

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: RW33							
STRAW		NINDE (TF) (FB) (RNP 2.00)		263.77 / 26.15				3400		CLIMB TO 3300 DIRECT JODSO AND HOLD, CONTINUE CLIMB-IN-HOLD TO 3300.							
IRILE (IAF)		ODOHU (NOPT) (TF) (FB) (RNP 1.00)		057.53 / 8.53				3000									
NINDE (IAF)		ODOHU (NOPT) (TF) (FB) (RNP 1.00)		239.22 / 5.00				3000		ADDITIONAL FLIGHT DATA: HOLD NW, RT, 149.13 INBOUND. FAS OBST: 1214 AAO 471334N/0962224W. JOWZI TO RW33: 3.05/45 CHART HECTOR INTL ASOS-3							
ODOHU (IF/IAF)		JOWZI (TF) (FB) (RNP 1.00)		329.13 / 6.10				2700									
JOWZI (FAF)		WELEB/1.90 NM TO RW33 (TF) (FB) (RNP 0.30)		329.13 / 3.36													
(SEE FORM 8260-10)																	
1. PT _____ SIDE OF COURSE _____ OUTBOUND _____ FT WITHIN _____ MILES OF _____ (IAF)																	
2. HOLD SE ODOHU, RT, 329.13 INBOUND, 3000 FT. IN LIEU OF PT (IAF)																	
3. FAC: 329.13 FAF: JOWZI DIST FAF TO MAP: 5.26 THLD: 5.26																	
4. MIN. ALT: ODOHU 3000, JOWZI 2700, WELEB/1.90 NM TO RW33 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 NOT CLEAR 34:1 IS NOT CLEAR																	
8. MSA FROM: RW33 2900																	
MAG VAR: 5E EPOCH YEAR: 2000																	
MINIMUMS																	
TAKEOFF: SEE FAA FORM 8260-15A FOR THIS AIRPORT										ALTERNATE: N A X							
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	1540	1	586	1540	1	586	1540	1 3/4	586		NA						
CIRCLING	1540	1	586	1540	1	586	1580	1 3/4	626		NA						
NOTES: CHART NOTE: USE HECTOR INTL ALTIMETER SETTING. CHART NOTE: RWY 33 HELICOPTER VISIBILITY REDUCTION BELOW 1 SM NOT AUTHORIZED CHART NOTE: PROCEDURE NA AT NIGHT CHART PLANVIEW NOTE: PROCEDURE NA FOR ARRIVALS AT STRAW ON V55 SOUTHEAST BOUND. PBN REQUIREMENTS NOTE: RNP APCH																	
CITY AND STATE ADA/TWIN VALLEY, MN		ELEVATION: 954 TDZE: 954 AIRPORT NAME: NORMAN COUNTY ADA/TWIN VALLEY				FACILITY IDENTIFIER: RNAV		PROCEDURE NO./AMDT NO./EFFECTIVE DATE: RNAV (GPS) RWY 33, ORIG-A				SUP: AMDT: ORIG DATED 05/05/2011					

ALL AFFECTED PROCEDURES REVIEWED? <div><input type="checkbox"/> YES</div> <div><input type="checkbox"/> NO</div>		COORDINATES OF FACILITIES		REQUIRED EFFECTIVE DATE	
ROUTINE					
COORDINATED WITH:					
A4A	ALPA	AOPA	APA	HAI	NBAA
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
OTHER (specify) AMGR, FARGO APP CON					
Digitally signed by					
FLIGHT CHECKED BY					
BEV L BORDY					
NAME:				Feb 23, 2018	FIFO
FLIGHT INSPECTION REVIEW NOT REQUIRED - PROCESSED IAW AIRCRAFT OPERATIONS GROUP (AJW-333) MEMO, DEC 22, 2017.					DATE:
DEVELOPED BY					
Digitally signed by					
NAME:				Feb 23, 2018	FIFO
VICTOR B. NASO (BRYAN HERRICK)					DATE:
				AJV-5413	12/05/2017
APPROVED BY					
NAME:				Feb 23, 2018	FIFO
GEORGE E. DAVIS				MANAGER	DATE:
				BEV L BORDY	AJV-5410
CHANGES:					
Feb 23, 2018					
1. ADDED HELICOPTER VISIBILITY REDUCTION CHART NOTE					
2. ADDED PROCEDURE NA AT NIGHT CHART NOTE					
3. ADDED 20:1 IS NOT CLEAR					
4. CHANGED CAT C LNAV MDA VISIBILITY FROM 1 1/2 SM TO 1 3/4 SM					
5. REMOVED DME/DME RNP 0.3 CHART NOTE, AND ADDED PBN EQUIPMENT REQUIREMENT NOTE					
6. CHANGED INTERMEDIATE RNP FROM 0.5 TO 1.0					
7. CHARTED FARGO ASOS-3.					
REASONS:					
1, 2, 3. NO OIS SURVEY TO RWY 15/33					
4. NEW VISIBILITY TABLE					
5. CURRENT ANNOTATION FOR RNAV PROCEDURE					
6. CURRENT NAVIGATION ACCURACY FOR INTERMEDIATE SEGMENT					
7. PE R .19H 8-2-4 B. (3)					

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
WELEB/1.90 NM TO RW33	RW33 (MAP) (TF) (FO) (RNP 0.30)	329.13 / 1.90	
RW33 (MAP)	1354 MSL (CA)	329.13	
1354 MSL	JODSO (DF) (FO) (RNP 1.00)		3300

QUALITY  
16  
CHECKED

CITY AND STATE  
ADA/TWIN VALLEY, MN

ELEVATION: 954 TDZE: 954  
AIRPORT NAME:  
NORMAN COUNTY ADA/TWIN VALLEY

FACILITY  
IDENTIFIER:  
RNAV

PROCEDURE NO./AMDT NO./EFFECTIVE DATE:  
RNAV (GPS) RWY 33, ORIG-A

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

ALL AFFECTED PROCEDURES REVIEWED? <input type="checkbox"/> YES <input type="checkbox"/> NO		COORDINATES OF FACILITIES		REQUIRED EFFECTIVE DATE	
COORDINATED WITH: A4A                      ALPA                      APA                      AOPA                      HAI                      NBAA                      OTHER (specify) <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> _____					
FLIGHT CHECKED BY					
NAME:				FIFO	DATE:
DEVELOPED BY					
NAME:				FIFO	DATE:
APPROVED BY					
NAME:				FIFO	DATE:
CHANGES:					
REASONS:					

## STANDARD INSTRUMENT APPROACH PROCEDURE DATA RECORD

## PART - A OBSTRUCTION DATA

1. APP SEGMENT	FROM	TO	OBSTRUCTION	COORDINATES	ELEV. MSL	ROC	ALT. ADJUSTMENTS	MIN. ALT.			
FEEDER	STRAW	NINDE	1. AAO	471154.00N/0952909.00W	2057 (4E)	1000	AT343	3400			
			2. TERRAIN	471200.00N/0953236.00W	1818 (1800)		AS1500	3300			
INITIAL	IRILE	ODOHU	3. AAO	470157.00N/0961930.00W	1444 (4E)	1000	DG500	3000			
			4. TERRAIN	470157.00N/0961930.00W	1244 (1200)		AS1500	2700			
INITIAL	NINDE	ODOHU	5. AAO	471000.00N/0961018.00W	1500 (4E)	1000	DG500	3000			
			6. TERRAIN	471015.00N/0961212.00W	1250 (1300)		AS1500	2800			
INTERMEDIATE	ODOHU (IF/IAF)	JOWZI	7. AAO	470851.00N/0961712.00W	1424 (2C)	500		2000			
			8. TERRAIN	470851.00N/0961712.00W	1224 (1200)		AS1500	2700			
FINAL: LNAV	JOWZI	WELEB/1.90 NM TO RW33	9. AAO	471055.27N/0961905.33W	1274 (2C)	250	RA69	1600			
FINAL: LNAV STEPDOWN	WELEB/1.90 NM TO RW33	RW33	10. AAO	471334.00N/0962223.72W	1214 (2C)	250	RA69	1540			
2. HOLD-IN-LIEU-OF-PT	ODOHU	P-5	11. AAO	465915.00N/0961227.00W	1449 (2C)	1000	AT499	3000			
			12. TERRAIN	465915.00N/0961227.00W	1342 (1300)		AS1500	2800			
3. MISSED APPROACH	MAP: RW33	JODSO				ASC		3300			
	ELEV: 1440		13. TREE	471510.20N/0962349.29W	1004 (2C)	1000		2100			
			14. TERRAIN	472227.00N/0962127.00W	1041 (1000)		AS1500	2500			
4. CIRCLING AREA	DISTANCE	HT. ABV. ARPT.									
CATEGORY A	1.3 NM	REQUIRED	350	ACTUAL	586	15. TREE	471506.00N/0962203.00W	1034 (2C)	300	SI	1540
CATEGORY B	1.5 NM		450		586	16. TREE	471427.00N/0962211.00W	1049 (2C)	300	SI	1540
CATEGORY C	1.7 NM		450		626	17. AAO	471400.00N/0962228.00W	1209 (2C)	300	RA69	1580
CATEGORY D	2.3 NM		550								
CATEGORY E	4.5 NM		550								
5. MINIMUM SAFE ALTITUDES	PRIMARY NAVAID: RW33										
SECTOR	OBSTRUCTION	BRG/DIST	ELEVATION (MSL)	M S A	SECTOR	OBSTRUCTION	BRG/DIST	ELEVATION (MSL)	M S A		
360-360	AAO	109/28.5	1864 (5E)	2900						16	
CITY AND STATE	ELEVATION: 954			FACILITY	PROCEDURE AND AMENDMENT NO:			REGION			
ADA/TWIN VALLEY, MN	AIRPORT NAME: NORMAN COUNTY ADA/TWIN VALLEY			RNAV	RNAV (GPS) RWY 33, ORIG-A			AGL			

PART B - SUPPLEMENTAL DATA										PART C - REMARKS: VDP NOT ESTABLISHED - REMOTE ALTIMETER SETTING IN USE.  PRECIPITOUS TERRAIN EVALUATION COMPLETED.  KFAR ASOS ON WMSCR  RASS PRESSURE PATTERNS THE SAME KD00 954, KFAR 901 KJKJ 918 RA = 68.53                      RA = 68.29  CAT D AND TAA NOT BUILT PER FPT.  LPV AND LNAV/VNAV NOT DEVELOPED PER FPT AND NO OIS SURVEY.  NO ADDITIONAL AIRSPACE REQUIRED.  50' TREE USED PER FPT.  FIX JODSO ALIGNED WITH FARGO (FAR) VORTAC R-015 FOR NON-RADAR REENTRY TO ENROUTE STRUCTURE.  NO OIS SURVEYS RWY 15/33 - UNABLE TO VERIFY VISUAL SURFACES CLEAR  WHEN HECTOR INTL ALTIMETER NOT RECEIVED, USE MOORHEAD ALTIMETER SETTING.													
1. COMMUNICATIONS WITH:				2. WEATHER SERVICE				3. ALTIMETER SETTING															
FAR TOWER ZMP ARTCC				N W S  F A A  A / C		OTHER: ASOS		SOURCE:KFAR / KJKJ															
								DISTANCE: 26.55 / 27.50															
								HOURS REMOTE OPERATION: 24 YES / 24 YES															
SATISFACTORY ON:				LOCATION: KFAR				ADJUSTMENT: 69 / 69															
X V H F		X U H F		H F																			
4. MONITOR STATUS		PRIMARY NAVAID:																					
		MONITOR POINT:																					
		HRS OPTN:		CAT 1																			
				CAT 3																			
5. APPROACH & RUNWAY LIGHTING				ALS																			
				(S) SALS																			
				MALS																			
				HIRL																			
				MIRL																			
				REIL																			
				TDZ																			
				C/LINE																			
		X		OTHER (SPECIFY) LIRL 15, 33																			
6. RUNWAY MARKINGS		BASIC																					
		ALL WEATHER																					
		INSTRUMENT        NPI-F 15, 33																					
7. RUNWAY VISUAL RANGE		APPROACH																					
		MIDFIELD																					
		ROLL OUT																					
8. GLIDE PATH		GP ANGLE:						ELEV RWY THRESHOLD:															
		DISTANCE FROM RWY:						ELEV GP ANTENNA:															
								THRESHOLD CROSSING HEIGHT:															
9. FINAL APPROACH COURSE AIMING				X		RUNWAY THRESHOLD				FT. FROM THRESHOLD													
				X		ON CENTERLINE				FT. FROM CENTERLINE													
10. WAIVERS: NONE																							
PART D - PREPARED BY: VICTOR B. NASO (BRYAN HERRICK)										DATE: 12/05/2017													
TITLE: AERONAUTICAL INFORMATION SPECIALIST										OFFICE: AJV-5413													

