

# Influence of Disasters on the Urban Poor's Food Environments and Security

## Evidence from Sri Lanka

**Nisha Arunatilake**

Health, Education and Labour  
Institute of Policy Studies of Sri Lanka

# Rationale and Objectives

# Rational

- **High undernutrition in Sri Lanka.**
  - 15% of children under 5 years of age are affected by wasting (Global Nutrition Report, 2022).
  - **Three forms of malnutrition:** under-nutrition, over-nutrition, and micro-nutrition deficits.
- **USS residents** are identified as one of the **most nutritionally vulnerable** populations.
- Food systems and environments are key drivers of unhealthy eating, malnutrition and obesity
- Urban poor, face disproportionate barriers to accessing healthy food.

# Objectives

- How have various crises in Sri Lanka influenced the retail food market, food security, and eating patterns of urban underserved settlements (USS) populations?

# Methods/analysis

# Conceptual Framework - Food Environments

## “Healthy retail food environments

encourage healthy diets by supporting relatively greater availability, affordability, and promotion of healthier compared to less healthy alternatives (Cameron, et al., 2020)

### External Domain

Availability

Prices

Vendor & product properties

Marketing and regulation

### Personal Domain

Accessibility

Affordability

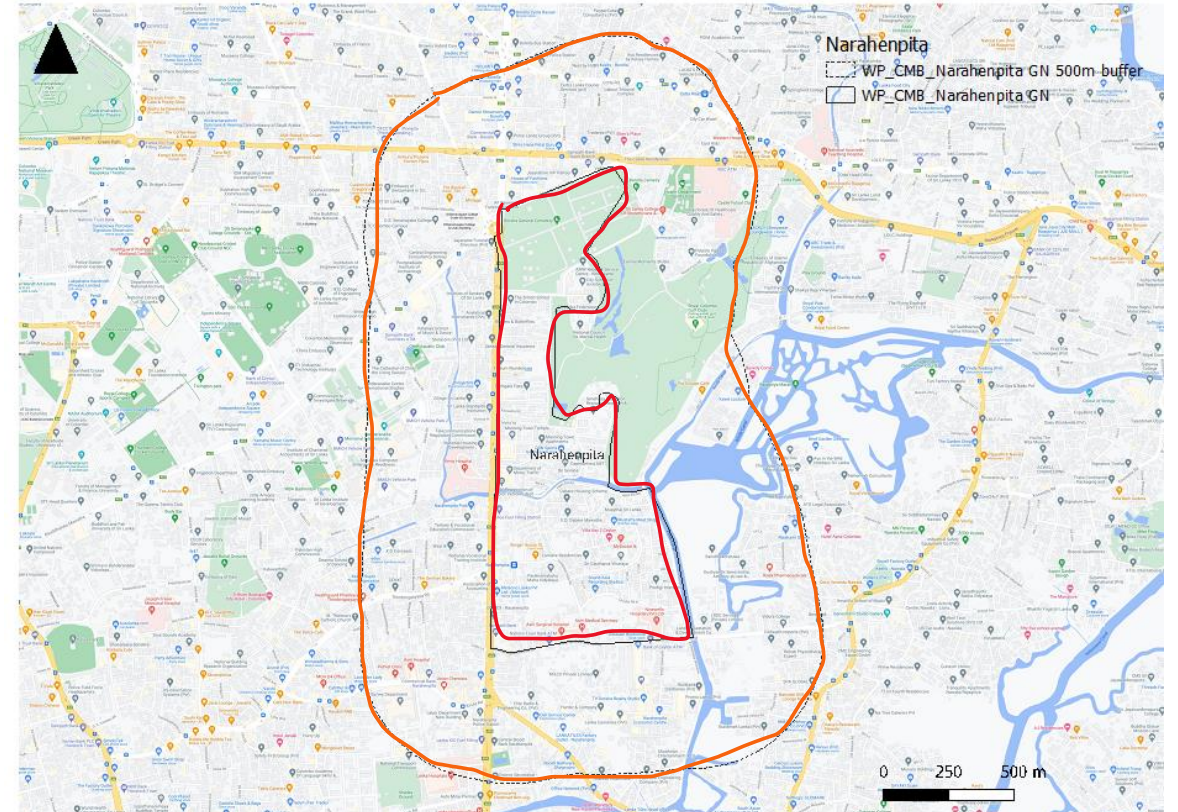
Convenience

Desirability

Source: Adapted from Turner, et al. (2018).

# Study Design

- **The study period:**
  - December 2021 (end of Covid-19) and February 2022 (onset of Economic Crisis)
- **Study locations** - three randomly selected under-served settlements plus a 500m buffer in the Colombo district:
  - Orugodawatta, Narahenpita, Wilawala



# Methods

- Food outlets (grocers, supermarkets shops and eateries) in and around the three GNs.
  - 383 restaurants & eateries
  - 209 retail outlets
  - A purposively selected 18 households

## Methods

- Key informant interviews; 24-hour dietary recall ; Shopping baskets
- Purchase patterns about food availability, prices, vendor/product properties, marketing & regulation
- Scoring system for food outlets to assess the availability, affordability, and promotion of health/unhealth food

## Analysis

- Descriptive analysis
- Deductive approach

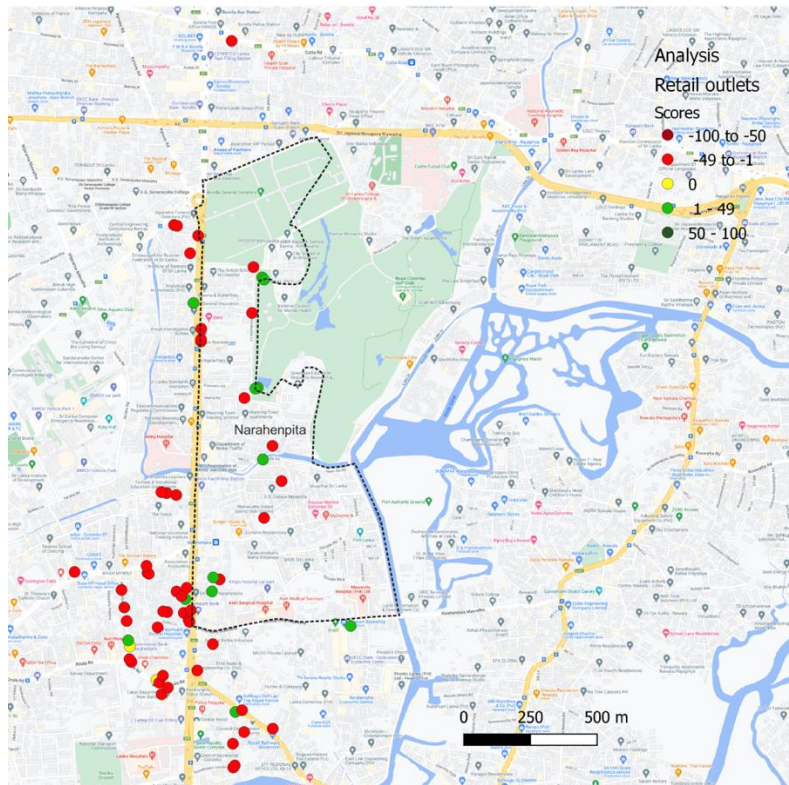


# Results / findings

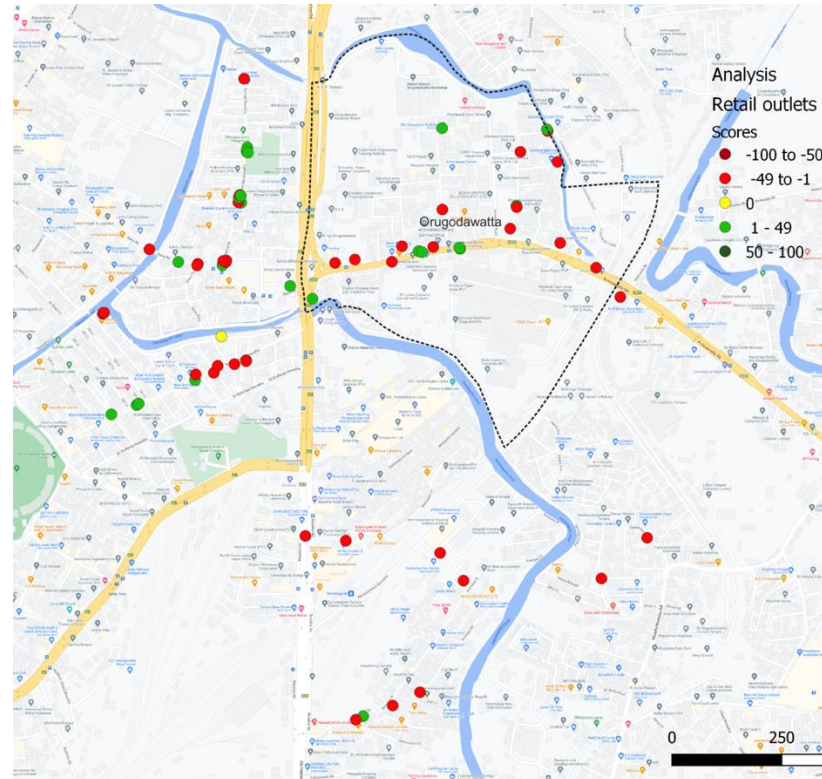
# Characteristics of the Study Sample

- 45% - Daily Wage Earners
- 85% - Experienced income losses during the pandemic
- Over half of the sampled households were poor or near poor
- 53% of the income was spent on food, on average

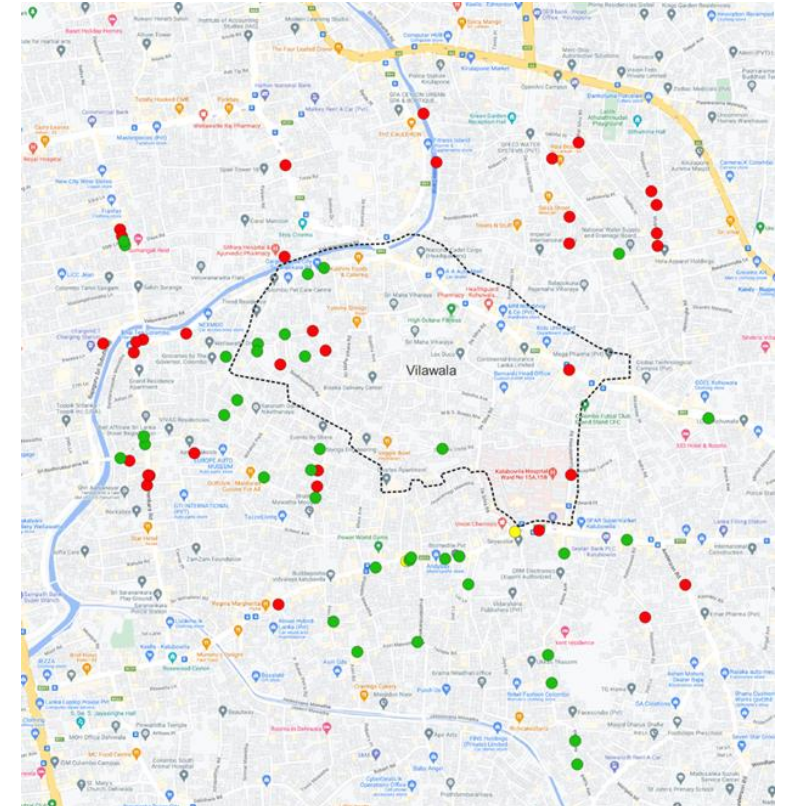
# External Domain Findings



Narahenpita



Orugodawatte



Wilawala

# Personal Domain Findings

## Accessibility

- **Purchasing at big markets is costly due to high transport and daily purchases**
- (Pandemic) accessibility to fruits and veg. increased due to mobile vendors
- Shortages of imported goods due to import restrictions

## Affordability

- Lower due to the high prices
- Affordability of fruits, and vegetables low (perishable)
- Prices of processed food with longer shelf life are less affected
- Purchase of smaller quantities of essentials

## Convenience

- Pre-cooked food consumption declined (high cost, health concerns)
- Cooking for several meals in one go (to save energy)

## Desirability

- Children eat refined carbohydrates as they do not like pulses and grains
- Frying popular due to desirability and low cost

# Conclusions/Implications

# Conclusions

- Food-security and nutrition security of USS affected during crises due to lower quantity and quality of food consumed
- USS hhs purchased food from nearby shops mostly due to daily purchases and transport costs. (which lowered variety and increased prices)
- The food choices of USS were mainly dependent on affordability and not on nutrition value or healthiness.
- Desire for refined carbohydrates lowered consumption of healthy food (children)
- Consumption of unhealthy cooked foods declined due to high cost and safety
- Accessibility to fruits and vegetables increased due to mobile vendors (pandemic)

# Implications

- More widespread distribution of fresh produce so that families can purchase perishable items in locations within their neighborhoods.
- Nurturing healthy dietary habits among children is necessary
- Introduce low-cost, healthy food options
- Reform the current approach to promoting nutrition security (see below) to be inclusive of USS
  - promoting the cultivation of healthy food;
  - promoting home gardening and animal husbandry;
  - reducing food wastage; and
  - promotion of quality food production, including food fortification