

Die Casting vs. Other Processes

COMPARED WITH					
9 POINTS OF COMPARISON	STAMPING	FORGINGS	SAND CASTINGS	PERMANENT MOLD CASTINGS	PLASTIC MOLDING
CUSTOM DIE CASTINGS GIVE YOU					
1 COST	less machining cost	lower final cost	less production, machining cost	less labor, production, machining cost	generally greater
2 DESIGN FLEXIBILITY	more complex shapes	more complex shapes	thinner wall sections possible	thinner wall sections possible, less draft required	much greater
3 FUNCTIONAL VERSATILITY	greater designs possible	more versatile with less machining	more versatile with less machining	more versatile with less machining	many more uses
4 TOLERANCES	tighter	tighter	tighter	tighter	tighter
5 WALL THICKNESS	more variations	thinner sections	thinner sections	thinner sections	thinner sections for same strength
6 SURFACE FINISH	greater variety	smoother	smoother	smoother	greater variety
7 MACHINE WASTE	lower	lower	lower	lower	same
8 STRENGTH	depends on design	smaller tensile	greater with same alloy	great with same alloy	much greater
9 WEIGHT	depends on design	lighter	lighter	lower	more