

## TORQUE SPECIFICATION

Part tightened	N·m	kgf·cm	ft·lbf
No.1 idler pulley x Oil pump	35	350	26
No.2 idler pulley x No.2 idler pulley bracket	40	400	30
No.1 timing belt cover x Oil pump	9	90	80 in.·lbf
Crankshaft pulley x Crankshaft	295	2,950	213
Camshaft timing pulley x Camshaft	110	1,100	81
Timing belt tensioner x Oil pump	27	280	20
No.2 timing belt cover x No.3 timing belt cover	9	90	80 in.·lbf
Oil dipstick guide x Generator bracket	8	80	71 in.·lbf
Fluid coupling x Fan bracket	5.4	54	48 in.·lbf
A/C compressor bracket x Cylinder block	47	479	35
A/C compressor x A/C compressor bracket	25	250	18
PS pump x PS pump bracket	43	440	31
Camshaft bearing cap x Cylinder head	16	160	12
Rear plate x Cylinder head	8	80	71 in.·lbf
Cylinder head x Cylinder block	12 pointed head 1st 2nd 3rd Recessed head	34 Turn 90° Turn 90° 18	350 Turn 90° Turn 90° 185
Cylinder head cover x Cylinder head	6	60	53 in.·lbf
Exhaust manifold x Cylinder head	40	400	30
Exhaust crossover pipe x Exhaust manifold	45	450	33
Generator bracket x LH cylinder head	18.5	185	14
PS pump bracket x RH cylinder head	18.5	185	14
Intake manifold, Intake manifold stay x Cylinder head	18	180	13
No.3 timing belt cover x Cylinder head	9	90	80 in.·lbf
Camshaft position sensor x RH cylinder head	8	80	71 in.·lbf
Intake air connector x Intake manifold	18	180	13
Air intake chamber x Intake air connector	18	180	13
Air intake chamber stay x LH cylinder head	40	408	30
Air intake chamber stay x Air intake chamber	18	184	13
Engine hanger No.2 x RH cylinder head	45	459	33
Frame crossmember x Engine rear mounting bracket	58	590	43
Engine rear mounting bracket x Engine rear mounting insulator	18	183	13
Engine front mounting insulator x Frame	38	387	28
Connecting rod cap x Connecting rod	1st 2nd	25 Turn 90°	18 Turn 90°
Main bearing cap x Cylinder block	1st 2nd	61 Turn 90°	45 Turn 90°
Rear oil seal retainer x Cylinder block	8	80	71 in.·lbf
Engine coolant drain cock x Cylinder block	39	400	29
Engine mounting bracket x Cylinder block	44	440	32
Oil filter union x Cylinder block	25	250	18
Oil pressure switch x Cylinder block	15	150	11
Generator adjusting bar x Cylinder block	42	420	31
No.2 idler pulley bracket x Cylinder block	38	380	28

2002 4RUNNER (RM887U)

## SERVICE SPECIFICATIONS - ENGINE MECHANICAL (5VZ-FE)

Water bypass pipe x Cylinder block		8.5	85	75 in.·lbf
Rear end plate x Cylinder block		7.5	75	66 in.·lbf
Drive plate x Crankshaft	A/T	83	850	61
Flywheel x Crankshaft	M/T	85	850	63
No.2 support bracket x Body		19	195	14
No.3 support bracket x Body		19	195	14
No.1 front exhaust pipe x Exhaust manifold		62	630	41
No.1 front exhaust pipe x No.2 front exhaust manifold		48	495	35
A/F sensor x No.1 front exhaust pipe		20	200	14
Heated oxygen sensor (Bank 1 sensor 2) x No.2 front exhaust pipe		44	449	32