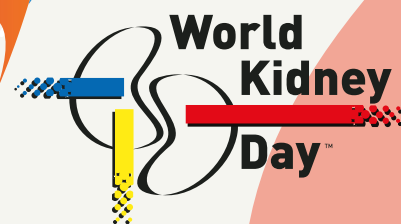


KIDNEY HEALTH FOR ALL
PREPARING FOR THE UNEXPECTED,
SUPPORTING THE VULNERABLE

Resilience in kidney care for all. A call to action



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Introduction

This call to action is being published on the occasion of World Kidney Day 2023, on 9 March, with this year's campaign theme being "Kidney Health for All – Preparing for the unexpected, supporting the vulnerable!". Given the many challenges faced by patients living with kidney disease in disaster and emergency situations, World Kidney Day calls for better preparedness in planning responses before, during and after a crisis, to minimize the effects of disrupted kidney care and ensure that as many lives as possible are saved. Effective crisis planning requires a comprehensive, multi-stakeholder approach, including governments, healthcare services, non-governmental organizations (NGOs), kidney disease patients and caregivers.

Natural disasters are becoming more common around the world, with the rate of disasters increasing by at least tenfold from 1960 to 2020, resulting in increased mortality, injuries, diseases, and disabilities² and, thus, exacerbating the vulnerability of people with pre-existing kidney diseases and increasing the risk of acute kidney injury.³

According to the United Nations Office for Disaster Risk Reduction (UNDRR) a disaster is defined as "a serious disruption of the functioning of a community or a society at any scale due to hazardous events interacting with conditions of exposure, vulnerability and capacity, leading to one or more of the following: human, material, economic and environmental losses and impacts".¹ This may range from natural disasters, such as earthquakes, floods or droughts, to man-made crises such as conflict, famine, or pandemics.

The impact of disasters on people living with kidney disease

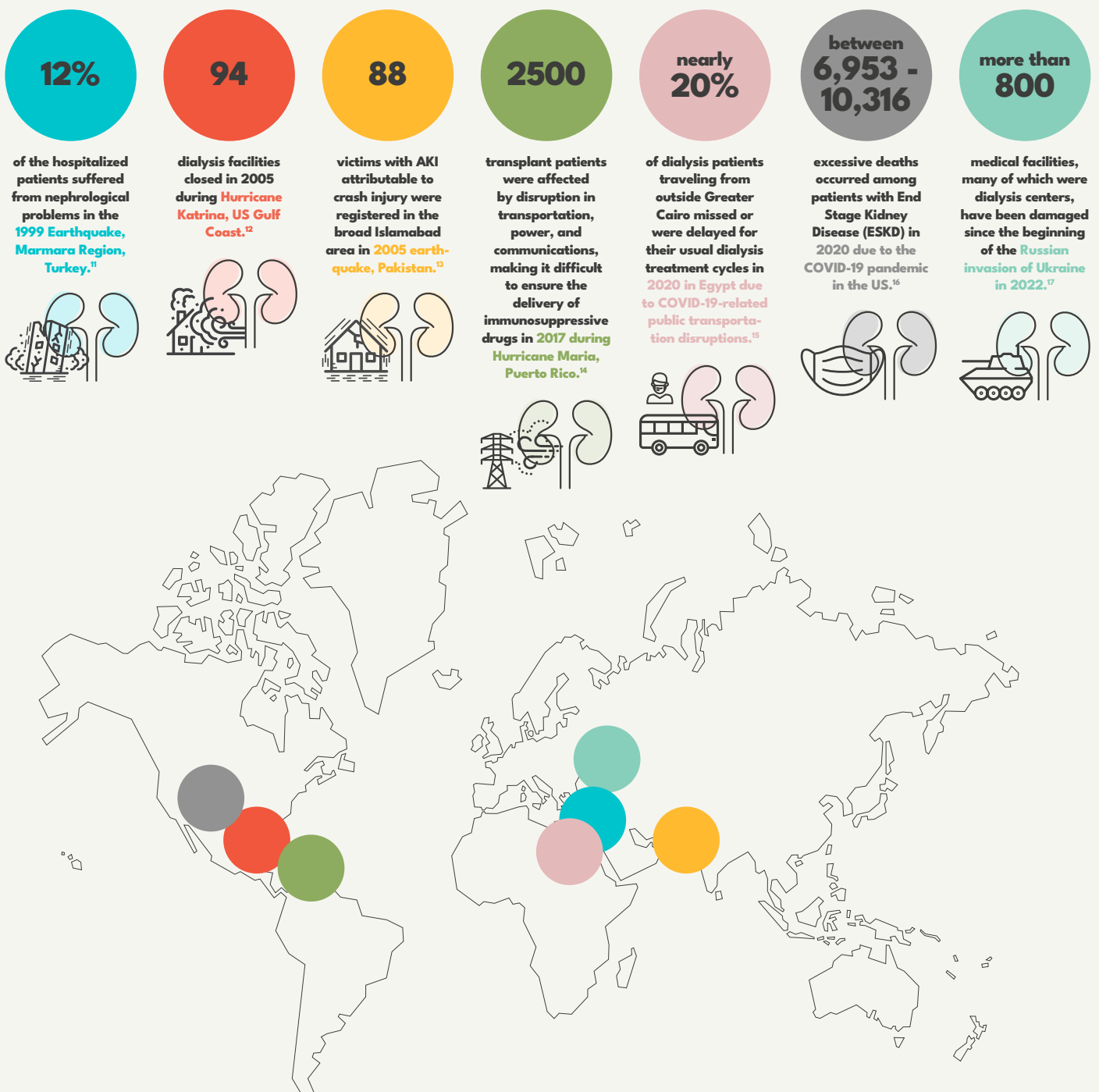
In emergency settings, the chronic disease population is particularly at risk. Being generally, more physically immobile⁴ than the rest of the population, people with chronic diseases may be more limited in their ability to prepare or react, and may be harmed by interruptions in continuous access to care.⁵ Responses to mass disasters prioritize emergency patients resulting from the crisis itself, with the consequence of passive non-prioritization of care for people living with chronic conditions such as kidney diseases, on dialysis or with transplantation.

Patients with pre-existing kidney disease are affected in several crucial and challenging ways in emergencies:

- Hemodialysis can be hampered by disasters which cause serious disruptions to infrastructure and healthcare provision (lockdowns; damaged or closed roads, renal units, and dialysis machines; no access to safe water, electricity, staff and medication shortages).⁶
- Peritoneal Dialysis can be hampered during disasters by staff shortages, scarcity of supplies and dialysate, catheter dysfunctions, poor patient adherence to peritoneal dialysis, and lack of patient support networks.⁷
- Transplantation services and donation chains are often suspended in times of crisis creating disruption for patients urgently awaiting the procedure.
- Patients living with a functioning graft or with chronic kidney disease of various forms may experience unavailability immunosuppressive medications.
- A sudden high demand for acute dialysis may impact dialysis availability for patients on chronic dialysis.
- If patients are forced to flee, these challenges are aggravated by unsafe and precarious conditions during their journey and/or at their destination.⁸

The crisis itself does not only affect patients with pre-existing kidney disease. In fact, it may lead to significant numbers of patients with acute kidney injury, such as crush injury, which for instance can result in acute kidney injury (AKI) or kidney failure, adding an additional burden to units.⁹

Due to scarce and limited data from the affected areas, accurate figures are frequently missing in emergency situations, and the majority of the evidence is gathered from direct observation and case reports.¹⁰ Below are some case examples that demonstrate how disasters have affected kidney patient



Policy responses

Disaster preparedness for unexpected events is crucial to ensure that people without pre-existing kidney disease and those living with kidney disease receive appropriate, immediate, and continuous healthcare during and after a disaster.

Healthcare service adaptability and resilience depends on “the capacity of health actors, institutions, and populations to prepare for and effectively respond to crises; maintain core functions when a crisis hits; and, informed by lessons learned during the crisis, reorganize if conditions require it”.¹⁸ Healthcare systems are stable and adaptable when they can safeguard people’s lives and deliver positive health benefits for all before, during and after a crisis.

The needs of people living with kidney disease must be included at all levels of the strategy, considering the specific necessity of patients living with kidney disease.

Governments

Governments should make sure that health emergency responses include the specific and complex needs of people living with kidney disease, often not prioritized and yet among the most vulnerable.

It is, therefore, essential to:

- Invest in resilient primary and public healthcare systems, to ensure that these can withstand more severe disasters.
- Implement an appropriate policy framework tailored to the needs of patients before, during, and after an emergency.¹⁹
- Include a nephrology perspective in the development of preparedness plans, addressing the complexity of kidney care in disaster settings. Nephrology preparedness plans should be in place for every country and healthcare infrastructure, and rely on a task force of experts who cover a well-defined geographic area.²⁰
- Recognize the importance of establishing ad hoc healthcare mechanisms aimed at providing continuity of kidney care through telecommunication, dissemination of accurate information, and home dialysis.

Healthcare services

Hospital and facility-based clinical services must be well-prepared and have the capacity to scale up service delivery to meet increased or altered health needs by

- Providing adequate staff training.
- Making use of telehealth and digital communication tools.
- Educating patients and caregivers adequately about emergency procedures.²¹
- Adopting emergency solutions in times of a crisis (e.g., by increasing bed capacity, establishing temporary facilities).²²

The figure below summarizes the main steps to be taken in case of severe disasters.



Figure 2²³

Additional recommendations about dialysis and emergency preparedness can be found in the *"ISN framework for developing dialysis programs in low-resource settings"*.²⁴

Non-governmental organizations (NGOs)

While responsibility for the administration of a disaster response may rest with the local or national government, medical relief efforts can be co-organized by local, national and international non-governmental organizations (NGOs), to support local health services²⁵ in disaster situations. Indeed, NGOs are often able to fill response gaps when conventional local healthcare or national emergency response services are stretched. This can include:

- Providing primary healthcare and medical assistance to those in need.
- Facilitating the transportation of supplies and medical professionals.
- Contributing to the procurement and distribution of medical supplies.
- Promoting disaster awareness and preparation in vulnerable communities.
- Advocating for kidney disease to be included and integrated into preparedness plans and asking that the continuity of care during unexpected events is ensured.
- Play their role in the digital communication process for providing kidney health information for all.

One example of such efforts is the Renal Disaster Relief Task Force established by the International Society of Nephrology (ISN) in 1989. The Task Force works in collaboration with Médecins Sans Frontières for organizational and logistical support and assisted nephrologists and their patients in many countries in the aftermath of disasters over the past decades.²⁶

Additional recommendations for kidney disease patients in emergencies can be found on the website of the National Kidney Foundation: [Planning for Emergencies - A Guide for People with Kidney Disease](#).²⁷

People living with kidney disease

In case of an emergency, it is important for patients to be prepared and informed on how to react. In particular, in case of emergencies, hemodialysis and transplant patients should:

- Plan ahead of an emergency; this can help save their lives.
- Prepare an emergency check-list.
- Obtain prescriptions ahead of time.
- Keep a list of their medical needs, medicines and dosages.
- Maintain a list of important contact information i.e., phone numbers of back-up dialysis units, doctors, different options of dialysis units and Emergency Medical Services.
- Keep a two-week extra supply of their required medicines in their original bottles and keep a 7-14 day emergency diet stock.
- Prepare an emergency kit in a waterproof bag (containing key information and items, such as a medicine list, doctor, transplant coordinator, pharmacist, insurance, bottles of water, and other supplies).
- Availability of emergency evacuation procedures/information, especially for hemodialysis patients to safely remove oneself from a dialysis machine.

Conclusion

World Kidney Day welcomes the WHO's action on the recognition of preparedness in disasters and recognizes the progress that has been made so far, e.g., the Interagency Emergency Health Kit (IEHK),²⁸ which in its revision included also NCDs; the WHO Emergency health kit for noncommunicable diseases,²⁹ which also mentions the life-threatening consequences of interruption of care for dialysis patients, as well as the WHO's commitment in "investing in and building longer-term NCD emergency preparedness and responses during the COVID-19 pandemic and beyond, as part of "build back better" through a multisectoral all-hazards approach" during its 75th World Health Assembly in 2022.³⁰

Additional efforts are needed to address appropriate responses. Preparedness plans are key to efficiently, effectively, and appropriately addressing the needs of people living with kidney disease. The steady progress made over the past several decades in the care and treatment of those living with kidney disease must not be undermined by poor planning.

Governments, healthcare services, NGOs, and people living with kidney disease should all work together to strengthen mutual emergency preparedness and response efforts, while addressing specific kidney care needs.

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World Kidney Day (WKD) is the global campaign that aims at increasing awareness of the importance of our kidneys to our health and reduces the impact of kidney disease and its associated problems worldwide. WKD is a joint initiative of the International Society of Nephrology and the International Federation of Kidney Foundations that was started in 2006 and has not stopped growing ever since.

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