

ARCA Coordination Application Instructions Sheet.

Check appropriate box(es): for New or for Relocation and/or modification of existing coordination.

Band: Indicate which band(s) your station will be operating.

Section 1 -- Repeater information

- **Repeater Call Sign:** What is the callsign of the repeater?
- **Repeater Location:** What is the name of the repeater site location?
- **Output & Input frequency:** Transmit and receive frequencies of the repeater (duplex)
- **Transmitter output power:** How much power in watts is the transmitter feeding into the feed line? Reminder: in Arizona, 432-450 MHz has a 50 W limit (see FCC Rules).
- **System ERP:** Calculate the Effective Radiated Power by adding the antenna gain and subtracting line loss, duplexer loss, isolator loss, connectors loss, and any other losses, to the transmitter power, converting to Watts.
- **Emissions type:** Check equipment for type and select from the list on the application. (16F3E) normal FM, (16F2D) for packet, (11K0F3E) for 12.5 narrow band FM, (6K5F1D) for D Star voice, (13K0F1D) for D Star Data, and (8K10F1E) for P-25 operation use. Or list other designator if different from the above.
- **Latitude & Longitude:** Using WGS84 datum in DD/MM/SS format, what is the latitude and longitude of the transmitter site?
- **Site Elevation:** Indicate site elevation in feet above mean sea level.
- **Antenna Elevation:** Indicate Height of the Antenna in feet above ground.
- **Manufacturer and model of antenna:** List name and model number
- **Antenna Gain:** List the manufacturer's estimate of gain in dBd.
- **Polarity: Vertical or Horizontal**
- **Pattern: Omni, or describe**
- **Bearing: Omni, or direction of main lobe of pattern in degrees from north**

Mountain Top Sites: Check if mountain top, AND, if above 1000 feet, provide HAAT: Indicate the antenna Height Above Average Terrain. Use the HATT calculator [On Line Calculator](https://www.fcc.gov/general/antenna-height-above-average-terrain-haat-calculator) found at: <https://www.fcc.gov/general/antenna-height-above-average-terrain-haat-calculator>

- **Repeater Estimated Geographic Coverage:** What is the estimated geographic area of the repeater? Pick the most appropriate for your repeater: North West AZ, North Central AZ, North East AZ, West Central AZ, Central AZ, East Central AZ, South West AZ, South Central AZ, South East AZ, Metro Flagstaff, Metro Phoenix, Metro Tucson.
- **Repeater type of operation:** Indicate all that apply:
 - LINK:** Interconnects repeaters
 - PORTABLE:** for use at temporary locations
 - CLOSED/PRIVATE:** Only members are welcomed to use repeater
 - AUTOPATCH:** Telephone interconnect available
 - CLOSED AUTOPATCH:** Telephone interconnect available to members
 - EMERGENCY POWER:** Generator, battery, solar, etc.
 - RACES:** RACES affiliated
 - TELEVISION:** Amateur TV
 - LINKED:** Interconnected to one or more other repeaters
 - REMOTE BASE:** Interconnected to a remote base
 - VOIP LINK:** Voice or radio over Internet

TYPE: ECHOLINK: Indicate Node #
IRLP: Indicate Node #
ACCESS: Indicate access code or CTCSS tone
LTZ: LONG TONE ZERO equipped
DTMF: DTMF required for access
REMARKS: Provide additional info on any of the above

Section 2 -- Single Point of Contact

- **Contact person Information:** List a contact person who can be notified and respond to questions on your behalf in the event a situation arises with the system that needs to be addressed and we are not able to contact you.

Section 3 -- Site Information and Location

- **Site Agreement:** Attach or Scan a copy of Site Agreement with this application if applicable.
- **Physical Location of the site** and the site owner's or manager's information

Section 4 -- Sponsor Information

- **Club sponsor** or other responsible party to contact if questions arise about the repeater and need to be addressed.

Section 5 -- Licensee

- **Amateur Licensee:** Who is the licensee or trustee of the repeater callsign responsible for the repeater's operations in compliance with FCC rules?

Estimate when the repeater will be on-the-air.

Note: coordination if approved will be conditional for the first 90 days pending no unforeseen issues or interference. You have 90 days to get the station on-the-air and functioning as intended. In the event there are delays, the coordinators may grant a 90 days extension on a case-by-case basis. You are required to keep the coordinator informed as to the operating status and updates on the progress of station construction and or repairs.

Sign and submit the form by mailing it or the coordinator for the appropriate band as listed on the on the [coordinators](http://www.azfreqcoord.org/coord.html) website (<http://www.azfreqcoord.org/coord.html>), or e-mail it to: coordinators@azfreqcoord.org