Title:
Epinephrine Auto-Injector Training in Primary Care

Mary K. Peterson, DNP, MSN
School of Nursing, Quinnipiac University School of Nursing, Hamden, CT, USA

Session Title:
Evidence-Based Practice Posters Session 2

Keywords:
Anaphylaxis and evidence-based care, Epinephrine auto-injector training and Life-threatening food allergies

References:


Abstract Summary:
Lives of patients with life-threatening food allergies can be saved by providing epinephrine auto injector training. Correct and prompt administration of epinephrine is the only treatment for anaphylaxis. Learning to incorporate this training into primary care visits will ultimately improve the care of patients with life-threatening food allergies.
Learning Activity:

<table>
<thead>
<tr>
<th>LEARNING OBJECTIVES</th>
<th>EXPANDED CONTENT OUTLINE</th>
</tr>
</thead>
<tbody>
<tr>
<td>The learner will identify the need to apply evidence-based research on epinephrine administration training into the care of children with life-threatening food allergies.</td>
<td>Research on the risk of death from anaphylaxis due to failure to administer the epinephrine autoinjector correctly will be provided.</td>
</tr>
<tr>
<td>The learner will compare their current epinephrine administration training process to current evidence-based practice on epinephrine auto injector training during primary care visits.</td>
<td>Provide data on the need for epinephrine auto injector training into primary care visits. Discuss how implementing a practice change utilizing evidence-based practice in caring for children with life-threatening food allergies will positively impact their quality of care.</td>
</tr>
</tbody>
</table>

Abstract Text:

Children with life-threatening food allergies are at risk of death from anaphylaxis due to incorrect administration of epinephrine. A review of the literature supports the need for primary care practices to develop protocols for epinephrine auto injector training for their patients with life-threatening food allergies that are at risk for anaphylaxis. According to Wagner (2013), in a study of over 38,000 children the prevalence of food allergy is approximately 8%, which amounts to over 6 million U.S. children. Jaslow (2013) reports that according to a recent CDC study, the number of children with food allergies has doubled since the late 1990’s and that currently 1 in 20 U.S. children suffer from food allergies. With the number of children with life-threatening food allergies on the rise it is imperative that primary care providers provide the education necessary to keep them safe.

The learning objectives I have stated for this topic are: the learner will identify the need to apply evidence-based research on epinephrine administration training into the care of children with life threatening food allergies, and the learner will compare their current epinephrine administration training process to current evidence-based practice on epinephrine auto injector training during primary care visits. These objectives will be met through the presentation of the research and outcome data for children with life-threatening food allergies. There is over-whelming evidence that incorporating review of epinephrine auto injector training during primary care visits will save lives.

A potential risk for children with food allergies, the most common being peanuts, tree nuts, eggs, milk, shellfish, fish, wheat, and soy, is that accidental ingestion of the allergen will lead to anaphylaxis which could be fatal if not treated properly. Studies have shown that a large percentage of caretakers and/or patients themselves do not know how to properly use their epinephrine device (Bonds, Aswasa, and Ghazi, 2015). This lack of knowledge is of serious concern because the outcome of incorrect administration of epinephrine could result in death.

There is no doubt that the implementation of an epinephrine auto injector training protocol in private practice will enhance the lives of children with life-threatening food allergies at risk for anaphylaxis. The literature review supports the fact that the number of children with life-threatening food allergies in this country is on the rise. Children with life-threatening food allergies are at risk of suffering an anaphylactic reaction which could result in death. Prompt administration of an epinephrine auto injector is the first line treatment of anaphylaxis and a life-saving measure. Studies have shown that a large percentage of patients/families do not correctly know how to administer an epinephrine auto injector correctly. This lack of knowledge could result in an unnecessary death. Frequent review and education on proper
administration technique of epinephrine auto injectors by primary care providers is a life-saving action and promotes the well-being of children with life-threatening food allergies.

In conclusion, children with food allergies are at a high risk for developing an anaphylactic reaction. The only treatment for anaphylaxis is administration of an epinephrine auto injector. The administration of epinephrine needs to be done quickly and correctly to save the life of a person suffering from an anaphylactic reaction. It is my goal to promote the need for epinephrine auto injector training into primary care visits for those children who are at risk for anaphylaxis. Reviewing how to use an epinephrine auto injector can potentially save the life of a child. Changing practice protocols, based on evidence-based research, to incorporate the epinephrine auto injector training in private practice enhances the quality of care provided to children with life-threatening food allergies.