

# TORQUE SPECIFICATIONS

All readings in ft. lbs.

Year	Engine	Cylinder	Main	Rod	Crankshaft	Flywheel	Manifold		Spark	Lug	
	Displacement						Engine	Head			Bearing
	Liters (cc)	ID/VIN	Bolts	Bolts	Bolts	Bolts	Bolts				
1990	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	61-69	⑦	15	18	④
1991	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	61-69	⑦	15	18	④
1992	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	72-80	⑦	15	18	④
1993	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	72-80	⑦	15	18	④
1994	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	72-80	⑦	15	18	④
1995	2.4 (2389)	KA24E	①	34-38	②	105-112	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	⑥	90-98	72-80	⑦	15	18	④
1996	2.4 (2389)	KA24E	①	34-38	②	87-116	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	②	90-98	72-80	⑧	15	18	④
	3.3 (3277)	VG33E	⑤	67-74	②	141-156	61-69	⑧	21-25	18	④
1997	2.4 (2389)	KA24E	①	34-38	②	87-116	③	14	14	18	④
	3.0 (2960)	VG30E	⑤	67-74	②	90-98	72-80	⑧	15	18	④
	3.3 (3277)	VG33E	⑤	67-74	②	141-156	61-69	⑧	21-25	18	④
1998	2.4 (2389)	KA24DE	①	34-41	②	105-112	105-112	⑧	27-35	14-22	87-108
	3.0 (2960)	VG30E	⑤	67-74	②	141-156	61-69	⑧	13-16	14-22	72-87
	3.3 (3277)	VG33E	⑤	67-74	②	141-156	61-69	⑧	21-25	14-22	87-108
1999-00	2.4 (2389)	KA24DE	①	34-41	②	105-112	105-112	⑧	27-35	14-22	87-108
	3.3 (3277)	VG33E	⑤	67-74	②	141-156	61-69	⑧	21-25	14-22	87-108

① Step 1: 22 ft. lbs.

Step 2: 58 ft. lbs.

Step 3: Loosen completely then retorque to 22 ft. lbs.

Step 4: 58 ft. lbs. or an additional 80-85 degrees

② 10-12 ft. lbs. plus 60-65 degrees or 28-33 ft. lbs.

③ Manual transmission: 105-112 ft. lbs.

Automatic transmission: 69-76 ft. lbs.

④ Quest: 80 ft. lbs.

Pick-up with single wheels and Pathfinder: 87-108 ft. lbs.

Pick-up with dual wheels: 166-203 ft. lbs.

⑤ Step 1: 22 ft. lbs.

Step 2: 43 ft. lbs.

Step 3: Loosen completely then retorque to 22 ft. lbs.

Step 4: 40-47 ft. lbs. or an additional 60-65 degrees

⑥ Step 1: 12 ft. lbs.

Step 2: 30 ft. lbs. or an additional 60 - 65 degrees

⑦ Nuts: 18 ft. lbs., in two steps

Bolts: 13 ft. lbs., in two steps

⑧ Step 1: Tighten nuts and bolts to 3 ft. lbs.

Step 2: Tighten bolts to 12-14 ft. lbs.; nuts to 17-20 ft. lbs.

Step 3: Repeat Step 2