

Floating Holder

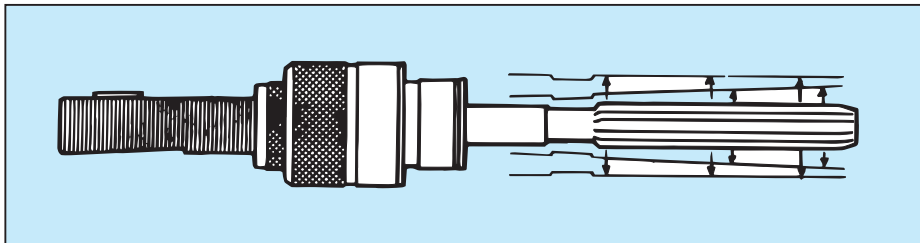
Applications

High precision reaming with special purpose machines and transfer lines.

Feature

1. Top quality floating mechanism

Radial float and angular float mechanisms compensate for misalignment between reamer and pre-drilled hole.



Radial & parallel float

+

Angular float

2. Use for both horizontal and vertical spindles

Built-in locking function prevents reamer from sagging on horizontal spindles.

3. No rust

No loss of precision due to rust by special surface treatment.

BT
CAT
AHO
HSK-A/E/F/C
HSK-T
UTS

Specialized Machine

Related Equipment

Bush & Chamfering Drill

Sub Holder

Tapping Chuck

Tap Adapter

Adjustable Adapter

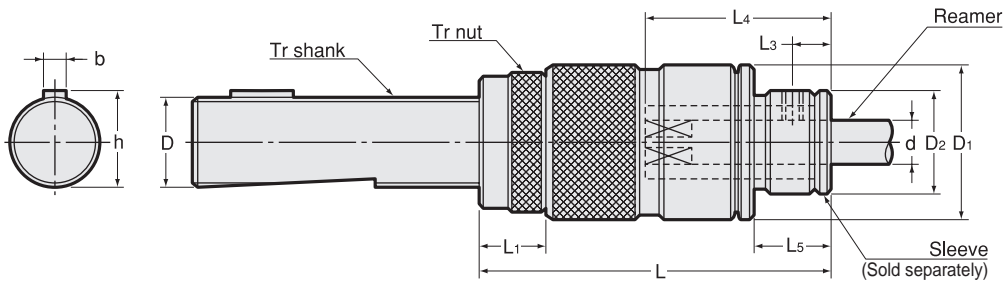
Endmill Chuck

Straight Drill Chuck

Floating Holder

FH-Tr

Floating Holder



Code	Model	d Reamer shank	Sleeve size	Float		D	b	h	D1	L	L1	L3	L5	D2	kg
				Radial	Angular										
0180 00003000	FH0 -Tr16	3.00 ~ 8.00	FHS0	0.4	1°	16	5	17.2	28	62~80	12	7	15	19.5	0.3
0180 00003001	-Tr16T	3.00 ~ 8.00	FHS0	0.4	1°	16	3	17.3	28	62~80	12	7	15	19.5	
0180 00003002	-Tr16N	3.00 ~ 8.00	FHS0	0.4	1°	16	4	17.5	28	62~80	12	7	15	19.5	0.3
0180 00003003	-Tr19	3.00 ~ 8.00	FHS0	0.4	1°	19	5	21.1	28	62~80	12	7	15	19.5	0.4
0180 00003004	-Tr20	3.00 ~ 8.00	FHS0	0.4	1°	20	5	21.2	28	62~75	12	7	15	19.5	0.4
0180 00003100	FH1 -Tr16	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	16	5	17.2	36	69~87	12	8	19	23	0.4
0180 00003101	-Tr16T	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	16	3	17.3	36	69~87	12	8	19	23	
0180 00003102	-Tr16N	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	16	4	17.5	36	69~87	12	8	19	23	0.4
0180 00003103	-Tr19	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	19	5	21.1	36	66~84	12	8	19	23	0.5
0180 00003104	-Tr20	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	20	5	21.2	36	66~79	12	8	19	23	0.5
0180 00003105	-Tr22	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	22	5	24.1	36	66~84	12	8	19	23	0.5
0180 00003106	-Tr24	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	24	5	26.1	36	66~94	12	8	19	23	0.6
0180 00003107	-Tr25	4.00 ~ 10.00	FHS1	0~0.4 Adjustable	0~1° Adjustable	25	6	26.5	36	66~84	12	8	19	23	0.6
0180 00003208	FH2 -Tr26T	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	26	5	28.1	55	87~110	12	14	25	38	1.2
0180 00003209	-Tr26N	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	26	7	28.6	55	87~110	12	14	25	38	1.2
0180 00003210	-Tr28	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	28	6	29.5	55	87~118	12	14	25	38	1.2
0180 00003211	-Tr30	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	30	7	33.1	55	89~118	14	14	25	38	1.3
0180 00003212	-Tr32	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	32	8	33.5	55	89~115	14	14	25	38	1.5
0180 00003213	-Tr35	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	35	7	38.1	55	89~125	14	14	25	38	1.6
0180 00003214	-Tr36	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	36	8	37.5	55	89~127	14	14	25	38	1.7
0180 00003215	-Tr36N	8.10 ~ 20.00	FHS2	0~0.6 Adjustable	0~1° Adjustable	36	10	39.6	55	89~127	14	14	25	38	

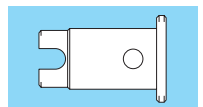
L4 Dimension

Model	d Reamer shank	L4
FH0 FH1	3.00 ~ 3.79	23
	3.80 ~ 4.79	26
	4.80 ~ 5.49	30
	5.50 ~ 10.00	35
FH2	8.10 ~ 10.79	42
	10.80 ~ 12.09	50
	12.10 ~ 20.00	55

1. Sleeve is sold separately.
2. To adjust the floating amount, please use the adjustable pin wrench GWA.
3. Please refer to P. 465 for GWA.

Sleeve

P. 494



Model	Wrench
FH1	GWA1
FH2	

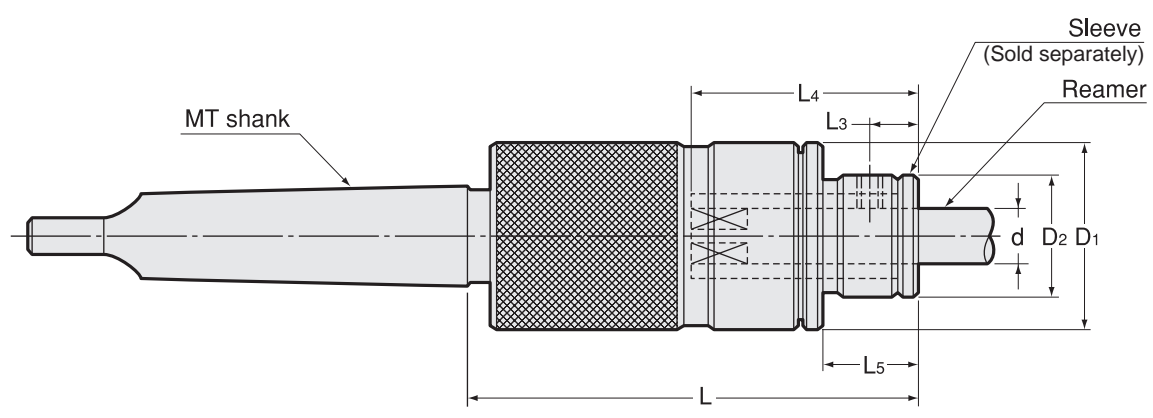
Ordering Example

FH0 - Tr20

Shank size

FH-MT

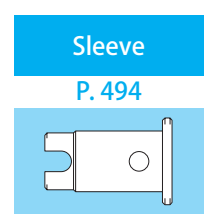
Floating Holder



Code	Model	d Reamer shank	Sleeve size	Float		D1	L	L3	L5	D2	kg
				Radial	Angular						
0180 00002001	FH0 -MT1	3.00 ~ 8.00	FHS0	0.4	1°	28	65	7	15	19.5	0.3
0180 00002002	-MT2	3.00 ~ 8.00	FHS0	0.4	1°	28	65	7	15	19.5	0.4
0180 00002101	FH1 -MT1	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	36	70	8	19	23	0.4
0180 00002102	-MT2	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	36	70	8	19	23	0.5
0180 00002202	FH2 -MT2	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	55	95	14	25	38	1.2
0180 00002203	-MT3	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	55	95	14	25	38	1.3

L4 Dimension		
Model	d Reamer shank	L4
FH0 FH1	3.00 ~ 3.79	23
FH0 FH1	3.80 ~ 4.79	26
FH0 FH1	4.80 ~ 5.49	30
FH0 FH1	5.50 ~ 10.00	35
FH2	8.10 ~ 10.79	42
FH2	10.80 ~ 12.09	50
FH2	12.10 ~ 20.00	55

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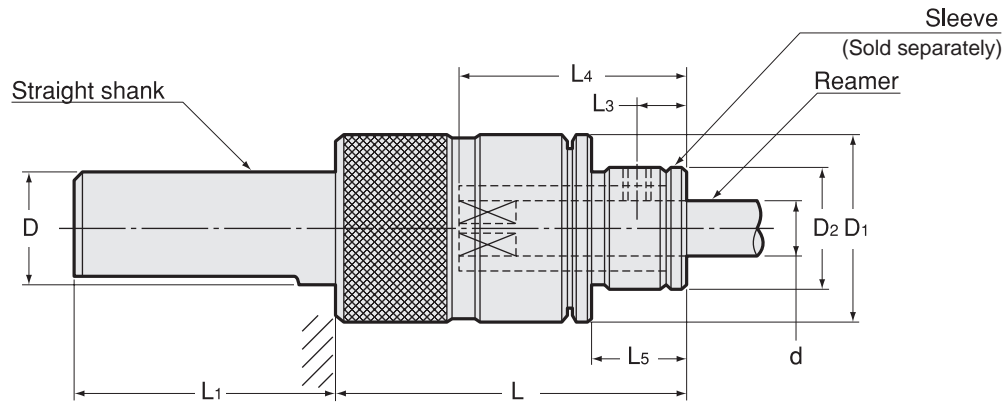


Model	Wrench
FH1	GWA1
FH2	

Ordering Example
FH0 - MT1
 Shank size

FH-ST

Floating Holder



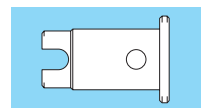
Code	Model	d Reamer shank	Sleeve size	Float		D	D1	L	L1	L3	L5	D2	kg
				Radial	Angular								
0180 00001000	FH0 -ST15.875	3.00 ~ 8.00	FHS0	0.4	1°	15.875	28	50	50	7	15	19.5	0.2
0180 00001001	-ST16	3.00 ~ 8.00	FHS0	0.4	1°	16	28	50	50	7	15	19.5	0.2
0180 00001002	-ST19.05	3.00 ~ 8.00	FHS0	0.4	1°	19.05	28	50	50	7	15	19.5	0.2
0180 00001003	-ST20	3.00 ~ 8.00	FHS0	0.4	1°	20	28	50	50	7	15	19.5	0.3
0180 00001100	FH1 -ST15.875	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	15.875	36	54	50	8	19	23	0.3
0180 00001101	-ST16	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	16	36	54	50	8	19	23	0.3
0180 00001102	-ST19.05	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	19.05	36	54	50	8	19	23	0.4
0180 00001103	-ST20	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	20	36	54	50	8	19	23	0.4
0180 00001104	-ST25	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	25	36	54	50	8	19	23	0.4
0180 00001105	-ST25.4	4.00 ~ 10.00	FHS1	0 ~ 0.4 Adjustable	0 ~ 1° Adjustable	25.4	36	54	50	8	19	23	0.4
0180 00001204	FH2 -ST25	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	25	55	75	50	14	25	38	0.9
0180 00001205	-ST25.4	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	25.4	55	75	50	14	25	38	0.9
0180 00001206	-ST32	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	32	55	75	70	14	25	38	1.1
0180 00001207	-ST35	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	35	55	75	70	14	25	38	1.2
0180 00001208	-ST38.1	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	38.1	55	75	70	14	25	38	1.3
0180 00001209	-ST40	8.10 ~ 20.00	FHS2	0 ~ 0.6 Adjustable	0 ~ 1° Adjustable	40	55	75	70	14	25	38	1.4

L4 Dimension		
Model	d Reamer shank	L4
FH0 FH1	3.00 ~ 3.79	23
FH0 FH1	3.80 ~ 4.79	26
FH0 FH1	4.80 ~ 5.49	30
FH0 FH1	5.50 ~ 10.00	35
FH2	8.10 ~ 10.79	42
FH2	10.80 ~ 12.09	50
FH2	12.10 ~ 20.00	55

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Sleeve

P. 494



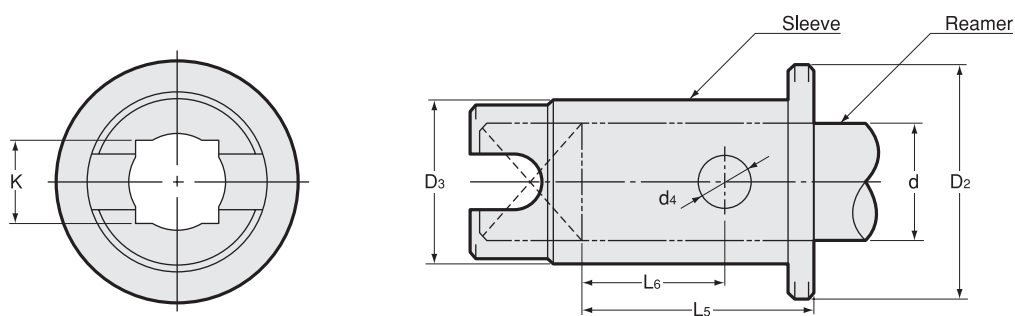
Model	Wrench
FH1	GWA1
FH2	

Ordering Example

FH0 - ST16

Shank size

Floating Holder Sleeve



Code	Model	d Reamer shank		K C11	Holder	L5	L6	D2	D3	d4	kg
		More than	Less than								
0185 0000 ※※※※	FHS0-φd	2.99	3.35	2.5	FH0-○○	18	11	19.5	11	5	0.03
		3.35	3.78	2.8	FH0-○○	17	10	19.5	11	5	0.03
		3.78	4.30	3.2	FH0-○○	20	13	19.5	11	5	0.03
		4.30	4.70	3.5	FH0-○○	20	13	19.5	11	5	0.02
		4.70	5.40	4.0	FH0-○○	23	16	19.5	11	5	0.02
		5.40	6.00	4.5	FH0-○○	28	21	19.5	11	5	0.02
		6.00	6.70	5.0	FH0-○○	27	20	19.5	11	5	0.02
		6.70	7.30	5.5	FH0-○○	27	20	19.5	11	5	0.02
0185 0001 ※※※※	FHS1-φd	3.99	4.30	3.2	FH1-○○	20	12	23	13	6	0.04
		4.30	4.70	3.5	FH1-○○	20	12	23	13	6	0.04
		4.70	5.40	4.0	FH1-○○	23	15	23	13	6	0.03
		5.40	6.00	4.5	FH1-○○	28	20	23	13	6	0.03
		6.00	6.70	5.0	FH1-○○	27	19	23	13	6	0.03
		6.70	7.30	5.5	FH1-○○	27	19	23	13	6	0.03
		7.30	8.00	6.0	FH1-○○	26	18	23	13	6	0.03
		8.00	8.60	6.5	FH1-○○	26	18	23	13	6	0.03
0185 0002 ※※※※	FHS2-φd	8.09	8.60	6.5	FH2-○○	33	19	38	26	7	0.20
		8.60	9.50	7.0	FH2-○○	32	18	38	26	7	0.20
		9.50	10.70	8.0	FH2-○○	31	17	38	26	7	0.19
		10.70	12.00	9.0	FH2-○○	38	24	38	26	7	0.19
		12.00	13.50	10.0	FH2-○○	42	28	38	26	7	0.17
		13.50	14.70	11.0	FH2-○○	41	27	38	26	7	0.16
		14.70	16.00	12.0	FH2-○○	40	26	38	26	7	0.15
		16.00	17.20	13.0	FH2-○○	39	25	38	26	7	0.14
		17.20	18.70	14.0	FH2-○○	38	24	38	26	7	0.12
		18.70	20.00	15.0	FH2-○○	37	23	38	26	7	0.11

Available in increments of 0.01 mm according to size of reamer shank.

Ordering Example

FHS1 - 6.0

Reamer shank dia.