Maintaining and Advancing Quality Cancer Care During a Global Pandemic

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Abstract: The care of patients with cancer occurs in a fast-moving, highpressure, and high-stakes ecosystem. Early in 2020, that complex ecosystem was further complicated by the advent of the COVID-19 pandemic. We address actions taken by care providers and systems during the initial phases of the pandemic, and how those actions preserved lifesaving and life-sustaining cancer care despite severely constrained resources. We outline cancer care principles and guidelines that were developed, shared, and adopted by cancer care organizations across the country. Care delivery concerns that arose during the pandemic, including equipment and personnel shortages, moral distress for care providers, and exacerbation of health care inequities are addressed. Process and operations changes taken by payers to serve their clients are described. Lessons learned are highlighted, along with a call to action that we learn from the experience, broaden our cancer care delivery mission, and commit to structural changes that will permanently improve the capacity of cancer care teams.

Key Words: COVID-19, Cancer, care delivery, quality

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he care of patients with cancer occurs in a fast-moving, highpressure, and high-stakes ecosystem. Early in 2020, that complex ecosystem was further complicated by the advent of the COVID-19 pandemic, forever changing the cancer care team's assumptions, processes, and expectations. For the first time, the entire cancer caregiving team was truly at one with their patients and their families. Patients and their care teams were unsettled and frightened by the risk of infection with severe acute respiratory syndrome coronavirus 2, which could lead to serious illness and death. Undeterred by adversity, dedicated members of the cancer caregiving team approached the COVID-19 pandemic with determination and resolve and continued to deliver high-quality care, albeit with significant limitations, despite the rapidly spreading virus. All aspects of care delivery were carefully and thoughtfully reviewed to incorporate COVID-19 protocols to mitigate viral spread and maximize patient survival. Priorities included provision of lifesaving and life-improving cancer care; protection of patients, families, and staff from infection; and equitable management of severely constrained resources.

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ACTIONS BY CARE PROVIDERS DURING THE INITIAL PHASES OF THE PANDEMIC

Clinicians focused on media and medical reports as viral illness emerged first in China, Italy, and then in the United States, in Seattle, New York, and beyond, to learn about its patterns of spread, clinical manifestations, and sequelae. Public health leaders across the world analyzed the disease's impact and put forward population-based guidelines to mitigate viral spread, focusing on principles of physical distancing, hand washing, and masking. Cities, communities, and health care systems established Incident Command Centers to strategize how best to care for populations within their purview and to establish and/or amend policies and procedures critical in limiting further spread of the disease. As we searched for guidance, evidence-based information seemed slow to emerge, but knowledge of early management strategies grew rapidly because of medical reports filed almost in real time from areas initially affected. Everywhere, responses were swift, and leaders were transparent. This sharing of information and strategies from clinicians throughout the world significantly aided attempts to contain the disease especially as new challenges emerged almost daily.

Guidelines outlining modifications in all phases of cancer care delivery were promptly created and shared broadly by large cancer care organizations. For example, Ontario Health Cancer Care in Ontario, Canada, issued the "Pandemic Planning Clinical Guideline for Patients With Cancer"¹ on March 19, 2020, and Roswell Park Comprehensive Cancer Center issued similar early and comprehensive guidelines that were widely circulated.² Large professional organizations developed COVID-19-focused cancer care recommendations. The American Society of Clinical Oncology (ASCO) included on its Web site resource page recommendations for how to manage and modify the timing of antineoplastic treatment for patients with cancer infected with severe acute respiratory syndrome coronavirus 2.3 The National Comprehensive Cancer Network issued recommendations that included management of isolation, vaccination, and clinician stress (in English, Spanish, and Chinese).⁴ The Center to Advance Palliative Care created and shared on its Web site COVID-19 response resources for palliative care.⁵ The American College of Surgeons issued a series of guidelines beginning in March 2020 with recommendations for management of elective surgical procedures and followed by 20 additional guidelines focused on maintaining essential surgical care during the pandemic.⁶ The American Society of Radiation Oncology posted disease-specific guidelines online, including recommendations for prioritization, triage, and evidencebased abbreviated (hypofractionation) treatment regimens when appropriate."

Individual health organizations, such as The University of Pennsylvania Health System, also developed and shared principles of cancer care. These principles emphasized maintaining curative cancer care and added consideration of COVID-19 risk into traditional risk/benefit estimates when discussing cancer treatment options with patients and families, as well as arranging treatment,

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when feasible, at sites away from the medical center. These were general principles put forward as very broad guidelines that were used at Penn Medicine. The principles include the following: (1) when possible, the standard of care should be delivered; (2) priority should be given to patients with potentially curable disease; (3) patients who are receiving end-of-life care should receive their care at home via telehealth visits; and (4) the age of a patient, as well as any comorbidities, should be taken into consideration in delivering their care. In addition, many cancer care systems rapidly incorporated telehealth platforms into routine clinical care when feasible, as discussed elsewhere in this monograph. See Table 1 for illustrative examples of COVID-19 cancer care principles and guidelines.

CARE DELIVERY CONCERNS IN LATER PHASES OF THE PANDEMIC

Despite intense adaptations to existing models of care by clinicians and health care organizations due to COVID-19, maintaining access to care and resources was still challenging for patients, communities, and cancer care teams. Essential personal protective equipment was often in short supply and very costly. In addition, necessary cleaning supplies as well as materials such as Plexiglas used to modify office and patient engagement environments according to physical distancing guidelines were also becoming increasingly scarce. Shortages of drugs that are essential for the care of patients with cancer also arose because of failing supply chains, difficulties obtaining raw materials, and pharmaceutical export bans in some countries.^{8,9}

Significant workforce shortages emerged among cancer care teams, and adequate staffing at all levels continues to challenge our ability to deliver high-quality cancer care. The reasons for the shortages are multifactorial but include concerns about virus exposure and infection for team members and their families, time off to recover from infection, and challenges with child care. Health care workers have been overburdened by increased numbers of critically ill patients and limited access to lifesaving resources such as ventilators, oxygen, and intensive care unit beds.

Anticipating such distress, the Hastings Center published an ethics framework for health care institutions to explore and communicate consequences of resource-constrained and emergencydriven contingency care. The framework highlights the need for coordination with local public health authorities, enhanced multidisciplinary collaboration with palliative care and other specialties, and active attention to staff distress exacerbated by tensions between patient-centered approaches to care and the pandemicimposed population-centered approaches to the allocation of

TABLE 1. Cancer Care Principles and Guidelines During the COVID-19 Pandemic

- 1. When possible, standard of care should be provided.
- 2. Priority should be given to patients with potentially curable disease, and treatments should be planned to preserve optimal chance for cure, although treatment plans may differ from usual practice and should be designed to minimize need for hospital-based interventions and admissions.
- Patients receiving palliative care should continue the best possible treatment when extension of life and reduction of symptoms are reasonable expectations.
- 4. Patients at the end of life should receive necessary supportive care delivered at home via televisits.
- Patient age and comorbidities should be taken into consideration because the risk of dying of COVID-19 is related to age and preexisting conditions.

resources.¹⁰ The American Society of Clinical Oncology has advised that while oncologists should be involved in community planning and communication regarding resource allocation, decisions about the care of individual patient should be made independently.¹¹ For example, a poignant essay in *JAMA* described the moral dilemmas surrounding ventilator scarcity, including decisions about withdrawal of support from one person to care for another more likely to survive.¹²

Long-standing inequities in access to care have been exacerbated by COVID-19, laying bare differences between those who have health insurance and those who are underinsured/uninsured, with respect to overall health care received and, more specifically, care of chronic illnesses. The risk factors associated with severity of COVID-19 illness include comorbidities such as obesity, diabetes, and chronic kidney disease. Financial status is also an important factor in outcome, with those with lower incomes faring significantly worse from COVID-19. In fact, Britain's Office of National Statistics reported that COVID-19 kills people in the most deprived areas at double the rate of those in the most affluent communities.¹³ Because people of color are often disproportionately disadvantaged financially compared with White, race/ethnicity was also found to be a significant predictor of outcome, with African Americans and Native Americans faring significantly worse with respect to COVID infection rates and outcomes compared with White Americans.14

ACTIONS BY PAYERS TO FACILITATE CARE DURING THE PANDEMIC

Disruptions in health insurance coverage have been consistently associated with a decrease in the receipt of cancer prevention and screening services, as well as delayed treatment, resulting in poorer survival.¹⁵ Thus, initial job losses during the pandemic raised concerns of significant losses of employer-sponsored insurance coverage for employees and their dependents.¹⁶ However, a significant change in the rate of uninsurance was not observed because of increased public coverage, in states with Medicaid expansion as well as nonexpansion states.¹⁷ Nonetheless, several programs have provided assistance to people who became unemployed and uninsured because of the COVID-19 pandemic and faced concerns regarding affordable medications for themselves and their families.¹⁸ For example, Express Scripts provided temporary assistance for uninsured Americans by lowering drug costs on select generic and brand-name medications.¹⁸ In the initial months of the pandemic, payers made several changes in a rapidly evolving environment to ensure access to care for their beneficiaries.¹⁹ Many facilitated improved access to virtual care, for both COVID-19 and other conditions. They enacted specific policies including no cost-sharing for telehealth visits, coverage for mental health visits, and payment parity for telehealth and in-person visits.20 This allowed increased access to care without compromising safety for both the health care providers and patients. Internal data from Cigna indicate that utilization of telehealth as a fraction of total oncology visits increased from 1.3% in February 2020 to 54.7% in April 2020, an increase of greater than 4000% in just a few weeks.²¹ Similar data were reported by other researchers such as IQVIA.²²

Many health care payers made several process and operational changes to support patient access and also provided helpful information to key stakeholders on an ongoing basis.²³ There were specific temporary waivers for prior authorizations and transfers for COVID-19–related care. To help patients with the financial costs of COVID-19 care, payers waived cost sharing for COVID-19 diagnostic testing, related office visits, and inpatient care for COVID-19 through January 31, 2021.²³ Several payers

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also recognized that the need for behavioral health care increased during the pandemic; however, there remains an imbalance between the supply and demand for behavioral health care. There has been a great expansion of benefits and various digital and virtual platforms to provide access to care,^{20,24} so this challenge was addressed through increased virtual care and on-demand digital tools.

Reduced utilization of screening tests for 4 different cancers (breast, colon, lung, and cervical cancer) was observed especially in the early months of the pandemic—from March through May 2020.^{22,25,26} Most screening rates rebounded by the end of 2020 following several clinical initiatives to ensure that patients received appropriate screenings, including outreach through emails and social media campaigns to reassure patients, and sending kits for home colon cancer screening with FIT.²⁷ To date, rates of advanced stage cancers have not changed significantly despite the dip in screening during early months of the pandemic.²⁸

Claims data for those with a cancer diagnosis and on active therapy showed that there was a significant decrease in surgery, in-person office visits, emergency room visits, inpatient admissions, and laboratory services for medical oncology patients. There was a modest impact on the number of new patient visits in medical oncology and radiation oncology patients seen in 2020.²⁹

EMERGING FROM THE PANDEMIC

Clearly, health care providers, health systems, and payers worked closely together during the pandemic to adapt practices and care models so that care could be provided effectively to patients with cancer. Changes to care processes due to this public health emergency have led to realizations that there are ways to improve health care as we move forward from the pandemic. Several important goals were identified in the 2020 ASCO publication American Society of Clinical Oncology Road to Recovery Report: Learning From the COVID-19 Experience to Improve Clinical Research and Cancer Care.³⁰ With respect to cancer care delivery, fundamental goals included (1) promoting and protecting equitable access to high-quality cancer care, (2) supporting safe delivery of high-quality cancer care, (3) advancing policies to ensure oncology clinicians have sufficient resources to provide high-quality patient care, (4) recognizing and addressing threats to clinician and patient well-being, and (5) improving patient access to high-quality cancer care via telemedicine. The report also emphasized the need for all patients to have access to health insurance and resources for outof-pocket costs; for clinicians to have access to personal protective equipment; and to establish physical distancing policies and workflows conducive to safe and effective cancer care delivery. This included stay-at-home care for those services proven to be safely provided in the home.

The financial viability of cancer practices was also a major consideration secondary to financial strains related to the pandemic. In particular, small practices and rural practices that provide care to underserved populations were especially compromised financially. Relief from reductions in Medicare payments to physicians associated with the Congressional sequester in 2011 was requested by ASCO.²⁸ Furthermore, pending new payment models in radiation oncology and medical oncology from the Centers for Medicare & Medicaid Services that will soon be implemented could introduce additional financial burdens to cancer care providers. Further consideration of alternative payment models already demonstrated to be cost-effective without sacrificing the quality of cancer care is urged.

The need to assess and address the physical and mental wellbeing of patients is clear. Similarly, the need to focus on the health and well-being of clinicians has also become abundantly clear. Recognizing the fundamental moral duty of clinicians to care for themselves and for one another, the ASCO Ethics Committee convened the Roundtable on Burnout and Moral Distress in Oncology at the 2019 Annual Meeting. Clinicians, bioethicists, administrators, and other leaders in clinician burnout developed a series of recommendations for preventing and alleviating burnout and moral distress in oncology.³¹ The recommendations focused on engaging organizational leaders as well as individual clinicians, developing the evidence base for effective interventions through assessment and quality measurement, understanding the individual needs of clinicians experiencing diminished well-being, and addressing systemic problems contributing to burnout. The American Society of Clinical Oncology established the Oncology Clinician Well-being Task Force in May 2020 to bring together the many stakeholders in the health care delivery system who will need to collaborate to make meaningful, sustainable improvement in the well-being of the clinical oncology workforce.

As the Task Force was convening, it was immediately apparent that the impact of the pandemic and response would be felt for years to come and would be inextricable from other efforts to improve clinician well-being. Thus, ASCO worked to develop a framework for understanding the role of this pandemic in compounding or exposing ongoing burnout among oncology clinicians. Initially captured as a goal in ASCO's *Road to Recovery Report*, the subsequently published report on occupational and personal consequences of the COVID-19 pandemic on US oncologist burnout and well-being identified significant distress, practice alterations such as early retirement, and signs of resiliency among clinicians.³² A follow-up survey is planned for 2022 to assess the ongoing consequences of the public health emergency.

A CALL TO ACTION

In response to the pandemic, the oncology community innovated and developed new collaborations at record speed. To continue to meet existing and emerging challenges, such collaborations must continue to identify and equitably solve disparities in access to quality cancer care. Health equity lessons, from cancer prevention to diagnosis and treatment to recovery and survivorship, must be learned from leaders in public health, behavior economics, and advocacy and must be integrated into expectations, standards, and clinical workflow. Professional organizations, academic programs, and health care delivery organizations must reset values, galvanize shared priorities, and hold each other accountable. Payers, regulators, and government agencies must support and pay for lifesaving, life-sustaining, and supportive oncology care. As an oncology care ecosystem, we must jointly commit to structural changes that improve the capacity of oncology care teams to meet patient and family needs so that all Americans equitably benefit from our remarkable scientific advances in cancer care.

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