

# WELDING TABLES

Machine PT630	DVS 2207-1 rel. August 2015
Thrust section sq.cm. 17,27	Material PE

SDR 41						Welding range 315 630					
D	S	P1 bead		P2 t 2		t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	7,7	6,4	1,5	0.. 0,4	77	0.. 6	6	6,4	6,5	8,1	10,3
355	8,7	8,2	1,5	0.. 0,5	87	0.. 7	7	8,2	7,2	9,0	11,5
400	9,8	10,4	1,5	0.. 0,7	98	0.. 7	7	10,4	7,9	10,0	12,8
450	11,0	13,1	1,5	0.. 0,9	110	0.. 8	8	13,1	8,8	11,1	14,3
500	12,2	16,2	2,0	0.. 1,1	122	0.. 8	8	16,2	9,6	12,2	15,7
560	13,7	20,4	2,0	0.. 1,4	137	0.. 8	9	20,4	10,6	13,4	17,5
630	15,4	25,8	2,0	0.. 1,7	154	0.. 9	9	25,8	11,7	14,9	19,6
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SDR 33						Welding range 315 630					
D	S	P1 bead		P2 t 2		t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	9,5	8,0	1,5	0.. 0,5	95	0.. 7	7	8	7,8	9,8	12,6
355	10,8	10,1	1,5	0.. 0,7	108	0.. 8	8	10,1	8,6	10,9	14,0
400	12,1	12,8	2,0	0.. 0,9	121	0.. 8	8	12,8	9,6	12,1	15,6
450	13,6	16,2	2,0	0.. 1,1	136	0.. 8	9	16,2	10,6	13,4	17,5
500	15,2	20,0	2,0	0.. 1,3	152	0.. 9	9	20	11,5	14,7	19,3
560	17,0	25,1	2,0	0.. 1,7	170	0.. 9	10	25,1	12,7	16,3	21,5
630	19,1	31,8	2,5	0.. 2,1	191	0.. 10	11	31,8	14,1	18,1	24,1
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SDR 27,6						Welding range 315 630					
D	S	P1 bead		P2 t 2		t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	11,4	9,5	1,5	0.. 0,6	114	0.. 8	8	9,5	9,1	11,5	14,8
355	12,9	12,0	2,0	0.. 0,8	129	0.. 8	8	12	10,1	12,7	16,5
400	14,5	15,2	2,0	0.. 1,0	145	0.. 9	9	15,2	11,1	14,1	18,5
450	16,3	19,3	2,0	0.. 1,3	163	0.. 9	10	19,3	12,3	15,7	20,7
500	18,1	23,8	2,0	0.. 1,6	181	0.. 10	11	23,8	13,4	17,2	22,9
560	20,3	29,9	2,5	0.. 2,0	203	0.. 10	12	29,9	14,9	19,1	25,5
630	22,8	37,8	2,5	0.. 2,5	228	0.. 11	13	37,8	16,7	21,3	28,4
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**REMEMBER:**

Heating mirror temperature must be 220 °C +/- 10°C;

Add drag pressure to P1 and P5;

A reduction of cooling time of up to 50% is permitted in the following circumstances:

- The joint connection was created under workshop conditions and
- the removal of the part from the welding machine and its temporary until the complete cooling time according to column t5 causes negligible loading of the joint connection

Machine PT630	DVS 2207-1 rel. August 2015
Thrust section sq.cm. 17,27	Material PE

SDR 26						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	12,1	10,0	2,0	0..0,7	121	0..8	8	10	9,6	12,1	15,6
355	13,7	12,7	2,0	0..0,8	137	0..8	9	12,7	10,6	13,4	17,5
400	15,4	16,1	2,0	0..1,1	154	0..9	9	16,1	11,7	14,9	19,6
450	17,3	20,4	2,0	0..1,4	173	0..10	10	20,4	12,9	16,5	21,9
500	19,2	25,2	2,5	0..1,7	192	0..10	11	25,2	14,2	18,2	24,3
560	21,5	31,6	2,5	0..2,1	215	0..11	12	31,6	15,8	20,2	26,9
630	24,2	40,1	2,5	0..2,7	242	0..11	13	40,1	17,7	22,5	30,0
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SDR 22						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	14,3	11,7	2,0	0..0,8	143	0..9	9	11,7	11,0	14,0	18,3
355	16,1	14,9	2,0	0..1,0	161	0..9	10	14,9	12,2	15,5	20,5
400	18,2	18,9	2,0	0..1,3	182	0..10	11	18,9	13,5	17,3	23,0
450	20,5	24,0	2,5	0..1,6	205	0..10	12	24	15,0	19,2	25,7
500	22,7	29,6	2,5	0..2,0	227	0..11	13	29,6	16,7	21,2	28,3
560	25,5	37,1	2,5	0..2,5	255	0..12	14	37,1	18,6	23,5	31,4
630	28,6	47,0	3,0	0..3,1	286	0..13	15	47	20,9	26,4	35,1
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SDR 21						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	15,0	12,3	2,0	0..0,8	150	0..9	9	12,3	11,4	14,6	19,1
355	16,9	15,6	2,0	0..1,0	169	0..9	10	15,6	12,7	16,2	21,5
400	19,0	19,8	2,5	0..1,3	190	0..10	11	19,8	14,0	18,0	24,1
450	21,4	25,1	2,5	0..1,7	214	0..11	12	25,1	15,7	20,1	26,8
500	23,8	30,9	2,5	0..2,1	238	0..11	13	30,9	17,4	22,1	29,5
560	26,7	38,8	3,0	0..2,6	267	0..12	14	38,8	19,5	24,6	32,8
630	30,0	49,1	3,0	0..3,3	300	0..13	16	49,1	21,9	27,6	36,7
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REMEMBER:  
 Heating mirror temperature must be 220 °C +/- 10°C;  
 Add drag pressure to P1 and P5;  
 A reduction of cooling time of up to 50% is permitted in the following circumstances:  
 - The joint connection was created under workshop conditions and  
 - the removal of the part from the welding machine and its temporary until the complete cooling time according to column t5 causes negligible loading of the joint connection

Machine PT630	DVS 2207-1 rel. August 2015
Thrust section sq.cm. 17,27	Material PE

SDR 17,6						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGEOV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	17,9	14,5	2,0	0..1,0	179	0..10	11	14,5	13,3	17,1	22,7
355	20,2	18,4	2,5	0..1,2	202	0..10	12	18,4	14,8	19,0	25,3
400	22,7	23,4	2,5	0..1,6	227	0..11	13	23,4	16,7	21,2	28,3
450	25,6	29,6	2,5	0..2,0	256	0..12	14	29,6	18,7	23,6	31,5
500	28,4	36,6	3,0	0..2,4	284	0..13	15	36,6	20,8	26,2	34,8
560	31,8	45,9	3,0	0..3,1	318	0..14	17	45,9	23,2	29,3	38,9
630	35,8	58,0	3,0	0..3,9	358	0..16	18	58	26,1	32,9	43,6
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SDR 17						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGEOV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	18,5	15,0	2,0	0..1,0	185	0..10	11	15	13,7	17,6	23,4
355	20,9	19,0	2,5	0..1,3	209	0..11	12	19	15,3	19,6	26,2
400	23,5	24,2	2,5	0..1,6	235	0..11	13	24,2	17,2	21,9	29,2
450	26,5	30,6	3,0	0..2,0	265	0..12	14	30,6	19,3	24,4	32,6
500	29,4	37,8	3,0	0..2,5	294	0..13	16	37,8	21,5	27,1	36,0
560	32,9	47,4	3,0	0..3,2	329	0..15	17	47,4	24,0	30,3	40,2
630	37,1	60,0	3,5	0..4,0	371	0..16	19	60	27,0	34,1	45,1
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SDR 13,6						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGEOV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	23,2	18,4	2,5	0..1,2	232	0..11	13	18,4	17,0	21,6	28,8
355	26,1	23,4	3,0	0..1,6	261	0..12	14	23,4	19,1	24,1	32,1
400	29,4	29,7	3,0	0..2,0	294	0..13	16	29,7	21,5	27,1	36,0
450	33,1	37,6	3,0	0..2,5	331	0..15	17	37,6	24,2	30,4	40,4
500	36,8	46,5	3,0	0..3,1	368	0..16	19	46,5	26,8	33,8	44,7
560	41,2	58,3	3,5	0..3,9	412	0..17	21	58,3	29,9	37,9	50,1
630	46,3	73,8	3,5	0..4,9	463	0..19	23	73,8	33,5	42,6	56,5
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REMEMBER:  
 Heating mirror temperature must be 220 °C +/- 10°C;  
 Add drag pressure to P1 and P5;  
 A reduction of cooling time of up to 50% is permitted in the following circumstances:  
 - The joint connection was created under workshop conditions and  
 - the removal of the part from the welding machine and its temporary until the complete cooling time according to column t5 causes negligible loading of the joint connection

Machine PT630	DVS 2207-1 rel. August 2015
Thrust section sq.cm. 17,27	Material PE

SDR 11						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	28,6	22,4	3,0	0..1,5	286	0..13	15	22,4	20,9	26,4	35,1
355	32,3	28,4	3,0	0..1,9	323	0..14	17	28,4	23,6	29,7	39,4
400	36,4	36,1	3,0	0..2,4	364	0..16	19	36,1	26,5	33,4	44,2
450	40,9	45,7	3,5	0..3,0	409	0..17	21	45,7	29,7	37,6	49,8
500	45,5	56,4	3,5	0..3,8	455	0..19	23	56,4	32,9	41,8	55,4
560	50,9	70,7	4,0	0..4,7	509	0..20	25	70,7	36,6	46,8	62,1
630	57,3	89,5	4,0	0..6,0	573	0..22	29	89,5	41,1	52,5	69,7
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SDR 9						Welding range 315 630					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	35,0	26,7	3,0	0..1,8	350	0..15	18	26,7	25,5	32,2	42,6
355	39,4	34,0	3,5	0..2,3	394	0..17	20	34	28,7	36,3	48,0
400	44,4	43,1	3,5	0..2,9	444	0..18	22	43,1	32,2	40,9	54,2
450	50,0	54,6	3,5	0..3,6	500	0..20	25	54,6	36,0	46,0	61,0
500	55,6	67,4	4,0	0..4,5	556	0..21	28	67,4	39,9	51,0	67,7
560	62,2	84,5	4,0	0..5,6	622	0..23	31	84,5	44,6	57,0	75,7
630	70,0	107,0	4,0	0..7,1	700	0..25	35	107	50,0	64,0	85,0
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SDR 7,4						Welding range 315 450					
D	S	P1	bead	P2	t 2	t 3	t 4	P5	t 5		
DIAMETER	THICKNESS	EQUALISING		HEATING		CHANGE OV.	JOINING	COOLING	<15°	15°-25°c	25°-40°c
mm	mm	bar	mm	bar	sec	sec	sec	bar	min	min	min
315	42,6	31,6	3,5	0..2,1	426	0..18	22	31,6	30,9	39,1	51,9
355	48,0	40,2	3,5	0..2,7	480	0..19	24	40,2	34,6	44,1	58,5
400	54,1	51,0	4,0	0..3,4	541	0..21	27	51	38,8	49,6	65,9
450	60,8	64,6	4,0	0..4,3	608	0..23	30	64,6	43,6	55,7	74,0
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REMEMBER:  
 Heating mirror temperature must be 220 °C +/- 10°C;  
 Add drag pressure to P1 and P5;  
 A reduction of cooling time of up to 50% is permitted in the following circumstances:  
 - The joint connection was created under workshop conditions and  
 - the removal of the part from the welding machine and its temporary until the complete cooling time according to column t5 causes negligible loading of the joint connection