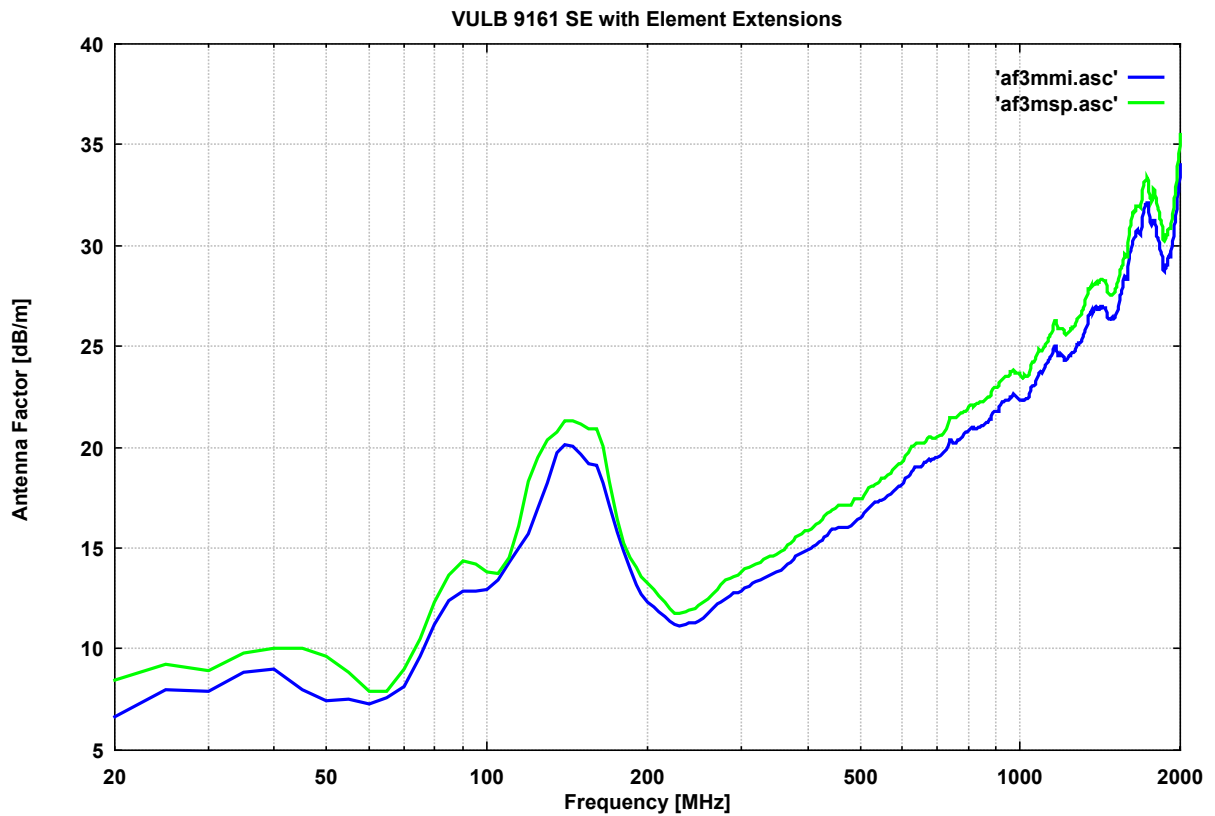
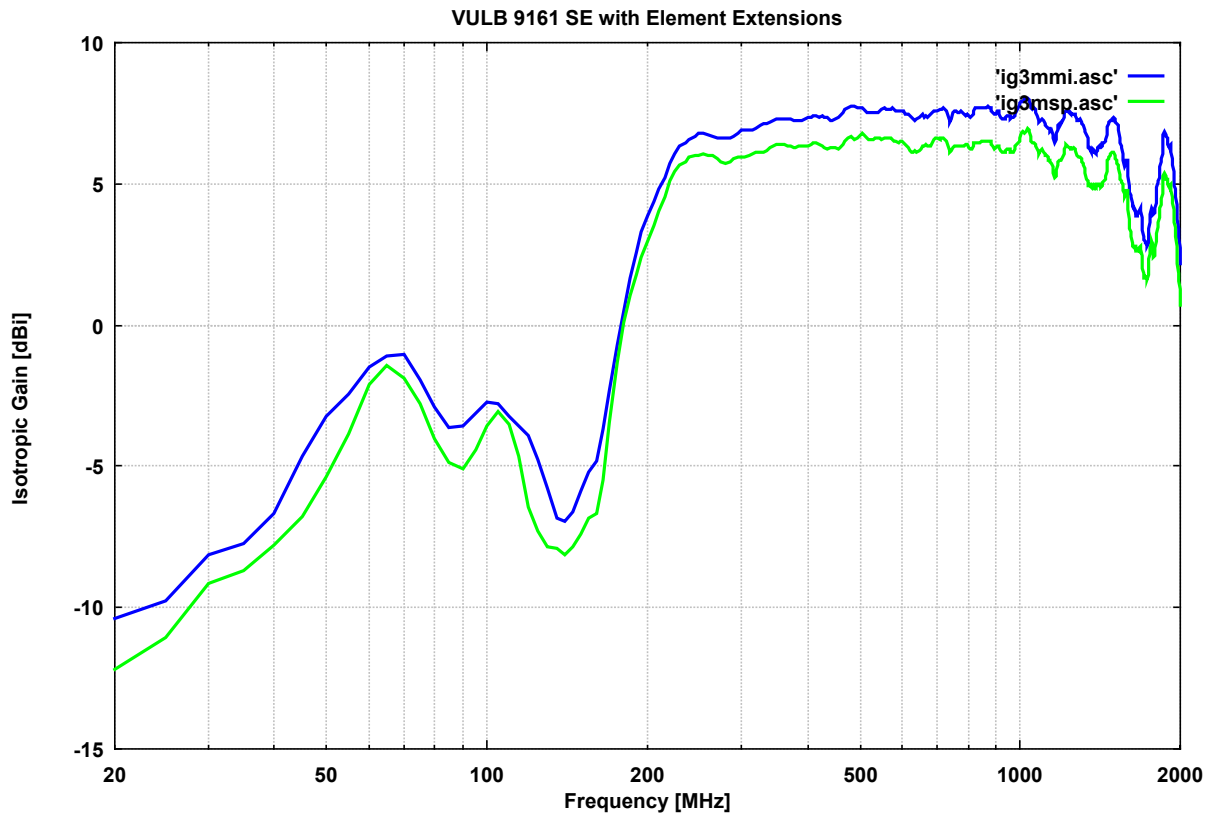


# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions



# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
20.00	-10.40	6.64	-12.20	8.44
25.00	-9.76	7.94	-11.05	9.23
30.00	-8.13	7.89	-9.16	8.92
35.00	-7.74	8.84	-8.72	9.82
40.00	-6.70	8.96	-7.79	10.05
45.00	-4.65	7.93	-6.78	10.06
50.00	-3.22	7.42	-5.41	9.61
55.00	-2.44	7.47	-3.84	8.87
60.00	-1.50	7.28	-2.09	7.87
65.00	-1.08	7.56	-1.45	7.93
70.00	-1.02	8.14	-1.85	8.97
75.00	-1.92	9.64	-2.80	10.52
80.00	-2.88	11.16	-4.04	12.32
85.00	-3.61	12.42	-4.86	13.67
90.00	-3.59	12.89	-5.07	14.37
95.00	-3.09	12.86	-4.43	14.20
100.00	-2.75	12.97	-3.59	13.81
105.00	-2.81	13.45	-3.06	13.70
110.00	-3.25	14.30	-3.50	14.55
115.00	-3.58	15.01	-4.64	16.07
120.00	-3.93	15.73	-6.47	18.27
125.00	-4.79	16.95	-7.31	19.47
130.00	-5.75	18.25	-7.87	20.37
135.00	-6.87	19.70	-7.93	20.76
140.00	-6.96	20.10	-8.16	21.30
145.00	-6.60	20.05	-7.89	21.34
150.00	-5.90	19.64	-7.40	21.14
155.00	-5.18	19.21	-6.86	20.89
160.00	-4.81	19.11	-6.66	20.96
165.00	-3.68	18.25	-5.48	20.05
170.00	-2.33	17.16	-3.44	18.27
175.00	-0.71	15.79	-1.30	16.38
180.00	0.49	14.84	0.10	15.23
185.00	1.64	13.92	1.04	14.52
190.00	2.58	13.22	1.78	14.02
195.00	3.34	12.68	2.43	13.59
200.00	3.89	12.35	2.97	13.27
205.00	4.39	12.07	3.55	12.91
210.00	4.83	11.83	4.07	12.59
215.00	5.22	11.65	4.58	12.29
220.00	5.70	11.37	5.09	11.98
225.00	6.08	11.18	5.46	11.80
230.00	6.33	11.12	5.67	11.78
235.00	6.44	11.20	5.77	11.87
240.00	6.56	11.26	5.94	11.88
245.00	6.69	11.31	6.00	12.00
250.00	6.78	11.40	6.04	12.14
255.00	6.79	11.56	6.07	12.28
260.00	6.72	11.80	6.04	12.48
265.00	6.67	12.01	5.99	12.69

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
270.00	6.65	12.20	5.88	12.97
275.00	6.65	12.36	5.78	13.23
280.00	6.65	12.51	5.74	13.42
285.00	6.65	12.67	5.79	13.53
290.00	6.70	12.77	5.89	13.58
295.00	6.81	12.81	5.94	13.68
300.00	6.89	12.87	5.97	13.79
305.00	6.91	13.00	5.97	13.94
310.00	6.92	13.13	6.00	14.05
315.00	6.92	13.27	6.06	14.13
320.00	6.99	13.33	6.13	14.19
325.00	7.06	13.40	6.14	14.32
330.00	7.13	13.46	6.12	14.47
335.00	7.17	13.55	6.17	14.55
340.00	7.21	13.64	6.27	14.58
345.00	7.27	13.71	6.37	14.61
350.00	7.31	13.79	6.41	14.69
355.00	7.31	13.91	6.39	14.83
360.00	7.32	14.03	6.40	14.95
365.00	7.29	14.18	6.32	15.15
370.00	7.29	14.29	6.32	15.26
375.00	7.23	14.47	6.27	15.43
380.00	7.24	14.58	6.30	15.52
385.00	7.26	14.67	6.33	15.60
390.00	7.28	14.76	6.34	15.70
395.00	7.29	14.86	6.32	15.83
400.00	7.34	14.92	6.36	15.90
405.00	7.38	14.99	6.41	15.96
410.00	7.41	15.07	6.45	16.03
415.00	7.40	15.18	6.43	16.15
420.00	7.38	15.30	6.38	16.30
425.00	7.40	15.39	6.33	16.46
430.00	7.37	15.52	6.28	16.61
435.00	7.34	15.65	6.26	16.73
440.00	7.27	15.82	6.27	16.82
445.00	7.26	15.93	6.28	16.91
450.00	7.29	15.99	6.27	17.01
455.00	7.35	16.03	6.24	17.14
460.00	7.42	16.06	6.31	17.17
465.00	7.51	16.06	6.40	17.17
470.00	7.63	16.03	6.55	17.11
475.00	7.71	16.04	6.66	17.09
480.00	7.77	16.07	6.67	17.17
485.00	7.77	16.16	6.64	17.29
490.00	7.75	16.27	6.59	17.43
495.00	7.73	16.38	6.65	17.46
500.00	7.72	16.48	6.73	17.47
505.00	7.69	16.60	6.80	17.49
510.00	7.63	16.74	6.74	17.63

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
515.00	7.55	16.91	6.63	17.83
520.00	7.53	17.01	6.56	17.98
525.00	7.51	17.11	6.56	18.06
530.00	7.53	17.18	6.60	18.11
535.00	7.51	17.28	6.63	18.16
540.00	7.54	17.33	6.62	18.25
545.00	7.59	17.36	6.62	18.33
550.00	7.63	17.40	6.60	18.43
555.00	7.67	17.44	6.62	18.49
560.00	7.64	17.54	6.62	18.56
565.00	7.65	17.61	6.63	18.63
570.00	7.66	17.68	6.62	18.72
575.00	7.69	17.72	6.57	18.84
580.00	7.66	17.83	6.54	18.95
585.00	7.61	17.95	6.51	19.05
590.00	7.59	18.05	6.49	19.15
595.00	7.62	18.09	6.51	19.20
600.00	7.59	18.19	6.52	19.26
605.00	7.60	18.26	6.48	19.38
610.00	7.50	18.43	6.38	19.55
615.00	7.46	18.54	6.27	19.73
620.00	7.42	18.65	6.16	19.91
625.00	7.36	18.78	6.13	20.01
630.00	7.31	18.90	6.15	20.06
635.00	7.25	19.03	6.18	20.10
640.00	7.29	19.05	6.15	20.19
645.00	7.37	19.04	6.17	20.24
650.00	7.41	19.07	6.23	20.25
655.00	7.45	19.09	6.35	20.19
660.00	7.38	19.23	6.37	20.24
665.00	7.41	19.27	6.40	20.28
670.00	7.38	19.36	6.32	20.42
675.00	7.42	19.39	6.32	20.49
680.00	7.49	19.38	6.35	20.52
685.00	7.55	19.38	6.48	20.45
690.00	7.60	19.40	6.58	20.42
695.00	7.61	19.45	6.64	20.42
700.00	7.60	19.52	6.63	20.49
705.00	7.63	19.55	6.60	20.58
710.00	7.63	19.62	6.63	20.62
715.00	7.66	19.65	6.66	20.65
720.00	7.67	19.70	6.65	20.72
725.00	7.57	19.86	6.51	20.92
730.00	7.41	20.08	6.32	21.17
735.00	7.24	20.31	6.16	21.39
740.00	7.22	20.38	6.13	21.47
745.00	7.33	20.33	6.20	21.46
750.00	7.54	20.18	6.29	21.43
755.00	7.61	20.17	6.34	21.44

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
760.00	7.59	20.25	6.35	21.49
765.00	7.53	20.36	6.34	21.55
770.00	7.55	20.40	6.34	21.61
775.00	7.57	20.44	6.33	21.68
780.00	7.51	20.55	6.34	21.72
785.00	7.46	20.66	6.35	21.77
790.00	7.42	20.75	6.39	21.78
795.00	7.45	20.78	6.38	21.85
800.00	7.41	20.87	6.29	21.99
805.00	7.39	20.95	6.26	22.08
810.00	7.40	20.99	6.26	22.13
815.00	7.48	20.96	6.37	22.07
820.00	7.58	20.92	6.45	22.05
825.00	7.67	20.88	6.49	22.06
830.00	7.68	20.92	6.45	22.15
835.00	7.69	20.96	6.46	22.19
840.00	7.70	21.01	6.45	22.26
845.00	7.72	21.04	6.51	22.25
850.00	7.73	21.08	6.53	22.28
855.00	7.72	21.14	6.55	22.31
860.00	7.73	21.18	6.54	22.37
865.00	7.72	21.24	6.52	22.44
870.00	7.74	21.27	6.55	22.46
875.00	7.71	21.35	6.54	22.52
880.00	7.70	21.41	6.55	22.56
885.00	7.61	21.55	6.41	22.75
890.00	7.51	21.70	6.32	22.89
895.00	7.45	21.81	6.26	23.00
900.00	7.50	21.80	6.30	23.00
905.00	7.58	21.77	6.37	22.98
910.00	7.57	21.83	6.33	23.07
915.00	7.46	21.99	6.27	23.18
920.00	7.39	22.11	6.19	23.31
925.00	7.32	22.22	6.15	23.39
930.00	7.33	22.26	6.14	23.45
935.00	7.32	22.32	6.15	23.49
940.00	7.38	22.30	6.19	23.49
945.00	7.41	22.32	6.23	23.50
950.00	7.41	22.36	6.22	23.55
955.00	7.41	22.41	6.21	23.61
960.00	7.33	22.54	6.14	23.73
965.00	7.37	22.54	6.13	23.78
970.00	7.34	22.62	6.12	23.84
975.00	7.44	22.56	6.22	23.78
980.00	7.49	22.55	6.32	23.72
985.00	7.59	22.50	6.39	23.70
990.00	7.72	22.41	6.45	23.68
995.00	7.81	22.37	6.51	23.67
1000.00	7.90	22.32	6.64	23.58

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
1005.00	7.91	22.35	6.78	23.48
1010.00	7.95	22.36	6.83	23.48
1015.00	7.97	22.38	6.82	23.53
1020.00	8.04	22.35	6.81	23.58
1025.00	8.04	22.39	6.87	23.56
1030.00	8.06	22.42	6.95	23.53
1035.00	8.01	22.51	6.93	23.59
1040.00	7.94	22.62	6.84	23.72
1045.00	7.79	22.81	6.67	23.93
1050.00	7.72	22.92	6.55	24.09
1055.00	7.64	23.05	6.49	24.20
1060.00	7.68	23.05	6.46	24.27
1065.00	7.63	23.14	6.41	24.36
1070.00	7.54	23.27	6.32	24.49
1075.00	7.40	23.45	6.23	24.62
1080.00	7.26	23.63	6.11	24.78
1085.00	7.22	23.71	6.09	24.84
1090.00	7.23	23.74	6.17	24.80
1095.00	7.30	23.71	6.24	24.77
1100.00	7.33	23.72	6.26	24.79
1105.00	7.25	23.84	6.14	24.95
1110.00	7.16	23.97	6.08	25.05
1115.00	7.08	24.09	6.02	25.15
1120.00	7.04	24.16	6.01	25.19
1125.00	7.00	24.24	5.94	25.30
1130.00	6.95	24.33	5.87	25.41
1135.00	6.94	24.38	5.82	25.50
1140.00	6.88	24.48	5.80	25.56
1145.00	6.89	24.51	5.74	25.66
1150.00	6.77	24.66	5.62	25.81
1155.00	6.64	24.83	5.39	26.08
1160.00	6.48	25.03	5.22	26.29
1165.00	6.56	24.99	5.27	26.28
1170.00	6.78	24.80	5.49	26.09
1175.00	6.93	24.69	5.65	25.97
1180.00	7.10	24.56	5.79	25.87
1185.00	7.14	24.55	5.83	25.86
1190.00	7.21	24.52	5.85	25.88
1195.00	7.17	24.60	5.87	25.90
1200.00	7.28	24.52	5.95	25.85
1205.00	7.34	24.50	6.05	25.79
1210.00	7.53	24.35	6.21	25.67
1215.00	7.58	24.33	6.32	25.59
1220.00	7.62	24.33	6.38	25.57
1225.00	7.57	24.41	6.34	25.64
1230.00	7.51	24.51	6.30	25.72
1235.00	7.53	24.52	6.29	25.76
1240.00	7.50	24.59	6.27	25.82
1245.00	7.51	24.61	6.22	25.90

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
1250.00	7.47	24.69	6.26	25.90
1255.00	7.50	24.69	6.24	25.95
1260.00	7.49	24.74	6.28	25.95
1265.00	7.48	24.78	6.23	26.03
1270.00	7.41	24.89	6.17	26.13
1275.00	7.31	25.02	6.04	26.29
1280.00	7.26	25.10	6.01	26.35
1285.00	7.25	25.15	5.94	26.46
1290.00	7.27	25.16	5.97	26.46
1295.00	7.29	25.18	5.94	26.53
1300.00	7.22	25.28	5.90	26.60
1305.00	7.17	25.36	5.80	26.73
1310.00	7.09	25.48	5.73	26.84
1315.00	7.05	25.55	5.68	26.92
1320.00	6.91	25.72	5.54	27.09
1325.00	6.85	25.81	5.38	27.28
1330.00	6.73	25.97	5.19	27.51
1335.00	6.62	26.11	5.10	27.63
1340.00	6.44	26.32	4.98	27.78
1345.00	6.27	26.52	4.94	27.85
1350.00	6.23	26.60	4.96	27.87
1355.00	6.13	26.73	4.87	27.99
1360.00	6.21	26.68	4.92	27.97
1365.00	6.17	26.75	4.88	28.04
1370.00	6.25	26.70	4.96	27.99
1375.00	6.17	26.82	4.89	28.10
1380.00	6.13	26.89	4.93	28.09
1385.00	6.06	26.99	4.90	28.15
1390.00	6.12	26.96	4.98	28.10
1395.00	6.19	26.92	5.00	28.11
1400.00	6.28	26.86	5.00	28.14
1405.00	6.32	26.85	4.97	28.20
1410.00	6.30	26.90	4.93	28.27
1415.00	6.31	26.93	4.94	28.30
1420.00	6.27	27.00	4.91	28.36
1425.00	6.32	26.98	4.95	28.35
1430.00	6.43	26.90	5.03	28.30
1435.00	6.49	26.87	5.10	28.26
1440.00	6.52	26.87	5.14	28.25
1445.00	6.59	26.83	5.26	28.16
1450.00	6.77	26.68	5.45	28.00
1455.00	6.92	26.56	5.70	27.78
1460.00	7.04	26.47	5.82	27.69
1465.00	7.14	26.40	5.92	27.62
1470.00	7.20	26.37	5.94	27.63
1475.00	7.24	26.36	6.02	27.58
1480.00	7.24	26.39	6.08	27.55
1485.00	7.24	26.41	6.13	27.52
1490.00	7.30	26.38	6.12	27.56

# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
1495.00	7.34	26.37	6.10	27.61
1500.00	7.29	26.45	6.03	27.71
1505.00	7.22	26.55	5.93	27.84
1510.00	7.15	26.65	5.84	27.96
1515.00	7.16	26.67	5.77	28.06
1520.00	7.15	26.71	5.75	28.11
1525.00	7.06	26.83	5.65	28.24
1530.00	6.91	27.00	5.57	28.34
1535.00	6.66	27.28	5.35	28.59
1540.00	6.45	27.52	5.18	28.79
1545.00	6.36	27.64	5.11	28.89
1550.00	6.29	27.74	5.06	28.97
1555.00	6.09	27.96	5.00	29.05
1560.00	5.83	28.25	4.79	29.29
1565.00	5.64	28.47	4.64	29.47
1570.00	5.61	28.53	4.57	29.57
1575.00	5.73	28.44	4.67	29.50
1580.00	5.84	28.35	4.77	29.42
1585.00	5.86	28.36	4.77	29.45
1590.00	5.66	28.59	4.53	29.72
1595.00	5.30	28.98	4.10	30.18
1600.00	4.95	29.35	3.73	30.57
1605.00	4.70	29.63	3.44	30.89
1610.00	4.60	29.76	3.31	31.05
1615.00	4.52	29.86	3.15	31.23
1620.00	4.34	30.07	2.90	31.51
1625.00	4.20	30.24	2.79	31.65
1630.00	4.10	30.36	2.74	31.72
1635.00	4.12	30.37	2.83	31.66
1640.00	4.05	30.47	2.80	31.72
1645.00	3.98	30.56	2.71	31.83
1650.00	3.87	30.70	2.62	31.95
1655.00	3.85	30.75	2.62	31.98
1660.00	3.90	30.72	2.66	31.96
1665.00	3.97	30.68	2.65	32.00
1670.00	4.05	30.62	2.69	31.98
1675.00	4.06	30.64	2.73	31.97
1680.00	4.16	30.57	2.82	31.91
1685.00	4.03	30.72	2.71	32.04
1690.00	3.81	30.97	2.46	32.32
1695.00	3.38	31.42	2.02	32.78
1700.00	3.16	31.67	1.82	33.01
1705.00	3.00	31.85	1.69	33.16
1710.00	2.95	31.93	1.67	33.21
1715.00	2.88	32.03	1.71	33.20
1720.00	2.87	32.06	1.68	33.25
1725.00	2.84	32.12	1.68	33.28
1730.00	2.82	32.16	1.62	33.36
1735.00	2.92	32.09	1.81	33.20



# SCHWARZBECK MESS - ELEKTRONIK

An der Klinge 29 D-69250 Schönau Tel.: 06228/1001 Fax.: (49)6228/1003

## TRILOG Breitband-Antenne VULB 9161 SE mit Elementverlängerung TRILOG Broadband Antenna VULB 9161 SE with Element Extensions

Frequency	Isotropic gain 3 m Center	Antenna factor 3 m Center	Isotropic gain 3 m Tip	Antenna factor 3 m Tip
Frequenz	Isotropgewinn 3 m Mitte	Antennen- wandlungsmaß 3 m Mitte	Isotropgewinn 3 m Spitze	Antennen- wandlungsmaß 3 m Spitze
[MHz]	[dBi]	[dB/m]	[dBi]	[dB/m]
1740.00	3.15	31.88	2.09	32.94
1745.00	3.40	31.66	2.36	32.70
1750.00	3.66	31.42	2.53	32.55
1755.00	3.96	31.15	2.75	32.36
1760.00	4.13	31.00	2.88	32.25
1765.00	4.13	31.02	2.95	32.20
1770.00	4.03	31.15	2.78	32.40
1775.00	3.94	31.26	2.52	32.68
1780.00	3.95	31.28	2.39	32.84
1785.00	3.97	31.28	2.47	32.78
1790.00	4.14	31.14	2.76	32.52
1795.00	4.32	30.98	2.97	32.33
1800.00	4.63	30.70	3.15	32.18
1805.00	4.86	30.49	3.26	32.09
1810.00	5.03	30.34	3.47	31.90
1815.00	5.11	30.29	3.62	31.78
1820.00	5.24	30.18	3.79	31.63
1825.00	5.41	30.04	3.91	31.54
1830.00	5.62	29.85	4.14	31.33
1835.00	5.79	29.70	4.25	31.24
1840.00	5.92	29.60	4.46	31.06
1845.00	6.09	29.45	4.64	30.90
1850.00	6.43	29.13	4.99	30.57
1855.00	6.75	28.84	5.26	30.33
1860.00	6.88	28.73	5.40	30.21
1865.00	6.83	28.80	5.40	30.23
1870.00	6.74	28.92	5.27	30.39
1875.00	6.69	28.99	5.21	30.47
1880.00	6.68	29.02	5.17	30.53
1885.00	6.64	29.09	5.18	30.55
1890.00	6.55	29.20	5.11	30.64
1895.00	6.40	29.37	5.00	30.77
1900.00	6.31	29.49	4.90	30.90
1905.00	6.36	29.46	4.95	30.87
1910.00	6.42	29.42	4.99	30.85
1915.00	6.39	29.47	4.96	30.90
1920.00	6.14	29.75	4.77	31.12
1925.00	5.92	29.99	4.57	31.34
1930.00	5.66	30.27	4.33	31.60
1935.00	5.46	30.49	4.09	31.86
1940.00	5.14	30.84	3.82	32.16
1945.00	4.95	31.05	3.64	32.36
1950.00	4.82	31.20	3.48	32.54