### **DEVICES FOR CONTROL AND PROTECTION OF EL. MOTORS**

# ELMARK

#### Starters

## Documents corresponding to the product:

Standard EN 60947-1 EN 60947-4-1 The products are in accordance with the directives of EC "Low voltage directives (LVD) no 73/23 EEC" and "Electromagnetic Compatibility Directives (EMC) no. 89/336 EEC".



#### **Starters for direct start**

The electromagnetic starters LT 5 Dxx series are devices designed for remote control, direct control and protection of induction motors or other electrical consumers. They are a combination of contactors LT 1 Dxx series and thermal protection LT 2 Exx factory cabled. The starters are offered on the market in metal or plastic boxes with the corresponding IP code from dust and moisture. At mounting there should be provided protection of the device from short circuit through breakers or disconnectors. If necessary, at client's order the factory mounted thermal protection in the pneumatic starter can be substituted. The choice of a suitable protection prevents motor's operation at unusual temperature conditions and guarantees maximum constant operation, increases the effectiveness and prolongs the term of exploitation.

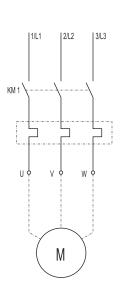
#### **Functions:**

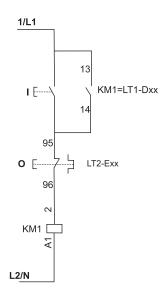
- switching on/off alternating current consumers
- does not allow secondary unwarranted switching on of the starter at transitory lowering of the
- voltageprotects the motor from overload in the range of the corresponding thermal protection
- remarkable with high reliability of current characteristics

#### **Technical data:**

 Rated voltage of the controlling voltage: 230/400V AC; 50/60 Hz **Note:** In case you need different controlling coils voltage of the starters you can turn to our regional representatives.

- Rated operating voltage: 690V
- Rated operating current range: from 7 to 93 A AC
- insulation voltage: 690V
- Surge voltage wear resistance:≥6000V
- Joining terminal: screw terminal
- Little power consumption and small dimensionsConnecting:
  - flexible or rigid conductors with or without cable terminal for joining to the consumer and section according to the motor power
  - two by two inlets/outlets supplied with orifices for the cables
- Possibility for range adjustment of the protection activating
- IP code: IP 44
- Possibility for operation at higher frequency
- Mounting: mounting to a flat surface (wall) with bolts/ screws
  - mounting position: vertical gradient maximum± 5°
- Plastic: wear resistance of UV rays and non-flammable (self-extinguishing material)
- Metal corpus: corrosion-proof coating
- Ambient temperature: -10°C + 60°C
- Altitude: up to 2000m





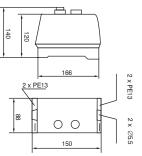
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# ELMARK

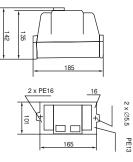
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Starters

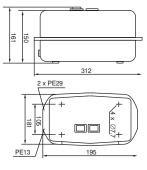












Туре	Rated capacity of motors 50/60Hz AC-3 category			Rated current	Thermal relay adjust-	Coil voltage	Packing/	Catalogue number
	220V 230V	380V 400V	415V 440V	(A)	ment range	(V)	Box (pcs)	number
LT5 D093	2.2	4.0	4.0	9	710A	230	1/16	43091
						400	1/16	43092
LT5 D123	3.0	5.5	5.5	12	913A	230	1/16	43121
						4.0	1/16	43122
LT5 D185	4.0	7.5	9.0	18	12 18A	230	1 / 16	43181
		7.5	9.0			400	1 / 16	43182

Note: Upon request the thermal relay will be replaced

Туре		acity of moto AC-3 categor 380V 400V		Rated current (A)	Thermal relay adjust- ment range	Coil voltage (V)	Packing/ Box (pcs)	Catalogue number
LT5 D255	5.5	11	11 11	25	17 25A	230	1/16	43251
		11				400	1/16	43252
LT5 D325	7.5 15	15	15	32	23 32A	230	1/16	43321
		IJ	15			400	1/16	43322

Note: Upon request the thermal relay will be replaced

Туре	Rated capacity of motors 50/60Hz AC-3 category			Rated current	Thermal relay adjust-	Coil voltage	Packing/ Box (pcs)	Catalogue number
	220V 230V	380V 400V	415V 440V	(A)	ment range	(V)	DOX (PC3)	number
LT5 D405	11.0	18.5	22	40	30 40A	230	1/6	43401
			22			400	1/6	43402
LT5 D655	18.5	30.0	37	65	48 65A	230	1/6	43651
						400	1/6	43652
LT5 D955	25.0 45.0	45.0	45	95	80 93A	230	1/6	43951
		45.0	40			400	1/6	43952

Note: Upon request the thermal relay will be replaced

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