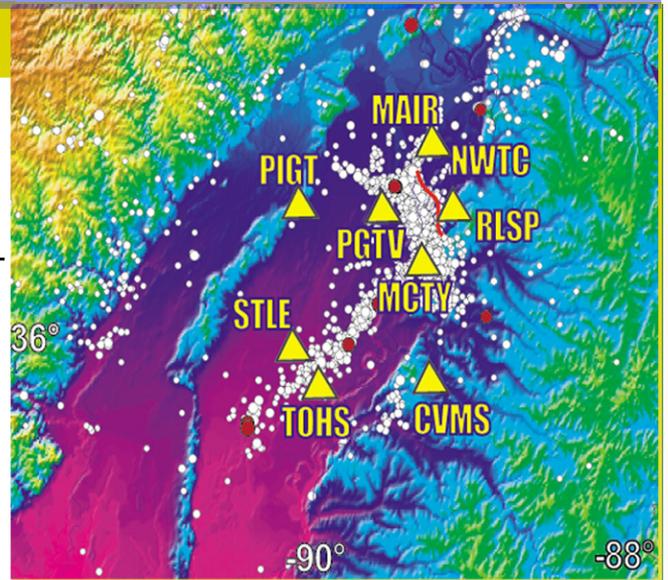




## seismic networks

**Central to CERI's mission** is operation of state of the art, digital seismic networks in support of scientific research and to provide timely, authoritative information following a significant earthquake. CERI operates 130 broadband, short-period, and strong-motion seismic stations in 10 states to monitor regional seismicity with a particular focus on the New Madrid and Southern Appalachian seismic zones. Twenty two of the stations are ANSS supported. CERI operates the ANSS-MA regional processing center (RPC). The RPC is located at CERI for the purpose of consolidating information flow, where appropriate, with the ANSS and for providing rapid and real-time products. A total of 783 data channels from CERI and partner networks are processed through the RPC and made available to other ANSS networks in real-time or through public and private earthworm waveservers. Automatic locations are determined via earthworm for the active portion of the NMSZ and these alarms are automatically distributed with about 2 minutes of the origin time. A weekly bulletin is produced and either faxed or mailed to more than 150 recipients. An email listserv is used to send rapid reviewed earthquake information to more than 1500 recipients. A "recent earthquakes" web page is available and receives more than 5 million hits per year.



### Regional seismic monitoring - a cooperative endeavor with:

- U.S.G.S. National Earthquake Information Center
- St Louis University
- Virginia Tech
- University of South Carolina
- University of Kentucky.

### Data products:

- catalog - 1974 to present
- online digital waveforms - 1995 to present
- paper waveform archives -1963 to present
- automated alerts and web page generation
- rapid notification email list
- teleseismic waveform database.

**The RPC is composed of** a network of 13 computer systems, primarily rack mount SUN servers, housed in seismically mitigated racks within a seismically strengthened two story wood structure.

**The RPC operates current standard software** such as qdds, qdm, recenteqs, eqinthenews, and get and put file modules with NSMP. We are also operating pre-beta versions of CISN\_display and GLASS.

