

The Nevada Airport Buffer Zone

For Proposed Construction or
Alteration within Six Nautical
Miles of an Airport



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FAA Filing Requirements

The Project Manager of any project within six nautical miles of an Airport must contact the Aviation Section at (775) 888-7464 for assistance in filling out the FAA form 7460-01.

The circles on the airport maps are 6 nautical miles / 6 nautical miles equals 6.8 statute miles.

The filing requirement to notify the FAA prior to construction commencement on certain objects that may affect the navigable airspace is contained in the Federal Aviation Regulations (FAR) Part 77. "Objects Affecting Navigable Airspace." The FARs are part of Title 14 of the Code of Federal Regulation. The filing requirement set forth in FAR Part 77 states failure to file Notice of Construction with the FAA subjects a \$1000.00 per day civil penalty for each day FAR Part 77 filing requirements are violated.

Who Must File?

§ 77.9 - Any person/organization who intends to sponsor any construction or alterations within the 6 nautical mile buffer zone of an airport must notify the Administrator of the FAA.

Standards for Determining Obstructions

NOTICE OF PROPOSED CONSTRUCTION OR ALTERATION

§77.13 Construction or alteration requiring notice.

(a) Except as provided in §77.15, each sponsor who proposes any of the following construction or alteration shall notify the Administrator in the form and manner prescribed in §77.17.

(1) Any construction or alteration of more than 200 feet in height above the ground level at its site.

(2) Any construction or alteration of greater height than imaginary surface extending outward and upward at one of the following slopes:

(i) 1 00 to 1 for horizontal distance of 20,000 feet from the nearest point of the nearest runway of each airport specified in paragraph (a)(5) or this section with at least one runway more than 3,200 feet in actual length, excluding heliports.

(ii) 50 to 1 for horizontal distance of 10,000 feet from the nearest point of the nearest runway of each airport specified in paragraph (a)(5) of this section with its longest runway no more than 3,200 feet in actual length, excluding heliports.

(iii) 25 to 1 for a horizontal distance of 5,000 feet from the nearest point of the nearest landing and takeoff area of each heliport specified in paragraph (a)(5) of this section.

(3) Any highway, railroad, or other traverse way for mobile objects, of a height which, if adjusted upward 17 feet for an Interstate Highway that is part of the National System of Military and Interstate Highways where overcrossings are designed for a minimum of 17 feet vertical distance, 16 feet for any other public roadway, 10 feet or the height of the highest mobile object that would normally traverse the road, whichever is greater, for a private road, 23 feet for a railroad, and for a waterway or any other traverse way not previously mentioned, an amount equal to the height of the highest mobile object that would normally traverse it, would exceed a standard of paragraph (a)(1) or (2) of this section.

(4) When requested by the FAA, any construction or alteration that would be in an instrument approach area

(defined in the FAA standards governing instrument approach procedures) and available information indicates it might exceed a standard of Subpart C of this part.

(5) Any construction or alteration on any of the following airports (including heliports):

(i) An airport that is available for public use and is listed in the Airport Directory of the current Airman's Information Manual or listed below of the supplied maps.

(ii) An airport under construction, that is the subject of a notice or proposal on file with the Federal Aviation Administration, and except for military airports, it is clearly indicated that airport will be available for public use.

(iii) An airport that is operated by an armed force of the United States.

(b) Each sponsor who proposes construction or alteration that is the subject of a notice under paragraph (a) of this section and is advised by an FAA regional office that a supplemental notice is required shall submit that notice on a prescribed form to be received by the FAA regional office at least 48 hours before the start of construction or alteration.

(c) Each sponsor who undertakes construction or alteration that is the subject of a notice under paragraph (a) of this section shall, within 5 days after that construction or alteration reaches its greatest height, submit a supplemental notice on a prescribed form to the FAA regional office having jurisdiction over the region involved, if –

(1) The construction or alteration is more than 200 feet above the surface level of its site; or

(2) An FAA regional office advises him that submission of the form is required. §77.15 Construction or alteration not requiring notice. No person is required to notify the Administrator for any of the following construction or alteration:

(a) Any object that would be shielded by existing structures of a permanent and substantial character or by natural terrain or topographic features of equal or greater height, and would be located in the congested area of a city, town, or settlement where it is evident beyond all reasonable doubt that the structure so shielded will not adversely affect safety in air navigation.

(b) Any antenna structure of 20 feet or less in height except one that would increase the height of another antenna structure.

(c) Any air navigation facility, airport visual approach or landing air, aircraft arresting device, or meteorological device, of a type approved by the Administrator, or an appropriate military service on military airports, the location and height of which is fixed by its functional purpose.

(d) Any construction or alteration for which notice is required by any other FAA regulation. §77.17 Form and time of notice (a) Each person who is required to notify the Administrator under §77.13 (a) shall send one executed form set of FAA Form 7460-1, Notice of Proposed Construction or Alteration, to the Manager, Air Traffic Division, FAA Regional Office having jurisdiction over the area within which the construction or alteration will be located. Copies of FAA Form 7460-1 may be obtained from the headquarters of the Federal Aviation Administration and the regional offices. (b) The notice required under §77.13 (a)(1) through (4) must be submitted at least 45 days before the earlier of the following dates – (1) The date the proposed construction or alteration is to begin. (2) The date an application for a construction permit is to be filed. However, a notice relating to proposed construction or alteration that is subject to the licensing requirements of the Federal Communications Act may be sent to the FAA at the same time the application for construction is filed with the

Federal Communications Commission, or at any time before that filing. (c) A proposed structure or an alteration to an existing structure that exceeds 2,000 feet in height above the ground will be presumed to be a hazard to air navigation and to result in an inefficient utilization of airspace and the applicant has the burden of overcoming that presumption. Each notice submitted under the pertinent provisions of this part 77 proposing a structure in excess of 2,000 feet above ground, or an alteration that will make an existing structure exceed that height, must contain a detailed showing, directed to meeting this burden. Only in exceptional cases, where the FAA concludes that a clear and compelling showing has been made that it would not result in an inefficient utilization of the airspace and would not result in a hazard to air navigation, will a determination of no hazard be issued. (d) In the case of an emergency involving essential public services, public health, or public safety that required immediate construction or alteration, the 30 day requirement in paragraph (b) of this section does not apply and the notice may be sent by telephone, telegraph, or other expeditious means, with an executed FAA Form 7460-1 submitted within five (5) days thereafter. Outside normal business hours, emergency notices by telephone or telegraph may be submitted to the nearest FAA Flight Service Station. (e) Each person who is required to notify the Administrator by paragraph (b) or (c) of §77.13, or

both shall send an executed copy of FAA Form 7460-2, Notice of Actual Construction or Alteration, to the Manager, Air Traffic Division, FAA Regional Office having jurisdiction over the area involved.

Part 77.23 Standards for determining obstructions

An object constitutes an obstruction to navigation if:

- If 200 ft. above ground level or 200 ft. above the airport elevation (whichever is greater) up to 3 miles (for runway lengths > 3200 ft.) from the airport.
 - Increase 100 ft. every mile up to 500 ft. at 6 miles from the ARP (airport reference point)
- If 500 ft. or more above ground level at the object site
- If penetrates an imaginary surface (a function of the precision of the runway)
- If penetrates the terminal obstacle clearance area (includes initial approach segment)

(a) An existing object, including a mobile object, is, and a future object would be, an obstruction to air navigation if it is of greater height than any of the following heights or surfaces:

(1) A height of 500 feet above ground level at the site of the object.

(2) A height that is 200 feet above ground level or above the established airport elevation, whichever is higher, within 3 nautical miles of the established reference point of an airport, excluding heliports, with its longest runway more than 3,200 feet in actual length, and that height increases in the proportion of 100 feet for each additional nautical mile of distance from the airport up to a maximum of 500 feet.

(3) A height within a terminal obstacle clearance area, including an initial approach segment, a departure area, and a circling approach area, which would result in the vertical distance between any point on the object and an established minimum instrument flight altitude within that area or segment to be less than the required obstacle clearance.

(4) A height within an en route obstacle clearance area, including turn and termination areas, of a Federal airway or approved off-airway route, that would increase the minimum obstacle clearance altitude.

(5) The surface of a takeoff and landing area of an airport or any imaginary surface established under § 77.25, § 77.28, or § 77.29. However, no part of the take-off or landing area itself will be considered an obstruction.

(b) Except for traverse ways on or near an airport with an operative ground traffic control service, furnished by an air traffic control tower or by the airport management and coordinated with the air traffic control service, the standards of paragraph (a) of this section apply to traverse

ways used or to be used for the passage of mobile objects only after the heights of these traverse ways are increased by:

- (1) Seventeen feet for an Interstate Highway that is part of the National System of Military and Interstate Highways where overcrossings are designed for a minimum of 17 feet vertical distance.
- (2) Fifteen feet for any other public roadway.
- (3) Ten feet or the height of the highest mobile object that would normally traverse the road, whichever is greater, for a private road.
- (4) Twenty-three feet for a railroad, and,
- (5) For a waterway or any other traverse way not previously mentioned, an amount equal to the height of the highest mobile object that would normally traverse it.

Persons failing to comply with the provisions of FAR Part 77 are subject to Civil Penalty under Section 902 of the Federal Aviation Act of 1958, as amended and pursuant to 49 U.S.C. Section 46301(a).

Form of Notification:

§ 77.7 - Individuals/Organizations proposing construction or alterations must submit FAA form SF 7460-1, "Notice of Proposed Construction or Alteration" at least **45 days** prior to the start of the proposed construction or alteration. Pertinent information about the alteration and appropriate

attachments showing the type and location of the alteration must also be submitted.

Supplemental information needed for the FAA review include the following items:

- Drawing (preferably scaled) showing location of the object in relation to nearest active runways. This may be a marked up-Airport Layout Plan or Terminal Area sheet.
- Perpendicular distance of the proposed object to the nearest active runway centerlines.
- Distance along centerline (actual or extended) from runway end to the perpendicular intercept point
- Ground Elevation at the site of the proposed object
- Height of the proposed object including antennas or other appurtenances
- Accurate geodetic coordinates conforming to North American Datum (NAD) 83
- Sketches, drawings, etc. showing the type of construction or alteration being proposed

On and Off-Airport Proposals:

For Airport proposals within the FAA Western Pacific Region, the sponsor should e-file the required information at <http://oeaaa.faa.gov>.

Subpart C - Obstruction Standards

§77.23(a)(2) - An object would be an obstruction to air navigation if of greater height than 200 feet above ground at the site, or above the established airport elevation, whichever is higher -

(a) within 3 NM of the established reference point of an airport with its longest runway more than 3,200 feet in actual length, and

(b) that height increases in proportion of 100 feet for each additional nautical mile from the airport reference point up to a maximum of 500 feet.

Note: Heliports excluded.

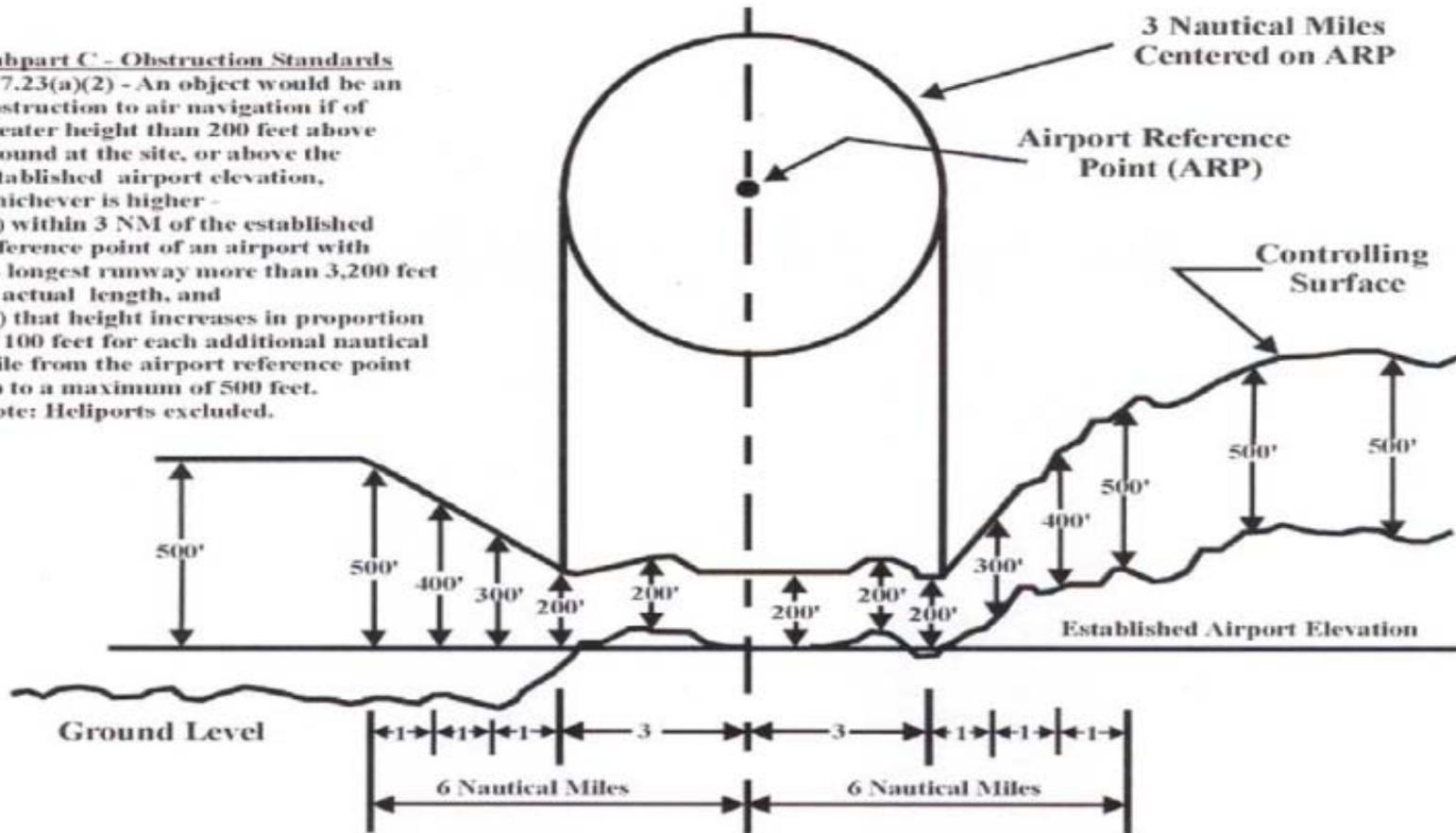


Figure 1, - Part 77 Obstruction Standards/ Near Airports

Index

Interstates

I-15	I-80	I-215	I-515	I-580
Henderson Executive Jean McCarran International Mesquite North Las Vegas	Battle Mountain Derby Field Elko Reno-Tahoe International Tiger Field Wells Municipal Winnemucca Municipal	Henderson Executive McCarran International	Boulder City McCarran International North Las Vegas	Reno-Tahoe International

US and Alternate US Routes

US 6	US 50	Alt US 50	US 93	US 95	US 95 cont'd	Alt US 95	US 395
Currant Ely/Yelland Tonopah	Austin Carson City Dayton Ely/Yelland Eureka Fallon Municipal Parker Carson Silver Springs	Silver Springs Tiger Field	Alamo Boulder City Ely/Yelland Jackpot/Hayden Field Lincoln County McCarran International North Las Vegas Wells Municipal	Beatty Boulder City Derby Field Fallon Municipal Hawthorne Kidwell Lida Junction McCarran Int'l	Mina North Las Vegas Searchlight Winnemucca Municipal	Silver Springs Tiger Field Yerington	Carson City Minden-Tahoe Parker Carson Reno/Stead Reno-Tahoe Int'l

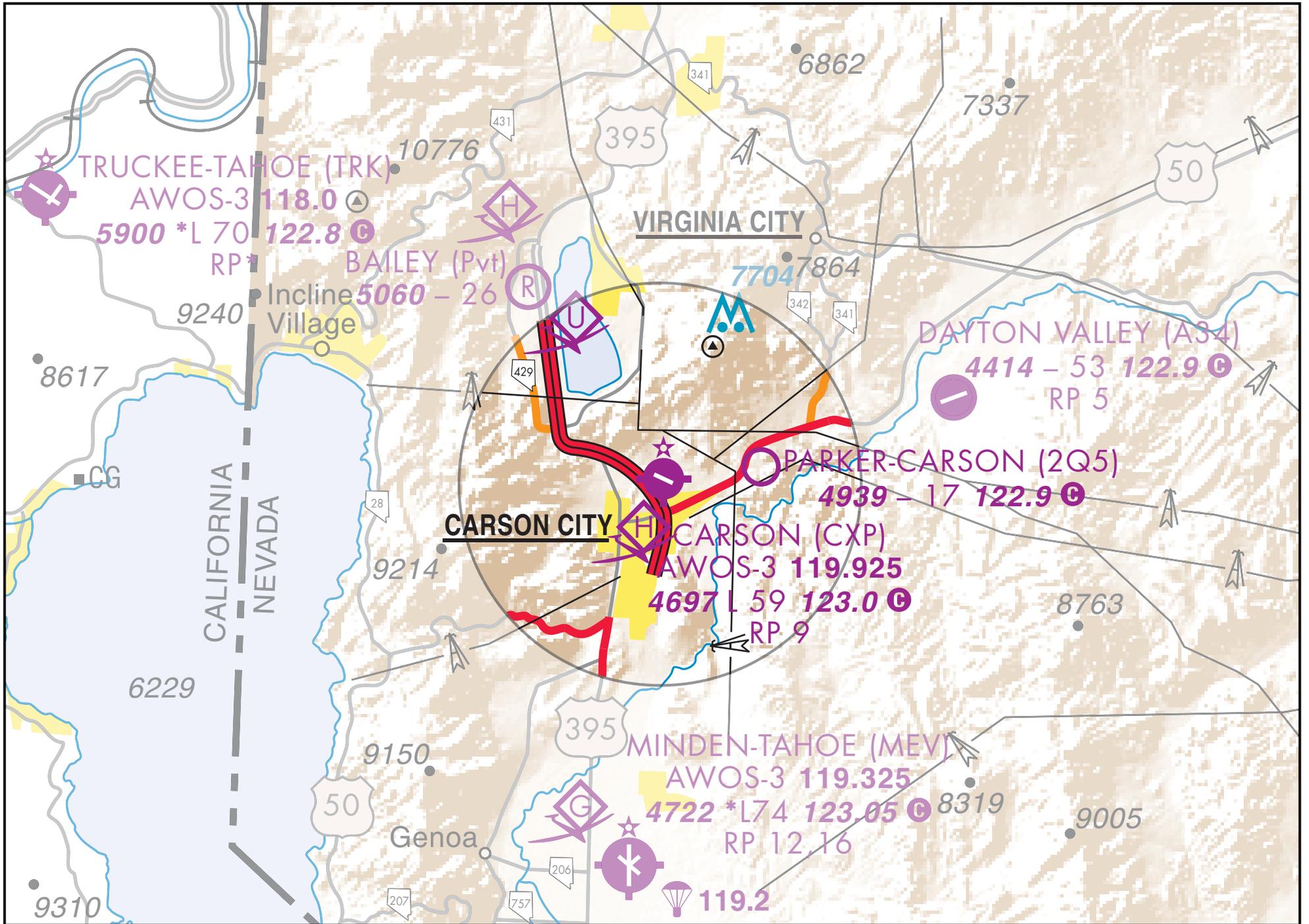
State Routes

SR 88 Minden-Tahoe SR 115 Fallon Municipal SR 116 Fallon Municipal SR 117 Fallon Municipal SR 118 Fallon Municipal SR 119 Fallon Municipal SR 120 Fallon Municipal SR 140 Denio Junction SR 146 Henderson Executive, McCarran International SR 147 North Las Vegas SR 159 McCarran International, North Las Vegas	SR 160 Henderson Executive, McCarran Int'l SR 161 Jean SR 164 Searchlight SR 169 Perkins SR 170 Mesquite SR 171 Henderson Exec, McCarran Int'l SR 172 Boulder City SR 206 Minden-Tahoe SR 207 Minden-Tahoe SR 208 Rosachi, Yerington SR 223 Wells Municipal	SR 225 Elko, Owyhee, Stevens-Crosby SR 227 Elko SR 228 Elko SR 231 Wells Municipal SR 232 Wells Municipal SR 264 Dyer SR 266 Lida Junction SR 278 Eureka SR 289 Winnemucca SR 292 Denio Junction SR 294 Winnemucca Municipal
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State Routes Continued

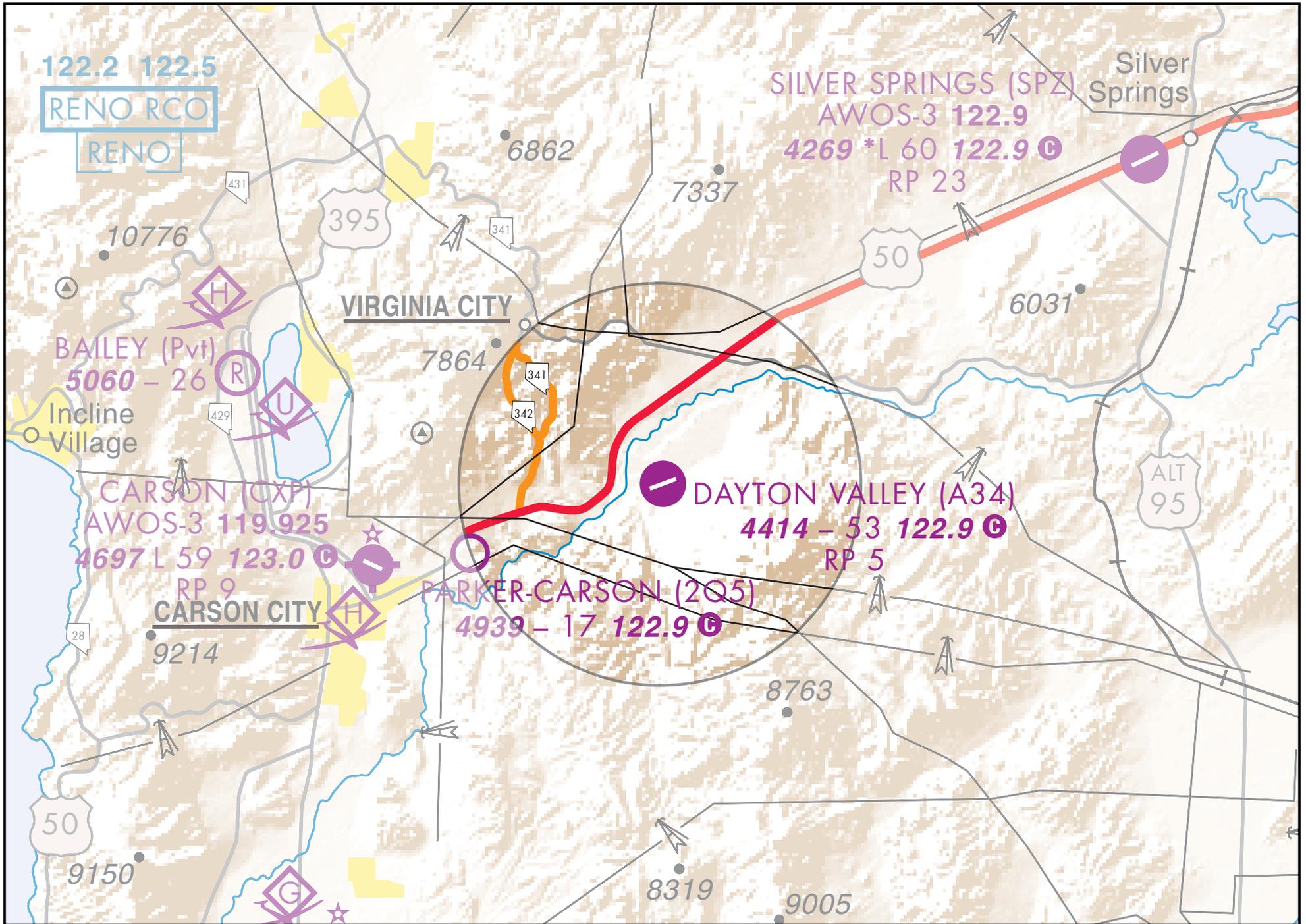
SR 304 Battle Mountain
SR 305 Austin, Battle Mountain
SR 306 Crescent Valley
SR 319 Lincoln County
SR 320 Lincoln County
SR 338 Rosachi
SR 339 Yerington
SR 340 Yerington
SR 341 Carson City, Dayton, Parker Carson, Reno-Tahoe Int'l
SR 342 Dayton, Parker Carson
SR 359 Hawthorne
SR 361 Gabbs
SR 362 Hawthorne
SR 374 Beatty
SR 376 Hadley, Kingston, Tonopah
SR 379 Curren, Duckwater
SR 397 Derby Field
SR 426 Reno-Tahoe International
SR 427 Tiger Field
SR 429 Carson City
SR 430 Reno/Stead, Reno-Tahoe International
SR 431 Reno-Tahoe International
SR 443 Reno/Stead, Reno-Tahoe Int'l, Spanish Springs
SR 445 Reno-Tahoe Int'l, Spanish Springs
SR 447 Empire, Tiger Field
SR 490 Ely/Yelland
SR 518 Carson City
SR 525 Carson City, Parker Carson
SR 529 Carson City, Parker Carson
SR 531 Carson City, Parker Carson
SR 535 Elko
SR 562 Henderson Executive, McCarran International
SR 573 North Las Vegas
SR 574 North Las Vegas
SR 578 North Las Vegas
SR 579 McCarran International, North Las Vegas
SR 582 Boulder City, McCarran Int'l, North Las Vegas
SR 589 McCarran Int'l, North Las Vegas
SR 592 McCarran Int'l, North Las Vegas
SR 593 McCarran International
SR 594 McCarran International
SR 595 McCarran Int'l, North Las Vegas
SR 596 McCarran Int'l, North Las Vegas
SR 599 McCarran Int'l, North Las Vegas
SR 602 McCarran Int'l, North Las Vegas
SR 604 McCarran Int'l, North Las Vegas
SR 610 North Las Vegas
SR 612 McCarran International
SR 647 Reno-Tahoe International
SR 648 Reno-Tahoe International
SR 653 Reno-Tahoe International
SR 659 Reno-Tahoe International
SR 667 Reno-Tahoe International
SR 668 Reno-Tahoe International
SR 671 Reno-Tahoe International
SR 673 Reno/Stead
SR 705 Carson City
SR 715 Fallon Municipal
SR 720 Fallon Municipal
SR 722 Austin
SR 723 Fallon Municipal
SR 726 Fallon Municipal
SR 756 Minden-Tahoe
SR 757 Minden-Tahoe
SR 759 Minden-Tahoe
SR 774 Lida Junction
SR 780 Eureka
SR 787 Winnemucca Municipal
SR 796 Winnemucca Municipal
SR 806 Battle Mountain
SR 816 Lincoln County
SR 822 Dayton, Parker Carson
SR 823 Rosachi
SR 824 Rosachi
SR 825 Rosachi
SR 827 Yerington
SR 828 Tiger Field
SR 829 Rosachi
SR 844 Gabbs
SR 860 Derby Field
SR 877 Carson City
SR 880 Reno-Tahoe International

Carson City



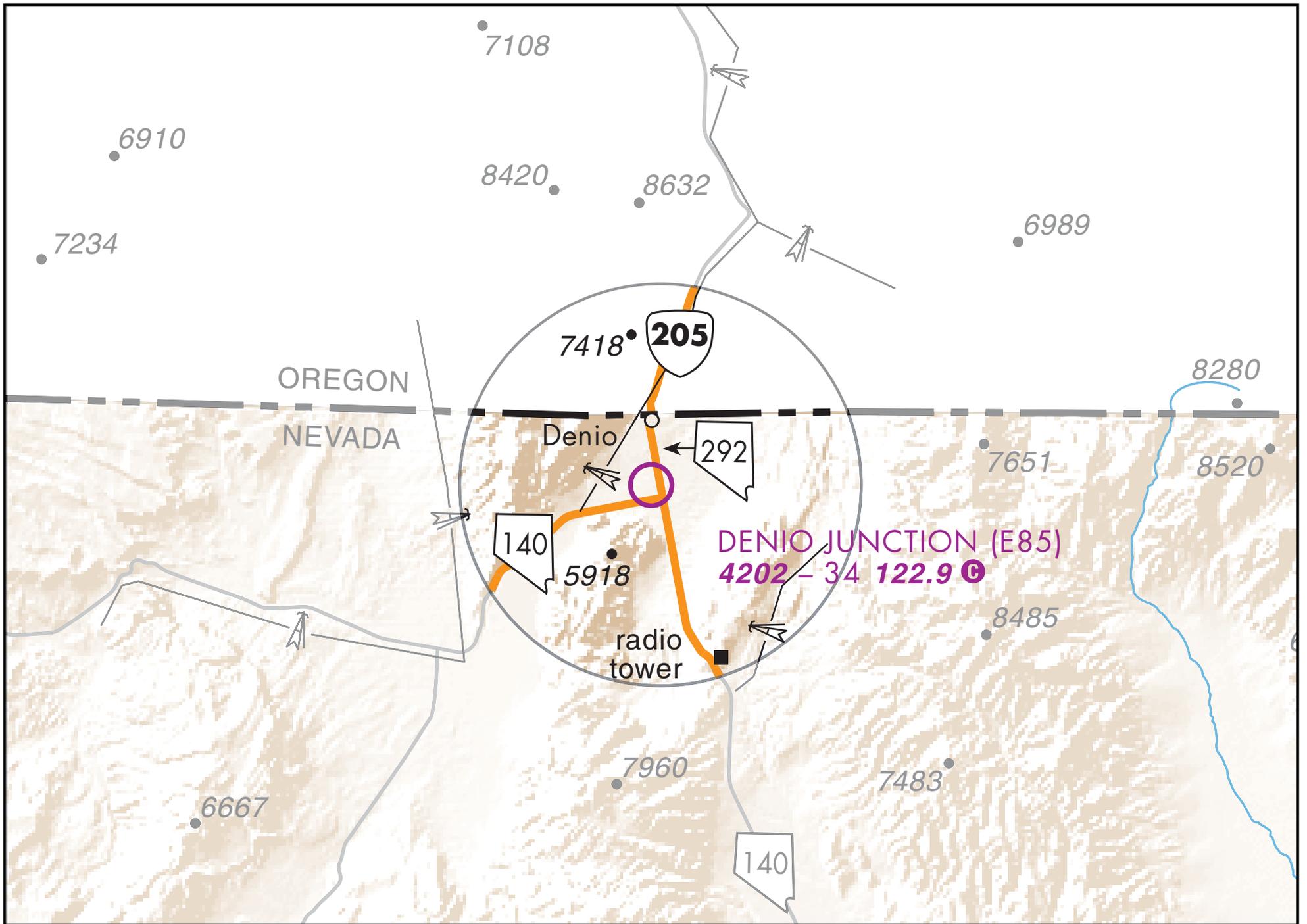
Carson City

Dayton



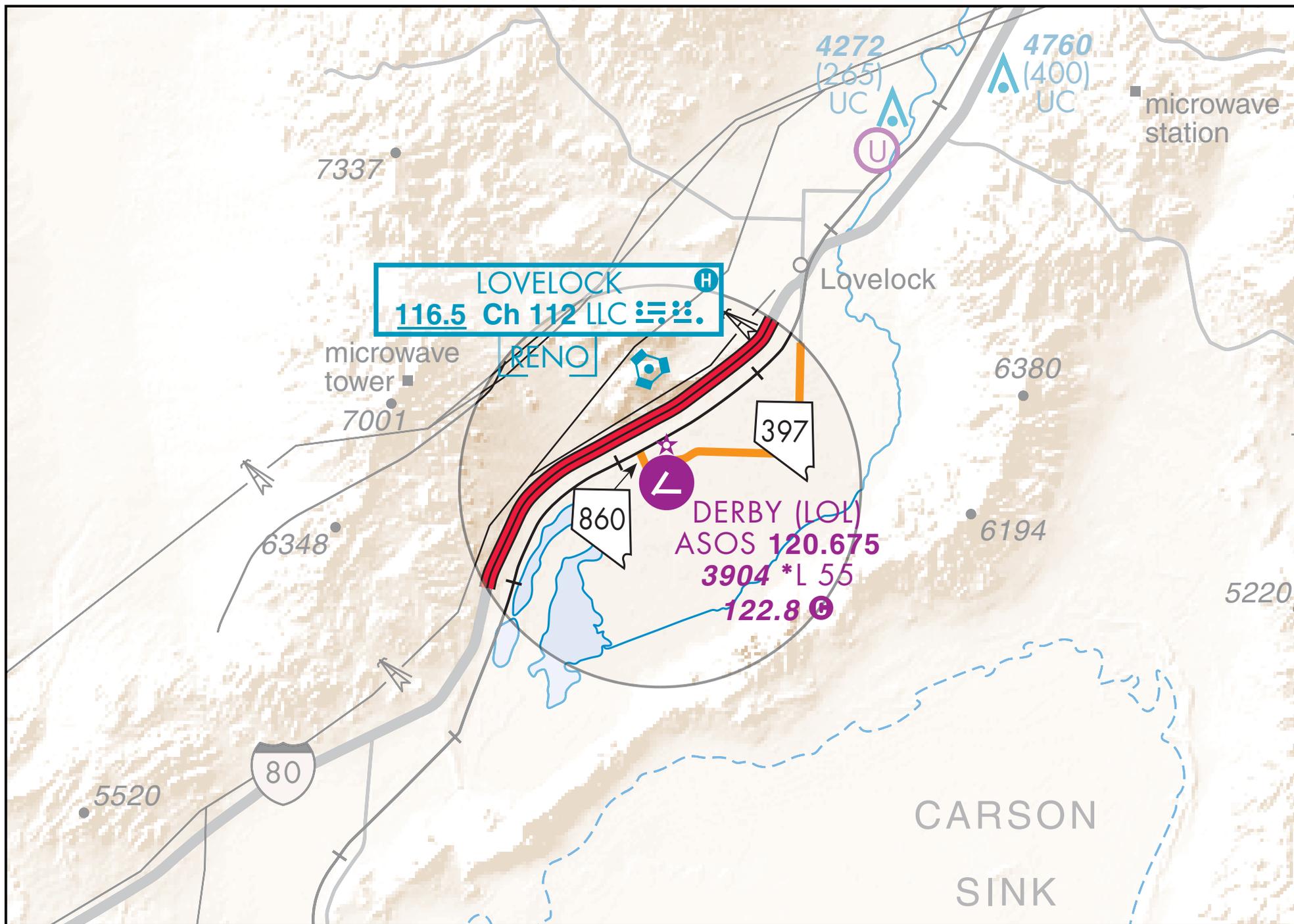
Dayton

Denio Junction



Denio Junction

Derby Field, Lovelock



Derby Field, Lovelock

Empire

GRANITE PK

9000

(Pvt)
BLACK ROCK
CITY AIRPORT

5650

6130



DESERT

6526

3859

Gerlach

7115

CREEK



Empire

EMPIRE (1A8)
3990 - 38 122.9
RP 7, 18

5809

6988

SMOKE

6849

7420

PAH RUM
PEAK

radio
tower



KUMIVA
PEAK

7608

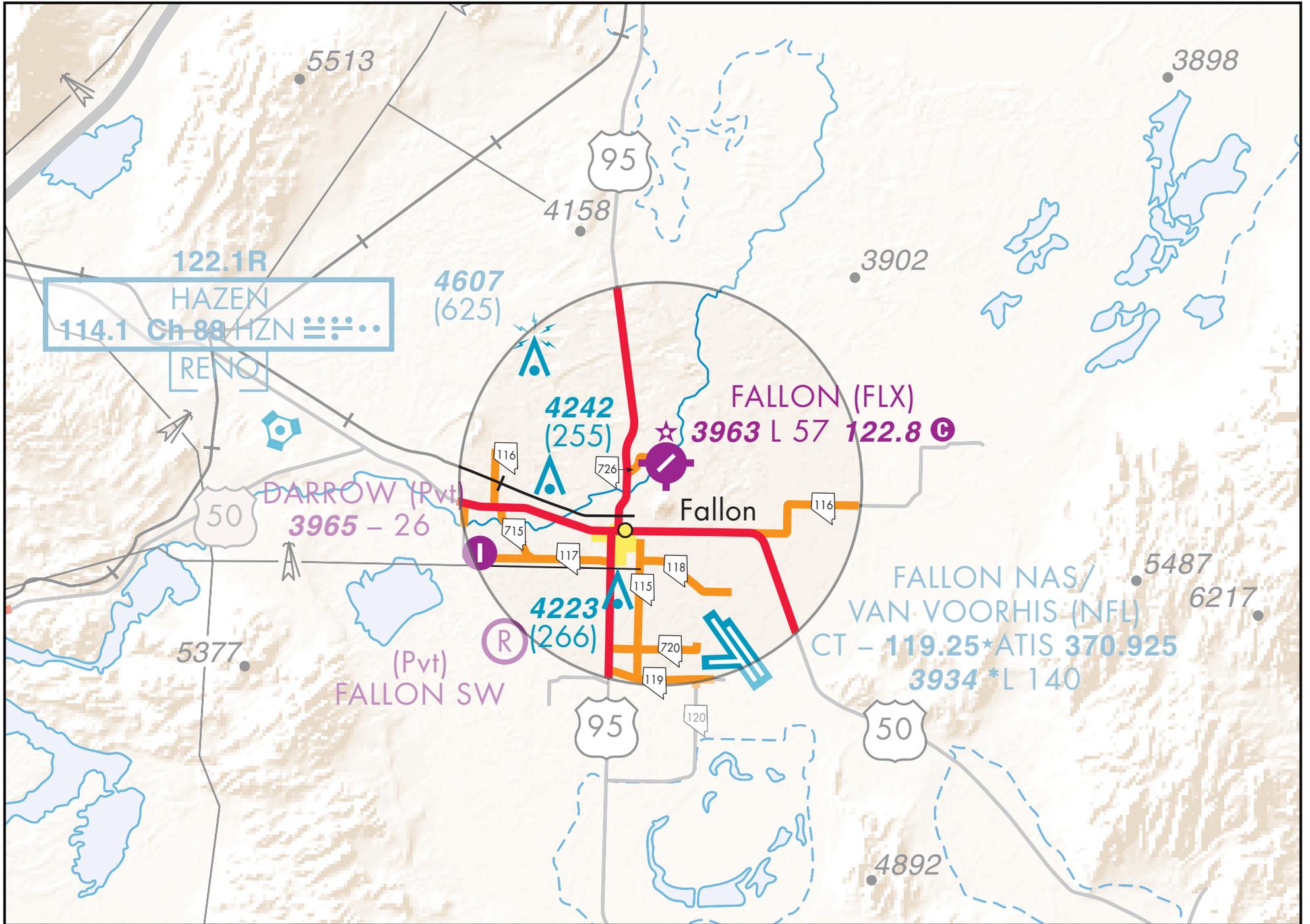
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8237

6617

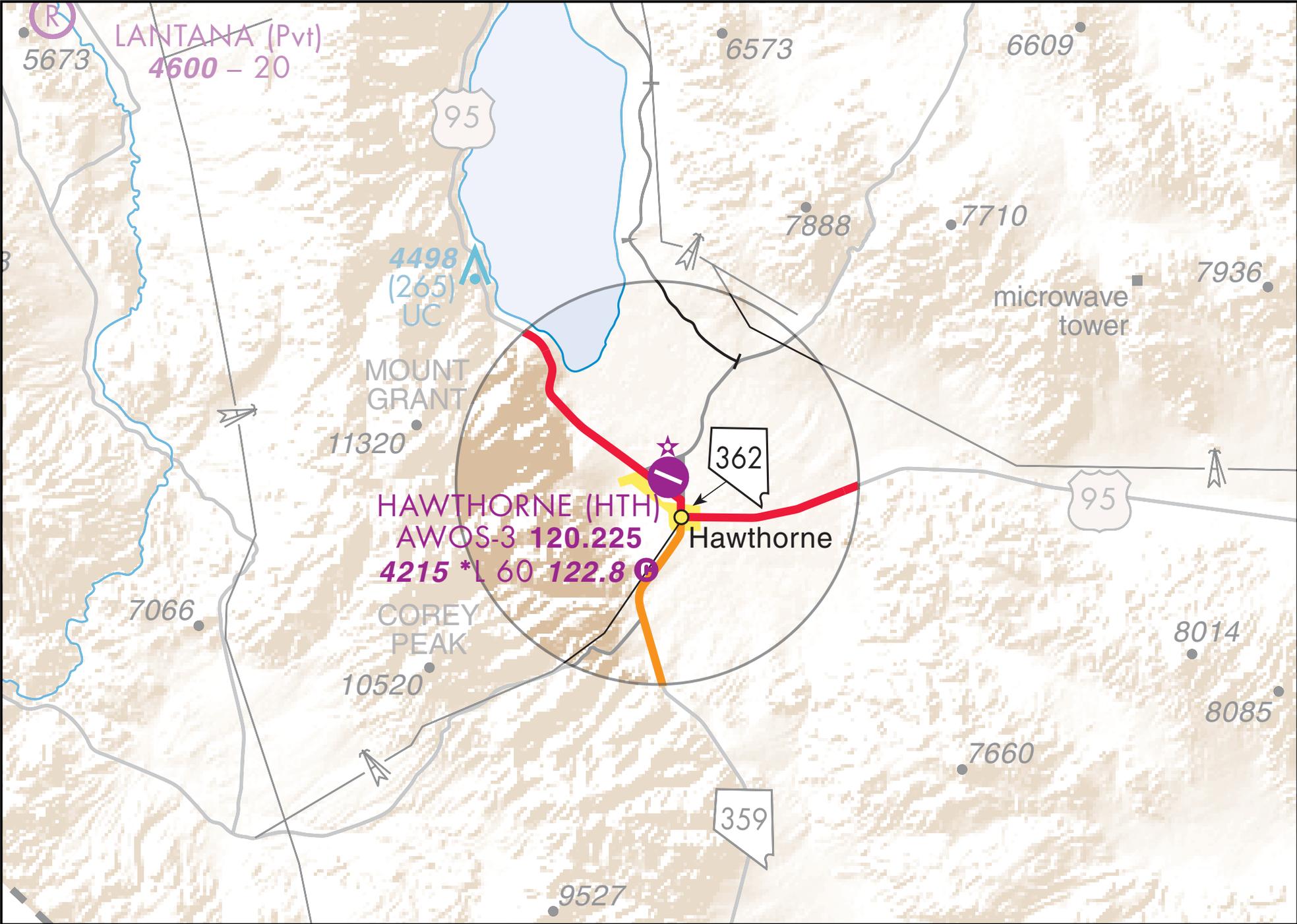
Empire

Fallon Municipal



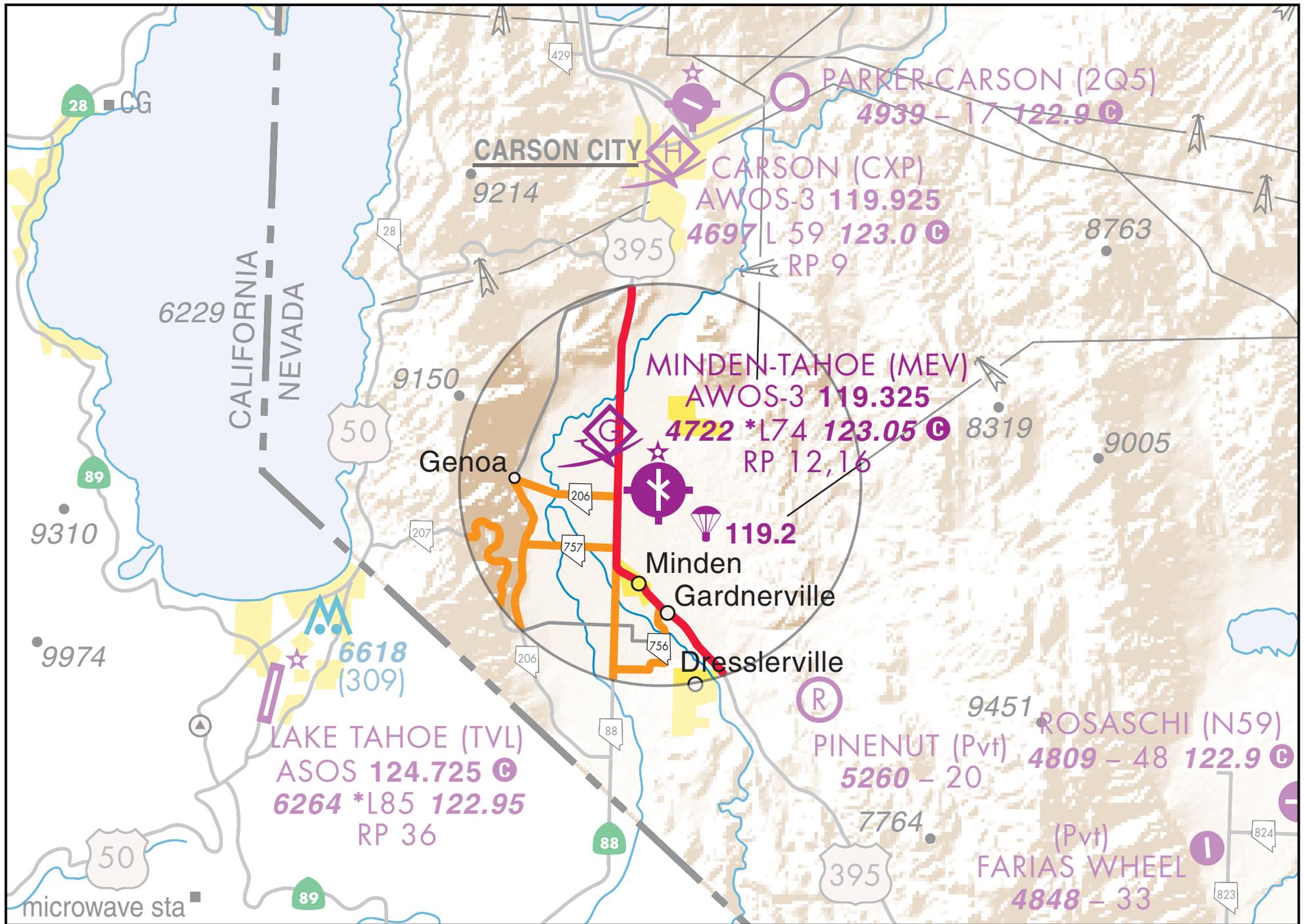
Fallon Municipal

Hawthorne



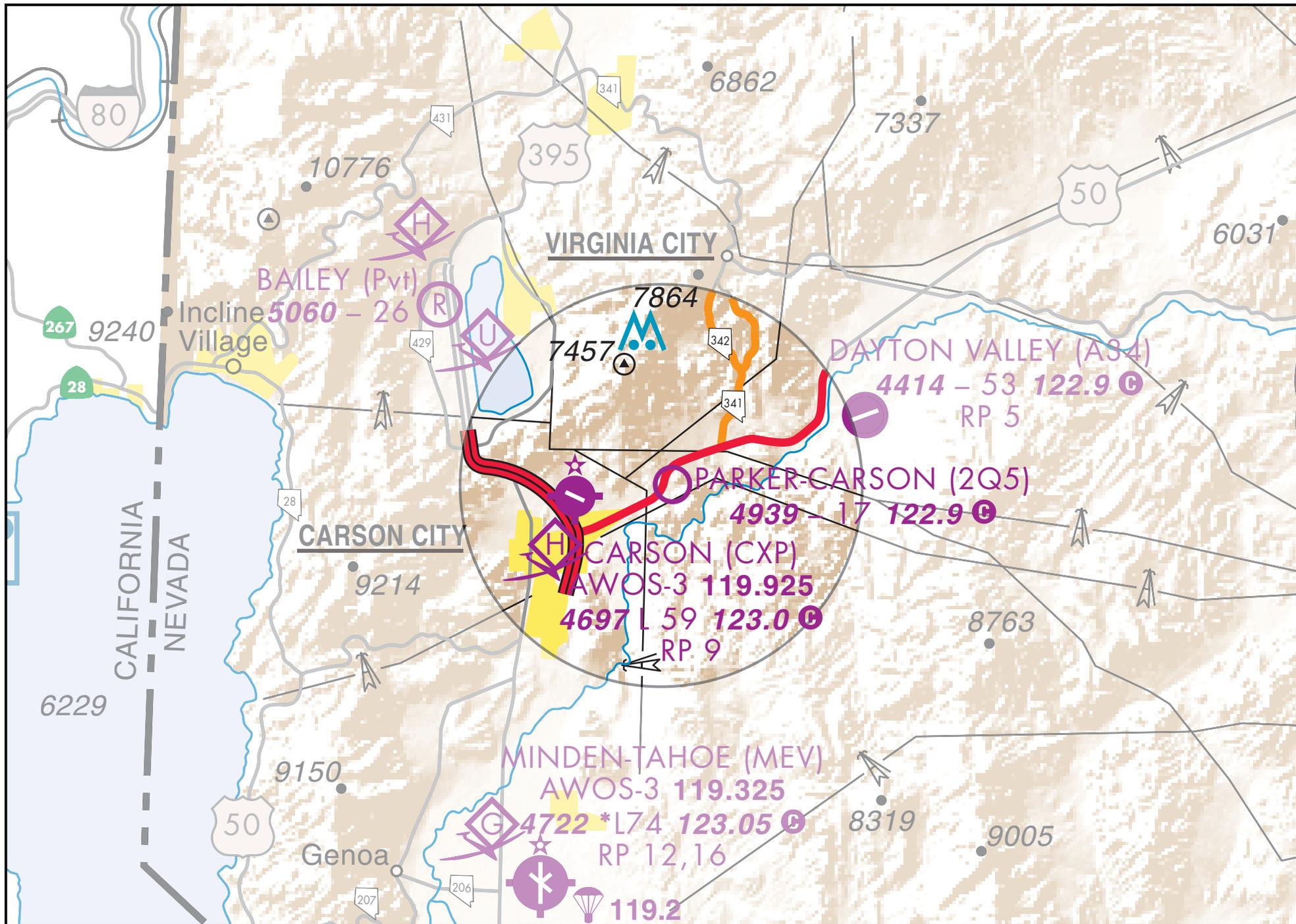
Hawthorne

Minden-Tahoe



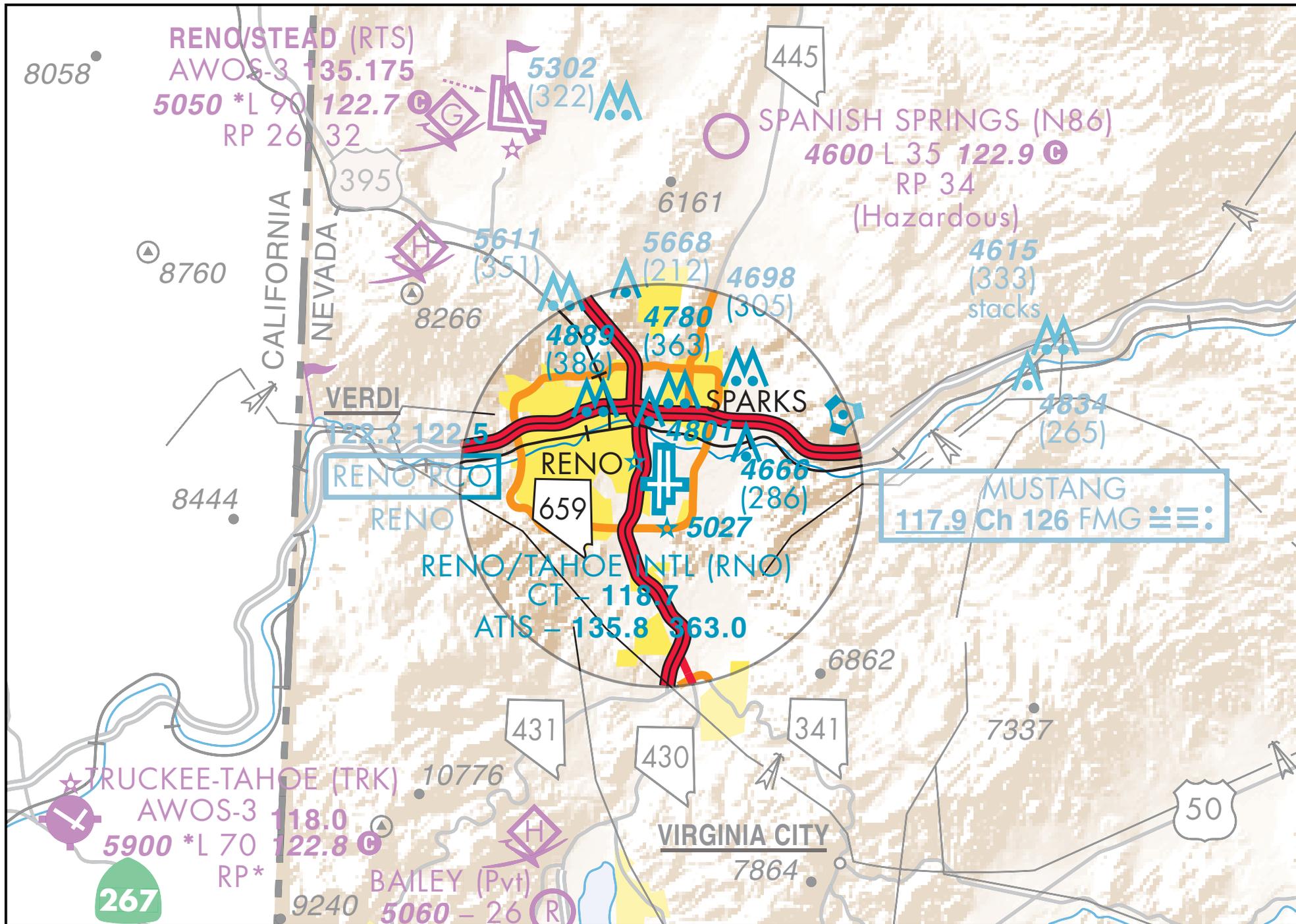
Minden-Tahoe

Parker Carson Stolport



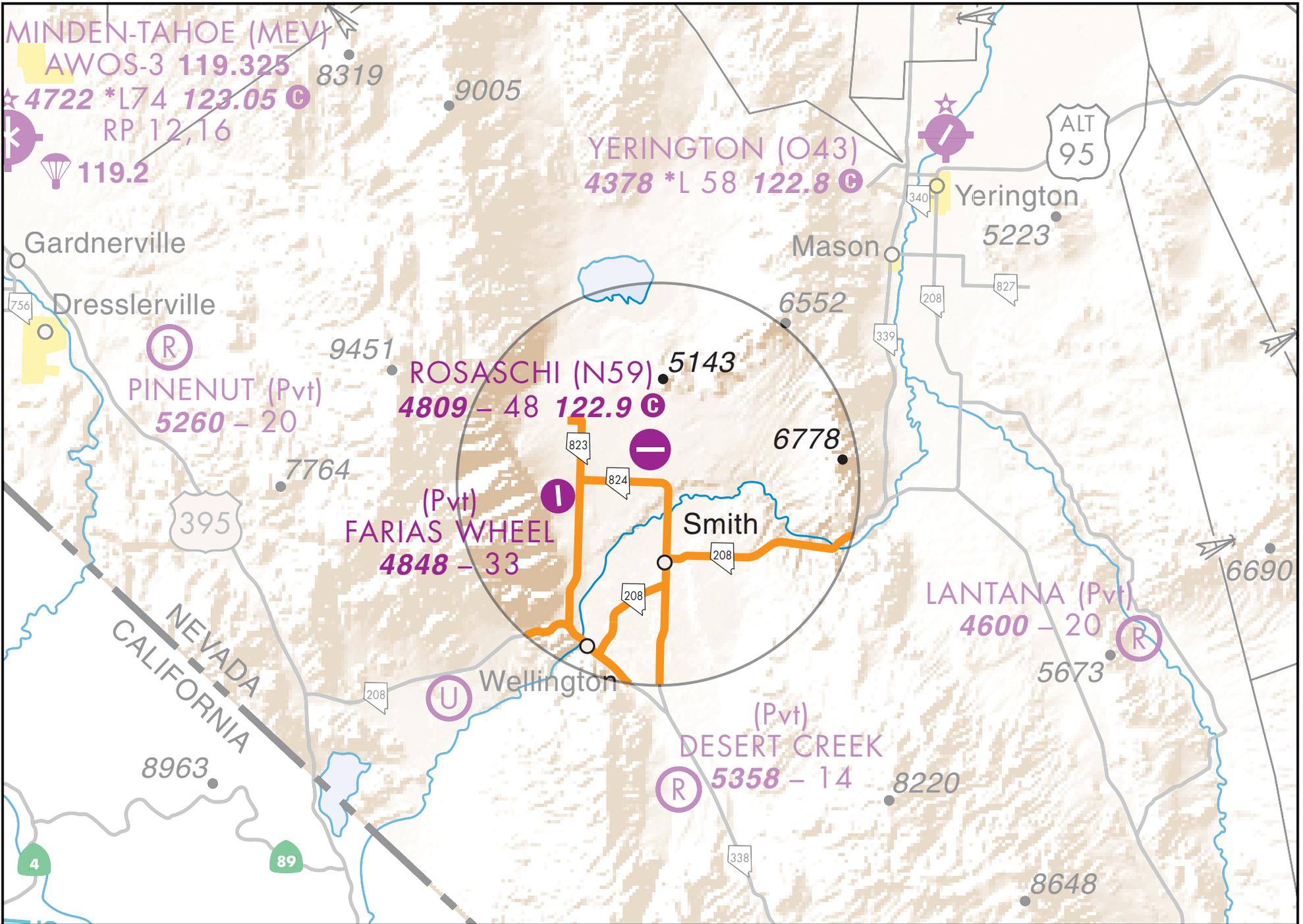
Parker Carson Stolport

Reno-Tahoe International



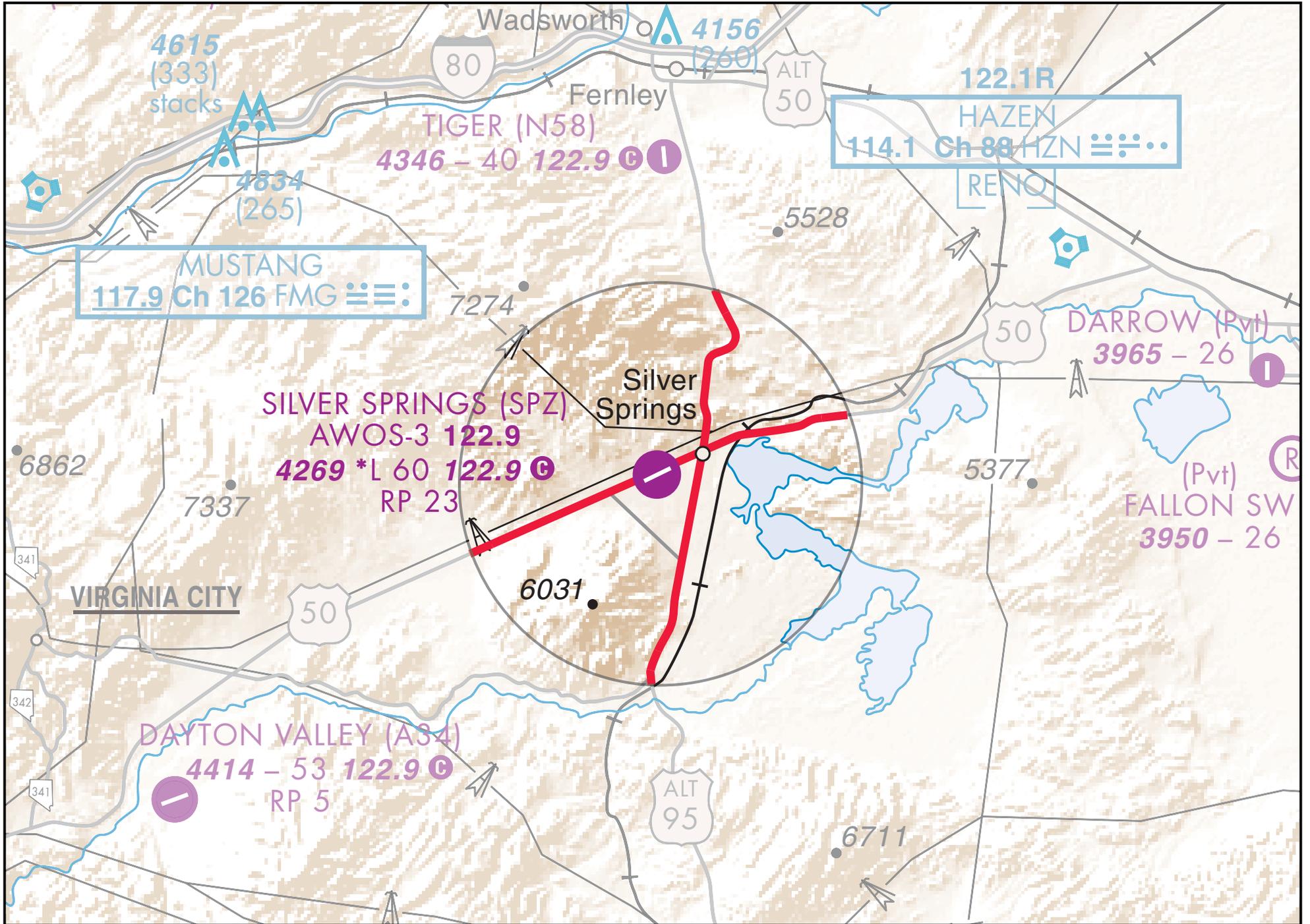
Reno-Tahoe International

Rosachi Airpark, Smith



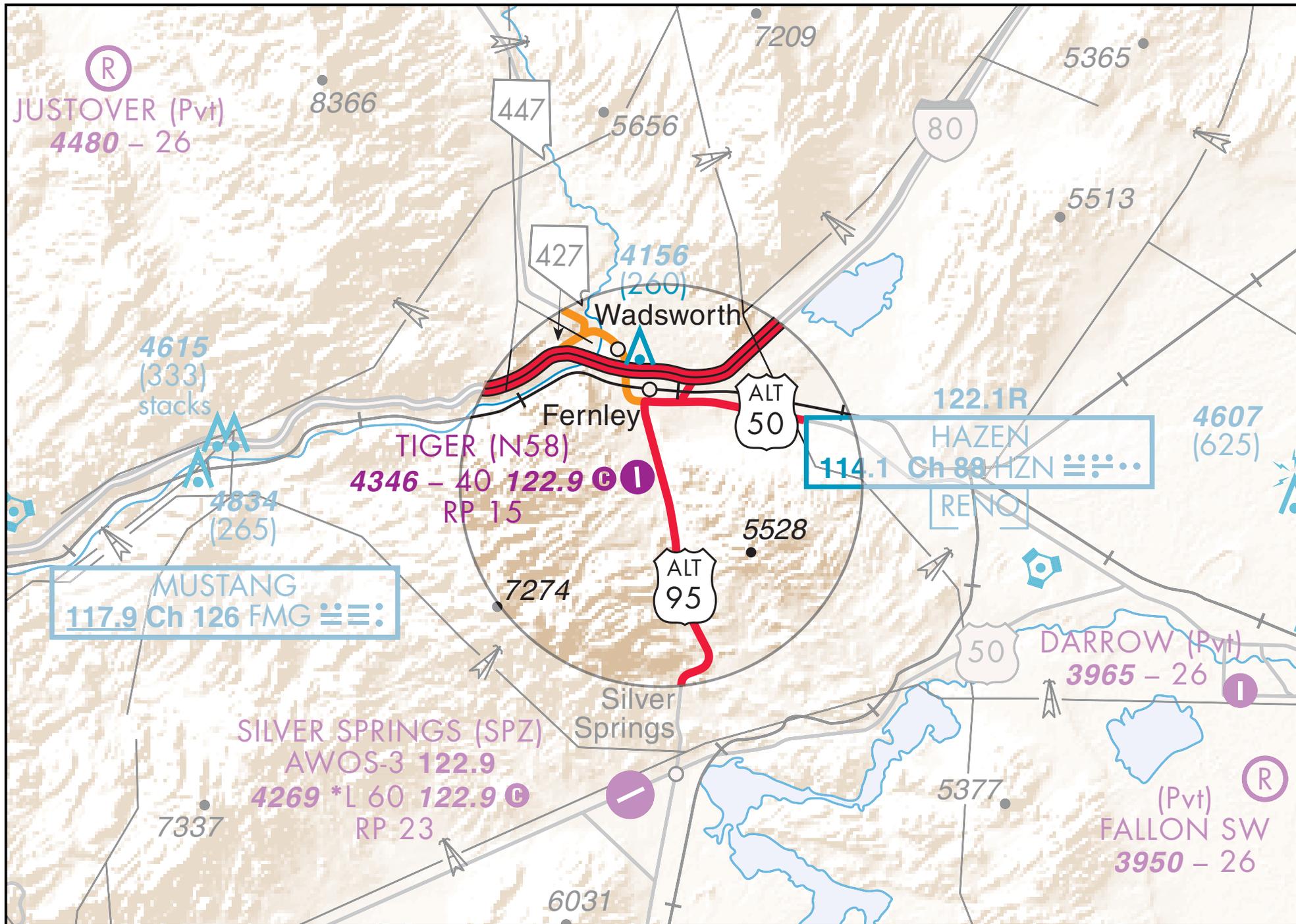
Rosachi Airpark, Smith

Silver Springs



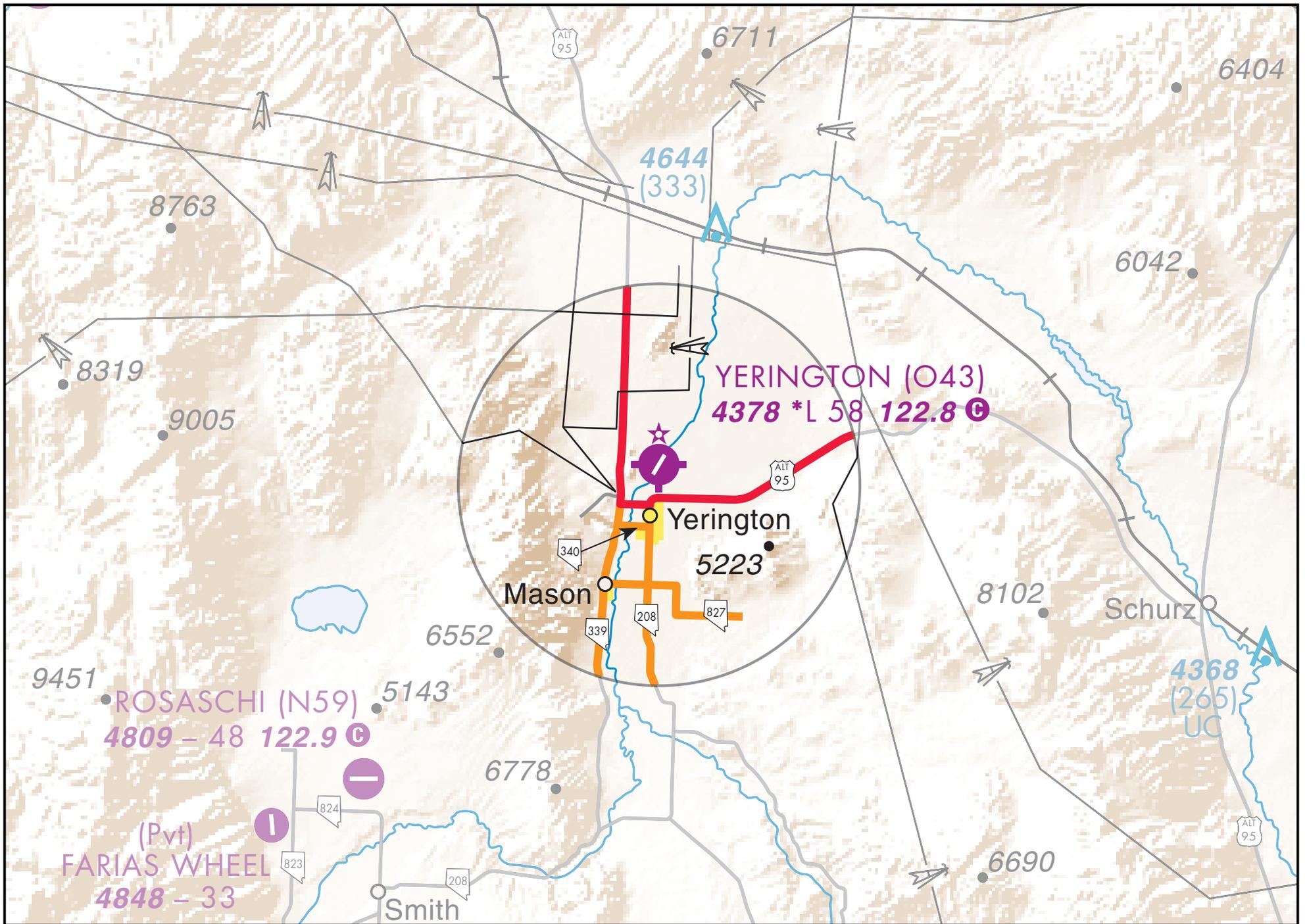
Silver Springs

Tiger Field, Fernley



Tiger Field, Fernley

Yerington Municipal



Yerington Municipal

INSTRUCTIONS FOR COMPLETING FAA FORM 7460-1

PLEASE TYPE or PRINT

ITEM #1. Please include the name, address and phone number of a personal contact point as well as the company name.

ITEM #2. Please include the name, address and phone number of a personal contact point as well as the company name.

ITEM #3. New Construction would be a structure that has not yet been built.

Alteration is a change to an existing structure such as the addition of a side mounted antenna, a change to the marking and lighting, a change to power and/or frequency, or a change to the height. The nature of the alteration shall be included in **ITEM #21** "Complete Description of Proposal".

Existing would be a correction to the latitude and/or longitude, a correction to the height, or if filing on an existing structure which has never been studied by the FAA. The reason for the notice shall be included in **ITEM #21** "Complete Description of Proposal".

ITEM #4. If Permanent, so indicate. If Temporary, such as a crane or drilling derrick, enter the estimated length of time the temporary structure will be up.

ITEM #5. Enter the date that construction is expected to start and the date that construction should be completed.

ITEM #6. Please indicate the type of structure. **DO NOT LEAVE BLANK.**

ITEM #7. In the event that obstruction marking and lighting is required, please indicate type desired. If no preference, check "other" and indicate "no preference" **DO NOT LEAVE BLANK.** **NOTE:** High Intensity lighting shall be used only for structures over 500' AGL. In the absence of high intensity lighting for structures over 500' AGL, marking is also required.

ITEM #8. If this is an existing tower that has been registered with the FCC, enter the FCC Antenna Structure Registration number here.

ITEM #9 and #10. Latitude and longitude must be geographic coordinates, accurate to within the nearest second or to the nearest hundredth of a second if known. Latitude and longitude derived solely from a **hand-held GPS instrument is NOT acceptable.** A hand-held GPS is only accurate to within 100 meters (328 feet) 95 percent of the time. This data, when plotted, should match the site depiction submitted under **ITEM #20.**

ITEM #11. NAD 83 is preferred; however, latitude and longitude may be submitted in NAD 27. Also, in some geographic areas where NAD 27 and NAD 83 are not available other datums may be used. It is important to know which datum is used. **DO NOT LEAVE BLANK.**

ITEM #12. Enter the name of the nearest city and state to the site. If the structure is or will be in a city, enter the name of that city and state.

ITEM #13. Enter the **full** name of the nearest public-use (*not private-use*) airport or heliport or military airport or heliport to the site.

ITEM #14. Enter the distance **from** the airport or heliport listed in **#13 to the structure.**

ITEM #15. Enter the direction **from** the airport or heliport listed in **#13 to the structure.**

ITEM #16. Enter the site elevation above mean sea level and expressed in whole feet rounded to the nearest foot (e.g. 17'3" rounds to 17', 17'6" rounds to 18'). This data should match the ground contour elevations for site depiction submitted under **ITEM #20.**

ITEM #17. Enter the total structure height **above ground level in whole feet rounded to the next highest foot** (e.g. 17'3" rounds to 18'). **The total structure height shall include anything mounted on top of the structure, such as antennas, obstruction lights, lightning rods, etc.**

ITEM #18. Enter the overall height above mean sea level and expressed in **whole feet.** This will be the total of **ITEM #16 + ITEM #17.**

ITEM #19. If an FAA aeronautical study was previously conducted, enter the previous study number.

ITEM #20. Enter the relationship of the structure to roads, airports, prominent terrain, existing structures, etc. Attach an 8-1/2" x 11" non-reduced copy of the appropriate 7.5 minute U.S. Geological Survey (USGS) Quadrangle Map **MARKED WITH A PRECISE INDICATION OF THE SITE LOCATION.** To obtain maps, contact USGS at 1-800-435-7627 or via internet at "<http://mapping.usgs.gov>". If available, attach a copy of a documented site survey with the surveyor's certification stating the amount of vertical and horizontal accuracy in feet.

ITEM #21.

- For transmitting stations, include maximum effective radiated power (*ERP*) and all frequencies.
- For antennas, include the type of antenna and center of radiation (*Attach the antenna pattern, if available*).
- For microwave, include azimuth relative to true north.
- For overhead wires or transmission lines, include size and configuration of wires and their supporting structures (*Attach depiction*).
- For **each** pole/support, include coordinates, site elevation, and structure height above ground level or water.
- For buildings, include site orientation, coordinates of **each** corner, dimensions, and construction materials.
- For alterations, explain the alteration thoroughly.
- For existing structures, thoroughly explain the reason for notifying the FAA (*e.g. corrections, no record or previous study, etc.*).

Filing this information with the FAA does not relieve the sponsor of this construction or alteration from complying with any other federal, state or local rules or regulations. If you are not sure what other rules or regulations apply to your proposal, contact local/state aviation and zoning authorities.

Paperwork Reduction Work Act Statement: This information is collected to evaluate the effect of proposed construction or alteration on air navigation and is not confidential. Providing this information is mandatory for anyone proposing construction or alteration that meets or exceeds the criteria contained in 14 CFR, part 77. We estimate that the burden of this collection is an average 19 minutes per response. An agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a currently valid OMB control number. The OMB control number for this collection is 2120-0001. Comments concerning the accuracy of this burden and suggestions for reducing the burden should be directed to the FAA at: 800 Independence Ave. SW, Washington, DC 20591, Attn: Information Collection Clearance Officer, ABA-20

