

Arithmetic average roughness Ra		0.025	0.05	0.1	0.2	0.4	0.8	1.6	3.2	6.3	12.5	25	50	100	
Conventional notation for surface roughness	Max. height Rmax.	0.1 —S	0.2 —S	0.4 —S	0.8 —S	1.6 —S	3.2 —S	6.3 —S	12.5 —S	25 —S	50 —S	100 —S	200 —S	400 —S	
	Standard value of reference length (mm)	0.25				0.8			2.5		8		25		
	Finishing symbol	▽▽▽▽				▽▽▽			▽▽		▽		—		
Machining methods	Forging									Fine					
	Casting									Fine					
	Die casting														
	Hot rolling														
	Cold rolling														
	Drawing														
	Extruding														
	Tumbling														
	Sandblasting														
	Rolling														
	Front milling								Fine						
	Planing														
	Carving (including slotting)														
	Milling								Fine						
	Precision boring														
	Filing								Fine						
	Round grinding					Fine			High		Medium			Rough	
	Boring								Fine						
	Drilling														
	Reaming								Fine						
	Broach grinding								Fine						
	Shaving														
	Grinding					Fine	High		Medium		Rough				
	Hone finishing					Fine									
	Super finishing			Fine											
	Buffing					Fine									
Paper finishing					Fine										
Lapping			Fine												
Liquid honing					Fine										
Burnishing															
Surface rolling															
Electric discharge carving															
WEDM (Wire electric discharge machining)															
Chemical polishing								Fine							
Electrolytic abrasion			Fine												