PROBLEM/ EVIDENCE
In the 1990’s, spontaneous breathing trials (SBT) were introduced by Wes Ely with the goal of defining ways to wean patients quickly from mechanical ventilation. Over the past 2 decades researchers have studied coupling the SBT with a spontaneous awakening trial (SAT). These trials were successful at weaning patients from mechanical ventilation while decreasing ICU length of stay (LOS), improving survival rates, decreasing hospital acquired infections, and decreasing VAP rates. These trials led to improvements in preventing oversedation which can be directly associated with long-term cognitive deficits, prolonged mechanical ventilation and the development of delirium.

STRATEGY
In 2008, our hospital adopted the “ABC Wake up and Breathe” philosophy. Nursing was concerned with abrupt withdrawal of medications during the SAT. We developed a protocol that included Girard’s screening tool and criteria for implementing daily SAT/SBTs. However, the protocol lacked standard rescue agents for the nurse to easily medicate and re-sedate to the targeted level of sedation when failure occurred.

PRACTICE CHANGE
The Girard protocol was distributed to all disciplines involved in care of the mechanically ventilated patients (physicians, nurses and respiratory therapists). Educational offerings were conducted to disseminate education and answer questions regarding the proposed protocol. After tailoring the changes, the protocol has now been implemented since January 2009.

EVALUATION/RESULTS
Our success is demonstrated in the graphs below. Average ventilator hours have decreased from 109.7 hours in 2008, to 88.1 hours in 2009, to 87.1 hours in 2010. This correlates with extreme cost savings with no added cost to the healthcare system.

RECOMMENDATIONS/ LESSONS LEARNED
Daily evaluations and screening criteria must be used to identify mechanically ventilated patients eligible for daily SAT/SBT. Evidence has shown that these measures will improve patient outcomes. This coupling concept will prevent the accumulation of sedative drug effect over time, prevent oversedation, and maintain the patient in the ordered targeted level of sedation while simultaneously focusing on patient comfort.