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BACKGROUND

Average annual incidence of in-hospital pediatric cardiopulmonary arrests (IHCA) occur in the US is 15,200 with an estimated annual incidence of >5000 out of hospital cardiac arrests (OHCA).

Return of spontaneous circulation (ROSC) in pediatric populations will occur in 78-89% of IHCA and 36% of OHCA.

Once ROSC has been achieved, the post-cardiac arrest phase of care begins.

Post-arrest care practices vary with the potential for systematic goal directed management to reduce hemodynamic instability and later morbidity and mortality.

OBJECTIVE

To assess our baseline knowledge of post-arrest care practices, management goals, and self-reported confidence in knowledge of this phase of care among RN, RT and MDs in the emergency department (PED) and pediatric intensive care unit (PICU).

METHODS

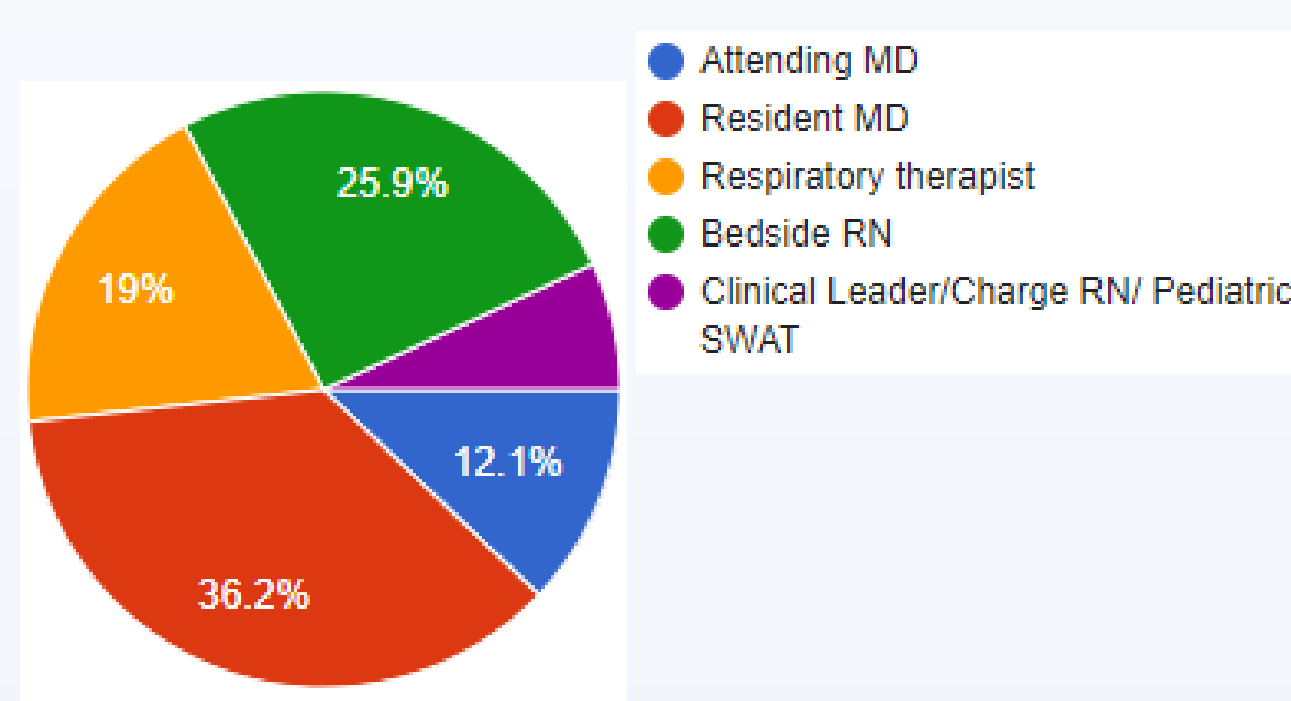
14-question survey was sent via google forms to all email distributions lists for RN, RT, MD residents and MD attendings in pediatric ED and PICU.

Reminders were sent and the survey was closed after a period of 4 weeks.

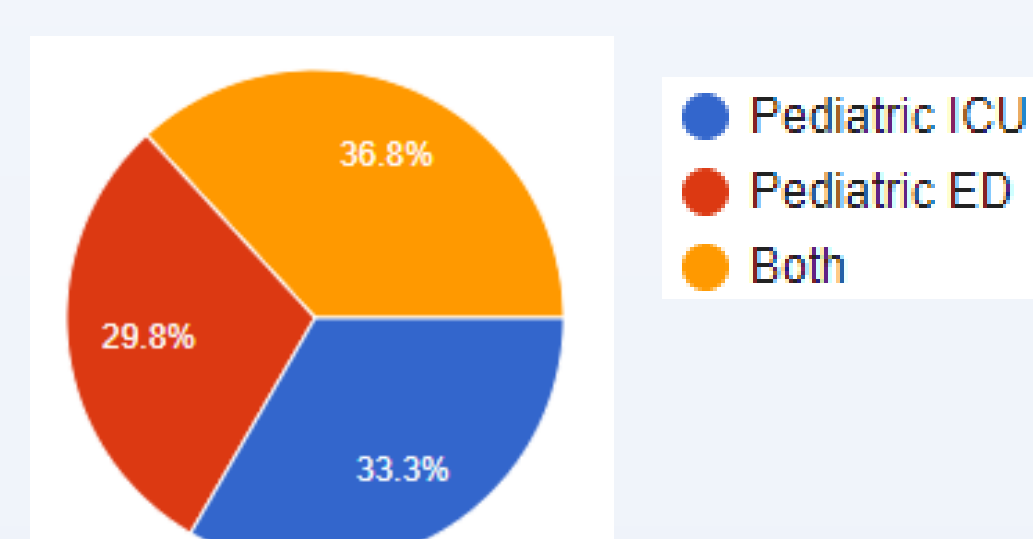
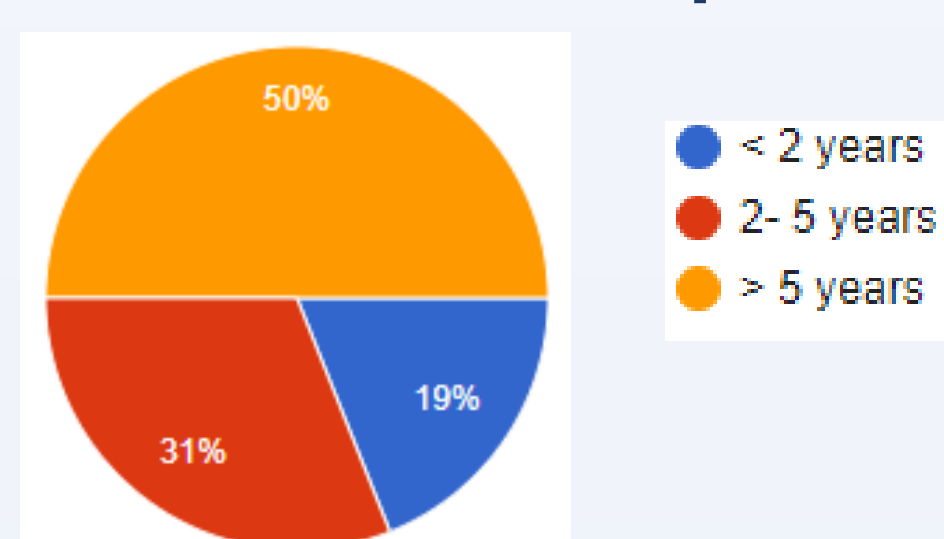
RESULTS

We received 58 completed surveys:

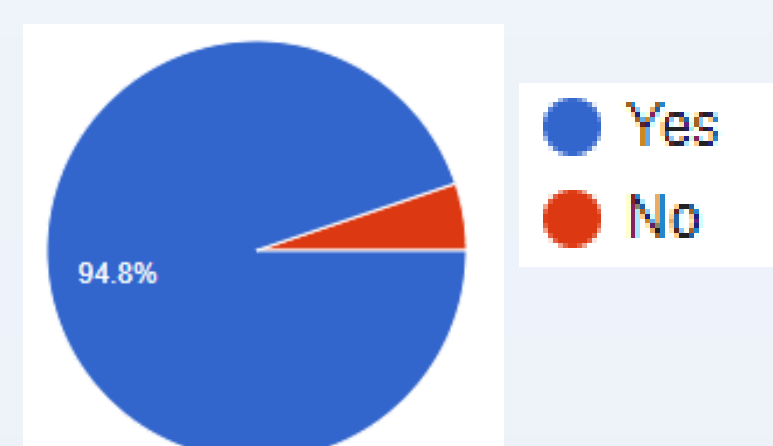
7 MD Attendings
 15 bedside RNs
 4 Clinical leaders/Charge RNs
 21/45 Pediatric residents
 11/25 respiratory therapists



Clinical Experience and Patient Care Role

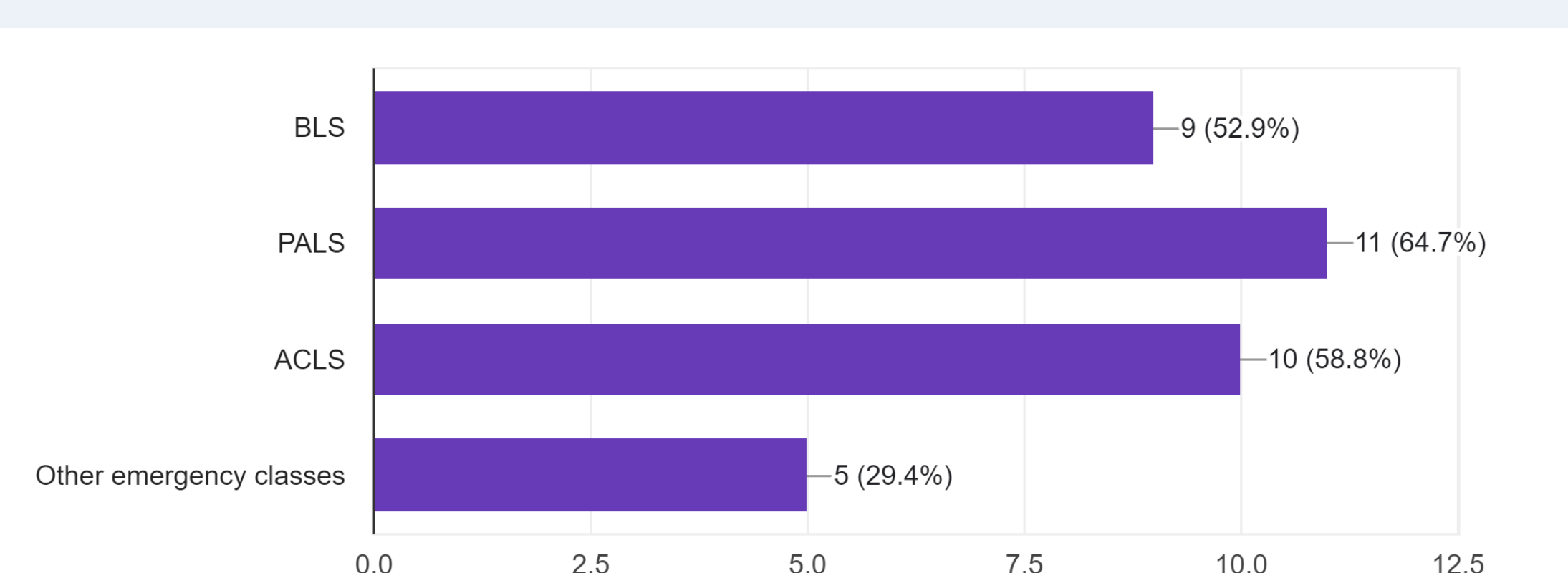


PALS-Certified



Yes = 55; N0=3

Certified AHA Instructors



Results Continued – Written Responses

In what SpO2 range would you want to start weaning your patient's FiO2?

It is reasonable to target what goal range of PaCO2?

What is your patients goal temperature?

What is your patients goal glucose?

Post-arrest AHA Goal Parameter	Responses matching AHA Goal	Responded "I don't Know"	Other written responses (> or < AHA goals)
Wean Oxygen when saturations >=94%	13	16	29
Normoglycemia and avoid hypoglycemia	28	26	4
Normothermia 36 to 37.5C	16	18	24
PaCO2 35 to 40 mmHg	22	24	12

SELF-REPORTED CONFIDENCE SCALE

Please rate your knowledge of providing pediatric post-arrest care per AHA PALS guidelines

1 (not-knowledgeable) and 10 (very knowledgeable)

LOW confidence (ratings of 1-4) N=15

MODERATE confidence (ratings of 5 to 7) N= 27

VERY HIGH confidence (ratings of 8 to 10) N= 16

CONCLUSIONS

- Our survey demonstrates responses from 58 clinical team members in our Pediatric ED and PICU setting. These team members demonstrate a high level of AHA certification level and clinical experience level with 10 ACLS and 11 PALS instructors and >50% of survey respondents having over 5 years pediatric bedside experience.
- Despite the experience and training of our survey respondents, we found a wide variation of overall knowledge of post-arrest care
- Importance of post-arrest monitoring for seizures, electrolyte abnormalities and rhythm abnormalities was well known
- We find the opportunity exists to introduce a post-arrest care bundle and standards to potentially reduce variability, improve comfort, confidence, and management of post-arrest goals of care

WHAT TO EXPECT IN THE NEAR FUTURE

- Participation in a multi-center registry of quality in Pediatric Resuscitation and Pediatric Resuscitation Bundles (pediRES-Q)
- Roll-out education and training on AHA guidelines for Pediatric Post Arrest care as defined in PALS
- Policies will provide guidance in delivering high quality care to pediatric post arrest patients