Approved by OMB
3060–0678

APPLICATION FOR EARTH STATION SPECIAL TEMPORARY AUTHORITY

APPLICANT INFORMATIONEnter a description of this application to identify it on the main menu:
Request to extend STA for additional 30 days (Dutch Harbor, AK)

1. Applicant

Name:	CapRock Communications, Inc.	**Phone Number:**	832–668–2751
DBA Name:		**Fax Number:**	832–668–2780
Street:	4400 S. Sam Houston Parkway Ea	**E–Mail:**	esands@cprk.com
City:	Houston	**State:**	TX
Country:	USA	**Zipcode:**	77048 –
Attention:	Ms. EllenAnn Sands		

GRANTED
International Bureau

File # SES-STA-20070919-01295
Call Sign _____ Grant Date 10/2/07
(or other identifier)
Term Dates
From 10/2/07 To: 10/31/07
Approved: Jeanette D. Spriggs

2. Contact

Name:	Raul Magallanes	**Phone Number:**	281 317 1397
Company:	The Law Office of Raul Magallanes, PLLC	**Fax Number:**	281 271–8085
Street:	PO Box 1213	E–Mail:	info@rmtelecomlaw.com
City:	Houston	**State:**	TX
Country:	USA	**Zipcode:**	77549 –
Attention:	Raul Magallanes	**Relationship:**	Legal Counsel

(If your application is related to an application filed with the Commission, enter either the file number or the IB Submission ID of the related application. Please enter only one.)
3. Reference File Number SESSTA2007081701103 or Submission ID

4a. Is a fee submitted with this application?
◉ If Yes, complete and attach FCC Form 159. If No, indicate reason for fee exemption (see 47 C.F.R.Section 1.1114).
○ Governmental Entity ○ Noncommercial educational licensee
○ Other(please explain):

4b. Fee Classification CGX – Fixed Satellite Transmit/Receive Earth Station

5. Type Request

○ Use Prior to Grant ○ Change Station Location ◉ Other

6. Requested Use Prior Date 09/23/2007	

7. CityDutch Harbor	8. Latitude (dd mm ss.s h) 53 53 36.0 N
9. State AK	10. Longitude (dd mm ss.s h) 166 33 24.0 W

11. Please supply any need attachments.

Attachment 1: Cover Letter Attachment 2: Antenna Patterns Attachment 3:

12. Description. (If the complete description does not appear in this box, please go to the end of the form to view it in its entirety.)

Request to extend STA for additional 30 days (Dutch Harbor, AK)

13. By checking Yes, the undersigned certifies that neither applicant nor any other party to the application is subject to a denial of Federal benefits that includes FCC benefits pursuant to Section 5301 of the Anti–Drug Act of 1988, 21 U.S.C. Section 862, because of a conviction for possession or distribution of a controlled substance. See 47 CFR 1.2002(b) for the meaning of "party to the application" for these purposes. (●) Yes ( ) No

14. Name of Person Signing Alan Aronowitz	15. Title of Person Signing VP & General Counsel

WILLFUL FALSE STATEMENTS MADE ON THIS FORM ARE PUNISHABLE BY FINE AND / OR IMPRISONMENT (U.S. Code, Title 18, Section 1001), AND/OR REVOCATION OF ANY STATION AUTHORIZATION (U.S. Code, Title 47, Section 312(a)(1)), AND/OR FORFEITURE (U.S. Code, Title 47, Section 503).

FCC NOTICE REQUIRED BY THE PAPERWORK REDUCTION ACT

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THE FOREGOING NOTICE IS REQUIRED BY THE PAPERWORK REDUCTION ACT OF 1995, PUBLIC LAW 104–13, OCTOBER 1, 1995, 44 U.S.C. SECTION 3507.

Power Density Comparison at 2 degrees from main beam for proposed Earth Station and FCC Max.
Antenna Gain Listed for Seatel 9797 is worst case of RHCP Co-Pol and LHCP Co-Pol Patterns.

SEATEL 9797	5.845 GHz	6.135 GHz	6.425 GHz
Antenna Gain (dBi) at 2 deg	21.2	21.18	17.67
Pwr Density (dBW/4kHz)	-16.7	-16.7	-16.7
Total (dBW/4kHz)	4.5	4.48	0.97

FCC Maximum Allowable	**29-25log(2) - 2.7**		
Antenna Gain (dBi) at 2 deg	21.47	21.47	21.47
Pwr Density (dBW/4kHz)	-2.7	-2.7	-2.7
Total (dBW/4kHz)	18.77	18.77	18.77

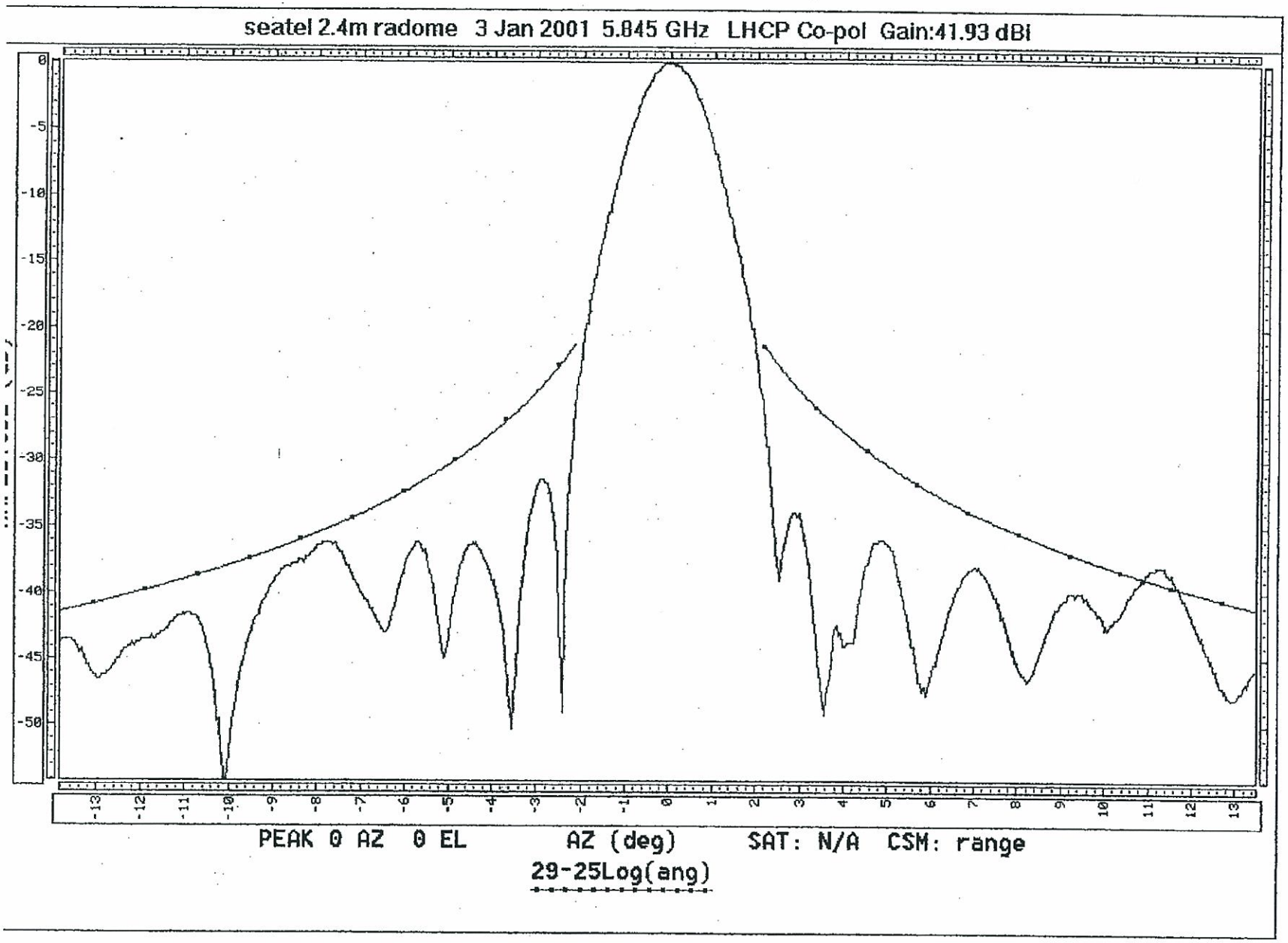
seatel 2.4m radome 3 Jan 2001 5.845 GHz LHCP Co-pol Gain:41.93 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 14

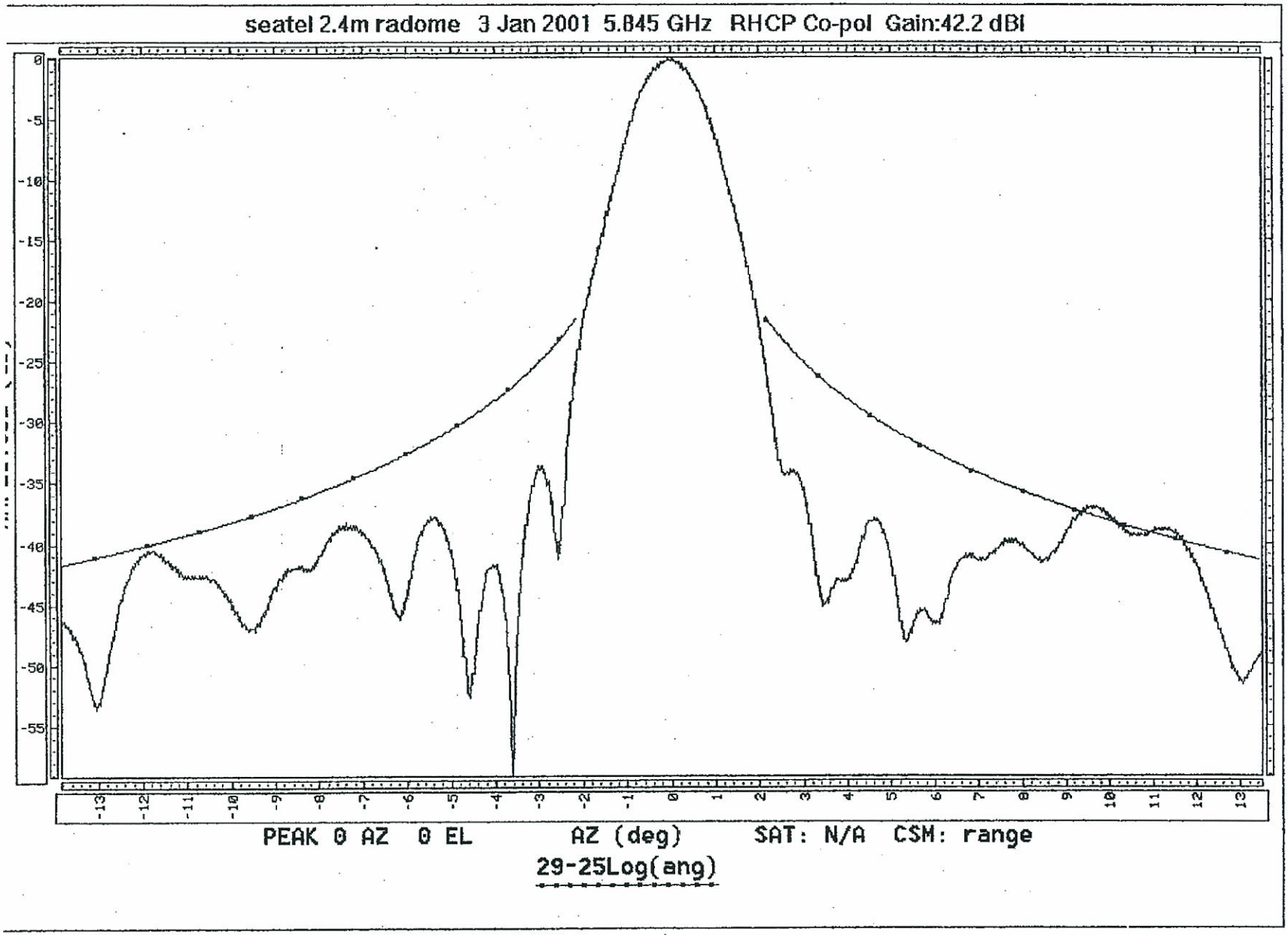
seatel 2.4m radome 3 Jan 2001 5.845 GHz RHCP Co-pol Gain:42.2 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-55
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 16

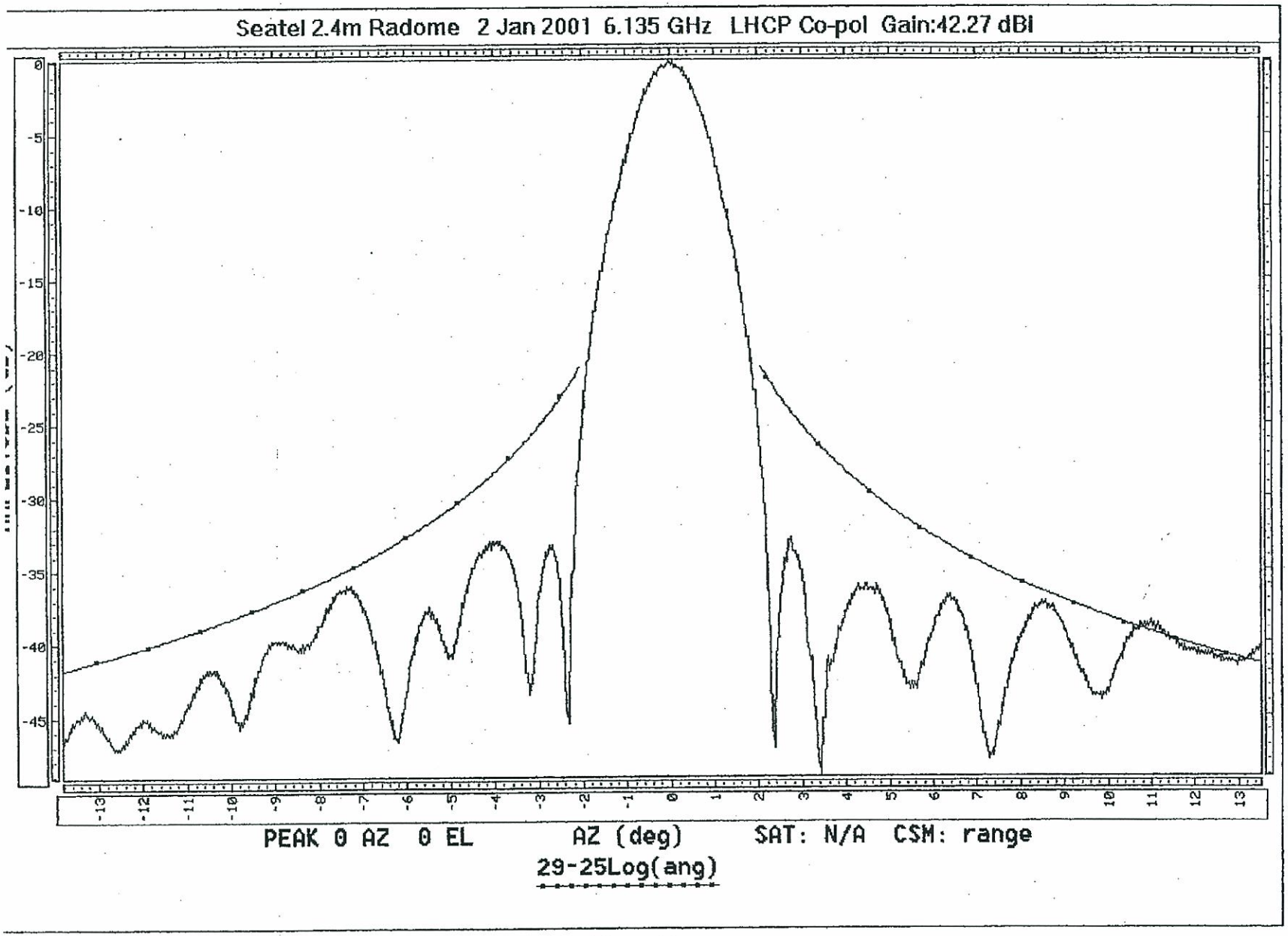
Seatel 2.4m Radome 2 Jan 2001 6.135 GHz LHCP Co-pol Gain:42.27 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 18

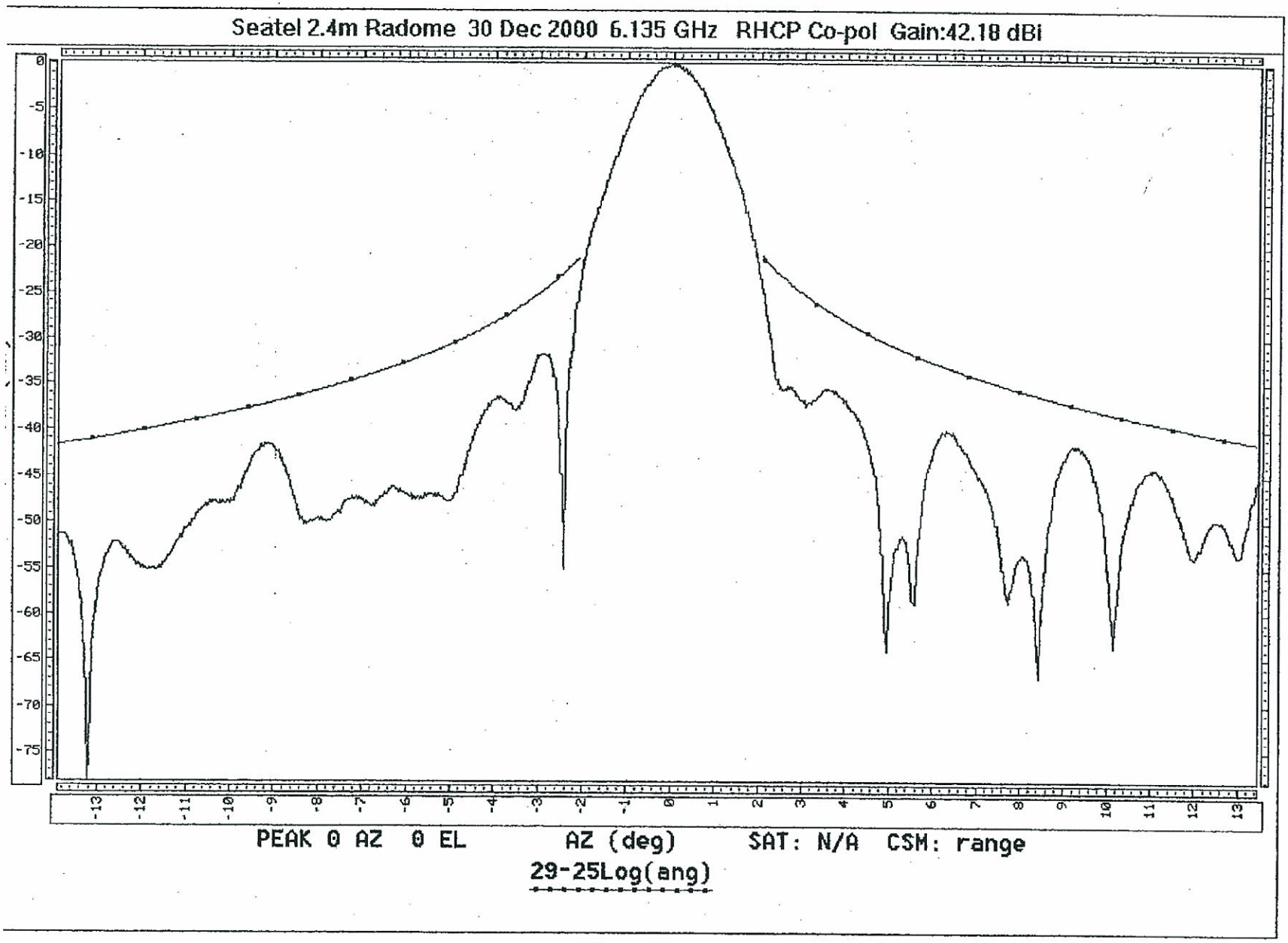
Seatel 2.4m Radome 30 Dec 2000 6.135 GHz RHCP Co-pol Gain:42.18 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-55
-60
-65
-70
-75
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 20

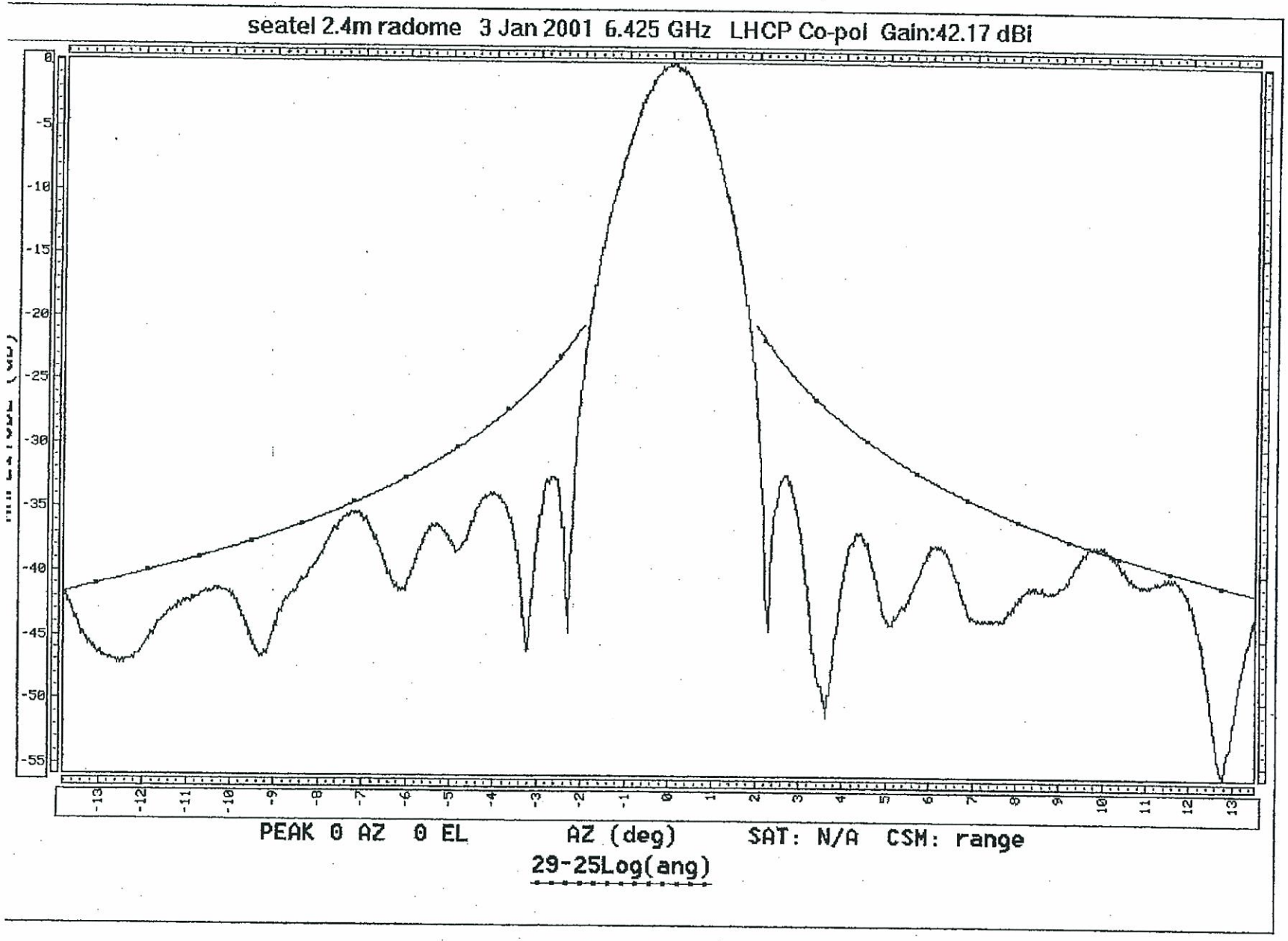
seatel 2.4m radome 3 Jan 2001 6.425 GHz LHCP Co-pol Gain:42.17 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-55
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 20

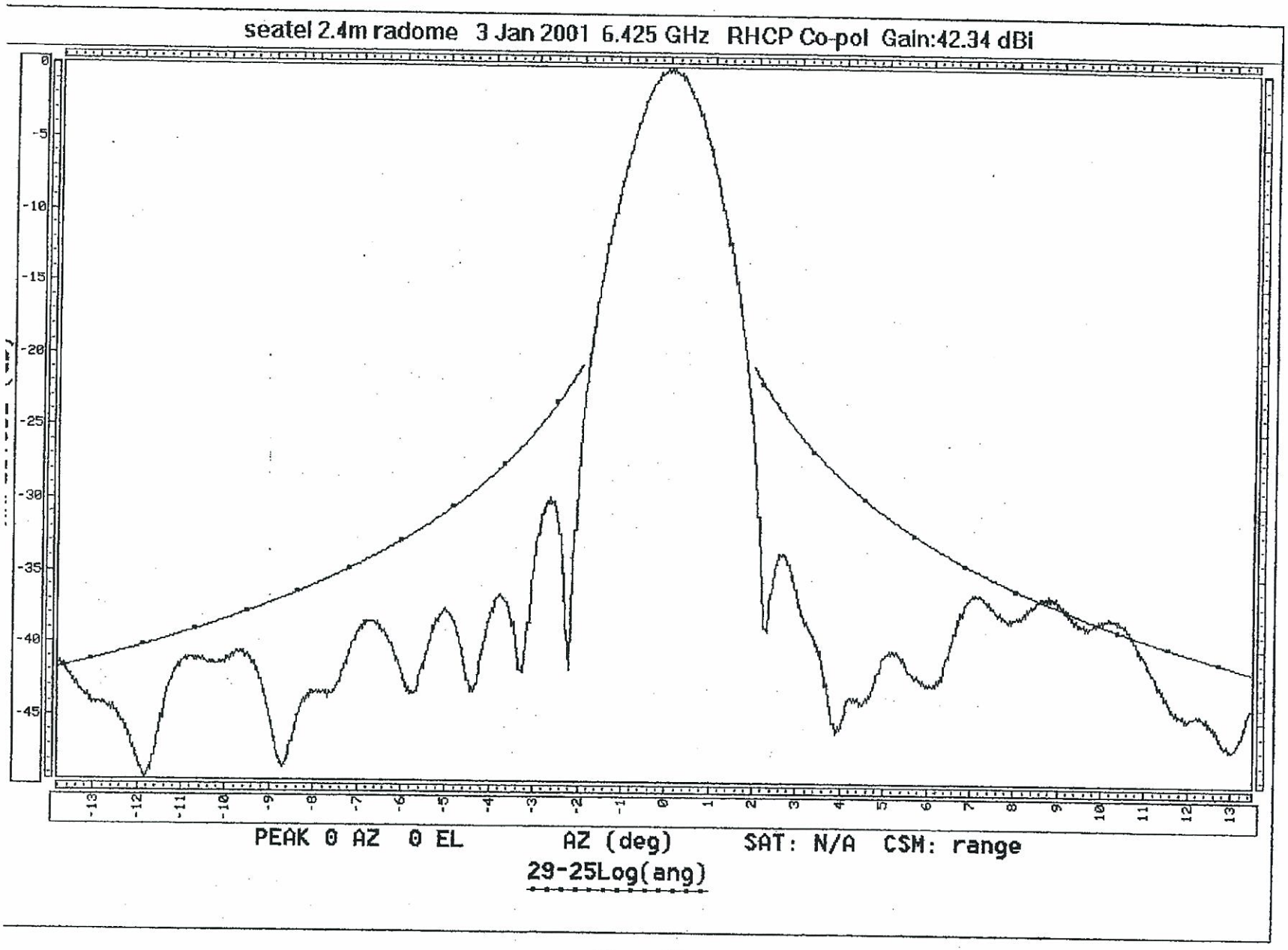
seatel 2.4m radome 3 Jan 2001 6.425 GHz RHCP Co-pol Gain:42.34 dBi
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 13
PEAK 0 AZ 0 EL
AZ (deg)
SAT: N/A CSM: range
29-25Log(ang)

Figure 24

TELECOMMUNICATIONS LAW
The Law Office of
Raúl Magallanes

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www.rmtelecomlaw.com

September 20, 2007

Scott Kotler, Chief
System Analysis Branch
Satellite Division
International Bureau
Federal Communications Commission
445 12th Street SW
Washington, DC 20554

Re: Request for Special Temporary Authority

Dear Mr. Kotler:

Pursuant to Section 25.120(a) of the Rules and Regulations ("Regulations") of the Federal Communications Commission ("Commission"), CapRock Communications, Inc. ("CapRock"), by way of the underlying application submitted by the undersigned, seeks Commission consideration to extend an existing Special Temporary Authority ("STA") for an additional 30 days. The existing STA is designated with file SES-STA-20070817-01103.

Pursuant to Section 25.120(a) of the Regulations, in "circumstances requiring … temporary use of facilities, request may be made for special temporary authority to install and/or operate new or modified equipment." In addition, according to Section 25.120(b)(4) of the Regulations, the Commission may grant temporary authorization for a period not to exceed 30 days, if the STA request has not been placed on public notice, and an application for regular authority is not contemplated.

In the instance case, the STA extension request has not been placed on public notice and CapRock does not plan to file an application for regular authority. The proposed antenna is being used to support a temporary communications system for a short-term oil drilling operation. An STA under these conditions is contemplated by the Regulations due to "circumstances requiring … temporary use of facilities." An application for regular authority is not submitted because it would be inefficient for the Commission to process an application for permanent authorization for a short-term project. Therefore, CapRock respectfully requests an STA for a period not to exceed 30 days.

In addition, because of the nature of the project, CapRock believes that the granting of this STA is in the public interest and that delay in the institution of these temporary operations would seriously prejudice the public interest. The Antenna is located in a remote

area of Alaska and it is the only means of communication for the applicant. In order to insure continued service, the requested STA date is September 23, 2007. In accordance to Section 25.120(a) of the Regulations, this STA is being filed at least 3 working days prior to the date of proposed operation.

The antenna at issue is a C-band Seatel 9797 ("Antenna"). This Antenna exceeds the envelope limits of Section 25.209 of the Regulations by approximately 2dB in the 9° to 12° region measured along the Azimuth axis (see attached antenna patterns). However, pursuant to Section 25.220 (b-c), of the Regulations, an applicant may request the Commission to consider a non-compliant antenna if it can be shown that the operational power density will be below the limit of –2.7dBW/4KHz in the 5925-6425 MHz frequency range, measured at the feed flange. Specifically, the earth station operator must provide the power and power density levels that result by reducing the –2.7dBW/4KHz power spectral density value by the number of decibels that the non-compliant antenna fails to meet the standards of Section 25.209 of the Regulations.

The Antenna exhibits a maximum power density at the flange of –12.78 dBW/4KHz which is 10.08 dB below the maximum allowed of -2.7dBW/4KHz. Applying the methodology in Section 25.220 (b-c), the maximum EIRP density at Antenna flange is increased by 2dB to yield –12.78dBW/4KHz + 2.0dB = -10.78dBW/4KHz. As calculated, this figure is still below the allowed maximum EIRP density at the Antenna flange of -2.7dBW/4KHz by a margin of 8.08dB. Exhibit A is included as a showing of off-axis spectral density along the Azimuth plane.

Sincerely,

/s/ *Raul Magallanes*

Attorney

Exhibit A
Spectral Density Calculation

PROJECT PARAMETERS:		
Antenna Manufacturer:	SeaTel	9797
Antenna Model:	2.4	m
Transmit:	5.93	GHz
Antenna Gain (Main Beam):	41.70	dBi
Max EIRP Density at Flange:	-12.78	dBW/4KHz
EIRP Density (§25.212(d) Limit):	-2.70	dBW/4KHz

§25.209(a) CONFORMING ANTENNA			ACTUAL ANTENNA		
Angle (Degrees)	§25.209 Gain (dBi)	EIRP Density (dBW/4KHz)	Actual Gain (dBi)	EIRP Density (dBW/4KHz)	EIRP Margin (dBW/4KHz)
1.00	29.00	26.30	36.70	23.92	-2.38
1.10	27.97	25.27	35.70	22.92	-2.35
1.20	27.02	24.32	34.70	21.92	-2.40
1.25	26.58	23.88	34.20	21.42	-2.46
1.30	26.15	23.45	33.70	20.92	-2.54
1.40	25.35	22.65	32.65	19.87	-2.78
1.50	24.60	21.90	31.60	18.82	-3.08
1.60	23.90	21.20	30.55	17.77	-3.43
1.70	23.24	20.54	29.50	16.72	-3.82
1.80	22.62	19.92	26.23	13.45	-6.47
1.90	22.03	19.33	22.97	10.18	-9.15
2.00	21.47	18.77	19.70	6.92	-11.86
2.10	20.94	18.24	18.17	5.38	-12.86
2.20	20.44	17.74	16.63	3.85	-13.89
2.30	19.96	17.26	15.10	2.32	-14.94
2.40	19.49	16.79	14.98	2.19	-14.60
2.50	19.05	16.35	14.85	2.07	-14.29
2.60	18.63	15.93	14.73	1.94	-13.99
2.70	18.22	15.52	14.60	1.82	-13.70
2.80	17.82	15.12	12.63	-0.15	-15.27
2.90	17.44	14.74	10.67	-2.12	-16.86
3.00	17.07	14.37	8.70	-4.08	-18.46
3.33	15.94	13.24	7.70	-5.08	-18.32
3.67	14.88	12.18	10.70	-2.08	-14.27
4.00	13.95	11.25	10.20	-2.58	-13.83
4.33	13.09	10.39	3.70	-9.08	-19.47
4.67	12.27	9.57	7.20	-5.58	-15.15
5.00	11.53	8.83	10.00	-2.78	-11.61
5.33	10.83	8.13	11.40	-1.38	-9.52
5.67	10.16	7.46	9.70	-3.08	-10.54
6.00	8.00	5.30	3.70	-9.08	-14.38
7.00	8.00	5.30	7.70	-5.08	-10.38

Appendix A (cont.)
Spectral Density Calculation

PROJECT PARAMETERS:		
Antenna Manufacturer:	SeaTel	9797
Antenna Model:	2.4	m
Transmit:	6.18	GHz
Antenna Gain (Main Beam):	41.70	dBi
Max EIRP Density at Flange:	-12.78	dBW/4KHz
EIRP Density (§25.212(d) Limit):	-2.70	dBW/4KHz

§25.209(a) CONFORMING ANTENNA			ACTUAL ANTENNA		
Angle (Degrees)	§25.209 Gain (dBi)	EIRP Density (dBW/4KHz)	Actual Gain (dBi)	EIRP Density (dBW/4KHz)	EIRP Margin (dBW/4KHz)
1.00	29.00	26.30	38.00	25.22	-1.08
1.10	27.97	25.27	36.90	24.12	-1.15
1.20	27.02	24.32	35.80	23.02	-1.30
1.25	26.58	23.88	35.25	22.47	-1.41
1.30	26.15	23.45	34.70	21.92	-1.54
1.40	25.35	22.65	33.45	20.67	-1.98
1.50	24.60	21.90	32.20	19.42	-2.48
1.60	23.90	21.20	30.95	18.17	-3.03
1.70	23.24	20.54	29.70	16.92	-3.62
1.80	22.62	19.92	26.97	14.19	-5.73
1.90	22.03	19.33	24.23	11.45	-7.89
2.00	21.47	18.77	21.50	8.72	-10.06
2.10	20.94	18.24	20.37	7.59	-10.66
2.20	20.44	17.74	19.23	6.45	-11.29
2.30	19.96	17.26	18.10	5.32	-11.94
2.40	19.49	16.79	17.87	5.09	-11.71
2.50	19.05	16.35	17.65	4.87	-11.49
2.60	18.63	15.93	17.42	4.64	-11.29
2.70	18.22	15.52	17.20	4.42	-11.10
2.80	17.82	15.12	16.73	3.95	-11.18
2.90	17.44	14.74	16.27	3.49	-11.25
3.00	17.07	14.37	15.80	3.02	-11.36
3.33	15.94	13.24	14.70	1.92	-11.32
3.67	14.88	12.18	13.20	0.42	-11.77
4.00	13.95	11.25	12.10	-0.68	-11.93
4.33	13.09	10.39	11.10	-1.68	-12.07
4.67	12.27	9.57	10.20	-2.58	-12.15
5.00	11.53	8.83	9.40	-3.38	-12.21
5.33	10.83	8.13	8.70	-4.08	-12.22
5.67	10.16	7.46	8.30	-4.48	-11.94
6.00	8.00	5.30	7.70	-5.08	-10.38
7.00	8.00	5.30	5.00	-7.78	-13.08

Appendix A (cont.)
Spectral Density Calculation

PROJECT PARAMETERS:		
Antenna Manufacturer:	SeaTel	9797
Antenna Model:	2.4	m
Transmit:	6.43	GHz
Antenna Gain (Main Beam):	41.70	dBi
Max EIRP Density at Flange:	-12.78	dBW/4KHz
EIRP Density (§25.212(d) Limit):	-2.70	dBW/4KHz

§25.209(a) CONFORMING ANTENNA			ACTUAL ANTENNA		
Angle (Degrees)	§25.209 Gain (dBi)	EIRP Density (dBW/4KHz)	Actual Gain (dBi)	EIRP Density (dBW/4KHz)	EIRP Margin (dBW/4KHz)
1.00	29.00	26.30	37.50	24.72	-1.58
1.10	27.97	25.27	36.23	23.45	-1.82
1.20	27.02	24.32	34.97	22.19	-2.13
1.25	26.58	23.88	34.33	21.55	-2.33
1.30	26.15	23.45	33.70	20.92	-2.54
1.40	25.35	22.65	32.20	19.42	-3.23
1.50	24.60	21.90	30.70	17.92	-3.98
1.60	23.90	21.20	29.20	16.42	-4.78
1.70	23.24	20.54	27.70	14.92	-5.62
1.80	22.62	19.92	25.03	12.25	-7.67
1.90	22.03	19.33	22.37	9.59	-9.75
2.00	21.47	18.77	19.70	6.92	-11.86
2.10	20.94	18.24	18.97	6.19	-12.06
2.20	20.44	17.74	18.23	5.45	-12.29
2.30	19.96	17.26	17.50	4.72	-12.54
2.40	19.49	16.79	16.55	3.77	-13.03
2.50	19.05	16.35	15.60	2.82	-13.54
2.60	18.63	15.93	14.65	1.87	-14.06
2.70	18.22	15.52	13.70	0.92	-14.60
2.80	17.82	15.12	10.37	-2.41	-17.54
2.90	17.44	14.74	7.03	-5.75	-20.49
3.00	17.07	14.37	3.70	-9.08	-23.46
3.33	15.94	13.24	7.70	-5.08	-18.32
3.67	14.88	12.18	9.20	-3.58	-15.77
4.00	13.95	11.25	6.70	-6.08	-17.33
4.33	13.09	10.39	7.70	-5.08	-15.47
4.67	12.27	9.57	9.10	-3.68	-13.25
5.00	11.53	8.83	6.70	-6.08	-14.91
5.33	10.83	8.13	-2.30	-15.08	-23.22
5.67	10.16	7.46	1.70	-11.08	-18.54
6.00	8.00	5.30	4.00	-8.78	-14.08
7.00	8.00	5.30	-1.30	-14.08	-19.38