

Final Report Acute and Rehab Operational Committee

Purpose

This committee came together in order to improve timely and standardized access of appropriate acute stroke inpatients to inpatient (IP) rehabilitation programming. The committee identified the following common issues or challenges with current processes within their respective organizations:

- Lengthy wait times for acute stroke patients to access in-patient active rehab
- Lack of communication strategies between acute and in-patient active rehab service provider teams
- Different intake criteria/referral processes for in-patient rehab units across the region
- Difficulty with early identification of stroke patients
- Delayed access to diagnostic imaging
- Inadequate number of rehab beds dedicated to stroke
- Limited access to outpatient rehab programming for stroke patients (impeding flow)
- Lack of physician engagement regarding knowledge of stroke best practices and limited physician-to-physician communication between acute care and rehab settings
- Stroke patients and their caregivers are anxious about the transition from acute care to rehab

Lack of a dedicated acute stroke unit was also noted to be an issue at two hospital sites, making early identification of stroke patients and smooth transitions with proper communication pathways even more difficult. This was identified at both Credit Valley Hospital and William Osler Health System.

Trillium Health Partners Mississauga Hospital noted they have two systems in place for transfer of stroke patients from acute to rehab. This is because stroke patients on the Comprehensive Stroke Unit (CSU) move fairly seamlessly from acute to rehab (as they do not need to move units, or even change beds), but since they also have acute stroke patients on the Neurosurgery unit, and not enough rehab beds on

the CSU to serve all stroke patients, a different process is used for stroke patients transferring to rehab units such as 4J or 5C.

Aims

The committee's focus was to develop strategies to address many of the challenges listed above. Once these challenges are addressed, sites will be better prepared to meet the best practice benchmarks of transfer from acute to rehab by day 5 for ischemic stroke and by day 7 for hemorrhagic stroke. The committee determined the following aims:

1. Implementation of standardized stroke rehab readiness criteria checklist at all sites. Other clinical data may also need to be obtained in order to make an accept/deny access to in-patient active rehab decision. (**See Appendix A**). Organizations can use in whatever format suits their current needs (paper, electronic, etc.).
2. Standardization of the triage process based on AFIM by developing a regional Stroke Flow Diagram (**See Appendix B**)
3. Compiling of a communication strategy to improve the relationship and communication between acute and inpatient rehab staff working with stroke patients.

Recommendations

In regards to the third aim listed above, Halton Healthcare presented to the group and shared some excellent ideas on how they have improved communication between the acute and rehab teams at their hospitals. Based on this work as well as other processes in place in the region the committee recommends that each site have or do the following:

1. Process in place for early identification of acute inpatient stroke patients including those that do not end up on the 'stroke' unit.
2. Ability to complete the stroke assessment and triage in a timely manner (Interprofessional team should assess the patient within 48 hours of admission to hospital and formulate a management plan (Canadian Stroke Best Practice Recommendation. 1.1 iii, 2015).
3. Process for timely completion of AFIM (target day 3). Consider developing a process to receive 'real time' data on AFIM completion rates as well as target LOS. For example, Halton HealthCare developed their stroke dashboard.

4. Use of the stroke flow diagram for consistent triage and as a communication tool amongst team members, and with patients/family when appropriate.
5. Improve use of ALC designation when stroke patient is medically stable. (**See Appendix C** Provincial ALC Definition from GTA Rehab Network)
6. Process in place for interdisciplinary team members to identify stroke patients who are rehab candidates and send referral to appropriate rehab setting/unit. This includes use of regional stroke rehab readiness criteria (based on stroke best practices) by receiving units to determine appropriate vs. inappropriate patients for inpatient active rehab. Any electronic or paper referral forms should contain all of the information needed to make an accept/deny decision based on this criteria.
7. Process in place for rehab to communicate *back* to the acute stroke unit in a timely manner if the patient was accepted, date bed is available, and if not accepted provide the reason why.
8. Education for stroke patients and their families (information handout/brochure, patient letter or script for staff to follow) moving from acute care to rehab which explains what to expect. This tool would assist with having early and productive discharge planning communication between interdisciplinary team members and patient and family members.
9. Discharge or transfer checklist or dashboard developed jointly by acute and rehab clinical teams so pertinent information is transferred between settings. (i.e. relevant investigations, status reports, treatment reports, follow up treatments/appointments). (See Example Discharge Transfer Checklist GTA Rehab Network **Appendix D**)

To encourage information sharing between various acute and rehab units caring for stroke patients in our region a West GTA Stroke Network Acute/Rehab Operational Committee Core Membership Contact List was created and is housed on the operational committee section of the West GTA website. . The hope is that instead of ‘reinventing the wheel’ facilities can adapt processes or resource being used at other hospitals for their own settings. One barrier with this is identifying who can keep this list updated and where to house it.

Some data related to the above recommendation are now being tracked and reported back quarterly via the West GTA Stroke Network’s Stroke Steering Committee (see list below). Those relevant to this committee’s work and/or recommendations are highlighted in yellow below:

The recent creating of the Stroke Dashboard through IDS BI™ in the MH LHIN will be helpful for tracking future trends related to meeting stroke best practices.

| Stroke/TIA Mortality within 30 days | Halton Healthcare | THP | Osler |
|--|-----------------------------|--------------------------|------------------------------|
| Readmission of Stroke/TIA Patients within 30 days | | | |
| AlphaFIM® Compliance | Q1 51%, Q2 100 % | Q1 64% Q2 69% | Q1 75.8% Q2 76.3% |
| AlphaFIM® done on day 2 - 4 | Q1 66% Q2 49.4% | Q1 90% Q2 83% | Q1 60.6% Q2 60.3% |
| Acute LOS (mean) | Q1 8.64 Q2 7.21 | Q1 9 Q2 9 | Q1 10.0 Q2 10.0 |
| Acute and ALC LOS (mean) | Q1 11.44 Q2 7.99 | Q1 10 Q2 9 | Q1 13.6 Q2 13.1 |
| Rehab LOS (mean) | | | |
| Rehab and ALC LOS (mean) | | | |

This tool was presented at Stroke Steering Committee in March and can provide both a regional but also organization specific overview of data elements such median days from stroke onset to rehab admission (which for MH LHIN Q2 was 8.5). This software and dashboard is not yet available in the CW LHIN.

Future Considerations

Although delayed access to diagnostic imaging was identified as a barrier, it was beyond the scope of the work of this committee. The West GTA Stroke Network does encourage its hospital partners to look at working with team members from diagnostic imaging to determine if there are ways to minimize access delays to Diagnostic Imaging and Medical Diagnostic Unit procedures which may be holding stroke patients longer in acute care beds. Work may also need to be done in conjunction with rehab clinical teams to determine which follow up DI tests can be completed after transfer to rehab.

As well, opportunities exist to improve nursing awareness of the AFIM tool, the plan of care, discharge plans, and rehab readiness criteria. Increasing nursing knowledge of these aspects of stroke rehab are likely to improve the overall interdisciplinary communication within a team, as well as communication *between* units, thus helping to both speed up and smooth the transfer from acute to rehab for stroke

patients. Currently, the primary driver of these transfers is allied health care team members (i.e. OT, PT, SLP) who are not always privy to the 24-hour picture of the patients, may have less contact with family due to the typical daytime-only therapy schedule, and are less available on weekend to assist with weekend transfers from acute to rehab settings.

The committee members noted as well that there is a need for further education for nursing staff on Rehab units since stroke patients are being transferred there more quickly and at the staff report feeling ill-prepared at time to deal with more acute stroke patients who may have greater medical and self-care needs.

Appendix A: Stroke Rehab Readiness Criteria Checklist

Criteria for admission to rehab setting should be standardized and communicated to all referring centre and services.

| ITEM or CRITERIA for STROKE REHAB READINESS CHECKLIST (Inclusion Criteria) | Yes | No |
|--|-----|----|
| ■ Recent stroke (less than one year or more than one year and requires IP team/rehab with nursing care) | | |
| ■ Requires interdisciplinary team to reach functional goals | | |
| ■ Stroke etiology and mechanisms have been clarified and prevention strategies started | | |
| ■ Medically stable (confirmed diagnosis of stroke, co-morbidities addressed, acute disease does not preclude participation in the program, vital signs stable) | | |
| ■ Adequate stamina (physical and mental) to participate in program demands | | |
| ■ Able to follow one step command with communication support if needed | | |
| ■ Sufficient attention, STM and insight to progress | | |
| ■ Potential to return to baseline function OR increase post-stroke functional level | | |
| ■ Has goals which are SMART | | |
| ■ Has consented to the program (or consent obtained through substitute decision maker) | | |
| ■ <u>No</u> behavioural issues limiting patients ability to participate in the program at the minimum level required | | |

Exclusion Criteria:

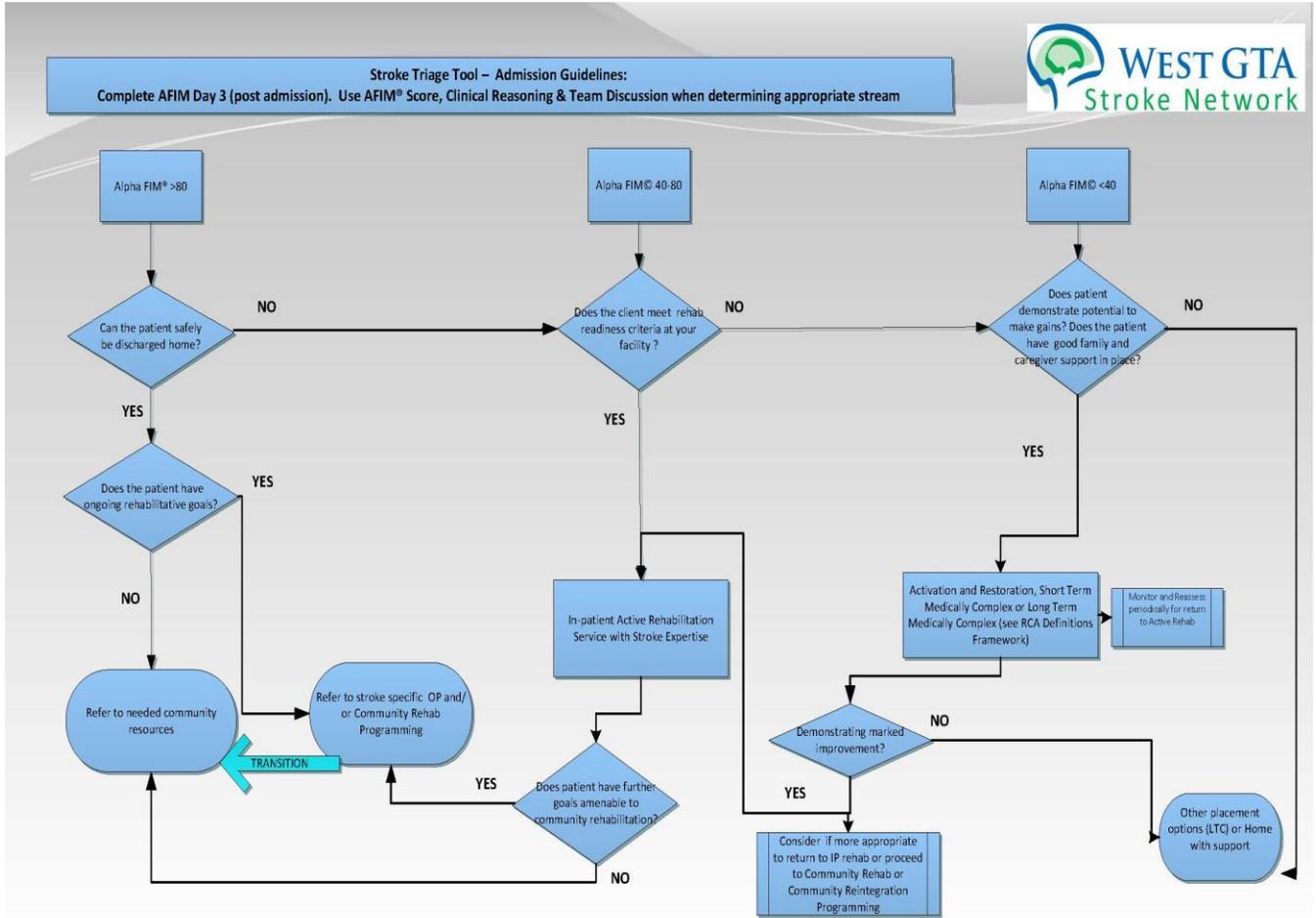
- Severe cognitive impairment that prevents learning or participation in therapy
- Needs being met elsewhere (receiving treatment elsewhere)
- Terminal illness with expected short survival
- Not willing to participate in the program

| Other Clinical Data To Consider | Yes | No | Score or data/comment (if appropriate) |
|--|-----|----|--|
| AFIM | | | |
| MOCA Screen | | | |
| Depression Screen | | | |
| Age of Client | | | |
| Pre Stroke Frailty? | | | |
| Existing Comorbidities | | | |
| Caregiver or Family Support? | | | |
| Anticipated date client will be ready for rehab? | | | |

| RAW FIM® Rating (Sum of Raw Motor and Cognitive Ratings) | Daily Care Requirements (Hours of Assistance Needed) |
|--|--|
| 20 | ➤ 8 |
| 21-30 | Approximately 7-8 |
| 31-40 | Approximately 6-7 |
| 41-50 | Approximately 5-6 |
| 51-60 | Approximately 4-5 |
| 60 | Approximately 4 |
| 80 | Approximately 2 |
| 90 | Approximately 1 |
| 100 | Minimal or no |
| 110 | No assistance |

*Use as a guide when discussing care needs and discharge plans. Note the average stroke patient makes 20-25 pt. change in FIM during inpatient active rehab. Note AFIM/FIM® tools do not measure assistance needed for Instrumental Activities of Daily Living (shopping, transport, meal prep., banking etc.).

Appendix B: Stroke Flow Diagram



Appendix C: Provincial ALC Definition from GTA Rehab Network

Available at: <http://www.gtarehabnetwork.ca/uploads/File/tools/inpatient-rehab-LTLD-referral-guidelines.pdf>

| APPENDIX | |
|---|---|
| Provincial Alternate Level of Care (ALC) Definition For implementation in all acute and post-acute hospitals* (Adapted from the Wait Time Information Strategy) | |
| <p>Provincial ALC Definition</p> <p>The healthcare system aspires to deliver care in a setting that is congruent with the clinical needs of a patient as defined by the patient's health status, treatment plan and goals.</p> <p>The definition applies to all patient populations waiting in all patient care beds in an acute or post acute care hospital in Ontario.</p> | <p>Note 1</p> <p>The patient's care goals have been met <i>or</i></p> <ul style="list-style-type: none">- progress has reached a plateau <i>or</i>- the patient has reached her/his potential in that program/level of care <i>or</i>- an admission occurs for supportive care because the services are not accessible in the community (e.g. "social admission"). <p>This will be determined by a physician/delegate, in collaboration with an interprofessional team, when available.</p> <p>Note 2</p> <p>Discharge/transfer destinations may include, but are not limited to:</p> <ul style="list-style-type: none">- home (with/without services/programs),- rehabilitation (facility/bed, internal or external),- complex continuing care (facility/bed, internal or external),- transitional care bed (internal or external),- long term care home,- group home,- convalescent care beds,- palliative care beds,- retirement home,- shelter,- supportive housing. <p>This will be determined by a physician/delegate, in collaboration with an interprofessional team, when available.</p> <p>Final Note</p> <p>The definition <u>does not</u> apply to patients:</p> <ul style="list-style-type: none">- waiting at home,- waiting in an acute care bed /service for another acute care bed/service (e.g., surgical bed to a medical bed),- waiting in a tertiary acute care hospital bed for transfer to a non tertiary acute care hospital bed (e.g., repatriation to community hospital). |

*as of July 1, 2009



Discharge / Transfer Checklist For Transfer of Patients to Inpatient Rehab/CCC

Inpatient rehab/CCC should be notified before transfer of patient if:

- Patient requires medications not usually available in a rehabilitation pharmacy
- Any changes in infection status
- New IV insert
- Significant change/deterioration in medical condition

If the following information is not included in your discharge summary report, please attach the most recent and relevant documents for the information below.

| Relevant Investigations | Status Reports |
|--|--|
| <input type="checkbox"/> Labwork <input type="checkbox"/> CT scan report <input type="checkbox"/> MRI Scan report <input type="checkbox"/> ECG <input type="checkbox"/> INR (5 day coumadin dose history) <input type="checkbox"/> Videopharyngeal Swallowing report <input type="checkbox"/> Chest X-ray report <input type="checkbox"/> Other (specify) | <input type="checkbox"/> Patient care plan <input type="checkbox"/> Current voiding status <input type="checkbox"/> Current diet orders <input type="checkbox"/> Current medication administration record (MAR) <input type="checkbox"/> IV Therapy <input type="checkbox"/> Current Infection Control Status <input type="checkbox"/> Current wound management <input type="checkbox"/> G-tube feeds/type/tube size/schedule/change date <input type="checkbox"/> Ostomy <input type="checkbox"/> Current O ₂ rate and flow <input type="checkbox"/> Advance Care Directives |
| Treatment Reports | Follow Up / Treatment Appointments |
| <input type="checkbox"/> Consultation notes <input type="checkbox"/> Medical discharge summary <input type="checkbox"/> Last OT, PT, SLP, SW assessment and progress notes | <input type="checkbox"/> Type of Appointment <input type="checkbox"/> Appointment Date/Time/Location <input type="checkbox"/> Preparation Required |