FSQCall-MO Mission Statement

Assist when requested, using digital communications, to served agencies and affiliated organizations including, but not limited to State of Missouri Emergency Management Agency (SEMA), county emergency operations centers, American Red Cross, Salvation Army, National Weather Service and other public service and disaster relief organizations to affected areas of the Missouri Section during ARES® activation. From natural to man made disasters, the FSQCall-MO net will augment the MESN voice network. Digital communications may be used when type of traffic may not be suitable for voice nets.

Section 1

Operations

Primary program for keyboard to keyboard communications will use FSQCall V0.24.6 (US Edition) or fldigi-fsq, current released version. User will be automatically centered at 1500Hz on waterfall with either program.

All routine, formal, exercise and test traffic will use the Fldigi suite of programs latest current version.

Fldigi traffic waterfall of 700Hz for inbound and outbound SEMA. This is also the primary waterfall frequency for all other traffic. The ARQ mode of flmsg will be used.

If additional non SEMA related traffic needs to be sent due to high volume on 700Hz, stations shall move down at least 1KHz to effect transfer, then return when finished.

Operating Frequencies
Primary Net Frequencies
7099 usb days 3598 usb nights (dial frequencies) Unattended operation
Secondary Frequencies (nets or traffic)
7073 usb days +/- 1000Hz 3573 usb nights +/- 1000Hz (dial frequency) Attended operations only

Net Check In Procedure For Routine Net

Use the FSQCall message syntax (#)

NCS Callsign#[net]sender_callsign/name/date local_time county/district/comments

A file will be saved to net-control's station (KA0OTL in this example) with a filename of "net.txt" NCS can just open "net.txt" on PC and will see a nice set of lines of text with check-ins. The station acting as NCS will auto acknowledge each station checking in. The NCS operator does not always have to be present to receive check-ins. Adding the date could be helpful for record keeping.

<u>Levels of Operations</u>

Any station on the network with official information, or a request from a supported agency as defined by the FSQCall-MO Mission Statement, is authorized to use the ALLCALL# feature of FSQCall and state the situation or emergency.

The network will have the following levels of activation:

Level One: Routine, normal net use. Personal chats between stations permitted.

Level Two: The net is on standby for potential activation for a portion or all of the state. Personal chats should be limited. Exchange of information for potential activation is encouraged. This level can be used for weather nets, or other types of exercises.

Level Three: Real World Event activation. All traffic is limited to support event or government entity as outlined in FSQCall-MO Mission Statement.

Use the FSQCall feature (|) to alert network status level change. Also locate a network station, with a good signal and is close to the center of the state to relay.(fsqcall feature ;) Example: callsign;callsign|callsign|callsign| Attempt to send to every station in your heard list, if possible. Alert pop-up box containing message is placed on the screen. When the operator closes this dialog, a response transmission is made: origin_callsign Alert ack. Information to be included: Level Status, entity requesting support and activation beginning time. <u>Example: Level Two Dept of Defense National Exercise, Comms distruption in progress MESN activated on 3963</u>

When Level Three activation has been declared, all stations will turn off sounders.
 (See FSQCall Sounding) The NCS shall occasionally sound, indicating Level Three activation and ask for stations with traffic and precedence.

Stations shall use the established procedure #[net] when checking into the net using quantity and precedence of traffic in place of comments.

Stations shall notify NCS when closing in a Level Three activation, using the # feature.

At least one station will act as liaison to the MESN, if activated. Notify the FSQCall-MO NCS and periodically, every 10 to 15 minutes, briefly returning to the digital net for any information to and from the MESN.

During a Level Three activation, the net will be a directed net, with all requests to send traffic going through NCS.   The NCS shall ask for a backup NCS.

<div align="center">FSQCall Sounding</div>

Sounders may be used during informal/daily nets, but should be DISABLED during formal exercises or actual emergency nets. When used, sounders should be set to the maximum time allowed by the software (30 or 60 minutes) to minimize the potential for interruptions of traffic flow of an unattended station.

<div align="center">FSQCall Traffic File Usage</div>

FSQCall should not be used to move traffic. The program does not have a reliable error correction.

<div align="center">FSQCall Baud Rate</div>

Three baud is recommended on HF for nets and general use. If signals are very good (FSQ signal strength of 10dB or better) for all stations on the frequency then 4.5 baud may be good to use.

<div align="center">**Section 2**</div>

<div align="center">Fldigi Settings and Procedures For NBEMS Traffic</div>

1. Both sending and receiving stations disable the FSQ sounder for duration of traffic. If sending traffic to unattended station, check the last sounder time.

2. Both stations turn on the TxID and RxID feature of fldigi (green indicator lights top right of fldigi) This enables stations to use Flmsg in ARQ mode for 100% accuracy of formal traffic, attended and unattended operations. The ARQ mode in Flmsg should be used for all traffic. Do not use the "Autosend" in Flmsg as it does not perform ARQ error correction.

3. The following modes are recommended: Thor22 or MFSK32 in good conditions (FSQ s/n >20dB) Thor16 or 11 or MFSK16 for average conditions (FSQ s/n between 10 and 20dB) Thor 8 for poor conditions. (FSQ s/n <10dB) For extremely good conditions (FSQ s/n>20dB and no QSB nor static crashes) the PSKR and 8PSK modems work well, and are very fast. Be aware of maximum baud rate allowed on HF, and choose modems that are less than about 700Hz wide since the band-pass filtering on some receivers may cut off the low frequencies if they go too low on the waterfall since the center frequency is at 700Hz. Remember, to check the fldigi squelch to be just above the noise floor with no signal present FOR THE MODEM IN USE (this varies from modem to modem) for best performance and decode. A good rule-of-thumb is to set the squelch slider about 1/3 of the way up from the bottom as a starting point.

4. Flmsg ARQ block size recommendations: 128 or lower for the slower modes such as Thor and 128 or higher for faster modes such as PSKR or 8PSK. If unsure, set at 128.

5. Sending station to unattended receiving station shall use the FSQCall message syntax feature (#), to notify of traffic with name or message number of traffic.

6. Receiving station should use the FSQCall syntax (#) message feature to inform sending station receipt of traffic. Use message number or name of traffic. This is a courtesy to establish good traffic handling procedures.

<u>Other Operating Recommendations</u>

Recommend balancing fsqcall and fldigi programs audio drive level to have an output power no more than 20 watts for a 100 watt capable transceiver.

Section 3

<u>Traffic Precedence</u>

FSQCall-MO stations shall use the following the ARRL traffic precedence's when notifying Net Control Station in a real world event. The precedence shall be spelled as a complete word.

When participating in an exercise, all traffic will include "This is an Exercise"

Emergency
Any message having life and death urgency to any person or group of persons, which is transmitted by Amateur Radio in the absence of regular commercial facilities. This includes official messages of welfare agencies during emergencies requesting supplies, materials or instructions vital to relief to stricken populace in emergency areas. During normal times, it will be very rare

Priority
This classification is for important messages having a specific time limit, official messages not covered in the emergency category, press dispatches and emergency-related traffic not of the utmost urgency.

Welfare
This classification, refers to either an inquiry as to the health and welfare of an individual in the disaster area or an advisory from the disaster area that indicates all is well. Welfare traffic is handled only after all emergency and priority traffic is cleared. The Red Cross equivalent to an incoming Welfare message is DWI (Disaster Welfare Inquiry).

Routine
Most traffic in normal times will bear this designation. In disaster situations, traffic labeled Routine should be handled last, or not at all when circuits are busy with higher-precedence traffic.