

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

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

<u>AIRPORT ID</u>	<u>PROCEDURE NAME</u>	<u>ORIGINAL/AMENDMENT</u>	<u>CITY</u>	<u>STATE</u>		
BTL	RNAV (GPS) RWY 23R	1E	BATTLE CREEK	MI		
<u>AIRPORT ELEVATION</u>	<u>TDZE</u>	<u>SUPERSEDED</u>	<u>ORIGINAL/AMENDMENT</u>	<u>DATED</u>	<u>MAG VAR</u>	<u>EPOCH YEAR</u>
952	929	RNAV (GPS) RWY 23R	1D	09/10/2020	4W	1985
<u>FACILITY</u>	<u>COORDINATES OF FACILITIES</u>	<u>ACTUAL EFFECTIVE DATE</u>	<u>REQUIRED EFFECTIVE DATE</u>	<u>CANCEL/SUSPEND</u>		
RNAV		21 MARCH 2024	ROUTINE			

TERMINAL ROUTES

FROM	FIX TYPE	TO	FIX TYPE	LEG TYPE	FO/FB	RNP	COURSE	DISTANCE	ALTITUDE
VIO VOR/DME		ZULSI		TF	FB	1.00	143.74	19.62	3000
YOVUR	IAF	WIPIL	NOPT	TF	FB	1.00	316.79	6.00	2500
ZULSI	IAF	WIPIL	NOPT	TF	FB	1.00	136.63	8.00	2500
WIPIL	IF/IAF	UYUNA		TF	FB	1.00	226.72	6.80	2200
UYUNA	FAF	RW23R	MAP	TF	FO	0.30	226.65	3.84	
RW23R	MAP	1129 MSL		CA			226.65		
1129 MSL		WEVSO		DF	FO	1.00			2500

MISSED APPROACH

MAP:

LPV: DA
LNAV/VNAV: DA
LNAV: RW23R

MISSED APPROACH INSTRUCTIONS:

CLIMB TO 2500 DIRECT WEVSO AND HOLD.

ALTERNATE MISSED APPROACH INSTRUCTIONS:

PROFILE:

1. PT	SIDE OF COURSE	OUTBOUND	FT WITHIN	MILES OF	(IAF)	
2. HOLD NE WIPIL, RT, 226.72 INBOUND, 2500 FT. IN LIEU OF PT (IAF), MAX 6000.						
3. FAC: 226.65	FAF: UYUNA		DIST FAF TO MAP: 3.84	DIST FAF TO THLD: 3.84		
4. MIN ALT: WIPIL 2500, UYUNA 2200						
5. DIST TO THLD FROM OM:	MM:	IM:	150 HAT:	200 HAT: 0.47	GS ANT:	
6. MIN GP INCPT: 2200	GP ALT AT PFAF: UYUNA 2200			OM:	MM:	IM:
7. GP ANGLE: 3.00	34:1: IS CLEAR	20:1: IS CLEAR	TCH: 49.4			
8. MSA FROM: RW23R 3000						



PBN REQUIREMENTS NOTE:

RNP APCH - GPS.

NOTES:

CHART NOTE: FOR UNCOMPENSATED BARO-VNAV SYSTEMS, LNAV/VNAV NA BELOW -20°C OR ABOVE 54°C.
CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT VIO VOR/DME ON V274 SOUTHWEST BOUND.
CHART NOTE: CIRCLING TO RWY 5R, 23L AND 31 NA AT NIGHT.
CHART NOTE: **RVR 1800 AUTHORIZED WITH USE OF FD OR AP OR HUD TO DA.
CHART NOTE: WHEN LOCAL ALTIMETER SETTING NOT RECEIVED, USE GRAND RAPIDS ALTIMETER SETTING: INCREASE ALL LPV DA TO 1236 FEET AND LNAV/VNAV DA TO 1365 FEET AND VISIBILITY TO RVR 5000 ALL CATS; INCREASE ALL MDA 120 FEET, LNAV CATS C AND D VISIBILITY TO 1 1/4 SM AND CIRCLING CAT C VISIBILITY TO 2 SM AND CAT D VISIBILITY TO 2 1/2 SM.
CHART NOTE: FOR INOPERATIVE ALS WHEN USING GRAND RAPIDS ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO RVR 5000 AND LNAV CATS C AND D VISIBILITY TO 1 5/8 SM.
CHART NOTE: BARO-VNAV AND VDP NA WHEN USING GRAND RAPIDS ALTIMETER SETTING.

ADDITIONAL FLIGHT DATA:

HOLD SW, RT, 046.48 INBOUND.
CHART FAS OBST: 1096 TOWER 421906N/0851313W.
FAS OBST: 1130 AAO 422151N/0851146W.
CHART VDP AT 1.26 NM TO RW23R.
WAAS CHANNEL # 56411
REFERENCE PATH ID: W23A
CHART CIRCLING ICON.
LTP HAE: 249.6 M

MINIMUMS:

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

ALTERNATE: NA ☐ STANDARD; 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**	1129	2400	200	1129	2400	200	1129	2400	200	1129	2400	200			
LNAV/VNAV DA	1258	3200	329	1258	3200	329	1258	3200	329	1258	3200	329			
LNAV MDA	1380	2400	451	1380	2400	451	1380	4500	451	1380	4500	451			
CIRCLING	1420	1	468	1480	1	528	1520	1 1/2	568	1520	2	568			

CHANGES - REASONS

1. PROFILE LINE 2: ADDED MAX HOLD-IN-LIEU ALTITUDE OF 6000 - 8260.19I, 8-6-7, B(2).
2. PROFILE LINE 5: ADDED "200 HAT: 0.47" - PER 8260.19I 8-6-7E(3).
3. PBN REQUIREMENTS NOTE: CHANGED FROM "RNP APCH" TO "RNP APCH - GPS" - PER 8260.19I, 8-6-8B2.
4. REMOVED CHART NOTE "CIRCLING TO RWY 31 NA AT NIGHT" AND CHANGED CHART NOTE FROM "CIRCLING NA TO RWYS 5R AND 23L" TO "CIRCLING TO RWYS 5R, 23L AND 31 NA AT NIGHT" - RWY 31 HAS 20:1 PENETRATIONS, 5R AND 23L NO RWY MARKINGS.
5. CHANGED CHART PLANVIEW NOTE FROM "PROCEDURE NA FOR ARRIVAL ON VIO VOR/DME AIRWAY RADIALS 058 CW 171" TO "PROCEDURE NA FOR ARRIVALS AT VIO VOR/DME ON V274 SOUTHWEST BOUND" - V285 NO LONGER EXIST, COURSE CHANGE EXCEEDS 90 DEGREES.
6. MOVED BACK-UP ALTIMETER NOTE AND BARO-VNAV AND VDP NOTE FROM -9 PART C: GENERAL REMARKS TO NOTES - PER FPT REQUEST.
7. ADDED CHART NOTE: FOR INOPERATIVE ALS WHEN USING GRAND RAPIDS ALTIMETER SETTING, INCREASE LPV ALL CATS VISIBILITY TO RVR 5000 AND LNAV CATS C AND D VISIBILITY TO 1 5/8 SM - PER UPDATED 8260.3E, 3-3-1 VIS TABLES.
8. ADDITIONAL FLIGHT DATA: REMOVED "LNAV ONLY" AND "NA" FROM "CHART VDP AT 1.26 NM TO RW23R" - NO LONGER REQUIRED BY CURRENT CRITERIA.
9. ADDITIONAL FLIGHT DATA: REMOVED "DISTANCE TO THLD FROM 200 HAT: 0.47 NM" - CURRENTLY DOCUMENTED ON PROFILE LINE 5.
10. ADDITIONAL FLIGHT DATA: REMOVED "CHART: ASR" - NO LONGER REQUIRED.
11. CHANGES FROM P-NOTAM FOR AMDT 1D INCORPORATED INTO FORM - REQUIRED IAW 8260.19I PARA 8-3-4C(3).



COORDINATED WITH:

A4A

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ALPA

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AOPA

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APA

☐

HAI

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NBAA

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OTHER:

ZAU, AZO APP CON, BTL ATC, AMGR.

FLIGHT CHECKED BY

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

OFFICE

Digitally signed by

CASIMIR L TABAKA

Jan 18, 2024

DATE

DEVELOPED BY

CASIMIR L. TABAKA (SILVIA YOUNG)

Digitally signed by

CASIMIR L TABAKA

Jan 18, 2024

OFFICE

AJV-A432

DATE

07/18/2023

APPROVED BY

CASIMIR L. TABAKA

Digitally signed by

CASIMIR L TABAKA

Jan 18, 2024

OFFICE

AJV-A432

DATE

TITLE

MANAGER

FAS DATA BLOCK INFORMATION

DATA FIELD

DATA

OPERATION TYPE
SBAS SERVICE PROVIDER IDENTIFIER
AIRPORT IDENTIFIER
RUNWAY
APPROACH PERFORMANCE DESIGNATOR
ROUTE INDICATOR
REFERENCE PATH DATA SELECTOR
REFERENCE PATH IDENTIFIER (APPROACH ID)
LTP/FTP LATITUDE
LTP/FTP LONGITUDE
LTP/FTP ELLIPSOIDAL HEIGHT
FPAP LATITUDE
FPAP LONGITUDE
THRESHOLD CROSSING HEIGHT (TCH)
TCH UNITS SELECTOR (METERS OR FEET USED)
GLIDEPATH ANGLE (GPA)
COURSE WIDTH AT THRESHOLD
LENGTH OFFSET
HORIZONTAL ALERT LIMIT (HAL)
VERTICAL ALERT LIMIT (VAL)

0
0
KBTL
RW23R
0
0
W23A
421857.3725N
0851427.4055W
+02496
421744.6330N
0851557.5225W
00049.4
F
03.00
106.75
0000
40.0
35.0

CRC REMAINDER

0212E371

ADDITIONAL PATH POINT RECORD INFORMATION

ICAO CODE
LTP ORTHOMETRIC HEIGHT
FPAP ORTHOMETRIC HEIGHT

K5
+02830
+02830

