

# TRUNNION MOUNTED BALL VALVE

The lower end of stem is designed with an integral collar to be blowout proof.

Integral ISO5211 actuator mounting pad, provides easy match-up to the actuator with standardized connections.

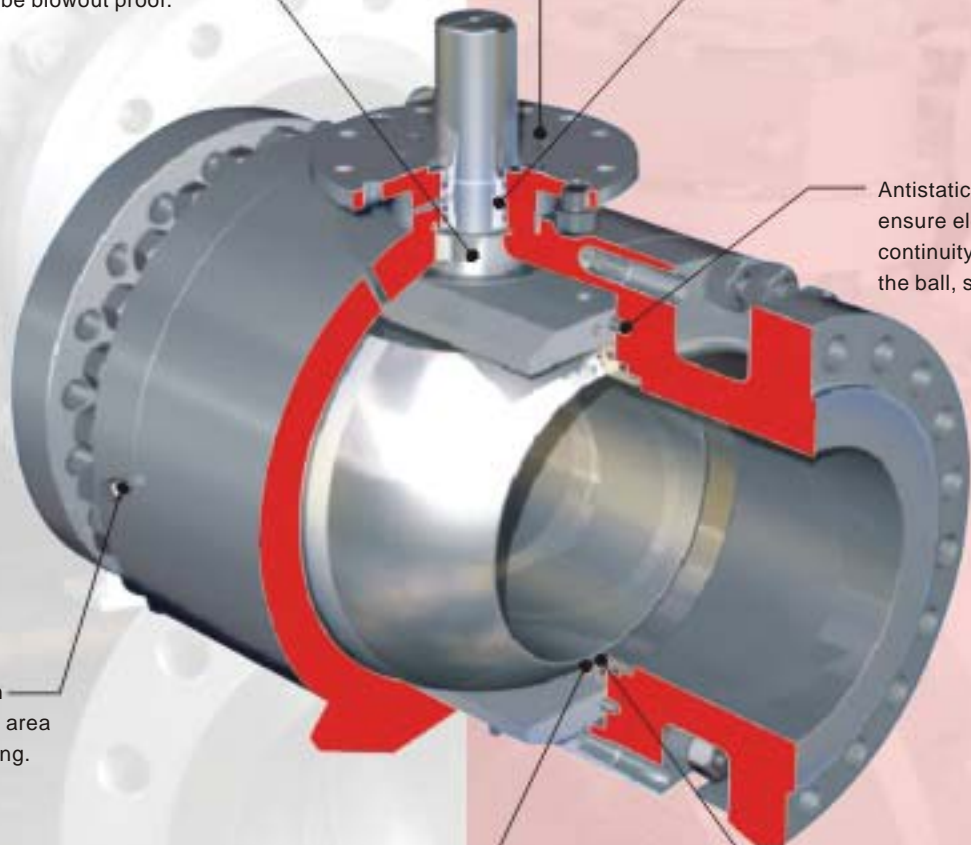
Multiple stem seal and packing for fugitive emission control.

Antistatic devices to ensure electrical continuity between the ball, stem and body.

Sealant injection in seat and stem area for positive sealing.

Double Block and Bleed (DBB).  
Refer to Page 15.

Fire safe achieved by a secondary metal to metal sealing.



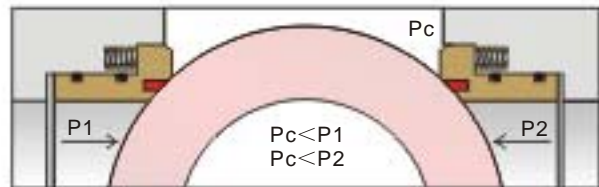
# TRUNNION MOUNTED BALL VALVE

## DESIGN FEATURES

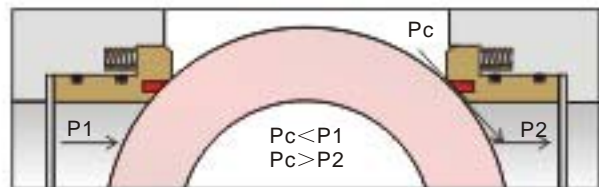
**KOLINK**  
VALVES & PIPE FITTINGS

### SEAT DESIGN FEATURE

Spring loaded metal seat with soft seat insert to maintain constant contact with the ball, assuring tight seal even at low pressure.

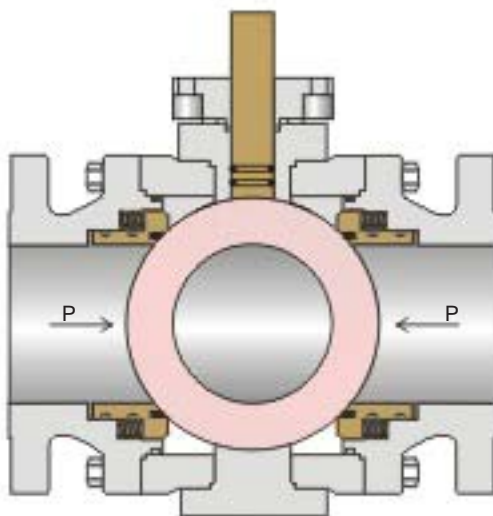


This design can also automatically relieve excess cavity pressure into the line when the cavity pressure exceeds line pressure.



### DOUBLE BLOCK AND BLEED (DBB)

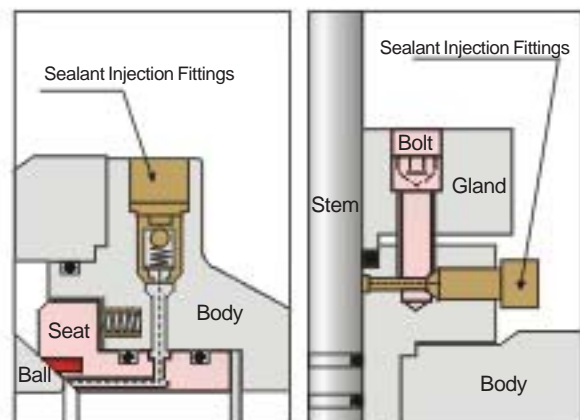
In the closed position, the spring loaded seat rings provides a positive seal against pressure from both ends of the valve, when the body cavity between the seating surfaces is vented through vent and drain valve. The drain valve can also be used to test for seat integrity.



Valve in Closed Position

### SEALANT INJECTION FITTINGS

In the event of stem seal or seat insert damage, emergency sealant injection can keep the integrity of the valve by incorporating a sealant seal around the stem or between the seat and the ball.

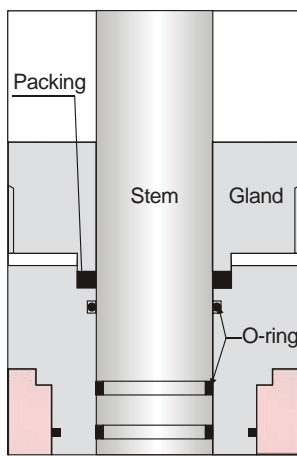


# TRUNNION MOUNTED BALL VALVE

## DESIGN FEATURES

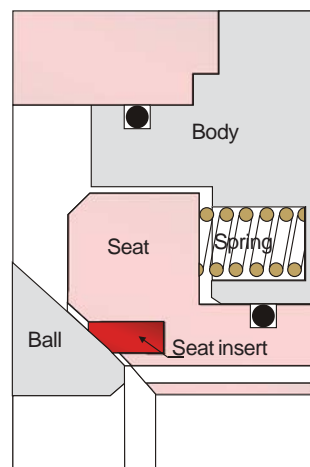
### STEM SEAL DESIGN

Double O-ring seal prevent leakage from stem area.



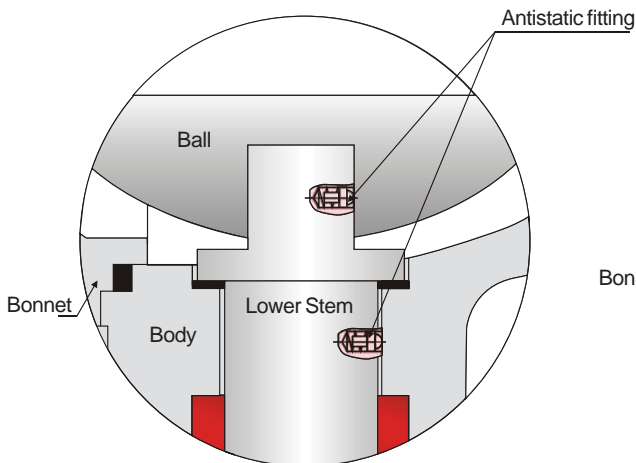
### FIRE SAFE DESIGN

A secondary metal to metal sealing shuts off the valve flow in the event of soft seat inserts are destroyed by fire. Fire tested to API 607 latest edition.



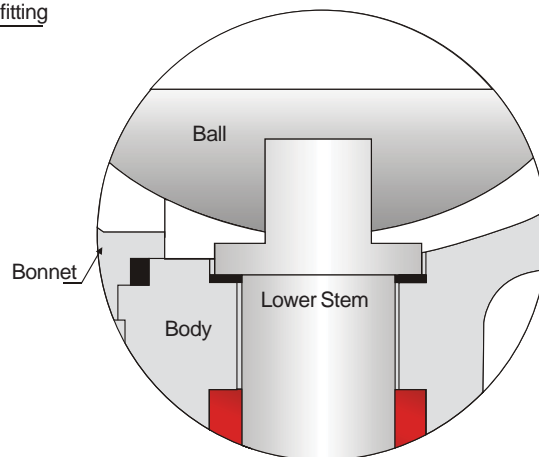
### ANTISTATIC DESIGN

Antistatic devices to ensure electrical continuity between the ball, stem and body, to eliminate electrostatic charging during service.



### ANTI-BLOWOUT DESIGN

The lower end of stem is designed with an integral collar to be blowout proof, assuring stem sealing at all pressures.



# CAST STEEL TRUNNION MOUNTED BALL VALVE 150LB

**KOLINK**  
VALVE & PIPE FITTING

## Features:

Trunnion Mounted Ball Type  
Split Body, End Entry  
2-Piece or 3-piece Body  
Full Port for Pigging Operation  
Gear or Actuator Available

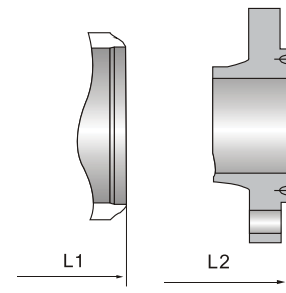
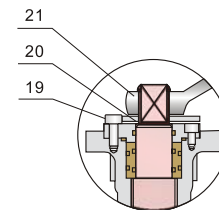
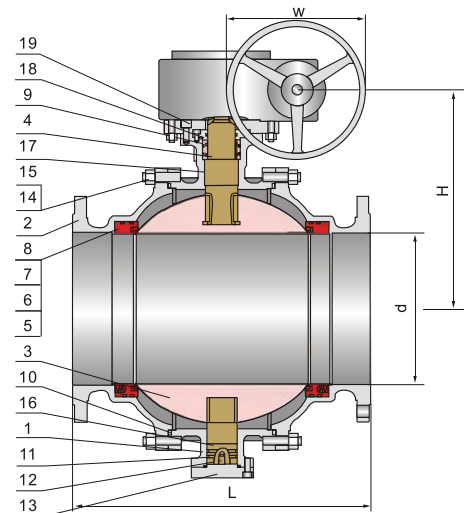
## Applicable Standards:

Design: API 6D / API 608 / BS 5351  
Wall Thickness: API 600 / BS 5351  
Fire Safe: API 607 / API 6FA  
Antistatic: API 608  
Face-to-face: ASME B16.10 / API 6D  
Flange Ends: ASME B16.5 / B16.47  
Butt-welding End: ASME B16.25  
Testing: API 598 / API 6D

## Materials of parts

No	Part Name	ASTM Material		
		Carbon Steel	Stainless Steel	Low Temp. Steel
1	Body	A216-WCB	A351-CF8M	A352-LCB
2	Bonnet	A216-WCB	A351-CF8M	A352-LCB
3	Ball	A182-F304 <sup>1)</sup>	A182-F316	A182-F304 <sup>1)</sup>
4	Stem	A276-420	A276-316	A276-420
5	Seat	A105+ENP	A182-F316	A350-LF2+ENP
6	Seat Insert	PTFE, RPTFE, PPL, NYLON, PEEK, etc.		
7	Seat Spring	A276-304	Inconel X-750	A313-304
8	Seat O-Ring	NBR, EPDN, VITON, etc.		
9	Stem O-Ring	NBR, EPDN, VITON, etc.		
10	Bonnet Gasket	Graphite+304 <sup>2)</sup>	Graphite+316 <sup>2)</sup>	Graphite+304 <sup>2)</sup>
11	Bonnet O-Ring	NBR, EPDN, VITON, etc.		
12	Antistatic Spring	A276-304	A276-316	A276-304
13	Back Cover	A105	A182-F316	A350-LF2
14	Bonnet Bolt	A193-B7	A193-B8M	A320-L7
15	Bonnet Bolt Nut	A194-2H	A194-8M	A194-4
16	Trunnion	A276-420 <sup>1)</sup>	A276-316	A276-420 <sup>1)</sup>
17	Bearing	304+PTFE	316+PTFE	304+PTFE
18	Gland Flange	A216-WCB	A351-CF8M	A352-LCB
19	Gland Bolt	A193-B7	A193-B8	A193-B7
20	Stop Plate	Carbon Steel	Carbon Steel+Zn	Carbon Steel
21	Wrench	Carbon Steel		

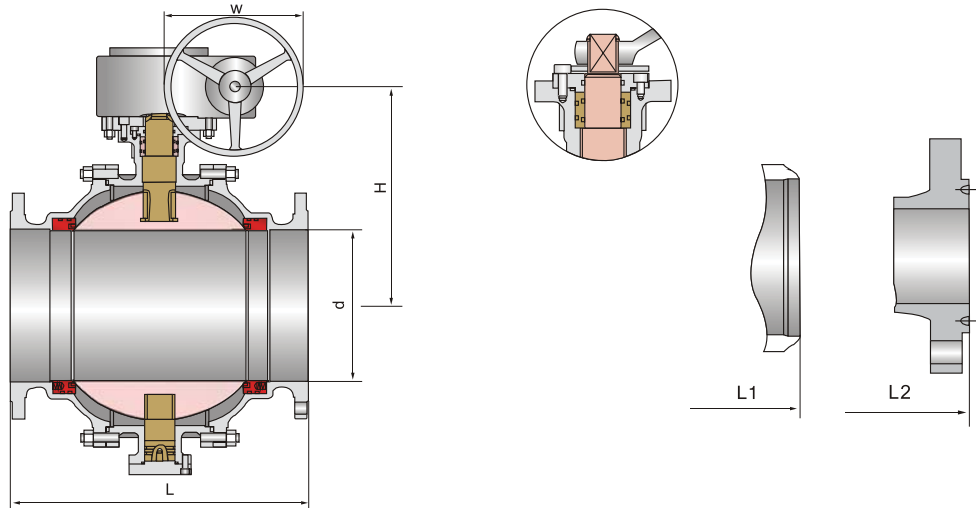
Note: 1). A105+ENP optional  
2). Spiral wound construction.



## Dimensions data

NPS	2	2½	3	4	6	8	10	12	14	16	18	20	24	26	28	30	32	36	in
DN	50	65	80	100	150	200	250	300	350	400	450	500	600	650	700	750	800	900	mm
<b>ANSI Class 150Lb</b>																			
L (RF)	7.00	7.50	8.00	9.00	15.50	18.00	21.00	24.00	27.00	30.00	34.00	36.00	42.00	45.00	49.00	51.00	54.00	60.00	in
	178	190	203	229	394	457	533	610	686	762	864	914	1067	1143	1245	1295	1372	1524	mm
L1 (BW)	8.50	9.50	11.12	12.00	18.00	20.50	22.00	25.00	30.00	33.00	36.00	39.00	45.00	49.00	53.00	55.00	60.00	68.00	in
	216	241	283	305	457	521	559	635	762	838	914	991	1143	1245	1346	1397	1524	1727	mm
H	7.00	7.50	8.25	9.25	20.88	24.62	25.62	30.75	31.00	36.25	38.25	43.38	45.25	50.75	55.12	64.12	70.88	80.75	in
	177	190	210	235	530	625	650	780	790	920	970	1100	1150	1290	1400	1630	1840	2050	mm
(d)	49	62	74	100	150	201	252	303	334	385	436	487	589	633	684	735	779	874	mm
W	14	16	20	20	24	24	24	24	32	32	32	32	32	32	32	32	32	32	in
	350	400	500	500	600	600	600	600	800	800	800	800	800	800	800	800	800	800	mm
WT (kg)	15	19	27	38	81	140	160	205	260	390	510	750	1200	1400	1860	2100	2530	2970	RF
	13.5	15.5	24.5	32.5	76	132	147	182	241	370	495	726	1125	1250	1640	1930	2390	2760	BW

# CAST STEEL TRUNNION MOUNTED BALL VALVE 300Lb~600Lb



## Dimensions data

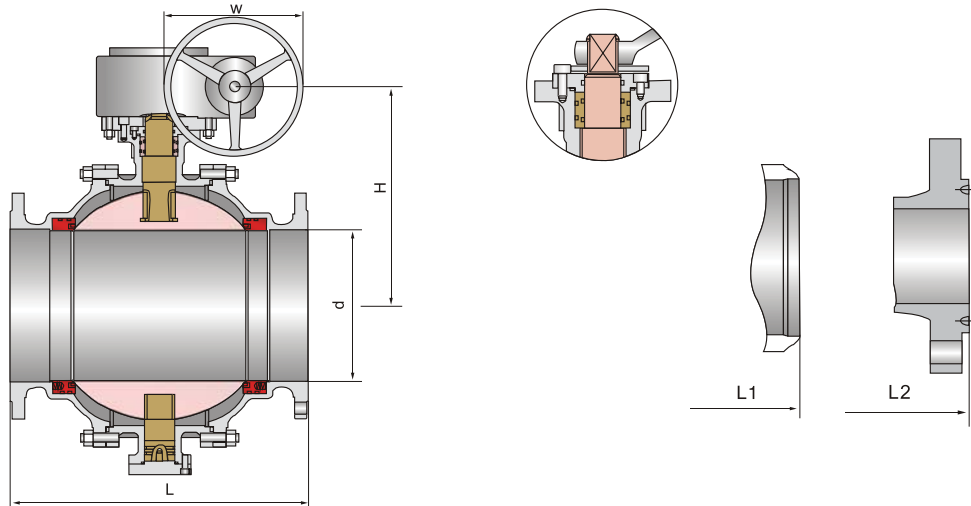
NPS DN	2 50	2½ 65	3 80	4 100	6 150	8 200	10 250	12 300	14 350	16 400	18 450	20 500	24 600	26 650	28 700	30 750	32 800	in mm
<b>ANSI Class 300Lb</b>																		
L (RF)	8.50 216	9.50 241	11.12 283	12.00 305	15.88 403	19.75 502	22.38 568	25.50 648	30.00 762	33.00 838	36.00 914	39.00 991	45.00 1143	49.00 1245	53.00 1346	55.00 1397	60.00 1524	in mm
L1 (BW)	8.50 216	9.50 241	11.12 283	12.00 305	18.00 457	20.50 521	22.00 559	25.00 635	30.00 762	33.00 838	36.00 914	39.00 991	45.00 1143	49.00 1245	53.00 1346	55.00 1397	60.00 1524	in mm
H	7.00 177	7.50 190	8.25 210	9.25 235	20.88 530	24.62 625	56.62 650	30.75 780	31.00 790	36.25 920	38.25 970	43.38 1100	45.25 1150	50.75 1290	55.12 1400	64.12 1630	70.88 1800	in mm
(d)	49	62	74	100	150	201	252	303	334	385	436	487	589	633	684	735	779	mm
W	14 350	16 400	20 500	20 500	24 600	24 600	24 600	24 600	32 800	32 800	32 800	32 800	32 800	32 800	32 800	32 800	32 800	in mm
WT (kg)	19 14	24 16	34 25	48 34	101 82	175 145	200 155	255 185	325 238	485 375	635 516	935 782	1500 1280	1750 1375	2225 1825	2450 2180	2870 2260	RF BW

NPS DN	2 50	2½ 65	3 80	4 100	6 150	8 200	10 250	12 300	14 350	16 400	18 450	20 500	24 600	26 650	28 700	in mm
<b>ANSI Class 600Lb</b>																
L/L1 (RF/BW)	11.50 292	13.00 330	14.00 356	17.00 432	22.00 559	26.00 660	31.00 787	33.00 838	35.00 889	39.00 991	43.00 1092	47.00 1194	55.00 1397	57.00 1448	61.00 1549	in mm
L2 (RTJ)	11.62 295	13.12 333	14.12 359	17.12 435	22.12 562	26.12 664	21.12 791	33.12 841	35.12 892	39.12 994	43.12 1095	47.25 1200	55.38 1407	57.50 1461	61.50 1562	in mm
H	7.12 180	7.62 193	8.50 215	9.50 241	21.25 540	25.00 635	26.12 665	31.12 790	31.88 810	36.38 925	38.75 985	44.50 1130	46.62 1185	52.50 1335	57.00 1450	in mm
(d)	49	62	74	100	150	201	252	303	334	385	436	487	589	633	684	mm
W	14 350	16 400	20 500	20 500	24 600	24 600	24 600	24 600	32 800	32 800	32 800	32 800	32 800	32 800	32 800	in mm
WT (kg)	26 19	35 25	58 42	81 51	142 85	287 200	540 395	780 610	1000 805	1300 1010	1700 1350	2100 1656	3400 2775	3800 3125	4500 3790	RF BW



# CAST STEEL TRUNNION MOUNTED BALL VALVE 900lb~2500lb

**KOLINK**  
VALVE & PIPE FITTING



## Dimensions data

NPS DN	2 50	2½ 65	3 80	4 100	6 150	8 200	10 250	12 300	14 350	16 400	18 450	20 500	24 600	in mm
<b>ANSI Class 900Lb</b>														
L/L1 (RF/BW)	14.50 368	16.50 419	15.00 381	18.00 457	24.00 610	29.00 737	33.00 838	38.00 965	40.50 1029	44.50 1130	48.00 1219	52.00 1321	61.00 1549	in mm
L2 (RTJ)	14.62 371	16.62 422	15.12 384	18.12 460	24.12 613	29.12 740	33.12 841	38.12 968	40.88 1038	44.88 1140	48.50 1232	52.50 1334	61.75 1568	in mm
H	8.62 219	9.25 235	10.25 260	15.38 390	25.75 655	30.25 770	31.75 805	38.00 965	38.50 980	45.00 1145	47.00 1195	53.50 1360	56.00 1425	in mm
(d)	49	62	74	100	150	201	252	303	322	373	423	471	570	mm
W	20 500	20 500	20 500	24 600	24 600	24 600	24 600	32 800	32 800	32 800	32 800	32 800	32 800	in mm
WT (kg)	31 23	43 31	68 51	98 61	171 102	345 240	650 480	940 735	1205 965	1565 1215	2050 1625	2535 1995	3950 3335	RF BW

NPS DN	2 50	2½ 65	3 80	4 100	6 150	8 200	10 250	12 300	14 350	16 400
<b>ANSI Class 1500Lb</b>										
L/L1 (RF)/(BW)	14.50 368	16.50 419	18.50 470	21.50 546	27.75 705	32.75 832	39.00 991	44.50 1130	49.50 1257	54.50 1384
L2 (RTJ)	14.62 371	16.62 422	18.62 473	21.62 549	28.00 711	33.12 841	39.38 1000	45.12 1146	50.25 1276	55.38 1407
H	11.25 285	12.00 306	13.25 338	20.00 506	33.50 852	39.38 1000	41.12 1045	49.38 1255	50.00 1270	58.50 1485
(d)	49	62	74	100	144	192	239	287	315	360
W	20 500	20 500	24 600	24 600	24 600	32 800	32 800	32 800	32 800	32 800
WT (kg)	49 33	67 44	106 73	153 87	268 145	540 345	1020 685	1475 1050	1885 1385	2455 1735

NPS DN	2 50	2½ 65	3 80	4 100	6 150	8 200	10 250	12 300	in mm
<b>ANSI Class 2500Lb</b>									
L/L1 (RF)/(BW)	17.75 451	20.00 508	22.75 578	26.50 673	36.00 914	40.25 1022	50.00 1270	56.00 1422	in mm
L2 (RTJ)	17.88 454	21.25 514	23.00 584	26.88 683	36.50 927	40.88 1038	50.88 1292	56.88 1445	in mm
H	12.00 304	12.88 327	14.25 362	21.25 540	35.88 911	42.12 1070	44.00 1120	53.00 1345	in mm
(d)	42	52	62	87	131	179	223	265	mm
W	20 500	24 600	24 600	24 600	32 800	32 800	32 800	32 800	in mm
WT (kg)	55 41	76 55	120 91	173 110	302 182	612 430	1150 855	1665 1315	RF/RTJ BW