



Contacts:
Clayton Berry—SLU 314-977-7117
Lori Light 314-554-2681
Susan Gallagher 314-554-2175

FOR IMMEDIATE RELEASE

AmerenUE, Saint Louis University Join Forces to Launch Pioneering Weather Monitoring, Forecasting, Response System

Highly Detailed, Precise Weather Predictions Help UE Restore Power Faster, Use Resources Even More Efficiently

St. Louis, MO Nov. 13, 2008---AmerenUE and Saint Louis University's Department of Earth and Atmospheric Sciences today announced *Quantum Weather*™ --- a highly precise weather monitoring, forecasting, and response system for UE's Missouri service territory.

Part of UE's Project Power On reliability initiative, this pioneering system can pinpoint severe weather activity on a neighborhood-by-neighborhood basis. Current weather tracking systems are unable to distinguish what's happening in individual neighborhoods because monitors are often more than 100 miles apart and provide information only on an hour-by-hour basis.

Quantum Weather feeds detailed, near real-time information over UE radio communications systems to central computers in Saint Louis University's Department of Earth and Atmospheric Sciences. Using computer models and analytical tools created by SLU researchers, the system produces highly detailed maps of weather activity that may affect neighborhoods across UE's service territory.

Quantum Weather will eventually include a network of up to 100 weather stations mounted on existing UE poles and deployed in key locations throughout the region to measure temperature, humidity, atmospheric pressure, wind speed, wind direction, and rainfall rates. UE has already erected 50 of these stations—primarily in the St. Louis metropolitan area.

"Hours in advance of severe weather, *Quantum Weather* provides predictions that are much more precise than are currently available---allowing UE to further improve restoration times and increase efficiencies," says UE President and Chief Executive Officer Thomas R. Voss.

"We expect this system to make a real difference in our efforts to offer restoration times even more quickly and to continue to improve our service. And partnering with SLU helps us support valuable science education programs in our own community," says Richard J. Mark, UE senior vice president, Missouri Energy Delivery.

Saint Louis University President Lawrence Biondi, S.J., adds that this SLU-UE partnership exemplifies the University's commitment to private sector partnerships that benefit the public. "Quantum Weather also allows the University to fulfill its promise to pursue research that improves our community. In addition, this project will provide graduate students and faculty cutting-edge research opportunities, and will give undergraduate students valuable operational weather forecasting experience. We appreciate UE for supporting the purchase and installation of these weather stations and for helping to fund two new graduate assistantships as part of this partnership."

Quantum Weather's more detailed information helps UE managers decide whether additional crews should be called in or held over. It can show the company where crews should be concentrated based on the severity and detailed location of damage – speeding up power restoration. Quantum Weather also helps the company better predict restoration times and identify facilities that are most vulnerable to outages so that those facilities might be considered for the improvement projects under the company's aggressive Power On Project.

Quantum Weather stations are also energy-efficient. Scientifically placed throughout the state, the weather stations are solar-powered with a battery that stores power during the day and keeps them operating at night and on cloudy days. Each monitor is adjusted for specific local conditions, like nearby buildings that can affect monitoring of wind speeds.

"A key component of the success of Quantum Weather is the SLU researchers' development of unique software that provides near-real-time forecasts on a very local scale," says Professor and Department Chair William P. Dannevik, Ph.D., of the SLU Department of Earth and Atmospheric Sciences. "This system has been made possible by the development of low-cost, easily deployed weather sensors; the advent of more cost-effective high-performance computing systems; new generation weather prediction models; and AmerenUE's broadband digital communications network."

Saint Louis University is a Jesuit, Catholic university ranked among the top research institutions in the nation. The University fosters the intellectual and character development of more than 12,700 students. Founded in 1818, it is the oldest university west of the Mississippi and the second oldest Jesuit university in the United States. Through teaching, research, health care and community service, Saint Louis University has provided one-of-a-kind education, leadership and service for 190 years.

For more information, visit www.slu.edu.

With 1.2 million customers, UE is Missouri's largest electric company and third largest provider of natural gas. Ameren, through its operating companies, serves 2.4 million electric and 1 million natural gas customers in a 64,000-square-mile area of Illinois and Missouri.

For more information, visit www.ameren.com/poweron.

NOTE: The term quantum leap has come to mean a major advance--a revolutionary change that happens all at once. "Quantum" clearly fits this pioneering new system. The butterfly icon is based on an illustration of chaos theory---that the air movement caused by a butterfly – sometimes called the Quantum Butterfly – flapping its wings in one end of the world can result in a typhoon or hurricane somewhere else on the globe.

#