

## CERAMICS IN TEXTILE MACHINERY MATERIALS USED FOR WEAR RESISTANCE AND LOW FRICTION

OUR STRENGTH – WIDE VARIETY OF CUSTOMIZED CERAMIC MATERIALS



Alumina  
( $Al_2O_3$ )



Silicon Nitride  
( $Si_3N_4$ )



Silicon Carbide  
(SiC)



Zirconia  
( $ZrO_2$ )






Others  
(Titania, Cermet,  
Sapphire etc.)

### GRAIN SHAPES - INFLUENCE ON PROPERTIES FOR FRICTION DISC

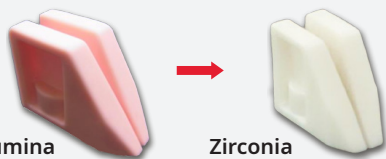


Friction disc

	Standard disc	Low snow disc	Special disc
Grain shape			
False	1	0.8	1
Snow amount	1	0.8	0.8
Grain size	6 $\mu m$	10 $\mu m$	4 - 6 $\mu m$
Cost	1x	1.3x	1.5x

### DIFFERENT MATERIALS - INFLUENCE ON LIFETIME

#### Oiling Nozzle



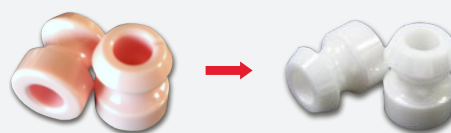
Alumina

Zirconia

Lifetime: 1-2 months

Lifetime: over 12 months

#### Top guide



Alumina

Zirconia

Lifetime: 2 weeks

Lifetime: 7 weeks

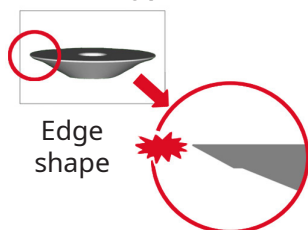
► Lifetime improvement

### CHANGE OF DESIGN - INFLUENCE ON DURABILITY



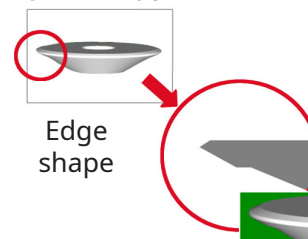
Knife edge disc

#### General type



Edge shape

#### Kyocera type



Edge shape

► Easy handling  
► Robust edge