



# Data communication systems

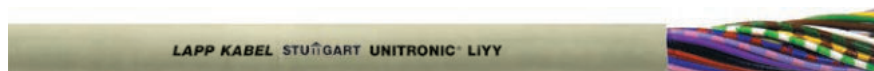


Low frequency data transmission cables • DIN colour code



## UNITRONIC® LiYY

Data transmission cable with colour code acc. to DIN 47100



### Info

- The classic for multi-functional use
- Further dimensions/colours on request
- CPR: Article number choice under [www.lappkabel.com/cpr](http://www.lappkabel.com/cpr)

### Benefits

- Space-saving installation due to small cable diameters
- Multifunctional application possibilities
- Depending on the quantity, the outer sheath can also be produced in other colours to match your application needs

### Application range

- UNITRONIC® LiYY is also used as a control and signal cable in electronics of computer systems, electronic control equipment, office machines, balances, etc.
- Dry or damp rooms
- Occasional flexing

### Product features

- Despite the large number of cores, LiYY data cables have small outer diameters
- Flame-retardant according IEC 60332-1-2

### Norm references / Approvals

- Based on VDE 0812

### Product Make-up

- Fine-wire/multi-wire (0.34 mm<sup>2</sup>) strand made of bare copper wires
- Core insulation made of PVC
- Outer sheath made of PVC  
Outer sheath colour: pebble grey (RAL 7032)

### Technical data



#### Classification ETIM 5/6

ETIM 5.0/6.0 Class-ID: EC000104  
ETIM 5.0/6.0 Class-Description: Control cable



#### Core identification code

DIN 47100 without colour repetition, refer to Appendix T9



#### Mutual capacitance

Approx. 120 nF/km



#### Inductivity

approx. 0.65 mH/km



#### Conductor stranding

Stranded, fine-wire  
0.34 mm<sup>2</sup>: 7-wire



#### Minimum bending radius

Occasional flexing: 10 x outer diameter  
Fixed installation: 4 x outer diameter



#### Temperature range

Occasional flexing: -5°C to +70°C  
Fixed installation: -40°C to +80°C



Article number	Number of cores and mm <sup>2</sup> per conductor	Outer diameter [mm]	Copper index [kg/km]	Weight [kg/km]
<b>UNITRONIC® LiYY</b>				
0028202	2 x 0.14	3.2	2.7	13.2
0028203	3 x 0.14	3.4	4.05	16
0028204	4 x 0.14	3.6	5.4	18.9
0028205	5 x 0.14	3.9	6.72	22.2
0028207	7 x 0.14	4.2	9.45	28.4
0028208	8 x 0.14	4.9	10.2	35.2
0028210	10 x 0.14	5.2	13.5	41.2
0028212	12 x 0.14	5.6	16.2	48.4
0028214	14 x 0.14	5.8	18.9	52.9
0028216	16 x 0.14	6.1	21.6	59.1
0028220	20 x 0.14	7	27	70.8
0028225	25 x 0.14	7.8	33.6	87.2
0028236	36 x 0.14	8.6	48.6	126.8
0028237	37 x 0.14	8.9	49.7	118
0028240	40 x 0.14	9.3	54	139.1
0028250	50 x 0.14	10.4	67.5	170.9
0028256	56 x 0.14	10.7	78.4	187
0028302	2 x 0.25	3.8	4.8	18
0028303	3 x 0.25	4	7.2	22
0028304	4 x 0.25	4.3	9.6	26.2
0028305	5 x 0.25	4.7	12	31
0028306	6 x 0.25	5.1	14.4	39
0028307	7 x 0.25	5.1	16.8	42
0028308	8 x 0.25	6.2	19.2	49.2
0028310	10 x 0.25	6.8	24	58
0028312	12 x 0.25	7	28.8	67
0028314	14 x 0.25	7.3	33.6	75.3
0028316	16 x 0.25	7.7	38.4	84.3
0028318	18 x 0.25	8.1	43.2	93
0028320	20 x 0.25	8.6	48	102
0028325	25 x 0.25	9.6	60	134
0028330	30 x 0.25	10.3	72	155
0028332	32 x 0.25	10.7	76.8	164
0028336	36 x 0.25	11.1	86.4	182.2
0028337	37 x 0.25	11.4	88.8	185
0028340	40 x 0.25	12	96.1	200
0028350	50 x 0.25	12.9	120	257.1

Article number	Number of cores and mm <sup>2</sup> per conductor	Outer diameter [mm]	Copper index [kg/km]	Weight [kg/km]
0028402	2 x 0.34	4.2	6.6	25
0028403	3 x 0.34	4.4	9.9	31
0028404	4 x 0.34	4.8	13.1	43.2
0028405	5 x 0.34	5.5	16.5	53.8
0028406	6 x 0.34	5.9	19.6	55
0028407	7 x 0.34	5.9	22.8	62
0028408	8 x 0.34	7.1	26.1	73.1
0028410	10 x 0.34	7.6	32.6	82
0028412	12 x 0.34	7.8	39.1	102
0028414	14 x 0.34	8.2	45.7	109
0028416	16 x 0.34	8.7	52	127
0028420	20 x 0.34	9.6	65.2	159.3
0028421	21 x 0.34	10.4	68.6	167
0028425	25 x 0.34	11.2	81.6	190
0028430	30 x 0.34	11.6	98	226
0028436	36 x 0.34	12.5	118	284
0028440	40 x 0.34	13.5	131	317
0028450	50 x 0.34	15	163	407
0028502	2 x 0.50	4.7	9.6	30
0028503	3 x 0.50	5	14.4	39
0028504	4 x 0.50	5.6	19.2	49
0028505	5 x 0.50	6.1	24	65
0028507	7 x 0.50	6.9	33.6	82
0028508	8 x 0.50	8	38.4	90
0028510	10 x 0.50	8.6	48	117
0028512	12 x 0.50	8.9	58	133
0028516	16 x 0.50	10.2	77	170
0028520	20 x 0.50	11.4	96	214
0028525	25 x 0.50	12.7	120	265
0028530	30 x 0.50	13.2	144	304
0028540	40 x 0.50	15.8	192	392
0028602	2 x 0.75	5.1	14.4	48
0028603	3 x 0.75	5.6	21.6	57
0028604	4 x 0.75	6.1	28.8	69
0028605	5 x 0.75	6.9	36	78
0028607	7 x 0.75	7.5	50	112
0028608	8 x 0.75	8.7	58	126
0028610	10 x 0.75	9.4	72	149

APPENDIX ACCESSORIES SILVYN® FLEXIMARK® SKINTOP® EPIC® HITRONIC® ETHERLINE® OLFLEX® UNITRONIC® MARINE RAILWAY INDUSTRIAL CALPE

Article number	Number of cores and mm <sup>2</sup> per conductor	Outer diameter [mm]	Copper index [kg/km]	Weight [kg/km]
0028612	12 x 0.75	10.1	86	176
0028616	16 x 0.75	11.2	115	218
0028620	20 x 0.75	12.4	144	274
0028625	25 x 0.75	14	180	320
0028702	2 x 1.00	5.6	19.2	55
0028703	3 x 1.00	5.9	29	70

Article number	Number of cores and mm <sup>2</sup> per conductor	Outer diameter [mm]	Copper index [kg/km]	Weight [kg/km]
0028704	4 x 1.00	6.4	38.4	79
0028705	5 x 1.00	7.3	48	98
0028802	2 x 1.50	6.2	29	74
0028803	3 x 1.50	6.8	43	89
0028804	4 x 1.50	7.4	58	105

Unless specified otherwise, the shown product values are nominal values. Detailed values (e.g. tolerances) are available upon request.  
 Copper price basis: EUR 150/100 kg. Refer to catalogue appendix T17 for the definition and calculation of copper-related surcharges.  
 Please find our standard lengths at: [www.lappkabel.de/en/cable-standardlengths](http://www.lappkabel.de/en/cable-standardlengths)  
 Packaging size: coil ≤ 30 kg or ≤ 250 m, otherwise drum  
 Please specify the preferred type of packaging (e.g. 1 x 500 m drum or 5 x 100 m coils).  
 Photographs and graphics are not to scale and do not represent detailed images of the respective products.

**Similar products**

- UNITRONIC® LiYY (TP) refer to page 285
- UNITRONIC® LiYY A refer to page 303

**Accessories**

- SKINTOP® ST-M refer to page 680
- SKINTOP® ST-M Small PU
- STAR STRIP stripping tool refer to page 957
- SENSOR STRIP stripping tool refer to page 961



**Info**

- CPR: Article number choice under [www.lappkabel.com/cpr](http://www.lappkabel.com/cpr)

**Benefits**

- Overall braid minimises electrical interference
- Multifunctional application possibilities

**Application range**

- Screened cables with small dimensions are suitable for use in computer systems, instrumentation technology, office equipment, balances.
- Dry or damp rooms

**Product features**

- Flame-retardant according IEC 60332-1-2

**Norm references / Approvals**

- Based on VDE 0812

**Product Make-up**

- Fine-wire/multi-wire (0.34 mm<sup>2</sup>) strand made of bare copper wires
- Core insulation made of PVC
- Tinned-copper braiding
- Outer sheath made of PVC  
Outer sheath colour: pebble grey (RAL 7032)



**UNITRONIC® LiYY**

Screened data transmission cable with colour code acc. to DIN 47100

**Technical data**

<b>Classification ETIM 5/6</b> ETIM 5.0/6.0 Class-ID: EC000104 ETIM 5.0/6.0 Class-Description: Control cable	<b>Conductor stranding</b> Stranded, fine-wire 0.34 mm <sup>2</sup> : 7-wire
<b>Core identification code</b> DIN 47100 without colour repetition, refer to Appendix T9	<b>Minimum bending radius</b> Occasional flexing: 15 x outer diameter Fixed installation: 6 x outer diameter
<b>Mutual capacitance</b> C/C: approx. 120 nF/km C/S: approx. 160 nF/km	<b>Temperature range</b> Occasional flexing: -5°C to +70°C Fixed installation: -40°C to +80°C
<b>Inductivity</b> approx. 0.65 mH/km	

Article number	Number of cores and mm <sup>2</sup> per conductor	Outer diameter [mm]	Copper index [kg/km]	Weight [kg/km]
<b>UNITRONIC® LiYY</b>				
0034302	2 x 0.14	3.9	12	20
0034303	3 x 0.14	4.1	13	28
0034304	4 x 0.14	4.3	14.3	33
0034305	5 x 0.14	4.6	15.5	38
0034306	6 x 0.14	4.9	18.2	38
0034307	7 x 0.14	4.9	19	49
0034308	8 x 0.14	5.8	21.2	56
0034310	10 x 0.14	6.1	28.5	66
0034312	12 x 0.14	6.3	30.4	78
0034314	14 x 0.14	6.7	32	80
0034315	15 x 0.14	6.9	37.8	86
0034316	16 x 0.14	7	43	90
0034318	18 x 0.14	7.3	48.8	95
0034320	20 x 0.14	7.7	53.9	100
0034321	21 x 0.14	7.9	55.5	105
0034324	24 x 0.14	8.3	61	112
0034325	25 x 0.14	8.5	63	120
0034328	28 x 0.14	8.5	66.1	141
0034330	30 x 0.14	8.7	69	155
0034336	36 x 0.14	9.3	83	170
0034340	40 x 0.14	10.4	87.5	178
0034344	44 x 0.14	10.7	110.5	185
0034350	50 x 0.14	11.1	122.5	195
0034402	2 x 0.25	4.5	16	32
0034403	3 x 0.25	4.7	21	37