

**BLUE-MASTER®**  
by celesa



FRESAS

## FRESAS FRONTALES SERIE CORTA DE 2 CORTES DIN 327 Y DIN 844

Fresas

Rosa

2 Z



INOX

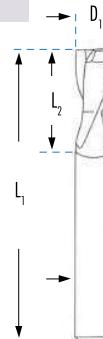
Al

TOL D2  
h6

Ref. FFAL



SERIE CORTA



Consultar dimensiones DIN844 en páginas sucesivas



DIN 327	MATERIAL		FF01	FF02	FF60	FT02	FF92	FP05	FT12	FP08	FT01	DIN 844	FFAL
	ACABADO		HSS	HSSCo 8%	HSSCo 8%	TiAIN	HSSCo 8%	BRILLANTE	ASP 60	ASP 60	ASP 60	ASP 60	HSSCo 8%
	CALIDAD		BRILLANTE	BRILLANTE	BRILLANTE	★★★	★★★	★★★	Premium Quality	Premium Quality	Premium Quality	Premium Quality	BRILLANTE
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	TOL e8	TOL e8	TOL e8	TOL e8	TOL h10	TOL e8	TOL e8	TOL h10	TOL h10	TOL e8
1,00	47	2,5	6						24,80	32,13	36,16	43,16	
2,00	48	4,0	6	11,27	14,28	23,42	27,31	29,07	20,92	28,56	31,92	39,24	17,27
2,50	49	5,0	6		14,28	23,42	27,31	30,92					17,62
3,00	49	5,0	6	11,27	14,28	23,42	27,31	29,21	20,92	28,56	31,92	39,24	17,23
3,50	50	6,0	6		15,51	24,63	28,69	30,92					18,28
4,00	51	7,0	6	11,06	14,28	23,43	27,32	29,21	19,02	27,30	31,92	39,24	17,74
4,50	52	8,0	6	11,06*	17,06	25,99	30,31	30,92					19,42
5,00	52	8,0	6	11,06	14,28	23,43	27,32	29,21	19,02	27,30	31,92	39,24	17,74
5,50	52	8,0	6		17,65	26,67	31,09	30,92					21,73
6,00	52	8,0	6	11,06	14,28	23,43	27,32	29,21	19,02	27,30	31,92	39,24	19,23
6,50	60	10,0	10	16,49*	23,10	33,42	38,96						28,42
7,00	60	10,0	10	16,49	22,41	32,71	38,14	35,20	28,70	37,75	42,23	55,85	25,84
7,50	61	11,0	10		22,20	32,49	37,89						30,30
8,00	61	11,0	10	13,42	18,46	28,89	33,71	31,35	24,93	37,01	42,23	55,85	23,39
8,50	61	11,0	10		24,94	36,14	42,14						31,94
9,00	61	11,0	10	17,15	22,80	34,16	39,82	36,04	30,69	40,77	42,23	57,53	28,95
9,50	63	13,0	10		24,40	35,36	41,22						
10,00	63	13,0	10	14,11	18,34	29,75	34,87	31,10	27,77	37,72	42,23	57,53	25,28
10,50	70	13,0	12		29,31	44,51	51,18						
11,00	70	13,0	12		27,83	40,73	47,50	43,92					34,91
12,00	73	16,0	12	18,44	24,56	37,29	43,48	41,45	35,43	48,68	57,51	73,11	31,71
13,00	73	16,0	12		35,82	50,22	58,56	54,77					45,19
14,00	73	16,0	12	26,23	35,82	50,22	58,56	54,77	43,19	59,70	64,99	80,90	44,36
15,00	73	16,0	12		40,05	56,89	66,35	58,91					48,72
16,00	79	19,0	16	27,38	35,45	52,21	60,89	59,84	54,07	70,76	75,99	94,40	47,47
17,00	79	19,0	16		48,12	66,66	77,74						66,05
18,00	79	19,0	16	35,87	48,12	66,73	77,82	72,88	68,47	84,40	96,32	145,50	59,29
19,00	79	19,0	16		60,13	80,81	94,26						79,97
20,00	88	22,0	16		62,94	85,99	100,27						
20,00	88	22,0	20	42,05	56,92	77,76	90,69	87,04	80,65	101,51	112,29	148,61	68,54
22,00	88	22,0	20	57,68	75,18	103,05	120,16	113,90	102,72	142,39	133,35	170,66	95,41
24,00	102	26,0	25	72,38	97,02	127,96	149,20	136,12					143,38
25,00	102	26,0	25	72,40	94,52	122,70	143,08	125,08	137,13	171,56	174,80*	215,98*	121,44
26,00	102	26,0	25		110,87	169,89	195,34						190,72
28,00	102	26,0	25	90,70	119,35	159,21	186,56						147,77
30,00	102	26,0	25	104,35	135,99	176,25	205,52	181,17					170,05
32,00	112	32,0	32	108,21	139,69	179,48	209,30						180,11
36,00	112	32,0	32	139,32	186,85	230,56	268,86						
40,00	130	38,0	32	169,38	229,44	285,06	332,43						

\*Hasta fin de existencias

## **FRESAS FRONTALES SERIE LARGA DE 2 CORTES DIN 327 Y DIN 844/L**



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TOL D2

Ref. FFLAL



45°

**SERIE LARGA**



DIN 327/L				FF06		FF67		FT06		FF15		FP21		DIN 844/L			FFLAL
				MATERIAL	HSSCo 8%	HSSCo 8%	HSSCo 8%	HSSCo 8%	HSSCo 8%	ASP 60	BRILLANTE				HSSCo 8%		
				ACABADO	BRILLANTE	TiAIN	TiAlSiN	BRILLANTE	BRILLANTE	Premium Quality	BRILLANTE				BRILLANTE		
				CALIDAD	★★	★★★	★★★★	★★	★★	Premium Quality							
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm		€	€	€	€	€	€	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm		€		
2,00	54	7	6	15,74*	24,82*	28,94*	31,96	37,49*	54	10	6			26,03			
2,50	56	8	6	15,82*	24,82*	28,94*	32,00		56	12	6						
3,00	56	8	6	15,74	24,89	29,03	32,00	38,64*	56	12	6			26,16			
3,50	59	10	6	17,88	29,56	34,50			59	15	6						
4,00	63	11	6	15,81	24,89	29,03	32,00	38,64	63	19	6			26,32			
4,50	63	11	6	17,88	25,42	29,64			63	19	6						
5,00	68	13	6	15,81	24,89	29,03	33,88	40,90*	68	24	6			26,45			
5,50	68	13	6	17,88	29,56	34,50			68	24	6						
6,00	68	13	6	15,81	24,89	29,03	30,62	36,95*	68	24	6			27,46			
6,50	80	16	10	29,65	48,52	55,79			68	24	6						
7,00	80	16	10	26,10	36,44	42,50	38,62	46,18*	80	30	10						
7,50	88	19	10						80	30	10						
8,00	88	19	10	22,97	33,27	38,82	38,62	46,60*	88	38	10			37,52			
8,50	88	19	10	35,16	47,85	55,80			88	38	10						
9,00	88	19	10	30,91	42,14	49,12	42,36		88	38	10			39,57			
10,00	95	22	10	25,31	38,54	44,94	42,18	51,16*	95	45	10			37,52			
11,00	102	22	12	39,90	53,83	62,76	56,18		102	45	12			52,58*			
12,00	110	26	12	36,39	50,90	59,36	55,10	66,21*	110	53	12			48,54			
13,00	110	26	12						110	53	12						
14,00	110	26	12	47,96	62,21	72,54	73,10	82,98	110	53	12			55,56			
15,00	123	32	16						110	53	12						
16,00	123	32	16	54,97	76,77	89,54	83,20	99,03	123	63	16			67,82			
17,00	123	32	16						123	63	16						
18,00	123	32	16	62,81	90,12	105,06	99,99	118,99	123	63	16			83,93			
20,00	141	38	20	72,23	98,85	115,28	108,42	129,01	141	75	20			100,11			
22,00	141	38	20	99,03	134,14	156,42	134,39	159,94	141	75	20						
24,00	166	45	25	150,70	170,66	196,22	180,78		166	90	25						
25,00	166	45	25	142,06	180,50	210,49	165,29	196,70	166	90	25						
26,00	166	45	25	188,64	200,96	231,06			166	90	25						
28,00	166	45	25	172,15	219,75	256,27			166	90	25						
30,00	166	45	25	191,37	236,56	275,85	246,22		166	90	25						
32,00	186	53	32	264,76	308,38	359,59	320,82		186	106	32						
36,00	186	53	32	299,54	350,63	408,87			186	106	32						
40,00	196	63	32	392,53	473,72	552,43			196	125	32						

## FRESAS FRONTALES SERIE CORTA DE 3 CORTES DIN 844 Y DIN 327

Fresas

Rosa

3 Z

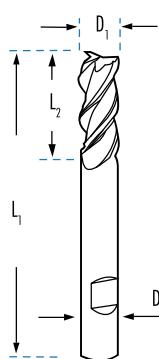


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TOL D2  
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## SERIE CORTA



DIN 844	MATERIAL	FF63	FF75	FT63	FF73	FF76	FT73	FP06	FT03
	ACABADO	HSSCo 8%	HSSCo 8%	HSSCo 8%	HSSCo 8%	HSSCo 8%	HSSCo 8%	ASP 60	ASP 60
	CALIDAD	BRILLANTE	TiAlN	TiAlSiN	BRILLANTE	TiAlN	TiAlSiN	BRILLANTE	TiAlSiN
	DESBASTE	TOL k10	TOL k10	TOL k10	TOL k12	TOL k12	TOL k12	TOL e8	TOL e8
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	€	€	€	€	€	€
1,00	49	3	6					26,66	33,20
2,00	51	7	6	15,69	24,70	28,80		21,66	32,43
2,50	52	8	6	15,69	24,70	28,80			
3,00	52	8	6	15,65	24,70	28,80		21,66	32,43
3,50	55	11	6	16,17	25,16	29,49			
4,00	55	11	6	15,68	24,70	28,80		21,66	32,43
4,50	57	13	6	17,27	26,10	30,44			
5,00	57	13	6	15,68	24,81	28,94		21,66	32,43
5,50	57	13	6	21,32	33,96	39,59			
6,00	57	13	6	16,52	27,75	32,35	44,77	54,08	62,16
6,50	66	16	10	29,62	45,42	52,23			
7,00	66	16	10	23,08	33,35	39,05	52,96*	64,55	74,22
7,50	69	19	10	29,84*	45,90*	52,78*			
8,00	69	19	10	20,61	30,78	35,91	45,88	53,45	62,34
8,50	69	19	10	31,45	47,40	54,50			
9,00	69	19	10	25,74	36,92	43,05	54,45*	63,92*	
9,50	72	22	10		49,81*	57,26*			
10,00	72	22	10	22,33	33,42	38,96	46,17	56,82	66,24
11,00	79	22	12	35,46	52,74	60,64	66,62*	76,75*	
12,00	83	26	12	28,04	39,88	46,51	55,55	65,38	76,25
13,00	83	26	12	44,60	61,32	70,51		84,52*	
14,00	83	26	12	38,20	52,31	61,01	63,39	74,58	86,98
15,00	83	26	12	45,82	63,64	73,18	80,23	87,82	96,80
16,00	92	32	16	41,94	58,38	68,08	76,84	92,66	108,09
17,00	92	32	16	68,64	90,13	103,62			
18,00	92	32	16	52,70	71,28	83,13	84,07	102,01	118,97
19,00	92	31	16	83,94	103,69	119,24			
20,00	104	38	20	60,51	80,34	93,70	102,58	120,00	139,93
22,00	104	38	20	96,46	121,31	139,48			118,70*
25,00	121	45	25	126,03	160,61	184,68	155,38	177,56	207,06
28,00	121	45	25	146,40	179,60	206,49			149,01*
30,00	121	45	25	180,10	210,93	242,53	193,22	227,98	265,87
32,00	133	53	32	183,31	227,65	261,75			

## FRESAS FRONTALES SERIE LARGA DE 3 CORTES DIN 844/L

3 Z

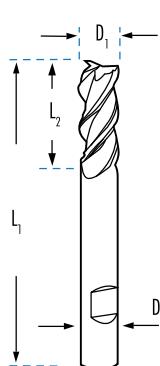


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TOL D1  
k10TOL D2  
h6

SERIE LARGA



Fresas

Rosa

DIN 844/L	MATERIAL ACABADO CALIDAD				FF83	FF86	FT83
	D1 mm	L1 mm	L2 mm	D2 mm	HSSCo 8% BRILLANTE ★★	HSSCo 8% TiAlN ★★★	HSSCo 8% TiAlSiN ★★★★
					€	€	€
1,00	52	7	6				
2,00	54	10	6	21,15	30,97	36,11	
2,50	56	12	6				
3,00	56	12	6	21,15	30,88	36,00	
3,50	59	15	6	23,67	33,10	38,62	
4,00	63	19	6	21,15	30,88	36,00	
4,50	63	19	6	23,67	33,10	38,62	
5,00	68	24	6	21,15	30,88	36,00	
5,50	68	24	6	23,67	33,10	38,62	
6,00	68	24	6	23,70	32,29	37,66	
6,50	68	24	6				
7,00	80	30	10	32,10	43,23	50,42	
7,50	80	30	10				
8,00	88	38	10	29,37	39,00	45,48	
8,50	88	38	10				
9,00	88	38	10	35,73	46,26	53,96	
9,50	88	38	10				
10,00	95	45	10	29,53	42,89	50,01	
11,00	102	45	12	45,40*	58,41*	68,11*	
12,00	110	53	12	37,56	52,28	60,98	
13,00	110	53	12				
14,00	110	53	12	48,93	63,93	74,56	
15,00	110	53	12				
16,00	123	63	16	55,13	77,05	89,87	
17,00	123	63	16				
18,00	123	63	16	66,81	91,08	106,23	
19,00	123	63	16				
20,00	141	75	20	78,43	104,22	121,52	
22,00	141	75	20	98,91	134,39	156,72	
25,00	166	90	25	144,15	177,54	207,04	
28,00	166	90	25	160,48	212,60	247,94	
30,00	166	90	25	178,67	227,09	264,83	
32,00	186	106	32	212,59	255,77	298,27	

## FRESAS FRONTALES SERIE CORTA Y LARGA VARIOS CORTES DIN 844 Y DIN 844/L

Fresas

Rosa

4-6 Z



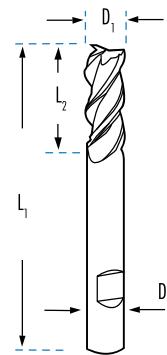
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TOL D1  
k10TOL D2  
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SERIE CORTA

SERIE LARGA



DIN 844	MATERIAL					FF18	FF20	FT18	FP07	FT09	DIN 844/L	MATERIAL					FF21	FF23	FT21	FP20		
	ACABADO		CALIDAD									BRILLANTE	TiAIN	TiAlSiN	BRILLANTE	TiAlSiN	BRILLANTE	TiAIN	TiAlSiN			
	D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	★★	★★★	★★★★	★★	★★★	★★★★	★★	★★★	★★★★	★★	★★★	★★★★	★★	★★★			
1,00	49	3	6	4								29,56	35,10									
2,00	51	7	6	4	15,75	24,77	28,87		21,60	29,61		52	7	6	4	19,22	28,13	32,80	30,69			
2,50	52	8	6	4	15,75	24,77	28,87					54	10	6	4	19,12	28,13	32,80				
3,00	52	8	6	4	15,75	24,77	28,87		21,60	29,61		56	12	6	4	19,22	28,14	32,81	30,69			
3,50	55	11	6	4	16,21	25,23	29,43					56	12	6	4	25,26	34,11	39,77				
4,00	55	11	6	4	15,75	24,77	28,87		21,60	29,61		59	15	6	4	19,22	28,14	32,81	30,69			
4,50	57	13	6	4	17,31	26,16	30,49					63	19	6	4	25,26	34,11	39,77				
5,00	57	13	6	4	15,75	24,77	28,87		21,60	29,61		63	19	6	4	19,22	28,14	32,81	30,69			
5,50	57	13	6	4	25,17	33,96	39,59					68	24	6	4	25,10	34,11	39,77				
6,00	57	13	6	4	16,43	25,54	29,78		21,60	29,61		68	24	6	4	19,22	28,14	32,81	30,69			
6,50	66	16	10	4	25,12	35,35	41,22					68	24	6	4	25,26	34,11	39,77				
7,00	66	16	10	4	23,08	33,36	38,90		29,36	42,24		80	30	10	4	29,16	39,12	45,64	45,78			
7,50	69	16	10	4	29,74	39,71	46,31					80	30	10	4	26,49	35,26	41,11	45,78			
8,00	69	19	10	4	20,31	30,91	36,05		29,23	41,83		88	38	10	4							
8,50	69	19	10	4	31,01	42,00	48,98					88	38	10	4	30,18	41,10	47,93	45,78*			
9,00	69	19	10	4	25,63	36,96	43,11		34,54	45,62		88	38	10	4							
9,50	69	19	10	4	32,81	43,69	50,94					88	38	10	4	26,60	38,91	45,39	45,78			
10,00	72	22	10	4	22,21	33,55	39,14		31,04	42,88		95	45	10	4							
11,00	79	22	12	4	30,90	43,66	50,92					102	45	12	4	37,79	51,27	59,81				
12,00	83	26	12	4	28,04	38,78	45,23		41,00	56,77		110	53	12	4	34,81	48,70	56,82	66,38			
13,00	83	26	12	4	39,55	53,94	62,91					110	53	12	4							
14,00	83	26	12	4	37,33	52,62	61,38		50,94	60,48		110	53	12	4	45,55	59,38	69,25	76,63			
15,00	83	26	12	4	42,63	58,81	68,59					110	53	12	4							
16,00	92	32	16	4	41,60	58,67	68,39		59,71	71,62		123	63	16	4	49,80	69,87	81,48	94,95			
17,00	92	32	16	4	51,83	70,24	81,91					123	63	16	4							
18,00	92	32	16	4	51,24	71,35	83,19		72,82	89,58		123	63	16	4	60,83	83,17	96,99	121,49			
19,00	92	31	16	4	60,69	80,75	94,14					123	63	16	4							
20,00	104	38	20	4	59,99	80,75	94,14		85,64	116,37		141	75	20	4	71,24	96,08	112,03	148,98			
22,00	104	38	20	4	83,27	111,91	130,52		112,84	137,25		141	75	20	5	98,79	126,62	147,67	167,11*			
24,00	121	45	25	5	104,69	131,88	153,80					141	75	25	5							
25,00	121	45	25	5	100,07	131,26	153,08		145,60	180,98		166	90	25	5	130,98	161,71	188,56	242,75			
26,00	121	45	25	5	120,12*	159,34	188,50*					166	90	25	5							
28,00	121	45	25	5	119,11	159,69	192,61					166	90	25	5	146,50	192,37	224,32				
30,00	121	45	25	6	138,47	177,25	217,00					166	90	25	6	165,37	211,32	246,45				
32,00	133	53	32	6	141,97	181,33	222,00					186	106	32	6	166,71	212,82	248,16				
36,00	133	53	32	6	215,01	260,34	318,69					186	106	32	6	238,96	286,89	334,55				
40,00	155	63	32	6	258,48*	316,61	387,57*					217	125	32	6	264,86	342,06	400,78				

\*Hasta fin de existencias

## FRESAS FRONTALES DE DESBASTE VARIOS CORTES DIN 844 Y DIN 844/L

4-6 Z

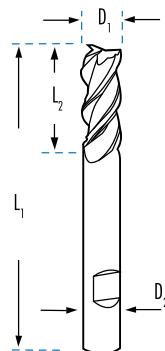


INOX

Al

TOL D1  
k12TOL D2  
h6

## SERIE CORTA



## SERIE LARGA



DIN 844	MATERIAL		ACABADO		CALIDAD		DESBASTE	
	HSSCo 8%		BRILLANTE		TiAlN		TiAlSiN	
	★★		★★★		★★★★		★★★★★	
	NR	NR	NR	NR	NR	NR	NR	NR
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	€	€	€	€
6,00	57	13	6	4	40,30	48,65	56,73	
7,00	66	16	10	4	48,43	58,07	67,71	
8,00	69	19	10	4	42,07	51,71	60,30	
9,00	69	19	10	4	50,28	60,88	71,02	
10,00	72	22	10	4	41,74	51,21	59,71	
11,00	79	22	12	4	61,16	73,35	85,55	
12,00	83	26	12	4	50,41	62,43	72,79	
13,00	83	26	12	4	71,57	84,70	98,77	
14,00	83	26	12	4	58,52	72,40	84,44	
15,00	83	26	12	4	76,96	93,19	108,68	
16,00	92	32	16	4	69,42	85,32	99,51	
17,00	92	32	16	4	94,80	112,79	131,52	
18,00	92	32	16	4	75,70	94,01	109,62	
19,00	92	31	16	4	112,03	130,73	152,46	
20,00	104	38	20	4	94,86	114,83	133,91	

## SIN CORTE AL CENTRO

FF25	FF27	FT25
HSSCo 8%	HSSCo 8%	HSSCo 8%
BRILLANTE	TiAlN	TiAlSiN
★★	★★★	★★★★
NR	NR	NR

DIN 844/L	MATERIAL		ACABADO		CALIDAD		DESBASTE	
	HSSCo 8%		BRILLANTE		TiAlN		TiAlSiN	
	★★		★★★		★★★★		★★★★★	
	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	€	€	€	€
68	24	6	4	57,12	64,60	75,70		
80	30	10	4	58,88*	73,81*	86,07*		
88	38	10	4	59,07	68,31	79,65		
88	38	10	4	64,77	74,84	87,27		
95	45	10	4	51,45	63,62	74,19		
102	45	12	4	84,20	96,48	112,53		
110	53	12	4	63,55	76,89	89,67		
110	53	12	4	73,43	86,87	101,33		
110	53	12	4	85,96	105,42	122,93		
123	63	16	4	100,39	123,27	143,75		
123	63	16	4	122,18	145,32	169,46		
141	75	20	4	137,62	185,63	207,15		
141	75	25	6	166	90	25	6	173,79
166	90	25	6	166	90	25	6	219,91
166	90	25	6	166	90	25	6	245,40
166	90	25	6	166	90	25	6	195,99
166	90	25	6	166	90	25	6	252,82
166	90	25	6	166	90	25	6	282,12
166	90	25	6	166	90	25	6	302,00
186	106	32	6	186	106	32	6	344,53
186	106	32	6	186	106	32	6	319,13
186	106	32	6	186	106	32	6	368,69
217	125	32	6	217	125	32	6	411,41
217	125	32	6	217	125	32	6	458,90
217	125	32	6	217	125	32	6	512,10

FF05	FF74	FT05	FF08	FF58	FT08
107,17	138,56		137,62	185,63	207,15
134,99	164,31	183,36	141	75	20
133,72	163,36	182,30	141	75	25
154,86	199,90	223,06	166	90	25
168,93	217,48	242,68	166	90	25
181,47	238,05	265,63	166	90	25
205,59	256,03	285,69	166	90	25
243,66	295,03	329,23	166	90	25
273,93	341,64	381,24	166	90	25

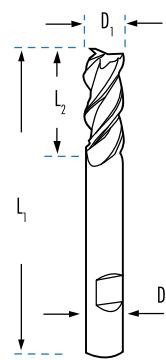
\*Hasta fin de existencias

## FRESAS FRONTALES, SIN CORTE AL CENTRO, VARIOS CORTES DIN 844 Y DIN 844/L

4-6 Z

TOL D1  
k10TOL D2  
h6

## SERIE CORTA



## SERIE LARGA



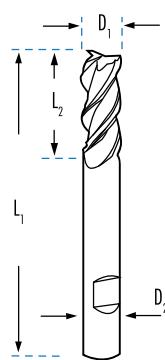
DIN 844					MATERIAL		HSS	HSSCo 8%	HSSCo 8%	HSSCo 8%	DIN 844/L					MATERIAL		HSSCo 8%	HSSCo 8%	HSSCo 8%
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	ACABADO		BRILLANTE	BRILLANTE	TiAIN	TiAlSiN	ACABADO		BRILLANTE	BRILLANTE	TiAIN	TiAlSiN	CALIDAD	★★	★★★	★★★★
					CALIDAD	★	★★	★★★	★★★★	★★★★★	CALIDAD	★★	★★★	★★★★	★★★★★	★★	★★★	★★★★	★★★★★	
2,00	51	7	6	4	11,28	14,79	23,80	27,77	54	10	6	4	18,49 *	28,62 *	33,53 *	33,53 *	28,62 *	18,49 *	26,27 *	30,78 *
2,50	52	8	6	4	11,28	14,79*	23,80*	27,77*	56	12	6	4	18,49 *	29,76 *	34,88 *	34,88 *	29,76 *	18,49 *	29,76 *	34,88 *
3,00	52	8	6	4	11,28	14,79	23,80	27,77	56	12	6	4	18,49 *	29,76 *	34,88 *	34,88 *	29,76 *	18,49 *	29,76 *	34,88 *
3,50	55	11	6	4	11,64	15,25*	24,34*	28,36*	59	15	6	4	24,33 *	35,72 *	41,86 *	41,86 *	35,72 *	24,33 *	35,72 *	41,86 *
4,00	55	11	6	4	11,28	14,79	23,89	27,84	63	19	6	4	18,49 *	29,76 *	34,88 *	34,88 *	29,76 *	18,49 *	29,76 *	34,88 *
4,50	57	13	6	4	11,64		24,34		63	19	6	4	24,33 *	35,72 *	41,86 *	41,86 *	35,72 *	24,33 *	35,72 *	41,86 *
5,00	57	13	6	4	11,28	14,79	23,89	27,84	68	24	6	4	18,49 *	29,76 *	34,88 *	34,88 *	29,76 *	18,49 *	29,76 *	34,88 *
5,50	57	13	6	4	17,53	23,00*	31,99*	37,29*	68	24	6	4	24,33 *	35,72 *	41,86 *	41,86 *	35,72 *	24,33 *	35,72 *	41,86 *
6,00	57	13	6	4	11,28	14,79	23,88	27,82	68	24	6	4	18,49 *	29,76 *	34,88 *	34,88 *	29,76 *	18,49 *	29,76 *	34,88 *
6,50	66	16	10	4	17,53*	23,00*	33,10*	38,62*	68	24	6	4	24,33 *	35,72 *	41,86 *	41,86 *	35,72 *	24,33 *	35,72 *	41,86 *
7,00	66	16	10	4	16,55	21,73	31,90	37,19	80	30	10	4	27,99 *	41,08 *	48,13 *	48,13 *	41,08 *	27,99 *	41,08 *	48,13 *
7,50	69	16	10	4	20,74	27,18*	37,08	43,24*	80	30	10	4						25,69 *	38,71 *	45,33 *
8,00	69	19	10	4	12,85	16,68	27,04	31,54	88	38	10	4						25,69 *	38,71 *	45,33 *
8,50	69	19	10	4	21,61				88	38	10	4						29,06 *	43,32 *	50,76 *
9,00	69	19	10	4	17,31	22,68	33,88	39,51	88	38	10	4						29,06 *	43,32 *	50,76 *
9,50	72	22	10	4	23,46	29,99*	41,25	48,11*	88	38	10	4						29,06 *	43,32 *	50,76 *
10,00	72	22	10	4	15,70	20,58	31,92	37,21	95	45	10	4	25,55 *	41,19 *	48,28 *	48,28 *	41,19 *	25,55 *	41,19 *	48,28 *
11,00	79	22	12	4	21,64	28,39	41,17	48,02	102	45	12	4	34,95 *	51,98 *	60,92 *	60,92 *	51,98 *	34,95 *	51,98 *	60,92 *
12,00	83	26	12	4	18,67	24,56	37,04	43,19	110	53	12	4	32,46 *	49,44 *	57,93 *	57,93 *	49,44 *	32,46 *	49,44 *	57,93 *
13,00	83	26	12	4	27,83	36,65	50,46	58,83	110	53	12	4						42,43 *	59,98 *	70,28 *
14,00	83	26	12	4	26,33	34,46	48,54	56,60	110	53	12	4						42,43 *	59,98 *	70,28 *
15,00	83	26	12	4	30,01	39,33	55,90	65,18	110	53	12	4						46,37 *	70,91 *	83,09 *
16,00	92	32	16	4	29,29	38,36	54,98	64,11	123	63	16	4						56,64 *	84,26 *	98,72 *
17,00	92	32	16	4	36,08	47,49	65,74	76,66	123	63	16	4						66,33 *	96,69 *	113,29 *
18,00	92	32	16	4	36,04	47,29	65,74	76,66	123	63	16	4						91,99 *	127,09	148,92
19,00	92	31	16	4	42,68	55,64	75,42	87,97	123	63	16	4						122,01 *	162,72 *	190,65 *
20,00	104	38	20	4	42,24	55,64	75,42	87,97	141	75	20	4						149,13 *	200,38 *	234,79 *
22,00	104	38	20	4	58,65	77,22	104,40	121,75	141	75	20	5						170,41 *	223,71 *	262,11 *
24,00	121	45	25	5	72,84	95,96	122,72	143,11	141	75	25	5						149,13 *	200,38 *	234,79 *
25,00	121	45	25	5	72,60	95,96	122,72	143,11	166	90	25	5						170,41 *	223,71 *	262,11 *
26,00	121	45	25	5	91,06	119,96*	155,14*	180,91*	166	90	25	5						149,13 *	200,38 *	234,79 *
28,00	121	45	25	5	91,06	119,96	159,33	185,79	166	90	25	5						170,41 *	222,15 *	260,27 *
30,00	121	45	25	6	105,57	138,28	177,66	207,19	166	90	25	6						170,41 *	223,71 *	262,11 *
32,00	133	53	32	6	108,58	141,85	181,79	212,00	186	106	32	6						170,41 *	223,71 *	262,11 *
36,00	133	53	32	6	142,08	187,13	227,64	265,45	186	106	32	6						243,05 *	307,38 *	360,16 *
40,00	143	63	32	6	170,34	224,93	279,34	325,76	217	125	32	6						270,17 *	413,11 *	484,05 *

## FRESAS FRONTALES DE DESBASTE VARIOS CORTES DIN 844 Y DIN 844/L

3-5 Z

TOL D1  
k12TOL D2  
h6

## SERIE CORTA



## SERIE LARGA



DIN 844	MATERIAL					€	€	€	€	DIN 844/L	MATERIAL					€	€	€	€										
	ACABADO		DESBASTE								ACABADO		DESBASTE																
	BRILLANTE		TiAlSiN								BRILLANTE		TiAlSiN																
	NF	NF	NF	NF	NR						Premium Quality	Premium Quality	Premium Quality	Premium Quality	Premium Quality														
2,00	51	7	6	3												54	10	6	3										
2,50	52	8	6	3												56	12	6	3										
3,00	52	8	6	3												56	12	6	3										
3,50	55	11	6	3												59	15	6	3										
4,00	55	11	6	3												63	19	6	3										
4,50	57	13	6	3												63	19	6	3										
5,00	57	13	6	3												68	24	6	3										
5,50	57	13	6	3												68	24	6	3										
6,00	57	13	6	3	50,47	57,92	46,77	53,78								68	24	6	3	79,20									
6,50	66	16	10	3												68	24	6	3	83,67									
7,00	66	16	10	3	64,72	70,47	58,72 *	66,82 *								80	30	10	3	70,25									
7,50	69	19	10	3												80	30	10	3	77,31									
8,00	69	19	10	3	55,74	64,93	51,11	59,04								88	38	10	3	89,53									
8,50	69	19	10	3												88	38	10	3	101,93									
9,00	69	19	10	3	67,14	73,52	61,08 *	69,88 *								88	38	10	3	81,31									
9,50	72	22	10	3												88	38	10	3	94,95									
10,00	72	22	10	4	53,15	63,00	48,18	59,83								95	45	10	4	74,95									
11,00	79	22	12	4												102	45	12	4	83,30									
12,00	83	26	12	4	69,92	79,19	63,75	72,95								110	53	12	4	88,66									
13,00	83	26	12	4												110	53	12	4	73,74									
14,00	83	26	12	4	84,91	96,53	76,98	87,54								110	53	12	4	82,59*									
15,00	83	26	12	4												110	53	12	4	100,56									
16,00	92	32	16	4	104,08	114,76	94,90	106,92								123	63	16	4	81,31									
17,00	92	32	16	4												123	63	16	4	95,56									
18,00	92	32	16	4	114,28	124,79	102,97	116,95								123	63	16	4	127,74									
19,00	92	31	16	4												123	63	16	4	100,12									
20,00	104	38	20	4	141,76	156,28	128,14	146,61								123	63	16	4	113,06									
22,00	104	38	20	5	174,76	192,54	158,48	180,11								141	75	20	5	133,17									
24,00	121	45	25	5												141	75	20	5	146,28									
25,00	121	45	25	5	207,16	230,18	187,91	213,19								166	90	25	5	118,82									
26,00	121	45	25	5												166	90	25	5	134,97									
28,00	121	45	25	5												166	90	25	5	193,63									
30,00	121	45	25	5												166	90	25	5	212,40									
32,00	133	53	32	5												186	106	32	5	171,55									
36,00	133	53	32	5												186	106	32	5	197,49									
40,00	155	63	32	5												217	125	32	5	297,06									

## FRESAS SERIE SUPER CORTA Y EXTRA CORTA DE 3 CORTES

3 Z



INOX

Al

TOL D1  
e8TOL D2  
h6

## SERIE SUPER CORTA

MATERIAL ACABADO					FF51	
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	HSSCo 8%	BRILLANTE
					€	
1,00	34	2	6	3	15,06	
1,50	34	3	6	3	15,06	
2,00	35	4	6	3	15,03	
2,50	36	5	6	3	15,03	
3,00	36	5	6	3	15,03	
3,50	37	6	6	3	15,03	
4,00	38	7	6	3	15,03	
4,50	38	7	6	3	15,03	
5,00	39	8	6	3	15,03	
5,50	39	8	6	3	15,03	
6,00	39	8	6	3	15,03	
6,50	42	10	8	3	20,66	
7,00	42	10	8	3	20,66	
7,50	42	10	8	3	20,66	
8,00	43	11	8	3	20,66	
8,50	48	11	10	3	23,68	
9,00	48	11	10	3	23,68	
9,50	48	11	10	3	23,68	
10,00	50	13	10	3	23,68	



## SERIE EXTRA CORTA

MATERIAL ACABADO					FF53	
D <sub>1</sub> mm	L <sub>1</sub> mm	L <sub>2</sub> mm	D <sub>2</sub> mm	Z	HSSCo 8%	BRILLANTE
					€	
2,00	38	7	6	3	16,48	
2,50	39	8	6	3	16,48	
3,00	39	8	6	3	16,48	
3,50	41	10	6	3	16,48	
4,00	42	11	6	3	16,48	
4,50	42	11	6	3	16,48	
5,00	44	13	6	3	16,48	
5,50	44	13	6	3	16,48	
6,00	44	13	6	3	16,48	
6,50	48	16	8	3	22,68	
7,00	48	16	8	3	22,68	
8,00	51	19	8	3	22,68	
8,50	56	19	10	3	25,94	
9,00	56	19	10	3	25,94	
10,00	59	22	10	3	25,94	

