

**Background:** The evaluation of skills acquired after a course of BLS is needed to ensure that the learning objectives are achieved. However, it is unusual to assess them along the time. The objective of our study is to evaluate retention of these skills at 6 months of a Critical Care Master course.



**Material and Methods:** A prospective study was conducted between October 2015 and May 2016 with institutional approval from the Ethics Committee of the University. 32 students of a Critical Care Master participated in a study in which it was compared the acquisition of skills course BLS (Basal Time) and its retention 6 months later (6M). The assessment tool was a registration of 2 minutes cardiopulmonary resuscitation (CPR), 30 compressions and 2 ventilations. The registration was performed with “Resusci Anne Skill®Reporter™”. Analysis using SPSS v.20 (SPSS Inc., Chicago IL, USA).

**Results:** After 6 months of BLS course, significant differences were objectified in the realization of the main skills that are needed to successfully perform high-quality CPR. 1.-Compression Mean Rate (Mean Compression/min). Basal Time=121,84 ± 13.011 vs 6M=114,19 ± 12,63 (p< 0.020). 2.-Compressions Mean Depth (mm). Basal Time= 50,19 ± 6,53 vs 6M=46,56 ± 7,645 (p< 0.043) 3.-Adequate Depth (%). Basal Time= 97,31 ± 6,70 vs 6M=63,41 ± 6,21 (p< 0.040). 4.-Correctly Released Ventilation (%). Basal Time= 98,13 ± 8,95 vs 6M=85,97 ± 12,87 (p< 0.009).



**Conclusions:** This educational intervention show that 6 months after a BLS course, main skills regarding compressions are not retained and therefore high-quality CPR is not performed. It is important to analyze retention time in BLS skills, both to maintain effectiveness of CPR and to establish the optimal refresh rate in BLS.

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