

Spaced Learning and Practice Model

Repetition is a powerful technique to aid memory performance and repetition of an experience improves memory over a single experience.¹ Evidence demonstrates that after resuscitation training courses, **skills and knowledge deteriorate after 1 to 6 months without ongoing practice**. Increasing the frequency of training may improve the efficacy of training, protect against skill deterioration, enhance performance during patient care, and improve patient outcomes.²

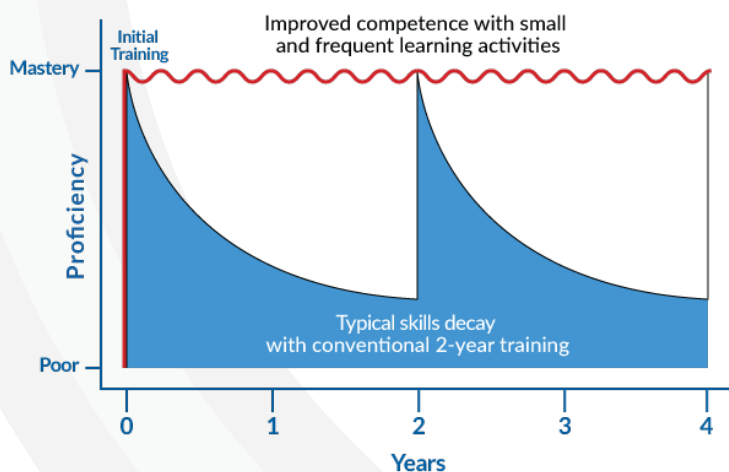
The **Resuscitation Quality Improvement® (RQI®)** programs utilize a spaced learning model through low-dose, high-frequency quality improvement sessions that measure and verify competence, to help healthcare providers retain life-saving skills.

THE SCIENCE IS CLEAR

Repetition Improves Performance

The current schedule of 1 to 2 days of resuscitation training every couple of years is effective for short-term learning. However, learners often do not retain these skills in the long term. Shorter learning sessions every few months may improve learning outcomes.²

The AHA Scientific Statement on Resuscitation Education Science addresses gaps in educational strategies for resuscitation, including the need to use mastery learning, deliberate practice, and spaced learning as methods to improve HCP BLS training.² The RQI programs use these innovative educational strategies and has demonstrated enhanced CPR quality and performance.³



How It Works

Instead of the conventional CPR training every couple of years which inevitably leads to unacceptable skill decay over time, RQI learners participate in a quality improvement program that **verifies competence and ensures retention over longer periods of time**.

Resuscitation knowledge and skills practice are delivered in a chunked, low-dose format that are repeated every quarter at the workplace with real-time and targeted feedback.

Increasing the frequency of training may improve efficacy, protect against skills deterioration, enhance performance during patient care, and improve patient outcomes (Cheng et al, 2018).

(1) Verkoijen, Peter, (2005). Explaining the spacing effect : Study-phase retrieval, contextual-variability, and priming accounts /. https://www.researchgate.net/publication/35457270_Explaining_the_spacing_effect_Study-phase_retrieval_contextual-variability_and_priming_accounts

(2) Cheng A, Nadkarni VM, Mancini MB, Hunt EA, Sinz EH, Merchant RM, Donoghue A, Duff JP, Eppich W, Auerbach M, Bigham BL, Blewer AL, Chan PS, Bhanji F; American Heart Association Education Science Investigators; and on behalf of the American Heart Association Education Science and Programs Committee, Council on Cardiopulmonary, Critical Care, Perioperative and Resuscitation; Council on Cardiovascular and Stroke Nursing; and Council on Quality of Care and Outcomes Research. Resuscitation Education Science: Educational Strategies to Improve Outcomes From Cardiac Arrest; A Scientific Statement From the American Heart Association. *Circulation*. 2018 Aug 7;138(6):e82-e122. doi: 10.1161/CIR.0000000000000583. PMID: 29930020.

(3) Panchal AR, Norton G, Gibbons E, Buehler J, Kurz MC. Low dose- high frequency, case based psychomotor CPR training improves compression fraction for patients with in-hospital cardiac arrest. *Resuscitation*. 2020 Jan 1;146:26-31. doi: 10.1016/j.resuscitation.2019.10.034. Epub 2019 Nov 12. PMID: 31730899.