CRYPTOGENIC STROKE PATHWAY: PLANNING AND IMPLEMENTATION GUIDE

Together, let’s improve stroke care
Many cryptogenic stroke patients are lost to follow-up. Pathways for transition of care and follow-up help to ensure these patients receive better care.

A Cryptogenic Stroke Pathway allows all healthcare professionals involved in the continuum to ensure a standard of care. Through this pathway, hospitals can:

- Provide underserved patient population a better risk reduction strategy to prevent a secondary stroke
- Establish cross-functional healthcare professional relationships to ensure integrated care delivery
- Ensure multidisciplinary stroke care involving both neurological and cardiovascular care
- Enhance hospital reputation in providing exemplary stroke care

WHAT IS A CRYPTOGENIC STROKE PATHWAY?

A Cryptogenic Stroke Pathway is a consistent approach to a follow-up plan and transition of care for patients with a stroke of unknown source.

This implementation guide is intended to extend your acute stroke protocol to include a monitoring plan for cryptogenic stroke patients. It includes monitoring for AF with the best monitoring mechanisms available to optimize outcomes.

WHY ESTABLISH A CRYPTOGENIC STROKE PATHWAY?

After initial stroke discharge, many patients are not receiving any additional cardiac monitoring. Establishing a monitoring pathway to detect and treat AF can significantly reduce a patient’s risk for another stroke. The ability to identify AF in patients with cryptogenic stroke has profound implications for long-term medical management.

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1. Increase in ischemic stroke risk for AF patients.¹
2. More likely for AF-related ischemic stroke to be fatal as non-AF stroke.²
3. Decrease in AF patient stroke risk with oral anticoagulants.³
1. Identify champions and align the multidisciplinary team

2. Agree on the pathway and education plan

3. Communicate and educate about new pathway to a prioritized list of healthcare providers in the hospital

4. Meet with cryptogenic stroke care team on a regular basis to assess implementation
THINGS TO CONSIDER

When developing the Cryptogenic Stroke Pathway, it is important to involve all stakeholders involved in the care of the patient.

Foundational Considerations
- Who will champion this effort?
- How is cryptogenic stroke defined at your hospital?
- You have an acute stroke protocol, but do you have a cryptogenic stroke pathway in place?
- Once a patient is deemed cryptogenic, what is the multidisciplinary pathway, transition of care, and follow-up plan in place for that patient?

Execution of Cryptogenic Stroke Pathway
- Do you have the infrastructure and staff in place to support the implementation?
- What else needs to be developed to support your plan?

Metrics
- Could this be a quality or process improvement project for your hospital?
- What will you measure in your pathway?
- What is your definition of success?
Identify Physician Champion and Ensure Multidisciplinary Buy-In
- Ideal to have both neurology and cardiology champions
- Ongoing communication among all specialties involved in the stroke care of the patient.
  - It is essential to establish patient ownership, coordination of care, and a transition of care plan
- The cardiac monitoring plan must be very clear at the onset and consistent throughout the continuum
  - Ensures patients are not lost to follow-up and all parties are aware of where the patient is within the continuum

Ongoing Education of all Stakeholders
Patient/Caregivers
- Tell the patient/caregivers about the cardiac monitoring plan and why it is important to look for AF after a cryptogenic stroke
- Designate nurse responsible for patient education throughout the care continuum (bedside nurse, nurse educator, nurse navigator, etc.)

Healthcare Professional Team
- Identify and educate whole care team on Cryptogenic Stroke Pathway (including hospitalists, nurses, fellows, PCPs, etc.)
- Use in-services and existing educational vehicles at hospital for continued education

Develop Stroke Care Team Communication Plan
- Communication is important prior to insertion, after insertion, when AF doesn’t/do occur, and prior to OAC initiation (if deemed necessary)
- Consider EMR notification
- Develop feedback loop
- Hold monthly interdisciplinary “Workflow” assessment meetings involving inpatient and outpatient care to ensure standardization of the process

Partner with Medtronic
- Understand available resources to assist your team in planning and implementation
- Learn best practices for utilizing Reveal LINQ™ ICM for cryptogenic stroke
Planning and Implementation Tools

Pathway Planning Materials
Includes multidisciplinary team discussion guide (PPT) to help foster clarity around pathway development.

Patient Education
Disease state and device educational materials, including a procedural video and patient responsibility sheet.

Patient Management Resources
Materials including information about best practices for Reveal LINQ patient management.

Healthcare Professional Education
Includes slide decks for use with colleagues during educational programs, and overview documents pertaining to data on cryptogenic stroke.

Healthcare Professional Educational Programs
Online and live educational programs available to multidisciplinary stroke care teams to help educate on the disease and Reveal LINQ ICM as a therapy option.

Public Relations Media Kit
Includes media materials and sample press releases.
CRYPTOGENIC STROKE PATHWAY

PATIENT DIAGNOSED WITH CRYPTOGENIC STROKE/TIA

Could detection of suspected AF impact patient management?

NO

Not a candidate

YES

Refer to cardiology to insert Reveal LINQ ICM

Inpatient

Inpatient/outpatient insertion

If unable to insert prior to discharge, potential external monitor bridge and schedule Reveal LINQ ICM

Insert Reveal LINQ ICM prior to discharge

Enroll in CareLink™ Network & perform remote monitoring

Schedule clinical follow-up with treating physician and ensure long-term adherence to monitoring

Outpatient

Insert expeditiously

Bridge with external monitor

AF not detected

AF detected

Insert Reveal LINQ ICM

Pathway based on the consensus of the Cryptogenic Stroke Pathway steering committee. February 2016.

Medtronic Disclosure Statement: This pathway is provided for educational purposes and should not be considered the exclusive source for this type of information. It is the responsibility of the practitioner to exercise independent clinical judgment.

Refer to the brief statement for indications, warnings/precautions, and complications for the Reveal LINQ ICM.
WHEN TO CONSIDER LOOKING FOR AF IN CRYPTOGENIC STROKE PATIENTS

Appropriate
- Stroke detected by CT or MRI that is not lacunar
- Absence of extracranial or intracranial atherosclerosis causing ≥ 50% luminal stenosis in arteries supplying the area of ischaemia
- No major-risk cardioembolic source of embolism
- No other specific cause of stroke identified (e.g., arteritis, dissection, migraine/vasospasm, drug misuse)
- First event — Stroke or High-Risk TIA
- CHADS² score ≥ 2 (Minimal risk factors)

Not Appropriate
- Indication for chronic anticoagulation or already on anticoagulation
- Patients with a relative contraindication for long-term anticoagulation and not appropriate for LAA closure device

* ABCD² Score >5

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References