




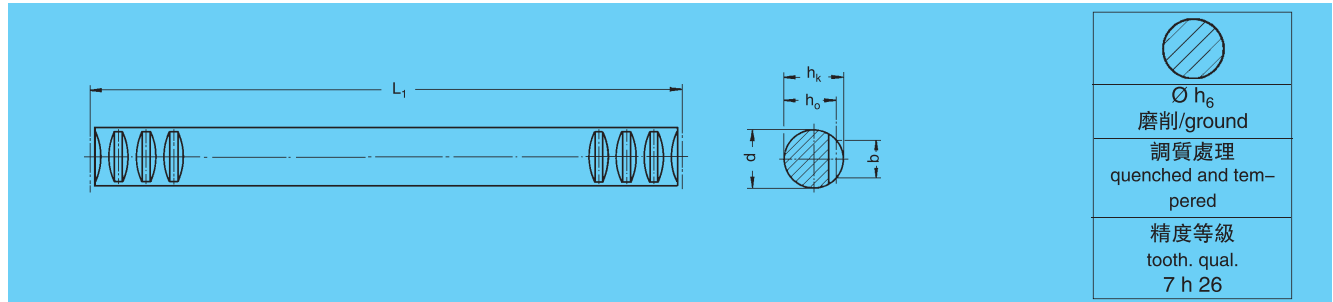
	系列 Series	直齒/斜齒 straight/helical	模數 Module	齒面熱處理 heat-treatment of teeth	精度等級 Tolerance of teeth	頁碼 Page
	35 .1 ...	直齒 straight	1; 1,5; 2; 3; 4	齒面熱處理 quenched and tempered	7 h 26	ZD-2
	35 .0 ...	直齒 straight	1; 1,5; 2; 2,5; 3; 4; 5	軟材 soft	9 e 27	ZD-3
	36 9. ...	直齒 straight	1; 1,5; 2; 3	軟材 / 不銹鋼 soft / stainless	 8 e 27	ZD-4
	80		導套 Guide bushes			ZD-5





直齒類，銑削齒，20° 壓力角
straight tooth system, milled teeth, 20° pressure angle



訂貨號 Order code	L ₁	齒數 N° of teeth z	Ø d _{h6}	b	h _k	h _o	GT _f /300 ¹⁾	
模數 / Module 1								
35 11 050	499,5	159	10	6,0	10	9,0	0,040	0,66
35 11 100	999,0	318	10	6,0	10	9,0	0,040	1,35
模數 / Module 1,5								
35 16 050	499,5	106	15	10,0	15	13,5	0,042	0,84
35 16 100	999,0	212	15	10,0	15	13,5	0,042	1,70
模數 / Module 2								
35 21 050	502,7	80	20	12,0	20	18,0	0,044	1,10
35 21 100	999,0	159	20	12,0	20	18,0	0,044	2,20
模數 / Module 3								
35 31 050	499,5	53	30	18,0	30	27,0	0,046	2,50
35 31 100	999,0	106	30	18,0	30	27,0	0,046	5,10
模數 / Module 4								
35 41 050	502,6	40	40	24,0	40	36,0	0,048	4,50
35 41 100	1005,3	80	40	24,0	40	36,0	0,048	9,10

高質量熱處理鋼材，拉伸強度950N/mm²，外圓直徑Ø_{h6}磨削。齒條兩端滿足拼接要求，可以互相連接到所需長度。請見ZD-5頁“導套”。

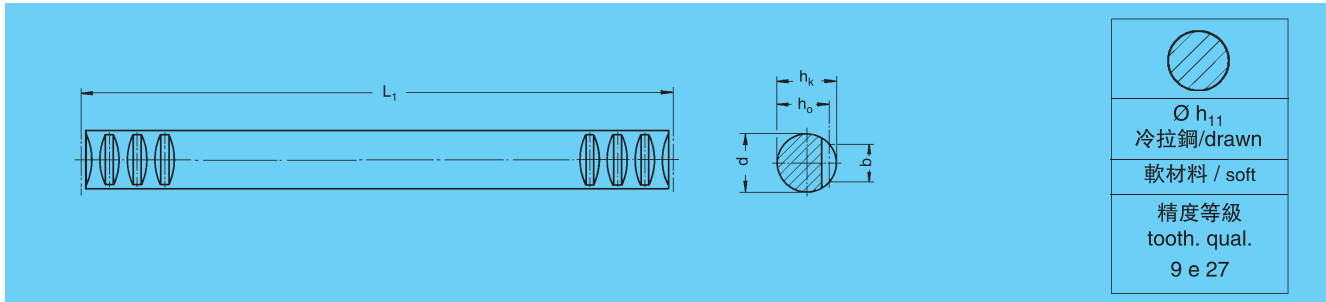
Of high-quality heat-treatable steel with a tensile strength of approx. 950 N/mm². Outside dia. Ø_{h6} ground. Both ends of the racks are designed so that several racks can be linked to obtain any desired length. Please see also our guide bushes on page ZD-5.

1) GT_f /300 = 整體節距誤差，即齒輪測量長度與理論長度 L₃₀₀ = (m / cos β) · π · Z₃₀₀ 相比的最大容許偏差 (每300mm)。為確保齒條和齒輪傳動的連續潤滑，建議選用ZI-2/3頁所介紹的電控潤滑器。

1) GT_f /300 = total pitch error, i.e. the max. permissible deviation (per 300 mm) of the measured length of the rack compared to the theoretical length L₃₀₀, with L₃₀₀ = (m / cos β) · π · Z₃₀₀. To ensure continuous lubrication of rack and pinion drives, we recommend to use electronic lubricators as described on page ZI-2/3!



直齒類，銑削齒，20° 壓力角
straight tooth system, milled teeth, 20° pressure angle



訂貨號 Order code	L ₁	齒數 N° of teeth z	Ø d _{h11}	b	h _K	h ₀	GT _f /300 ¹⁾	
模數 / Module 1								
35 10 025	251,3	80	15	7,5	15	14,0	0,056	0,34
35 10 050	499,5	159	15	7,5	15	14,0	0,056	0,66
35 10 100	999,0	318	15	7,5	15	14,0	0,056	1,35
模數 / Module 1,5								
35 15 025	249,8	53	17	9,6	17	15,5	0,059	0,42
35 15 050	499,5	106	17	9,6	17	15,5	0,059	0,84
35 15 100	999,0	212	17	9,6	17	15,5	0,059	1,70
模數 / Module 2								
35 20 025	251,3	40	20	12,0	20	18,0	0,068	0,55
35 20 050	502,7	80	20	12,0	20	18,0	0,068	1,10
35 20 100	999,0	159	20	12,0	20	18,0	0,068	2,20
模數 / Module 2,5								
35 25 025	251,3	32	25	15,0	25	22,5	0,063	0,90
35 25 050	502,7	64	25	15,0	25	22,5	0,063	1,80
35 25 100	997,5	127	25	15,0	25	22,5	0,063	3,60
模數 / Module 3								
35 30 025	254,5	27	30	18,0	30	27,0	0,065	1,30
35 30 050	499,5	53	30	18,0	30	27,0	0,065	2,50
35 30 100	999,0	106	30	18,0	30	27,0	0,065	5,10
模數 / Module 4								
35 40 025	251,3	20	40	24,0	40	36,0	0,068	2,30
35 40 050	502,6	40	40	24,0	40	36,0	0,068	4,50
35 40 100	1005,3	80	40	24,0	40	36,0	0,068	9,10
模數 / Module 5								
35 50 025	251,3	16	50	30,0	50	45,0	0,070	3,80
35 50 050	502,6	32	50	30,0	50	45,0	0,070	7,10
35 50 100	1005,3	64	50	30,0	50	45,0	0,070	14,30

材料C45k，材料編號：No1.0503，特殊處理的光亮鋼Ø_{h11}。
拉伸強度約650N/mm²，齒條兩端滿足拼接要求，可以互相連接達到所需長度。請見第ZD-5頁“導套”。

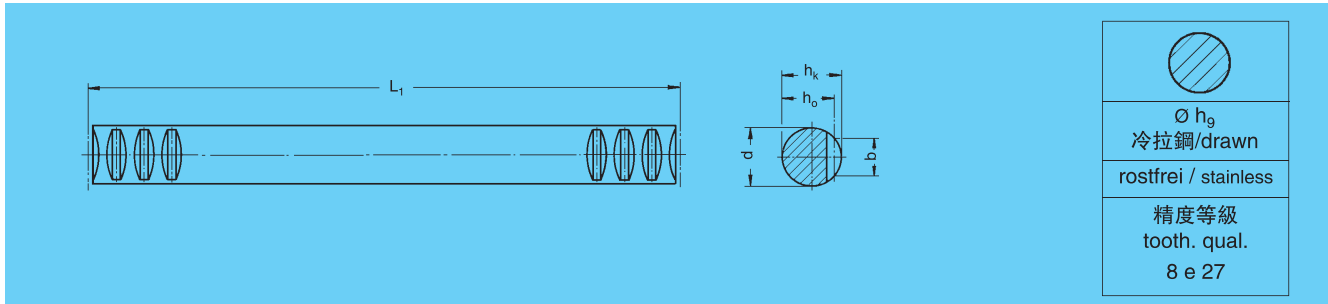
Material C 45, Mat. No. 1.0504, of specially treated bright steel Ø_{h11} with a tensile strength of approx. 650 N/mm². Both ends of the racks are designed so that several racks can be linked to obtain any desired length. Please see also our guide bushes on page ZD-5.

1) GT_f /300 = 整體節距誤差，即齒輪測量長度與理論長度 L₃₀₀ = (m / cos β) · π · Z₃₀₀ 相比的最大容許偏差（每300mm）。為確保齒條和齒輪傳動的連續潤滑，建議選用ZI-2/3頁所介紹的電控潤滑器。

1) GT_f /300 = total pitch error, i.e. the max. permissible deviation (per 300 mm) of the measured length of the rack compared to the theoretical length L₃₀₀, with L₃₀₀ = (m / cos β) · π · Z₃₀₀. To ensure continuous lubrication of rack and pinion drives, we recommend to use electronic lubricators as described on page ZI-2/3!



直齒類，銑削齒，20° 壓力角
straight tooth system, milled teeth, 20° pressure angle



訂貨號 Order code	L_1	齒數 N° of teeth z	Ø d_{h9}	b	h_k	h_o	GT_f /300 ¹⁾	
模數 / Module 1								
36 90 050	499,5	159	10	6,0	9,9	8,9	0,040	0,66
36 90 100	999,0	318	10	6,0	9,9	8,9	0,040	1,35
模數 / Module 1,5								
36 91 050	499,5	106	15	9,0	14,9	13,4	0,042	0,84
36 91 100	999,0	212	15	9,0	14,9	13,4	0,042	1,70
模數 / Module 2								
36 92 050	502,6	80	20	12,0	19,8	17,8	0,044	1,10
36 92 100	999,0	159	20	12,0	19,8	17,8	0,044	2,20
模數 / Module 3								
36 94 050	499,5	53	30	18,0	29,8	26,8	0,046	2,50
36 94 100	999,0	106	30	18,0	29,8	26,8	0,046	5,10

材料 X 8 CrNi S18-9，材料編號 1.4305，外圓直徑 \varnothing_{h9} 。齒條兩端滿足拼接要求，可以互相連接達到所需長度。請見第 ZD-5 頁“導套”。

Material X 8 CrNi S 18-9, Mat.No. 1.4305, outside dia. \varnothing_{h9} . Both ends of the racks are designed so that several racks can be linked to obtain any desired length. Please see also our guide bushes on page ZD-5.

1) $GT_f / 300$ = 整體節距誤差，即齒輪測量長度與理論長度 $L_{300} = (m / \cos \beta) \cdot \pi \cdot z_{300}$ 相比的最大容許偏差（每 300mm）。為確保齒條和齒輪傳動的連續潤滑，建議選用 ZI-2/3 頁所介紹的電控潤滑器。

1) $GT_f / 300$ = total pitch error, i.e. the max. permissible deviation (per 300 mm) of the measured length of the rack compared to the theoretical length L_{300} , with $L_{300} = (m / \cos \beta) \cdot \pi \cdot z_{300}$. To ensure continuous lubrication of rack and pinion drives, we recommend to use electronic lubricators as described on page ZI-2/3!



導套用于裝配，由內含固體潤滑劑 MoS_2 的青銅燒結而成，因此可免維護。

Guide bushes, ready for mounting, of sintered bronze, filled with solid lubricant MoS_2 and therefore practically maintenance-free.



訂貨號 Order code	d_1 G7	d_2 r6	d_3	b_1	b_2	kg
80 35 010	10	16	22	3	16	0,017
80 35 015	15	21	26	3	16	0,025
80 35 020	20	26	32	3	25	0,042
80 35 030	30	38	46	4	30	0,115
80 35 040	40	50	60	5	50	0,270
80 35 050	50	60	70	5	63	0,580

