



Autism and The Emergency Department

An Educational Program

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Background

Autism Spectrum Disorder (ASD) is a life-long neurodevelopmental disorder that impacts 1 in 68 children. An intensive literature review found a lack of awareness of the disorder and appropriate care measures by nurses in the emergency department (ED).

- A life-long neurodevelopmental and neurobehavioral disorder
- Impacts 1 out of every 68 eight - year-old children in the U.S. 1 - 42 are boys and 1 - 189 are girls
- Occurs in all races, ethnic and socioeconomic groups
- Includes: Classical Autism, Asperger's and Pervasive Developmental Disorder
- Patient population that will be permanently present in our practices
- EDs have seen an increase with inpatient admissions
- ED's nurses begin the patient perception of care
- Improvement in understanding of disorder and methods for providing care to patient population is needed

The CDC surveillance summary found that:

- 31% of these children had IQ scores in the disabled range (<70)
- 23% were in the borderline range of 71-85
- 46% were of average or above average

- Common psychological and medical comorbidities
- Seizures and Epilepsy
 - Sleep and Gastrointestinal Disorders
 - Attention Deficit Hyperactivity Disorder
 - Anxiety and Depression
 - Obsessive Compulsive Disorder
 - Learning Disabilities

PURPOSE

Increase nurse awareness of ASD in the Emergency Department (ED) to achieve improved patient outcomes

Increased knowledge of disorder and comorbidities facilitates timely implementation of effective nursing interventions.

- Decrease stimuli
- Provide comfort
- Enhance communication with the ASD patients

EVIDENCE-BASED PRACTICE PROJECT

To enhance ED nursing staff awareness of care of ASD patients and appropriate nursing interventions, an evidence-based quality improvement project was developed and implemented

- Two main domains concerning diagnosis criteria of ASD
- Deficits in social communication and social interaction
 - Restricted or repetitive behaviors or interests

- Frequently seen symptoms with this diagnosis are the following
- Impairments in social interaction
 - Fixation on objects & concrete thinking
 - Low frustration tolerance
 - Repetitive actions and/or words
 - Over-stimulation
 - Hypersensitivity and Hyposensitivity

- The hypersensitivity and hyposensitivity symptoms of this disorder are significant challenges
- Responses to stimuli jumbled
 - Oversensitive to sound, touch, sight, smells and taste
 - May not recognize a typically painful injury
 - Some research suggests those with ASD and ADD/ADHD have higher rates of injuries requiring medical attention
 - Study found that ASD patients had a significant increase in ED visits due to psychiatric reasons versus a non ASD pediatric patient

- Currently there is limited training or awareness concerning this patient population
- There is a limit to strong evidence concerning best practices
 - It is critical to begin educating ED staff concerning ASD
 - Further research is needed
 - Research for educational presentation from various professional journals including pediatric nursing, behavioral pediatrics, nursing and medical journals

- Successful implementation of quality improvement project engaged key stakeholders
- South Carolina Autism Society
 - Individuals with ASD and their families
 - The ED nurse manager, nurse educator and the staff nurses



METHODS

An educational presentation presented to staff members of the emergency department

- Presented at mandatory staff meetings
- The content included: definition of the disorder, incidence statistics, signs and symptoms of disorder, and evidence based practices for their care
- Pictures of staff members' families with ASD was used for impact
- Nursing staff instructed on the importance of querying patients/ family members concerning Autism Spectrum Disorder during ED visit
- Education on appropriate nursing interventions: computer apps, visual cue cards, tongue depressors, x-ray apron

Strategies utilized to address various learning styles and needs of the adult learner

- Material presented in visual, auditory and kinetic format
- Power Point presentations used
- Discussions and follow up feedback



OUTCOMES

Subjective post-implementation feedback indicated a change in practice due to increase awareness of ASD in the ED

- The ED nurses reported improved awareness of the disorder and techniques for providing patient care
- Staff nurses discussed items available in their ED that could be utilized for ASD patient care
- Staff nurses determined methods for decreasing stimuli in ED
- The program outcomes, to implement evidence-based quality improvement practices and improve efficacy of assessment and treatment of patients with ASD were achieved
- The quality improvement project was budget neutral



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