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**REQUEST FOR ENGINEERING  
SPECIAL TEMPORARY  
AUTHORITY “STA” FOR A  
TELEVISION BROADCAST  
STATION**

**CALL SIGN: WJSP(TV)**  
**FACILITY ID: 23918**  
**LOCATION: COLUMBUS, GA**

**Prepared For:**

Georgia Public  
Telecommunications Commission  
260 14th St NW  
Atlanta, GA 30318

**Prepared By:**

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**Prepared On:**

November 28, 2018

## 1.0 PURPOSE OF ENGINEERING SPECIAL TEMPORARY AUTHORITY

This Engineering STA was prepared on behalf of Georgia Public Telecommunication Commission, licensee of digital TV station WJSP-TV located to serve Columbus, GA. WJSP-TV is currently licensed to operate on channel 23. It was reassigned to channel 5 in the *Closing and Channel Reassignment Public Notice* and assigned to transition Phase 1, which has a phase completion date of November 30, 2018.

During the construction of the post transition facilities, a tower crew reduced the licensed channel 23 antenna center of radiation height from 309 to 243.8 meters to make way for the new channel 5 antenna. Also, a significant amount of tower upgrades were required to meet current TIA standards such as new guy wire anchors and concrete which takes 28 days to cure. The extended curing time forced the tower crew to return on a later date to commence operation. On November 7, 2018 the tower crew reassembled at the tower site to commence work; however, on November 15, 2018 the tower crew reported that inclement weather had prevented any meaningful progress for the prior 8 days. On November 19, 2018 the tower crew indicated that it will not be possible to meet the Phase 1 November 30, 2018 deadline, but that they would continue to make progress, weather permitting.

Due to the complications in completing construction described above, WJSP, by a concurrently filed legal STA request, has asked that it be assigned to Phase 2 of the repack and that its construction permit for post-auction facilities (LMS File No. 29683) be extended until January 11, 2019. The instant STA proposes temporary operations at reduced height and reduced power on channel 23 until the tower crew can complete the work necessary to permit installation of WJSP's permanent post-auction channel 5 facilities. Grant of the STA would serve the public interest by allowing WJSP-TV to commence operation in lieu of going dark until the new antenna and facility is installed and commissioned.

## **2.0 ALLOCATION ANALYSIS**

It is proposed to use the licensed antenna but reduce its height by 65.2 meters and reduce the ERP from 177 kW to 30.5kW. The licensed transmitter site, azimuth pattern, channel, and antenna azimuth direction shall be retained as currently licensed. Appendix A is a TVStudy V2.2.5 analysis which demonstrates IX failures to the following post transition facilities:

- 2.68% to Phase 5 Station WOIL-CD FCC File No.: 0000034660
- 4.76% to Phase 3 Station WPGA-TV FCC File No.: 0000028377
- 1.99% to Phase 1 Station WXTX-TV FCC File No.: 0000034233

Because WJSP-TV must complete construction of its channel 5 facilities by January 11, 2019, before the end of Phase 2, the temporary operations requested by this application would not interfere with the post-auction facilities of stations WOIL-CD and WPGA-TV (assigned to Phase 5 and Phase 3, respectively). WXTX-TV is a linked facility with WJSP-TV; however, the interference does not result in new interference above two percent permitted during the transition<sup>1</sup>, nor will it create any new linked station sets so long as construction does not extend into phase 3. It has thus been demonstrated that the proposed change to WJSP-TV's transition phase should not have an adverse impact on the overall transition schedule or a negative impact on other stations or viewers.

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<sup>1</sup> See *Transition Scheduling Adoption Public Notice*, 32 FCC Red at 897, para. 16 (allowing temporary increased pairwise (station-to-station) interference of up to two percent during the transition period).

### 3.0 CERTIFICATION

The foregoing statement and the report regarding the aforementioned engineering work are true and correct to the best of my knowledge.

Ryan Wilhour



Consulting Engineer  
November 28, 2018

## Appendix A – TVStudy V2.2.5 Allocation Analysis

Study created: 2018.11.27 13:45:30

Study build station data: LMS TV 2018-11-25

Proposal: WJSP-TV D23 DT LIC COLUMBUS, GA  
File number: BLANK0000016507  
Facility ID: 23918  
Station data: User record  
Record ID: 3597  
Country: U.S.  
Zone: II

Search options:  
Non-U.S. records included  
Baseline record excluded if station has CP

Stations potentially affected by proposal:

IX	Call	Chan	Svc	Status	City, State	File Number	Distance
Yes	WCOV-TV	D22	DT	CP	MONTGOMERY, AL	BLANK0000034411	168.2 km
No	WTWC-TV	D22	DT	CP	TALLAHASSEE, FL	BLANK0000034393	251.0
Yes	WHSB-TV	D22	DT	CP	MONROE, GA	BLANK0000034684	104.2
No	WDPM-DT	D23	DT	LIC	MOBILE, AL	BLCDT20090420AAD	370.7
Yes	WOIL-CD	D23	DC	CP	TALLADEGA, AL	BLANK0000034660	153.4
No	WVUA-CD	D23	DC	LIC	TUSCALOOSA/NORTHPORT, AL	BLANK0000001646	264.5
Yes	WKTG-CD	D23	DC	CP	NORCROSS, GA	BLANK0000034685	127.2
Yes	WPGA-TV	D23	DT	CP	PERRY, GA	BLANK0000028377	107.5
No	WBTB	D23	DT	LIC	CHARLOTTE, NC	BLCDT19991025AEB	427.3
Yes	WFLI-TV	D23	DT	CP	CLEVELAND, TN	BLANK0000034902	262.8
No	WJDE-LD	D23	DC	CP	NASHVILLE, TN	BLANK0000034264	420.4
No	WBXA-CD	D24	DC	CP	BIRMINGHAM, AL	BLANK0000035776	208.1
No	WHIQ	D24	DT	LIC	HUNTSVILLE, AL	BLANK0000004828	269.1
No	WTLF	D24	DT	APP	TALLAHASSEE, FL	BLANK0000035775	251.0
No	WTLF	D24	DT	LIC	TALLAHASSEE, FL	BLCDT20030303ABF	263.4
Yes	WXTX	D24	DT	CP	COLUMBUS, GA	BLANK0000034233	46.5
No	WGTA	D24	DT	LIC	TOCCOA, GA	BLANK0000001315	230.9

No non-directional AM stations found within 0.8 km

No directional AM stations found within 3.2 km

Record parameters as studied:

Channel: D23  
Latitude: 32 51 6.80 N (NAD83)  
Longitude: 84 42 5.50 W  
Height AMSL: 641.8 m  
HAAT: 380.3 m  
Peak ERP: 30.5 kW  
Antenna: DIE-TLP-24C (C) (ID 80959) 0.0 deg  
Elev Pattn: Generic  
Elec Tilt: 1.00

39.7 dBu contour:

Azimuth	ERP	HAAT	Distance
0.0 deg	9.13 kW	381.6 m	72.2 km
45.0	4.71	376.9	67.7
90.0	8.47	376.3	71.4
135.0	5.25	411.7	70.6
180.0	10.6	396.2	74.2
225.0	24.7	392.9	79.6
270.0	30.5	315.6	74.6
315.0	23.7	391.2	79.2

Distance to Canadian border: 996.9 km

Distance to Mexican border: 1407.2 km

Conditions at FCC monitoring station: Powder Springs GA  
Bearing: 358.9 degrees Distance: 112.3 km

Proposal is not within the West Virginia quiet zone area

Conditions at Table Mountain receiving zone:  
Bearing: 299.7 degrees Distance: 1997.9 km

Study cell size: 2.00 km  
Profile point spacing: 1.00 km

Maximum new IX to full-service and Class A: 0.50%  
Maximum new IX to LPTV: 2.00%

\*\*IX check failure to BLANK0000034660 CP scenario 1, 2.68% interference caused  
\*\*IX check failure to BLANK0000034660 CP scenario 2, 2.68% interference caused  
\*\*IX check failure to BLANK0000028377 CP scenario 1, 4.76% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 1, 1.99% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 2, 1.99% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 3, 1.98% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 4, 1.98% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 5, 1.99% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 6, 1.99% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 7, 1.98% interference caused  
\*\*IX check failure to BLANK0000034233 CP scenario 8, 1.98% interference caused