# An Evaluation of Evidence Uptake of

# Crisis in Gaza: Scenario-Based Health Impact Projections

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## I.    Introduction

The ongoing Israel-Gaza conflict has had a profound impact on populations, with a death toll passing 44,000 in Gaza.[1] Most of the Gazan population (1.9 million out of a population of 2.2 million)[2] is now displaced and living in overcrowded conditions with limited access to water, sanitation, food, and health services.

Funded by United Kingdom Humanitarian Innovation Hub (UKHIH), researchers from the London School of Hygiene and Tropical Medicine (LSHTM) and the Johns Hopkins Center for Humanitarian Health at Johns Hopkins University (JHU) launched a project to estimate the potential public health impact of the crisis under different future trajectories of its evolution. These projections are intended to assist humanitarian organizations, governments, and other stakeholders in planning their crisis response and making informed, evidence-based decisions, with the ultimate goal of contributing to saving lives. All outputs are available on gaza-projections.org.

The first report of "Crisis in Gaza: Scenario-Based Health Impact Projections" (hereinafter referred to as HIP Report 1) comprised estimating the potential public health impact of the crisis under various future scenarios: 1) an immediate permanent ceasefire; 2) status-quo (a continuation of the conditions experienced from October 2023 to mid-January); and 3) further escalation of the conflict. The projections are stratified by sub-period, age and category of proximal causes of death including traumatic injuries, infections, maternal and neonatal deaths and stillbirths, and non-communicable diseases (NCDs), with malnutrition as an underlying cause. The report was released on February 19, 2024 with initial projections covering a six-month period from February 7 to August 6, 2024.

The second report "Crisis in Gaza: Projected Deaths due to Traumatic Injuries in the Rafah Governorate Report 2 (hereinafter referred to as HIP Report 2) released on June 4, 2024 provided a projection of the number of deaths due to traumatic injuries in the Rafah Governorate over a three-month period from 20 May to 17 August, 2024.

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[1] UNOCHA. Reported impact since 7 October 2023. https://www.ochaopt.org/
[2] https://www.hrw.org/report/2024/11/14/hopeless-starving-and-besieged/israels-forced-displacement-palestinians-gaza

## II.    Rationale, aim and objectives

The research done by JHU and LSHTM established a completely novel approach to mortality estimation and public health projections. It is therefore useful to learn from this innovative approach and build on it for future research efforts that could help inform decision making.

Historically, mortality estimates have often been misunderstood or contested, and data on impact has been lacking. The research-policy pipeline is one that is important to examine, particularly in light of its potential complexities. "*Many practitioners are familiar with the literature, but finding meaningful ways to measure results in this area often proves to be a challenge.*"[3]

Funded by the UK-HIH, this evaluation aims to build a better understanding of the potential contribution to impact of these evidence-based mortality projections by documenting how, and the extent to which, decision-makers engaged with the Scenario-Based Health Impact Projections and used them for action. This work was also funded by UK-HIH.

> **"Data [and evidence] does not automatically translate into better policy-making processes, but when it is interpreted, analysed and critically discussed, it can help make decisions smarter, more transparent and more open." – Varun Banka, Pulse Lab Jakarta (2014)**

To document the extent to which, and how decision-makers engaged with the Scenario-Based Health Impact Projections and used them for action, 1) we captured quantitative metrics of evidence uptake, and 2) conducted key informant interviews with a purposive sample of stakeholders.

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[3] Barnett, C., & Gregorowski, R. (2013). Learning about theories of change for the monitoring and evaluation of research uptake.

## III. Methods

### 1. Capturing quantitative metrics of evidence uptake

Various sources were used to compile the information:

1. Input from the UK-HIH, LSHTM and JHU research team members on dissemination strategy followed and media engagement.
2. Google Analytics data of the gaza-projections.org website between February 19 and October 31, 2024. Metrics included website views, referral channels and users by country.
3. Media coverage shared by the LSHTM communications team covering the period between February 19 and May 28, 2024 for HIP Report 1. No media coverage was conducted for HIP report 2.
4. Advanced search on Google for the exact term "gaza-projections.org"
5. For scholar publications, a Google Scholar search using the terms "gaza-projections.org" was conducted.

### 2. Key informant interviews

We conducted semi-structured interviews between April and October 2024 with actors who engaged with the Scenario-Based Health Impact Projections. A preliminary list of potential interviewees was compiled by the funder and research teams and was expanded upon using the snowball technique. We sought interviews with representatives from governments, international donors, UN agencies, international non-governmental organisations (INGOs) including human rights organisations, humanitarian clusters, academic & research institutions/entities and media, mortality experts, among others. Interviews were conducted online over Zoom platform.

Topic guide questions explored: 1) participants' role in the context of the Gaza crisis, 2) their awareness and understanding of the Scenario-Based Health Impact Projections, 3) how the evidence was used, if at all (e.g. whether and how they may have engaged with the projections and whether the outputs influenced (or had the potential to influence) decision making or their work on the ground), 4) perceptions of the projections and suggestions for changes (e.g. strengths, weaknesses and what they found helpful or unhelpful in terms of content and presentation and transferability of methods) (Annex 1).

Transcripts were analysed using a thematic approach. A coding framework was developed iteratively using both inductive and deductive approaches.

Ethical approval was obtained from the LSHTM Ethics Committee. Written informed consent was obtained from all subjects.

## IV.    Findings

The findings are divided into two parts: (1) quantitative metrics, and (2) the qualitative analysis from key informant interviews. The quantitative metrics capture the dissemination strategy, media coverage and engagement, website reach, and report uses. The qualitative analysis includes a summary of key informants interviewed, the themes we uncovered, and the key findings within each thematic area.

## 1.   Capturing Quantitative Metrics

### 1.1. Communications and dissemination strategies, media coverage and engagement, website reach and report uses

#### 1.1.1.   Communication and dissemination strategies

The UK-HIH in partnership with LSHTM and JHU put in place a communications strategy for the dissemination of outputs as well as a media and communications policy to provide clear guidelines to all three entities to ensure effective, consistent, and appropriate public engagement related to the published reports.

In advance of the HIP report 1 release, UK-HIH, LSHTM, and JHU intentionally mapped stakeholders with whom the report was shared on release day. Stakeholders included humanitarians from WHO and INGO agencies, mortality experts globally and donors. They themselves further disseminated the report within their institutions and networks, as well as on social media.

The Foreign, Commonwealth and Development Office shared the HIP Report 1 through diplomatic circles.

The researchers themselves also shared the HIP Report 1 through their professional circles. They met with representatives of governmental agencies (at the National Security Council), UN agencies (UN-OHCHR, GOARN), development agencies (USAID BHA and FEWS NET) and technical experts (Famine Review Committee) to disseminate the results.

They presented the research findings of both reports, and contributed to conferences and webinars (MSF Scientific Day International 2024[4], Refugees International Stop Gaza's Famine), panel discussions in-person or online at several academic institutions in the USA (JHU, UCLA, Harvard University, Columbia University and Brown University), the UK (LSHTM, Westminster University), South Africa (Capetown University), Europe (Ghent University) and Palestine (Palestine Economic Policy Research Institute – MAS) between March and October 2024.

It was agreed that no proactive media engagement for HIP Report 1 will be sought by the UK-HIH, nor its partners LSHTM and JHU initially. As uptake was slow, the teams started reaching out to select journalists, and that drove most of the interest (further information under media engagement).

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[4] https://scienceportal.msf.org/assets/8792

A few days after the launch, both academic institutions posted statements on their websites as well as about the findings on social media (such as LinkedIn and X). Then the UK-HIH developed some graphics that were also posted on LinkedIn.

For HIP Report 2, it was shared with key news outlets that reported on HIP Report 1.

### 1.1.2. Media coverage

Media coverage was tracked for HIP Report 1 by the LSHTM media office, while it was not tracked for HIP Report 2. Thus, the information below is only relevant to HIP Report 1 between its launching date (February 19, 2024) and May 31, 2024.

The HIP Report 1 was mentioned 943 times in the media, with 78% of mentions over the first two weeks post-launch (Annex 2- Figure 1). Most were online news and content, and blogs from over 70 countries with an aggregate readership exceeding 3.1 billion (online news and content with 3 billion, and blogs with 15.6 million). Forty percent of mentions were from USA outlets followed by Australian (8.5%) and UK ones (7.5%). It is worth noting that the USA outlets constituted 52% of the mentions among the top 10 countries (Annex 2- Figure 2).

The researchers were hosted in interviews on international broadcast TV and radio, and online media including podcasts, news, magazines, and blogs (as shown in Annex 2- Table 1). Other international actors such as WHO officials, and international non-governmental organizations also referred to and commented on the report on international news outlets (Annex 2-Table 2).

### 1.1.3. HIP Reports 1 and 2 Website Analytics (gaza-projections.org)

Out of the approximate 18,000 new users who visited the website within the allotted timeframe (February 19 – October 31, 2024), around 17,000 users engaged with the website. Peak views from new users happened between February and March after the release of HIP Report 1 (Figure 1). No similar peak in views was noted after the release of HIP Report 2. The number of sessions[5] reached over 26,000 with users returning to the website.

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[5] Google Analytics defines a session as web impressions, or every single time someone visits your website, logged between the time they visit and ending after 30 minutes of inactivity. Every pageview, click, download, etc., is logged as one "Session," and if the same visitor comes back hours or days later, another session is logged. As such, this metric does not reflect unique views.

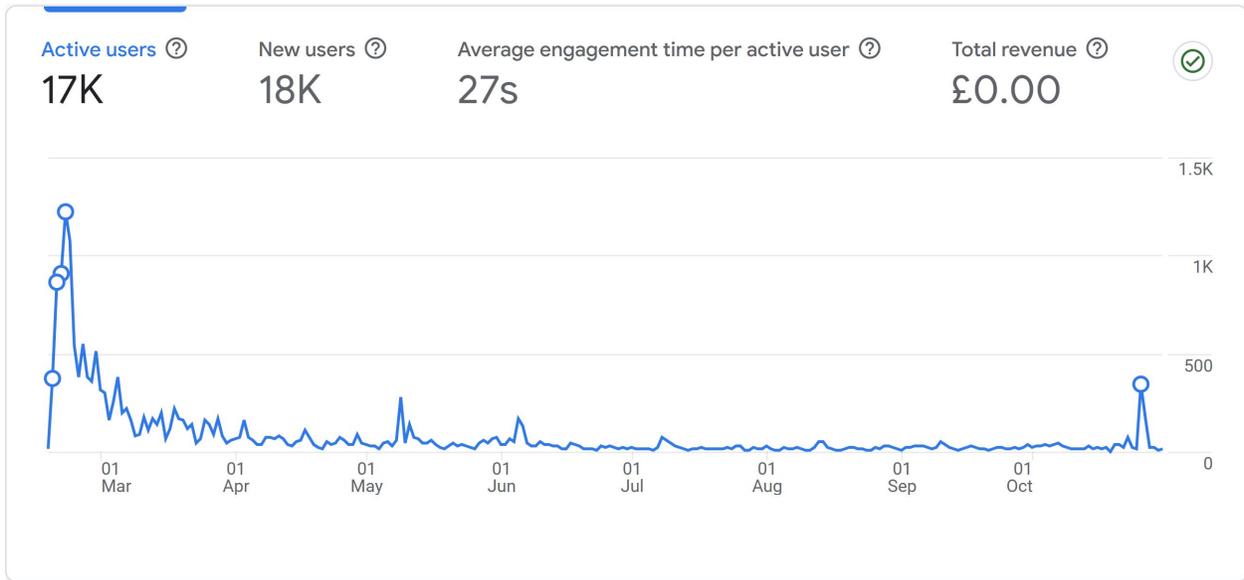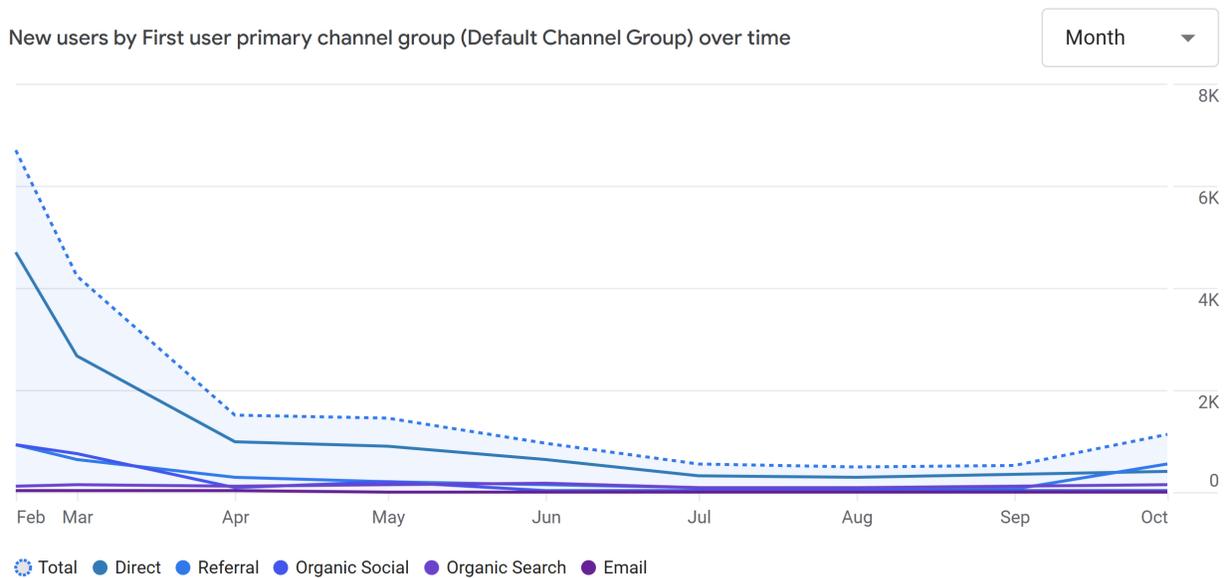**Figure 1:** Unique website visitors



Figure 2 illustrates the default channels[6] to access the website, or how new visitors were directed to the site over time. Over 60% of new users visited the website directly, while others found the site via referral, organic social, or organic search.

**Figure 2:** Default channels to access the website



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[6] "Direct" is the channel by which users arrived at the website via a saved link or by entering the URL. "Referral" is the channel by which users arrived at the website via non-ad links on other sites and apps such as blogs and news sites. "Organic Social" reflects users arriving at the website via non-ad links on social sites like Facebook or Twitter. "Organic Search" is the channel by which users arrived at the site via non-ad links in organic-search results.

New users by
First user primary channel group (Default Channel Grou... ▾
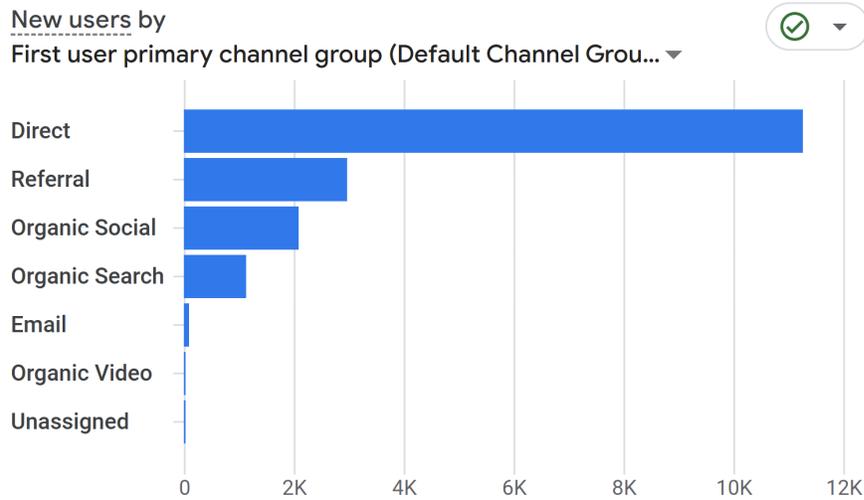
The top new users visiting the website were from the USA and the UK, with over 7,700 users in total from both countries as shown in Figure 3. Palestine ranked 26th in the country user list with 74 new users.

**Figure 3:** New users by country



New users ▾ by Country

| COUNTRY | NEW USERS |
|---|---|
| United States | 7.6K |
| United Kingdom | 2.4K |
| Netherlands | 805 |
| Canada | 644 |
| France | 499 |
| Israel | 467 |
| Germany | 378 |

### 1.1.4. HIP Report uses

Soon after its launch, the HIP Report 1 was used by various stakeholders as a source of evidence in politics, as well as human rights and judiciary, to comment on the humanitarian situation in Gaza and advocate for a ceasefire. It was also referenced in UN situation reports and technical reports to highlight the humanitarian situation and need for humanitarian assistance, as well as in academic work.

*Politics*

The mortality projections were brought up several times in the UK parliament within ten days of the report launch. Brendan O'Hara, a Scottish National Party MP, mentioned the projections at the House of Commons during a debate on ceasefire in Gaza[7]. In the USA, Senators Sanders and Warnock referred to the mortality projections as part of their interventions at the Senate on February 28, 2024.[8]

The projections were also mentioned in high-level humanitarian forums. Dr Richard Brennan, Regional Emergency Director for Eastern Mediterranean Region, WHO, intervened as a witness on the humanitarian situation in Gaza at the International Development Committee meeting on February 27, 2024.[9] And in April 2025, MP Layla Moran also referred to the excess deaths during a debate on the humanitarian crisis in Gaza.[10]

*Human rights report/Judiciary[11]*

Francesca Albanese, special rapporteur on the situation of human rights in the Palestinian territories occupied since 1967, refers to the HIP Report 1 in the "Anatomy of a Genocide" report she presented at the Human Rights Council in March 2024[12] , and in "Genocide as colonial erasure" report in October 2024[13].

In response to a request by Gisha, the Legal Center for Freedom of Movement, the LSHTM research lead submitted a letter in support of a petition to enable humanitarian aid access to the Gaza Strip (filing date: 18 March 2024) to the High Court of Justice in Israel[14].

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[7] https://hansard.parliament.uk/commons/2024-02-21/debates/610A4D12-A333-4885-9D0B-0A225C35C043/CeasefireInGaza

[8] https://www.facebook.com/senatorsanders/videos/1473420286720190

[9] https://www.dropbox.com/home/BBCP_03-03-2024_23.09?preview=BBCP_03-03-2024_23.09.09.mp4

[10] https://hansard.parliament.uk/commons/2024-04-17/debates/65D2C3D1-F094-4D2C-A6A2-267BAA710BE2/HumanitarianSituationInGaza

[11] The International Court of Justice referred to the Lancet paper on Excess mortality in Gaza: Oct 7–26, 2023 which isn't covered by this report. https://www.thelancet.com/journals/lancet/article/PIIS0140-6736(23)02640-5/fulltext

[12] https://reliefweb.int/report/occupied-palestinian-territory/anatomy-genocide-report-special-rapporteur-situation-human-rights-palestinian-territories-occupied-1967-francesca-albanese-ahrc5573-advance-unedited-version

[13] https://www.un.org/unispal/document/genocide-as-colonial-erasure-report-francesca-albanese-01oct24/

[14] https://gisha.org/UserFiles/File/LegalDocuments/HCJPetition2024/Expert_opinion_Checchi_030424.pdf

*Open letter*[15]

A group of American medical professionals who served in Gaza wrote an open letter addressing the president urging for a ceasefire and for full, unrestricted access of medical professionals to Gaza.

*Reports and briefs*

Several UN agencies reports, technical reports and briefing notes with a focus on food insecurity, protection, and humanitarian access, as well as policy briefs and papers referred to the HIP Reports with a majority referring to Report 1 (Annex 2- Tables 3, 4 and 5).

*Academic citations*

Only HIP Report 1 has so far been cited in scholarly articles/papers, mostly in public health and nutrition journals, as well as bioethics and economics (Annex 2 - Table 6). Only three articles are peer-reviewed (#1, #2, #3), one is an economics research paper, and the remaining ones are news, editorial, opinion, and perspective articles.

## 1.1.5. Reflections and implications

Most news outlets focused on the numbers of excess deaths for the three scenarios in HIP Report 1. While the report clearly presented the numbers both in the absence and with the occurrence of epidemics, news outlets very rarely reported on the numbers with the occurrence of epidemics, despite their constant mention by the research team during their dissemination activities.

Many outlets adopted the narrative of "saving lives" when referring to the first report. For example, *Visualizing Palestine* reported that "74,100+ could be saved based on the projected difference between continued genocide & permanent ceasefire."[16]

A key error was noted in reporting the number of excess deaths. For example, an article by Reuters mentioned that, "Even if the fighting in Gaza stopped now, about 8,000 more people could still die there over the next six months,"[17] a number that was never included in the HIP Report 1. The Reuters article constituted the source for more international media articles citing these incorrect numbers.[18]

While the overall number of excess deaths was initially of interest, several elements of the HIP report 1 were increasingly relevant over the months as the situation evolved in Gaza. For

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[15] https://www.gazahealthcareletters.org/usa-letter-oct-2-2024
[16] https://visualizingpalestine.org/visual/ceasefire-projection/
[17] https://www.reuters.com/world/middle-east/gaza-health-crisis-could-kill-8000-more-by-august-even-if-fighting-stops-report-2024-02-20/
[18] https://in-cyprus.philenews.com/international/gaza-health-crisis-could-kill-8000-more-by-august-even-if-fighting-stops-report/; https://www.stabroeknews.com/2024/02/20/news/world/gaza-health-crisis-could-kill-8000-more-by-august-even-if-fighting-stops-report/; https://news.indozone.id/world-update/914202163/krisis-kesehatan-di-gaza-diperkirakan-tewaskan-8000-orang-hingga-agustus

example, acute malnutrition was the most relevant section during discussions of possible famine, and more recently the infectious diseases with the Polio outbreak.

## 2. Qualitative analysis of key informant interviews

### 2.1. Characteristics of participants

Out of 47 stakeholders contacted, 18 responded and 16 were interviewed. Five of the 16 key informant interviews were conducted with government agency/international development representatives, six were with UN agency representatives, and one each with: an academic representative, an independent consultant, an INGO representative, and a non-profit organization representative.

Of the key informants interviewed, the majority (12 out of 16) were involved in the Gaza crisis. Five of them were based in Gaza and doing work on the ground there, either permanently or for temporary field work during the crisis. One was formerly based in Gaza, but was not involved in the current crisis.

The majority of interviewees were directly involved in the Gaza crisis and had an impact on decisions within their own operations on the ground. Some were more directly involved in decisions around what the humanitarian response strategy should be based on the data, while others' role involved utilizing the findings to provide guidance to decision making executives at a higher level. This included coordination with donors around financing, coordination for collective advocacy activities, humanitarian preparedness and response around the key health issues identified, operational expertise and oversight (including protocol development), implementation, situational and impact analyses, and monitoring and feedback from on-the-ground operations.

Five out of the 16 interviews were conducted when only the first report had been launched, and thus those key informants only reflected on that first report. Out of the 11 key informants who were interviewed after the launch of the second report, five reflected on the exercise generally without referring to any of the reports, three reflected only on report one, and three on both reports.

### 2.2. Key findings

The main aim of the Gaza-crisis Health Impact Projections was to "*try and influence*" the high-level political decision makers in the UK and USA, and to a lesser extent "*to inform people who are trying to generate the programming and financial response*.

*"We would use them [the projections] internally to make other teams and more senior people and ministers aware of what was projected to happen. And I think that was really useful and the projected timeframes were really useful because we could kind of then say, look, this could be the scenario in a few months if nothing changes."* - International development agency representative

### 2.2.1. Uses of the mortality projections

The projections were utilized by respondents to help advocate for a cessation of hostilities; to back what they "already knew" to sceptics, as well as to higher-level decision makers; and to inform humanitarian and emergency response on the ground, including the mobilization of resources. The report also helped contribute evidence and fill gaps, and also memorialize the crisis with the hope of post-conflict accountability from the perpetrators.

### *To advocate for a ceasefire*

Several stakeholders mentioned that the report was used for communication and advocacy with senior officials, including to advocate for a ceasefire, and influenced the positions of decision makers, as the data highlighted the gravity of the conflict and the trajectory that it was heading towards.

*"It was picked up certainly in the US by national security council, people, certain senators, and others that spoke in the House. [They] referenced it. Did it really massively shift? UK, I don't know. I'd have to go and speak to the former Foreign Secretary. I don't think so. But [it was] helpful in reinforcing what a lot of us have been saying anyway… And provide a better evidence base for that. Then. Yeah, I'd hope so.* - International development agency representative

Evidence is needed to inform action. It creates pressure for decision making, forcing institutional decision-makers to come face-to-face with the realities on the ground. It allows for strategizing around the reported operational realities that cannot be denied.

*"It [this report] forces the truth onto the table. It forces people to admit. It isn't about, you know, the practicalities and the criteria. It's not. It's nothing to do with that. It's for political forces at work.* – INGO representative

Yet, **the political nature of the war was cited as one of the main roadblocks** to having this evidence lead to policy changes. While the projections highlighted the impact of the war on the population and mortality, making a concrete difference on the ground was still a challenge.

*"The politicized nature of this particular conflict meant that […] we were advocating continuously about the extent to which the conflict was impacting on Gazans. Did it change policy? No, I mean, no, it didn't. It didn't have the effect that we would want, and you know that was, you know, for many of us professionally extremely challenging."* - International development agency representative

*"It's [a] much more complicated situation when it comes to advocating for the cessation of the war."* - UN agency representative

This illustrates how while evidence is a prerequisite to influence decision-making, data and subsequent awareness around an issue are not always enough to lead to decisions due to political factors that come into play. One INGO representative elaborated on this "*cognitive dissonance*":

*"You need evidence. You know, you need pressure. You need even the notion for a lot of leaders [...] because there's so much cognitive dissonance [...]. It's the institutions of aid versus reality on the ground. And this is the tension that always plays out. So, from a moral human cause, [mission-based] perspective, you know, we'd be doing things very differently if that was the only consideration. But in any institution, there's a whole bunch of other considerations that work against [that]. And so, what you find is institutional decision-makers are quite distant from reality. And so even to have evidence that says there is a human cost that is intolerable. That is, excess that shouldn't be allowed to happen, already brings decision makers [...] much closer to reality. It shocks them."*

This informant also mentioned that evidence is sometimes glorified, but it really comes down to subjective human decision making "*whether you like it or not*."

As such, despite the realities being made clear in the report, humanitarian actors and other decision makers will need to find ways to strategize around the operational realities and politics on the ground.

### *To back what they already knew on the ground to sceptics in the international community*

Several respondents mentioned that the data from the report were utilized to back what they already knew on the ground to sceptics in the international community. The credibility of the sources as well as the data generated were both factors that helped humanitarian workers make the case for the gravity of this crisis. The importance of air-tight data and a credible source were emphasized here.

*"The [...] extraordinary element in Gaza, of course, is just the degree of scrutiny from the Israeli authorities in particular, but also everyone, right. So whatever numbers you're [going to] publish, you [...] had to make sure that [...] there was a good deal of credible [...] evidence in terms of how they were generated. So that being said, I think once the final report came out... I seem to recall that we used it quite considerably inside [because] it confirmed what a lot of our suspicions of what we thought was happening on the ground and what we would estimate, as the humanitarian practitioners, would be the case given the intensity of the conflict."* - International development agency representative

*"One of the biggest issues for me in this crisis [...] [in Palestine] in the past but especially now [is] the contesting of evidence. And I think that it's got to be a very clear facts-based approach. You see, the continued approach by Israel to condemn, [deny], divert attention away from evidence coming from sources we had previously used and accepted [by] the Ministry of Health statistics in Gaza for example [...] There's a question mark over the [...] credibility of those now which wasn't there before [...] so you have to be very, very clear. And [...] when I was negotiating or meeting with the Israeli authorities, it was important that the evidence we had was a hundred percent watertight and that's important for things when you are using it for advocacy and you're using it to show trends which are impacting humanitarian situation. So having reports from John Hopkins University and other credible outlets, it's important for us to have that as leverage for advocacy and for improving the ability to respond."* - UN agency representative

Another UN agency representative reiterated the credibility of this set of data, and how it helped *"to send the message that we weren't just crazy humanitarians running around [...] flinging aid from right to left, but that there was some serious analytical quantitative thinking that was going on behind the scenes."*

### To inform humanitarian action

The report was seen as particularly useful by humanitarian actors, especially in a context when they needed this data presented to them as it took some of the legwork off of their work in the field. There is a lack of thorough, scenario-based planning, and humanitarian response is *"so overwhelmed by the barriers – structural and operational pieces,"* which is where the report added value in response efforts.

According to stakeholders, this report highlighted where the priority health needs are, and where they will continue to be high, providing a working baseline to help **inform and structure** the on-going health response – particularly considering that the source is widely considered trustworthy.

*"We are currently trying to mobilize a specialist for [a] Maternal Health Hospital for antenatal-postnatal care, [...] The first part is "Is it technically the right thing to do? Is there a case? Is there a programmatic case based on evidence for this? And that's pretty easy to generate, and so this kind of information [from the report] becomes a secondary source that corroborates what are people on the ground already saying. [...] So it adds to that picture in real time, [...] and it's used in briefings that go into our government briefings that go [...] in real time as we fight to get the right kind of decisions made."* - INGO representative

The report also informed future planning including rebuilding the health sector post-ceasefire.

> *"There's definitely a feeling that once this ceasefire is announced that [it] will be the time when it [the report] is more needed […] like all the kind of equipment for procurement and stuff like that we were trying to do in the early months. There's no point right now because it's not going to get in[to Gaza]. You know, if it had got in, then it would have been burned or bombed anyways. […] We need the ceasefire and then that's when the surgical rebuild will start."* – Representative of a professional network

In addition, the projections for excess deaths due to various conditions, beyond just food insecurity, helped to inform humanitarian action as per an international development agency representative.

> *"It's really reassuring that [it had its utility on the] programming side […] because that was certainly one of the objectives, because in a lot of crises, you know, it's just this heavy focus on food security […] other health issues, you know, [get] dropped off."*

Another international development agency representative said that it was used to inform decisions: "*So we've used it a lot as a kind of evidence base again with the caveat that these are projections, but nevertheless we feel they're fairly accurate projection[s]. So, we were using them to say [that] this is necessary. This is what the piece of work from LSHTM [and JHU] said could be the scenario. This is why we need to do X, Y, and Z.*"

The projections were also valuable because they provided an opportunity for humanitarian workers to look at the bigger picture and challenge whether their decisions being made were the best ones to address what was happening. It was an important piece of research that was taken into consideration for mapping ways forward in humanitarian response.

*For resource mobilization and allocation*

There was use for the report at a coordination level, and it would "*come back to prominence*" when coordinating agencies were working on their updated flash appeal. It was revisited during discussions at key points in time, where "*there would be that light bulb where people would say, 'Hey, there's that report. That might be really useful. Let's refer back to that and see if there's something we can pull from that.'*"

The impact of the report at an agency level was that the data helped to reinforce the need for the expansion of specific service areas and their lifesaving nature, as well as the procurement of drugs for communicable diseases such as COVID-19 and cholera. The report helped make the case for these services and highlight where the focus areas need to be. It also informed on priority areas for allocating funds and mobilizing resources for health service delivery in priority areas, as much as a particular organization would have influence over that.

*"I think the framing of the trauma picture was really helpful to both maintain [care], and we're [...] adding a second facility. So I think those are expensive. But I think this data helped to reinforce the level of need for that service area, and the lifesaving nature of it and just how [...] preventable [this] mortality [is]."* - International development agency representative

They also mentioned how, in emergency settings, the focus tends to shift from trauma care to primary care. As such, it was helpful particularly at the primary care level to inform efforts to mitigate the anticipated mortality rates that were projected. The report also demonstrated the potential impact of interventions on the ground.

However, not everyone agreed on the impact of the report on funding allocation. One stakeholder stated that funding decisions had already been made, and so it did not have an impact on funding flow toward particular areas. In their view, the report's objective was not to detail where funding was needed, and as such it was not utilized for that purpose.

In addition, one key informant reported that a possible reason for the limited use of projections in planning is that humanitarian actors are *"already both seeing and planning for worst case scenarios to the extent that they can. I don't think there's any confusion about how bad it is for the people inside. You know, nothing is really hidden. And, so, people are working at the maximum of what they're able to do. And so unfortunately [...] there's not a lot of ability to sort of [scale]."*

### *To memorialize the crisis and post-conflict accountability*

Beyond impact, the data was also seen as **a way to memorialize what happened during the hostilities**, "*especially when there is such failure attached*" to it as well. One interviewee drove this point home by painting a picture of what this information describes: A tragedy. "*It's a tragedy of inaction that is in Gaza, that is implied in those excess mortality numbers. [...] Where I think this data is very powerful is people focus on the conflict related casualties. [...] This data tells a different story this bigger tragedy. That is its power. I think that differentiates it from other data sets [...] So this sort of story of failure that's built into this data, I think it's powerful.*

The report was also considered to be a "*new tactic in human rights advocacy*" that is seen as *"immensely valuable"* in showing the staggering scale of civilian casualties and injuries inflicted by the perpetrators. It goes to support calculations done in humanitarian courts of law to rebut arguments that the *"military goals were proportionate to the civilian suffering"* inflicted.

> *What this study does and what I think is so interesting is this provides us a structured and scientific way to put perpetrators on notice. That what they're doing is likely to constitute a war crime or crime against humanity or a human rights crime, depending on the context, of course. I think you could use it in any number of ways. And that's really useful.*

*[…] If you continue on this course, this is the likely cost. And that [is] so valuable as a point of advocacy and argument.*" – Non-profit organisation representative

### 2.2.2. Contributions to evidence and whether it impacted decisions

The report provided information that was critically needed and missing, in a way that was transparent about its methodology and limitations.

There was also an emphasis on risks across various demographic variables, as juxtaposed with the counter-narrative on fighter deaths. There was much value offered from knowing the projections on patterns of mortality among women, children, and other groups that may actually be at even higher risk than military-age males.

The evidence **generated, reinforced, and complemented other existing data**, providing a broader evidence base, and "*add[ing] evidence to different areas of need and to our programs and strategies.*"

Specifically, the report helped members of organizations communicate what was projected to happen internally and make the case for the importance of the crisis.

> "*I understand that with all the rhetoric for the past 10, 15, 20 years about evidence-based decision making that there's the assumption that you need to take this document, read it. And there needs to be a one-to-one correlation between a decision that made and that I can't give to you.*" – UN agency representative

On the other hand, another UN agency representative said that solid data, while regarded as essential for preparedness and response, should not be the only factor to inform humanitarian action. Meaning, action should not be contingent on a specific number, particularly because the whole picture cannot be captured by quantifications alone. "*You want to move early, and [donors] want data that basically proves that [a crisis] is on the way and once you have that data, you're already kind of too late. Once the data is really solid… But it might not come. The point is, [it should already be] good enough to release funding, get humanitarians to […] do something about it. You've got to be able to move, and you've got to be able to admit you know what we moved […] we did something that was important, because it's like putting life preservers on a boat. You don't know that the boat's going down. You just need to do it because of the catastrophic cost of not doing it.*"

They continued to say that, "*none of that is an argument against this methodology. It's an argument to contextualize this information. And make sure that it's never seen as a solution to anything but a contribution to a much larger analysis.*"

Many uses were reported by key informants, but some mentioned that "*it didn't necessarily feed specifically into a concrete plan or high-level decision.*" This may be due to the limited

applicability on a practical level, as well as a reliance on first-hand experience over published evidence.

> *"We used the information, we thought about it, we looked at it, we took it into consideration, but it didn't necessarily feed specifically into a concrete plan. And it didn't necessarily feed into a specific high-level decision."* - UN agency representative

One reason behind that: *"It's that **heavy dynamic nature** that sucks from us the time and the energy to be able to do that depth of thinking that this offers us, but it also **limited our ability to really apply this and use this in a way that we would in a different context in a different situation.**"*

> *"From my point honestly, I only ever got the reports that were filtered to me on the overarching picture of the key sectors. I mean, clearly I was in Gaza every week. [...]. So I saw myself, I didn't need reports to tell me what was happening. You know, I would go there [to the hospitals] and speak to frontline workers. I would speak to the emergency field hospitals [...] and the questions were always more or less the same. Any new injuries, any new infections? What are the numbers? Who are the categories? Who are the constituents who are being affected? So for **me it was about first-hand experience of first-hand information** so I could use that when I'm having conversation[s] with the Israelis to put pressure on them to help us with the ability to respond better, that is bringing in more material, that is having more access. More crossing points, [...] having a better understanding of their obligations under an international humanitarian law."* – UN agency representative

The projections alone were seen as unlikely to influence decision-makers to act differently than they would have without them, or "*this evidence alone would not stop the war.*" This is likely because **one sole source of evidence** is typically not enough to persuade decisions made on the ground.

### 2.2.3. Factors that supported the uptake of the evidence generated

*The credibility of the institutions in a very controversial political type of response*

Multiple interviewees highlighted the credibility of the institutions and principal investigators as trusted sources with a track record as a main facilitator for "*selling*" the evidence generated. This was of note particularly given the controversial political nature of this work.

> *"[The report is] from a quality institution. And it's obviously been done in a way that's kind of irrefutable in [a] political sense, and [...] so much of this war is entirely political. It's not a natural disaster, and therefore having things that are out there in black and white and especially in the context where nobody really knows what's going on [...] on the ground*

*puts more [value] into projections like this, and [presents] a good idea of what to expect."*
– Representative of professional network

Yet, one stakeholder mentioned that while the institutions were highly credible, the report would have had a lot more value had it been published in a peer-reviewed journal.

### *Utility of dissemination and communications tools*

As part of the dissemination strategy, communications documents were presented to key stakeholders ahead of the official launching of the report, which helped to attract some attention to it.

> *"I thought that was really helpful. I don't know how much people pulled from them, but I thought it was a very helpful reference, and gives you a glimpse of what you [...] took away from all of this. So that was helpful."* - International development agency representative

While these communications outputs were useful to stakeholders, they were shared just an hour before launch, which was not enough time for organizations to be able to draw key messages from it to respond to questions early on.

> *"[The research team presented] to key UN partners just like an hour before the report was actually launched and I think that's a really good idea. I mean [in] hindsight, maybe an hour before is a bit quick because quite often, entities have to be prepared [with what they are] going to say, especially you know WHO and the like I imagine wanted to have defensive lines ready."* - International development agency representative

There was also an embargo on the report, and as such its launch caused difficulties in responding given the politicized nature of the conflict.

> *"When the report was published, we were all on panic mode in the field. Because when you face [your partners] and so on, what does that mean? [...] So, we would have, I think, personally, liked to see the report 48 [hours] or 3 days before. We can respect an embargo. We understand an embargo but we can be better prepared. To have some lines to take for the journalist[s], and so on."* – UN agency representative

### 2.2.4. Factors that may have undermined the uptake of the evidence generated

### *Format of the report*

A number of respondents reported that the report was easy to digest, accessible, and easily understood, which helped ensure that results were interpreted accurately including by the lay person.

*"I think [a] strength is, I really like the way they presented in the end. The way that they came out with the scenarios and the table [of] content was brilliant because it was a very easy to use format. And as I said before, we painfully learn[ed] about misinterpretation, and an easy-to-use format on results that can't be misconstrued is really valuable."* - International development agency representative

The friendly formatting was an added value to a dense report that may not have been utilized in the same way if it were not for this attention to detail in its presentation.

Yet, the report was seen by other respondents as a bit too technical for external actors and the lay person. With such a scientific approach, the report read as a bit dense, and the target audience may have missed out on some of the key messages. It would have been useful, in the eyes of these informants, to outline the main takeaways from the report at the outset using infographics, and include the more detailed version for those who wish to delve into the hard evidence. This would have made the report more accessible to the target audience.

### The delay in launching the reports

The time-consuming nature of the exercise led to delays in launching the first report. This delay, while justified, may have undermined the impact of the projections on decision-making and specifically advocacy for ceasefire as the narrative may have shifted by then.

*"I'm not sure that on its own… The estimates, the projections, you know, resulted in a massive shift… And it was probably quite late by the time [the first report was published], not late but things… I think the narrative had already moved a bit in terms of pressure to change the conduct of hostilities to some extent."* - International development agency representative

*"But I just do wonder if we had something earlier, whether that it might have been even more impactful, but it probably would have been less technically credible. And that's the balance. That's the trade-off."* - International development agency representative

### The dynamic/volatile nature of the conflict and inherent limitations of projections' studies

*"There have been changes in the way that the war has just progressed […] I wouldn't say that they are completely invalid but then because of the political situation it's important for us to continuously be revisiting that data and seeing if it's still, it's relevant and valid as much as possible."* – UN agency representative

**Projections have inherent limitations and challenges**; no matter how rigorous, the numbers generated will not be completely precise. Forecasting presents limitations as to *"how far the realities of what has been projected will actually come into play."* This is true particularly given the ever-changing, fluid and volatile nature of the situation.

*"Endeavouring to project something in a highly dynamic situation,"* as well as *"the disparities between the different possible scenarios, means that the variance in the projected numbers could be extremely high"*. Consistent monitoring and follow-up with a timely, updated version of the report could have made the ongoing projections stronger. The projections were of value for a given snapshot in time.

### 2.2.5. Transferability of methods

Another point that was brought up was **the innovation of this study**. This type of mortality study hadn't been done before, and there is hope that the methodology can be developed over time and be used in other contexts. A non-profit organisation representative mentioned, *"And that's the most exciting piece of it. That's why I think this is such an exciting study, because this is a replicable method that we can use in lots of different places."*

The methodology was also cited as a strength, both in terms of the methods itself, as well as the transparency of the report in highlighting its own strengths and limitations. This meant that it delivered what it promised to deliver: projections rather than predictions. This allowed those utilizing its findings to know exactly what they intended to represent.

> *You know, so I think if they do a serious job of that [drafting an after action report] then perhaps not only could this be transferred to other [contexts], but it could be transferred in a way that would really shed light… rather than just like producing a report that maybe where the predictions […] turn out to be [higher] the next time they do it…"* – Academic

### 2.2.6. Strengths of the mortality projections

The quantification of excess mortality, the three scenarios, and the comparative nature of the projections were all cited as specific strengths in the methodology. The three scenarios were coherent compared to other surveys that were seen by stakeholders. These scenarios, while they were not predictions, helped outline an understanding of what may be on the horizon and subsequently informed communications around these potential future outcomes.

An academic mentioned how the report highlighted indirect deaths before it was widely talked about; it provided a blueprint as to where to look and what those deaths might look like.

There was a difference of perspective on the value of the projections; some thought they were useful, while others questioned their utility. A UN agency representative mentioned that it was not the projections *themselves* that were the biggest strength, given the volatile nature of the situation, but rather that *"the report had [us] come face to face with topics that [we] may ignore whether by mistake or voluntarily"*. They further stated that an advantage of the report was that it *"made us think better and challenged us."*

As stated by another UN agency representative, *"We thought we could trust the information in the document in terms of [the] projections that they could make. It felt quite realistic, in these projections. So that's why we were using it as a reference document."*

Others said, *"this is the most sensible projection of the impact of the war"*, and that *"this particular document was the most helpful that I have found […] I did feel that at least the numbers that they were getting, to me, seem the most grounded and kind of scientific oriented than others that I have seen."*

## V.     Limitations of this exercise

*Quantitative component*

This report provides insight rather than a comprehensive picture into the dissemination, reach and mentions of the HIP Reports for various reasons. For HIP Report 1, the researchers may not have shared a full list of their engagement whether through media or in their professional circles. For HIP Report 2, no dissemination strategy was adopted, and media engagement was not monitored. No digital object identifier (DOI) was given to the reports; thus, the reporting of mentions may be incomplete.

While the overall number of excess deaths was initially of interest, several elements of the HIP report 1 were increasingly relevant over the months as the situation evolved in Gaza. For example, acute malnutrition was the most relevant section during discussions of possible famine, and more recently the infectious diseases with the Polio outbreak.

*Qualitative component*

Out of 47 stakeholders contacted, 16 were interviewed. There were obstacles in recruiting stakeholders for these key informant interviews, particularly those based in Gaza at the time of data collection. There was a slow and low response rate from those potential participants, plausibly as engaging in an interview would not be a top priority for those on the ground. As such, a shift in strategy was needed. Stakeholders working outside Gaza with teams on the ground, or those who had already returned home and had more bandwidth to respond were recruited (in place of those who we tried to initially reach). We also were unable to interview policy makers who would have given us a better insight on the political impact of this work.

## VI.     Conclusion

The research work by the LSHTM and JHU on Gaza established an innovative approach to mortality estimations and public health projections. These projections are intended to assist humanitarian organizations, governments, and other stakeholders in planning their crisis response and making informed, evidence-based decisions, with the ultimate goal of contributing to saving lives. Uptake can be defined as *"a link between producing evidence and results and having an impact on the humanitarian system."* The interest in uptake and diffusion is growing in the field, while acknowledging that the research to policy and practice pipeline is often riddled with complexities: Policy is influenced by a multitude of different factors, each with its own

dynamic. Causal pathways between research and policy change are difficult to establish, and the relative impact of one organization or body of findings is hard to measure. In addition, and in relevance to contexts such as the one in Gaza and the pressure for a quick turn-around of results, policy change can only be adequately measured over time.[19]

Organizations are increasingly requiring for the assessment of the impact of research innovations to help drive evidence-based humanitarian responses.[20] As such, this evidence uptake evaluation was conducted to build a better understanding of the potential contributions of such data to decision making.

The projections were quickly used by various stakeholders (including UN organizations, humanitarian and medical professionals, and academics) as a source of evidence to inform the humanitarian action in Gaza and advocate for a ceasefire in Gaza and for full and unrestricted access for humanitarian workers. It was also referenced in UN reports and in academic work.

Research uptake requires four strands of diffusion: stakeholder engagement, capacity building, communicating, and uptake monitoring and evaluation. In this framework, not all strands are seen as essential to every project. Researchers may consider all four strands; however, each project will utilise them according to relevance and applicability.[20] This exercise in particular capitalised on dissemination and communication strategies. Another strand it applied was this evidence uptake evaluation, which is the purpose of this report. As such, three strands out of four were applied within the scope of this project.

As part of their communications and disseminations strategy, both the funders and research teams mapped stakeholders with whom to share the report on the day of its launch, allowing for their early engagement. A media and communications strategy was also put into place to provide clear guidelines for effective and consistent public engagement, and to improve the report's visibility and its potential to influence change. The research teams shared the report with their professional circles and a wide network of humanitarian stakeholders, and through social media and international broadcast TV and radio stations. The HIP Report 1 was disseminated by 943 online news and content, and blogs from over 70 countries with an aggregate readership exceeding 3.1 billion. A dissemination strategy for HIP Report 2, on the other hand, was not adopted, which may explain the limited mentions and uses. Also, more than 65% of the approximate 17,000 visitors of the gaza-projections.org website visited it directly (i.e. via a saved link or by entering the URL) rather than through referral (i.e. non-ad links on other sites and apps such as blogs and news sites). Thus, the targeted dissemination strategy driven by the funder and research team was successful, indicating its importance for future such reports. Future dissemination strategies should require hyperlinks to the research findings to be included in media shared, as this could help drive traffic directly to the resource. The credibility of the

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[19] Barnett, C., & Gregorowski, R. (2013). Learning about theories of change for the monitoring and evaluation of research uptake.

[20] Elrha. Uptake and Diffusion Guidance Note: for projects funded through ELRHA. 2014. https://www.elrha.org/wp-content/uploads/2015/01/ELRHA-Uptake-Diffusion-Guidelines.pdf

research institutions was cited by many stakeholders, and as such was key in facilitating dissemination, and boosting stakeholder engagement and uptake of the results.

Any future research uptake should consider all four strands of diffusion. The context is important to consider. If such research is being conducted in ongoing crises and in emergency contexts, preparedness and commitment from researchers, funders, and other relevant stakeholders is needed to ensure research uptake. In addition, politically sensitive issues need special consideration within the communications strategy, such as permissions to share the findings with key partners while the output is still under embargo.

This research was among the first published bodies of work around mortality projections. The methodology was cited as replicable in different contexts and can be developed further over time as more such research is conducted, which is an added value of this work. The findings and lessons learned from this innovative study help to pave the path for future similar research endeavours.

However, one source of evidence is not likely to be the driver of policy change. While such data may feed into work on the ground, they are only one piece of the puzzle, particularly in volatile and politically sensitive contexts where the factors influencing decisions are dynamic and complex. Policy and practice decisions are informed by multiple factors, values, and sources of evidence, and are driven "by power dynamics beyond the direct influence of research activities." [22] In addition, the report was seen as quite dense by some stakeholders, which may be another potential limiting factor around uptake[21].

These mortality projections were pioneering in their own right, offering data points for the crisis in Gaza with the potential for on-the-ground impact, and lessons to be carried over for future research in similar contexts.

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[21] Louder E, Wyborn C, Cvitanovic C, Bednarek AT. A synthesis of the frameworks available to guide evaluations of research impact at the interface of environmental science, policy and practice. Environmental Science & Policy. 2021; 116: 258-265. & Hakkarainen V, Daw TM, Tengo M. On the other end of research: exploring community-level knowledge exchanges in small-scale fisheries in Zanzibar. Sustainability Science. 2020;15:281–295.

# TOPIC GUIDE – KEY INFORMANT INTERVIEW

**Title of Project:** An evaluation of evidence uptake of *Crisis in Gaza: Scenario-Based Health Impact Projections*

**Name of PI/Researcher responsible for project:** Francesco CHECCHI

| Question | Possible probes |
|---|---|
| **Topic 1: Generalities** | |
| What has been your role in the context of the Gaza crisis? | When working on the Gaza crisis, what would have been your main day-to-day activities / areas of focus? |
| What types of decisions related to the crisis do you feel that you have been most involved in, or been in a position to influence? | How do you feel that you achieve your influence? What kinds of stakeholders do you mainly engage with? |
| **Topic 2: Awareness and understanding of Scenario-Based Health Impact Projections** | |
| We contacted you because we believe that you have seen and perhaps used the LSHTM/JHU's health impact projections to the Gaza crisis. Can you confirm that you have some familiarity with this information product? | *[if not familiar, offer to either end interview at this point or resume it at a later date after the participant has had a chance to review the LSHTM projections: in the latter case, skip to Topic 4 and note that the participant was not initially familiar with the projections]* |
| What is your understanding of the kind of evidence that the projections are presenting? | What do you understand to be the main strengths and limitations of the projections, at least in terms of the methods used? |
| Who do you think are the main target audiences for the LSHTM/JHU projections? | When thinking about whom the project was done for, do particular actors come to mind? |
| **Topic 3: How the evidence was used, if at all** | |
| Thinking about your own work, can you tell us about the utility of the LSHTM/JHU projections? | To what extent were the projections looked at? To what extent did they influence decision-making? |
| [if any utility reported:] Can you identify one or more specific decisions that were influenced by the projections? | Decisions could be around resource allocation, humanitarian activity design, military planning, advocacy, diplomacy… Try to be as specific as possible. |

| Question | Possible probes |
|---|---|
| Thinking about others' work, including people outside your organisation, can you tell us about the utility of the LSHTM/JHU projections? | To what extent were the projections looked at? To what extent did they influence decision-making? |
| [if any utility reported:] Can you identify one or more specific decisions that were influenced by the projections? | Decisions could be around resource allocation, humanitarian activity design, military planning, advocacy, diplomacy… Try to be as specific as possible. |
| Topic 4: Perceptions of the projections; suggestions for changes | |
| What do you think are some strengths of the LSHTM/JHU projections? | |
| What do you think are some weaknesses of the LSHTM/JHU projections? | What about the researchers' positionality? What about the way in which information is presented / packaged? |
| How could this information product be adapted or improved? Are the methods transferable to other contexts? | Try to be specific. Is there any information that is missing, and should be added? Is there any information that you would take out? Any changes in the adopted format? |
| Are you aware of information products generated during the crisis that you or others considered particularly successful at influencing decisions? | Please describe the information product(s). What made the product(s) more or less influential than the LSHTM/JHU projections? |

## Annex 2 – Supplementary material

**Table 1:** Media engagement of LSHTM and JHU members

| Outlet | Title and URL |
|---|---|
| **Television** | |
| Democracy Now! | Gaza Ceasefire Could Save 75,000 from Death: Report from London School of Hygiene & Johns Hopkins<br><br>https://www.democracynow.org/2024/2/26/gaza_health_projections |
| BBC News 24 - The Context with Christian Fraser | Death toll in Gaza to hit 30,000 people.<br>https://www.dropbox.com/scl/fi/aj3hd1dkq8g2n07ek1b5v/BBC24_02-26-2024_21.03.56.zip?rlkey=mym1lgte065x4xg1om52bzxd4&dl=0 |
| Sunday with Laura Kuenssberg | No longer available. Broadcast on 21/04 |
| TRT World | New report on Gaza future draws grim outlook for enclave.<br>https://www.youtube.com/watch?v=MNKiDTAZ_NM. |
| **Radio** | |
| BBC Radio 5 Live (ft. independent charity consultant Madeleine McGivern) | Page no longer available. |
| BBC World Service Newsday | Page no longer available. |
| RTE Radio One | Warning up to 85,000 Gazans could die in the next six months due to war or illness. https://www.rte.ie/radio/radio1/clips/22359058/ |
| CBC Radio One | Title not available.<br>https://www.dropbox.com/scl/fo/7njzx8olom2675jjmbcgr/h?rlkey=psk3ik2ix2er6t0xoukysasno&dl=0 |
| **Podcasts** | |
| Public Health on Call podcast | Projections of Excess Deaths in Gaza Over the Next Six Months<br>https://player.fm/series/public-health-on-call/ep-733-projections-of-excess-deaths-in-gaza-over-the-next-six-months |
| Owen Jones Talks podcast | Horrifying New Gaza Study Shows Worst To Come - Without Immediate Ceasefire<br>https://www.youtube.com/watch?v=zzjlHMFkRdk |
| Jadaliyya podcast | Gaza in Context: A Collaborative Teach-In Series — Mortality Estimation in Gaza: Between Politics and Reality<br>https://www.jadaliyya.com/Details/46198 |
| **Online news, magazines & blogs** | |
| The New Yorker | The Humanitarian Catastrophe in Gaza Can Only Get Worse<br>Trying to project the death toll from Israel's military campaign over the next six months. https://www.newyorker.com/news/q-and-a/the-humanitarian-catastrophe-in-gaza-can-only-get-worse |

| | |
|---|---|
| Fanpage.it | Israel's blockade of aid to Gaza is causing a famine worse than that in Somalia: the data. https://www.fanpage.it/esteri/il-blocco-di-israele-agli-aiuti-a-gaza-sta-causando-una-carestia-peggiore-di-quella-in-somalia-i-dati/ |
| The Wall Street Journal | Over One Million Gazans Are Estimated to Be Starving<br><br>Food-insecurity experts also warn of 'imminent' famine in northern Gaza.  https://www.wsj.com/world/middle-east/over-one-million-people-in-gaza-are-facing-starvation-d2bdf6c4 |
| TIME Magazine | How Warmer Weather Could Fuel a Massive Epidemic in Gaza. https://time.com/6837417/gaza-crisis-spring-disease/ |
| Goats and Soda- NPR's global health and development blog. | Middle East Crisis – Explained. Even if there's a ceasefire, thousands of deaths projected in Gaza over next 6 months https://www.npr.org/sections/goatsandsoda/2024/03/01/1234993226/deaths-gaza-hamas-israel-war-projection |
| Haaretz | Epidemics, Famine, Untreated Wounds: Things Are About to Get Much Worse in Gaza. https://www.haaretz.com/israel-news/2024-04-06/ty-article-magazine/.highlight/epidemics-famine-untreated-wounds-what-happens-if-the-crisis-in-gaza-continues/0000018e-afe8-d9e9-a9af-effad3950000 |
| **Policy research organization** | |
| Center for Strategic and International Studies | Three futures for Gaza. https://www.csis.org/events/senator-van-hollen-next-steps-gaza |

**Table 2:** Examples of interventions by international actors referring to the HIP report 1

| Outlet | Guest | URL |
|---|---|---|
| CNN | Dr. Richard Brennan, WHO Regional Emergency Director | https://edition.cnn.com/videos/world/2024/02/22/exp-who-gaza-hunger-crisis-brennan-intv-022212aseg1-cnni-world.cnn |
| CNN | Chessa Latifi, Director of Emergency Preparedness and Response, Project Hope | https://www.dropbox.com/scl/fi/tqplvpjg7ui40d4ysbrt3/CNNIEU_03-02-2024_08.14.56.zip?rlkey=vfvvvbe8hof7t58hb3mdfnbk2&dl=0 |

**Table 3:** List of UN reports that refer to HIP Report 1

| #1 | UN OCHA. Hostilities in the Gaza Strip and Israel | Flash Update #125. February 2024. https://www.unocha.org/publications/report/occupied-palestinian-territory/hostilities-gaza-strip-and-israel-flash-update-125-enarhe |
|----|----|
| #2 | UNFPA. Situation report. Crisis in Palestine. March 2024. https://palestine.unfpa.org/sites/default/files/pub-pdf/unfpa-situation-report-6-march24.pdf |
| #3 | UN Women. Gender Alert: Gaza: A War on Women's Health. September 2024. https://www.un.org/sexualviolenceinconflict/wp-content/uploads/2024/09/gender-alert-gaza-a-war-on-womens-health/gender-alert-gaza-a-war-on-womens-health-en.pdf |

**Table 4: List of technical reports that refer to HIP Report 1**

| #1 | IPC Global Initiative. Special Brief The Gaza Strip. 2024. https://www.ipcinfo.org/fileadmin/user_upload/ipcinfo/docs/IPC_Gaza_Strip_Acute_Food_Insecurity_Feb_July2024_Special_Brief.pdf |
|----|----|
| #2 | Protection Cluster Occupied Palestinian Territory. Gaza Protection Analysis Update. The Systematic Destruction of the Fabric of Life. A protection update from Gaza. May 2024. https://www.globalprotectioncluster.org/sites/default/files/2024-05/gaza_pau_final_05.24.pdf |
| #3 | The Integrated Food Security Phase Classification (IPC) Famine Review Committee (FRC). Gaza Strip March 2024. Conclusions and recommendations. https://www.un.org/unispal/wp-content/uploads/2024/03/IPC_Famine_Committee_Review_Report_Gaza_Strip_Acute_Food_Insecurity_Feb_July2024_Special_Brief.pdf |
| #4 | Humanitarian Outcomes. Humanitarian Access SCORE Report: Gaza – the first six months. Survey on the Coverage, Operational Reach, and Effectiveness of Humanitarian Aid. March 2024. https://humanitarianoutcomes.org/sites/default/files/publications/score_gaza_2024.pdf |
| #5 | World Bank Group. World Bank Economic Monitoring Report. Impacts of the conflict in the Middle East on the Palestinian economy. May 2024. https://thedocs.worldbank.org/en/doc/ce9fed0d3bb295f0363d690224d1cd39-0280012024/original/Palestinian-Econ-Upd-May2024-FINAL-ENGLISH-Only.pdf |
| #6 | The Integrated Food Security Phase Classification (IPC) Famine Review Committee (FRC). Review of the Famine Early Warning Systems Network (FEWS NET) IPC-Compatible Analysis in the Northern Governorates of the Gaza Strip. Conclusions and recommendations.  May 2024. https://www.ipcinfo.org/fileadmin/user_upload/ipcinfo/docs/documents/IPC_Famine_Review_Committee_Report_FEWS_NET_Gaza_4June2024.pdf |
| #7 | UN FAO. Rural Transformation and Gender Equality Division (ESP) – Economic and Social Development Stream. Protecting the right to adequate food and saving lives in the Gaza Strip. Briefing note on the Occupied Palestinian Territory. 2024. https://openknowledge.fao.org/server/api/core/bitstreams/26907267-9b0d-4e84-a66d-26239d8af103/content |

**Table 5:** List of policy briefs and papers that refer to HIP Reports

| #1 | UN ESCWA. Gaza war: Expected socioeconomic impacts on the State of Palestine. October 2024. https://www.undp.org/arab-states/publications/gaza-war-expected-socio-economic-impacts-state-palestine-october-2024* |
|----|----|
| #2 | The Israeli Institute for Regional Foreign Policies. Recommendations for Essential  Infrastructure and Healthcare in the Gaza Strip. March 2024. https://mitvim.org.il/wp-content/uploads/2024/04/English-Recommendations-for-Essential-infrastructures-in-Gaza-V2.pdf |

* Not clear to which HIP report the authors refer to.

**Table 6: List of scholar publications citing the report**

| #1 | Tanous O, Hagopian A. The Locations of Palestine and the US in the Global Map of Homelessness: Part 2. International journal of social determinants of health and health services. 2024:27551938241261246. |
|----|----|
| #2 | Basu S, Yudkin JS, Jawad M, Ghattas H, Hamad BA, Jamaluddine Z, et al. Reducing non-communicable diseases among Palestinian populations in Gaza: A participatory comparative and cost-effectiveness modeling assessment. PLOS Global Public Health. 2024;4(5):e0003168. |
| #3 | Tanous O, Hagopian A. The Locations of Palestine and the U.S. in the Global Map of Homelessness: Part 2. International Journal of Social Determinants of Health and Health Services. https://doi.org/10.1177/27551938241261246 |
| #4 | de Waal A. Famine in Gaza: an example of the global humanitarian crisis. The American Journal of Clinical Nutrition. 2024 |
| #5 | Hassan F, London L, Manjra S. The global health community must call for an immediate ceasefire and unrestricted humanitarian aid in Gaza. British Medical Journal Publishing Group; 2024. |
| #6 | Yerramilli P. Refeeding in crisis settings: Implications on health care needs in Gaza. PLOS Global Public Health. 2024;4(5):e0003280. |
| #7 | Shahvisi A. The ethical is political: Israel's production of health scarcity in Gaza. Institute of Medical Ethics; 2024. p. 289-91 |
| #8 | Mahomed H, Hendricks L. A disappointing vote by the Stellenbosch University Senate on Gaza, Palestine: A lost opportunity to show ethical and moral leadership in support of social justice. South African Journal of Bioethics and Law. 2024:e2231-e |
| #9 | Ugarte ACG, Acosta E, Basellini U, Alburez-Gutierrez D. The effect of war on Palestinian life expectancy in 2023. Center for Open Science; 2024 |
| #10 | Looi MK. Gaza: Excess deaths could exceed 85 000, researchers predict BMJ 2024; 384. https://doi.org/10.1136/bmj.q509 |
| #11 | London L, Watterson A, Mergler D, Albin M, Andrade-Rivas F, Di Ciaula A et al. A call from 40 public health scientists for an end to the continuing humanitarian and environmental catastrophe in Gaza. Environmental Health 2024; 23: 59 https://link.springer.com/article/10.1186/s12940-024-01097-9 |
| #12 | Qureshi YA,  Dawas K, Maynard ND. Excess deaths in Gaza. The Lancet Global Health .2024; 12: 9, E1395. https://www.thelancet.com/journals/langlo/article/PIIS2214-109X(24)00267-5/fulltext |

| #13 | Khatib R, McKee M, Yusuf S. Counting the dead in Gaza: difficult but essential. The Lancet. 2024; 404, 10449: 237-238<br>https://www.thelancet.com/journals/lancet/article/PIIS0140-6736(24)01169-3/fulltext |
|---|---|
| #14 | Stamatopoulou-Robbins S. The Human Toll: Indirect Deaths from War in Gaza and the West Bank, October 7, 2023 Forward. 2024. As part of the Cost of War research project at Watson Institute for International and Public Affairs at Brown University.<br>https://watson.brown.edu/costsofwar/papers/2024/IndirectDeathsGaza |
| #15 | Mallapaty S. Gaza: why is it so hard to establish the death toll? Nature. 2024; 364:18-19 |
| #16 | Beyar R, Skorecki K, Concerns regarding Gaza mortality estimates. The Lancet. 2024; 404 (10466): 1925-1927.<br>https://www.thelancet.com/journals/lancet/article/PIIS0140-6736(24)01683-0/fulltext |

**Figure 1:** Total mentions over time

**Figure 2:** Total mentions for top 10 countries



International
Search: HHCC projections - all

18 men.          377 men.

| COUNTRY | TOTAL MENTIONS |
|---|---|
| United States | 377 (52%) |
| Australia | 80 (11%) |
| United Kingdom | 71 (10%) |
| Italy | 49 (7%) |
| Indonesia | 33 (5%) |
| India | 30 (4%) |
| Germany | 27 (4%) |
| Greece | 23 (3%) |
| France | 19 (3%) |
| Bahrain | 18 (2%) |