Dursan® and SilcoNert® 2000 Coating Comparison Guide

PHYSICAL PROPERTIES	Dursan®	SilcoNert [®] 2000 (Sulfinert®)	304 Stainless Steel	
Temperature range	-210C to +450C	-210C to +450C	Per tool	
Pressure range	Limited by tool	Limited by tool	Per tool	
				304 Stainless Steel SilcoNert 2000 (Suffnert)
Minimum Coating Thickness (nm)	500	120	N/A	0 100 200 300 400 500 600
Wear resistance (x10-5mm3/N m)	6.13	14.00	13.81	
				304 Stainless Steel SilcoNert 2000 (Suffinert) Dursan
Relative wear resistance vs. stainless steel	2.25	0.99	1.00	0.00 0.50 1.00 1.50 2.00 2.50
Lubricity (coefficient of friction)	0.378	0.7	0.589	
				304 Staintes Steel
Relative lubricity vs. stainless steel	1.56	0.84	1.00	0.00 0.20 0.40 0.60 0.80 1.00 1.20 1.40 1.60 1.80
Ductility, flexibility	Good, flexible with steel	Good, flexible with steel	Per tool	
Hydrophobicity/moisture resistance (contact angle)	104	80	36	304 Stainless Steel
				SilcoNett 2000 (Suffice)
Relative moisture resistance vs. stainless steel	2.89	2.22	1.00	0.00 0.50 1.00 1.50 2.00 2.50 3.00 3.54
Relative moisture resistance vs. stainless steel CHEMICAL INERTNESS PROPERTIES	2.89	2.22	1.00	
CHEMICAL INERTNESS PROPERTIES H2S/ Sulfur and sulfur compounds (50ppm H2S, 30 day recovery)	2.89 95% Fair Fair N/A	2.22 97% Excellent Good Good	1.00 0% Poor Poor Poor Poor	304 Stainless Steel Dursan 0,00 0,50 1,00 1,50 2,00 2,50 3,00 3,54 SilcoNert 2000 (Suffnert) Dursan 0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100
CHEMICAL INERTNESS PROPERTIES H2S/ Sulfur and sulfur compounds (50ppm H2S, 30 day recovery) Mercury and mercury compounds Ammonia Arsenic	95% Fair Fair N/A	97% Excellent Good Good	0% Poor Poor Poor	304 Stainless Steel SilcoNert 2000 (Sulfnert) 0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100 304 Stainless Steel SilcoNert 2000 (Sulfnert) Dursan
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CHEMICAL INERTNESS PROPERTIES H2S/ Sulfur and sulfur compounds (50ppm H2S, 30 day recovery) Mercury and mercury compounds Ammonia Arsenic Allowable pH exposure	95% Fair Fair N/A	97% Excellent Good Good	0% Poor Poor Poor	304 Stainless Steel SilcoNert 2000 [Suffiner] Dursan 0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100 304 Stainless Steel SilcoNert 2000 [Suffiner] Dursan 0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 SilcoNert 2000 [Suffiner]
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Please email techservice@silcotek.com or call +1 (814) 353-1778 if you have any questions.



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