

U.S. Department
of Transportation

800 Independence Ave., S.W.
Washington, D.C. 20591

**Federal Aviation
Administration**

Transmittal Letter 18-17

June 29, 2018

**PREPARED BY THE AERONAUTICAL INFORMATION GROUP, AJV-53
(AVAILABLE ON THE WEB AT [HTTP://NFDC.FAA.GOV](http://NFDC.FAA.GOV))**

**The enclosed Standard Instrument Approach Procedures, Departure
Procedures/Takeoff Minimums and Fix Actions are effective as indicated.**

**The following is a corrected copy of a procedure originally published in TL 18-15 on June 1,
2018. This correction was inadvertently omitted in TL 18-16. It is included here, effective
July 19, 2018.**

New York, NY, John F Kennedy Intl, RNAV (GPS) Y RWY 4R, Amdt 2A

RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33						Bearings, headings, courses, 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 in feet RVR.										
TERMINAL ROUTES											MISSED APPROACH					
FROM		TO			COURSE AND DISTANCE			ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW04R (DO NOT EXCEED 210 KIAS UNTIL GAALO) CLIMB TO 4000 DIRECT GAALO AND ON TRACK 082.67 TO HIRBO AND HOLD. ADDITIONAL FLIGHT DATA: HOLD W, LT, 079.00 INBOUND. CHART FAS OBST: 210 BLDG 403529N/0734715W. DISTANCE TO THLD FROM 200 HAT: 0.46 NM. CHART VDP AT 1.42 NM TO RW04R* *LNAV ONLY. WAAS CHANNEL # 81819 REFERENCE PATH ID: W04B CHART CIRCLING ICON. LTP HAE: -28.4 M						
VERRU (IF)		EBBEE (TF) (FB) (RNP 1.00)			043.68 / 5.99			1500								
EBBEE (FAF)		RW04R (MAP) (TF) (FO) (RNP 0.30)			043.73 / 4.51											
RW04R (MAP)		212 MSL (CA)			043.73											
212 MSL		GAALO (DF) (FB) (RNP 1.00)								MAG VAR: 13W EPOCH YEAR: 2020						
GAALO		HIRBO (TF) (FO) (RNP 1.00)			082.67 / 21.05			4000								
THIS IS A CORRECTED COPY OF A PROCEDURE ORIGINALLY PUBLISHED IN TL 18-15.																
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. PROFILE STARTS AT VERRU 3. FAC: <u>043.73</u> FAF: <u>EBBEE</u> DIST FAF TO MAP: <u>4.51</u> THLD: <u>4.51</u> 4. MIN. ALT: <u>VERRU 2000, EBBEE 1500</u> 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____ 6. MIN GS INCPT: <u>1500</u> GS ALT AT: <u>EBBEE 1500</u> OM: _____ MM: _____ IM: _____ 7. GS ANGLE: <u>3.00</u> TCH: <u>52.7</u> 20:1 IS CLEAR 34:1 IS CLEAR 8. MSA FROM: <u>RW04R 2900</u>																
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A		STANDARD							
CATEGORY =====>		A			B			C			D			E		
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	
LPV DA	212	1800	200	212	1800	200	212	1800	200	212	1800	200				
LNAV/VNAV DA	369	4000	357	369	4000	357	369	4000	357	369	4000	357				
LNAV MDA	520	2400	508	520	2400	508	520	5500	508	520	5500	508				
CIRCLING	640	1	627	640	1	627	640	1 3/4	627	660	2	647				
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -12C (11F) OR ABOVE 54C (130F). CHART NOTE: SIMULTANEOUS APPROACH AUTHORIZED. CHART NOTE: LNAV PROCEDURE NA DURING SIMULTANEOUS OPERATIONS. CHART NOTE: USE OF FD OR AP PROVIDING RNAV TRACK GUIDANCE REQUIRED DURING SIMULTANEOUS OPERATIONS. (CONTINUED ON PAGE 2)																
CITY AND STATE NEW YORK, NY		ELEVATION: 13 TDZE: 12 AIRPORT NAME: JOHN F KENNEDY INTL			FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Y RWY 4R, AMDT 2A 19 JULY 2018					SUP: AMDT: 2 DATED 08/17/2017				



**RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

NOTES, (CONT.):**CHART PROFILE NOTE: VGSi AND RNAV GLIDEPATH NOT COINCIDENT (VGSi ANGLE {ANGLE}/TCH {FEET}).****CHART NOTE: FOR INOPERATIVE ALS, INCREASE LNAV/VNAV ALL CATS VISIBILITY TO RVR 6000 AND LNAV CAT C/D****VISIBILITY TO 1 3/8 SM.****PBN REQUIREMENTS NOTE: RNP APCH.**

CITY AND STATE

NEW YORK, NY

ELEVATION: 13**TDZE: 12**

AIRPORT NAME:

JOHN F KENNEDY INTL

FACILITY
IDENTIFIER:

RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

RNAV (GPS) Y RWY 4R, AMDT 2A

19 JULY 2018

SUP:

AMDT: 2

DATED: 08/17/2017

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION**DATA FIELD****DATA**

OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KJFK
RUNWAY	RW04R
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	Y
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W04B
LTP/FTP LATITUDE	403731.5320N
LTP/FTP LONGITUDE	0734613.2500W
LTP/FTP ELLIPSOIDAL HEIGHT	-00284
FPAP LATITUDE	403848.1430N
FPAP LONGITUDE	0734513.3835W
THRESHOLD CROSSING HEIGHT (TCH)	00052.7
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0192
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0

CRC REMAINDER

9324F9EA

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+00036
FPAP ORTHOMETRIC HEIGHT	+00036

QUALITY
4
CHECKED

CITY AND STATE NEW YORK, NY	ELEVATION: 13 TDZE: 12 AIRPORT NAME: JOHN F KENNEDY INTL	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Y RWY 4R, AMDT 2A 19 JULY 2018	SUP:
				AMDT: 2
				DATED: 08/17/2017

[4910-13]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 97

[Docket No. [31202](#); Amdt. No. [3807](#)]

**Standard Instrument Approach Procedures, and Takeoff Minimums
and Obstacle Departure Procedures; Miscellaneous Amendments**

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: This rule establishes, amends, suspends, or removes Standard Instrument Approach Procedures (SIAPs) and associated Takeoff Minimums and Obstacle Departure Procedures (ODPs) for operations at certain airports. These regulatory actions are needed because of the adoption of new or revised criteria, or because of changes occurring in the National Airspace System, such as the commissioning of new navigational facilities, adding new obstacles, or changing air traffic requirements. These changes are designed to provide safe and efficient use of the navigable airspace and to promote safe flight operations under instrument flight rules at the affected airports.

DATES: This rule is effective [INSERT DATE OF PUBLICATION IN THE FEDERAL REGISTER]. The compliance date for each SIAP, associated Takeoff Minimums, and ODP is specified in the amendatory provisions.

The incorporation by reference of certain publications

listed in the regulations is approved by the Director of the Federal Register as of [INSERT DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: Availability of matters incorporated by reference in the amendment is as follows:

For Examination

1. U.S. Department of Transportation, Docket Ops-M30, 1200 New Jersey Avenue SE, West Bldg., Ground Floor, Washington, D.C., 20590-0001.

2. The FAA Air Traffic Organization Service Area in which the affected airport is located;

3. The office of Aeronautical Navigation Products, 6500 South MacArthur Blvd., Oklahoma City, OK 73169 or,

4. The National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to:
http://www.archives.gov/federal_register/code_of_federal_regulations/ibr_locations.html.

Availability

All SIAPs and Takeoff Minimums and ODPs are available online free of charge. Visit the National Flight Data Center at nfdc.faa.gov to register. Additionally, individual SIAP and Takeoff Minimums and ODP copies may be obtained from the FAA Air Traffic Organization Service Area in which the affected airport is located.

FOR FURTHER INFORMATION CONTACT: Thomas J. Nichols, Flight Procedure Standards Branch (AFS-420), Flight Technologies and Programs Divisions, Flight Standards Service, Federal Aviation Administration, Mike Monroney Aeronautical Center, 6500 South MacArthur Blvd. Oklahoma City, OK. 73169 (Mail Address: P.O. Box 25082, Oklahoma City, OK 73125) Telephone: (405) 954-4164.

SUPPLEMENTARY INFORMATION:

This rule amends Title 14 of the Code of Federal Regulations, Part 97 (14 CFR part 97), by establishing, amending, suspending, or removes SIAPS, Takeoff Minimums and/or ODPS. The complete regulatory description of each SIAP and its associated Takeoff Minimums or ODP for an identified airport is listed on FAA form documents which are incorporated by reference in this amendment under 5 U.S.C. 552(a), 1 CFR part 51, and 14 CFR part 97.20. The applicable FAA forms are FAA Forms 8260-3, 8260-4, 8260-5, 8260-15A, and 8260-15B when required by an entry on 8260-15A.

The large number of SIAPs, Takeoff Minimums and ODPs, their complex nature, and the need for a special format make publication in the **Federal Register** expensive and impractical. Further, airmen do not use the regulatory text of the SIAPs, Takeoff Minimums or ODPs, but instead refer to their graphic depiction on charts printed by publishers of aeronautical materials. Thus, the advantages of incorporation by reference are realized and publication of the complete description of each

SIAP, Takeoff Minimums and ODP listed on FAA form documents is unnecessary. This amendment provides the affected CFR sections and specifies the types of SIAPs, Takeoff Minimums and ODPs with their applicable effective dates. This amendment also identifies the airport and its location, the procedure, and the amendment number.

Availability and Summary of Material Incorporated by Reference

The material incorporated by reference is publicly available as listed in the ADDRESSES section.

The material incorporated by reference describes SIAPS, Takeoff Minimums and/or ODPS as identified in the amendatory language for part 97 of this final rule.

The Rule

This amendment to 14 CFR part 97 is effective upon publication of each separate SIAP, Takeoff Minimums and ODP as Amended in the transmittal. Some SIAP and Takeoff Minimums and textual ODP amendments may have been issued previously by the FAA in a Flight Data Center (FDC) Notice to Airmen (NOTAM) as an emergency action of immediate flight safety relating directly to published aeronautical charts.

The circumstances that created the need for some SIAP and Takeoff Minimums and ODP amendments may require making them effective in less than 30 days. For the remaining SIAPs and Takeoff Minimums and ODPs, an effective date at least 30 days after publication is provided.

Further, the SIAPs and Takeoff Minimums and ODPs contained in this amendment are based on the criteria contained in the U.S. Standard for Terminal Instrument Procedures (TERPS). In developing these SIAPs and Takeoff Minimums and ODPs, the TERPS criteria were applied to the conditions existing or anticipated at the affected airports. Because of the close and immediate relationship between these SIAPs, Takeoff Minimums and ODPs, and safety in air commerce, I find that notice and public procedure under 5 U.S.C. 553(b) are impracticable and contrary to the public interest and, where applicable, under 5 U.S.C 553(d), good cause exists for making some SIAPs effective in less than 30 days.

The FAA has determined that this regulation only involves an established body of technical regulations for which frequent and routine amendments are necessary to keep them operationally current. It, therefore--(1) is not a "significant regulatory action" under Executive Order 12866; (2) is not a "significant rule" under DOT Regulatory Policies and Procedures (44 FR 11034; February 26, 1979) ; and (3) does not warrant preparation of a regulatory evaluation as the anticipated impact is so minimal. For the same reason, the FAA certifies that this amendment will not have a significant economic impact on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

List of Subjects in 14 CFR part 97:

Air Traffic Control, Airports, Incorporation by reference, Navigation (Air).

Issued in Washington, DC on [June 29, 2018](#)

A handwritten signature in black ink, appearing to read "John S. Duncan", with a stylized, flowing script.

John S. Duncan
Executive Director, Flight Standards Service

ADOPTION OF THE AMENDMENT

Accordingly, pursuant to the authority delegated to me, Title 14, Code of Federal Regulations, Part 97 (14 CFR part 97) is amended by establishing, amending, suspending, or removing Standard Instrument Approach Procedures and/or Takeoff Minimums and Obstacle Departure Procedures effective at 0901 UTC on the dates specified, as follows:

Part 97—Standard Instrument Approach Procedures

1. The authority citation for part 97 continues to read as follows:

AUTHORITY: 49 U.S.C. 106(f), 106(g), 40103, 40106, 40113, 40114, 40120, 44502, 44514, 44701, 44719, 44721-44722.

2. Part 97 is amended to read as follows:

Effective 16 August 2018

Deland, FL, Deland Muni-Sidney H Taylor Field, RNAV (GPS) RWY 5, Orig-B
 Deland, FL, Deland Muni-Sidney H Taylor Field, RNAV (GPS) RWY 12, Orig-A
 Deland, FL, Deland Muni-Sidney H Taylor Field, RNAV (GPS) RWY 23, Orig-A
 Deland, FL, Deland Muni-Sidney H Taylor Field, RNAV (GPS) RWY 30, Orig-A
 Easton, MD, Easton/Newnam Field, ILS OR LOC RWY 4, Amdt 2B
 Easton, MD, Easton/Newnam Field, RNAV (GPS) RWY 15, Orig-B
 Easton, MD, Easton/Newnam Field, RNAV (GPS) RWY 33, Orig-B
 Dayton, OH, James M Cox Dayton Intl, RNAV (RNP) Y RWY 24R, Orig-C
 Norwalk, OH, Norwalk-Huron County, RNAV (GPS) RWY 28, Orig-B
 Martin, SD, Martin Muni, RNAV (GPS) RWY 32, Amdt 1

Effective 13 September 2018

Ambler, AK, Ambler, RNAV (GPS) RWY 1, Amdt 1A
 Galena, AK, Edward G Pitka SR, RNAV (GPS) RWY 8, Amdt 3
 Galena, AK, Edward G Pitka SR, RNAV (GPS) RWY 26, Amdt 3
 Galena, AK, Edward G Pitka SR, Takeoff Minimums and Obstacle DP, Amdt 1
 Golovin, AK, Golovin NOME TWO, Graphic DP
 Golovin, AK, Golovin, RNAV (GPS) RWY 3, Amdt 1
 Golovin, AK, Golovin, RNAV (GPS)-A, Amdt 1
 Golovin, AK, Golovin, Takeoff Minimums and Obstacle DP, Amdt 1
 Flippin, AR, Marion County Rgnl, VOR-A, Amdt 15, CANCELED
 Pocahontas, AR, Pocahontas Muni, RNAV (GPS) RWY 18, Orig
 Pocahontas, AR, Pocahontas Muni, RNAV (GPS) RWY 36, Orig
 Pocahontas, AR, Pocahontas Muni, Takeoff Minimums and Obstacle DP, Amdt 1
 Pocahontas, AR, Pocahontas Muni, VOR OR GPS RWY 36, Amdt 6, CANCELED
 Fort Huachuca/Sierra Vista, AZ, Sierra Vista Muni-Libby AAF, NDB RWY 26, Amdt 4, CANCELED
 San Bernardino, CA, San Bernardino Intl, ILS OR LOC Z RWY 6, Amdt 3
 San Bernardino, CA, San Bernardino Intl, LOC Y RWY 6, Amdt 1
 San Bernardino, CA, San Bernardino Intl, RNAV (GPS) Y RWY 6, Amdt 1
 San Bernardino, CA, San Bernardino Intl, RNAV (GPS) Z RWY 6, Amdt 1
 Sterling, CO, Sterling Muni, NDB RWY 33, Amdt 3B, CANCELED
 DeFuniak Springs, FL, DeFuniak Springs, RNAV (GPS) RWY 9, Amdt 1A
 Immokalee, FL, Immokalee Rgnl, Takeoff Minimums and Obstacle DP, Amdt 2A
 Albany, GA, Southwest Georgia Rgnl, ILS OR LOC RWY 4, Amdt 13A
 West Union, IA, George L Scott Muni, VOR/DME-A, Amdt 4, CANCELED
 Champaign/Urbana, IL, University of Illinois-Willard, VOR RWY 4, Amdt 12A

Champaign/Urbana, IL, University of Illinois-Willard, VOR RWY 14L, Orig-B
 Champaign/Urbana, IL, University of Illinois-Willard, VOR RWY 22, Amdt 8A
 Chicago, IL, Chicago O'Hare Intl, Takeoff Minimums and Obstacle DP, Amdt 20D
 Lawrenceville, IL, Lawrenceville-Vincennes Intl, VOR RWY 36, Amdt 1C, CANCELED
 Mount Carmel, IL, Mount Carmel Muni, VOR/DME RWY 22, Amdt 10A, CANCELED
 Anderson, IN, Anderson Muni-Darlington Field, NDB RWY 30, Amdt 8A
 Fort Wayne, IN, Fort Wayne Intl, ILS OR LOC RWY 32, Amdt 31A
 Huntington, IN, Huntington Muni, NDB RWY 9, Amdt 2, CANCELED
 Jeffersonville, IN, Clark Rgnl, ILS OR LOC RWY 18, Amdt 4
 Jeffersonville, IN, Clark Rgnl, NDB RWY 18, Amdt 3
 Jeffersonville, IN, Clark Rgnl, RNAV (GPS) RWY 18, Amdt 1
 Jeffersonville, IN, Clark Rgnl, Takeoff Minimums and Obstacle DP, Amdt 3
 Richmond, IN, Richmond Muni, VOR RWY 6, Amdt 12A, CANCELED
 Shelbyville, IN, Shelbyville Muni, RNAV (GPS) RWY 19, Amdt 1C
 Winchester, IN, Randolph County, RNAV (GPS) RWY 8, Amdt 2
 Winchester, IN, Randolph County, VOR-A, Amdt 10
 Wellington, KS, Wellington Muni, RNAV (GPS) RWY 18, Amdt 2
 Wellington, KS, Wellington Muni, RNAV (GPS) RWY 36, Amdt 2
 Wellington, KS, Wellington Muni, Takeoff Minimums and Obstacle DP, Amdt 1
 Wellington, KS, Wellington Muni, VOR RWY 18, Amdt 3
 Galliano, LA, South Lafourche Leonard Miller Jr, RNAV (GPS) RWY 18, Amdt 2B
 Pittsfield, ME, Pittsfield Muni, RNAV (GPS) RWY 18, Amdt 1
 Pittsfield, ME, Pittsfield Muni, RNAV (GPS) RWY 36, Amdt 1
 Escanaba, MI, Delta County, RNAV (GPS) RWY 1, Orig-C
 Escanaba, MI, Delta County, Takeoff Minimums and Obstacle DP, Amdt 1
 Escanaba, MI, Delta County, VOR RWY 1, Orig-D
 Lapeer, MI, DuPont-Lapeer, VOR-A, Amdt 1
 Newberry, MI, Luce County, VOR RWY 29, Amdt 12, CANCELED
 Fredericktown, MO, A Paul Vance Fredericktown Rgnl, Takeoff Minimums and Obstacle DP, Amdt 1A
 Vicksburg, MS, Vicksburg Muni, RNAV (GPS) RWY 1, Amdt 1B
 Vicksburg, MS, Vicksburg Muni, RNAV (GPS) RWY 19, Orig-B
 Asheville, NC, Asheville Rgnl, ILS OR LOC RWY 35, Orig
 Asheville, NC, Asheville Rgnl, ILS OR LOC RWY 35, Orig, CANCELED
 Asheville, NC, Asheville Rgnl, LOC RWY 17, Orig
 Asheville, NC, Asheville Rgnl, RNAV (GPS) RWY 17, Orig
 Asheville, NC, Asheville Rgnl, RNAV (GPS) RWY 17, Orig, CANCELED
 Asheville, NC, Asheville Rgnl, RNAV (GPS) RWY 35, Orig
 Asheville, NC, Asheville Rgnl, RNAV (GPS) RWY 35, Orig, CANCELED
 Asheville, NC, Asheville Rgnl, Takeoff Minimums and Obstacle DP, Amdt 1
 Tioga, ND, Tioga Muni, Takeoff Minimums and Obstacle DP, Amdt 1
 Kimball, NE, Kimball Muni/Robert E Arraj Field, RNAV (GPS) RWY 28, Amdt 1C
 Gallup, NM, Gallup Muni, RNAV (GPS) RWY 24, Orig-A
 Buffalo, NY, Buffalo Niagara Intl, RNAV (RNP) Z RWY 23, Orig-B
 New York, NY, Long Island Mac Arthur, Takeoff Minimums and Obstacle DP, Amdt 5A

Wellsville, NY, Wellsville Muni Arpt, Tarantine Fld, VOR-A, Amdt 6, CANCELED
 Columbus, OH, John Glenn Columbus Intl, RNAV (RNP) Z RWY 10L, Amdt 1C
 Columbus, OH, John Glenn Columbus Intl, RNAV (RNP) Z RWY 10R, Amdt 1C
 Delaware, OH, Delaware Muni - Jim Moore Field, RNAV (GPS) RWY 10, Amdt 1A
 Delaware, OH, Delaware Muni - Jim Moore Field, RNAV (GPS) RWY 28, Amdt 1A
 London, OH, Madison County, RNAV (GPS) RWY 9, Orig-A
 London, OH, Madison County, RNAV (GPS) RWY 27, Orig-A
 Mount Vernon, OH, Knox County, RNAV (GPS) RWY 28, Amdt 1C
 New Philadelphia, OH, Harry Clever Field, RNAV (GPS) RWY 15, Amdt 1
 New Philadelphia, OH, Harry Clever Field, RNAV (GPS) RWY 33, Orig
 New Philadelphia, OH, Harry Clever Field, VOR-A, Amdt 2B
 Sidney, OH, Sidney Muni, RNAV (GPS) RWY 28, Amdt 1A
 Steubenville, OH, Jefferson County Airpark, RNAV (GPS) RWY 32, Amdt 1A
 Willard, OH, Willard, Takeoff Minimums and Obstacle DP, Amdt 2
 Fairview, OK, Fairview Muni, Takeoff Minimums and Obstacle DP, Amdt 4
 Tahlequah, OK, Tahlequah Muni, RNAV (GPS) RWY 35, Amdt 1A
 Beaver Falls, PA, Beaver County, LOC RWY 10, Amdt 4C
 St Marys, PA, St Marys Muni, LOC RWY 28, Amdt 4D
 St Marys, PA, St Marys Muni, RNAV (GPS) RWY 28, Amdt 1D
 St Marys, PA, St Marys Muni, Takeoff Minimums and Obstacle DP, Amdt 2A
 Cleveland, TN, Cleveland Rgnl Jetport, RNAV (GPS) RWY 3, Amdt 2
 Cleveland, TN, Cleveland Rgnl Jetport, RNAV (GPS) RWY 21, Amdt 2
 Cleveland, TN, Cleveland Rgnl Jetport, Takeoff Minimums and Obstacle DP, Amdt 2
 Austin, TX, Austin-Bergstrom Intl, ILS OR LOC RWY 35R, ILS RWY 35R SA CAT I, ILS RWY 35R SA CAT II, Amdt 4
 Floydada, TX, Floydada Muni, RNAV (GPS) RWY 17, Amdt 1
 Floydada, TX, Floydada Muni, RNAV (GPS) RWY 35, Amdt 1
 Renton, WA, Renton Muni, Takeoff Minimums and Obstacle DP, Amdt 8A
 Seattle, WA, Seattle-Tacoma Intl, Takeoff Minimums and Obstacle DP, Amdt 4B
 Wheeling, WV, Wheeling Ohio Co, RNAV (GPS) RWY 34, Amdt 1A
 Jackson, WY, Jackson Hole, RNAV (RNP) Y RWY 1, Amdt 1
 Jackson, WY, Jackson Hole, RNAV (RNP) Y RWY 19, Amdt 2
 Jackson, WY, Jackson Hole, RNAV (RNP) Z RWY 1, Amdt 1

RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33						Bearings, headings, courses, 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 in feet RVR.													
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW05 CLIMB TO 3000 DIRECT HOSOK AND LEFT TURN ON TRACK 322.45 TO BARBS AND HOLD. ADDITIONAL FLIGHT DATA: HOLD N, LT, 175.00 INBOUND. CHART FAS OBST: 272 TOWER 290231N/0811922W. CHART R-2910. DISTANCE TO THLD FROM 306 HAT: 0.84 NM. CHART VDP AT 1.41 NM TO RW05* *LNAV ONLY. WAAS CHANNEL # 90300 REFERENCE PATH ID: W05A LTP HAE: -4.2 M									
MAMBO (IAF)		UFIPI (TF) (FB) (RNP 1.00)		043.38 / 13.76				2000											
UFIPI (IF)		RUXZO (TF) (FB) (RNP 1.00)		053.65 / 6.19				2000											
RUXZO (FAF)		SEVAE/2.50 NM TO RW05 (TF) (FB) (RNP 0.30)		053.69 / 3.31															
SEVAE/2.50 NM TO RW05		RW05 (MAP) (TF) (FO) (RNP 0.30)		053.69 / 2.50															
RW05 (MAP)		385 MSL (CA)		053.69															
(SEE FORM 8260-10)																			
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. PROFILE STARTS AT UFIPI 3. FAC: 053.69 FAF: RUXZO DIST FAF TO MAP: 5.81 THLD: 5.81 4. MIN. ALT: UFIPI 2000, RUXZO 2000, SEVAE/2.50 NM TO RW05 900* 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____ 6. MIN GS INCPT: 2000 GS ALT AT: RUXZO 2000 OM: _____ MM: _____ IM: _____ 7. GS ANGLE: 3.00 TCH: 40.0 20:1 IS CLEAR 34:1 IS NOT CLEAR 8. MSA FROM: RW05 2800																MAG VAR: 5W		EPOCH YEAR: 2000	
MINIMUMS																			
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT								ALTERNATE: N A		STANDARD @									
CATEGORY =====>		A		B		C		D		E									
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA				
LPV DA	385	1	306	385	1	306	385	1	306	385	1	306							
LNAV/VNAV DA	577	1 3/4	498	577	1 3/4	498	577	1 3/4	498	577	1 3/4	498							
LNAV MDA	580	1	501	580	1	501	580	1 3/8	501	580	1 3/8	501							
CIRCLING	600	1 1/4	521	600	1 1/4	521	600	1 1/2	521	640	2	561							
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15C (5F) OR ABOVE 54C (130F). @ NA WHEN LOCAL WEATHER NOT AVAILABLE. CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). PBN REQUIREMENTS NOTE: RNP APCH CHART NOTE: RWY 5 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED. (CONTINUED ON PAGE 2)																			
CITY AND STATE		ELEVATION: 79 TDZE: 79		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE:				SUP:									
DELAND, FL		AIRPORT NAME:		DELAND MUNI-SIDNEY H TAYLOR FIELD		RNAV (GPS) RWY 5, ORIG-B				AMDT: ORIG-A									
						16 AUGUST 2018				DATED 05/05/2011									



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

TERMINAL ROUTES, (CONT.):

FROM	TO	COURSE AND DISTANCE	ALTITUDE
385 MSL	HOSOK (DF) (FB) (RNP 1.00)		
HOSOK	BARBS (TF) (FO) (RNP 1.00)	322.45 / 15.27	3000

NOTES, (CONT.):

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED. USE DAYTONA BEACH INTL ALTIMETER SETTING AND INCREASE ALL DAS 38 FEET AND ALL MDAS 40 FEET; INCREASE LPV ALL CATS, LNAVNAV ALL CATS, AND LNAV CAT D VISIBILITY 1/4 MILE.



CITY AND STATE
DELAND, FL

ELEVATION: 79 TDZE: 79
AIRPORT NAME:
DELAND MUNI-SIDNEY H TAYLOR FIELD

FACILITY
IDENTIFIER:
RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:
RNAV (GPS) RWY 5, ORIG-B
16 AUGUST 2018

SUP:	
AMDT:	ORIG-A
DATED:	05/05/2011

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KDED
RUNWAY	RW05
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W05A
LTP/FTP LATITUDE	290339.0820N
LTP/FTP LONGITUDE	0811717.2245W
LTP/FTP ELLIPSOIDAL HEIGHT	-00042
FPAP LATITUDE	290437.9900N
FPAP LONGITUDE	0811600.7900W
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	1440
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
 <u>CRC REMAINDER</u>	 730CAC5A

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00239
FPAP ORTHOMETRIC HEIGHT	+00239

QUALITY
16
CHECKED

CITY AND STATE DELAND, FL	ELEVATION: 79 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD	TDZE: 79 RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 5, ORIG-B 16 AUGUST 2018	SUP:
				AMDT: ORIG-A
				DATED: 05/05/2011

RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33						Bearings, headings, courses, 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 in feet RVR.										
TERMINAL ROUTES											MISSED APPROACH					
FROM		TO		COURSE AND DISTANCE			ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW12 CLIMB TO 2000 DIRECT CUGAK THEN ON TRACK 138.72 TO OAKIE AND HOLD. ADDITIONAL FLIGHT DATA: HOLD N, RT, 167.11 INBOUND. CHART FAS OBST: 284 POLE 290512N/0811930W. DISTANCE TO THLD FROM 330 HAT: 0.91 NM. CHART VDP AT 1.49 NM TO RW12* *LNAV ONLY. WAAS CHANNEL # 50300 REFERENCE PATH ID: W12A LTP HAE: -5.6 M							
BARBS (IAF)		XEHMO (TF) (FB) (RNP 1.00)		207.17 / 9.80			1600									
XEHMO (IF)		IDROF (TF) (FB) (RNP 1.00)		121.91 / 6.39			1600									
IDROF (FAF)		RW12 (MAP) (TF) (FO) (RNP 0.30)		121.96 / 4.61												
RW12 (MAP)		404 MSL (CA)		121.96												
404 MSL		CUGAK (DF) (FB) (RNP 1.00)														
CUGAK		OAKIE (TF) (FO) (RNP 1.00)		138.72 / 10.93			2000									
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. PROFILE STARTS AT XEHMO 3. FAC: <u>121.96</u> FAF: <u>IDROF</u> DIST FAF TO MAP: <u>4.61</u> THLD: <u>4.61</u> 4. MIN. ALT: <u>XEHMO 1600, IDROF 1600</u> 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____ 6. MIN GS INCPT: <u>1600</u> GS ALT AT: <u>IDROF 1600</u> OM: _____ MM: _____ IM: _____ 7. GS ANGLE: <u>3.00</u> TCH: <u>40.0</u> 20:1 IS CLEAR 34:1 IS NOT CLEAR 8. MSA FROM: <u>RW12 2800</u>											MAG VAR: <u>5W</u>		EPOCH YEAR: <u>2000</u>			
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A		STANDARD @							
CATEGORY =====>		A		B		C		D		E						
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	
LPV DA	404	1 1/4	330	404	1 1/4	330	404	1 1/4	330	404	1 1/4	330				
LNAV/VNAV DA	528	1 1/2	454	528	1 1/2	454	528	1 1/2	454	528	1 1/2	454				
LNAV MDA	600	1	526	600	1	526	600	1 1/2	526	600	1 1/2	526				
CIRCLING	600	1 1/2	521	600	1 1/2	521	600	1 1/2	521	640	2	561				
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15C (5F) OR ABOVE 54C (130F). @ NA WHEN LOCAL WEATHER NOT AVAILABLE. CHART NOTE: BARO-VNAV AND VDP NA WHEN USING DAYTONA BEACH INTL ALTIMETER SETTING. CHART NOTE: RWY 12 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED. CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). (CONTINUED ON PAGE 2)																
CITY AND STATE		ELEVATION: 79 TDZE: 74		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE:						SUP:				
DELAND, FL		AIRPORT NAME:				RNAV (GPS) RWY 12, ORIG-A						AMDT: ORIG				
		DELAND MUNI-SIDNEY H TAYLOR FIELD				16 AUGUST 2018						DATED 11/23/2006				



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

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NOTES, (CONT.):

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED USE DAYTONA BEACH INTL ALTIMETER SETTING
INCREASE ALL DA/MDA 40 FEET, INCREASE LNAV/VNAV VISIBILITY 1/4 SM ALL CATS.

PBN REQUIREMENTS NOTE: RNP APCH

QUALITY
16
CHECKED

CITY AND STATE DELAND, FL	ELEVATION: 79 TDZE: 74 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./ AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 12, ORIG-A 16 AUGUST 2018	SUP:
				AMDT: ORIG
				DATED: 11/23/2006

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KDED
RUNWAY	RW12
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W12A
LTP/FTP LATITUDE	290420.6675N
LTP/FTP LONGITUDE	0811733.4580W
LTP/FTP ELLIPSOIDAL HEIGHT	-00056
FPAP LATITUDE	290340.1100N
FPAP LONGITUDE	0811602.8700W
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	0920
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
 <u>CRC REMAINDER</u>	 5C38C62C

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00225
FPAP ORTHOMETRIC HEIGHT	+00225

QUALITY
16
CHECKED

CITY AND STATE DELAND, FL	ELEVATION: 79 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD	TDZE: 74	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 12, ORIG-A 16 AUGUST 2018	SUP:
					AMDT: ORIG
					DATED: 11/23/2006

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33		Bearings, headings, courses, 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 in feet RVR.											
TERMINAL ROUTES										MISSED APPROACH					
FROM		TO		COURSE AND DISTANCE		ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW23							
OMN VORTAC (IAF)		WEKLU (TF) (FB) (RNP 1.00)		188.48 / 6.80		1600		CLIMB TO 3000 DIRECT RUXZO AND ON TRACK 226.66 TO MAMBO AND HOLD.							
WEKLU (IF)		HOSOK (TF) (FB) (RNP 1.00)		233.81 / 6.38		1600									
HOSOK (FAF)		RW23 (MAP) (TF) (FO) (RNP 0.30)		233.76 / 4.62				ADDITIONAL FLIGHT DATA: HOLD NW, LT, 134.19 INBOUND. CHART 308 TOWER 290620N/0811252W. CHART R-2910. DISTANCE TO THLD FROM 296 HAT: 0.84 NM. CHART VDP AT 0.89 NM TO RW23* *LNAV ONLY. WAAS CHANNEL # 45700 REFERENCE PATH ID: W23A LTP HAE: -7.4 M							
RW23 (MAP)		374 MSL (CA)		233.76											
374 MSL		RUXZO (DF) (RNP 1.00)													
RUXZO		MAMBO (TF) (FO) (RNP 1.00)		226.66 / 19.88		3000									
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)										MAG VAR: 5W EPOCH YEAR: 2000					
2. PROFILE STARTS AT WEKLU															
3. FAC: 233.76 FAF: HOSOK DIST FAF TO MAP: 4.62 THLD: 4.62															
4. MIN. ALT: WEKLU 1600, HOSOK 1600															
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____															
6. MIN GS INCPT: 1600 GS ALT AT: HOSOK 1600 OM: _____ MM: _____ IM: _____															
7. GS ANGLE: 3.00 TCH: 40.0 20:1 IS CLEAR 34:1 IS NOT CLEAR															
8. MSA FROM: RW23 2800															
MINIMUMS															
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT						ALTERNATE: N A		STANDARD @							
CATEGORY =====>		A		B		C		D		E					
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA
LPV DA	374	1	296	374	1	296	374	1	296	374	1	296			
LNAV/VNAV DA	414	1 1/4	336	414	1 1/4	336	414	1 1/4	336	414	1 1/4	336			
LNAV MDA	420	1	342	420	1	342	420	1	342	420	1	342			
CIRCLING	600	1 1/4	521	600	1 1/4	521	600	1 1/2	521	640	2	561			
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15C (5F) OR ABOVE 54C (130F). @ NA WHEN LOCAL WEATHER NOT AVAILABLE. CHART NOTE: BARO-VNAV AND VDP NA WHEN USING DAYTONA BEACH INTL ALTIMETER SETTING. CHART NOTE: RWY 23 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED. CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). (CONTINUED ON PAGE 2)															
CITY AND STATE DELAND, FL		ELEVATION: 79 TDZE: 78 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 23, ORIG-A 16 AUGUST 2018				SUP: AMDT: ORIG DATED 06/08/2006					



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

NOTES, (CONT.):

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE DAYTONA BEACH INTL ALTIMETER SETTING AND INCREASE ALL DA 38 FEET AND ALL MDA 40 FEET, INCREASE LPV VISIBILITY 1/8 SM ALL CATS.

PBN REQUIREMENTS NOTE: RNP APPROACH

QUALITY
16
CHECKED

CITY AND STATE DELAND, FL	ELEVATION: 79 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD	TDZE: 78	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 23, ORIG-A 16 AUGUST 2018	SUP:
					AMDT: ORIG
					DATED: 06/08/2006

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KDED
RUNWAY	RW23
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W23A
LTP/FTP LATITUDE	290407.1660N
LTP/FTP LONGITUDE	0811640.7900W
LTP/FTP ELLIPSOIDAL HEIGHT	-00074
FPAP LATITUDE	290308.2400N
FPAP LONGITUDE	0811757.2000W
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	1440
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0

<u>CRC REMAINDER</u>	A29D9867

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00207
FPAP ORTHOMETRIC HEIGHT	+00207

QUALITY
16
CHECKED

CITY AND STATE DELAND, FL	ELEVATION: 79 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD	TDZE: 78	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 23, ORIG-A 16 AUGUST 2018	SUP:
					AMDT: ORIG
					DATED: 06/08/2006

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION							RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33									Bearings, headings, courses, 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 in feet RVR.					
TERMINAL ROUTES												MISSED APPROACH									
FROM			TO			COURSE AND DISTANCE			ALTITUDE			LNAV: RW30									
OAKIE (IAF)			CUGAK (TF) (FB) (RNP 1.00)			318.79 / 10.93			2000			CLIMB TO 3000 DIRECT XEHMO AND RIGHT TURN ON TRACK 027.14 DIRECT BARBS AND HOLD.									
SMYRA (IAF)			CUGAK (TF) (FB) (RNP 1.00)			255.26 / 4.93			2000												
CUGAK (IF)			YEBBU (TF) (FB) (RNP 1.00)			302.09 / 6.88			1600												
YEBBU (FAF)			RW30 (MAP) (TF) (FO) (RNP 0.30)			302.04 / 4.62															
RW30 (MAP)			480 MSL (CA)			302.04						ADDITIONAL FLIGHT DATA: HOLD N, LT, 175.00 INBOUND. CHART FAS OBST: 260 TOWER 290116N/0811317W. CHART VDP AT 1.18 NM TO RW30. YEBBU TO RWY 30: 3.00/40.0									
(SEE FORM 8260-10)																					
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																					
2. PROFILE STARTS AT CUGAK																					
3. FAC: 302.04 FAF: YEBBU DIST FAF TO MAP: 4.62 THLD: 4.62																					
4. MIN. ALT: CUGAK 2000, YEBBU 1600																					
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																					
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____																					
7. GS ANGLE: _____ TCH: 20:1 IS CLEAR 34:1 IS NOT CLEAR																					
8. MSA FROM: RW30 2800												MAG VAR: 5W			EPOCH YEAR: 2000						
MINIMUMS																					
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A		STANDARD @												
CATEGORY ==>		A			B			C			D			E							
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA						
LNAV MDA	500	1	428	500	1	428	500	1 1/4	428	500	1 1/4	428									
CIRCLING	600	1 1/4	521	600	1 1/4	521	600	1 1/2	521	640	2	561									
NOTES: CHART NOTE: RWY 30 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 NOT AUTHORIZED. CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). CHART NOTE: VDP NA WHEN USING DAYTONA BEACH INTL ALTIMETER SETTING. CHART NOTES: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE DAYTONA BEACH INTL ALTIMETER SETTING AND (CONTINUED ON PAGE 2)																					
CITY AND STATE DELAND, FL				ELEVATION: 79 TDZE: 72 AIRPORT NAME: DELAND MUNI-SIDNEY H TAYLOR FIELD				FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 30, ORIG-A 16 AUGUST 2018				SUP: AMDT: ORIG DATED 06/08/2006							



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

TERMINAL ROUTES, (CONT.):

FROM	TO	COURSE AND DISTANCE	ALTITUDE
480 MSL	XEHMO (DF) (FB) (RNP 1.00)		
XEHMO	BARBS (TF) (FO) (RNP 1.00)	027.14 / 9.80	3000

NOTES, (CONT.):

INCREASE ALL MDAS 40 FEET.

EQUIPMENT REQUIREMENT NOTE: RNP APCH.

QUALITY
16
CHECKED

CITY AND STATE

DELAND, FL

ELEVATION: 79

TDZE: 72

AIRPORT NAME:

DELAND MUNI-SIDNEY H TAYLOR FIELD

FACILITY
IDENTIFIER:
RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

RNAV (GPS) RWY 30, ORIG-A

16 AUGUST 2018

SUP:

AMDT: ORIG

DATED: 06/08/2006

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
ILS STANDARD INSTRUMENT APPROACH PROCEDURE

TITLE 14 CFR PART 97.29

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> EASTON/NEWNAM FIELD	<u>AIRPORT ID</u> KESN	<u>PROCEDURE NAME</u> ILS OR LOC RWY 4	<u>ORIGINAL/AMENDMENT</u> 2B	<u>CITY</u> EASTON	<u>STATE</u> MD
<u>AIRPORT ELEVATION</u> 72	<u>TDZE</u> 58	<u>SUPERSEDED</u> ILS OR LOC RWY 4	<u>ORIGINAL/AMENDMENT</u> 2A	<u>DATED</u> 02/01/2018	<u>MAG VAR</u> 10W
<u>FACILITY</u> I-FGH	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 1985

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>
RIKME/I-FGH 11.82 DME	IF/IAF	WEGRO/I-FGH 5.78 DME		DF			040.50	6.04 (I-FGH)	1600

MISSED APPROACH

MAP:

ILS: DA
LOC: I-FGH 1.01 DME

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 ON HEADING 041 AND ON ATR VOR/DME R-283 TO ORETE INT/ATR 31.62 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS (DO NOT CHART):

CLIMB TO 500 THEN CLIMBING RIGHT TURN TO 2000 ON HEADING 075 AND ON ENO VORTAC R-226 TO RIDGY/ENO 21.52 DME AND HOLD.

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. HOLD SW RIKME/I-FGH 11.82 DME, LT, 040.50 INBOUND, 2000 FT. IN LIEU OF PT (IAF), MAX 4600.
3. **FAC:** 040.50 **FAF:** WEGRO/I-FGH 5.78 DME **DIST FAF TO MAP:** **DIST FAF TO THLD:** 4.77
4. **MIN ALT:** RIKME/I-FGH 11.82 DME 2000, WEGRO/I-FGH 5.78 DME 1600
5. **DIST TO THLD FROM OM:** **MM:** **IM:** **150 HAT:** **HAT:** **GS ANT:** 770
6. **MIN GS INCPT:** 1600 **GS ALT AT FAF :** WEGRO/I-FGH 5.78 DME 1600 **OM:** **MM:** **IM:**
7. **GP ANGLE:** 3.00 **34:1:** **20:1:** **TCH:** 43.9
8. **MSA FROM:** KESN 2100

EQUIPMENT REQUIREMENTS NOTES

RADAR AND DME REQUIRED FOR PROCEDURE ENTRY.
DME REQUIRED FOR LOC ONLY.

NOTES:

CHART NOTE: CIRCLING RWY 15, 33 NA AT NIGHT.
CHART NOTE: AUTOPILOT COUPLED APPROACH NA BELOW 550.



ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART IN PLANVIEW: RIDGY/ENO 21.52 DME
CHART R-4006
CHART VDP AT 2.45 DME*
DISTANCE VDP TO THLD 1.44 NM

* LOC ONLY
CHART FAS OBST: 237 TOWER 384616N/0760519W.
CHART IN PLANVIEW: ALTERNATE MA HOLDING, HOLD SW RIDGY/ENO 21.52 DME, RT, 045.56 INBOUND.
HOLD W, RT, 102.74 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ ILS: STANDARD - NA WHEN CONTROL TOWER CLOSED.; LOC: STANDARD - NA WHEN CONTROL TOWER CLOSED.

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
S-ILS 04	273	3/4	215	273	3/4	215	273	3/4	215	273	3/4	215			
S-LOC 04	540	1	482	540	1	482	540	1 3/8	482	540	1 3/8	482			
CIRCLING	540	1	468	640	1	568	640	1 1/2	568	740	2	668			

CHANGES - REASONS

1. CHANGED CHART NOTE: AUTOPILOT COUPLED APPROACH NA BELOW 541 TO CHART NOTE: AUTOPILOT COUPLED APPROACH NA BELOW 550. - TO CLEAR NOTAM FDC 8/5329.
2. REMOVED ALL REFERENCE OF BACK-UP ALTIMETER SETTING MINIMUMS - LOCAL WEATHER ON WMSCR AND DEEMED RELIABLE.
3. MOVED CHART NOTE: "DME REQUIRED", AND PLANVIEW NOTE: "RADAR AND DME REQUIRED" TO EQUIPMENT REQUIREMENTS NOTE - 8260.19H PARA 8-6-8B.



COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☐ **HAI** ☐ **NBAA** ☒

OTHER: ZDC, PCT APP CON, ARPT MGR, ESN ATCT

FLIGHT CHECKED BY

STEPHEN BAUER

Digitally signed by

BEV L BORDY

OFFICE

FICO

DATE

6/19/18

DEVELOPED BY

LONNIE EVERHART (TODD BOWLING)

Digitally signed by

BEV L BORDY

OFFICE

AJV-5400

DATE

03/20/2018

APPROVED BY

LONNIE EVERHART

Digitally signed by

BEV L BORDY

OFFICE

AJV-5400

DATE

TITLE

MANAGER

Jun 25, 2018



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> EASTON/NEWNAM FIELD	<u>AIRPORT ID</u> KESN	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 15	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> EASTON	<u>STATE</u> MD	
<u>AIRPORT ELEVATION</u> 72	<u>TDZE</u> 47	<u>SUPERSEDED</u> RNAV (GPS) RWY 15	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 04/03/2014	<u>MAG VAR</u> 10W	<u>EPOCH YEAR</u> 1985
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
HIVAR	IF	CERAV		TF	FB	1.00	147.48	6.11	1600
CERAV	FAF	RW15	MAP	TF	FO	0.30	147.54	4.72	
RW15	MAP	440 MSL		CA			327.62		
440 MSL		TUKIE		DF	FB	1.00			
TUKIE		ORETE		TF	FO	1.00	052.30	8.05	2000

MISSED APPROACH

MAP:

LNAV: RW15

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 DIRECT TUKIE AND ON TRACK 052.30 TO ORETE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. PROFILE STARTS AT HIVAR
3. **FAC:** 147.54 **FAF:** CERAV **DIST FAF TO MAP:** 4.72 **DIST FAF TO THLD:** 4.72
4. **MIN ALT:** HIVAR 2000, CERAV 1600
5. **DIST TO THLD FROM OM:** **MM:** **IM:** **150 HAT:** **HAT:**
6. **MIN GP INCPT:** **GP ALT AT FAF :** **OM:** **MM:** **IM:**
7. **GP ANGLE:** **34:1:** IS NOT CLEAR **20:1:** IS NOT CLEAR **TCH:**
8. **MSA FROM:** RW15 2100



PBN EQUIPMENT REQUIREMENTS NOTES

PBN REQUIREMENTS NOTE: RNP APCH.

NOTES:

CHART NOTE: RWY 15 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART NOTE: STRAIGHT-IN RWY 15 NA AT NIGHT, CIRCLING RWY 15, 33 NA AT NIGHT.
CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART R-4006
CHART FAS OBST: 171 ANTENNA 384836N/0760413W.
HOLD NW, RT, 118.98 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
LNAV MDA	440	1	393	440	1	393	440	1 1/8	393	440	1 1/4	393			
CIRCLING	480	1	408	640	1	568	640	1 1/2	568	740	2	668			

CHANGES - REASONS

1. LNAV: CHANGED MDA/HAT FROM 420/373 TO 440/393 ALL CATS, AND CAT C VISIBILITY FROM 1 TO 1 1/8 - NEW CONTROLLING OBSTACLE AND NEW VISIBILITY TABLE APPLIED.
2. CIRCLING, CHANGED MDA/HAA: CAT B FROM 540/468 TO 640/568, CAT C FROM 660/588 TO 640/568, CAT D FROM 660/588 TO 740/668 AND ADDED CHART CIRCLING ICON - NEW CIRCLING AREA CRITERIA ADDED TO MATCH ILS OR LOC RWY 4.
3. ADDED RWY 15 TO HELICOPTER VISIBILITY NOTE - 8260.19H PARA 8-6-11 K(3).
4. ADDED 20:1 IS NOT CLEAR - 8260.19H PARA 8-6-7 G(3).
5. REMOVED VDA AND VGSI NON COINCIDENT NOTE - VDA REMOVED DUE TO VISUAL SEGMENT OBSTACLES.
6. REMOVED ALL REFERENCE OF BACK-UP ALTIMETER SETTING MINIMUMS - LOCAL WEATHER ON WMSCR AND DEEMED RELIABLE.
7. CHANGED FAS OBST FROM 163 TREE TO 171 ANTENNA - OBSTACLE DATA BASE UPDATED.
8. CHANGED CHART NOTE: "NIGHT LANDING: RWY 15, 33 NA" TO "STRAIGHT-IN RWY 15 NA AT NIGHT, CIRCLING RWY 15, 33 NA AT NIGHT" - 8260.19H PARA 8-6-11 O(2) NOTE.
9. REMOVED DME/DME RNP-0.3 NA AND REPLACED IT WITH PBN REQUIREMENTS NOTE: RNP APCH - 8260.19H PARA 8-6-8A.
10. CHANGED MISSED APPROACH WORDING FROM "...AND VIA 052.30 TRACK..." TO "...AND ON TRACK 052.30..." - 8260.19H PARA 8-6-6D (11).
11. DELETED PLANVIEW NOTE "RADAR REQUIRED" - NOT REQUIRED FOR PROCEDURE ENTRY ON GPS PROCEDURES.



<u>AIRPORT</u> EASTON/NEWNAM FIELD	<u>AIRPORT ID</u> KESN	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 15	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> EASTON	<u>STATE</u> MD
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZDC, PCT APP CON, ARPT MGR					
<u>FLIGHT CHECKED BY</u> STEPHEN BAUER		Digitally signed by BEV L BORDY Jun 25, 2018	<u>OFFICE</u> FICO	<u>DATE</u> 6/19/18	
<u>DEVELOPED BY</u> LONNIE EVERHART (TODD BOWLING)		Digitally signed by BEV L BORDY Jun 25, 2018	<u>OFFICE</u> AJV-5400	<u>DATE</u> 03/14/2018	
<u>APPROVED BY</u> LONNIE EVERHART		Digitally signed by BEV L BORDY Jun 25, 2018	<u>OFFICE</u> AJV-5400	<u>DATE</u>	<u>TITLE</u> MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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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> EASTON/NEWNAM FIELD	<u>AIRPORT ID</u> KESN	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 33	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> EASTON	<u>STATE</u> MD	
<u>AIRPORT ELEVATION</u> 72	<u>TDZE</u> 51	<u>SUPERSEDED</u> RNAV (GPS) RWY 33	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 04/03/2014	<u>MAG VAR</u> 10W	<u>EPOCH YEAR</u> 1985
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
JOVOL	IF	TUKIE		TF	FB	1.00	327.68	6.12	1600
TUKIE	FAF	RW33	MAP	TF	FO	0.30	327.62	4.66	
RW33	MAP	472 MSL		CA			327.62		
472 MSL		ORETE		DF	FO	1.00			2000

MISSED APPROACH

MAP:

LNAV: RW33

MISSED APPROACH INSTRUCTIONS:

CLIMBING RIGHT TURN TO 2000 DIRECT ORETE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

- PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
- PROFILE STARTS AT JOVOL
- FAC: 327.62 FAF: TUKIE DIST FAF TO MAP: 4.66 DIST FAF TO THLD: 4.66
- MIN ALT: JOVOL 2000, TUKIE 1600
- DIST TO THLD FROM OM: MM: IM: 150 HAT: HAT:
- MIN GP INCPT: GP ALT AT FAF : OM: MM: IM:
- GP ANGLE: 34:1: IS NOT CLEAR 20:1: IS NOT CLEAR TCH:
- MSA FROM: RW33 2100

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.



NOTES:

CHART NOTE: STRAIGHT-IN RWY 33 NA AT NIGHT, CIRCLING RWY 33, 15 NA AT NIGHT
CHART NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART R-4006
CHART FAS OBST: 191 TREE 384608N/0760159W.
HOLD NW, RT, 118.98 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
LNAV MDA	520	1	469	520	1	469	520	1 3/8	469	520	1 1/2	469			
CIRCLING	520	1	448	640	1	568	640	1 1/2	568	740	2	668			

CHANGES - REASONS

1. LNAV: CHANGED CAT C VISIBILITY FROM 1 1/4 TO 1 3/8 - NEW VISIBILITY TABLE APPLIED.
2. CIRCLING, CHANGED MDA/HAA: CAT B FROM 540/468 TO 640/568, CAT C FROM 660/588 TO 640/568, CAT D FROM 660/588 TO 740/668 AND ADDED CHART CIRCLING ICON - NEW CIRCLING AREA CRITERIA ADDED TO MATCH ILS OR LOC RWY 4.
3. ADDED RWY 33 TO HELICOPTER VISIBILITY NOTE - 8260.19H PARA 8-6-11 K(3).
4. ADDED 20:1 IS NOT CLEAR - 8260.19H 8-6-7 G(3).
5. REMOVED VDA AND VGSI NONE COINCIDENT NOTE - VDA REMOVED DUE TO VISUAL SEGMENT OBSTACLES.
6. REMOVED ALL REFERENCE OF BACK-UP ALTIMETER SETTING MINIMUMS - LOCAL WEATHER ON WMSCR AND DEEMED RELIABLE.
7. CHANGED FAS OBST FROM 210 TOWER TO 191 TREE - OBSTACLE DATA BASE UPDATED.
8. CHANGED CHART NOTE: "NIGHT LANDING: RWY 15, 33 NA" TO "STRAIGHT-IN RWY 15 NA AT NIGHT, CIRCLING RWY 15, 33 NA AT NIGHT" - 8260.19H PARA 8-6-11 O(2) NOTE.
9. REMOVED DME/DME RNP-0.3 NA AND REPLACED IT WITH PBN REQUIREMENTS NOTE: RNP APCH - 8160.19H PARA 8-6-8A.
10. REMOVED PLANVIEW NOTE: RADAR REQUIRED - RADAR NOT REQUIRED FOR PROCEDURE ENTRY ON GPS PROCEDURES.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒

OTHER: ZDC, PCT APP CON, ARPT MGR

FLIGHT CHECKED BY

STEPHEN BAUER

Digitally signed by

BEV L BORDY
Jun 25, 2018

OFFICE

FICO

DATE

6/19/18

DEVELOPED BY

LONNIE EVERHART (TODD BOWLING)

Digitally signed by

BEV L BORDY
Jun 25, 2018

OFFICE

AJV-5400

DATE

03/19/2018

APPROVED BY

LONNIE EVERHART

Digitally signed by

BEV L BORDY
Jun 25, 2018

OFFICE

AJV-5400

DATE

TITLE

MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> JAMES M COX DAYTON INTL	<u>AIRPORT ID</u> KDAY	<u>PROCEDURE NAME</u> RNAV (RNP) Y RWY 24R	<u>ORIGINAL/AMENDMENT</u> ORIG-C	<u>CITY</u> DAYTON	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 1009	<u>TDZE</u> 997	<u>SUPERSEDED</u> RNAV (RNP) Y RWY 24R	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>DATED</u> 05/24/2018	<u>MAG VAR</u> 6W	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
HOPRI	IAF	JESTS		TF	FB	1.00	198.98	3.00	3400
HOXIM	IAF	EARNs		TF	FB	1.00	241.47	4.08	2900
PIRNS	IAF	OVEDE		TF	FB	1.00	333.57	4.00	4100
GNASH	IF	FABKA		TF	FB	1.00	061.27	6.00	4400
JESTS	IF	NEMIE		TF	FB	1.00	198.97	3.00	2500
EARNs	IF	WAPLI		TF	FB	1.00	241.42	3.00	2000
OVEDE	IF	ZABEP		TF	FB	1.00	333.54	3.00	3200
JATAD	IF	OAVES		TF	FB	1.00	061.36	6.00	4400
FABKA		NEMIE		RF	FB	1.00	(2.60 NM RADIUS CW (CFJLW))	6.24	2500
NEMIE		WAPLI		RF	FB	0.50	(2.30 NM RADIUS CW (CFJQG))	1.70	2000
OAVES		ZABEP		RF	FB	1.00	(2.59 NM RADIUS CCW (CFJSG))	3.97	3200
ZABEP		WAPLI		RF	FB	1.00	(2.47 NM RADIUS CCW (CFJVN))	3.97	2000
WAPLI	FAF	RW24R	MAP	TF	FO	0.30	241.39	2.98	
RW24R	MAP	COWED		TF	FO	1.00	241.35	12.16	3000





ALTERNATE: NA ☐ STANDARD

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
AUTHORIZATION REQUIRED															
RNP 0.10 DA	1334	3500	337	1334	3500	337	1334	3500	337	1334	3500	337			
RNP 0.30 DA	1418	5000	421	1418	5000	421	1418	5000	421	1418	5000	421			

CHANGES - REASONS

1. ADDED PBN EQUIPMENT REQUIREMENTS NOTE: RNP AR APCH, REMOVED GPS REQUIRED NOTE - 8260.19H 8-6-8B(1) AND MEMO #257, PARA F.
2. CORRECTED CHART NOTE FOR UNCOMPENSATED BARO-VNAV SYSTEMS TO REMOVE (FAHRENHEIT) REFERENCE FROM NOTE. - 8260.19H 8-6-9S.
3. DELETED "DISTANCE TO THLD FROM 337 HAT: 0.89 NM" FROM ADDITIONAL FLIGHT DATA - INFORMATION IS NOW DISPLAYED ON LINE 5 OF 8260-3.
4. DELETED "HOPRI 4000, HOXIM 4000, PIRNS 5000, GNASH 6000, AND JATAD 6000" FROM MIN ALT BLOCK. ADDED "WAPLI 2000" - ONLY FIX CHARTED IN PROFILE VIEW IS "WAPLI 2000".
5. DELETED DUPLICATE COPY OF MISSED APPROACH HOLDING INSTRUCTIONS IN ADDITIONAL FLIGHT DATA - ADDITIONAL COPY OF HOLDING INSTRUCTIONS ADDED IN ERROR.
6. MISSED APPROACH INSTRUCTIONS RE-WORDED FROM "CLIMB TO 3000 ON THE RNAV MISSED APPROACH ROUTE TO COWED AND HOLD" TO "CLIMB TO 3000 ON TRACK 241.35 TO COWED AND HOLD" - INSTRUCTIONS ARE CLEARER TO UNDERSTAND, NO CHANGE IN ROUTE.

COORDINATED WITH:

A4A ☒ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: AIRPORT MANAGER, AVIATION MANAGER, ZID ARTCC, COLUMBUS APPCON

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

CARLOS J. ESCALANTE

Digitally signed by
CARLOS J ESCALANTE
May 23, 2018

APPROVED BY

PATRICK MULQUEEN

Digitally signed by
DAVID TEFFETELLER
Jun 12, 2018

OFFICE Digitally signed by DATE

DAVID TEFFETELLER

Jun 12, 2018

OFFICE DATE

AJV-5433

05/07/2018

OFFICE DATE

AJV-5430

TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> NORWALK-HURON COUNTY	<u>AIRPORT ID</u> K5A1	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> NORWALK	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 853	<u>TDZE</u> 851	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 06/23/2016	<u>MAG VAR</u> 6W	<u>EPOCH YEAR</u> 1995
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 186/30 CW 006/30	NOPT	OFUZU	IF/IAF	3100
2. 006/30 CW 186/30		OFUZU	IF/IAF	3100

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>
OFUZU	IF/IAF	ETOTY		TF	FB	1.00	276.34	6.00	2500
ETOTY	FAF	JOMKU/1.80 NM TO RW28		TF	FB	0.30	276.25	3.25	
JOMKU/1.80 NM TO RW28		RW28	MAP	TF	FO	0.30	276.25	1.80	
RW28	MAP	1253 MSL		CA			276.25		
1253 MSL		JUROL		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LP: RW28
 LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT JUROL AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD E OFUZY, RT, 276.34 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 276.25FAF: ETOTYDIST FAF TO MAP: 5.05DIST FAF TO THLD: 5.05

4. MIN ALT: OFUZY 3100, ETOTY 2500, JOMKU/1.80 NM TO RW28 1460

5. DIST TO THLD FROM OM:MM:IM:150 HAT:HAT:

6. MIN GP INCPT:GP ALT AT FAF :OM:MM:IM:

7. GP ANGLE:34:1: IS NOT CLEAR20:1: IS NOT CLEARTCH:

8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART NOTE: PROCEDURE NA AT NIGHT.
CHART NOTE: USE CLEVELAND-HOPKINS INTL ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON
CHART CLEVELAND-HOPKINS INTL ASOS
ETOTY TO RW28: 3.00/40.
WAAS CHANNEL #86835
REFERENCE PATH ID: W28A
CHART FAS OBST: 984 TREE 411431N/0823120W, 1012 TREE 411411N/0823035W.
HOLD W, RT, 096.03 INBOUND
LTP HAE: 224.6 M

MINIMUMS:

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

ALTERNATE: NA ☒

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
LP MDA	1320	1	469	1320	1	469	1320	1 3/8	469		NA				
LNAV MDA	1360	1	509	1360	1	509	1360	1 3/8	509		NA				
CIRCLING	1420	1	567	1420	1	567	1440	1 1/2	587		NA				



CHANGES - REASONS

- 1. LNAV MDA INCREASED FROM 1340/489 TO 1360/509 ALL CATS - NEW CONTROLLING OBSTACLE.
- 2. CAT A CIRCLING MDA INCREASED FROM 1400/548 TO 1420/567 - NEW CONTROLLING OBSTACLE.
- 3. DELETED DME/DME RNP-0.3 NA - IAW CURRENT DOCUMENTATION POLICY.
- 4. ADDED PBN EQUIPMENT REQUIREMENTS NOTE: RNP APCH - IAW CURRENT DOCUMENTATION POLICY.
- 5. UPDATED HELICOPTER NOTE FROM "HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NA" TO "RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED." - IAW CURRENT DOCUMENTATION POLICY.
- 6. CIRCLING CAT B HAA CHANGED FROM 568 TO 567 - AIRPORT ELEVATION CHANGED FROM 852 TO 853.
- 7. CIRCLING CAT C HAA CHANGED FROM 588 TO 587 - AIRPORT ELEVATION CHANGED FROM 852 TO 853.
- 8. CRC REMAINDER CHANGED FROM F88311E1 TO EED0A144 - LTP LONGITUDE CHANGED FROM 0823245.5980 TO 0823245.5935.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB ARTCC, MFD APP CON, AMGR

FLIGHT CHECKED BY

MARC WEBBER

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

FICO

DATE

6/18/18

DEVELOPED BY

CHRIS O'BRIEN

Digitally signed by
CHRISTOPHER P O'BRIEN
May 07, 2018

OFFICE

AJV-5421

DATE

04/30/2018

APPROVED BY

JULIE MORGAN

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

AJV-5420

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	5A1
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	411441.1000N
LTP/FTP LONGITUDE	0823245.5935W
LTP/FTP ELLIPSOIDAL HEIGHT	+02246
FPAP LATITUDE	411441.3600N
FPAP LONGITUDE	0823443.7100W
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	1672
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	EED0A144
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+02594
FPAP ORTHOMETRIC HEIGHT	+02594



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> MARTIN MUNI	<u>AIRPORT ID</u> K9V6	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 32	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> MARTIN	<u>STATE</u> SD
<u>AIRPORT ELEVATION</u> 3295	<u>TDZE</u> 3294	<u>SUPERSEDED</u> RNAV (GPS) RWY 32	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 07/21/2016	<u>MAG VAR</u> 6E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 16 AUGUST 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 230/30 CW 050/30	NOPT	USETY	IF/IAF	6000
2. 050/30 CW 230/30		USETY	IF/IAF	6000

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>
USETY	IF/IAF	VUGGI		TF	FB	1.00	320.18	6.10	5000
VUGGI	FAF	JESIP/2.50 NM TO RW32		TF	FB	0.30	320.13	2.78	
JESIP/2.50 NM TO RW32		RW32	MAP	TF	FO	0.30	320.13	2.50	
RW32	MAP	3800 MSL		CA			320.13		3800
3800 MSL		USETY		DF	FO	1.00			6000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW32

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3800 THEN CLIMBING RIGHT TURN TO 6000 DIRECT USETY AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD SE USETY, RT, 320.18 INBOUND, 6000 FT. IN LIEU OF PT (IAF), MAX 8000.
3. FAC: 320.13 FAF: VUGGI DIST FAF TO MAP: 5.28 DIST FAF TO THLD: 5.28
4. MIN ALT: USETY 6000, VUGGI 5000, JESIP/2.50 NM TO RW32 4100*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 250 HAT: 0.71
6. MIN GP INCPT: 5000 GP ALT AT FAF : VUGGI 5000 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 0.92 NM TO RW32*
*LNAV ONLY
WAAS CHANNEL #77540
REFERENCE PATH ID: W32A
CHART FAS OBST: 3335 TREE 430928N/1014312W.
LTP HAE: 979.3 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 800-2 1/2

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	3544	1	250	3544	1	250	3544	1	250		NA				
LNAV/VNAV DA	3544	1	250	3544	1	250	3544	1	250		NA				
LNAV MDA	3600	1	306	3600	1	306	3600	1	306		NA				
CIRCLING	3780	1	485	3820	1	525	4060	2 1/2	765		NA				



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
MARTIN MUNI	K9V6	RNAV (GPS) RWY 32	1	MARTIN	SD

CHANGES - REASONS

- 1. INCREASED MISSED APPROACH CLIMB TO ALTITUDE FROM 3700 TO 3800 - MINIMUM LENGTH REQUIREMENTS FOR LPV SECTION 1A.
- 2. DECREASED DISTANCE TO THLD FROM 339 HAT: 0.99 TO 250 HAT: 0.71 AND MOVED FROM ADDITIONAL FLIGHT DATA TO LINE 5 - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT AND CURRENT CRITERIA REQUIREMENT.
- 3. ADDED USETY HIL MAX ALTITUDE 8000 - CURRENT CRITERIA REQUIREMENT.
- 4. DECREASED LPV AND LNAV/VNAV ALL CATS DA/HAT FROM 3633/339 TO 3544/250 - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT.
- 5. DECREASED LPV AND LNAV/VNAV ALL CATS VISIBILITY FROM 1 1/4 TO 1 - IAW 8260.3C TABLE 3-3-1.
- 6. DECREASED LNAV ALL CATS MDA/HAT FROM 3680/386 TO 3600/306 - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT..
- 7. DECREASED LNAV CAT C VISIBILITY FROM 1 1/8 TO 1 - IAW 8260.3C TABLE 3-3-1.
- 8. DECREASED CMDA/HAA FOR CIRCLING CAT A FROM 3860/565 TO 3780/465, CIRCLING CAT B FROM 3920/625 TO 3820/525, CIRCLING CAT C FROM 4100/865 TO 4060/825 - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT.
- 9. INCREASED CAT C VISIBILITY FROM 2 1/4 TO 2 1/2 - IAW 8260.3C TABLE 3-3-7.
- 10. REMOVED CHART NOTE: DME/DME RNP-0.3 NA - ADDED PBN REQUIREMENT NOTE: RNP APCH.
- 11. REMOVED CHART NOTE "USE PINE RIDGE ALTIMETER SETTING" - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT.
- 12. CHANGED CHART NOTE "BARO-VNAV NA" TO "BARO-VNAV AND VDP NA WHEN USING PINE RIDGE ALTIMETER SETTING" AND MOVED TO 8260-9 PART C - LOCAL ALTIMETER ON WMSCR.
- 13. ADDED CHART VDP AT 0.92 NM TO RW32* TO ADDITIONAL FLIGHT DATA - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT.
- 14. CHANGED "ALTERNATE NA" TO "STANDARD - CAT C 900-2 1/2" - LOCAL ALTIMETER ESTABLISHED SINCE LAST AMENDMENT.



<u>AIRPORT</u> MARTIN MUNI	<u>AIRPORT ID</u> K9V6	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 32	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> MARTIN	<u>STATE</u> SD
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZDV, AMGR					
<u>FLIGHT CHECKED BY</u> JAMES HAWLEY		<u>OFFICE</u> FICO	<u>DATE</u> 05/14/2018	<i>Digitally signed by</i> ROBERT G HAMILTON May 16, 2018	
<u>DEVELOPED BY</u> DUSTIN DAVIDSON		<u>OFFICE</u> AJV-5422	<u>DATE</u> 04/09/2018		
<u>APPROVED BY</u> JULIE MORGAN		<u>OFFICE</u> AJV-5420	<u>DATE</u>	<i>Digitally signed by</i> ROBERT G HAMILTON May 16, 2018	<u>TITLE</u> MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	K9V6
RUNWAY	RW32
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W32A
LTP/FTP LATITUDE	430941.1810N
LTP/FTP LONGITUDE	1014231.7900W
LTP/FTP ELLIPSOIDAL HEIGHT	+09793
FPAP LATITUDE	431055.1280N
FPAP LONGITUDE	1014339.7480W
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	1624
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	88D642E4

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K3
LTP ORTHOMETRIC HEIGHT	+09990
FPAP ORTHOMETRIC HEIGHT	+09990



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> AMBLER	<u>AIRPORT ID</u> PAFM	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 1	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> AMBLER	<u>STATE</u> AK
<u>AIRPORT ELEVATION</u> 293	<u>TDZE</u> 248	<u>SUPERSEDED</u> RNAV (GPS) RWY 1	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 01/05/2017	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 279/30 CW 099/30	NOPT	279/5 CW 099/5		4400
1. 279/5 CW 099/5		RONYE	IF/IAF	3600
2. 099/30 CW 189/30		099/11 CW 189/11		5800
2. 099/11 CW 189/11		FELOS	IAF	4400
3. 189/30 CW 279/30		189/11 CW 279/11		6200
3. 189/11 CW 279/11		LOUPS	IAF	3600

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>
LOUPS	IAF	RONYE	NOPT	TF	FB	1.00	279.76	10.00	3600
FELOS	IAF	RONYE	NOPT	TF	FB	1.00	099.04	10.00	3600
RONYE	IF/IAF	JAKOW		TF	FB	1.00	009.40	6.16	1900
JAKOW	FAF	RW01	MAP	TF	FO	0.30	009.49	5.06	
RW01	MAP	1000 MSL		CA			009.49		1000
1000 MSL		RONYE		DF	FO	1.00			3600

QUALITY
18
CHECKED

MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW01

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1000 THEN CLIMBING RIGHT TURN TO 3600 DIRECT RONYE AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3600.
**MISSED APPROACH REQUIRES MINIMUM CLIMB OF 210 FEET PER NM TO 2300.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD S RONYE, RT, 009.40 INBOUND, 3600 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 009.49 FAF: JAKOW DIST FAF TO MAP: 5.06 DIST FAF TO THLD: 5.06
4. MIN ALT: RONYE 3600, JAKOW 1900
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 250 HAT: 0.66
6. MIN GP INCPT: 1900 GP ALT AT FAF : JAKOW 1900 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH

NOTES:

CHART NOTE: CIRCLING NA W OF RWY 1-19.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW 20C OR ABOVE 42C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
*LNAV ONLY

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 2.27 NM TO RW01*
*LNAV ONLY
WAAS CHANNEL #40439
REFERENCE PATH ID: W01A
CHART FAS OBST: 359 TREE 670514N/1575400W.
470 AAO 670154N/1580000W.
LTP HAE: 80.3 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 800-2 1/4



<u>CATEGORY:</u>	<u>A</u>			<u>B</u>			<u>C</u>			<u>D</u>			<u>E</u>		
<u>FINAL TYPE</u>	<u>DA/MDA</u>	<u>VIS</u>	<u>HAT/HAA</u>	<u>DA/MDA</u>	<u>VIS</u>	<u>HAT/HAA</u>	<u>DA/MDA</u>	<u>VIS</u>	<u>HAT/HAA</u>	<u>DA/MDA</u>	<u>VIS</u>	<u>HAT/HAA</u>	<u>DA/MDA</u>	<u>VIS</u>	<u>HAT/HAA</u>
LPV DA**	498	1	250	498	1	250	498	1	250	498	1	250			
LPV DA	666	1 3/8	418	666	1 3/8	418	666	1 3/8	418	666	1 3/8	418			
LNAV/VNAV DA	791	1 7/8	543	791	1 7/8	543	791	1 7/8	543	791	1 7/8	543			
LNAV MDA	1000	1	752	1000	1 1/4	752	1000	1 7/8	752	1000	1 7/8	752			
CIRCLING	1000	1	707	1000	1 1/4	707	1000	2	707	1000	2 1/4	707			

CHANGES - REASONS

1. REMOVED CHART NOTE: DME/DME RNP-0.3 NA, ADDED PBN NAVSPEC REQUIREMENT NOTE: RNP APCH - IAW 8260.19 CH 8
2. ADDED NOTE: 20:1 IS CLEAR - NEW IPDS EVALUATION.
3. MIN ALT AT RONYE CHANGED FROM 3400 TO 3600 - CHART CORRECTION (INCORPORATED NOTAM FDC 8/5519).

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZAN, WESTERN FPO, AMGR
Digitally signed by

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS Jun 04, 2018
GROUP (AJW-333) MEMO, DEC 22, 2017.
Digitally signed by

DEVELOPED BY

LONNIE EVERHART (NEAL BLOOMQUIST)

APPROVED BY

LONNIE EVERHART

DONALD H LANIER OFFICE

DATE

DONALD H LANIER OFFICE

Jun 04, 2018

AJV-5400

DATE

04/11/2018

Digitally signed by

DONALD H LANIER

OFFICE

Jun 04, 2018

AJV-5400

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	PAFM
RUNWAY	RW01
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W01A
LTP/FTP LATITUDE	670559.8400N
LTP/FTP LONGITUDE	1575138.4800W
LTP/FTP ELLIPSOIDAL HEIGHT	+00803
FPAP LATITUDE	670721.8115N
FPAP LONGITUDE	1575010.9215W
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	1528
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0

CRC REMAINDER	CB36B68E

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	PA
LTP ORTHOMETRIC HEIGHT	+00757
FPAP ORTHOMETRIC HEIGHT	+00757

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> EDWARD G PITKA SR	<u>AIRPORT ID</u> PAGA	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 8	<u>ORIGINAL/AMENDMENT</u> 3	<u>CITY</u> GALENA	<u>STATE</u> AK
<u>AIRPORT ELEVATION</u> 154	<u>TDZE</u> 152	<u>SUPERSEDED</u> RNAV (GPS) RWY 7	<u>ORIGINAL/AMENDMENT</u> 2A	<u>DATED</u> 11/13/2014	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 9/13/2018	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 346/30 CW 166/30	NOPT	346/10 CW 166/10		5000
2. 346/10 CW 166/10		JINUV	IF/IAF	3600
3. 166/30 CW 256/30		MOCJU	IAF	3800
4. 256/30 CW 346/30		YUWAR	IAF	5000

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>
MOCJU	IAF	JINUV	NOPT	TF	FB	1.00	166.01	8.00	3600
YUWAR	IAF	JINUV	NOPT	TF	FB	1.00	346.01	8.00	3600
JINUV	IF/IAF	RAMAW	PFAF	TF	FB	1.00	076.01	7.34	2300
RAMAW	FAF	ZEMDO/2.80 NM TO RW08		TF	FB	0.30	076.28	3.82	
ZEMDO/2.80 NM TO RW08		RW08	MAP	TF	FO	0.30	076.28	2.80	
RW08	MAP	402 MSL		CA			076.28		
402 MSL		MIGKY		DF	FO	1.00			3600



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW08

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3600 DIRECT MIGKY AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)				
2.	HOLD W JINUV, RT, 076.01 INBOUND, 3600 FT. IN LIEU OF PT (IAF), MAX 6000.							
3. FAC:	076.28	PFAF: RAMAW	DIST PFAF TO MAP: 6.62	DIST PFAF TO THLD: 6.62				
4. MIN ALT:	JINUV 3600, RAMAW 2300, ZEMDO/2.80 NM TO RW08 1080*							
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	250 HAT: 0.66	GS ANT:			
6. MIN GP INCPT: 2300	GP ALT AT PFAF : RAMAW 2300		OM:	MM:	IM:			
7. GP ANGLE: 3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 42.1					
8. MSA FROM:								

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -20C OR ABOVE 54C.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 0.97 NM TO RW08*
*LNAV ONLY
WAAS CHANNEL #86907
REFERENCE PATH ID: W08A
CHART FAS OBST: 247 DOME 644431N/1565727W.
HOLD E, LT, 257.09 INBOUND
LTP HAE: 53.1 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD



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	402	1	250	402	1	250	402	1	250	402	1	250			
LNAV/VNAV DA	410	1	258	410	1	258	410	1	258	410	1	258			
LNAV MDA	500	1	348	500	1	348	500	1	348	500	1	348			
CIRCLING	560	1	406	620	1	466	620	1 1/2	466	720	2	566			

CHANGES - REASONS

1. UPDATED MAGVAR FROM 17E/2010 TO 13E/2020, UPDATED RWY NUMBER FROM 7 TO 8, UPDATED REFERENCE PATH ID FROM W07A TO W08A, AND ALL COURSES UPDATED 4 DEGREES WEST - AIRPORT MAGVAR OUT OF TOLERANCE.
2. UPDATED AIRPORT ELEVATION FROM 153 TO 154 AND TDZE FROM 150 TO 152 - NEW AIRPORT DATA.
3. LOWERED TAA STRAIGHT-IN OUTER SECTOR ALTITUDE FROM 5500 TO 5000 - NEW CONTROLLING OBSTACLE.
4. LOWERED LEFT BASE ALTITUDE FROM 4300 TO 3800 - NEW CONTROLLING OBSTACLE.
5. DELETED RIGHT BASE STEP DOWN ARC AND LOWERED THE SECTOR ALTITUDE FROM 5400 TO 5000 - NEW CONTROLLING OBSTACLE.
6. UPDATED MOCJU TO JINUV COURSE FROM 162.02 TO 166.01, YUWAR TO JINUV COURSE FROM 342.02 TO 346.01, JINUV TO RAMAW COURSE/DISTANCE FROM 072.02/7.50 TO 076.02/7.34- MAGVAR OUT OF TOLERANCE/MOVED RAMAW (FAF) WEST 930 FEET.
7. RAISED JINUV TO RAMAW ALTITUDE, FAF ALTITUDE AND GS INCPT FROM 2200 TO 2300 - ATC/FPT CHECKLIST
8. UPDATED SDF FIX DISCRIPTION FROM "ZEMDO/2.22 NM TO RW07" TO "ZEMDO/2.80 NM TO RW07," - MOVED ZEMDO 2521 FEET WEST.
9. UPDATED RAMAW TO ZEMDO DISTANCE FROM 4.08 TO 3.82 AND ZEMDO TO RW08 COURSE DISTANCE FROM 072.42/2.22 TO 072.28/2.22 - MOVED RAMAW (FAF) WEST 930 FEET AND MOVED ZEMDO 2521 FEET WEST.
10. UPDATED CA LEG FROM "RW07 TO 398 MSL" TO "RW08 TO 402 MSL" - RWY NUMBER UPDATE/NEW AIRPORT DATA.
11. ADDED LEG TYPES AND RNP VALUES TO TERMINAL ROUTES - IAW 8260.19H 8-6-4.A.(6)(B) & (C).
12. UPDATED "398 MSL TO MIGKY" TO "402 MSL TO MIGKY AND LOWERED MA ALTITUDE FROM 4000 TO 3600 - NEW AIRPORT DATA/NEW CONTROLLING OBSTACLE.
13. UPDATED HIL INBOUND COURSE FROM 072.02 TO 076.01 - ALIGN WITH INTERMEDIATE COURSE.
14. UPDATED DIST FAF TO MAP/THLD FROM 6.30 TO 6.62 - MOVED RAMAW (FAF) WEST 930 FEET.
15. RAISED ZEMDO SDF ALITDUE FROM 900 TO 1080 - MOVED ZEMDO 2521 FEET WEST/OPTIMUM DESCENT GRADIENT.
16. ADDED "250 HAT: 0.66" TO LINE 5 AND DELETED "DISTANCE TO THLD FROM 250 HATH: 0.64 NM." FROM ADDITIONAL FLIGHT DATA - IAW 8260.19H 8-6-7.E.(3) DISTANCE CHANGED DUE TO NEW AIRPORT DATA.
17. LOWERED TCH FROM 45.0 TO 42.1 - ATC/FPT CHECKLIST.
18. UPDATED NOTE FROM "34:1 IS NOT CLEAR" TO "34:1 IS CLEAR" AND ADDED "20:1 IS CLEAR" - ALL VISUAL SURFACES ARE CLEAR, IAW 8260.19H 8-6-7.G.(3).
19. UPDATED FAS OBST FROM "CHART FAS OBST: 249 TREE 644348N/1570133W" TO "CHART FAS OBST: 247 DOME 644431N/1565727W" - NEW CONTROLLING OBSTACLE.
20. DELETED "FAS OBST: 333 AAO 6444403N/157W" - FAF TO STEPDOWN OBSTACLE NOT REQUIRED WHEN THEIR IS A STEPDOWN AND NO DUAL MINS. IAW 8260.19H 8-6-10.C.
21. ADDED "CHART VDP AT 0.97 NM TO RW08*" AND "LNAV ONLY" TO ADDITIONAL FLIGHT DATA - 20:1 PENETRATIONS NO LONGER EXIST.
22. ADDED CHART CIRCLING ICON TO ADDITIONAL FLIGHT DATA - IAW 8260.19H PARA 8-6-10.T. & UPDATE TO NEW CIRCLING CRITERIA.
23. RAISED LPV ALL CATS DA FROM 400 TO 402 - NEW AIRPORT DATA.
24. LOWERED LNAV/VNAV ALL CATS DA/VIS/HAT FROM 511/1 1/4/361 TO 410/1/258, LOWERED LNAV ALL CATS MDA/HAT FROM 560/410 TO 500/348 AND VIS CATS C/D FROM 1 1/8 TO 1 AND LOWERED CIRCLING CMDA/HAA FROM 620/467 TO 560/406 - NEW CONTROLLING OBSTACLE.
25. UPDATED CIRCLING HAA CATS B/C FROM 467 TO 466 AND CAT D FROM 567 TO 566 - NEW AIRPORT DATA.
26. ADDED "RNP APCH" TO PBN REQUIREMENTS NOTES AND DELETED "CHART NOTE: DME/DME RNP - 0.3 NA" FROM NOTES SECTION - IAW 8260.19H PARA 8-6-8.B.(1) AND IMPLEMENTATION OF FAA ORDER 8260.19H FLIGHT PROCEDURES AND AIRSPACE MEMO, DATED 9/12/2017 PARA. F.
27. UPDATED TEMPERATURE NOTE FROM "CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -25C (-13F) OR ABOVE 42C (109F)" TO "CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -20C OR ABOVE 54C" - IAW 8260.19H 8-6-9.S. AND MEMO DATED 03/01/2013.
28. MOVED THE BACK-UP ALTIMETER NOTE AND ALL ASSOCIATED NOTES TO THE 8260-9 PART C GENERAL REMARKS - IAW 8-6-9.F.(3).
29. DELETED "CHART NOTE: WHEN VGSi INOP, PROCEDURE NA AT NIGHT" - VGSi DECOMMISSIONED/20:1 PENETRATIONS NO LONGER EXIST.
30. UPDATED CRC REMAINDER FROM 41D43142 TO E633A981- CHANGE TO REF PATH ID, LTP LAT/LONG AND VAL.
31. DELETED "CHART NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 1SM NA" - 20:1 AND 34:1 PENETRATIONS NO LONGER EXIST.





FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> EDWARD G PITKA SR	<u>AIRPORT ID</u> PAGA	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 26	<u>ORIGINAL/AMENDMENT</u> 3	<u>CITY</u> GALENA	<u>STATE</u> AK
<u>AIRPORT ELEVATION</u> 154	<u>TDZE</u> 154	<u>SUPERSEDED</u> RNAV (GPS) RWY 25	<u>ORIGINAL/AMENDMENT</u> 2B	<u>DATED</u> 11/13/2014	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 167/30 CW 347/30	NOPT	167/8 CW 347/8		5900
2. 167/8 CW 347/8		MIGKY	IF/IAF	4000
3. 347/30 CW 077/30		ORIZY	IAF	5000
4. 077/30 CW 167/30		EDWUM	IAF	4300

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>
ORIZY	IAF	MIGKY	NOPT	TF	FB	1.00	347.10	8.00	4000
EDWUM	IAF	MIGKY	NOPT	TF	FB	1.00	167.10	8.00	4000
MIGKY	IF/IAF	CIVBA		TF	FB	1.00	257.09	9.53	2300
CIVBA	FAF	YAGUL/3.00 NM TO RW26		TF	FB	0.30	256.78	3.61	
YAGUL/3.00 NM TO RW26		RW26	MAP	TF	FO	0.30	256.78	3.00	
RW26	MAP	404 MSL		CA			256.78		
404 MSL		JINUV		DF	FO	1.00			3600



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW26

MISSED APPROACH INSTRUCTIONS:
CLIMB TO 3600 DIRECT JINUV AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3600.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)					
2.	HOLD E MIGKY, LT, 257.09 INBOUND, 4000 FT. IN LIEU OF PT (IAF), MAX 6000.								
3. FAC:	256.78	FAF: CIVBA	DIST FAF TO MAP: 6.61	DIST FAF TO THLD: 6.61					
4. MIN ALT:	MIGKY 4000, CIVBA 2300, YAGUL/3.00 NM TO RW26 1140*								
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	250 HAT: 0.65	GS ANT:				
6. MIN GP INCPT: 2300	GP ALT AT FAF : CIVBA 2300		OM:	MM:	IM:				
7. GP ANGLE: 3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 42.4						
8. MSA FROM:									

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -20C OR ABOVE 54C.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.02 NM TO RW26*
*LNAV ONLY
WAAS CHANNEL #77707
REFERENCE PATH ID: W26A
CHART FAS OBST: 252 TREE 644431N/1565423W.
550 AAO 644337N/1564252W.
HOLD W, RT, 076.01 INBOUND
LTP HAE: 54.2 M

MINIMUMS:
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT
ALTERNATE: NA ☐ STANDARD



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	404	1	250	404	1	250	404	1	250	404	1	250			
LNAV/VNAV DA	414	1	260	414	1	260	414	1	260	414	1	260			
LNAV MDA	520	1	366	520	1	366	520	1	366	520	1	366			
CIRCLING	560	1	406	620	1	466	620	1 1/2	466	720	2	566			

CHANGES - REASONS

1. UPDATED MAGVAR FROM 17E/2010 TO 13E/2020, UPDATED RWY NUMBER FROM 25 TO 26, AND ALL COURSES UPDATED 4 DEGREES EAST - AIRPORT MAGVAR OUT OF TOLERANCE.
2. UPDATED AIRPORT ELEVATION FROM 153 TO 154 AND TDZE FROM 153 TO 154 - NEW AIRPORT DATA.
3. UPDATED PROCEDURE NAME FROM RNAV (GPS) RWY 25 TO RNAV (GPS) RWY 26 - MAGVAR OUT OF TOLERANCE.
4. CHANGED TAA STRAIGHT IN OUTER ALIGNMENT RADIALS FROM 163 CW 343 TO 167 CW 347 - MAGVAR OUT OF TOLERANCE.
5. CHANGED TAA STRAIGHT IN INNER ALIGNMENT RADIALS AND ARC FROM 163/5 CW 343/5 TO 167/8 CW 347/8 - MAGVAR OUT OF TOLERANCE AND ATC/FPT CHECKLIST.
6. CHANGED TAA LEFT BASE ALIGNMENT RADIALS FROM 343 CW 073 TO 347 CW 077 - MAGVAR OUT OF TOLERANCE.
7. CHANGED TAA RIGHT BASE ALIGNMENT RADIALS FROM 073 CW 163 TO 077 CW 167 - MAGVAR OUT OF TOLERANCE.
8. RAISED MIGKY TO CIVBA ALTITUDE, FAF ALTITUDE AND GS INCPT FROM 2200 TO 2300 - ATC/FPT CHECKLIST
9. UPDATED ORIZY TO MIGKY COURSE FROM 343.10 TO 347.10, EDWUM TO MIGKY COURSE FROM 163.10 TO 167.10, MIGKY TO CIVBA COURSE/DISTANCE FROM 253.10/9.73 TO 257.09/9.53 - MAGVAR OUT OF TOLERANCE
10. UPDATED CIVBA TO YAGUL COURSE/DISTANCE CHANGED FROM 252.76/4.08 TO 256.78/3.61 - MOVED CIVBA (FAF) EAST 1190 FEET. - TCH AND PFAF ALTITUDE CHANGED.
11. UPDATED YAGUL TO RWY 26 (MAP) COURSE/DISTANCE CHANGED FROM 252.62/2.19 TO 256.78/3.00 - MOVED YAGUL (SDF) EAST 4072 FEET - IAW 8260.54A PARA 3.5.1.
12. CHANGED FAF DISTANCE FAF TO THLD FROM 6.27NM TO 6.61NM - NEW LOCATION OF FAF FOR 2300 FT ALTITUDE.
13. LOWERED TCH FROM 50.0 TO 42.4 - PER ATC/FPT CHECKLIST.
14. CHANGED HOLDING TURN DIRECTION/INBOUND RADIAL FROM RT/253.10 TO LT/257.09 - ATC REQUEST AND DUE TO TERRAIN.
15. CHANGED MISSED APPROACH INSTRUCTIONS FROM CLIMB TO 3600 DIRECT JINUV AND HOLD TO CLIMB TO 3600 DIRECT JINUV AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3600 - ATC/FPT CHECKLIST.
16. ADDED "CHART CIRCLING ICON" TO ADDITIONAL FLIGHT DATA - IAW 8260.19H PARA 8-6-10.T. & UPDATE TO NEW CIRCLING CRITERIA.
17. ADDED "CHART VDP AT 1.02NM TO RW26 AND **LNAV ONLY" TO ADDITIONAL FLIGHT DATA - 20:1 PENETRATIONS NO LONGER EXIST.
18. UPDATED CRC REMAINDER IN FAS DATA FROM 6F5E2E65 TO 11D1DBE7- CHANGE TO REF PATH ID, LTP LAT/LONG - UPDATED AIRPORT DATA, TCH, RWY NUMBER CHANGE, AND FPAP.
19. UPDATED NOTE FROM "34:1 IS NOT CLEAR" TO "34:1 IS CLEAR" AND ADDED "20:1 IS CLEAR" - ALL VISUAL SURFACES ARE CLEAR, IAW 8260.19H 8-6-7.G.(3).
20. UPDATED FAS OBST FROM "CHART FAS OBST: 320 MOBILE CRANE 64403N/1565506W" TO "CHART FAS OBST: 252 TREE 644431N/1565423W" - NEW CONTROLLING OBSTACLE.
21. ADDED "RNP APCH" TO PBN REQUIREMENTS NOTES AND DELETED "CHART NOTE: DME/DME RNP - 0.3 NA" FROM NOTES SECTION - IAW 8260.19H PARA 8-6-8.B.(1) AND IMPLEMENTATION OF FAA ORDER 8260.19H FLIGHT PROCEDURES AND AIRSPACE MEMO, DATED 9/12/2017 PARA. F.
22. UPDATED TEMPERATURE NOTE FROM "CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -25C (-13F) OR ABOVE 42C (109F)" TO "CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -20C OR ABOVE 54C" - IAW 8260.19H 8-6-9.S. AND MEMO DATED 03/01/2013.
23. MOVED THE BACK-UP ALTIMETER NOTE AND ALL ASSOCIATED NOTES TO THE 8260-9 PART C GENERAL REMARKS - IAW 8-6-9.F.(3).
24. DELETED "CHART NOTE: PROCEDURE NA AT NIGHT" - VGSI DECOMMISSIONED/20:1 PENETRATIONS NO LONGER EXIST.
25. UPDATED CA LEG FROM "RW25 TO 403 MSL" TO "RW26 TO 404 MSL" - MAGVAR OUT OF TOLERANCE/NEW AIRPORT DATA.
26. ADDED LEG TYPES AND RNP VALUES TO TERMINAL ROUTES - IAW 8260.19H 8-6-4.A.(6)(B) & (C).
27. RAISED LPV ALL CATS DA FROM 403 TO 404 - NEW AIRPORT DATA.
28. LOWERED LNAV/VNAV ALL CATS DA/VIS/HAT FROM 481/1 1/8/328 TO 414/1/260, LOWERED LNAV ALL CATS MDA/HAT FROM 580/427 TO 520/366 AND VIS CATS C/D FROM 1 1/4 TO 1 AND LOWERED CAT A CIRCLING CMDA/HAA FROM 620/467 TO 560/406, CAT B/C HAA FROM 467 TO 466, CAT D HAA TO 567 TO 566 - NEW CONTROLLING OBSTACLE.
29. DELETED "CHART NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 1SM NA" - 20:1 AND 34:1 PENETRATIONS NO LONGER EXIST.
30. LOWERED TAA LEFT BASE ALTITUDE FROM 5400 TO 5000 - NEW CONTROLLING OBSTACLE.
31. ADDED 550 (7:1) OBSTACLE AAO TO ADDITIONAL FLIGHT DATA NOTES.

PDF EDIT CRITICAL TEMP REMARKS: CHANGED AVERAGE COLD TEMPERATURE DERIVED FROM ISA - 40 TO AVERAGE COLD TEMPERATURE BASED ON STANDARD -40C DEVIATION.





**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
GALENA, AK	EDWARD G PITKA SR	9/13/2018	1

TAKEOFF MINIMUMS:

RWY 6, 24: NA - ENVIROMENTAL

RWY 8, 26: STANDARD

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 8, DAM 0 FT FROM DER, 198 FT RIGHT OF CENTERLINE, 37 FT AGL/165 FT MSL. TREES BEGINNING 18 FT FROM DER, 298 FT RIGHT OF CENTERLINE, UP TO 22 FT AGL/170 FT MSL. TREES, TERRAIN, TRAVERSE WAY BEGINNING 50 FT FROM DER, 340 FT RIGHT OF CENTERLINE, UP TO 24 FT AGL/171 FT MSL. TREE, DAM BEGINNING 232 FT FROM DER, 443 FT RIGHT OF CENTERLINE, UP TO 18 FT AGL/177 FT MSL. TREES, TRAVERSE WAY BEGINNING 247 FT FROM DER, 351 FT RIGHT OF CENTERLINE, UP TO 40 FT AGL/189 FT MSL. TREES, TRAVERSE WAY BEGINNING 575 FT FROM DER, 179 FT RIGHT OF CENTERLINE, UP TO 43 FT AGL/195 FT MSL. CATENARY 1439 FT FROM DER, 876 FT LEFT OF CENTERLINE, 44 FT AGL/195 FT MSL.

NOTE: RWY 26, NAVAID 26 FT FROM DER, 85 FT RIGHT OF CENTERLINE, 2 FT AGL/150 FT MSL. TREE 55 FT FROM DER, 498 FT LEFT OF CENTERLINE, 6 FT AGL/154 FT MSL. TRAVERSE WAY, TREES BEGINNING 211 FT FROM DER, 499 FT LEFT OF CENTERLINE, UP TO 169 FT MSL. TOWER, TREE BEGINNING 236 FT FROM DER, 456 FT RIGHT OF CENTERLINE, UP TO 82 FT AGL/210 FT MSL. TREES, TRAVERSE WAY BEGINNING 350 FT FROM DER, 339 FT LEFT OF CENTERLINE, UP TO 42 FT AGL/193 FT MSL. TREES BEGINNING 2383 FT FROM DER, 851 FT RIGHT OF CENTERLINE, UP TO 75 FT AGL/214 FT MSL.

CONTROLLING OBSTACLES:

REMARKS:

<u>FLIGHT INSPECTED BY:</u>	<i>Digitally signed by</i> DONALD H LANIER Jun 19, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
PENDING			
<u>DEVELOPED BY:</u>	<i>Digitally signed by</i> DONALD H LANIER Jun 19, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
ADOLFO URRUTIA (ANTHONY KACZKA)		AJV-5432	04/18/2018
<u>APPROVED BY:</u>	<i>Digitally signed by</i> DONALD H LANIER Jun 19, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
PATRICK MULQUEEN		AJV-5430	

REQUIRED EFFECTIVE DATE:
9/13/2018

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☐	☐	☒

OTHER:

ZAN, AIRPORT MANAGER, AT AV DIR, WESTERN FPT

CHANGES - REASONS:

1. CHANGE ALL REFERENCES OF RWY 6/24 TO 8/26. - AIRPORT MAG VAR UPDATED AND RWY RE-NUMBERING.
2. UPDATED TAKEOFF OBSTACLE NOTES. - NEW SURVEYED OBSTACLES.
3. RWY 6/24 UNUSEABLE FOR IFR DEPARTURES (GRAVEL RWY SURFACE). - IAW 8260.48F, PARA 6 A, APPENDIX D.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
GRAPHIC DEPARTURE PROCEDURES (DP)**

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<u>DP NAME</u>	<u>NUMBER</u>	<u>DP COMPUTER CODE</u>	<u>SUPERSEDED NUMBER</u>	<u>DATED</u>	<u>EFFECTIVE DATE</u>
NOME	TWO	OME2.OME	ONE	12/22/2005	13 SEPTEMBER 2018

<u>TYPE:</u>	<u>OBSTACLE</u>	<u>COPTER</u>	<u>SID</u>	<u>SPECIAL</u>	<u>RNAV</u>
	☒	☐	☐	☐	☒

DP ROUTE DESCRIPTION:

TAKEOFF RWY 3: CLIMB HEADING 025.97 TO 557, THEN CLIMBING LEFT TURN DIRECT KUSEY, THENCE...

TAKEOFF RWY 21: CLIMB HEADING 205.98 TO 557, THEN CLIMBING RIGHT TURN DIRECT KUSEY, THENCE...

...ON TRACK 251.25 TO OME VOR/DME, MAINTAIN 5000.

TRANSITION ROUTES (GRAPHIC DEPICTION ONLY):

<u>TRANSITION NAME</u>	<u>TRANSITION COMPUTER CODE</u>	<u>FROM FIX/NAVAID</u>	<u>TO FIX/NAVAID</u>	<u>COURSE</u>	<u>DISTANCE</u>	<u>MEA</u>	<u>MOCA</u>	<u>CROSSING ALTITUDE/FIXES</u>

PROCEDURAL DATA NOTES:

NOTE: GPS REQUIRED.

NOTE: RNAV 1.

TAKEOFF MINIMUMS:

RWY 3: STANDARD WITH MINIMUM CLIMB OF 280 FT PER NM TO 1700.

RWY 21: STANDARD WITH A MINIMUM CLIMB OF 350 FT PER NM TO 2000.

TAKEOFF OBSTACLES NOTES:

NOTE: RWY 3: VERTICAL STRUCTURE AND VEGETATION BEGINNING 12 FT FROM DER, 9 FT RIGHT OF CENTERLINE, UP TO 39 FT MSL. VERTICAL STRUCTURE, VEGETATION, AND VEHICLES ON ROAD BEGINNING 13 FT FROM DER, 21 FT LEFT OF CENTERLINE, UP TO 39 FT MSL. VEHICLES ON ROAD BEGINNING 168 FT FROM DER, 80 FT LEFT OF CENTERLINE, UP TO 46 FT MSL.

NOTE: RWY 21: VERTICAL STRUCTURE AND VEGETATION BEGINNING 12 FT FROM DER, 23 FT RIGHT OF CENTERLINE, UP TO 8 FT AGL/64 FT MSL. VERTICAL STRUCTURE 55 FT FROM DER, 1 FT LEFT OF CENTERLINE, 60 FT MSL. VERTICAL STRUCTURE 443 FT FROM DER, 614 FT RIGHT OF CENTERLINE, 22 FT AGL/78 FT MSL.

CONTROLLING OBSTACLES:

RWY 3: 1279 FT MSL AAO 643850.00N/1625435.00W.

RWY 21: 1499 FT MSL AAO 642859.00N/1631016.00W.

LOST COMMUNICATIONS PROCEDURES:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
GRAPHIC DEPARTURE PROCEDURES (DP)**

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<u>DP NAME</u>	<u>NUMBER</u>	<u>DP COMPUTER CODE</u>	<u>SUPERSEDED NUMBER</u>	<u>DATED</u>	<u>EFFECTIVE DATE</u>
NOME	TWO	OME2.OME	ONE	12/22/2005	13 SEPTEMBER 2018

ADDITIONAL FLIGHT DATA:
REFERENCE MAG VAR: PAGL 10E EPOCH YR: 2020
DME/DME ASSESSMENT: NOT CONDUCTED.

AIRPORTS SERVED:

<u>AIRPORT NAME</u>	<u>CITY</u>	<u>STATE</u>
GOLOVIN	GOLOVIN	AK

COMMUNICATIONS:
ZAN, OME FSS, CTAF, AWOS

FIXES AND/OR NAVAIDS:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
GRAPHIC DEPARTURE PROCEDURES (DP)**

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<u>DP NAME</u>	<u>NUMBER</u>	<u>DP COMPUTER CODE</u>	<u>SUPERSEDED NUMBER</u>	<u>DATED</u>	<u>EFFECTIVE DATE</u>
NOME	TWO	OME2.OME	ONE	12/22/2005	13 SEPTEMBER 2018

REMARKS:

1. RWY 3 CLIMB GRADIENT ROUNDED TO 280 FT PER NM FOR PUBLICATION (COMPUTED VALUE 277.94 FT PER NM).
2. RWY 21 CLIMB GRADIENT ROUNDED TO 350 FT PER NM FOR PUBLICATION (COMPUTED VALUE 347.12 FT PER NM).

FLIGHT INSPECTED BY: *Digitally signed by*
JOHN KEARBY **ROBERT G HAMILTON**
Jun 25, 2018

OFFICE SYMBOL: **DATE:**
FICO 6/20/18

DEVELOPED BY: *Digitally signed by*
PETER GUIMOND **PETER R GUIMOND**
Apr 19, 2018

OFFICE SYMBOL: **DATE:**
AJV-5422 04/19/2018

APPROVED BY: *Digitally signed by*
JULIE MORGAN **ROBERT G HAMILTON**
Jun 25, 2018

OFFICE SYMBOL: **DATE:**
AJV-5420

REQUIRED EFFECTIVE DATE:
ROUTINE

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☐	☐	☒

OTHER:

ZAN, AMGR, STATE OF ALASKA DOT

CHANGES - REASONS:

1. AMENDED REFERENCE MAGVAR FROM 16E (2005) TO 10E (2020) - WESTERN FPT REQUEST.
2. AMENDED ALL REFERENCES OF RWY 2/20 TO RWY 3/21 - WESTERN FPT REQUEST, RUNWAYS ARE BEING RENUMBERED FOR MAGVAR UPDATE.
3. DELETED RWY 3 TAKEOFF DP ROUTE DESCRIPTION: CLIMB DIRECT DAGKE, THEN LEFT TURN VIA 280.86 TRACK TO POYIC, THEN VIA 245.32 TRACK TO KUSEY - REPLACED BY UPDATED DP ROUTE DESCRIPTION.
4. ADDED RWY 3 DP ROUTE DESCRIPTION: CLIMB HEADING 025.97 TO 557, THEN CLIMBING LEFT TURN DIRECT KUSEY - WESTERN FPT REQUEST.
5. DELETED RWY 21 TAKEOFF ROUTE DESCRIPTION: CLIMB DIRECT EBAYA, THEN VIA 274.13 TRACK TO KUSEY - REPLACED BY UPDATED DP ROUTE DESCRIPTION.
6. ADDED RWY 21 DP ROUTE DESCRIPTION: CLIMB HEADING 215.98 TO 557, THEN CLIMBING RIGHT TURN DIRECT KUSEY - WESTERN FPT REQUEST.
7. AMENDED TRACK TO OME VOR/DME FROM 245.25 TO 251.25 - COMPUTED USING UPDATED REFERENCE MAGVAR.
8. AMENDED RWY 3 TAKEOFF MINIMUMS FROM STANDARD WITH MINIMUM CLIMB OF 260 FT PER NM TO 1200 TO READ STANDARD WITH MINIMUM CLIMB OF 280 FT PER NM TO 1700 - NEW OBSTACLE STUDY.
9. AMENDED RWY 21 TAKEOFF MINIMUMS FROM STANDARD TO READ STANDARD WITH MINIMUM CLIMB OF 350 FT PER NM TO 2000 - NEW OBSTACLE STUDY.
10. AMENDED RWY 3 AND RWY 21 TAKEOFF OBSTACLE NOTES - NEW OBSTACLE STUDY USING OBSTACLE SURVEY ADDED SINCE LAST AMENDMENT. GROUPED AND FORMATTED IN ACCORDANCE WITH THE DEPARTURE OBSTACLE GROUPER SOP (1.0).
11. AMENDED RWY 3 AND RWY 21 CONTROLLING OBSTACLES - NEW OBSTACLE STUDY. FORMATTED IN ACCORDANCE WITH FAAO 8260.46F, APPENDIX E, PARA 8.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
DEPARTURE (DATA RECORD)**

<u>DP NAME</u>		<u>NUMBER</u>		<u>DP COMPUTER CODE</u>		<u>SUPERSEDED NUMBER</u>		<u>DATED</u>	<u>EFFECTIVE DATE</u>
NOME		TWO		OME2.OME		ONE		12/22/2005	13 SEPTEMBER 2018
<u>FIX/NAVAID</u>	<u>LAT/LONG</u>	<u>C</u>	<u>FO/FB</u>	<u>LEG TYPE</u>	<u>TC</u>	<u>DIST (NM)</u>	<u>ALTITUDE</u>	<u>SPEED</u>	<u>REMARKS</u>
RW03 (AER)	643245.72N/1630052.69W	N	-	-	-	-			
557 MSL	-	-	-	VA	035.97	-			CG 280 FT PER NM TO 1700
KUSEY	643609.68N/1633708.59W	Y	FB	DF	-	-			LEFT TURN
OME VOR/DME	642906.39N/1651511.43W	Y	FB	TF	261.25	42.92			
RW21 (AER)	643317.58N/1625958.94W	N	-	-	-	-			
557 MSL	-	-	-	VA	215.98	-			CG 350 FT PER NM TO 2000
KUSEY	643609.68N/1633708.59W	Y	FB	DF	-	-			RIGHT TURN
OME VOR/DME	642906.39N/1651511.43W	Y	FB	TF	261.25	42.92			



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> GOLOVIN	<u>AIRPORT ID</u> PAGL	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 3	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> GOLOVIN	<u>STATE</u> AK	
<u>AIRPORT ELEVATION</u> 57	<u>TDZE</u> 57	<u>SUPERSEDED</u> RNAV (GPS) RWY 2	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 12/22/2005	<u>MAG VAR</u> 10E	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 281/30 CW 101/30	NOPT	ZOVAN	IF/IAF	3000
2. 101/30 CW 191/30		101/22 CW 191/22		4500
3. 101/22 CW 191/22		JODMI	IAF	3900
4. 191/30 CW 281/30		191/10 CW 281/10		4500
5. 191/10 CW 281/10		TAMVE	IAF	3700

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>
JODMI	IAF	ZOVAN	NOPT	TF	FB	1.00	101.03	8.00	3000
TAMVE	IAF	ZOVAN	NOPT	TF	FB	1.00	281.55	8.00	3000
ZOVAN	IF/IAF	HAPNA		TF	FB	1.00	011.29	8.00	2900
HAPNA	FAF	TINOC/3.80 NM TO XELHU		TF	FB	0.30	011.39	4.04	
TINOC/3.80 NM TO XELHU		VIYUV/2.20 NM TO XELHU		TF	FB	0.30	011.39	1.60	
VIYUV/2.20 NM TO XELHU		XELHU	MAP	TF	FO	0.30	011.39	2.20	
XELHU	MAP	500 MSL		CA			011.39		500
500 MSL		WUKPO		DF	FB	1.00			
WUKPO		WONAB		TF	FO	1.00	210.15	23.36	3000



MISSED APPROACH

MAP:

LNAV: XELHU

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 500 THEN CLIMBING LEFT TURN TO 3000 DIRECT WUKPO AND ON TRACK 210.15 TO WONAB AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)		
2. HOLD S ZOVAN, RT, 011.29 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.						
3. FAC:	011.39	FAF: HAPNA	DIST FAF TO MAP: 7.84	DIST FAF TO THLD: 8.48		
4. MIN ALT: ZOVAN 3000, HAPNA 2900, TINOC/3.80 NM TO XELHU 1580, VIYUV/2.20 NM TO XELHU 1040						
5. DIST TO THLD FROM OM:		MM:	IM:	150 HAT:	HAT:	
6. MIN GP INCPT:		GP ALT AT FAF :		OM:	MM:	IM:
7. GP ANGLE:	34:1:	IS NOT CLEAR	20:1:	IS CLEAR	TCH:	
8. MSA FROM:						

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA SE OF RWY 3-21.
CHART NOTE: RWY 3 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
TINOC TO RW03: 3.14/40.
CHART PLANVIEW NOTE: FINAL APPROACH COURSE OFFSET 14.46 DEGREES.
CHART FAS OBST: 147 TOWER 643245N/1630137W.
FAC CROSSES RWY C/L EXTENDED 3026 FT FROM THLD.
HOLD W, RT, 089.00 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 1000-3

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
LNAV MDA	400	1	343	400	1	343	400	1	343	400	1	343			
CIRCLING	460	1	403	520	1	463	680	1 3/4	623	1000	3	943			



CHANGES - REASONS

1. AMENDED PROCEDURE MAGVAR FROM 16E (2005) TO 10E (2020) - WESTERN FPT CHECKLIST REQUEST.
2. AMENDED ALL REFERENCES TO RWY 2/20 TO RWY 3/21 - RWYS BEING RENUMBERED FOR MAGVAR UPDATE.
3. AMENDED PROCEDURE NAME FROM RNAV (GPS) RWY 2 TO RNAV (GPS) RWY 3 - RWY BEING RENUMBERED FOR MAGVAR UPDATE.
4. DELETED GACEY AND TOCOT INITIAL SEGMENTS - WESTERN FPT CHECKLIST REQUEST.
5. DELETED SOROC INTERMEDIATE AND HOLD-IN-LIEU SEGMENT - WESTERN FPT CHECKLIST REQUEST.
6. ADDED JODMI AND TAMVE INITIAL SEGMENTS - WESTERN FPT CHECKLIST REQUEST.
7. ADDED ZOVAN INTERMEDIATE AND HOLD-IN-LIEU SEGMENT - WESTERN FPT CHECKLIST REQUEST.
8. AMENDED ALL TAA SECTORS AND ALTITUDES - EVALUATED USING AMENDED MAGVAR VALUE, NEW IAF(S) AND IF/IAF, AND NEW STEPDOWN ARCS REQUESTED BY WESTERN FPT CHECKLIST.
9. MOVED HAPNA (FAF) 0.52 NM SOUTHWEST - WESTERN FPT CHECKLIST REQUEST, FINAL OFFSET TO AVOID HIGH TERRAIN AND ACHIEVE BEST MINIMUMS.
10. AMENDED MISSED APPROACH POINT FROM RUNWAY THRESHOLD TO XELHU - MOVED TO A POINT AT LEAST 3000 FEET PRIOR TO THRESHOLD DUE TO 14.46 DEGREE FINAL OFFSET AND NAMED IN ACCORDANCE WITH FAAO 8260.19H, PARA 2-10-5A(3)B.
11. MOVED TINOC STEPDOWN FIX 0.56 NM NORTH - ALIGNED WITH AMENDED FAF AND MAP LOCATIONS.
12. ADDED SECOND FINAL STEPDOWN FIX VIYUV - ACHIEVE BEST MINIMUMS.
13. DELETED MISSED APPROACH: CLIMBING LEFT TURN TO 3000 DIRECT WONAB AND HOLD - REPLACED BY NEW MISSED APPROACH.
14. ADDED MISSED APPROACH: CLIMB TO 500 THEN CLIMBING LEFT TURN TO 3000 DIRECT WUKPO AND ON TRACK 210.15 TO WONAB AND HOLD - WESTERN FPT CHECKLIST REQUEST.
15. AMENDED MISSED APPROACH INBOUND HOLDING COURSE FROM 088.52 TO 089.00 - WESTERN FPT CHECKLIST REQUEST.
16. AMENDED FINAL APPROACH COURSE FROM 004.90 TO 011.39 - COMPUTED USING UPDATED MAGVAR AND UPDATED POSITION OF HAPNA.
17. DELETED CHART 979 TREE 642830N/16330853W FROM ADDITIONAL FLIGHT DATA - REPLACED BY UPDATED OBSTACLE.
18. DELETED CHART 1718 TREE 642745N/1630942W FROM ADDITIONAL FLIGHT DATA - NO LONGER REQUIRED.
19. ADDED CHART FAS OBST: 147 TOWER 643245N/1630137W - NEW OBSTACLE STUDY USING UPDATED FINAL APPROACH PARAMETERS.
20. ADDED CHART CIRCLING ICON IN ADDITIONAL FLIGHT DATA - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-10T.
21. AMENDED HAPNA TO RW02: 3.31/30 TO TINOC TO RW03: 3.14/40 IN ADDITIONAL FLIGHT DATA - COMPUTED USING NEW PARAMETERS ON FINAL COURSE.
22. AMENDED 34:1 IS CLEAR TO READ 34:1 IS NOT CLEAR - 34:1 VISUAL SURFACE PENETRATED.
23. ADDED 20:1 IS CLEAR - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-7G(3).
24. AMENDED DIST FAF TO MAP FROM 8.00 TO 7.48 AND DIST FAF TO THLD FROM 8.00 TO 8.48 - COMPUTED USING AMENDED LOCATION OF HAPNA AND AMENDED POSITION OF MAP.
25. AMENDED TDZE AND APT ELEV FROM 59 TO 57 - MATCH PENDING AIRNAV DATA.
26. AMENDED CAT A/B/C LNAV MDA/HAT FROM 460/401 TO 400/343 AND CAT C VISIBILITY FROM 1 1/4 TO 1 - NEW OBSTACLE STUDY. WESTERN FPT REQUESTED LOWEST POSSIBLE MINIMUMS.
27. ADDED CAT D MINIMUMS - WESTERN FPT CHECKLIST REQUEST.
28. ADDED CAT D ALTERNATE MINIMUMS 1000-3 - CAT D MINIMUMS ADDED TO PROCEDURE.
29. AMENDED CAT A CIRCLING MDA/HAA FROM 480/421 TO 460/403 - NEW OBSTACLE STUDY, WESTERN FPT NOTIFIED AND CONCURS WITH LOWER MINIMUMS.
30. AMENDED CAT B CIRCLING MDA/HAA FROM 540/481 TO 520/463 - NEW OBSTACLE STUDY, WESTERN FPT NOTIFIED AND CONCURS WITH LOWER MINIMUMS.
31. AMENDED CAT C HAA FROM 621 TO 623 - COMPUTED USING AMENDED APT ELEV.
32. DELETED VDP AT 1.2 NM FROM RW02 - VDP NOW COMPUTES TO WITHIN 0.50 NM OF MAP AND WON'T BE PUBLISHED.
33. DELETED NOTE DME/DME RNP-0.3 NA - REPLACED BY PBN REQUIREMENTS NOTE.
34. ADDED PBN REQUIREMENTS NOTE RNP APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
35. ADDED NOTE CIRCLING NA SE OF RWY 3-21 - REQUESTED BY WESTERN FPT TO AVOID HIGH TERRAIN AND ACHIEVE BEST MINIMUMS.
36. DELETED PROFILE NOTE VGSI AND DESCENT ANGLES NOT COINCIDENT - VGSI NOT INSTALLED ACCORDING TO PENDING AIRNAV DATA
37. ADDED NOTE RWY 3 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-11K(3).
38. ADDED PLANVIEW NOTE FINAL APPROACH COURSE OFFSET 14.46 DEGREES - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-10G(1).



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZAN, AMGR, STATE OF ALASKA DOT

FLIGHT CHECKED BY

JOHN KEARBY

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

FICO

DATE

6/20/18

DEVELOPED BY

PETER R. GUIMOND

Digitally signed by
PETER R GUIMOND
Apr 20, 2018

OFFICE

AJV-5422

DATE

04/20/2018

APPROVED BY

JULIE MORGAN

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

AJV-5420

DATE

TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> GOLOVIN	<u>AIRPORT ID</u> PAGL	<u>PROCEDURE NAME</u> RNAV (GPS)-A	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> GOLOVIN	<u>STATE</u> AK	
<u>AIRPORT ELEVATION</u> 57	<u>TDZE</u>	<u>SUPERSEDED</u> RNAV (GPS)-A	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 12/22/2005	<u>MAG VAR</u> 10E	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 026/30 CW 206/30	NOPT	026/6 CW 206/6		5500
2. 026/6 CW 206/6		NOCIL	IF/IAF	3200
3. 206/30 CW 296/30		206/9 CW 296/9		5500
4. 206/9 CW 296/9		SERAI	IAF	4300
5. 296/30 CW 026/30		JIRAV	IAF	4000

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>
SERAI	IAF	NOCIL	NOPT	TF	FB	1.00	205.82	8.00	3200
JIRAV	IAF	NOCIL	NOPT	TF	FB	1.00	025.49	8.00	3200
NOCIL	IF/IAF	DADYA		TF	FB	1.00	115.66	6.00	1900
DADYA	FAF	GIDCE	MAP	TF	FO	0.30	115.83	5.00	
GIDCE	MAP	457 MSL		CA			115.83		
457 MSL		TOCOT		DF	FB	1.00			
TOCOT		FEMEB		TF	FB	1.00	245.55	13.86	
FEMEB		WONAB		TF	FO	1.00	285.27	15.05	3000



MISSED APPROACH

MAP:
GIDCE

MISSED APPROACH INSTRUCTIONS:

CLIMBING RIGHT TURN TO 3000 DIRECT TOCOT AND ON TRACK 245.55 TO FEMEB AND ON TRACK 285.27 TO WONAB AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)
2.	HOLD NW NOCIL, RT, 115.66 INBOUND, 3200 FT. IN LIEU OF PT (IF/IAF), MAX 6000.			
3. FAC:	115.83	FAF: DADYA	DIST FAF TO MAP: 5.00	DIST FAF TO THLD:
4. MIN ALT:	NOCIL 3200, DADYA 1900			
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	HAT:
6. MIN GP INCPT:	GP ALT AT FAF :	OM:	MM:	IM:
7. GP ANGLE:	34:1:	20:1:	TCH:	
8. MSA FROM:				

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA SE OF RWY 3-21.

ADDITIONAL FLIGHT DATA:

FAC CROSSES MIDPOINT OF RWY 3-21.
CHART CIRCLING ICON.
FAS OBST: 224 AAO 643660N/1630833W.
HOLD W, RT, 089.00 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ CAT D 1000-3

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
CIRCLING	480	1	423	520	1	463	680	1 3/4	623	1000	3	943			



<u>AIRPORT</u> GOLOVIN	<u>AIRPORT ID</u> PAGL	<u>PROCEDURE NAME</u> RNAV (GPS)-A	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> GOLOVIN	<u>STATE</u> AK

CHANGES - REASONS

1. AMENDED PROCEDURE MAGVAR FROM 16E (2005) TO 10E (2020) - WESTERN FPT CHECKLIST REQUEST.
2. AMENDED ALL REFERENCES TO RWY 2/20 TO RWY 3/21 - RWYS BEING RENUMBERED FOR MAGVAR UPDATE.
3. DELETED BEYAS AND KAYVE INITIAL SEGMENTS - WESTERN FPT CHECKLIST REQUEST.
4. DELETED JUDAN INTERMEDIATE STEPDOWN FIX - WESTERN FPT CHECKLIST REQUEST.
5. ADDED SERAI AND JIRAV INITIAL SEGMENTS - WESTERN FPT CHECKLIST REQUEST.
6. AMENDED MINIMUM ALTITUDE AT NOCIL (IF/IAF) FROM 3300 TO 3200 - WESTERN FPT CHECKLIST REQUEST.
7. AMENDED ALL TAA SECTORS AND ALTITUDES - EVALUATED USING AMENDED MAGVAR VALUE, NEW IAF(S), AND NEW STEPDOWN ARCS REQUESTED BY WESTERN FPT CHECKLIST.
8. AMENDED MINIMUM ALTITUDE AT DADYA (FAF) FROM 1700 TO 1900 - WESTERN FPT REQUEST TO APPLY 1500 AIRSPACE IN INTERMEDIATE SEGMENT TO CONTAIN PROCEDURE WITHIN EXISTING AIRSPACE.
9. DELETED MISSED APPROACH: CLIMBING RIGHT TURN TO 5000 DIRECT FIKBU AND HOLD, CONTINUE CLIMB-IN-HOLD TO 5000 - REPLACED BY NEW MISSED APPROACH.
10. ADDED MISSED APPROACH: CLIMBING RIGHT TURN TO 3000 DIRECT TOCOT AND ON TRACK 245.55 TO FEMEB AND ON TRACK 285.27 TO WONAB AND HOLD - WESTERN FPT CHECKLIST REQUEST.
11. AMENDED FINAL APPROACH COURSE FROM 109.83 TO 115.83 - COMPUTED USING AMENDED MAGVAR VALUE.
12. AMENDED HOLD-IN-LIEU AND INTERMEDIATE COURSE FROM 109.66 TO 115.66 - COMPUTED USING AMENDED MAGVAR VALUE.
13. DELETED NOTE DME/DME RNP-0.3 NA - REPLACED BY PBN REQUIREMENTS NOTE.
14. ADDED PBN REQUIREMENTS NOTE RNP APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
15. ADDED NOTE CIRCLING NA SE OF RWY 3-21 - REQUESTED BY WESTERN FPT TO ACHIEVE BEST MINIMUMS.
16. ADDED CHART CIRCLING ICON IN ADDITIONAL FLIGHT DATA - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-10T.
17. DELETED FAS OBST 129 TREE 643342N/1630048W IN ADDITIONAL FLIGHT DATA - REPLACED BY NEW FAS OBST.
18. ADDED FAS OBST 224 AAO 643700N/1630833W - NEW OBSTACLE STUDY USING AAO IN ACCORDANCE WITH FAAO 8260.19H, PARA 2-11-5.
19. AMENDED APT ELEV FROM 59 TO 57 - MATCH PENDING AIRNAV DATA.
20. AMENDED CAT B CIRCLING MDA/HAA FROM 540/481 TO 520/463 - NEW OBSTACLE STUDY, WESTERN FPT NOTIFIED AND CONCURS WITH LOWER MINIMUMS.
21. AMENDED CAT A HAA FROM 421 TO 423 AND CAT C HAA FROM 621 TO 623 - COMPUTED USING AMENDED APT ELEV.
22. ADDED CAT D MINIMUMS - WESTERN FPT CHECKLIST REQUEST.
23. ADDED CAT D ALTERNATE MINIMUMS 1000-3 - CAT D MINIMUMS ADDED TO PROCEDURE.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZAN, AMGR, STATE OF ALASKA DOT

FLIGHT CHECKED BY

JOHN KEARBY
Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

FICO

DATE

6/20/18

DEVELOPED BY

PETER R. GUIMOND
Digitally signed by
PETER R GUIMOND
Apr 20, 2018

OFFICE

AJV-5422

DATE

04/20/2018

APPROVED BY

JULIE MORGAN
Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

OFFICE

AJV-5420

DATE

TITLE

MANAGER



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
GOLOVIN, AK	GOLOVIN	13 SEPTEMBER 2018	1

TAKEOFF MINIMUMS:

TEXTUAL DEPARTURE PROCEDURES:

USE NOME DEPARTURE.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

CONTROLLING OBSTACLES:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
GOLOVIN, AK	GOLOVIN	13 SEPTEMBER 2018	1

REMARKS:

<u>FLIGHT INSPECTED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 25, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
JOHN KEARBY		FICO	6/20/18
<u>DEVELOPED BY:</u>	<i>Digitally signed by</i> PETER R GUIMOND Apr 19, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
PETER GUIMOND		AJV-5422	04/19/2018
<u>APPROVED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 25, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
JULIE MORGAN		AJV-5420	

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☐	☒	☒	☐	☐	☒

OTHER:

ZAN, AMGR, STATE OF ALASKA DOT.

CHANGES - REASONS:

UPDATED FORM TO CURRENT VERSION OF 8260.15A - IN ACCORDANCE WITH FAAO 8260.15A, APPENDIX D.

QUALITY
5
CHECKED

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, and radials are magnetic. Elevations and altitudes are in feet, MSL, except HATh, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE											
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)																			
2. _____																			
3. FAC ____ FAF _____ DIST FAF TO MAP ____ THLD ____																			
4. MIN. ALT _____																			
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____									
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE FLIPPIN, AR		ELEVATION: 720 AIRPORT NAME: MARION COUNTY RGNL		TDZE:		FACILITY IDENTIFIER: FLP		PROCEDURE NO./AMDТ NO./EFFECTIVE DATE: VOR-A, AMDТ 15, 03/02/2017						SUP AMDТ 14 DATE 03/12/2009					



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> POCAHONTAS MUNI	<u>AIRPORT ID</u> KM70	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>CITY</u> POCAHONTAS	<u>STATE</u> AR	
<u>AIRPORT ELEVATION</u> 273	<u>TDZE</u> 273	<u>SUPERSEDED</u>	<u>ORIGINAL/AMENDMENT</u>	<u>DATED</u>	<u>MAG VAR</u> 1W	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 092/30 CW 272/30	NOPT	TACHS	IF/IAF	3100
2. 272/30 CW 092/30	PT	TACHS	IF/IAF	3100

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>
TACHS	IF/IAF	CAPIS		TF	FB	1.00	181.75	3.84	2100
CAPIS		JAPUD	PFAF	TF	FB	1.00	181.75	4.16	2000
JAPUD	FAF	MUCIN/2.48 NM TO RW18		TF	FB	0.30	181.75	2.82	
MUCIN/2.48 NM TO RW18		RW18	MAP	TF	FO	0.30	181.75	2.48	
RW18	MAP	571 MSL		CA			181.75		
571 MSL		HAVUK		DF	FO	1.00			3100

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW18

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3100 DIRECT HAVUK AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD N TACHS, RT, 181.75 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 181.75 PFAF: JAPUD DIST PFAF TO MAP: 5.30 DIST PFAF TO THLD: 5.30
4. MIN ALT: TACHS 3100, CAPIS 2100, JAPUD 2000, MUCIN/2.48 NM TO RW18 1100
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 298 HAT: 0.81
6. MIN GP INCPT: 2000 GP ALT AT PFAF : JAPUD 2000 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA.
CHART NOTE: USE WALNUT RIDGE ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART: WALNUT RIDGE RNGL AWOS
CHART CIRCLING ICON.
WAAS CHANNEL #45543
REFERENCE PATH ID: W18A
CHART FAS OBST: 499 TREE 361715N/0905741W.
HOLD S, RT, 001.75 INBOUND
LTP HAE: 54.5 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 900-2 1/2, CAT D 900-2 3/4

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	571	1	298	571	1	298	571	1	298	571	1	298			
LNAV/VNAV DA	733	1 3/8	460	733	1 3/8	460	733	1 3/8	460	733	1 3/8	460			
LNAV MDA	780	1	507	780	1	507	780	1 3/8	507	780	1 3/8	507			
CIRCLING	900	1	627	900	1	627	1100	2 1/2	827	1100	2 3/4	827			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
POCAHONTAS MUNI	KM70	RNAV (GPS) RWY 18	ORIG	POCAHONTAS	AR

CHANGES - REASONS

ORIGINAL PROCEDURE.

PDF EDITS:
AIRSPACE LETTER CHANGED MAP TO ARP.
ADDED ELEV RWY THRESHOLD.
REMOVED MISSED APCH PENETRATING OBS FOR LNAV/VNAV AND LNAV.



COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☐ **HAI** ☐ **NBAA** ☒ **OTHER:** AIRPORT MANAGER, ZME

FLIGHT CHECKED BY

JOHN E PHILLABAUM

DEVELOPED BY

ADOLFO URRUTIA (CHRISTINE BAYSE)

APPROVED BY

PATRICK MULQUEEN

Digitally signed by
ADOLFO D URRUTIA
Jun 07, 2018

Digitally signed by
ADOLFO D URRUTIA
Jun 07, 2018

Digitally signed by
ADOLFO D URRUTIA
Jun 07, 2018

OFFICE

FICO

OFFICE

AJV-5432

OFFICE

AJV-5430

DATE

6/6/18

DATE

04/16/2018

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	M70
RUNWAY	RW18
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W18A
LTP/FTP LATITUDE	361503.5670N
LTP/FTP LONGITUDE	0905718.4280W
LTP/FTP ELLIPSOIDAL HEIGHT	+00545
FPAP LATITUDE	361334.3490N
FPAP LONGITUDE	0905719.8695W
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	1536
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0

CRC REMAINDER	9F3F8F1B

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+00828
FPAP ORTHOMETRIC HEIGHT	+00828



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> POCAHONTAS MUNI	<u>AIRPORT ID</u> KM70	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>CITY</u> POCAHONTAS	<u>STATE</u> AR	
<u>AIRPORT ELEVATION</u> 273	<u>TDZE</u> 273	<u>SUPERSEDED</u>	<u>ORIGINAL/AMENDMENT</u>	<u>DATED</u>	<u>MAG VAR</u> 1W	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 272/30 CW 092/30	NOPT	HAVUK	IF/IAF	3100
2. 092/30 CW 272/30	PT	HAVUK	IF/IAF	3100

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>
HAVUK	IF/IAF	KADEY	PFAF	TF	FB	1.00	001.75	8.00	2000
KADEY	FAF	IDRUW/2.48 NM TO RW36		TF	FB	0.30	001.75	2.82	
IDRUW/2.48 NM TO RW36		RW36	MAP	TF	FO	0.30	001.75	2.48	
RW36	MAP	541 MSL		CA			001.75		
541 MSL		TACHS		DF	FO	1.00			3100

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW36

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3100 DIRECT TACHS AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD S HAVUK, RT, 001.75 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 001.75 PFAF: KADEY DIST PFAF TO MAP: 5.30 DIST PFAF TO THLD: 5.30
4. MIN ALT: HAVUK 3100, KADEY 2000, IDRUW/2.48 NM TO RW36 1100*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 268 HAT: 0.72
6. MIN GP INCPT: 2000 GP ALT AT PFAF : KADEY 2000 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: RWY 36 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA.
*LNAV ONLY
CHART NOTE: USE WALNUT RIDGE ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART WALNUT RIDGE RGNL AWOS.
CHART CIRCLING ICON.
WAAS CHANNEL #56342
REFERENCE PATH ID: W36A
CHART FAS OBST: 402 TOWER 361433N/0905739W.
HOLD N, RT, 181.75 INBOUND
LTP HAE: 54.5 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 900-2 1/2, CAT D 900-2 3/4

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	541	1	268	541	1	268	541	1	268	541	1	268			
LNAV/VNAV DA	583	1	310	583	1	310	583	1	310	583	1	310			
LNAV MDA	680	1	407	680	1	407	680	1 1/8	407	680	1 1/8	407			
CIRCLING	900	1	627	900	1	627	1100	2 1/2	827	1100	2 3/4	827			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
POCAHONTAS MUNI	KM70	RNAV (GPS) RWY 36	ORIG	POCAHONTAS	AR

CHANGES - REASONS

ORIGINAL PROCEDURE.

PDF EDITS:
AIRSPACE LETTER CHANGED MAP TO ARP.
ADDED ELEV RWY THRESHOLD.



<u>AIRPORT</u> POCAHONTAS MUNI	<u>AIRPORT ID</u> KM70	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>CITY</u> POCAHONTAS	<u>STATE</u> AR
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: AIRPORT MANAGER, ZME.					
<u>FLIGHT CHECKED BY</u>		<u>OFFICE</u>	<u>DATE</u>		
JOHN E PHILLABAUM		FICO	6/6/18		
<u>DEVELOPED BY</u>		<u>OFFICE</u>	<u>DATE</u>		
ADOLFO URRUTIA (CHRISTINE BAYSE)		AJV-5432	04/13/2018		
<u>APPROVED BY</u>		<u>OFFICE</u>	<u>DATE</u>	<u>TITLE</u>	
PATRICK MULQUEEN		AJV-5430		MANAGER	



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	M70
RUNWAY	RW36
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W36A
LTP/FTP LATITUDE	361424.0210N
LTP/FTP LONGITUDE	0905719.0665W
LTP/FTP ELLIPSOIDAL HEIGHT	+00545
FPAP LATITUDE	361553.2385N
FPAP LONGITUDE	0905717.6245W
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	1536
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	568E29F6
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+00827
FPAP ORTHOMETRIC HEIGHT	+00827



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
POCAHONTAS, AR	POCAHONTAS MUNI	13 SEPTEMBER 2018	1

TAKEOFF MINIMUMS:
RWY 18, 36: STANDARD.

TEXTUAL DEPARTURE PROCEDURES:
RWY 36: CLIMB HEADING 001.75 TO 1000 BEFORE TURNING LEFT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:
NOTE: RWY 18: TREE, BUILDING AND VEHICLES ON ROAD BEGINNING 78 FT FROM DER, 272 FT LEFT OF CENTERLINE, UP TO 20 FT AGL/288 FT MSL. POLE 265 FT FROM DER, 538 FT LEFT OF CENTERLINE, 36 FT AGL/303 FT MSL. TREE AND POLE BEGINNING 288 FT FROM DER, 312 FT LEFT OF CENTERLINE, UP TO 40 FT AGL/308 FT MSL. TREE AND POLES BEGINNING 364 FT FROM DER, 306 FT LEFT OF CENTERLINE, UP TO 46 FT AGL/314 FT MSL. POLE 438 FT FROM DER, 432 FT RIGHT OF CENTERLINE, 31 FT AGL/301 FT MSL. POLES BEGINNING 440 FT FROM DER, 313 FT RIGHT OF CENTERLINE, UP TO 33 FT AGL/303 FT MSL. BUILDING 707 FT FROM DER, 480 FT LEFT OF CENTERLINE, 55 FT AGL/321 FT MSL. TREES AND POLES BEGINNING 1082 FT FROM DER, 324 FT RIGHT OF CENTERLINE, UP TO 58 FT AGL/327 FT MSL. TREE 1323 FT FROM DER, 610 FT LEFT OF CENTERLINE, 64 FT AGL/329 FT MSL.

NOTE: RWY 36: VEHICLE ON ROAD 2 FT FROM DER, 435 FT LEFT OF CENTERLINE, 284 FT MSL. POLE 157 FT FROM DER, 501 FT LEFT OF CENTERLINE, 26 FT AGL/297 FT MSL. POLES, VEHICLE ON ROAD AND TREE BEGINNING 179 FT FROM DER, 444 FT LEFT OF CENTERLINE, UP TO 31 FT AGL/301 FT MSL. VEHICLE ON ROAD 203 FT FROM DER, 444 FT RIGHT OF CENTERLINE, 285 FT MSL. POLES BEGINNING 204 FT FROM DER, 515 FT RIGHT OF CENTERLINE, UP TO 23 FT AGL/298 FT MSL. TREES BEGINNING 449 FT FROM DER, 295 FT LEFT OF CENTERLINE, UP TO 57 FT AGL/319 FT MSL. TREE 1065 FT FROM DER, 749 FT LEFT OF CENTERLINE, 85 FT AGL/342 FT MSL. TREE 2007 FT FROM DER, 832 FT RIGHT OF CENTERLINE, 75 FT AGL/340 FT MSL. TREE 2523 FT FROM DER, 1172 FT RIGHT OF CENTERLINE, 88 FT AGL/347 FT MSL. TREE 2997 FT FROM DER, 40 FT RIGHT OF CENTERLINE, 98 FT AGL/356 FT MSL. TREE 3356 FT FROM DER, 1147 FT RIGHT OF CENTERLINE, 101 FT AGL/360 FT MSL.

CONTROLLING OBSTACLES:
OBSTACLE MANDATING ROUTE DEVELOPMENT: RWY 36 - 1034 FT MSL TOWER 361825.00N/0910113.00W.

REMARKS:

FLIGHT INSPECTED BY:	<i>Digitally signed by</i> ADOLFO D URRUTIA	OFFICE SYMBOL:	DATE:
BRIAN HARRELSON	Jun 07, 2018	FICO	5/16/18
DEVELOPED BY:	<i>Digitally signed by</i> ADOLFO D URRUTIA	OFFICE SYMBOL:	DATE:
ADOLFO URRUTIA (CHRISTINE BAYSE)	Jun 07, 2018	AJV-5432	04/05/2018
APPROVED BY:	<i>Digitally signed by</i> ADOLFO D URRUTIA	OFFICE SYMBOL:	DATE:
PATRICK MULQUEEN	Jun 07, 2018	AJV-5430	

REQUIRED EFFECTIVE DATE:
ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☐	☒	☒	☐	☐	☒

OTHER:
ZME, AMGR.

CHANGES - REASONS:
1. UPDATED RWY 36 TEXTUAL DEPARTURE PROCEDURES FROM "CLIMB HEADING 356.75 TO 1000" TO "CLIMB HEADING 001.75 TO 1000".
-AIRPORT MAG VAR UPDATED FROM E4/1980 TO W1/2020.
2. UPDATED TAKEOFF OBSTACLE NOTES. - NEW OBSTACLES.

06/19/2018: THIS IS A CORRECTED COPY OF THE FORM APPROVED ON 6/7/2018
1. CHANGED POCAHONTAS TO POCAHONTAS IN CITY NAME. (LRE)

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR OR GPS STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE											
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)																			
2. _____																			
3. FAC ____ FAF _____ DIST FAF TO MAP ____ THLD _____																			
4. MIN. ALT _____																			
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____									
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE POCAHONTAS, AR		ELEVATION: 273 AIRPORT NAME: POCAHONTAS MUNI		TDZE: 271		FACILITY IDENTIFIER: ARG		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: VOR OR GPS RWY 36, AMDT 6, 03/17/2005				SUP AMDT NONE DATE							

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION NDB STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.27										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM			TO			COURSE AND DISTANCE				ALTITUDE									
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)										MAG VAR: EPOCH YEAR:									
2. _____																			
3. FAC ____ FAF ____ DIST FAF TO MAP ____ THLD ____																			
4. MIN. ALT ____																			
8. MSA FROM: _____																			
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:										QUALITY 20 CHECKED									
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE FORT HUACHUCA/SIERRA VISTA, AZ			ELEVATION: 4719 TDZE: 4629 AIRPORT NAME: SIERRA VISTA MUNI-LIBBY AAF			FACILITY IDENTIFIER: DAO		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: NDB RWY 26, AMDT 4, 09/01/2005					SUP AMDT 3A DATE 08/10/2000						

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION							ILS - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.29									Bearings, headings, courses, 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 in feet RVR.					
TERMINAL ROUTES													MISSED APPROACH								
FROM			TO			COURSE AND DISTANCE			ALTITUDE			ILS: DA LOC: 6.12 NM AFTER PETIS NDB/INT									
PDZ VORTAC (IAF)			SUDOC INT			006.77 / 6.72			4000			CLIMB TO 2000 THEN CLIMBING RIGHT TURN TO 6000 DIRECT PDZ VORTAC AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6000. *MISSED APPROACH REQUIRES MINIMUM CLIMB OF 340 FEET PER NM TO 4000; IF UNABLE TO MEET CLIMB GRADIENT, SEE LOC Y RWY 06.									
SUDOC INT (IF)			PETIS NDB/INT			057.42 / 6.03 (I-SBD)			3300												
													ADDITIONAL FLIGHT DATA: HOLD E, RT, 258.00 INBOUND. FAS OBST: 1444 AAO 340348N/1172027W. CHART IN PLANVIEW: HDF VOR. CHART CIRCLING ICON.								
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																					
2. PROFILE STARTS AT SUDOC																					
3. FAC: 057.42 FAF: PETIS NDB/INT DIST FAF TO MAP: 6.12 THLD: 6.12																					
4. MIN. ALT: SUDOC 4000, PETIS NDB/INT 3300																					
5. DIST TO THLD FROM OM: 6.12 MM: - IM: - 150 HAT: - 100 HAT: - GS ANT: 911																					
6. MIN GS INCPT: 3300 GS ALT AT: - OM: 3118 MM: - IM: -																					
7. GS ANGLE: 3.00 TCH: 50.7																					
8. MSA FROM: SBD NDB 010-100 12700, 100-270 7000, 270-010 11300													MAG VAR: 13E EPOCH YEAR: 2005								
MINIMUMS																					
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A			ILS: STANDARD #			LOC: STANDARD @								
CATEGORY =====>		A			B			C			D			E							
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA						
S-ILS 06*	1353	3/4	250	1353	3/4	250	1353	3/4	250	1353	3/4	250									
S-LOC 06*	1740	1	637	1740	1	637	1740	1 3/4	637	1740	1 3/4	637									
CIRCLING	1740	1	581	1740	1	581	1760	1 3/4	601	2640	3	1481									
NOTES: CHART NOTE: CIRCLING NA NW OF RWY 06-24. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON PDZ VORTAC AIRWAY RADIALS 012 CW 030. CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE ONTARIO ALTIMETER SETTING AND INCREASE DA TO 1426 FEET AND ALL VISIBILITIES 1/4 SM; INCREASE ALL MDA 80 FEET AND S-LOC CATS C/D AND CIRCLING CAT C VISIBILITY 1/4 SM.																					
CITY AND STATE SAN BERNARDINO, CA				ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL				FACILITY IDENTIFIER: I-SBD		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: ILS OR LOC Z RWY 6, AMDT 3 13 SEPTEMBER 2018						SUP: AMDT: 2B DATED 03/12/2009					

@ NA WHEN CONTROL TOWER CLOSED.
@ NA WHEN LOCAL WEATHER NOT AVAILABLE.
@ CAT D 1500-3

QUALITY
4
CHECKED

US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
ILS - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.29

Bearings, headings, courses, 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 in feet RVR.

QUALITY
4
CHECKED

CITY AND STATE SAN BERNARDINO, CA	ELEVATION: 1159	TDZE: 1103	FACILITY IDENTIFIER: I-SBD	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: ILS OR LOC Z RWY 6, AMDT 3 13 SEPTEMBER 2018	SUP:
	AIRPORT NAME:				AMDT: 2B
	SAN BERNARDINO INTL				DATED: 03/12/2009

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION LOC STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.25										Bearings, headings, courses, 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 in feet RVR.						
TERMINAL ROUTES										MISSED APPROACH						
FROM		TO			COURSE AND DISTANCE			ALTITUDE		MAP: LOC: 6.12 NM AFTER PETIS NDB/INT						
PDZ VORTAC (IAF)		SUDOC INT			006.77 / 6.72			4000		CLIMB TO 2700 THEN CLIMBING RIGHT TURN TO 6000 DIRECT PDZ VORTAC AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6000.						
SUDOC INT (IF)		PETIS NDB/INT			057.42 / 6.03 (I-SBD)			3300								
										ADDITIONAL FLIGHT DATA: HOLD E, RT, 258.00 INBOUND. FAS OBST: 1444 AAO 340349N/1172027W. CHART IN PLANVIEW: HDF VOR. CHART CIRCLING ICON. PETIS NDB/INT TO RW06: 3.33/52.						
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																
2. PROFILE STARTS AT SUDOC																
3. FAC 057.42 FAF PETIS NDB/INT DIST FAF TO MAP 6.12 THLD 6.12																
4. MIN. ALT SUDOC 4000, PETIS NDB/INT 3300																
8. MSA FROM: SBD NDB 010-100 12700, 100-270 7000, 270-010 11300										MAG VAR: 13E			EPOCH YEAR: 2005			
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A		LOC: @				
CATEGORY =====>		A			B			C			D			E		
		MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA
S-LOC 06		2020	1 1/4	917	2020	1 1/4	917	2060	3	957	2060	3	957			
CIRCLING		2020	1 1/4	861	2020	1 1/4	861	2060	3	901	2640	3	1481			
NOTES:																
CHART NOTE: CIRCLING NA NW OF RWY 06-24. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON PDZ VORTAC AIRWAY RADIALS 012 CW 030. CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). CHART NOTE: WHEN LOCAL ALTIMETER NOT RECEIVED, USE ONTARIO ALTIMETER SETTING AND INCREASE ALL MDA 80 FT; INCREASE S-LOC CAT B AND CIRCLING CAT B VISIBILITY 1/4 SM.										@ NA WHEN CONTROL TOWER CLOSED. @ NA WHEN LOCAL WEATHER NOT AVAILABLE. @ CAT A, B 1000-2, CAT C 1000-3, CAT D 1500-3						
CITY AND STATE SAN BERNARDINO, CA		ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL			FACILITY IDENTIFIER: I-SBD		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: LOC Y RWY 6, AMDT 1 13 SEPTEMBER 2018				SUP AMDT ORIG DATE 05/10/2007					



US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION							RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES														MISSED APPROACH												
FROM				TO				COURSE AND DISTANCE				ALTITUDE		LNAV: RW06												
PDZ VORTAC (IAF)				UCUDO (TF) (FB) (RNP 1.00)				005.06 / 6.37				4000		CLIMB TO 2800 THEN CLIMBING RIGHT TURN TO 6000 DIRECT PDZ VORTAC AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6000.												
UCUDO (IF)				WIDAD (TF) (FB) (RNP 1.00)				057.30 / 5.90				3300														
WIDAD (FAF)				RW06 (MAP) (TF) (FO) (RNP 0.30)				057.36 / 6.80						ADDITIONAL FLIGHT DATA: HOLD E, RT, 258.00 INBOUND. FAS OBST: 1444 AAO 340349N/1172027W. CHART VDP AT 4.11 NM TO RW06. CHART CIRCLING ICON. WIDAD TO RW06: 3.00/50.7												
RW06 (MAP)				2800 MSL (CA)								2800														
2800 MSL				PDZ VORTAC (DF) (FO) (RNP 1.00)								6000														
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																										
2. PROFILE STARTS AT UCUDO																										
3. FAC: 057.36 FAF: WIDAD DIST FAF TO MAP: 6.80 THLD: 6.80																										
4. MIN. ALT: UCUDO 4000, WIDAD 3300																										
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																										
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____																										
7. GS ANGLE: _____ TCH: 20:1 IS CLEAR 34:1 IS CLEAR																										
8. MSA FROM: RW06 12700														MAG VAR: 13E							EPOCH YEAR: 2005					
MINIMUMS																										
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT														ALTERNATE: N A			@									
CATEGORY =====>		A			B			C			D			E												
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA											
LNAV MDA	2460	1 1/4	1357	2460	1 1/2	1357	2460	3	1357	2460	3	1357														
CIRCLING	2460	1 1/4	1301	2460	1 1/2	1301	2460	3	1301	2640	3	1481														
NOTES: CHART NOTE: CIRCLING NA NW OF RWY 06-24. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON PDZ VORTAC AIRWAY RADIALS 278 CW 078. PBN REQUIREMENTS NOTE: RNP APCH CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE ONTARIO ALTIMETER SETTING AND INCREASE ALL MDA 80 FT.																@ NA WHEN LOCAL WEATHER NOT AVAILABLE. @ CAT A, B 1400-2, CAT C 1400-3, CAT D 1500-3										
CITY AND STATE SAN BERNARDINO, CA				ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL				FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Y RWY 6, AMDT 1 13 SEPTEMBER 2018							SUP: AMDT: ORIG DATED 05/07/2009									



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

QUALITY
23
CHECKED

CITY AND STATE SAN BERNARDINO, CA	ELEVATION: 1159 AIRPORT NAME: SAN BERNARDINO INTL	TDZE: 1103	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Y RWY 6, AMDT 1 13 SEPTEMBER 2018	SUP:
					AMDT: ORIG
					DATED: 05/07/2009

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION							RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES																	MISSED APPROACH									
FROM				TO				COURSE AND DISTANCE				ALTITUDE		LPV: DA LNAV: RW06												
PDZ VORTAC (IAF)				UCUDO (TF) (FB) (RNP 1.00)				005.06 / 6.37				4000		CLIMB TO 2000 THEN CLIMBING RIGHT TURN TO 6000 DIRECT PDZ VORTAC AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6000. **MISSED APPROACH REQUIRES MINIMUM CLIMB OF 340 FEET PER NM TO 4000; IF UNABLE TO MEET CLIMB GRADIENT, SEE RNAV (GPS) Y RWY 06. ADDITIONAL FLIGHT DATA: HOLD E, RT, 258.00 INBOUND. FAS OBST: 1444 AAO 340349N/1172027W. DISTANCE TO THLD FROM 250 HAT: 0.68 NM. CHART VDP AT 1.89 NM TO RW06* *LNAV ONLY. WAAS CHANNEL # 66041 REFERENCE PATH ID: W06A CHART CIRCLING ICON. LTP HAE: 297.8 M												
UCUDO (IF)				WIDAD (TF) (FB) (RNP 1.00)				057.30 / 5.90				3300														
WIDAD (FAF)				RW06 (MAP) (TF) (FO) (RNP 0.30)				057.36 / 6.80																		
RW06 (MAP)				2000 MSL (CA)								2000														
2000 MSL				PDZ VORTAC (DF) (FO) (RNP 1.00)								6000														
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																	MAG VAR: 13E EPOCH YEAR: 2005									
2. PROFILE STARTS AT UCUDO																										
3. FAC: 057.36 FAF: WIDAD DIST FAF TO MAP: 6.80 THLD: 6.80																										
4. MIN. ALT: UCUDO 4000, WIDAD 3300																										
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																										
6. MIN GS INCPT: 3300 GS ALT AT: WIDAD 3300 OM: _____ MM: _____ IM: _____																										
7. GS ANGLE: 3.00 TCH: 50.7 20:1 IS CLEAR 34:1 IS CLEAR																										
8. MSA FROM: RW06 12700																										
MINIMUMS																										
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A			STANDARD @																
CATEGORY =====>		A			B			C			D			E												
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA											
LPV DA**	1353	3/4	250	1353	3/4	250	1353	3/4	250	1353	3/4	250														
LNAV MDA**	1740	1	637	1740	1	637	1740	1 3/4	637	1740	1 3/4	637														
CIRCLING	1740	1	581	1740	1	581	1760	1 3/4	601	2640	3	1481														
NOTES: CHART NOTE: CIRCLING NA NW OF RWY 06-24. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON PDZ VORTAC AIRWAY RADIALS 278 CW 078. PBN REQUIREMENTS NOTE: RNP APCH CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE ONTARIO ALTIMETER SETTING AND INCREASE DA (CONTINUED ON PAGE 2)																										
CITY AND STATE SAN BERNARDINO, CA				ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL				FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Z RWY 6, AMDT 1 13 SEPTEMBER 2018						SUP: AMDT: ORIG DATED 05/07/2009										



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

NOTES, (CONT.):
TO 1426 FEET AND ALL VISIBILITIES 1/4 SM; INCREASE ALL MDA 80 FEET AND LNAV CATS C/D AND CIRCLING
CAT C VISIBILITY 1/4 SM.

QUALITY
23
CHECKED

CITY AND STATE SAN BERNARDINO, CA	ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./ AMDT NO./EFFECTIVE DATE: RNAV (GPS) Z RWY 6, AMDT 1 13 SEPTEMBER 2018	SUP:
				AMDT: ORIG
				DATED: 05/07/2009

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KSBD
RUNWAY	RW06
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	Z
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W06A
LTP/FTP LATITUDE	340526.7165N
LTP/FTP LONGITUDE	1171501.5735W
LTP/FTP ELLIPSOIDAL HEIGHT	+02978
FPAP LATITUDE	340559.8370N
FPAP LONGITUDE	1171309.5370W
THRESHOLD CROSSING HEIGHT (TCH)	00050.7
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	143.75
LENGTH OFFSET	0000
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0

<u>CRC REMAINDER</u>	D1CDBFC2

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K2
LTP ORTHOMETRIC HEIGHT	+03305
FPAP ORTHOMETRIC HEIGHT	+03305

QUALITY
23
CHECKED

CITY AND STATE SAN BERNARDINO, CA	ELEVATION: 1159 TDZE: 1103 AIRPORT NAME: SAN BERNARDINO INTL	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) Z RWY 6, AMDT 1 13 SEPTEMBER 2018	SUP:
				AMDT: ORIG
				DATED: 05/07/2009

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.
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<u>AIRPORT</u> DEFUNIAK SPRINGS	<u>AIRPORT ID</u> K54J	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 9	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> DEFUNIAK SPRINGS	<u>STATE</u> FL
<u>AIRPORT ELEVATION</u> 289	<u>TDZE</u> 289	<u>SUPERSEDED</u> RNAV (GPS) RWY 9	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 05/24/2018	<u>MAG VAR</u> 4W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2020

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>
DEFUN		LEDAH		TF	FO	2.00	269.15	13.35	3000
CORKY	IAF	LEDAH	NOPT	TF	FB	1.00	108.55	6.58	3000
LEDAH	IF/IAF	JAACK		TF	FB	1.00	114.74	6.82	2100
JAACK	FAF	IAATE/2.20 NM TO MAGSS		TF	FB	0.30	108.95	2.89	
IAATE/2.20 NM TO MAGSS		MAGSS	MAP	TF	FO	0.30	108.95	2.20	
MAGSS	MAP	620 MSL		CA			108.95		
620 MSL		NALLA		DF	FB	1.00			
NALLA		LAARA		TF	FO	1.00	065.56	11.25	3000

MISSED APPROACH

MAP:

LP: MAGSS
 LNAV: MAGSS

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT NALLA AND ON TRACK 065.56 TO LAARA AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD NW LEDAH, RT, 114.74 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 108.95

FAF: JAACK

DIST FAF TO MAP: 5.09

DIST FAF TO THLD: 5.57

4. MIN ALT: LEDAH 3000, JAACK 2100, IAATE/2.20 NM TO MAGSS 1180

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

HAT:

6. MIN GP INCPT:

GP ALT AT FAF :

OM:

MM:

IM:

7. GP ANGLE:

34:1: IS NOT CLEAR

20:1: IS NOT CLEAR

TCH:

8. MSA FROM: MAGSS 3100

PBN EQUIPMENT REQUIREMENTS NOTES

PBN REQUIREMENTS NOTE: RNP APCH.

NOTES:

CHART NOTE: STRAIGHT-IN, CIRCLING RWY 9 NA AT NIGHT.
CHART NOTE: RWY 9 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.

ADDITIONAL FLIGHT DATA:

CHART PLANVIEW NOTE: FINAL APPROACH COURSE OFFSET 14.63 DEGREES.
IAATE TO MAGSS: 3.00/42.5.
FICTITIOUS THRESHOLD POINT (CFRDW) DO NOT CHART.
CHART CIRCLING ICON.
CHART EGLIN E MOA
CHART EGLIN D MOA
CHART R-2914A
WAAS CHANNEL #40441
REFERENCE PATH ID: W09A
CHART FAS OBST: 353 TREE 304355N/0860939W.
389 TREE 304357N/0860928W.
FAC CROSSES RWY C/L EXTENDED 3002 FT FROM THLD.
HOLD E, RT, 275.31 INBOUND
FTP HAE: 59 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
LP MDA	620	1	331	620	1	331		NA			NA				
LNAV MDA	640	1	351	640	1	351		NA			NA				
CIRCLING	700	1	411	920	1	631		NA			NA				

QUALITY
10
CHECKED

CHANGES - REASONS

- 1. TERMINAL ROUTES, NALLA TO LAARA, DISTANCE CHANGED FROM 13.50 TO 11.25 - CORRECTED DISTANCE.
- 2. NOTE DELETED: DME/DME RNP-0.3 NA - PER MEMO 257.
- 3. NOTE ADDED: PBN REQUIREMENTS NOTE: RNP APCH - PER MEMO 257.
- 4. NOTE CHANGED FROM 'CIRCLING RWY 9, 36 NA AT NIGHT' TO 'STRAIGHT-IN, CIRCLING RWY 9 NA AT NIGHT' - VISUAL SURFACE PENETRATIONS FOR RWY 9. RWY 18-36 IS A DIRT RWY, OPERATIONS NA TO RUNWAY 36.

8260-3 PDF EDITED:

- 1. TERMINAL ROUTES: DEFUN TO LEDAH, DELETED FIX TYPE 'POINT'.

8260-9 PDF EDITED:

- 1. CIRCLING CAT B ADJUSTMENTS, DELETED DUPLICATE AC50.
- 2. AIRSPACE FORM, RUNWAY APCH END AND DIST FURTHEST FROM 'ARP'.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZJX, EGLIN APPROACH CONTROL, AIRPORT MANAGER

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY Digitally signed by
ANDREA CHANEY **ANDREA J CHANEY**
May 09, 2018

APPROVED BY
PATRICK MULQUEEN

Digitally signed by
DAVID TEFFETELLER
May 10, 2018

OFFICE Digitally signed by DATE
DAVID TEFFETELLER
May 10, 2018

OFFICE DATE
AJV-5433 04/30/2018

OFFICE DATE TITLE
AJV-5430 MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	K54J
RUNWAY	RW09
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W09A
LTP/FTP LATITUDE	304350.2940N
LTP/FTP LONGITUDE	0860940.9790W
LTP/FTP ELLIPSOIDAL HEIGHT	+00059
FPAP LATITUDE	304327.1635N
FPAP LONGITUDE	0860801.1310W
THRESHOLD CROSSING HEIGHT (TCH)	00042.5
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0000
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	425C3A7D
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00864
FPAP ORTHOMETRIC HEIGHT	+00864



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
IMMOKALEE, FL	IMMOKALEE RGNL	13 SEPTEMBER 2018	2A

TAKEOFF MINIMUMS:
RWY 9, 27, 36: STANDARD.

RWY 18: 300-2 1/4 OR STANDARD WITH A MINIMUM CLIMB OF 230 FT PER NM TO 420, OR ALTERNATIVELY, WITH STANDARD TAKEOFF MINIMUMS AND A NORMAL 200 FT PER NM CLIMB GRADIENT, TAKEOFF MUST OCCUR NO LATER THAN 2200 FT PRIOR TO DER.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 09: TREE 58 FT FROM DER, 445 FT LEFT OF CENTERLINE, 46 FT MSL. TREES BEGINNING 166 FT FROM DER, 408 FT LEFT OF CENTERLINE, UP TO 47 FT MSL. TREE 1129 FT FROM DER, 299 FT LEFT OF CENTERLINE, 37 FT AGL/67 FT MSL.

NOTE: RWY 18: APRT SIGN, REIL BEGINNING 27 FT FROM DER, 116 FT LEFT OF CENTERLINE, UP TO 2 FT AGL/34 FT MSL. REIL 38 FT FROM DER, 115 FT RIGHT OF CENTERLINE, 1 FT AGL/34 FT MSL. BLDGS BEGINNING 253 FT FROM DER, 475 FT LEFT OF CENTERLINE, UP TO 51 FT MSL. TREE 1180 FT FROM DER, 767 FT LEFT OF CENTERLINE, 63 FT MSL. TREE 1242 FT FROM DER, 620 FT LEFT OF CENTERLINE, 66 FT MSL. TREE 1309 FT FROM DER, 814 FT LEFT OF CENTERLINE, 69 FT MSL. TOWER 1.7 NM FROM DER, 2983 FT RIGHT OF CENTERLINE, 297 FT AGL/322 FT MSL. COMMUNICATION TWR 1.7 NM FROM DER, 2996 FT RIGHT OF CENTERLINE, 285 FT AGL/311 FT MSL.

NOTE: RWY 27: FENCE 4 FT FROM DER, 472 FT RIGHT OF CENTERLINE, 7 FT AGL/41 FT MSL. APRT SIGN 33 FT FROM DER, 467 FT LEFT OF CENTERLINE, 3 FT AGL/38 FT MSL. TREE 231 FT FROM DER, 486 FT RIGHT OF CENTERLINE, 60 FT MSL. TREE 308 FT FROM DER, 425 FT RIGHT OF CENTERLINE, 61 FT MSL. TREES BEGINNING 393 FT FROM DER, 340 FT RIGHT OF CENTERLINE, UP TO 63 FT MSL. TREES BEGINNING 505 FT FROM DER, 286 FT RIGHT OF CENTERLINE, UP TO 30 FT AGL/68 FT MSL. TREE 719 FT FROM DER, 624 FT LEFT OF CENTERLINE, 45 FT AGL/80 FT MSL. TREE 769 FT FROM DER, 527 FT LEFT OF CENTERLINE, 81 FT MSL. TREE, POLE BEGINNING 870 FT FROM DER, 258 FT LEFT OF CENTERLINE, UP TO 54 FT AGL/89 FT MSL. TREE 967 FT FROM DER, 363 FT RIGHT OF CENTERLINE, 33 FT AGL/70 FT MSL. POLE 1029 FT FROM DER, 670 FT RIGHT OF CENTERLINE, 71 FT MSL. TREE, POLE BEGINNING 1053 FT FROM DER, 49 FT RIGHT OF CENTERLINE, UP TO 45 FT AGL/76 FT MSL.

NOTE: RWY 36: TREES BEGINNING 265 FT FROM DER, 383 FT LEFT OF CENTERLINE, UP TO 63 FT MSL. TREES BEGINNING 355 FT FROM DER, 306 FT LEFT OF CENTERLINE, UP TO 30 FT AGL/68 FT MSL. TREE 400 FT FROM DER, 232 FT RIGHT OF CENTERLINE, 16 FT AGL/51 FT MSL. TREES BEGINNING 446 FT FROM DER, 209 FT RIGHT OF CENTERLINE, UP TO 18 FT AGL/53 FT MSL.

CONTROLLING OBSTACLES:

RWY 18: 322 FT MSL TOWER 262342.70N/0812445.80W (CG, CTA, CIG), 311 FT MSL COMMUNICATION TWR 262342.52N/0812445.94W (VIS)

REMARKS:
THIS AMENDMENT DOES NOT QUALIFY AS A PERIODIC REVIEW.

FLIGHT INSPECTED BY:
FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW 33) MEMO, DEC 22, 2017

OFFICE SYMBOL: **DATE:**
Digitally signed by
BEV L BORDY
Jun 19, 2018

DEVELOPED BY: *Digitally signed by*
LONNIE EVERHART (LORRI DOWNEY) **BEV L BORDY**
Jun 19, 2018

OFFICE SYMBOL: **DATE:**
AJV-5400
05/03/2018

APPROVED BY: *Digitally signed by*
LONNIE EVERHART **BEV L BORDY**
Jun 19, 2018

OFFICE SYMBOL: **DATE:**
AJV-5400

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☐	☒	☒	☐	☐	☒

QUALITY
3
CHECKED

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
IMMOKALEE, FL	IMMOKALEE RGNL	13 SEPTEMBER 2018	2A

OTHER:

ZMA, RSW ATCT AND AMGR

CHANGES - REASONS:

CHANGED NOTE RWY 27: "FROM FENCE FT FROM DER, 472 FT RIGHT OF CENTERLINE, 7 FT AGL/41 FT MSL." TO "FENCE 4 FT FROM DER, 472 FT RIGHT OF CENTERLINE, 7 FT AGL/41 FT MSL." - NUMBER "4" MISSING FROM PREVIOUS AMENDMENT.

QUALITY
3
CHECKED

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
ILS STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.29

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<u>AIRPORT</u> SOUTHWEST GEORGIA RGNL	<u>AIRPORT ID</u> KABY	<u>PROCEDURE NAME</u> ILS OR LOC RWY 4	<u>ORIGINAL/AMENDMENT</u> 13A	<u>CITY</u> ALBANY	<u>STATE</u> GA	
<u>AIRPORT ELEVATION</u> 196	<u>TDZE</u> 196	<u>SUPERSEDED</u> ILS OR LOC RWY 4	<u>ORIGINAL/AMENDMENT</u> 13	<u>DATED</u> 02/01/2018	<u>MAG VAR</u> 5W	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> I-ABY	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
PZD VOR/DME		FOLKA INT/I-ABY 7.37 DME					178.68	12.07	2200
SALER		FOLKA INT/I-ABY 7.37 DME		TF	FO	1.00	319.14	9.37	2200
ELMOE		FOLKA INT/I-ABY 7.37 DME		TF	FO	1.00	016.78	10.31	2200
AYUVO/PZD 17.01 DME CCW	IAF	HAVEX/I-ABY 13.55 DME	NOPT				17.01 DME ARC (PZD LR-201)		2200
HAVEX/I-ABY 13.55 DME	IF	FOLKA INT/I-ABY 7.37 DME					047.10	6.19 (I-ABY)	2200

MISSED APPROACH

MAP:

ILS: DA
LOC: 6.11 NM AFTER FOLKA INT/I-ABY 7.37 DME OR AT I-ABY 1.26 DME

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1000 THEN CLIMBING LEFT TURN TO 3000 DIRECT PZD VOR/DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. HOLD SW FOLKA/I-ABY 7.37 DME, RT, 047.10 INBOUND, 2200 FT. IN LIEU OF PT (IAF), MAX 4600.
3. **FAC:** 047.10 **PFAF:** FOLKA INT/I-ABY 7.37 DME **DIST PFAF TO MAP:** 6.11 **DIST PFAF TO THLD:** 6.11
4. **MIN ALT:** FOLKA INT/I-ABY 7.37 DME 2200, XIKHO/I-ABY 2.66 DME 680*
5. **DIST TO THLD FROM OM:** **MM:** **IM:** **150 HAT:** **HAT:** **GS ANT:** 1150
6. **MIN GS INCPT:** 2200 **GS ALT AT PFAF :** FOLKA INT/I-ABY 7.37 DME 2200 **OM:** **MM:** **IM:**
7. **GP ANGLE:** 3.00 **34:1:** **20:1:** **TCH:** 59.6
8. **MSA FROM:** PZD VOR/DME 2600



EQUIPMENT REQUIREMENTS NOTES

PBN REQUIREMENTS NOTE: FROM ELMOE AND SALER: RNAV-1 GPS REQUIRED.

NOTES:

CHART PROFILE NOTE: VGSI AND ILS GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
*LOC ONLY
CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-LOC 4 CATS C/D VISIBILITY TO 1 3/8 SM AND XIKHO FIX MINIMUMS S-LOC 4 CATS C/D VISIBILITY TO RVR 5500.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART PZD R-295 AT AYUVO.
FAS OBST: 309 TREES 313034N/0841332W.
HOLD NW, RT, 145.00 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ ILS: STANDARD - NA WHEN CONTROL TOWER CLOSED.; LOC: STANDARD - CAT C 800-2 1/4, CAT D 800-2 1/2, NA WHEN CONTROL TOWER CLOSED.

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
S-ILS 04	396	2400	200	396	2400	200	396	2400	200	396	2400	200			
S-LOC 04	680	2400	484	680	2400	484	680	5000	484	680	5000	484			
CIRCLING	680	1	484	680	1	484	940	2 1/4	744	940	2 1/2	744			
XIKHO FIX MINIMUMS (DME REQUIRED)															
S-LOC 04	560	2400	364	560	2400	364	560	3500	364	560	3500	364			
CIRCLING	640	1	444	660	1	464	940	2 1/4	744	940	2 1/2	744			

CHANGES - REASONS

1. AMENDED SALER TO FOLKA FEEDER ROUTE COURSE FROM 316.14 TO 319.14 - CALCULATED USING AIRPORT MAGVAR (5W).
2. AMENDED ELMOE TO FOLKA FEEDER ROUTE COURSE FROM 013.78 TO 016.78 - CALCULATED USING AIRPORT MAGVAR (5W).
3. DELETED NOTE **RVR 1800 AUTHORIZED WITH USE OF FD OR AP OR HUD TO DA - IN ACCORDANCE WITH FAAO 8400.13D. AFS APPROVAL REQUIRED DUE TO I-ABY LOCALIZER RESTRICTIONS. EASTERN FPT NOTIFIED AND DOES NOT WISH TO PURSUE AFS APPROVAL FOR THIS AMENDMENT.
4. DELETED PLANVIEW NOTE: RNAV-1 GPS REQUIRED FOR PROCEDURE ENTRY FROM ELMOE OR SALER - REPLACED BY PBN REQUIREMENTS NOTE IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
5. DELETED ALTERNATE MISSED APPROACH INSTRUCTIONS - NOT NEEDED IN ACCORDANCE WITH JO 7930.2, PARA 7-1-3G. EASTERN FPT NOTIFIED AND CONCURS.



COORDINATED WITH:

A4A ☒ **ALPA** ☒ **AOPA** ☒ **APA** ☒ **HAI** ☐ **NBAA** ☒ **OTHER:** ZJX, ABY ATCT, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

PETER R. GUIMOND

Digitally signed by
PETER R GUIMOND
Apr 25, 2018

APPROVED BY

JULIE MORGAN

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

04/25/2018

DATE

Digitally signed by
ROBERT G HAMILTON
May 08, 2018

Digitally signed by
ROBERT G HAMILTON
May 08, 2018

TITLE

MANAGER



U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR/DME STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM			TO			COURSE AND DISTANCE				ALTITUDE									
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)										MAG VAR: EPOCH YEAR:									
2. _____																			
3. FAC ____ FAF ____ DIST FAF TO MAP ____ THLD ____																			
4. MIN. ALT ____																			
8. MSA FROM: _____																			
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE WEST UNION, IA			ELEVATION: 1232 AIRPORT NAME: GEORGE L SCOTT MUNI			TDZE:		FACILITY IDENTIFIER: UKN		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: VOR/DME-A, AMDT 4, 07/29/2010					SUP VOR/DME OR GPS-A AMDT 3 DATE 08/25/1988				



**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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.

If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> UNIVERSITY OF ILLINOIS-WILLARD	<u>AIRPORT ID</u> KCMJ	<u>PROCEDURE NAME</u> VOR RWY 4	<u>ORIGINAL/AMENDMENT</u> 12A	<u>CITY</u> CHAMPAIGN/URBANA	<u>STATE</u> IL
<u>AIRPORT ELEVATION</u> 755	<u>TDZE</u> 751	<u>SUPERSEDED</u> VOR RWY 4	<u>ORIGINAL/AMENDMENT</u> 12	<u>DATED</u> 05/07/2009	<u>MAG VAR</u> 3E
<u>FACILITY</u> CMI	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1965

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>

MISSED APPROACH

MAP:

CMI VORTAC

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 THEN CLIMBING RIGHT TURN TO 2700 ON CMI VORTAC R-062 TO OCTOE INT/CMI 12.19 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT L SIDE OF COURSE 232.00 OUTBOUND 2300 FT WITHIN 10 MILES OF CMI VORTAC (IAF)
2.
3. FAC: 052.00 FAF: DIST FAF TO MAP: DIST FAF TO THLD:
4. MIN ALT:
8. MSA FROM: CMI VORTAC 3100

EQUIPMENT REQUIREMENTS NOTES:

NOTES:

ADDITIONAL FLIGHT DATA:



CHART: ASR.
CHART CIRCLING ICON.
CHART VDP AT 1.78 DME
DISTANCE VDP TO THLD 1.34 NM
FAS OBST: 904 AAO 400022N/0882122W.
FAC CROSSES RWY C/L EXTENDED 2890 FT FROM THLD.
HOLD NE, RT, 241.59 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 800-2 1/4, CAT D 800-2 1/2

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
S-04	1220	1	469	1220	1	469	1220	1 3/8	469	1220	1 1/2	469			
CIRCLING	1240	1	485	1240	1	485	1500	2 1/4	745	1500	2 1/2	745			

CHANGES - REASONS

1. CHANGED MISSED APPROACH WORDING FROM "VIA" TO "ON" - CURRENT DOCUMENTATION POLICY.
2. PROFILE VIEW, LINE 4, REMOVED MIN ALT AT BARRW - STEPDOWN FIX REMOVED DUE TO NEW OBSTACLE RAISING STEPDOWN ALTITUDE.
3. REMOVED NOTE ""1280 WHEN USING RANTOUL ALTIMETER SETTING" - STEPDOWN FIX REMOVED.
4. REMOVED BACKUP ALTIMETER NOTE AND PLACED ON BACK ON FORM 8260-9 - NOW PERMITTED BY 8260.19H.
5. ADDED VDP - WITH REMOVAL OF STEPDOWN FIX, VDP IS NO LONGER TOO CLOSE TO IT.
6. CHANGED ALTERNATE MINIMUMS FROM "@NA WHEN LOCAL WEATHER NOT AVAILABLE" TO "STANDARD - CAT C 800-2 1/4, CAT D 800-2 1/2" - AIRPORT WEATHER IS NOW ON WMSCR AND CIRCLING HAA INCREASED.
7. INCREASED S-4 CAT C VISIBILITY FROM 1 1/4 TO 1 3/8 - RECALCULATION.
8. CIRCLING MDA AND HAA INCREASED FOR ALL CATS, CAT C AND D VISIBILITY INCREASED - USING CURRENT CIRCLING AREAS.
9. ADDED CIRCLING ICON - USING CURRENT CIRCLING AREAS.

PDF EDIT:
PROFILE VIEW, LINE 1, ADDED "VORTAC" AFTER CMI.

COORDINATED WITH:

A4A ☒ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: CMI ATCT, ZAU ARTCC, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

RUSS ROSLEWSKI

APPROVED BY

JULIE MORGAN

Digitally signed by
RUSSELL ROSLEWSKI
Jun 20, 2018

Digitally signed by
DEZ SILAGYI
Jun 22, 2018

Digitally signed by
DEZ SILAGYI
Jun 22, 2018

OFFICE
DATE
OFFICE
DATE
AJV-5421
05/08/2018

OFFICE
DATE
TITLE
MANAGER
AJV-5420



**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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<u>AIRPORT</u> UNIVERSITY OF ILLINOIS-WILLARD	<u>AIRPORT ID</u> KCMJ	<u>PROCEDURE NAME</u> VOR RWY 14L	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> CHAMPAIGN/URBANA	<u>STATE</u> IL
<u>AIRPORT ELEVATION</u> 755	<u>TDZE</u> 755	<u>SUPERSEDED</u> VOR/DME RWY 14L	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 09/23/2010	<u>MAG VAR</u> 3E
<u>FACILITY</u> CMI	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1965

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>
CMI VORTAC		HITVU/6.84 DME					321.80	6.84	2800

MISSED APPROACH

MAP:

JOXIV/CMI 0.89 DME

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2700 THEN LEFT TURN HEADING 020 AND CMI R-062 TO OCTOE INT/12.19 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT L **SIDE OF COURSE** 321.80 **OUTBOUND** 2800 **FT WITHIN** 10 **MILES OF** HITVU (IAF)
- 2.
3. **FAC:** 141.80 **FAF:** HITVU/6.84 DME **DIST FAF TO MAP:** **DIST FAF TO THLD:** 5.95
4. **MIN ALT:** HITVU/6.84 DME 2700, CUDLA/2.49 DME 1300
8. **MSA FROM:** CMI VORTAC 3100

EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED.

NOTES:

CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).

ADDITIONAL FLIGHT DATA:



HOLD NE. RT. 241.59 INBOUND

QUALITY
10
CHECKER

**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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<u>AIRPORT</u> UNIVERSITY OF ILLINOIS-WILLARD	<u>AIRPORT ID</u> KCMJ	<u>PROCEDURE NAME</u> VOR RWY 22	<u>ORIGINAL/AMENDMENT</u> 8A	<u>CITY</u> CHAMPAIGN/URBANA	<u>STATE</u> IL	
<u>AIRPORT ELEVATION</u> 755	<u>TDZE</u> 750	<u>SUPERSEDED</u> VOR/DME RWY 22	<u>ORIGINAL/AMENDMENT</u> 8	<u>DATED</u> 11/25/2004	<u>MAG VAR</u> 3E	<u>EPOCH YEAR</u> 1965
<u>FACILITY</u> CMI	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
LODGE INT/CMI 13.24 DME		ENOYE/12.00 DME					116.58	1.24 (CMI R-297)	2800
CMI VORTAC		STADI/6.00 DME					027.00	6.00	2800
ENOYE/CMI 12.00 DME CW	IAF	FASOB/12.00 DME	NOPT				12.00 DME ARC		2800
FEXIL/CMI 12.00 DME CCW	IAF	FASOB/12.00 DME	NOPT				12.00 DME ARC		2800
RBS VOR/DME	IAF	VINEY INT/CMI 18.00 DME	NOPT				165.34	17.70	2800
DNV VORTAC	IAF	VINEY INT/CMI 18.00 DME	NOPT				268.25	24.00	2800
VINEY INT/CMI 18.00 DME		FASOB/12.00 DME					207.00	6.00 (CMI R-027)	2800
FASOB/12.00 DME	IF	STADI/6.00 DME					207.00	6.00 (CMI R-027)	2500

MISSED APPROACH

MAP:

LOLIY/0.70 DME FIX

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2800 THEN RIGHT TURN HEADING 340 AND CMI VORTAC R-297 TO LODGE INT/CMI 13.24 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT R **SIDE OF COURSE** 027.00 **OUTBOUND** 2800 **FT WITHIN** 10 **MILES OF** STADI (IAF)
- 2.
3. **FAC:** 207.00 **FAF:** STADI/6.00 DME **DIST FAF TO MAP:** **DIST FAF TO THLD:** 5.31
4. **MIN ALT:** STADI/6.00 DME 2500, JOKOP/2.60 DME 1460
8. **MSA FROM:** CMI VORTAC 3100



EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED.

NOTES:

CHART NOTE: RWY 22 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT RBS VOR/DME ON V191 NORTHEAST BOUND.

ADDITIONAL FLIGHT DATA:

CHART 1146 TOWER 400504N/0881453W
CHART: ASR.
CHART CIRCLING ICON.
STADI TO RW22: 3.04/41.
CHART CMI R-297 AT ENOYE.
CHART CMI R-121 AT FEXIL.
CHART VDP AT 1.73 DME
DISTANCE VDP TO THLD 1.04 NM
CHART FAS OBST: 864 TOWER 400403N/0881454W.
FAC CROSSES RWY C/L EXTENDED 2751 FT FROM THLD.
HOLD NW, LT, 116.58 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 800-2 1/4, CAT D 800-2 1/2

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
S-22	1120	1	370	1120	1	370	1120	1	370	1120	1 1/4	370			
CIRCLING	1240	1	485	1240	1	485	1500	2 1/4	745	1500	2 1/2	745			

CHANGES - REASONS

1. CHANGED PROCEDURE NAME FROM VOR/DME TO VOR - 8260.3C REMOVED "/DME" FROM NAMING STANDARD.
2. APT ELEV INCREASED FROM 754 TO 755 AND TDZE INCREASED FROM 749 TO 750 - UPDATED SURVEY DATA.
3. MISSED APPROACH, REMOVED WORD "VIA" - CURRENT WORDING POLICY.
4. REMOVED ALTERNATE MISSED APPROACH - PREVIOUS ALTERNATE MISSED USED THE SAME NAVIGATIONAL FACILITY AS PRIMARY MISSED, AND ALTERNATE MISSED NOT REQUIRED SINCE DME IS REQUIRED ON PROCEDURE.
5. LINES 3 AND 4, ADDED "6.00 DME" AFTER "STADI" - CURRENT DOCUMENTATION POLICY.
6. ADDED EQUIPMENT REQUIREMENT NOTE FOR DME REQUIRED - 8260.19H, PARA 8-6-8.
7. ADDED HELICOPTER VISIBILITY NOTE - 34:1 PENETRATIONS.
8. REMOVED PROCEDURE NA NOTE FROM DNV VORTAC - ONLY EXISTING AIRWAY THAT EXCEEDS TURN LIMITATIONS PASSES THROUGH THE CMI VORTAC.
9. REWORDED PROCEDURE NA NOTE FROM RBS VOR/DME - ONLY ONE AIRWAY EXCEEDS TURN LIMITATIONS.
10. ADDED CIRCLING ICON - CURRENT CIRCLING AREAS EVALUATED.
11. ADDED NON-STANDARD ALTERNATE MINIMUMS - CIRCLING VISIBILITY CHANGES.
12. S-22 HATS LOWERED FROM 371 TO 370 - UPDATED TDZE.
13. CIRCLING MDA AND HAA INCREASED FOR ALL CATS, CAT C AND D VISIBILITY INCREASED - USING CURRENT CIRCLING AREAS.
14. CHANGED VDP FROM 1.74 DME/1.05 NM TO 1.73 DME/1.04 NM - RECALCULATION.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
CHICAGO, IL	CHICAGO O'HARE INTL	13 SEPTEMBER 2018	20D

TAKEOFF MINIMUMS:

RWY 4L, 4R, 9L, 9R, 10C, 10L, 10R, 22L, 22R: STANDARD.

RWY 27L: STANDARD WITH MINIMUM CLIMB OF 220 FT PER NM TO 900, OR ALTERNATIVELY, WITH STANDARD TAKEOFF MINIMUMS AND A NORMAL 200 FT PER NM CLIMB GRADIENT, TAKEOFF MUST OCCUR NO LATER THAN 1500 FEET PRIOR TO DER.

RWY 27R: STANDARD WITH MINIMUM CLIMB OF 220 FT PER NM TO 1800.

RWY 28C: STANDARD WITH MINIMUM CLIMB OF 220 FT PER NM TO 1700.

RWY 28L: STANDARD WITH MINIMUM CLIMB OF 235 FT PER NM TO 1000, OR ALTERNATIVELY, WITH STANDARD TAKEOFF MINIMUMS AND A NORMAL 200 FT PER NM CLIMB GRADIENT, TAKEOFF MUST OCCUR NO LATER THAN 1900 FEET PRIOR TO DER.

RWY 28R: STANDARD WITH MINIMUM CLIMB OF 225 FT PER NM TO 1700.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 4L: TOWER ON BUILDING 3301 FT FROM DER, 1248 FT RIGHT OF CENTERLINE, 109 FT AGL/750 FT MSL.

NOTE: RWY 4R: AIRCRAFT ON TAXIWAY 152 FT FROM DER, 329 FT LEFT OF CENTERLINE, 80 FT AGL/735 FT MSL. TREE 809 FT FROM DER, 610 FT RIGHT OF CENTERLINE, 675 FT MSL.

NOTE: RWY 9L: BUILDING 2771 FT FROM DER, 1233 FT RIGHT OF CENTERLINE, 94 FT AGL/745 FT MSL.

NOTE: RWY 9R: POLE 877 FT FROM DER, 688 FT RIGHT OF CENTERLINE, 29 FT AGL/673 FT MSL.

NOTE: RWY 10C: TOWER 1169 FT FROM DER, 778 FT LEFT OF CENTERLINE, 41 FT AGL/694 FT MSL.

NOTE: RWY 10L: AIRCRAFT ON TAXIWAY BEGINNING 32 FT FROM DER, 439 FT LEFT OF CENTERLINE, UP TO 80 FT AGL/735 FT MSL. SIGN AND TOWER ON BUILDING BEGINNING 2518 FT FROM DER, 729 FT RIGHT OF CENTERLINE, UP TO 88 FT AGL/732 FT MSL. TOWER 3958 FT FROM DER, 1287 FT RIGHT OF CENTERLINE, 127 FT AGL/771 FT MSL. POLE 4388 FT FROM DER, 1585 FT LEFT OF CENTERLINE, 124 FT AGL/762 FT MSL.

NOTE: RWY 10R: TREE 2190 FT FROM DER, 1020 FT RIGHT OF CENTERLINE, 714 FT MSL. TREES BEGINNING 2202 FT FROM DER, 1016 FT RIGHT OF CENTERLINE, UP TO 715 FT MSL. TREE 2248 FT FROM DER, 777 FT RIGHT OF CENTERLINE, 716 FT MSL. TREES BEGINNING 2265 FT FROM DER, 780 FT RIGHT OF CENTERLINE, UP TO 717 FT MSL. TREES BEGINNING 2365 FT FROM DER, 586 FT RIGHT OF CENTERLINE, UP TO 720 FT MSL. TREE 2412 FT FROM DER, 735 FT RIGHT OF CENTERLINE, 723 FT MSL. TREES BEGINNING 2415 FT FROM DER, 586 FT RIGHT OF CENTERLINE, UP TO 71 FT AGL/724 FT MSL.

NOTE: RWY 22L: POLE 1301 FT FROM DER, 737 FT RIGHT OF CENTERLINE, 39 FT AGL/694 FT MSL.

NOTE: RWY 22R: AIRCRAFT ON TAXIWAY 34 FT FROM DER, 429 FT LEFT OF CENTERLINE, UP TO 80 FT AGL/736 FT MSL, BATCH PLANT TOWER MISCELLANEOUS EQUIPMENT BEGINNING 3600 FT FROM DEPARTURE END OF RWY, 608 FT RIGHT OF CENTERLINE, 90 FT AGL/UP TO 752 FT MSL, CONSTRUCTION EQUIPMENT BEGINNING 1282 FT FROM DER, 626 FT RIGHT OF CENTERLINE, 45 FT AGL/UP TO 703 FT MSL.

NOTE: RWY 27L: AIRCRAFT ON TAXIWAY 70 FT FROM DER, 407 FT LEFT OF CENTERLINE, UP TO 80 FT AGL/740 FT MSL. POLE 5860 FT FROM DER, 1822 FT LEFT OF CENTERLINE, 147 FT AGL/812 FT MSL.

NOTE: RWY 27R: TANK 1509 FT FROM DER, 886 FT LEFT OF CENTERLINE, 56 FT AGL/726 FT MSL. ELEVATOR 2778 FT FROM DER, 1019 FT LEFT OF CENTERLINE, 111 FT AGL/776 FT MSL.

NOTE: RWY 28C: TREE 2373 FT FROM DER, 1099 FT LEFT OF CENTERLINE, 737 FT MSL. TREE 2559 FT FROM DER, 257 FT RIGHT OF CENTERLINE, 737 FT MSL. TREE 2907 FT FROM DER, 1196 FT LEFT OF CENTERLINE, 746 FT MSL. TREE 3526 FT FROM DER, 695 FT LEFT OF CENTERLINE, 768 FT MSL.

NOTE: RWY 28L: RAILROAD BEGINNING 590 FT FROM DER, 639 FT LEFT OF CENTERLINE, UP TO 700 FT MSL. POLE 1070 FT FROM DER, 697 FT LEFT OF CENTERLINE, 707 FT MSL. TREE 1583 FT FROM DER, 803 FT LEFT OF CENTERLINE, 724 FT MSL. TREES BEGINNING 1590 FT FROM DER,

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
CHICAGO, IL	CHICAGO O'HARE INTL	13 SEPTEMBER 2018	20D

724 FT LEFT OF CENTERLINE, UP TO 734 FT MSL. TREE 1877 FT FROM DER, 825 FT LEFT OF CENTERLINE, 740 FT MSL. TREES BEGINNING 1911 FT FROM DER, 788 FT LEFT OF CENTERLINE, UP TO 79 FT AGL/751 FT MSL. TREES BEGINNING 2552 FT FROM DER, 717 FT LEFT OF CENTERLINE, UP TO 758 FT MSL. TANK 5913 FT FROM DER, 741 FT RIGHT OF CENTERLINE, 167 FT AGL/834 FT MSL.

NOTE: RWY 28R: TREE 2559 FT FROM DER, 942 FT LEFT OF CENTERLINE, 737 FT MSL.

CONTROLLING OBSTACLES:

RWY 27L: 812 FT MSL POLE 415844.00N/0875620.00W.

RWY 27R: 1468 FT MSL TOWER 420042.49N/0880206.93W.

RWY 28C: 1413 FT MSL TOWER 415926.00N/0880139.00W.

RWY 28L: 852 FT MSL TANK 415732.96N/0875658.25W.

RWY 28R: 1413 FT MSL TOWER 415926.00N/0880139.00W.

REMARKS:

1. DEPARTURE ROUTES THAT WOULD AUTHORIZE STANDARD TAKEOFF MINIMUMS WITH A 200 FT PER NM CLIMB GRADIENT AND MEET ATC FLOW REQUIREMENTS CAN NOT BE CONSTRUCTED FOR RWY 27L, 27R, 28C, 28L AND 28R. NON-STANDARD CLIMB GRADIENTS PUBLISHED TO MITIGATE 40:1 PENETRATIONS PER ATC REQUEST.
2. ATC REQUESTS TO OPT OUT OF VCOA REQUIREMENT DUE TO TRAFFIC VOLUME AND COMPLEXITY.
3. AIRBUS 380 (80 FT AGL) USED AS WORST CASE FOR AIRCRAFT ON TAXIWAYS.
4. RWY 27L AND RWY 27R CLIMB GRADIENTS ROUNDED UP TO 220 FT PER NM FOR PUBLICATION (COMPUTED VALUE IS 218 FT PER NM).
5. RWY 28L CLIMB GRADIENT COMPUTES TO 210 FT PER NM TO 900. RETAINED PUBLISHED 235 FT PER NM TO 1000 CLIMB GRADIENT UNTIL NEXT FULL AMENDMENT.

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
CHICAGO, IL	CHICAGO O'HARE INTL	13 SEPTEMBER 2018	20D

6. RWY 28R CLIMB GRADIENT ROUNDED UP TO 225 FT PER NM FOR PUBLICATION (COMPUTED VALUE IS 222 FT PER NM).

FLIGHT INSPECTED BY:

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

OFFICE SYMBOL:

DATE:

Digitally signed by
ROBERT G HAMILTON

May 21, 2018

DATE:

4/9/18

DEVELOPED BY:

DAVID DOWLING

Digitally signed by

DAVID A DOWLING

Apr 10, 2018

OFFICE SYMBOL:

AJV-5422

OFFICE SYMBOL:

AJV-5420

DATE:

Digitally signed by

ROBERT G HAMILTON

May 21, 2018

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A

ALPA

AOPA

APA

HAI

NBAA



OTHER:

ZAU, ORD APP CON, ORD ATCT, AMGR

CHANGES - REASONS:

1. ADDED TO RWY 22 TAKEOFF OBSTACLES NOTE: BATCH PLANT TOWER MISCELLANEOUS EQUIPMENT BEGINNING 3600 FT FROM DEPARTURE END OF RWY, 608 FT RIGHT OF CENTERLINE, 90 FT AGL//UP TO 752 FT MSL, CONSTRUCTION EQUIPMENT BEGINNING 1282 FT FROM DER, 626 FT RIGHT OF CENTERLINE, 45 FT AGL//UP TO 703 FT MSL - KORD CONSTRUCTION IAW FPT AND NRA 2017-AGL-1043 THROUGH 10146 (BATCH PLANT TWR EQUIP) AND NRA 2016-AGL-10912, 10916, 10920 (CONSTRUCTION EQUIP).

QUALITY
3
CHECKED

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR/DME STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE											
										ADDITIONAL FLIGHT DATA:									
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																			
2. _____																			
3. FAC _____ FAF _____ DIST FAF TO MAP _____ THLD _____																			
4. MIN. ALT _____																			
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____									
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE MOUNT CARMEL, IL				ELEVATION: 429 TDZE: 429 AIRPORT NAME: MOUNT CARMEL MUNI				FACILITY IDENTIFIER: LWV		PROCEDURE NO./AMD'T NO./EFFECTIVE DATE: VOR/DME RWY 22, AMDT 10A, 01/08/2015				SUP VOR RWY 22 AMD'T 10 DATE 05/06/2010					

**FLIGHT STANDARDS SERVICE
NDB STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.27

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If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> ANDERSON MUNI-DARLINGTON FIELD	<u>AIRPORT ID</u> KAID	<u>PROCEDURE NAME</u> NDB RWY 30	<u>ORIGINAL/AMENDMENT</u> 8A	<u>CITY</u> ANDERSON	<u>STATE</u> IN	
<u>AIRPORT ELEVATION</u> 919	<u>TDZE</u> 919	<u>SUPERSEDED</u> NDB RWY 30	<u>ORIGINAL/AMENDMENT</u> 8	<u>DATED</u> 09/14/2017	<u>MAG VAR</u> 3W	<u>EPOCH YEAR</u> 1985
<u>FACILITY</u> AI	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
MIE VOR/DME		VIDEO LOM	FAF/IAF				211.12	11.40	2900
OKK VORTAC		VIDEO LOM	FAF/IAF				142.38	37.23	2900
MOTTS/DQN VOR/DME 31.02 DME		YILEJ INT/DQN VOR/DME 36.21 DME	IAF				264.06	5.19 (DQN R-264)	2900
YILEJ INT/DQN VOR/DME 36.21 DME	IAF	ROBOW INT	NOPT				299.44	10.34 (AI BRG-119)	2900
ROBOW INT	IF	VIDEO LOM					299.44	6.92	2600

MISSED APPROACH

MAP:

4.89 NM AFTER VIDEO LOM

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 THEN CLIMBING RIGHT TURN TO 2900 DIRECT VIDEO LOM AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT R **SIDE OF COURSE** 119.44 **OUTBOUND** 2900 **FT WITHIN** 10 **MILES OF** VIDEO LOM (IAF)
- 2.
3. **FAC:** 299.44 **FAF:** VIDEO LOM **DIST FAF TO MAP:** 4.89 **DIST FAF TO THLD:** 4.89
4. **MIN ALT:** VIDEO LOM 2600
8. **MSA FROM:** AI LOM 2900

EQUIPMENT REQUIREMENTS NOTES:

NOTES:



CHART NOTE: RWY 30 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: CIRCLING RWY 12, 36 NA AT NIGHT.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON MIE VOR/DME AIRWAY RADIALS 212 CW 244.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON OKK VORTAC AIRWAY RADIALS 102 CW 187.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL AT MOTTS ON V50 EASTBOUND.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-30 CAT C/D VISIBILITY TO 1 3/4 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
VIDEO LOM TO RW30: 3.15/45.
FAS OBST: 1190 AAO 400409N/0853210W.
HOLD SE, LT, 299.44 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - NA WHEN CONTROL TOWER CLOSED.

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
S-30	1500	3/4	581	1500	3/4	581	1500	1 3/8	581	1500	1 3/8	581			
CIRCLING	1500	1	581	1500	1	581	1520	1 3/4	601	1520	2	601			

CHANGES - REASONS

REMOVED INT FROM MOTTS - FIX IS NO LONGER AN INTERSECTION.

THIS AMENDMENT DOES NOT SATISFY PERIODIC REVIEW REQUIREMENTS.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: AMGR, ZID, IND APP CON, AID ATCT, ATA

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

DAVID A. DOWLING

APPROVED BY

JULIE MORGAN

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

04/17/2018

DATE

Digitally signed by
ROBERT G HAMILTON
May 16, 2018

Digitally signed by
ROBERT G HAMILTON
May 16, 2018
TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
ILS STANDARD INSTRUMENT APPROACH PROCEDURE

TITLE 14 CFR PART 97.29

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> FORT WAYNE INTL	<u>AIRPORT ID</u> KFWA	<u>PROCEDURE NAME</u> ILS OR LOC RWY 32	<u>ORIGINAL/AMENDMENT</u> 31A	<u>CITY</u> FORT WAYNE	<u>STATE</u> IN	
<u>AIRPORT ELEVATION</u> 815	<u>TDZE</u> 800	<u>SUPERSEDED</u> ILS OR LOC RWY 32	<u>ORIGINAL/AMENDMENT</u> 31	<u>DATED</u> 04/27/2017	<u>MAG VAR</u> 6W	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> I-FWA	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
FWA VORTAC		LILRE/I-FWA 6.02 DME/RADAR					139.35	4.75	2900
JEGPU/I-FWA 17.26 DME/RADAR	IF	LILRE/I-FWA 6.02 DME/RADAR					320.76	11.25 (I-FWA)	2300

MISSED APPROACH

MAP:

ILS: DA
LOC: 4.55 NM AFTER LILRE/I-FWA 6.02 DME/RADAR OR AT I-FWA 1.47 DME

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 THEN LEFT TURN ON FWA VORTAC R-285 TO TELEY INT/FWA 17.48 DME AND HOLD..

ALTERNATE MISSED APPROACH INSTRUCTIONS (DO NOT CHART):

CLIMB TO 3500 THEN CLIMBING LEFT TURN TO 4000 ON GSH VORTAC R-130 TO WERBU INT/GSH 31.17 DME AND HOLD.

PROFILE:

1. PT L **SIDE OF COURSE** 140.76 **OUTBOUND** 2400 **FT WITHIN** 10 **MILES OF** LILRE (IAF)
- 2.
3. **FAC:** 320.76 **FAF:** LILRE/I-FWA 6.02 DME/RADAR **DIST FAF TO MAP:** 4.55 **DIST FAF TO THLD:** 4.55
4. **MIN ALT:** LILRE/I-FWA 6.02 DME/RADAR 2300, ZINOM/I-FWA 2.87 DME 1280*
5. **DIST TO THLD FROM OM:** **MM:** **IM:** **150 HAT:** **GS ANT:** 1051
6. **MIN GS INCPT:** 2300 **GS ALT AT FAF :** LILRE/I-FWA 6.02 DME/RADAR 2300 **OM:** **MM:** **IM:**
7. **GP ANGLE:** 3.00 **34:1:** **20:1:** **TCH:** 55.6
8. **MSA FROM:** FWA VORTAC 2700

EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED FOR LOC ONLY.
DME OR RADAR REQUIRED FOR PROCEDURE ENTRY.

NOTES:



CHART PROFILE NOTE: VGSI AND ILS GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
*LOC ONLY
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON FWA VORTAC AIRWAY RADIALS 097 CW 198.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-ILS 32 CAT E VISIBILITY TO RVR 4000, S-LOC 32 CAT E VISIBILITY TO RVR 6000.
CHART NOTE: USE I-FWA DME WHEN ON THE LOCALIZER COURSE.
CHART PLANVIEW NOTE: CAT E PROCEDURE TURN NA.
CHART NOTE: **RVR 1800 AUTHORIZED WITH USE OF FD OR AP OR HUD TO DA.

ADDITIONAL FLIGHT DATA:

CHART PLANVIEW NOTE: DME OR RADAR REQUIRED.
CHART: ASR.
CHART CIRCLING ICON.
CHART IN PLANVIEW: WERBU INT/GSH 31.17 DME
CHART FAS OBST: 900 TREE 405745N/0850935W.
CHART IN PLANVIEW: ALTERNATE MA HOLDING, HOLD NW WERBU INT/GSH 31.17 DME, RT, 130.47 INBOUND.
HOLD W, RT, 105.25 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ ILS: STANDARD; LOC: STANDARD - CAT D 800-2 1/4, CAT E 800-2 1/2

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
S-ILS 32**	1000	2400	200	1000	2400	200	1000	2400	200	1000	2400	200	1000	2400	200
S-LOC 32	1160	2400	360	1160	2400	360	1160	4000	360	1160	4000	360	1160	4000	360
CIRCLING	1300	1	485	1300	1	485	1420	1 3/4	605	1520	2 1/4	705	1520	2 1/2	705

CHANGES - REASONS

1. REMOVED ARC SEGMENT ZULUG TO JEGPU - PER FPT FOR RID VORTAC DECOMMISSIONING.
2. REPLACED DME REQUIRED NOTE WITH EQUIPMENT REQUIREMENTS NOTE: "DME REQUIRED FOR LOC ONLY" - 19H, CH. 8 REQUIREMENT.
3. REMOVED S-ILS 32 ALTERNATE MINIMUMS - PER 8260-3C, TABLE 3-4-1.
4. ADDED S-LOC 32 ALTERNATE MINIMUMS - PER 8260-3, TABLE 3-4-1.
5. ADDED EQUIPMENT REQUIREMENTS NOTE: "DME OR RADAR REQUIRED FOR PROCEDURE ENTRY" - 19H, CH. 8 REQUIREMENT.



<u>AIRPORT</u> FORT WAYNE INTL	<u>AIRPORT ID</u> KFWA	<u>PROCEDURE NAME</u> ILS OR LOC RWY 32	<u>ORIGINAL/AMENDMENT</u> 31A	<u>CITY</u> FORT WAYNE	<u>STATE</u> IN

COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☒ **HAI** ☐ **NBAA** ☒ **OTHER:** ZAU, FWA APP CON, FWA ATCT, AMGR, ATA

<u>FLIGHT CHECKED BY</u>	<u>OFFICE</u>	<u>DATE</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 21, 2018
FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.			
<u>DEVELOPED BY</u>	<i>Digitally signed by</i> DAVID A DOWLING Jun 18, 2018	<u>OFFICE</u>	<u>DATE</u>
DAVID A. DOWLING	AJV-5420	05/04/2018	
<u>APPROVED BY</u>	<u>OFFICE</u>	<u>DATE</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 21, 2018
JULIE MORGAN	AJV-5420		<u>TITLE</u> MANAGER



U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION NDB STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.27										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE											
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)																			
2. _____																			
3. FAC ____ FAF _____ DIST FAF TO MAP ____ THLD _____																			
4. MIN. ALT _____																			
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____									
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE HUNTINGTON, IN		ELEVATION: 806 AIRPORT NAME: HUNTINGTON MUNI		TDZE: 806		FACILITY IDENTIFIER: HHG		PROCEDURE NO./AMDТ NO./EFFECTIVE DATE: NDB RWY 9, AMDТ 2, 04/27/2017						SUP AMDТ 1 DATE 01/20/2005					



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
ILS STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.29

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<u>AIRPORT</u> CLARK RGNL	<u>AIRPORT ID</u> KJVY	<u>PROCEDURE NAME</u> ILS OR LOC RWY 18	<u>ORIGINAL/AMENDMENT</u> 4	<u>CITY</u> JEFFERSONVILLE	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 476	<u>TDZE</u> 476	<u>SUPERSEDED</u> ILS OR LOC RWY 18	<u>ORIGINAL/AMENDMENT</u> 3	<u>DATED</u> 07/24/2014	<u>MAG VAR</u> 2W
<u>FACILITY</u> I-JVY	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1990

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>

MISSED APPROACH

MAP:

ILS: DA
LOC: 5.86 NM AFTER CATCH LOM

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1500 THEN CLIMBING LEFT TURN TO 2500 DIRECT CATCH LOM AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS (DO NOT CHART):

CLIMB TO 2400 ON HEADING 181.97 FOR RADAR VECTORS.

PROFILE:

1. PT L SIDE OF COURSE 001.97 OUTBOUND 2600 FT WITHIN 10 MILES OF CATCH LOM (IAF)
2.
3. FAC: 181.97 FAF: CATCH LOM DIST FAF TO MAP: 5.86 DIST FAF TO THLD: 5.86
4. MIN ALT: CATCH LOM 2500
5. DIST TO THLD FROM OM: 5.86 MM: IM: 150 HAT: GS ANT: 1000
6. MIN GS INCPT: 2500 GS ALT AT FAF : OM: 2425 MM: IM:
7. GP ANGLE: 3.00 34:1 20:1 TCH: 51.0
8. MSA FROM: CATCH LOM 360-180 3600, 180-360 3000

EQUIPMENT REQUIREMENTS NOTES:

ADF REQUIRED.
RADAR REQUIRED FOR PROCEDURE ENTRY.

NOTES:

CHART NOTE: CIRCLING NA FOR CAT D SW OF RWYS 14 AND 36.
CHART NOTE: CIRCLING RWY 14, 32 NA AT NIGHT.
CHART PROFILE NOTE: VGSI AND ILS GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, SDF APP CON, AIRPORT MANAGER

FLIGHT CHECKED BY

PENDING

Digitally signed by

ROBERT G HAMILTON

Jun 22, 2018

OFFICE

DATE

DEVELOPED BY

RUSS ROSLEWSKI

Digitally signed by

RUSSELL ROSLEWSKI

Jun 15, 2018

OFFICE

DATE

AJV-542105/21/2018

APPROVED BY

JULIE MORGAN

Digitally signed by

ROBERT G HAMILTON

Jun 22, 2018

OFFICE

DATE

TITLE

MANAGER



**FLIGHT STANDARDS SERVICE
NDB STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.27

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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.

If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> CLARK RGNL	<u>AIRPORT ID</u> KJVV	<u>PROCEDURE NAME</u> NDB RWY 18	<u>ORIGINAL/AMENDMENT</u> 3	<u>CITY</u> JEFFERSONVILLE	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 476	<u>TDZE</u> 476	<u>SUPERSEDED</u> NDB RWY 18	<u>ORIGINAL/AMENDMENT</u> 2	<u>DATED</u> 07/24/2014	<u>MAG VAR</u> 2W
<u>FACILITY</u> JV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1990

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>

MISSED APPROACH

MAP:

5.86 NM AFTER CATCH LOM

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1500 THEN CLIMBING LEFT TURN TO 2500 DIRECT CATCH LOM AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT L **SIDE OF COURSE** 002.30 **OUTBOUND** 2600 **FT WITHIN** 10 **MILES OF** CATCH LOM (IAF)
- 2.
3. **FAC:** 182.30 **FAF:** CATCH LOM **DIST FAF TO MAP:** 5.86 **DIST FAF TO THLD:** 5.86
4. **MIN ALT:** CATCH LOM 2500
8. **MSA FROM:** CATCH LOM 360-180 3600, 180-360 3000

EQUIPMENT REQUIREMENTS NOTES:

RADAR REQUIRED FOR PROCEDURE ENTRY.

NOTES:

CHART NOTE: CIRCLING NA FOR CAT D SW OF RWYS 14 AND 36.

CHART NOTE: CIRCLING RWY 14, 32 NA AT NIGHT.

CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).

CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-18 CATS A AND B VISIBILITY TO 1 SM AND CATS C AND D TO 1 3/4 SM.

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE LOUISVILLE INTL-STANDIFORD FIELD ALTIMETER SETTING AND INCREASE ALL MDAS 40 FEET AND CIRCLING VISIBILITY CAT C 1/8 SM.

CHART NOTE: FOR INOPERATIVE ALS WHEN USING LOUISVILLE INTL-STANDIFORD FIELD ALTIMETER SETTING, INCREASE S-18 CATS A AND B VISIBILITY TO 1 SM.

ADDITIONAL FLIGHT DATA:

QUALITY
22
CHECKED

CHART CIRCLING ICON.
CATCH LOM TO RW18: 3.18/45.
CHART FAS OBST: 780 TOWER 382624N/0854559W.
HOLD N, LT, 182.30 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☒

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
S-18	1080	3/4	604	1080	3/4	604	1080	1 3/8	604	1080	1 3/8	604			
CIRCLING	1080	1	604	1080	1	604	1080	1 3/4	604	1100	2	624			

CHANGES - REASONS

1. LINE 1, PT OUTBOUND COURSE CHANGED FROM 002.29 TO 002.30 - RECALCULATION WITH RELOCATED RUNWAY THRESHOLD.
2. LINE 3, FAC CHANGED FROM 182.29 TO 182.30 AND DISTANCES CHANGED FROM 6.11 TO 5.86 - RECALCULATION, RUNWAY EXTENDED 1500 FT NORTH.
3. MAP CHANGED FROM 6.11 NM AFTER JV OM TO 5.86 NM AFTER JV NDB - RECALCULATION WITH RELOCATED RUNWAY THRESHOLD.
4. MISSED APPROACH HOLDING INBOUND COURSE CHANGED FROM 182.29 TO 182.30 - RECALCULATION WITH RELOCATED RUNWAY THRESHOLD.
5. FAS OBST CHANGED FROM 789 AAO TO 780 TOWER - REEVALUATION OF OBSTACLE ENVIRONMENT.
6. REPLACED PLANVIEW NOTE: RADAR REQUIRED WITH EQUIPMENT REQUIREMENTS NOTE: RADAR REQUIRED FOR PROCEDURE ENTRY - CURRENT DOCUMENTATION POLICY.
7. ALL MDAS LOWERED BY 20 FEET - REEVALUATION OF OBSTACLE ENVIRONMENT.
8. ALL HAT/HAA ADJUSTED FOR LOWERED MDA AND UPDATED APT ELEV/TDZE - RECALCULATION.
9. NIGHT LANDING NOTE REWORDED - CURRENT DOCUMENTATION POLICY.
10. INOPERATIVE ALS NOTE, BACKUP ALTIMETER NOTE AND INOP/BACKUP ALTIMETER NOTES UPDATED - RECALCULATION.
11. REMOVED MAXIMUM PROCEDURE TURN ENTRY ALTITUDE AT CATCH LOM - NOT REQUIRED.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, SDF APP CON, AIRPORT MANAGER

FLIGHT CHECKED BY

PENDING
Digitally signed by
ROBERT G HAMILTON

OFFICE

DATE

DEVELOPED BY

RUSS ROSLEWSKI
Digitally signed by
RUSSELL ROSLEWSKI
Jun 15, 2018

OFFICE

AJV-5421

DATE

05/24/2018

APPROVED BY

JULIE MORGAN
Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

OFFICE

AJV-5420

DATE

TITLE
MANAGER



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> CLARK RGNL	<u>AIRPORT ID</u> KJVV	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> JEFFERSONVILLE	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 476	<u>TDZE</u> 476	<u>SUPERSEDED</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 12/11/2014	<u>MAG VAR</u> 2W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1990

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>
STREP	IAF	EATTN	NOPT	TF	FB	1.00	133.26	17.25	3100
MOSEY	IAF	EATTN	NOPT	TF	FB	1.00	248.12	18.64	3100
EATTN	IF/IAF	OREOH		TF	FB	1.00	181.98	6.19	2500
OREOH	FAF	ZUBGU/1.90 NM TO RW18		TF	FB	0.30	181.98	4.30	
ZUBGU/1.90 NM TO RW18		RW18	MAP	TF	FO	0.30	181.98	1.90	
RW18	MAP	900 MSL		CA			181.98		900
900 MSL		EATTN		DF	FO	1.00			3100

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW18

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 900 THEN CLIMBING LEFT TURN TO 3100 DIRECT EATTN AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD N EATTN, RT, 181.98 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 181.98

FAF: OREOH

DIST FAF TO MAP: 6.20

DIST FAF TO THLD: 6.20

4. MIN ALT: EATTN 3100, OREOH 2500, ZUBGU/1.90 NM TO RW18 1120*

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

200 HAT: 0.47

GS ANT:

6. MIN GP INCPT: 2500

GP ALT AT FAF : OREOH 2500

OM:

MM:

IM:

7. GP ANGLE: 3.00

34:1: IS CLEAR

20:1: IS CLEAR

TCH: 51.0

8. MSA FROM: RW18 3600

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA FOR CAT D SW OF RWYS 14 AND 36.
CHART NOTE: CIRCLING RWY 14, 32 NA AT NIGHT.
CHART NOTE: BARO-VNAV AND VDP NA WHEN USING LOUISVILLE INTL-STANDIFORD FIELD ALTIMETER SETTING.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
*LNAV ONLY
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT STREP ON V53 NORTHWEST BOUND.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE LNAV/VNAV VISIBILITY TO 1 SM.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE LOUISVILLE INTL-STANDIFORD FIELD ALTIMETER SETTING: INCREASE ALL DAS 30 FEET AND LNAV/VNAV VISIBILITY 1/8 SM; INCREASE ALL MDAS 40 FEET, LNAV VISIBILITY CATS C AND D 1/8 SM AND CIRCLING VISIBILITY CAT C 1/4 SM.
CHART NOTE: FOR INOPERATIVE ALS WHEN USING LOUISVILLE INTL-STANDIFORD FIELD ALTIMETER SETTING, INCREASE LNAV/VNAV VISIBILITY TO 1 1/8 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.12 NM TO RW18*
*LNAV ONLY
WAAS CHANNEL #82426
REFERENCE PATH ID: W18A
CHART FAS OBST: 609 TREE 382305N/0854349W.
LTP HAE: 111.7 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	676	1/2	200	676	1/2	200	676	1/2	200	676	1/2	200			
LNAV/VNAV DA	850	5/8	374	850	5/8	374	850	5/8	374	850	5/8	374			
LNAV MDA	860	1/2	384	860	1/2	384	860	5/8	384	860	5/8	384			
CIRCLING	1000	1	524	1040	1	564	1060	1 1/2	584	1100	2	624			



CHANGES - REASONS

- 1. CHANGED AIRPORT ELEVATION AND TDZE FROM 474 TO 476 - RUNWAY CONSTRUCTION AND UPDATED SURVEY.
- 2. TERMINAL ROUTE STREP TO EATTN DISTANCE CHANGED FROM 17.26 TO 17.25 - REPOSITIONING OF EATTN.
- 3. TERMINAL ROUTE MOSEY TO EATTN COURSE CHANGED FROM 248.11 TO 248.12 - REPOSITIONING OF EATTN.
- 4. TERMINAL ROUTE EATTN TO OREOH DISTANCE CHANGED FROM 6.10 TO 6.19 - REPOSITIONING OF EATTN AND OREOH.
- 5. TERMINAL ROUTE EATTN TO OREOH ALTITUDE CHANGED FROM 2600 TO 2500 - PFAF ALTITUDE TO MATCH ILS.
- 6. TERMINAL ROUTE OREOH TO ZUBGU DISTANCE CHANGED FROM 4.63 TO 4.30 - PFAF ALTITUDE LOWERED 100 FEET.
- 7. PROFILE SECTION, LINE 2, ADDED MAX HOLDING ALTITUDE - 8260.19H REQUIREMENT.
- 8. PROFILE SECTION, LINE 3, DISTANCES CHANGED FROM 6.53 TO 6.20 - PFAF ALTITUDE LOWERED.
- 9. PROFILE SECTION, LINE 4, ALTITUDE AT OREOH CHANGED FROM 2600 TO 2500 - PFAF ALTITUDE LOWERED.
- 10. PROFILE SECTION, LINE 5, DIST TO THLD FROM 200 HAT CHANGED FROM 0.48 TO 0.47 - RECALCULATION.
- 11. PROFILE SECTION, LINE 6, CHANGED ALTITUDES FROM 2600 TO 2500 - PFAF ALTITUDE LOWERED.
- 12. PROFILE SECTION, LINE 7, TCH CHANGED FROM 45.4 TO 51.0 - COINCIDENT WITH ILS RWY 18 TCH.
- 13. PROFILE SECTION, LINE 7, ADDED "20:1 IS CLEAR" - CURRENT DOCUMENTATION POLICY.
- 14. REPLACED CHART NOTE: DME/DME RNP-0.3 NA WITH PBN REQUIREMENTS NOTE - CURRENT DOCUMENTATION POLICY.
- 15. REWORDED NIGHT CIRCLING RESTRICTION NOTE - CURRENT DOCUMENTATION POLICY.
- 16. ADDED CHART NOTE: VDP NA WHEN USING BACKUP ALTIMETER SETTING - NOT ALLOWED WITH BACKUP ALTIMETERS.
- 17. REMOVED CHART PROFILE NOTE REGARDING V47 AT MOSEY - V47 NO LONGER EXISTS.
- 18. UPDATED ALL INOPERATIVE ALS AND BACKUP ALTIMETER NOTES - RECALCULATION WITH NEW HAT/HAA AND VISIBILITIES.
- 19. ADDED CIRCLING ICON - USED CURRENT CIRCLING AREAS.
- 20. ADDED VDP - VGS1 TCH IS NOW KNOWN.
- 21. LPV DA INCREASED FROM 674 TO 676 - NEW TDZE.
- 22. LNAV/VNAV DA/HAT INCREASED FROM 730/256 TO 850/374 AND VISIBILITIES INCREASED FROM 1/2 TO 5/8 - NEW CONTROLLING OBSTACLE.
- 23. LNAV MDA/HAT INCREASED FROM 820/346 TO 860/384 - NEW CONTROLLING OBSTACLE.
- 24. CIRCLING MDA CAT A DECREASED FROM 1040 TO 1000, CAT C INCREASED FROM 1040 TO 1060, CAT D INCREASED FROM 1040 TO 1100 AND ALL HAAS UPDATED - CURRENT CIRCLING AREAS AND OBSTACLE DATA.
- 25. INCREASED BARO-VNAV NA HIGH TEMPERATURE FROM 40 C TO 54 C AND REMOVED FAHRENHEIT VALUES - RECALCULATION AND CURRENT POLICY.
- 26. ADDED CIRCLING RESTRICTION FOR CAT D - MATCH OTHER PROCEDURES AND ALLOW LOWER MDA.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, SDF APP CON, AIRPORT MANAGER

FLIGHT CHECKED BY

PENDING

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

OFFICE

DATE

DEVELOPED BY

RUSS ROSLEWSKI

Digitally signed by
RUSSELL ROSLEWSKI
Jun 15, 2018

OFFICE

DATE

AJV-542105/22/2018

APPROVED BY

JULIE MORGAN

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

OFFICE

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KJVY
RUNWAY	RW18
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W18A
LTP/FTP LATITUDE	382234.1070N
LTP/FTP LONGITUDE	0854416.3895W
LTP/FTP ELLIPSOIDAL HEIGHT	+01117
FPAP LATITUDE	382104.9140N
FPAP LONGITUDE	0854416.3440W
THRESHOLD CROSSING HEIGHT (TCH)	00051.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0616
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0
CRC REMAINDER	9D6CD8DA
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+01452
FPAP ORTHOMETRIC HEIGHT	+01452



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
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TAKEOFF MINIMUMS:

RWY 18, 36: STANDARD.

RWY 14: 300-1 7/8 OR STANDARD WITH MINIMUM CLIMB OF 230 FT PER NM TO 900.

RWY 32: STANDARD WITH MINIMUM CLIMB OF 225 FT PER NM TO 1600 OR 1900-3 FOR VCOA.

TEXTUAL DEPARTURE PROCEDURES:

RWY 14: CLIMB HEADING 139.98 TO 1300 BEFORE TURNING RIGHT.

RWY 18: CLIMB HEADING 181.98 TO 1600 BEFORE TURNING RIGHT.

RWY 32: CLIMB HEADING 319.99 TO 2000 BEFORE TURNING LEFT.

RWY 36: CLIMB HEADING 001.98 TO 1600 BEFORE TURNING LEFT.

VISUAL CLIMB OVER AIRPORT:

RWY 32: OBTAIN ATC APPROVAL FOR VCOA WHEN REQUESTING IFR CLEARANCE. CLIMB IN VISUAL CONDITIONS TO CROSS CLARK RGNL AIRPORT AT OR ABOVE 2200 BEFORE PROCEEDING ON COURSE.

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 14: SIGN AND TREE BEGINNING 22 FT FROM DER, 88 FT RIGHT OF CENTERLINE, UP TO 7 FT AGL/465 FT MSL.

TREE 73 FT FROM DER, 266 FT LEFT OF CENTERLINE, 529 FT MSL.

TREE 123 FT FROM DER, 377 FT LEFT OF CENTERLINE, 540 FT MSL.

TREE AND POLE BEGINNING 126 FT FROM DER, 29 FT LEFT OF CENTERLINE, UP TO 92 FT AGL/553 FT MSL.

TREE 205 FT FROM DER, 176 FT RIGHT OF CENTERLINE, 21 FT AGL/468 FT MSL.

TREE 248 FT FROM DER, 179 FT RIGHT OF CENTERLINE, 23 FT AGL/470 FT MSL.

TREES BEGINNING 372 FT FROM DER, 41 FT RIGHT OF CENTERLINE, UP TO 41 FT AGL/491 FT MSL.

TREES BEGINNING 397 FT FROM DER, 129 FT RIGHT OF CENTERLINE, UP TO 51 FT AGL/503 FT MSL.

TREES BEGINNING 420 FT FROM DER, 22 FT RIGHT OF CENTERLINE, UP TO 506 FT MSL.

TREE 563 FT FROM DER, 266 FT RIGHT OF CENTERLINE, 518 FT MSL.

TREES BEGINNING 565 FT FROM DER, 422 FT RIGHT OF CENTERLINE, UP TO 526 FT MSL.

TREES BEGINNING 596 FT FROM DER, 175 FT RIGHT OF CENTERLINE, UP TO 100 FT AGL/536 FT MSL.

CATENARY, TREE AND POLE BEGINNING 1615 FT FROM DER, 252 FT LEFT OF CENTERLINE, UP TO 563 FT MSL.

TREE 1693 FT FROM DER, 858 FT RIGHT OF CENTERLINE, 537 FT MSL.

TREE 1793 FT FROM DER, 790 FT RIGHT OF CENTERLINE, 550 FT MSL.

TREES BEGINNING 1884 FT FROM DER, 732 FT RIGHT OF CENTERLINE, UP TO 551 FT MSL.

POLE, CATENARY AND TREE BEGINNING 2085 FT FROM DER, 242 FT LEFT OF CENTERLINE, UP TO 566 FT MSL.

CATENARY AND TRANSMISSION LINE BEGINNING 2148 FT FROM DER, 316 FT LEFT OF CENTERLINE, UP TO 580 FT MSL.

TOWER 2207 FT FROM DER, 734 FT LEFT OF CENTERLINE, 594 FT MSL.

TOWER, CATENARY, TREE AND TRANSMISSION LINE BEGINNING 2216 FT FROM DER, 201 FT LEFT OF CENTERLINE, UP TO 110 FT AGL/600 FT MSL.

TREE AND CATENARY BEGINNING 2388 FT FROM DER, 321 FT RIGHT OF CENTERLINE, UP TO 558 FT MSL.

CATENARY AND TREE BEGINNING 2507 FT FROM DER, 165 FT LEFT OF CENTERLINE, UP TO 607 FT MSL.

CATENARY AND TREE BEGINNING 2742 FT FROM DER, 1025 FT RIGHT OF CENTERLINE, UP TO 572 FT MSL.

CATENARY 3380 FT FROM DER, 10 FT RIGHT OF CENTERLINE, 119 FT AGL/578 FT MSL.

CATENARY 3763 FT FROM DER, 202 FT RIGHT OF CENTERLINE, 95 FT AGL/590 FT MSL.

CATENARY 4265 FT FROM DER, 508 FT RIGHT OF CENTERLINE, 593 FT MSL.

ANTENNA 1.5 NM FROM DER, 1335 FT LEFT OF CENTERLINE, 171 FT AGL/730 FT MSL.

NOTE: RWY 18: TREE 262 FT FROM DER, 523 FT LEFT OF CENTERLINE, 50 FT AGL/490 FT MSL.

TREE 301 FT FROM DER, 515 FT RIGHT OF CENTERLINE, 53 FT AGL/492 FT MSL.

TREES BEGINNING 320 FT FROM DER, 475 FT RIGHT OF CENTERLINE, UP TO 496 FT MSL.

TREE 369 FT FROM DER, 543 FT LEFT OF CENTERLINE, 493 FT MSL.

TREE AND BUILDING BEGINNING 545 FT FROM DER, 94 FT RIGHT OF CENTERLINE, UP TO 508 FT MSL.

TREES BEGINNING 559 FT FROM DER, 105 FT LEFT OF CENTERLINE, UP TO 512 FT MSL.

TREES BEGINNING 1223 FT FROM DER, 691 FT LEFT OF CENTERLINE, UP TO 526 FT MSL.

TREES BEGINNING 1375 FT FROM DER, 791 FT LEFT OF CENTERLINE, UP TO 90 FT AGL/538 FT MSL.

TREE 1716 FT FROM DER, 777 FT LEFT OF CENTERLINE, 545 FT MSL.

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
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TREE AND TANK BEGINNING 1720 FT FROM DER, 29 FT RIGHT OF CENTERLINE, UP TO 96 FT AGL/559 FT MSL.
TREES BEGINNING 1778 FT FROM DER, 746 FT LEFT OF CENTERLINE, UP TO 552 FT MSL.
TREES BEGINNING 1946 FT FROM DER, 676 FT LEFT OF CENTERLINE, UP TO 559 FT MSL.
TREES BEGINNING 2254 FT FROM DER, 164 FT LEFT OF CENTERLINE, UP TO 563 FT MSL.
TREES BEGINNING 3221 FT FROM DER, 678 FT RIGHT OF CENTERLINE, UP TO 562 FT MSL.
TREES BEGINNING 3833 FT FROM DER, 303 FT LEFT OF CENTERLINE, UP TO 86 FT AGL/570 FT MSL.
CATENARY AND TRANSMISSION LINE BEGINNING 4274 FT FROM DER, 564 FT LEFT OF CENTERLINE, UP TO 603 FT MSL.
CATENARY AND TRANSMISSION LINE BEGINNING 4976 FT FROM DER, 254 FT LEFT OF CENTERLINE, UP TO 125 FT AGL/610 FT MSL.
CATENARY 5675 FT FROM DER, 681 FT RIGHT OF CENTERLINE, 606 FT MSL.

NOTE: RWY 32, SIGN 19 FT FROM DER, 87 FT LEFT OF CENTERLINE, 8 FT AGL/474 FT MSL.
TREE 40 FT FROM DER, 419 FT RIGHT OF CENTERLINE, 87 FT AGL/542 FT MSL.
TREE 145 FT FROM DER, 447 FT RIGHT OF CENTERLINE, 101 FT AGL/557 FT MSL.
TREE, POLE AND BUILDING BEGINNING 192 FT FROM DER, 12 FT RIGHT OF CENTERLINE, UP TO 91 FT AGL/546 FT MSL.
TREE, POLE AND TRAVERSE WAY BEGINNING 386 FT FROM DER, 8 FT LEFT OF CENTERLINE, UP TO 70 FT AGL/531 FT MSL.
TREES BEGINNING 1054 FT FROM DER, 9 FT RIGHT OF CENTERLINE, UP TO 101 FT AGL/560 FT MSL.
TREE 1638 FT FROM DER, 744 FT LEFT OF CENTERLINE, 534 FT MSL.
TREES BEGINNING 1648 FT FROM DER, 608 FT LEFT OF CENTERLINE, UP TO 541 FT MSL.
TREES BEGINNING 1819 FT FROM DER, 518 FT LEFT OF CENTERLINE, UP TO 542 FT MSL.
TREES BEGINNING 2052 FT FROM DER, 11 FT LEFT OF CENTERLINE, UP TO 101 FT AGL/569 FT MSL.
TREE 2824 FT FROM DER, 1250 FT LEFT OF CENTERLINE, 575 FT MSL.
TREES BEGINNING 3038 FT FROM DER, 1195 FT LEFT OF CENTERLINE, UP TO 576 FT MSL.
TREES BEGINNING 3296 FT FROM DER, 895 FT RIGHT OF CENTERLINE, UP TO 567 FT MSL.
TREES BEGINNING 3501 FT FROM DER, 821 FT RIGHT OF CENTERLINE, UP TO 582 FT MSL.
TREES BEGINNING 3880 FT FROM DER, 563 FT LEFT OF CENTERLINE, UP TO 600 FT MSL.
TREES BEGINNING 4783 FT FROM DER, 1553 FT LEFT OF CENTERLINE, UP TO 616 FT MSL.

NOTE: RWY 36: FENCE 172 FT FROM DER, 462 FT RIGHT OF CENTERLINE, 482 FT MSL.
TRAVERSE WAY 330 FT FROM DER, 508 FT RIGHT OF CENTERLINE, 494 FT MSL.
TREE 418 FT FROM DER, 596 FT LEFT OF CENTERLINE, 505 FT MSL.
TREES BEGINNING 604 FT FROM DER, 596 FT LEFT OF CENTERLINE, UP TO 527 FT MSL.
POLE 1130 FT FROM DER, 791 FT RIGHT OF CENTERLINE, 513 FT MSL.
POLE 1310 FT FROM DER, 568 FT RIGHT OF CENTERLINE, 515 FT MSL.
TRANSMISSION LINE 1648 FT FROM DER, 888 FT RIGHT OF CENTERLINE, 92 FT AGL/544 FT MSL.
CATENARY, TREE AND POLE BEGINNING 1648 FT FROM DER, 603 FT RIGHT OF CENTERLINE, UP TO 548 FT MSL.
TREES BEGINNING 2148 FT FROM DER, 821 FT LEFT OF CENTERLINE, UP TO 94 FT AGL/552 FT MSL.
TREES BEGINNING 2216 FT FROM DER, 555 FT LEFT OF CENTERLINE, UP TO 553 FT MSL.
TREE 2823 FT FROM DER, 871 FT RIGHT OF CENTERLINE, 550 FT MSL.
TREE 3009 FT FROM DER, 1296 FT RIGHT OF CENTERLINE, 552 FT MSL.
TREE 3055 FT FROM DER, 818 FT RIGHT OF CENTERLINE, 562 FT MSL.
TRANSMISSION LINE AND TREE BEGINNING 3192 FT FROM DER, 321 FT RIGHT OF CENTERLINE, UP TO 71 FT AGL/564 FT MSL.



CONTROLLING OBSTACLES:

RWY 14: 730 FEET MSL ANTENNA 382044.85N/0854230.06W.
RWY 32: 1241 FEET MSL TOWER 382438.13N/0854939.28W (CLIMB GRADIENT), 1292 FEET MSL TOWER 382517.72N/0854941.92W (CLIMB GRADIENT TERMINATION ALTITUDE)
RWY 32 (VCOA): 1945 FEET MSL ANTENNA 382208.37N/0854947.57W (VCOA).

OBSTACLE MANDATING ODP ROUTE DEVELOPMENT: 1945 FEET MSL ANTENNA 382208.37N/0854947.57W.

REMARKS:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
JEFFERSONVILLE, IN	CLARK RGNL	13 SEPTEMBER 2018	3

<u>FLIGHT INSPECTED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
PENDING	Jun 22, 2018		

<u>DEVELOPED BY:</u>	<i>Digitally signed by</i> RUSSELL ROSLEWSKI	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
RUSS ROSLEWSKI	Jun 15, 2018	AJV-5421	04/25/2018

<u>APPROVED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
JULIE MORGAN	Jun 22, 2018	AJV-5420	

REQUIRED EFFECTIVE DATE:
09/13/2018

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☐	☐	☒

OTHER:
ZID, SDF APP CON, AIRPORT MANAGER

CHANGES - REASONS:

1. RWY 14 TAKEOFF MINIMUMS CHANGED FROM STANDARD TO INCLUDE VISIBILITY AND/OR CLIMB GRADIENT - NEW CONTROLLING OBSTACLE.
2. RWY 32 TAKEOFF MINIMUMS CHANGED FROM STANDARD TO INCLUDE CLIMB GRADIENT OR VCOA - NEW CONTROLLING OBSTACLE.
3. DEPARTURE PROCEDURE FOR ALL RUNWAYS CHANGED FROM REFERENCING "WEST" TO "RIGHT" OR "LEFT" AS APPROPRIATE - AS RECOMMENDED BY 8260.46F.
4. RWY 18 CLIMB-TO ALTITUDE CHANGED FROM 1500 TO 1600 - NEW CONTROLLING OBSTACLE.
5. RWY 32 DEPARTURE PROCEDURE CHANGED TO ELIMINATE IMMEDIATE TURN AFTER TAKEOFF - SINCE CLIMB GRADIENT IS REQUIRED ANYWAY FOR AIRCRAFT TURNING LEFT, THERE WAS NO ADVANTAGE TO AN IMMEDIATE TURN.
6. RWY 32 CLIMB-TO ALTITUDE CHANGED FROM 1900 TO 2000 - REEVALUATION WITH NEW STRAIGHT-OUT DEPARTURE.
7. RWY 32 VCOA ADDED - CLIMB GRADIENT REQUIRED.
8. TAKEOFF OBSTACLE NOTES AND CONTROLLING OBSTACLES UPDATED - UPDATED AIRPORT SURVEY AND DOCUMENTATION POLICY.

QUALITY
22
CHECKED

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> SHELBYVILLE MUNI	<u>AIRPORT ID</u> KGEZ	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 19	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> SHELBYVILLE	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 803	<u>TDZE</u> 803	<u>SUPERSEDED</u> RNAV (GPS) RWY 19	<u>ORIGINAL/AMENDMENT</u> 1B	<u>DATED</u> 11/10/2016	<u>MAG VAR</u> 4W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
SHB VOR/DME		DOTYY		TF	FO	2.00	015.96	8.93	3000
ZAVNE		EKUZE		TF	FB	2.00	112.33	10.94	3000
OPVAF	IAF	DOTYY	NOPT	TF	FB	1.00	278.60	5.00	3000
HOMAR	IAF	DOTYY	NOPT	TF	FB	1.00	228.11	9.60	3000
EKUZE	IAF	DOTYY	NOPT	TF	FB	1.00	098.46	5.00	3000
DOTYY	IF/IAF	LISTE		TF	FB	1.00	188.53	6.01	2500
LISTE	FAF	RW19	MAP	TF	FO	0.30	188.52	5.11	
RW19	MAP	1095 MSL		CA			188.52		
1095 MSL		WAGSE		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW19

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT WAGSE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD N DOTYY, RT, 188.53 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 188.52

FAF: LISTE

DIST FAF TO MAP: 5.11

DIST FAF TO THLD: 5.11

4. MIN ALT: DOTYY 3000, LISTE 2500

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

292 HAT: 0.78

GS ANT:

6. MIN GP INCPT: 2500

GP ALT AT FAF : LISTE 2500

OM:

MM:

IM:

7. GP ANGLE: 3.00

34:1: IS CLEAR

20:1: IS CLEAR

TCH: 45.0

8. MSA FROM: RW19 3100

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: CIRCLING RWY 9, 27 NA AT NIGHT.
CHART NOTE: BARO-VNAV NA WHEN USING INDIANAPOLIS INTL ALTIMETER SETTING.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART NOTE: VDP NA WHEN USING INDIANAPOLIS INTL ALTIMETER SETTING.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE INDIANAPOLIS INTL ALTIMETER SETTING: INCREASE LPV DA TO 1152 FEET AND LNAV/VNAV DA TO 1199 FEET; INCREASE ALL MDAS 60 FEET AND LNAV VISIBILITY CATS C AND D 1/8 SM.

ADDITIONAL FLIGHT DATA:

CHART 1089 POWERLINE 394004N/0854745W
CHART R-3401B
CHART R-3401A
CHART VDP AT 0.94 NM TO RW19*
*LNAV ONLY
WAAS CHANNEL #53603
REFERENCE PATH ID: W19A
CHART FAS OBST: 876 TREE 393534N/0854831W.
CHART 868 TREE 393606N/0854813W.
HOLD S, RT, 008.50 INBOUND
LTP HAE: 210.7 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	1095	1	292	1095	1	292	1095	1	292	1095	1	292			
LNAV/VNAV DA	1142	1 1/4	339	1142	1 1/4	339	1142	1 1/4	339	1142	1 1/4	339			
LNAV MDA	1140	1	337	1140	1	337	1140	1	337	1140	1	337			
CIRCLING	1200	1	397	1260	1	457	1320	1 1/2	517	1480	2 1/4	677			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
SHELBYVILLE MUNI	KGEZ	RNAV (GPS) RWY 19	1C	SHELBYVILLE	IN

CHANGES - REASONS

- 1. DELETED TERMINAL ROUTE CUPJU TO OPVAF - DECOMMISSIONING OF RID VORTAC.
- 2. PROFILE VIEW, LINE 2, ADDED MAX HOLDING ALTITUDE - CURRENT DOCUMENTATION POLICY.
- 3. PROFILE VIEW, LINE 6, ADDED GP ALT AT LISTE 2500 - CURRENT DOCUMENTATION POLICY.
- 4. PROFILE VIEW, LINE 7, ADDED 20:1 IS CLEAR - CURRENT DOCUMENTATION POLICY.
- 5. REPLACED "DME/DME RNP-0.3 NA" NOTE WITH PBN EQUIPMENT REQUIREMENTS NOTE - CURRENT DOCUMENTATION POLICY.
- 6. CHANGED HIGH TEMPERATURE LIMIT FOR BARO-VNAV FROM 47 TO 54 DEG C - RECALCULATION.
- 7. REMOVED FAHRENHEIT VALUES FROM BARO-VNAV TEMPERATURE NOTE - CURRENT DOCUMENTATION POLICY.
- 8. UPDATED BACKUP ALTIMETER NOTE - RECALCULATION.



<u>AIRPORT</u> SHELBYVILLE MUNI	<u>AIRPORT ID</u> KGEZ	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 19	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> SHELBYVILLE	<u>STATE</u> IN
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, IND APP CON, AMGR					
<u>FLIGHT CHECKED BY</u>			<i>Digitally signed by</i> <u>OFFICE</u>	<u>DATE</u>	
FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.			DEZ SILAGYI Jun 19, 2018		
<u>DEVELOPED BY</u>	<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>		
RUSS ROSLEWSKI	RUSSELL ROSLEWSKI Jun 15, 2018	AJV-5421	05/02/2018		
<u>APPROVED BY</u>	<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>		
JULIE MORGAN	DEZ SILAGYI Jun 19, 2018	AJV-5420	<u>TITLE</u> MANAGER		



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KGEZ
RUNWAY	RW19
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W19A
LTP/FTP LATITUDE	393535.7660N
LTP/FTP LONGITUDE	0854811.7750W
LTP/FTP ELLIPSOIDAL HEIGHT	+02107
FPAP LATITUDE	393406.8700N
FPAP LONGITUDE	0854820.8600W
THRESHOLD CROSSING HEIGHT (TCH)	00045.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1224
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	C4A33804
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+02445
FPAP ORTHOMETRIC HEIGHT	+02445



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> RANDOLPH COUNTY	<u>AIRPORT ID</u> KI22	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 8	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> WINCHESTER	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 1123	<u>TDZE</u> 1121	<u>SUPERSEDED</u> RNAV (GPS) RWY 8	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 11/10/2016	<u>MAG VAR</u> 5W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2010

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 352/30 CW 172/30	NOPT	OYCEG	IF/IAF	3000
2. 172/30 CW 352/30		OYCEG	IAF	3000

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>
OYCEG	IF/IAF	WUBEK		TF	FB	1.00	082.09	7.67	2800
WUBEK	FAF	HURIB/2.10 NM TO RW08		TF	FB	0.30	082.20	3.05	
HURIB/2.10 NM TO RW08		RW08	MAP	TF	FO	0.30	082.20	2.10	
RW08	MAP	1430 MSL		CA			082.20		
1430 MSL		MOSEW		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW08

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT MOSEW AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD W OYCEG, RT, 082.09 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 082.20FAF: WUBEKDIST FAF TO MAP: 5.15DIST FAF TO THLD: 5.15
4. MIN ALT: OYCEG 3000, WUBEK 2800, HURIB/2.10 NM TO RW08 1820*
5. DIST TO THLD FROM OM:MM:IM:150 HAT:309 HAT: 0.84
6. MIN GP INCPT: 2800GP ALT AT FAF : WUBEK 2800OM:MM:IM:
7. GP ANGLE: 3.0034:1: IS CLEAR20:1: IS CLEARTCH: 45.0
8. MSA FROM: RW08 2900

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: BARO-VNAV NA.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
*LNAV ONLY

ADDITIONAL FLIGHT DATA:

CHART VERSAILLES AWOS-3
CHART: 1581 WINDMILL 401008N/0850232W.
CHART CIRCLING ICON.
WAAS CHANNEL #90420
REFERENCE PATH ID: W08A
CHART FAS OBST: 1219 TREE 400927N/0845740W.
HOLD E, RT, 262.45 INBOUND
LTP HAE: 306.6 M

MINIMUMS:

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

ALTERNATE: NA ☒

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	1430	7/8	309	1430	7/8	309	1430	7/8	309		NA				
LNAV/VNAV DA	1430	7/8	309	1430	7/8	309	1430	7/8	309		NA				
LNAV MDA	1560	1	439	1560	1	439	1560	1 1/4	439		NA				
CIRCLING	1620	1	497	1620	1	497	1820	2	697		NA				



CHANGES - REASONS

- 1. REMOVED ALL REFERENCE TO THE RID AND MIE VOR FACILITIES. - BOTH VOR'S ARE ON THE VOR MON DISCONTINUANCE LIST.
- 2. CREATED TAA. - WITH THE DELETION OF ALL INITIALS AND FEEDER ROUTES A TAA WAS NECESSARY.
- 3. REMOVED ALL AIRWAY PROCEDURE NA NOTES. - NO LONGER NEEDED WITH THE REMOVAL OF THE VOR NAVAIDS.
- 4. ADDED CHART CIRCLING ICON. - NEW CIRCLING CRITERIA IS APPLIED.
- 5. DELETED "DME/DME RNP - 0.3 NA" - REPLACED WITH PBN EQUIPMENT REQUIREMENTS NOTE "RNP APCH".
- 6. DELETED "CHART NOTE: NIGHT LANDING: CAT C, RWY 8 NA" - NO VISUAL SURFACE PENETRATIONS EXIST.
- 7. CHANGED LINE 7 FROM "34:1 IS NOT CLEAR" TO "34:1 IS CLEAR" AND ADDED "20:1 IS CLEAR" - NO VISUAL SURFACE PENTRATIONS EXIST.
- 8. LOWERED LPV AND LNAV/VNAV VISIBILITY FROM 1SM TO 7/8 SM - VISI CALCULATOR.
- 9. DELETED BACKUP ALTIMETER NOTE - DOCUMENTED ON -9 AS A CONTINGENCY NOTE.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: COLUMBUS APP CON, ZID, AMGR

FLIGHT CHECKED BY

SCOTT WIEBE
ADOLFO D URRUTIA

DEVELOPED BY

ADOLFO URRUTIA (BRETT E. CANNON)
ADOLFO D URRUTIA

APPROVED BY

PATRICK MULQUEEN
ADOLFO D URRUTIA

OFFICE

FICO

OFFICE

AJV-5432

OFFICE

AJV-5430

DATE

5/17/18

DATE

03/14/2018

DATE

TITLE

MANAGER



**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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.

If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> RANDOLPH COUNTY	<u>AIRPORT ID</u> KI22	<u>PROCEDURE NAME</u> VOR-A	<u>ORIGINAL/AMENDMENT</u> 10	<u>CITY</u> WINCHESTER	<u>STATE</u> IN
<u>AIRPORT ELEVATION</u> 1123	<u>TDZE</u>	<u>SUPERSEDED</u> VOR-A	<u>ORIGINAL/AMENDMENT</u> 9	<u>DATED</u> 03/10/2011	<u>MAG VAR</u> 5W
<u>FACILITY</u> DQN	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2010

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>
DQN VOR/DME		INCUR/DQN 10.00 DME					291.47	10.00	2700
INCUR/DQN 10.00 DME	IAF	TOKAY/DQN 14.90 DME					291.47	4.90 (DQN R-291)	2700
TOKAY/DQN 14.90 DME	IF	BICEN/DQN 21.00 DME					291.47	6.10 (DQN R-291)	2700

MISSED APPROACH

MAP:

MARSP/DQN 25.84 DME

MISSED APPROACH INSTRUCTIONS:

CLIMBING RIGHT TURN TO 2700 ON DQN VOR/DME R-291 TO BICEN/21.00 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. PROFILE STARTS AT TOKAY/DQN 14.90 DME
3. **FAC:** 291.47 **FAF:** BICEN/DQN 21.00 DME **DIST FAF TO MAP:** **DIST FAF TO THLD:**
4. **MIN ALT:** TOKAY/DQN 14.90 DME 2700, BICEN/DQN 21.00 DME 2700
8. **MSA FROM:** DQN VOR/DME 3100

EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED.

NOTES:

CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON DQN VOR/DME AIRWAY RADIALS 234 CW 329.



ADDITIONAL FLIGHT DATA:

CHART VERSAILLES AWOS-3
FAC CROSSES MIDPOINT OF RWY 8-26.
CHART CIRCLING ICON.
FAS OBST: 1379 AAO 400716N/0845240W.
HOLD E, RT, 291.47 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☒

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
CIRCLING	1700	1	577	1700	1	577	1820	2	697		NA				

CHANGES - REASONS

1. REMOVED ALL REFERENCE TO THE RID AND MIE VOR FACILITIES - BOTH VOR'S ARE ON THE VOR MON DISCONTINUANCE LIST.
2. REMOVED PROCEDURE TURN - NO LONGER REQUIRED WITH THE REMOVAL OF THE MIE VOR/DME FEEDER ROUTE.
3. ADDED EQUIPMENT REQUIREMENT NOTES: DME REQUIRED - REMOVAL OF RID AND MIE VOR FACILITIES MAKE THE PROCEDURE DME REQUIRED.
4. ADDED CHART CIRCLING ICON. - NEW CIRCLING CRITERIA APPLIED.
5. CIRCLING CAT B/C VISIBILITY FROM 1 1/4 AND 1 1/2 TO 1 AND 2. - PER AFS APPROVED VISIBILITY CALCULATOR.
6. PROFILE VIEW LINE 4 CHANGED FROM MIN. ALT BICEN 2700 TO TOKAY 2700, BICEN 2700. - FAA ORDER 8260.19H 8-6-7 D.
7. MISSED APPROACH CHANGED FROM CLIMBING RIGHT TURN TO 2700 VIA DQN VOR/DME R-291 TO BICEN INT/21 DME AND HOLD TO CLIMBING RIGHT TURN TO 2700 ON DQN VOR/DME R-291 TO BICEN/21 DME AND HOLD. - FAA ORDER 8260.19H 8-6-6.
8. DELETED TIME/DISTANCE TABLE - DME REQUIRED TO FLY PROCEDURE.
9. DELETED BACKUP ALTIMETER NOTE - DOCUMENTED ON -9 AS A CONTINGENCY NOTE.
10. ADDED: "CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON DQN VOR/DME AIRWAY RADIALS 234 CW 329" - TURNS EXCEED 120 DEGREES.
11. RAISED CIRCLING CAT C MDA FROM 1700 TO 1820 - NEW VISI TABLE.

05/25/18: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 03/07/18.

1. CHANGED #11. IN CHANGES AND REASONS FROM 1800 TO 1820.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: DAY APP CON, ZID, AMGR

FLIGHT CHECKED BY
SCOTT WIEBE
Digitally signed by
ADOLFO D URRUTIA
May 25, 2018

OFFICE
FICO
DATE
5/17/18

DEVELOPED BY
ADOLFO URRUTIA (BRETT E. CANNON)
Digitally signed by
ADOLFO D URRUTIA
May 25, 2018

OFFICE
AJV-5432
DATE
03/07/2018

APPROVED BY
PATRICK MULQUEEN
Digitally signed by
ADOLFO D URRUTIA
May 25, 2018

OFFICE
AJV-5430
DATE
TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> WELLINGTON MUNI	<u>AIRPORT ID</u> KEGT	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> WELLINGTON	<u>STATE</u> KS
<u>AIRPORT ELEVATION</u> 1277	<u>TDZE</u> 1277	<u>SUPERSEDED</u> RNAV (GPS) RWY 17	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 10/25/2007	<u>MAG VAR</u> 3E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 086/30 CW 266/30	NOPT	086/14 CW 266/14		3600
1. 086/14 CW 266/14		TANUC	IF/IAF	3000
2. 266/30 CW 356/30		266/13 CW 356/13		3600
2. 266/13 CW 356/13		JUMUG	IAF	3000
3. 356/30 CW 086/30		356/15 CW 086/15		3200
3. 356/15 CW 086/15		PIYIS	IAF	3000

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>
JUMUG	IAF	TANUC	NOPT	TF	FB	1.00	266.53	8.00	3000
PIYIS	IAF	TANUC	NOPT	TF	FB	1.00	086.32	8.00	3000
TANUC	IF/IAF	HUMUN		TF	FB	1.00	176.42	6.00	3000
HUMUN	FAF	UDEYE/1.80 NM TO RW18		TF	FB	0.30	176.43	3.48	
UDEYE/1.80 NM TO RW18		RW18	MAP	TF	FO	0.30	176.43	1.80	
RW18	MAP	1477 MSL		CA			176.43		
1477 MSL		GOTPE		DF	FO	1.00			3000



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW18

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT GOTPE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF	(IAF)
2.	HOLD N TANUC, RT, 176.42 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.				
3. FAC:	176.43	FAF: HUMUN	DIST FAF TO MAP: 5.28	DIST FAF TO THLD: 5.28	
4. MIN ALT:	TANUC 3000, HUMUN 3000, UDEYE/1.80 NM TO RW18 1880*				
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	200 HAT: 0.50	GS ANT:
6. MIN GP INCPT: 3000	GP ALT AT FAF : HUMUN 3000			OM:	MM: IM:
7. GP ANGLE: 3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 40.0		
8. MSA FROM:					

PBN REQUIREMENTS NOTE:

RNP APCH

NOTES:

CHART NOTE: BARO-VNAV AND VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -17C OR ABOVE 54C.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING: INCREASE LPV DA TO 1531 FEET; INCREASE LNAV/VNAV DA TO 1776 FEET; INCREASE ALL MDA 60 FEET AND LNAV CAT C/D VISIBILITY 1/8 SM AND CIRCLING CAT C/D VISIBILITY 1/4 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.2 NM TO RW18*
*LNAV ONLY
WAAS CHANNEL #93804
REFERENCE PATH ID: W18A
CHART FAS OBST: 1436 TANK 372110N/0972305W.
CHART: 1559 TOWER 372200N/0972413W.
HOLD S, RT, 356.43 INBOUND
LTP HAE: 360.5 M

MINIMUMS:

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

ALTERNATE: NA ☒



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	1477	3/4	200	1477	3/4	200	1477	3/4	200	1477	3/4	200			
LNAV/VNAV DA	1722	1 3/8	445	1722	1 3/8	445	1722	1 3/8	445	1722	1 3/8	445			
LNAV MDA	1700	1	423	1700	1	423	1700	1 1/4	423	1700	1 1/4	423			
CIRCLING	1760	1	483	1760	1	483	2040	2 1/4	763	2140	2 3/4	863			

CHANGES - REASONS

1. KEGT MAGVAR UPDATED FROM 7E/1990 TO 3E/2020: ALL COURSES INCREASED 4 DEGREES ACCORDINGLY - TO BRING MV WITHIN TOLERANCE
2. ALL REFERENCES TO RWY 17 CHANGED TO RWY 18 - NEW RWY NUMBERING DUE TO MV CHANGE FROM 7E TO 3E
3. JUMUG-TANUC COURSE/DISTANCE CHANGED FROM 262.49/5NM TO 266.53/8NM - INITIALLY LENGTHENED FOR TURNING OEA CONSTRUCTION, 8NM LENGTH CHOSEN AT ATC/FPT REQUEST.
4. PIYIS-TANUC COURSE/DISTANCE CHANGED FROM 082.37/5NM TO 086.32/8NM - INITIALLY LENGTHENED FOR TURNING OEA CONSTRUCTION, 8NM LENGTH CHOSEN AT ATC/FPT REQUEST.
5. VDP CHANGED FROM 1.32 NM TO 1.20 NM (TO RW18) - BASED ON NEW 1700 FT LNAV MDA
6. ADDED RW18-1477 MSL CA LEG (MA INSTRUCTIONS UNCHANGED) - RNAV ENGAGEMENT ALTITUDE/CODING REQUIREMENT
7. DIST FAF TO MAP/THLD CHANGED FROM 5.21 TO 5.28 - NEW PFAF CALCULATION CRITERIA FOR 3.00 DEGREE GP.
8. LINE 7, ADDED '20:1 IS CLEAR' - 20:1 SURFACE WAS PREVIOUSLY CLEAR, ADDED TO 8260-3 IAW 8260.19H.
9. LINE 2, HOLD IN LIEU INBOUND COURSE CHANGED FROM 172.43 TO 176.42 - IF/IAF MOVED NORTH DUE TO 1000FT RWY EXTENSION, COURSE CHANGED .01 DEGREE DUE TO EARTH CURVATURE.
10. CHART FAS OBST CHANGED FROM '1459 TREE 372110N/0972305W' TO '1436 TANK 372110N/0972305W' - NEW SURVEY/BUILD DATA
11. ADDNL FLT DATA: REMOVED 'CHART FAS OBST: 1449 TREE 372059N/0972251W' - NO LONGER FINAL NON-PRECISION CONTROLLING OBSTACLE
12. ADDED 'CHART CIRCLING ICON' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION.
13. ADDNL FLT DATA: ADDED 'LTP HAE: 360.5 M' - ALL FAS DATA UPDATED (NEW LTP, FPAP, ETC.)
14. LPV DH/VIS/HAT (ALL CATS) LOWERED FROM '1527/1SM/250' TO '1477 / 3/4 SM / 200' - NPI RWY MARKINGS NOW ALLOW FOR 200FT HAT PER LATEST CRITERIA INTERPRETATION, LPV OCS IS ASC (FPT APPROVED)
15. LNAV/VNAV DH/VIS/HAT LOWERED (ALL CATS) FROM '1763/ 1 3/4SM / 486' TO '1722 / 1 3/8SM / 445' - NEW SURVEY/BUILD DATA BASED ON 1000 FT RWY EXTENSION TO THE NORTH, FPT REQUESTED LOWERING
16. LNAV MDA/HAT LOWERED (ALL CATS) FROM 1720 / 443 TO 1700 / 423 - NEW SURVEY/BUILD DATA BASED ON 1000 FT RWY EXTENSION TO THE NORTH, FPT REQUESTED LOWERING
17. LNAV VIS CAT D LOWERED FROM 1 1/2 TO 1 1/4 - MDA/HAT LOWERED 20FT, VISICHECK TOOL CONFIRMED
18. CIRCLING CAT C MDA/VIS/HAA RAISED FROM '1760/ 1 1/2SM / 483' TO '2040/ 2 1/4SM / 763' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION AND PICKED UP HIGHER CONTROLLING OBSTACLE
19. CIRCLING CAT D MDA/VIS/HAA RAISED FROM '1840/ 2SM / 563' TO '2140/ 2 3/4SM / 863' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION AND PICKED UP HIGHER CONTROLLING OBSTACLE
20. COMBINED NOTES 'BARO-VNAV NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' AND 'VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' INTO 'BARO-VNAV AND VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' - NOTE COMBINATION ALLOWABLE PER 8260.19H
21. CHANGED UNCOMPENSATED BARO-VNAV SYSTEMS NOTE FROM 'LNAV/VNAV NA BELOW -17C (2F) OR ABOVE 46C (114F)' TO 'LNAV/VNAV NA BELOW -17C OR ABOVE 54C' - FAHRENHEIT REMOVED IN 8260.19H, 54C NEW HIGH TEMP PER AFS TEMP LIMIT CALC.
22. ADDED 'PBN REQUIREMENTS NOTE: RNP APCH' - IAW 8260.19H NEW 8260-3 FORMS.
23. IN 'LOCAL ALTIMETER SETTING NOT RECEIVED' NOTE, ADDED 'INCREASE LPV DA TO 1531 FEET; INCREASE LNAV/VNAV DA TO 1776 FEET; INCREASE ALL MDA 60 FEET AND LNAV CAT C/D VISIBILITY 1/8 SM AND CIRCLING CAT C/D VISIBILITY 1/4 SM' - NEW MINS/VISIBILITIES AND NEW VISICHECK CALCULATION.
24. TAA: STRAIGHT-IN AREA OUTER SEGMENT (FROM 086/30 CW 266/30 TO 086/14 CW 266/14) ALTITUDE RAISED FROM 3500 TO 3600 - HIGHER CONTROLLING OBSTACLE PER BUILD DATA.
25. PROFILE LINE 5, DIST TO THLD CHANGED FROM '250 HAT: 0.66' TO '200 HAT: 0.50' - HAT LOWERED B/C LPV OCS IS ASC (FPT APPROVED)
26. TAA: LEFT BASE INNER SEGMENT RADIUS REDUCED FROM 15NM TO 13NM - DISTANCES GREATER THAN 13NM PICK UP HIGHER OBSTACLES AND REQUIRE MORE THAN A 3000FT ALTITUDE.
27. UPDATED FAS DATA: LTP FROM 371945.8035N/0972318.2790W TO 371955.6905N/0972318.4035W, ELLIPSOIDAL HEIGHT FROM 03604 TO 03605, FPAP FROM 371826.4860N/0972317.1700W TO 372033.4830N/0972317.2850W, LENGTH OFFSET FROM 1472 TO 1168, VAL FROM 50 TO 35, CRC REMAINDER FROM A578262D TO FDD104A0, ORTHO HEIGHTS FROM 3891 TO 3892 - UPDATED AIRNAV DATA PER NEW SURVEY, RWY EXTENDED TO THE NORTH 1000FT.

<u>AIRPORT</u> WELLINGTON MUNI	<u>AIRPORT ID</u> KEGT	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> WELLINGTON	<u>STATE</u> KS
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZKC, ICT APP CON, AMGR, STATE AERO					
<u>FLIGHT CHECKED BY</u> PENDING		<u>OFFICE</u>	<u>DATE</u>	Digitally signed by ROBERT G HAMILTON Jun 19, 2018	
<u>DEVELOPED BY</u> LUCAS MCCLOUD		Digitally signed by LUCAS MCCLOUD Jun 14, 2018	<u>OFFICE</u> AJV-5422	<u>DATE</u> 05/02/2018	Digitally signed by ROBERT G HAMILTON Jun 19, 2018
<u>APPROVED BY</u> JULIE MORGAN		<u>OFFICE</u> AJV-5420	<u>DATE</u>	Digitally signed by ROBERT G HAMILTON Jun 19, 2018	<u>TITLE</u> MANAGER



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> WELLINGTON MUNI	<u>AIRPORT ID</u> KEGT	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> WELLINGTON	<u>STATE</u> KS
<u>AIRPORT ELEVATION</u> 1277	<u>TDZE</u> 1277	<u>SUPERSEDED</u> RNAV (GPS) RWY 35	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 12/07/2017	<u>MAG VAR</u> 3E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2020

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 266/30 CW 086/30	NOPT	GOTPE	IF/IAF	3000
2. 086/30 CW 176/30		086/15 CW 176/15		3200
2. 086/15 CW 176/15		OPUPE	IAF	3000
3. 176/30 CW 266/30		176/15 CW 266/15		3600
3. 176/15 CW 266/15		ZEBUT	IAF	3000

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>
OPUPE	IAF	GOTPE	NOPT	TF	FB	1.00	086.33	8.00	3000
ZEBUT	IAF	GOTPE	NOPT	TF	FB	1.00	266.53	8.00	3000
GOTPE	IF/IAF	FORVU		TF	FB	1.00	356.43	6.00	3000
FORVU	FAF	LIYIT/2.00 NM TO RW36		TF	FB	0.30	356.43	3.30	
LIYIT/2.00 NM TO RW36		RW36	MAP	TF	FO	0.30	356.43	2.00	
RW36	MAP	1527 MSL		CA			356.43		
1527 MSL		TANUC		DF	FO	1.00			3000



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW36

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT TANUC AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)				
2.	HOLD S GOTPE, RT, 356.43 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.							
3. FAC:	356.43	FAF: FORVU	DIST FAF TO MAP: 5.30	DIST FAF TO THLD: 5.30				
4. MIN ALT:	GOTPE 3000, FORVU 3000, LIYIT/2.00 NM TO RW36 1940*							
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	250 HAT: 0.68	GS ANT:			
6. MIN GP INCPT: 3000	GP ALT AT FAF : FORVU 3000			OM:	MM:	IM:		
7. GP ANGLE: 3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 40.0					
8. MSA FROM:								

PBN REQUIREMENTS NOTE:

RNP APCH

NOTES:

CHART NOTE: BARO-VNAV AND VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -17C OR ABOVE 54C.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING: INCREASE LPV DA TO 1581 FEET AND ALL VISIBILITIES 1/8 SM; INCREASE LNAV/VNAV DA TO 1674 FEET AND ALL VISIBILITIES 1/8 SM; INCREASE ALL MDA 60 FEET AND CIRCLING CAT C/D VISIBILITY 1/4 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.28 NM TO RW36*
*LNAV ONLY
WAAS CHANNEL #70504
REFERENCE PATH ID: W36A
CHART FAS OBST: 1453 TANK 371820N/0972341W.
HOLD N, RT, 176.42 INBOUND
LTP HAE: 358.7 M

MINIMUMS:

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

ALTERNATE: NA ☒



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	1527	3/4	250	1527	3/4	250	1527	3/4	250	1527	3/4	250			
LNAV/VNAV DA	1614	1	337	1614	1	337	1614	1	337	1614	1	337			
LNAV MDA	1720	1	443	1720	1	443	1720	1 3/8	443	1720	1 3/8	443			
CIRCLING	1760	1	483	1760	1	483	2040	2 1/4	763	2140	2 3/4	863			

CHANGES - REASONS

1. INCORPORATED CHANGES FROM P-NOTAM FOR AMDT 1A - SIAP UPDATED TO MATCH EXISTING PUBLISHED IAP
2. KEGT MAGVAR UPDATED FROM 7E/1990 TO 3E/2020: ALL COURSES INCREASED 4 DEGREES ACCORDINGLY - TO BRING MV WITHIN TOLERANCE
3. ALL REFERENCES TO RWY 35 CHANGED TO RWY 36 - NEW RWY NUMBERING DUE TO MV CHANGE FROM 7E TO 3E
4. OPUPE-GOTPE COURSE/DISTANCE CHANGED FROM 082.37/5NM TO 086.33/8NM - INITIALLY LENGTHENED FOR TURNING OEA CONSTRUCTION, 8NM LENGTH CHOSEN AT ATC/FPT REQUEST.
5. ZEBUT-GOTPE COURSE/DISTANCE CHANGED FROM 262.49/5NM TO 266.53/8NM - INITIALLY LENGTHENED FOR TURNING OEA CONSTRUCTION, 8NM LENGTH CHOSEN AT ATC/FPT REQUEST.
6. LIYIT CHANGED FROM '1.9NM TO RW35 1920' TO '2.0NM TO RW36 1940' - 1920 AT 1.9NM DID NOT MEET VAA REQUIREMENT, HAD TO MOVE BACK .1NM AND RAISE TO 1940 FOR DG.
7. ADDED RW36-1527 MSL CA LEG (MA INSTRUCTIONS UNCHANGED) - RNAV ENGAGEMENT ALTITUDE/CODING REQUIREMENT
8. DIST FAF TO MAP/THLD CHANGED FROM 5.22 TO 5.30 - NEW PFAF CALCULATION CRITERIA FOR 3.00 DEGREE GP.
9. CHANGED '34:1 IS NOT CLEAR' TO '20:1 IS CLEAR' AND '34:1 IS CLEAR' - NEW SURVEY, CAT A/B AREAS CLEAR PER BUILD RESULTS.
10. MA HOLD INBOUND COURSE CHANGED FROM 172.43 TO 176.42 - HOLDING FIX (ALSO THE RW18 IF) MOVED NORTH DUE TO 1000FT RWY EXTENSION, COURSE CHANGED .01 DEGREE DUE TO EARTH CURVATURE.
11. CHART FAS OBST CHANGED FROM '1389 TREE 371847N/0972331W' TO '1453 TANK 371820N/0972341W' - NEW SURVEY/BUILD DATA
12. REMOVED 'CHART 1615 TOWER 371503N/0972347W' - NO LONGER FINAL NON-PRECISION CONTROLLING OBSTACLE
13. ADDED 'CHART CIRCLING ICON' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION.
14. ADDNL FLT DATA: ADDED 'LTP HAE: 358.7 M' - ALL FAS DATA UPDATED (NEW LTP, FPAP, ETC.)
15. LPV VIS ALL CATS LOWERED FROM 1SM TO 3/4 SM - NEW VISIBILITY CRITERIA/TABLES, VISICHECK TOOL CONFIRMED
16. LNAV/VNAV DH/VIS/HAT LOWERED (ALL CATS) FROM '1659/ 1 1/2SM / 382' TO '1614 / 1SM / 337' - NEW SURVEY/BUILD DATA, FPT REQUESTED LOWERING
17. CIRCLING CAT C MDA/VIS/HAA RAISED FROM '1760/ 1 1/2SM / 483' TO '2040/ 2 1/4SM / 763' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION AND PICKED UP HIGHER CONTROLLING OBSTACLE
18. CIRCLING CAT D MDA/VIS/HAA RAISED FROM '1840/ 2SM / 563' TO '2140/ 2 3/4SM / 863' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION AND PICKED UP HIGHER CONTROLLING OBSTACLE
19. COMBINED NOTES 'BARO-VNAV NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' AND 'VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' INTO 'BARO-VNAV AND VDP NA WHEN USING WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING' - NOTE COMBINATION ALLOWABLE PER 8260.19H
20. CHANGED UNCOMPENSATED BARO-VNAV SYSTEMS NOTE FROM 'LNAV/VNAV NA BELOW -17C (2F) OR ABOVE 46C (114F)' TO 'LNAV/VNAV NA BELOW -17C OR ABOVE 54C' - FAHRENHEIT REMOVED IN 8260.19H, 54C NEW HIGH TEMP PER AFS TEMP LIMIT CALC.
21. REPLACED 'CHART NOTE: DME/DME RNP-0.3 NA' WITH 'PBN EQUIPMENT REQUIREMENTS NOTE: RNP APCH' - 8260.19H NEW 8260-3 FORMS.
22. IN 'LOCAL ALTIMETER SETTING NOT RECEIVED' NOTE, ADDED 'INCREASE LPV DA TO 1581 FEET AND ALL VISIBILITIES 1/8 SM; INCREASE LNAV/VNAV DA TO 1674 FEET AND ALL VISIBILITIES 1/8 SM; INCREASE ALL MDA 60 FEET AND CIRCLING CATS C/D VISIBILITY 1/4 SM' - NEW MINS/VISIBILITIES AND NEW VISICHECK CALCULATION.
23. TAA: FROM 086/30 CW 176/30 TO 086/15 CW 176/15 ALTITUDE RAISED FROM 3100 TO 3200 - HIGHER CONTROLLING OBSTACLE PER BUILD DATA.
24. UPDATED FAS DATA: LTP FROM '371904.2785N/0972317. 7590W' TO '371904.2780N/0972317.7590W', ELLIPSOIDAL HEIGHT FROM 03588 TO 03587, FPAP FROM 372033.4800N/0972318.8700W TO 372033.4830N/0972318.8785W, LENGTH OFFSET FROM 1472 TO 1168, CRC REMAINDER FROM FB112F61 TO BB81AB04 - UPDATED AIRNAV DATA PER NEW SURVEY, RWY EXTENDED TO THE NORTH 1000FT.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZKC, ICT APP CON, AMGR, STATE AERO

FLIGHT CHECKED BY

PENDING

OFFICE

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

DEVELOPED BY

LUCAS MCCLOUD

Digitally signed by
LUCAS MCCLOUD
Jun 14, 2018

OFFICE

AJV-5422

DATE

04/30/2018

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

APPROVED BY

JULIE MORGAN

OFFICE

AJV-5420

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KEGT
RUNWAY	RW36
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W36A
LTP/FTP LATITUDE	371904.2780N
LTP/FTP LONGITUDE	0972317.7590W
LTP/FTP ELLIPSOIDAL HEIGHT	+03587
FPAP LATITUDE	372033.4830N
FPAP LONGITUDE	0972318.8785W
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	1168
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	BB81AB04
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K3
LTP ORTHOMETRIC HEIGHT	+03874
FPAP ORTHOMETRIC HEIGHT	+03874



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
WELLINGTON, KS	WELLINGTON MUNI	09/13/2018	1

TAKEOFF MINIMUMS:
RWY 18, 36: STANDARD.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:
NOTE: RWY 18: LIGHTING 10 FT FROM DER, 31 FT LEFT OF CENTERLINE, 1 FT AGL/1272 FT MSL.
TERRAIN 79 FT FROM DER, 477 FT RIGHT OF CENTERLINE, 1274 FT MSL.
TERRAIN 104 FT FROM DER, 488 FT RIGHT OF CENTERLINE, 1275 FT MSL.

NOTE: RWY 36: ROAD 296 FT FROM DER, 340 FT LEFT OF CENTERLINE, 1288 FT MSL.

CONTROLLING OBSTACLES:

REMARKS:

<u>FLIGHT INSPECTED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
PENDING	Jun 19, 2018		
<u>DEVELOPED BY:</u>	<i>Digitally signed by</i> LUCAS MCCLOUD	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
LUCAS MCCLOUD	Jun 13, 2018	AJV-5422	05/04/2018
<u>APPROVED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
JULIE MORGAN	Jun 19, 2018	AJV-5420	

REQUIRED EFFECTIVE DATE:
09/13/2018

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☐	☐	☒

OTHER:
ZKC, ICT APP CON, AMGR, STATE AERO

CHANGES - REASONS:
1. RWYS 17 AND 35 CHANGED TO 18 AND 36 - KEGT MAGVAR UPDATED FROM 7E TO 3E (2020 VALUE).
2. UPDATED RWY 18 AND ADDED RWY 36 TAKEOFF OBSTACLE NOTES - NEW SURVEYS AND RWY EXTENDED 1000 FT TO THE NORTH.

QUALITY
6
CHECKED

**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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.

If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> WELLINGTON MUNI	<u>AIRPORT ID</u> KEGT	<u>PROCEDURE NAME</u> VOR RWY 18	<u>ORIGINAL/AMENDMENT</u> 3	<u>CITY</u> WELLINGTON	<u>STATE</u> KS
<u>AIRPORT ELEVATION</u> 1277	<u>TDZE</u> 1277	<u>SUPERSEDED</u> VOR RWY 17	<u>ORIGINAL/AMENDMENT</u> 2B	<u>DATED</u> 12/07/2017	<u>MAG VAR</u> 7E
<u>FACILITY</u> ICT	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 1985

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>
ICT VORTAC	IAF	VECUD/16.00 DME					152.30	16.00	3100
KUDPY/16.00 DME CW	IAF	VECUD/16.00 DME					16.00 DME ARC		3100
KUHCU/16.00 DME CCW	IAF	VECUD/16.00 DME					16.00 DME ARC		3100
VECUD/16.00 DME	IF	KOPNE/20.00 DME					152.30	4.00 (ICT R-152)	2900
KOPNE/20.00 DME		WELIN/22.00 DME					152.30	2.00 (ICT R-152)	2800

MISSED APPROACH

MAP:

ICT 26.46 DME

MISSED APPROACH INSTRUCTIONS:

CLIMBING RIGHT TURN TO 3300 ON HEADING 290 AND HUT VOR/DME R-149 TO REKOC/HUT 36.00 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
2. PROFILE STARTS AT ICT VORTAC
3. FAC: 152.30 FAF: WELIN/22.00 DME DIST FAF TO MAP: DIST FAF TO THLD: 4.46
4. MIN ALT: ICT VORTAC 3600, VECUD/16.00 DME 3100, KOPNE/20.00 DME 2900, WELIN/22.00 DME 2800
8. MSA FROM: ICT VORTAC 360-270 3600, 270-360 4000 (28NM)

EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED.

NOTES:

CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON ICT VORTAC AIRWAY RADIALS 130 CW 212.



CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
WELIN TO RW18: 3.13/40.
CHART ICT R-057 AT KUDPY.
CHART ICT R-249 AT KUHCU.
CHART FAS OBST: 1639 TOWER 372326N/0972714W.
HOLD NW, RT, 149.47 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☒

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
S-18	2100	1	823	2100	1 1/4	823	2100	2 1/2	823	2100	2 1/2	823			
CIRCLING	2100	1 1/4	823	2100	1 1/4	823	2100	2 1/2	823	2180	3	903			

CHANGES - REASONS

- ALL REFERENCES TO RWY 17 CHANGED TO RWY 18 - NEW RWY NUMBERING DUE TO KEGT MV CHANGE FROM 7E TO 3E
- COURSE FROM ICT VORTAC TO KEGT RW18 THLD SHIFTED FROM 152.42 TO 152.30 - KEGT RW18 EXTENDED 1000 FT TO THE NORTH, COURSE REALIGNED TO INTERSECT THE NEW LTP PER 8260.3C 5-2-4.
- DIST FAF TO THLD CHANGED FROM 4.61 TO 4.46 - FAF WELIN REMAINS AT 22.00 DME PER FPT/ATC REQUEST EVEN THOUGH RW18 EXTENDED 1000 FT TO THE NORTH, SHORTENING LENGTH OF FINAL
- MAP CHANGED FROM '4.61 NM AFTER WELIN OR AT ICT 26.61 DME' TO 'ICT 26.46 DME' - RW18 EXTENDED 1000 FT TO THE NORTH, TIMING NOT APPLICABLE SINCE DME IS REQUIRED.
- CHART FAS OBST CHANGED FROM '1559 TOWER 372200N/0972413W' TO '1639 TOWER 372326N/0972714W' - NEW FINAL CONTROLLER GIVEN NEW COURSE, SURVEY, AND BUILD DATA.
- DESCENT ANGLE/TCH CHANGED FROM 3.03/40 TO 3.13/40 - FAF STILL AT 22.00 DME EVEN THOUGH RW18 EXTENDED 1000 FT TO THE NORTH.
- ADDED 'CHART CIRCLING ICON' - CIRCLING RADII EXPANDED IAW 8260.3C NEW CIRCLING CALCULATION.
- REMOVED 'WICHITA DWIGHT D EISENHOWER NATIONAL ALTIMETER SETTING MINIMUMS' LINES OF MINIMA - RASS INCREASE NOTE OR LINE OF MINIMA NOT REQUIRED BECAUSE RASS ADJUSTMENT IS ALREADY INCORPORATED.
- 'DME REQUIRED' CHANGED FROM 'CHART NOTE' TO 'CHART EQUIPMENT REQUIREMENTS NOTE' - NEW CHARTING REQUIREMENT PER 8260.19H
- S-18 CAT D VIS LOWERED FROM 2 3/4 TO 2 1/2 - NEW VISIBILITY CRITERIA/TABLES, VISICHECK TOOL CONFIRMED
- CIRCLING CAT A VIS RAISED FROM 1 TO 1 1/4 - NEW VISIBILITY CRITERIA/TABLES, VISICHECK TOOL CONFIRMED
- CIRCLING CAT D MDA/VIS/HAA RAISED FROM '2100 / 2 3/4SM / 823' TO '2180 / 3SM / 903' - EXPANDED CIRCLING RADII PICKS UP HIGHER CONTROLLING OBSTACLE.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZKC, ICT APP CON, AMGR, STATE AERO

FLIGHT CHECKED BY

PENDING

OFFICE

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

DEVELOPED BY

LUCAS MCCLOUD

Digitally signed by
LUCAS MCCLOUD
Jun 13, 2018

OFFICE

AJV-5422

DATE

05/02/2018

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

APPROVED BY

JULIE MORGAN

OFFICE

AJV-5420

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018
TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> SOUTH LAFOURCHE LEONARD MILLER JR	<u>AIRPORT ID</u> KGAO	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 2B	<u>CITY</u> GALLIANO	<u>STATE</u> LA
<u>AIRPORT ELEVATION</u> 0	<u>TDZE</u> 0	<u>SUPERSEDED</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 2A	<u>DATED</u> 07/21/2016	<u>MAG VAR</u> 2E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 1995

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>
HRV VORTAC		ZAPSI		TF	FB	2.00	207.22	14.70	2000
TBD VOR/DME		OYABI		TF	FB	2.00	091.73	23.67	2000
ZAPSI	IAF	HIKEN	NOPT	TF	FB	1.00	268.65	6.20	2000
OYABI	IAF	HIKEN	NOPT	TF	FB	1.00	088.53	6.20	2000
HIKEN	IF/IAF	JADUL		TF	FB	1.00	178.59	6.00	1700
JADUL	FAF	AIVER/1.60 NM TO RW18		TF	FB	0.30	178.59	3.58	
AIVER/1.60 NM TO RW18		RW18	MAP	TF	FO	0.30	178.59	1.60	
RW18	MAP	520 MSL		CA			178.59		520
520 MSL		HIKEN		DF	FO	1.00			2000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW18

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 520 THEN CLIMBING RIGHT TURN TO 2000 DIRECT HIKEN AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

QUALITY
41
CHECKED

PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD N HIKEN, RT, 178.59 INBOUND, 2000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 178.59 FAF: JADUL DIST FAF TO MAP: 5.18 DIST FAF TO THLD: 5.18

4. MIN ALT: HIKEN 2000, JADUL 1700, AIVER/1.60 NM TO RW18 560*

5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 284 HAT: 0.73 GS ANT: MM: IM:

6. MIN GP INCPT: 1700 GP ALT AT FAF : JADUL 1700 OM:

7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 51.0

8. MSA FROM: RW18 2100

PBN REQUIREMENTS NOTE:

RNP APCH

NOTES:

CHART NOTE: RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -15C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE LOUIS ARMSTRONG NEW ORLEANS INTL ALTIMETER SETTING AND INCREASE ALL DA 77 FT AND ALL MDA 80 FT AND INCREASE LPV ALL CATS VISIBILITY 1/4 MILE, LNAV/VNAV CAT A AND B VISIBILITY 1/4 MILE AND CAT C AND D VISIBILITY 1/8 MILE, LNAV CAT C AND D VISIBILITY 3/8 MILE AND CIRCLING CAT C AND D VISIBILITY 1/4 MILE.
CHART NOTE: BARO-VNAV AND VDP NA WHEN USING LOUIS ARMSTRONG NEW ORLEANS INTL ALTIMETER SETTING.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT TBD VORTAC ON V198-552 WESTBOUND.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON HRV VORTAC AIRWAY RADIALS 128 CW 254.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.07 NM TO RW18*
*LNAV ONLY
WAAS CHANNEL #61308
REFERENCE PATH ID: W18A
CHART FAS OBST: 123 POLE 292758N/0901619W.
LTP HAE: -24.7 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	319	1	319	319	1	319	319	1	319	319	1	319			
LNAV/VNAV DA	284	7/8	284	284	7/8	284	284	1	284	284	1	284			
LNAV MDA	380	1	380	380	1	380	380	1 3/4	380	380	2	380			
CIRCLING	440	1	440	560	1	560	640	1 3/4	640	640	2	640			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
SOUTH LAFOURCHE LEONARD MILLER JR	KGAO	RNAV (GPS) RWY 18	2B	GALLIANO	LA

CHANGES - REASONS

CHANGED INITIAL MISSED APPROACH CLIMB FROM CLIMB TO 400 ... TO CLIMB TO 520... - IAW 8260.58 REQUIREMENTS.
REMOVED NOTE: NIGHT LANDING: RWY 18 CAT C AND D NA. - IAW CURRENT CRITERIA AND GUIDANCE, CAT C/D AREAS ARE NO LONGER EVALUATED AND CAT A/B AREA IS CLEAR OF 20:1 PENETRATIONS.
ADDED PBN EQUIPMENT REQUIREMENT NOTE: RNP APPROACH - IAW 8260.19H
REMOVED NOTE: DME/DME RNP - 0.3 NA. - IAW 8260.19H.
REMOVED FAHRENHEIT FROM BARO-VNAV NOTE - NO LONGER REQUIRED TO BE CHARTED.
ADDED VDP AND ASSOCIATED NOTE - 20:1 VISUAL SURFACE IS CLEAR.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: MSY APP CON, AIRPORT MGR, ST AV DIR.

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

VICTOR B. NASO

Digitally signed by

VICTOR B NASO

Jun 18, 2018

APPROVED BY

MARLON ROBINSON

Digitally signed by

CASIMIR L TABAKA

Jun 21, 2018

OFFICE

Digitally signed by

CASIMIR L TABAKA

Jun 21, 2018

OFFICE

AJV-5441

OFFICE

AJV-5440

DATE

DATE

05/01/2018

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KGAO
RUNWAY	RW18
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W18A
LTP/FTP LATITUDE	292700.1475N
LTP/FTP LONGITUDE	0901539.6480W
LTP/FTP ELLIPSOIDAL HEIGHT	-00247
FPAP LATITUDE	292530.8305N
FPAP LONGITUDE	0901540.6985W
THRESHOLD CROSSING HEIGHT (TCH)	00051.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0768
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	C25B9B92

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+00000
FPAP ORTHOMETRIC HEIGHT	+00000



FEDERAL AVIATION ADMINISTRATION
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TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> PITTSFIELD MUNI	<u>AIRPORT ID</u> K2B7	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> PITTSFIELD	<u>STATE</u> ME
<u>AIRPORT ELEVATION</u> 197	<u>TDZE</u> 197	<u>SUPERSEDED</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> ORIG-C	<u>DATED</u> 09/18/2014	<u>MAG VAR</u> 17W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2010

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>
RINTH		JERED		TF	FB	2.00	271.81	6.97	3000
ANSYN		BIDGE		TF	FB	2.00	073.10	20.06	3800
JERED	IAF	OROSE	NOPT	TF	FB	1.00	274.56	7.75	2600
BIDGE	IAF	OROSE	NOPT	TF	FB	1.00	094.30	7.75	2600
OROSE	IF/IAF	KRANK		TF	FB	1.00	184.44	6.32	2100
KRANK	FAF	ETTOR/1.72 NM TO RW18		TF	FB	0.30	184.44	3.41	
ETTOR/1.72 NM TO RW18		RW18	MAP	TF	FO	0.30	184.44	1.72	
RW18	MAP	597 MSL		CA			184.44		
597 MSL		POKUE		DF	FO	1.00			2600

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW18

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2600 DIRECT POKUE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF	(IAF)
2.	HOLD N OROSE, RT, 184.44 INBOUND, 2600 FT. IN LIEU OF PT (IAF), MAX 6000.				
3. FAC:	184.44	FAF: KRANK	DIST FAF TO MAP: 5.13	DIST FAF TO THLD: 5.13	
4. MIN ALT:	OROSE 2600, KRANK 2100, ETTOR/1.72 NM TO RW18 860*				
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	413 HAT: 1.02	GS ANT:
6. MIN GP INCPT: 2100	GP ALT AT FAF : KRANK 2100			OM:	MM: IM:
7. GP ANGLE: 3.42	34:1	IS NOT CLEAR	20:1	IS CLEAR	TCH: 40.0
8. MSA FROM:	RW18 3300				

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA.
*LNAV ONLY
CHART NOTE: USE BANGOR ALTIMETER SETTING; WHEN NOT RECEIVED PROCEDURE NA.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT RINTH ON V39 NORTHEAST BOUND AND FOR ARRIVALS AT ANSYN ON V104 WESTBOUND.

ADDITIONAL FLIGHT DATA:

CHART BANGOR ASOS.
CHART CIRCLING ICON.
WAAS CHANNEL #53342
REFERENCE PATH ID: W18A
CHART FAS OBST: 427 TANK 444732N/0692215W.
650 AAO 445150N/0692311W.
HOLD S, RT, 004.48 INBOUND
LTP HAE: 34.7 M

MINIMUMS:

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

ALTERNATE: NA ☒

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	610	1 1/8	413	610	1 1/8	413	610	1 1/8	413		NA				
LNAV/VNAV DA	785	1 3/4	588	785	1 3/4	588	785	1 3/4	588		NA				
LNAV MDA	740	1	543	740	1	543	740	1 5/8	543		NA				
CIRCLING	800	1	603	800	1	603	880	2	683		NA				



CHANGES - REASONS

- 1. CHANGED FEEDER FROM "RINTH-WITTE COURSE/DISTANCE 272.62/9.72" TO "RINTH-JERED COURSE/DISTANCE 271.81/6.97". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 2. CHANGED FEEDER FROM "ANSYN-SQUAB COURSE/DISTANCE 075.58/22.65" TO "ANSYN-BIDGE COURSE/DISTANCE 073.10/20.06". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 3. CHANGED INITIAL FROM "WITTE-OROSE COURSE/DISTANCE 274.52/5.00" TO "JERED-OROSE COURSE/DISTANCE 274.56/7.75". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 4. CHANGED INITIAL FROM "SQUAB-OROSE COURSE/DISTANCE 094.36/5.00" TO "BIDGE-OROSE COURSE/DISTANCE 094.30/7.75". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 5. CHANGED IF/IAF FROM "OROSE-KRANK COURSE/DISTANCE 184.44/6.00" TO "OROSE-KRANK COURSE/DISTANCE 184.44/6.32". - FIX MOVED TO MITIGATE VGS PENETRATIONS IAW 8260.3C PARA 2-6-6.
- 6. CHANGED FAF/SDF FROM "KRANK/ETTOR COURSE/DISTANCE 184.43/3.25" TO "KRANK/ETTOR COURSE/DISTANCE 184.44/3.41". - FIX MOVED TO MITIGATE VGS PENETRATIONS IAW 8260.3C PARA 2-6-6.
- 7. CHANGED SDF/MAP FROM "ETTOR/RW18 COURSE/DISTANCE 184.43/2.20" TO "ETTOR/RW18 COURSE/DISTANCE 184.44/1.72". - IPDS CALCULATED VALUE.
- 8. FAC CHANGED FROM 184.43 TO 184.44. - IPDS CALCULATED VALUE.
- 9. CHANGED MSA FROM RW18 360-360 (3100') TO RW18 360-360 (3300'). - NEW CONTROLLING OBSTACLE.
- 10. DISTANCE FAF-MAP CHANGED FROM 5.45 TO 5.13. - FAF MOVED. IPDS CALCULATED VALUE.
- 11. ADDED LPV DA/HAT 610/413 AND VIS 1 1/8 SM FOR CAT A-C. - LPV CAT A-C MINIMUMS ADDED PER FPT REQUEST.
- 12. ADDED LNAV/VNAV DA/HAT 785/588 AND VIS 1 3/4 SM FOR CAT A-C. - LNAV/VNAV CAT A-C MINIMUMS ADDED PER FPT REQUEST.
- 13. REVISED LNAV MDA/HAT FROM 760/563 AND VIS 1 SM FOR CAT A-B TO 740/543 AND VIS 1 SM, ADDED MDA/HAT 740/543 AND VIS 1 SM FOR CAT C. - NEW CONTROLLING OBSTACLE. LNAV CAT C MINIMUMS ADDED PER FPT REQUEST.
- 14. ADDED "CHART NOTE: BARO-VNAV NA". - MINS NOT AUTHORIZED WITH REMOTE ALTIMETER SETTING IAW 8260.19H.
- 15. CHANGED "CHART NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED" TO "CHART NOTE: RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED". - CHART NOTE UPDATED IAW 8260.19H PARA 8-6-11.K.(3)
- 16. REPLACED NOTE "CHART NOTE DME/DME RNP 0.3 NA" WITH PBN REQUIREMENTS NOTE: RNP APCH". - CHANGED PER NAVSPEC REQUIREMENT IAW FAAO 8260.19H, 8-6-8.
- 17. CHARTED CIRCLING ICON. - CIRCLING MEETS CHANGE 21 CIRCLING CRITERIA.
- 18. ADDED FAS DATA FOR LPV LINE OF MINIMA. - IPDS CALCULATED FAS DATA VALUES.

- 06/05/18: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 03/22/18.
- 1. ADDED NOTE: *LNAV ONLY TO ANNOTATE THAT THE STEPDOWN FIX ALTITUDE APPLIES ONLY TO THE LNAV PROCEDURE.
 - 2. CHANGED "CHART NOTE: BANGOR ASOS-3" TO "CHART NOTE: BANGOR ASOS" IN ADDITIONAL FLIGHT DATA.



<u>AIRPORT</u> PITTSFIELD MUNI	<u>AIRPORT ID</u> K2B7	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 18	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> PITTSFIELD	<u>STATE</u> ME
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: BGR APCH, ZBW, AMGR					
<u>FLIGHT CHECKED BY</u>		<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>	
GABRIEL JOHN PARKISON		ROBERT G HAMILTON	FIOG	05/31/2018	
		Jun 06, 2018	<i>Digitally signed by</i>		
<u>DEVELOPED BY</u>		JASON KRETSCHMER	<u>OFFICE</u>	<u>DATE</u>	
JASON KRETSCHMER		Mar 22, 2018	AJV-5422	03/22/2018	
<u>APPROVED BY</u>		<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>	<u>TITLE</u>
JULIE MORGAN		ROBERT G HAMILTON	AJV-5420		MANAGER
		Jun 06, 2018			



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	2B7
RUNWAY	RW18
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W18A
LTP/FTP LATITUDE	444625.9800N
LTP/FTP LONGITUDE	0692233.9490W
LTP/FTP ELLIPSOIDAL HEIGHT	+00347
FPAP LATITUDE	444459.0095N
FPAP LONGITUDE	0692206.8095W
THRESHOLD CROSSING HEIGHT (TCH)	00040.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.42
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1536
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	F552BDF2
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+00601
FPAP ORTHOMETRIC HEIGHT	+00601



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> PITTSFIELD MUNI	<u>AIRPORT ID</u> K2B7	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> PITTSFIELD	<u>STATE</u> ME
<u>AIRPORT ELEVATION</u> 197	<u>TDZE</u> 194	<u>SUPERSEDED</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> ORIG-C	<u>DATED</u> 03/03/2016	<u>MAG VAR</u> 17W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2010

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>
BGR VORTAC		HIBOB		TF	FB	2.00	235.48	18.25	3000
AUG VOR/DME		MAIRS		TF	FB	2.00	060.88	18.99	3000
HIBOB	IAF	POKUE	NOPT	TF	FB	1.00	274.61	7.71	2600
MAIRS	IAF	POKUE	NOPT	TF	FB	1.00	094.37	7.71	2600
POKUE	IF/IAF	TIPKE		TF	FB	1.00	004.48	5.92	2000
TIPKE	FAF	CUPEG/1.90 NM TO RW36		TF	FB	0.30	004.49	3.70	
CUPEG/1.90 NM TO RW36		RW36	MAP	TF	FO	0.30	004.49	1.90	
RW36	MAP	499 MSL		CA			004.49		
499 MSL		OROSE		DF	FO	1.00			2600

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW36

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2600 DIRECT OROSE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD S POKUE, RT, 004.48 INBOUND, 2600 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 004.49FAF: TIPKEDIST FAF TO MAP: 5.60DIST FAF TO THLD: 5.60

4. MIN ALT: POKUE 2600, TIPKE 2000, CUPEG/1.90 NM TO RW36 820*

5. DIST TO THLD FROM OM:MM:IM:150 HAT:305 HAT: 0.89GS ANT:

6. MIN GP INCPT: 2000GP ALT AT FAF : TIPKE 2000OM:MM:IM:

7. GP ANGLE: 3.0034:1: IS NOT CLEAR20:1: IS CLEARTCH: 40.0

8. MSA FROM: RW36 3300

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: RWY 36 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA.
*LNAV ONLY
CHART NOTE: USE BANGOR ALTIMETER SETTING; WHEN NOT RECEIVED PROCEDURE NA.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON BGR VORTAC AIRWAY RADIALS 239 CW 283 AND FOR ARRIVAL ON AUG VOR/DME AIRWAY RADIALS 053 CW 141.

ADDITIONAL FLIGHT DATA:

CHART BANGOR ASOS.
CHART CIRCLING ICON.
WAAS CHANNEL #90242
REFERENCE PATH ID: W36A
CHART FAS OBST: 339 TREE 444408N/0692221W.
562 AAO 444022N/0692002W.
HOLD N, RT, 184.44 INBOUND
LTP HAE: 28.4 M

MINIMUMS:

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

ALTERNATE: NA☒

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	499	1	305	499	1	305	499	1	305		NA				
LNAV/VNAV DA	499	1	305	499	1	305	499	1	305		NA				
LNAV MDA	660	1	466	660	1	466	660	1 3/8	466		NA				
CIRCLING	800	1	603	800	1	603	880	2	683		NA				



CHANGES - REASONS

- 1. CHANGED FEEDER FROM "BGR-TOVYA COURSE/DISTANCE 240.30/20.41" TO "BGR-HIBOB COURSE/DISTANCE 235.48/18.25". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 2. CHANGED FEEDER FROM "AUG-HEVKO COURSE/DISTANCE 064.88/21.31" TO "AUG-MAIRS COURSE/DISTANCE 060.88/18.99". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 3. CHANGED INITIAL FROM "TOVYA-POKUE COURSE/DISTANCE 274.56/5.00" TO "HIBOB-POKUE COURSE/DISTANCE 274.61/7.71". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 4. CHANGED INITIAL FROM "HEVKO-POKUE COURSE/DISTANCE 094.40/5.00" TO "MAIRS-POKUE COURSE/DISTANCE 094.37/7.71". - FIX MOVED MORE THAN 1 NM. FIX NAME CHANGED IAW 7400.2K PARA 3-3-4F.
- 5. CHANGED IAF/IF FROM POKUE-TIPKE COURSE/DISTANCE 004.48/6.00 TO "POKUE-TIPKE COURSE/DISTANCE 004.48/5.92". - IPDS CALCULATED VALUE.
- 6. CHANGED FAF/SDF FROM "TIPKE/CUPEG COURSE/DISTANCE 004.49/3.25" TO "TIPKE/CUPEG COURSE/DISTANCE 004.49/3.70". - IPDS CALCULATED VALUE.
- 7. CHANGED SDF/MAP FROM "CUPEG/RW36 COURSE/DISTANCE 004.49/2.00" TO "CUPEG/RW36 COURSE/DISTANCE 004.49/1.90". - IPDS CALCULATED VALUE.
- 8. CHANGED MSA FROM RW36 360-360 (3100') TO RW18 360-360 (3300'). - NEW CONTROLLING OBSTACLE.
- 9. DISTANCE FAF-MAP CHANGED FROM 5.52 TO 5.60. - FAF MOVED. IPDS CALCULATED VALUE.
- 10. ADDED LPV DA/HAT 499/305 AND VIS 1 SM FOR CAT A-C. - LPV CAT A-C MINIMUMS ADDED PER FPT REQUEST.
- 11. ADDED LNAV/VNAV DA/HAT 499/305 AND VIS 1 SM FOR CAT A-C. - LNAV/VNAV CAT A-C MINIMUMS ADDED PER FPT REQUEST.
- 12. ADDED LNAV MDA/HAT 660/466 AND VIS 1 3/8 SM FOR CAT C. - NEW CONTROLLING OBSTACLE. LNAV CAT C MINIMUMS ADDED PER FPT REQUEST.
- 13. ADDED "CHART NOTE: BARO-VNAV NA". - MINS NOT AUTHORIZED WITH REMOTE ALTIMETER SETTING IAW 8260.19H.
- 14. CHANGED "CHART NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED" TO "CHART NOTE: RWY 36 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED". - CHART NOTE UPDATED IAW 8260.19H PARA 8-6-11.K.(3)
- 15. REPLACED NOTE "CHART NOTE DME/DME RNP 0.3 NA" WITH PBN REQUIREMENTS NOTE: RNP APCH". - CHANGED PER NAVSPEC REQUIREMENT IAW FAAO 8260.19H, 8-6-8.
- 16. CHARTED CIRCLING ICON. - CIRCLING MEETS CHANGE 21 CIRCLING CRITERIA.
- 17. ADDED FAS DATA FOR LPV LINE OF MINIMA. - IPDS CALCULATED FAS DATA VALUES.

- 06/05/18: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 03/22/18.
- 1. ADDED NOTE: *LNAV ONLY TO ANNOTATE THAT THE STEPDOWN FIX ALTITUDE APPLIES ONLY TO THE LNAV PROCEDURE.
 - 2. CHANGED "CHART NOTE: BANGOR ASOS-3" TO "CHART NOTE: BANGOR ASOS" IN ADDITIONAL FLIGHT DATA.
 - 3. ADDED 55 FT REMOTE ALTIMETER ADJUSTMENT TO THE LNAV/VNAV FINAL SEGMENT IN TERMINAL ROUTES.



<u>AIRPORT</u> PITTSFIELD MUNI	<u>AIRPORT ID</u> K2B7	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 36	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> PITTSFIELD	<u>STATE</u> ME
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: BGR APCH, ZBW, AMGR					
<u>FLIGHT CHECKED BY</u> GABRIEL JOHN PARKISON		<i>Digitally signed by</i> ROBERT G HAMILTON Jun 06, 2018	<u>OFFICE</u> FIOG	<u>DATE</u> 05/31/2018	
<u>DEVELOPED BY</u> JASON KRETSCHMER		<i>Digitally signed by</i> JASON KRETSCHMER Mar 22, 2018	<u>OFFICE</u> AJV-5422	<u>DATE</u> 03/22/2018	
<u>APPROVED BY</u> JULIE MORGAN		<i>Digitally signed by</i> ROBERT G HAMILTON Jun 06, 2018	<u>OFFICE</u> AJV-5420	<u>DATE</u>	<u>TITLE</u> MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	2B7
RUNWAY	RW36
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W36A
LTP/FTP LATITUDE	444547.4000N
LTP/FTP LONGITUDE	0692221.9075W
LTP/FTP ELLIPSOIDAL HEIGHT	+00284
FPAP LATITUDE	444714.3695N
FPAP LONGITUDE	0692249.0580W
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	1536
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	B5A03E4E

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+00537
FPAP ORTHOMETRIC HEIGHT	+00537



US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33		Bearings, headings, courses, 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 in feet RVR.												
TERMINAL ROUTES										MISSED APPROACH						
FROM		TO		COURSE AND DISTANCE				ALTITUDE		LP: RW01 LNAV: RW01						
WOKOL (IF/IAF)		CUXUG (TF) (FB) (RNP 1.00)		003.89 / 6.10				2200		CLIMB TO 1100, THEN CLIMBING LEFT TURN TO 2800 DIRECT ZALKI AND HOLD.						
CUXUG (FAF)		RW01 (MAP) (TF) (FO) (RNP 0.30)		003.89 / 4.91												
RW01 (MAP)		1100 MSL (CA)		003.89				1100								
1100 MSL		ZALKI (DF) (FO) (RNP 1.00)						2800		ADDITIONAL FLIGHT DATA: HOLD N, RT, 164.49 INBOUND. CHART FAS OBST: 678 TREE 454258N/0870523W CHART FAS OBST: 699 TREE 454133N/0870601W WAAS CHANNEL # 69333 REFERENCE PATH ID: W01A CUXUG TO RW01: 3.00/45. CHART CIRCLING ICON. LTP HAE: 144.6 M						
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																
2. HOLD S WOKOL, RT, 003.89 INBOUND, 2700 FT. IN LIEU OF PT (IAF)																
3. FAC: 003.89 FAF: CUXUG DIST FAF TO MAP: 4.91 THLD: 4.91																
4. MIN. ALT: WOKOL 2700, CUXUG 2200																
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____																
7. GS ANGLE: _____ TCH: 34:1 IS NOT CLEAR																
8. MSA FROM: _____																
MAG VAR: 3W EPOCH YEAR: 1985																
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A		STANDARD @				
CATEGORY =====>		A		B		C		D		E						
		DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA
LP MDA		940	1	340	940	1	340	940	1	340	940	1	340			
LNAV MDA		960	1	360	960	1	360	960	1	360	960	1	360			
CIRCLING		1060	1	451	1080	1	471	1280	2	671	1480	2 3/4	871			
NOTES: CHART NOTE: RWY 1 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED. CHART NOTE: DME/DME RNP-0.3 NA. CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}). CHART NOTE: STRAIGHT-IN RWY 1 NA AT NIGHT, CIRCLING RWY 1, 19 NA AT NIGHT. (CONTINUED ON PAGE 2)																
CITY AND STATE ESCANABA, MI		ELEVATION: 609 TDZE: 600 AIRPORT NAME: DELTA COUNTY		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 1, ORIG-C 13 SEPTEMBER 2018						SUP: RNAV (GPS) RWY 36 AMDT: ORIG-B DATED 05/28/2015				

**RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33**

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NOTES, (CONT.):

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE MARQUETTE ALTIMETER SETTING AND INCREASE ALL MDA 180 FEET AND INCREASE LP CAT C AND D VISIBILITY 1/2 SM, LNAV CAT C AND D VISIBILITY 5/8 SM, AND CIRCLING CAT C VISIBILITY 1/2 SM AND CAT D VISIBILITY 1/4 SM.

CHART PLANVIEW NOTE: CAUTION: MAGNETIC DISTURBANCES OF AS MUCH AS 14 DEGREES EXIST AT GROUND LEVEL AT ESCANABA.

TAA

	FROM	TO	ALT
1.	274/30 CW 094/30 (NOPT)	WOKOL (IF/IAF) (FB)	2700
2.	094/30 CW 274/30	WOKOL (IF/IAF) (FO)	2700

QUALITY
4
CHECKED

CITY AND STATE ESCANABA, MI	ELEVATION: 609 TDZE: 600 AIRPORT NAME: DELTA COUNTY	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 1, ORIG-C 13 SEPTEMBER 2018	SUP: RNAV (GPS) RWY 36
				AMDT: ORIG-B
				DATED: 05/28/2015

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

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FAS DATA BLOCK INFORMATION**DATA FIELD****DATA**

OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KESC
RUNWAY	RW01
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W01A
LTP/FTP LATITUDE	454306.1505N
LTP/FTP LONGITUDE	0870512.2660W
LTP/FTP ELLIPSOIDAL HEIGHT	+01446
FPAP LATITUDE	454435.2200N
FPAP LONGITUDE	0870510.2900W
THRESHOLD CROSSING HEIGHT (TCH)	00045.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1224
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0

CRC REMAINDER

4A1B98B4

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+01805
FPAP ORTHOMETRIC HEIGHT	+01805

QUALITY
4
CHECKED

CITY AND STATE

ESCANABA, MI

ELEVATION: 609

TDZE: 600

AIRPORT NAME:

DELTA COUNTY

FACILITY
IDENTIFIER:

RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

RNAV (GPS) RWY 1, ORIG-C

13 SEPTEMBER 2018

SUP:

RNAV (GPS) RWY 36

AMDT:

ORIG-B

DATED:

05/28/2015

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
ESCANABA, MI	DELTA COUNTY	13 SEPTEMBER 2018	1

TAKEOFF MINIMUMS:

RWY 09, 19, 27, STANDARD.

RWY 01, 400-2 1/4 OR STANDARD WITH MINIMUM CLIMB GRADIENT OF 265 FEET PER NM TO 1100.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: **RWY 01,** VEHICLES ON ROAD BEGINNING 40 FT FROM DER, 40 FT RIGHT OF CENTERLINE, UP TO 15 FT AGL/621 FT MSL. TOWER 1.7 NM FROM DER, 2363 FT LEFT OF CENTERLINE, 293 FT AGL/965 FT MSL.

NOTE: **RWY 09,** VEHICLES ON ROAD BEGINNING 1 FT FROM DER, 272 FT RIGHT OF CENTERLINE, UP TO 607 FT MSL. TREES BEGINNING 1753 FT FROM DER, 417 FT RIGHT OF CENTERLINE, UP TO 648 FT MSL. TREE 1859 FT FROM DER, 561 FT RIGHT OF CENTERLINE, 654 FT MSL. TREES BEGINNING 1869 FT FROM DER, 54 FT RIGHT OF CENTERLINE, UP TO 656 FT MSL. TREE 2024 FT FROM DER, 444 FT LEFT OF CENTERLINE, 646 FT MSL.

NOTE: **RWY 19,** FENCE BEGINNING 131 FT FROM DER, 402 FT RIGHT OF CENTERLINE, UP TO 9 FT AGL/599 FT MSL. POLE 247 FT FROM DER, 562 FT RIGHT OF CENTERLINE, 28 FT AGL/618 FT MSL. TREE 321 FT FROM DER, 350 FT LEFT OF CENTERLINE, 606 FT MSL. TREES BEGINNING 367 FT FROM DER, 524 FT RIGHT OF CENTERLINE, UP TO 646 FT MSL. TREE 374 FT FROM DER, 454 FT LEFT OF CENTERLINE, 643 FT MSL. TREES BEGINNING 447 FT FROM DER, 383 FT LEFT OF CENTERLINE, UP TO 650 FT MSL. TREES BEGINNING 463 FT FROM DER, 383 FT LEFT OF CENTERLINE, UP TO 660 FT MSL. TREES BEGINNING 543 FT FROM DER, 500 FT RIGHT OF CENTERLINE, UP TO 652 FT MSL. TREES BEGINNING 640 FT FROM DER, 19 FT LEFT OF CENTERLINE, UP TO 664 FT MSL. TREES BEGINNING 671 FT FROM DER, 19 FT RIGHT OF CENTERLINE, UP TO 673 FT MSL.

CONTROLLING OBSTACLES:

RWY 01: 915 MSL TOWER 454548.00N/0870542.00W.

REMARKS:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
ESCANABA, MI	DELTA COUNTY	13 SEPTEMBER 2018	1

FLIGHT INSPECTED BY:

JEFFREY W HARING

Digitally signed by
DONALD H LANIER
Apr 30, 2018

OFFICE SYMBOL:

FICO

DATE:

7/19/17

DEVELOPED BY:

MARK CIARLONE

Mark David Ciarlone
Digitally signed by Mark David Ciarlone
Date: 2017.05.30 14:31:54 -05'00'

OFFICE SYMBOL:

AJV-5431

DATE:

05/30/2017

APPROVED BY:

PATRICK MULQUEEN

Digitally signed by
DONALD H LANIER
Apr 30, 2018

OFFICE SYMBOL:

AJV-5430

DATE:

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☒	☒	☒	☒	☐	☒

OTHER:

CNTL FPT, AMGR, ZMP

CHANGES - REASONS:

1. RWY 18/36 RENUMBERED TO RWY 19/01 - PER FPT IFP REQUEST.
2. RWY 01 TAKEOFF MINIMUMS INCREASED FROM "261 FEET PER NM TO 1100" TO "265 FEET PER NM TO 1100" - NEW TARGETS SOFTWARE USED TO DETERMINE TAKEOFF MINIMUMS.
3. TAKEOFF OBSTACLE NOTES UPDATED - UTILIZED THE ***NEW*** DEPARTURE OBSTACLE GROUPER FOR TARGETS 5.2.

QUALITY
6
CHECKED

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.						
TERMINAL ROUTES										MISSED APPROACH						
FROM		TO		COURSE AND DISTANCE				ALTITUDE		MAP: ESC VOR/DME						
										CLIMB TO 2400 THEN RIGHT TURN DIRECT ESC VOR/DME AND HOLD.						
										ADDITIONAL FLIGHT DATA: HOLD S, RT, 351.00 INBOUND. CHART FAS OBST: 730 RIG 454309N/0870350W CHART CIRCLING ICON. FAC 34 FT L OF RWY C/L EXTENDED 3000 FT FROM THLD.						
1. PT <u>L</u> SIDE OF COURSE <u>171.00</u> OUTBOUND <u>2200</u> FT WITHIN <u>10</u> MILES OF <u>ESC VOR/DME</u> (IAF)																
2.																
3. FAC <u>351.00</u> FAF _____ DIST FAF TO MAP _____ THLD _____																
4. MIN. ALT _____																
8. MSA FROM: <u>ESC VOR/DME 360-090 3100, 090-360 2600</u>										MAG VAR: <u>0E</u>			EPOCH YEAR: <u>1965</u>			
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: <u>N A</u>		STANDARD @				
CATEGORY =====>		A		B		C		D		E						
		MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA
S-01		1080	1	480	1080	1	480	1080	1 3/8	480	1080	1 3/8	480			
CIRCLING		1080	1	471	1080	1	471	1280	2	671	1480	2 3/4	871			
NOTES:																
CHART NOTE: STRAIGHT-IN RWY 1 NA AT NIGHT, CIRCLING RWY 1, 19 NA AT NIGHT.										@ NA WHEN LOCAL WEATHER NOT AVAILABLE.						
CHART NOTE: RWY 1 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.										@ CAT D 900-2 3/4						
CAUTION: MAGNETIC DISTURBANCES OF AS MUCH AS 14 DEGREES EXISTS AT GROUND LEVEL AT ESCANABA.																
(CONTINUED ON PAGE 2)																
CITY AND STATE ESCANABA, MI		ELEVATION: 609 AIRPORT NAME: DELTA COUNTY		TDZE: 600		FACILITY IDENTIFIER: ESC		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: VOR RWY 1, ORIG-D 13 SEPTEMBER 2018				SUP VOR RWY 36 AMDT ORIG-C DATE 05/28/2015				



**VOR STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - - TITLE 14 CFR PART 97.23**

Bearings, headings, courses, 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 in feet RVR.

NOTES, (CONT.):

WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE MARQUETTE ALTIMETER SETTING AND INCREASE ALL MDA 180 FEET AND INCREASE S-01 CAT C AND D VISIBILITY 1/2 SM, CIRCLING CAT C VISIBILITY 1/2 SM AND CAT D VISIBILITY 1/4 SM.

QUALITY
6
CHECKED

CITY AND STATE

ESCANABA, MI

ELEVATION: 609

TDZE: 600

AIRPORT NAME:

DELTA COUNTY

FACILITY
IDENTIFIER:

ESC

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

VOR RWY 1, ORIG-D

13 SEPTEMBER 2018

SUP: VOR RWY 36

AMDT: ORIG-C

DATED: 05/28/2015

**FLIGHT STANDARDS SERVICE
VOR STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.23

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.

If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> DUPONT-LAPEER	<u>AIRPORT ID</u> KD95	<u>PROCEDURE NAME</u> VOR-A	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> LAPEER	<u>STATE</u> MI
<u>AIRPORT ELEVATION</u> 835	<u>TDZE</u>	<u>SUPERSEDED</u> VOR-A	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 09/15/2016	<u>MAG VAR</u> 7W
<u>FACILITY</u> FNT	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
FNT VORTAC	IAF	COLBA/10.00 DME					079.89	10.00	3000
COLBA/10.00 DME	IF	MIXED/16.00 DME					079.89	6.00 (FNT R-080)	2500

MISSED APPROACH

MAP:

HOGRA/21.62 DME FIX

MISSED APPROACH INSTRUCTIONS:

CLIMBING LEFT TURN TO 2500 ON FNT VORTAC R-080 TO MIXED/16.00 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. PROFILE STARTS AT COLBA
3. **FAC:** 079.89 **FAF:** MIXED/16.00 DME **DIST FAF TO MAP:** 5.62 **DIST FAF TO THLD:**
4. **MIN ALT:** COLBA/10.00 DME 3000, MIXED/16.00 DME 2500
8. **MSA FROM:** FNT VORTAC 3100

EQUIPMENT REQUIREMENTS NOTES:

DME REQUIRED.

NOTES:

CHART NOTE: CIRCLING NA TO RWYS 9 AND 27.
CHART NOTE: CIRCLING RWY 18 NA AT NIGHT.
CHART NOTE: RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON FNT VORTAC AIRWAY RADIALS 076 CW 097.
CAUTION: NE/SW DRAG STRIP 2 MILES NORTH OF AIRPORT.



ADDITIONAL FLIGHT DATA:

FAC CROSSES RWY 36 1640 FEET FROM THLD.
CHART CIRCLING ICON.
CHART FAS OBST: 1133 TOWER 430257N/0831839W.
HOLD W, LT, 079.89 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐

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
CIRCLING	1400	1	565	1400	1	565	1460	1 3/4	625		NA				

CHANGES - REASONS

REMOVED FLINT ALTIMETER AS THE PRIMARY ALTIMETER SOURCE. - LOCAL ALTIMETER SOURCE AVAILABLE.
ADDED LOCAL ALTIMETER AND USED FLINT AS BACKUP ALTIMETER. - FPT REQUEST.
REMOVED PONTIAC VORTAC AND INT AT COLBA AND MIXED - VORMON / DECOMMISSIONING VORTAC.
CAT B VISIBILITY DECREASED FROM 1 1/4 TO 1 - PER VISI CHECK CALCULATION.
CHANGED HELICOPTER NOTE FROM "HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NA" TO "RWY 18 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED." - IAW 8260.19H PARA 8-6-11K(3).
UPDATED MISSED APPROACH INSTRUCTIONS, CHANGED FROM "VIA" TO "ON" - IAW 8260.19H PARA 8-6-6D(7).
NAMED MISSED APPROACH POINT. - IAW 8260.19H PARA 8-6-6C.
ADDED EQUIPMENT NOTE "DME REQUIRED". - IAW 8260.19H PARA 8-6-8A(2)A.
ADDED PLANVIEW NOTE "PROCEDURE NA FOR ARRIVAL ON FNT VORTAC AIRWAY RADIALS 076 CW 097." - TURN EXCEEDS 120 DEGREES - IAW 8260.3C 2-3-1(A).
LOWERED CAT A & B MDA/HAA FROM 1460/616 TO 1400/565. - LOCAL ALTIMETER NOW AVAILABLE.
CAT C HAA RAISED FROM 616 TO 625 - UPDATED AIRPORT ELEVATION PER AIRNAV.

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: FNT ATCT, AMGR

FLIGHT CHECKED BY

Digitally signed by

ROBERT G HAMILTON

JEFFREY W HARING

Jun 18, 2018

OFFICE

FICO

DATE

6/14/18

DEVELOPED BY

Digitally signed by

ROBERT G HAMILTON

ROBERT G HAMILTON (AUSTIN GOTCHER)

Jun 18, 2018

OFFICE

AJV-5422

DATE

03/16/2018

APPROVED BY

Digitally signed by

ROBERT G HAMILTON

JULIE MORGAN

Jun 18, 2018

OFFICE

AJV-5420

DATE

03/16/2018

TITLE

MANAGER



U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.																											
TERMINAL ROUTES										MISSED APPROACH																											
FROM		TO		COURSE AND DISTANCE				ALTITUDE																													
										ADDITIONAL FLIGHT DATA:																											
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																																					
2. _____																																					
3. FAC _____ FAF _____ DIST FAF TO MAP _____ THLD _____																																					
4. MIN. ALT _____																																					
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____																											
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT																				ALTERNATE: N A																	
CATEGORY =====>																																					
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS																		
NOTES:																																					
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																																					
CITY AND STATE NEWBERRY, MI				ELEVATION: 869 TDZE: 867 AIRPORT NAME: LUCE COUNTY				FACILITY IDENTIFIER: ERY				PROCEDURE NO./AMD'T NO./EFFECTIVE DATE: VOR RWY 29, AMDT 12, 07/29/2010						SUP VOR OR GPS RWY 29																			
																		AMD'T 11A																			
																		DATE 11/27/2004																			



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
FREDERICKTOWN, MO	A PAUL VANCE FREDERICKTOWN RGNL	13 SEPTEMBER 2018	1A

TAKEOFF MINIMUMS:

RWY 19: STANDARD

RWY 1: 300-2 1/4 OR STANDARD WITH MINIMUM CLIMB OF 245 FT PER NM TO 1300.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 1: TREES BEGINNING 9 FT FROM DER, 198 FT RIGHT OF CENTERLINE, UP TO 955 FT MSL. TREE 27 FT FROM DER, 121 FT LEFT OF CENTERLINE, 876 FT MSL. TREE 318 FT FROM DER, 431 FT LEFT OF CENTERLINE, 915 FT MSL. TREES BEGINNING 522 FT FROM DER, 188 FT LEFT OF CENTERLINE, UP TO 938 FT MSL. TREE 2098 FT FROM DER, 641 FT RIGHT OF CENTERLINE, 956 FT MSL. TREES BEGINNING 2111 FT FROM DER, 323 FT RIGHT OF CENTERLINE, UP TO 957 FT MSL. TREES BEGINNING 2234 FT FROM DER, 119 FT RIGHT OF CENTERLINE, UP TO 962 FT MSL. TREES BEGINNING 2348 FT FROM DER, 498 FT RIGHT OF CENTERLINE, UP TO 963 FT MSL. TREE 1.4 NM FROM DER, 2752 FT RIGHT OF CENTERLINE, 1099 FT MSL. TREES BEGINNING 1.4 NM FROM DER, 2688 FT RIGHT OF CENTERLINE, UP TO 1120 FT MSL. TREES BEGINNING 1.4 NM FROM DER, 2685 FT RIGHT OF CENTERLINE, UP TO 1136 FT MSL. TREES BEGINNING 1.5 NM FROM DER, 2640 FT RIGHT OF CENTERLINE, UP TO 1138 FT MSL. TREES BEGINNING 1.5 NM FROM DER, 2558 FT RIGHT OF CENTERLINE, UP TO 1141 FT MSL. TREE 1.5 NM FROM DER, 2838 FT RIGHT OF CENTERLINE, 1146 FT MSL. TREES BEGINNING 1.5 NM FROM DER, 2079 FT RIGHT OF CENTERLINE, UP TO 1149 FT MSL. TREES BEGINNING 1.5 NM FROM DER, 2489 FT RIGHT OF CENTERLINE, UP TO 1159 FT MSL. TREES BEGINNING 1.5 NM FROM DER, 1894 FT RIGHT OF CENTERLINE, UP TO 1162 FT MSL. TREES BEGINNING 1.6 NM FROM DER, 1882 FT RIGHT OF CENTERLINE, UP TO 1169 FT MSL. TREE, TRAVERSE_WAY BEGINNING 1.6 NM FROM DER, 2091 FT RIGHT OF CENTERLINE, UP TO 1171 FT MSL. TREES BEGINNING 1.6 NM FROM DER, 1590 FT RIGHT OF CENTERLINE, UP TO 1174 FT MSL. TREES BEGINNING 1.6 NM FROM DER, 1840 FT RIGHT OF CENTERLINE, UP TO 1177 FT MSL. TREE 1.7 NM FROM DER, 2717 FT RIGHT OF CENTERLINE, 1151 FT MSL.

NOTE: RWY 19: POLE 10 FT FROM DER, 50 FT RIGHT OF CENTERLINE, 26 FT AGL/876 FT MSL.

CONTROLLING OBSTACLES:

RWY 1: 1174 FT MSL TREE 373808.96N-0901610.79W (CLIMB GRADIENT/CLIMB-TO ALTITUDE). 1177 FT MSL TREE 373813.00N-0901614.48W (CEILING). 1151 FT MSL TREE 373815.66N-0901602.35W (VISIBILITY).

REMARKS:

FLIGHT INSPECTED BY:	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 04, 2018	OFFICE SYMBOL:	DATE:
MATTHEW OSLSTAD		FICO	5/30/18
DEVELOPED BY:	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 04, 2018	OFFICE SYMBOL:	DATE:
LONNIE EVERHART (JOHN BURCH)		AJV-5400	04/13/2018
APPROVED BY:	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 04, 2018	OFFICE SYMBOL:	DATE:
LONNIE EVERHART		AJV-5400	

REQUIRED EFFECTIVE DATE:
ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☐	☒	☒	☒	☐	☒

OTHER:

ARPT MGR, MO STATE AERO.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
FREDERICKTOWN, MO	A PAUL VANCE FREDERICKTOWN RGNL	13 SEPTEMBER 2018	1A

CHANGES - REASONS:

1. CHANGED RWY 1 TAKEOFF MINIMUMS FROM 300-2 1/4 OR STANDARD WITH MINIMUM CLIMB OF 237 FT PER NM TO 1300 TO 300-2 1/4 OR STANDARD WITH MINIMUM CLIMB OF 245 FT PER NM TO 1300 - 1147 FT MSL TREE.
2. UPDATED TAKEOFF OBSTACLES ALL RUNWAYS - NEW SURVEY DATA.



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> VICKSBURG MUNI	<u>AIRPORT ID</u> KVKS	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 1	<u>ORIGINAL/AMENDMENT</u> 1B	<u>CITY</u> VICKSBURG	<u>STATE</u> MS
<u>AIRPORT ELEVATION</u> 107	<u>TDZE</u> 104	<u>SUPERSEDED</u> RNAV (GPS) RWY 1	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 06/26/2014	<u>MAG VAR</u> 0W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2015

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 278/30 CW 098/30	NOPT	ADIVE	IF/IAF	2000
2. 098/30 CW 278/30	PT	098/10 CW 278/10		3500
3. 098/10 CW 278/10	PT	ADIVE	IAF	2000

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>
ADIVE	IF/IAF	DOGME		TF	FB	1.00	007.59	6.00	1800
DOGME	FAF	CAVOD/1.80 NM TO RW01		TF	FB	0.30	007.60	3.41	
CAVOD/1.80 NM TO RW01		RW01	MAP	TF	FO	0.30	007.60	1.80	
RW01	MAP	507 MSL		CA			007.60		
507 MSL		WIVNI		DF	FO	1.00			2000

MISSED APPROACH

MAP:

LP: RW01
 LNAV: RW01

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 DIRECT WIVNI AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD S ADIVE, RT, 007.59 INBOUND, 2000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 007.60

FAF: DOGME

DIST FAF TO MAP: 5.21

DIST FAF TO THLD: 5.21

4. MIN ALT: ADIVE 2000, DOGME 1800, CAVOD/1.80 NM TO RW01 700

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

GS ANT:

6. MIN GP INCPT:

GP ALT AT FAF :

OM:

MM:

IM:

7. GP ANGLE:

34:1: IS NOT CLEAR

20:1: IS NOT CLEAR

TCH:

8. MSA FROM:

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA FOR CAT D WEST OF RWY 1-19.
CHART NOTE: PROCEDURE NA AT NIGHT.
CHART NOTE: RWY 1 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.

ADDITIONAL FLIGHT DATA:

CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.
WAAS CHANNEL #66030
REFERENCE PATH ID: W01A
CHART FAS OBST: 357 TREE 321234N/0905617W, 378 TREE 321233N/0905526W.
499 AAO 320920N/0905552W.
HOLD N, RT, 187.62 INBOUND
LTP HAE: 4.3 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 800-2 1/2

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
LP MDA	620	1	516	620	1	516	620	1 3/8	516	620	1 3/8	516			
LNAV MDA	640	1	536	640	1	536	640	1 1/2	536	640	1 1/2	536			
CIRCLING	700	1	593	700	1	593	700	1 1/2	593	860	2 1/2	753			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
VICKSBURG MUNI	KVKS	RNAV (GPS) RWY 1	1B	VICKSBURG	MS

CHANGES - REASONS

- 1. CHANGED "CAVOD/1.80 NM TO RW01 TO RW01" AND "RW01 TO 507 MSL" TERMINAL ROUTE COURSE FROM 007.61 TO 007.60 - FINAL COURSE DOES NOT CHANGE ONCE PASSED FAF.
- 2. ADDED MAX HOLDING ALTITUDE FOR HOLD IN LIEU OF PROCEDURE TURN - CURRENT 8260.19 GUIDANCE.
- 3. ADDED "20:1 IS NOT CLEAR" TO LINE 7 - CURRENT 8260.19 GUIDANCE.
- 4. REMOVED CHART NOTE "DME/DME RNP 0.3 NA" - NO LONGER REQUIRED.
- 5. ADDED PBN REQUIREMENT NOTE "RNP APCH" - CURRENT NAV SPEC REQUIREMENTS IAW 8260.19.
- 6. MOVED CHART NOTE "WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE VICKSBURG TALLULAH RGNL ALTIMETER SETTING AND INCREASE ALL MDA 40 FEET, INCREASE LP CATS C/D VISIBILITY 1/4 MILE, LNAV CATS C/D VISIBILITY 1/8 MILE AND CIRCLING CAT C VISIBILITY 1/4 MILE" TO 8260-9 PART C - PRIMARY AND SECONDARY ALTIMETER ON WMSCR.
- 7. REMOVED "DOGME TO RW01: 3.00/40" FROM CHART PROFILE AND REPLACED WITH "VISUAL SEGMENT -OBSTACLES" - FLIGHT CHECK REQUEST TO REMOVE VDA/TCH.
- 8. ADDED CHART FAS OBST "378 TREE 321233N/0905526W" IN ADDITIONAL FLIGHT DATA - LNAV SURVEYED FAS OBSTACLE.
- 9. UPDATED FPAP LAT/LONG FROM 321527.8400N/0905530. 9700W TO 321527.8330N/0905530.9635W - UPDATED TO UNROUNDED VALUES.
- 10. CHANGED FAS DATA TCH FROM 40.0 TO 0.0 - FLIGHT CHECK REQUEST TO REMOVE VDA/TCH.
- 11. CHANGED FAS DATA GPA FROM 3.00 TO 0.00 - FLIGHT CHECK REQUEIST TO REMOVE VDA/TCH.
- 12. CRC REMAINDER CHANGED FROM A33FA10C TO 24B0BB83 - MULTIPLE CHANGES TO FAS DATA.

PDF EDITS: TDZE 104 ENTERED DUE TO REPORT FORMAT/SIAP ISSUES.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZME, ATL FPO, ARPT MGR.

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

DUSTIN DAVIDSON

APPROVED BY

JULIE MORGAN

Digitally signed by
DUSTIN DAVIDSON
Jun 15, 2018

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

05/16/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 25, 2018

TITLE
MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KVKS
RUNWAY	RW01
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W01A
LTP/FTP LATITUDE	321359.3360N
LTP/FTP LONGITUDE	0905544.8780W
LTP/FTP ELLIPSOIDAL HEIGHT	+00043
FPAP LATITUDE	321527.8330N
FPAP LONGITUDE	0905530.9635W
THRESHOLD CROSSING HEIGHT (TCH)	00000.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	00.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1320
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	24B0BB83

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00308
FPAP ORTHOMETRIC HEIGHT	+00308

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> VICKSBURG MUNI	<u>AIRPORT ID</u> KVKS	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 19	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> VICKSBURG	<u>STATE</u> MS	
<u>AIRPORT ELEVATION</u> 107	<u>TDZE</u> 106	<u>SUPERSEDED</u> RNAV (GPS) RWY 19	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 08/21/2014	<u>MAG VAR</u> 0W	<u>EPOCH YEAR</u> 2015
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 098/30 CW 278/30	NOPT	WIVNI	IF/IAF	2000
2. 278/30 CW 098/30	PT	278/10 CW 098/10		3500
3. 278/10 CW 098/10	PT	WIVNI	IAF	2000

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>
WIVNI	IF/IAF	ZOKLU		TF	FB	1.00	187.62	6.00	1800
ZOKLU	FAF	USEZU/2.40 NM TO RW19		TF	FB	0.30	187.61	2.79	
USEZU/2.40 NM TO RW19		RW19	MAP	TF	FO	0.30	187.61	2.40	
RW19	MAP	507 MSL		CA			187.61		
507 MSL		ADIVE		DF	FO	1.00			2000

MISSED APPROACH

MAP:

LP: RW19
 LNAV: RW19

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 DIRECT ADIVE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD N WIVNI, RT, 187.62 INBOUND, 2000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 187.61FAF: ZOKLUDIST FAF TO MAP: 5.19DIST FAF TO THLD: 5.19

4. MIN ALT: WIVNI 2000, ZOKLU 1800, USEZU/2.40 NM TO RW19 900

5. DIST TO THLD FROM OM:MM:IM:150 HAT:GS ANT:

6. MIN GP INCPT:GP ALT AT FAF :OM:MM:IM:

7. GP ANGLE:34:1: IS NOT CLEAR20:1: IS NOT CLEARTCH:

8. MSA FROM:

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA FOR CAT D WEST OF RWY 1-19.
CHART NOTE: PROCEDURE NA AT NIGHT.
CHART NOTE: RWY 19 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.

ADDITIONAL FLIGHT DATA:

CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.
WAAS CHANNEL #60932
REFERENCE PATH ID: W19A
CHART FAS OBST: 592 STACK 321702N/0905550W.
HOLD S, RT, 007.59 INBOUND
LTP HAE: 5.9 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT C 800-2 1/4, CAT D 800-2 1/2

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
LP MDA	660	1	554	660	1	554	660	1 5/8	554	660	1 5/8	554			
LNAV MDA	860	1	754	860	1 1/4	754	860	2	754	860	2	754			
CIRCLING	860	1	753	860	1 1/4	753	860	2 1/4	753	860	2 1/2	753			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
VICKSBURG MUNI	KVKS	RNAV (GPS) RWY 19	ORIG-B	VICKSBURG	MS

CHANGES - REASONS

- 1. CHANGED "USEZU/2.40 NM TO RW19 TO RW19" AND "RW19 TO 507 MSL" TERMINAL ROUTE COURSE FROM 187.60 TO 187.61 - FINAL COURSE DOES NOT CHANGE ONCE PASSED FAF.
- 2. ADDED MAX HOLDING ALTITUDE FOR HOLD IN LIEU OF PROCEDURE TURN - CURRENT 8260.19 GUIDANCE.
- 3. ADDED "20:1 IS NOT CLEAR" TO LINE 7 - CURRENT 8260.19 GUIDANCE.
- 4. REMOVED CHART NOTE "DME/DME RNP 0.3 NA" - NO LONGER REQUIRED.
- 5. ADDED PBN REQUIREMENT NOTE "RNP APCH" - CURRENT NAV SPEC REQUIREMENTS IAW 8260.19.
- 6. MOVED CHART NOTE "WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE VICKSBURG TALLULAH RGNL ALTIMETER SETTING AND INCREASE ALL MDA 40 FEET, INCREASE LP CAT C/D VISIBILITY 1/8 MILE AND LNAV CAT C/D 1/2 MILE AND CIRCLING CAT C 1/4 MILE." TO 8260-9 PART C - PRIMARY AND SECONDARY ALTIMETER ON WMSCR.
- 7. REMOVED "ZOKLU TO RW19: 3.00/40" FROM CHART PROFILE AND REPLACED WITH "VISUAL SEGMENT -OBSTACLES" - FLIGHT CHECK REQUEST TO REMOVE VDA/TCH.
- 8. UPDATED FPAP LAT/LONG FROM 32131212.3300N/0905552.2600W TO 321312.3360N/0905552.2550W - UPDATED TO UNROUNDED VALUES.
- 9. CHANGED FAS DATA TCH FROM 40.0 TO 0.0 - FLIGHT CHECK REQUEST TO REMOVE VDA/TCH.
- 10. CHANGED FAS DATA GPA FROM 3.00 TO 0.00 - FLIGHT CHECK REQUEIST TO REMOVE VDA/TCH.
- 11. CRC REMAINDER CHANGED FROM 3BBC9EA9 TO 225C3026- MULTIPLE CHANGES TO FAS DATA.



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KVKS
RUNWAY	RW19
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W19A
LTP/FTP LATITUDE	321440.8255N
LTP/FTP LONGITUDE	0905538.3650W
LTP/FTP ELLIPSOIDAL HEIGHT	+00059
FPAP LATITUDE	321312.3360N
FPAP LONGITUDE	0905552.2550W
THRESHOLD CROSSING HEIGHT (TCH)	00000.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	00.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1368
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	225C3026

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+00324
FPAP ORTHOMETRIC HEIGHT	+00324



ILS - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.29						Bearings, headings, courses, 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 in feet RVR.													
TERMINAL ROUTES											MISSED APPROACH								
FROM		TO		COURSE AND DISTANCE			ALTITUDE		ILS: DA LOC: 5.73 NM AFTER UMUXE INT/I-AVL 7.24 DME/RADAR OR AT I-AVL 1.51 DME CLIMB TO 2700 THEN CLIMBING RIGHT TURN TO 5600 ON HEADING 020 AND SUG VORTAC R-312 TO JUNOE INT/SUG 24.15 DME AND HOLD. ADDITIONAL FLIGHT DATA: HOLD SE, LT, 312.22 INBOUND. CHART FAS OBST: 2238 TREE 352327N/0823126W. 2560 AAO 352216N/0823046W. CHART VDP AT 2.53 DME* DISTANCE VDP TO THLD 1.02 NM. *LOC ONLY. CHART CIRCLING ICON.										
SUG VORTAC		NURUE INT/I-AVL 11.42 DME		232.27 / 12.73			6200												
FREEZ INT/SUG 18.40 DME		NURUE INT/I-AVL 11.42 DME		052.27 / 5.67 (SUG R-232)			6200												
SPA VORTAC		TUXDO INT/I-AVL 19.76 DME		287.14 / 24.59			5500												
TUXDO INT/I-AVL 19.76 DME (IAF)		NURUE INT/I-AVL 11.42 DME (NOPT)		346.83 / 8.34 (I-AVL)			5100												
NURUE INT/I-AVL 11.42 DME (IF/IAF)		UMUXE INT/I-AVL 7.24 DME/RADAR		346.83 / 4.18 (I-AVL)			4000												
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. HOLD S NURUE, RT, 346.83 INBOUND, 5100 FT. IN LIEU OF PT (IAF) 3. FAC: 346.83 FAF: UMUXE INT/I-AVL 7.24 DME/RADAR DIST FAF TO MAP: 5.73 THLD: 5.73 4. MIN. ALT: NURUE 5100, UMUXE 4000, OBOVE INT/I-AVL 4.61 DME/RADAR 3160* 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: 950 6. MIN GS INCPT: 4000 GS ALT AT: UMUXE 4000 OM: _____ MM: _____ IM: _____ 7. GS ANGLE: 3.00 TCH: 57.1 8. MSA FROM: BRA NDB 7700																MAG VAR: 7W		EPOCH YEAR: 2020	
MINIMUMS																			
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A		ILS: #		LOC: @								
CATEGORY ==>		A		B		C		D		E									
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA				
S-ILS 35	2349	3/4	208	2349	3/4	208	2349	3/4	208	2349	3/4	208							
S-LOC 35	3160	1 1/4	1019	3160	1 1/2	1019	3160	3	1019	3160	3	1019							
CIRCLING	3160	1 1/4	996	3160	1 1/2	996	3460	3	1296	3720	3	1556							
OBOVE FIX MINIMUMS (DUAL VOR RECEIVERS OR DME OR RADAR REQUIRED)																			
S-LOC 35	2500	1	359	2500	1	359	2500	1	359	2500	1	359							
CIRCLING	2800	1	636	2880	1	716	3460	3	1296	3720	3	1556							
NOTES: CHART NOTE: CIRCLING NA W OF RWY 17-35. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT SUG VORTAC ON V185 NORTHBOUND. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON SPA VORTAC AIRWAY RADIALS 231 CW 325.																			
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2164 TDZE: 2141 AIRPORT NAME: ASHEVILLE RGNL		FACILITY IDENTIFIER: I-AVL		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: ILS OR LOC RWY 35, ORIG, 09/13/2018						SUP:							
												AMDT: NONE							
												DATED							



US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		ILS - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.29				Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH					
FROM		TO		COURSE AND DISTANCE				ALTITUDE		ADDITIONAL FLIGHT DATA:					
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)															
2. _____															
3. FAC: _____ FAF: _____ DIST FAF TO MAP: _____ THLD: _____															
4. MIN. ALT: _____															
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____															
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____															
7. GS ANGLE: _____ TCH: _____															
8. MSA FROM: _____										MAG VAR: _____			EPOCH YEAR: _____		
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT															
ALTERNATE: N A															
CATEGORY =====>															
		DH/MDA		VIS				DH/MDA		VIS				DH/MDA	
NOTES:															
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018															
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2162 TDZE: 2136 AIRPORT NAME: ASHEVILLE RGNL				FACILITY IDENTIFIER: I-XQR		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: ILS OR LOC RWY 35, ORIG 12/10/2015				SUP: AMDT: NONE DATED			

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION LOC STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.25										Bearings, headings, courses, 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 in feet RVR.										
TERMINAL ROUTES										MISSED APPROACH										
FROM			TO			COURSE AND DISTANCE			ALTITUDE		MAP: LOC: 5.55 NM AFTER KEANS LOM/I-IMO 7.02 DME OR AT I-IMO 1.47 DME									
WEAKS INT/HMV 46.49 DME			KEANS LOM/I-IMO 7.02 DME			207.34 / 12.10 (IM BRG-027)			7500		CLIMB TO 5000 DIRECT BRA NDB AND HOLD.									
SUG VORTAC			KEANS LOM/I-IMO 7.02 DME			297.94 / 17.36			6700											
BRA NDB			KEANS LOM/I-IMO 7.02 DME			346.91 / 16.60			6100											
SOT VORTAC (IAF)			JUNOE INT/I-IMO 15.50 DME (NOPT)			114.37 / 21.21			6600											
JUNOE INT/I-IMO 15.50 DME (IF)			WUGAG/I-IMO 10.01 DME			166.82 / 5.49 (I-IMO)			5000											
WUGAG/I-IMO 10.01 DME			KEANS LOM/I-IMO 7.02 DME			166.82 / 3.00 (I-IMO)			4100		ADDITIONAL FLIGHT DATA: HOLD S, RT, 346.83 INBOUND. FAS OBST: 2460 AAO 353004N/0823356W. CHART VDP AT 3.04 DME DISTANCE VDP TO THLD 1.57 NM. CHART CIRCLING ICON. KEANS LOM TO RW17: 3.20/55.									
1. PT <u>R</u> SIDE OF COURSE <u>346.82</u> OUTBOUND <u>6100</u> FT WITHIN <u>10</u> MILES OF <u>KEANS LOM</u> (IAF)																				
2.																				
3. FAC <u>166.82</u> FAF <u>KEANS LOM/I-IMO 7.02 DME</u> DIST FAF TO MAP <u>5.55</u> THLD <u>5.55</u>																				
4. MIN. ALT <u>WUGAG 5000, KEANS LOM 4100</u>																				
8. MSA FROM: <u>IM LOM 090-180 5700, 180-090 7900</u>										MAG VAR: <u>7W</u> EPOCH YEAR: <u>2020</u>										
MINIMUMS																				
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: <u>N A</u>		STANDARD @								
CATEGORY =====>		A			B			C			D			E						
		MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA				
S-LOC 17		2720	1	556	2720	1	556	2720	1 5/8	556	2720	1 5/8	556							
CIRCLING		2800	1	636	2880	1	716	3460	3	1296	3720	3	1556							
NOTES:																				
CHART NOTE: CIRCLING NA W OF RWY 17-35.										@ NA WHEN CONTROL TOWER CLOSED										
CHART NOTE: ADF REQUIRED.										@ CAT C 1300-3, CAT D 1600-3										
CHART PLANVIEW NOTE: DME REQUIRED.																				
CITY AND STATE		ELEVATION: 2164 TDZE: 2164			FACILITY IDENTIFIER:			PROCEDURE NO./AMDT NO./EFFECTIVE DATE:				SUP								
ASHEVILLE, NC		AIRPORT NAME:			I-IMO			LOC RWY 17, ORIG, 09/13/2018				AMDT NONE								
		ASHEVILLE RGNL										DATE								



RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33						Bearings, headings, courses, 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 in feet RVR.										
TERMINAL ROUTES											MISSED APPROACH					
FROM		TO			COURSE AND DISTANCE			ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW17 CLIMB TO 6000 DIRECT AVEBE AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6000. ADDITIONAL FLIGHT DATA: HOLD S, RT, 346.88 INBOUND. CHART FAS OBST: 2621 TREE 352800N/0823400W. DISTANCE TO THLD FROM 200 HAT: 0.46 NM. WAAS CHANNEL # 93641 REFERENCE PATH ID: W17A CHART CIRCLING ICON. LTP HAE: 629.6 M						
LEDME (IAF)		ONZIQ (NOPT) (TF) (FB) (RNP 1.00)			226.84 / 6.00			6000								
OPIME (IAF)		ONZIQ (NOPT) (TF) (FB) (RNP 1.00)			106.68 / 6.00			6000								
ONZIQ (IF/IAF)		LUYGI (TF) (FB) (RNP 1.00)			166.76 / 5.00			4500								
LUYGI		STOSS (TF) (FB) (RNP 1.00)			166.78 / 3.00			4000								
STOSS (FAF)		JIRDU/2.50 NM TO RW17 (TF) (FB) (RNP 0.30)			166.80 / 3.09											
(SEE FORM 8260-10)																
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. HOLD N ONZIQ, LT, 166.76 INBOUND, 6000 FT. IN LIEU OF PT (IAF) 3. FAC: 166.80 FAF: STOSS DIST FAF TO MAP: 5.59 THLD: 5.59 4. MIN. ALT: ONZIQ 6000, LUYGI 4500, STOSS 4000, JIRDU/2.50 NM TO RW17 3000* 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____ 6. MIN GS INCPT: 4000 GS ALT AT: STOSS 4000 OM: _____ MM: _____ IM: _____ 7. GS ANGLE: 3.00 TCH: 55.0 34:1 IS CLEAR 8. MSA FROM: _____																
										MAG VAR: 7W			EPOCH YEAR: 2020			
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT							ALTERNATE: N A		STANDARD @							
CATEGORY =====>		A			B			C			D			E		
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	
LPV DA	2364	3/4	200	2364	3/4	200	2364	3/4	200	2364	3/4	200				
LNAV/VNAV DA	2958	3	794	2958	3	794	2958	3	794	2958	3	794				
LNAV MDA	2880	1	716	2880	1	716	2880	2	716	2880	2	716				
CIRCLING	2880	1	716	2880	1	716	3460	3	1296	3720	3	1556				
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -12C (11F) OR ABOVE 53C (128F). @ CAT C 1300-3, CAT D 1600-3 CHART NOTE: CIRCLING NA W OF RWY 17-35. CHART NOTE: DME/DME RNP-0.3 NA. *LNAV ONLY																
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2164 TDZE: 2164 AIRPORT NAME: ASHEVILLE RGNL			FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 17, ORIG, 09/13/2018					SUP:				
												AMDT: NONE				
												DATED				



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION

RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

TERMINAL ROUTES, (CONT.):

FROM	TO	COURSE AND DISTANCE	ALTITUDE
JIRDU/2.50 NM TO RW17	RW17 (MAP) (TF) (FO) (RNP 0.30)	166.80 / 2.50	
RW17 (MAP)	2364 MSL (CA)	166.80	
2364 MSL	AVEBE (DF) (FO) (RNP 1.00)		6000

TAA

	FROM	TO	ALT
1.	107/30 CW 227/30 (NOPT)	107/5 CW 227/5	8800
	107/5 CW 227/5	ONZIQ (IF/IAF) (FB)	6000
2.	227/30 CW 347/30	227/6 CW 347/6	8900
	227/6 CW 347/6	LEDME (IAF) (FB)	7600
3.	347/30 CW 107/30	347/12 CW 107/12	8800
	347/12 CW 107/12	OPIME (IAF) (FB)	7600

QUALITY
25
CHECKED

CITY AND STATE

ASHEVILLE, NC

ELEVATION: 2164

TDZE: 2164

AIRPORT NAME:

ASHEVILLE RGNL

FACILITY
IDENTIFIER:

RNAV

PROCEDURE NO./ AMDT NO./EFFECTIVE DATE:

RNAV (GPS) RWY 17, ORIG, 09/13/2018

SUP:

AMDT: NONE

DATED:

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

Bearings, headings, courses, 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 in feet RVR.

FAS DATA BLOCK INFORMATION**DATA FIELD****DATA**

OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KAVL
RUNWAY	RW17
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W17A
LTP/FTP LATITUDE	352647.1400N
LTP/FTP LONGITUDE	0823248.0500W
LTP/FTP ELLIPSOIDAL HEIGHT	+06296
FPAP LATITUDE	352523.3795N
FPAP LONGITUDE	0823210.4395W
THRESHOLD CROSSING HEIGHT (TCH)	00055.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0312
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0

CRC REMAINDER

D055B800

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+06596
FPAP ORTHOMETRIC HEIGHT	+06596

QUALITY
25
CHECKED

CITY AND STATE

ASHEVILLE, NC

ELEVATION: 2164

TDZE: 2164

AIRPORT NAME:

ASHEVILLE RGNL

 FACILITY
IDENTIFIER:

RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

RNAV (GPS) RWY 17, ORIG, 09/13/2018

SUP:

AMDT: NONE

DATED:

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33		Bearings, headings, courses, 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 in feet RVR.													
TERMINAL ROUTES										MISSED APPROACH							
FROM		TO		COURSE AND DISTANCE				ALTITUDE		ADDITIONAL FLIGHT DATA:							
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)										MAG VAR: _____ EPOCH YEAR: _____							
2. _____																	
3. FAC: _____ FAF: _____ DIST FAF TO MAP: _____ THLD: _____																	
4. MIN. ALT: _____																	
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																	
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____																	
7. GS ANGLE: _____ TCH: _____																	
8. MSA FROM: _____																	
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A							
CATEGORY =====>																	
	DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS			
NOTES:																	
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																	
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2162 TDZE: 2162 AIRPORT NAME: ASHEVILLE RGNL		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 17, ORIG 12/10/2015						SUP: AMDT: NONE DATED					



US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33		Bearings, headings, courses, 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 in feet RVR.												
TERMINAL ROUTES										MISSED APPROACH						
FROM		TO		COURSE AND DISTANCE		ALTITUDE		LPV: DA LNAV/VNAV: DA LNAV: RW35								
ZIKOL (IAF)		AVEBE (NOPT) (TF) (FB) (RNP 1.00)		046.96 / 6.00		6000		CLIMB TO 6800 DIRECT ONZIQ AND HOLD, CONTINUE CLIMB-IN-HOLD TO 6800.								
FIMOV (IAF)		AVEBE (NOPT) (TF) (FB) (RNP 1.00)		286.84 / 6.00		6000										
AVEBE (IF/IAF)		UMUXE (TF) (FB) (RNP 1.00)		346.88 / 7.42		4000										
UMUXE (FAF)		OBOVE/3.10 NM TO RW35 (TF) (FB) (RNP 0.30)		346.85 / 2.63												
OBOVE/3.10 NM TO RW35		RW35 (MAP) (TF) (FO) (RNP 0.30)		346.85 / 3.10				ADDITIONAL FLIGHT DATA: HOLD N, LT, 166.76 INBOUND. CHART FAS OBST: 2324 POLE 352428N/0823240W. 2480 AAO 352225N/0823045W. DISTANCE TO THLD FROM 200 HAT: 0.52 NM. CHART VDP AT 1.52 NM TO RW35* *LNAV ONLY. WAAS CHANNEL # 48941 REFERENCE PATH ID: W35A CHART CIRCLING ICON. LTP HAE: 615.3 M								
(SEE FORM 8260-10)																
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)										MAG VAR: 7W EPOCH YEAR: 2020						
2. HOLD S AVEBE, RT, 346.88 INBOUND, 6000 FT. IN LIEU OF PT (IAF)																
3. FAC: 346.85 FAF: UMUXE DIST FAF TO MAP: 5.73 THLD: 5.73																
4. MIN. ALT: AVEBE 6000, UMUXE 4000, OBOVE/3.10 NM TO RW35 3160*																
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																
6. MIN GS INCPT: 4000 GS ALT AT: UMUXE 4000 OM: _____ MM: _____ IM: _____																
7. GS ANGLE: 3.00 TCH: 57.1 34:1 IS CLEAR																
8. MSA FROM: _____																
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT						ALTERNATE: N A		STANDARD @								
CATEGORY =====>		A		B		C		D		E						
		DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA
LPV DA		2341	3/4	200	2341	3/4	200	2341	3/4	200	2341	3/4	200			
LNAV/VNAV DA		2602	1 3/8	461	2602	1 3/8	461	2602	1 3/8	461	2602	1 3/8	461			
LNAV MDA		2660	1	519	2660	1	519	2660	1 3/8	519	2660	1 3/8	519			
CIRCLING		2800	1	636	2880	1	716	3460	3	1296	3720	3	1556			
NOTES: CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -12C (11F) OR ABOVE 53C (128F). @ CAT C 1300-3, CAT D 1600-3 CHART NOTE: CIRCLING NA W OF RWY 17-35. CHART NOTE: DME/DME RNP-0.3 NA.																
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2164 TDZE: 2141 AIRPORT NAME: ASHEVILLE RGNL		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 35, ORIG, 09/13/2018						SUP: AMDT: NONE DATED				



US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

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TERMINAL ROUTES, (CONT.):

FROM	TO	COURSE AND DISTANCE	ALTITUDE
RW35 (MAP)	2341 MSL (CA)	346.85	

2341 MSL	ONZIQ (DF) (FO) (RNP 1.00)		6800

TAA

	FROM	TO	ALT
1.	287/30 CW 047/30 (NOPT)	287/7 CW 047/7	6300
	287/7 CW 047/7	AVEBE (IF/IAF) (FB)	6000
2.	047/30 CW 167/30	047/6 CW 167/6	8600
	047/6 CW 167/6	ZIKOL (IAF) (FB)	6300
3.	167/30 CW 287/30	167/10 CW 287/10	8800
	167/10 CW 287/10	FIMOV (IAF) (FB)	6000

QUALITY
25
CHECKED

CITY AND STATE ASHEVILLE, NC	ELEVATION: 2164	TDZE: 2141	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 35, ORIG, 09/13/2018	SUP:	
	AIRPORT NAME:				AMDT:	NONE
	ASHEVILLE RGNL				DATED:	

**RNAV STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - FAR PART 97.33**

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FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KAVL
RUNWAY	RW35
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W35A
LTP/FTP LATITUDE	352532.8700N
LTP/FTP LONGITUDE	0823214.7000W
LTP/FTP ELLIPSOIDAL HEIGHT	+06153
FPAP LATITUDE	352656.6330N
FPAP LONGITUDE	0823252.3040W
THRESHOLD CROSSING HEIGHT (TCH)	00057.1
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0312
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0

<u>CRC REMAINDER</u>	AAA4BF0C

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+06454
FPAP ORTHOMETRIC HEIGHT	+06454

QUALITY
25
CHECKED

CITY AND STATE ASHEVILLE, NC	ELEVATION: 2164 TDZE: 2141 AIRPORT NAME: ASHEVILLE RGNL	FACILITY IDENTIFIER: RNAV	PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 35, ORIG, 09/13/2018	SUP:
				AMDT: NONE
				DATED:

US DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION		RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33		Bearings, headings, courses, 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 in feet RVR.													
TERMINAL ROUTES										MISSED APPROACH							
FROM		TO		COURSE AND DISTANCE				ALTITUDE		ADDITIONAL FLIGHT DATA:							
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)										MAG VAR: _____ EPOCH YEAR: _____							
2. _____																	
3. FAC: _____ FAF: _____ DIST FAF TO MAP: _____ THLD: _____																	
4. MIN. ALT: _____																	
5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____																	
6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____																	
7. GS ANGLE: _____ TCH: _____																	
8. MSA FROM: _____																	
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A							
CATEGORY =====>																	
		DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS		DH/MDA	VIS		
NOTES:																	
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																	
CITY AND STATE ASHEVILLE, NC		ELEVATION: 2162 TDZE: 2136 AIRPORT NAME: ASHEVILLE RGNL		FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 35, ORIG 12/10/2015						SUP: AMDT: NONE DATED					

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
ASHEVILLE, NC	ASHEVILLE RGNL	09/13/2018	1

TAKEOFF MINIMUMS:

RWY 17: STANDARD WITH MINIMUM CLIMB OF 250 FT PER NM TO 4500 OR 3600-3 FOR VCOA.

RWY 35: STANDARD WITH MINIMUM CLIMB OF 390 FT PER NM TO 5500 OR 3600-3 FOR VCOA.

TEXTUAL DEPARTURE PROCEDURES:

RWY 17: CLIMB HEADING 166.82 TO 4500 BEFORE PROCEEDING ON COURSE.

RWY 35: CLIMB HEADING 346.83 TO 5500 BEFORE PROCEEDING ON COURSE.

VISUAL CLIMB OVER AIRPORT:

RWY 17, 35: OBTAIN ATC APPROVAL FOR VCOA WHEN REQUESTING IFR CLEARANCE. CLIMB IN VISUAL CONDITIONS TO CROSS ASHEVILLE REGIONAL AIRPORT AT OR ABOVE 5600 BEFORE PROCEEDING ON COURSE. NOTE: VCOA NA AT NIGHT.

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 17: VEHICLES ON ROAD 141 FT FROM DER, 294 FT LEFT OF CENTERLINE, 2122 FT MSL.

NOTE: RWY 35: TREES BEGINNING 10 FT FROM DER, 305 FT LEFT OF CENTERLINE, UP TO 27 FT AGL/2177 FT MSL. TREES BEGINNING 24 FT FROM DER, 208 FT LEFT OF CENTERLINE, UP TO 24 FT AGL/2184 FT MSL. TREES BEGINNING 542 FT FROM DER, 539 FT LEFT OF CENTERLINE, UP TO 2194 FT MSL. TREES 953 FT FROM DER, 612 FT LEFT OF CENTERLINE, 2196 FT MSL. TREES BEGINNING 1065 FT FROM DER, 656 FT LEFT OF CENTERLINE, UP TO 2200 FT MSL. TREES AND ANTENNA BEGINNING 1198 FT FROM DER, 641 FT LEFT OF CENTERLINE, UP TO 2203 FT MSL. TREES BEGINNING 1.2 NM FROM DER, 2098 FT LEFT OF CENTERLINE, UP TO 2363 FT MSL. TRANSMISSION LINE TOWER 1.2 NM FROM DER, 2289 FT LEFT OF CENTERLINE, 2376 FT MSL. TRANSMISSION LINE TOWER AND VEHICLES ON ROAD BEGINNING 1.2 NM FROM DER, 2309 FT LEFT OF CENTERLINE, UP TO 2388 FT MSL. TREES BEGINNING 1.3 NM FROM DER, 1957 FT LEFT OF CENTERLINE, UP TO 2437 FT MSL. TREES BEGINNING 1.3 NM FROM DER, 2308 FT LEFT OF CENTERLINE, UP TO 2464 FT MSL. TREES BEGINNING 1.3 NM FROM DER, 2190 FT LEFT OF CENTERLINE, UP TO 2471 FT MSL. TREES BEGINNING 1.3 NM FROM DER, 2199 FT LEFT OF CENTERLINE, UP TO 2513 FT MSL. TREES BEGINNING 1.3 NM FROM DER, 2124 FT LEFT OF CENTERLINE, UP TO 2528 FT MSL. TREES 1.3 NM FROM DER, 2539 FT LEFT OF CENTERLINE, 2537 FT MSL. TREES AND VEHICLES ON ROAD BEGINNING 1.3 NM FROM DER, 2254 FT LEFT OF CENTERLINE, UP TO 2568 FT MSL. TREES, ANTENNAS, AND TOWERS BEGINNING 1.4 NM FROM DER, 1885 FT LEFT OF CENTERLINE, UP TO 2579 FT MSL.

CONTROLLING OBSTACLES:

RWY 17: 3320 FT MSL AAO, 351845.00N/0823124.00W.

RWY 35: 2568 FT MSL TREE, 352755.61N/0823353.94W.

RWY 17, 35: (VCOA) 6057 FT MSL TOWER, 352532.00N/0824524.00W, (VCA) 3157 FT MSL TREE, 352805.33N/0823539.07W.

OBSTACLES MANDATING ODP ROUTE DEVELOPMENT:

RWY 17, 35: 6057 FT MSL TOWER, 352532.00N/0824524.00W



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
ASHEVILLE, NC	ASHEVILLE RGNL	09/13/2018	1

REMARKS:
NEW RUNWAY CONSTRUCTION.

FLIGHT INSPECTED BY: STEPHEN F KOCH	<i>Digitally signed by</i> ROBERT G HAMILTON Aug 14, 2017	OFFICE SYMBOL: FICO	DATE: 9/27/17
DEVELOPED BY: RALPH DUMAR	RALPH ALAN DUMAR Digitally signed by RALPH ALAN DUMAR Date: 2017.07.13 10:19:36 -05'00'	OFFICE SYMBOL: AJV-5422	DATE: 07/13/2017
APPROVED BY: JULIE MORGAN	<i>Digitally signed by</i> ROBERT G HAMILTON Aug 14, 2017	OFFICE SYMBOL: AJV-5420	DATE:

REQUIRED EFFECTIVE DATE:
09/13/2018 - HARD DATE FOR NEW RUNWAY CONSTRUCTION PROJECT.

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☒	☐	☒

OTHER:
ZTL, AVL APP CON, AVL ATCT, ARPT MGR

CHANGES - REASONS:
TAKEOFF MINIMUMS RWY 17: LOWERED CLIMB-TO ALTITUDE FROM 4600 TO 4500. DETERMINED BY TARGETS SOFTWARE VS. MANUAL CALCULATION FROM PREVIOUS AMDT.
TAKEOFF MINIMUMS RWY 35: CHANGED FROM "STANDARD WITH MINIMUM CLIMB OF 410 FT PER NM TO 5700" TO "STANDARD WITH MINIMUM CLIMB OF 390 FT PER NM TO 5500." DETERMINED BY TARGETS SOFTWARE VS. MANUAL CALCULATION FROM PREVIOUS AMDT.
UPDATED TAKEOFF OBSTACLE NOTES PER DEPARTURE OBSTACLE GROUPER TOOL.

QUALITY
3
CHECKED

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
TIOGA, ND	TIOGA MUNI	13 SEPTEMBER 2018	1

TAKEOFF MINIMUMS:

RWY 3, 21: NA - ENVIRONMENTAL.

RWY 12: STANDARD.

RWY 30: 300 - 1 1/8 OR STANDARD WITH MINIMUM CLIMB OF 249 FT PER NM TO 2500, OR ALTERNATELY, WITH STANDARD TAKEOFF MINIMUMS AND A NORMAL 200 FT PER MILE CLIMB GRADIENT, TAKEOFF MUST OCCUR NO LATER THAN 2200 FEET PRIOR TO DER.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 12, LIGHTING 10 FT FROM DER, 18 FT RIGHT OF CENTERLINE, 2 FT AGL/2272 FT MSL.

LIGHTING 10 FT FROM DER, 15 FT LEFT OF CENTERLINE, 2 FT AGL/2273 FT MSL.

POLE, TRAVERSE_WAY BEGINNING 630 FT FROM DER, 144 FT RIGHT OF CENTERLINE, UP TO 23 FT AGL/2311 FT MSL.

NOTE: RWY 30, LIGHTING 9 FT FROM DER, 18 FT RIGHT OF CENTERLINE, 2 FT AGL/2242 FT MSL.

LIGHTING 9 FT FROM DER, 18 FT LEFT OF CENTERLINE, 2 FT AGL/2242 FT MSL.

BUILDING 554 FT FROM DER, 640 FT RIGHT OF CENTERLINE, 27 FT AGL/2264 FT MSL.

GENERAL_UTILITY 4410 FT FROM DER, 1465 FT RIGHT OF CENTERLINE, 170 FT AGL/2366 FT MSL.

STACK 5674 FT FROM DER, 1751 FT RIGHT OF CENTERLINE, 167 FT AGL/2417 FT MSL.

CONTROLLING OBSTACLES:

RWY 30: 2417 FT MSL STACK 482354.89N/1025500.18W

REMARKS:

FLIGHT INSPECTED BY:

Digitally signed by
ROBERT G HAMILTON
Jun 18, 2018

OFFICE SYMBOL:

FICO

DATE:

6/14/18

ANTHOINY D VALLERA

DEVELOPED BY:

Digitally signed by
ROBERT G HAMILTON
Jun 18, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

02/28/2018

LONNIE EVERHART
(MICHAEL HARRIS)

APPROVED BY:

Digitally signed by
ROBERT G HAMILTON
Jun 18, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

LONNIE EVERHART

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A **ALPA** **AOPA** **APA** **HAI** **NBAA**



OTHER:

ZMP, AIRPORT MANAGER

CHANGES - REASONS:

1. CHANGED RWY 30 TAKEOFF MINIMUMS FROM STANDARD TO 300 - 1 1/8 OR STANDARD WITH MINIMUM CLIMB OF 249 FT PER NM TO 2500, OR ALTERNATELY, WITH STANDARD TAKEOFF MINIMUMS AND A NORMAL 200 FT PER MILE CLIMB GRADIENT, TAKEOFF MUST OCCUR NO LATER

QUALITY
6
CHECKED

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
TIOGA, ND	TIOGA MUNI	13 SEPTEMBER 2018	1

- THAN 2200 FEET PRIOR TO DER- TO INCORPORATE NOTAM FDC 7/7900.
2. UPDATED TAKEOFF OBSTACLE NOTES RWY 12/30- NEW OBSTACLE EVALUATION.
3. ADDED CONTROLLING OBSTACLE RWY 30-TO INCORPORATE NOTAM FDC 7/7900.



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> KIMBALL MUNI/ROBERT E ARRAJ FIELD	<u>AIRPORT ID</u> KIBM	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> KIMBALL	<u>STATE</u> NE
<u>AIRPORT ELEVATION</u> 4926	<u>TDZE</u> 4908	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1B	<u>DATED</u> 09/15/2016	<u>MAG VAR</u> 10E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
PIETY		INGIU		TF	FO	2.00	083.99	29.55	7600
MEILE		LAGOZ		TF	FB	2.00	170.59	26.59	7000
LAGOZ	IAF	INGIU	NOPT	TF	FB	1.00	185.00	7.00	6500
SNY VOR/DME	IAF	INGIU	NOPT	TF	FB	1.00	266.55	18.93	6500
INGIU	IF/IAF	GAMAC		TF	FB	1.00	274.97	7.70	6500
GAMAC	FAF	BICAR/2.90 NM TO RW28		TF	FB	0.30	274.86	2.00	
BICAR/2.90 NM TO RW28		RW28	MAP	TF	FO	0.30	274.83	2.90	
RW28	MAP	5158 MSL		CA			274.83		
5158 MSL		HIMAV		DF	FO	1.00			7000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 7000 DIRECT HIMAV AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD E INGIU, RT, 274.97 INBOUND, 6500 FT. IN LIEU OF PT (IAF), MAX 10000.
3. FAC: 274.86FAF: GAMACDIST FAF TO MAP: 4.90DIST FAF TO THLD: 4.90
4. MIN ALT: INGIU 6500, GAMAC 6500, BICAR/2.90 NM TO RW28 5860*
5. DIST TO THLD FROM OM:MM:IM:150 HAT:250 HAT: 0.68GS ANT:
6. MIN GP INCPT: 6500GP ALT AT FAF : GAMAC 6500OM:MM:IM:
7. GP ANGLE: 3.0034:1: IS NOT CLEAR20:1: IS CLEARTCH: 40.0
8. MSA FROM: RW28 7000

PBN REQUIREMENTS NOTE:

RNP APCH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -24C OR ABOVE 54C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT SNY VOR/DME ON V6 EAST BOUND.
CHART NOTE: CIRCLING RWY 10 NA AT NIGHT

ADDITIONAL FLIGHT DATA:

CHART VDP AT 0.82 NM TO RW28*
*LNAV ONLY
WAAS CHANNEL #42503
REFERENCE PATH ID: W28A
CHART FAS OBST: 4949 TREE 411121N/1033942W.
HOLD W, RT, 094.60 INBOUND
LTP HAE: 1474.7 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	5158	1	250	5158	1	250	5158	1	250	5158	1	250			
LNAV/VNAV DA	5158	1	250	5158	1	250	5158	1	250	5158	1	250			
LNAV MDA	5200	1	292	5200	1	292	5200	1	292	5200	1	292			
CIRCLING	5280	1	354	5460	1	534	5460	1 1/2	534	5480	2	554			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
KIMBALL MUNI/ROBERT E ARRAJ FIELD	KIBM	RNAV (GPS) RWY 28	1C	KIMBALL	NE

CHANGES - REASONS

DELETED CHART NOTE: WHEN VGSI INOP, STRAIGHT-IN/CIRCLING RWY 28 PROCEDURE NA AT NIGHT - NO 20:1 PENETRATOR.
DELETED CHART NOTE: VISIBILITY REDUCTION BY HELICOPTERS NA - NO 20:1 OR 34:1 PENETRATOR.
DELETED CHART NOTE: WHEN VGSI INOP, CIRCLING RWY 10 NA AT NIGHT- NO FLIGHT STANDARD LETTER OF APPROVAL TO USE VGSI IN LIEU OF OBSTRUCTION LIGHTING ON FILE, PLUS NO SURVEY FOR RWY 10.
ADDED CHART NOTE: CIRCLING RWY 10 NA AT NIGHT - NO SURVEY FOR RWY 10.
CHANGED 20:1 & 34:1 FROM IS NOT CLEAR TO IS CLEAR-NO PENETRATOR.
ADDED PBN REQUIREMENT NOTE: RNP APCH - EQUIPMENT NAVSPEC REQUIREMENTS.
DELETED CHART NOTE: DME/DME RNP-0.3 NA - REPLACED WITH PBN REQUIREMENT NOTE: RNP APCH.
DELETED ALL BACK UP ALTIMETER NOTES - CONTINGENCY ALTIMETER INFORMATION LISTED ON THE BACK OF THE 8260-9. KIBM AND KSNY WEATHER SOURCE TRANSMITTED TO WMSCR.
UPDATED BARO VNAV LOW TEMP FROM -24C (-11F) TO -24C - FAHRENHEIT NO LONGER REQUIRED.
UPDATED BARO VNAV HIGH TEMP FROM 13C (55) TO 54C - AJV CERTIFIED LOW/HIGH TEMPERATURE LIMIT CALCULATOR AND FAHRENHEIT NO LONGER REQUIRED.
ADDED CHART VDP AT 0.82 NM TO RW28* *LNAV ONLY - NO 20:1 PENETRATORS.



COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☐ **HAI** ☐ **NBAA** ☒ **OTHER:** AMGR, ZDV

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

Digitally signed by **OFFICE** **DATE**
DEZ SILAGYI
Jun 19, 2018

DEVELOPED BY

DEANNA M. FIELDS *Digitally signed by*
DEANNA M FIELDS
Jun 15, 2018

OFFICE **DATE**
AJV-5421 05/04/2018

APPROVED BY

JULIE MORGAN *Digitally signed by*
DEZ SILAGYI
Jun 19, 2018

OFFICE **DATE** **TITLE**
AJV-5420 MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KIBM
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	411109.1770N
LTP/FTP LONGITUDE	1033959.3860W
LTP/FTP ELLIPSOIDAL HEIGHT	+14747
FPAP LATITUDE	411131.9200N
FPAP LONGITUDE	1034153.5000W
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	0864
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	1AADC2DC

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K3
LTP ORTHOMETRIC HEIGHT	+14934
FPAP ORTHOMETRIC HEIGHT	+14934



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> GALLUP MUNI	<u>AIRPORT ID</u> KGUP	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 24	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>CITY</u> GALLUP	<u>STATE</u> NM	
<u>AIRPORT ELEVATION</u> 6472	<u>TDZE</u> 6472	<u>SUPERSEDED</u> RNAV (GPS) RWY 24	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 11/25/2004	<u>MAG VAR</u> 12E	<u>EPOCH YEAR</u> 1985
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
DERTY		EKIYO		TF	FB	2.00	136.17	11.16	10000
GUP VORTAC		BAXTU		TF	FO	2.00	059.04	18.13	10000
BLINI	IAF	BAXTU	NOPT	TF	FB	1.00	314.31	14.59	9500
EKIYO	IAF	BAXTU	NOPT	TF	FB	1.00	152.02	5.00	9500
HERET	IAF	BAXTU	NOPT	TF	FB	1.00	290.16	10.42	9500
BAXTU	IF/IAF	FESIX		TF	FB	1.00	242.04	6.14	8700
FESIX	FAF	DEYEB/3.09 NM TO RW24		TF	FB	0.30	241.97	3.77	
DEYEB/3.09 NM TO RW24		RW24	MAP	TF	FO	0.30	241.97	3.09	
RW24	MAP	6872 MSL		CA			241.97		
6872 MSL		BAXTU		DF	FO	1.00			9500

MISSED APPROACH

MAP:

LNAV: RW24

MISSED APPROACH INSTRUCTIONS:

CLIMBING RIGHT TURN TO 9500 DIRECT BAXTU AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD NE BAXTU, RT, 242.04 INBOUND, 9500 FT. IN LIEU OF PT (IAF), MAX 14000.
3. FAC: 241.97 FAF: FESIX DIST FAF TO MAP: 6.86 DIST FAF TO THLD: 6.86
4. MIN ALT: BAXTU 9500, FESIX 8700, DEYEB/3.09 NM TO RW24 7500
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: HAT:
6. MIN GP INCPT: GP ALT AT FAF : OM: MM: IM:
7. GP ANGLE: 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH:
8. MSA FROM: RW24 10200

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH

NOTES:

CHART NOTE: RWY 24 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART PROFILE NOTE: VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).

ADDITIONAL FLIGHT DATA:

FESIX TO RW24: 3.00/45.
CHART R-5117
CHART FAS OBST: 6889 TOWER 353106N/1084355W.

MINIMUMS:

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

ALTERNATE: NA ☐ CAT A, B 900-2, CAT C 900-2 3/4, CAT D 900-3

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
LNAV MDA	7360	1 1/4	888	7360	1 1/4	888	7360	2 1/2	888	7360	2 1/2	888			
CIRCLING	7360	1 1/4	888	7360	1 1/4	888	7360	2 3/4	888	7360	3	888			

CHANGES - REASONS

1. RAISED LNAV MDA FROM 7140 TO 7360 ALL CATS AND LNAV CAT A/B VISIBILITY FROM 1 SM TO 1 1/4 SM, CAT C/D FROM 1 3/4 AND 2 SM TO 2 1/2 SM. - NEW MISSED SECTION 2 CONTROLLING OBSTACLE.
2. RAISED CIRCLING MDA FROM 7140 TO 7360 CATS A/B/C AND VISIBILITY CATS A/B FROM 1 SM TO 1 1/4 SM, CAT C FROM 1 3/4 SM TO 2 3/4 SM. - NEW MISSED SECTION 2 CONTROLLING OBSTACLE.
3. UPDATED STEPDOWN AND A/B/C CIRLING CONTROLLING OBSTACLES. - OBSTACLES VERIFIED AND ASSIGNED ID NUMBERS IN AIRNAV.
4. REMOVED: DME/DME RNP-0.3 NA - UPDATED TO CURRENT CRITERIA.
5. ADDED: PBN REQUIREMENTS NOTE RNP APCH - UPDATED TO CURRENT CRITERIA.
6. ADDED: 20:1 IS CLEAR - UPDATED TO CURRENT CRITERIA.
7. REMOVED VDP - VDP LESS THAN .5 NM FROM STEPDOWN FIX.
8. UPDATED 34:1 PENETRATIONS - NEW PENETRATIONS AND NEW OBST ID'S.
9. REMOVED AAO FROM MISSED APPROACH AS LEVEL SURFACE CONTROLLING OBSTACLE. - NEW CONTROLLING OBSTACLE.
10. ADDED BACK-UP ALTIMETER STATEMENT TO BACK OF -9. - KGUP ON WMSCR/FOR RECORD KEEPING.
11. ADDED: "CHART PROFILE NOTE VGSI AND DESCENT ANGLES NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET})"- VGSI TCH 48.2.



<u>AIRPORT</u> GALLUP MUNI	<u>AIRPORT ID</u> KGUP	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 24	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>CITY</u> GALLUP	<u>STATE</u> NM
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: ZAB, ABQ FSS, AMGR, ATA					
<u>FLIGHT CHECKED BY</u> KENNETH E JACK	Digitally signed by ROBERT G HAMILTON May 30, 2018		<u>OFFICE</u> FICO	<u>DATE</u> 5/24/18	
<u>DEVELOPED BY</u> LONNIE EVERHART (ANDRE TUCKER)	Digitally signed by ROBERT G HAMILTON May 30, 2018		<u>OFFICE</u> AJV-5400	<u>DATE</u> 04/11/2018	
<u>APPROVED BY</u> LONNIE EVERHART	Digitally signed by ROBERT G HAMILTON May 30, 2018		<u>OFFICE</u> AJV-5400	<u>DATE</u>	<u>TITLE</u> MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> BUFFALO NIAGARA INTL	<u>AIRPORT ID</u> KBUF	<u>PROCEDURE NAME</u> RNAV (RNP) Z RWY 23	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>CITY</u> BUFFALO	<u>STATE</u> NY	
<u>AIRPORT ELEVATION</u> 727	<u>TDZE</u> 726	<u>SUPERSEDED</u> RNAV (RNP) Z RWY 23	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>DATED</u> 05/24/2018	<u>MAG VAR</u> 11W	<u>EPOCH YEAR</u> 2015
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
SUSKE	IAF	BUFST		TF	FB	1.00	063.15	6.65	5500
BUFST		FOTBL		TF	FB	1.00	063.23	4.55	5000
TRAVA	IAF	BUULS		TF	FB	1.00	235.07	5.57	2700
FOTBL	IF	ZADUM		TF	FB	1.00	054.89	3.45	3900
COZZS	IF	EFFCT		TF	FB	1.00	055.00	3.14	4000
WNGGS	IF	JEDAR		TF	FB	1.00	351.85	3.00	3200
ZADUM		JABET		RF	FB	1.00	(2.49 NM RADIUS CW (CFQFT))	4.12	2700
EFFCT		JEDAR		RF	FB	1.00	(2.49 NM RADIUS CCW (CFNBR))	2.75	3200
JEDAR		ZUDAT		RF	FB	1.00	(2.62 NM RADIUS CCW (CFHSN))	2.00	2600
JABET		BIILS		RF	FB	1.00	(2.02 NM RADIUS CW (CFJJB))	3.00	1800
BUULS	IF	BIILS	PFAF	TF	FB	1.00	235.02	3.00	1800
ZUDAT		BIILS		RF	FB	1.00	(2.02 NM RADIUS CCW (CFJRZ))	2.57	1800
BIILS	PFAF	RW23	MAP	TF	FO	0.30	234.98	3.21	
		WABUS		TF	FO	1.00	234.95	13.50	3000



MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 ON THE RNAV MISSED APPROACH ROUTE TO WABUS AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF	(IAF)
2.	PROFILE STARTS AT BIILS				
3. FAC:	234.98	PFAF: BIILS	DIST PFAF TO MAP:	DIST PFAF TO THLD:	
4. MIN ALT:	BILLS 1800				
5. DIST TO THLD FROM OM:	3.21	MM:	IM:	150 HAT:	388 HAT: 1.06
6. MIN GP INCPT:	1800	GP ALT AT PFAF :	OM:	GS ANT:	
7. GP ANGLE:	3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 51.1#	MM: IM:
8. MSA FROM:	RW23 3900				

PBN REQUIREMENTS NOTES:

RNP AR APCH.

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -18C OR ABOVE 54C.
CHART PROFILE NOTE: SEE PLANVIEW FOR MULTIPLE IF LOCATIONS.
CHART PLANVIEW NOTE ADJACENT TO SUSKE IAF, WNNGS IF, COZZS IF: RF REQUIRED.
CHART SPEED ICON IN PLANVIEW AT FOTBL, BUULS, WNNGS, COZZS: MAX 210 KIAS
CHART NOTE: FOR INOPERATIVE ALSF, INCREASE RNP 0.10 ALL CATS VISIBILITY TO 1 1/4
CHART NOTE: FOR INOPERATIVE ALSF, INCREASE RNP 0.20 ALL CATS VISIBILITY TO 1 1/2
CHART NOTE: FOR INOPERATIVE ALSF, INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 3/4

ADDITIONAL FLIGHT DATA:

#TCH 777.0 MSL (DO NOT CHART)
ROUTE TYPE: A, H
ROUTE TYPE QUALIFIER 1: F
ROUTE TYPE QUALIFIER 2: S
CHART MANDATORY 5000 AT FOTBL
CHART MANDATORY 5000 AT COZZS
CHART MANDATORY 4000 AT WNNGS
CHART MANDATORY 2700 AT BUULS
CHART MINIMUM 5500 AT SUSKE
CHART MINIMUM 3500 AT TRAVA
HOLD SW, RT, 054.81 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD



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
AUTHORIZATION REQUIRED															
RNP 0.10 DA	1114	4500	388	1114	4500	388	1114	4500	388	1114	4500	388			
RNP 0.20 DA	1170	5500	444	1170	5500	444	1170	5500	444	1170	5500	444			
RNP 0.30 DA	1228	1 1/4	502	1228	1 1/4	502	1228	1 1/4	502	1228	1 1/4	502			

CHANGES - REASONS

ADDED "STANDARD" TO ALTERNATE MINIMUMS - IAW 8260.19H PARA 8-6-11B(4).



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: AIRPORT MANAGER, AVIATION MANAGER, ZOB ARTCC, BUF APP CON, ATA

Digitally signed by

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

OFFICE

DATE

ADOLFO D URRUTIA
May 23, 2018

DEVELOPED BY

DAVID TEFFETELLER (KWEKU DONKOR)

OFFICE

DATE

Digitally signed by
ADOLFO D URRUTIA
May 23, 2018

APPROVED BY

PATRICK MULQUEEN

Digitally signed by
ADOLFO D URRUTIA
May 23, 2018

OFFICE

DATE

TITLE
MANAGER



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
NEW YORK, NY	LONG ISLAND MAC ARTHUR	13 SEPTEMBER 2018	5A

TAKEOFF MINIMUMS:
STANDARD

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 06, LIGHTING 1 FT FROM DER, ON CENTERLINE, 99 FT MSL. TREE 902 FT FROM DER, 663 FT RIGHT OF CENTERLINE, 43 FT AGL/140 FT MSL. TREES BEGINNING 1221 FT FROM DER, 708 FT RIGHT OF CENTERLINE, UP TO 148 FT MSL. TREE 1390 FT FROM DER, 854 FT LEFT OF CENTERLINE, 40 FT AGL/144 FT MSL. TREES BEGINNING 1515 FT FROM DER, 799 FT LEFT OF CENTERLINE, UP TO 148 FT MSL. TREES BEGINNING 1888 FT FROM DER, 938 FT LEFT OF CENTERLINE, UP TO 151 FT MSL. TREES BEGINNING 2014 FT FROM DER, 857 FT RIGHT OF CENTERLINE, UP TO 156 FT MSL. TREES BEGINNING 2140 FT FROM DER, 853 FT LEFT OF CENTERLINE, UP TO 155 FT MSL. TREES BEGINNING 2269 FT FROM DER, 849 FT LEFT OF CENTERLINE, UP TO 166 FT MSL. TREE 2332 FT FROM DER, 996 FT RIGHT OF CENTERLINE, 159 FT MSL. TREE 2399 FT FROM DER, 1086 FT RIGHT OF CENTERLINE, 163 FT MSL. POLE, TREE BEGINNING 2457 FT FROM DER, 865 FT LEFT OF CENTERLINE, UP TO 65 FT AGL/175 FT MSL. TREE 2613 FT FROM DER, 727 FT RIGHT OF CENTERLINE, 62 FT AGL/169 FT MSL. TREE 2682 FT FROM DER, 1165 FT RIGHT OF CENTERLINE, 173 FT MSL. TREE 3423 FT FROM DER, 190 FT RIGHT OF CENTERLINE, 75 FT AGL/186 FT MSL. TREE 3563 FT FROM DER, 76 FT LEFT OF CENTERLINE, 77 FT AGL/189 FT MSL.

NOTE: RWY 15L, SIGN 9 FT FROM DER, 66 FT LEFT OF CENTERLINE, 83 FT MSL. TERRAIN BEGINNING 12 FT FROM DER, 458 FT LEFT OF CENTERLINE, UP TO 89 FT MSL. TREES BEGINNING 705 FT FROM DER, 404 FT RIGHT OF CENTERLINE, UP TO 43 FT AGL/122 FT MSL. TREES BEGINNING 732 FT FROM DER, 560 FT RIGHT OF CENTERLINE, UP TO 44 FT AGL/124 FT MSL. TREES BEGINNING 751 FT FROM DER, 317 FT RIGHT OF CENTERLINE, UP TO 45 FT AGL/125 FT MSL. TREES BEGINNING 785 FT FROM DER, 224 FT RIGHT OF CENTERLINE, UP TO 48 FT AGL/128 FT MSL. TREES BEGINNING 843 FT FROM DER, 188 FT RIGHT OF CENTERLINE, UP TO 129 FT MSL. TREES BEGINNING 929 FT FROM DER, 192 FT RIGHT OF CENTERLINE, UP TO 50 FT AGL/130 FT MSL. TREE 933 FT FROM DER, 201 FT LEFT OF CENTERLINE, 113 FT MSL. TREE 952 FT FROM DER, 209 FT LEFT OF CENTERLINE, 114 FT MSL. TREE 974 FT FROM DER, 196 FT LEFT OF CENTERLINE, 118 FT MSL. TREES BEGINNING 977 FT FROM DER, 193 FT LEFT OF CENTERLINE, UP TO 120 FT MSL. TREES BEGINNING 1111 FT FROM DER, 16 FT RIGHT OF CENTERLINE, UP TO 56 FT AGL/136 FT MSL. TREES BEGINNING 1133 FT FROM DER, 199 FT LEFT OF CENTERLINE, UP TO 48 FT AGL/132 FT MSL. TREES BEGINNING 1248 FT FROM DER, 42 FT LEFT OF CENTERLINE, UP TO 133 FT MSL. TREES BEGINNING 1506 FT FROM DER, 24 FT LEFT OF CENTERLINE, UP TO 139 FT MSL. TREES BEGINNING 1572 FT FROM DER, 138 FT LEFT OF CENTERLINE, UP TO 143 FT MSL. TREES BEGINNING 2291 FT FROM DER, 720 FT LEFT OF CENTERLINE, UP TO 145 FT MSL. TREES BEGINNING 2412 FT FROM DER, 802 FT LEFT OF CENTERLINE, UP TO 147 FT MSL.

NOTE: RWY 15R, VEHICLES ON ROAD BEGINNING 175 FT FROM DER, 439 FT RIGHT OF CENTERLINE, UP TO 91 FT MSL. BUILDING 629 FT FROM DER, 666 FT RIGHT OF CENTERLINE, 101 FT MSL. TREE 1213 FT FROM DER, 162 FT LEFT OF CENTERLINE, 109 FT MSL. TREE 1239 FT FROM DER, 101 FT LEFT OF CENTERLINE, 112 FT MSL. TREE 1267 FT FROM DER, 188 FT LEFT OF CENTERLINE, 45 FT AGL/121 FT MSL. TREES BEGINNING 1269 FT FROM DER, 74 FT LEFT OF CENTERLINE, UP TO 43 FT AGL/122 FT MSL. TREES BEGINNING 1295 FT FROM DER, 248 FT LEFT OF CENTERLINE, UP TO 44 FT AGL/124 FT MSL. TREES BEGINNING 1314 FT FROM DER, 178 FT LEFT OF CENTERLINE, UP TO 45 FT AGL/125 FT MSL. TREES BEGINNING 1348 FT FROM DER, 81 FT LEFT OF CENTERLINE, UP TO 48 FT AGL/128 FT MSL. TREES BEGINNING 1406 FT FROM DER, 67 FT LEFT OF CENTERLINE, UP TO 129 FT MSL. TREES BEGINNING 1492 FT FROM DER, 174 FT LEFT OF CENTERLINE, UP TO 50 FT AGL/130 FT MSL. TREES BEGINNING 1675 FT FROM DER, 236 FT LEFT OF CENTERLINE, UP TO 56 FT AGL/136 FT MSL. TREE 1778 FT FROM DER, 924 FT RIGHT OF CENTERLINE, 124 FT MSL.

NOTE: RWY 24, POLE 787 FT FROM DER, 656 FT RIGHT OF CENTERLINE, 38 FT AGL/120 FT MSL. TREE, POLE BEGINNING 826 FT FROM DER, 559 FT LEFT OF CENTERLINE, UP TO 131 FT MSL. TREE 1063 FT FROM DER, 781 FT RIGHT OF CENTERLINE, 137 FT MSL. TREE 1592 FT FROM DER, 892 FT LEFT OF CENTERLINE, 141 FT MSL. TREES BEGINNING 1976 FT FROM DER, 188 FT LEFT OF CENTERLINE, UP TO 142 FT MSL. NOTE: RWY 24, POLE 787 FT FROM DER, 656 FT RIGHT OF CENTERLINE, 38 FT AGL/120 FT MSL. TREE, POLE BEGINNING 826 FT FROM DER, 559 FT LEFT OF CENTERLINE, UP TO 131 FT MSL. TREE 1063 FT FROM DER, 781 FT RIGHT OF CENTERLINE, 137 FT MSL. TREE 1592 FT FROM DER, 892 FT LEFT OF CENTERLINE, 141 FT MSL. TREES BEGINNING 1976 FT FROM DER, 188 FT LEFT OF CENTERLINE, UP TO 142 FT MSL.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
NEW YORK, NY	LONG ISLAND MAC ARTHUR	13 SEPTEMBER 2018	5A

NOTE: RWY 33L, TREES BEGINNING 37 FT FROM DER, 467 FT RIGHT OF CENTERLINE, UP TO 47 FT AGL/145 FT MSL. VEHICLES ON ROAD, TREE BEGINNING 92 FT FROM DER, 309 FT LEFT OF CENTERLINE, UP TO 112 FT MSL. TREE, POLE, VEHICLES ON ROAD BEGINNING 392 FT FROM DER, 250 FT LEFT OF CENTERLINE, UP TO 116 FT MSL. TREES BEGINNING 551 FT FROM DER, 569 FT RIGHT OF CENTERLINE, UP TO 149 FT MSL. TREES BEGINNING 563 FT FROM DER, 487 FT RIGHT OF CENTERLINE, UP TO 50 FT AGL/151 FT MSL. TREE 567 FT FROM DER, 637 FT RIGHT OF CENTERLINE, 153 FT MSL. TREES BEGINNING 579 FT FROM DER, 534 FT RIGHT OF CENTERLINE, UP TO 53 FT AGL/154 FT MSL. TREES BEGINNING 658 FT FROM DER, 519 FT RIGHT OF CENTERLINE, UP TO 53 FT AGL/155 FT MSL. TREE 680 FT FROM DER, 483 FT LEFT OF CENTERLINE, 118 FT MSL. TREES BEGINNING 692 FT FROM DER, 501 FT RIGHT OF CENTERLINE, UP TO 55 FT AGL/158 FT MSL. POLE 699 FT FROM DER, 504 FT LEFT OF CENTERLINE, 32 FT AGL/132 FT MSL. POLE, BUILDING, TREE BEGINNING 719 FT FROM DER, 325 FT LEFT OF CENTERLINE, UP TO 40 FT AGL/140 FT MSL. TREES BEGINNING 860 FT FROM DER, 394 FT RIGHT OF CENTERLINE, UP TO 55 FT AGL/159 FT MSL. TREE, TANK BEGINNING 1075 FT FROM DER, 127 FT LEFT OF CENTERLINE, UP TO 142 FT MSL. TREE 1223 FT FROM DER, 187 FT LEFT OF CENTERLINE, 143 FT MSL. TREES BEGINNING 1224 FT FROM DER, 141 FT LEFT OF CENTERLINE, UP TO 42 FT AGL/145 FT MSL. TREES BEGINNING 1263 FT FROM DER, 61 FT LEFT OF CENTERLINE, UP TO 43 FT AGL/146 FT MSL. TREE, POLE BEGINNING 1290 FT FROM DER, 3 FT RIGHT OF CENTERLINE, UP TO 55 FT AGL/160 FT MSL. TREES BEGINNING 1319 FT FROM DER, 31 FT LEFT OF CENTERLINE, UP TO 47 FT AGL/150 FT MSL. TREES BEGINNING 1523 FT FROM DER, 107 FT LEFT OF CENTERLINE, UP TO 52 FT AGL/155 FT MSL. TOWER, TREE BEGINNING 1528 FT FROM DER, 17 FT LEFT OF CENTERLINE, UP TO 61 FT AGL/163 FT MSL. TREES BEGINNING 1740 FT FROM DER, 6 FT LEFT OF CENTERLINE, UP TO 63 FT AGL/166 FT MSL. TREES BEGINNING 1948 FT FROM DER, 27 FT RIGHT OF CENTERLINE, UP TO 59 FT AGL/166 FT MSL. TREES BEGINNING 2023 FT FROM DER, 13 FT LEFT OF CENTERLINE, UP TO 64 FT AGL/168 FT MSL. TREES BEGINNING 2055 FT FROM DER, 5 FT RIGHT OF CENTERLINE, UP TO 69 FT AGL/174 FT MSL. TREES BEGINNING 2075 FT FROM DER, 26 FT LEFT OF CENTERLINE, UP TO 65 FT AGL/169 FT MSL. TREES BEGINNING 2186 FT FROM DER, 34 FT LEFT OF CENTERLINE, UP TO 68 FT AGL/172 FT MSL. TREES BEGINNING 2791 FT FROM DER, 389 FT RIGHT OF CENTERLINE, UP TO 179 FT MSL. TREES BEGINNING 2796 FT FROM DER, 362 FT RIGHT OF CENTERLINE, UP TO 180 FT MSL. TREES BEGINNING 2893 FT FROM DER, 316 FT RIGHT OF CENTERLINE, UP TO 75 FT AGL/181 FT MSL. TREE 2977 FT FROM DER, 1203 FT LEFT OF CENTERLINE, 173 FT MSL. TREE 3173 FT FROM DER, 30 FT LEFT OF CENTERLINE, 83 FT AGL/188 FT MSL. TREE 3370 FT FROM DER, 114 FT RIGHT OF CENTERLINE, 78 FT AGL/185 FT MSL.

NOTE: RWY 33R, TOWER 324 FT FROM DER, 483 FT RIGHT OF CENTERLINE, 28 FT AGL/118 FT MSL. NAVAID 325 FT FROM DER, 484 FT RIGHT OF CENTERLINE, 125 FT MSL. NAVAID, POLE BEGINNING 725 FT FROM DER, 582 FT LEFT OF CENTERLINE, UP TO 114 FT MSL. TREES BEGINNING 761 FT FROM DER, 14 FT RIGHT OF CENTERLINE, UP TO 130 FT MSL. TREE 785 FT FROM DER, 166 FT LEFT OF CENTERLINE, 117 FT MSL. TREES BEGINNING 796 FT FROM DER, 63 FT LEFT OF CENTERLINE, UP TO 118 FT MSL. TREES BEGINNING 798 FT FROM DER, 34 FT RIGHT OF CENTERLINE, UP TO 138 FT MSL. TREES BEGINNING 808 FT FROM DER, 164 FT LEFT OF CENTERLINE, UP TO 121 FT MSL. TREES BEGINNING 824 FT FROM DER, 19 FT LEFT OF CENTERLINE, UP TO 128 FT MSL. TREES BEGINNING 829 FT FROM DER, 21 FT RIGHT OF CENTERLINE, UP TO 139 FT MSL. TREES BEGINNING 862 FT FROM DER, ON CENTERLINE, UP TO 140 FT MSL. TREES BEGINNING 960 FT FROM DER, 60 FT LEFT OF CENTERLINE, UP TO 129 FT MSL. TREES BEGINNING 970 FT FROM DER, 40 FT RIGHT OF CENTERLINE, UP TO 141 FT MSL. TREES BEGINNING 993 FT FROM DER, 6 FT LEFT OF CENTERLINE, UP TO 133 FT MSL. TREES BEGINNING 1014 FT FROM DER, 4 FT RIGHT OF CENTERLINE, UP TO 146 FT MSL. TREES BEGINNING 1277 FT FROM DER, 16 FT LEFT OF CENTERLINE, UP TO 136 FT MSL. TREES BEGINNING 1463 FT FROM DER, 30 FT LEFT OF CENTERLINE, UP TO 138 FT MSL. TREES BEGINNING 1504 FT FROM DER, 40 FT LEFT OF CENTERLINE, UP TO 142 FT MSL. TREES BEGINNING 1527 FT FROM DER, 4 FT LEFT OF CENTERLINE, UP TO 143 FT MSL. TREES BEGINNING 1969 FT FROM DER, 42 FT LEFT OF CENTERLINE, UP TO 144 FT MSL. TREES BEGINNING 2020 FT FROM DER, 218 FT LEFT OF CENTERLINE, UP TO 145 FT MSL. TREE 2157 FT FROM DER, 196 FT LEFT OF CENTERLINE, 146 FT MSL. TREES BEGINNING 2199 FT FROM DER, 189 FT LEFT OF CENTERLINE, UP TO 147 FT MSL. TOWER 2995 FT FROM DER, 79 FT RIGHT OF CENTERLINE, 108 FT AGL/209 FT MSL.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
NEW YORK, NY	LONG ISLAND MAC ARTHUR	13 SEPTEMBER 2018	5A

CONTROLLING OBSTACLES:

REMARKS:

FLIGHT INSPECTED BY:

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

OFFICE SYMBOL:

Digitally signed by

BEV L BORDY

Jun 04, 2018

DATE:

DEVELOPED BY:

Digitally signed by

LONNIE EVERHART (ALEXANDER MILES)

BEV L BORDY

Jun 04, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

04/17/2018

APPROVED BY:

Digitally signed by

BEV L BORDY

LONNIE EVERHART

Jun 04, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☒	☐	☒

OTHER:

ATA, ZNY, NYC APP CON, KISP ATCT, AMGR, EASTERN FPO

CHANGES - REASONS:

1. REMOVED RWY 10/28 FROM TAKEOFF MINIMUMS - RWY CONVERTED TO TAXIWAY.
2. TAKEOFF OBSTACLES NOTES UPDATED - NEW OBSTACLE EVALUATION COMPLETED.

QUALITY
3
CHECKED

U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, 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 in feet RVR.									
TERMINAL ROUTES										MISSED APPROACH									
FROM		TO		COURSE AND DISTANCE				ALTITUDE											
										ADDITIONAL FLIGHT DATA:									
1. PT ____ SIDE OF COURSE ____ OUTBOUND ____ FT WITHIN ____ MILES OF ____ (IAF)																			
2. _____																			
3. FAC ____ FAF _____ DIST FAF TO MAP ____ THLD _____																			
4. MIN. ALT _____																			
8. MSA FROM: _____										MAG VAR: _____ EPOCH YEAR: _____									
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A									
CATEGORY =====>																			
		MDA	VIS			MDA	VIS			MDA	VIS			MDA	VIS				
NOTES:																			
PROCEDURE CANCELED EFFECTIVE 13 SEPTEMBER 2018																			
CITY AND STATE WELLSVILLE, NY				ELEVATION: 2124 TDZE: AIRPORT NAME: WELLSVILLE MUNI ARPT,TARANTINE FLD				FACILITY IDENTIFIER: ELZ		PROCEDURE NO./AMDТ NO./EFFECTIVE DATE: VOR-A, AMDT 6, 01/18/2007				SUP VOR OR GPS-A AMDT 5B DATE 03/06/2002					

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) 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> JOHN GLENN COLUMBUS INTL	<u>AIRPORT ID</u> KCMH	<u>PROCEDURE NAME</u> RNAV (RNP) Z RWY 10L	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> COLUMBUS	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 815	<u>TDZE</u> 815	<u>SUPERSEDED</u> RNAV (RNP) Z RWY 10L	<u>ORIGINAL/AMENDMENT</u> 1B	<u>DATED</u> 06/22/2017	<u>MAG VAR</u> 7W	<u>EPOCH YEAR</u> 2015
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
PIZZA	IAF	CABMI		TF	FB	1.00	131.00	8.74	3000
LIMPS	IAF	CABMI		TF	FB	1.00	013.88	11.34	3000
CABMI	IF	ALEME	PFAF	TF	FB	1.00	101.03	6.43	2700
ALEME	PFAF	RW10L	MAP	TF	FO	0.30	101.12	5.76	
RW10L	MAP	1400 MSL		CA			101.12		1400
1400 MSL		APE VORTAC		DF	FO	1.00			3000

MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1400 THEN CLIMBING LEFT TURN TO 3000 DIRECT APE VORTAC AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

- PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
- PROFILE STARTS AT CABMI
- FAC: 101.12 PFAF: ALEME DIST PFAF TO MAP: DIST PFAF TO THLD:
- MIN ALT: CABMI 3000, ALEME 2700
- DIST TO THLD FROM PFAF: 5.76 MM: IM: 150 HAT: 327 HAT: 0.87 GS ANT:
- MIN GP INCPT: 2700 GP ALT AT PFAF : ALEME 2700 OM: MM: IM:
- GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 50.1#
- MSA FROM: RW10L 3100



PBN REQUIREMENTS NOTES:

RNP AR APCH.

NOTES:

CHART NOTE: SIMULTANEOUS APPROACH AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -18C OR ABOVE 54C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT LIMPS ON V5 SOUTHWEST BOUND.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.13 ALL CATS VISIBILITY TO RVR 5500, INCREASE RNP 0.26 ALL CATS VISIBILITY TO 1 1/4 SM AND INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 1/2 SM.

ADDITIONAL FLIGHT DATA:

ROUTE TYPE: A,H
ROUTE TYPE QUALIFIER 1:F
ROUTE TYPE QUALIFIER 2:S
#TCH 864.8 MSL (DO NOT CHART)
HOLD NE, RT, 235.00 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
AUTHORIZATION REQUIRED															
RNP 0.13 DA	1142	4000	327	1142	4000	327	1142	4000	327	1142	4000	327			
RNP 0.26 DA	1193	4000	378	1193	4000	378	1193	4000	378	1193	4000	378			
RNP 0.30 DA	1246	5000	431	1246	5000	431	1246	5000	431	1246	5000	431			

CHANGES - REASONS

1. REMOVED CHART PLANVIEW NOTE PROCEDURE NA AT PIZZA - AIRWAY CLEANUP PROJECT, V12 REMOVED AND PIZZA CHANGED TO WP.
2. UPDATED NOTE FROM "SIMULTANEOUS APPROACH AUTHORIZED WITH RWY 10R. USE OF FD OR AP PROVIDING RNAV TRACK GUIDANCE REQUIRED DURING SIMULTANEOUS OPERATIONS" TO "SIMULTANEOUS OPERATIONS AUTHORIZED" - IN ACCORDANCE WITH FAAO 8260.19H PARA 8-6-11. O.(7)(A).
3. REMOVED NOTE: GPS REQUIRED - THIS NOTE NO LONGER REQUIRED.
4. ADDED PBN REQUIREMENTS NOTE: RNP AR APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
5. UPDATED BARO/VNAV NOTE - REMOVED FAHRENHEIT TEMPERATURES IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-9.S.
6. LINE 7: CHANGED 34:1 IS NOT CLEAR TO 34:1 IS CLEAR AND ADDED 20:1 IS CLEAR - NO VISUAL SURFACE PENETRATIONS.

PDF EDIT: 06/12/2018

1. PBN EQUIPMENT REQUIREMENTS NOTES CHANGED FROM "CHART PBN REQUIREMENTS NOTE: RNP AR APCH." TO "RNP AR APCH".



COORDINATED WITH:

A4A ☒ **ALPA** ☒ **AOPA** ☒ **APA** ☒ **HAI** ☐ **NBAA** ☒ **OTHER:** AMGR, CMH ATCT, CMH APP CON, ZID

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

ROBERT G HAMILTON (WILLIAM HANBY)

APPROVED BY

JULIE MORGAN

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

04/11/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

TITLE
MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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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> JOHN GLENN COLUMBUS INTL	<u>AIRPORT ID</u> KCMH	<u>PROCEDURE NAME</u> RNAV (RNP) Z RWY 10R	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> COLUMBUS	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 815	<u>TDZE</u> 809	<u>SUPERSEDED</u> RNAV (RNP) Z RWY 10R	<u>ORIGINAL/AMENDMENT</u> 1B	<u>DATED</u> 06/22/2017	<u>MAG VAR</u> 7W	<u>EPOCH YEAR</u> 2015
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
JOGER	IAF	WOTIT		TF	FB	1.00	037.23	20.02	2900
PIZZA	IAF	WOTIT		TF	FB	1.00	136.93	8.44	2900
WOTIT	IF	SHOSH	PFAF	TF	FB	1.00	101.01	7.12	2700
SHOSH	PFAF	RW10R	MAP	TF	FO	0.30	101.11	5.78	
RW10R	MAP	CORED		TF	FO	1.00	101.20	13.42	3000

MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 ON TRACK 101.20 TO CORED AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
2. PROFILE STARTS AT WOTIT
3. **FAC:** 101.11 **PFAF:** SHOSH **DIST PFAF TO MAP:** **DIST PFAF TO THLD:**
4. **MIN ALT:** WOTIT 2900, SHOSH 2700
5. **DIST TO THLD FROM PFAF:** 5.78 **MM:** **IM:** **150 HAT:** **362 HAT:** 0.98 **GS ANT:**
6. **MIN GP INCPT:** 2700 **GP ALT AT PFAF :** SHOSH 2700 **OM:** **MM:** **IM:**
7. **GP ANGLE:** 3.00 **34:1:** IS CLEAR **20:1:** IS CLEAR **TCH:** 54.0#
8. **MSA FROM:** RW10R 3100



PBN REQUIREMENTS NOTES:

RNP AR APCH.

NOTES:

CHART NOTE: SIMULTANEOUS APPROACH AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -18C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT JOGER ON V5 SOUTHWEST BOUND.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.17 ALL CATS VISIBILITY TO RVR 5900, INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 5/8 SM.

ADDITIONAL FLIGHT DATA:

ROUTE TYPE: A, H
ROUTE TYPE QUALIFIER 1: F
ROUTE TYPE QUALIFIER 2: S
#TCH 859 MSL (DO NOT CHART)
HOLD E, LT, 281.38 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
AUTHORIZATION REQUIRED															
RNP 0.17 DA	1171	3500	362	1171	3500	362	1171	3500	362	1171	3500	362			
RNP 0.30 DA	1288	5500	479	1288	5500	479	1288	5500	479	1288	5500	479			

CHANGES - REASONS

1. REMOVED CHART PLANVIEW NOTE PROCEDURE NA AT PIZZA - AIRWAY CLEANUP PROJECT, V12 REMOVED AND PIZZA CHANGED TO WP.
2. CHANGED NOTE: FOR INOPERATIVE MALSR, INCREASE RNP 0.17 ALL CATS VISIBILITY TO RVR 5900, INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 5/8 MILE" TO "CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.17 ALL CATS VISIBILITY TO RVR 5900, INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 5/8 SM" - PER ORDER 8260.19H, PARA 8-6-11.O.(3)(D).
3. REMOVED NOTE "USE OF FD OR AP PROVIDING RNAV TRACK GUIDANCE REQUIRED DURING SIMULTANEOUS OPERATIONS - NOT REQUIRED FOR RNP APPROACHES PER FAAO 8260.19H PARA 8-6-11. O.(7).
4. CHANGED DISTANCE TO THLD FROM 362 HAT: FROM 0.97 NM TO 0.98 NM - UPDATED IAW AFS APPROVED VISI TOOL.
5. REMOVED NOTE "GPS REQUIRED" - THIS NOTE NO LONGER REQUIRED.
6. ADDED PBN REQUIREMENTS NOTE: RNP AR APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
7. ADDED 20:1 IS CLEAR - NO VISUAL SURFACE PENETRATIONS.
8. UPDATED BARO/VNAV NOTE - REMOVED FAHRENHEIT TEMPERATURES IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-9.S AND UPDATED HIGH TEMPERATURE FROM 38C TO 54C - AFS TEMPERATURE CALCULATOR.

PDF EDITS: 06/06/2018

1. PBN EQUIPMENT REQUIREMENTS NOTES CHANGED FROM "CHART PBN REQUIREMENTS NOTE: RNP AR APCH." TO "RNP AR APCH".

2. PART D: AIRSPACE ADDED THRESHOLD COORDINATES 395937.14N/0825433.04W - NEW SIAP ISSUE, SIAP DROPPING LAT/LONG.

3. ADDED HMAS VALUES - KNOWN PROBLEM, SIAP HMAS ENTRIES DO NOT POPULATE NEW FORMS 8260-9.



COORDINATED WITH:

A4A ☒ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: CMH APP CON, CMH ATCT, ZID, AMGR., ATA

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

ROBERT G HAMILTON (WILLIAM HANBY)

APPROVED BY

JULIE MORGAN

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

04/12/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

TITLE

MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> DELAWARE MUNI - JIM MOORE FIELD	<u>AIRPORT ID</u> KDLZ	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 10	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> DELAWARE	<u>STATE</u> OH
<u>AIRPORT ELEVATION</u> 945	<u>TDZE</u> 945	<u>SUPERSEDED</u> RNAV (GPS) RWY 10	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 01/05/2017	<u>MAG VAR</u> 6W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
ESSIE		KIRRA		TF	FB	2.00	173.77	8.20	2600
PIZZA		VIBCO		TF	FB	2.00	338.26	6.93	2600
KIRRA	IAF	MOSQI		TF	FB	1.00	194.19	6.50	2600
VIBCO	IAF	MOSQI		TF	FB	1.00	014.17	6.50	2600
MOSQI	IF	ITTOW		TF	FB	1.00	104.18	6.76	2600
ITTOW	FAF	CODOX/2.30 NM TO RW10		TF	FB	0.30	104.26	2.76	
CODOX/2.30 NM TO RW10		RW10	MAP	TF	FO	0.30	104.26	2.30	
RW10	MAP	1195 MSL		CA			104.26		
1195 MSL		PICUM		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW10

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT PICUM AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. PROFILE STARTS AT MOSQI
3. FAC: 104.26

FAF: ITTOW

DIST FAF TO MAP: 5.06

DIST FAF TO THLD: 5.06
4. MIN ALT: MOSQI 2600, ITTOW 2600, CODOX/2.30 NM TO RW10 1720*
5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

250 HAT: 0.65
6. MIN GP INCPT: 2600

GP ALT AT FAF : ITTOW 2600

OM:

MM:

IM:
7. GP ANGLE: 3.00

34:1: IS CLEAR

20:1: IS CLEAR

TCH: 43.4
8. MSA FROM: RW10 3100

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APPROACH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT ESSIE ON V279 NORTHWEST BOUND.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.04 NM TO RW10*
*LNAV ONLY
WAAS CHANNEL #90506
REFERENCE PATH ID: W10A
CHART FAS OBST: 1076 TREE 401648N/0831036W.
HOLD E, RT, 284.51 INBOUND
LTP HAE: 253.9 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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	1195	7/8	250	1195	7/8	250	1195	7/8	250	1195	7/8	250			
LNAV/VNAV DA	1231	1	286	1231	1	286	1231	1	286	1231	1	286			
LNAV MDA	1340	1	395	1340	1	395	1340	1	395	1340	1	395			
CIRCLING	1420	1	475	1420	1	475	1560	1	615	1560	2	615			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
DELAWARE MUNI - JIM MOORE FIELD	KDLZ	RNAV (GPS) RWY 10	1A	DELAWARE	OH

CHANGES - REASONS

- 1. DELETED CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT PIZZA ON V12 EASTBOUND - THIS PORTION OF V12 IS TO BE CANCELLED - 14 CFR PART 71, V12, P. 1584.
- 2. AMENDED RNP VALUE ON IF FROM 0.5 TO 1.0 - 8260.58A, TABLE 1-2-1.
- 3. ADDED RNP APCH TO PBN EQUIPMENT REQUIREMENT NOTES - 8260.19H, CH 8, 8-6-8 B(1).
- 4. REMOVED CHART NOTE: DME/DME RNP 0.3 NA - 8260.19H, CH 8, 8-6-8 N.
- 5. AMENDED CHART NOTE: FOR UNCOMPENSATED BARO-NAV SYSTEMS, LNAV/VNAV NA BELOW -16C (4F) OR ABOVE 54C (10F) TO CHART NOTE: FOR UNCOMPENSATED BARO-NAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C - 8260.19H, CH 8, 8-6-9 S.
- 6. CHANGED CRC REMAINDER FROM 3D6E4792 TO 2E1B4F10 - LTP/FPAP COORDINATES UPDATED, AND LTP/FPAP ELLIPSOIDAL AND LTP/FPAP ORTHOMETRIC HEIGHTS UPDATED.
- 7. ON LINE 7, ADDED 20:1 IS CLEAR - CHARTING REQUIREMENT PER 8260.19H, 8-6-7 G(3).



COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☐ **HAI** ☐ **NBAA** ☒ **OTHER:** ZOB, ZID, CMH APP CON, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

LONNIE EVERHART (KELLY CARLSON)

APPROVED BY

LONNIE EVERHART

OFFICE

OFFICE

AJV-5400

OFFICE

AJV-5400

DATE

DATE

04/06/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Apr 25, 2018

Digitally signed by
ROBERT G HAMILTON
Apr 25, 2018

Digitally signed by
ROBERT G HAMILTON
Apr 25, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KDLZ
RUNWAY	RW10
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W10A
LTP/FTP LATITUDE	401650.5075N
LTP/FTP LONGITUDE	0830725.2010W
LTP/FTP ELLIPSOIDAL HEIGHT	+02539
FPAP LATITUDE	401637.5710N
FPAP LONGITUDE	0830530.0140W
THRESHOLD CROSSING HEIGHT (TCH)	00043.4
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0984
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	2E1B4F10
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+02878
FPAP ORTHOMETRIC HEIGHT	+02878



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> DELAWARE MUNI - JIM MOORE FIELD	<u>AIRPORT ID</u> KDLZ	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> DELAWARE	<u>STATE</u> OH
<u>AIRPORT ELEVATION</u> 945	<u>TDZE</u> 945	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 01/05/2017	<u>MAG VAR</u> 6W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
MEEKS		ITENY		TF	FB	2.00	133.52	24.91	3000
PIZZA		HABNI		TF	FB	2.00	089.26	21.74	3100
ITENY	IAF	PICUM		TF	FB	1.00	194.54	6.50	3000
HABNI	IAF	PICUM		TF	FB	1.00	014.52	6.50	3000
PICUM	IF	WEBUT		TF	FB	1.00	284.53	7.22	2600
WEBUT	FAF	RW28	MAP	TF	FO	0.30	284.42	5.07	
RW28	MAP	1195 MSL		CA			284.42		
1195 MSL		MOSQI		DF	FO	1.00			2600

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2600 DIRECT MOSQI AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. PROFILE STARTS AT PICUM
3. FAC: 284.42

FAF: WEBUT

DIST FAF TO MAP: 5.07

DIST FAF TO THLD: 5.07
4. MIN ALT: PICUM 3000, WEBUT 2600
5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

250 HAT: 0.66
6. MIN GP INCPT: 2600

GP ALT AT FAF : WEBUT 2600

OM:

MM:

IM:
7. GP ANGLE: 3.00

34:1: IS NOT CLEAR

20:1: IS CLEAR

TCH: 40.7
8. MSA FROM: RW28 3100

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APPROACH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT MEEKS ON V38 NORTHWEST BOUND.
CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART VDP AT 1.36 NM TO RW28*
*LNAV ONLY
WAAS CHANNEL #50506
REFERENCE PATH ID: W28A
FAS OBST: 1160 AAO 401559N/0830037W.
HOLD W, LT, 104.18 INBOUND
LTP HAE: 254 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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	1195	7/8	250	1195	7/8	250	1195	7/8	250	1195	7/8	250			
LNAV/VNAV DA	1406	1 3/4	461	1406	1 3/4	461	1406	1 3/4	461	1406	1 3/4	461			
LNAV MDA	1420	1	475	1420	1	475	1420	1 3/8	475	1420	1 3/8	475			
CIRCLING	1420	1	475	1420	1	475	1560	1 3/4	615	1560	2	615			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
DELAWARE MUNI - JIM MOORE FIELD	KDLZ	RNAV (GPS) RWY 28	1A	DELAWARE	OH

CHANGES - REASONS

- 1. DELETED CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT PIZZA ON V12 EASTBOUND - THIS PORTION OF V12 IS TO BE CANCELLED - 14 CFR PART 71, V12, P. 1584.
- 2. AMENDED RNP VALUE ON IF FROM 0.5 TO 1.0 - 8260.58A, TABLE 1-2-1.
- 3. ADDED RNP APCH TO PBN EQUIPMENT REQUIREMENT NOTES - 8260.19H, CH 8, 8-6-8 B(1).
- 4. REMOVED CHART NOTE: DME/DME RNP 0.3 NA - 8260.19H, CH 8, 8-6-8 N.
- 5. AMENDED CHART NOTE: FOR UNCOMPENSATED BARO-NAV SYSTEMS, LNAV/VNAV NA BELOW -16C (4F) OR ABOVE 54C (10F) TO CHART NOTE: FOR UNCOMPENSATED BARO-NAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C - 8260.19H, CH 8, 8-6-9 S.
- 6. CHANGED CRC REMAINDER FROM 5E9E2FEE TO DAA8BA73 - LTP/FPAP COORDINATES UPDATED, AND LTP/FPAP ELLIPSOIDAL AND LTP/FPAP ORTHOMETRIC HEIGHTS UPDATED.
- 7. ON LINE 7, ADDED 20:1 IS CLEAR - CHARTING REQUIREMENT PER 8260.19H, 8-6-7 G(3).



COORDINATED WITH:

A4A ☐ **ALPA** ☒ **AOPA** ☒ **APA** ☐ **HAI** ☐ **NBAA** ☒ **OTHER:** ZOB, ZID, CMH APP CON, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

LONNIE EVERHART (KELLY CARLSON)

APPROVED BY

LONNIE EVERHART

OFFICE

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AJV-5400

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AJV-5400

DATE

DATE

04/09/2018

DATE

Digitally signed by
ROBERT G HAMILTON

Apr 25, 2018

Digitally signed by
ROBERT G HAMILTON

Apr 25, 2018

Digitally signed by
ROBERT G HAMILTON

Apr 25, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KDLZ
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	401642.1955N
LTP/FTP LONGITUDE	0830611.1605W
LTP/FTP ELLIPSOIDAL HEIGHT	+00254
FPAP LATITUDE	401655.1205N
FPAP LONGITUDE	0830806.3505W
THRESHOLD CROSSING HEIGHT (TCH)	00040.7
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0984
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	DAA8BA73
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+02879
FPAP ORTHOMETRIC HEIGHT	+02879



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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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> MADISON COUNTY	<u>AIRPORT ID</u> KUYF	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 9	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>CITY</u> LONDON	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 1082	<u>TDZE</u> 1082	<u>SUPERSEDED</u> RNAV (GPS) RWY 9	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 09/25/2008	<u>MAG VAR</u> 6W	<u>EPOCH YEAR</u> 2000
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
JOGER		OHOZE		TF	FB	2.00	302.73	15.63	3000
MECAN		NOGJO		TF	FB	2.00	249.57	11.02	3000
BONEE		NOGJO		TF	FB	2.00	111.43	10.84	3000
NOGJO	IAF	FENLU	NOPT	TF	FB	1.00	182.46	5.00	3000
OHOZE	IAF	FENLU	NOPT	TF	FB	1.00	002.46	5.00	3000
FENLU	IF/IAF	SUREW		TF	FB	1.00	092.46	6.20	2800
SUREW	FAF	RW09	MAP	TF	FB	0.30	092.55	5.20	
RW09	MAP	1332 MSL		CA			092.55		
1332 MSL		AKPUC		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW09

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT AKPUC AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD W FENLU, RT, 092.46 INBOUND, 3000 FT. IN LIEU OF PT (IF/IAF), MAX 8000.

3. FAC: 092.55 FAF: SUREW DIST FAF TO MAP: 5.20 DIST FAF TO THLD: 5.20

4. MIN ALT: FENLU 3000, SUREW 2800

5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 250 HAT: 0.66 GS ANT: MM: IM:

6. MIN GP INCPT: 2800 GP ALT AT FAF : SUREW 2800 OM: MM: IM:

7. GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 40.0

8. MSA FROM: RW09 3100

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -17C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT JOGER ON V5 NORTHEAST BOUND.

ADDITIONAL FLIGHT DATA:

CHART VDP AT 1.47 NM TO RW09*
*LNAV ONLY
WAAS CHANNEL #53409
REFERENCE PATH ID: W09A
HOLD E, RT, 272.79 INBOUND
LTP HAE: 296.7 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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	1332	1	250	1332	1	250	1332	1	250	1332	1	250			
LNAV/VNAV DA	1548	1 3/4	466	1548	1 3/4	466	1548	1 3/4	466	1548	1 3/4	466			
LNAV MDA	1580	1	498	1580	1	498	1580	1 3/8	498	1580	1 1/2	498			
CIRCLING	1600	1	518	1640	1	558	1640	1 1/2	558	1640	2	558			



CHANGES - REASONS

- 1. DELETED NOTE: DME/DME RNP-0.3 NA - REPLACED BY EQUIPMENT REQUIREMENT NOTE.
- 2. ADDED PBN REQUIREMENTS NOTE: RNP APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
- 3. DELETED NOTE: OBTAIN LOCAL ALTIMETER SETTING ON CTAF; WHEN NOT RECEIVED, USE SPRINGFIELD ALTIMETER SETTING AND INCREASE ALL DA 47 FEET AND ALL MDA 60 FEET AND LNAV CAT C/D AND CIRCLING CAT C VISIBILITY 1/4 MILE - LOCAL AWOS HAS BEEN INSTALLED AND IS ON WMSCR, BACK-UP ALTIMETER ADJUSTMENTS MOVED TO FORM 8260-9 FOR CONTINGENCY USE.
- 4. DELETED NOTE: BARO-VNAV AND VDP NA WHEN USING SPRINGFIELD ALTIMETER SETTING - KUYF AWOS ON WMSCR, BACK-UP ALTIMETER ADJUSTMENTS MOVED TO FORM 8260-9 FOR CONTINGENCY USE.
- 5. ADDED PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL AT JOGER ON V5 NORTHEAST BOUND - TURN EXCEEDS 90 DEGREES.
- 6. ADDED 20:1 IS CLEAR - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-7G(3).
- 7. ADDED VDP AT 1.47 TO RW09 - IN ACCORDANCE WITH FAAO 8260.19H, PARA 2-6-5A.
- 8. AMENDED 34:1 IS NOT CLEAR TO 34:1 IS CLEAR - VISUAL SURFACES CLEAR OF PENETRATIONS.
- 9. DELETED NOTE: VISIBILITY REDUCTION BY HELICOPTERS NA - NO LONGER REQUIRED, VISUAL SURFACES CLEAR OF PENETRATIONS.
- 10. AMENDED LNAV CAT C VISIBILITY FROM 1 1/4 TO 1 3/8 - COMPUTED IN ACCORDANCE WITH FAAO 8260.3C, TABLE 3-1-1.
- 11. REMOVED FAHRENHEIT VALUES FROM UNCOMPENSATED BARO-VNAV TEMPERATURE LIMITS AND AMENDED HIGH LIMIT FROM 46C TO 54C - FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-9S. HIGH TEMP CALCULATED USING AFS LOW/HIGH TEMPERATURE LIMIT CALCULATOR.
- 12. ADDED A CA LEG TO MISSED APPROACH SEGMENT - IN ACCORDANCE WITH CURRENT DOCUMENTATION POLICY.
- 13. AMENDED ALTERNATE MINIMUMS FROM NA TO STANDARD - AWOS INSTALLED AT AIRPORT SINCE LAST AMENDMENT AND IS ON WMSCR.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, DAY APP CON, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

PETER R. GUIMOND
Digitally signed by PETER R GUIMOND
May 07, 2018

APPROVED BY

JULIE MORGAN

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

05/07/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KUYF
RUNWAY	RW09
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W09A
LTP/FTP LATITUDE	395556.6015N
LTP/FTP LONGITUDE	0832808.8055W
LTP/FTP ELLIPSOIDAL HEIGHT	+02967
FPAP LATITUDE	395601.8400N
FPAP LONGITUDE	0832613.1800W
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	1528
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	41E8E712

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+03296
FPAP ORTHOMETRIC HEIGHT	+03296



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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 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> MADISON COUNTY	<u>AIRPORT ID</u> KUYF	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 27	<u>ORIGINAL/AMENDMENT</u> ORIG-A	<u>CITY</u> LONDON	<u>STATE</u> OH
<u>AIRPORT ELEVATION</u> 1082	<u>TDZE</u> 1073	<u>SUPERSEDED</u> RNAV (GPS) RWY 27	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 09/25/2008	<u>MAG VAR</u> 6W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2000

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>
JOGER		UHAGY		TF	FB	2.00	053.76	12.47	3000
MECAN		MELUQ		TF	FB	2.00	110.82	13.78	3000
UHAGY	IAF	AKPUC	NOPT	TF	FB	1.00	002.79	5.00	3000
MELUQ	IAF	AKPUC	NOPT	TF	FB	1.00	182.79	5.00	3000
AKPUC	IF/IAF	FOFWI		TF	FB	1.00	272.79	6.20	2700
FOFWI	FAF	JADMU/2.10 NM TO RW27		TF	FB	0.30	272.70	2.88	
JADMU/2.10 NM TO RW27		RW27	MAP	TF	FO	0.30	272.70	2.10	
RW27	MAP	1400 MSL		CA			272.70		
1400 MSL		FENLU		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW27

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT FENLU AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD E AKPUC, RT, 272.79 INBOUND, 3000 FT. IN LIEU OF PT (IF/IAF), MAX 8000.
3. FAC: 272.70 PFAF: FOFWI DIST PFAF TO MAP: 4.98 DIST PFAF TO THLD: 4.98
4. MIN ALT: AKPUC 3000, FOFWI 2700, JADMU/2.10 NM TO RW27 1740*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 327 HAT: 0.97 GS ANT:
6. MIN GP INCPT: 2700 GP ALT AT PFAF : FOFWI 2700 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM: RW27 3100

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:

CHART NOTE: RWY 27 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -17C OR ABOVE 54C.
CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT JOGER ON V5 SOUTHWEST BOUND.

ADDITIONAL FLIGHT DATA:

CHART VDP AT 1.44 NM TO RW27*
*LNAV ONLY
WAAS CHANNEL #61009
REFERENCE PATH ID: W27A
CHART FAS OBST: 1179 TREE 395536N/0832709W.
HOLD W, RT, 092.46 INBOUND
LTP HAE: 287.4 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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	1400	1 1/4	327	1400	1 1/4	327	1400	1 1/4	327	1400	1 1/4	327			
LNAV/VNAV DA	1449	1 1/2	376	1449	1 1/2	376	1449	1 1/2	376	1449	1 1/2	376			
LNAV MDA	1540	1	467	1540	1	467	1540	1 3/8	467	1540	1 1/2	467			
CIRCLING	1600	1	518	1640	1	558	1640	1 1/2	558	1640	2	558			



CHANGES - REASONS

- 1. DELETED NOTE: DME/DME RNP-0.3 NA - REPLACED BY EQUIPMENT REQUIREMENT NOTE.
- 2. ADDED PBN REQUIREMENTS NOTE: RNP APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
- 3. DELETED NOTE: OBTAIN LOCAL ALTIMETER SETTING ON CTAF; WHEN NOT RECEIVED, USE SPRINGFIELD ALTIMETER SETTING AND INCREASE ALL DA 47 FEET AND ALL MDA 60 FEET AND LPV VISIBILITY 1/4 MILE ALL CATS, LNAV CAT C/D 1/4 MILE, AND CIRCLING CAT C 1/4 MILE - LOCAL AWOS HAS BEEN INSTALLED AND IS ON WMSCR, BACK-UP ALTIMETER ADJUSTMENTS MOVED TO FORM 8260-9 FOR CONTINGENCY USE.
- 5. DELETED NOTE: BARO-VNAV AND VDP NA WHEN USING SPRINGFIELD ALTIMETER SETTING - KUYF AWOS ON WMSCR, BACK-UP ALTIMETER ADJUSTMENTS MOVED TO FORM 8260-9 FOR CONTINGENCY USE.
- 6. AMENDED THE WORD "VIA" TO READ "ON" IN PLANVIEW NOTE AT JOGER - IN ACCORDANCE WITH CURRENT DOCUMENTATION POLICY.
- 7. DELETED NOTE: VISIBILITY REDUCTION BY HELICOPTERS NA - REPLACED BY UPDATED NOTE.
- 8. ADDED NOTE: RWY 27 HELICOPTER VISIBILITY BELOW 3/4 SM NOT AUTHORIZED - FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-11(K)(3).
- 9. DELETED PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT MECAN VIA V12 WESTBOUND - V12 AIRWAY BEING CANCELED IN CONJUNCTION WITH RID VOR DECOMMISSIONING.
- 10. REMOVED FAHRENHEIT VALUES FROM UNCOMPENSATED BARO-VNAV TEMPERATURE LIMITS AND AMENDED HIGH LIMIT FROM 46C TO 54C - FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-9S. HIGH TEMP CALCULATED USING AFS LOW/HIGH TEMPERATURE LIMIT CALCULATOR.
- 11. AMENDED LNAV CAT C VISIBILITY FROM 1 1/4 TO 1 3/8 - COMPUTED IN ACCORDANCE WITH FAAO 8260.3C, TABLE 3-1-1.
- 12. ADDED 20:1 IS CLEAR - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-7G(3).
- 13. ADDED A CA LEG TO MISSED APPROACH SEGMENT - IN ACCORDANCE WITH CURRENT DOCUMENTATION POLICY.
- 14. AMENDED ALTERNATE MINIMUMS FROM NA TO STANDARD - AWOS INSTALLED AT AIRPORT SINCE LAST AMENDMENT AND IS ON WMSCR.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZID, DAY APP CON, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-33) MEMO, DEC 22, 2017.

DEVELOPED BY

PETER R. GUIMOND

APPROVED BY

JULIE MORGAN

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

05/07/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 22, 2018

TITLE
MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KUYF
RUNWAY	RW27
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W27A
LTP/FTP LATITUDE	395558.9285N
LTP/FTP LONGITUDE	0832717.5415W
LTP/FTP ELLIPSOIDAL HEIGHT	+02874
FPAP LATITUDE	395553.6700N
FPAP LONGITUDE	0832913.1700W
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	1528
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	FEADAEF3

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+03203
FPAP ORTHOMETRIC HEIGHT	+03203



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> KNOX COUNTY	<u>AIRPORT ID</u> K4I3	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1C	<u>CITY</u> MOUNT VERNON	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 1191	<u>TDZE</u> 1189	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1B	<u>DATED</u> 03/29/2018	<u>MAG VAR</u> 6W	<u>EPOCH YEAR</u> 1990
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
APE VORTAC		TUCUG		TF	FB	2.00	098.75	13.45	3000
ROSCO	IAF	PATIE	NOPT	TF	FB	1.00	304.59	13.64	2800
TUCUG	IAF	PATIE	NOPT	TF	FB	1.00	013.85	9.80	2800
PATIE	IF/IAF	WEBUB		TF	FB	1.00	283.87	6.90	2700
WEBUB	FAF	SLAPT/1.70 NM TO RW28		TF	FB	0.30	283.77	2.94	
SLAPT/1.70 NM TO RW28		RW28	MAP	TF	FO	0.30	283.77	1.70	
RW28	MAP	1389 MSL		CA			283.77		
1389 MSL		BONIF		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT BONIF AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. HOLD E PATIE, RT, 283.87 INBOUND, 2800 FT. IN LIEU OF PT (IAF), MAX 6000.
3. FAC: 283.77 FAF: WEBUB DIST FAF TO MAP: 4.64 DIST FAF TO THLD: 4.64
4. MIN ALT: PATIE 2800, WEBUB 2700, SLAPT/1.70 NM TO RW28 1760*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 200 HAT: 0.50
6. MIN GP INCPT: 2700 GP ALT AT FAF : WEBUB 2700 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM: RW28 3100

PBN EQUIPMENT REQUIREMENTS NOTES

CHART PBN REQUIREMENTS NOTE: RNP APCH.

NOTES:

CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON APE VORTAC AIRWAY RADIALS 055 CW 168.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -17C OR ABOVE 36C.

ADDITIONAL FLIGHT DATA:

CHART VDP AT 0.99 NM TO RW28*
*LNAV ONLY
WAAS CHANNEL #69423
REFERENCE PATH ID: W28A
CHART FAS OBST: 1273 TREE 401954N/0823119W.
HOLD W, RT, 103.50 INBOUND
LTP HAE: 327 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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	1389	1	200	1389	1	200	1389	1	200	1389	1	200			
LNAV/VNAV DA	1439	1	250	1439	1	250	1439	1	250	1439	1	250			
LNAV MDA	1540	1	351	1540	1	351	1540	1	351	1540	1	351			
CIRCLING	1660	1	469	1660	1	469	1660	1 1/2	469	1780	2	589			

CHANGES - REASONS

1. ARINC CODING - ROSCO (IAF) FIX TYPE CHANGED FROM GROUND BASED TO WAYPOINT.

RNAV (GPS) RWY 28, AMDT 1C DOES NOT MEET REQUIREMENTS FOR PERIODIC REVIEW.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB, AMGR

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

DAVID A. DOWLING

APPROVED BY

JULIE MORGAN

Digitally signed by
DAVID A DOWLING
Apr 26, 2018

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

04/16/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Apr 27, 2018

Digitally signed by
ROBERT G HAMILTON
Apr 27, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	K4I3
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	401940.4485N
LTP/FTP LONGITUDE	0823058.6955W
LTP/FTP ELLIPSOIDAL HEIGHT	+00327
FPAP LATITUDE	401952.3800N
FPAP LONGITUDE	0823254.1600W
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	1072
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0
 CRC REMAINDER	 2ABE41F4

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+03608
FPAP ORTHOMETRIC HEIGHT	+03608



RNAV - STANDARD INSTRUMENT APPROACH PROCEDURE TITLE 14 CFR PART 97.33				Bearings, headings, courses, 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 in feet RVR.												
TERMINAL ROUTES										MISSED APPROACH						
FROM		TO			COURSE AND DISTANCE			ALTITUDE		LNAV: RW15 CLIMB TO 3000 DIRECT HIMEL AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3000. ADDITIONAL FLIGHT DATA: HOLD NW, RT, 147.33 INBOUND. CHART FAS OBST: 1322 ANTENNA 403046N/0812725W. CHART CIRCLING ICON. CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.						
ZETMU (IAF)		EPIBY (NOPT) (TF) (FB) (RNP 1.00)			096.73 / 7.44			3000								
CEPSI (IAF)		EPIBY (NOPT) (TF) (FB) (RNP 1.00)			207.22 / 4.93			3000								
EPIBY (IF/IAF)		TOSDE (TF) (FB) (RNP 1.00)			147.19 / 7.29			2600								
TOSDE (FAF)		RW15 (MAP) (TF) (FO) (RNP 0.30)			147.25 / 3.94											
RW15 (MAP)		1294 MSL (CA)			147.25											
1294 MSL		HIMEL (DF) (FO) (RNP 1.00)						3000								
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF) 2. HOLD NW EPIBY, RT, 147.19 INBOUND, 3000 FT. IN LIEU OF PT (IAF) 3. FAC: 147.25 FAF: TOSDE DIST FAF TO MAP: 3.94 THLD: 3.94 4. MIN. ALT: EPIBY 3000, TOSDE 2600 5. DIST TO THLD FROM OM: _____ MM: _____ IM: _____ 150 HAT: _____ 100 HAT: _____ GS ANT: _____ 6. MIN GS INCPT: _____ GS ALT AT: _____ OM: _____ MM: _____ IM: _____ 7. GS ANGLE: _____ TCH: 20:1 IS NOT CLEAR 34:1 IS NOT CLEAR 8. MSA FROM: RW15 3400																
										MAG VAR: 8W			EPOCH YEAR: 2000			
MINIMUMS																
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A		STANDARD				
CATEGORY =====>		A			B			C			D			E		
	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	DH/MDA	VIS	HAT/HAA	
LNAV MDA	1580	1	686	1580	1	686		NA			NA					
CIRCLING	1620	1	726	1640	1	746		NA			NA					
NOTES: PBN REQUIREMENTS NOTE: RNP APCH. CHART NOTE: CIRCLING NA TO RWYS 12 AND 30. CHART NOTE: PROCEDURE NA AT NIGHT. CHART NOTE: RWY 15 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.																
CITY AND STATE		ELEVATION: 894 TDZE: 894			FACILITY IDENTIFIER: RNAV			PROCEDURE NO./AMDT NO./EFFECTIVE DATE:				SUP:				
NEW PHILADELPHIA, OH		AIRPORT NAME:			HARRY CLEVER FIELD			RNAV (GPS) RWY 15, AMDT 1				AMDT: ORIG-C				
								13 SEPTEMBER 2018				DATED 10/12/2017				

QUALITY
 35
 CHECKED

US DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION
RNAV - STANDARD
INSTRUMENT APPROACH PROCEDURE - TITLE 14 CFR PART 97.33

Bearings, headings, courses, 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 in feet RVR.

QUALITY
5
CHECKED

CITY AND STATE

NEW PHILADELPHIA, OH

ELEVATION: 894

TDZE: 894

AIRPORT NAME:

HARRY CLEVER FIELD

FACILITY
IDENTIFIER:
RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

RNAV (GPS) RWY 15, AMDT 1
13 SEPTEMBER 2018

SUP:

AMDT: ORIG-C

DATED: 10/12/2017

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> HARRY CLEVER FIELD	<u>AIRPORT ID</u> KPHD	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 33	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>CITY</u> NEW PHILADELPHIA	<u>STATE</u> OH
<u>AIRPORT ELEVATION</u> 894	<u>TDZE</u> 893	<u>SUPERSEDED</u>	<u>ORIGINAL/AMENDMENT</u>	<u>DATED</u>	<u>MAG VAR</u> 8W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2000

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 237/30 CW 057/30	NOPT	237/10 CW 057/10		3400
2. 237/10 CW 057/10		ZUDGI	IF/IAF	3000
3. 057/30 CW 237/30		ZUDGI		3000

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>
ZUDGI	IF/IAF	JOGRO		TF	FB	1.00	327.42	9.31	2800
JOGRO	FAF	RW33	MAP	TF	FB	0.30	327.34	3.91	
RW33	MAP	1294 MSL		CA			327.34		
1294 MSL		EPIBY		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LP: RW33
LNAV: RW33

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT EPIBY AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD SE ZUDGI, RT, 327.42 INBOUND, 3000 FT. IN LIEU OF PT (IF/IAF), MAX 6000.

3. FAC: 327.34FAF: JOGRODIST FAF TO MAP: 3.91DIST FAF TO THLD: 3.91

4. MIN ALT: ZUDGI 3000, JOGRO 2800

5. DIST TO THLD FROM OM:MM:IM:150 HAT:HAT:MM:IM:

6. MIN GP INCPT:GP ALT AT FAF :OM:MM:IM:

7. GP ANGLE:34:1: IS NOT CLEAR20:1: IS NOT CLEARTCH:

8. MSA FROM:

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: CIRCLING NA TO RWYS 12 AND 30.
CHART NOTE: RWY 33 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART NOTE: PROCEDURE NA AT NIGHT.

ADDITIONAL FLIGHT DATA:

1388 AAO 402409N/0812230W.
CHART CIRCLING ICON.
JOGRO TO RW33: 4.00/54.2.
WAAS CHANNEL #70343
REFERENCE PATH ID: W33A
CHART FAS OBST: 1276 TREE 402708N/0812329W.
CHART FAS OBST: 1299 TREE 402654N/0812244W.
HOLD NW, RT, 147.19 INBOUND
LTP HAE: 236.6 M

MINIMUMS:

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

ALTERNATE: NA☐ STANDARD

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
LP MDA	1540	1	647	1540	1	647		NA			NA				
LNAV MDA	1560	1	667	1560	1	667		NA			NA				
CIRCLING	1620	1	726	1640	1	746		NA			NA				

CHANGES - REASONS

ORIGINAL



<u>AIRPORT</u> HARRY CLEVER FIELD	<u>AIRPORT ID</u> KPHD	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 33	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>CITY</u> NEW PHILADELPHIA	<u>STATE</u> OH
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB ARTCC, CAK APP CON, AMGR.					
<u>FLIGHT CHECKED BY</u> MARC WEBBER		Digitally signed by DAVID TEFFETELLER Jun 25, 2018	<u>OFFICE</u> FICO	<u>DATE</u> 6/21/18	
<u>DEVELOPED BY</u> DAVID TEFFETELLER (FRANK MOORE)		Digitally signed by DAVID TEFFETELLER Jun 25, 2018	<u>OFFICE</u> AJV-5433	<u>DATE</u> 03/27/2018	
<u>APPROVED BY</u> PATRICK MULQUEEN		Digitally signed by DAVID TEFFETELLER Jun 25, 2018	<u>OFFICE</u> AJV-5430	<u>DATE</u>	<u>TITLE</u> MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KPHD
RUNWAY	RW33
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W33A
LTP/FTP LATITUDE	402800.4570N
LTP/FTP LONGITUDE	0812454.4270W
LTP/FTP ELLIPSOIDAL HEIGHT	+02366
FPAP LATITUDE	402908.0460N
FPAP LONGITUDE	0812610.5750W
THRESHOLD CROSSING HEIGHT (TCH)	00054.2
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	04.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1552
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0

CRC REMAINDER	B0303679

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+02701
FPAP ORTHOMETRIC HEIGHT	+02701



U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION VOR STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.23										Bearings, headings, courses, and radials are magnetic. Elevations and altitudes are in feet, MSL, except HATh, 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 in feet RVR.											
TERMINAL ROUTES										MISSED APPROACH											
FROM			TO			COURSE AND DISTANCE				ALTITUDE		MAP: 4.93 NM AFTER BARTE/BSV 11.00 DME/RADAR OR AT HAVOL/15.93 DME FIX									
BSV VOR/DME (IF)			BARTE/11.00 DME/RADAR (NOPT)			181.99 / 11.00				3000		CLIMB TO 2100 THEN CLIMBING LEFT TURN TO 3000 DIRECT BSV VOR/DME AND HOLD.									
										ADDITIONAL FLIGHT DATA: HOLD N, RT, 181.99 INBOUND. FAS OBST: 1459 AAO 403208N/0812323W. FAC CROSSES MIDPOINT OF RWY 15-33. CHART CIRCLING ICON.											
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																					
2. HOLD N BARTE, RT, 181.99 INBOUND, 3000 FT. IN LIEU OF PT (IAF)																					
3. FAC 181.99 FAF BARTE/11.00 DME/RADAR _____ DIST FAF TO MAP 4.93 THLD _____																					
4. MIN. ALT BARTE 3000																					
8. MSA FROM: BSV VOR/DME 270-090 2800, 090-270 3100										MAG VAR: 4W EPOCH YEAR:1965											
MINIMUMS																					
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A				@							
CATEGORY =====>		A			B			C			D			E							
		MDA	VIS	HATh/HAA	MDA	VIS	HATh/HAA	MDA	VIS	HATh/HAA	MDA	VIS	HATh/HAA	MDA	VIS	HATh/HAA					
CIRCLING		1720	1 1/4	826	1720	1 1/4	826	1720	2 1/2	826		NA									
NOTES:																					
EQUIPMENT REQUIREMENTS NOTE: DME OR RADAR REQUIRED.										@ CAT A, B 900-2, CAT C 900-2 1/2											
CHART NOTE: CIRCLING NA TO RWYS 12 AND 30.																					
CHART NOTE: RWY 15, 33 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.																					
CHART NOTE: PROCEDURE NA AT NIGHT.																					
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON BSV VOR/DME AIRWAY RADIALS 151 CW 246.																					
CITY AND STATE NEW PHILADELPHIA, OH		ELEVATION: 894 AIRPORT NAME: HARRY CLEVER FIELD			TDZE:		FACILITY IDENTIFIER: BSV		PROCEDURE NO./AMD'T NO./EFFECTIVE DATE: VOR-A, AMDT 2B 13 SEPTEMBER 2018						SUP AMDT 2A DATE 10/12/2017						

QUALITY
5
CHECKED

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> SIDNEY MUNI	<u>AIRPORT ID</u> KSCA	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> SIDNEY	<u>STATE</u> OH
<u>AIRPORT ELEVATION</u> 1044	<u>TDZE</u> 1044	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 11/12/2015	<u>MAG VAR</u> 5W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 1995

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>
ROD VORTAC		NYIIM		TF	FO	2.00	126.39	6.74	3000
BONEE		WAGIH		TF	FB	2.00	044.39	6.98	3000
WAGIH	IAF	NYIIM	NOPT	TF	FB	1.00	335.04	6.00	3000
NYIIM	IF/IAF	ETTAF		TF	FB	1.00	279.35	4.98	2700
ETTAF	FAF	ZIRIT/1.80 NM TO RW28		TF	FB	0.30	279.28	3.30	
ZIRIT/1.80 NM TO RW28		RW28	MAP	TF	FO	0.30	279.28	1.80	
RW28	MAP	1302 MSL		CA			279.28		
1302 MSL		ZIDNI		DF	FO	1.00			3000

MISSED APPROACH

MAP:

LPV: DA
 LNAV/VNAV: DA
 LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT ZIDNI AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)	
2.	HOLD E NYIIM, RT, 279.35 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.				
3. FAC:	279.28	FAF: ETTAF	DIST FAF TO MAP: 5.10	DIST FAF TO THLD: 5.10	
4. MIN ALT:	NYIIM 3000, ETTAF 2700, ZIRIT/1.80 NM TO RW28 1640*				
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	258 HAT: 0.70	GS ANT:
6. MIN GP INCPT: 2700	GP ALT AT FAF : ETTAF 2700			OM:	MM: IM:
7. GP ANGLE: 3.00	34:1:	IS NOT CLEAR	20:1:	IS NOT CLEAR	TCH: 35.6
8. MSA FROM:	RW28 3000				

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:

CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA WHEN USING JAMES M. COX DAYTON INTL ALTIMETER SETTING.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -22C OR ABOVE 54C.
*LNAV ONLY
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON ROD VORTAC AIRWAY RADIALS 046 CW 207.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE JAMES M. COX DAYTON INTL ALTIMETER SETTING: INCREASE LPV DA TO 1355; INCREASE LNAV/VNAV DA TO 1365; INCREASE ALL MDA 60 FEET AND LNAV CAT C VISIBILITY AND CIRCLING CAT C VISIBILITY 1/4 SM.
CHART NOTE: STRAIGHT-IN RWY 28 AT NIGHT, OPERATIONAL VGSI REQUIRED, REMAIN AT OR ABOVE VGSI GLIDEPATH UNTIL THRESHOLD.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
WAAS CHANNEL #82234
REFERENCE PATH ID: W28A
CHART FAS OBST: 1168 TREE 401411N/0840613W.
CHART: 1187 TRANSMISSION_LINE 401423N/0840528W.
1319 AAO 401353N/0840226W.
HOLD W, RT, 099.06 INBOUND
LTP HAE: 284.3 M

MINIMUMS:

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

ALTERNATE: NA ☒

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	1302	1	258	1302	1	258	1302	1	258		NA				
LNAV/VNAV DA	1312	1	268	1312	1	268	1312	1	268		NA				
LNAV MDA	1420	1	376	1420	1	376	1420	1	376		NA				
CIRCLING	1460	1	416	1520	1	476	1640	1 1/2	596		NA				



CHANGES - REASONS

- 1. DELETED NOTE: DME/DME RNP-0.3 NA - REPLACED BY EQUIPMENT REQUIREMENT NOTE.
- 2. ADDED PBN REQUIREMENTS NOTE: RNP APCH - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
- 3. DELETED NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE JAMES M COX DAYTON INTL ALTIMETER SETTING AND INCREASE ALL DA 53 FEET, ALL MDA 60 FEET; INCREASE LPV AND LNAV/VNAV ALL CATS VISIBILITY 1/8 MILE, INCREASE LNAV CAT C AND CIRCLING CAT C VISIBILITY 1/4 MILE - REPLACED BY UPDATED NOTE.
- 4. ADDED NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE JAMES M. COX DAYTON INTL ALTIMETER SETTING: INCREASE LPV DA TO 1355; INCREASE LNAV/VNAV DA TO 1365; INCREASE ALL MDA 60 FEET AND LNAV CAT C VISIBILITY AND CIRCLING CAT C VISIBILITY 1/4 SM - VISIBILITY ADJUSTMENTS RECOMPUTED USING FAAO 8260.3C, TABLE 3-1-1 AND TABLE 3-3-7. NOTE FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-11N(1)(A)2.
- 5. DELETED NOTE: HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED - REPLACED BY UPDATED NOTE.
- 6. ADDED NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED - FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-11K(3).
- 7. DELETED NOTE: NIGHT LANDING: RWY 28 OPERATIONAL VGSI REQUIRED, REMAIN AT OR ABOVE VGSI GLIDEPATH UNTIL THRESHOLD - REPLACED BY UPDATED NOTE.
- 8. ADDED NOTE: STRAIGHT-IN RWY 28 AT NIGHT, OPERATIONAL VGSI REQUIRED, REMAIN AT OR ABOVE VGSI GLIDEPATH UNTIL THRESHOLD - FORMATTED IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-11O(1)(H).
- 9. DELETED PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT BONEE ON V12 WESTBOUND - V12 AIRWAY BEING CANCELED IN CONJUNCTION WITH RID VOR DECOMMISSIONING.
- 10. DELETED FAHRENHEIT VALUES FROM UNCOMPENSATED BARO-VNAV CHART NOTE - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-9S.
- 11. ADDED 20:1 IS NOT CLEAR - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-7G(3).
- 12. FAS DATA: AMENDED LTP LONGITUDE 0840811.6345W TO 0840811.6355W - MATCH CURRENT AIRNAV VALUE.
- 13. FAS DATA: AMENDED CRC REMAINDER FROM 71CBEEA0 TO 633A3273 - RECOMPUTED USING UPDATED LTP VALUE.



<u>AIRPORT</u> SIDNEY MUNI	<u>AIRPORT ID</u> KSCA	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> SIDNEY	<u>STATE</u> OH
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ <u>OTHER:</u> ZID, CMH APP CON, AMGR					
<u>FLIGHT CHECKED BY</u>		<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>	
TODD D HAIFLEY		ROBERT G HAMILTON	FICO	5/30/18	
		May 31, 2018			
<u>DEVELOPED BY</u>		<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>	
PETER R. GUIMOND		PETER R GUIMOND	AJV-5422	05/08/2018	
		May 08, 2018			
<u>APPROVED BY</u>		<i>Digitally signed by</i>	<u>OFFICE</u>	<u>DATE</u>	<u>TITLE</u>
JULIE MORGAN		ROBERT G HAMILTON	AJV-5420		MANAGER
		May 31, 2018			



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KSCA
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	401430.0840N
LTP/FTP LONGITUDE	0840811.6355W
LTP/FTP ELLIPSOIDAL HEIGHT	+02843
FPAP LATITUDE	401436.6145N
FPAP LONGITUDE	0841007.6775W
THRESHOLD CROSSING HEIGHT (TCH)	00035.6
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1224
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	633A3273

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+03174
FPAP ORTHOMETRIC HEIGHT	+03174



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> JEFFERSON COUNTY AIRPARK	<u>AIRPORT ID</u> K2G2	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 32	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> STEUBENVILLE	<u>STATE</u> OH	
<u>AIRPORT ELEVATION</u> 1198	<u>TDZE</u> 1192	<u>SUPERSEDED</u> RNAV (GPS) RWY 32	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 11/10/2016	<u>MAG VAR</u> 8W	<u>EPOCH YEAR</u> 2000
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
WISKE	IAF	ULIZE		TF	FB	1.00	051.53	9.13	3000
HEFJA	IAF	ULIZE		TF	FB	1.00	261.96	5.61	3000
ULIZE	IF	KEDSE		TF	FB	1.00	322.30	5.93	2800
KEDSE	FAF	RW32	MAP	TF	FO	0.30	322.24	4.07	
RW32	MAP	2000 MSL		CA			322.24		2000
2000 MSL		WISKE		DF	FO				3100

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW32

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 THEN CLIMBING LEFT TURN TO 3100 DIRECT WISKE AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
2. PROFILE STARTS AT ULIZE
3. FAC: 322.24 FAF: KEDSE DIST FAF TO MAP: 4.07 DIST FAF TO THLD: 4.07
4. MIN ALT: ULIZE 3000, KEDSE 2800
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 300 HAT: 0.64
6. MIN GP INCPT: 2800 GP ALT AT FAF : KEDSE 2800 OM: MM: IM:
7. GP ANGLE: 3.60 34:1: IS NOT CLEAR 20:1: IS NOT CLEAR TCH: 55.0
8. MSA FROM: RW32 3100

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH.

NOTES:

CHART NOTE: RWY 32 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED.
CHART NOTE: BARO-VNAV NA.
CHART NOTE: STRAIGHT-IN RWY 32 NA AT NIGHT, CIRCLING RWY 32 NA AT NIGHT.
CHART NOTE: USE WHEELING ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART: WHEELING ASOS
CHART FAS OBST: 1601 TOWER 402047N/0803938W.
CHART CIRCLING ICON.
WAAS CHANNEL #58339
REFERENCE PATH ID: W32A
HOLD SW, LT, 051.00 INBOUND
LTP HAE: 329.2 M

MINIMUMS:

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

ALTERNATE: NA ☒

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	1492	1	300	1492	1	300	1492	1	300		NA				
LNAV/VNAV DA	1972	2 1/2	780	1972	2 1/2	780	1972	2 1/2	780		NA				
LNAV MDA	1880	1	688	1880	1	688	1880	2	688		NA				
CIRCLING	1880	1	682	1980	1	782	1980	2 1/4	782		NA				



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
JEFFERSON COUNTY AIRPARK	K2G2	RNAV (GPS) RWY 32	1A	STEUBENVILLE	OH

CHANGES - REASONS

- 1. REMOVED NOTE: PROCEDURE NA FOR ARRIVALS AT HEFJA ON V12 EASTBOUND. - V12 CANCELLATION, CHANGING HEFJA FIX TYPE FROM "WP, DME" TO "WP" .
- 2. CHANGED LNAV/VNAV DA FROM 1469 TO 1972 AND VISIBILITY FROM 1 TO 2 1/2. - NEW SURVEY DATA RESULTED IN NEW CONTROLLING OBSTACLE IN FINAL.
- 3. CHANGED LNAV MDA FROM 1800 TO 1880 AND LNAV CAT C VISIBILITY FROM 1 3/4 TO 2. - NEW SURVEY DATA RESULTED IN NEW CONTROLLING OBSTACLE IN FINAL.
- 4. CHANGED CIRCLING CAT A FROM 1800 TO 1880 AND CAT B/C FROM 1940 TO 1980. - NEW SURVEY DATA RESULTED IN NEW CONTROLLING OBSTACLE.
- 5. CHANGED CHART FAS OBST FROM 1596 ANT 402047N/0803938W TO 1601 TOWER 402047N/0803938W. - NEW SURVEY DATA RESULTED IN NEW CONTROLLING OBSTACLE.
- 6. CHANGED CHART NOTE FROM DME/DME RNP-0.3 NA TO PBN EQUIPMENT REQUIREMENTS NOTE: RNP APCH. - DME/DME NOTE NO LONGER APPLICABLE, PBN EQUIPMENT REQUIREMENTS NOTES NOW REQUIRED PER 8260.19H AND MEMO 257.
- 7. LPV DA/HAT RAISED FROM 1489/297 TO 1492/300 - CAT C DOES NOT MEET MINIMUM HAT REQUIREMENTS FROM TERPS TABLE 3-2-2.
- 8. REMOVED BACKUP ALTIMETER NOTE - DOCUMENTED ON -9 AS A CONTINGENCY NOTE.

PDF EDITS:
REMOVED NEW CIRCLING APPLIED NOTE, ADDED ELEV RWY THRESHOLD, REMOVED VGSI INFO. PG. 11.
REMOVED MISSED APCH PENETRATING OBS FOR LNAV/VNAV AND LNAV. PG. 9,10.
CORRECTED PBN EQUIPMENT REQUIREMENT NOTES. PG. 2.
ADDED HOLDING OBSTACLE TO MISSED SEGMENT REMARKS. PG. 9,10.
ADDED WX REMARKS PRESSURE PATTERNS. PG. 11.
CHANGED AIRSPACE LETTER MAP TO ARP. PG. 13.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB, PIT APP CON, AMGR

FLIGHT CHECKED BY

JEFFREY W HARING

DEVELOPED BY

ROBERT G HAMILTON (AUSTIN GOTCHER)

APPROVED BY

JULIE MORGAN

OFFICE

FICO

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

6/15/18

DATE

04/05/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 19, 2018

ROBERT G HAMILTON
MANAGER
Jun 19, 2018



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	K2G2
RUNWAY	RW32
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W32A
LTP/FTP LATITUDE	402121.0205N
LTP/FTP LONGITUDE	0804142.9550W
LTP/FTP ELLIPSOIDAL HEIGHT	+03292
FPAP LATITUDE	402223.1730N
FPAP LONGITUDE	0804306.5320W
THRESHOLD CROSSING HEIGHT (TCH)	00055.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.60
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1224
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	88E7AB4D
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K5
LTP ORTHOMETRIC HEIGHT	+03629
FPAP ORTHOMETRIC HEIGHT	+03629



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
WILLARD, OH	WILLARD	13 SEPTEMBER 2018	2

TAKEOFF MINIMUMS:
RWY 10, 28: STANDARD

TEXTUAL DEPARTURE PROCEDURES:
RWY 10: CLIMB ON HEADING 103.45 TO 1400 BEFORE TURNING LEFT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 10: BUILDING 705 FT FROM DER, 149 FT LEFT OF CENTERLINE, 19 FT AGL/959 FT MSL. TRANSMISSION LINE 783 FT FROM DER, 289 FT LEFT OF CENTERLINE, 39 FT AGL/980 FT MSL. POLE 1900 FT FROM DER, 418 FT LEFT OF CENTERLINE, 32 FT AGL/985 FT MSL. POLE 1965 FT FROM DER, 985 FT LEFT OF CENTERLINE, 32 FT AGL/986 FT MSL.

NOTE: RWY 28: BLDG BEGINNING 6 FT FROM DER, 159 FT RIGHT OF CENTERLINE, UP TO 30 FT AGL/969 FT MSL. POLE 78 FT FROM DER, 306 FT LEFT OF CENTERLINE, UP TO 30 FT AGL/969 FT MSL. POLE 125 FT FROM DER, 326 FT RIGHT OF CENTERLINE, UP TO 40 FT AGL/979 FT MSL. TREES BEGINNING 201 FT FROM DER, 279 FT RIGHT OF CENTERLINE, UP TO 100 FT AGL/1039 FT MSL. TREES BEGINNING 406 FT FROM DER, 487 FT RIGHT OF CENTERLINE, UP TO 100 FT AGL/1049 FT MSL. TREES BEGINNING 1239 FT FROM DER, 144 FT LEFT OF CENTERLINE, UP TO 100 FT AGL/1069 FT MSL. TREES BEGINNING 1300 FT FROM DER, 4 FT RIGHT OF CENTERLINE, UP TO 100 FT AGL/1069 FT MSL.

CONTROLLING OBSTACLES:
OBSTACLE MANDATING ODP ROUTE DEVELOPMENT: RWY 10: 1317 FEET MSL TOWER 410253.30N/0824052.44W

REMARKS:

<u>FLIGHT INSPECTED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 25, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
MARC WEBBER		FICO	6/18/18
<u>DEVELOPED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 25, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
LONNIE EVERHART (BRANDON MAULDIN)		AJV-5400	04/11/2018
<u>APPROVED BY:</u>	<i>Digitally signed by</i> ROBERT G HAMILTON Jun 25, 2018	<u>OFFICE SYMBOL:</u>	<u>DATE:</u>
LONNIE EVERHART		AJV-5400	

REQUIRED EFFECTIVE DATE:
ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☐	☐	☒	☐	☐	☒



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
WILLARD, OH	WILLARD	13 SEPTEMBER 2018	2

OTHER:

ARPT MGR, ZOB ARTCC, MFD ATCT

CHANGES - REASONS:

1. CHANGED TAKEOFF MINIMUMS RWY 10/28 FROM 300-1 TO STANDARD-REFERENCE REVISED OBSTACLE REVIEW.
2. UPDATED THE TAKEOFF OBSTACLE NOTES TO CURRENT OBSTACLES-NEW TARGETS EVALUATION.
3. CHANGED DEPARTURE PROCEDURE RWY 10 FROM CLIMB RWY HEADING TO 1500 FEET BEFORE PROCEEDING ON COURSE TO CLIMB ON HEADING 103.45 TO 1400 BEFORE TURNING LEFT-REFERENCE REVISED CRITERIA AND REVISED OBSTACLES.
4. ADDED OBSTACLE INFORMATION MANDATING ODP ROUTE DEVELOPMENT.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
FAIRVIEW, OK	FAIRVIEW MUNI	09/13/2018	4

TAKEOFF MINIMUMS:

RWY 17, 300-1 1/4 OR STANDARD WITH MINIMUM CLIMB OF 350 FT PER NM TO 1600.

RWY 35, STANDARD.

TEXTUAL DEPARTURE PROCEDURES:

RWY 17: CLIMB HEADING 174.00 TO 1800 BEFORE TURNING LEFT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 17, TERRAIN 1 FT FROM DER, 494 FT RIGHT OF CENTERLINE, 1273 FT MSL. TREES, ROAD, POLE, BUILDINGS, SIGN BEGINNING 38 FT FROM DER, 285 FT LEFT OF CENTERLINE, UP TO 50 FT AGL/1321 FT MSL. UTILITY POLE 192 FT FROM DER, 417 FT RIGHT OF CENTERLINE, 5 FT AGL/1279 FT MSL. TANK, TERRAIN BEGINNING 217 FT FROM DER, 409 FT RIGHT OF CENTERLINE, UP TO 8 FT AGL/1281 FT MSL. POLES, BUILDINGS, ROAD, TANK, ANTENNA, POWER POLES, TREES BEGINNING 239 FT FROM DER, 193 FT RIGHT OF CENTERLINE, UP TO 35 FT AGL/1308 FT MSL. TREES BEGINNING 377 FT FROM DER, 418 FT LEFT OF CENTERLINE, UP TO 55 FT AGL/1327 FT MSL. TREES, ROAD, BUILDINGS, POLES, BEGINNING 394 FT FROM DER, 44 FT LEFT OF CENTERLINE, UP TO 65 FT AGL/1335 FT MSL. ELECTRIC SYSTEM, POLE, TREE BEGINNING 454 FT FROM DER, 452 FT RIGHT OF CENTERLINE, UP TO 36 FT AGL/1311 FT MSL. POLE, TREES, BUILDING BEGINNING 520 FT FROM DER, 213 FT RIGHT OF CENTERLINE, UP TO 43 FT AGL/1317 FT MSL. TREES, ELECTRIC SYSTEM, POLES, ROAD, BUILDINGS BEGINNING 526 FT FROM DER, 193 FT RIGHT OF CENTERLINE, UP TO 46 FT AGL/1320 FT MSL. TREES, BUILDINGS, POLES, ELECTRIC SYSTEM, BEGINNING 698 FT FROM DER, 192 FT RIGHT OF CENTERLINE, UP TO 50 FT AGL/1325 FT MSL. TREES, POLES BEGINNING 1010 FT FROM DER, 14 FT RIGHT OF CENTERLINE, UP TO 58 FT AGL/1333 FT MSL. TREES, POLES BEGINNING 1174 FT FROM DER, 174 FT LEFT OF CENTERLINE, UP TO 71 FT AGL/1341 FT MSL. TREES, ELECTRIC SYSTEMS, POLES, BUILDING, BEGINNING 1209 FT FROM DER, 9 FT RIGHT OF CENTERLINE, UP TO 68 FT AGL/1344 FT MSL. TREES BEGINNING 1249 FT FROM DER, 34 FT LEFT OF CENTERLINE, UP TO 76 FT AGL/1346 FT MSL. TREE 1378 FT FROM DER, 713 FT LEFT OF CENTERLINE, 82 FT AGL/1353 FT MSL. TREES, POLE BEGINNING 1397 FT FROM DER, 27 FT LEFT OF CENTERLINE, UP TO 86 FT AGL/1356 FT MSL. TREES, POLES, ANTENNA BEGINNING 1675 FT FROM DER, 31 FT RIGHT OF CENTERLINE, UP TO 73 FT AGL/1351 FT MSL. TREE 2927 FT FROM DER, 227 FT RIGHT OF CENTERLINE, 70 FT AGL/1352 FT MSL. GRAIN ELEVATOR BEGINNING 4385 FT FROM DER, 1445 FT RIGHT OF CENTERLINE, UP TO 172 FT AGL/1463 FT MSL. ANTENNA 6033 FT FROM DER, 404 FT RIGHT OF CENTERLINE, 136 FT AGL/1432 FT MSL.

NOTE: RWY 35, SIGN, FENCE, BRUSH BEGINNING 5 FT FROM DER, LEFT AND RIGHT OF CENTERLINE, UP TO 4 FT AGL/1267 FT MSL. BRUSH BEGINNING 65 FT FROM DER, 288 FT RIGHT OF CENTERLINE, UP TO 5 FT AGL/1268 FT MSL. TREE 698 FT FROM DER, 488 FT LEFT OF CENTERLINE, 35 FT AGL/1298 FT MSL. TREES BEGINNING 699 FT FROM DER, 351 FT LEFT OF CENTERLINE, UP TO 34 FT AGL/1300 FT MSL. TREE 799 FT FROM DER, 674 FT LEFT OF CENTERLINE, 41 FT AGL/1308 FT MSL. ANTENNA, TREE BEGINNING 801 FT FROM DER, 703 FT LEFT OF CENTERLINE, UP TO 47 FT AGL/1314 FT MSL. TREE 839 FT FROM DER, 691 FT LEFT OF CENTERLINE, 48 FT AGL/1316 FT MSL. TREE 2029 FT FROM DER, 50 FT RIGHT OF CENTERLINE, 57 FT AGL/1319 FT MSL. TREE 2133 FT FROM DER, 160 FT LEFT OF CENTERLINE, 62 FT AGL/1326 FT MSL.

CONTROLLING OBSTACLES:

RWY 17: 1463 FT MSL GRAIN ELEVATOR (40-077953) 361623.47N/0982852.62W (CLIMB GRADIENT/CEILING/CLIMB GRADIENT TERMINATION), 1432 FT MSL ANTENNA (40-077158) 361606.99N/0982839.64W (VISIBILITY).

OBSTACLE MANDATING ROUTE DEVELOPMENT: 1636 FT MSL TOWER (40-000355) 361535.00N/0982741.00W.

REMARKS:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
FAIRVIEW, OK	FAIRVIEW MUNI	09/13/2018	4

FLIGHT INSPECTED BY:
PENDING

Digitally signed by
DAVID TEFFETELLER
May 30, 2018

OFFICE SYMBOL: **DATE:**

DEVELOPED BY:
SCOTT BAGENSIE

Digitally signed by
SCOTT BAGENSIE
May 29, 2018

OFFICE SYMBOL: **DATE:**
AJV-5433 04/24/2018

APPROVED BY:
PATRICK MULQUEEN

Digitally signed by
DAVID TEFFETELLER
May 30, 2018

OFFICE SYMBOL: **DATE:**
AJV-5430

REQUIRED EFFECTIVE DATE:
09/13/2018

COORDINATED WITH:

<u>A4A</u>	<u>ALPA</u>	<u>AOPA</u>	<u>APA</u>	<u>HAI</u>	<u>NBAA</u>
☐	☒	☒	☐	☐	☒

OTHER:
ZKC, END APP/CON, AMGR

CHANGES - REASONS:

1. CHANGED RWY 17 CLIMB GRADIENT FROM 435 TO 350 - UPDATED OBSTACLE SURVEY.
2. CHANGED RWY 17 REQUIRED VISIBILITY FROM 1 SM TO 1 1/4 SM - UPDATED OBSTACLE SURVEY.
3. CHANGED RWY 17 DEPARTURE HEADING FROM 173.98 TO 174.00 - UPDATED AIRPORT SURVEY.
4. UPDATED TAKEOFF OBSTACLE NOTES - UPDATED OBSTACLE SURVEY.
5. ADDED RWY 17 CONTROLLING OBSTACLES FOR CEILING, VISIBILITY AND CLIMB GRADIENT TERMINATION ALTITUDE - IAW 8260.46F APENDIX D, #10.



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> TAHLEQUAH MUNI	<u>AIRPORT ID</u> KTQH	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 35	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> TAHLEQUAH	<u>STATE</u> OK	
<u>AIRPORT ELEVATION</u> 874	<u>TDZE</u> 874	<u>SUPERSEDED</u> RNAV (GPS) RWY 35	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 06/05/2008	<u>MAG VAR</u> 5E	<u>EPOCH YEAR</u> 1995
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 267/30 CW 087/30	NOPT	267/10 CW 087/10		3700
2. 267/10 CW 087/10		SUBME	IF/IAF	3100
3. 087/30 CW 177/30		087/10 CW 177/10		3600
4. 087/10 CW 177/10		JURMA	IAF	3100
5. 177/30 CW 267/30		177/10 CW 267/10		3400
6. 177/10 CW 267/10		HOSAD	IAF	3100

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>
HOSAD	IAF	SUBME	NOPT	TF	FB	1.00	267.29	5.00	3100
JURMA	IAF	SUBME	NOPT	TF	FB	1.00	087.17	5.00	3100
SUBME	IF/IAF	CEDIK		TF	FB	1.00	357.23	6.10	2200
CEDIK	FAF	REVSE/2.20 NM TO RW35		TF	FB	0.30	357.23	1.86	
REVSE/2.20 NM TO RW35		RW35	MAP	TF	FO	0.30	357.23	2.20	
RW35	MAP	1124 MSL		CA	FO		002.23		
1124 MSL		YASXU		DF	FO	1.00			3000



MISSED APPROACH

MAP:

LPV: DA
LNAV: RW35

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3000 DIRECT YASXU AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)				
2.	HOLD S SUBME, RT, 357.23 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.							
3. FAC:	357.23	FAF: CEDIK	DIST FAF TO MAP: 4.06	DIST FAF TO THLD: 4.06				
4. MIN ALT:	SUBME 3100, CEDIK 2200, REVSE/2.20 NM TO RW35 1580*							
5. DIST TO THLD FROM OM:		MM:	IM:	150 HAT:	250 HAT: 0.73			
6. MIN GP INCPT:	2200	GP ALT AT FAF :	CEDIK 2200	OM:		MM:		IM:
7. GP ANGLE:	3.00	34:1:	IS CLEAR	20:1:	IS CLEAR	TCH:	40.0	
8. MSA FROM:								

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH

NOTES:

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECIEVED, USE MUSKOGEE ALTIMETER SETTING AND INCREASE ALL MDAS 100 FEET AND INCREASE LNAV CAT C VISIBILITY 1/4 MILE, CIRCLING CAT B 1/4 MILE AND CAT C 1/2 MILE.
CHART NOTE: VDP NA WHEN USING MUSKOGEE ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

CHART VDP AT 1.6 NM TO RW35*
*LNAV ONLY
WAAS CHANNEL #90207
REFERENCE PATH ID: W35A
CHART FAS OBST: 1141 TREE 355339N/0950117W.
HOLD N, RT, 177.24 INBOUND
LTP HAE: 230.4 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	1124	1	250	1124	1	250	1124	1	250		NA				
LNAV MDA	1400	1	526	1400	1	526	1400	1 1/2	526		NA				
CIRCLING	1520	1	646	1520	1	646	1520	1 3/4	646		NA				

CHANGES - REASONS

1. CHART VDP FOR LNAV AT 1.6 NM TO RWY 35 - 20:1 SURFACE CLEAR
2. RAISE TAA ALTITUDE STRAIGHT-IN SEGMENT 267/30 CW 087/30 TO 267/10 CW 087/10 FROM 3400 TO 3700 - NEW CONTROLLING OBSTACLE 2663 MSL (5D) TOWER (40-020064)
3. REPLACED CHART NOTE "DME/DME RNP-0.3 NA" WITH PBN REQUIREMENTS NOTE "RNP APCH" - RECENT CRITERIA CHANGE
4. ADDED NOTE "20:1 IS CLEAR" TO LINE 7 - AIRPORT HAD ALL 20:1 PENETRATORS REMOVED.
5. DELETED NOTE "HELICOPTER VISIBILITY REDUCTION NA" - AIRPORT HAD ALL 20:1 PENETRATORS REMOVED.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZME, AIRPORT MANAGER

FLIGHT CHECKED BY

MATTHEW OLSTAD

Digitally signed by

ROBERT G HAMILTON

Jun 25, 2018

OFFICE

FICO

DATE

6/1/18

DEVELOPED BY

LONNIE EVERHART (CHARLES CTR THIBODEAUX)

Digitally signed by

ROBERT G HAMILTON

Jun 25, 2018

OFFICE

AJV-5400

DATE

03/21/2018

APPROVED BY

LONNIE EVERHART

Digitally signed by

ROBERT G HAMILTON

Jun 25, 2018

OFFICE

AJV-5400

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KTQH
RUNWAY	RW35
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W35A
LTP/FTP LATITUDE	355524.3265N
LTP/FTP LONGITUDE	0950017.4535W
LTP/FTP ELLIPSOIDAL HEIGHT	+02304
FPAP LATITUDE	355653.4900N
FPAP LONGITUDE	0950013.1800W
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	1224
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	DEDB65DC
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+02594
FPAP ORTHOMETRIC HEIGHT	+02594



**FLIGHT STANDARDS SERVICE
LOC STANDARD INSTRUMENT APPROACH PROCEDURE**

TITLE 14 CFR PART 97.25

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If an instrument approach procedure of the above type is conducted at the below named airport, it shall be conducted in accordance with a charted instrument approach procedure predicted on the specifications contained herein, unless an approach is conducted in accordance with a different procedure for such airport authorized by the Administrator. Minimum altitudes shall correspond with those established for enroute operations in the particular area or as set forth below.

<u>AIRPORT</u> BEAVER COUNTY	<u>AIRPORT ID</u> KBVI	<u>PROCEDURE NAME</u> LOC RWY 10	<u>ORIGINAL/AMENDMENT</u> 4C	<u>CITY</u> BEAVER FALLS	<u>STATE</u> PA
<u>AIRPORT ELEVATION</u> 1253	<u>TDZE</u> 1238	<u>SUPERSEDED</u> LOC RWY 10	<u>ORIGINAL/AMENDMENT</u> 4B	<u>DATED</u> 01/08/2015	<u>MAG VAR</u> 7W
<u>FACILITY</u> I-BVI	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 1985

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>
EWC VOR/DME		JOTMI/EWC 20.83 DME/RADAR					271.74	20.83	3000
JOTMI/EWC 20.83 DME/RADAR	IF/IAF	NAMTH OM					100.85	6.54 (I-BVI)	3000

MISSED APPROACH

MAP:

5.63 NM AFTER NAMTH OM

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2000 THEN CLIMBING LEFT TURN TO 3000 DIRECT EWC VOR/DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

- 1. PT** **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
- 2.** HOLD W JOTMI, LT, 100.85 INBOUND, 3000 FT. IN LIEU OF PT (IAF), MAX 6000.
- 3. FAC:** 100.85 **FAF:** NAMTH OM **DIST FAF TO MAP:** 5.63 **DIST FAF TO THLD:** 5.63
- 4. MIN ALT:** JOTMI/EWC 20.83 DME/RADAR 3000, NAMTH OM 3000
- 8. MSA FROM:** EWC VOR/DME 360-270 3100, 270-360 3600

EQUIPMENT REQUIREMENTS NOTES:

DME OR RADAR REQUIRED.

NOTES:

CHART NOTE: RWY 10 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE PITTSBURGH INTL ALTIMETER SETTING AND INCREASE ALL MDAS 60 FEET AND VISIBILITY S-10 CATS C AND D 1/4 SM.

CHART NOTE: CIRCLING RWY 28 NA AT NIGHT.



ADDITIONAL FLIGHT DATA:

NAMTH OM TO RW10: 2.94/42.
CHART FAS OBST: 1326 TOWER 404630N/0802604W.
CHART 1387 TOWER 404659N/0803321W.
HOLD E, RT, 256.00 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ LOC: STANDARD - NA WHEN CONTROL TOWER CLOSED.

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
S-10	1640	1	402	1640	1	402	1640	1 1/8	402	1640	1 1/8	402			
CIRCLING	1720	1	467	1720	1	467	1720	1 1/2	467	1820	2	567			

CHANGES - REASONS

1. INCREASED S-10 MDA ALL CATS FROM 1580/376 HAT TO 1640/402 HAT - NEW MISSED APPROACH SECTION 1 OBSTACLE INCREASED MDA BY 60 FT.
2. REMOVED CHART NOTE: WHEN VGSI INOP, STRAIGHT-IN/CIRCLING RWY 10, 28 PROCEDURE NA AT NIGHT; REPLACED CHART NOTE: VISIBILITY REDUCTION BY HELICOPTERS NA WITH CHART NOTE: RWY 10 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED - INCORPORATED PREVIOUS NOTAMS.
3. RAISED S-10 CAT C AND D VISIBILITY FROM 1 TO 1 1/8 - FAAO 8260.3C TABLE 3-3-1 SETS VISIBILITY FOR CATS C AND D WITH A 401 HAT TO 1 1/8 SM.
4. REMOVED CHART PLANVIEW NOTE: DME OR RADAR REQUIRED AND CHART NOTE: DME OR RADAR REQUIRED - NEW EQUIPMENT REQUIREMENTS NOTE FORMAT IAW 8260.19H, PARA. 8-6-8.A.
5. ADDED EQUIPMENT REQUIREMENTS NOTE: DME OR RADAR REQUIRED - NEW EQUIPMENT REQUIREMENTS NOTE FORMAT IAW 8260.19H, PARA. 8-6-8.A.
6. ADDED CHART NOTE: CIRCLING RWY 28 NA AT NIGHT - ADDED DUE TO 20:1 PENETRATION ON VOR RWY 28 OFFSET VISUAL AREA.
7. REPLACED "CHART NOTE: WHEN CONTROL TOWER CLOSED, USE PITTSBURGH INTL ALTIMETER SETTING, AND INCREASE ALL MDAS 60 FEET, INCREASE S-10 CAT C AND D VISIBILITY 1/4 MILE." WITH "CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE PITTSBURGH INTL ALTIMETER SETTING AND INCREASE ALL MDAS 60 FEET AND VISIBILITY S-10 CATS C AND D 1/4 SM." - INCORPORATED PREVIOUS NOTAMS.

PDF EDIT:
REMOVED "CF" FROM LEG TYPE IN TERMINAL ROUTES
REPLACED ALL INSTANCES OF "BV" WITH "NAMTH"

COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB, PIT APCH, AOO FSS, AMGR

FLIGHT CHECKED BY

JORGE A MALCUN

DEVELOPED BY

VICTOR B. NASO (ROBERT LYMAN)

APPROVED BY

GEORGE DAVIS

Digitally signed by

BEV L BORDY

Jun 19, 2018

OFFICE

FICO

DATE

6/14/18

Digitally signed by

BEV L BORDY

Jun 19, 2018

OFFICE

AJV-5443

DATE

01/05/2018

Digitally signed by

BEV L BORDY

Jun 19, 2018

OFFICE

AJV-5410

DATE

TITLE

MANAGER



U.S. DEPARTMENT OF TRANSPORTATION - FEDERAL AVIATION ADMINISTRATION LOC STANDARD INSTRUMENT APPROACH PROCEDURE FLIGHT STANDARDS SERVICE - TITLE 14 CFR PART 97.25										Bearings, headings, courses, 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 in feet RVR.										
TERMINAL ROUTES										MISSED APPROACH										
FROM			TO			COURSE AND DISTANCE			ALTITUDE		MAP: RW28 OR AT I-OYM 0.83 DME									
SLT VORTAC (IAF)			MINSK INT/I-OYM 11.86 DME (NOPT)			252.61 / 14.01			4000		CLIMBING RIGHT TURN TO 4000 ON I-OYM E COURSE TO MINSK INT/I-OYM 11.86 DME AND HOLD.									
ETG VORTAC (IAF)			MINSK INT/I-OYM 11.86 DME (NOPT)			347.67 / 12.79			4000											
MINSK INT/I-OYM 11.86 DME (IF/IAF)			LYCEE/I-OYM 5.86 DME			280.99 / 6.00 (I-OYM)			3600											
										ADDITIONAL FLIGHT DATA: CHART FAS OBST: 2379 TREE 412441N/0782533W. CHART 2439 TREE 412429N/0782503W. CHART DUKE MOA. CHART VDP AT 3.23 DME DISTANCE VDP TO THLD 2.39 NM. FETKU TO RW28: 3.10/39.										
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)										MAG VAR: 11W EPOCH YEAR: 2005										
2. HOLD E MINSK, RT, 280.99 INBOUND, 4000 FT. IN LIEU OF PT (IAF)																				
3. FAC 280.99 FAF LYCEE/I-OYM 5.86 DME DIST FAF TO MAP _____ THLD 5.03																				
4. MIN. ALT MINSK 4000, LYCEE 3600, FETKU/I-OYM 4.13 DME 3060																				
8. MSA FROM: ETG VORTAC 4200																				
MINIMUMS																				
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A		X								
CATEGORY =====>		A			B			C			D			E						
	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA	MDA	VIS	HAT/HAA					
S-28	2740	1	806	2740	1	806	2740	2	806	2740	2	806								
CIRCLING	2740	1	806	2740	1 1/4	806	2740	2 1/2	806	2800	2 3/4	866								
NOTES: CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO CAT A. CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED. CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT ETG VORTAC ON AIRWAY RADIALS 290 CW 338, AND ARRIVALS AT SLT VORTAC ON AIRWAY RADIALS 289 CW 308. (CONTINUED ON PAGE 2)																				
CITY AND STATE ST MARYS, PA		ELEVATION: 1934 TDZE: 1934 AIRPORT NAME: ST MARYS MUNI		FACILITY IDENTIFIER: I-OYM		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: LOC RWY 28, AMDT 4D 13 SEPTEMBER 2018				SUP LOC/DME RWY 28 AMDT 4C DATE 08/18/2016										



**LOC STANDARD INSTRUMENT APPROACH PROCEDURE
FLIGHT STANDARDS SERVICE - - TITLE 14 CFR PART 97.25**

Bearings, headings, courses, 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 in feet RVR.

NOTES, (CONT.):

CHART NOTE: VDP NA WHEN USING BRADFORD ALTIMETER SETTING.

CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE BRADFORD ALTIMETER SETTING AND INCREASE

ALL MDA 240 FT, AND S-28 CAT B AND CIRCLING CAT A/B/D VISIBILITY 1/4 SM AND S-28 CAT C/D AND

CIRCLING CAT C 1/2 SM.

CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-28 CAT C/D VISIBILITY TO 2 1/2 SM.

CHART NOTE: FOR INOPERATIVE ALS WHEN USING BRADFORD ALTIMETER SETTING, INCREASE S-28 CAT C/D

VISIBILITY TO 3 SM.

EQUIPMENT REQUIREMENTS NOTE: DME REQUIRED.



CITY AND STATE

ST MARYS, PA

ELEVATION: 1934

TDZE: 1934

AIRPORT NAME:

ST MARYS MUNI

FACILITY
IDENTIFIER:

I-OYM

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:

LOC RWY 28, AMDT 4D

13 SEPTEMBER 2018

SUP: LOC/DME RWY 28

AMDT: 4C

DATED: 08/18/2016

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> ST MARYS MUNI	<u>AIRPORT ID</u> KOYM	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1D	<u>CITY</u> ST MARYS	<u>STATE</u> PA	
<u>AIRPORT ELEVATION</u> 1934	<u>TDZE</u> 1934	<u>SUPERSEDED</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1C	<u>DATED</u> 08/18/2016	<u>MAG VAR</u> 11W	<u>EPOCH YEAR</u> 2005
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
SLT VORTAC	IAF	MINSK		TF	FB	1.00	255.61	14.01	4000
ETG VORTAC	IAF	MINSK		TF	FB	1.00	348.67	12.79	4000
MINSK	IF	LYCEE		TF	FB	1.00	281.15	6.00	3600
LYCEE	FAF	ELOC/3.40 NM TO RW28		TF	FB	0.30	281.06	1.60	
ELOC/3.40 NM TO RW28		RW28	MAP	TF	FO	0.30	281.06	3.43	
RW28	MAP	2290 MSL		CA					
2290 MSL		PUNKS		DF	FO	1.00			4000

MISSED APPROACH

MAP:

LPV: DA
LNAV: RW28

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 4000 DIRECT PUNKS AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
2. PROFILE STARTS AT MINSK
3. FAC: 281.06 FAF: LYCEE DIST FAF TO MAP: 5.03 DIST FAF TO THLD: 5.03
4. MIN ALT: MINSK 4000, LYCEE 3600, ELOC/3.40 NM TO RW28 3040*
5. DIST TO THLD FROM OM: MM: IM: 150 HAT: 356 HAT: 0.99
6. MIN GP INCPT: 3600 GP ALT AT FAF : LYCEE 3600 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 40.0
8. MSA FROM: RW28 4200

PBN EQUIPMENT REQUIREMENTS NOTES

RNP APCH

NOTES:

CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO LPV ALL CATS AND LNAV CAT A/B.
CHART NOTE: VDP NA WHEN USING BRADFORD ALTIMETER SETTING.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE BRADFORD ALTIMETER SETTING AND INCREASE ALL DA/MDA 240 FT, LPV ALL CATS VISIBILITY 3/8 SM, LNAV CAT C/D 3/4 SM, AND CIRCLING CAT A/D 1/4 SM AND CAT B 1/2 SM AND CAT C 1 SM.
CHART NOTE: WHEN USING BRADFORD ALTIMETER SETTING, INOPERATIVE TABLE DOES NOT APPLY TO LNAV CAT C/D.
CHART NOTE: FOR INOPERATIVE ALS WHEN USING BRADFORD ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO 1 3/4 SM AND LNAV CAT A/B TO 1 1/4 SM.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT ETG VORTAC ON AIRWAY RADIALS 276 CW 338, AND ON SLT VORTAC AIRWAY RADIALS 289 CW 308.

ADDITIONAL FLIGHT DATA:

CHART VDP AT 2.08 NM TO RW28*
*LNAV ONLY
WAAS CHANNEL #82302
REFERENCE PATH ID: W28A
CHART FAS OBST: 2279 TREES 412417N/0782629W.
HOLD W, RT, 100.82 INBOUND
LTP HAE: 557.6 M

MINIMUMS:

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

ALTERNATE: NA ☒

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	2290	1	356	2290	1	356	2290	1	356	2290	1	356			
LNAV MDA	2640	1	706	2640	1	706	2640	1 3/4	706	2640	1 3/4	706			
CIRCLING	2640	1	706	2660	1	726	2660	2	726	2800	2 3/4	866			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
ST MARYS MUNI	KOYM	RNAV (GPS) RWY 28	1D	ST MARYS	PA

CHANGES - REASONS

- 1. RAISED LPV DA/HAT FROM 2208/274 TO 2290/356 - NEW CONTROLLING OBSTACLE IN LPV FINAL SEGMENT. ALSO WILL CLEAR FDC NOTAM 8/2969
- 2. ADDED CHART NOTE: RWY 28 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED - INCORPORATING T-NOTAM 8/2969
- 3. CHANGED 34:1 IS CLEAR TO 34:1 IS NOT CLEAR - 34:1 PENETRATIONS FOUND
- 4. CHANGED INTERMEDIATE RNP FROM 0.5 TO 1.0 - CURRENT RNAV CRITERIA
- 5. REMOVED MISSED APPROACH SLOPING SURFACE OBSTACLE - NO LONGER A MISSED APPROACH PENETRATION WITH NEW LPV DA
- 6. REMOVED DME/DME RNP-0.3 NA AND ADDED RNP APCH - PER 8260.19
- 7. CHANGED BACKUP ALTIMETER NOTE FROM WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE BRADFORD ALTIMETER SETTING AND INCREASE ALL DA/MDA 240 FEET, LPV ALL CATS VISIBILITY 5/8 SM, LNAV CAT C/D 3/4 SM, AND CIRCLING CAT A/D 1/4 SM AND CAT B 1/2 SM AND CAT C 1 SM TO WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE BRADFORD ALTIMETER SETTING AND INCREASE ALL DA/MDA 240 FT, LPV ALL CATS VISIBILITY 3/8 SM, LNAV CAT C/D 3/4 SM, AND CIRCLING CAT A/D 1/4 SM AND CAT B 1/2 SM AND CAT C 1 SM - INCORPORATING P-NOTAM 6/1829 AND VISCHECK CALCULATOR
- 8. CHANGED LNAV VISIBILITY CAT C FROM 2 SM TO 1 3/4 SM, AND CAT D FROM 2 1/4 SM TO 1 3/4 SM - NEW INOP LIGHT TABLE
- 9. CHANGED CHART NOTE FROM INOPERATIVE TABLE DOES NOT APPLY TO INOPERATIVE TABLE DOES NOT APPLY TO LPV ALL CATS AND LNAV CAT A/B - INCORPORATING P-NOTAM 6/1829
- 10. REMOVED CHART NOTE: FOR INOPERATIVE MALS, INCREASE LNAV CAT D VISIBILITY TO 2 MILE - VIS INCREASE IS NOW COVERED BY THE NEW INOP TABLE.
- 11. CHANGED PLANVIEW NOTE FROM PROCEDURE NA FOR ARRIVALS AT ETG VORTAC ON AIRWAY RADIALS 290 CW 338, AND ON SLT VORTAC AIRWAY RADIALS 289 CW 308 TO PROCEDURE NA FOR ARRIVALS AT ETG VORTAC ON AIRWAY RADIALS 276 CW 338, AND ON SLT VORTAC AIRWAY RADIALS 289 CW 308 - TURN GREATER THAN 90 DEGREES
- 12. ADDED CHART NOTE: WHEN USING BRADFORD ALTIMETER SETTING, INOPERATIVE TABLE DOES NOT APPLY TO LNAV CAT C/D - INCORPORATING P-NOTAM 6/1829
- 13. CHANGED CHART NOTE FROM FOR INOPERATIVE MALS WHEN USING BRADFORD ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO 1 7/8 MILE TO FOR INOPERATIVE ALS WHEN USING BRADFORD ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO 1 3/4 SM AND LNAV CAT A/B TO 1 1/4 SM - INCORPORATING P-NOTAM 6/1829 AND VISCHECK CALCULATOR
- 14. ADDED CHART VDP AT 2.08 NM TO RW28* *LNAV ONLY TO ADDITIONAL FLIGHT DATA - INCORPORATING P-NOTAM 6/1829
- 15. ADDED CHART NOTE: VDP NA WHEN USING BRADFORD ALTIMETER SETTING - INCORPORATING P-NOTAM 6/1829



<u>AIRPORT</u> ST MARYS MUNI	<u>AIRPORT ID</u> KOYM	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 28	<u>ORIGINAL/AMENDMENT</u> 1D	<u>CITY</u> ST MARYS	<u>STATE</u> PA
<u>COORDINATED WITH:</u>					
A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZOB, AIRPORT MANAGER					
		Digitally signed by			
<u>FLIGHT CHECKED BY</u>		BEV L BORDY	<u>OFFICE</u>	<u>DATE</u>	
JORGE A MALCUN		Jun 19, 2018	FICO	6/15/18	
		Digitally signed by			
<u>DEVELOPED BY</u>		BEV L BORDY	<u>OFFICE</u>	<u>DATE</u>	
LONNIE EVERHART (ANTHONY CAPPABIANCO)		Jun 19, 2018	AJV-5400	03/13/2018	
		Digitally signed by			
<u>APPROVED BY</u>		BEV L BORDY	<u>OFFICE</u>	<u>DATE</u>	<u>TITLE</u>
LONNIE EVERHART		Jun 19, 2018	AJV-5400		



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KOYM
RUNWAY	RW28
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W28A
LTP/FTP LATITUDE	412444.9500N
LTP/FTP LONGITUDE	0782941.3000W
LTP/FTP ELLIPSOIDAL HEIGHT	+05576
FPAP LATITUDE	412444.9200N
FPAP LONGITUDE	0783139.7200W
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	1440
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	50.0
CRC REMAINDER	54A50AD8
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+05896
FPAP ORTHOMETRIC HEIGHT	+05896



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
ST MARYS, PA	ST MARYS MUNI	13 SEPTEMBER 2018	2A

TAKEOFF MINIMUMS:

RWY 10: STANDARD WITH MINIMUM CLIMB OF 230 FT PER NM TO 2800, OR 1000-3 FOR VCOA.

RWY 28: STANDARD.

TEXTUAL DEPARTURE PROCEDURES:

VISUAL CLIMB OVER AIRPORT:

RWY 10: OBTAIN ATC APPROVAL FOR VCOA WHEN REQUESTING IFR CLEARANCE. CLIMB IN VISUAL CONDITIONS TO CROSS ST MARYS MUNI AIRPORT AT OR ABOVE 2800 BEFORE PROCEEDING ON COURSE.

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 10: VEHICLES ON ROAD, TERRAIN BEGINNING 197 FT FROM DER, 275 FT LEFT OF CENTERLINE, UP TO 1952 FT MSL. POLE, TREE BEGINNING 410 FT FROM DER, 211 FT RIGHT OF CENTERLINE, UP TO 37 FT AGL/1963 FT MSL. POLE, BUILDING BEGINNING 690 FT FROM DER, 411 FT LEFT OF CENTERLINE, UP TO 36 FT AGL/1978 FT MSL. TREE 1023 FT FROM DER, 680 FT RIGHT OF CENTERLINE, 1987 FT MSL. TREE 1280 FT FROM DER, 723 FT RIGHT OF CENTERLINE, 102 FT AGL/2030 FT MSL. TREE 1984 FT FROM DER, 728 FT RIGHT OF CENTERLINE, 2045 FT MSL. TREE 2238 FT FROM DER, 303 FT LEFT OF CENTERLINE, 67 FT AGL/2006 FT MSL. TREES BEGINNING 2452 FT FROM DER, 62 FT RIGHT OF CENTERLINE, UP TO 91 FT AGL/2056 FT MSL. TREES BEGINNING 2475 FT FROM DER, 686 FT LEFT OF CENTERLINE, UP TO 98 FT AGL/2027 FT MSL.

NOTE: RWY 28: TREES BEGINNING 12 FT FROM DER, 213 FT RIGHT OF CENTERLINE, UP TO 1948 FT MSL. POLE 91 FT FROM DER, 263 FT LEFT OF CENTERLINE, 23 FT AGL/1928 FT MSL. TREE, NAVAID BEGINNING 466 FT FROM DER, ON CENTERLINE, UP TO 1967 FT MSL. POLE, NAVAID, TREE BEGINNING 544 FT FROM DER, 255 FT LEFT OF CENTERLINE, UP TO 33 FT AGL/1954 FT MSL. TREE 659 FT FROM DER, 451 FT RIGHT OF CENTERLINE, 75 FT AGL/1968 FT MSL. TREE 2194 FT FROM DER, 25 FT LEFT OF CENTERLINE, 73 FT AGL/1965 FT MSL.

CONTROLLING OBSTACLES:

RWY 10: 2539 FEET MSL AAO 412428.79N-0782503.23W(CG/CGTA)

VCOA: 2539 FEET MSL AAO 412428.79N-0782503.23W(DIVERSE AREA), 2474 FEET MSL AAO 412112.00N-0783142.00W(VCA)

REMARKS:

FLIGHT INSPECTED BY:

JORGE A MALCUN

Digitally signed by

BEV L BORDY

Jun 19, 2018

Digitally signed by

BEV L BORDY

Jun 19, 2018

Digitally signed by

BEV L BORDY

Jun 19, 2018

OFFICE SYMBOL:

FICO

OFFICE SYMBOL:

AJV-5400

OFFICE SYMBOL:

AJV-5400

DATE:

6/14/18

DATE:

03/14/2018

DATE:

DEVELOPED BY:

LONNIE EVERHART
(KEITH JONES)

APPROVED BY:

LONNIE EVERHART

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A **ALPA** **AOPA** **APA** **HAI** **NBAA**



OTHER:

ATA, ZOB, AMGR.

CHANGES - REASONS:

CHANGED RWY 10 FROM "STANDARD" TO "STANDARD WITH MINIMUM CLIMB OF 230 FT PER NM TO 2800, OR 1000-3 FOR VCOA." - NEW CONTROLLING OBSTACLE.

AMENDED RWY 10 AND 28 TAKEOFF OBSTACLE NOTES. - UPDATED TO CURRENT AVAILABLE OBSTACLE DATA.



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> CLEVELAND RGNL JETPORT	<u>AIRPORT ID</u> KRZR	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 3	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> CLEVELAND	<u>STATE</u> TN
<u>AIRPORT ELEVATION</u> 860	<u>TDZE</u> 834	<u>SUPERSEDED</u> RNAV (GPS) RWY 3	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 06/25/2015	<u>MAG VAR</u> 5W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2015

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 334/30 CW 094/30	NOPT	334/5 CW 094/5		5100
2. 334/5 CW 094/5		MMARS	IF/IAF	4100
3. 094/30 CW 214/30		YODUL	IAF	4600
4. 214/30 CW 334/30		ZUBEB	IAF	6400

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>
ZUBEB	IAF	MMARS	NOPT	TF	FB	1.00	334.19	8.00	4100
YODUL	IAF	MMARS	NOPT	TF	FB	1.00	094.05	8.00	4100
MMARS	IF/IAF	AMZON		TF	FB	1.00	034.14	7.09	2700
AMZON	FAF	CULBO/2.50 NM TO RW03		TF	FB	0.30	034.19	2.54	
CULBO/2.50 NM TO RW03		RW03	MAP	TF	FO	0.30	034.19	2.50	
RW03	MAP	1800 MSL		CA			034.19		1800
1800 MSL		MMARS		DF	FO	1.00			4100



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW03

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1800 THEN CLIMBING LEFT TURN TO 4100 DIRECT MMARS AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)				
2.	HOLD SW MMARS, RT, 034.14 INBOUND, 4100 FT. IN LIEU OF PT (IAF), MAX 6000.							
3. FAC:	034.19	FAF: AMZON	DIST FAF TO MAP: 5.04	DIST FAF TO THLD: 5.04				
4. MIN ALT:	MMARS 4100, AMZON 2700, CULBO/2.50 NM TO RW03 1780*							
5. DIST TO THLD FROM OM:		MM:	IM:	150 HAT:	200 HAT: 0.43			
6. MIN GP INCPT:	2700	GP ALT AT FAF : AMZON 2700			OM:	MM:	IM:	
7. GP ANGLE:	3.40	34:1: IS NOT CLEAR	20:1: IS CLEAR	TCH: 55.0				
8. MSA FROM:								

PBN REQUIREMENTS NOTE

RNP APCH.

NOTES:

CHART NOTE: RWY 3 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 20C.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON
CHART VDP AT 1.67 NM TO RW03*
*LNAV ONLY
WAAS CHANNEL #99632
REFERENCE PATH ID: W03A
CHART FAS OBST: 1192 TREE 351055N/0845006W.
LTP HAE: 221.4 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 1000-3



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	1034	3/4	200	1034	3/4	200	1104	7/8	270	1104	7/8	270			
LNAV/VNAV DA	1437	1 3/4	603	1437	1 3/4	603	1437	1 3/4	603	1437	1 3/4	603			
LNAV MDA	1400	1	566	1400	1	566	1400	1 5/8	566	1400	1 5/8	566			
CIRCLING	1460	1	600	1460	1	600	1580	2	720	1780	3	920			

CHANGES - REASONS

1. ALTERNATE MINIMUMS ADDED - KRZR WEATHER SERVICE IS ON SERVICE A.
2. MMARS TO AMZON DISTANCE CHANGED FROM 6.37 TO 7.09 - GLIDEPATH ANGLE (GPA)/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
3. AMZON TO CULBO/2.50 NM TO RW03 COURSE/DISTANCE CHANGED FROM 034.18 / 3.26 TO 034.19 / 2.54 - GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
4. CULBO/2.50 NM TO RW03 TO RW03 COURSE CHANGED FROM 034.18 TO 034.19 - GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
5. (CA) ALTITUDE CHANGED FROM 2100 TO 1800-PER IFF CHECKLIST, NEW MISSED APPROACH INSTRUCTIONS.
6. FAC: CHANGED FROM 034.18 TO 034.19- GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
7. GLIDE PATH ALTITUDE CHANGED FROM 1660* TO 1780*-STABILIZED DESCENT ANGLE.
8. DIST FAF TO MAP/THLD CHANGED FROM 5.76 TO 5.04 - GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
9. GPA ANGLE/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0-PER IFF CHECKLIST/FIM TO MITIGATE OBSTACLES AND ACHIEVE LOWER LPV DA/HAT.
10. MISSED APPROACH INSTRUCTIONS CHANGED FROM CLIMB TO 2100 THEN CLIMBING RIGHT TURN TO 4100 DIRECT MMARS AND HOLD "TO" CLIMB TO 1800 THEN CLIMBING LEFT TURN TO 4100 DIRECT MMARS AND HOLD - PER IFF CHECKLIST/FIM.
11. DISTANCE TO THLD FROM 453 HAT: 1.30 NM CHANGED TO DISTANCE TO THLD FROM 200 HAT: 0.43 NM - GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
12. LPV CATS A/B DA/HAT CHANGED FROM 1349/515 TO 1034/200- GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
13. LPV CATS A/B VISIBILITY CHANGED FROM 1 3/4 TO 3/4 - LOWER DA/HAT.
14. LPV CATS C/D DA/HAT CHANGED FROM 1349/515 TO 1104/270-GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
15. LPV CATS C/D VISIBILITY CHANGED FROM 1 3/4 TO 7/8- LOWER DA/HAT.
16. UPDATED BARO LOW TEMP FROM -16C (4F) TO -16C - FAHRENHEIT NO LONGER REQUIRED.
17. UPDATED BARO HIGH TEMP FROM 54C (130F) TO 20C - GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0 AND FAHRENHEIT NO LONGER REQUIRED.
18. ADDED PBN REQUIREMENT NOTE: RNP APCH - EQUIPMENT NAVSPEC REQUIREMENTS.
19. DELETED CHART NOTE: DME/DME RNP-0.3 NA - REPLACED WITH PBN REQUIREMENT NOTE: RNP APCH.
20. DELETED ALL BACK UP ALTIMETER NOTES - CONTINGENCY ALTIMETER INFORMATION LISTED ON THE BACK OF THE 8260-9. KRZR AND KCHA WEATHER SOURCE TRANSMITTED TO WMSCR.
21. ADDED 20:1 IS CLEAR - NO 20:1 OBSTACLES.
22. LOWERED MIN ALTITUDE OF TAA SEGMENT 214/30 CW 334/30 FROM 6500 TO 6400. NEW AAO EVALUATION.

FAS DATA CHANGES AND REASONS:

23. FPAP LATITUDE CHANGED FROM 351335.5415N TO 351335.5370N- GPA/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
24. FPAP LONGITUDE CHANGED FROM 0844722.2785W TO 0844722.2685W- GPA ANGLE/TCH CHANGED FROM 3.00/40.1 TO 3.40/55.0.
25. TCH CHANGED FROM 00040.1 TO 00055.0 - PER IFF CHECKLIST/FIM TO ACHIEVE LOWER LPV DA/HAT.
26. GLIDEPATH ANGLE (GPA) CHANGED FROM 03.00 TO 03.40- PER IFF CHECKLIST/FIM TO ACHIEVE LOWER LPV DA/HAT.
27. VERTICAL ALERT LIMIT (VAL) CHANGED FROM 50.0 TO 35.0 - LPV CATS A/B HAT CHANGED FROM 515 TO 200.
28. LENGTH OFFSET CHANGED FROM 1072 TO 864 - NEW RUNWAY LENGTH.
29. CRC REMAINDER CHANGED FROM C931533A TO 166217E5 - RESULT OF FAS DATA BLOCK INFORMATION CHANGES.

PREVIOUS P-NOTAM CHANGES AND REASONS INCORPORATED IN THIS AMENDMENT.

06/19/2018: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 04/16/2018.
REQUIRED EFFECTIVE DATE CHANGED FROM ROUTINE TO HARD DATE 09/13/2018.

PDF EDIT:
-3, LPV CATS C/D DA/HAT FROM 1034/200 TO 1104/270.
-9, REMOVED "ORDER 8260.3, VOLUME 1, CHAPTER 2, NEW CIRCLING CRITERIA APPLIED" FROM NOTES/EXPLANATIONS FROM PROCEDURE SEGMENTS.
-9, CHANGED AVERAGE COLD TEMPERATURE DERIVED DEVIATION REMARK FROM 13C TO -30C.
-9, CHANGED "MAP" TO "ARP" IN AIRSPACE.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZTL, ARPT MGR, CHA APP CON

FLIGHT CHECKED BY

PENDING

Digitally signed by

DEZ SILAGYI

OFFICE

DATE

DEVELOPED BY

DEANNA M. FIELDS

Digitally signed by

DEANNA M FIELDS

OFFICE

DATE

AJV-5421

04/16/2018

APPROVED BY

JULIE MORGAN

Digitally signed by

DEZ SILAGYI

OFFICE

DATE

TITLE

AJV-5420

Jun 20, 2018



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KRZR
RUNWAY	RW03
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W03A
LTP/FTP LATITUDE	351217.6520N
LTP/FTP LONGITUDE	0844815.3525W
LTP/FTP ELLIPSOIDAL HEIGHT	+02214
FPAP LATITUDE	351335.5370N
FPAP LONGITUDE	0844722.2685W
THRESHOLD CROSSING HEIGHT (TCH)	00055.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.40
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0864
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0
CRC REMAINDER	166217E5
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+02515
FPAP ORTHOMETRIC HEIGHT	+02515



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> CLEVELAND RGNL JETPORT	<u>AIRPORT ID</u> KRZR	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 21	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> CLEVELAND	<u>STATE</u> TN	
<u>AIRPORT ELEVATION</u> 860	<u>TDZE</u> 866	<u>SUPERSEDED</u> RNAV (GPS) RWY 21	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 06/25/2015	<u>MAG VAR</u> 5W	<u>EPOCH YEAR</u> 2015
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> 09/13/2018	<u>CANCEL SUSPEND</u>		

TAA

<u>FROM</u>	<u>FIX TYPE</u>	<u>TO</u>	<u>FIX TYPE</u>	<u>ALTITUDE</u>
1. 154/30 CW 274/30	NOPT	154/8 CW 274/8		7100
2. 154/8 CW 274/8		KAYAC	IF/IAF	3700
3. 274/30 CW 034/30		274/10 CW 034/10		7800
4. 274/10 CW 034/10		HUVPO	IAF	5100
5. 034/30 CW 154/30		WITIV	IAF	5300

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>
HUVPO	IAF	KAYAC	NOPT	TF	FB	1.00	274.38	8.00	3700
WITIV	IAF	KAYAC	NOPT	TF	FB	1.00	154.24	8.00	3700
KAYAC	IF/IAF	HWSEE		TF	FB	1.00	214.29	6.63	2600
HWSEE	FAF	RW21	MAP	TF	FO	0.30	214.25	5.29	
RW21	MAP	1066 MSL		CA			214.25		
1066 MSL		MMARS		DF	FO	1.00			4100



MISSED APPROACH

MAP:
LPV: DA
LNAV/VNAV: DA
LNAV: RW21

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 4100 DIRECT MMARS AND HOLD, CONTINUE CLIMB-IN-HOLD TO 4100.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF (IAF)				
2.	HOLD NE KAYAC, RT, 214.29 INBOUND, 3700 FT. IN LIEU OF PT (IAF), MAX 6000.							
3. FAC:	214.25	FAF: HWSEE	DIST FAF TO MAP: 5.29	DIST FAF TO THLD: 5.29				
4. MIN ALT:	KAYAC 3700, HWSEE 2600							
5. DIST TO THLD FROM OM:		MM:	IM:	150 HAT:	200 HAT: 0.47			
6. MIN GP INCPT:	2600	GP ALT AT FAF : HWSEE 2600			OM:	MM:	IM:	
7. GP ANGLE:	3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 50.0				
8. MSA FROM:								

PBN REQUIREMENTS NOTE

RNP APCH

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -16C OR ABOVE 54C.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON
CHART VDP AT 1.39 NM TO RW21*
*LNAV ONLY
WAAS CHANNEL #45731
REFERENCE PATH ID: W21A
CHART FAS OBST: 1094 TREE 351342N/0844807W.
CHART: 1252 TOWER 351804N/0844425W.
HOLD SW, RT, 034.14 INBOUND
LTP HAE: 233.7 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 1000-3



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	1066	3/4	200	1066	3/4	200	1066	3/4	200	1066	3/4	200			
LNAV/VNAV DA	1276	1 1/8	410	1276	1 1/8	410	1276	1 1/8	410	1276	1 1/8	410			
LNAV MDA	1360	1	494	1360	1	494	1360	1 3/8	494	1360	1 3/8	494			
CIRCLING	1460	1	600	1460	1	600	1580	2	720	1780	3	920			

CHANGES - REASONS

1. (CA) ALTITUDE CHANGED FROM 1260 TO 1066 - LPV DA 1066 IS THE LOWEST ALTITUDE.
2. TCH CHANGED FROM 40 TO 50 - IFP FIM.
3. FAF DISTANCE CHANGED FROM 5.34 TO 5.29 - TCH CHANGED FROM 40 TO 50.
4. DIST FAF TO MAP/THLD CHANGED FROM 5.34 TO 5.29 - TCH CHANGED FROM 40 TO 50.
5. FAS OBST CHANGED FROM 1100 AAO 351657N/0844421W TO 1094 TREE 351342N/0844807W - SURVEY
6. DISTANCE TO THLD FROM 200 HAT: 0.50 NM CHANGED TO DISTANCE TO THLD FROM 200 HAT: 0.47 NM - TCH CHANGED FROM 40 TO 50.
7. VDP DISTANCE CHANGED FROM 1.44 NM TO 1.39 NM - TCH CHANGED FROM 40 TO 50.
8. LPV DA CHANGED FROM 1060 TO 1066 ALL CATS - TDZE CHANGED FROM 860 TO 866.
9. LNAV/VNAV DA/HAT CHANGED FROM 1255/395 TO 1276/410 ALL CATS - QUAD MAP STUDY DONE PLACING 100 FT VEGETATION.
10. LNAV/VNAV VISIBILITY CHANGED FROM 1 3/8 TO 1 1/8 ALL CATS - AJV VALIDATED VISCHECK (NEW INOP TABLE) CALCULATOR.
11. LNAV HAT CHANGED FROM 500 TO 494 ALL CATS - TDZE CHANGED FROM 860 TO 866.
12. ALTERNATE MINIMUMS ADDED - KRZR WEATHER SERVICE IS ON SERVICE A.
13. UPDATED BARO LOW TEMP FROM -16C (4F) TO -16C - FAHRENHEIT NO LONGER REQUIRED.
14. UPDATED BARO HIGH TEMP FROM 54C (130F) TO 54C - FAHRENHEIT NO LONGER REQUIRED.
15. ADDED PBN REQUIREMENT NOTE: RNP APCH - EQUIPMENT NAVSPEC REQUIREMENTS.
16. DELETED CHART NOTE: DME/DME RNP-0.3 NA - REPLACED WITH PBN REQUIREMENT NOTE: RNP APCH.
17. DELETED ALL BACK UP ALTIMETER NOTES - CONTINGENCY ALTIMETER INFORMATION LISTED ON THE BACK OF THE 8260-9.
18. KRZR AND KCHA WEATHER SOURCE TRANSMITTED TO WMSCR.
19. ADDED 20:1 IS CLEAR - NO 20:1 OBSTACLES.
20. ADDED 7:1 OBSTACLE 1252 TOWER 351804N/0844425W - SURVEY

FAS DATA CHANGES AND REASONS:

21. LTP/FTP LATITUDE CHANGED FROM 351305.1270N TO 351311.1700N - AIRNAV DATA.
22. LTP/FTP LONGITUDE CHANGED FROM 0844742.9960W TO 0844738.8800W - AIRNAV DATA.
23. LTP/FTP ELLIPSOIDAL HEIGHT CHANGED FROM +02320 TO +02337 - AIRNAV DATA.
24. FPAP LATITUDE CHANGED FROM 351147.2390N TO 351153.2835N - TCH CHANGED FROM 40 TO 50.
25. FPAP LONGITUDE CHANGED FROM 0844836.0675W TO 0844831.9560W - TCH CHANGED FROM 40 TO 50.
26. THRESHOLD CROSSING HEIGHT (TCH) CHANGED FROM 00040.0 TO 00050.0 - IFP FIM
27. LENGTH OFFSET CHANGED FROM 1072 TO 864 - NEW RUNWAY LENGTH.
28. CRC REMAINDER CHANGED FROM 8338D88F TO 635F1011 - RESULT OF FAS DATA BLOCK INFORMATION CHANGES.

PREVIOUS P-NOTAM CHANGES AND REASONS INCORPORATED IN THIS AMENDMENT.

06/19/2018: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 04/18/2018.
REQUIRED EFFECTIVE DATE CHANGED FROM ROUTINE TO HARD DATE 09/13/2018

PDF EDIT:

- 9, REMOVED "ORDER 8260.3, VOLUME 1, CHAPTER 2, NEW CIRCLING CRITERIA APPLIED" FROM NOTES/EXPLANATIONS FROM PROCEDURE SEGMENTS.
- 9, CHANGED AVERAGE COLD TEMPERATURE DERIVED DEVIATION REMARK FROM 12C TO -30C.
- 9, CHANGED "MAP" TO "ARP" IN AIRSPACE.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZTL, APRT MGR, CHA APP CON

FLIGHT CHECKED BY

PENDING

Digitally signed by

DEZ SILAGYI

Jun 20, 2018

OFFICE

DATE

DEVELOPED BY

DEANNA M. FIELDS

Digitally signed by

DEANNA M FIELDS

May 10, 2018

OFFICE

AJV-5421

DATE

04/18/2018

APPROVED BY

JULIE MORGAN

Digitally signed by

DEZ SILAGYI

Jun 20, 2018

OFFICE

AJV-5420

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KRZR
RUNWAY	RW21
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W21A
LTP/FTP LATITUDE	351311.1700N
LTP/FTP LONGITUDE	0844738.8800W
LTP/FTP ELLIPSOIDAL HEIGHT	+02337
FPAP LATITUDE	351153.2835N
FPAP LONGITUDE	0844831.9560W
THRESHOLD CROSSING HEIGHT (TCH)	00050.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	0864
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	35.0
CRC REMAINDER	635F1011
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K7
LTP ORTHOMETRIC HEIGHT	+02638
FPAP ORTHOMETRIC HEIGHT	+02638



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
CLEVELAND, TN	CLEVELAND RGNL JETPORT	09/13/2018	2

TAKEOFF MINIMUMS:

RWY 3: STANDARD

RWY 21: 300-1 3/4 OR STANDARD WITH MINIMUM CLIMB OF 260 FT PER NM TO 1200.

TEXTUAL DEPARTURE PROCEDURES:

RWY 3: CLIMB HEADING 034.22 TO 2200 BEFORE TURNING RIGHT.

RWY 21: CLIMB HEADING 214. 22 TO 2400 BEFORE PROCEEDING ON COURSE.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

RWY 21: NOTE: RWY 21, TREE 3009 FT FROM DER, 676 FT LEFT OF CENTERLINE, 920 FT MSL.

TREE 1.1 NM FROM DER, 2087 FT LEFT OF CENTERLINE, 1011 FT MSL.

TREE 1.1 NM FROM DER, 2321 FT LEFT OF CENTERLINE, 1021 FT MSL.

TOWER 1.1 NM FROM DER, 65 FT LEFT OF CENTERLINE, 196 FT AGL/1054 FT MSL.

TOWER 1.4 NM FROM DER, 880 FT RIGHT OF CENTERLINE, 225 FT AGL/1075 FT MSL.

CONTROLLING OBSTACLES:

RWY 21: 1054 FT MSL TOWER, 351116.23N/0844856.29W (CLIMB GRADIENT/CLIMB TO ALTITUDE). 1075 FT MSL TOWER, 351105.00N/0844917.00W (CEILING/VISIBILITY).

OBSTACLE MANDATING ODP ROUTE DEVELOPMENT:

RWY 3: 3283 FT MSL TOWER, 351135.00N/0843333.00W.

RWY21: 4400 FT MSL AAO, 350000.00N/0843145.00W.

REMARKS:

FLIGHT INSPECTED BY:

Digitally signed by

DEZ SILAGYI

Jun 20, 2018

OFFICE SYMBOL:

FICO

DATE:

6/12/18

DEVELOPED BY:

Digitally signed by

DEANNA M FIELDS

May 10, 2018

OFFICE SYMBOL:

AJV-5421

DATE:

04/25/2018

APPROVED BY:

Digitally signed by

DEZ SILAGYI

Jun 20, 2018

OFFICE SYMBOL:

AJV-5420

DATE:

REQUIRED EFFECTIVE DATE:

09/13/2018

COORDINATED WITH:

A4A

ALPA

AOPA

APA

HAI

NBAA



OTHER:

ZTL, CHA APP CON, ARPT MGR

CHANGES - REASONS:

1. RWY 3 TEXTUAL DEPARTURE PROCEDURE: HEADING CHANGED FROM 034.21 TO 034.22 - CURRENT AIRNAV.
2. UPDATED TAKEOFF OBSTACLE NOTES - GROUPED AND FORMATTED IN ACCORDANCE WITH THE DEPARTURE OBSTACLE GROUPER SOP (1.0).
3. RWY 21 CONTROLLING OBSTACLE: 1054 FT MSL TOWER, 351116.23N/0844856.29W ADDED (CLIMB GRADIENT/CLIMB TO ALTITUDE) - CRITERIA, WHEN THERE IS MORE THAN ONE CONTROLLING OBSTACLE TO BE DOCUMENTED, FOLLOWING THE COORDINATES, INCLUDE WHAT ENTITY IT APPLIES TOO.
5. RWY 21 CONTROLLING OBSTACLE: ADDED 1075 FT MSL TOWER, 351105.00N/0844917.00W (CEILING/VISIBILITY) - CURRENT AIRNAV.

**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
CLEVELAND, TN	CLEVELAND RGNL JETPORT	09/13/2018	2

6. OBSTACLE MANDATING ODP ROUTE DEVELOPMENT: DELETED RWY 3 OBSTACLE 3187 FT MSL TOWER 351131.00N/0843331.00W - NOT A FACTOR WITH NEW THE EVALUATION IN TARGETS.

06/19/2018: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 04/25/2018.
REQUIRED EFFECTIVE DATE CHANGED FROM ROUTINE TO HARD DATE 09/13/2018.

FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
ILS STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.29

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> AUSTIN-BERGSTROM INTL	<u>AIRPORT ID</u> KAUS	<u>PROCEDURE NAME</u> ILS OR LOC RWY 35R ILS RWY 35R SA CAT I, ILS RWY 35R SA CAT II	<u>ORIGINAL/AMENDMENT</u> 4	<u>CITY</u> AUSTIN	<u>STATE</u> TX	
<u>AIRPORT ELEVATION</u> 542	<u>TDZE</u> 480	<u>SUPERSEDED</u> ILS OR LOC RWY 35R	<u>ORIGINAL/AMENDMENT</u> 3	<u>DATED</u> 12/07/2017	<u>MAG VAR</u> 4E	<u>EPOCH YEAR</u> 2020
<u>FACILITY</u> I-HCE	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
BALLD/I-HCE 15.00 DME/RADAR	IAF	SSHOE/I-HCE 6.27 DME/RADAR					354.70	8.73 (I-HCE)	2500
SSHOE/I-HCE 6.27 DME/RADAR	IF	ZEDKU/I-HCE 4.93 DME/RADAR					354.70	1.34 (I-HCE)	2100
ZEDKU/I-HCE 4.93 DME/RADAR		FNNLY/I-HCE 3.26 DME/RADAR					354.70	1.67 (I-HCE)	1600

MISSED APPROACH

MAP:

ILS: DA
LOC: I-HCE 0.13 DME

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 1000 THEN CLIMBING RIGHT TURN TO 3000 ON HEADING 030 AND CWK VORTAC R-088 TO HOOKK/CWK 17.00 DME AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS (DO NOT CHART):

CLIMB TO 1000 THEN CLIMBING RIGHT TURN TO 3000 ON HEADING 040 FOR RADAR VECTORS. (RADAR REQUIRED).

PROFILE:

- PT **SIDE OF COURSE** **OUTBOUND** **FT WITHIN** **MILES OF (IAF)**
- PROFILE STARTS AT BALLD/I-HCE 15.00 DME/RADAR
- FAC:** 354.70 **PFAF:** FNNLY/I-HCE 3.26 DME/RADAR **DIST PFAF TO MAP:** **DIST PFAF TO THLD:** 3.37
- MIN ALT:** BALLD/I-HCE 15.00 DME/RADAR 4000, SSHOE/I-HCE 6.27 DME/RADAR 2500, ZEDKU/I-HCE 4.93 DME/RADAR 2100, FNNLY/I-HCE 3.26 DME/RADAR 1600
- DIST TO THLD FROM OM:** **MM:** **IM:** **150 HAT:** 1984 **100 HAT:** 1030 **GS ANT:** 961
- MIN GS INCPT:** 1600 **GS ALT AT PFAF:** FNNLY/I-HCE 3.26 DME/RADAR 1600 **OM:** **MM:** **IM:**
- GP ANGLE:** 3.00 **34:1:** **20:1:** **TCH:** 52.4
- MSA FROM:** CWK VORTAC 205-300 3100, 300-205 2600

EQUIPMENT REQUIREMENTS NOTES

DME REQUIRED.
RADAR REQUIRED FOR PROCEDURE ENTRY.



NOTES:

SA CAT I ILS - SPECIAL AIRCREW AND AIRCRAFT CERTIFICATION REQUIRED; S-ILS 35R: CAT A, B, C, D, RA 235, RVR 1400, HAT 150, DA 630 MSL.
SA CAT II ILS - SPECIAL AIRCREW AND AIRCRAFT CERTIFICATION REQUIRED; S-ILS 35R: CAT A, B, C, D, RA 110, RVR 1200, HAT 100, DA 580 MSL.
CHART NOTE: SIMULTANEOUS APPROACH AUTHORIZED.
SA CAT I CHART NOTE: REQUIRES SPECIFIC OPSPEC, MSPEC, OR LOA APPROVAL AND USE OF HUD TO DH.
SA CAT II CHART NOTE: REDUCED LIGHTING: REQUIRES SPECIFIC OPSPEC, MSPEC, OR LOA APPROVAL AND USE OF AUTOLAND OR HUD TO TOUCHDOWN.
CHART PROFILE NOTE: VGSI AND ILS GLIDEPATH NOT COINCIDENT (VGSI ANGLE {ANGLE}/TCH {FEET}).
CHART NOTE: FOR INOPERATIVE ALS, INCREASE S-ILS 35R CAT E VISIBILITY TO RVR 4000, S-LOC 35R CATS C/D/E VISIBILITY TO 1 3/8 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART IN PROFILE VIEW: I-HCE DME ANTENNA.
CHART VDP AT 1.35 DME*
DISTANCE VDP TO THLD 1.46 NM
* LOC ONLY
CHART FAS OBST: 694 TRANSMISSION LINE 300825N/0973947W.
HOLD E, RT, 267.66 INBOUND
800 AAO 300723/0973900W

MINIMUMS:

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

ALTERNATE: NA ☐ ILS: STANDARD; LOC: STANDARD - CAT E 1000-3

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
S-ILS 35R	680	1800	200	680	1800	200	680	1800	200	680	1800	200	680	1800	200
S-LOC 35R	1000	2400	520	1000	2400	520	1000	5500	520	1000	5500	520	1000	5500	520
CIRCLING	1040	1	498	1100	1	558	1200	1 3/4	658	1200	2	658	1520	3	978

CHANGES - REASONS

1. ADDED SA CAT I AND SA CAT II MINIMUMS AND ASSOCIATED DATA - CENTRAL FPT REQUEST AS PART OF NATIONAL REDUCED MINIMUMS INITIATIVE.
2. DELETED CHART LOC RWY 35L IN ADDITIONAL FLIGHT DATA - PARALLEL RWY LOCALIZERS NO LONGER CHARTED.
3. DELETED PLANVIEW NOTE: DME AND RADAR REQUIRED - REPLACED BY EQUIPMENT REQUIREMENT NOTE.
4. DELETED NOTE: DME REQUIRED - REPLACED BY EQUIPMENT REQUIREMENT NOTE.
5. ADDED EQUIPMENT REQUIREMENT NOTES: DME REQUIRED AND RADAR REQUIRED FOR PROCEDURE ENTRY - IN ACCORDANCE WITH FAAO 8260.19H, PARA 8-6-8.
6. DELETED DISTANCE FAF TO MAP - TIMING TABLE NOT REQUIRED, PROCEDURE REQUIRES DME.
7. AMENDED LOC FAF FROM 3.37 NM AFTER FNNLY/I-HCE 3.26 DME/RADAR OR AT I-HCE 0.13 DME TO READ I-HCE 0.13 DME - TIMING TABLE WILL NOT BE PUBLISHED, PROCEDURE REQUIRES DME.
8. AMENDED S-ILS 35R ALTERNATE MINIMUMS FROM CAT A/B/C STANDARD, CAT C/D 700-2, CAT E 1000-3 TO ALL CATS STANDARD - IN ACCORDANCE WITH FAAO 8260.3C 3-3-2C(2)(A).



COORDINATED WITH:

A4A ☒ **ALPA** ☒ **AOPA** ☒ **APA** ☒ **HAI** ☐ **NBAA** ☒ **OTHER:** ZHU, AUS APP CON, AUS ATCT, AMGR

FLIGHT CHECKED BY

ZACK SMYER

Digitally signed by
ROBERT G HAMILTON
Jun 07, 2018

OFFICE

FICO

DATE

06/05/2018

DEVELOPED BY

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Apr 24, 2018

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DATE

04/24/2018

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Jun 07, 2018

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AJV-5420

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TITLE

MANAGER



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> FLOYDADA MUNI	<u>AIRPORT ID</u> K41F	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 17	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> FLOYDADA	<u>STATE</u> TX	
<u>AIRPORT ELEVATION</u> 3187	<u>TDZE</u> 3187	<u>SUPERSEDED</u> RNAV (GPS) RWY 17	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 10/22/2009	<u>MAG VAR</u> 7E	<u>EPOCH YEAR</u> 2010
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<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>
SHOES		BIGPE		TF	FB	2.00	008.60	21.77	5300
PVW VOR/DME		BIGPE		TF	FB	2.00	061.48	16.95	5300
EXONE		CESUM		TF	FB	2.00	261.77	24.23	5000
BIGPE	IAF	ANERY		TF	FB	1.00	082.28	7.00	5000
CESUM	IAF	ANERY		TF	FB	1.00	262.44	7.00	5000
ANERY	IF	COSAG		TF	FB	1.00	172.36	6.03	4800
COSAG	FAF	EHOVI/2.80 NM TO RW17		TF	FB	0.30	172.36	2.13	
EHOVI/2.80 NM TO RW17		RW17	MAP	TF	FO	0.30	172.36	2.80	
RW17	MAP	3587 MSL		CA			172.36		
3587 MSL		ASACI		DF	FO	1.00			5000

MISSED APPROACH

MAP:

LP: RW17
LNAV: RW17

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 5000 DIRECT ASACI AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. PROFILE STARTS AT ANERY

3. FAC:

172.36

FAF: COSAG

DIST FAF TO MAP: 4.93

DIST FAF TO THLD: 4.93

4. MIN ALT: ANERY 5000, COSAG 4800, EHOVI/2.80 NM TO RW17 4120

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

GS ANT:

6. MIN GP INCPT:

GP ALT AT FAF :

OM:

MM:

IM:

7. GP ANGLE:

34:1: IS NOT CLEAR

20:1: IS CLEAR

TCH:

8. MSA FROM: RW17 5300

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: RWY 17 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: USE PLAINVIEW ALTIMETER SETTING, WHEN NOT RECEIVED, USE LUBBOCK ALTIMETER SETTINGAND INCREASE ALL MDA 20 FEET; INCREASE LNAV CAT C VISIBILITY 3/8 SM AND CIRCLING CAT C VISIBILITY 1/4 SM.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
COSAG TO RW17: 3.00/40.
WAAS CHANNEL #78142
REFERENCE PATH ID: W17A
CHART FAS OBST: 3299 TREE 340242N/1012008W.
CHART: 3388 TOWER 340323N/1011922W.
HOLD S, RT, 352.36 INBOUND
LTP HAE: 944.8 M

MINIMUMS:

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

ALTERNATE: NA ☒

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
LP MDA	3640	1	453	3640	1	453	3640	1 3/8	453		NA				
LNAV MDA	3720	1	533	3720	1	533	3720	1 1/2	533		NA				
CIRCLING	3840	1	653	3920	1	733	3980	2 1/4	793		NA				



CHANGES - REASONS

- 1. ADDED LP MINIMUMS - AS REQUESTED.
- 2. ADDED 20:1 IS CLEAR - NO 20:1 OBSTACLES.
- 3. ADDED CA LEG TO MISSED APCH (ELEVATION 3588) - CURRENT DOCUMENTATION REQUIREMENT.
- 4. ADDED PBN REQUIREMENTS NOTE: RNP APCH - EQUIPMENT NAVSPEC REQUIREMENT.
- 5. ADDED RWY 17 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED - 34:1 PENETRATIONS.
- 6. DELETED CHART NOTE: DME/DME RNP-0.3 NA - REPLACED BY PBN REQUIREMENTS NOTE.
- 7. DELETED VISIBILITY REDUCTION BY HELICOPTERS NA NOTE - REPLACED BY RWY 17 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
- 8. CIRCLING CAT B MDA/HAA CHANGED FROM 3840/653 TO 3920/733 - NEW SURVEY AND CIRCLING RADII.
- 9. CIRCLING CAT C MDA/HAA CHANGED FROM 3920/733 TO 3980/793 - NEW SURVEY AND CIRCLING RADII.
- 10. TERMINAL ROUTE (PVW VOR/DME - BIGPE) ALT INCREASED FROM 5000 TO 5300 - COMMON FIX (BIGPE) ALT 5300.
- 11. TERMINAL ROUTE (PVW VOR/DME - BIGPE) CHANGED FROM 063.62/18.83 TO 061.48/16.95 - IAF (BIGPE) MOVED 2 NM.
- 12. TERMINAL ROUTE (SHOES - BIGPE) CHANGED FROM 013.51/22.41 TO 008.60/21.77 - IAF (BIGPE) MOVED 2 NM.
- 13. TERMINAL ROUTE (EXONE - CESUM) CHANGED FROM 261.84/26.23 TO 261.77/24.23 - IAF (CESUM) MOVED 2 NM.
- 14. TERMINAL ROUTE (BIGPE - ANERY) CHANGED FROM 082.30/5.00 TO 082.28/7.00 - IAW DTA REQUIREMENTS.
- 15. TERMINAL ROUTE (CESUM - ANERY) CHANGED FROM 262.42/5.00 TO 262.44/7.00 - IAW DTA REQUIREMENTS.
- 16. GPA CHANGED FROM 3.04 TO 3.00 - FAF MOVED 296 FT NORTH.
- 17. CRC REMAINDER CHANGED FROM C7A94778 TO 96A5E777 - GPA CHANGED TO 3.00.
- 18. DIST FAF TO MAP/THLD CHANGED FROM 4.87 TO 4.93 - FAF (COSAG) MOVED 296 FT NORTH.

06/19/18: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 05/23/18

- 1. ADDED "CHART CIRCLING ICON" TO ADDITIONAL FLT DATA.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZFW, LBB APP CON, AMGR, ST AV DIR

FLIGHT CHECKED BY

ZACK LEE SMYER

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DEZ SILAGYI
Jun 21, 2018

OFFICE

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DATE

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OFFICE

AJV-5420

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

DATA FIELD	DATA
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	41F
RUNWAY	RW17
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W17A
LTP/FTP LATITUDE	340028.2330N
LTP/FTP LONGITUDE	1011949.2050W
LTP/FTP ELLIPSOIDAL HEIGHT	+09448
FPAP LATITUDE	335858.9800N
FPAP LONGITUDE	1011948.0075W
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	1352
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	96A5E777
ADDITIONAL PATH POINT RECORD INFORMATION	
ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+09715
FPAP ORTHOMETRIC HEIGHT	+09715



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> FLOYDADA MUNI	<u>AIRPORT ID</u> K41F	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 35	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> FLOYDADA	<u>STATE</u> TX
<u>AIRPORT ELEVATION</u> 3187	<u>TDZE</u> 3187	<u>SUPERSEDED</u> RNAV (GPS) RWY 35	<u>ORIGINAL/AMENDMENT</u> ORIG	<u>DATED</u> 10/22/2009	<u>MAG VAR</u> 7E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL/SUSPEND</u>	<u>EPOCH YEAR</u> 2010

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>
SHOES		FIKUR		TF	FB	2.00	098.78	6.40	5000
FLOYD		ASACI		TF	FO	2.00	191.98	10.40	5000
FIKUR	IAF	ASACI	NOPT	TF	FB	1.00	082.28	7.00	5000
ASACI	IF/IAF	CINAV		TF	FB	1.00	352.36	6.03	4800
CINAV	FAF	RW35	MAP	TF	FO	0.30	352.36	4.95	
RW35	MAP	3587 MSL		CA			352.36		
3587 MSL		ASACI		DF	FO	1.00			5000

MISSED APPROACH

MAP:

LP: RW35
LNAV: RW35

MISSED APPROACH INSTRUCTIONS:

CLIMBING LEFT TURN TO 5000 DIRECT ASACI AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD S ASACI, RT, 352.36 INBOUND, 5000 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC: 352.36FAF: CINAVDIST FAF TO MAP: 4.95DIST FAF TO THLD: 4.95

4. MIN ALT: ASACI 5000, CINAV 4800

5. DIST TO THLD FROM OM:MM:IM:150 HAT:GS ANT:

6. MIN GP INCPT:GP ALT AT FAF :OM:MM:IM:

7. GP ANGLE:34:1: IS NOT CLEAR20:1: IS CLEARTCH:

8. MSA FROM: RW35 5300

PBN REQUIREMENTS NOTE:

RNP APCH.

NOTES:

CHART NOTE: RWY 35 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
CHART NOTE: USE PLAINVIEW ALTIMETER SETTING, WHEN NOT RECEIVED, USE LUBBOCK ALTIMETER SETTING AND INCREASE ALL MDA 20 FEET; INCREASE LP CAT C VISIBILITY 1/8 SM AND CIRCLING CAT C VISIBILITY 1/4 MILE.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES.
WAAS CHANNEL #82442
REFERENCE PATH ID: W35A
CHART FAS OBST: 3366 TWR 335755N/1011952W.
LTP HAE: 944.1 M

MINIMUMS:

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

ALTERNATE: NA☒

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
LP MDA	3760	1	573	3760	1	573	3760	1 5/8	573		NA				
LNAV MDA	3840	1	653	3840	1	653	3840	1 7/8	653		NA				
CIRCLING	3840	1	653	3920	1	733	3980	2 1/4	793		NA				



CHANGES - REASONS

- 1. ADDED LP MINIMUMS - AS REQUESTED.
- 2. ADDED CA LEG TO MISSED APCH - CURRENT DOCUMENTATION REQUIREMENT.
- 3. ADDED 20:1 IS CLEAR - NO 20:1 OBSTACLES.
- 4. ADDED PBN REQUIREMENTS NOTE: RNP APCH - EQUIPMENT NAVSPEC REQUIREMENT.
- 5. ADDED RWY 35 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED - 34:1 PENETRATIONS.
- 6. DELETED VISIBILITY REDUCTION BY HELICOPTERS NA - REPLACED BY RWY 35 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED.
- 7. DELETED CHART NOTE: DME/DME RNP-0.3 NA - REPLACED BY PBN REQUIREMENTS NOTE.
- 8. TERMINAL ROUTE (FIKUR - ASACI) CHANGED FROM 082.30/5.00 TO 082.28/7.00 - DTA REQUIREMENT.
- 9. TERMINAL ROUTE (SHOES - FIKUR) CHANGED FROM 094.86/8.34 TO 098.78/6.40 - IAF (FIKUR) MOVED 2 NM.
- 10. DIST FAF TO MAP/THLD CHANGED FROM 4.88 TO 4.95 - FAF MOVED 398 FT FOR DG.
- 11. CINAV TO RW35 CHANGED FROM 3.04/39 TO 3.00/39 - FAF MOVED 398 FT FOR DG.
- 12. CRC REMAINDER CHANGED FROM 4B7EC911 TO 575E5924 - FPAP LAT/LONGS CHANGED FROM 340111.9820N/1011949.7930W TO 340111.9815N/1011949.7930W.

06/19/18: THIS IS AN UPDATED COPY OF THE FORM DEVELOPED ON 05/22/18

- 1. ADDED "CHART CIRCLING ICON" TO ADDITIONAL FLT DATA.
- 2. REMOVED VDA "CINAV TO RW35: 3.00/39" AND ADDED "CHART PROFILE NOTE: VISUAL SEGMENT - OBSTACLES." TO ADDITIONAL FLT DATA.
- 3. CHANGED CRC REMAINDER FROM 575E5924 TO DBD45974 - CHANGED GLIDEPATH ANGLE/TCH TO 0.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☐ HAI ☐ NBAA ☒ OTHER: ZFW, LBB APP CON, AMGR, ST AV DIR

FLIGHT CHECKED BY

ZACK LEE SMYER

Digitally signed by
DEZ SILAGYI
Jun 21, 2018

OFFICE

FIOG

DATE

06/13/2018

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DATE

05/22/2018

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Jun 21, 2018

OFFICE

AJV-5430

DATE

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	41F
RUNWAY	RW35
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W35A
LTP/FTP LATITUDE	335942.7290N
LTP/FTP LONGITUDE	1011948.5970W
LTP/FTP ELLIPSOIDAL HEIGHT	+09441
FPAP LATITUDE	340111.9815N
FPAP LONGITUDE	1011949.7945W
THRESHOLD CROSSING HEIGHT (TCH)	00000.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	00.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1352
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	DBD45974
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K4
LTP ORTHOMETRIC HEIGHT	+09708
FPAP ORTHOMETRIC HEIGHT	+09708



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

Bearings, headings, courses, tracks and radials are magnetic. Elevations and altitudes are in feet, MSL. Altitudes are minimum altitudes unless otherwise indicated.
Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
RENTON, WA	RENTON MUNI	13 SEPTEMBER 2018	8A

TAKEOFF MINIMUMS:

RWY 16: STANDARD WITH MINIMUM CLIMB OF 405 FT PER NM TO 2000.

RWY 34: STANDARD WITH MINIMUM CLIMB OF 330 FT PER NM TO 2700.

TEXTUAL DEPARTURE PROCEDURES:

RWY 16: CLIMB HEADING 157.15 TO 3000 THEN CLIMBING RIGHT TURN TO INTERCEPT SEA R-180 TO SEA VORTAC, THENCE...

RWY 34: CLIMB HEADING 337.15 TO 3000 THEN CLIMBING LEFT TURN TO INTERCEPT SEA R-340 TO SEA VORTAC, THENCE...

...CONTINUE CLIMB IN SEA HOLDING PATTERN (HOLD E, LEFT TURNS, 290.00 INBOUND) TO CROSS SEA VORTAC AT OR ABOVE MEA/MCA FOR ROUTE OF FLIGHT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 16, BUILDING, VEHICLES ON ROADS, WALLS, GENERAL UTILITY, POLES BEGINNING 8 FT FROM DER, 3 FT LEFT OF CENTERLINE, UP TO 26 FT AGL/59 FT MSL. SIGN, VEHICLES ON ROADS, WALL BEGINNING 40 FT FROM DER, 116 FT RIGHT OF CENTERLINE, UP TO 19 FT AGL/49 FT MSL. POLES, VEHICLES ON ROADS, TREES, SIGN, BUILDINGS BEGINNING 181 FT FROM DER, 3 FT RIGHT OF CENTERLINE, UP TO 40 FT AGL/73 FT MSL. POLES, VEHICLES ON ROAD, BUILDINGS, VEGETATION, TREES BEGINNING 287 FT FROM DER, 10 FT LEFT OF CENTERLINE, UP TO 39 FT AGL/71 FT MSL. TREES, POLES BEGINNING 585 FT FROM DER, 39 FT RIGHT OF CENTERLINE, UP TO 101 FT MSL. TREES, BUILDING BEGINNING 716 FT FROM DER, 5 FT RIGHT OF CENTERLINE, UP TO 106 FT MSL. TREES 941 FT FROM DER, 383 FT RIGHT OF CENTERLINE, 120 FT MSL. TREES BEGINNING 998 FT FROM DER, 9 FT RIGHT OF CENTERLINE, UP TO 146 FT MSL. TREES BEGINNING 1626 FT FROM DER, 3 FT LEFT OF CENTERLINE, UP TO 82 FT MSL. TREES BEGINNING 1638 FT FROM DER, 70 FT LEFT OF CENTERLINE, UP TO 119 FT MSL. TREES, BUILDING BEGINNING 1720 FT FROM DER, 9 FT LEFT OF CENTERLINE, UP TO 120 FT MSL. TRANSMISSION LINE 1.4 NM FROM DER, 2562 FT LEFT OF CENTERLINE, 121 FT AGL/453 FT MSL. TREES 1.9 NM FROM DER, 3214 FT LEFT OF CENTERLINE, 572 FT MSL.

NOTE: RWY 34, VEHICLES ON ROAD 2 FT FROM DER, 194 FT RIGHT OF CENTERLINE, 9 FT AGL/28 FT MSL. VEHICLES ON ROAD 2 FT FROM DER, 242 FT RIGHT OF CENTERLINE, 10 FT AGL/29 FT MSL. LIGHTING 6 FT FROM DER, 80 FT LEFT OF CENTERLINE, 2 FT AGL/25 FT MSL. FENCE 17 FT FROM DER, 329 FT LEFT OF CENTERLINE, 8 FT AGL/29 FT MSL.

CONTROLLING OBSTACLES:

RWY 16: 453 FT MSL TRANSMISSION LINE 472747.62N/122122.90W (CLIMB GRADIENT), 572 FT MSL TREE 472716.83N/1221148.71W (CLIMB GRADIENT TERMINATION ALTITUDE).

RWY 34: 514 FT MSL TREE 473159.37N/1221319.12W.

OBSTACLES MANDATING ODP ROUTE DEVELOPMENT: RWY 16, 34 - 3148FT MSL TOWER 473013.00N/1215833.00W.

REMARKS:

VCOA NOT ESTABLISHED AT ATC REQUEST DUE TO PROXIMITY TO SEATTLE TACOMA INTERNATIONAL AIRPORT AND BOEING FIELD.

FLIGHT INSPECTED BY:

Digitally signed by

SCOTT A THOMPSON

ADOLFO D URRUTIA

Jun 25, 2018

OFFICE SYMBOL:

FICO

DATE:

6/20/18

DEVELOPED BY:

Digitally signed by

LONNIE EVERHART (CASEY RANDALL)

ADOLFO D URRUTIA

Jun 25, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

3/27/18

APPROVED BY:

LONNIE EVERHART

Digitally signed by

ADOLFO D URRUTIA

Jun 25, 2018

OFFICE SYMBOL:

AJV-5400

DATE:

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

A4A

ALPA

AOPA

APA

HAI

NBAA



OTHER:

ZSE, SEA APP CON, RNT ATCT, AMGR



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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<u>CITY, STATE</u>	<u>AIRPORT</u>	<u>EFFECTIVE DATE</u>	<u>AMDT NO</u>
RENTON, WA	RENTON MUNI	13 SEPTEMBER 2018	8A

CHANGES - REASONS:

CHANGED RWY 34 TAKEOFF MINIMUMS FROM STANDARD WITH MINIMUM CLIMB OF 315 FT PER NM TO 2700 TO STANDARD WITH MINIMUM CLIMB OF 330 FT PER NM TO 2700 - NEW CONTROLLING OBSTACLE.
VCOA NOT ESTABLISHED AT ATC REQUEST DUE TO PROXIMITY TO SEATTLE TACOMA INTERNATIONAL AIRPORT AND BOEING FIELD.



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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Ceilings are in feet above airport elevation. Distances are in nautical miles. Visibilities are in statute miles or feet RVR unless otherwise indicated.

CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
SEATTLE, WA	SEATTLE-TACOMA INTL	13 SEPTEMBER 2018	4B

TAKEOFF MINIMUMS:

RWY 16C, 34L, 34C, 34R: STANDARD.

RWY 16L: 300-1 OR STANDARD WITH MINIMUM CLIMB OF 425 FT PER NM TO 600.

RWY 16R: 300-1 1/4 OR STANDARD WITH MINIMUM CLIMB OF 215 FT PER NM TO 600.

TEXTUAL DEPARTURE PROCEDURES:

RWY 16L, 16C, 16R: CLIMB TO 1000 ON HEADING 164.34, THEN CLIMBING RIGHT TURN DIRECT SEA VORTAC, THENCE...

RWY 34L, 34C, 34R: CLIMB TO 1000 ON HEADING 344.34, THEN CLIMBING LEFT TURN DIRECT SEA VORTAC, THENCE...

...CLIMB IN SEA VORTAC HOLDING PATTERN (HOLD SE, LEFT TURNS, 310 INBOUND) TO MEA/MCA FOR ROUTE OF FLIGHT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 16L: TREE 48 FT FROM DER, 483 FT RIGHT OF CENTERLINE, 372 FT MSL. LIGHTING 85 FT FROM DER, 287 FT LEFT OF CENTERLINE, 3 FT AGL/349 FT MSL. TREE 193 FT FROM DER, 510 FT RIGHT OF CENTERLINE, 378 FT MSL. TREE 2567 FT FROM DER, 357 FT RIGHT OF CENTERLINE, 415 FT MSL. TREES BEGINNING 2602 FT FROM DER, 365 FT RIGHT OF CENTERLINE, UP TO 416 FT MSL. TREE 2663 FT FROM DER, 1144 FT RIGHT OF CENTERLINE, 449 FT MSL. TREE 2779 FT FROM DER, 1135 FT RIGHT OF CENTERLINE, 456 FT MSL. TREES BEGINNING 2785 FT FROM DER, 1003 FT RIGHT OF CENTERLINE, UP TO 472 FT MSL. TREES BEGINNING 2806 FT FROM DER, 1022 FT RIGHT OF CENTERLINE, UP TO 481 FT MSL. TREES BEGINNING 2880 FT FROM DER, 1038 FT RIGHT OF CENTERLINE, UP TO 499 FT MSL.

NOTE: RWY 16C: VERTICAL POINT 132 FT FROM DER, 255 FT LEFT OF CENTERLINE, 6 FT AGL/368 FT MSL. TREE 4477 FT FROM DER, 550 FT RIGHT OF CENTERLINE, 476 FT MSL. TREE 4598 FT FROM DER, 415 FT RIGHT OF CENTERLINE, 478 FT MSL. TREE 4657 FT FROM DER, 1183 FT RIGHT OF CENTERLINE, 483 FT MSL. TREE 4714 FT FROM DER, 1250 FT RIGHT OF CENTERLINE, 488 FT MSL. TREE 4784 FT FROM DER, 961 FT RIGHT OF CENTERLINE, 503 FT MSL. TREES BEGINNING 4804 FT FROM DER, 1069 FT RIGHT OF CENTERLINE, UP TO 506 FT MSL. TREES BEGINNING 4838 FT FROM DER, 445 FT RIGHT OF CENTERLINE, UP TO 509 FT MSL.

NOTE: RWY 16R: TREE 8 FT FROM DER, 497 FT RIGHT OF CENTERLINE, 369 FT MSL. LIGHTING 10 FT FROM DER, 5 FT LEFT OF CENTERLINE, 1 FT AGL/357 FT MSL. SIGN 62 FT FROM DER, 286 FT LEFT OF CENTERLINE, 3 FT AGL/359 FT MSL. BUILDING 488 FT FROM DER, 604 FT LEFT OF CENTERLINE, 24 FT AGL/384 FT MSL. TREE 1137 FT FROM DER, 586 FT RIGHT OF CENTERLINE, 398 FT MSL. TREE 1271 FT FROM DER, 689 FT RIGHT OF CENTERLINE, 414 FT MSL. TREE 1634 FT FROM DER, 932 FT RIGHT OF CENTERLINE, 427 FT MSL. TREE, TRANSMISSION LINE BEGINNING 3124 FT FROM DER, 718 FT RIGHT OF CENTERLINE, UP TO 468 FT MSL. TREE 5709 FT FROM DER, 738 FT LEFT OF CENTERLINE, 503 FT MSL. TREES BEGINNING 5729 FT FROM DER, 487 FT LEFT OF CENTERLINE, UP TO 506 FT MSL. TREES BEGINNING 5763 FT FROM DER, 440 FT LEFT OF CENTERLINE, UP TO 509 FT MSL.

NOTE: RWY 34L: LIGHTING 10 FT FROM DER, 5 FT RIGHT OF CENTERLINE, 1 FT AGL/416 FT MSL. TREE 4009 FT FROM DER, 1367 FT LEFT OF CENTERLINE, 521 FT MSL. TREES BEGINNING 4129 FT FROM DER, 857 FT LEFT OF CENTERLINE, UP TO 528 FT MSL. TREE 4315 FT FROM DER, 989 FT LEFT OF CENTERLINE, 537 FT MSL.

NOTE: RWY 34C: LIGHTING 5 FT FROM DER, 5 FT LEFT OF CENTERLINE, 1 FT AGL/430 FT MSL. POLE 129 FT FROM DER, 282 FT RIGHT OF CENTERLINE, 6 FT AGL/434 FT MSL.

NOTE: RWY 34R: LIGHTING 9 FT FROM DER, 4 FT LEFT OF CENTERLINE, 1 FT AGL/434 FT MSL. LIGHTING 53 FT FROM DER, 139 FT RIGHT OF CENTERLINE, 4 FT AGL/436 FT MSL. SIGN 92 FT FROM DER, 277 FT RIGHT OF CENTERLINE, 4 FT AGL/437 FT MSL. TREE 2933 FT FROM DER, 918 FT RIGHT OF CENTERLINE, 506 FT MSL. TREES BEGINNING 3031 FT FROM DER, 781 FT RIGHT OF CENTERLINE, UP TO 534 FT MSL. TREE 3798 FT FROM DER, 1434 FT RIGHT OF CENTERLINE, 565 FT MSL.

CONTROLLING OBSTACLES:

RWY 16L: 499 FT MSL TREE 472523.86N/1221847.29W.

RWY 16R: 509 FT MSL TREE 472529.01N/1221856.84W (CEILING, CLIMB GRADIENT, CLIMB GRADIENT TERMINATION ALTITUDE). 509 FT MSL TREE 472527.19N/1221853.31W (VISIBILITY).

OBSTACLE MANDATING ODP ROUTE DEVELOPMENT: RWY 16L, 16C, 16R, 34L, 34C, 34R: 14527 FT MSL AAO 465115.00N/1214527.00W.

REMARKS:



**FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
TAKEOFF MINIMUMS AND OBSTACLE DEPARTURE PROCEDURES (ODP)
TITLE 14 CFR PART 97.37**

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CITY, STATE	AIRPORT	EFFECTIVE DATE	AMDT NO
SEATTLE, WA	SEATTLE-TACOMA INTL	13 SEPTEMBER 2018	4B

FLIGHT INSPECTED BY:	<i>Digitally signed by</i> JOHNNIE BAKER Jun 22, 2018	OFFICE SYMBOL:	DATE:
SCOTT A THOMPSON		FICO	6/20/18

DEVELOPED BY:	<i>Digitally signed by</i> DION E LANCIA May 22, 2018	OFFICE SYMBOL:	DATE:
DION E .LANCIA		AJV-5441	05/04/2018

APPROVED BY:	<i>Digitally signed by</i> JOHNNIE BAKER Jun 22, 2018	OFFICE SYMBOL:	DATE:
JOHNNIE BAKER		AJV-5441	ROUTINE

REQUIRED EFFECTIVE DATE:
ROUTINE

COORDINATED WITH:

A4A	ALPA	AOPA	APA	HAI	NBAA
☒	☒	☒	☒	☐	☒

OTHER:

ATA, ZSE, SEA APPROACH CONTROL, SEA ATCT, APT MGR

CHANGES - REASONS:

1. ADDED TAKEOFF MINIMUMS TO RWYS 16L AND 16R - NEW SURVEY, TREES PENETRATE DEPARTURE OBSTACLE IDENTIFICATION SURFACES.
2. CHANGED INITIAL HEADING IN TEXTUAL DEPARTURE PROCEDURES DEPARTING RWY 16R FROM "164.33" TO "164.34" AND DEPARTING RWY 34L FROM "344.33" TO "344.34" - NEW SURVEY DATA CHANGED RWY HEADINGS 1/100TH, PUBLISHED HEADINGS UNCHANGED.
3. UPDATED TAKEOFF OBSTACLE NOTES FOR ALL RWYS - NEW SURVEY IDENTIFIED MANY MORE LOW-CLOSE-IN OBSTACLES.
4. ADDED CONTROLLING OBSTACLES FOR RWYS 16L AND 16R - NEW SURVEY, TREES PENETRATE DEPARTURE OBSTACLE IDENTIFICATION SURFACES.
5. UPDATED OBSTACLE MANDATING ODP ROUTE DEVELOPMENT - TARGETS AAO ON DTED REPLACED AAO ON SECTIONAL SPOT ELEVATION.



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (GPS) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> WHEELING OHIO CO	<u>AIRPORT ID</u> KHLG	<u>PROCEDURE NAME</u> RNAV (GPS) RWY 34	<u>ORIGINAL/AMENDMENT</u> 1A	<u>CITY</u> WHEELING	<u>STATE</u> WV
<u>AIRPORT ELEVATION</u> 1194	<u>TDZE</u> 1191	<u>SUPERSEDED</u> RNAV (GPS) RWY 34	<u>ORIGINAL/AMENDMENT</u> 1	<u>DATED</u> 08/17/2017	<u>MAG VAR</u> 7W
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 1985

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>
PIDYY		CEPGI		TF	FO	1.00	158.00	17.60	3100
AIR VOR/DME		GELIF		TF	FB	1.00	126.45	11.53	3100
GELIF	IAF	CEPGI	NOPT	TF	FB	1.00	044.95	6.00	3100
AHTIY	IAF	CEPGI	NOPT	TF	FB	1.00	316.92	8.11	3100
CEPGI	IF/IAF	ECAYO		TF	FB	1.00	338.12	6.01	3000
ECAYO	FAF	XACJE/2.20 NM TO RW34		TF	FB	0.30	338.08	3.35	
XACJE/2.20 NM TO RW34		RW34	MAP	TF	FO	0.30	338.08	2.20	
RW34	MAP	1594 MSL		CA			338.08		
1594 MSL		PIDYY		DF	FO	1.00			3300

MISSED APPROACH

MAP:

LP: RW34
 LNAV: RW34

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 3300 DIRECT PIDYY AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3300.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. HOLD S CEPGI, RT, 338.12 INBOUND, 3100 FT. IN LIEU OF PT (IAF), MAX 6000.

3. FAC:

338.08

FAF: ECAYO

DIST FAF TO MAP: 5.55

DIST FAF TO THLD: 5.55

4. MIN ALT: CEPGI 3100, ECAYO 3000, XACJE/2.20 NM TO RW34 1920

5. DIST TO THLD FROM OM:

MM:

IM:

150 HAT:

GS ANT:

6. MIN GP INCPT:

GP ALT AT FAF :

OM:

MM:

IM:

7. GP ANGLE:

34:1

IS CLEAR

20:1

IS CLEAR

TCH:

8. MSA FROM: RW34 3100

PBN REQUIREMENTS NOTES:

RNP APCH

NOTES:

CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON AIR VOR/DME AIRWAY RADIALS 051 CW 158.
CHART SPEED ICON IN PLANVIEW AT GELIF: MAX 210 KIAS.

ADDITIONAL FLIGHT DATA:

CHART CIRCLING ICON.
ECAYO TO RW34: 3.00/42.
CHART VDP AT 1.21 NM TO RW34
WAAS CHANNEL #69540
REFERENCE PATH ID: W34A
CHART FAS OBST: 1360 TREE 400844N/0803729W.
1480 TREE 400832N/0803623W.
CHART: 1419 TREE 400833N/0803658W.
HOLD S, RT, 338.04 INBOUND
LTP HAE: 329.1 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD - CAT D 800-2 1/4

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
LP MDA	1620	1	429	1620	1	429	1620	1 1/4	429	1620	1 1/4	429			
LNAV MDA	1740	1	549	1740	1	549	1740	1 5/8	549	1740	1 5/8	549			
CIRCLING	1740	1	546	1740	1	546	1900	2	706	1920	2 1/4	726			

CHANGES - REASONS

1. ADDED PBN REQUIREMENT NOTE "RNP APCH" - PER 8260.19H, PARA. 8-6-8A(1)(E).
2. REMOVED NOTE "DME/DME RNP-0.3 NA - PER 8260.19H, PARA. 1-1-5F(14), REPLACED BY PBN REQUIREMENTS NOTES.
3. CHANGED PIDYY FIX DEPICTION FROM NAVAID FIX TO RNAV WP - V12 SCHEDULED TO CANCEL PER VOR MON; FIX NO LONGER REQUIRES NAVAID FIX MAKE-UP.
4. REMOVED PLANVIEW NOTE "PROCEDURE NA FOR ARRIVALS AT PIDYY ON V12 WESTBOUND - V12 SCHEDULED TO CANCEL PER VOR MON PROGRAM.



COORDINATED WITH:

A4A ☐ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: ZOB, PIT APP CON, HLG ATCT, AMGR, ATA

FLIGHT CHECKED BY

FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.

DEVELOPED BY

RALPH DUMAR

APPROVED BY

JULIE MORGAN

Digitally signed by
RALPH DUMAR
May 03, 2018

OFFICE

OFFICE

AJV-5422

OFFICE

AJV-5420

DATE

DATE

05/03/2018

DATE

Digitally signed by
ROBERT G HAMILTON
Jun 15, 2018

Digitally signed by
ROBERT G HAMILTON
Jun 15, 2018

TITLE

MANAGER



FAS DATA BLOCK INFORMATION

<u>DATA FIELD</u>	<u>DATA</u>
OPERATION TYPE	0
SBAS SERVICE PROVIDER IDENTIFIER	0
AIRPORT IDENTIFIER	KHLG
RUNWAY	RW34
APPROACH PERFORMANCE DESIGNATOR	0
ROUTE INDICATOR	
REFERENCE PATH DATA SELECTOR	0
REFERENCE PATH IDENTIFIER (APPROACH ID)	W34A
LTP/FTP LATITUDE	401011.7030N
LTP/FTP LONGITUDE	0803828.0505W
LTP/FTP ELLIPSOIDAL HEIGHT	+03291
FPAP LATITUDE	401129.7150N
FPAP LONGITUDE	0803924.3480W
THRESHOLD CROSSING HEIGHT (TCH)	00042.0
TCH UNITS SELECTOR (METERS OR FEET USED)	F
GLIDEPATH ANGLE (GPA)	03.00
COURSE WIDTH AT THRESHOLD	106.75
LENGTH OFFSET	1376
HORIZONTAL ALERT LIMIT (HAL)	40.0
VERTICAL ALERT LIMIT (VAL)	0.0
CRC REMAINDER	0E263ADD
<u>ADDITIONAL PATH POINT RECORD INFORMATION</u>	
ICAO CODE	K6
LTP ORTHOMETRIC HEIGHT	+03630
FPAP ORTHOMETRIC HEIGHT	+03630



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) STANDARD INSTRUMENT APPROACH PROCEDURE
TITLE 14 CFR PART 97.33

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<u>AIRPORT</u> JACKSON HOLE	<u>AIRPORT ID</u> KJAC	<u>PROCEDURE NAME</u> RNAV (RNP) Y RWY 1	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> JACKSON	<u>STATE</u> WY
<u>AIRPORT ELEVATION</u> 6451	<u>TDZE</u> 6431	<u>SUPERSEDED</u> RNAV (RNP) Y RWY 1	<u>ORIGINAL/AMENDMENT</u> ORIG-B	<u>DATED</u> 06/30/2011	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2005

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>
IDECA		UROCO		TF	FB	1.00	258.00	25.00	14000
OLNUE		VUGUY		TF	FB	1.00	089.89	15.37	14000
UROCO		VUGUY		TF	FB	1.00	318.57	14.32	14000
VUGUY	IAF	LIYET		TF	FB	0.50	006.34	12.00	11600
LIYET		NECPI		TF	FB	0.50	006.40	2.00	11200
NECPI		YONUL		TF	FB	0.50	006.41	2.40	10500
YONUL		JEVIM		TF	FB	0.50	006.42	2.40	9900
JEVIM	IF	WIDGA		TF	FB	0.30	006.43	7.88	8600
WIDGA	FAF	RW01	MAP	TF	FO	0.30	006.47	6.71	
RW01	MAP	QUIRT		TF	FB	1.00	006.50	17.15	
QUIRT		DNW VOR/DME		TF	FO	1.00	088.36	12.15	14000

MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 14000 ON TRACK 006.50 TO QUIRT AND TRACK 088.36 TO DNW VOR/DME AND HOLD, CONTINUE CLIMB-IN-HOLD TO 14000.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)
2. PROFILE STARTS AT VUGUY
3. FAC: 006.47

FAF:

DIST FAF TO MAP:

DIST FAF TO THLD:
4. MIN ALT: VUGUY 14000, LIYET 11600, NECPI 11200, YONUL 10500, JEVIM 9900, WIDGA 8600
5. DIST TO THLD FROM OM: 6.71

MM:

IM:

150 HAT:

942 HAT: 2.86
6. MIN GP INCPT: 8600

GP ALT AT FAF : WIDGA 8600

OM:

MM:

IM:
7. GP ANGLE: 3.00

34:1: IS CLEAR

20:1: IS CLEAR

TCH: 50.0
8. MSA FROM: RW01 15000

PBN REQUIREMENTS NOTE

RNP AR APCH.

NOTES:

CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY.
CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -27C OR ABOVE 54C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT OLNUE ON V465 SOUTHWEST BOUND AND ARRIVALS AT IDECA ON V328 SOUTHEAST BOUND.
CHART PLANVIEW NOTE AT IDECA AND OLNUE: (RNP 0.30).

ADDITIONAL FLIGHT DATA:

ROUTE TYPE: A, H
ROUTE TYPE QUALIFIER 1: F
ROUTE TYPE QUALIFIER 2: S
CHART MAXIMUM 17500 AT IDECA AND OLNUE AND MAXIMUM 15000 AT VUGUY.
HOLD N, LT, 197.99 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ CAT A, B, C, D 1000-4

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
AUTHORIZATION REQUIRED															
RNP 0.30 DA	7373	4	942	7373	4	942	7373	4	942	7373	4	942			

CHANGES - REASONS

1. ADDED CAT D MINIMUMS. - PER FPT CHECKLIST.
- 2 RNP 0.30 DA/HAT CHANGED FROM 7364/933 TO 7373/942. FINAL IS NOW ASC WITH THE SAME MISSED APPROACH PENETRATION.
3. REMOVED NOTE "WHEN VGSI INOPERATIVE, PROCEDURE NA AT NIGHT". - NOTE NO LONGER REQUIRED, NO 20:1 PENETRATIONS IDENTIFIED IN THE CAT A/B VISUAL SURFACE AREA.
4. UPDATED MISSED APPROACH REFERENCES OF "VIA" TO "ON". - IAW 8260.19H.



<u>AIRPORT</u> JACKSON HOLE	<u>AIRPORT ID</u> KJAC	<u>PROCEDURE NAME</u> RNAV (RNP) Y RWY 1	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> JACKSON	<u>STATE</u> WY
<u>COORDINATED WITH:</u>					
<u>A4A</u> ☒	<u>ALPA</u> ☒	<u>AOPA</u> ☒	<u>APA</u> ☒	<u>HAI</u> ☐	<u>NBAA</u> ☒
<u>OTHER:</u> ZLC ARTCC, KJAC ATCT, AMGR					
<u>FLIGHT CHECKED BY</u> THOMAS E MOLOKIE		<i>Digitally signed by</i> DONALD H LANIER Jun 15, 2018	<u>OFFICE</u> FICO	<u>DATE</u> 6/12/18	
<u>DEVELOPED BY</u> NICHOLAS K. JACKSON		<i>Digitally signed by</i> NICHOLAS JACKSON Apr 24, 2018	<u>OFFICE</u> AJV-5431	<u>DATE</u> 04/02/2018	
<u>APPROVED BY</u> PATRICK MULQUEEN		<i>Digitally signed by</i> DONALD H LANIER Jun 15, 2018	<u>OFFICE</u> AJV-5430	<u>DATE</u>	<u>TITLE</u> MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) 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> JACKSON HOLE	<u>AIRPORT ID</u> KJAC	<u>PROCEDURE NAME</u> RNAV (RNP) Y RWY 19	<u>ORIGINAL/AMENDMENT</u> 2	<u>CITY</u> JACKSON	<u>STATE</u> WY
<u>AIRPORT ELEVATION</u> 6451	<u>TDZE</u> 6451	<u>SUPERSEDED</u> RNAV (RNP) Y RWY 19	<u>ORIGINAL/AMENDMENT</u> 1A	<u>DATED</u> 03/31/2016	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2005

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>
TOCUD		DNW VOR/DME		TF	FB	1.00	198.13	16.55	12900
DNW VOR/DME	IAF	ZIBIV		TF	FB	1.00	251.47	8.55	11000
ZIBIV	IF	ZOSUV		TF	FB	0.50	231.70	4.26	9800
ZOSUV		WOMRU		TF	FB	0.50	205.38	4.00	8700
WOMRU		YUSGU		TF	FB	0.50	186.55	2.69	8000
YUSGU	FAF	RW19	MAP	TF	FO	0.30	186.53	4.71	
RW19	MAP	ZEKUG		TF	FB	1.00	186.51	6.49	
ZEKUG		KICNE		TF	FO	1.00	193.93	19.82	14000

MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 14000 ON TRACK 186.51 TO ZEKUG AND ON TRACK 193.93 TO KICNE AND HOLD, CONTINUE CLIMB-IN-HOLD TO 14000.

**MISSED APPROACH REQUIRES MINIMUM CLIMB OF 330 FEET PER NM TO 8200.

*MISSED APPROACH REQUIRES MINIMUM CLIMB OF 250 FEET PER NM TO 8200.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT SIDE OF COURSE OUTBOUND FT WITHIN MILES OF (IAF)
2. PROFILE STARTS AT ZIBIV
3. FAC: 186.53 FAF: DIST FAF TO MAP: DIST FAF TO THLD:
4. MIN ALT: ZIBIV 11000, ZOSUV 9800, WOMRU 8700, YUSGU 8000
5. DIST TO THLD FROM OM: 4.71 MM: IM: 150 HAT: 299 HAT: 0.78
6. MIN GP INCPT: 8000 GP ALT AT FAF : YUSGU 8000 OM: MM: IM:
7. GP ANGLE: 3.00 34:1: IS NOT CLEAR 20:1: IS CLEAR TCH: 49.7
8. MSA FROM: RW19 15000

PBN REQUIREMENTS NOTE

RNP AR APCH.

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -27C OR ABOVE 54C.
CHART PLANVIEW NOTE AT TOCUD: (RNP 0.50).
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVAL ON DNW VOR/DME AIRWAY RADIALS 219 CW 267.
CHART PLANVIEW NOTE AT DNW VOR/DME: (RNP 0.50).
CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.30 ALL CATS VISIBILITY TO 1 3/8 SM.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.11* ALL CATS VISIBILITY TO RVR 4500.

ADDITIONAL FLIGHT DATA:

CHART APPROACH TRANSITION FROM DNW VORTAC.
ROUTE TYPE: A, H
ROUTE TYPE QUALIFIER 1: F
ROUTE TYPE QUALIFIER 2: S
HOLD S, RT, 012.59 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
AUTHORIZATION REQUIRED															
RNP 0.11 DA*	6750	4000	299	6750	4000	299	6750	4000	299	6750	4000	299			
RNP 0.30 DA**	6826	4000	375	6826	4000	375	6826	4000	375	6826	4000	375			
RNP 0.30 DA	6911	5500	460	6911	5500	460	6911	5500	460	6911	5500	460			



CHANGES - REASONS

- 1. ADDED RNP 0.11 LINE OF MINIMA. - PER FPT CHECKLIST.
- 2. ADDED RNP 0.30 LINE OF MINIMA WITH A CLIMB GRADIENT. - PER FPT CHECKLIST.
- 3. ADDED CAT D MINIMUMS. - PER FPT CHECKLIST.
- 4. ADDED NOTE **MISSED APPROACH REQUIRES A MINIMUM CLIMB OF 330 FEET PER NM TO 8200. - RNP 0.30 LOWER MINIMA REQUIRES THE CLIMB GRADIENT TO CLEAR OBSTACLES.
- 5. ADDED NOTE *MISSED APPROACH REQUIRES A MINIMUM CLIMB OF 250 FEET PER NM TO 8200. - RNP 0.11 REQUIRES THE CLIMB GRADIENT TO CLEAR OBSTACLES.
- 6. RNP 0.30 DA/HAT ALL CATS CHANGED FROM 6966/515 TO 6911/460. - CONTROLLING OBSTRUCTION ADJUSTMENT AND REQUEST FOR LOWER MINIMUMS.



COORDINATED WITH:

A4A

☒

ALPA

☒

AOPA

☒

APA

☒

HAI

☐

NBAA

☒

OTHER:

ZLC ARTCC, KJAC ATCT, AMGR

FLIGHT CHECKED BY

THOMAS E MOLOKIE

DONALD H LANIER

Jun 15, 2018

OFFICE

FICO

DATE

6/12/18

DEVELOPED BY

NICHOLAS K. JACKSON

Digitally signed by
NICHOLAS JACKSON

OFFICE

AJV-5431

DATE

03/28/2018

APPROVED BY

PATRICK MULQUEEN

May 03, 2018
Digitally signed by
DONALD H LANIER
Jun 15, 2018

OFFICE

AJV-5430

DATE

TITLE

MANAGER



FEDERAL AVIATION ADMINISTRATION
FLIGHT STANDARDS SERVICE
RNAV (RNP) 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> JACKSON HOLE	<u>AIRPORT ID</u> KJAC	<u>PROCEDURE NAME</u> RNAV (RNP) Z RWY 1	<u>ORIGINAL/AMENDMENT</u> 1	<u>CITY</u> JACKSON	<u>STATE</u> WY
<u>AIRPORT ELEVATION</u> 6451	<u>TDZE</u> 6431	<u>SUPERSEDED</u> RNAV (RNP) Z RWY 1	<u>ORIGINAL/AMENDMENT</u> ORIG-C	<u>DATED</u> 06/30/2011	<u>MAG VAR</u> 13E
<u>FACILITY</u> RNAV	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u> 13 SEPTEMBER 2018	<u>REQUIRED EFFECTIVE DATE</u> ROUTINE	<u>CANCEL SUSPEND</u>	<u>EPOCH YEAR</u> 2005

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>
IDECA		UROCO		TF	FB	1.00	258.00	25.00	14000
OLNUE		VUGUY		TF	FB	1.00	089.89	15.37	14000
UROCO		VUGUY		TF	FB	1.00	318.57	14.32	14000
VUGUY	IAF	LIYET		TF	FB	0.50	006.34	12.00	11600
LIYET		NECPI		TF	FB	0.50	006.40	2.00	11200
NECPI		YONUL		TF	FB	0.50	006.41	2.40	10500
YONUL		JEVIM		TF	FB	0.50	006.42	2.40	9900
JEVIM	IF	WIDGA		TF	FB	0.30	006.43	7.88	8600
WIDGA	FAF	RW01	MAP	TF	FB	0.30	006.47	6.71	
RW01	MAP	UBEVE		TF	FB	0.30	006.51	4.37	
UBEVE		QUIRT		TF	FB	1.00	006.52	12.77	
QUIRT		DNW VOR/DME		TF	FO	1.00	088.36	12.15	14000

MISSED APPROACH

MAP:

RNP: DA

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 14000 ON TRACK 006.51 TO UBEVE AND TRACK 006.52 TO QUIRT AND TRACK 088.36 TO DNW VOR/DME AND HOLD, CONTINUE CLIMB-IN-HOLD TO 14000. *MISSED APPROACH REQUIRES MINIMUM CLIMB OF 330 FEET PER NM TO 8200; IF UNABLE TO MEET CLIMB GRADIENT, SEE RNAV (RNP) Y RWY 1.

ALTERNATE MISSED APPROACH INSTRUCTIONS:



PROFILE:

1. PT

SIDE OF COURSE

OUTBOUND

FT WITHIN

MILES OF (IAF)

2. PROFILE STARTS AT VUGUY

3. FAC: 006.47

FAF:

DIST FAF TO MAP:

DIST FAF TO THLD:

4. MIN ALT: VUGUY 14000, LIYET 11600, NECPI 11200, YONUL 10500, JEVIM 9900, WIDGA 8600

5. DIST TO THLD FROM OM: 6.71

MM:

IM:

150 HAT:

259 HAT: 0.71

6. MIN GP INCPT: 8600

GP ALT AT FAF : WIDGA 8600

OM:

MM:

IM:

7. GP ANGLE: 3.00

34:1: IS CLEAR

20:1: IS CLEAR

TCH: 50.0

8. MSA FROM: RW01 15000

PBN REQUIREMENTS NOTE

RNP AR APCH.

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, PROCEDURE NA BELOW -27C OR ABOVE 54C.
CHART NOTE: INOPERATIVE TABLE DOES NOT APPLY TO RNP 0.11* ALL CATS VISIBILITY.
CHART NOTE: FOR INOPERATIVE ALS, INCREASE RNP 0.30* ALL CATS VISIBILITY TO 7/8 SM.
CHART NOTE: MISSED APPROACH REQUIRES RNP LESS THAN 1.0.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT OLNUE ON V465 SOUTHWEST BOUND AND ARRIVALS AT IDECA ON V328 SOUTHEAST BOUND.
CHART PLANVIEW NOTE AT IDECA AND OLNUE: (RNP 0.30).

ADDITIONAL FLIGHT DATA:

ROUTE TYPE: A, H
ROUTE TYPE QUALIFIER 1: F
ROUTE TYPE QUALIFIER 2: S
CHART MAXIMUM 17500 AT IDECA AND OLNUE AND MAXIMUM 15000 AT VUGUY.
HOLD N, LT, 197.99 INBOUND

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD

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
AUTHORIZATION REQUIRED															
RNP 0.11 DA*	6690	3/4	259	6690	3/4	259	6690	3/4	259	6690	3/4	259			
RNP 0.30 DA*	6743	3/4	312	6743	3/4	312	6743	3/4	312	6743	3/4	312			



AIRPORT	AIRPORT ID	PROCEDURE NAME	ORIGINAL/AMENDMENT	CITY	STATE
JACKSON HOLE	KJAC	RNAV (RNP) Z RWY 1	1	JACKSON	WY

CHANGES - REASONS

- 1. ADDED CAT D MINIMUMS. - PER FPT CHECKLIST.
- 2. ADDED RNP 0.11 LINE OF MINIMA. - PER FPT/ATC DISTRO PACKAGE REQUEST.
- 3. RNP 0.30 DA/HAT ALL CATS CHANGED FROM 6811/380 TO 6762/311. -FINAL IS ASC, MISSED APPROACH CLIMB GRADIENT INCREASED FROM 280 TO 8100 TO 330 TO 8200.
- 4. RNP 0.30 VISIBILITIES ALL CATS CHANGED FROM 1 SM TO 3/4 SM. - VISIBILITIES UPDATED PER AFS CERTIFIED VISI TOOL.
- 5. REMOVED NOTE "WHEN VGSI INOPERATIVE, PROCEDURE NA AT NIGHT. - NOTE NO LONGER REQUIRED, NO 20:1 PENETRATIONS IDENTIFIED IN THE CAT A/B VISUAL SURFACE AREA.
- 6. REMOVED NOTE "VISIBILITY REDUCTION BY HELICOPTERS NA". - NOTE NO LONGER REQUIRED, NO 34:1 PENETRATIONS IDENTIFIED IN THE CAT A/B VISUAL SURFACE AREA.
- 7. RNP 0.30 MISSED APPROACH CLIMB GRADIENT INCREASED FROM 280 FT/NM TO 331 FT/NM. - CLIMB GRADIENT INCREASED DUE TO REQUESTED LOWERING OF DA TO CLEAR OBSTACLES.
- 8. UPDATED MISSED APPROACH REFERENCES OF "VIA" TO "ON". - IAW 8260.19H.



COORDINATED WITH:

A4A ☒ ALPA ☒ AOPA ☒ APA ☒ HAI ☐ NBAA ☒ OTHER: ZLC ARTCC, KJAC ATCT, AMGR

FLIGHT CHECKED BY

THOMAS E MOLOKIE

Digitally signed by

DONALD H LANIER

Jun 15, 2018

OFFICE

FICO

DATE

6/12/18

DEVELOPED BY

NICHOLAS K. JACKSON

Digitally signed by

NICHOLAS JACKSON

Apr 25, 2018

OFFICE

AJV-5431

DATE

03/30/2018

APPROVED BY

PATRICK MULQUEEN

Digitally signed by

DONALD H LANIER

Jun 15, 2018

OFFICE

AJV-5430

DATE

TITLE

MANAGER



[4910-13]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 97

[Docket No. [31203](#); Amdt. No. [3808](#)

**Standard Instrument Approach Procedures, and Takeoff Minimums
and Obstacle Departure Procedures; Miscellaneous Amendments**

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: This rule amends, suspends, or removes Standard Instrument Approach Procedures (SIAPs) and associated Takeoff Minimums and Obstacle Departure Procedures for operations at certain airports. These regulatory actions are needed because of the adoption of new or revised criteria, or because of changes occurring in the National Airspace System, such as the commissioning of new navigational facilities, adding new obstacles, or changing air traffic requirements. These changes are designed to provide for the safe and efficient use of the navigable airspace and to promote safe flight operations under instrument flight rules at the affected airports.

DATES: This rule is effective [INSERT DATE OF PUBLICATION IN THE FEDERAL REGISTER]. The compliance date for each SIAP, associated Takeoff Minimums, and ODP is specified in the amendatory provisions.

The incorporation by reference of certain publications listed in the regulations is approved by the Director of the Federal Register as of [INSERT DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: Availability of matter incorporated by reference in the amendment is as follows:

For Examination

1. U.S. Department of Transportation, Docket Ops-M30, 1200 New Jersey Avenue SE, West Bldg., Ground Floor, Washington, D.C., 20590-0001;

2. The FAA Air Traffic Organization Service Area in which the affected airport is located;

3. The office of Aeronautical Navigation Products, 6500 South MacArthur Blvd., Oklahoma City, OK 73169 or,

4. The National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to:

http://www.archives.gov/federal_register/code_of_federal_regulations/ibr_locations.html.

Availability

All SIAPs and Takeoff Minimums and ODPs are available online free of charge. Visit the National Flight Data Center online at nfdc.faa.gov to register. Additionally, individual SIAP and Takeoff Minimums and ODP copies may be obtained from the FAA Air Traffic Organization Service Area in which the affected airport is located.

FOR FURTHER INFORMATION CONTACT: Thomas J. Nichols, Flight Procedure Standards Branch (AFS-420) Flight Technologies and Procedures Division, Flight Standards Service, Federal Aviation Administration, Mike Monroney Aeronautical Center, 6500 South MacArthur Blvd., Oklahoma City, OK. 73169 (Mail Address: P.O. Box 25082 Oklahoma City, OK. 73125) telephone: (405) 954-4164.

SUPPLEMENTARY INFORMATION:

This rule amends Title 14, Code of Federal Regulations, Part 97 (14 CFR part 97) by amending the referenced SIAPs. The complete regulatory description of each SIAP is listed on the appropriate FAA Form 8260, as modified by the National Flight Data Center (NFDC)/Permanent Notice to Airmen (P-NOTAM), and is incorporated by reference under 5 U.S.C. 552(a), 1 CFR part 51, and 14 CFR §97.20. The large number of SIAPs, their complex nature, and the need for a special format make their verbatim publication in the **Federal Register** expensive and impractical. Further, airmen do not use the regulatory text of the SIAPs, but refer to their graphic depiction on charts printed by publishers of aeronautical materials. Thus, the advantages of incorporation by reference are realized and publication of the complete description of each SIAP contained on FAA form documents is unnecessary.

This amendment provides the affected CFR sections, and specifies the SIAPs and Takeoff Minimums and ODPs with their applicable effective dates. This amendment also identifies the airport and its location, the procedure and the amendment number.

Availability and Summary of Material Incorporated by Reference

The material incorporated by reference is publicly available as listed in the ADDRESSES section.

The material incorporated by reference describes SIAPs, Takeoff Minimums and ODPs as identified in the amendatory language for part 97 of this final rule.

The Rule

This amendment to 14 CFR part 97 is effective upon publication of each separate SIAP and Takeoff Minimums and ODP as amended in the transmittal. For safety and timeliness of change considerations, this amendment incorporates only specific changes contained for each SIAP and Takeoff Minimums and ODP as modified by FDC permanent NOTAMs.

The SIAPs and Takeoff Minimums and ODPs, as modified by FDC permanent NOTAM, and contained in this amendment are based on the criteria contained in the U.S. Standard for Terminal Instrument Procedures (TERPS). In developing these changes to SIAPs and Takeoff Minimums and ODPs, the TERPS criteria were applied only to specific conditions existing at the affected

airports. All SIAP amendments in this rule have been previously issued by the FAA in a FDC NOTAM as an emergency action of immediate flight safety relating directly to published aeronautical charts.

The circumstances that created the need for these SIAP and Takeoff Minimums and ODP amendments require making them effective in less than 30 days.

Because of the close and immediate relationship between these SIAPs, Takeoff Minimums and ODPs, and safety in air commerce, I find that notice and public procedure under 5 U.S.C. 553(b) are impracticable and contrary to the public interest and, where applicable, under 5 U.S.C. 553(d), good cause exists for making these SIAPs effective in less than 30 days.

The FAA has determined that this regulation only involves an established body of technical regulations for which frequent and routine amendments are necessary to keep them operationally current. It, therefore--(1) is not a "significant regulatory action" under Executive Order 12866; (2) is not a "significant rule" under DOT Regulatory Policies and Procedures (44 FR 11034; February 26, 1979) ; and (3) does not warrant preparation of a regulatory evaluation as the anticipated impact is so minimal. For the same reason, the FAA certifies that this amendment will not have a significant economic impact on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

List of Subjects in 14 CFR part 97:

Air Traffic Control, Airports, Incorporation by reference, Navigation (Air).

Issued in Washington, DC on [June 29, 2018](#)

A handwritten signature in black ink, appearing to read "John S. Duncan", with a long, sweeping horizontal stroke extending to the right.

John S. Duncan
Executive Director, Flight Standards Service

ADOPTION OF THE AMENDMENT

Accordingly, pursuant to the authority delegated to me, Title 14, Code of Federal regulations, Part 97, (14 CFR part 97), is amended by amending Standard Instrument Approach Procedures and Takeoff Minimums and ODPs, effective at 0901 UTC on the dates specified, as follows:

PART 97 – STANDARD INSTRUMENT APPROACH PROCEDURES

1. The authority citation for part 97 continues to read as follows:

AUTHORITY: 49 U.S.C. 106(f), 106(g), 40103, 40106, 40113, 40114, 40120, 44502, 44514, 44701, 44719, 44721-44722.

2. Part 97 is amended to read as follows:

By amending: §97.23 VOR, VOR/DME, VOR or TACAN, and VOR/DME or TACAN; §97.25 LOC, LOC/DME, LDA, LDA/DME, SDF, SDF/DME; §97.27 NDB, NDB/DME; §97.29 ILS, ILS/DME, MLS, MLS/DME, MLS/RNAV; §97.31 RADAR SIAPs; §97.33 RNAV SIAPs; and §97.35 COPTER SIAPs, Identified as follows:

.....EFFECTIVE UPON PUBLICATION

AIRAC DATE	STATE	CITY	AIRPORT	FDC NUMBER	FDC DATE	SUBJECT
16-Aug-18	AZ	Fort Huachuca Sierra Vista	Sierra Vista Muni-Libby AAF	8/5934	6/20/18	RNAV (GPS) RWY 8, Amdt 1B
16-Aug-18	IA	Audubon	Audubon County	8/7524	6/20/18	RNAV (GPS) RWY 32, Orig
16-Aug-18	CT	Danbury	Danbury Muni	8/8657	6/20/18	RNAV (GPS)-A, Orig
16-Aug-18	CT	Danbury	Danbury Muni	8/8664	6/20/18	LOC RWY 8, Amdt 6

AIRAC Date: 16 AUGUST 2018

FDC **8/5934** FHU IAP SIERRA VISTA MUNI-LIBBY AAF, Fort Huachuca Sierra Vista, AZ. RNAV (GPS) RWY 8, AMDT 1B... CHART PROFILE NOTE: VGSI AND RNAV GLIDEPATH NOT COINCIDENT (VGSI ANGLE 3.00/TCH 50). CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -24C (-11F) OR ABOVE 47C (117F). DELETE NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -24C (-11F) OR ABOVE 14C (57F). DELETE NOTE: DME/DME RNP-0.3 NA. PBN REQUIREMENTS NOTE: RNP APCH. THIS IS RNAV (GPS) RWY 8, AMDT 1C. 1805141651-PERM

FDC **8/7524** ADU IAP AUDUBON COUNTY, Audubon, IA. RNAV (GPS) RWY 32, ORIG... CHART NOTE: CIRCLING RWY 14 NA AT NIGHT. PBN REQUIREMENTS NOTE: RNP APCH. DELETE NOTE: GPS OR RNP -0.3 REQUIRED. DELETE NOTE: DME/DME RNP -0.3 NA. THIS IS RNAV (GPS) RWY 32, ORIG-A. 1806191756-PERM

FDC **8/8657** DXR IAP DANBURY MUNI, Danbury, CT. RNAV (GPS)-A, ORIG... PBN REQUIREMENT NOTE: RNP APCH. DELETE NOTE: RWY 8, 17, 26 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED. CHART NOTE: HELICOPTER VISIBILITY BELOW 1 SM NOT AUTHORIZED. DELETE NOTE: PROCEDURE NA AT NIGHT. CHART NOTE: CIRCLING RWY 17, 26 NA AT NIGHT. DELETE NOTE: DME/DME RNP-.03 NA PBN REQUIREMENT NOTE: RNP APCH. THIS IS RNAV (GPS)-A, ORIG A. 1806051138-PERM

FDC **8/8664** DXR IAP DANBURY MUNI, Danbury, CT. LOC RWY 8, AMDT 6... DELETE NOTE: PROCEDURE NA AT NIGHT. CHART NOTE: CIRCLING RWY 17, 26, NA AT NIGHT. DELETE NOTE: RWY 8 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED. CHART NOTE: RWY 8 HELICOPTER VISIBILITY REDUCTION BELOW 3/4 SM NOT AUTHORIZED. THIS IS LOC RWY 8, AMDT 6A. 1806051144-PERM