INTERNAL GRINDING WHEELS

Internal grinding finds a large number of applications in bearing and automobile industry. Typical applications are bore grinding of inner rings, bore grinding of gears, track grinding of outer rings and steering nuts etc.

The significant difference between cylindrical grinding of internal & surfaces is the Wheel to Work conformity. In Internal grinding, on account of grinding of internal surfaces the arc of contact and thereby the conformity between the wheel and work-piece, is substantially higher.

In Internal Grinding, high Wheel-Work conformity results in

- Large number of grains in contact with the work-piece > Lower Force per unit grain
- Grain and bond fracturing gets hampered due to low Force per grain and can lead to more rubbing and sliding of the abrasive while grinding (Glazing)
- ▶ Poor coolant availability in the grinding zone
- The work material debris (chips) have a higher probability to be entrapped between the wheel and the work, leading to their increased frictional effect
- High heat generation due to poor lubricity, higher friction and iability to remove heat effectively from grind zone



H	Usage	•	OEIVI	Ancillaries	0	engg	•	Dies	•
	Industry	Steel	Auto	Auto Ancilliaries	Cutting Tool	General Engg	Others	Tools & Dies	Tobacco

TYPICAL APPLICATIONS

- To give dimensional tolerances for engineering components like Bearings, Gears and other Automobile components
- To give required surface finish for these components

STOCK AVAILABILITY TABLE

Internal Grinding Wheels

Size Dia x Thk x Bore	Std. Pkg.	Specification	Stock No.
13 x 13 x 6.35	100	32A 60 M8 VBE	V1
20 x 20 x 6.35	100	32A 60 M8 VBE	V2
25 x 25 x 6.35	50	32A 60 M8 VBE	V4
25 x 25 x 6.35 1-13 x 16	50	32A 60 M8 VBE	V5

INTERNAL GRINDING WHEELS									
	FEATURES				BENEFITS				
	Abrasive	Grit	Grade	Bond					
BEST	ES, TG	80-120	I-N	VS3	Substantially reduced dressing frequencyFor higher material removal rate applications				
BETTER	SG, XG	46-120	J-N	VS3	For improved process capacity on sizeRecommended for rigid machines				
GOOD	32A, 35A, 38A	36-180	J-N	VIN, VBE	Sulphur treatment availableRecommended for optimum performance				