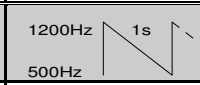
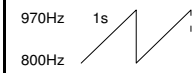
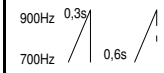
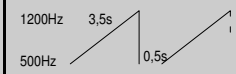
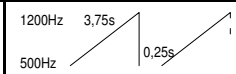
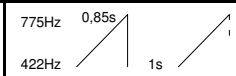
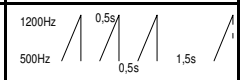
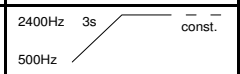
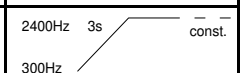
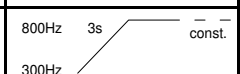
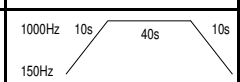
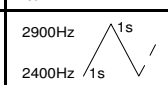
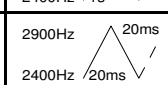
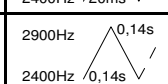
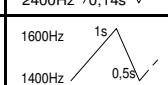
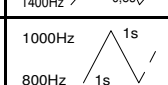
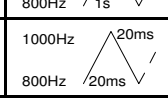
Pfannenberg
ELEKTROTECHNIK FÜR DIE INDUSTRIE

Pfannenberg GmbH
Werner-Witt-Str. 1
D-21035 Hamburg
Telefon 0049 (0)40/ 7 34 12 - 0
Internet http:\\www.pfannenberg.com

PA 1 / PATROL-Serie

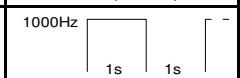
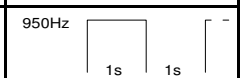
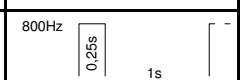
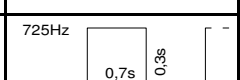
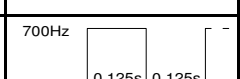
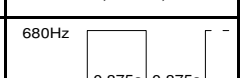
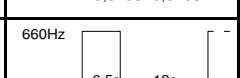
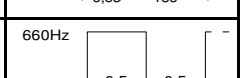
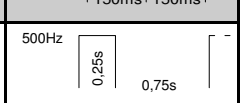
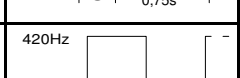
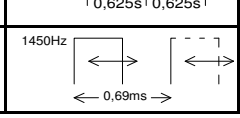
Schalldruckpegel und Stromaufnahme Schallgeber PA 1 DC /
sound pressure level and current drain of PA 1 DC-Sounders:

Grund-Ton-Nr. (♪)	Beschreibung / Description		12V DC*	24V DC	48V DC	SPL (max.) +/- 3dB
1	Silence		I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
2	Saw tooth, Germany DIN 33404-3 (emergency signal), PFEER PAPA		15,3	38	42	106,15
9	Slow whoop, fire alarm, UK BS5839-1		16	38	42	106,77
11	Whoop (fast)		13,8	40	46	103,27
13	Whoop		8	23,5	27,4	99,57
15	Slow whoop, evacuation, Netherlands NEN 2575		13	35	40	106,87
16	Slow whoop, evacuation Australia AS2220		13,6	36	43	106,67
18	Slow whoop, NFPA		11,2	30	35	103,27
22	Whoop, Australia AS1670, ISO8201		9,1	24	28	104,77
23	Siren		9,74	29	29	108,17
24	Siren		13,7	30	35	106,27
25	Siren		13,63	36	39	103,97
26	Industrial alarm (Germany)		12,6	28	33	106,87
27	Sweeping		11,2	32,6	37,1	103,37
29	Sweeping (fast)		11	31,3	37,3	101,07
30	Sweeping		11	32	37,5	101,76
31	Sweeping, France NF C 48-265		12,9	32	37	94,13
33	Sweeping, UK BS5839-1 (medium sweep)		13,1	34,4	40,1	106,67
34	Sweeping (fast)		14	33,7	38,9	103,67

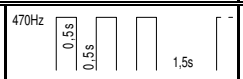
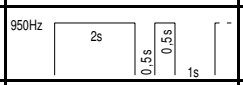
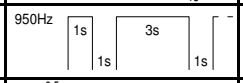
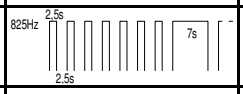
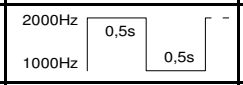
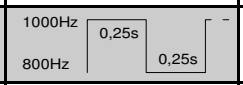
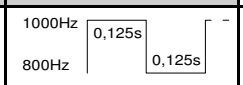
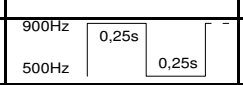
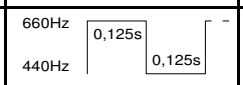
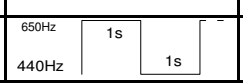
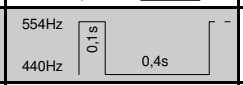
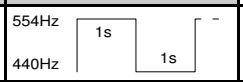
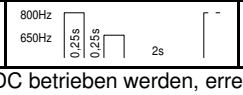
*Schallgeber, die mit weniger als 18V DC betrieben werden, erreichen nicht den, in der Tabelle angegebenen, Schallpegel!
*Devices which were biased with less than 18V DC will not reach the stated sound pressure level.
☐Töne nach EN54-3 / *Tone according to EN54-3*

Grund-Ton-Nr. (♪)	Beschreibung / Description		12V DC*	24V DC	48V DC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
35	Sweeping, UK BS5839-1 (fast sweep)	1000Hz 800Hz 0,14s 0,14s	14	34,7	40,3	104,17
36	Sweeping	1500Hz 700Hz 3s 3s	13	35	40	105,86
43	Sweeping	1200Hz 500Hz 3s 3s	13,5	36	41	106,07
44	Sweeping, IMO 3d, Germany KTA3901 evacuation	1200Hz 500Hz 2s 2s	13,8	37	43	105,67
45	Sweeping	1200Hz 500Hz 6s 6s	13,3	35	40	106,57
46	Sweeping, Finland General Alarm	1500Hz 500Hz 14s 14s	15	39	42,5	106,77
52	Continuous	2400Hz	9,4	25,5	30,3	103,67
53	Continuous	2000Hz	11,6	26,7	29,9	108,29
54	Continuous, Finland All Clear	1500Hz	13,5	31	37	93,68
55	Continuous	1200Hz	11,8	34	39	101,07
56	Continuous, PFEER (Gasalarm)	1000Hz	12,3	29	34	106,77
57	Continuous, UK BS5839-1	950Hz	13,5	32,2	37,1	106,57
59	Continuous	880Hz	15,4	43	46	100,97
60	Continuous	825Hz	14,9	43	49	98,27
61	Continuous	800Hz	14	35	41	99,57
63	Continuous	725Hz	12,6	34,6	41,8	98,87
65	Continuous, Sweden SS031711 (All Clear)	660Hz	15,64	38	43	104,57
66	Continuous	554Hz	16,33	43	50	98,67
67	Continuous, Germany KTA3901 (All Clear)	500Hz	16,8	49,1	57,3	101,17
68	Continuous	470Hz	17,8	52,5	61	102,17
69	Continuous	440Hz	18,8	52	61	97,87

*Schallgeber, die mit weniger als 18V DC betrieben werden, erreichen nicht den, in der Tabelle angegebenen, Schallpegel!
*Devices which were biased with less than 18V DC will not reach the stated sound pressure level.
Töne nach EN54-3 / *Tone according to EN54-3*

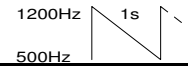
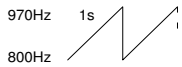
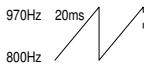
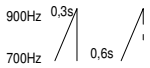
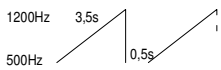
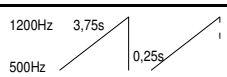
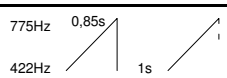
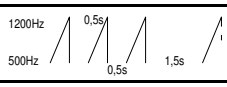
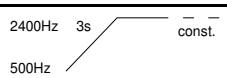
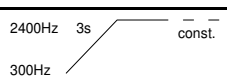
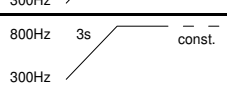
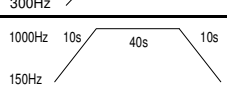
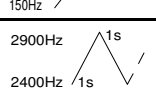
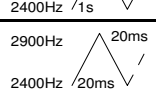
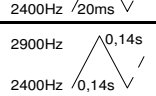
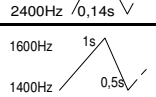
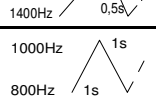
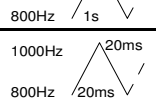
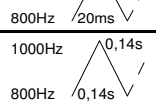
Grund-Ton-Nr. (♪)	Beschreibung / Description		12V DC*	24V DC	48V DC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
71	Continuous		22	63	76	95,97
77	Intermittent		7	17,5	21,7	103,07
82	Intermittent, PFEER (General Alarm), UK BS5839-1 (Back-up Alarm)		8,6	20	25	106,27
83	Intermittent, PFEER (General Alarm)		9,2	23	26	106,67
88	Intermittent		8,9	20,1	24	106,17
90	Intermittent		9,5	25	30	97,67
91	Intermittent		10	29	34	97,87
92	Intermittent		6	16,3	19,5	96,77
93	Intermittent (fast), electromechanical horn		9,6	28	34	97,17
97	Intermittent		11,2	29	34	98,57
98	Intermittent, Sweden SS 031711 (Imminent Danger)		10	26,3	30,4	98,27
100	Intermittent, Industrial Alarm (Germany)		10,5	26	28	102,37
101	Intermittent, Sweden SS031711 (Important Message (Pre Mess))		16	22	25	103,17
102	Intermittent, Sweden SS031711 (Local Warning)		10,5	26,7	32,1	103,27
103	Intermittent, Sweden SS031711 (Air Raid)		12	23	30	103,57
104	Intermittent, Sweden SS031711 (Imminent Danger)		9,5	24,5	28,5	98,17
107	Intermittent, Germany KTA3901 (evacuation)		9	26	30,4	100,17
109	Intermittent, Australia AS2220,AS1610, AS1670		13,3	37	44,3	96,27
110	Intermittent (fast variable), Bell		21,9	57,9	66,3	93,17

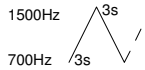
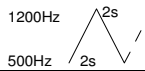
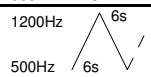
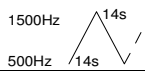
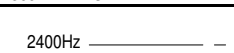
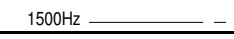
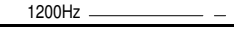
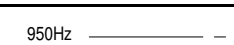
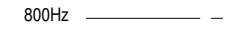
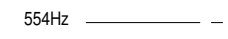
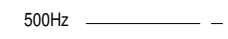
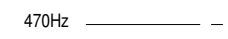
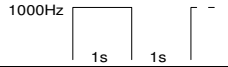
*Schallgeber, die mit weniger als 18V DC betrieben werden, erreichen nicht den, in der Tabelle angegebenen, Schallpegel!
*Devices which were biased with less than 18V DC will not reach the stated sound pressure level.
Töne nach EN54-3 / *Tone according to EN54-3*

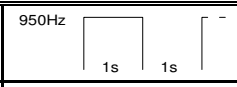
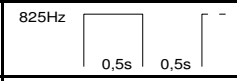
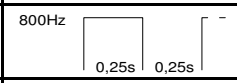
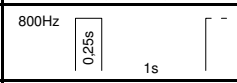
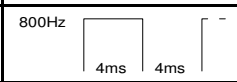
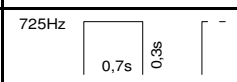
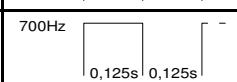
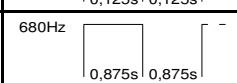
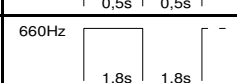
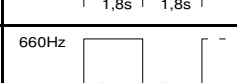
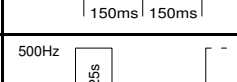
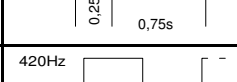
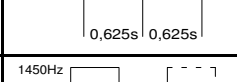
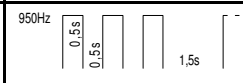
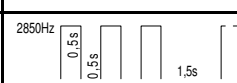
Grund-Ton-Nr. (♪)	Beschreibung / Description		12V DC*	24V DC	48V DC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
111	Intermittent, ISO8201 (emergency evacuation signal), USA (evacuation)		11,6	33,5	37,5	101,27
112	Intermittent, ISO8201 (emergency evacuation signal)		9	19	23	106,07
113	Intermittent, ISO8201 (emergency evacuation signal) treble tone		9	18	19	94,57
115	Intermittent, IMO (Telefon Call)		10,5	23	29	106,77
116	Intermittent, IMO (abandon ship)		10	24	28	106,57
117	Intermittent, IMO SOLAS III/50 + SOLAS III/6.4 (General Alarm)		10	32	36	97,97
122	Alternating		11	27,3	32,1	103,07
123	Alternating		11,8	29	34	101,97
124	Alternating, Singapore		11,9	26	32	106,57
125	Alternating		13	32,1	37,4	98,17
128	Alternating		13,5	37,1	42,8	104,27
130	Alternating, UK BS5839-1(Fire Alarm)		13,3	35	40	105,37
131	Alternating, UK BS5839-1(Fire Alarm, Level crossing)		13,3	35	40	106,73
135	Alternating, UK BS5839-1 (Fire Alarm, increased urgency – Level crossing)		13,3	35	40	105,17
142	Alternating		16,8	41	48	100,87
143	Alternating, Germany Industrial Alarm		17,2	44	52	102,97
144	Alternating		17,5	44	55	104,57
146	Alternating, France NFS 32-001 (fire alarm)		18,4	49	58	98,37
147	Alternating, Sweden SS031711 (turn out)		17,2	49,4	58,1	98,27
148	Alternating, Sweden SS031711 (turn out)		17,6	47	55	98,37
152	Alternating-intermittent		5,8	17	21	103,67

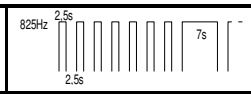
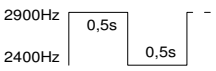
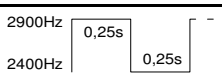
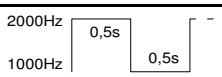
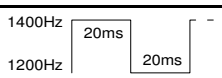
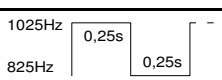
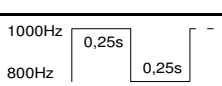
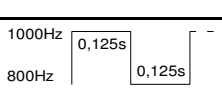
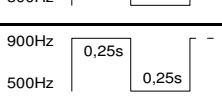
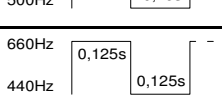
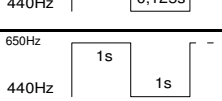
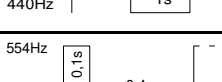
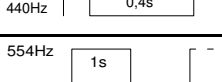
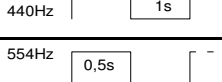
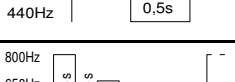
*Schallgeber, die mit weniger als 18V DC betrieben werden, erreichen nicht den, in der Tabelle angegebenen, Schallpegel!
*Devices which were biased with less than 18V DC will not reach the stated sound pressure level.
Töne nach EN54-3 / *Tone according to EN54-3*

Schalldruckpegel und Stromaufnahme Schallgeber PA 1 AC /
sound pressure level and current drain of PA 1 AC-Sounders:

Grund-Ton-Nr. (♪)	Beschreibung / Description		115V AC	230V AC	24V AC	SPL (max.) +/- 3dB
1	Silence		I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
2	Saw tooth, Germany DIN 33404-3 (emergency signal), PFEER PAPA		18-30	9-12	97,6	105,87
9	Slow whoop, fire alarm, UK BS5839-1		18-30	9-12	99,2	107,62
11	Whoop (fast)		18-30	9-12	103	104,12
13	Whoop		18-30	9-12	72,5	100,43
15	Slow whoop, evacuation, Netherlands NEN 2575		18-30	9-12	59,6	107,7
16	Slow whoop, evacuation Australia AS2220		18-30	9-12	94,9	107,5
18	Slow whoop, NFPA		18-30	9-12	78	104,1
22	Whoop, Australia AS1670, ISO8201		18-30	9-12	70,7	105,6
23	Siren		18-30	9-12	95,4	109
24	Siren		18-30	9-12	97,5	107,1
25	Siren		18-30	9-12	101,5	104,8
26	Industrial alarm (Germany)		18-30	9-12	100	107,7
27	Sweeping		18-30	9-12	102,2	104,2
29	Sweeping (fast)		18-30	9-12	100,5	101,9
30	Sweeping		18-30	9-12	101,7	102,5
31	Sweeping, France NF C 48-265		18-30	9-12	99,6	96,8
33	Sweeping, UK BS5839-1 (medium sweep)		18-30	9-12	102,9	107,5
34	Sweeping (fast)		18-30	9-12	102,2	104,5
35	Sweeping, UK BS5839-1 (fast sweep)		18-30	9-12	102,7	105

Grund-Ton-Nr. (♪)	Beschreibung / Description		115V AC	230V AC	24V AC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
36	Sweeping		18-30	9-12	100,8	106,6
43	Sweeping		18-30	9-12	101,6	106,9
44	Sweeping, IMO 3d, Germany KTA3901 evacuation		18-30	9-12	102,2	106,5
45	Sweeping		18-30	9-12	102,6	107,4
46	Sweeping, Finland General Alarm		18-30	9-12	105,8	107,6
52	Continuous		18-30	9-12	89,8	104,5
53	Continuous		18-30	9-12	91,5	108
54	Continuous, Finland All Clear		18-30	9-12	99,1	95,1
55	Continuous		18-30	9-12	101,2	101,9
56	Continuous, PFEER (Gasalarm)		18-30	9-12	93,6	107,6
57	Continuous, UK BS5839-1		18-30	9-12	98	107,4
59	Continuous		18-30	9-12	105,2	101,8
60	Continuous		18-30	9-12	107,7	99,1
61	Continuous		18-30	9-12	101,6	100,4
63	Continuous		18-30	9-12	94,3	99,7
65	Continuous, Sweden SS031711 (All Clear)		18-30	9-12	105,3	105,4
66	Continuous		18-30	9-12	108,4	99,5
67	Continuous, Germany KTA3901 (All Clear)		18-30	9-12	111,2	102
68	Continuous		18-30	9-12	113,9	103
69	Continuous		18-30	9-12	115,3	98,7
71	Continuous		18-30	9-12	120	96,8
77	Intermittent		18-30	9-12	72,5	103,9
82	Intermittent, PFEER (General Alarm), UK BS5839-1 (Back-up Alarm)		18-30	9-12	75,1	107,1
83	Intermittent, PFEER (General Alarm)		18-30	9-12	76,3	107,5

Grund-Ton-Nr. (♪)	Beschreibung / Description		115V AC	230V AC	24V AC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
88	Intermittent		18-30	9-12	76,3	107
90	Intermittent		18-30	9-12	79,5	98,5
91	Intermittent		18-30	9-12	84,1	98,7
92	Intermittent		18-30	9-12	62,8	97,6
93	Intermittent (fast), electromechanical horn		18-30	9-12	83,7	98
97	Intermittent		18-30	9-12	89,1	99,4
98	Intermittent, Sweden SS 031711 (Imminent Danger)		18-30	9-12	78,2	99,1
100	Intermittent, Industrial Alarm (Germany)		18-30	9-12	82	103,2
101	Intermittent, Sweden SS031711 (Important Message (Pre Mess))		18-30	9-12	106,6	104
102	Intermittent, Sweden SS031711 (Local Warning)		18-30	9-12	85,1	104,1
103	Intermittent, Sweden SS031711 (Air Raid)		18-30	9-12	84	104,4
104	Intermittent, Sweden SS031711 (Imminent Danger)		18-30	9-12	82	99
107	Intermittent, Germany KTA3901 (evacuation)		18-30	9-12	68,6	101,
109	Intermittent, Australia AS2220,AS1610, AS1670		18-30	9-12	88,2	97,1
110	Intermittent (fast variable), Bell		18-30	9-12	128	94
111	Intermittent, ISO8201 (emergency evacuation signal), USA (evacuation)		18-30	9-12	80,5	102,1
112	Intermittent, ISO8201 (emergency evacuation signal)		18-30	9-12	73	106,9
113	Intermittent, ISO8201 (emergency evacuation signal) treble tone		18-30	9-12	74	95,4
115	Intermittent, IMO (Telefon Call)		18-30	9-12	82,2	107,6
116	Intermittent, IMO (abandon ship)		18-30	9-12	82,4	107,4

Grund-Ton-Nr. (♪)	Beschreibung / Description		115V AC	230V AC	24V AC	SPL (max.) +/- 3dB
			I rms/mA	I rms/mA	I rms/mA	dB(A) 1m
117	Intermittent, IMO SOLAS III/50 + SOLAS III/6.4 (General Alarm)		18-30	9-12	85,7	98,8
122	Alternating		18-30	9-12	95	103,9
123	Alternating		18-30	9-12	100,4	102,8
124	Alternating, Singapore		18-30	9-12	93,9	107,4
125	Alternating		18-30	9-12	99,8	99
128	Alternating		18-30	9-12	101,7	105,1
130	Alternating, UK BS5839-1(Fire Alarm)		18-30	9-12	101,7	106,2
131	Alternating, UK BS5839-1(Fire Alarm, Level crossing)		18-30	9-12	101,3	106,6
135	Alternating, UK BS5839-1 (Fire Alarm, increased urgency – Level crossing)		18-30	9-12	100,7	106
142	Alternating		18-30	9-12	109,6	101,7
143	Alternating, Germany Industrial Alarm		18-30	9-12	111,5	103,8
144	Alternating		18-30	9-12	113,4	105,4
146	Alternating, France NFS 32-001 (fire alarm)		18-30	9-12	115,4	99,2
147	Alternating, Sweden SS031711 (turn out)		18-30	9-12	86,4	99,1
148	Alternating, Sweden SS031711 (turn out)		18-30	9-12	112,8	99,2
152	Alternating-intermittent		18-30	9-12	64,8	104,5