

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.33

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL, except HAT, HAA, TCH, and RA. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles unless otherwise indicated, except visibilities which are in statute miles or feet RVR.

<u>AIRPORT</u> TSTC WACO	<u>AIRPORT ID</u> KCNW	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 17L	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> WACO	<u>STATE</u> TX
<u>AIRPORT ELEVATION</u> 470	<u>TDZE</u> 470	<u>SUPERSEDED</u> RNAV (GPS) RWY 17L	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 10/16/2014	<u>MAG VAR</u> 4E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 5 DECEMBER 2019	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2015

TERMINAL ROUTES

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>LEG TYPE</u>	<u>FO/FB</u>	<u>RNP</u>	<u>COURSE</u>	<u>DISTANCE</u>	<u>ALTITUDE</u>
ACT VORTAC		CUKAV		TF	FO	1.00	034.32	15.22	2300
CQY VORTAC		TOURS		TF	FB	1.00	247.96	46.73	2300
TOURS	IAF	CUKAV	NOPT	TF	FB	1.00	173.54	4.77	2300
CUKAV	IF/IAF	ZIRVI		TF	FB	1.00	173.54	7.00	2300
ZIRVI	FAF	WIPLU/2.00 NM TO RW17L		TF	FB	0.30	173.55	3.58	
WIPLU/2.00 NM TO RW17L		RW17L	MAP	TF	FO	0.30	173.55	2.00	
RW17L	MAP	670 MSL		CA			173.55		
670 MSL		OMOB		DF	FO	1.00			2300

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW17L

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2300 DIRECT OMOB AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

QUALITY
18
CHECKED

PROFILE:

1. PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
2. HOLD N CUKAV, LT, 173.54 INBOUND, 2300 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 173.55 FAF: ZIRVI DIST FAF TO MAP: 5.58 DIST FAF TO THLD: 5.58
4. MIN ALT: CUKAV 2300, ZIRVI 2300, WIPLU/2.00 NM TO RW17L 1140*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 200 HAT: 0.46 GS ANT: MM: IM:
6. MIN GP INCPT: 2300 GP ALT AT FAF : ZIRVI 2300 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 51.7
8. MSA FROM: RW17L 3600

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15°C OR ABOVE 54°C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS ON ACT VORTAC AIRWAY RADIALS 305 CW 050.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS ON CQY VORTAC AIRWAY RADIALS 163 CW 263.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE LNAV/VNAV ALL CATS VISIBLITY TO 3/4 SM AND LNAV CATS C/D VISIBILITY TO 1 SM.

ADDITIONAL FLIGHT DATA:

CHART: ASR.
CHART CIRCLING ICON.
CHART VDP AT 1.00 NM TO RW17L*
*LNAV ONLY
WAAS CHANNEL #73020
REFERENCE PATH ID: W17A
CHART FAS OBST: 582 TRANSMISSION_LINE 314044N/0970404W.
CHART: 1034 TOWER 314452N/0970624W.
HOLD S, RT, 353.56 INBOUND
LTP HAE: 116.4 M

MINIMUMS:

TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT

ALTERNATE: NA ☐ STANDARD - NA WHEN LOCAL WEATHER NOT AVAILABLE.

CATEGORY:	A			B			C			D			E		
FINAL TYPE	DA/MDA	VIS	HAT/HAA	DA/MDA	VIS	HAT/HAA	DA/MDA	VIS	HAT/HAA	DA/MDA	VIS	HAT/HAA	DA/MDA	VIS	HAT/HAA
LPV DA	670	1/2	200	670	1/2	200	670	1/2	200	670	1/2	200			
LNAV/VNAV DA	720	1/2	250	720	1/2	250	720	1/2	250	720	1/2	250			
LNAV MDA	840	1/2	370	840	1/2	370	840	5/8	370	840	5/8	370			
CIRCLING	940	1	470	1040	1	570	1040	1 1/2	570	1120	2	650			



CHANGES - REASONS

1. REMOVED JEN FEEDER LEG AND ASSOCIATED INITIAL AND ALL REFERENCES TO JEN VORTAC- JEN VORTAC DECOMMISSIONING PER JEN VOR MON PROJECT.
2. REMOVED CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS ON JEN VORTAC AIRWAY RADIALS 083 CW 187- JEN VORTAC DECOMMISSIONING PER JEN VOR MON PROJECT.
3. ADDED "CHART CIRCLING ICON" IN ADDITIONAL FLIGHT DATA- PER 8260.19H PARA 8-7-1D(12).
4. ADDED 20:1 IS CLEAR- PER 8260.19H PARA 8-6-7G(3) AND NEW TARGETS EVALUATION SHOWING NO 20:1 PENETRATIONS.
5. REMOVED ALTIMETER NOTE FROM 8260-3- UPDATED AND MOVED TO CONTINGENCY NOTE SECTION ON -9 PER 8260.19H PARA 8-6-9F(3).
6. REPLACED DME/DME RNP-0.3 NM WITH PBN REQUIREMENTS NOTE: RNP APCH- PER 8260.19H PARA 8-6-8B(1).
7. LOWERED ALL LNAV/VNAV DA/HAT FROM 818/348 TO 720/250- AND ALL VISIBILITIES FROM 5/8 TO 1/2 SM- NEW TARGETS EVALUATION.
8. INCREASED CAT B CIRC MDA/ HAT FROM 960/490 TO 1040/570 AND CAT D FROM 1040/570 TO 1120/ 650- NEW TARGETS EVALUATION.
9. ADDED "MAX 6000" TO HOLD-IN-LIEU ON LINE 2. - IAW CUKAV 8260-2.
10. CHANGED AIRPORT NAME FROM TSTC WACO TO HEART OF TEXAS INDUSTRIAL- UPDATED AIRNAV DATA.
11. ADDED CHART NOTE: FOR INOPERATIVE ALS, INCREASE LNAV/VNAV ALL CATS VISIBLITY TO 3/4 SM AND LNAV CATS C/D VISIBILITY TO 1 SM. - UPDATED VISCHECK DATA.
12. REMOVED CHART NOTE: BARO-VNAV NA WHEN USING WACO RGNL ALTIMETER SETTING FROM 8260-3- ADDED AS A CONTINGENCY NOTE ON -9- PER 8260.19H PARA 8-6-9F(3).
13. REMOVED CHART NOTE: VDP NA WHEN USING WACO RGNL ALTIMETER SETTING FROM 8260-3- ADDED AS A CONTINGENCY NOTE ON -9- PER 8260.19H PARA 8-6-9F(3).
14. CHANGED "DISTANCE TO THLD FROM 200 HATH: 0.47NM" TO "DISTANCE TO THLD 200 HAT: 0.46" - UPDATED TARGETS BUILD EVALUATION.
15. REMOVED FAHRENHEIT VALUES FROM UNCOMPENSATED BARO-VNAV NOTE - PER 8260.19H, CHAP 8-6-7.S.

08/14/2019: THIS IS A CORRECTED COPY OF THE FORM APPROVED ON 07/19/2019.
1. ADDED NOPT TO TERMINAL ROUTES FROM TOURS TO CUKAV.

10/1/2019: THIS IS A CORRECTED COPY OF THE FORM APPROVED ON: 08/14/2019:
1. CHANGED AIRPORT NAME FROM "HEART OF TEXAS INDUSTRIAL" TO "TSTC WACO".

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZFW, WACO APP CON, AMGR

FLIGHT CHECKED BY
MARK STEPHEN CORDEIRO

Digitally signed by
WARDELL HENNING
Oct 23, 2019

OFFICE
FIOG

DATE
07/03/2019

DEVELOPED BY
WARDELL HENNING (MICHAEL W HARRIS)

Digitally signed by
WARDELL HENNING
Oct 23, 2019

OFFICE
AJV-A432

DATE
04/18/2019

APPROVED BY
LONNIE EVERHART

Digitally signed by
WARDELL HENNING
Oct 23, 2019

OFFICE
AJV-A430

DATE

TITLE
MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KCNW
RUNWAY	RW17L
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W17A
LTP/FTP LATITUDE	313905.7475N
LTP/FTP LONGITUDE	0970425.7230W
LTP/FTP ELLIPSOIDAL HEIGHT	+01164
FPAP LATITUDE	313736.5375N
FPAP LONGITUDE	0970421.2620W
THRESHOLD CROSSING HEIGHT (TCH)	00051.7
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0128
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0
CRC REMAINDER	7905A644

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+01432
FPAP ORTHOMETRIC HEIGHT	+01432