



## LIH(St)H



### Kullanım Alanları

HFFR izole ve kılıflı kablolar, elektrik ve elektronik cihazlar arasında bilgi alışverişini sağlamak için kullanılan düşük duman yoğunluklu ve halogen gazı içermeyen yalıtım ve kılıflı kablolardır. Ekranlı olan bu kablolar otellerde, fabrikalarda, alışveriş merkezlerinden apartmanlara kadar her alanda kullanılmaktadır.

Talep edildiği takdirde numara kodlu olarak aşağıda belirtilen tip üretilebilir.  
LIH(St)H-OZ: Damarlar Siyah/Beyaz numara kodlu

### Kablo Yapısı

**İç İletken**  
Elektrolitik Bükülü Bakır Tel  
Sınıf 5 IEC 60228, DIN VDE EN 0295

**İzolasyon**  
HFFR, DIN 47100 İzole renk uygulamasına uygun  
EN 50290-2-26

**Büküm**  
Grup halinde bükülü damarlar

**Polyester**  
Pet Bant

**Toprak İletken**  
Kalaylı Bakır Toprak Teli

**Folyo**  
Al-Pet Bant

**Dış Kılıf**  
HFFR\*, RAL 7001 Gri  
EN 50290-2-27

### Teknik Özellikler

**Çalışma Sıcaklığı** -30°C ... + 70°C

**Min. Bük. Yarı Çapı** 15 x Kablo Çapı

**İzolasyon Direnci** 200 MΩ km

**Çalışma Gerilimi**

0.22 mm <sup>2</sup> - 0.34 mm <sup>2</sup>	250 V
≥ 0.50 mm <sup>2</sup>	300/500 V

**Test Gerilimi**

0.22 mm <sup>2</sup> - 0.34 mm <sup>2</sup>	1200 V
≥ 0.50 mm <sup>2</sup>	2000 V

**Ambalaj** 500 / 1000 m

### Standartlar

TS EN 13755, DIN VDE 0812

**CPR Sınıfı**  
D<sub>ca</sub>

**Alev Geciktiricilik**  
EN 60332-1-2

**Korozif Gaz Testi**  
TS EN 60754-2

**Duman Yoğunluğu**  
EN 61034-2

**EMC**  
Elektromanyetik uyumlu

### Application

These cables are used for connections in the electronic control technology, signal and data transmission cables for voice frequency transmissions. Thanks to the HFFR material that is used in these cables, they are flame retardant, moreover they do not extract poisonous gases and black smoke when they are in fire. These cables are used in the hotels, factories, shopping centers, and apartments.

If there is a request from this cables as number coded, it can be able to produce the following types.  
LIH(St)H-OZ: Cores number coded and Black/White color

### Cable Construction

**Inner Conductor**  
Stranded Electrolytic Bare Copper  
Class 5 IEC 60228, DIN VDE 0295

**Insulation**  
HFFR, DIN 47100 Suitable for isolated color  
EN 50290-2-26

**Stranding**  
Twisted in group

**Polyester**  
Pet Band

**Drain Wire**  
Tinned Copper Drain Wire

**Foil**  
Al-Pet Band

**Outer Sheath**  
HFFR\*, RAL 7001 Grey  
EN 50290-2-27

### Technical Properties

**Operating Temperature** -30°C ... + 70°C

**Min. Bending Radius** 15 x Cable Diameter

**Insulation Resistance** 200 MΩ km

**Operating Voltage**

0.22 mm <sup>2</sup> - 0.34 mm <sup>2</sup>	250 V
≥ 0.50 mm <sup>2</sup>	300/500 V

**Test Voltage**

0.22 mm <sup>2</sup> - 0.34 mm <sup>2</sup>	1200 V
≥ 0.50 mm <sup>2</sup>	2000 V

**Packing** 500 / 1000 m

### Standards

TS EN 13755, DIN VDE 0812

**Euro Class**  
D<sub>ca</sub>

**Flame Retardancy**  
EN 60332-1-2

**Corrosive Gases Test**  
TS EN 60754-2

**Smoke Density**  
EN 61034-2

**EMC**  
Electromagnetic compatible

İletken Çapı Cross Section (mm <sup>2</sup> )	İletken Direnci Conductor Resistance (Ohm/km @ 20 °C)
0.22	96.00
0.34	56.00
0.50	39.00
0.75	26.00
1.00	19.50
1.50	13.30
2.50	7.98

Damar Sayısı x Kesit No. Of Cores x Cross Section (mm <sup>2</sup> )	Kablo Çapı Overall Diameter (mm)	Bakır Ağırlığı Copper Weight (kg/km)	Kablo Ağırlığı Cable Weight (kg/km)
2 x 0.22	3.7	5.0	20
3 x 0.22	3.9	7.2	21
4 x 0.22	4.2	9.0	23
5 x 0.22	4.6	11.5	30
6 x 0.22	5.2	13.5	34
7 x 0.22	5.2	15.5	36
8 x 0.22	5.5	17.5	41
9 x 0.22	5.9	20.0	48
10 x 0.22	6.1	22.0	52
12 x 0.22	6.3	26.0	58
14 x 0.22	6.8	31.0	64
16 x 0.22	7.1	35.0	73
18 x 0.22	7.4	39.0	81
20 x 0.22	7.9	43.0	88
25 x 0.22	8.9	53.0	111
2 x 0.34	4.4	9.7	21
3 x 0.34	4.7	12.9	28
4 x 0.34	5.1	16.1	35
5 x 0.34	5.5	19.3	42
6 x 0.34	6.0	22.6	48
7 x 0.34	6.0	25.8	54
8 x 0.34	6.6	28.0	62
9 x 0.34	7.1	32.0	70
10 x 0.34	7.6	35.5	76
12 x 0.34	7.9	41.9	88
14 x 0.34	8.3	48.3	100
16 x 0.34	8.9	54.8	116
18 x 0.34	9.4	61.2	128
20 x 0.34	10.0	67.0	141
25 x 0.34	11.0	83.8	172
2 x 0.50	4.7	14.5	28
3 x 0.50	5.0	19.3	37
4 x 0.50	5.4	24.1	46
5 x 0.50	6.0	29.0	55
6 x 0.50	6.4	33.8	62
7 x 0.50	6.4	38.6	70
8 x 0.50	7.3	42.0	77
9 x 0.50	7.9	47.0	83
10 x 0.50	8.4	53.1	96
12 x 0.50	8.7	62.7	112
14 x 0.50	9.1	72.4	132
16 x 0.50	9.6	82.0	146
18 x 0.50	10.1	91.7	162
20 x 0.50	10.6	99.0	171
25 x 0.50	11.9	125.5	225

Damar Sayısı x Kesit No. Of Cores x Cross Section (mm <sup>2</sup> )	Kablo Çapı Overall Diameter (mm)	Bakır Ağırlığı Copper Weight (kg/km)	Kablo Ağırlığı Cable Weight (kg/km)
2 x 0.75	5.2	21.7	39
3 x 0.75	5.5	29.0	50
4 x 0.75	6.0	36.2	61
5 x 0.75	6.6	43.4	72
6 x 0.75	7.2	50.7	84
7 x 0.75	7.2	57.9	96
8 x 0.75	8.0	62.0	97
9 x 0.75	8.8	70.0	110
10 x 0.75	9.4	79.6	135
12 x 0.75	9.7	94.1	156
14 x 0.75	10.2	108.6	180
16 x 0.75	10.8	123.0	201
18 x 0.75	11.6	137.5	230
20 x 0.75	12.0	150.0	234
25 x 0.75	13.6	188.2	310
2 x 1.00	5.4	29.0	46
3 x 1.00	5.7	39.0	60
4 x 1.00	6.3	48.0	74
5 x 1.00	6.9	58.0	90
6 x 1.00	7.5	68.0	102
7 x 1.00	7.5	77.0	116
8 x 1.00	8.7	83.0	125
9 x 1.00	9.4	95.0	136
10 x 1.00	9.8	106.0	164
12 x 1.00	10.1	125.0	191
14 x 1.00	10.7	145.0	220
16 x 1.00	11.5	164.0	251
18 x 1.00	12.1	183.0	280
20 x 1.00	12.8	201.0	291
25 x 1.00	14.4	251.0	384
2 x 1.50	6.4	38.0	60
3 x 1.50	6.8	57.0	85
4 x 1.50	7.5	71.0	106
5 x 1.50	8.4	85.0	131
6 x 1.50	9.2	99.0	154
7 x 1.50	9.2	113.0	172
8 x 1.50	10.4	120.0	180
9 x 1.50	11.5	135.0	204
10 x 1.50	12.0	156.0	244
12 x 1.50	12.4	184.0	282
14 x 1.50	13.1	212.0	324
16 x 1.50	14.0	240.0	371
18 x 1.50	14.8	269.0	414
20 x 1.50	15.7	296.0	426
25 x 1.50	17.4	368.0	558

Damar Sayısı x Kesit No. Of Cores x Cross Section (mm <sup>2</sup> )	Kablo Çapı Overall Diameter (mm)	Bakır Ağırlığı Copper Weight (kg/km)	Kablo Ağırlığı Cable Weight (kg/km)
2 x 2.50	8.0	71.0	101
3 x 2.50	8.7	94.0	132
4 x 2.50	9.6	118.0	165
5 x 2.50	10.6	141.0	200
6 x 2.50	11.8	165.0	236
7 x 2.50	11.8	188.0	265
8 x 2.50	13.3	202.0	286
9 x 2.50	14.6	223.0	326
10 x 2.50	15.3	259.0	374
12 x 2.50	15.9	306.0	435
14 x 2.50	16.7	353.0	498
16 x 2.50	17.7	401.0	562
18 x 2.50	18.7	448.0	625
20 x 2.50	20.0	484.0	686
25 x 2.50	22.2	613.0	854