

(REFERENCE COPY - Not for submission)

FCC Form 399: Reimbursement Request

18267 Service: **DTV** Channel: 29 (UHF) Facility Call WKOP-TV Sign:

ID:

File 0000025313

Number:

FRN: 0001773852 Date 06/12

> Submitted: /2019

Applicant Information

Applicant Name, Type, and Contact Information

Applicant	Address	Phone	Email	Applicant Type
EAST TENNESSEE PUBLIC COMMUNICATIONS CORP. Doing Business As: EAST TENNESSEE PUBLIC COMMUNICATIONS CORP.	Tony Poole 1611 E. MAGNOLIA AVENUE KNOXVILLE, TN 37917 United States	+1 (865) 595- 0220	tony@easttennesseepbs. org	Not-for- Profit

Reimbursement Contact Name and Information Reimbursement Contact Information

Applicant	Address	Phone	Email
[Confidential]			

Preparer Contact Information

Preparer Contact Name and Information

Applicant	Address	Phone	Email
Robert Gehman ConsultingEngineer Kessler and Gehman Associates, Inc.	Robert Gehman 507 NW 60 Street Suite D Gainesville, FL 32607 United States	+1 (352) 332-3157	bob@kesslerandgehman. com

Broadcaster Information and Transition Plan

Question	Response
Will the station be sharing equipment with another broadcast television station or stations (e.g., a shared antenna, co-location on a tower, use of the same transmitter room, multiple transmitters feeding a combiner, etc.)? If yes, enter the facility ID's of the other stations and click 'prefill' to download those stations' licensing information.	Yes
Briefly describe transition plan	Replace transmitter using existing antenna and line.

Transmitters

Section	Question	Response
Transmitter Related Expenses	Do you have transmitter related expenses?	Yes

Primary Transmitter

Existing Transmitter Information

Section	Question	Response
Existing Transmitter Description	Type of change	Purchase New
	Use	Primary (Main)
	Description of Use	N/A
	Ownership	Owned
	Owner	N/A
	Site	N/A
	Is this transmitter currently shared with another station?	No
	Is this transmitter currently in operating condition?	Yes
Existing Transmitter	Manufacturer	
Manufacturer and Type	Model	Diamond
	Year	2007
	Туре	Solid State
	Solid State Cooling	Air Cooled
	Solid State Power Capacity	10 kW

Primary Transmitter

New Transmitter Costs

Section	Question	Response
New Transmitter	Use	Primary (Main)
	Change Type	Purchase New
	Is this a request for upgraded equipment?	Yes
	Manufacturer	
	Model	EC712HP-BB
	Transmitter Type	Solid State
	Solid State Cooling	Liquid Cooled
	Solid State Power capacity	10 kW
	Justification for New Transmitter	The manufacturer of the existing transmitter advises that the transmitter cannot be retuned to the assigned channel. See attachment.

Primary Transmitter

Other Transmitter Costs

Section	Question	Response
Electrical Service	Service Entrance (3 phases 800A 208V)	No
	Switchgear (industrial 800 amp)	Yes
	Transformer (480V)	Yes
	Power	150 kVA
	Rigid Conduit and Wiring	Yes

	Size	3 inches
	Length	100.0 feet
	Other Electrical Service	No
	Description	N/A
HVAC Service	Does the replacement transmitter require HVAC Service?	No
	Туре	N/A
	Size	N/A
	Other Size	N/A
Transmitter Building Addition/Modification or Leasehold Improvement	Does the Transmitter Building require an addition, modification, other leashold improvement?	No
	Size	N/A
Channel 14 Costs	Is an RF Consulting Engineer needed?	N/A
	Is a channel 14 Mask Filer needed?	N/A
	Is additional field engineering time needed?	N/A
	Number of Days	N/A

Primary Transmitter

Other Transmitter Cost Not Listed

Name	Description
Standby Exciter and Switch	Standby Exciter with Automatic Change Over Switch
Additional Interior RF System	Interior RF System Existing Transmitter to Interim Transmission line

Antennas

Section	Question	Response
Antenna Related Expenses	Do you have antenna related expenses?	Yes

Primary Antenna

Existing Antenna Information

Section	Question	Response
Existing Antenna Description	Type of change	Retune Existing
	Antenna Use	Primary (Main)
	Description of Use	N/A
	Ownership	Owned
	Owner	N/A
	Site	N/A
	Is the existing antenna shared with another station or stations?	Yes
	Is the existing antenna directional?	No
	Is antenna in operating condition?	Yes
	Is antenna located on or in close proximity to an antenna farm?	Yes
Existing Antenna	Class	Full Power
Manufacturer and Type	Mounting	Top Mount
	Antenna position in stack	Not in Stac
	Polarization	Horizontal
	Туре	Slotted Coaxial
	Number of Stations Supported	N/A
	Number of Panels	N/A
	Design power capacity in use	N/A
	Lower Limit	N/A

Upper Limit	N/A
Other Antenna Type	N/A
ERP: (Effective Radiated Power)	100.0 kW
Manufacturer	Andrew
Model	ABBP16H3- HTO5-17 /30H
Year	2007

Facility ID's and Call Signs of all stations with whom the antenna is shared.

Facility ID	Call Sign
35908	WVLT-TV

Primary Antenna

Adjustment to Existing Antenna

Section	Question	Response
Sweep Test of Existing Antenna	Do you need a sweep test of existing antenna?	Yes

Primary Antenna

Other Antenna Costs

Section	Question	Response
Combiner for Shared Antenna	Do you need a Combiner for a Shared Antenna?	No
	Туре	
	Number of channels supported	N/A
	Frequencies of channels supported	N/A
	Frequency	_

Primary Antenna

Other Antenna Cost Not Listed

Name	Description
Rigging	Rigging to replace and/or retune the elbow complex

Transmission Seffien	Question	Response
Transmission Line Related Expenses	Do you have transmission line related expenses?	Yes

Primary Transmission

Existing Transmission Line

Section	Question	Response
Existing Transmission Line Description	Type of change	Utilize Existing
	Use	Primary (Main)
	Description of Use	N/A
	Ownership	Owned
	Owner	N/A
	Site	N/A
	Is the existing transmission line shared with another station or stations?	No
	Is Transmission Line in operating condition?	Yes
Existing Transmission Line Manufacturer and Type	Manufacturer	Dielectric
	Туре	Rigid
	Diameter	8 3/16 inches
	Other Diameter	N/A
	Segment Length	Broadband
	Other Segment Length	N/A
	Number of parallel runs	1
	Length	1450 feet per run

Primary Transmission

Other Transmission Line Expenses Not Listed

n Line	Description
Sweep Tests	Sweep tests associated with the elbow complex tuning or replacement with the assistance of a rigger

Tower Equipment And Rigging Costs

Section	Question	Response
Tower Equipment or Rigging Costs Changes	Do you have tower equipment or rigging costs changes?	No

Outside Professional

Section	Question	Response
Al Services Costs Outside Project Management Services	Do you require outside project management services?	Yes
	Number of Hours	34
	Explanation	Fewer Project Management "PM" tasks are required & Other Engineering Services "OES" are required, therefore the PM total has been reduced to 34 hrs (\$5,100 at \$150/hr), & a new OES category has been created & funded with the money removed from PM.
Outside RF consulting Engineering Services	Perform engineering study for new channel assignment and antenna development	Yes
	Prepare engineering section of Form FCC Construction Permit Application	Yes
	For Auxiliary Facility	No
	For Main Facility	Yes

Prepare engineering section of Form FCC License to Cover Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare request for Special Temporary Authority	No
Quantity	N/A
Do you have Distributed Transmission System engineering services?	N/A
Critical Facility	N/A
Terrain-Shielded Facility	N/A
Prepare and file Form FCC Construction Permit Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare and file Form FCC License to Cover Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare request for Special Temporary Authority	No
Quantity	N/A
NEPA Section 106 environmental review	No
Environmental Assessment	No
ASR Modification	No
FAA Consultation (including preparation of FAA Form 7460)	No
Negotiation of Lease and other Matter for Shared Locations	No
Prepare or Review FCC Form 399 for Reimbursement	Yes

Attorney and Other Outside Consulting

Services

	Address transition timing and coordination issues w/ other stations and wireless providers	Yes
RF Field Engineering Services	Comprehensive coverage verification via field study	Yes
	RF exposure measurements	Yes
	Additional Field Engineering Service	Yes
	Number of Days	9
	Justification	It will be necessary to survey the site, plan the equipment, develop specifications for purchasing, and oversee multiple vendor RF projects. Station does not have available personnel or personnel trained in such services.

Outside Professiona

Other Professional Services Expenses Not Listed

sional	Services Costs	Description
	Other Engineering Services	Fewer Project Management "PM" tasks are required & Other Engineering Services "OES" are required, therefore the PM total has been reduced to 34 hrs (\$5,100 at \$150 /hr), & a new OES category has been created & funded with the money removed from PM.

Other Expenses

Section	Question	Response
AM Pattern Disturbance	Is an Impact Study needed?	Yes
	Is Remediation needed?	Yes
Facility Expenses	Name	N/A
	Other Distributed Transmission System Expenses Not listed	N/A
	Name	N/A
	Is Notification of a Medical Facility required as a result of DTV broadcasting?	Yes
Permit and Filing Costs	Local Zoning	No
	Non-zoning permits	No
	BLM or NFS Coordination	No
	FCC Construction Permit Minor Change	No
	FCC License to Cover Application	No
	FCC Special Temporary Authority Application	No
Other Miscellaneous Expenses	Does this relocation require paying Disposal Costs (for equipment and other waste, net of any salvage value)?	Yes
	Does this relocation require Equipment Delivery or Handling Charges not otherwise included in individual item costs?	Yes
	Does this relocation require Equipment Storage?	No
	Does this relocation require the Development and Airing of an Announcement regarding an upcoming channel change?	No
	Does this relocation require MVPD Notification of a Channel Change?	Yes

Other Expenses Not Listed

Expenses Information not provided.

Transmitters

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

			Estimated		
Description	Predetermined Cost Estimate	Estimated Cost	Cost Justification	Actual Cost	Actual Cost Justification
Primary Transmitter EC712HP- BB	\$728,450.00	\$539,229.00		\$308,729.00	
Additional Interior RF System	\$140,000.00	\$140,000.00	N/A	N/A	N/A
Standby Exciter and Switch	\$25,000.00	\$25,000.00	N/A	N/A	N/A
3" Rigid Conduit and Wiring (Cost per foot)	\$5,200.00	\$4,900.00	N/A	N/A	N/A
Transformer 3 phase /480v - 150 KVA	\$25,550.00	\$24,300.00	N/A	N/A	N/A
Switchgear - industrial 800 amp	\$38,200.00	\$36,300.00	N/A	N/A	N/A
UHF - Liquid Cooled Solid State Transmitter 8.2 - 13 kW	\$494,500.00	\$308,729.00	N/A	\$308,729.00	N/A
Sub-total	\$728,450.00	\$539,229.00	N/A	\$308,729.00	N/A
Total for all systems	\$1,260,122.00	\$1,031,129.00	N/A	\$323,781.44	N/A

Components

Actual Information Description	File Name	
Additional Interior RF System	Information not provided.	
Standby Exciter and Switch	Information not provided.	
3" Rigid Conduit and Wiring (Cost per foot)	Information not provided.	
Transformer 3 phase/480v - 150 KVA	Information not provided.	
Switchgear - industrial 800 amp	Information not provided.	
UHF - Liquid Cooled Solid State Transmitter 8.2 - 13 kW	Component Description: Amount:	Comark 12101-3A v190612jgv2 \$114,641.43
	Component Description:	Comark inv #12101- B Primary transmitter pmt 1 UL20190208jgv2
	Amount:	\$194,087.57

Antennas

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Primary Antenna ABBP16H3- HTO5-17 /30H	\$287,430.00	\$274,400.00		\$0.00	
Rigging	\$20,000.00	\$20,000.00	N/A	N/A	N/A
Elbow complex, broadband, at antenna input, per 6 1/8. feedline (if needed)	\$13,700.00	\$13,000.00	N/A	N/A	N/A
Sweep test of existing antenna	\$6,730.00	\$6,400.00	N/A	N/A	N/A
UHF - High Power Top Mount (200-1000 kW), One station antenna, horizontally polarized	\$247,000.00	\$235,000.00	N/A	N/A	N/A
Sub-total	\$287,430.00	\$274,400.00	N/A	\$0.00	N/A
Total for all systems	\$1,260,122.00	\$1,031,129.00	N/A	\$323,781.44	N/A

Components

Information not provided.

Transmission Line

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Primary Transmission Line	\$6,400.00	\$6,400.00		\$0.00	
Sweep Tests	\$6,400.00	\$6,400.00	N/A	N/A	N/A
Sub-total	\$6,400.00	\$6,400.00	N/A	\$0.00	N/A
Total for all systems	\$1,260,122.00	\$1,031,129.00	N/A	\$323,781.44	N/A

Components

Information not provided.

Tower Equipment and Rigging Costs

Cost Information

Information Information not provided.

Cost Information

Outside Professional Services

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Outside Professional Services	\$175,352.00	\$150,600.00		\$15,052.44	
Other Engineering Services	\$21,750.00	\$21,750.00	N/A	\$1,483.00	N/A
Additional Field Engineering Service, 9 Days	\$18,000.00	\$18,000.00	N/A	\$2,986.94	Additional Field Engineering Service, on-site equip inventory and facilities survey for pos trans planning WKOP
RF Exposure Measurements	\$21,050.00	\$2,000.00	N/A	N/A	N/A
Comprehensive coverage verification via field study, if needed	\$84,200.00	\$80,000.00	N/A	N/A	N/A
Attorney Fees - Prepare and File FCC Form 2100 (main), License to Cover Application	\$2,365.00	\$2,250.00	N/A	N/A	N/A

Attorney Fees - Prepare and File FCC Form 2100 (main), Construction Permit Application	\$5,260.00	\$5,000.00	N/A	\$397.50	Attorney section of Fore FCC Construction Permit Application Main Facility for
Address transition timing and coordination issues w/ other stations and wireless	\$2,630.00	\$2,500.00	N/A	N/A	N/A
Prepare engineering section of FCC Form 2100 (main), License to Cover Application	\$1,580.00	\$1,500.00	N/A	N/A	N/A
Project management of the transition	\$5,372.00	\$5,100.00	N/A	\$1,500.00	Outside Proje Managemen Services, For 387 Progress Report.
Prepare and or review reimbursement form	\$2,630.00	\$2,500.00	N/A	\$2,935.00	Prepare or Review FCC Form 399 for Reimburseme for WKOP.
Perform engineering study for new channel assignment and antenna development	\$7,360.00	\$7,000.00	N/A	\$3,750.00	Engineering study for new channel assignment ar antenna development for WKOP

Prepare	\$3,155.00	\$3,000.00	N/A	\$2,000.00	Engineering
engineering					section of Forn
section of FCC					FCC
Form 2100					Construction
(main),					Permit
Construction					Application
Permit					Main Facility fo
Application					WKOP
Sub-total	\$175,352.00	\$150,600.00	N/A	\$15,052.44	N/A
Total for all	\$1,260,122.00	\$1,031,129.00	N/A	\$323,781.44	N/A

Components

•		
Actual Information Description	File Name	
Description	The Name	
Other Engineering Services		
	Component Description:	KGA inv #950-21
	Component Description.	RF Design and
		calcs
		UL20190117jgv1
	Amount:	\$132.50
	Amount.	ψ102.00
		1/04 1/070 00
	Component Description:	KGA inv #950-20
		Actual Cost invoices
		Nov 2018
	A	UL20190117jgv1
	Amount:	\$450.50
		1/OA : #050 00
	Component Description:	KGA inv #950-22
		Actual Cost invs
		181130-190119
		UL20190201jgv1
	Amount:	\$575.00
	Component Description:	KGA inv #950-26
		Actual Cost invs
		190110-190131
		UL20190228jgv1
	Amount:	\$325.00

Additional Field Engineering Service, 9 Days	Component Description:	KGA inv #950-01 Facility Elec Survey and Condition Assessment UL20181130jgv1
	Amount:	\$2,986.94
RF Exposure Measurements	Information not provided.	
Comprehensive coverage verification via field study, if needed	Information not provided.	
Attorney Fees -Prepare and File FCC Form 2100 (main), License to Cover Application	Information not provided.	
Attorney Fees - Prepare and File FCC Form 2100 (main), Construction Permit Application	Component Description:	Attorney section of Form FCC Construction Permit Application Main Facility for WKOP
	Amount:	\$360.00
	Component Description:	Attorney section of Form FCC Construction Permit Application Main Facility
	Amount:	\$37.50
Address transition timing and coordination issues w/ other stations and wireless	Information not provided.	
Prepare engineering section of FCC Form 2100 (main), License to Cover Application	Information not provided.	

Project management of the transition

Component Description: KGA inv #950-09

Actual Cost invoices

UL20181210jgv1

Amount: \$300.00

Component Description: KGA inv #950-14

2018 Q2 387 UL20190201jgv1

Amount: \$150.00

Component Description: KGA inv #950-18

2018 Q3 387 UL20190201jgv1

Amount: \$150.00

Component Description: KGA inv #950-11

2017 Q4 387 UL20181210jgv1

Amount: \$225.00

Component Description: KGA inv #950-25

2018 Q4 387 UL20190201jgv1

Amount: \$150.00

Component Description: KGA inv #950-13

2018 Q1 387 UL20190201jgv1

Amount: \$225.00

Component Description: Outside Project

Management

Services, Form 387 Progress Report for

WKOP

Amount: \$300.00

Prepare and or review reimbursement form		
reimbursement form	Component Description:	Attorney Review
		FCC Form 399 for
		Reimbursement for
		WKOP
	Amount:	\$435.00
	Component Description:	Prepare or Review
		FCC Form 399 for
		Reimbursement for
		WKOP. See
		attached KGA
		Repack Services
		Proposal to justify
		fixed fee.
	Amount:	\$2,500.00
Perform engineering study		
for new channel	Component Description:	Engineering study
assignment and antenna		for new channel
development		assignment and
		antenna
		development for
		WKOP
	Amount:	\$3,750.00
	Component Description:	Engineering study
	Component Description.	for new channel
		assignment and
		antenna
		development
	Amount:	\$3,750.00
	- AIIIVUIII.	ao.7 au.uu

Prepare engineering section of FCC Form 2100 (main), Construction Permit Application

Component Description: Engineering section

of Form FCC

Construction Permit Application Main Facility for WKOP

Amount: \$2,000.00

Component Description: CP Application for

Main Facility

Amount: \$2,000.00

Other Expenses

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Other Expenses	\$62,490.00	\$60,500.00		\$0.00	
MVPD Notification of Channel Change	\$2,000.00	\$2,000.00	N/A	N/A	N/A
Equipment Delivery and Handling Charges	\$10,000.00	\$10,000.00	N/A	N/A	N/A
Disposal Costs (for equipment and other waste, net of any salvage value)	\$10,000.00	\$10,000.00	N/A	N/A	N/A
DTV Medical Facility Notification	\$11,550.00	\$11,000.00	N/A	N/A	N/A
AM Pattern Disturbance Remedy	\$21,050.00	\$20,000.00	N/A	N/A	N/A
AM Pattern Disturbance Impact study	\$7,890.00	\$7,500.00	N/A	N/A	N/A
Sub-total	\$62,490.00	\$60,500.00	N/A	\$0.00	N/A
Total for all systems	\$1,260,122.00	\$1,031,129.00	N/A	\$323,781.44	N/A

Components

Information not provided.

Grand Total

	Predetermined Cost Estimate	Estimated Cost	Actual Cost
Total for all systems	\$1,260,122.00	\$1,031,129.00	\$323,781.44

Reimbursem	entestiatus	Response
	The facility has ceased operating on its pre- auction channel.	No
	Construction of final facilities or all necessary modifications are complete.	No
	All receipts for reimbursement have been submitted no further costs are expected to be incurred. Note this will lock the Form 399 from further editing and begin close-out procedures with the Fund Administrator.	No

Attachments