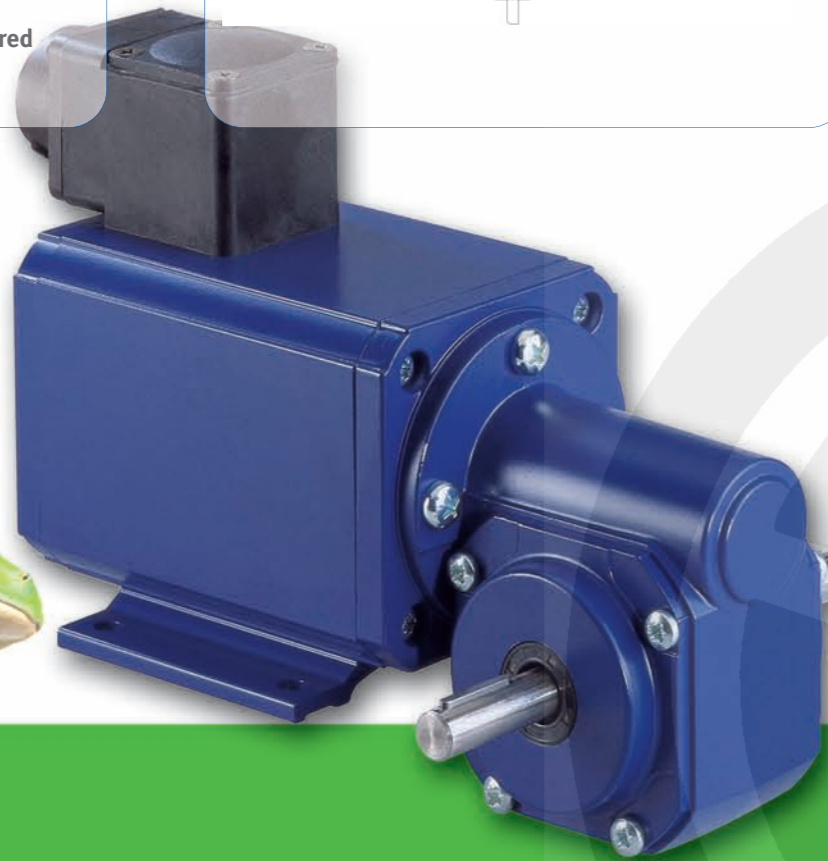
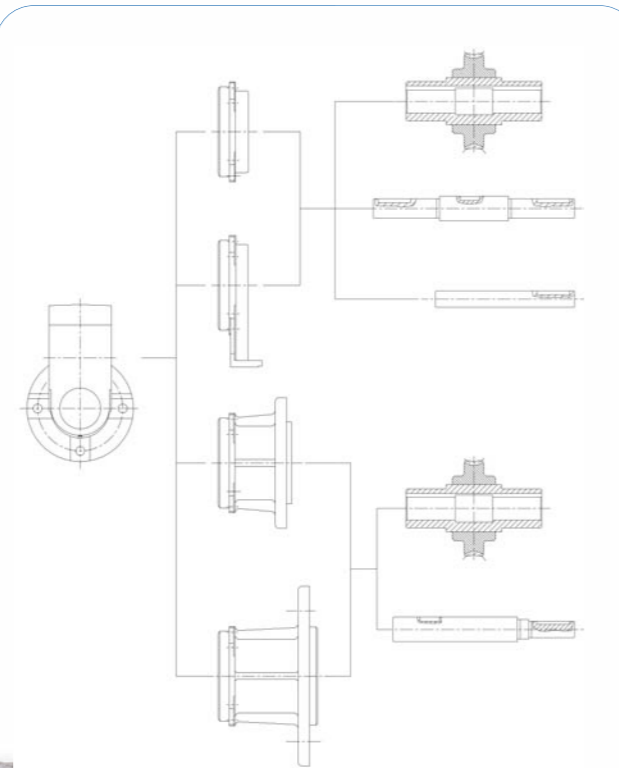
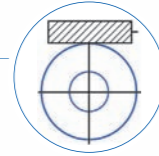


VARIO VE31

One concept –
Ten possibilities:

- **Modular design**
 - cover
 - foot (optional)
 - flange (optional)
- **Option of drive shaft protruding on both sides or one side only**
- **Solid or hollow drive shaft**
- **Good efficiency factor**
- **Increased load capacity**
- **Eight different possibilities for attaching**
- **Low noise level**
- **O-Ring sealing**
- **Optional features available**
 - e.g. drive shaft support
- **Modern design**
- **Special features considered for series manufacturing**

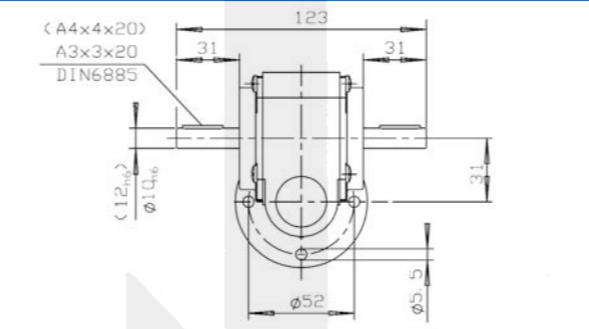


VARIO VE31 – The variable modular system. Possible model designs and general assembly:

Cover completion

with solid shaft, protruding either both sides or one side only; or with hollow shaft

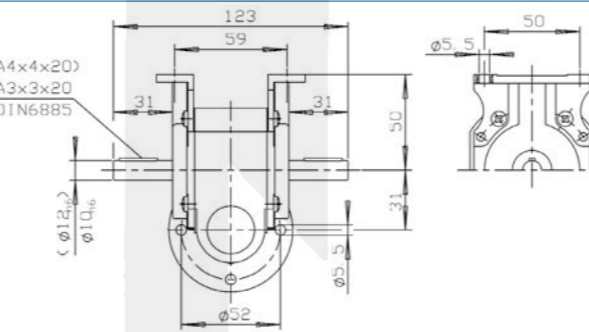
VE 31-D-B-2	F_R [N]	F_{ax} [N]
VE 31-D-B-25	80	50
	120	80



Foot completion

with solid shaft, protruding either both sides or one side only; or with hollow shaft
foot rotatable 90° / 180°

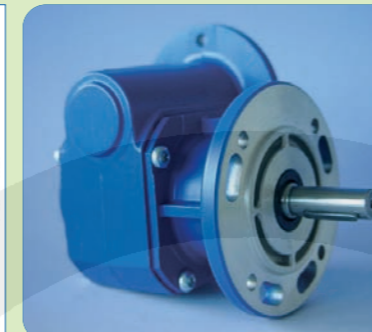
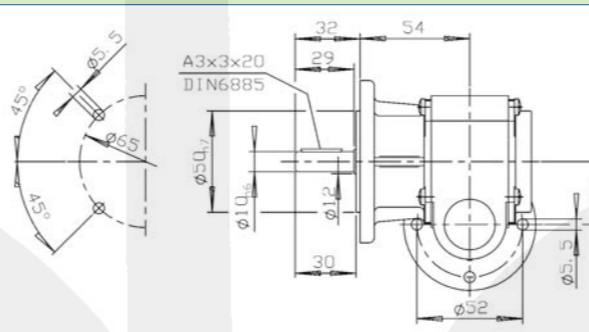
VE 31-F-B-2	F_R [N]	F_{ax} [N]
VE 31-F-B-25	80	50
	120	80



Small flange completion

with solid shaft, protruding as standard design on one side only; or with hollow shaft

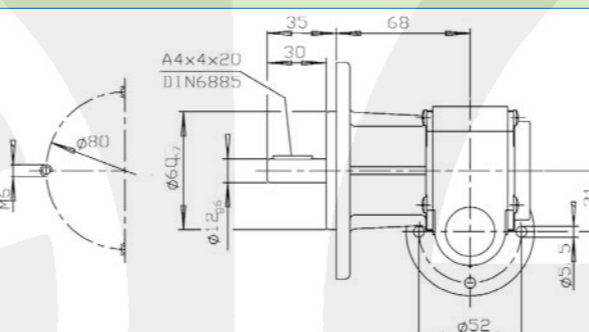
VE 31-K-R-31	F_R [N]	F_{ax} [N]
VE 31-K-L-32	150	100
	150	100



Large flange completion

with solid shaft, protruding as standard design on one side only; or with hollow shaft

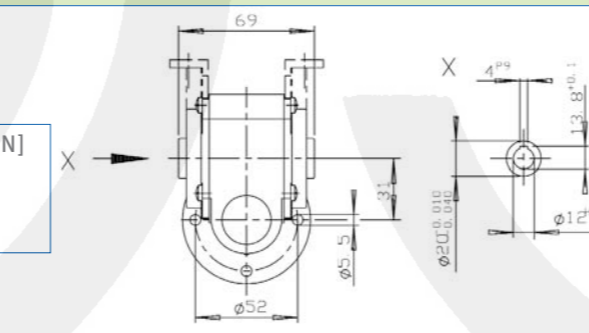
VE 31-G-R-5	F_R [N]	F_{ax} [N]
VE 31-G-L-5	150	100
	150	100



Hollow shaft completion

example: cover / foot

VE 31-D-H	F_R [N]	F_{ax} [N]
VE 31-F-H	dependent from the type of plug-in drive shaft	100



VARIO VE31: Efficiency factors

Ratio	$n_{mot}=1400 \text{ min}^{-1}$			$n_{mot}=2800 \text{ min}^{-1}$		
	$M_{ab}=900\text{Ncm}$	$M_{ab}=300\text{Ncm}$	$M_{ab}=100\text{Ncm}$	$M_{ab}=900\text{Ncm}$	$M_{ab}=300\text{Ncm}$	$M_{ab}=100\text{Ncm}$
5	0,80	0,78	0,73	0,83	0,80	0,74
7	0,78	0,75	0,68	0,81	0,78	0,70
10	0,70	0,67	0,60	0,74	0,70	0,61
12	0,71	0,67	0,59	0,75	0,70	0,59
15	0,66	0,62	0,53	0,70	0,65	0,54
18	0,61	0,57	0,48	0,66	0,61	0,49
20	0,61	0,56	0,47	0,65	0,59	0,47
22	0,54	0,51	0,42	0,59	0,54	0,43
24	0,49	0,46	0,38	0,54	0,49	0,39
25	0,51	0,47	0,39	0,56	0,51	0,40
30	0,49	0,45	0,36	0,53	0,48	0,37
38	0,48	0,43	0,33	0,52	0,46	0,33
50	0,36	0,33	0,25	0,41	0,35	0,26
55	0,43	0,37	0,27	0,47	0,40	0,27
75	-	0,24	0,18	-	0,27	0,19

n_{mot} : initial speed
 M_{ab} : torque at gear drive shaft
 η_{ges} : optimal operating efficiency

standard ratios

The listed values apply for synthetic lubricant only (at extra charge).
Grease based on mineral oil is used as standard lubricant.
(Reduction of efficiency factor 5 % approx.)

Maximum permissible power loss at continuous operation:

Gear with cover	25 W
Gear with foot	33 W
Gear with small flange	34 W
Gear with large flange	37 W

