NORTON RAZORSTAR® **F990S FIBRE DISCS**

GRIT: 36+

BACKING: VULCANIZED FIBRE

FEATURES: TOPSIZE COOLING LAYER

MACHINE: ELECTRIC OR PNEUMATIC HIGH POWER ANGLE GRINDERS

Use with a Norton back-up pad for best results.

Size (mm)	Grit	Max. RPM	Box Quantity	Article No.
115x22	36+	13,300	25	66254434179
125x22	36+	12,200	25	66254434181
150x22	36+	10,200	25	63642598628
180x22	36+	8,500	25	66254434506

NORTON BACK-UP PADS

Size (mm)	Max. RPM	Box Quantity	Article No.	Product Colour
115	13,300	5	66254442905	Yellow
125	12,200	5	66254442902	Yellow
180	8,500	5	66254442907	Yellow

Back-up pads can be purchased separately.

For unbeatable grinding results, contact your local representative and put Norton RazorStar® fibre discs to the test today.

WATCH THIS SPACE...

Our ongoing commitment to sustainable innovations means that these fibre discs are just the start of the new Norton RazorStar® range of abrasives.

www.nortonabrasives.com

www.youtube.com/NortonAbrasivesEMEA





SAINT-GOBAIN



NORTON RAZORSTAR® FIBRE DISCS

FEATURING ENGINEERED SHAPED **CERAMIC GRAIN**



Transformina

surfaces

SHARPER THAN EVER Norton and RazorStar are registered trademarks of Saint-Gobain.



NEXT GENERATION FIBRE DISCS. GRINDING DOWN YOUR PROCESS COST.

Norton RazorStar® F990S 36+ is setting a new standard in grinding productivity, speed and life.

Designed for medium to high pressure metal removal in grinding applications, RazorStar® fibre discs feature 100% engineered shaped ceramic grain which cuts through metal with unbeatable performance.

PRODUCE MORE PARTS WITH FEWER DISCS AND SAVE TIME AND MONEY IN YOUR GRINDING OPERATIONS.



INCREASED EFFICIENCY



IMPROVED PERFORMANCE



IMPROVED QUALITY



REDUCED MACHINE TIME



MORE PARTS PER DISC

FASTER, LONGER, COOLER GRINDING



HIGHER CUT RATE

A breakthrough innovation of razor-sharp ceramic grain, with a tough microstructure, cuts faster and removes more material. This is combined with the highest percentage of grains applied to the backing in an upright position for razor-sharp cutting.



LONGER LIFE

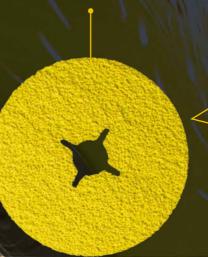
Unique patented geometry enables the grain to stay sharp as new razor-sharp edges are exposed as the grain fractures. The innovative design of Norton RazorStar® promotes improved grain retention, providing unparalleled disc life.

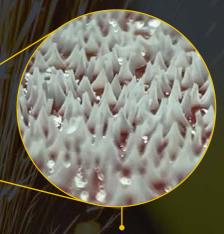


COOLER CUT

The unique sharp design of the grains, combined with the disc's **special topsize grinding aid, helps to significantly reduce heat generation** – resulting in less thermal damage to the workpiece.

THE RESULT:
UNBEATABLE GRINDING
PERFORMANCE AND LOWER
GRINDING COST



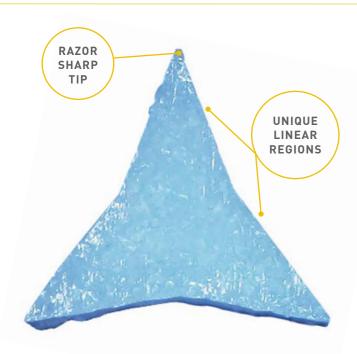


MORE UPRIGHT GRAIN FOR RAZOR-SHARP CUTTING

A BREAKTHROUGH

IN SHAPED CERAMIC GRAIN

Saint-Gobain's engineered shaped ceramic grain is a breakthrough technology specifically designed to deliver unbeatable grinding performance versus all other conventional ceramic grain fibre discs in the market today.



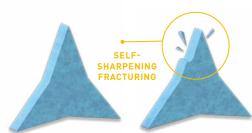
SHAPED CERAMIC GRAIN HOW DOES IT WORK?

Unlike other shaped grains, those used in RazorStar® fibre discs are formed by two linear regions which join to form razor-sharp tips.

It's these sharp tips that deliver a high initial cut and continue to slice through metal, throughout the entire disc life. Its tough microstructure and unique patented geometry, tuned for Seeded Gel chemistry, enables each grain to fracture into similar sharp shapes during grinding. What's more, this unique geometry ensures grain uniformity and consistency in shape, strength and cutting behaviour.



RAZORSTAR® GRAIN REMAINS SHARP THROUGHOUT DISC LIFE



COMPETITOR GRAIN FRACTURES TO A BLUNT EDGE



NEW NORTON BACK-UP PADS

UPRIGHT GRAIN

PRIMED TO CUT

competitor fibre discs.

Norton RazorStar® fibre discs fully leverage the sharpness

of the engineered shaped grain. Grains that lie flat do not

position grains upright on the backing, RazorStar® fibre

discs deliver the sharpest grinding possible compared to

cut, so thanks to a new patent-pending method designed to



The new Norton back-up pads give the right support for grinding applications. The ribbed surface provides maximum aggression and cooling effect, enhancing the performance of Norton RazorStar® fibre discs even further. Available in 115mm, 125mm and 180mm diameter.

SMOOTHER GRINDING, MORE CONTROL

What's more, the high number of grains per unit area,

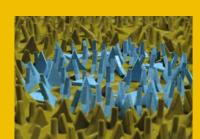
topsize coating and heavy weight backing are designed to

to maintain powerful grinding performance over prolonged

promote grain retention and self-sharpening fracturing,

periods in medium to high pressure applications.

Thanks to the razor-sharp grains which glide through the metal, grinding is smoother, drawing less power from the machine for better operator control. Less force is also required as the grains do the work, minimising operator fatigue and reducing prolonged exposure to vibration.



HIGHER % UPRIGHT GRAINS

RazorStar® fibre discs have the highest percentage of grains oriented upright.



LOWER % UPRIGHT GRAINS

Competitor fibre discs have a lower percentage of grains oriented uprigh



IMPROVING PRODUCTIVITY

PRODUCE MORE PARTS WITH FEWER DISCS AND SAVE TIME AND MONEY

Extensive testing has shown RazorStar® boosts productivity. Using a disc which lasts longer and removes material faster means fewer disc changes, grinding down process cost.





LONGER LIFE



PROVEN RESULTS VERSUS COMPETITOR

CASE STUDY #1

Component: Structural carbon steel plate
Application: Bevelling

Disc Size: 125mm

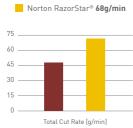
Machine: 1900W angle grinder
Back-up Pad: Hard, serrated

FASTER CUT RATE

Material removal per min (g/min

Competitor 47g/min

Norton RazorStar® 68g/min



+93%
HIGHER STOCK REMOVAL
Cumulative material removal per disc (g)
Competitor 353g/disc
Norton RazorStar® 683g/disc

This means a reduction in manufacturing time and fewer discs can be used, saving energy and reducing waste.

CASE STUDY #2

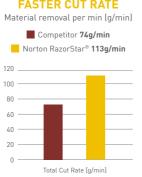
Component: Structural carbon steel plate S355

Application: Bevelling to 30°

Disc Size: 125mm

Machine: 1300W angle grinder Back-up Pad: Hard, serrated

+52%

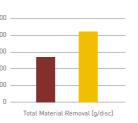


+50%

Competitor 280g/disc

Norton RazorStar® 423g/disc

Cumulative material removal per disc (g)



CASE STUDY #3

Component: Carbon steel

Disc Size: 125mm

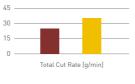
Machine: 1500W angle grinder

Application: Deburring sharp edges

Back-up Pad: Hard, serrated

+44% FASTER CUT RATE

tor **25g/min** Norton RazorStar® **36g/mi**n



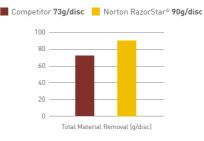
perform the same task, saving time and money.

This means less

machine time and

energy is needed to

HIGHER STOCK REMOVAL
Cumulative material removal per disc (g)



CASE STUDY #4

Component: Carbon steel plate

Disc Size: 125mm

Machine: 700W angle grinder

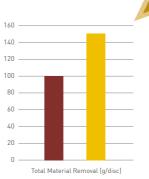
Application: Bevelling

Back-up Pad: Hard, serrated

+50%
HIGHER STOCK REMOVAL
Cumulative material removal per disc (g)

Competitor 100g/disc

Norton RazorStar® 150g/disc



APPLICATIONS

- Weld removal & preparation
- Bevelling
- Grinding
- Scale removal
- Heavy deburring