Epinephrine Auto-Injection Training For Health Care Providers Caring For Adolescents With Food Allergies: A Quality Improvement Project

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Background

- Childhood hospitalizations for food allergies tripled between 1990-mid-2000s with more than 40% of children experiencing anaphylaxis
- Fatal mock code exercise prompted need for further education about epinephrine auto-injectors
- Intra-muscular injection of epinephrine is the treatment of choice for anaphylaxis

Methods

<u>Participants</u>: Pediatric inpatient staff caring for adolescents (age 13-21) with food allergies Intervention: 5-minute video demonstrating correct epinephrine auto-injector technique Measurement:

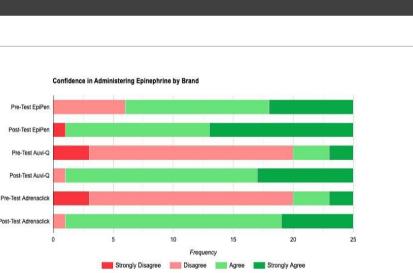
- Pre- and post-test injector technique assessed using FAME checklist
- 4-point Likert Scale measuring confidence in administering and teaching

Aim 1:

To increase health care providers knowledge on the steps in using epinephrine auto-injectors by achieving post-test scores of 80% or higher by end of demonstration.

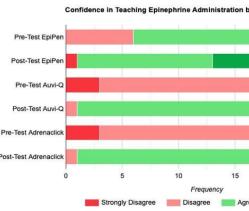
Aim 2:

To increase health care providers confidence in administering epinephrine during an anaphylactic emergency by increasing Likert Scores to 80% "strongly agree" by end of demonstration.



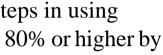
Aim 3:

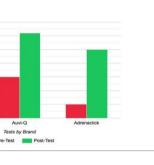
To increase confidence in health care providers to be able to teach back the skill of epinephrine injection to adolescents by increasing Likert Scores to 80% "strongly agree" by end of demonstration.





Implications for Practice





- This project has presented the need for educating health care providers on epinephrine auto-injector use.
- Successfully demonstrated the efficacy of delivering this education via digital training.
- This intervention cost zero dollars to create and deliver, requires no manual monitoring and can be performed at any time in any place.

Acknowledgements

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