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THE IMPACT OF COVID-19 PANDEMIC RESTRICTIONS ON GERIATRIC DAY HOSPITALS AND GERIATRIC AMBULATORY CARE IN CANADA: ADAPTING FOR FUTURE WAVES AND BEYOND

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Abstract

The COVID-19 pandemic has not only directly impacted the health of those older adults infected with the virus, but also led to social isolation, loneliness, functional decline and the destabilization of chronic comorbidities. Throughout this period, clinician leaders from across the country providing ambulatory care to this population benefitted from regular video-conference calls to share challenges, innovations and emerging best practices. Going forward, particularly in the context of a potential second wave or other future pandemic, lessons learned suggest that we must advocate for: the improved availability of technology for patients; consistent rapid access to ambulatory care that is more tightly integrated with primary care; stable in-home caregiving; and enhanced virtual care in order to better support the health and wellness of our frail seniors.

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Key messages

- COVID-19 pandemic restrictions worsened health outcomes for older adults by causing social isolation, limiting access to outpatient healthcare, disrupting in-home assistance and creating an environment of loneliness.
- Virtual care methods improve access for some; however, there is significant disparity in access amongst older adults depending on social determinants of health, physical and cognitive function. As telemedicine becomes more ubiquitous, so will the need for ensuring access and telemedicine readiness universally across Canada.
- A proactive plan balancing ambulatory virtual and in-person assessments is important in specialized geriatric services care models, with novel approaches to the comprehensive geriatric assessments going forward.
- In-home caregiving protocols, approaches and policies must be reviewed and optimized to allow for ongoing in-home care.
- Communication between primary care providers and specialized senior services must be maintained and optimized for better frail older adult care.

Introduction

Since the World Health Organization declared the global outbreak of COVID-19 infection a pandemic on March 11, 2020[1], life as we know it has changed dramatically. Healthcare institutions implemented pandemic plans where hospitals and clinics minimized or eliminated non-urgent encounters and planned for a potential surge of COVID-19 cases. It quickly became clear that older adults are particularly vulnerable to COVID-19 infection and suffer worse outcomes than younger people[2,3]. Particularly concerning for healthcare providers who care exclusively for older adults was the negative impact on the health and wellness of all vulnerable seniors, not just those infected with the virus. Senior care specialists have had to rethink and redesign how they deliver care to align with directives from their local health authorities and home organizations.

Before the pandemic was declared, ambulatory services specializing in caring for older adults typically followed one of three general formats:

1. Traditional Geriatric Day Hospital (DH): patients are seen by a geriatrician or a care of the elderly physician and allied health professionals, with a longitudinal program to address their multiple medical issues and geriatric syndromes over a period of weeks. Recreational and therapeutic small group programming are often key components. The effectiveness of Geriatric Day Hospitals has previously been reviewed in this journal (see http://canadiangeriatrics.ca/wp-content/uploads/2017/02/The-Geriatric-Day-Hospital.pdf).
2. Comprehensive Geriatric Assessment (CGA) ambulatory care clinic: patients are similarly seen by specialty physicians and allied health professionals, as in the previous model, but the professionals provide comprehensive assessments and advise treatment recommendations to primary care providers to follow either as a single assessment or brief targeted follow-up.
3. Geriatric medicine ambulatory care clinic: specialty physician, with limited affiliated team members, assesses a patient and provides recommendations to the primary care provider.

Regardless of format, these outpatient clinics generally serve adults 65 years of age and older who have multiple medical comorbidities and one or more geriatric syndromes based on the Geriatric 5Ms (see http://canadiangeriatrics.ca/wp-content/uploads/2017/04/UPDATE-THE-PUBLIC-LAUNCH-OF-THE-GERIATRIC-5MS.pdf)[4]. These older adults tend to have some level of functional dependency and many rely on caregivers for their daily survival.

Since the pandemic began, most specialized geriatric ambulatory care services had to temporarily suspend their clinical activities due to their physical location (e.g. co-location within acute care hospitals or long-term care facilities) or loss of staff (e.g. redeployment or illness) or, if able to remain open, dramatically change how they operate by switching to a largely virtual model). This coincided with challenges in accessing primary care, specialist care, home-care services, outreach programs and caregiver support. As a result, older adults have been at increased serious risk of experiencing worsening health outcomes, increasing social isolation and manifesting progressive functional decline.

This article attempts to summarize the experiences and observations of leaders in geriatric outpatient services across the country shared over the course of a series of regularly scheduled video conferences (CGS-PGLO Geriatric Day Hospital/Geriatric Ambulatory Care Interest Group Meetings).

Adapting in the Moment

How individual centres adapted varied across the country and was based on staffing and existing experience and infrastructure, enabling a shift to virtual care. Triaging urgency and focused assessments were essential tools for all centres. Physician and nurse-led assessments were able to continue in most centres. Phone-based assessment and follow-up was the most common method with some centres able to offer a hybrid assessment with initial phone interview followed by a very focused in-person assessment of the highest risk individuals. Phone-based assessments were identified as being feasible in individuals already known and followed by the physicians but much more challenging as a single modality for diagnostic assessment of new referrals. Patients with certain presenting problems (such as frequent falls, undiagnosed Parkinsonism and atypical dementias) posed particular challenges using virtual methods, with physical examination being a necessary part of the assessment. For patients requiring objective cognitive testing, additional challenges were faced by the clinicians. Few cognitive tests were validated for telephone application. Administering a cognitive test virtually, both telephone and video can also be plagued by technical challenges such as sensory impairment, poor technology connectivity and caregiver interference. A recent Canadian Geriatric Society Continuing Medical Education article published in May 2020 provided guidance to clinicians to address these concerns (see https://canadiangeriatrics.ca/wp-content/uploads/2020/05/Virtual-Approaches-to-Cognitive-Screening-During-Pandemics_FINAL.pdf)[5]. Centres already employing video-based assessments were at an advantage while rapid adoption of technology and learning about best practice was needed in other centres. Lack of access to necessary equipment due to worldwide shortages of materials such as webcams was a barrier in many settings. Where available, video-based assessment was found to allow for a more comprehensive assessment than phone assessment.

When older adults already had access to technology and were adept at using these, centres were generally able to direct them to services and social resources accessible by internet. These individuals generally were able to maintain social networks and maintain contact with family through virtual means. A disparity amongst older adults with and without robust social determinants of health (SDOH) became clearer as those with more robust SDOH could better meet their needs during pandemic restrictions.

Patients who were in the process of multidisciplinary assessment and ongoing treatment in the traditional Day Hospital model who did not have technology access were particularly vulnerable. In those programs who maintained skeleton staff, strategies that mitigated poor outcomes included:

- Frequent monitoring by telephone to assist with problem solving and resource access.
- Specific direction regarding exercise. This varied from mailing out an exercise program with a TheraBand to directing patients to local online exercise programs.
- Facilitating connection with phone-based social resources such as volunteer phone contact and local social agencies offering telephone-based recreation programs.
- Close collaboration with existing services such as geriatric outreach teams (see https://canadiangeriatrics.ca/wp-content/uploads/2018/10/3_Phil-St.-John-Article-Formatted-final.pdf).
- Deprescribing by phone in collaboration with community pharmacy or primary care.
- Periodic re-triaging for priority of intervention.

Despite these strategies, deconditioning, loneliness and caregiver stress occurred.

Moving forward

As of early August most centres were in the process of slowly expanding services though recognizing that future waves may result in retraction of services. Day Hospital small group programs are not expected to return for the foreseeable future. Throughout this time new referrals were received and continue to be received at all centres. Triage processes have been developed to prioritize the resulting backlog of referrals. Uniformly, centres are adapting their practice to much more comprehensive up-front phone-based assessment to allow for triaging and determination of the focus of the intervention. While this challenges our traditional models of CGA, it fosters interdisciplinary care and moves us away from duplicating assessments. Literature shows that CGA is most effective in improving patient outcomes when targeted at high-risk patients and when strategies are in place to encourage adherence to recommendations (see https://www.jamda.com/article/S1525-8610(16)30521-7/fulltext)[6]. Virtual strategies may be used to improve adherence to recommendations (e.g. regular follow-up phone calls to patients or primary care), and replace some in-person small group programming or in-person visits when these are not possible, but generally this has yet to be explored as most centres are still struggling to address new referrals.

Lessons Learned

The onset of the COVID-19 pandemic has underscored the important role geriatricians and care of the elderly physicians have in patient advocacy – namely, devising novel methods to improve access to care. Four key areas have come to light and need ongoing development and advocacy: technology access, ambulatory care strengthening, in-home caregiving and optimizing models of virtual care.

Make technology accessible

Technology has offered solutions to improve access during the pandemic, but has tended to conflict with the needs and realities of our patient population. A recent cross-sectional study of adults 65 and older looked at telemedicine unreadiness due to various intrinsic and extrinsic factors[7]. They found that 38% of older adults were not ready for video visits predominantly due to inexperience with technology. Even when connected to a social support to facilitate video telemedicine, 32% were unready. In the case of telephone visits (often deemed inferior to video telemedicine), 20% were unable to benefit due to hearing, communication or cognitive difficulties. How do we prevent our older adult population from falling behind in virtual technology access, setup and implementation? Traditionally, appointments for frail older adults often required facilitation by family, whether for in-person assessments or virtually. During the pandemic, the challenges of isolation were prevalent and hence any assessment relied on the independent abilities of the older adult to answer a phone or to set up video conferencing (e.g. Zoom). Increased need to acquire, teach and practice virtual technologies is critical to prevent disparity in care for older adults[8]. For example:

- Within acute care, following the concept of transitional care planning, prepare patients with connectivity information and teaching pre-discharge. Consideration of a technology interface specialist by expanding the role of recreational therapists in acute care or including this role with the virtual visitor programs in acute care could be options.
- Encourage families to create a virtual hub in-home, with instructions. Low income options must be considered by provinces to support virtual care. Families can consider obtaining home health monitoring devices (e.g. ambulatory BP monitor) to facilitate virtual outpatient assessments and medication renewals.

Strengthen ambulatory care for seniors

The fear of entering an emergency department that was prevalent amongst the older adult population, combined with the challenge of effectively managing chronic comorbidity virtually, caused many older adults to develop medical instability. More than 80% of family practice "visits" were virtual during the pandemic. Routine visits for chronic disease were postponed[9]. While significant planning occurred around the reopening

of surgeries, dementia and seniors' clinic reopening was not prioritized with a coordinated plan or response. From the pandemic experience, the value of appropriate triaging has been especially notable and improved our ability to deliver appropriate care to the right patient within resource constraints. Going forward, proactive case finding including close partnerships with primary care may help identify the most at-risk seniors early on and provide them with timely CGA. If families feel connected to their primary care provider with rapid access to specialized seniors' services, then they may be less inclined to visit an emergency department, as has been seen in previous systematic reviews on outpatient multidisciplinary geriatric evaluation and management (see https://doi.org/10.1093/gerona/61.1.53)[10]. A health system strategy that prioritizes the ongoing support of seniors' ambulatory care clinic infrastructure and functioning will be crucial going forward to prevent avoidable destabilization, decline and emergency department visits. Individual ambulatory services will need to have plans in place to be ready to quickly adapt their model of care if there are sudden changes in ability to conduct in-person assessments, which should include the ability to provide care virtually. For some socially isolated, marginalized, homebound or rural populations, home visits may be the only option unless access to technology for older adults can be assured. For group interventions, small teleconferenced or virtual groups may be an option.

Support in-home caregiving

During the lockdown, without family members or active home care teams consistently entering their homes (either on patient/family request or due to lack of personal protective equipment (PPE) or an implementation plan) many seniors experienced a functional decline due to the lack of necessary supports. Encouragement of virtual connectivity, facilitated telehealth[7] and improved family confidence in providing direct assistance (through better understanding of safe visiting practices and donning PPE) have been identified as key to mitigating loneliness and improving mental health in older adults. This pandemic has demonstrated the importance of longitudinal medical care, home care and family care in helping to support an older adult in independent living at home. While long-term care reform is being reviewed, we advocate that in-home caregiving follow a similar strategy of improvement and readiness for future pandemic waves and beyond.

Optimize virtual care

Improved communication at the time of referral is needed to facilitate better triaging and to enhance the quality of outpatient virtual consultation, especially to identify those conditions that require in-person assessment[11]. In-person assessments with specialized geriatric service care providers must remain available for certain circumstances to confidently provide a diagnosis within an ambulatory pandemic prepared environment. Examples that may be suitable to a mixed virtual model include the Rapid Access to Consultative Expertise (RACE) "just-in-time" service that supports a shared care model (https://www.cfhi-fcass.ca/WhatWeDo/connected-medicine), Interface Geriatrics[12] (involvement of geriatricians when a patient enters or leaves acute, subacute, emergency or community care points) including rapid access clinics post-emergency visit[13], polypharmacy assessments, interdisciplinary models of care and consultation to supportive/long-term care homes. Certain allied health assessments and interventions are more amenable to virtual care, including those of the dietitian, pharmacist and social worker. New locations of care may need to be considered such as day hospitals that operate away from acute care or long-term care sites, falls prevention programs that reopen in recreational centres (while they are otherwise closed to the public). Virtual models that integrate the concept of interface geriatrics have the potential to prevent avoidable emergency department use, unnecessary admissions to hospital, shorten duration of hospitalizations and ensure access to appropriate care pathways based on need.

Conclusion

The COVID-19 pandemic has unmasked important deficiencies and vulnerabilities in current specialized geriatric ambulatory care delivery models. The clinical practices of geriatric medicine and care of the elderly have relied on lengthy in-person assessments involving multiple allied health team members and visits, which become impractical or impossible to do when patients cannot present in-person during a pandemic. Furthermore, the absence of existing infrastructure or contingency plan to provide virtual care make

maintaining the same level of care to our vulnerable patients very challenging. At the societal level, we need to better prepare for the future by ensuring that our older adults can have equal and facilitated access to technology. At the health system level, we need to strengthen collaboration with primary care and focus on supporting geriatric ambulatory care to avoid need to access acute care and ensuring uninterrupted delivery of in-home care. At the clinic level, we need to embrace technology and plan to adapt our assessments and treatments virtually so that we are more comfortable with virtual care while remaining true to our roots in optimizing the 5Ms of geriatric care (see https://Geriatric5Ms.ca).

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