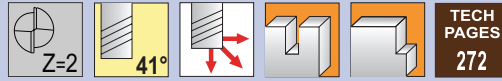
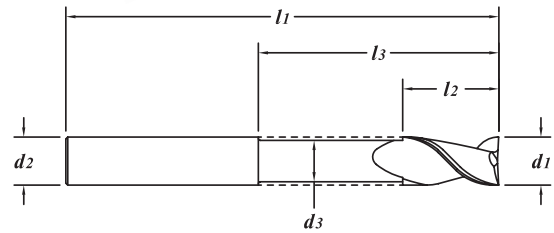


d_1	+0,000 -0,025mm (+.000" -.001")
d_2	h6



- HSAL - Square End - ALUMASTAR Coated
- HSAL - Ohne Eckenradius - ALUMASTAR-Beschichtet
- HSAL - Extremo Sin Radio - Recubrimiento de ALUMASTAR
- HSAL - Extrémité Carré - Revêtement ALUMASTAR
- HSAL - Piatte - Rivestimento in ALUMASTAR
- HSAL - 平头 - ALUMASTAR 涂层



Solid submicron grain carbide end mill - center cutting
Specific coating engineered to repel aluminum
Engineered to run at 750-2500 SFM (225-750 M/Min.)
For high speed machining of aluminum
High velocity - high metal removal rate (for spindles 10,000 RPM and above)
Need to use properly balanced holders
Holds perpendicularity
Flats can be added within 48 hours



Hochleistungs- Vollhartmetallfräser aus Feinkornhartmetall - Zentrumschnitt
Spezielle Beschichtung entwickelt zu abstoßen Aluminium
Entwickelt für Vorschübe von 225 - 750 M/Min. (750 - 2500 SFM)
Für die Hochgeschwindigkeitsbearbeitung von Aluminium
Hohe Geschwindigkeit - Hohe Abtragungsraten (Für Spindeldrehzahlen über 10.000 min⁻¹)
Benutzen Sie korrekt gewichtete Spannmittel
Hilft die Perpendicularität zu halten
Kann mit einer Fläche innerhalb von 48 Stunden werden



Fresa de submicrograno sólido carburo de alto rendimiento - corte centrado
Recubrimiento concebido específicamente para repeler el aluminio
Diseñado para trabajar a 225-750 M/Min. (750-2500 SFM)
Para el mecanizado a alta velocidad de aluminio
Alta velocidad - alto índice de desalajo de viruta (Para husillos de 10.000 r.p.m. o mas)
Use portaherramientas adecuadaente equilibrados
Ayuda a mantener la perpendicularidad
Puede ser modificado con un plano en 48 horas



Fraises carbure submicrograin - coupe au centre
Revetement special conçu pour l'aluminium
Developpement pour usiner a 225-750 M/Min. (750-2500 SFM)
Pour haute vitesse usinage pour l'aluminium
Haute vitesse et haut volume copeaux (Pour les mandrins 10,000 RPM et plus)
Utilisation avec porte outils équilibrés
Aide a tenir la perpendicularite
Peut etre modifier avec un surface plat sous un delai de 48 heures



Fresa sub-micrograno metallo duro - taglio al centro
Rivestimento specifico costruito per respingere alluminio
Costruito per alta velocità 225-750 M/Min. (750-2500 SFM)
Per lavorazioni ad alta velocità su alluminio
Alta velocità - Alto volume di materiale asportato (Per 10.000 Giri al minuto e superiori)
Usare mandrini bilanciati
Rispettare la perpendicolarità
Può essere modificata in 48 ore



高速加工铝合金整体硬质合金立铣刀 - 中心切削
特殊涂层专为加工铝合金
适用于按750-2500英尺/分(225-750 米/分) 线速度运转的专用涂层
适合高速加工铝合金
高速 - 高切屑率 用于主轴转速在10,000 RPM及更高
使用动平衡的刀夹
保持垂直
可在48小时内磨成削平柄

EDP#	d_1 † Diameter		d_2 Shank Diameter	l_1 Overall Length	l_2 Flute Length	l_3 Reach Length	d_3 Neck Diameter
	Decimal	Metric					
41222	.1575	4.000	6.0	50	12	-	-
41232	.1575	4.000	6.0	65	6	20	3.7
41282	.1875 3/16"	4.763	3/16"	2"	9/16"	-	-
41342	.1969	5.000	6.0	65	16	-	-
41352	.1969	5.000	6.0	75	8	20	4.7
41402	.2362	6.000	6.0	65	19	-	-
41412	.2362	6.000	6.0	75	10	25	5.7
41462	.2500 1/4"	6.350	1/4"	2-1/2"	3/4"	-	-
41542	.2756	7.000	8.0	65	19	-	-
41602	.3125 5/16"	7.938	5/16"	2-1/2"	3/4"	-	-
41662	.3150	8.000	8.0	65	19	-	-
41672	.3150	8.000	8.0	75	12	25	7.4
41722	.3750 3/8"	9.525	3/8"	2-1/2"	7/8"	-	-
41802	.3937	10.000	10.0	70	24	-	-
41812	.3937	10.000	10.0	75	12	30	9.4
41822	.3937	10.000	10.0	100	12	35	9.4
41882	.4724	12.000	12.0	75	32	-	-
41892	.4724	12.000	12.0	75	16	30	11.4
41902	.4724	12.000	12.0	100	16	35	11.4
41912	.4724	12.000	12.0	100	16	40	11.4
41942	.5000 1/2"	12.700	1/2"	3"	1-1/4"	-	-
42022	.6250 5/8"	15.875	5/8"	4"	1-5/8"	-	-
42072	.6299	16.000	16.0	75	16	30	15.4
42082	.6299	16.000	16.0	100	40	-	-
42092	.6299	16.000	16.0	100	20	40	15.4
42102	.6299	16.000	16.0	125	20	60	15.4
42142	.7500 3/4"	19.050	3/4"	4"	1-5/8"	-	-
42212	.7874	20.000	20.0	100	32	-	-
42222	.7874	20.000	20.0	100	20	40	19
42232	.7874	20.000	20.0	125	20	60	19
42302	1.000 1"	25.400	1"	4"	1-5/8"	-	-

MATERIAL HARDNESS (RC) 70 35 0

TOLERANCES

$d1$	+0,000 -0,025mm (+.000" -.001")
$d2$	h6
r	+0,0127 -0,0127mm (+.0005" -.0005")



Series 142R

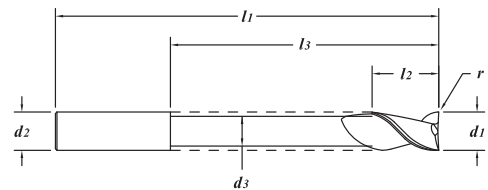
4,000mm - 12,000mm
(.1575" - .4724")

HIGH PERFORMANCE
END MILLS

- HSAL - Corner Radius - ALUMASTAR Coated
- HSAL - Eckenradius - ALUMASTAR-Beschichtet
- HSAL - Ángulo Redondeado - Recubrimiento de ALUMASTAR
- HSAL - Rayon de Coin - Revêtement ALUMASTAR
- HSAL - Torica - Rivestimento in ALUMASTAR
- HSAL - 圆角半径 - ALUMASTAR 涂层



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(Für Spindeldrehzahlen über 10.000 min⁻¹)
Benutzen Sie korrekt gewuchtete Spannmittel
Hilft die Perpendicularität zu halten
Kann mit einer Fläche innerhalb von 48 Stunden werden



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Recubrimiento concebido específicamente para repeler el aluminio
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Para el mecanizado a alta velocidad de aluminio
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适用于按750-2500英尺/分 (225-750 米/分) 线速度运转的专用涂层
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高速—高切屑率 用于主轴转速在10,000 RPM及更高
使用动平衡的刀夹
保持垂直
可在48小时内磨成削平柄

EDP#	$d1$ † Diameter		$d2$ Shank Diameter	$l1$ Overall Length	$l2$ Flute Length	r Corner Radius	$l3$ Reach Length	$d3$ Neck Diameter
	Decimal	Metric						
39222	.1575	4.000	6.0	50	12	0.30	-	-
39232	.1575	4.000	6.0	65	6	0.50	20	3.7
39242	.1575	4.000	6.0	65	6	1.00	20	3.7
39282	.1875	3/16"	4.763	3/16"	2"	9/16"	.010"	-
39342	.1969	5.000	6.0	65	16	0.30	-	-
39352	.1969	5.000	6.0	75	8	0.50	20	4.7
39362	.1969	5.000	6.0	75	8	1.00	20	4.7
39402	.2362	6.000	6.0	65	19	0.30	-	-
39412	.2362	6.000	6.0	75	10	0.50	25	5.7
39422	.2362	6.000	6.0	75	10	1.00	25	5.7
39432	.2362	6.000	6.0	75	10	1.50	25	5.7
39442	.2362	6.000	6.0	75	10	2.00	25	5.7
39462	.2500	1/4"	6.350	1/4"	2-1/2"	3/4"	.015"	-
39602	.3125	5/16"	7.938	5/16"	2-1/2"	3/4"	.015"	-
39662	.3150	8.000	8.0	65	19	0.50	-	-
39672	.3150	8.000	8.0	75	12	0.50	25	7.4
39682	.3150	8.000	8.0	75	12	1.00	25	7.4
39692	.3150	8.000	8.0	75	12	2.00	25	7.4
39702	.3150	8.000	8.0	75	12	3.00	25	7.4
39722	.3750	3/8"	9.525	3/8"	2-1/2"	7/8"	.030"	-
39802	.3937	10.000	10.0	70	24	0.50	-	-
39812	.3937	10.000	10.0	100	12	1.00	35	9.4
39822	.3937	10.000	10.0	100	12	1.50	35	9.4
39832	.3937	10.000	10.0	100	12	2.00	35	9.4
39842	.3937	10.000	10.0	100	12	3.00	35	9.4
39882	.4724	12.000	12.0	75	32	0.50	-	-
39892	.4724	12.000	12.0	100	16	0.50	40	11.4
39902	.4724	12.000	12.0	100	16	1.00	40	11.4
39912	.4724	12.000	12.0	100	16	1.50	40	11.4
39922	.4724	12.000	12.0	100	16	2.00	40	11.4
39932	.4724	12.000	12.0	100	16	3.00	40	11.4

70

35

MATERIAL HARDNESS (RC)

0

continued →

Series 142R (continued)

12,700mm - 20,000mm
(.5000" - .7874")

EDP#	d_1 † Diameter		d_2 Shank Diameter	l_1 Overall Length	l_2 Flute Length	r Corner Radius	l_3 Reach Length	d_3 Neck Diameter	
	Decimal	Metric							
39942	.5000	1/2"	12.700	1/2"	3"	1-1/4"	.030"	-	-
40022	.6250	5/8"	15.875	5/8"	4"	1-5/8"	.030"	-	-
40082	.6299		16.000	16.0	100	40	1.00	-	-
40092	.6299		16.000	16.0	125	20	1.00	60	15.4
40102	.6299		16.000	16.0	125	20	2.00	60	15.4
40142	.7500	3/4"	19.050	3/4"	4"	1-5/8"	.030"	-	-
40182	.7874		20.000	20.0	100	40	1.00	-	-
40192	.7874		20.000	20.0	150	20	1.00	65	19.0
40202	.7874		20.000	20.0	150	20	2.00	65	19.0
40212	.7874		20.000	20.0	150	20	3.00	65	19.0

