

IADC CLASSIFICATION FOR PDC AND DIAMOND BITS

IADC code consists of four characters, indicating bit body, formation type, cutting structure and bit profile. First character is literal, others – numerical.

First literal code character designates the bit body material (**S**teel, **M**atrix or **D**iamond).

Second numerical code character (1-8) designates the formation type being drilled. Category 5 has no code.

Third numerical code character designates drill bit cutting structure (PDC cutter size, diamond cutter type). Drill bits are equipped with 8-19 mm PDC cutters for 1-4 formation type categories and with natural diamonds, thermally stable polycrystalline diamonds (TPS), their combination or impregnated diamonds for 6-8 formation type categories. .

Fourth numerical code character – bit profile.

1	2		3				4			
Bit body	Formation type		Size of PDC cutters				Bit profile			
			1	2	3	4	1	2	3	4
S – steel M – matrix D – diamond	Very soft	1	-	19	13	8	Short fishtail	Short profile	Medium profile	Long profile
	Soft	2								
	Soft to medium	3								
	Medium	4								
	no code	5	Diamond cutters type							
	Medium hard	6	Natural diamond	Thermally stable (TSP)	Combination	-				
	Hard	7								
	Extremely hard	8		-	-	Impregnated diamond				