

3. Major Difference

The following changes have been made to the 1CD-FTV engine with D-CAT from the 1CD-FTV engine without D-CAT:

	Item	Outline
Engine Proper (See page 73)	Cylinder Head Cover	Addition of a hole and an oil seal for installing the exhaust fuel addition injector
	Cylinder Head	Addition of an area for mounting the exhaust fuel addition injector above the No. 4 exhaust port
	Cylinder Head Gasket	Change in the seal locations to accommodate the installation of the exhaust fuel addition injector
Intake and Exhaust System (See page 74)	Diesel Throttle Valve	Change to a rotary solenoid type
	EGR Valve	Change to a linear solenoid type
	EGR Cooler	Addition of a catalyst in front of the EGR cooler
	Turbocharger	Improved performance
	Exhaust Manifold	Improvement of sealing performance
	Exhaust Pipe	Change to support the installation of the DPNR-Cat differential pressure sensor
	Exhaust Manifold Converter	Adoption of tandem catalysts
Fuel System (See page 77)	Exhaust Fuel Addition Injector	Addition of an exhaust fuel addition injector to the exhaust manifold
	No.3 Fuel Pipe	New provision for supplying fuel to the exhaust fuel addition injector
	Common-Rail	Change of the maximum fuel pressure and addition of orifices to realize high precision fuel injection timing control
	Fuel Pipe Insulator	New provision of insulator to ensure heat resistance and reliability
	Supply Pump	Addition of a flow damper to realize low noise and vibration while supplying fuel to the exhaust fuel addition injector
Engine Control System (See page 80)	Differential Pressure Sensor	Addition for detecting the clogging of DPNR-Cat
	Exhaust Gas Temperature Sensor	Addition for detecting the temperature of the DPNR catalyst
	Air Fuel Ratio Sensor	Addition for detecting the air-fuel ratio after the DPNR catalyst