

PHP & PHH New Grades

The revolution on PVD Milling solutions



PHP & PHH
Milling

PHP
NEW
GRADE

PHH
NEW
GRADE



PDF

Higher performance **achieved by new technology**

PHP NEW GRADE - THE PIONEERING COATING TECHNOLOGY

Novo grau PHP - A tecnologia de revestimento pioneira | Nueva calidad PHP - La tecnología pionera de recubrimiento



Product of the latest coating technology, the new **PHP** coating comes to revolutionize the milling of Steel and Cast Iron.
PHP is a balanced PVD coating that combines high hardness and high cracking resistance.

Its composition and structure ensure an optimal adhesion which results in a very smooth surface preventing built-up edge, coating worn-out and keeps the insert in a lubricated-like condition.



Recommended for finishing operations in steels and hardened steels.



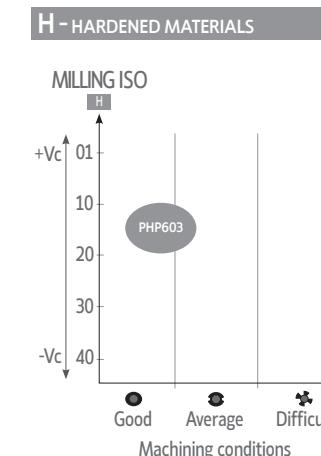
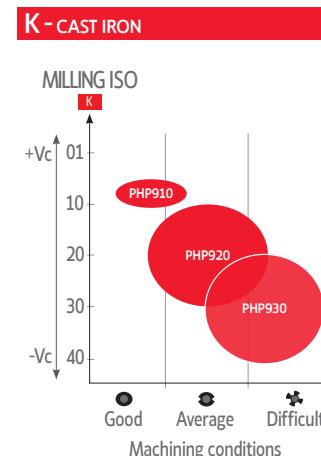
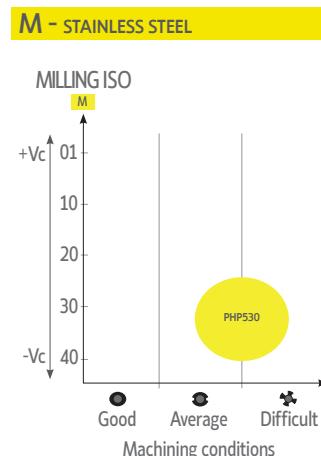
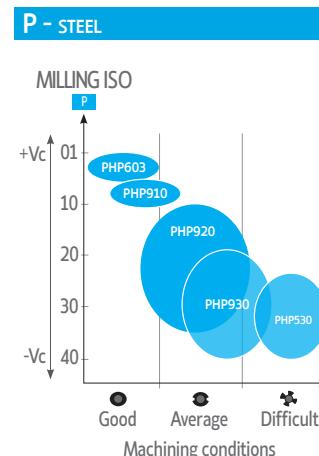
Recommended for light operations in steels.



Recommended for General Steel & Cast Iron Milling.



Recommended for medium to roughing operations in steels and cast irons.



Extremely heat resistant grade. First choice in cold-section turbine blade milling.

PHH NEW GRADE - THE CUTTING EDGE FOR SUPERALLOYS AND HARDENED STEELS MILLING

Novo grau PHH - A tecnologia de ponta para fresagem de super-ligas e aços endurecido | Nueva calidad PHH - La tecnología de vanguardia para fresado en superaleaciones y aceros endurecidos



Product of the latest coating technology, the new **PHH** coating comes to revolutionize the milling of stainless steel, HRSA as well and hardened steel.

PHH is a stable PVD coating that merges both high hardness and an unmatched heat resistance.

It's structure contains refractory materials which allows it to work at the highest temperature and the hardest conditions.



Recommended for finishing operations in steels and hardened steels.
First choice in mold and die finishing applications.

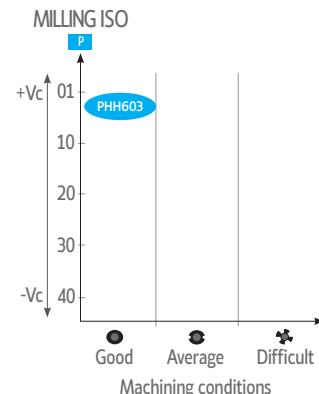


Recommended for general purpose milling of stainless steels and HRSA.

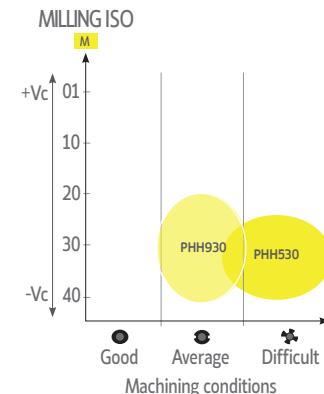


Extremely heat resistant grade. First choice in hot-section turbine blade milling.

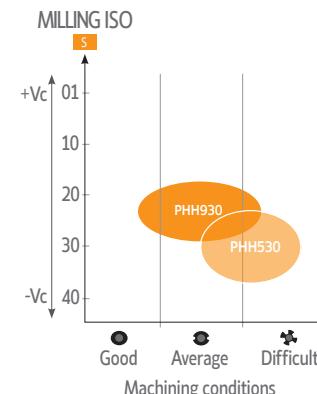
P - STEEL



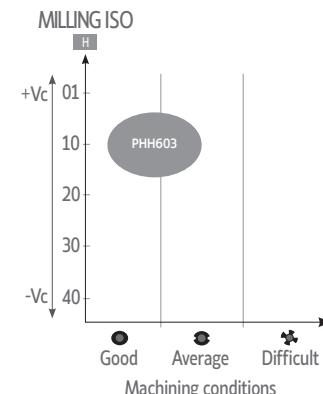
M - STAINLESS STEEL



S - HEAT RESISTANT / TITANIUM ALLOYS



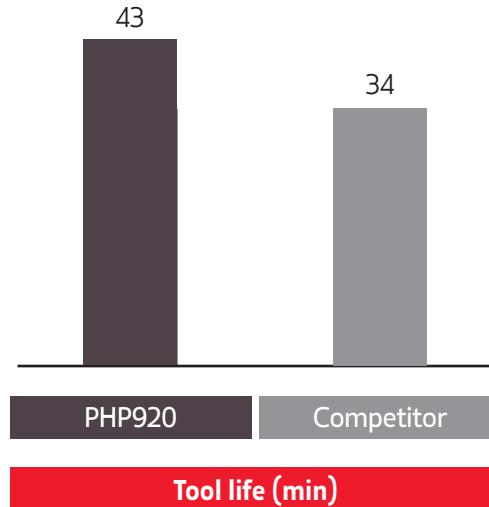
H - HARDENED MATERIALS





Insert: ANHX 120608 PNSR-MP

Grade: PHP920 / Competitor



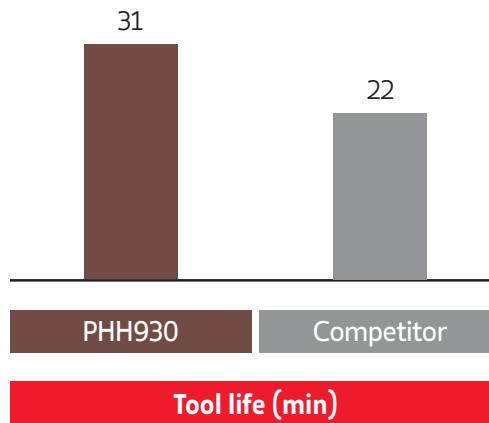
Workpiece material: 1.2738 Steel (34 HRC)

Cutting speed: V_c	180 m/min	590 sfm
Feed per tooth: f_z	0,15 mm/t	0.006 in/t
Depth of cut: a_p	4,0 mm	0.157 in
Operation	Face Milling	
Coolant	Air	



Insert: SOET 13M520-MS

Grade: PHH930 / Competitor



Workpiece material: AISI 316L

Cutting speed: V_c	160 m/min	525 sfm
Feed per tooth: f_z	1,4 mm/t	0.055 in/t
Depth of cut: a_p	1,0 mm	0.039 in
Operation	HiFeed Milling	
Coolant	Air	