

STOP/CHECK VALVES

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STOP/CHECK VALVES FROM 10 TO 250 mm

RFF stop/check valves can operate at the same time as both stop valves and check valves. When they are open, they act as check valves, but it is possible to lock them in the closed position, and they act as stop valves.

They are identical in design to standard versions of RFF valves. Maintenance and installation procedures are identical to the corresponding RFF standard valve.

The nominal pressure is 25 bar with temperature range from -50°C up to +150°C. Also available in PN 65 or PN 40 on request (depending on diameter).

The size of a stop/check valve on an installation should be carefully selected especially if ammoniac is used : The stop/check valve should not be oversized or it may start to "chatter" when operating.

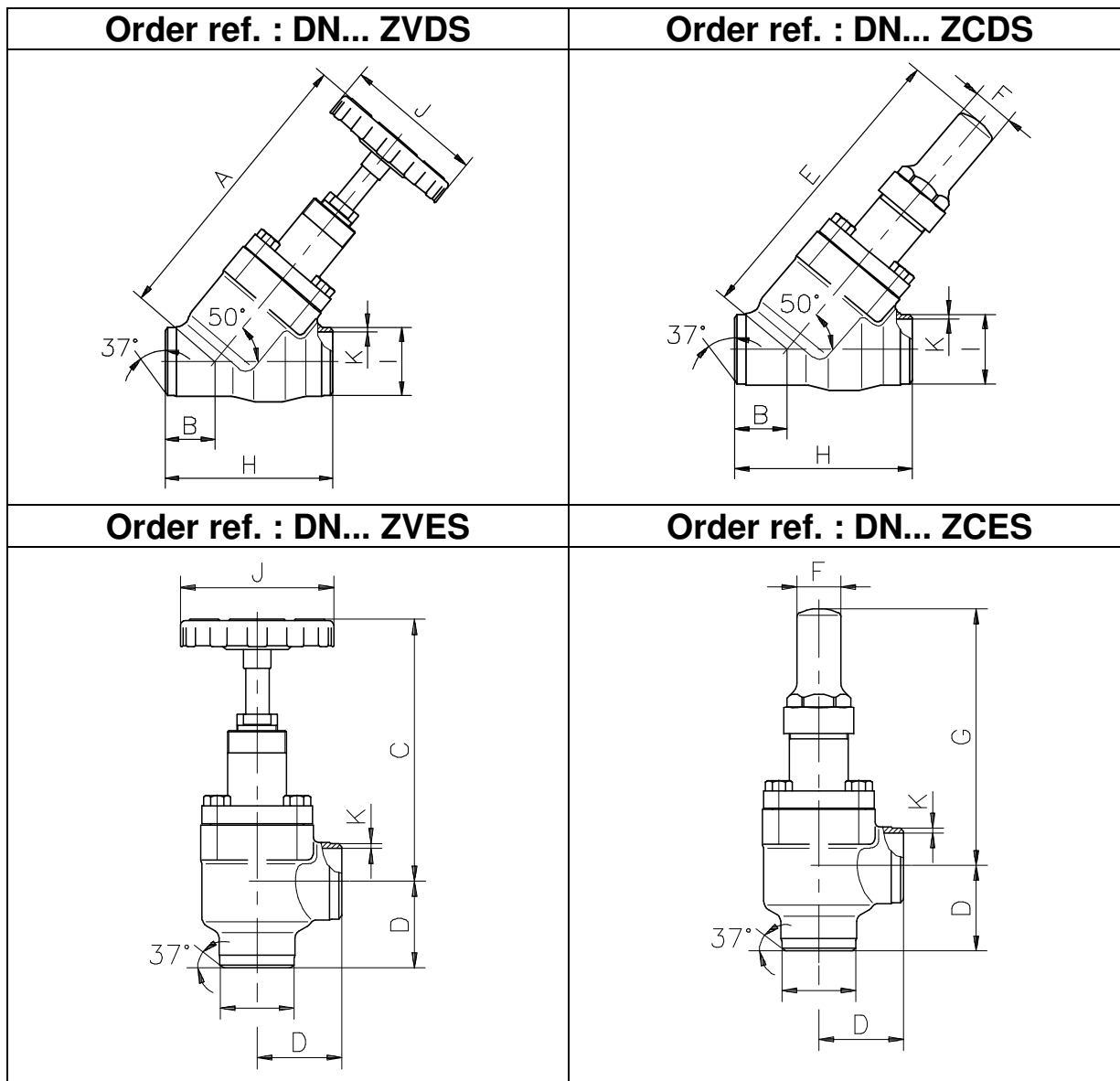
Stop/check valves can be identified by a groove machined above the bonnet. They are also supplied painted in blue to indicate the no-return function.

Spring strength for stop/check valves :

DN	START OPENING PRESSURE (bar)	END OPENING FORCE (DaN)	SEAT AREA (cm ²)
10/15	0.093	0.3	2.54
20/25	0.053	0.49	6.157
32/40	0.04	0.86	15.9
50	0.039	1.6	23.76
65	0.032	2.2	38.48
80	0.032	2.9	55.42
100	0.042	6.2	88.24
125	0.037	6.5	134.78
150	0.037	11	188.69
200	0.035	16.35	277.59
250	0.035	25	422.73

REFERENCES

D	...	Z	X	x	x
Steel range	DN	Stop/check valve	V : with handwheel C : with cap	D : straight E : angle	<u>Connections</u> S : Butt welding ends – standard series M : Butt weldings end – Din 2448 B : Brazing ends K : Socket welding ends H : Butt welding Thickness 2 mm for stainless steel pipe



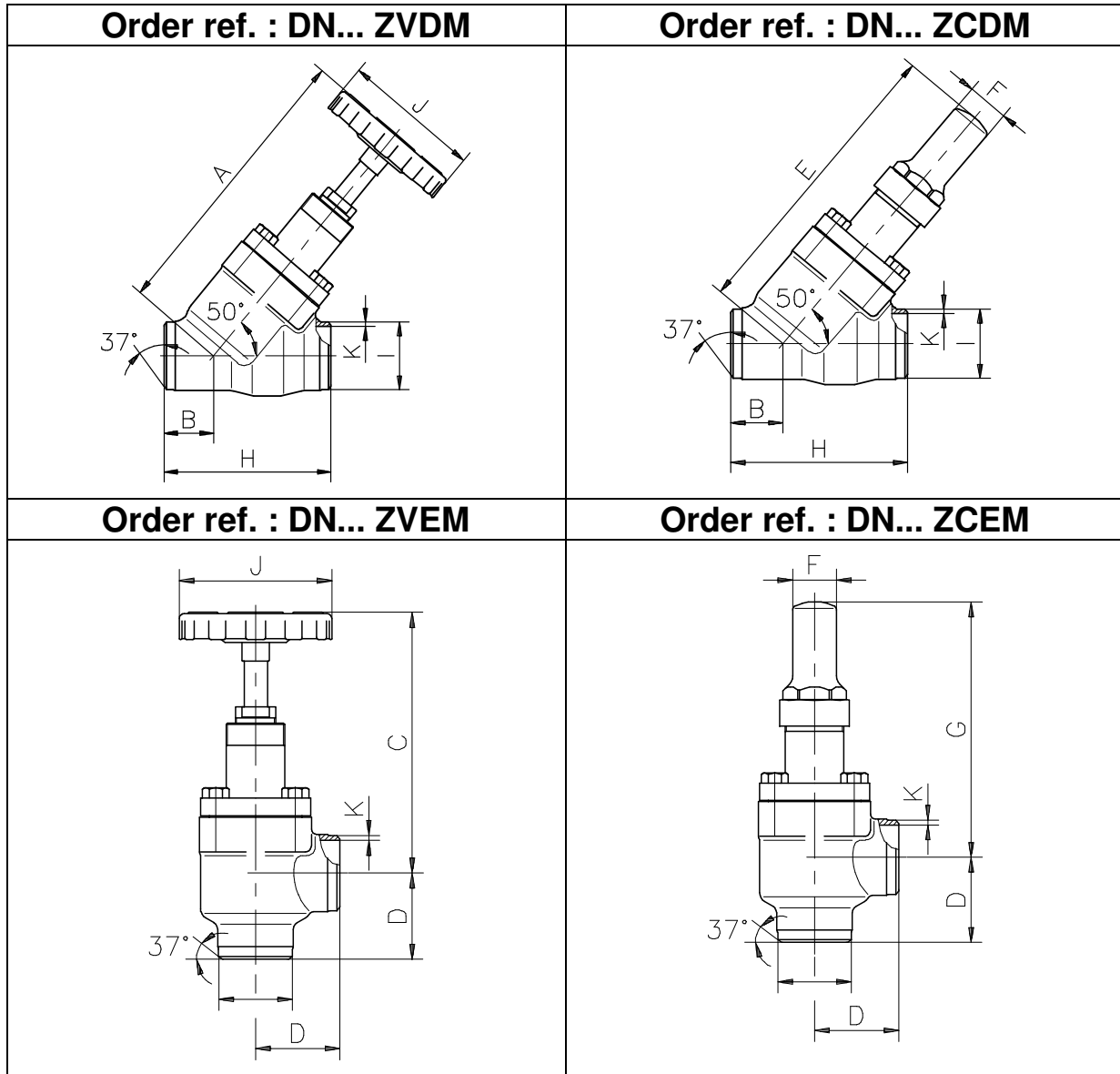
DIMENSIONS IN MILLIMETRES												
	DN	A *	B	C *	D	E	F	G	H	I	J	K
3/8"	10	128	25	112	39	136	28	112	85	17.2	50	2.3
1/2"	15	128	25	112	39	136	28	112	85	21.3	50	2.6
3/4"	20	161	33	136	46	171	36	146	110	26.9	70	2.9
1"	25	161	33	136	46	171	36	146	110	33.7	70	3.6
1 1/4"	32	200	40	159	57	214	36	161	130	42.4	100	3.6
1 1/2"	40	200	40	159	57	214	36	161	130	48.3	100	3.6
2"	50	247	41	209	69	257	36	206	152	60.3	125	4
2 1/2"	65 #	305	49	235	85	308	41	237	186	76.1	175	5
3"	80	360	54	273	85	368	50	281	238	88.9	200	5.6
4"	100	397	58	299	105	396	50	299	275	114.4	200	6.3
5"	125	545	66	427	120	558	48	442	308	139.7	250	7.1
6"	150	569	71	435	135	584	48	450	344	168.3	250	7.1
8"	200	833	88	655	170	869	56	691	427	219.1	400	8
10"	250	946	106	723	215	945	56	722	527	273	400	9.3

* Dimensions stop/check valve open

DN 65 : Ref S065ZVDUSA, S065ZVEUSA, S065ZCDUSA or S065ZCEUSA

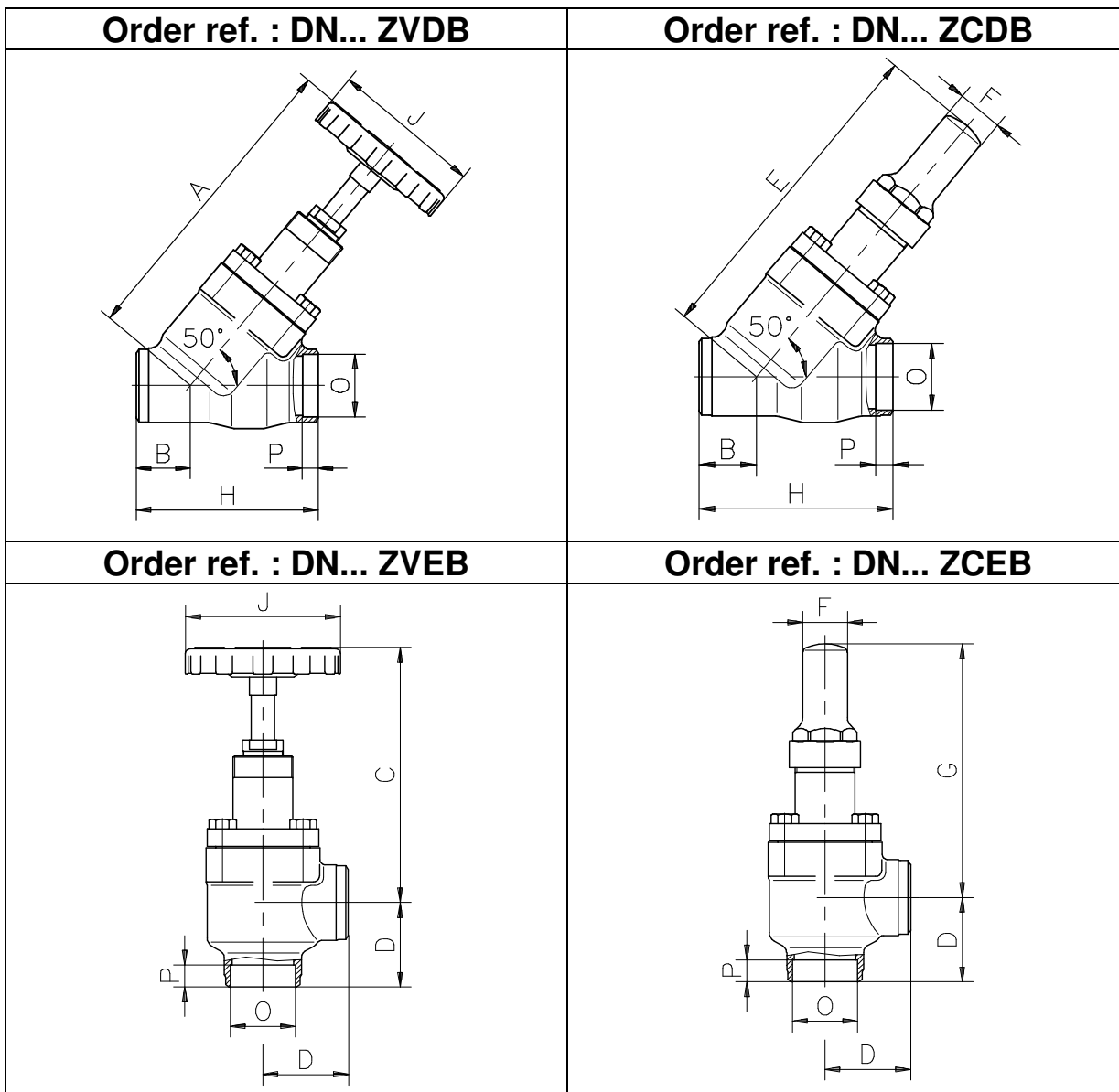
I = 73 , K = 5.2

STOP/CHECK VALVES FROM 10 TO 250 mm for WELDING "M"



DIMENSIONS IN MILLIMETRES												
	DN	A *	B	C *	D	E	F	G	H	I	J	K
3/8"	10	128	25	112	39	136	28	112	85	17.2	50	1.8
1/2"	15	128	25	112	39	136	28	112	85	21.3	50	2
3/4"	20	161	33	136	46	171	36	146	110	26.9	70	2.3
1"	25	161	33	136	46	171	36	146	110	33.7	70	2.6
1 1/4"	32	200	40	159	57	214	36	161	130	42.4	100	2.6
1 1/2"	40	200	40	159	57	214	36	161	130	48.3	100	2.6
2"	50	247	41	209	69	257	36	206	152	60.3	125	2.9
2 1/2"	65	305	49	235	85	308	41	237	186	76.1	175	2.9
3"	80	360	54	273	85	368	50	281	238	88.9	200	3.2
4"	100	397	58	299	105	396	50	299	275	114.4	200	3.6
5"	125	545	66	427	120	558	48	442	308	139.7	250	4.5
6"	150	569	71	435	135	584	48	450	344	168.3	250	4.5
8"	200	833	88	655	170	869	56	691	427	219.1	400	6.3
10"	250	946	106	723	215	945	56	722	527	273	400	6.3

* Dimensions stop/check valve open

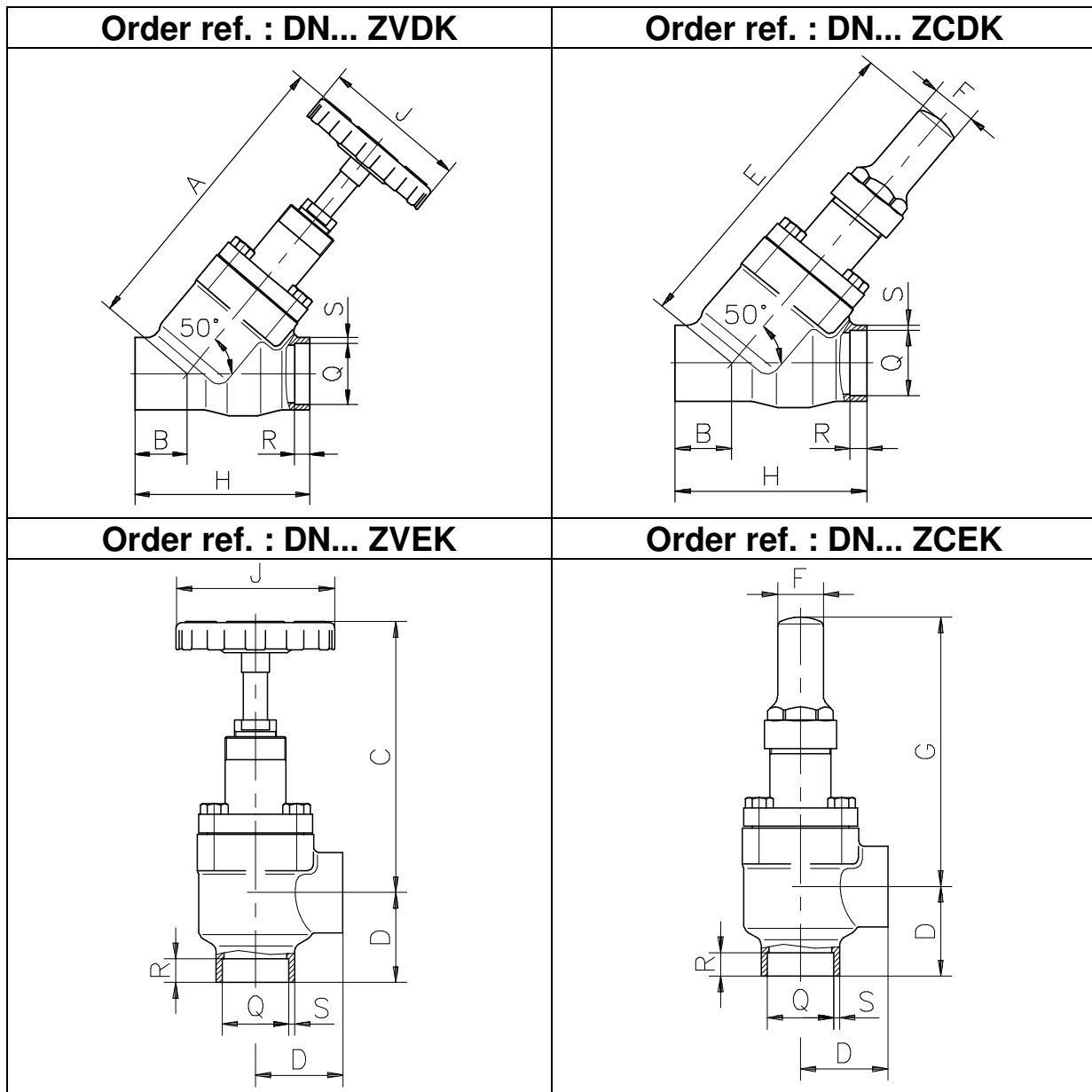


DIMENSIONS IN MILIMETRES													
	DN	A *	B	C *	D	E	F	G	H	J	O	P	
	1/2"	10	128	25	112	39	136	28	112	85	50	12.9	12
	5/8"	15	128	25	112	39	136	28	112	85	50	16.1	15.5
	7/8"	20	161	33	136	46	171	36	146	110	70	22.4	20
	1 1/8"	25	161	33	136	46	171	36	146	110	70	28.8	20
	1 3/8"	32	200	40	159	57	214	36	161	130	100	35.2	22
	1 5/8"	40	200	40	159	57	214	36	161	130	100	41.5	22
	2 1/8"	50	247	41	209	69	257	36	206	152	125	54.3	25
	2 5/8"	65	305	49	235	85	308	41	237	186	175	66.9	25
	3 1/8"	80	360	54	273	85	368	50	281	238	200	79.6	30
	4 1/8"	100	397	58	299	105	396	50	299	275	200	105	30

* Dimensions open stop/check valve

STOP/CHECK VALVES FROM 10 TO 32 mm SOCKET "K"

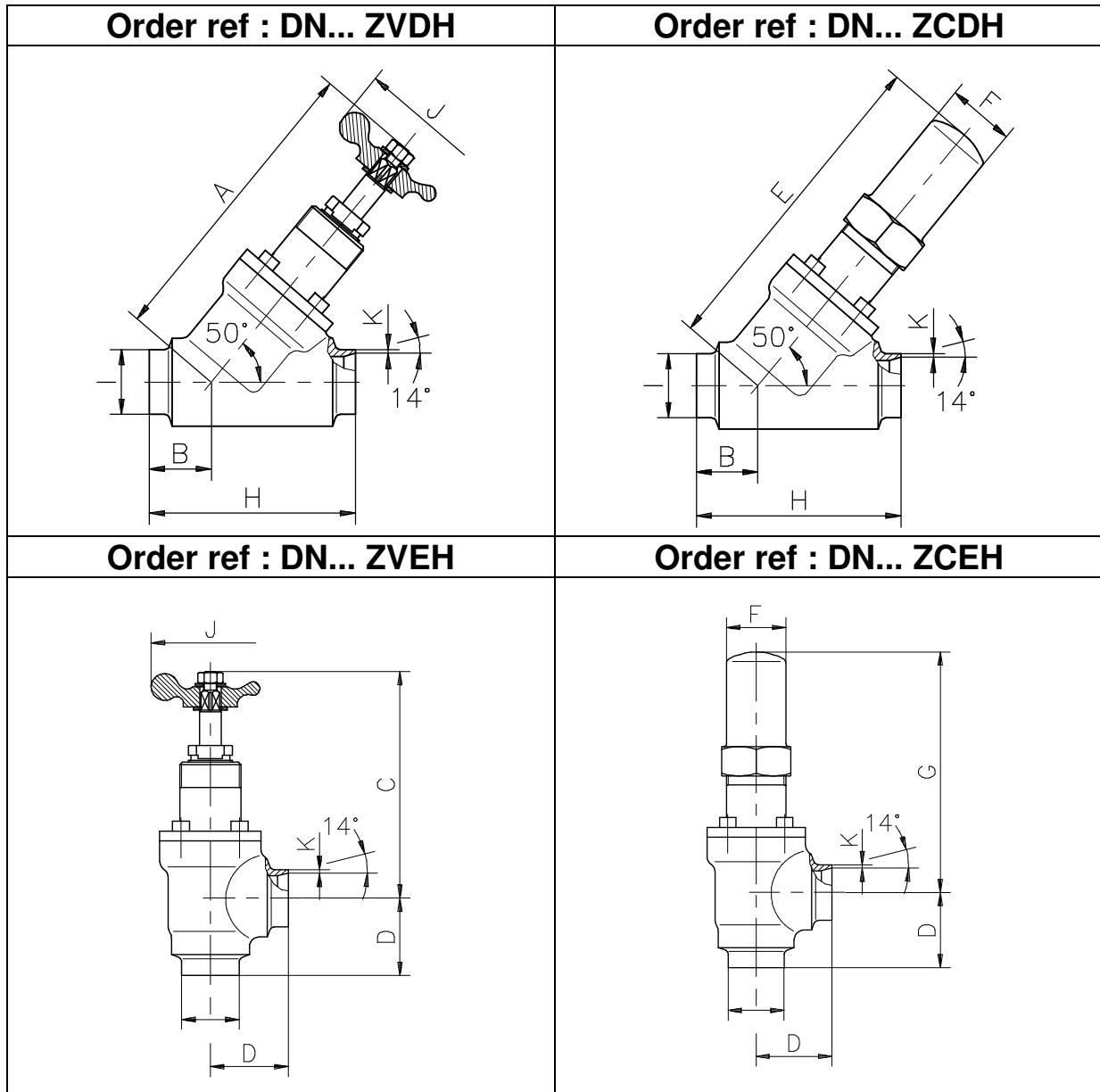
STEEL



DIMENSIONS IN MILLIMETRES												
DN	A *	B	C *	D	E	F	G	H	J	Q	R	S
3/8"	10	128	25	112	39	136	28	112	85	50	17.5	7.2
1/2"	15	128	25	112	39	136	28	112	85	50	21.9	5.1
3/4"	20	161	33	136	46	171	36	146	110	70	27.4	9.3
1"	25	161	33	136	46	171	36	146	110	70	34.1	5.9
1 1/4"	32	200	40	159	57	214	36	161	130	100	42.9	5.3

* Dimensions open stop/check valve

STOP/CHECK VALVES FROM 10 TO 250 mm for WELDING "H"



DIMENSIONS IN MILLIMETERS												
	DN	A *	B	C *	D	E	F	G	H	I	J	K
3/8"	10	128	25	112	39	136	28	112	85	17.2	50	2
1/2"	15	128	25	112	39	136	28	112	85	21.3	50	2
3/4"	20	161	33	136	46	171	36	146	110	26.9	70	2
1"	25	161	33	136	46	171	36	146	110	33.7	70	2
1 1/4"	32	200	40	159	57	214	36	161	130	42.4	100	2
1 1/2"	40	200	40	159	57	214	36	161	130	48.3	100	2
2"	50	247	41	209	69	257	36	206	152	60.3	125	2
2 1/2"	65	305	49	235	85	308	41	237	186	76.1	175	2
3"	80	360	54	273	85	368	50	281	238	88.9	200	2
4"	100	397	58	299	105	396	50	299	275	114.4	200	2
5"	125	545	66	427	120	558	48	442	308	139.7	250	2
6"	150	569	71	435	135	584	48	450	344	168.3	250	2
8"	200	833	88	655	170	869	56	691	427	219.1	400	2
10"	250	946	106	723	215	945	56	722	527	273	400	2

* Dimensions open stop/check valve

STAINLESS STEEL STOP/CHECK VALVE FROM 10 TO 25mm

STAINLESS

RFF stop/check valves are constructed of Stainless steel shell X4CrNi 18-10 (1.4301) EN10088-3 with aluminium cap or bakelite handwheel. Internal parts are similar than standard steel valves.

The nominal pressure rating is 25 bar with temperature range from -50°C up to +150°C. Stop/check valves with higher pressure PN 65 are also available on request with temperature range from -50°C to +110°C.

RFF stop/check valves can operate at the same time as both stop valves and check valves. When they are open, they act as check valves, but it is possible to lock them in the closed position, and they act as stop valves.

The size of a stop/check valve on an installation should be carefully selected especially if ammoniac is used : The stop/check valve should not be oversized or it may start to "chatter" when operating.

They are identical in design to standard versions of RFF valves. Maintenance and installation procedures are identical to the corresponding RFF standard valve.

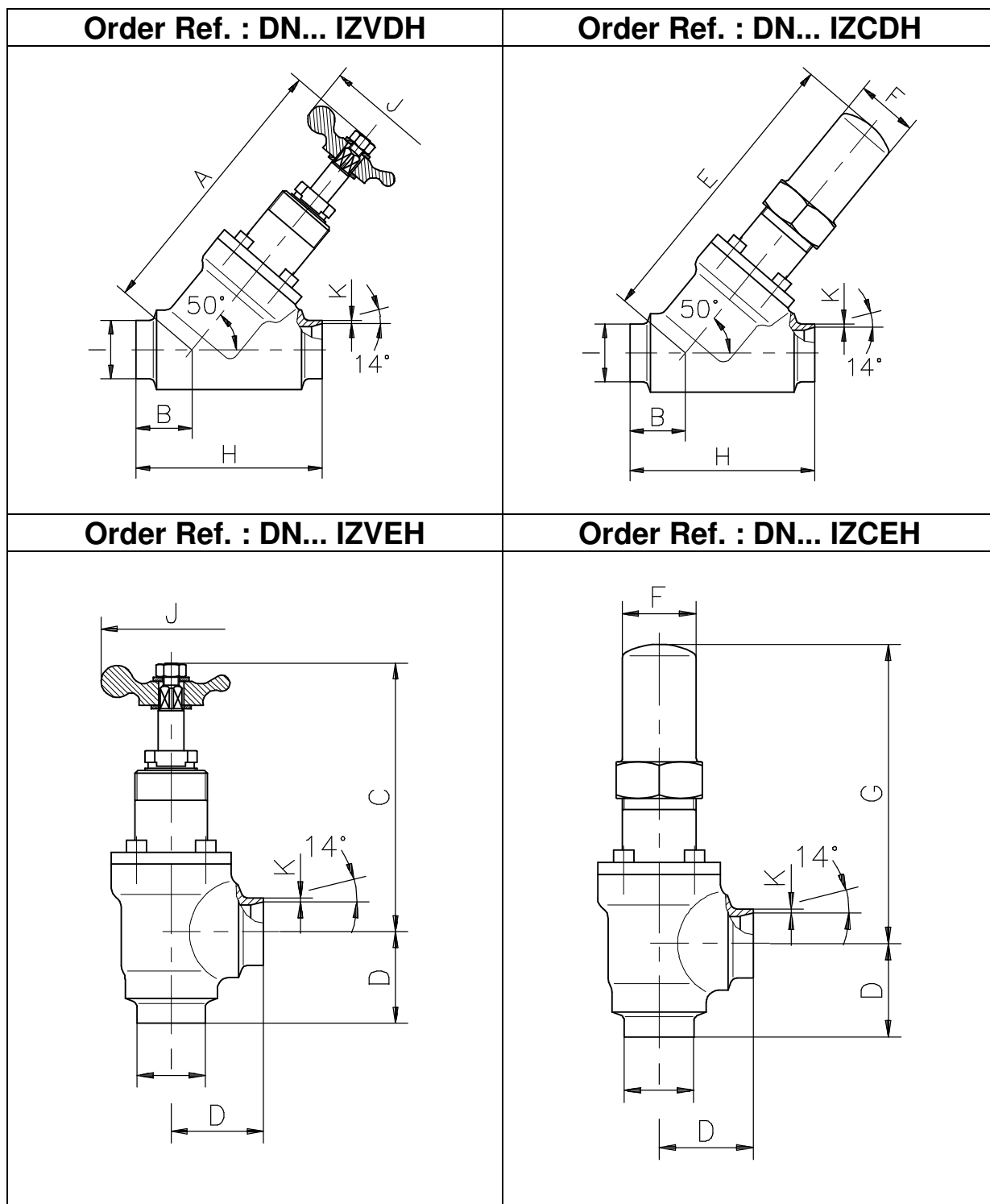
Stop/check valves can be identified by a groove machined above the bonnet.

Branch connections on RFF check valves can be :
for butt welding, "H" class
(Thickness 2mm for stainless steel pipe)

Spring strength for stop/check valves :

<u>DN</u>	<u>START OPENING PRESSURE</u> (bar)	<u>END OPENING FORCE</u> (DaN)	<u>SEAT AREA</u> (cm ²)
10/15	0.093	0.3	2.54
20/25	0.053	0.49	6.157

REFERENCES					
I	...	Z	x	x	x
Stainless steel range	DN	Stop check valve	V : with handwheel C : with cap	D : Straight E : Angle	<u>Connections</u> H : Butt welding Thickness 2 mm for stainless steel pipe



DIMENSIONS IN MILIMETRES													
	DN	A *	B	C*	D	E	F	G	H	I	J	K	
	3/8"	10	128	25	112	39	136	28	112	85	17.2	50	2
	1/2"	15	128	25	112	39	136	28	112	85	21.3	50	2
	3/4"	20	161	33	136	46	171	36	146	110	26.9	70	2
	1"	25	161	33	136	46	171	36	146	110	33.7	70	2

* Dimensions valve open