Federal Communications Commission

§ 87.527 Audio visual warning systems. An audio visual warning system (AVWS) is a radar-based obstacle avoidance system. AVWS activates obstruction lighting and transmits VHF audible warnings to alert pilots of potential collisions with land-based obstructions. The AVWS operations are limited to locations where natural and man-made obstructions exist. The continuously operating radar calculates the location, direction and groundspeed of nearby aircraft that enter one of two warning zones reasonably established by the licensee. As aircraft enter the first warning zone, the AVWS activates obstruction lighting. If the aircraft continues toward the obstacle and enters the second warning zone, the VHF radio transmits an audible warning describing the obstacle.

(a) Radiodetermination (radar) frequencies. Frequencies authorized under §87.475(b)(8) of this chapter are available for use by an AVWS. The frequency coordination requirements in §87.475(a) of this chapter apply.

(b) VHF audible warning frequencies. Frequencies authorized under §87.187(j), §87.217(a), §87.241(b), and §87.323(b) (excluding 121.950 MHz) of this chapter are available for use by an AVWS. Multiple frequencies may be authorized for an individual station, depending on need and the use of frequencies assigned in the vicinity of a proposed AVWS facility. Use of these frequencies is subject to the following limitations:

(1) The output power shall not exceed −3 dBm watts for each frequency authorized.

(2) The antenna used in transmitting the audible warnings must be omnidirectional with a maximum gain equal to or lower than a half-wave centerfed dipole above 30 degrees elevation, and a maximum gain of +5 dBi from horizontal up to 30 degrees elevation.

(3) The audible warning shall not exceed two seconds in duration. No more than six audible warnings may be transmitted in a single transmit cycle, which shall not exceed 12 seconds in duration. An interval of at least twenty seconds must occur between transmit cycles.

[78 FR 61207, Oct. 3, 2013]

Subpart R [Reserved]

Subpart S—Automatic Weather Stations (AWOS/ASOS)

§ 87.525 Scope of service. Automatic weather observation stations (AWOS) and automatic surface observation stations (ASOS) must provide up-to-date weather information including the time of the latest weather sequence, altimeter setting, wind speed and direction, dew point, temperature, visibility and other pertinent data needed at airports having neither a full-time control tower nor a full-time FAA Flight Service Station. When a licensee has entered into an agreement with the FAA, an AWOS or an ASOS may also operate as an automatic terminal information station (ATIS) during the control tower’s operating hours.

[64 FR 27476, May 20, 1999]

§ 87.527 Supplemental eligibility. (a) Licenses will be granted only upon FAA approval.

(b) Eligibility for an AWOS, an ASOS, or an ATIS is limited to the owner or operator of an airport or to a person who has entered into a written agreement with the owner or operator for exclusive rights to operate and maintain the station. Where applicable a copy of the agreement between the applicant and owner or operator of the airport must be submitted with an application.
§ 87.529 Frequencies.

Prior to submitting an application, each applicant must notify the applicable FAA Regional Frequency Management Office. Each application must be accompanied by a statement showing the name of the FAA Regional Office and date notified. The Commission will assign the frequency. Normally, frequencies available for air traffic control operations set forth in subpart E will be assigned to an AWOS, ASOS, or to an ATIS. When a licensee has entered into an agreement with the FAA to operate the same station as both an AWOS and as an ATIS, or as an ASOS and an ATIS, the same frequency will be used in both modes of operation.

[69 FR 52886, June 14, 2004]