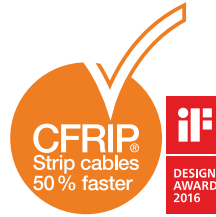


Control cable | PVC | chainflex® CF5

- For heavy duty applications
- PVC outer jacket
- Oil-resistant
- Flame retardant



Dynamic information

	Bend radius	e-chain® linear	minimum 6.8 x d
		flexible	minimum 5 x d
		fixed	minimum 4 x d
	Temperature	e-chain® linear	+5 °C to +70 °C
		flexible	-5 °C to +70 °C (following DIN EN 60811-504)
		fixed	-15 °C to +70 °C (following DIN EN 50305)
	v max.	unsupported	10 m/s
		gliding	5 m/s
		a max.	80 m/s ²
	Travel distance	Unsupported travel distances and up to 100 m for gliding applications, Class 5	
	Torsion	± 90°, with 1 m cable length, Class 2	

Cable structure

	Conductor	Finely stranded conductor consisting of bare copper wires (following DIN EN 60228).
	Core insulation	Cores ≤ 0,5 mm² : Mechanically high-quality TPE mixture. Cores ≥ 0,75 mm² : Mechanically high-quality PVC mixture.
	Core structure	Number of cores < 12 : Cores wound in a layer with a short pitch length. Number of cores ≥ 12 : Cores wound in bundles which are then wound around a high tensile strength centre element, all with optimised short pitch lengths and directions.
	Core identification	Cores ≤ 0,34 mm² : Colour code in accordance with DIN 47100. Cores ≥ 0,5 mm² : Black cores with white numerals, one core green-yellow.
	Outer jacket	Low-adhesion, oil-resistant PVC mixture, adapted to suit the requirements in e-chains® (following DIN EN 50363-4-1). Colour: Moss green (similar to RAL 6005)
	CFRIP®	Strip cables faster: a tear strip is moulded into the outer jacket Video ► www.igus.eu/CFRIP

Electrical information

	Nominal voltage	300/500 V (following DIN VDE 0298-3)
	Testing voltage	2000 V (following DIN EN 50395)

Class 5.5.2.2

Basic requirements	low	1	2	3	4	5	6	7	highest
Travel distance	unsupported	1	2	3	4	5	6	7	≥ 400 m
Oil resistance	none	1	2	3	4	highest			
Torsion	none	1	2	3	±180°				

Properties and approvals

	UV resistance	Medium.
	Oil resistance	Oil-resistant (following DIN EN 50363-4-1), Class 2.
	Flame retardant	According to IEC 60332-1-2, CEI 20-35, FT1, VW-1
	Silicone-free	Free from silicone which can affect paint adhesion (following PV 3.10.7 – status 1992).
	UL/CSA	Cores < 0.5 mm² : Style 10492 and 2570, 600 V, 80 °C Cores ≥ 0.5 mm² : Style 11113 and 2570, 600 V, 80 °C
	NFFPA	Following NFFPA 79-2012 chapter 12.9.
	EAC	Certificate no. RU C-DE.ME77.B.01254 (TR ZU)
	CTP	Certificate no. C-DE.PB49.B.00416 (Fire safety)
	CEI	Following CEI 20-35.
	Lead-free	Following 2011/65/EU (RoHS-II).
	Cleanroom	According to ISO Class 2, material/cable tested by IPA according to ISO standard 14644-1.
	CE	Following 2014/35/EU.

Guaranteed lifetime according to guarantee conditions (Page 22-23)

Double strokes*	5 million		7.5 million		10 million	
	< 10 m	≥ 10 m	< 10 m	≥ 10 m	< 10 m	≥ 10 m
Temperature, from/to [°C]	R min. [factor x d]	R min. [factor x d]	R min. [factor x d]	R min. [factor x d]	R min. [factor x d]	R min. [factor x d]
+5/+15	7.5	10	8.5	11	9.5	12
+15/+60	6.8	7.5	7.8	8.5	8.8	9.5
+60/+70	7.5	10	8.5	11	9.5	12

* Higher number of double strokes? Online lifetime calculation: www.igus.eu/chainflexlife

Typical mechanical application areas

- For heavy duty applications
- Light oil influence
- Preferably indoor applications, but also outdoor ones at temperatures > 5 °C
- Unsupported travel distances and up to 100 m for gliding applications
- Storage and retrieval units for high-bay warehouses, machining units/packaging machines, quick handling equipment, indoor cranes



Example image



Control cable | PVC | chainflex® CF5

Strip cables 50% faster

igus® chainflex® CF5

Example image

Part No.	Number of cores and conductor nominal cross section [mm²]	Outer diameter (d) max. mm	Copper index kg/km	Weight kg/km
CF5.02.36	36x0.25	15.0	105	215
CF5.03.15	15x0.34	11.0	58	141
CF5.03.18	18x0.34	12.0	71	182
CF5.03.25	25x0.34	14.0	97	244
CF5.05.02	2x0.5	6.0	11	38
CF5.05.03	3G0.5	6.0	16	42
CF5.05.05	5G0.5	7.0	27	75
CF5.05.07	7G0.5	8.0	38	80
CF5.05.12	12G0.5	11.0	64	134
CF5.05.18	18G0.5	13.0	96	195
CF5.05.25	25G0.5	16.0	132	289
CF5.05.30	30G0.5	18.0	159	417
CF5.07.03	3G0.75	6.5	24	56
CF5.07.04	4G0.75	7.0	33	68
CF5.07.05	5G0.75	7.5	41	84
CF5.07.07	7G0.75	9.0	58	118
CF5.07.12	12G0.75	12.5	96	194
CF5.07.18	18G0.75	15.0	143	278
CF5.07.25	25G0.75	17.5	203	397
CF5.07.36	36G0.75	22.0	285	605
CF5.07.42	42G0.75	24.0	333	658
CF5.10.03	3G1.0	6.5	32	57
CF5.10.04	4G1.0	7.0	43	80
CF5.10.05	5G1.0	8.0	53	97
CF5.10.07	7G1.0	9.5	78	135
CF5.10.12	12G1.0	13.0	127	235
CF5.10.18	18G1.0	16.5	191	318
CF5.10.25	25G1.0	19.5	264	503
CF5.15.03	3G1.5	7.5	48	77
CF5.15.04	4G1.5	8.0	64	108
CF5.15.05	5G1.5	9.0	79	132
CF5.15.07 ¹⁷⁾	7G1.5	10.5	112	187
CF5.15.12	12G1.5	15.0	191	276
CF5.15.18	18G1.5	19.5	285	496
CF5.15.25	25G1.5	21.5	396	670

¹⁷⁾ When using the cables with „7 G 1.5 mm²“ and „7 G 2.5 mm²“ minimum bend radius must be 17.5 x d with gliding travel distance ≥ 5 m.
Note: The given outer diameters are maximum values and may tend toward lower tolerance limits.
G = with green-yellow earth core x = without earth core

Class 5.5.2.2

Basic requirements	low	1	2	3	4	5	6	7	highest
Travel distance	unsupported	1	2	3	4	5	6	7	≥ 400 m
Oil resistance	none	1	2	3	4	highest			
Torsion	none	1	2	3	±180°				

Part No.	Number of cores and conductor nominal cross section [mm²]	Outer diameter (d) max. mm	Copper index kg/km	Weight kg/km
CF5.15.36	36G1.5	26.5	570	1001
CF5.25.04	4G2.5	10.0	102	176
CF5.25.05	5G2.5	11.0	128	208
CF5.25.07 ¹⁷⁾	7G2.5	13.0	181	291
CF5.25.12	12G2.5	18.5	303	499
CF5.25.18	18G2.5	23.5	456	794
CF5.25.25	25G2.5	27.5	637	1100

¹⁷⁾ When using the cables with „7 G 1.5 mm²“ and „7 G 2.5 mm²“ minimum bend radius must be 17.5 x d with gliding travel distance ≥ 5 m.
Note: The given outer diameters are maximum values and may tend toward lower tolerance limits.
G = with green-yellow earth core x = without earth core

Order example: **CF5.02.36** – to your desired length (0.5 m steps)
CF5 chainflex® series .02 Code nominal cross section .36 Code Number of cores

Online order ► www.chainflex.eu/CF5

Delivery time 24h or today.
Delivery time means time until shipping of goods.



chainflex® CF5/CF6 for storage retrieval unit: Long travel in longitudinal axis. e-chain®: Series E4/00 with igus® guide trough made of steel

