

**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>	<u>PROCEDURE NAME</u>	<u>ORIGINAL/AMENDMENT</u>	<u>CITY</u>	<u>STATE</u>	
ITH	RNAV (GPS) RWY 32	ORIG-D	ITHACA	NY	
<u>AIRPORT ELEVATION</u>	<u>TDZE</u>	<u>SUPERSEDED</u>	<u>DATED</u>	<u>MAG VAR</u>	<u>EPOCH YEAR</u>
1099	1099	RNAV (GPS) RWY 32	01/30/2020	12W	1985
<u>FACILITY</u>	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u>	<u>REQUIRED EFFECTIVE DATE</u>	<u>CANCEL/SUSPEND</u>	
RNAV			ROUTINE		

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>
CFB VOR/DME	IAF	OCCIE		TF	FB	1.00	355.00	9.95	3400
OCCIE	IF	CONUL		TF	FB	1.00	324.69	9.59	3000
CONUL	FAF	RW32	MAP	TF	FO	0.30	324.58	5.36	
RW32	MAP	1385 MSL		CA			324.58		
1385 MSL		STATN		DF	FB	1.00			
STATN		VAFKU		TF	FO	1.00	282.19	7.67	3700

MISSED APPROACH

MAP:

LPV: DA
LNAV: RW32

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3700 DIRECT STATN AND ON TRACK 282.19 TO VAFKU AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

- PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
- PROFILE STARTS AT OCCIE
- FAC: 324.58 FAF: CONUL DIST FAF TO MAP: 5.36 DIST FAF TO THLD: 5.36
- MIN ALT: OCCIE 3400, CONUL 3000
- DIST TO THLD FROM OM: MM: IM: 150 HAT: 286 HAT: 0.68 GS ANT: IM:
- MIN GP INCPT: 3000 GP ALT AT PFAF: CONUL 3000 OM: MM:
- GP ANGLE: 3.20 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 53.9
- MSA FROM: RW32 3700



PBN REQUIREMENTS NOTE:

RNP APCH - GPS.

NOTES:

CHART NOTE: RWY 32 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: CIRCLING NA TO RWYS 15 AND 33.
CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO LNAV CAT A/C/D.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON CFB VOR/DME AIRWAY RADIALS 310 CW 015.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE LPV ALL CATS VISIBILITY TO RVR 4500.

ADDITIONAL FLIGHT DATA:

HOLD SW, RT, 050.65 INBOUND.
CHART FAS OBST: 2139 TOWER (36-000513) 422754N/0762223W.
CHART VDP AT 3.38 NM TO RW32.
WAAS CHANNEL # 62815
REFERENCE PATH ID: W32A
CHART CIRCLING ICON.
LTP HAE: 301.9 M

MINIMUMS:

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

ALTERNATE: NA ☐ CAT A, B 1300-2, CAT C 1300-3, CAT D 1400-3, 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	1385	2400	286	1385	2400	286	1385	2400	286	1385	2400	286			
LNAV MDA	2300	4000	1201	2300	5500	1201	2300	3	1201	2300	3	1201			
CIRCLING	2300	1 1/4	1201	2300	1 1/2	1201	2300	3	1201	2440	3	1341			

CHANGES - REASONS

- INCORPORATED P-NOTAM ORIG-C INTO FORM – IAW 8260.19J 8-3-4C(3).
- PROFILE LINE 5: ADDED “DIST TO THLD FROM 286 HAT: 0.68”, REMOVED FROM ADDITIONAL FLIGHT DATA – IAW 8260.19J 8-6-7E(3).
- CHANGED “CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO LNAV CAT A” TO “CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO LNAV CAT A/C/D” – CANCELS FDC NOTAM 2/8113.
- CHANGED “CHART NOTE: FOR INOPERATIVE ALS, INCREASE LNAV CAT B VISIBILITY 1/4 SM” TO “CHART NOTE: FOR INOPERATIVE ALS, INCREASE LPV ALL CATS VISIBILITY TO RVR 4500” – LOWERED LPV VISIBILITY IAW 8260.3F TABLE 3-3-1.
- MOVED ALTIMETER AND ASSOCIATED NOTES TO 8260-9 AS A CONTINGENCY NOTE - IAW 8260.19J 8-6-10F(3).
- CHANGED PBN REQUIREMENT NOTE FROM “RNP APCH” TO “RNP APCH – GPS” – IAW 8260.19J 8-6-8D(5)A(1).
- ADDITIONAL FLIGHT DATA: CHANGED “CHART FAS OBST: 2139 TOWER 422754N/0762223W” TO “CHART FAS OBST: 2139 TOWER (36-000513) 422754N/0762223W” – IAW 8260.19J 8-6-11C.
- ADDITIONAL FLIGHT DATA: REMOVED “*” FROM “CHART VDP AT 3.38 NM TO RW32*” – NO LONGER REQUIRED PER CURRENT CRITERIA.
- ADDITIONAL FLIGHT DATA: REMOVED “*LNAV ONLY” – NO LONGER REQUIRED PER CURRENT CRITERIA.
- ALTERNATE MINIMUMS: CHANGED “CAT A, B 1300-2, CAT C, D 1300-3” TO “CAT A, B 1300-2, CAT C 1300-3, CAT D 1400-3, NA WHEN LOCAL WEATHER NOT AVAILABLE” – CANCELS FDC NOTAM 2/8113.
- MINIMUMS: LOWERED LPV ALL CATS VISIBILITY FROM “4000” TO “2400”, LNAV CAT A/B FROM “6000” TO “4000/5500” - IAW 8260.3F TABLES 3-3-1, 3-3-3, 3-3-4.
- MINIMUMS: RAISED LNAV CAT C/D VISIBILITY FROM “2 1/2 SM” TO “3 SM” – CANCELS FDC NOTAM 2/8113.



COORDINATED WITH:

A4A

ALPA

X

AOPA

X

APA

HAI

NBAA

X

OTHER:

ITH ATCT, ELM APP CON, ZNY, AMGR

FLIGHT CHECKED BY

PROCESSED IAW TECHNICAL SUPPORT GROUP (AJF-17) MEMO DATED 07/07/2021 GUIDANCE
FOR PROCEDURAL CHANGES REQUIRING FLIGHT INSPECTION/VALIDATION

Digitally signed by
CASIMIR L TABAKA
Oct 21, 2024

OFFICE

DATE

DEVELOPED BY

CASIMIR L. TABAKA (ROBERT A. SWINSON)

Digitally signed by
CASIMIR L TABAKA
Oct 21, 2024

OFFICE

AJV-A432

DATE

05/01/2024

APPROVED BY

CASIMIR L. TABAKA

Digitally signed by
CASIMIR L TABAKA
Oct 21, 2024

OFFICE

AJV-A432

DATE

01/16/2025

TITLE

MANAGER

FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KITH
RUNWAY	RW32
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W32A
LTP/FTP LATITUDE	422905.6305N
LTP/FTP LONGITUDE	0762657.9535W
LTP/FTP ELLIPSOIDAL HEIGHT	+03019
FPAP LATITUDE	422952.1900N
FPAP LONGITUDE	0762806.5900W
THRESHOLD CROSSING HEIGHT (TCH)	00053.9
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.20
COURSE WIDTH AT THRESHOLD	106.5
LENGTH OFFSET	0000
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	62F1BC30

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+03350
FPAP ORTHOMETRIC HEIGHT	+03350



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
STANDARD INSTRUMENT APPROACH PROCEDURE DATA RECORD**

<u>AIRPORT ID</u> ITH	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 32	<u>AMDT NO.</u> ORIG-D	<u>CITY</u> ITHACA	<u>STATE</u> NY	<u>AIRPORT ELEVATION</u> 1099	<u>FACILITY</u> RNAV
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PART A: OBSTRUCTION DATA SEGMENTS

INITIAL

FROM CFB VOR/DME **TO** OCCIE

RNP 1.00 DISTANCE 9.95 PAT MAP HAT HMAS

<u>OBSTRUCTION</u>	<u>COORDINATES</u>	<u>ELEV MSL</u>	<u>HORZ</u>	<u>VERT</u>	<u>AC</u>	<u>ROC</u>	<u>OCS</u>	<u>CG</u>	<u>CGTA</u>	<u>ADJUSTMENTS</u>	<u>MIN ALT</u>
AAO	421651.00N/0761257.00W	1923	164	98	4E	1000				AT477	3400
TERRAIN	421651.00N/0761257.00W	1723 (1700)								AS1500	3200

COMPUTATIONS

ALT KIAS KTAS HAA VKTW TR BA DTA COURSE CHANGE DVEB VEB OCS RF CENTER FIX/DISTANCE

SEGMENT REMARKS:

INTERMEDIATE

FROM OCCIE **TO** CONUL

RNP 1.00 DISTANCE 9.59 PAT MAP HAT HMAS

<u>OBSTRUCTION</u>	<u>COORDINATES</u>	<u>ELEV MSL</u>	<u>HORZ</u>	<u>VERT</u>	<u>AC</u>	<u>ROC</u>	<u>OCS</u>	<u>CG</u>	<u>CGTA</u>	<u>ADJUSTMENTS</u>	<u>MIN ALT</u>
AAO	422421.00N/0761630.00W	2212	164	98	4E	500				AC98	2900
TERRAIN	422421.00N/0761630.00W	2012 (2000)								AS1000	3000

COMPUTATIONS

ALT KIAS KTAS HAA VKTW TR BA DTA COURSE CHANGE DVEB VEB OCS RF CENTER FIX/DISTANCE

SEGMENT REMARKS:



FINAL: LPV

FROM

CONUL

TO

RW32

<u>RNP</u>	<u>DISTANCE</u>	<u>PAT</u>	<u>MAP</u>		<u>HAT</u>		<u>HMAS</u>				
0.30	5.36		DA		286						
<u>OBSTRUCTION</u>	<u>COORDINATES</u>	<u>ELEV MSL</u>	<u>HORZ</u>	<u>VERT</u>	<u>AC</u>	<u>ROC</u>	<u>OCS</u>	<u>CG</u>	<u>CGTA</u>	<u>ADJUSTMENTS</u>	<u>MIN ALT</u>
TREE (KITH0044)	422845.90N/0762621.52W	1161	20	3	1A		25.34:1				1385

COMPUTATIONS

ALT

KIAS

KTAS

HAA

VKTW

TR

BA

DTA

COURSE CHANGE

DVEB

VEB OCS

RF CENTER FIX/DISTANCE

SEGMENT REMARKS:

FINAL: LNAV

FROM

CONUL

TO

RW32

<u>RNP</u>	<u>DISTANCE</u>	<u>PAT</u>	<u>MAP</u>		<u>HAT</u>		<u>HMAS</u>				
0.30	5.36		RW32		1201						
<u>OBSTRUCTION</u>	<u>COORDINATES</u>	<u>ELEV MSL</u>	<u>HORZ</u>	<u>VERT</u>	<u>AC</u>	<u>ROC</u>	<u>OCS</u>	<u>CG</u>	<u>CGTA</u>	<u>ADJUSTMENTS</u>	<u>MIN ALT</u>
TOWER (36-000513)	422754.00N/0762223.00W	2139	500	50	5D	250				AC50 SA-143	2300

COMPUTATIONS

ALT

KIAS

KTAS

HAA

VKTW

TR

BA

DTA

COURSE CHANGE

DVEB

VEB OCS

RF CENTER FIX/DISTANCE

SEGMENT REMARKS:



MISSED APPROACH: LPV

FROM

DA

TO

VAFKU

RNP 0.30-1.00	DISTANCE	PAT	MAP				HAT	HMAS 1161			
OBSTRUCTION	COORDINATES	ELEV MSL	HORZ	VERT	AC	ROC	OCS	CG	CGTA	ADJUSTMENTS	MIN ALT
							ASC				3700
AAO	422954.00N/0763715.00W	1464	250	125	4E	1000				SA-10	2500
TERRAIN	422957.00N/0763748.00W	1237 (1200)								AS1500	2700

COMPUTATIONS

ALT

KIAS

KTAS

HAA

VKTW

TR

BA

DTA

COURSE CHANGE

DVEB

VEB OCS

RF CENTER FIX/DISTANCE

SEGMENT REMARKS:

MISSED APPROACH: LNAV

FROM

RW32

TO

VAFKU

<u>RNP</u> 0.30-1.00	<u>DISTANCE</u>	<u>PAT</u>	<u>MAP</u>				<u>HAT</u>	<u>HMAS</u> 2050			
<u>OBSTRUCTION</u>	<u>COORDINATES</u>	<u>ELEV MSL</u>	<u>HORZ</u>	<u>VERT</u>	<u>AC</u>	<u>ROC</u>	<u>OCS</u>	<u>CG</u>	<u>CGTA</u>	<u>ADJUSTMENTS</u>	<u>MIN ALT</u>
							ASC				3700
AAO	422954.00N/0763715.00W	1464	250	125	4E	1000				SA-10	2500
TERRAIN	422957.00N/0763748.00W	1237 (1200)								AS1500	2700

COMPUTATIONS

ALT

KIAS

KTAS

HAA

VKTW

TR

BA

DTA

COURSE CHANGE

DVEB

VEB OCS

RF CENTER FIX/DISTANCE

SEGMENT REMARKS:



AIRPORT ID

ITH

PROCEDURE NAME

RNAV (GPS) RWY 32

AMDT NO.

ORIG-D

CITY

ITHACA

STATE

NY

AIRPORT ELEVATION

1099

FACILITY

RNAV

CIRCLING

☐ ALL CATS

☒ CAT A

☒ CAT B

☒ CAT C

☒ CAT D

☐ CAT E

☐ NOT AUTHORIZED

OBSTRUCTION	COORDINATES	RADIUS	HAA	ELEV MSL	HORZ	VERT	AC	ROC	OCS	ADJUSTMENTS	MIN ALT
CATEGORY A											
9. TREE (36-103377)	423026.50N/0762724.51W	1.30	1201	1240	20	10	1B	300		SI	2300
CATEGORY B											
10. TREE (36-103230)	423113.31N/0762643.18W	1.84	1201	1297	20	10	1B	300		SI	2300
CATEGORY C											
11. TOWER (36-006068)	422758.00N/0762351.00W	2.90	1201	1620	250	50	4D	300		SI	2300
CATEGORY D											
12. TOWER (36-000513)	422754.20N/0762222.30W	3.82	1341	2136	250	3	4A	300			2440

CIRCLING REMARKS:

MSA

CENTER	RADIUS
RW32	25

SECTOR	OBSTRUCTION	COORDINATES	BEARING	DISTANCE	ELEV MSL	HORZ	VERT	AC	ROC	OCS	ADJUSTMENTS	MIN ALT
360-360	TWR (36-001183)	425250.00N/0761144.00W	037	26.3	2610	500	125	5E	1000			3700

MSA REMARKS:

NOTES/EXPLANATIONS FROM PROCEDURE SEGMENTS:



PART B: SUPPLEMENTAL DATA

COMMUNICATIONS WITH

ZNY ARTCC, ELM APP CON, ITH TOWER

<u>WX SERVICE</u>	<u>LOCATION</u>	<u>HRS OPERATION</u>	<u>ALTIMETER SOURCE</u>	<u>DISTANCE</u>	<u>SERVICE-A</u>	<u>ADJUSTMENTS</u>
AWOS-3PT	ITH	24	ITH	0.13	Y	0
<u>BACK-UP WX SERVICE</u>	<u>LOCATION</u>	<u>HRS OPERATION</u>	<u>ALTIMETER SOURCE</u>	<u>DISTANCE</u>	<u>SERVICE-A</u>	<u>ADJUSTMENTS</u>
ASOS	ELM	24	ELM	27.52	Y	85

WX REMARKS:

RASS PRESSURE PATTERNS THE SAME
ITH 1099, ELM 946
RA = 84.8.

<u>PRIMARY NAVAID</u>	<u>MONITOR POINT</u>	<u>HRS OPERATION</u>	<u>CAT</u>
<u>APPROACH AND RUNWAY LIGHTING SYSTEM</u>	<u>RUNWAY MARKINGS</u>	<u>RUNWAY VISUAL RANGE</u>	
RW15			
RW33			
RW14 - HIRL (PCL), PAPI-4L	PIR-G	ROLL OUT	
RW32 - MALSR (PCL), HIRL (PCL), PAPI-4L	PIR-G	APPROACH	

<u>GLIDESLOPE ANGLE</u>	<u>ELEV RWY THRESHOLD</u>	<u>TCH</u>	<u>ELEV GS ANTENNA</u>	<u>DISTANCE FROM RWY</u>	<u>VGSI ANGLE</u>	<u>TCH</u>
3.20	1099.0	53.9			3.20	53.0

FINAL APPROACH COURSE AIMING

RUNWAY THRESHOLD	☒	FT FROM THRESHOLD	DISPLACED THRESHOLD DISTANCE
ON CENTERLINE	☒	FT FROM CENTERLINE	

CRITICAL TEMPERATURES

<u>CRITICAL LOW</u>	<u>CRITICAL HIGH</u>	<u>ACT</u>	<u>APT ISA</u>
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CRITICAL TEMPERATURE REMARKS:

"VISUAL PORTION OF FINAL" PENETRATIONS

PENETRATIONS REMARKS:

"VISUAL PORTION OF FINAL" PENETRATIONS
RW32 34:1 PENETRATION:1169' MSL TREE 422844.23N-0762638.05W (KITH0047).



HELICOPTER 'VISUAL PORTION OF FINAL' PENETRATIONS

and/or

5280-FT "PROCEED VFR" SEGMENT LEVEL SURFACE AREA PENETRATIONS

PENETRATIONS REMARKS:

PART C: GENERAL REMARKS:

PRECIPITOUS TERRAIN EVALUATION COMPLETED.

50 FT VEGETATION USED PER FPT.

FOR CONTINGENCY PURPOSES:
WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE ELM ALTIMETER SETTING: INCREASE LPV DA TO 1470 FEET AND ALL VISIBILITIES TO RVR 3500; INCREASE ALL MDA 100 FEET.
FOR INOPERATIVE ALS, WHEN USING ELM ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO RVR 5500, AND INCREASE LNAV CAT B VISIBILITY TO 1 1/2 SM.

LNAV/VNAV NOT DEVELOPED, FINAL PENETRATION MOVES DA WITHIN 1 NM OF FAF.

CIRCLING NA TO RWYS 15 AND 33 - TURF RUNWAY.

PROCEDURE DESIGNED AT 3.2 DEGREE GLIDEPATH TO MATCH ILS RWY 32.

ORDER 8260.3, CHAPTER 2, NEW CIRCLING CRITERIA APPLIED.

PART D: AIRSPACE

DOCKET #

ALL DISTANCES TO 1/100NM; ELEVATION TO NEAREST 100 FEET; COORDINATES TO 1/100 SECOND; DEG TO 1/100 DEGREE

DISTANCE FROM	THLD	TO 1000FT POINT	4.85
WIDTH OF	FINAL	SEGMENT AT 1000FT POINT	1.96
TRUE COURSE OF	FINAL	SEGMENT CONTAINING 1000FT POINT	312.58
HIGH TERRAIN IN	FINAL	SEGMENT CONTAINING 1000FT POINT	1800
DISTANCE FROM	THLD	TO 1500FT POINT	14.95
WIDTH OF	INTERMEDIATE	SEGMENT AT 1500FT POINT	4.00
TRUE COURSE OF	INTERMEDIATE	SEGMENT CONTAINING 1500FT POINT	312.69
HIGH TERRAIN IN	INTERMEDIATE	SEGMENT CONTAINING 1500FT POINT	2000

THRESHOLD COORDINATES (IF STR-IN)	422905.63N/0762657.95W
ARP COORDINATES	422928.90N/0762731.40W
RUNWAY APCH END AND DIST FURTHEST FROM ARP	RUNWAY 14 DISTANCE 0.58 NM
FAF COORDINATES	422528.00N/0762137.79W
FIX NAME COORDINATES	

REMARKS

PART E: PREPARED BY

NAME	OFFICE	DATE	TITLE
CASIMIR L. TABAKA (ROBERT A. SWINSON)	AJV-A432	05/01/2024	AERONAUTICAL INFORMATION SPECIALIST

