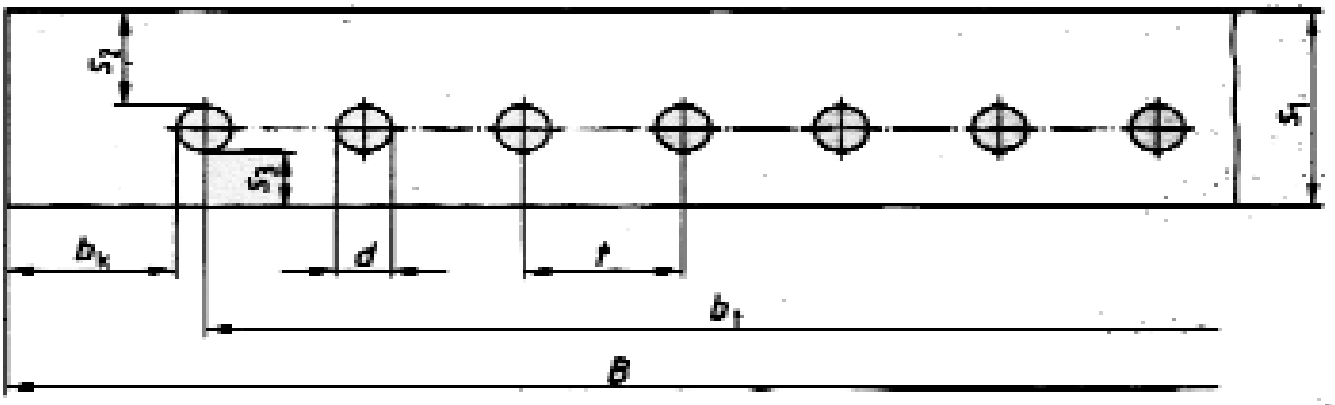
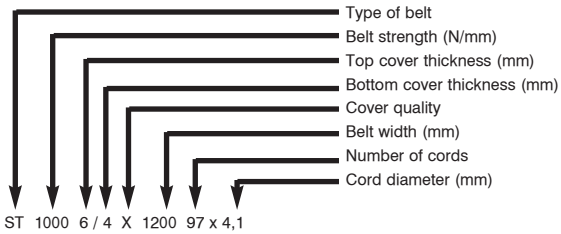
TECHNICAL INFORMATION
STEEL CORD BELT



B	Belt width
b_t	Effective belt width
d	Cord diameter
b_k	Edge width
t	Cord pitch
S1	Belt thickness
S2	Top cover thickness
S3	Bottom cover thickness

Key to symbols



Standard specification for ST-belts

Cord type - diameter (mm)	*Belt strength (N / mm)*												*Theoretical Diameter (mm)*	*Minimum breaking load (kN)*
	ST 500-630	ST 800	ST 1000	ST 1250	ST 1400	ST 1600-2250	ST 2500-2800	ST 3150	ST 3500	ST 4000	ST 4500	ST 5000		
7 x 7 - 2,7	■												2,83	8,1
7 x 7 - 3,1		■											3,23	10,6
7 x 7 - 3,6		■	■										3,77	14,0
7 x 7 - 3,8			■										3,99	14,9
7 x 7 - 4,1			■	■									4,27	17,9
7 x 7 - 4,4				■	■								4,59	20,1
7 x 7 - 5,0					■	■							5,18	25,8
7 x 7 - 5,4						■							5,54	28,4
19 + 7 x 7 - 5,9						■							5,98	32,5
19 + 7 x 7 - 6,7							■						6,83	40,3
19 + 7 x 7 - 7,4								■					7,55	50,9
7 x 19 - 6,7							■						6,82	38,8
7 x 19 - 6,9							■						7,08	41,2
7 x 19 - 7,6								■					7,71	51,2
7 x 19 - 8,2									■				8,39	57,2
7 x 19 - 8,6										■			8,82	59,9
7 x 19 - 8,8										■			9,05	67,6
7 x 19 - 9,3											■		9,44	76,7
7 x 19 - 9,6											■		9,83	79,2
7 x 19 - 10,7												■	10,9	96,9

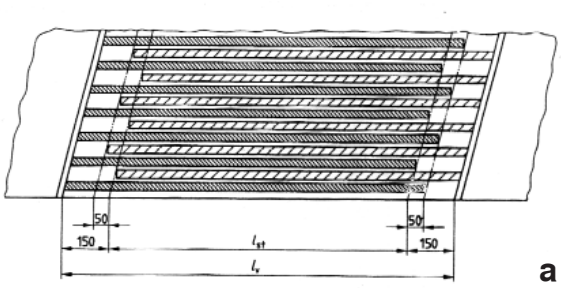
Specification for steel cord conveyor belts according to DIN 22131

Steel cord conveyor belts

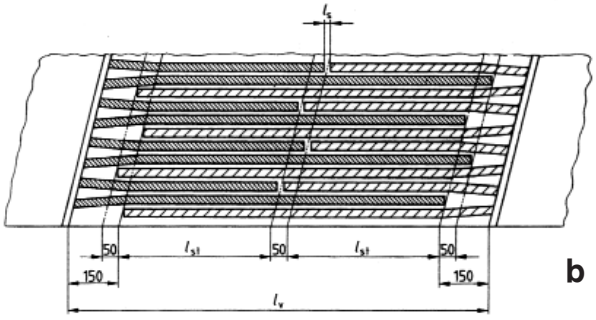
Type		*ST 400*	*ST 500*	*ST 630*	*ST 800*	*ST 1000*	*ST 1250*	*ST 1600*	*ST 1800*	*ST 2000*	*ST 2500*	*ST 3150*	*ST 3500*	*ST 4000*	*ST 4500*	*ST 5000*	*ST 5400*	*ST 6300*
Minimum breaking load in N per carrying mm belt width		400	500	630	800	1000	1250	1600	1800	2000	2500	3150	3500	4000	4500	5000	5400	6300
Min. breaking load of cords (kN)		5,3	5,3	10,0	11,5	13,2	19,2	26,4	26,4	26,4	41,2	52,0	57,7	66,0	79,2	93,5	101,0	118,0
Max. required diameter d (mm)		2,5	2,5	3,3	3,5	4,1	4,9	5,6	5,6	5,6	7,2	8,1	8,6	8,9	9,7	10,9	11,3	12,3
t ± 1,5 (mm)		12	10	13,5	13,5	12	14	15	13	12	15	15	15	16	16	17	17	17
Belt width	Acceptable tolerance	n = number of cords																
500	± 5	40	48	36	36	40	34											
650	± 7	53	63	47	47	52	44											
800	± 8	65	78	58	58	64	55	50	58	62	60	50	50	50				
1000	± 10	82	98	73	98	81	69	64	73	78	64	64	64	64	59	55	55	55
1200	± 10	98	118	87	87	97	84	77	88	97	77	77	77	77	71	66	66	66
1400	± 12	115	138	102	102	114	98	90	104	114	90	80	90	90	84	78	78	78
1600	± 12	132	156	117	117	131	112	104	120	131	104	104	104	104	96	90	90	90
1800	± 14	148	177	131	131	147	126	117	138	147	117	117	117	117	109	102	102	102
2000	± 14	164	197	145	146	164	141	130	150	184	130	130	130	130	121	113	113	113
2200	± 15			161	161	181	166	144	166	181	144	144	144	144	134	125	125	126
2400	± 15			175	175	197	169	157	182	197	157	157	157	157	146	137	137	137
2600	± 15			190	190	214	184	170	196	214	170	170	170	170	159	149	149	149
2800	± 15							184	212	231	184	184	184	184	171	161	161	161
3000	± 16							197	227	247	197	197	197	197	184	172	172	172
3200	± 15										210	210	210	210	196	184	184	184

Belt thickness +1,0 - 0,5 (mm)		10,5	10,5	13,5	13,6	14,0	14,0	19,5	19,5	19,5	25,0	26,0	26,5	29,0	29,5	33,0	33,5	34,5
Cover thickness of the loading side (mm)		4,0	4,0	6,0	6,0	6,0	6,0	8,0	8,0	8,0	10,0	10,0	10,0	12,0	12,0	12,0	12,0	12,0
Cover thickness of the tracking side (mm)		4,0	4,0	4,0	4,0	4,0	4,0	6,0	6,0	6,0	8,0	8,0	8,0	8,0	8,0	10,0	10,0	10,0
Belt weight of a.m. data (kg / m2)	Quality Y	13,5	14,0	17,5	18,5	20,0	20,5	28,6	29,0	29,5	39,0	42,0	45,0	50,0	52,5	60,0	63,0	68,0
	Quality X	13,0	13,5	17,0	18,0	19,5	20,0	28,0	28,5	29,0	38,0	41,0	44,0	49,0	51,5	59,0	62,0	67,0

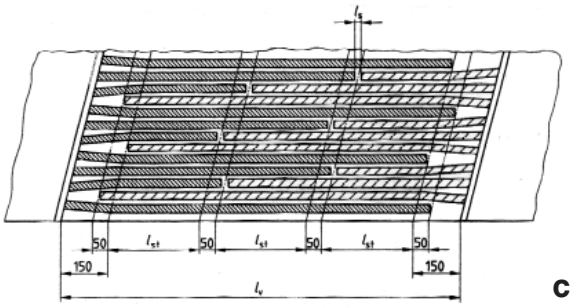
Splicing the ST-belts



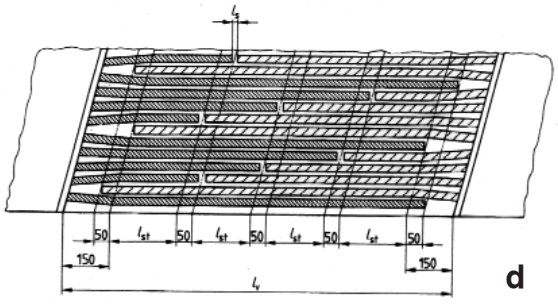
a



b



c



d

Length of splice steps for ST - belts

Belt tensile strength (N / mm)	*Step length (mm)*	*Splice length (mm)*	*According to Figure*
1000	300	600	a
1250	350	650	a
1600	450	750	a
2000	400	1150	b
2500	500	1350	b
3150	650	1650	b
3500	650	2350	c
4000	750	2650	c
4500	800	2800	c
5000	900	4050	d
5400	1000	4450	d

D. RUBBER QUALITIES

Cover qualities

Quality class	*Tensile strength σ_R N / mm² min*	*Elongation at break % min*	*Abrasion A mm³ max*
W	18	400	90
X	25	450	120
Y	20	400	150
Z	15	350	250

Code letter	*Special characteristics*
E	with antistatic cover
K	with antistatic and flame resistant cover
S	flame resistant with and without cover and with antistatic cover
T	heat resistant
R	cold resistant
G	oil and grease resistant
A	for food
C	for chemical products

Other cover qualities, e.g. with anti - adhesive properties (silicon layer on top cover), possible on request.

Carcass rubber properties

A. Steelcord belt
Adhesive force rubber to cord in N / mm

	ST 1000	*ST 1250*	*ST 1600*	*ST 2000*	*ST 2500*	*ST 3150*	*ST 3500*	ST 4000	*ST 4500*	*ST 5000*	*ST 5400*
Delivery state	80	*95*	*105*	*105*	*130*	*140*	*145*	*150*	*165*	*175*	*180*
After thermic treatment	*75*	*90*	*95*	*95*	*120*	*130*	*140*	*145*	*160*	*170*	*175*