

Taking the MYSTERY out of Oil Pan Capacities

Listed below are the factory oil capacity numbers for the popular Cummins marine engines. Since understanding oil pan capacities & their relationship to “dip sticks” seems to be an ongoing topic of discussion, I will attempt to explain what it really means..

What is most important to remember or understand is that Oil Pan (sump) capacity is exactly that, and HAS ZERO to do with oil filters, oil lines, oil coolers or ?? The second most important part of understanding oil capacity is to realize that the Dipstick measures OIL PAN capacity and it has NOTHING to do with the oil filter being full or not, and/or any other oil in the system which is part of the "total system capacity".. “System Capacity” is that amount of oil in the pan (the dipstick measures that), and all of the other oil that is in the engine (oil filter, lines & hoses, oil galleries, etc.) that cannot be drained from the oil pan under normal circumstances.

Understanding the basics in changing oil and having a correctly marked dipstick is very simple. Drain the oil pan completely, add the correct amount of oil to the pan listed in the chart (LOW mark first). Wait a couple of minutes & check your dipstick a FEW TIMES to be sure it is correctly marked for the LOW MARK—If not, then remark it correctly.. Then add the 1-4 quarts listed and check your HIGH MARK. If you change your oil filter, it's always best to fill it first (no dry starts wanted) and you are done. If your filter was installed empty or dry, after you start it, the oil level will be slightly below the high mark as some oil in the pan was used to fill the filter. If you pre-filled the filter, then the oil level in the pan will be as it was (or very close to it) after the start-up and fill.

And last, running your engine on the low mark has NO detrimental effects on the engine, and in the case of a B series Cummins that uses the very shallow marine oil pan, this is a recommended practice from us to help alleviate or keep oil “whipping” to a minimum.. In general, and from a personal point of view, we prefer keeping the oil level in the oil pan in-between the “marks” on a correctly marked dip stick on all engines regardless of the color.. This also applies to transmissions and/or gear boxes

Tony / Seaboard Marine

Aug 08

Popular Cummins Marine Engines	Oil Pan Capacities (quarts) Dipstick marks	
	Low	Hi
4B / 4BT / 4BTA 3.9	9	10
6B / 6BT / 6BTA 5.9 (includes 330/370 Diamonds)	13	15
6CTA 8.3 (includes 450 Diamonds)	14	18
QSB	13	15
QSC 8.3	14	18
QSL 9 (deep pan)	16	20
QSL 9 (shallow pan)	14	18
QSM 11	28	32