

Page

Additional dimensional drawings for motor-mounted components

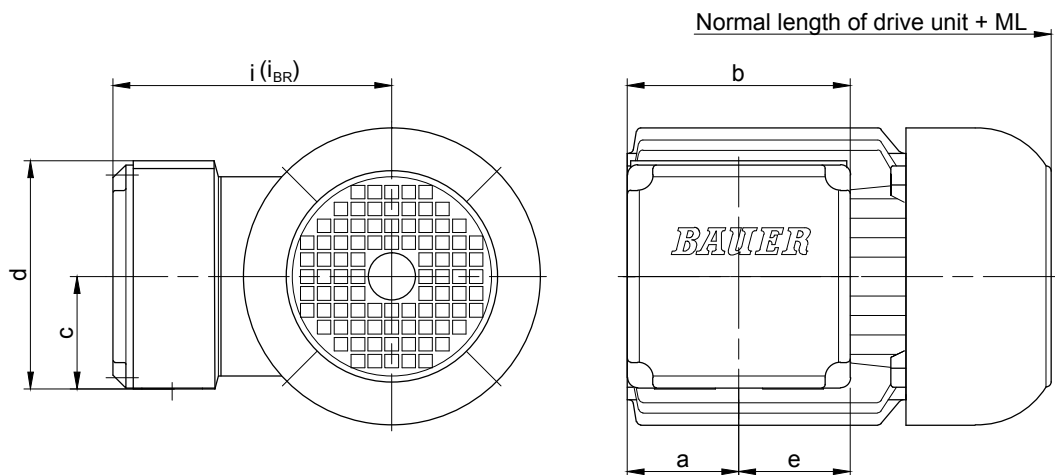
435-452

- Dimensional drawing, standard terminal box**
- Dimensional drawing, plug-connector terminal box**
- Dimensional drawings, standard brakes without terminal box**
- Dimensional drawings, for brakes with terminal box**
- Dimensional drawing, motor with second shaft end**
- Dimensional drawing, motor with protective hood**
- Dimensional drawing, motor with independent fan**
- Dimensional drawing, motor with brake and independent fan**
- Dimensional drawing, motor with encoder**
- Dimensional drawing, motor with brake and encoder**
- Dimensional drawing, motor in IEC design**

Motor-mounted components

Dimension

Standard terminal box

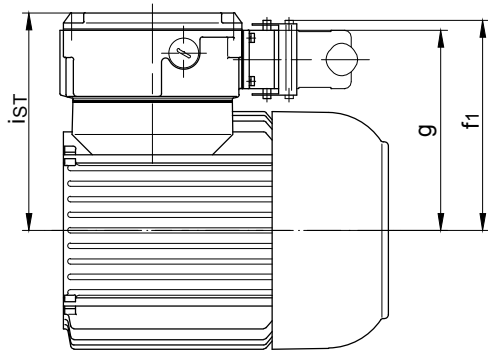


Motor/ Motor with Brake	Dimensions (mm)						Code	Cable entry Major (M) Minor (N)	max. wrench size for cable entry gland
	a	b	c	d	e	i / i _{BR}			
S..08..	50	100	50	100	50	115	KAG2	M=2xM25x1.5	29 mm
S..09..	50	100	50	100	50	124	KAG2	M=2xM25x1.5	29 mm
S..11..	62	132	66.5	135	66	181	TB222	M=2xM32x1.5; N=2xM25x1.5	-

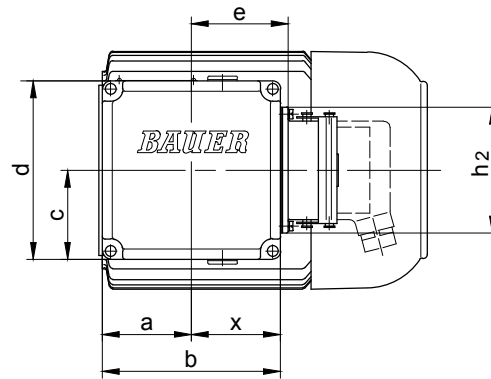
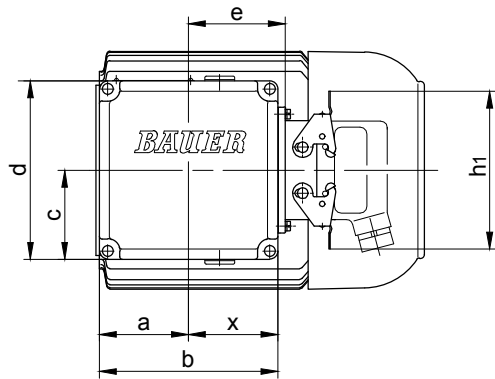
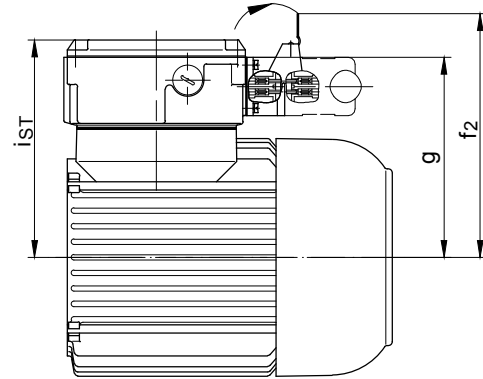
The actual gearbox design can vary from the geometry shown.

Plug-connector terminal box

Standard design (two brackets)



Optional for DESINA (one bracket)



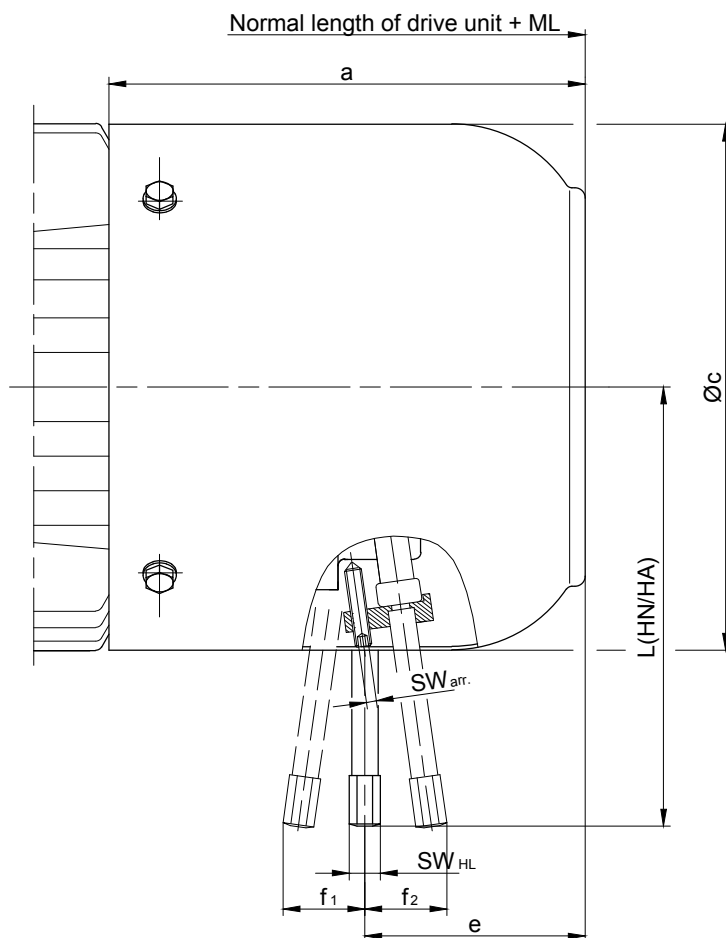
Motor	Size of terminal box	a	b	c	d	e	f ₁	f ₂	g	h ₁	h ₂	ist	x
S..08	TBS1	45	90	52.5	106	49	143.5	172	136	117	93	149.5	46
S..09	TBS2	62	132	66	135	71.5	158.5	187	158	117	93	164	68.5
S..11	TBS2	62	132	66	135	71.5	175.5	191	166	117	93	181	68.5

The actual gearbox design can vary from the geometry shown.

Motor-mounted components

Dimension

Standard brakes



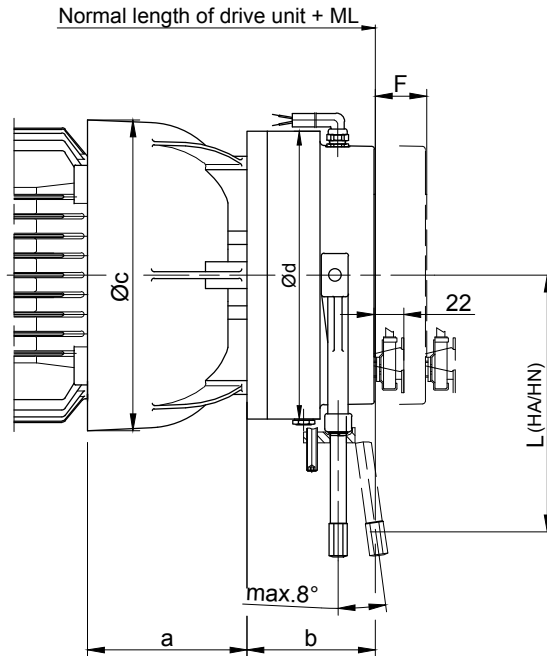
Motor Type	Brake Type	ML(mm) Additional length with brake	Dimensions (mm)								Add. weight kg
			a	Øc	e	f ₁	f ₂	L(HN/HA)	SW _{HL}	SW _{arr.}	
S..08	ES(X)010	66	141	156	68	-	29	132	8	2.5	2.6
S..09	ES(X)010	93	173	176	99	-	29	132	8	2.5	2.7
	ES(X)027				91	-	35.5	162			4.2
S..11	ES(X)027	98	195	218	103	-	35.5	162	8	2.5	4.5
	ES(X)040				100	-	37	172			6.3
	ES(X)070				96	-	34.5	190	12	4	8.5

HN = Manual release non-locking

HA = Manual release locking

The actual gearbox design can vary from the geometry shown.

“Heavy-Duty“- brake



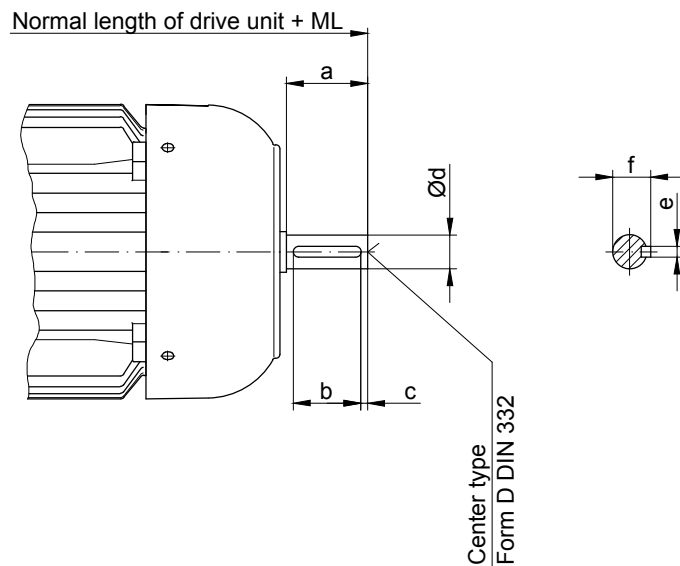
Motor	Brake	ML(mm) Additional length with brake		Dimensions (mm)					Add. weight kg
		Standard	Micro s.	a	b	c	Ød	L (HA/HN)	
S..08	EH(X)027	79	101	83.5	66.5	166	145	162	5.5
S..09	EH(X)040	90	112	102	73	191	168	172	8.3
S..11	EH(X)125	114	136	120	95	231	213	208.5	19.5

The actual gearbox design can vary from the geometry shown.

Motor-mounted components

Dimension

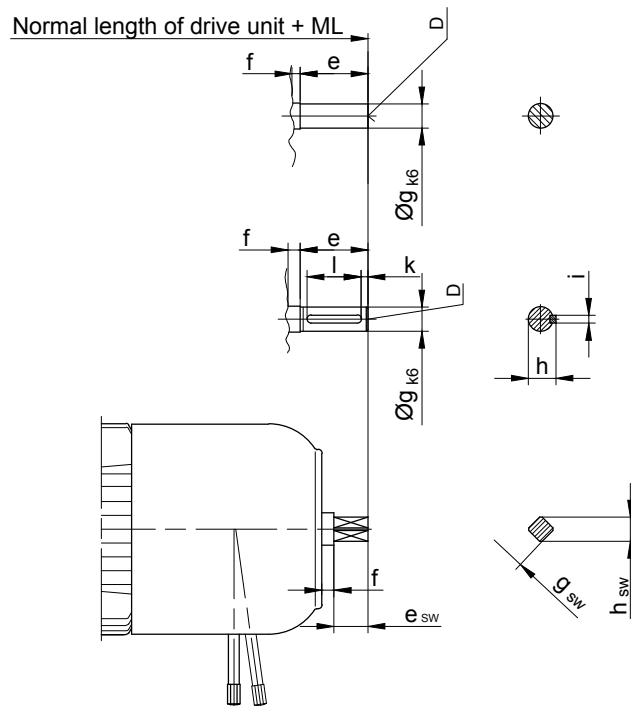
Motor with second shaft end



Motor	ML(mm) Add. length with second shaft extension	Dimensions (mm)						Center DIN 332
		a	b	c	d	e	f	
S..08	45	40	30	5	16 _{k6}	5	18	D 5
S..09	55	50	40	5	20 _{k6}	6	22.5	D 5
S..11	65	60	50	5	25 _{k6}	8	28	D 8

The actual gearbox design can vary from the geometry shown.

Motors with brake and second shaft end



Motor	Brake	Additional length		Dimensions (mm)										Center D DIN332	
		ML	ML _{SW}	e	e _{SW}	f	g	g _{SW}	h	h _{SW}	i	k	l	Center D	SW
S..08	ES(X)..	121	96*	50	25*	5	18	SW14*	20.5	18*	6	5	40	D6	D4*
S..09		98	123*												
S..11		153.5*	128	50*	25		20*	SW14	22.5*	18	6*	40*	D6*	D4	

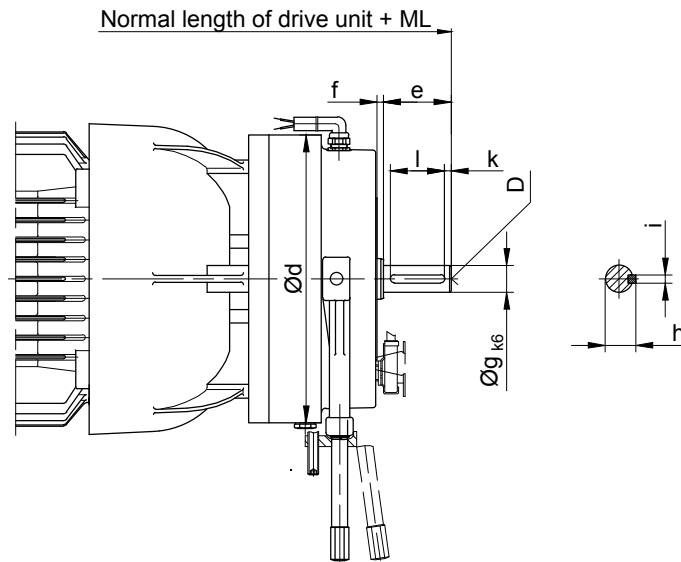
* Special design

** with manual release

Motor-mounted components

Dimension

Motor with "heavy duty" brake and second shaft end

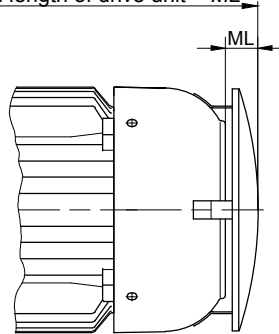


Motor	Brake	ML(mm) Additional length with brake and encoder	Dimensions (mm)								Centring D 332	Add. weight kg
			Ød	e	f	g	h	i	k	k		
S..08	EH(X)027	132	145	50	4	18	20.5	6	5	6	D06	6
S..09	EH(X)040	144	168		5							9
S..11	EH(X)125	169	213		20	22.5	20					

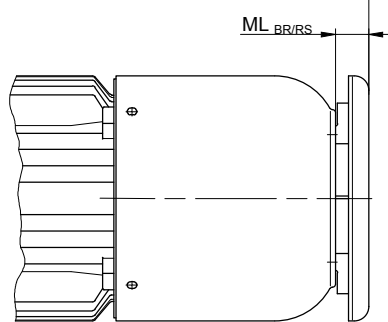
The actual gearbox design can vary from the geometry shown.

Motor with protective hood

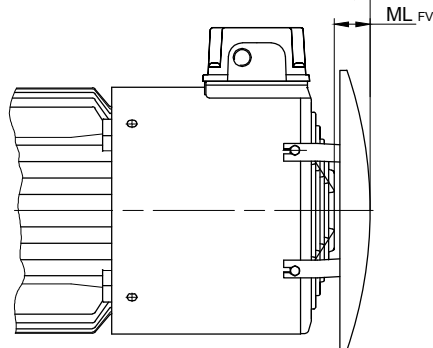
Normal length of drive unit + ML



Normal length of drive unit + ML



Normal length of drive unit + ML



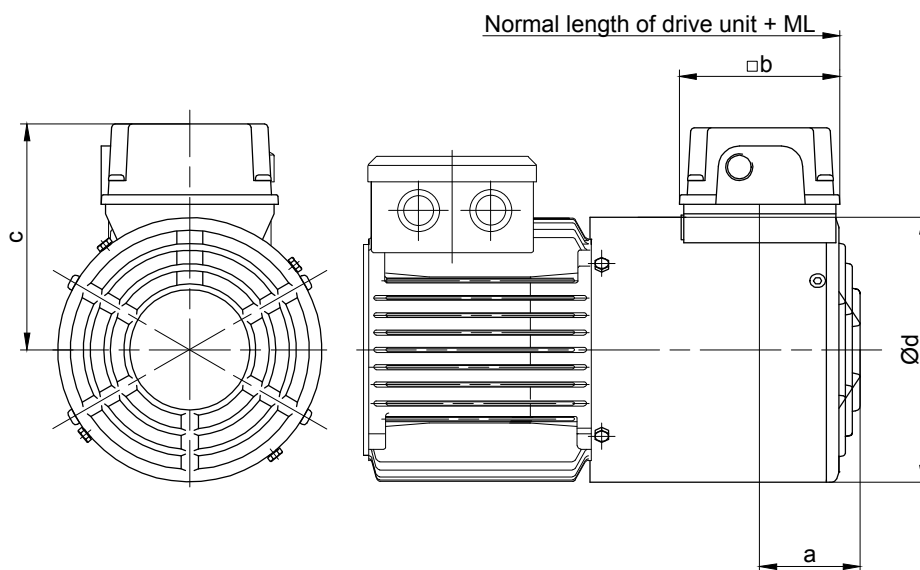
Motor	ML(mm) Add. length with attached protective cover			Add. weight kg
	ML	ML _{BR}	ML _{FV}	
S..08	14.5	24.5	40	0.20
S..09	22	24.5	30	0.30
S..11	29	29.5	33	0.40

The actual gearbox design can vary from the geometry shown.

Motor-mounted components

Dimension

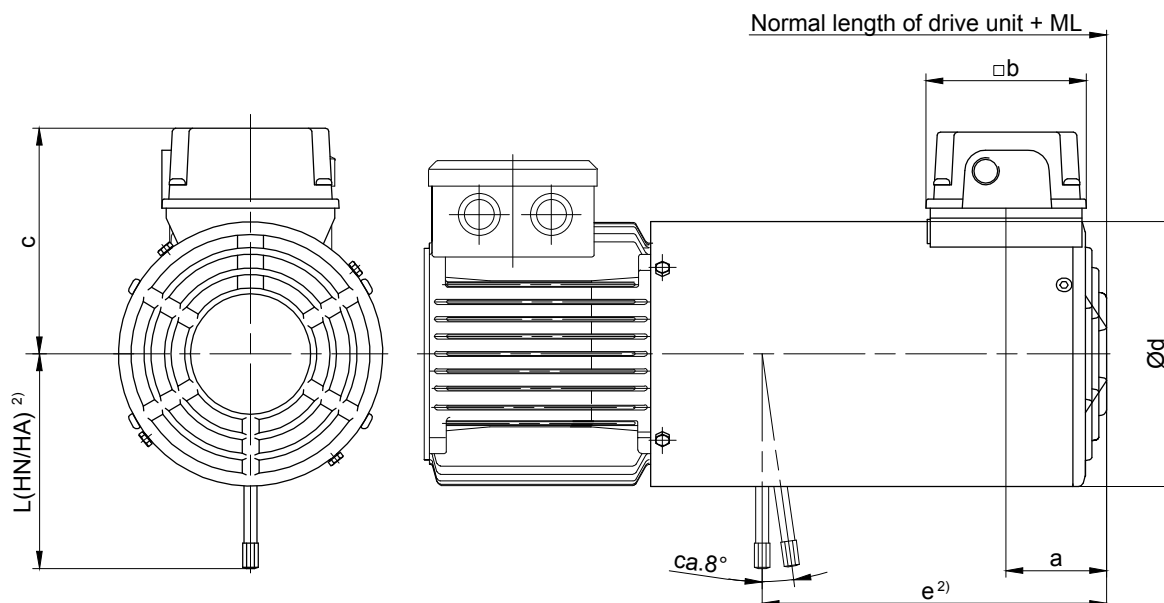
Motor with independent fan



Drive Motor	Fan Motor			400 V	ML (mm) Additional length forced vent.	Dimensions (mm)				Add. weight
Type	Type	kW	r/min	A		a	b	c	d	~ kg
S..08	FV D08	0.019	2670	0.029	92	69.5	95	131.5	157	2.2
S..09	FV D09	0.046	2820	0.106	97	69.5	95	141.5	176	2.7
S..11	FV D11	0.051	2660	0.110	97	79.5	95	162.5	219	3.2

The actual gearbox design can vary from the geometry shown.

Motor with brake and independent fan



Motor	Brake	ML (mm) ¹⁾ Additional length with attached brake and forced ventilation	Dimensions (mm)						Add. weight ~kg
			a	b	c	Ød	e ²⁾	L(HN/HA) ²⁾	
S..08	ES(X)010	202	59	95	131.5	157	204	132	5.0
S..09	ES(X)010	214	69.5	95	141.5	176	220	132	5.5
	212						162	7.5	
S..11*	ES(X)027	221	69.5	95	162.5	219	226	162	8.0
	ES(X)040						223	172	10
	ES(X)070						218	184	12

* bayonet joint

1) The additional length is for normal motor unit without brake.

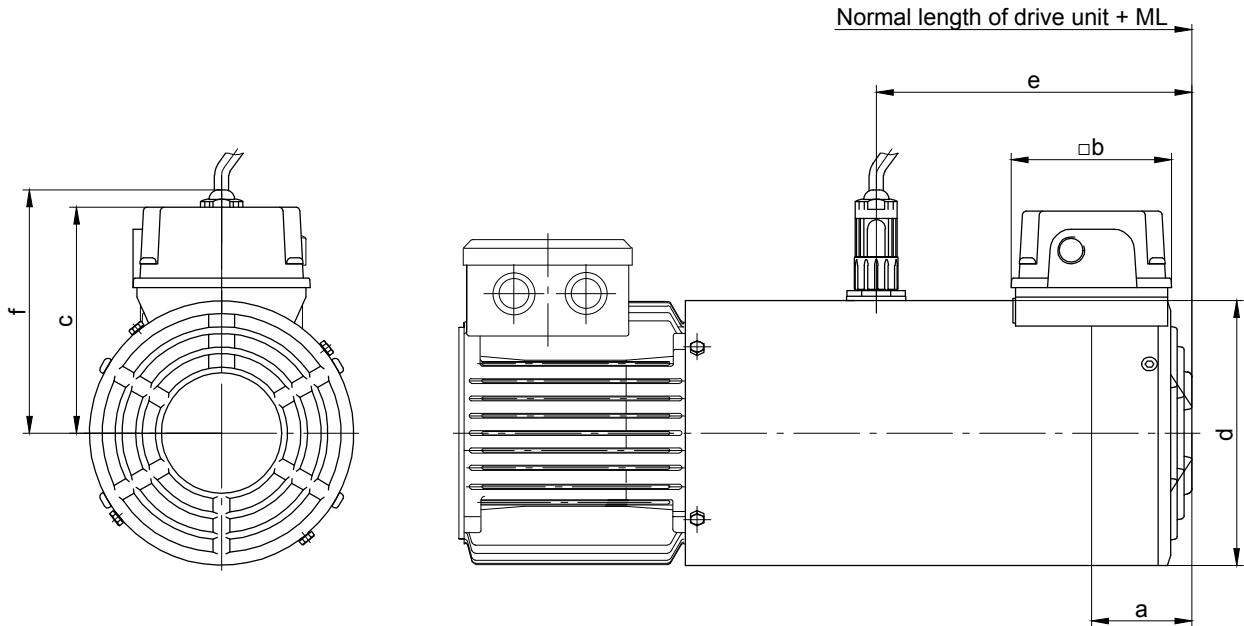
Other dimensions see the appropriate normal dimensioned sketch

2) Brake release on request

Motor-mounted components

Dimension

Motor with encoder with built-on independent fan

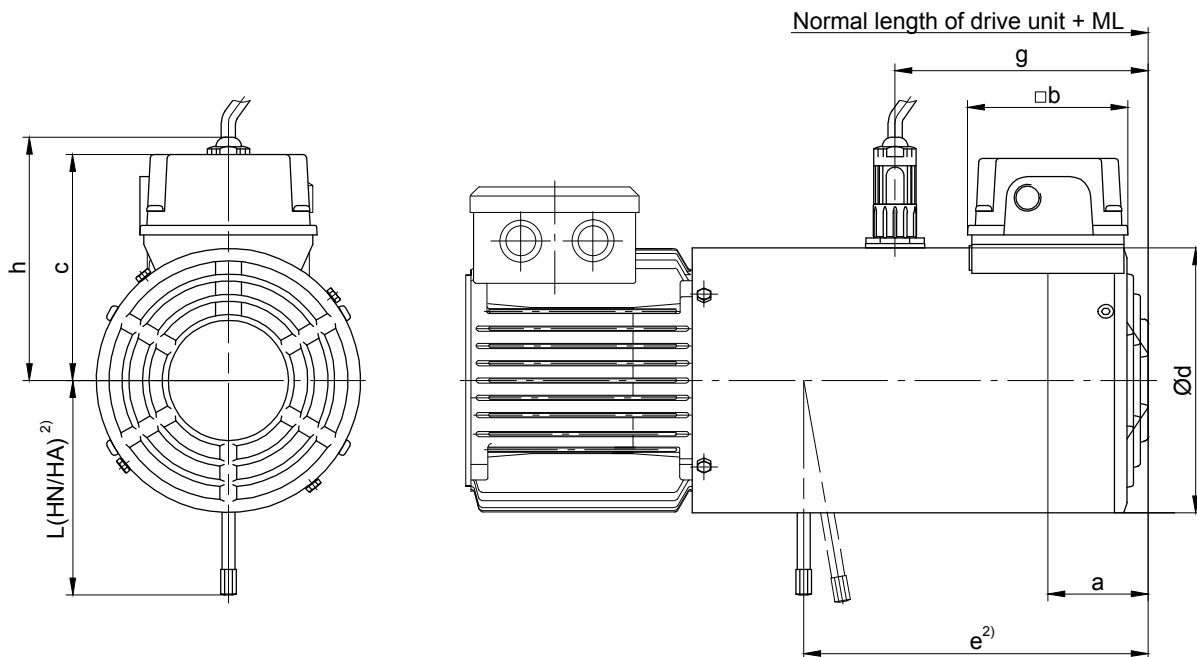


Motor	ML(mm) ¹⁾ Additional length with attached encoder and forced ventilation	Dimensions (mm)						Add. weight ~ kg
		a	b	c	d	e	f	
S..08	202	59	95	131.5	157	187	144	2.6
S..09	214	69.5	95	141.5	176	192	153.5	3.3
S..11*	221	69.5	95	162.5	218	192	-	4.0

* with bayonet joint

1) The additional length is for normal motor unit without brake.
Other dimensions see the appropriate normal dimensioned sketch

Motor with brake and encoder with built-on independent fan



Motor	Brake	ML (mm) ¹⁾ Additional length with attached brake, encoder and forced ventilation	Dimensions (mm)								Add. weight ~ kg
			a	b	c	Ød	e ²⁾	g	h	L(HN/HA) ²⁾	
S..08	ES(X)010	202	59	95	131.5	157	204	150	150	132	6.0
S..09	ES(X)010	214	69.5	95	141.5	176	220	160	160	132	6.5
	212						160	162		8.5	
S..11*	ES(X)027	221	69.5	95	162.5	219	226	155	155	162	9.0
	ES(X)040						223	155		172	11.5
	ES(X)070						218	155		184	13.5

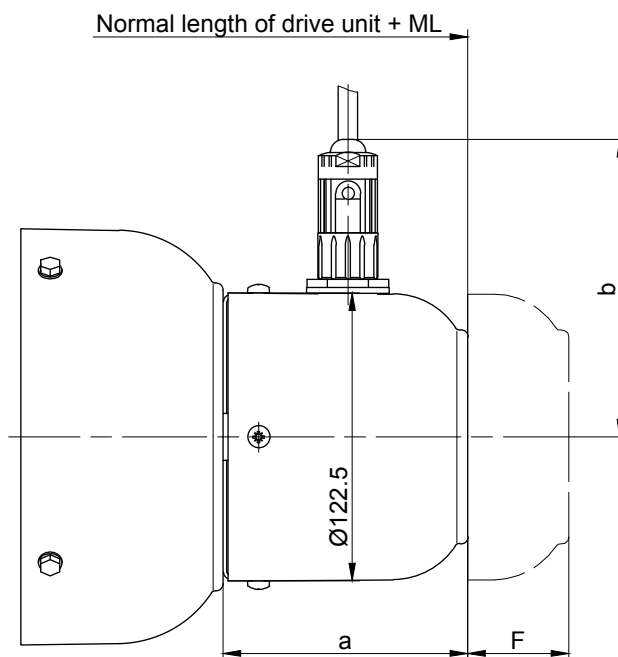
bayonet joint

- 1) The additional length is for normal motor unit without brake.
Other dimensions see the appropriate normal dimensioned sketch
- 2) Brake release on request

Motor-mounted components

Dimension

Motor with encoder

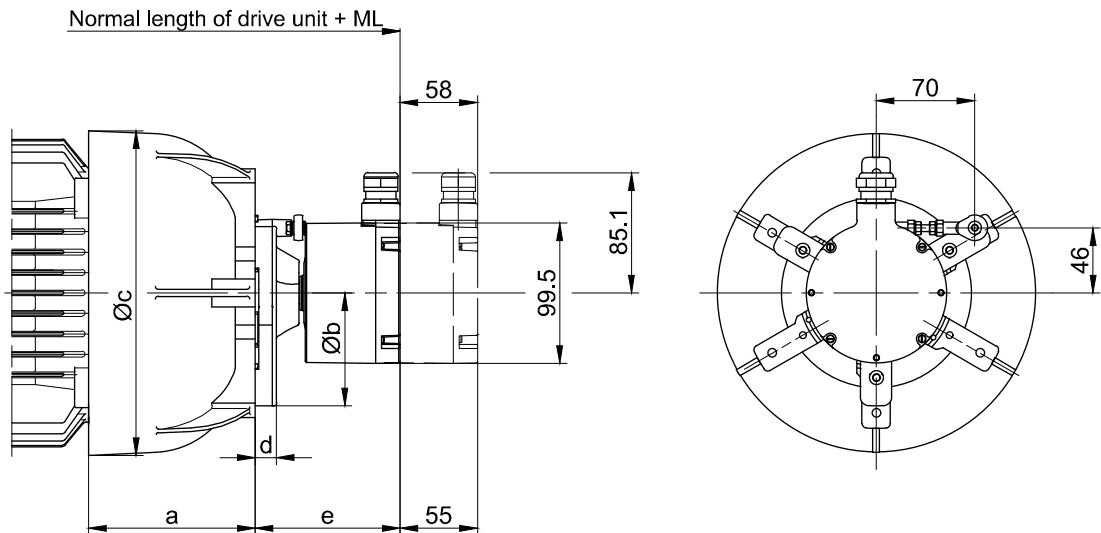


S..08-S..11

Motor	ML(mm) Additional length with encoder	Dimensions (mm)				Add. weight kg	Free space for removing encoder "F"	
		Fa. Kübler Typ 5820		Fa. TR Typ CS58-M			Fa. Kübler Typ 5820	Fa. TR Typ CS58-M
		a	b	a	b			
S..08	107	107.5	127	107.5	0.9	41	66	
S..09		104		104				0.8
S..11		104		104				

The actual gearbox design can vary from the geometry shown.

Motor with "heavy duty" encoder



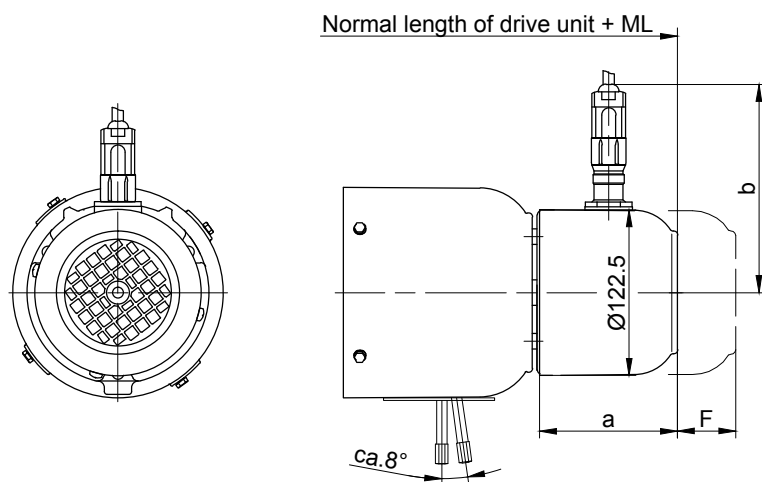
Motor	ML(mm) Additional length with encoder	Dimensions (mm)					Add. weight kg
		a	b	c	d	e	
S..08	114	83.5	160	166	15	102.5	2
S..09	118.5	102		191			
S..11	121.5	120		231			

The actual gearbox design can vary from the geometry shown.

Motor-mounted components

Dimension

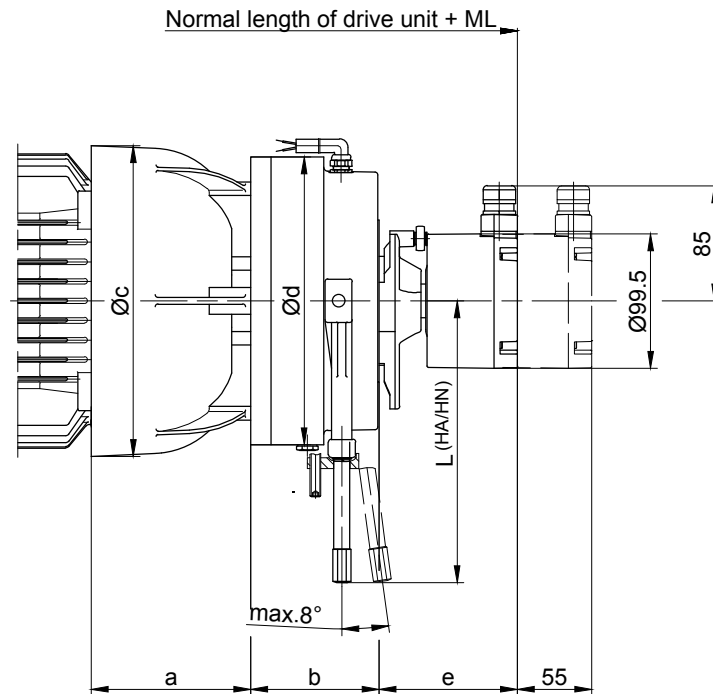
Motor with brake and encoder



S..08-S..11

Motor	Brake	ML(mm) Additional length with brake and encoder	Dimensions (mm)				Add. weight kg	Free space for removing encoder "F"	
			incremental encoder Fa. Kübler Typ 5820		absolute encoder Fa. TR Typ CS58-M			incremental encoder Fa. Kübler Typ 5820	absolute encoder Fa. TR Typ CS58-M
			a	b	a	b			
S..08	ES(X)..	173.5	102	127	102	127	0.8	49	74
S..09	ES(X)..	197							
S..11	ES(X)..	200							

Motor with "heavy duty" brake and encoder

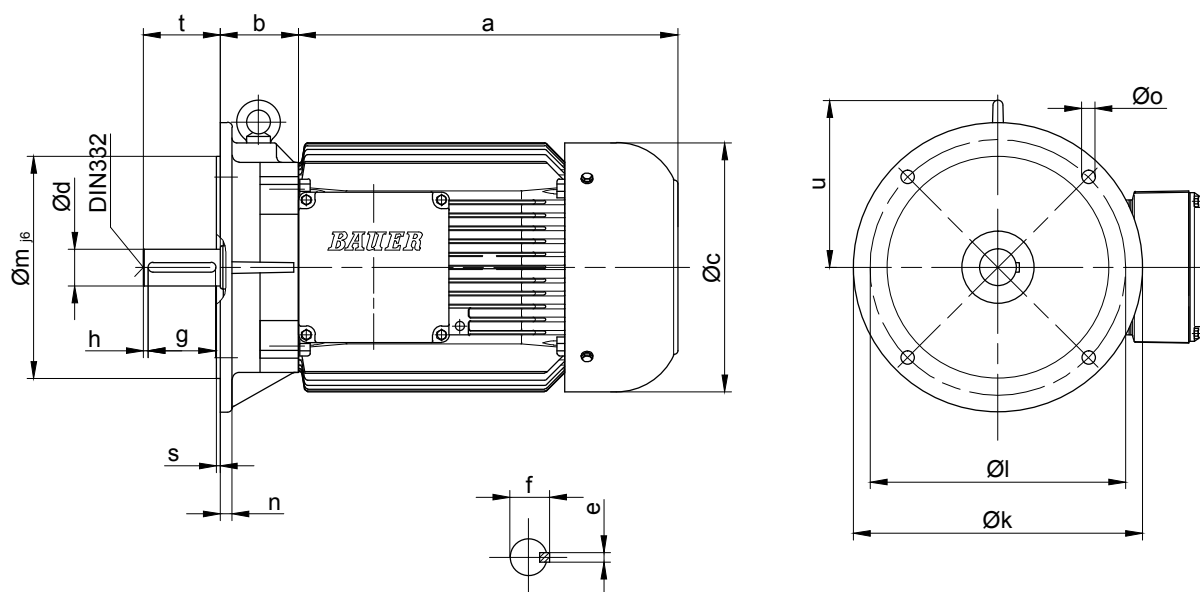


Motor	Brake	ML(mm) Additional length with brake and encoder	Dimensions (mm)						Add. weight
			a	b	c	$\varnothing d$	e	L (HA/HN)	
S..08	EH(X)027	180.5	83.5	66.5	166	145	102.5	162	7.1
S..09	EH(X)040	191.5	102	73	191	168		172	10
S..11	EH(X)125	216.5	120	95	231	213		208.5	21.4

Motor-mounted components

Dimension

Motor in IEC design



Motor	Dimensions (mm)																Center DIN 332
	a	b	c	d	e	f	g	h	k	l	m	n	o	s	t	u	
S..08	200	49	156	19_{j6}	6	21.5	35	2.5	200	165	130	10	12	3.5	40	-	D4
S..09	251	66	176	24_{j6}	8	27	40	5	200	165	130	10	12	3.5	50	128.5	D6
S..11	319	75	218	28_{j6}	8	31	50	5	250	215	180	11	14.5	4	60	145.5	D8

The actual gearbox design can vary from the geometry shown.