Triage and resource allocation during crisis medical surge conditions (pandemics and mass casualty situations): A position statement of the Christian Medical and Dental Associations special task force.

Paul Hoehner[a], David H. Beyda[b], William P. Cheshire[c], Robert E. Cranston[d], John T. Dunlop[e], John E. Francis[f], C. Ben Mitchell[g], Cheyn Onarecker[h], D. Joy Riley[i], Allen H. Roberts, II[j], Dennis M. Sullivan[k], Christine C. Toevs[l], Ferdinand D. Yates[m], Christopher Hook[n]

[a] MD, MA (Theological Studies), PhD, Clinical Associate, Department of Anesthesiology and Perioperative Medicine, Dartmouth-Hitchcock Medical Center, Lebanon NH, and Professor of Theology, Washington University of Virginia, Neil T. Jones Seminary, Annandale VA, USA

[b] MD, Chair and Professor, Bioethics and Medical Humanism; Professor, Child Health; Director, Global Health Program, University of Arizona College of Medicine Phoenix, AZ, USA

[c] MD, MA(Bioethics), Consultant (Neurology), Mayo Clinic Florida, Jacksonville, FL, USA

[d] MD, MA, MSHA, FAAN, Associate Clinical Professor, CI MED, Neurologist, Carle Foundation Hospital, Urbana, IL, USA

[e] MD, MA (Bioethics), Geriatrics, Yale - New Haven Health, New Haven, CT, and Adjunct Professor of Bioethics, Trinity International University, Deerfield, IL, USA

[f] MD, FACS, Assistant Professor of Surgery, Indiana University School of Medicine, Indianapolis, IN and Unity Surgical Center, Lafayette, IN, USA

[g] MDiv, PhD, Graves Professor of Moral Philosophy, Union University, Jackson, TN, USA

[h] MD, Residency Director, Family Medicine, St. Anthony Hospital: Oklahoma City, OK, USA

[i] MD, MA, Adjunct Professor of Bioethics, Trinity International University, Deerfield, IL, USA

[j] MD, MDiv, MA (Bioethics), FCCP, FACP, Professor of Clinical Medicine and Associate Medical Director, Medstar Georgetown University Hospital, Washington, DC, USA

[k] MD, MA (Ethics), Professor Emeritus of Pharmacy Practice, Cedarville University, Cedarville, OH, USA

[l] MD, MA (Bioethics), Trauma Medical Director, Terre Haute Regional Hospital, Terre Haute IN, USA

[m] MD, MA (Bioethics), Active Associate Pediatrician, Children's Healthcare of Atlanta, GA, USA

[n] MD, Associate Professor of Medicine, Consultant (Hematology), Mayo Clinic, Rochester, MN, USA

Abstract

The Christian Medical and Dental Associations (CMDA) was founded in 1931 and is made up of the Christian Medical Association (CMA) and the Christian Dental Association (CDA). CMDA has a current membership of over 19,000 physicians, dentists, and other allied health professionals. During and in direct response to the pressing urgencies of the COVID-19 universal pandemic of 2020 the President of CMDA commissioned a special task force to provide current and future Christian reflection and

guidance on triage and resource allocation policies during pandemics and other forms of crisis surge medical conditions (e.g., mass casualty situations). This is a condensed version of the CMDA special task force position statement.

Key Words: triage, resource allocation, resource reallocation, pandemic, epidemic, mass casualty incident, ethics, stewardship.

Introduction

Health care systems and health care professionals (HCPs) need to prepare for mass casualty incidents (MCI) including disasters, epidemics, and pandemics, as have occurred throughout history and will certainly occur in the future. The purpose of this statement is to provide biblically sound ethical guidance for the triage and allocation of limited life-sustaining and other critical resources (e.g., mechanical ventilators and effective medical therapies) during crisis medical surge conditions when the demand for these resources outstrips the supply. Instituting and putting into place broad population-based policies that drastically alter the normal patient-physician relationship should be implemented only if: 1) critical care (life-sustaining) capacity has been, or shortly will be, exceeded despite taking all appropriate steps to increase capacity, AND 2) a regional-level and duly-authorized authority has declared an emergency.

Rationale for Advance Planning

HCPs have an ethical duty to provide compassionate and competent care, including making life-and-death decisions with as much forethought and ethical clarity as possible. This clarity must be maintained even during a crisis that creates stress for HCPs.[1] The only way to make this happen is to carry out advance planning, design decision-making tools, and prepare contingency protocols for dissemination. This will help to alleviate uncertainty and moral distress during a major health care emergency.

Guiding Ethical Principles

Triage in times of medical crisis surge conditions and mass casualty incidents (MCI) is directed to the saving of as many lives as possible, seeking to maximize good outcomes for the greatest number of people possible. In shifting the ethical emphasis for pragmatic reasons, it is important not to lose sight of higher moral values. Utilitarian goals, while important, must not be absolutized or sought at the expense of respect for the intrinsic value of all human beings as unique bearers of the image of God.

- Triage policies should only be implemented if: 1) medical and life-saving capacity has been, or shortly will be, exceeded despite taking all appropriate steps to increase capacity, AND 2) a regional-level authority has declared an emergency necessitating such policies.[2]
- All health care facilities should have a formalized emergency operation plan in place under these conditions.
- During these periods (e.g., mass casualties, pandemics), there is an imposed shift in a HCP's duty from providing the most definitive and beneficial treatment to individual patients (standard of care) to the priority of populations or groups of patients who are most at risk and will most likely benefit with an appropriate stewardship of limited resources (sufficient care). Triage

and resource allocation decisions should be objective, formalized, open, and transparent to both HCPs and to the public.

- As a given medical surge condition mounts and progresses from a conventional to a contingent surge condition, it may be tempting for HCPs to begin enacting crisis triage and resource allocation decisions unilaterally or on their own, i.e., moving from patient-oriented medical care and ethics to community- and population-prioritized medical care and ethics. However, until a crisis surge condition or MCI has been declared and formal, published protocols have been enacted, standard patient-oriented care and ethics continue to apply to all HCPs.
- It is important that HCPs understand when there is a definitive "all clear" moment when crisis surge conditions have been abated so that standard medical care and ethics become operative once more. This underscores the necessity for advance planning and decision-making tools and protocols prior to any foreseen or unforeseen MCI.

Justice

- Public health decisions should be based on objective factors, rather than on the choice of individual leaders, HCPs, or patients. All individuals should receive the highest level of care required for survival or limitation of long-term disability given the resources available at the time. Elective, non-essential interventions lack priority in these circumstances.
- In accordance with the Christian duty to respect all life as sacred, in times of medical crisis surge conditions, triage and resource allocation decisions must be equitable and based on objective and justifiable medical criteria, with the understanding that in unprecedented or unique circumstances these criteria may not have been fully validated for the current situation. They should nevertheless be based on the best medical evidence available as well as informed clinical judgment. All other considerations based on non-medical criteria should be excluded. Such decisions must be non-discriminatory and never based on perceived social worth, social class, ethnicity, age, gender, sexual orientation, religious convictions, political affiliation, economic status, nationality, disability, or any other medically non-relevant trait that does not impact immediate crisis-related prognosis or survivability.[3,4]
- Appropriate stewardship of scarce critical resources requires triage and resource allocation decisions to be prioritized on the basis of medical need and likelihood for survival. Survival is defined by examining a patient's short-term likelihood of surviving the acute medical episode rather than a patient's long-term prognosis related to chronic medical conditions or disabilities.
- Devising a just and equitable protocol means more than merely maximizing the absolute number of patients who survive to hospital discharge. Other criteria that may be employed include:
    - Prospects for short-term survival. The most straightforward measure of whether a patient will benefit from life-supportive treatment is whether a patient survives to discharge because of this care.
    - Prospects for long-term survival. This measure considers how much benefit treatment produces in terms of survival after discharge. Although important, placing too great a priority on this criterion may, in certain circumstances, further disadvantage those who already

face systemic disadvantages (i.e., this may be discriminatory).
    - Pregnancy. Preferences are to be considered for pregnant women.
- When objective medical criteria do not clearly favor a particular patient (all things being equal), then "first come, first served" rules of allocation or a lottery system should apply.
    - "First come, first served" and lottery systems, both based on a theoretically random selection of equally qualified patients, acknowledge that each person is irreducibly valuable and that social value and other subjective factors are irrelevant. It also invokes the concept of justice, in that when a basic human right such as life is at stake, justice requires that all persons be treated equally. "For a right to be called human entails all humans have it equally."[5]
    - A "first come, first served" rule, as a type of "natural" lottery, has the advantage of reflecting the normal course of the medical system. It also has the advantage of not requiring the time necessary to set up a lottery system in times of public health emergencies. It has the disadvantage of selecting patients who enter the system earlier, possibly discriminating against those populations who have limited physical access to the medical system or limited knowledge of when to enter the medical system (e.g., the economically, physically, and psychosocially disadvantaged).
    - A lottery system may be more purely "random" but may be impractical based on the logistics of putting one into place in an equitable and fair system in a timely manner during times of public health crises.
    - Both "first come, first served" and lottery systems must be scrutinized to be free from manipulation and to not disfavor disadvantaged and marginalized subgroups. The rationale and procedures for such systems of triage and allocation must be made clear to the public and understandable.
- Triage and allocation protocols must be established to give guidance to all HCPs and to provide for objective standards to ensure fairness and justice during difficult decisions that may be influenced by subjective and personal concerns. It is also important that HCPs understand when there is a clear and well-communicated moment that a crisis has abated sufficiently to shift focus back to prioritizing individual patient concerns.
    - In times of limited critical resources, decisions must be made regarding who and who will not receive specific therapies, even life-saving therapies. All patients are still to be afforded the maximal care and comfort that is available, and patient-centered principles of medical ethics still apply. HCPs have a paramount duty to care for the individual patient and to seek appropriate and indicated treatment for each patient. This duty persists in a surge crisis.
    - If resources are available, they should be deployed as indicated regardless of the prognosis of the individual patient. "Decision tools should not be used to exclude patients preemptively from use of life-saving resources when these resources are available."[6]

- The capacity and need for treating physicians to reach routine decisions and recommendations regarding the indications for and the appropriateness of treatment are not altered by a surge crisis and not removed by triage and resource allocation restraints.
- Patients who are no longer eligible for life-saving resources (e.g., mechanical ventilation) are never to be abandoned and should continue to receive intensive symptom management as well as psychosocial and spiritual support. Where available, specialist palliative care teams should be involved.
- Triage and resource allocation decisions that apply to individual patients should be the responsibility of parties other than the treating physician. This is best accomplished through a triage officer or a triage team who are removed from direct patient care and work in close partnership with a facility's ethics committee.
- Communicating triage decisions, particularly when a patient is excluded from receiving life-saving resources, should be the responsibility of the deciding triage officer(s) or appointed representatives of a triage committee, along with the treating physician.

Fairness

- Fairness concerns require triage and resource allocation to pay particular attention to the needs of at-risk and marginalized persons, including the poor, the aged, and persons with disabilities.
- Several justifications for pure chronological age-related criteria have been proposed, but each is morally problematic:
  - Strict chronological age criteria can serve as a convenient and objective, albeit hidden, form of social-value criterion.[5] The elderly may also be the weakest, marginalized, and least able to resist. Age, per se, is not a medically relevant factor in that the elderly can have different medical problems and states of health that make one a better candidate than another, or even a better candidate than younger, less-healthy candidates. Age-related medical conditions may be potential reasons for exclusion, but not age itself. Age should be seen in the context of overall objective medical predictors of outcome, not as a sole independent criterion itself
  - An "equal opportunity" justification prioritizes "life-years saved" by giving younger persons an equal opportunity to live a longer number of years. However, persons are more than sums of accumulated life-years. All persons are of equal value and must be treated as such. Life is equally precious at any age.
  - A "life span" justification defends an age criterion by assuming that at a given age everything of significance has been "accomplished" and "achieved."[7] Implicit in this argument is that what matters most is "doing" not "being" (a productivity view of human value).
  - God commands us to honor, respect, and value the elderly. "Rise in the presence of the aged, show respect for the elderly and revere your God. I am the LORD." (Lev 19:32, NIV); "Is not

wisdom found among the aged? Does not long-life bring understanding?" (Job 12:12, NIV). See also Deut 32:7; Job 32:7; Isa 46:4; Psa 71:9, 18; Prov 16:31; 20:29; 1 Tim 5:1.[8]

Transparency and Procedural Justice

- Governments and institutions have an ethical obligation to plan allocation of critical scarce resources through a process that is transparent, open, and publicly debated to the extent time permits.
- In order to ensure procedural justice, any triage operation should be regularly and repeatedly evaluated to guarantee that the process has been followed fairly, that the need for triage operations still persists, and that current objective criteria continue to be based on the best available evidence.[9]
- Physicians should have a formalized procedure to advocate for their patients with regard to individual triage decisions, including an expedited appeal process. However, decisions authorized by appointed triage officers or teams should generally prevail.
- Triage decisions for individual patients should be revisited periodically and upon request of the treating physician to consider patients with initial low physiological acuity who may subsequently deteriorate and require more urgent need for critical life-saving resources.
- For patients with very severe illness, an urgent clinical appeal process should be available when a treating physician believes that patient improvement would alter the triage decision.[6]

Categorical Exclusion Criteria

- Criteria that are "hard stops" (e.g., age > 85 years) that prevent a patient from even reaching the triage decision-making stage and identify individuals to be excluded from access to critical services under any circumstances during an MCI should not be used. Categorical exclusions may be interpreted that some groups are "not worth saving." Any triage or allocation system must make clear that all individuals are "worth saving."
- Rather than providing categorical exclusion criteria (even some that would seem ethically founded, e.g., hospice care patients, and patients with existing do-not- resuscitate (DNR) orders or with advance directives that prohibit intubation or mechanical ventilation),[6] HCPs should not exclude any patient who would under normal clinical circumstances be eligible (e.g., for mechanical ventilation) and allow the availability of critical resources (ventilators) determine how many eligible patients receive it.[2]
- Critical care physicians all recognize that some conditions lead to immediate or near-immediate death despite aggressive therapy and that under routine clinical conditions certain critical care services are not warranted or offered (e.g., cardiac arrest unresponsive to appropriate ACLS, overwhelming traumatic injuries, massive intracranial bleeds, intractable shock, multi-system organ failure, advance states of cancer, etc.). HCPs should not be obligated to provide non-recommended, potentially inappropriate interventions that have no reasonable possibility of beneficial effect solely because a patient or surrogate requests them.
- During an MCI involving a crisis surge condition, physicians should still make clinical judgments about the appropriateness of utilizing critical resources using the same

criteria they use during normal clinical practice.

Reallocation of Life-Supportive Resources

- During an MCI, reallocation is the non-consensual withdrawal of life-supportive treatment (in the absence of a properly executed advance directive or decision of a properly authorized surrogate) with the direct intent of transferring that same life-supportive treatment to another patient who is considered a more worthy candidate for such treatment (by any criteria or bias) when the same or equivalent treatment is currently not available.
- Non-consensual withdrawal of life-supportive resources (e.g., mechanical ventilation) involves an active, intentional, and direct taking from a vulnerable person incapable of resisting. Except in cases authorized by court order, such withdrawal is recognized as legal in only one jurisdiction in the United States.[10]
- CMDA rejects any form of reallocation as defined above, whether by individual HCPs or by triage officers/committees. These utilitarian reallocation decisions tend to be based on notions of quality of life or social value (including age and disabilities not directly contributing to a patient's short-term prognosis) in which one individual's "worth" is pitted against another known individual's. Withdrawal of life-supportive resources from a vulnerable patient should never be used as a means to another's end but should always be decided based on the clinical ends of that individual patient (e.g., reducing the burdens and suffering involved with a given treatment). Withdrawal of life-supportive resources should ideally not occur without the patient's consent (including authorized surrogate consent or through an advance directive). However, if the treatment is deemed non-beneficial to achieving the goal of surviving the medical crisis, urgent circumstances may dictate the necessity of withdrawing life- sustaining therapy according to procedures outlined in this statement.

Alternative to Reallocation: Optimal Stewardship and Care in a Time of Absolute Scarcity

- During an MCI or officially declared medical crisis surge situation, when the demand for critical life-supportive resources has surpassed the supply and availability of those or equivalent resources, HCPs, along with hospital administrators, ethicists, and governing authorities, will be required to make difficult decisions with regards to balancing optimal stewardship of critical scarce resources and the treatment of individual patients who can best benefit from those resources. Those decisions must be made recognizing the inherent and irreducible value of each human life.
- The difference between reallocation and optimal stewardship is that the former is based on a utilitarian calculus comparing the "worth" or "benefit received" between patients where life-supportive treatment is unilaterally removed from one patient based on their prognosis at the time, and may be given to another. The latter is based on the beneficent/non-maleficent treatment and care of each individual patient irrespective of the immediate needs of other patients. Even in an MCI, the good of the individual patient remains paramount.
- Even when life-supportive treatments are readily available, many patients on life-supportive treatment may become terminally

and irreversibly ill with little or no reasonable hope of recovery, from a medical standpoint. All fifty states and the District of Columbia recognize advance directives that permit direct withdrawal of life- supportive treatment under these circumstances. Withholding or withdrawal of life- support in patients is also ethically permissible when: 1) the medical treatment becomes detrimental or no longer is contributing to the patient's expected goals and outcomes and 2) the suffering and burdens of a treatment outweigh the intended and foreseen benefits (the intention is to avoid those sufferings and burdens, and even if death is foreseen, it is not intended as a means or as an end, but is accepted as the natural course of the underlying illness).

- During worst-case extremes of crisis surge conditions, optimal stewardship of scarce life-supportive resources, such as mechanical ventilation, may require that a more stringent standard (more so than what would occur under normal circumstances of perceived unlimited resources) apply for what constitutes optimal beneficent and sufficient treatment. The ethical appropriateness of continuing or discontinuing treatment is must be equally applied to all patients. The relative stringency of these clinical standards (e.g., length of a trial of ventilation before a patient improves, percentage estimate of short-term survivability, level of acuity, SOFA or APACHE II score, and similar markers of survivability and benefit from treatment) will vary depending on the severity and magnitude of the MCI or crisis surge condition.
- Further allocation of available life-supportive resources should be offered only within the bounds of well-communicated time-limited trials appropriate for the patient's medical condition and the severity and magnitude of the current MCI or crisis surge condition.
- Any decision to apply more stringent standards for what constitutes optimal beneficent and sufficient treatment should be impartial, based only on standard objective medical acuity including short-term prognosis scoring systems (such as SOFA and APACHE II scores) and not based on long-term survival prospects, age, disability, or social value. These decisions must, whenever possible, be the responsibility of an appointed triage officer or triage committee and not the treating HCP, recognizing the limitations of smaller institutions.
- During an MCI or crisis surge condition, persons with disabilities possess the same dignity and worth as others and should not be denied treatments based on stereotypes, assessments of quality of life, or judgments about their relative worth. Treatment decisions should be based on individualized assessments based on the best available medical evidence. For instance, patients with certain spinal cord injuries or neuromuscular disease who are otherwise stable but require long-term use of ventilators should not have their ventilators removed for the purpose of reallocation. Preexisting terminal diagnoses, such as metastatic cancer, end-organ failure (lung, liver, kidneys), or severe dementia[11] are not considered a disability, but rather a medical condition.
- These situational standards of beneficence should apply to all patients equally. Withdrawal of treatment for any patient should be based solely on those objective medical criteria appropriate to the situation and without deference to another patient who may benefit from subsequent resources that would be made available. Unless continued treatment is determined to be medically non-beneficial with no objective reasonable hope of short-term survival, decisions to withdraw treatment should never be unilateral or against

the patient's or their family's wishes but remain a shared decision. Unlike many utilitarian reallocation schemes, these standards and criteria are not to be used to stratify or rank one patient against another, but to optimize the stewardship of limited resources by providing the best possible treatment to each and every patient, constrained by the contingencies of an MCI.

- HCPs withdrawing treatment according to these more stringent situational standards should consider consultation with their hospital's ethics service/triage committee along with the patient's family/surrogate in order to avoid misunderstandings.
- Triage teams ideally should have no direct role in the treatment of patients nor in the withdrawal of resources, even when they are in accordance with advance directives, recognizing that this may not be practical in small institutions where those making triage decisions may necessarily also be involved in direct patient care.
- It is well established that in trauma mass casualty and resource-limited mission situations, triage and stewardship decisions are based on split-second intake and processing of relative clinical and situational data, but never on any "relative worthiness" criteria.

Conscience Objections

During worst-case extremes of crisis surge conditions when an officially declared emergency exists and population-based ethics dominate, non-consensual withdrawal and reallocation of life-supporting resources and/or unilateral decisions not to resuscitate (based on either patient condition or health care provider safety) may be dictated by government public health authorities, by designated triage officers/teams, or by published protocols. CMDA rejects any form of reallocation.

Some HCPs may experience moral distress based on their professional commitment to be patient advocates. Treating HCPs should be provided a formal means to appeal and advocate for their patient and/or to conscientiously object to complying with a triage order. At a minimum, HCPs should be provided with the option to step aside and allow another HCP to comply with the order when such appeals are denied. For further information and reflections, see CMDA's statement Duties of Christian Health Care Professionals in the Face of Pandemics.

Jesus calls us to love one another, so if differences of opinion about ethical issues arise during MCI, Christian HCPs should work hard to maintain the unity of the Spirt through the bond of peace.

Priority of Medical Personnel

Should medical personnel, particularly front-line HCPs, receive preferential priority (e.g., subtracting points from their priority score or using it as a tiebreaker criterion) for scarce life-saving resources during a medical crisis surge? This is a controversial issue in the ethical and medical literature. Three arguments are usually given to advocate for their priority.

1. A policy that prioritizes at-risk front-line HCPs will increase their morale and motivation to "show up." This argument is unwarranted because HCPs possess a higher calling and duty than the general public and should not be induced by such preference.

2. Front-line HCPs deserve preferential treatment "just because" of their valuable contributions in the past, present, and future to the health of society. This argument is also unwarranted because it assumes that the lives of HCPs are somehow intrinsically more valuable than any other lives.

3. A stronger argument is based on the calculus of medical crisis surge conditions that the increased risk taken by front-line HCPs will create a further reduction in important skilled personnel resources thereby contributing to an increased overall loss of life. This cannot be a blanket argument, but must take into account several additional factors such as the absolute necessity and irreplaceable skill a particular HCP possesses, how long they will be removed from the pool of necessary personnel even if given treatment (including mandatory quarantine time), and the projected overall total impact on available personnel resources. While it would be a very extreme and unique situation where such preferential treatment would make a significant impact on overall outcome, there may be some scenarios where this may be a consideration and will depend on the exact nature of the mass casualty incident (MCI).

Aside from the argument for preferential treatment or having an absolute higher priority in triage decisions, it is still imperative for front-line HCPs with direct patient contact to receive preferential allocation of scarce personal protective equipment (PPE) resources in order to protect and preserve important personnel resources.

Physician Assisted Suicide (PAS) and Euthanasia

CMDA opposes the active intervention with the intent to produce death for the relief of suffering, economic considerations, or convenience of patient, family, or society. See CMDA's statement on Euthanasia. CMDA is equally opposed to all active interventions that intend to hasten or produce death in a patient as part of any population-based ethic during a public health emergency or medical crisis surge. Withdrawal of a life-supportive resource may be ethically permissible, however, in some situations where imminent death is foreseeable but not intended.

Christian HCPs, administrators, and legislators should be aware of and oppose any protocols, policies, or legislation put into place or activated during a public health crisis or medical crisis surge that promote or seek to make the acceptance of PAS and euthanasia more palatable or more easily accessible either during the crisis or afterwards.

Conclusions

Broad population-based policies that drastically alter the normal patient-physician relationship should be implemented only if: 1) critical care (life-sustaining) capacity has been, or shortly will be, exceeded despite taking all appropriate steps to increase capacity, AND 2) a regional-level and duly-authorized authority has declared an emergency.

As Christian physicians, our moral duty in these extreme, distressing, and challenging situations is to use our God-given, Spirit-led, and Scripture-bounded wisdom to the best of our ability to balance the biblical goals, motives, and directives of the Christian life within the complexities of living in a fallen and sinful world, submitting all our limitations to God's love, mercy, and providence. Jesus calls us to love one another, so if differences of opinion about ethical issues arise during these challenging times, Christian HCPs should work hard to maintain the unity of the Spirit through the bond of peace.

- Public health decisions should be based on objective and transparent factors, rather than on the choice of individual leaders, HCPs, or patients.
- Governments and institutions have an ethical obligation to plan allocation of critical scarce resources through a process that is transparent,

open, and publicly debated to the extent time permits.

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References

1. Ryus J and Baruch J. The duty of mind: ethical capacity in time of crisis. Disaster Medicine and Public Health Preparedness. 2018; 12: 657-662. https://doi.org/10.1017/dmp.2017.120.
2. University of Pittsburgh School of Medicine, Department of Critical Care Medicine. Allocation of scarce critical care resources during a public health emergency; 2020. Available from: https://ccm.pitt.edu/sites/default/files/UnivPittsburgh_ModelHospitalResourcePolicy.pdf.
3. Beauchamp TL and Childress JF. Principles of biomedical ethics. Eighth edition. New York: Oxford University Press; 2019.
4. Edelstein L. The Hippocratic Oath: text, translation and interpretation. Baltimore: The Johns Hopkins Press; 1943.
5. Kilner, J. Who lives? Who dies? Ethical criteria in patient selection. New Haven: Yale University Press; 1990.
6. Institute of Medicine Committee on Guidance for Establishing Crisis Standards of Care for Use in Disaster Situations. Crisis standards of care: a systems framework for catastrophic disaster response. Washington, DC: National Academies Press; 2012.. https://doi.org/10.17226/13351.
7. Callahan D. Setting limits: medical goals in an aging society. New York: Simon and Schuster; 1987.
8. Scripture quotations marked (NIV) are taken from the Holy Bible, New International Version®, NIV®. Copyright © 1973, 1978, 1984, 2011 by Biblica, Inc.™ Used by permission of Zondervan. All rights reserved worldwide. www.zondervan.com The "NIV" and "New International Version" are trademarks registered in the United States Patent and Trademark Office by Biblica, Inc.™.
9. Rubinson L, Hick JL, Hanfling DG, Devereaux, AV, Dichter, JR, Christian, MD, Talmor D, Medina J, Curtis, JR, and Geiling JA. Definitive care for the critically ill during a disaster: a framework for allocation of scarce resources in mass critical care. Chest. 2008; 133(5 Suppl 1): 51S-66S. https://doi.org/10.1378/chest.07-2693.
10. Texas advance directives act. Texas Health and Safety Code. 2020; §166.046.
11. Chang A and Walter LC. Recognizing dementia as a terminal illness in nursing home residents. Archives of Internal Medicine. 2010; 170(13): 1107-9. https://doi.org/10.1001/archinternmed.2010.166.

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Correspondence: Dr. Paul Hoehner, USA. pjhoehner@gmail.com

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