

**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 ID</u> D60	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 30	<u>ORIGINAL/AMENDMENT</u> 1D	<u>CITY</u> TIOGA	<u>STATE</u> ND
<u>AIRPORT ELEVATION</u> 2271	<u>TDZE</u> 2271	<u>SUPERSEDED</u> RNAV (GPS) RWY 30	<u>DATED</u> 12/05/2019	<u>MAG VAR</u> 8E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 14 MAY 2026	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>EPOCH YEAR</u> 2015
			<u>CANCEL/SUSPEND</u>	

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>
FONIA		RENLY		TF	FO	1.00	083.10	19.33	4500
ERUVE	IAF	RENLY	NOPT	TF	FB	1.00	256.75	7.07	4500
RENLY	IF/IAF	GAZUH		TF	FB	1.00	305.39	6.02	3800
GAZUH	FAF	CETBO/2.70 NM TO RW30		TF	FB	0.30	305.31	1.98	
CETBO/2.70 NM TO RW30		RW30	MAP	TF	FO	0.30	305.31	2.70	
RW30	MAP	3200 MSL		CA			305.31		3200
3200 MSL		RENLY		DF	FO	1.00			4500

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW30

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3200 THEN CLIMBING RIGHT TURN TO 4500 DIRECT RENLY AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

- | | | | | | |
|---|----------------------------|----------------|-----------------------|------------------------|---------|
| 1. PT | SIDE OF COURSE | OUTBOUND | FT WITHIN | MILES OF | (IAF) |
| 2. HOLD SE RENLY, RT, 305.39 INBOUND, 4500 IN LIEU OF PT (IAF), MAX 6000. | | | | | |
| 3. FAC: 305.31 | FAF: GAZUH | | DIST FAF TO MAP: 4.68 | DIST FAF TO THLD: 4.68 | |
| 4. MIN ALT: RENLY 4500, GAZUH 3800, CETBO/2.70 NM TO RW30 3160 | | | | | |
| 5. DIST TO THLD FROM OM: | MM: | IM: | 150 HAT: | 250 HAT: 0.66 | GS ANT: |
| 6. MIN GP INCPT: 3800 | GP ALT AT PFAF: GAZUH 3800 | | | OM: | MM: |
| 7. GP ANGLE: 3.00 | 34:1: IS NOT CLEAR | 20:1: IS CLEAR | TCH: 40.0 | | IM: |
| 8. MSA FROM: RW30 4100 | | | | | |



PBN REQUIREMENTS NOTE:

RNP APCH - GPS.

NOTES:

CHART NOTE: RWY 30 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -19°C OR ABOVE 54°C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART NOTE: CIRCLING NA TO RWYS 3 AND 21.

ADDITIONAL FLIGHT DATA:

CHART FAS OBST: 2435 TRANSMISSION_LINE (38-028260) 482033N/1025126W.
CHART VDP AT 1.33 NM TO RW30.
WAAS CHANNEL # 56630
REFERENCE PATH ID: W30A
LTP HAE: 673.8 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 800-2 1/4, 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	2521	1	250	2521	1	250	2521	1	250	2521	1	250			
LNAV/VNAV DA	2712	1 3/8	441	2712	1 3/8	441	2712	1 3/8	441	2712	1 3/8	441			
LNAV MDA	2720	1	449	2720	1	449	2720	1 3/8	449	2720	1 3/8	449			
CIRCLING	2820	1	549	2980	1	709	2980	2	709	3000	2 1/4	729			

CHANGES - REASONS

- INCORPORATED CHANGES FROM NOTAMS FOR AMDTS 1A, 1B, AND 1C INTO FORM - IAW 8260.19K, PARA 8-3-4 C (3).
- TERMINAL ROUTE: UPDATED COURSE "CETBO/2.70 NM TO RW30 TO RW30 AND RW30 TO 3200 MSL" FROM "305.29" TO "305.31" - NEW EVALUATION.
- PROFILE LINE 2: ADDED "MAX 6000" - IAW 8260.19K, PARA 8-6-7 B (2).
- PROFILE LINE 4: REMOVED ASTERISK (*) - NO LONGER REQUIRED.
- PROFILE LINE 5: ADDED 250 HAT: 0.66 - MOVED FROM ADDITIONAL FLIGHT DATA/IAW 8260.19K, PARA 8-6-7 E (3).
- PROFILE LINE 7: ADDED 20:1 IS CLEAR - NO 20:1 PENETRATIONS FOUND.
- PROFILE LINE 8: CHANGED FROM "RW 30 4000" TO "RW30 4100" - NEW CONTROLLING OBSTACLE.
- PBN REQUIREMENTS NOTE: CHANGED FROM "RNP APCH" TO "RNP APCH-GPS" - IAW 8260.19K, PARA 8-6-8 D (5).
- NOTES: UPDATED FROM "CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT" TO "CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET})" - IAW 8260.19K, PARA 8-6-10 M (1).
- NOTES: REMOVED "'LNAV ONLY" - NO LONGER NEEDED.
- ADDITIONAL FLIGHT DATA: ADDED "CHART VDP: 1.33 NM TO RW30" - IAW 8260.19K, PARA 8-6-10 M (2).
- ADDITIONAL FLIGHT DATA: CHANGED FAS CHART OBSTACLE FROM "2429 TREE 482138N/1025305W" TO "2435 TRANSMISSION_LINE (38-028260) 482033N/1025126W" - NEW CONTROLLING OBSTACLE.
- ADDITIONAL FLIGHT DATA: REMOVED CHART 2726 TOWER (38-001074) 481953N/1024714W - NO LONGER REQUIRED.
- ADDITIONAL FLIGHT DATA: DELETED "CHART CIRCLING ICON" - NO LONGER REQUIRED IAW MEMO #279: REVISED CIRCLING MANEUVERING AREA CRITERIA IMPLEMENTATION PLAN.
- FAS DATA BLOCK INFORMATION: CRC REMAINDER CHANGED FROM "5B5E56F8" TO "C7055008" - FPAP LATITUDE/LONGITUDE UPDATED FROM "482330.4500N/1025459.0500W" TO "482330.4485N/1025459.0505W."



COORDINATED WITH:

A4A

☐

ALPA

☒

AOPA

☒

APA

☐

HAI

☐

NBAA

☒

OTHER: ZMP, AMGR

FLIGHT CHECKED BY

JOEL P MURPHY

Digitally signed by

RAKE MCGRAW

Mar 13, 2026

OFFICE

AJF

DATE

03/11/2026

DEVELOPED BY

ROBERT G HAMILTON (KAMARUDINI R. RAIMI)

Digitally signed by

RAKE MCGRAW

Mar 13, 2026

OFFICE

AJV-A433

DATE

11/03/2025

APPROVED BY

ROBERT G HAMILTON

Digitally signed by

RAKE MCGRAW

Mar 13, 2026

OFFICE

AJV-A433

DATE

TITLE

MANAGER

FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	D60
RUNWAY	RW30
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W30A
LTP/FTP LATITUDE	482229.4515N
LTP/FTP LONGITUDE	1025321.6780W
LTP/FTP ELLIPSOIDAL HEIGHT	+06738
FPAP LATITUDE	482330.4485N
FPAP LONGITUDE	1025459.0505W
THRESHOLD CROSSING HEIGHT (TCH)	00040.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1192
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	C7055008

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K3
LTP ORTHOMETRIC HEIGHT	+06921
FPAP ORTHOMETRIC HEIGHT	+06921

