

**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>AIRPORT ID</u>	<u>CITY</u>	<u>STATE</u>	<u>AMDT NO</u>	<u>ACTUAL EFFECTIVE DATE</u>
C04	HART/SHELBY	MI	1	

TAKEOFF MINIMUMS:

RWY 15, 33: NA - ENVIRONMENTAL.
RWY 9: 300-1 1/8 OR STANDARD WITH MINIMUM CLIMB OF 355 FT/NM TO 1200.
RWY 27: 300-1 OR STANDARD WITH MINIMUM CLIMB OF 450 FT/NM TO 1200.

TEXTUAL DEPARTURE PROCEDURES:

RWY 27: CLIMB HEADING 267.64 TO 1500 BEFORE TURNING RIGHT.

VISUAL CLIMB OVER AIRPORT:

TAKEOFF OBSTACLE NOTES:

NOTE: RWY 9: SIGN 13 FT FROM DER, 125 FT LEFT OF CENTERLINE, 2 FT AGL/903 FT MSL.
TERRAIN BEGINNING 54 FT FROM DER, 314 FT LEFT OF CENTERLINE, UP TO 904 FT MSL.
TERRAIN 73 FT FROM DER, 195 FT RIGHT OF CENTERLINE, 904 FT MSL.
TERRAIN 125 FT FROM DER, 371 FT RIGHT OF CENTERLINE, 908 FT MSL.
TREES BEGINNING 257 FT FROM DER, 269 FT RIGHT OF CENTERLINE, UP TO 922 FT MSL.
TREES BEGINNING 759 FT FROM DER, 82 FT RIGHT OF CENTERLINE, UP TO 65 FT AGL/970 FT MSL.
VEHICLES ON ROAD 786 FT FROM DER, 654 FT LEFT OF CENTERLINE, 926 FT MSL.
TREE 894 FT FROM DER, 434 FT LEFT OF CENTERLINE, 929 FT MSL.
TREE 927 FT FROM DER, 611 FT LEFT OF CENTERLINE, 951 FT MSL.
TREES, TRANSMISSION LINE, POLE BEGINNING 1026 FT FROM DER, 17 FT LEFT OF CENTERLINE, UP TO 981 FT MSL.
TREES BEGINNING 1206 FT FROM DER, 365 FT RIGHT OF CENTERLINE, UP TO 71 FT AGL/976 FT MSL.
TREES BEGINNING 1855 FT FROM DER, 451 FT RIGHT OF CENTERLINE, UP TO 1004 FT MSL.
TREES BEGINNING 1959 FT FROM DER, 525 FT RIGHT OF CENTERLINE, UP TO 90 FT AGL/1013 FT MSL.
TREES BEGINNING 2124 FT FROM DER, 201 FT LEFT OF CENTERLINE, UP TO 70 FT AGL/1004 FT MSL.
TREES BEGINNING 2201 FT FROM DER, 152 FT LEFT OF CENTERLINE, UP TO 81 FT AGL/1011 FT MSL.
TREE 2770 FT FROM DER, 953 FT RIGHT OF CENTERLINE, 78 FT AGL/1020 FT MSL.
TREES BEGINNING 2786 FT FROM DER, 763 FT RIGHT OF CENTERLINE, UP TO 1022 FT MSL.
TREES BEGINNING 2804 FT FROM DER, 230 FT RIGHT OF CENTERLINE, UP TO 82 FT AGL/1027 FT MSL.
TREES BEGINNING 3700 FT FROM DER, 4 FT LEFT OF CENTERLINE, UP TO 151 FT AGL/1066 FT MSL.
TREES BEGINNING 3791 FT FROM DER, 2 FT RIGHT OF CENTERLINE, UP TO 102 FT AGL/1037 FT MSL.
TREES BEGINNING 4539 FT FROM DER, 1206 FT RIGHT OF CENTERLINE, UP TO 101 FT AGL/1062 FT MSL.
TREE 5525 FT FROM DER, 1800 FT RIGHT OF CENTERLINE, 203 FT AGL/1082 FT MSL.

NOTE: RWY 27: TERRAIN 11 FT FROM DER, 449 FT RIGHT OF CENTERLINE, 920 FT MSL.
TERRAIN BEGINNING 14 FT FROM DER, 192 FT RIGHT OF CENTERLINE, UP TO 922 FT MSL.
TREE 76 FT FROM DER, 453 FT LEFT OF CENTERLINE, 925 FT MSL.
TERRAIN 115 FT FROM DER, 259 FT RIGHT OF CENTERLINE, 923 FT MSL.
TREE 188 FT FROM DER, 476 FT LEFT OF CENTERLINE, 20 FT AGL/935 FT MSL.
TREES BEGINNING 188 FT FROM DER, 383 FT LEFT OF CENTERLINE, UP TO 20 FT AGL/937 FT MSL.
TERRAIN BEGINNING 192 FT FROM DER, 193 FT RIGHT OF CENTERLINE, UP TO 924 FT MSL.
TERRAIN BEGINNING 243 FT FROM DER, 304 FT RIGHT OF CENTERLINE, UP TO 925 FT MSL.
TERRAIN 364 FT FROM DER, 294 FT RIGHT OF CENTERLINE, 926 FT MSL.
VEHICLES ON ROAD BEGINNING 446 FT FROM DER, 196 FT RIGHT OF CENTERLINE, UP TO 939 FT MSL.
TREES, VEHICLES ON ROAD BEGINNING 468 FT FROM DER, 2 FT LEFT OF CENTERLINE, UP TO 17 FT AGL/938 FT MSL.
TREES, VEHICLES ON ROAD, AGRICULTURAL EQUIPMENT, TERRAIN BEGINNING 469 FT FROM DER, 44 FT RIGHT OF CENTERLINE, UP TO 971 FT MSL.
TREES, BUILDING, TERRAIN BEGINNING 566 FT FROM DER, 455 FT LEFT OF CENTERLINE, UP TO 64 FT AGL/985 FT MSL.
TREES, TERRAIN BEGINNING 1982 FT FROM DER, 130 FT LEFT OF CENTERLINE, UP TO 76 FT AGL/1040 FT MSL.
TREES, POLE, TRANSMISSION LINES BEGINNING 2029 FT FROM DER, 13 FT RIGHT OF CENTERLINE, UP TO 76 FT AGL/1044 FT MSL.
TREES BEGINNING 2544 FT FROM DER, 176 FT LEFT OF CENTERLINE, UP TO 79 FT AGL/1044 FT MSL.
TREES BEGINNING 2581 FT FROM DER, 121 FT LEFT OF CENTERLINE, UP TO 77 FT AGL/1050 FT MSL.
TREES BEGINNING 2663 FT FROM DER, 106 FT LEFT OF CENTERLINE, UP TO 77 FT AGL/1051 FT MSL.
TREES BEGINNING 2694 FT FROM DER, 135 FT LEFT OF CENTERLINE, UP TO 1062 FT MSL.
TREES BEGINNING 2721 FT FROM DER, 111 FT LEFT OF CENTERLINE, UP TO 92 FT AGL/1067 FT MSL.
TREES BEGINNING 2768 FT FROM DER, 233 FT LEFT OF CENTERLINE, UP TO 94 FT AGL/1070 FT MSL.
TREE 2800 FT FROM DER, 665 FT LEFT OF CENTERLINE, 94 FT AGL/1071 FT MSL.
TREES BEGINNING 2806 FT FROM DER, 309 FT LEFT OF CENTERLINE, UP TO 98 FT AGL/1072 FT MSL.
TREES BEGINNING 2832 FT FROM DER, 20 FT LEFT OF CENTERLINE, UP TO 97 FT AGL/1073 FT MSL.
TREES BEGINNING 3221 FT FROM DER, 2 FT LEFT OF CENTERLINE, UP TO 91 FT AGL/1075 FT MSL.
TREES BEGINNING 3265 FT FROM DER, 11 FT RIGHT OF CENTERLINE, UP TO 77 FT AGL/1048 FT MSL.
TREES BEGINNING 3355 FT FROM DER, 162 FT RIGHT OF CENTERLINE, UP TO 76 FT AGL/1049 FT MSL.
TREE 3363 FT FROM DER, 38 FT RIGHT OF CENTERLINE, 72 FT AGL/1051 FT MSL.
TREES BEGINNING 3364 FT FROM DER, 7 FT RIGHT OF CENTERLINE, UP TO 81 FT AGL/1056 FT MSL.

QUALITY
23
CHECKED

TREES, TRANSMISSION LINES, POLE BEGINNING 3434 FT FROM DER, 13 FT RIGHT OF CENTERLINE, UP TO 80 FT AGL/1058 FT MSL.
TREES BEGINNING 4634 FT FROM DER, 393 FT LEFT OF CENTERLINE, UP TO 104 FT AGL/1070 FT MSL.

CONTROLLING OBSTACLES:

RWY 9: 1066 FT MSL TREE 433849.89N/0861835.06W (CLIMB GRADIENT) (CLIMB GRADIENT TERMINATION ALTITUDE), 1082 FT MSL TREE 433821.24N/0861804.94W (CEILING) (VISIBILITY).
RWY 27: 1070 FT MSL TREE 433816.82N/0862045.86W (CLIMB GRADIENT), 1075 FT MSL TREE 433821.34N/0862052.88W (CEILING), 1070 FT MSL TREE 433813.55N/0862110.87W (VISIBILITY), 1073 FT MSL TREE 433817.36N/0862046.84W (CLIMB GRADIENT TERMINATION ALTITUDE).
OBSTACLES MANDATING ODP ROUTE DEVELOPMENT: RWY 27: 1480 FT MSL TOWER 433953.06N/0862134.33W.

REMARKS:

100 FT VEGETATION USED PER FPT.

FLIGHT INSPECTED BY
SCOTT WIEBE

Digitally signed by

DAVID DANNER

Apr 29, 2025

OFFICE
AJF

DATE
04/25/2025

DEVELOPED BY
TIA FERONTI

Digitally signed by

TIA L FERONTI

Apr 03, 2025

OFFICE
AJV-A421

DATE
02/24/2025

APPROVED BY
DAVID DANNER

Digitally signed by

DAVID DANNER

Apr 29, 2025

OFFICE
AJV-A421

DATE
07/03/2025

TITLE
MANAGER

REQUIRED EFFECTIVE DATE:

ROUTINE

COORDINATED WITH:

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

OTHER: ZAU ARTCC, AMP ARTCC, AMGR

CHANGES - REASONS:

1. CLEARS NOTAM 4/0351.- UPDATED EVALUATION AND TAKEOFF OBSTACLE NOTES, ADDITIONAL LOW CLOSE-IN OBSTACLES.
2. TAKEOFF MINIMUMS: RWY 9: "300-1 OR STANDARD WITH MINIMUM CLIMB OF 265 FT/NM TO 1200" CHANGED TO "300-1 1/8 OR STANDARD WITH MINIMUM CLIMB OF 355 FT/NM TO 1200"; RWY 27: "STANDARD" CHANGED TO "300-1 OR STANDARD WITH MINIMUM CLIMB OF 450 FT/NM TO 1200".- UPDATED EVALUATION, NEW CONTROLLING OBSTACLES.
3. CONTROLLING OBSTACLES: CHANGED FROM "RWY 9: 1056 FEET MSL TREE 433821.52N/0861818.48W" TO "RWY 9: 1066 FT MSL TREE 433849.89N/0861835.06W (CLIMB GRADIENT) (CLIMB GRADIENT TERMINATION ALTITUDE), 1082 FT MSL TREE 433821.24N/0861804.94W (CEILING) (VISIBILITY). RWY 27: 1070 FT MSL TREE 433816.82N/0862045.86W (CLIMB GRADIENT), 1075 FT MSL TREE 433821.34N/0862052.88W (CEILING), 1070 FT MSL TREE 433813.55N/0862110.87W (VISIBILITY), 1073 FT MSL TREE 433817.36N/0862046.84W (CLIMB GRADIENT TERMINATION ALTITUDE).- UPDATED EVALUATION.

QUALITY
23
CHECKED