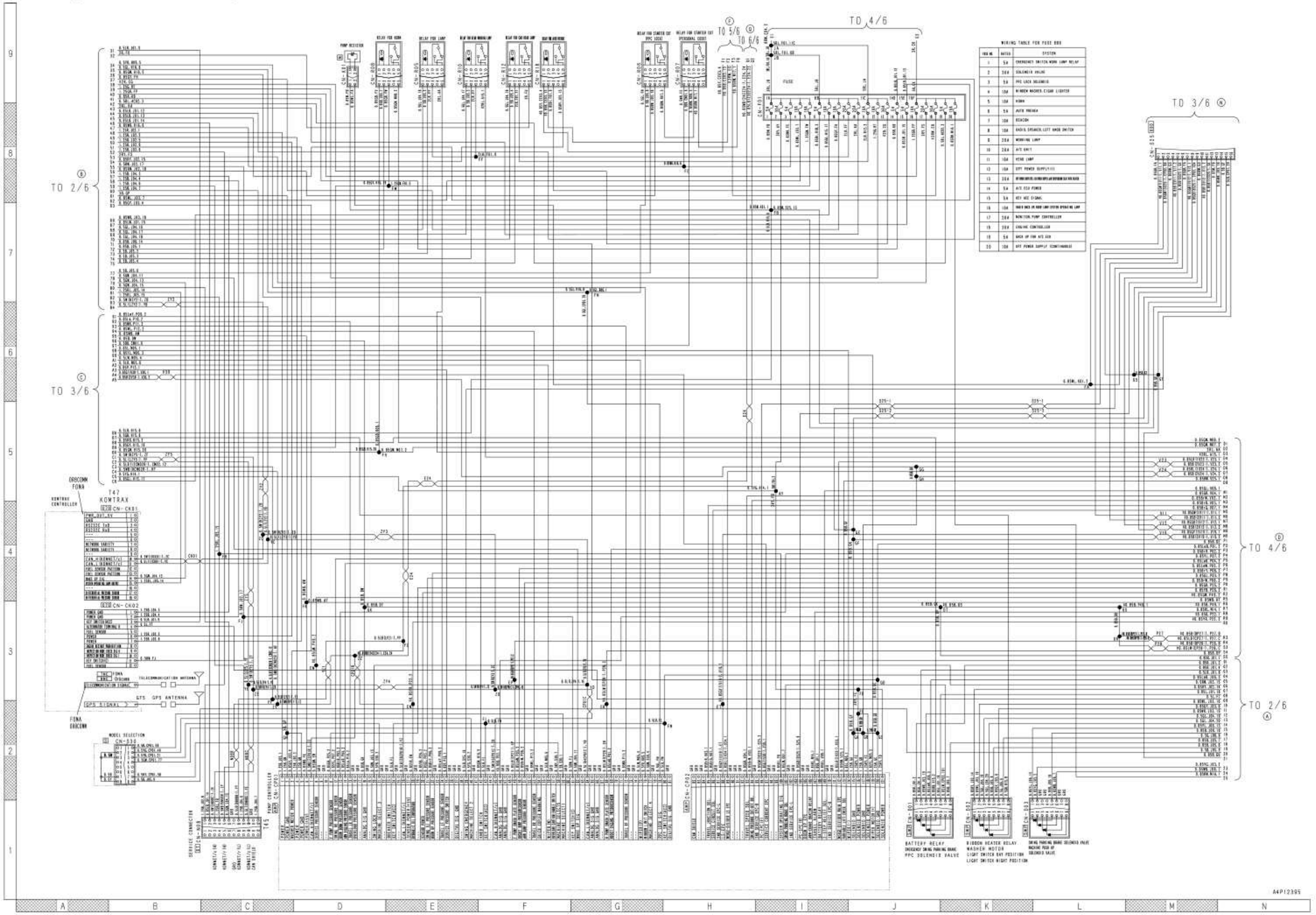
No.	Cause	Procedure, measuring location, criteria and remarks		
1	Defective wiring harness connector	1. See descriptions of wirings harness and connectors in "c: Electrical equipment" in "Checks before troubleshooting" of "General information on troubleshooting", and check them. 2. Starting switch: ON		
		If this failure code does not appear, the wiring harness connector is defective. ★ If this failure code appears, perform the following.		
2	Defective KDOC inlet temperature sensor	If failure code [CA3313], [CA3314], or [CA3315] appears, carry out troubleshooting for it first.		
3	Short circuit in wiring harness	1. Starting switch: OFF 2. Disconnect connectors CE03 and TEMP1 (KDOC inlet temperature sensor), and connect T-adapter to female side of connector CE03. ★ Check by using multi meter in continuity mode.		
		Continuity	Between CE03 (female) (45) and each other pin	No continuity (No sound is heard)

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Electrical circuit diagram (1/6)

PC360LC-10

★ This figure covers the equipment and devices that are unavailable as optional items in some areas.



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