

**MINOR CHANGE APPLICATION/  
CUMULUS LICENSING LLC  
WFAS-FM RADIO STATION  
CH 280A - 103.9 MHZ - 0.98W  
BRONXVILLE, NEW YORK  
November 2007**

**EXHIBIT A**

**Grandfathered Shortspace Review (§73.213(a))**

This application seeks to relocate WFAS-FM, Channel 280A, Bronxville, New York, to an alternate site. As indicated on Exhibit A1, Channel 280A, at the licensed WFAS-FM site at Bronxville, New York, meets the Commission's minimum distance separation requirements to all other licensed, applied for, or proposed facilities pursuant to §73.207, with the exception of the following stations: WAXQ, Channel 282B, New York, New York; WKTU, Channel 278B, Lake Success, New York; WRCN-FM, Channel 280A, Riverhead, New York; WNNJ-FM, Channel 279B1, Newton, New Jersey; and WPHH, Channel 281B, Waterbury, Connecticut.

Channel 280A commenced operation in White Plains, New York prior to November 16, 1964. Additionally, the channels for each of the shortspaced stations, WAXQ, WKTU, WRCN-FM, WNNJ-FM and WPHH, are also pre-1964 assignments.<sup>1</sup> Based on the review, WFAS-FM is a pre-1964 grandfathered shortspaced station with respect to WAXQ, WKTU, WRCN-FM, WNNJ-FM and WPHH pursuant to §73.213(a) of the rules. As indicated in §73.213(a)(4), there

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1) According to data reviewed, WFAS-FM commenced operation in 1947; WAXQ in 1956; WKTU in 1940; WRCN-FM in 1962; although WPHH was authorized in a permit issued in 1965, it was identified in an Order adopted on December 3, 1964 (as a grandfathered station). Station WNNJ-FM was originally authorized on Channel 279B in 1961. WNNJ-FM was subsequently downgraded to Channel 279B1 in 1989 and remained shortspaced. WNNJ-FM relocated in 1994 and invoked §73.215, but remained shortspaced to WFAS-FM, as it did not protect WFAS-FM as a maximum 6.0 kilowatt Class A station. Therefore, §73.213(a) applies to each of these shortages.

is no minimum distance or interference protection requirements for second or third adjacent channels, which have remained continuously shortspaced since 1964. As such, neither WAXQ or WKTU are addressed further in this instant application.

The proposed WFAS-FM site will relocate the station 16.7 kilometers south-southwest of its licensed location. As such, the distances to the various grandfathered shortspaced stations will be changed. As indicated on Exhibit A2, from the proposed location, WFAS-FM will be moved farther away from WNNJ-FM, WRCN-FM and WPHH. In fact, the relocation of WFAS-FM to its proposed new site will completely eliminate the shortage to WPHH, thus complying with §73.207 with respect to WPHH. Thus, only a review of the impact of the relocation of WFAS-FM on WRCN-FM and WNNJ-FM is needed.

As indicated on Exhibit A3, the presently licensed WFAS-FM facility has an interfering contour that overlaps with the protected contour of WRCN-FM. The actual interference to WRCN-FM is based on a ratio of the protected and interfering contours, or depth of interference.<sup>2</sup> Based on depth of interference, WFAS-FM's licensed facility causes interference to 15,890 persons in 14.0 square kilometers. Exhibit A4 shows the depth of interference to WRCN-FM as a result of the proposed relocation. Based on the relocation, WFAS-FM will cause interference to 14,522 persons in 12.3 square kilometers. The actual interference to WRCN-FM from WFAS-FM will be reduced by 1,368 persons. A map showing the interference

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2) The depth of interference is determined by calculating the desired and undesired ratio of the protected and interfering contours relative to the channel relationship. A specific point of interference is then determined. Then the value of the protected contour is adjusted, with a corresponding adjustment to the interfering contour, to determine another point of interference. These points are then joined to establish the depth of interference.

areas (based on contour overlap) is shown on Exhibit A5. As indicated, there is an area to the northwest of WRCN-FM, which will no longer receive interference from WFAS-FM, and a corresponding smaller area to the southwest, which will receive some new interference (there is also a large area in common). The area which presently is not receiving interference from WFAS-FM is served by a minimum of five full time services and, as such, is considered adequately served, as indicated on Exhibit A6. A tabulation of the stations providing service to the interference area is attached as Exhibit A7.

As indicated on Exhibit A8, the presently licensed WRCN-FM facility has an interfering contour that overlaps with the protected contour of the licensed WFAS-FM. The actual interference to WFAS-FM is also based on a ratio of the protected and interfering contours, or depth of interference. Based on depth of interference, WFAS-FM's licensed facility receives interference from WRCN-FM which impacts 6,879 persons in 20.5 square kilometers. Exhibit A9 shows the depth of interference from WRCN-FM as a result of the proposed relocation of WFAS-FM. Based on the relocation, WRCN-FM will cause interference to 748 persons in 8.5 square kilometers. As such, the interference to WFAS-FM from WRCN-FM is reduced by 6,131 persons. Exhibit A10 is a map showing the interference areas (based on contour overlap). As indicated, there is an area to the northeast of WFAS-FM, which will no longer receive interference from WRCN-FM, and a corresponding smaller area to the east, which will receive some new interference (there is also a small area in common). The area which presently is not receiving interference from WRCN-FM is served by a minimum of five full-time services and, as



such, is considered adequately served, as indicated on Exhibit A11. A tabulation of the stations providing service to the interference area is attached as Exhibit A12.

As indicated on Exhibit A13, the presently licensed WFAS-FM facility has an interfering contour that overlaps with the protected contour of WNNJ-FM. The actual interference to WNNJ-FM is based on a ratio of the protected and interfering contours, or depth of interference. Based on depth of interference, WFAS-FM's licensed facility causes interference to 24,233 persons in 72.5 square kilometers. Exhibit A14 shows the depth of interference to WNNJ-FM as a result of the proposed relocation. Based on the relocation, WFAS-FM will cause interference to 8,138 persons in 14.0 square kilometers. The actual interference to WNNJ-FM from WFAS-FM will be reduced by 16,095 persons. Exhibit A15 is a map showing the interference areas (based on contour overlap). As indicated, there is an area to the northeast of WNNJ-FM, which will no longer receive interference from WFAS-FM, and a corresponding smaller area to the southeast of WNNJ-FM), which will receive some new interference (there is also an area in common). This small area which presently is not receiving interference from WNNJ-FM is served by a minimum of five full-time services and, as such, is considered adequately served, as indicated on Exhibit A16. A tabulation of the stations providing service to the interference area is attached as Exhibit A17.

As indicated on Exhibit A18, the presently licensed WFAS-FM facility has an overlap of its protected contour with the interfering contour of WNNJ-FM. The actual interference to WFAS-FM is based on a ratio of the protected and interfering contours, or depth of interference.



Based on depth of interference, WFAS-FM's licensed facility receives interference to 6,959 persons in 8.5 square kilometers. Exhibit A19 shows the proposed WFAS-FM facility's 60 dBu contour will not have any overlap from the interfering contour of WNNJ-FM. As such, the interference to WFAS-FM from WNNJ-FM will be eliminated.

As shown on Exhibit A20, there is a shortage between WFAS-FM and WPHH, however there is no contour overlap between the stations, and thus no interference delivered or received. Further, the relocated WFAS-FM will also have no contour overlap with WPHH. WFAS-FM will meet the Commission's minimum distance separation requirements to WPHH based on the relocation.

A tabulation of the present and proposed interference between WFAS-FM, and both WRCN-FM and WNNJ-FM is attached as Exhibit A21. As indicated, the proposed relocation of WFAS-FM will reduce the interference both delivered and received between the stations and eliminate interference received from WNNJ-FM. As such, this proposal will provide a net reduction in interference between the stations. Further, the small new areas of interference created to both WRCN-FM and WNNJ-FM are served by a minimum of five full time services. Therefore, it is believed that this proposal is in compliance with §73.213(a) of the rules.

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**EXHIBIT A1**

Clearance Study for WFAS-FM Bronxville, New York  
Using Present Site as Reference

REFERENCE	CLASS = A	DISPLAY DATES
41 01 32.0 N.	Current	DATA 11-16-07
73 49 39.0 W.	Spacings	SEARCH 11-16-07
----- Channel 280 - 103.9 MHz -----		

Call	Channel	Location	Ant	Azi	Dist	FCC	Margin
Lat.	Lng.			Power	HAAT		
<b>WFAS-FM</b>	<b>LIC 280A</b>	<b>Bronxville</b>	<b>NY</b>	<b>0.0</b>	<b>0.00</b>	<b>115.0</b>	<b>-115.00</b>
	41 01 32.0	73 49 39.0	CX	0.600 kW	203 M		
	Cumulus Licensing LLC			BLH-20070608ABX			
* WAXQ	LIC 282B	New York	NY	203.4	33.56	69.0	-35.44
	40 44 54.0	73 59 10.0	CN	6.000 kW	415 M		
	AMFM Radio Licenses, L.L.C.			BLH-19960426KA			
* WKTU	LIC 278B	Lake Success	NY	203.4	33.56	69.0	-35.44
	40 44 54.0	73 59 10.0	CX	6.000 kW	415 M		
	AMFM Radio Licenses, L.L.C.			BLH-20030604ACH			
* WRCN-FM	LIC 280A	Riverhead	NY	101.8	91.50	115.0	-23.50
	40 51 08.0	72 45 55.0	C	1.400 kW	148 M		
	IW Limited Liability Company			BLH-20001226AAD			
* WNNJ-FM	LIC-N 279B1	Newton	NJ	283.1	80.98	96.0	-15.02
	41 11 12.0	74 46 04.0	NCX	2.300 kW	272 M		
	CC Licenses, LLC			BMLH-20020611ABA			
* WPHH	LIC-D 281B	Waterbury	CT	53.7	101.61	113.0	-11.39
	41 33 41.0	72 50 39.0	DCN	18.000 kW	255 M		
	Capstar TX Limited Partnership			BLH-19880223KK			
WPAT-FM	APP-N 226B	Paterson	NJ	203.4	33.56	15.0	18.56
	40 44 54.0	73 59 10.0	NCX	6.000 kW	415 M		
	WPAT Licensing, Inc.			BPH-20021107AAD			
WPAT-FM	LIC 226B	Paterson	NJ	204.2	38.19	15.0	23.19
	40 42 43.0	74 00 49.0	CN	5.400 kW	433 M		
	WPAT Licensing, Inc.			BLH-19820223AR			
WAEB-FM	LIC 281B	Allentown	PA	257.7	152.85	113.0	39.85
	40 43 13.0	75 35 44.0	CN	50.000 kW	152 M		
	Capstar TX Limited Partnership			BLH-7006			

\* Note: This station has a 1964 grandfathered shortspace with WFAS-FM. See Ex A.

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**EXHIBIT A2**

Clearance study for WFAS-FM Bronxville, New York  
Using proposed site as reference

REFERENCE	CLASS = A	DISPLAY DATES
40 52 48.0 N.	Current	DATA 11-16-07
73 52 40.0 W.	Spacings	SEARCH 11-16-07
----- Channel 280 - 103.9 MHz -----		

Call	Channel Lat.	Location Lng.	Ant	Azi Power	Dist HAAT	FCC	Margin
WFAS-FM	LIC 280A 41 01 32.0	Bronxville 73 49 39.0	CX	NY 14.6 0.600 kW	16.70 203 M	115.0	-98.30
	Cumulus Licensing LLC BLH-20070608ABX						
* WAXQ	LIC 282B 40 44 54.0	New York 73 59 10.0	CN	NY 211.9 6.000 kW	17.24 415 M	69.0	-51.76
	AMFM Radio Licenses, L.L.C. BLH-19960426KA						
* WKTU	LIC 278B 40 44 54.0	Lake Success 73 59 10.0	CX	NY 211.9 6.000 kW	17.24 415 M	69.0	-51.76
	AMFM Radio Licenses, L.L.C. BLH-20030604ACH						
* WRCN-FM	LIC 280A 40 51 08.0	Riverhead 72 45 55.0	C	NY 91.5 1.400 kW	93.84 148 M	115.0	-21.16
	IW Limited Liability Company BLH-20001226AAD						
* WNNJ-FM	LIC-N 279B1 41 11 12.0	Newton 74 46 04.0	NCX	NJ 294.8 2.300 kW	82.22 272 M	96.0	-13.78
	CC Licenses, LLC BMLH-20020611ABA						
WPHH	LIC-D 281B 41 33 41.0	Waterbury 72 50 39.0	DCN	CT 48.4 18.000 kW	115.05 255 M	113.0	2.05
	Capstar TX Limited Partnership BLH-19880223KK						
WPAT-FM	APP-N 226B 40 44 54.0	Paterson 73 59 10.0	NCX	NJ 211.9 6.000 kW	17.24 415 M	15.0	2.24
	WPAT Licensing, Inc. BPH-20021107AAD						
WPAT-FM	LIC 226B 40 42 43.0	Paterson 74 00 49.0	CN	NJ 211.5 5.400 kW	21.90 433 M	15.0	6.90
	WPAT Licensing, Inc. BLH-19820223AR						
WPRB	LIC 277B 40 16 58.0	Princeton 74 41 11.0	CX	NJ 226.1 14.000 kW	95.31 222 M	69.0	26.31
	Princeton Broadcasting Ser. BLH-20070221AAV						
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* Note:	This station has a 1964 grandfathered shortspace with WFAS-FM. See Ex A.						



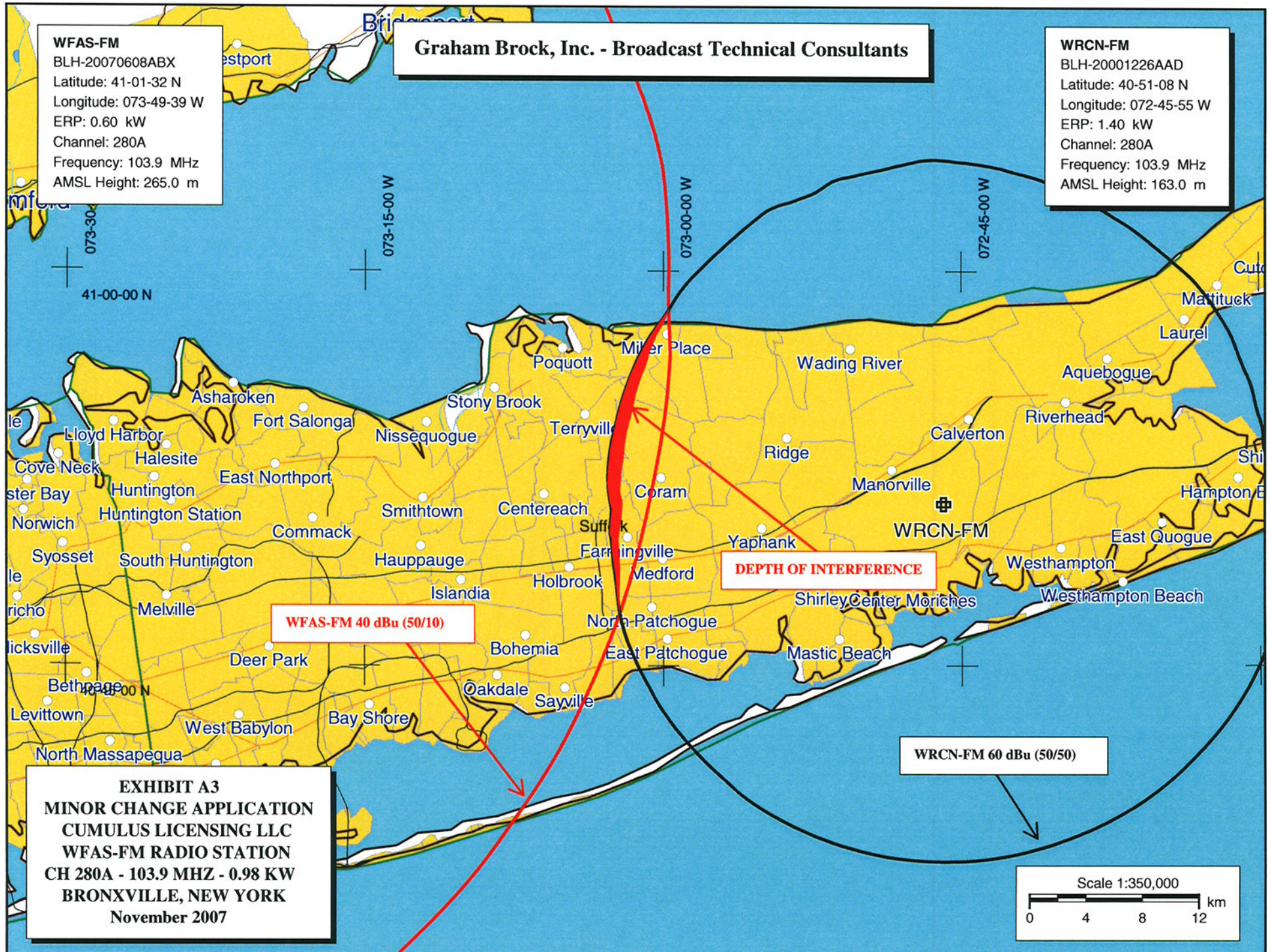
**Graham Brock, Inc. - Broadcast Technical Consultants**

**WFAS-FM**

BLH-20070608ABX  
Latitude: 41-01-32 N  
Longitude: 073-49-39 W  
ERP: 0.60 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 265.0 m

**WRCN-FM**

BLH-20001226AAD  
Latitude: 40-51-08 N  
Longitude: 072-45-55 W  
ERP: 1.40 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 163.0 m

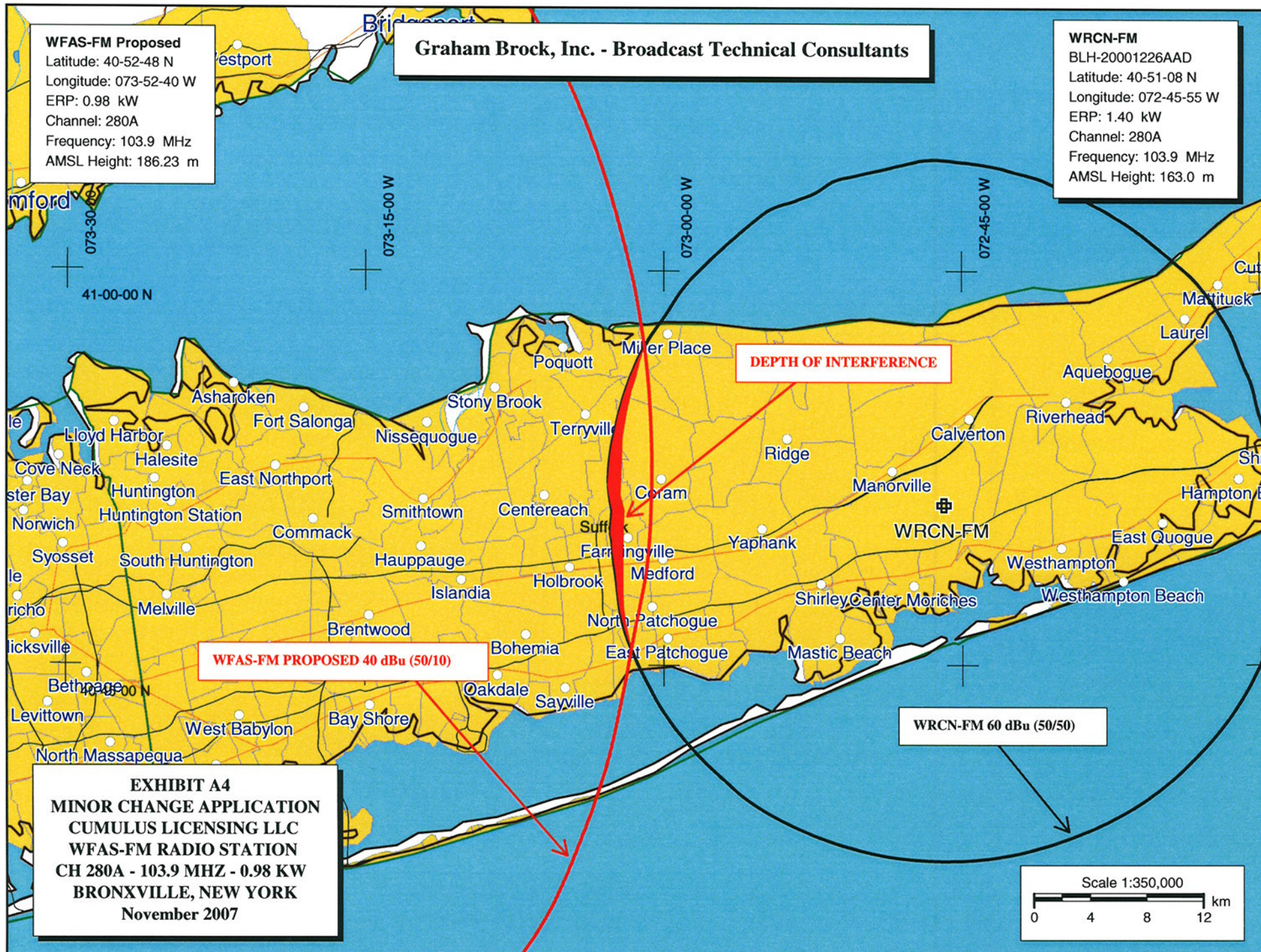




**Graham Brock, Inc. - Broadcast Technical Consultants**

**WFAS-FM Proposed**  
Latitude: 40-52-48 N  
Longitude: 073-52-40 W  
ERP: 0.98 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 186.23 m

**WRCN-FM**  
BLH-20001226AAD  
Latitude: 40-51-08 N  
Longitude: 072-45-55 W  
ERP: 1.40 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 163.0 m



**EXHIBIT A4**  
**MINOR CHANGE APPLICATION**  
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**WFAS-FM**

BLH-20070608ABX  
Latitude: 41-01-32 N  
Longitude: 073-49-39 W  
ERP: 0.60 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 265.0 m

**WFAS-FM New**

Latitude: 40-52-48 N  
Longitude: 073-52-40 W  
ERP: 0.98 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 186.23 m

**WRCN-FM**

BLH-20001226AAD  
Latitude: 40-51-08 N  
Longitude: 072-45-55 W  
ERP: 1.40 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 163.0 m

AREA PRESENTLY RECEIVING  
INTERFERENCE FROM WFAS-FM

WRCN-FM 60 dBu (50/50)

COMMON INTERFERENCE AREA

WFAS-FM 40 dBu (50/10)

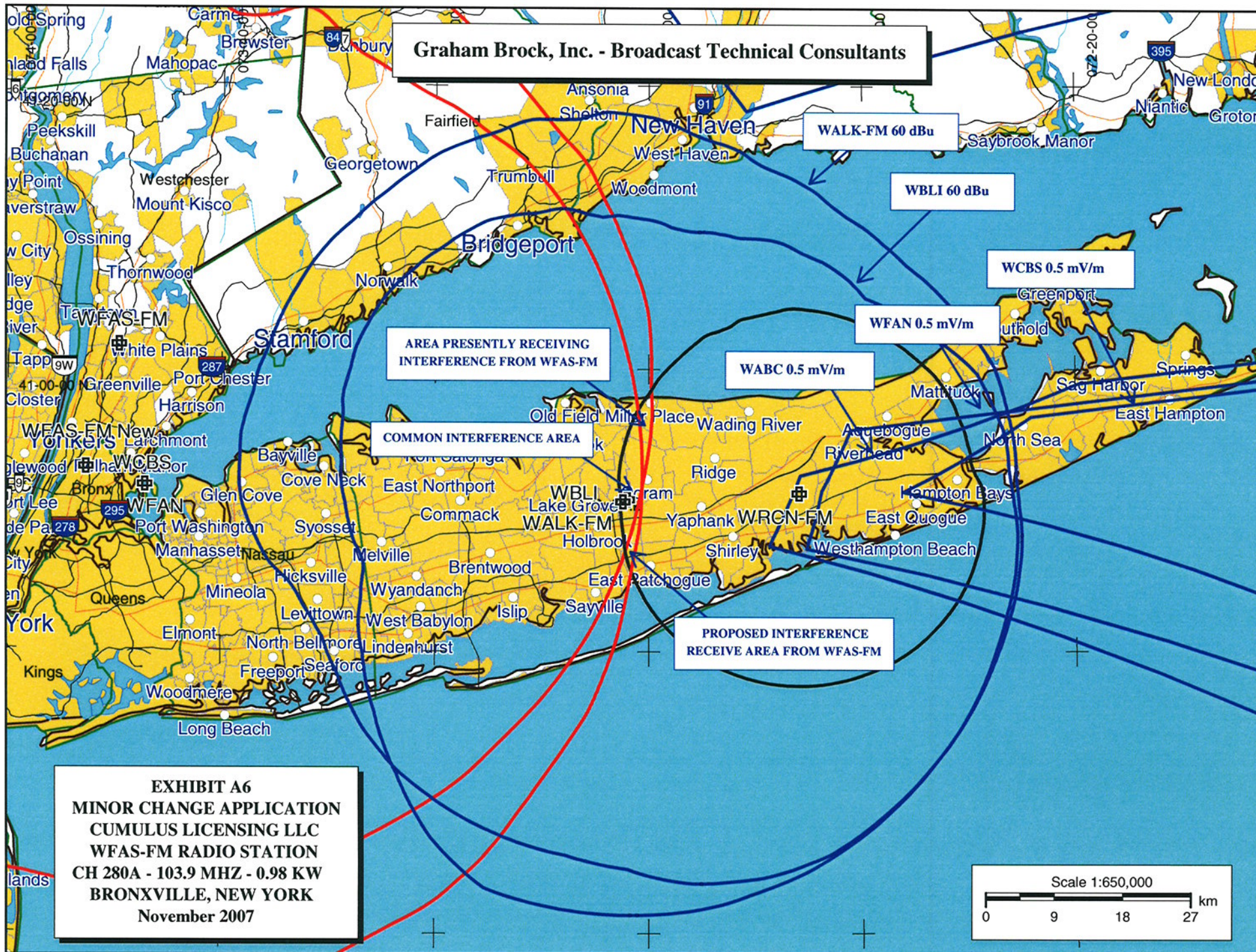
WFAS-FM NEW 40 dBu (50/10)

PROPOSED INTERFERENCE  
RECEIVE AREA FROM WFAS-FM

**EXHIBIT A5**  
**MINOR CHANGE APPLICATION**  
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**WFAS-FM RADIO STATION**  
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Scale 1:350,000  
0 4 8 12 km







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EXHIBIT A7

Stations Providing Protected Service to WRCN-FM IX area

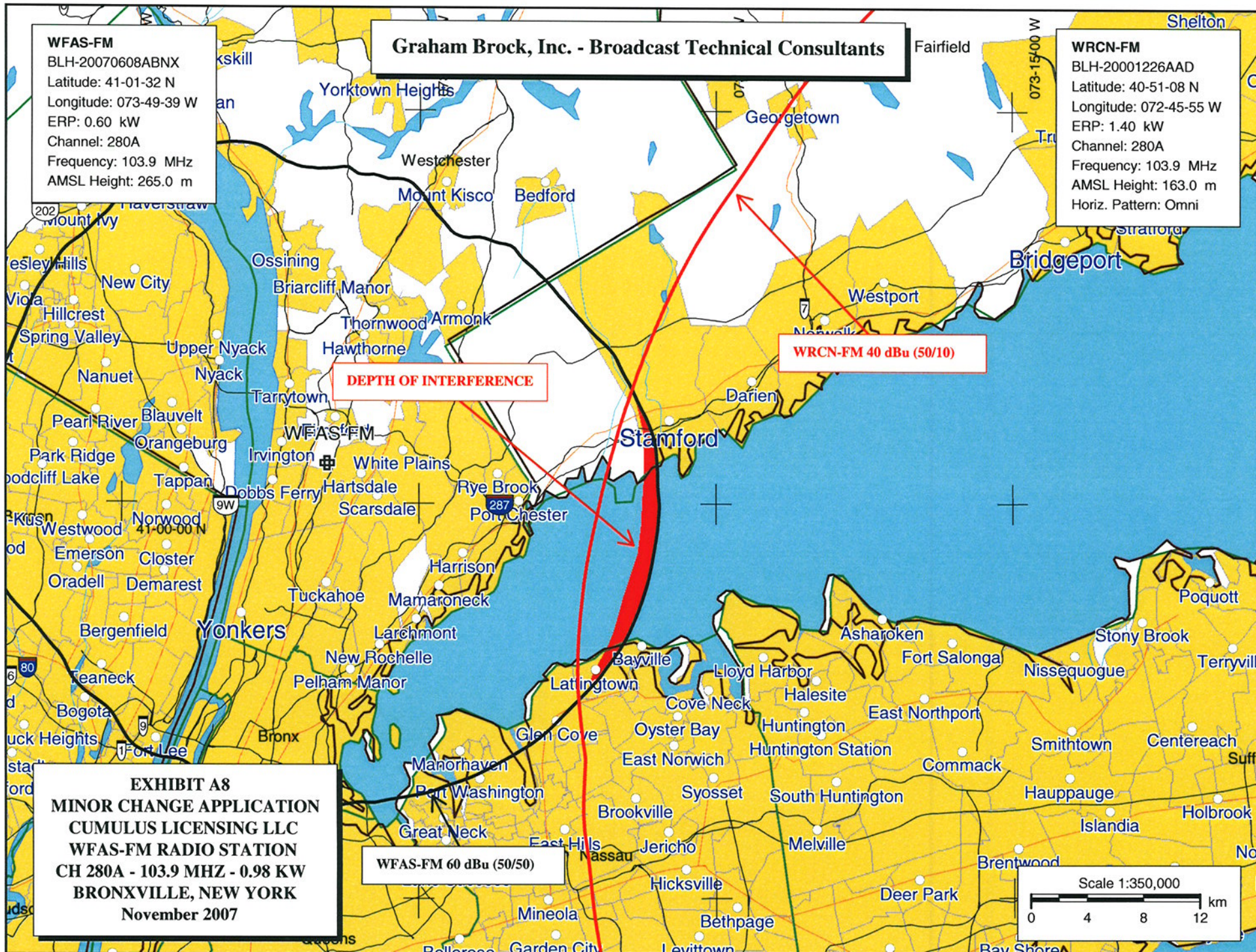
AM STATIONS

<u>Call</u>	<u>Channel</u>	<u>City</u>	<u>State</u>
WABC	770 kHz	New York	New York
WCBS	880 kHz	New York	New York
WFAN	660 kHz	New York	New York

FM STATIONS

<u>Call</u>	<u>Channel</u>	<u>City</u>	<u>State</u>
WALK-FM	248B	Patchogue	New York
WBLI	291B	Patchogue	New York







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**WFAS-FM**

Latitude: 40-52-48 N  
Longitude: 073-52-40 W  
ERP: 0.98 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 186.23 m

**WRCN-FM**

BLH-20001226AAD  
Latitude: 40-51-08 N  
Longitude: 072-45-55 W  
ERP: 1.40 kW  
Channel: 280A  
Frequency: 103.9 MHz  
AMSL Height: 163.0 m

**DEPTH OF INTERFERENCE**

**WRCN-FM 40 dBu (50/10)**

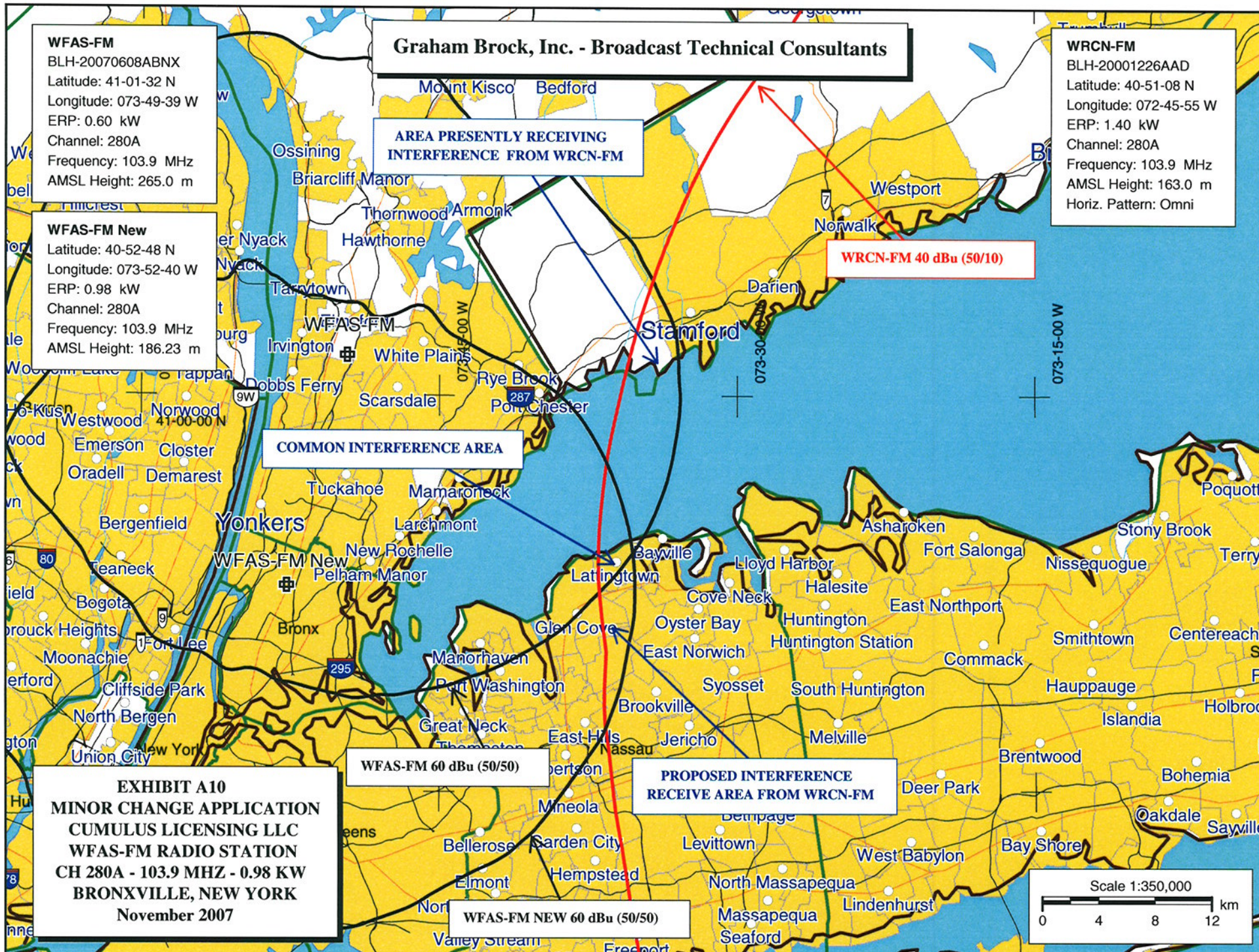
**WFAS-FM 60 dBu (50/50)**

**EXHIBIT A9**  
**MINOR CHANGE APPLICATION**  
**CUMULUS LICENSING LLC**  
**WFAS-FM RADIO STATION**  
**CH 280A - 103.9 MHz - 0.98 kW**  
**BRONXVILLE, NEW YORK**  
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Scale 1:350,000

0 4 8 12 km







**Graham Brock, Inc. - Broadcast Technical Consultants**

