



Evaluation of the effectiveness of Intrapartum care and Emergency obstetric care training in Lao PDR



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Background

Intrapartum Care and Emergency Obstetric Care (IPC/EmOC) training is designed to decrease Maternal mortality ratio in Lao PDR. In 2014, the team of maternal death surveillance and response reported that 75% of the cause of maternal death were PPH, Eclampsia and sepsis in Lao PDR. The course includes these three causes of maternal death and trainers from central hospitals and University of Health Sciences teach how to detect danger signs for complication cases and how to provide appropriate treatment.

Objectives

To assess the effectiveness of IPC/EmOC training before expanding the training throughout Lao PDR.

Methods

- IPC/EmOC trainings was conducted 3 days in Champasak, Attapeu, Xiengkhouang and Salavan in the period between July 2017 and July 2018. Total 146 practitioners from provincial hospitals and district hospitals attended the training.
- Before and after the training, pre-test and post-test was conducted to assess knowledge, recording skills and practical skills. Valid responses from 116 participants were compared their pre- and post- condition of knowledge (13 items), recording skills of Partograph (9 items) and practical skills (8 items). Exact Wilcoxon signed rank test was performed to analyze the pre and post difference.

Process of training

Pre-test
1. Written test
2. Partograph test
3. Skill assessment

Simulation practices
1. Intrapartum care and Postpartum care
2. Postpartum infection
3. Preterm birth
4. Partograph and Prolonged labour
5. Postpartum haemorrhage
6. Severe pre-eclampsia/Eclampsia

Skill practices
1. Bimanual compression
2. Manual removal of the placenta
3. Shoulder dystocia
4. Vaginal breech delivery

Post-test
1. Written test
2. Partograph test
3. Skill assessment

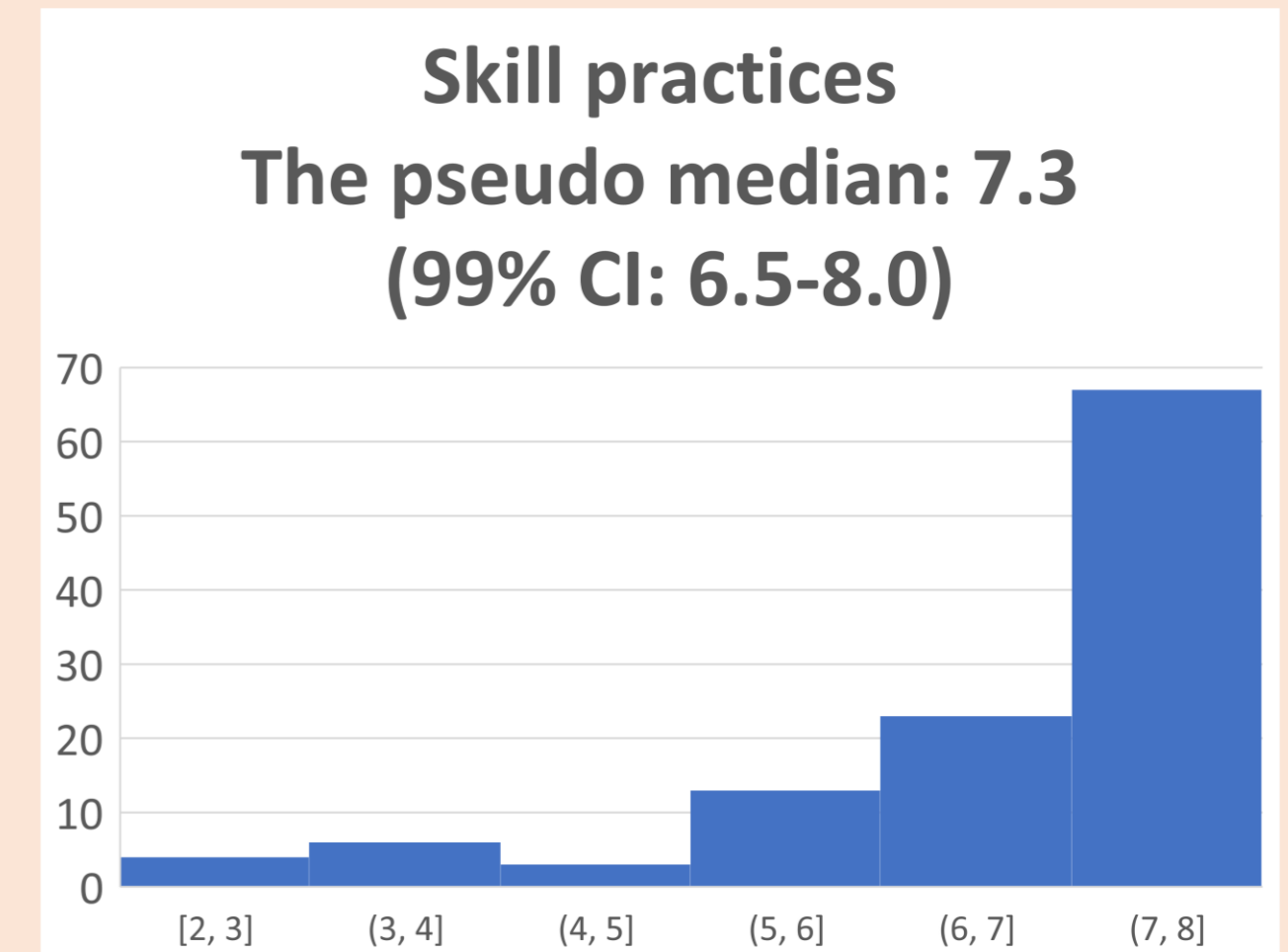
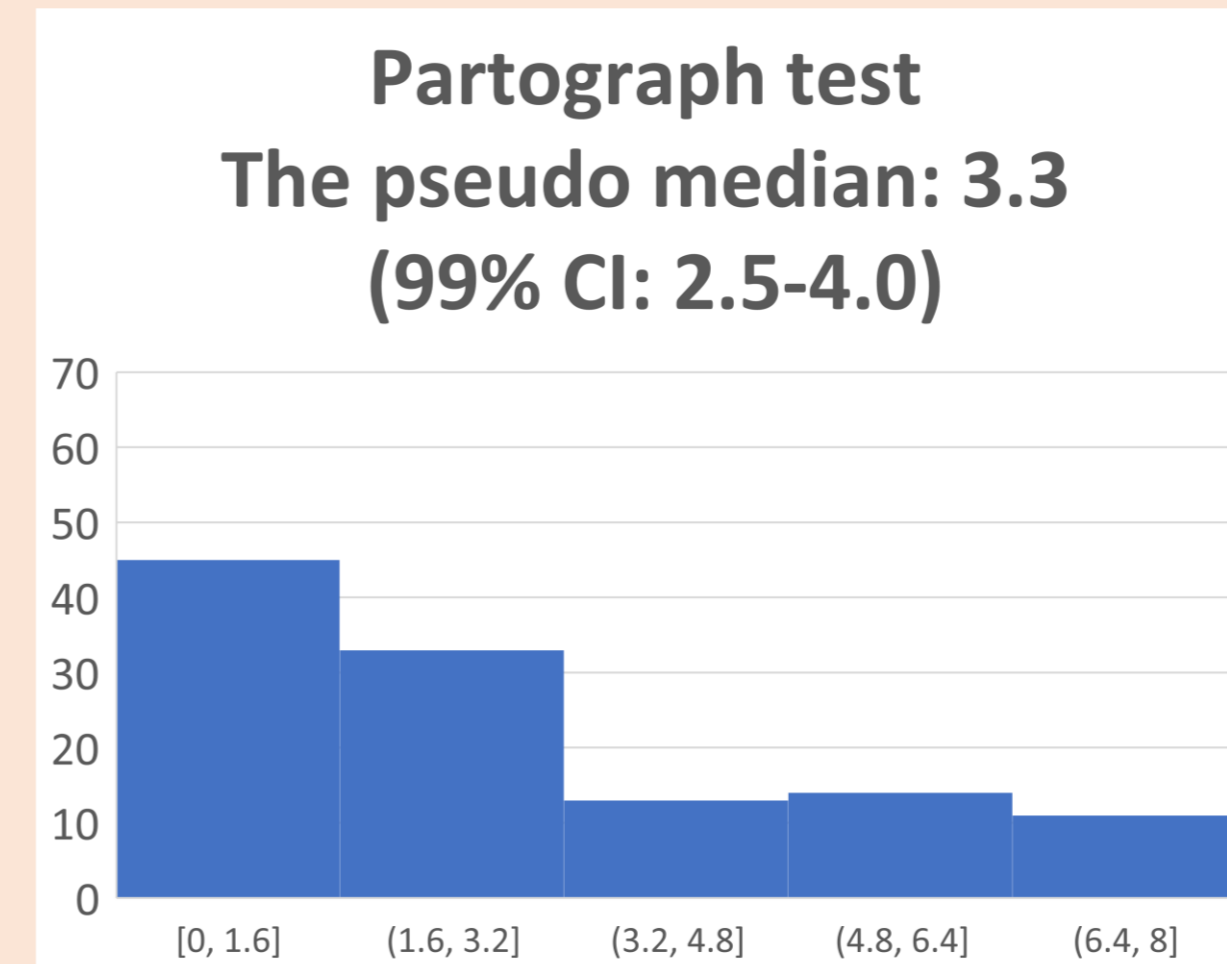
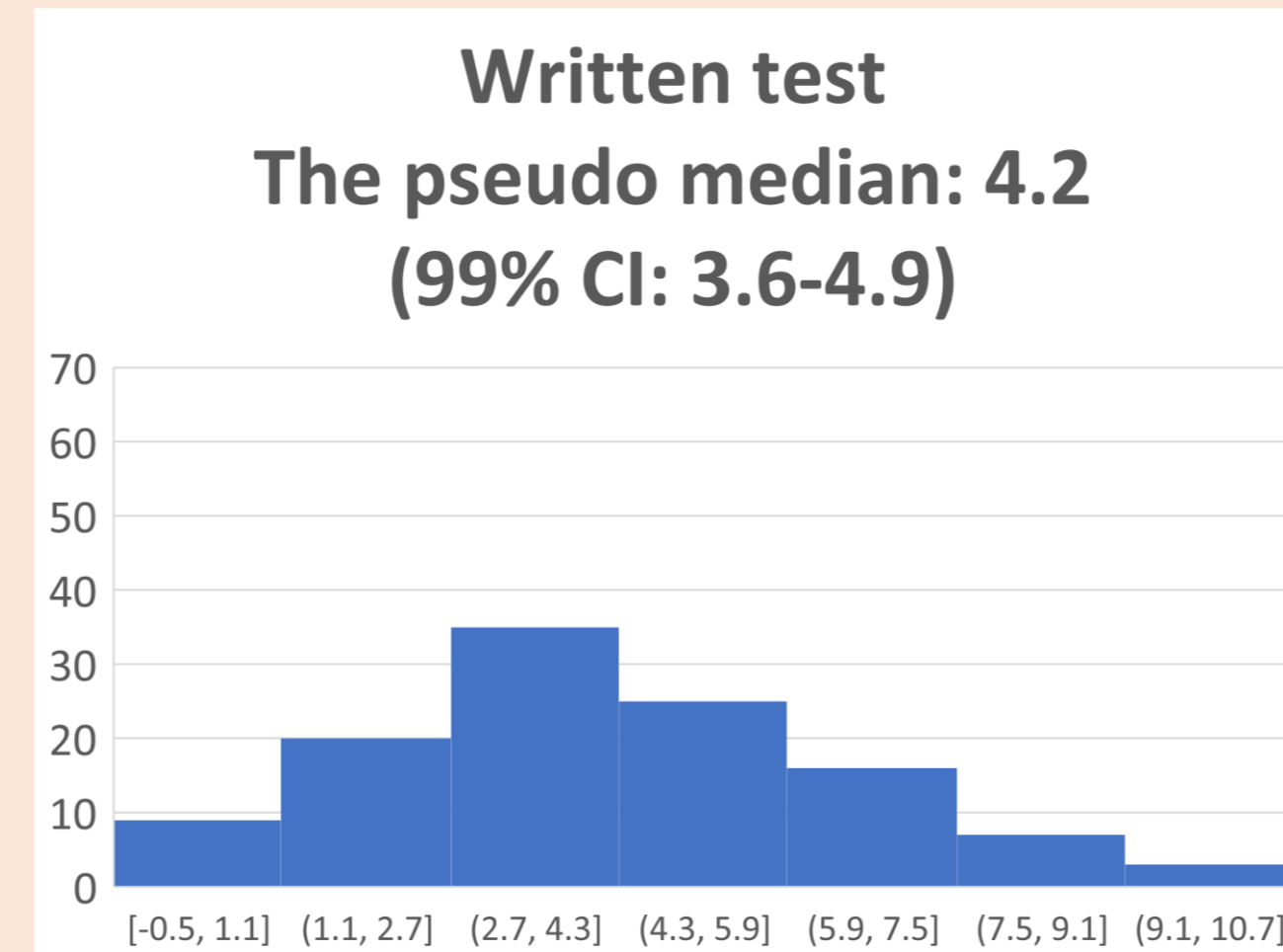


Results

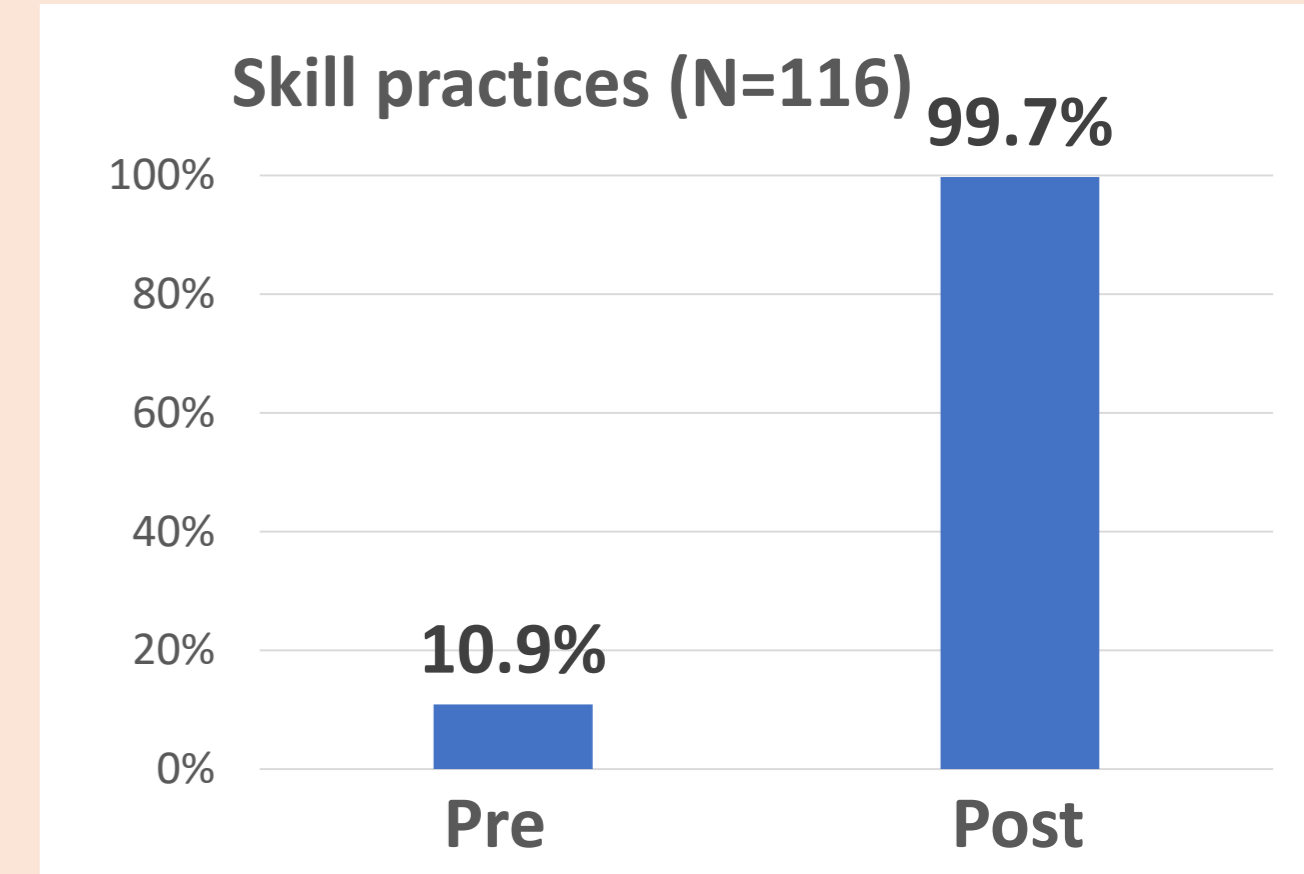
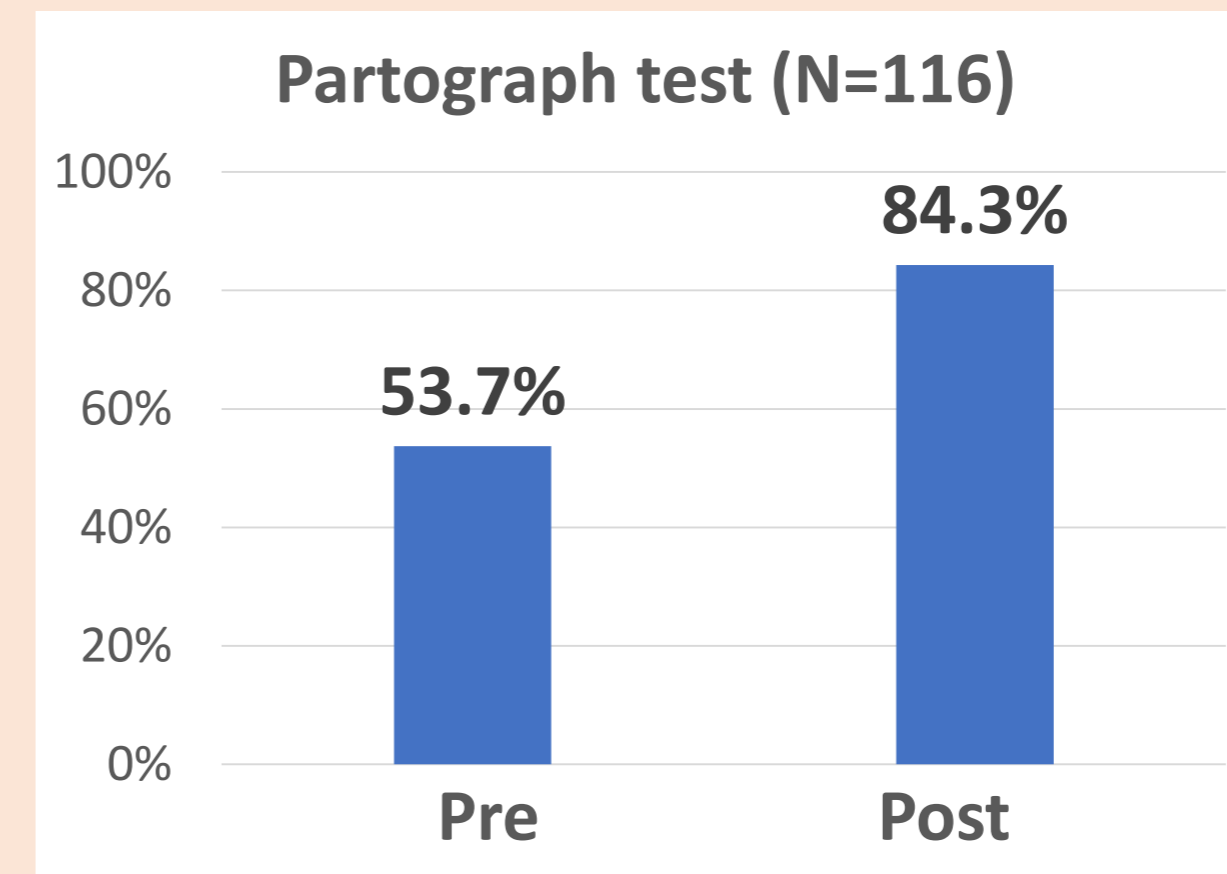
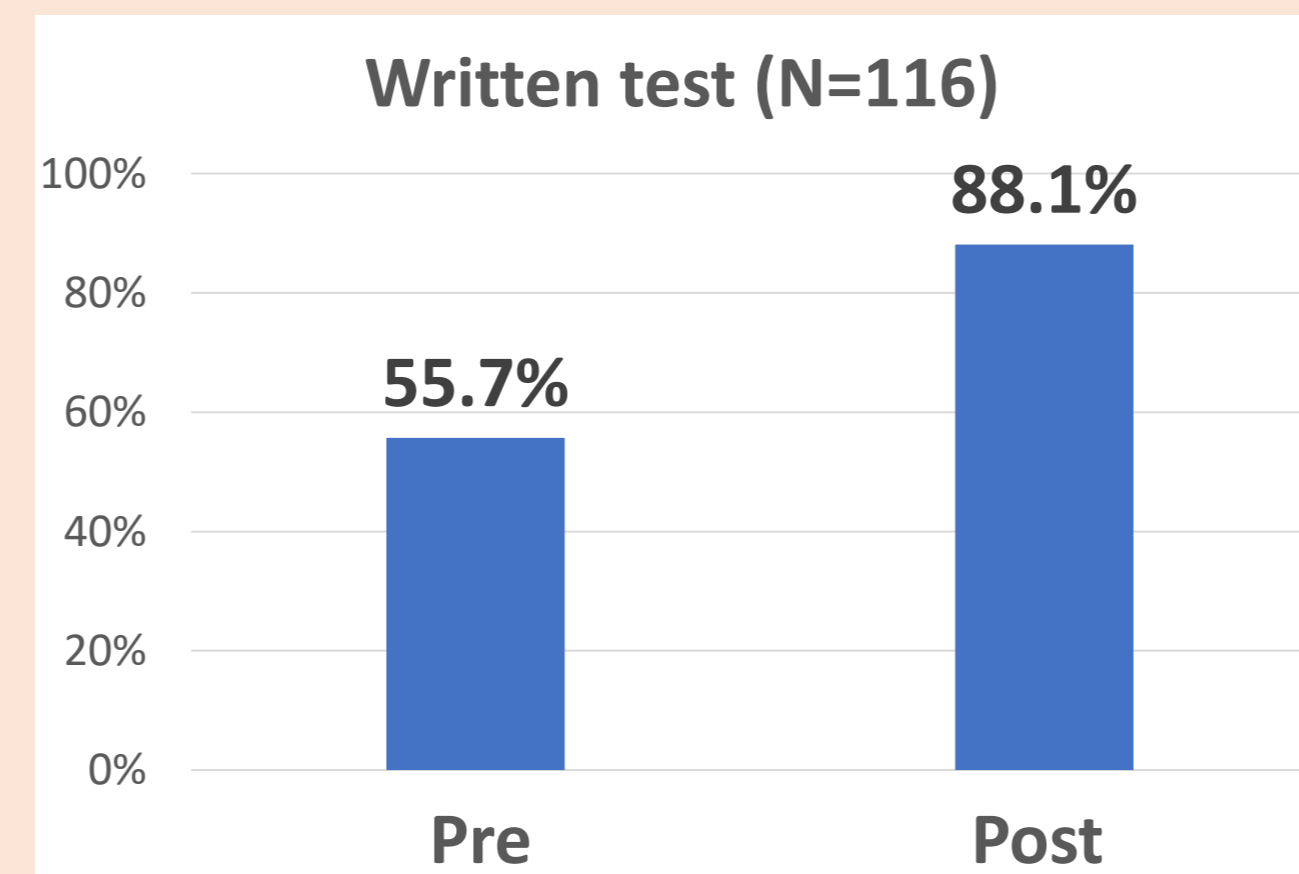
Profile of trainees

Variables (N=116)	n	Percentage (%)
Profession		
OBGYN	3	2.6
Medical doctor	34	29.3
Midwife	38	32.8
Nurse	26	22.4
Others	15	12.9
Facility		
Provincial hospital	41	35.3
District hospital type A	15	12.9
District hospital type B	55	47.4
College and training center	5	4.3
Years of experience		
< 1 year	8	6.9
1-5 year	60	51.7
6-10 year	13	11.2
11-15 year	13	11.2
> 15 year	22	19.0

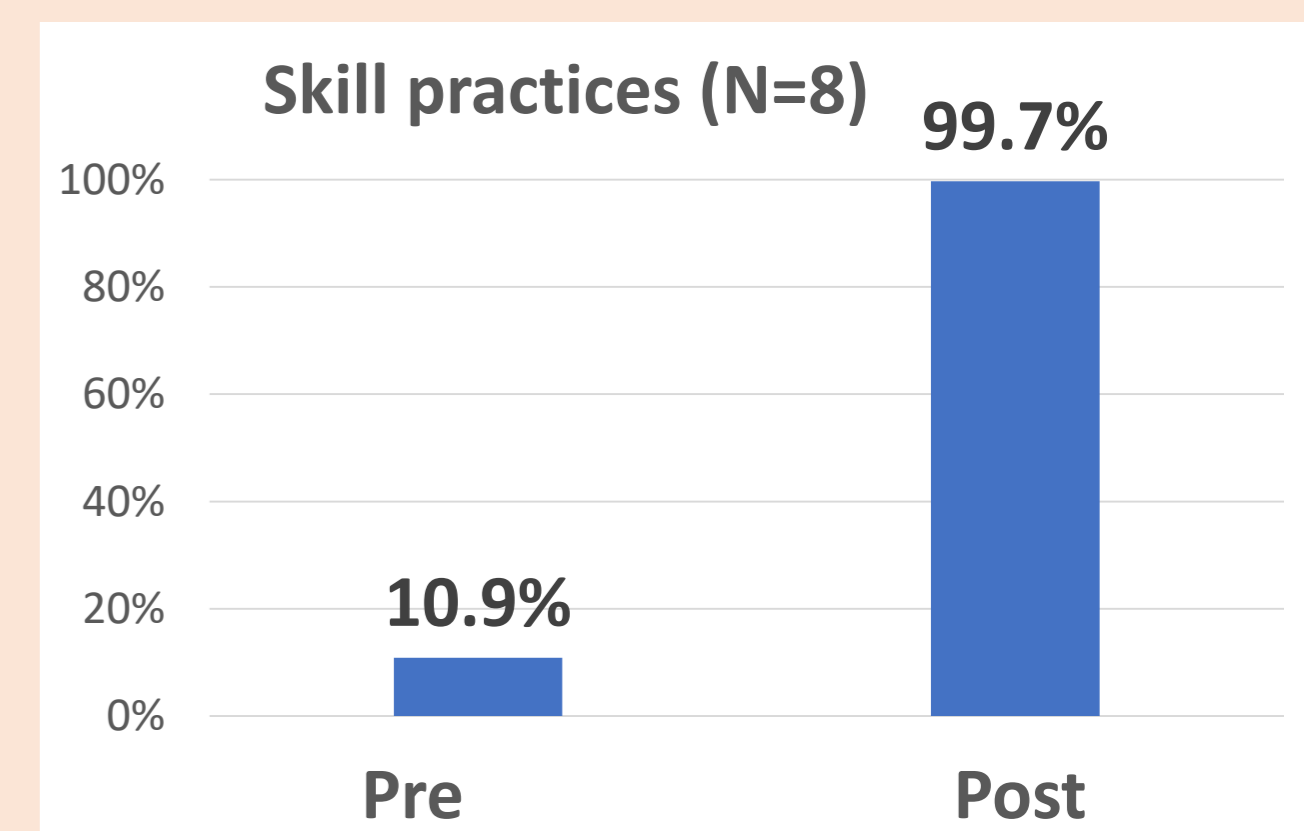
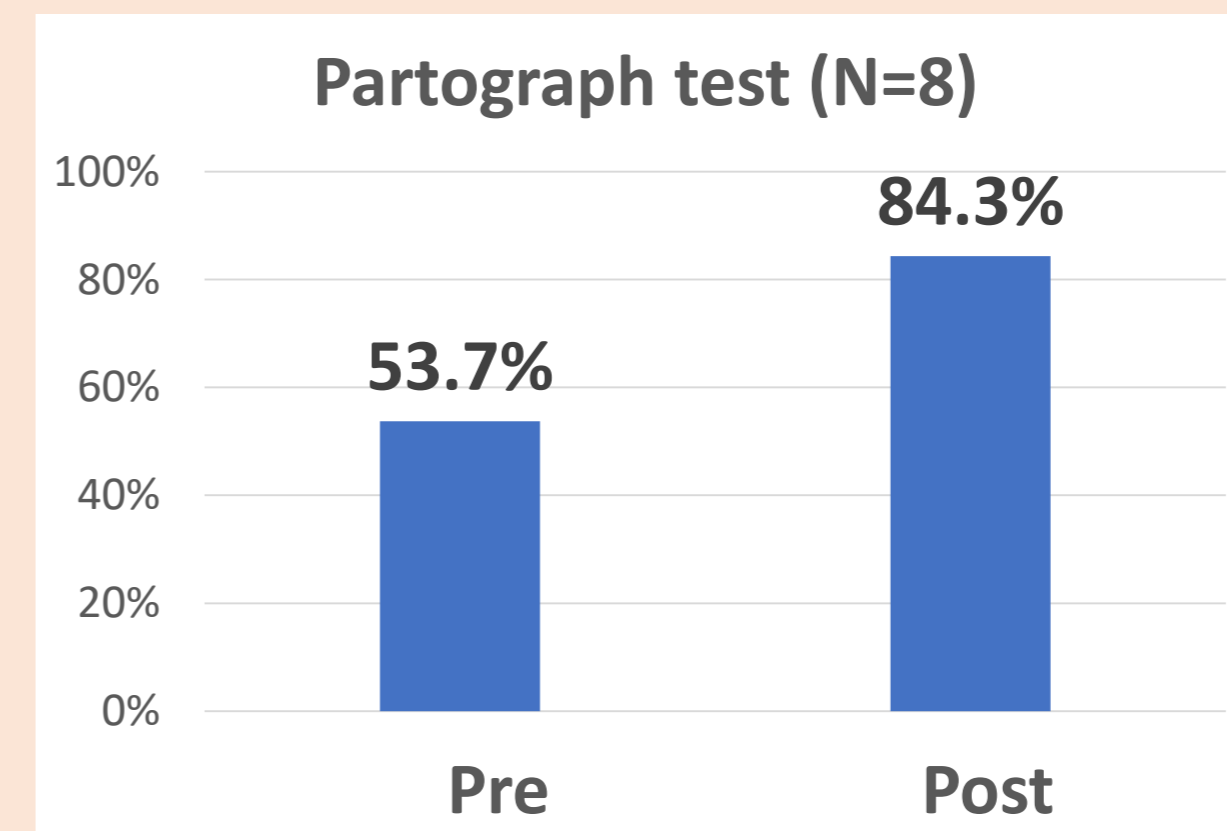
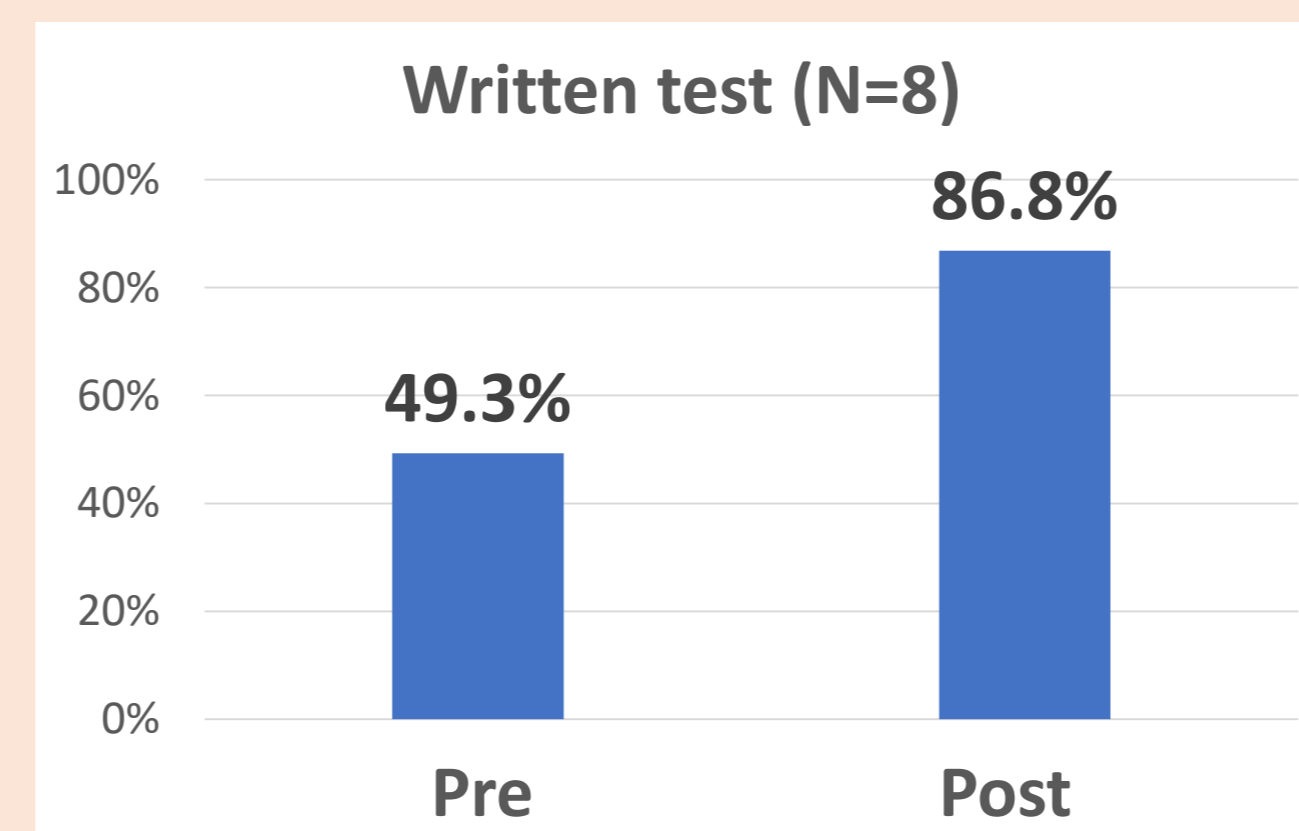
The pseud median of pre and post differences and Exact Wilcoxon signed rank test



Average score of pre- and post- test for 116 participants



Average score of pre- and post- test of 8 participants who was less than one year experiences



Conclusions /Policy implications

IPC/EmOC training filled gaps of necessary knowledge, recording skills and practical skills of emergency obstetrics care, and it especially improved practical skills of participants dramatically. IPC/EmOC training can be useful in other provinces. Also consideration of early exposure of IPC/EmOC practice in university may help students who will perform practical skills right after graduation.

In this research we assessed participants' knowledge and skills immediately after training. Further study is needed to evaluate how acquired knowledge and skills in IPC/EmOC training changed the trainees' real practices in hospitals. Next challenge is to develop the training module of IPC/EmOC for health providers at Health Center.