

Acetylsalicylic Acid Desensitization Protocol for Cardiac Patients

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DESCRIPTION

At Humber River Health (HRH), physicians recognized the need for an Acetylsalicylic Acid (ASA) Desensitization Protocol within the Intensive Care Unit (ICU) to meet the needs of cardiac patients. ASA is an essential component in the management of acute coronary syndrome. There are some cardiac patients with history or testing-confirmed hypersensitivity to ASA. While an alternative medication may be ordered, there are clinical circumstances where ASA is preferred. Rapid drug desensitization is utilized in these cases, which is a high-risk procedure that permits introduction of such medication. This process involves a gradual stepwise introduction of increased doses that induce temporary immunologic tolerance.

OBJECTIVE

Develop a guideline and an order set to safely administer the ASA Desensitization Protocol to cardiac patients in the ICU.

ACTIONS TAKEN

For this project, a team of key interdisciplinary members were established which comprised of: Allergist, Intensivist, Cardiologist, Pharmacists, Clinical Practice Leader, Information Systems (IS) analysts, and Program Leaders. Stakeholders used a collaborative approach to develop and implement the following:

- Regular stakeholder meetings to share project updates and timelines
- ASA Desensitization Protocol Admission Criteria
- An electronic ASA Desensitization Order Set
- ASA Desensitization Protocol
- Nursing assessment intervention in the Electronic Medical Record
- Stocked all anaphylaxis/reaction management medications in Omnicell
- Provide education to all Registered Nurses and Pharmacists

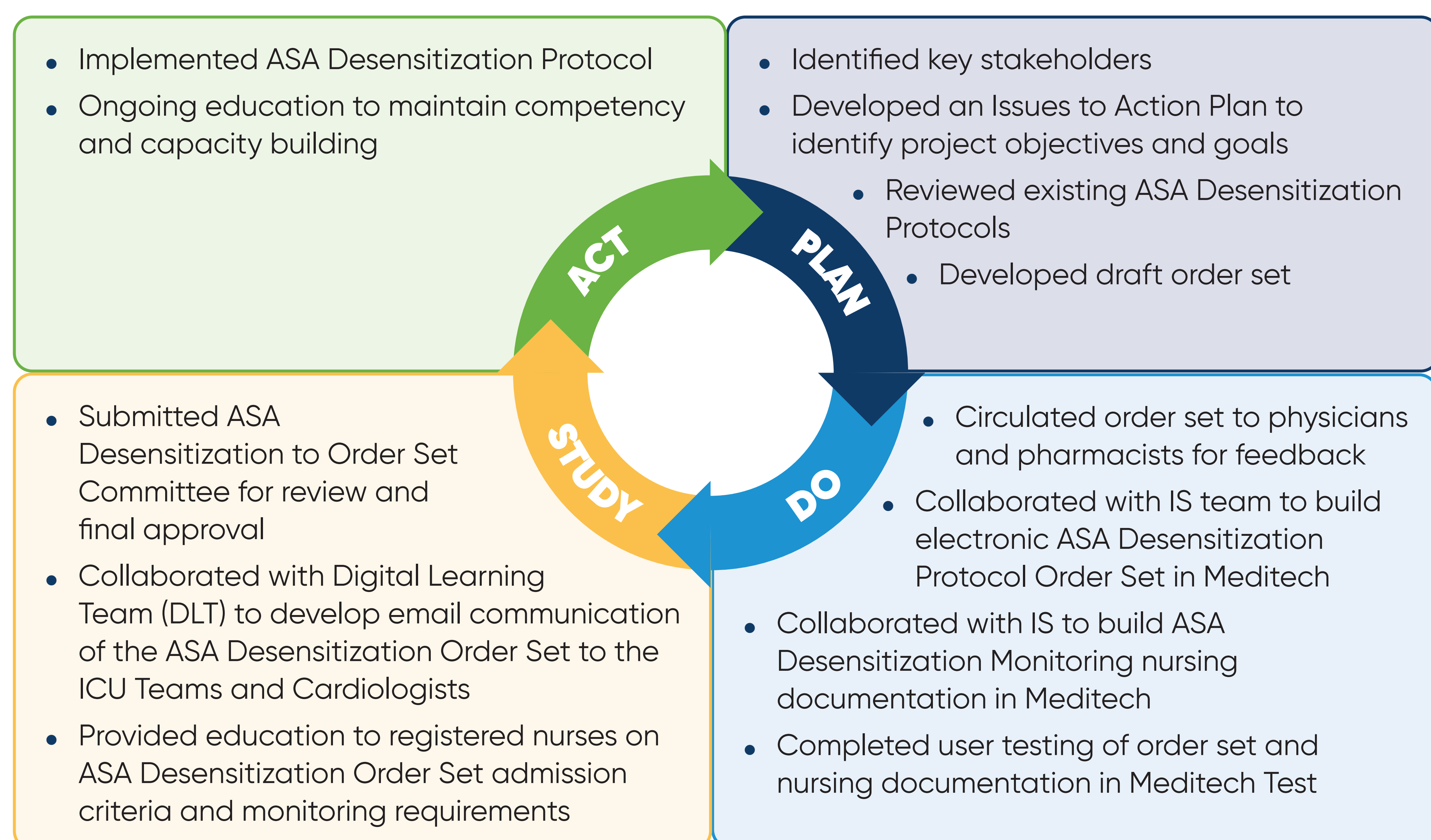


Figure 1. PDSA Cycle.

Figure 2. Electronic ASA Desensitization Order Set in Meditech.

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Interventions	
ASA Desensitization Monitoring As Dire...	✓
Assessments	✓
Symptom Monitoring	
Symptom Monitoring	
*Vital Signs Recorded	<input type="radio"/> Yes <input type="radio"/> No
*Reaction/Adverse Reaction	<input type="radio"/> Yes <input type="radio"/> No
General	<input type="checkbox"/> Anxiety <input type="checkbox"/> Irritable <input type="checkbox"/> Diaphoresis <input type="checkbox"/> Drowsy/Lethargic <input type="checkbox"/> Pallor <input type="checkbox"/> Altered Level of Consciousness <input type="checkbox"/> Cyanosis
HEENT	<input type="checkbox"/> Ocular Erythema <input type="checkbox"/> Rhinorrhea <input type="checkbox"/> Dysphonia/Laryngeal Edema <input type="checkbox"/> Ocular Pruritus <input type="checkbox"/> Sneezing <input type="checkbox"/> Ocular Watering <input type="checkbox"/> Congestion
Mucocutaneous	<input type="checkbox"/> Urticaria <input type="checkbox"/> Angioedema <input type="checkbox"/> Non-urticarial Rash <input type="checkbox"/> Pruritus Without Rash
Cardiovascular	<input type="checkbox"/> Tachycardia <input type="checkbox"/> Dizziness/Presyncope <input type="checkbox"/> Cardiac Arrest <input type="checkbox"/> Hypotension <input type="checkbox"/> Arrhythmia
Respiratory	<input type="checkbox"/> Dyspnea <input type="checkbox"/> Stridor <input type="checkbox"/> Tachypnea <input type="checkbox"/> Dysphonia <input type="checkbox"/> Hypoxia/Increasing O2 Requirement <input type="checkbox"/> Laryngeal Edema <input type="checkbox"/> Wheezing
Gastrointestinal	<input type="checkbox"/> Nausea <input type="checkbox"/> Vomiting <input type="checkbox"/> Diarrhea <input type="checkbox"/> Abdominal Pain/Cramping
Additional Assessment Details	

Figure 3. The ASA Desensitization Monitoring Intervention in Meditech for nursing assessment and documentation.

SUMMARY OF RESULTS

The development of the ASA Desensitization Protocol at HRH enables admitted cardiac patients in the ICU to receive medical interventions within the hospital, without having to transfer to another facility. This ensures continuity of timely care and overall satisfaction with health care delivery.

Following the implementation of the ASA Desensitization Protocol, stakeholders continue to review other opportunities for desensitization protocols, including antibiotic desensitization for various patient conditions.

LESSONS LEARNED

Inter-professional collaboration and support amongst multiple stakeholders enabled a successful implementation of this new protocol enhancing patient care delivery at HRH.

