Forklift Batteries

Traction lead acid batteries, as the DC drive power of forklift, traction vehicles, transportation vehicles, tramcars etc., have a wide application in airport, station, port, vegetable and fruit markets and warehouses and so on. Also traction batteries, which are designed to be DC power of non-pollution transportation equipments, are widely used by buses, gymnastic and recreation locations. Traction batteries are fully compliant to BS standard or DIN standard.It meets the dimensions of the standards DIN/EN 60254-2 and IEC 60254-2.



Construction Features

- ※ Nonwoven protective gauntlet, better elastic, less pore size, less electrical resistance and higher air permeability.
- ※ Flexible, fully isolated connector prevents any creeping current.
- ※ Flip top plugs with special electrolyte level indication.
- ※ Automatic refilling plugs are also available (according request).
- ※ Imported microporous catercorner separator with advanced quality provides higher porosity and lower electrical resistance.
- ※ Containers and lids are made of polypropylene (PP). The impact resistance is very good.
- ※ Patented terminal sealing construction fully prevents plate growth and electrolyte leakage.

Nonwoven protective gauntlet



Flip Top Plug



Flexible Intercell Connector



Automatic Refilling Plug

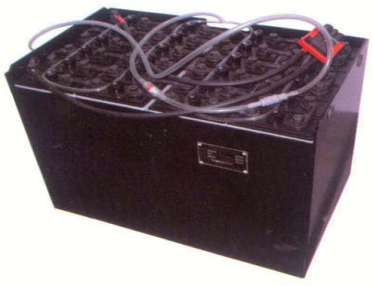


DIN 198 Series Specification

Model	INTL Model	Rated Voltage	5 Hr Rated Capacity	Max.Overall Dimenison(mm)					Pole Qty	Case Material	Reference weight(kg)	
		(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
2PzS120	D-120-K2	2	120	47	198	360	395	405	2	PP	6.5	8.5
3PzS180	D-180-K3	2	180	65	198	360	395	405	2	PP	9	12
4PzS240	D-240-K4	2	240	83	198	360	395	405	2	PP	11.5	15.5
5PzS300	D-300-K5	2	300	101	198	360	395	405	2	PP	14	19
6PzS360	D-360-K6	2	360	119	198	360	395	405	2	PP	16.8	22.5
7PzS420	D-420-K7	2	420	137	198	360	395	405	2	PP	19.4	26
8PzS480	D-480-K8	2	480	155	198	360	395	405	2or4	PP	22	30
9PzS540	D-540-K9	2	540	173	198	360	395	405	2or4	PP	25	33.5
10PzS600	D-600-K10	2	600	191	198	360	395	405	2or4	PP	28.8	37.5
12PzS720	D-720-K12	2	720	227	198	360	395	405	2or4	PP	32	41
2PzS140	D-140-K2	2	140	47	198	405	440	450	2	PP	8	10.5
3PzS210	D-210-K3	2	210	65	198	405	440	450	2	PP	11	15
4PzS280	D-280-K4	2	280	83	198	405	440	450	2	PP	14	19
5PzS350	D-350-K5	2	350	101	198	405	440	450	2	PP	17.5	24
6PzS420	D-420-K6	2	420	119	198	405	440	450	2	PP	20.5	28
7PzS490	D-490-K7	2	490	137	198	405	440	450	2	PP	23.5	32.5
8PzS560	D-560-K8	2	560	155	198	405	440	450	2or4	PP	27	37
9PzS630	D-630-K9	2	630	173	198	405	440	450	2or4	PP	30.5	41.5
10PzS700	D-700-K10	2	700	191	198	405	440	450	2or4	PP	33.5	46
12PzS840	D-840-K12	2	840	227	198	405	440	450	2or4	PP	36.5	52
2PzS160	D-160-K2	2	160	47	198	456	491	501	2	PP	9.5	12.5
3PzS240	D-240-K3	2	240	65	198	456	491	501	2	PP	13	17.5
4PzS320	D-320-K4	2	320	83	198	456	491	501	2	PP	17	23
5PzS400	D-400-K5	2	400	101	198	456	491	501	2	PP	20.5	27.5
6PzS480	D-480-K6	2	480	119	198	456	491	501	2	PP	23.5	32.5
7PzS560	D-560-K7	2	560	137	198	456	491	501	2	PP	27	38
8PzS640	D-640-K8	2	640	155	198	456	491	501	2or4	PP	31	43
9PzS720	D-720-K9	2	720	173	198	456	491	501	2or4	PP	36.5	49.5
10PzS800	D-800-K10	2	800	191	198	456	491	501	2or4	PP	38.5	53
12PzS960	D-960-K12	2	960	227	198	456	491	501	2or4	PP	41	58
2PzS180	D-180-K2	2	180	47	198	525	560	570	2	PP	9	12
3PzS270	D-270-K3	2	270	65	198	525	560	570	2	PP	12	17
4PzS360	D-360-K4	2	360	83	198	525	560	570	2	PP	15.5	22
5PzS450	D-450-K5	2	450	101	198	525	560	570	2	PP	19	27
6PzS540	D-540-K6	2	540	119	198	525	560	570	2	PP	21.5	31.5
7PzS630	D-630-K7	2	630	137	198	525	560	570	2	PP	25.5	36.5
8PzS720	D-720-K8	2	720	155	198	525	560	570	2or4	PP	29	42
9PzS810	D-810-K9	2	810	173	198	525	560	570	2or4	PP	31.5	46.5
10PzS900	D-900-K10	2	900	191	198	525	560	570	2or4	PP	35.5	50.5
12PzS1080	D-1080-K12	2	1080	227	198	525	560	570	2or4	PP	38.5	56

DIN 198 Series Specification

Model	INTL Model	Rated Voltage	5 Hr Rated Capacity	Max.Overall Dimenison(mm)					Pole Qty	Case Material	Reference weight(kg)	
		(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
2PzS200	D-200-K2	2	200	47	198	570	605	615	2	PP	10	13.5
3PzS300	D-300-K3	2	300	65	198	570	605	615	2	PP	14.5	20
4PzS400	D-400-K4	2	400	83	198	570	605	615	2	PP	18.5	25.5
5PzS500	D-500-K5	2	500	101	198	570	605	615	2	PP	22	31
6PzS600	D-600-K6	2	600	119	198	570	605	615	2	PP	26.5	37
7PzS700	D-700-K7	2	700	137	198	570	605	615	2	PP	30.5	43
8PzS800	D-800-K8	2	800	155	198	570	605	615	2or4	PP	34.5	49
9PzS900	D-900-K9	2	900	173	198	570	605	615	2or4	PP	39.5	55
10PzS1000	D-1000-K10	2	1000	191	198	570	605	615	2or4	PP	42.5	60.5
12PzS1200	D-1200-K10	2	1200	227	198	570	605	615	2or4	PP	46.5	65
2PzS240	D-240-K2	2	240	47	198	690	725	735	2	PP	12	16
3PzS360	D-360-K3	2	360	65	198	690	725	735	2	PP	17	24
4PzS480	D-480-K4	2	480	83	198	690	725	735	2	PP	22	32
5PzS600	D-600-K5	2	600	101	198	690	725	735	2	PP	27	40
6PzS720	D-720-K6	2	720	119	198	690	725	735	2	PP	32	48.5
7PzS840	D-840-K7	2	840	137	198	690	725	735	2	PP	37	56
8PzS960	D-960-K8	2	960	155	198	690	725	735	2or4	PP	43	64
9PzS1080	D-1080-K9	2	1080	173	198	690	725	735	2or4	PP	48	72
10PzS1200	D-1200-K10	2	1200	191	198	690	725	735	2or4	PP	54	80
2PzS280	D-280-K2	2	280	47	198	720	755	765	2	PP	15	19
3PzS420	D-420-K3	2	420	65	198	720	755	765	2	PP	20	25.6
4PzS560	D-560-K4	2	560	83	198	720	755	765	2	PP	26	33.6
5PzS700	D-700-K5	2	700	101	198	720	755	765	2	PP	33	42
6PzS840	D-840-K6	2	840	119	198	720	755	765	2	PP	39	50
7PzS980	D-980-K7	2	980	137	198	720	755	765	2	PP	45.5	58.5
8PzS1120	D-1120-K8	2	1120	155	198	720	755	765	2or4	PP	52	66
9PzS1260	D-1260-K9	2	1260	173	198	720	755	765	2or4	PP	58	74.5
10PzS1400	D-1400-K10	2	1400	191	198	720	755	765	2or4	PP	63	81.3





BS 158 Series Specification

Model	INTL Model	Rated Voltage	5 Hr Rated Capacity	Max.Overall Dimenison(mm)					Pole Qty	Case Material	Reference weight(kg)	
		(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
2VBS100	D-100-Z2	2	100	45	158	385	420	430	2	PP	5.8	7.5
3VBS150	D-150-Z3	2	150	61	158	385	420	430	2	PP	7.5	10
4VBS200	D-200-Z4	2	200	77	158	385	420	430	2	PP	9.5	13
5VBS250	D-250-Z5	2	250	93	158	385	420	430	2	PP	12	16
6VBS300	D-300-Z6	2	300	109	158	385	420	430	2or4	PP	15	20
7VBS350	D-350-Z7	2	350	125	158	385	420	430	2or4	PP	17	23
8VBS400	D-400-Z8	2	400	141	158	385	420	430	2or4	PP	20	27
9VBS450	D-450-Z9	2	450	157	158	385	420	430	2or4	PP	22.5	30
10VBS500	D-500-Z10	2	500	173	158	385	420	430	2or4	PP	24.5	33
11VBS550	D-550-Z11	2	550	189	158	385	420	430	4	PP	27	36
12VBS600	D-600-Z12	2	600	205	158	385	420	430	4	PP	29	39
13VBS650	D-650-Z13	2	650	221	158	385	420	430	4	PP	31	42
14VBS700	D-700-Z14	2	700	237	158	385	420	430	4	PP	33	45
15VBS750	D-750-Z15	2	750	253	158	385	420	430	4	PP	35.5	48
2VBS110	D-110-Z2	2	110	45	158	405	440	450	2	PP	6.7	8.5
3VBS165	D-165-Z3	2	165	61	158	405	440	450	2	PP	8.7	11.5
4VBS220	D-220-Z4	2	220	77	158	405	440	450	2	PP	11.3	15
5VBS275	D-275-Z5	2	275	93	158	405	440	450	2	PP	13.4	18
6VBS330	D-330-Z6	2	330	109	158	405	440	450	2or4	PP	15.5	21
7VBS385	D-385-Z7	2	385	125	158	405	440	450	2or4	PP	17.5	24
8VBS440	D-440-Z8	2	440	141	158	405	440	450	2or4	PP	19.5	27.5
9VBS495	D-495-Z9	2	495	157	158	405	440	450	2or4	PP	22	30.5
10VBS550	D-550-Z10	2	550	173	158	405	440	450	2or4	PP	25.5	34.5
11VBS605	D-605-Z11	2	605	189	158	405	440	450	4	PP	27.5	37.5
12VBS660	D-660-Z12	2	660	205	158	405	440	450	4	PP	30	41
13VBS715	D-715-Z13	2	715	221	158	405	440	450	4	PP	32	44
14VBS770	D-770-Z14	2	770	237	158	405	440	450	4	PP	34	47
15VBS825	D-825-Z15	2	825	253	158	405	440	450	4	PP	36.5	50.5
2VBS120	D-120-Z2	2	120	45	158	431	466	476	2	PP	6.9	9
3VBS180	D-180-Z3	2	180	61	158	431	466	476	2	PP	9.7	12.6
4VBS240	D-240-Z4	2	240	77	158	431	466	476	2	PP	12.4	16.2
5VBS300	D-300-Z5	2	300	93	158	431	466	476	2	PP	15.1	19.8
6VBS360	D-360-Z6	2	360	109	158	431	466	476	2or4	PP	17.8	23.4
7VBS420	D-420-Z7	2	420	125	158	431	466	476	2or4	PP	20.5	27
8VBS480	D-480-Z8	2	480	141	158	431	466	476	2or4	PP	23.2	30.6
9VBS540	D-540-Z9	2	540	157	158	431	466	476	2or4	PP	26	34.2
10VBS600	D-600-Z10	2	600	173	158	431	466	476	2or4	PP	28.7	37.8
11VBS660	D-660-Z11	2	660	189	158	431	466	476	4	PP	32	41.4
12VBS720	D-720-Z12	2	720	205	158	431	466	476	4	PP	34	44
13VBS780	D-780-Z13	2	780	221	158	431	466	476	4	PP	36	47
14VBS840	D-840-Z14	2	840	237	158	431	466	476	4	PP	38	51
15VBS900	D-900-Z15	2	900	253	158	431	466	476	4	PP	40	54

BS 158 Series Specification

Model	INTL Model	Rated Voltage	5 Hr Rated Capacity	Max.Overall Dimenison(mm)					Pole Qty	Case Material	Reference weight(kg)	
		(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
2VBS140	D-140-Z2	2	140	45	158	495	530	540	2	PP	7.6	10
3VBS210	D-210-Z3	2	210	61	158	495	530	540	2	PP	10	13.5
4VBS280	D-280-Z4	2	280	77	158	495	530	540	2	PP	13	18
5VBS350	D-350-Z5	2	350	93	158	495	530	540	2	PP	16	21
6VBS420	D-420-Z6	2	420	109	158	495	530	540	2or4	PP	21	28
7VBS490	D-490-Z7	2	490	125	158	495	530	540	2or4	PP	23	31
8VBS560	D-560-Z8	2	560	141	158	495	530	540	2or4	PP	25	34
9VBS630	D-630-Z9	2	630	157	158	495	530	540	2or4	PP	27.5	38
10VBS700	D-700-Z10	2	700	173	158	495	530	540	2or4	PP	30	41
11VBS770	D-770-Z11	2	770	189	158	495	530	540	2or4	PP	33	46
12VBS840	D-840-Z12	2	840	205	158	495	530	540	4	PP	36	50
13VBS910	D-910-Z13	2	910	221	158	495	530	540	4	PP	39.5	55
14VBS980	D-980-Z14	2	980	237	158	495	530	540	4	PP	42.5	59
15VBS1050	D-1050-Z15	2	1050	253	158	495	530	540	4	PP	45	63
2VBS160	D-160-Z2	2	160	45	158	554	589	599	2	PP	8.5	11
3VBS240	D-240-Z3	2	240	61	158	554	589	599	2	PP	12.4	16.5
4VBS320	D-320-Z4	2	320	77	158	554	589	599	2	PP	16	23
5VBS400	D-400-Z5	2	400	93	158	554	589	599	2	PP	20	27
6VBS480	D-480-Z6	2	480	109	158	554	589	599	2or4	PP	24	35
7VBS560	D-560-Z7	2	560	125	158	554	589	599	2or4	PP	30	41
8VBS640	D-640-Z8	2	640	141	158	554	589	599	2or4	PP	34.5	48
9VBS720	D-720-Z9	2	720	157	158	554	589	599	2or4	PP	39	54
10VBS800	D-800-Z10	2	800	173	158	554	589	599	2or4	PP	44	61
11VBS880	D-880-Z11	2	880	189	158	554	589	599	4	PP	49	66
12VBS960	D-960-Z12	2	960	205	158	554	589	599	4	PP	52	72
13VBS1040	D-1040-Z13	2	1040	221	158	554	589	599	4	PP	57	79
14VBS1120	D-1120-Z14	2	1120	237	158	554	589	599	4	PP	62	86
15VBS1200	D-1200-Z15	2	1200	253	158	554	589	599	4	PP	67.5	93
2VBS180	D-180-Z2	2	180	45	158	615	650	660	2	PP	10	14
3VBS270	D-270-Z3	2	270	61	158	615	650	660	2	PP	14	18
4VBS360	D-360-Z4	2	360	77	158	615	650	660	2	PP	18	23.5
5VBS450	D-450-Z5	2	450	93	158	615	650	660	2	PP	24	30
6VBS540	D-540-Z6	2	540	109	158	615	650	660	2or4	PP	28	36
7VBS630	D-630-Z7	2	630	125	158	615	650	660	2or4	PP	42	42
8VBS720	D-720-Z8	2	720	141	158	615	650	660	2or4	PP	36	48
9VBS810	D-810-Z9	2	810	157	158	615	650	660	2or4	PP	40	54
10VBS900	D-900-Z10	2	900	173	158	615	650	660	2or4	PP	44	61
11VBS990	D-990-Z11	2	990	189	158	615	650	660	4	PP	48	67
12VBS1080	D-1080-Z12	2	1080	205	158	615	650	660	4	PP	52	73
13VBS1170	D-1170-Z13	2	1170	221	158	615	650	660	4	PP	57	79
,14VBS1260	D-1260-Z14	2	1260	237	158	615	650	660	4	PP	62	86
15VBS1350	D-1350-Z15	2	1350	253	158	615	650	660	4	PP	64	93

BS 158 Series Specification

Model	INTL Model	Rated Voltage	5 Hr Rated Capacity	Max.Overall Dimenison(mm)					Pole Qty	Case Material	Reference weight(kg)	
		(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
2VBS200	D-200-Z2	2	200	45	158	690	725	735	2	PP	10.5	13
3VBS300	D-300-Z3	2	300	61	158	690	725	735	2	PP	13	18
4VBS400	D-400-Z4	2	400	77	158	690	725	735	2	PP	16.5	21
5VBS500	D-500-Z5	2	500	93	158	690	725	735	2	PP	20	28
6VBS600	D-600-Z6	2	600	109	158	690	725	735	2or4	PP	23	33
7VBS700	D-700-Z7	2	700	125	158	690	725	735	2or4	PP	26	38
8VBS800	D-800-Z8	2	800	141	158	690	725	735	2or4	PP	30	42
9VBS900	D-900-Z9	2	900	157	158	690	725	735	2or4	PP	33	47
10VBS1000	D-1000-Z10	2	1000	173	158	690	725	735	2or4	PP	37	52
11VBS1100	D-1100-Z11	2	1100	189	158	690	725	735	4	PP	40	57
12VBS1200	D-1200-Z12	2	1200	205	158	690	725	735	4	PP	44	62
13VBS1300	D-1300-Z13	2	1300	221	158	690	725	735	4	PP	48	67
14VBS1400	D-1400-Z14	2	1400	237	158	690	725	735	4	PP	52	72
15VBS1500	D-1500-Z15	2	1500	253	158	690	725	735	4	PP	56	78







GB Series Specification

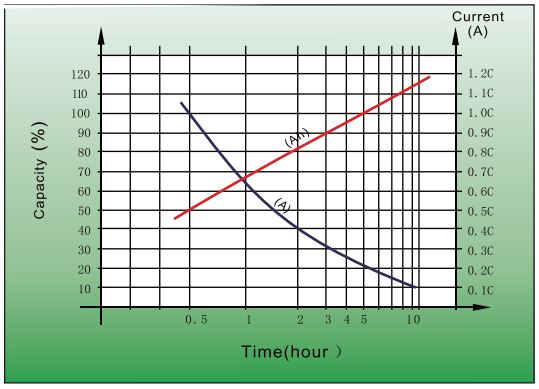
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	(V)	(Ah)	Length	Width	Height	Welding Height	Bolted Height	(PCS)		Dry	Wet
D-250	2	250	138	210	290	325	335	2	PP	11.5	210
D-250B	2	250	137	181	290	325	335	2	PP	11.5	16
D-308	2	308	137	181	405	440	450	2or4	PP	12	17
D-330	2	330	137	181	405	440	450	2or4	PP	13.5	18
D-330B	2	330	137	181	344	379	389	2or4	PP	13.5	18
D-395	2	395	137	181	405	440	450	2or4	PP	16	22
D-400	2	400	146	159	385	420	430	2or4	PP	16	22
D-440	2	440	146	159	405	440	450	2or4	PP	17.6	25
D-480	2	480	146	159	431	466	476	2or4	PP	19.2	27
D-440B	2	440	174	180	405	440	450	4	PP	18	24.5
D-515	2	515	174	180	405	440	450	4	PP	21	28.5
D-560	2	560	173	158	455	490	500	2or4	PP	23	31
D-580	2	580	173	158	455	490	500	2or4	PP	25	33
D-620	2	620	173	158	455	490	500	2or4	PP	26	34



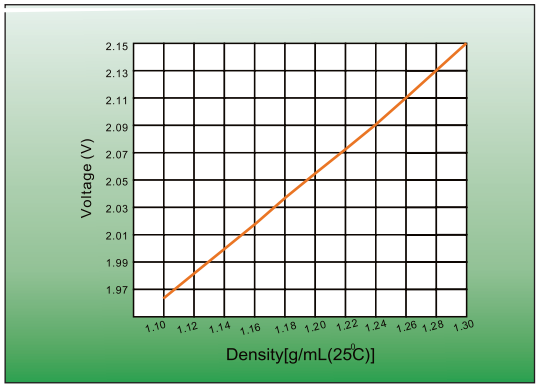


Performance Characteristics

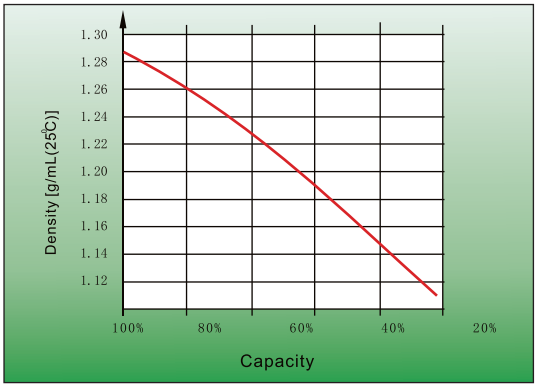
Discharge Characteristics



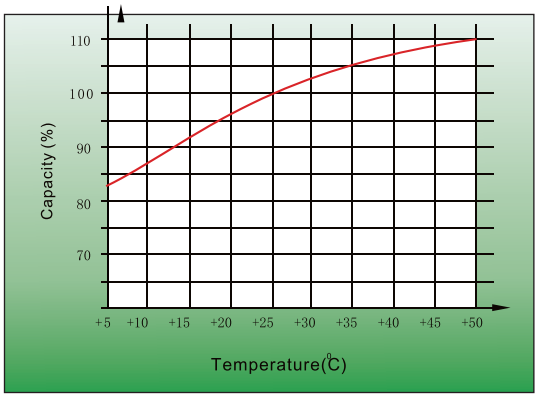
Density Effects in Relation to Voltage



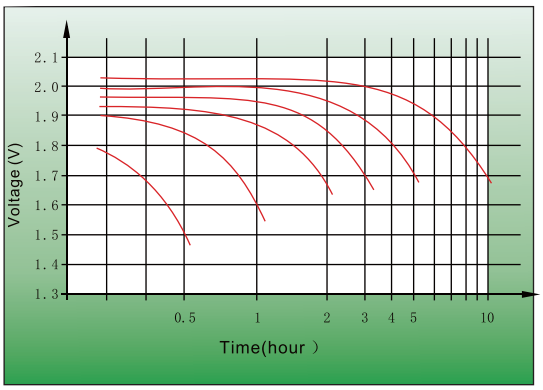
Density Effects in Relation to Capacity



Temperature Effects in Relation to Battery Capacity



Discharge Characteristics



Cycle Life in Relation to Depth of Discharge

