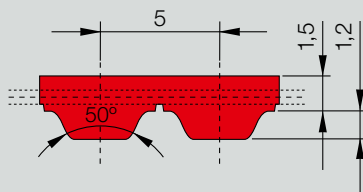


# AT high performance Timing Belts

## AT 5 GEN III



CONTI® SYNCHROFLEX Timing Belt (SFX) AT 5 GEN III

High performance AT profile with metric pitch and trapezoidal teeth.

**Standard version:**

- single-sided
- high performance polyurethane in red colour
- steel cord tension members with high density
- steel cord tension members in two-filament construction
- steel cord tension members in highly flexible construction

**FA:** with bigger back thickness

Type / Length* GEN III	Number of teeth	Type / Length* GEN III	Number of teeth
AT 5 / 225	45	AT 5 / 720	144
AT 5 / 255	51	AT 5 / 750	150
AT 5 / 260	52	AT 5 / 780	156
AT 5 / 280	56	AT 5 / 825	165
AT 5 / 300	60	AT 5 / 860	172
AT 5 / 330	66	AT 5 / 875	175
AT 5 / 340	68	AT 5 / 900	180
AT 5 / 375	75	AT 5 / 920	184
AT 5 / 390	78	AT 5 / 975	195
AT 5 / 420	84	AT 5 / 1050	210
AT 5 / 450	90	AT 5 / 1125	225
AT 5 / 455	91	AT 5 / 1230	246
AT 5 / 480	96	AT 5 / 1500	300
AT 5 / 490	98	AT 5 / 1750	350
AT 5 / 500	100	AT 5 / 2000	400
AT 5 / 525	105	AT 5 / 3350 FA**	670
AT 5 / 545	109	AT 5 / 3800 FA**	760
AT 5 / 600	120		
AT 5 / 610	122		
AT 5 / 620	124		
AT 5 / 630	126		
AT 5 / 660	132		
AT 5 / 670	134		
AT 5 / 690	138		
AT 5 / 710	142		

Preferred belt width\* in mm:  
6, 10, 16, 25, 32, 50, 75, 100

\* Other dimensions upon request.  
\*\* Please request technical support from your Mulco sales partner.

**Order example**

CONTI® SYNCHROFLEX Timing Belt 50 AT5 / 450 GEN III

Belt width in mm \_\_\_\_\_

Type/Pitch \_\_\_\_\_

Belt length in mm \_\_\_\_\_

Specification Generation III \_\_\_\_\_

# AT 5 GEN III Technical data

## 1. Tooth shear strength (specific belt tooth strength)

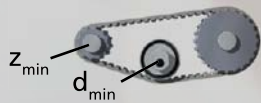

R.p.m. n [min <sup>-1</sup> ]	F <sub>Uspec</sub> [N/cm]	M <sub>spec</sub> [Ncm/cm]	P <sub>spec</sub> [W/cm]	R.p.m. n [min <sup>-1</sup> ]	F <sub>Uspec</sub> [N/cm]	M <sub>spec</sub> [Ncm/cm]	P <sub>spec</sub> [W/cm]
0	44,13	3,51	0,00	2000	27,38	2,18	4,56
20	43,63	3,48	0,07	2200	26,63	2,12	4,89
40	43,13	3,44	0,14	2400	26,00	2,07	5,20
60	42,63	3,40	0,21	2600	25,38	2,02	5,50
80	42,25	3,36	0,28	2800	24,80	1,97	5,79
100	41,88	3,33	0,35	3000	24,28	1,93	6,06
200	40,00	3,19	0,67	3200	23,76	1,89	6,34
300	38,63	3,08	0,96	3400	23,30	1,85	6,60
400	37,25	2,96	1,24	3600	22,85	1,82	6,85
500	36,25	2,88	1,51	3800	22,41	1,78	7,10
600	35,25	2,80	1,76	4000	22,01	1,85	7,34
700	34,28	2,74	2,00	4500	21,08	1,68	7,90
800	33,50	2,68	2,24	5000	20,23	1,61	8,43
900	32,88	2,61	2,46	5500	19,45	1,55	8,91
1000	32,13	2,56	2,68	6000	18,75	1,49	9,38
1100	31,50	2,51	2,89	6500	18,10	1,44	9,80
1200	31,00	2,64	3,10	7000	17,49	1,39	10,20
1300	30,38	2,42	3,30	7500	16,93	1,35	10,58
1400	29,88	2,38	3,49	8000	16,39	1,30	10,93
1500	29,38	2,34	3,68	8500	15,89	1,26	11,25
1600	29,00	2,30	3,86	9000	15,41	1,23	11,55
1700	28,50	2,27	4,04	9500	14,96	1,19	11,84
1800	28,13	2,24	4,21	10000	14,54	1,16	12,11
1900	27,75	2,21	4,39				

Rotational speeds over 10000 rpm and/or belt speeds over 80 m/s need special drive designs. Please ask our advice.

## 2. Tension member strength (permitted tensile force of the belt F<sub>zul</sub>), Belt weight

Belt width	b	[mm]	6	10	16	25	32	50	75	100
Tension member strength F <sub>zul</sub>		[N]	417	787	1342	2175	2823	4489	6803	9117
Belt weight	AT 5 GEN III	[kg/m]	0,022	0,036	0,058	0,090	0,115	0,180	0,270	0,360

## 3. Flexibility (Minimum numbers of teeth, minimum diameter)

Timing pulley	z <sub>min</sub>	15		Drive type without contraflexure
Tension roller (smooth), running on teeth	d <sub>min</sub> [mm]	25		
Timing pulley	z <sub>min</sub>	20		Drive type with contraflexure
Tension roller (smooth), running on the back of the belt	d <sub>min</sub> [mm]	60		