WHO/FAO Inter-Regional meeting to promote healthy diets through the informal food sector in Asia

20–22 August 2019, Bangkok, Thailand
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1. Introduction

For the scope of this intercountry consultation and report, the informal food sector\(^1\) comprises of street foods; ready-to-eat foods and beverages prepared and/or sold by vendors or hawkers especially in the streets and other similar places, market vendors, small restaurants and kiosks/stalls. The informal food sector plays a critical role in the food systems, environment, and cultural and social aspects and lifestyles of people in Asia.\(^2\) Informal food retail contributes to food security by improving accessibility to foods especially in urban settings – providing affordable foods at convenient locations and is an important source of employment, specially for low income households.\(^3\)

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**Definition/scope of informal food sector**

- Street-vended foods” or “street foods”: ready-to-eat foods prepared and/or sold by vendors and hawkers especially in the streets and other public places. (Codex- CAC/GL 22-1997).
- Street food stalls: a place where street food is prepared, displayed, served and sold to the public. It includes carts, tables, baskets, vehicles with or without wheels and any other structure……
- Street food center – any public place or establishment designated by the relevant authority for the preparation, display and sale of street foods by multiple vendors (Codex- CAC/GL 22-1997)
- Processing and sale of ready to eat food (prepared food in the street and small outlets)

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A review of literature commissioned by WHO SEARO in 2018 shows that a sizable proportion of the urban Asian population consumes informal sector foods on a daily basis.\(^4\) Street foods are usually country/region specific and rarely are their healthfulness assessed or nutritional content made known and/or analyzed. The available evidence is equivocal; some traditional foods and meals contain multiple food groups and are healthy, but often, foods are often of poor dietary quality; high in energy, saturated fats and trans-fats, sodium and sugar.\(^5\) The cooking methods can also be unhealthy, such as the multiple re-use

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1. The term informal food sector refers to informal retail foods, which included street foods.
of cooking oil. Food safety issues also abound; food adulteration and use of sub-standard and contaminated food products, and unclean cooking practices are of concern. Beyond food safety, street vended/informal foods may play a role in contributing to unhealthy diets and increased risk of noncommunicable diseases (NCDs).

For Asian countries looking to reduce the double burden of malnutrition and diet related risks of NCDs, active involvement and engagement with the informal food sector is essential to ensure safe and healthy food choices are available to the consumer. The informal sector foods/street-vended food businesses should be supported to supply safe, good quality and nutritious foods within a safe food environment. Global and regional policies and attention towards the quality of food produced and sold through the informal food sector have focused primarily on food safety. For example, the Codex Committee for Asia has taken initiative to draft a Regional Code of Practice for street-vended foods which was adopted in 2017. But few policy documents refer to informal foods in the context of healthy diets; the Milan Urban Food Policy Framework for Action, the Action plan to reduce the double burden of malnutrition in South-East Asia Region and the draft Regional Framework for Action on Food Safety in South-East Asia are few examples.

No comprehensive evidence based guidance or recommendations are in existence to promote healthy diets in informal settings, possibly due to the lack of information regarding the contribution of these foods to diets, the variety of settings and such foods being mainly limited to Asian and African regions. The draft voluntary guidelines for healthy diets by the Committee for Food Security is one exception that recommends the importance of healthier street foods. Some information is also provided from the WHO supported FEEDcities Project in Central Asia, which characterizes the street food environment in selected Central Asian cities and provides some guidance for actions.

As Asian lifestyles evolve and become busier, and considering the present socio economic profile of urban populations, the informal food sector is likely to grow. Addressing the ever increasing burden of malnutrition and NCD risk is a good entry point to look beyond food safety and promote healthier diets. For providing healthier food options, opportunities to improve dietary quality of informal sector foods must be explored.

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8 http://www.fao.org/fao-who-codexalimentarius/sh-proxy/en/?lnk=1&url=https%253A%252F%252Fworkspace.fao.org%252Fsites%252Fcode%252Fmeetings%252Fcx-727-20%252Freport%252Ffinal%252Frep17%252Fasiea.p
The informal food sector is not organized and lacks any form of protection, a challenge to efforts at promoting healthier diets.\textsuperscript{11} As the food operators often belong to the less privileged groups of society such as rural migrants and lack access to information including health directives, innovative solutions are needed. Identifying possible intervention points and actions to improve food quality by the informal food sector, through examining the landscape around the food environment, informal food production, food supply chains, informal food sector actors and their capacities and the existing policy and legislative environment is necessary. So is the learning from good practices. Examining food safety programmes and identifying opportunities where promotion of healthier foods maybe included is another possibility.

Strategic thinking is required to improve the nutritional quality of street foods in Asian countries, while protecting the important cultural and community role that informal food vendors play in sustaining traditional foods and diets. Therefore, a preliminary exploratory meeting, involving Member States that have addressed food safety in the informal food sector to some degree and/or implemented actions to improve nutritional quality of informal sector foods was organized in September 2019.

2. Meeting objectives

The overall objective of the meeting was to prioritize actions in Asia to promote healthy diets in the informal food sector.

**Specific objectives**

(1) To understand the few operating models that are currently in place in specific cities to support healthier diets in informal food sector, and to share best practices and challenges.

(2) To prioritize initiatives, including regulatory measures and the support needed to promote better quality of foods through the informal sector.

(3) To explore possible integration of promoting healthy diet in the existing operating models such as Food Safety and Healthy Cities.

(4) To develop initial recommendations for promoting a healthy diet through the informal food sector, for consideration of Member States, or large cities within Member States.
3. Summary of sessions

3.1 Session 1 (opening session)

The meeting, a collaboration between WHO SEARO, WHO WPRO, and FAO Regional Office for Asia and the Pacific (RAP) opened with a message from Dr Poonam Khetrapal Singh, Regional Director, WHO Regional Office for South-East Asia, delivered on her behalf by the Regional Adviser, Nutrition and Health for Development (RA NHD), WHO SEARO. (Annex 1).

3.2 Technical sessions: Key messages and information from plenaries and country presentations

The technical sessions began with an update on the informal food sector, sharing information on the situation across Asia and on connectivity to urban food systems. The plenary presentations covered best practices with regard to promoting healthier diets across informal and restaurant food retailers. Panel discussions debated the feasibility of expanding food safety to encompass healthy diets, importance of political and policy leadership in promoting and supporting the sector, the necessity for both vendor and consumer education and existing legal measures which support healthier foods. Country presentations were interwoven across the entire programme. Participants described how countries had implemented actions on food safety and the possibilities/feasibility of expanding actions to include healthy diet promotion within the informal food sector. The discussions provided ample opportunity for the participants to share experiences, discuss with experts and brainstorm ways of moving forward.

The initial group work session was on understanding the current status of healthy diets in the informal food sector in each country/area/city and identifying information gaps. The final group work identified in-country agencies that would possibly lead interventions to promote healthier street foods, stakeholders, opportunities and constraints to implementing actions to promote healthy diets through the informal food sector, their monitoring, and prioritization of the next steps.
3.3 Technical session details

3.3.1 Session 2. Regional overview

Setting the scene: Informal sector foods including street foods in Asia; entry points to promote for safe and healthy foods and perspectives on promoting healthy diets in the informal food sector through an urban food systems approach

Dr Juliawati Untoro, Dr Angela de Silva and Dr Warren Lee

An overview of the informal food sector across Asia was provided within the defined scope of the subject in relation to this meeting. The overview also included information on possible entry points to promote healthier foods through the informal sector and the need to align with an urban food systems\textsuperscript{12} approach to support healthier food choices for the consumer with foods supplied by the informal food sector.

The “informal food sector” exists in many forms. It includes small producers, enterprises, traders and service providers, involved in regulated and unregulated activities related to food. The informal food retail sector, which is the focus of this meeting consists of actors who move products through the market into the hands of the consumer and usually include the following groups: open or wet retail markets and small, independent (family-run) retail stores; informal food vendors and small restaurants. (Table 1)

The informal food sector provides affordable foods at convenient locations for the urban dweller in Asia, as well as employment opportunities, specially for women. It preserves and promotes local and traditional food culture, contributes food supply chains, food trade and tourism (street foods). Vendors/suppliers are usually poor urban dwellers, often migrants of low socio economic and education status, and mobile, with no fixed residence. In many instances, their clients/consumers are also perceived to be of lower socio economic status, with inadequate food and nutrition knowledge, who also need easy physical access to low cost foods. In some countries such as in Singapore, both street food stall vendors and consumers are of higher socio economic strata.

The rate of urbanization in Asia is the highest in the world at 1.5 percent per year. By 2030, more than 55 percent of the Asian population will be urban, mainly

\textsuperscript{12} Food system consists of all the elements People (food system actors – farmers, consumers, private sector, policy makers, etc.), Environment (socio-political, economic, and technological), Infrastructures, Institutions and activities that related to: Production, Storage & processing, Transportation, Sales/marketing, Distribution, Selection, preparation and food consumption, Social-economic & environmental outcomes
driven by India and China. Of the world’s 31 megacities listed in 2016, 17 are located in the Asia-Pacific region. Historically, urbanization was a sign of social and economic transformation. Cities have been recognized as important drivers of development and urbanization has often been associated with higher living standards, including better health and nutrition. However, if city development is not planned and managed, rapid urbanization can also lead to dysfunctional food systems, resulting in undernutrition and obesity occurring within the same city or even the same household as is occurring in many urban centers of Asia today, where large disparities in food security and nutrition are obvious.

In rapidly urbanizing areas, many challenges affect nutrition security; reduced access to diverse, nutrition and affordable foods is common, due to long supply chains, higher cost of fresh foods as opposed to ultra-processed foods; lack of cooking time, kitchen space and facilities, and ease of access to ready-made foods. A more nuanced understanding of the key drivers and interactions are essential in transforming urban landscapes into resilient systems capable of fostering sustainable food systems. Over 68 % of employed population in the Asia Pacific Region work in the informal economy, consisting of 1.3 billion people. Informal sector workers typically operate at a low level of organization with little or no division between labour and capital and produce on a small scale. They are largely unrecognized, unrecorded/unregistered and unregulated in their activities and this includes the food sector.

Table 1. Types of informal retail food sector

<table>
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<tr>
<th>Street Food</th>
<th>Market Vendor</th>
<th>Small Restaurant/Caterer</th>
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| • A wide range of ready-to-eat foods and beverages sold and sometimes prepared in public places, notably streets.  
• Vendors’ stalls are usually located outdoors or under a roof which is easily accessible from the street/sidewalks.  
• Important to the poor for socio cultural, economic and nutritional reasons | • Most visible actors in the IFS – formal markets (e.g. public markets managed by local authorities) and informal or spontaneous markets. | • Home-based caterers are entrepreneurs who cook food at home and then serve the finished products.  
• Small restaurant/ canteen – often not registered. |

In many countries, street food vending is not legally recognized by authorities. Street food vendors are often victims of abuse. e.g. police harassment and arbitrary confiscation of merchandise, or have to bear with complicated registration & licensing, restrictions on trade location, unaffordable taxes and fees.

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The focus of food related policies and programmes targeting informal food retailers/street food vendors has been clearly and understandably been on food safety. Registration, licensing, training of food vendors, and small vending sites, improving food preparation and sales areas, and designation of vending zones have been common practices to improve food safety. While these elements are important scalable and sustainable examples in promoting healthier diets through the informal food sector are limited.

**Informal food sector and healthy diets; a review of published information from Asia**

*Prof Pulani Lanerolle, Faculty of Medicine, University of Colombo*

Most published literature is from India, with scant information from countries such as Thailand, Vietnam, Philippines and Myanmar, all with flourishing street food cultures. Data on nutritional contribution to diets is limited, the available evidence indicating that street foods are often of low-quality with some exceptions. There is some evidence that the contribution to dietary intake varied from 13–50% in adults and children. Generally, such foods tended to be high in fat and low in complex carbohydrates and in micronutrients while being high in sodium and sugar. Data on poor cooking practices (deep frying, sweetening and salting) provide some indirect evidence regarding the poor quality of such diets. Recipes are not standard and there is much variation in composition within the same type of food. Fruits, vegetables, legumes & pulses, nuts & seeds are also often sold. Though lacking in direct evidence, it is likely that unhealthy street food diets possibly contribute to the increased prevalence of overweight and obesity; diet-related non-communicable diseases (diabetes, high blood pressure, stroke, cardio-vascular diseases, colorectal cancers, etc) when eaten regularly. The risks of food borne illnesses and infections is also higher.

Foods are prepared on site, or at home and transported to the vending site, or may be produced in a small factory as unbranded, unlabeled packaged foods. Street foods included whole meals and snacks and were either traditional foods, global foods or a mixed cuisine. Whole meals tended to include more food groups than snack foods. Many working adults depend on street foods, but some studies also indicate that school children make up a large clientele. Majority of consumers tended to priorities the low cost, convenience and taste over food safety and nutrition.

Vendors are often from the poorer segments of the unskilled population with little understanding of nutrition quality or healthy cooking practices. They produce to a limited budget, hence quality is compromised. The unregulated nature of the industry enables traders from low income environments to thrive and to provide food at competitive costs compared to the formal food sector.

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3.3.2 Session 3: Country experiences and lessons learned

The country delegations provided information on food safety initiatives, policy measures (if any) that have been initiated and future plans on promoting healthy diets through the informal food sector.

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<th>Country/city</th>
<th>Information</th>
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| Bangladesh   | - Retail sale of fresh or prepared products, e.g. stationary or itinerant sale of street food is common.  
- Focus is on food safety of the formal sector. Intervention points include communication and public awareness; policy enforcement through legislative instruments; surveillance; self-regulation. No continuing programmes on the informal sector.  
- Dhaka City Municipal Corporation set up a demonstration project to improve food safety of street foods, funded by an INGO. They set up training for food inspectors, provided carts and water sources for vendors and trained vendors in food safety. But the project has not been scaled up. Challenges included sustainability, traditional practices and food habits, multiple agencies and laws and lack of regular funding. |
| Cambodia     | - Food safety policy and legislation is under the purview of six ministries including health, agriculture and fisheries, and commerce. There is little focus on street foods.  
- City/Municipal food safety authorities provide promotion and training on food safety issues to the venders and food handlers – on proper hands washing techniques, personal hygiene and provided guidance leaflets.  
- Ministry of Health has drafted a street food legislation, trained food safety officials from the Municipal Corporations and developed a checklist for monitoring street vended foods – on food hygiene and safety surveillance. At present, there are no plans to expand to healthier diets.  
- A project on food sample testing (microbial safety) from street foods was done in some areas of the country.  
- Challenges: limited numbers of officials, lack of budget and large numbers of vendors hinders implementation/enforcement. |
| India        | - India’s Food Safety and Standards Authority (FSSAI) has initiated the Eat Right India movement which promotes specific actions to improve street foods, which include  
  - Prevention and surveillance of food adulteration  
  - Repurposing the use of cooking oil (RU CO)  
  - Clean street food hubs  
- The clean street food hub: the objective is to raise the quality of street food vending to the level of food courts, hotels and restaurants while preserving culinary heritage.  
  - A geographical area with an aggregation of clusters of vendors is identified and recommended by the local food authority to FSSAI for declaration as a food hub. Comprehensive auditing and training is provided and certification is awarded. Routine inspections, quality sampling are used for monitoring. However, the focus so far is on food safety rather than healthy diets. At present there are 11 such food hubs across the country. |
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<th>Country/city</th>
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| **Indonesia** | • Many “ready to eat” food businesses, restaurants, catering, and street food vendors.  
  • Food and nutrition safety is prioritized with regulations and policies: *e.g.* *Ministry of Health Regulation no. 1098/2003 on Hygiene and Sanitation of Street Foods*. For street vended foods – focus is on food safety (microbial contamination, unsanitary conditions, use of unsafe chemicals and food additives).  
  • Food safety actions being implemented on a regular basis include: capacity building, providing IEC materials, food sampling and microbiological testing, spot assessment of hygiene and sanitation. These are coordinated across Ministry of Health, Municipal Corporations and others government departments. *e.g.* *Intersectoral Collaboration for Healthier Street Foods Campaign in Jakarta Province*; the implementation of a central regulation is operationalized into a governor’s regulation, then into a Mayor’s regulation.  
  • School Food Safety education campaigns  
  • Future options to promote healthy diets in informal food sector: Strengthening implementation/enforcement of regulation & policy; while Indonesia’s diets contain a variety of healthy foods from diverse cultural groups, much of Indonesian street food is high in sugar, sodium, and fat and low in fruits & vegetables  
  – Change in lifestyle economy prosperity; food tourism, online food store opportunities for street food vendors; Corporate Social Responsibility opportunities for expanding business;  
  – Centralization street food vendors; currently no zoning, Street food can be sold anywhere. Possibility of enforcing zoning to be considered  
  – Education of community and stakeholders is a feasible option. |
| **Malaysia** | • Food safety regulations are in place to protect the public against health hazards and fraud in the preparation, sale and use of food. By law, all food business/operators must be licensed, manage waste and comply with elements of food hygiene.  
  • Food Premise Register is maintained by MOH and all vendors must be licensed with the Local Authority and are subject to checks by MOH/Local Authority  
  • There are checklists for monitoring:  
  – Joint Operation and Enforcement Premise Inspection, Joint Operation for bazar Ramadan  
  – Promotions: Accreditation BeSS/Premise Grading --BeSS recognition is a basic step towards Healthy Cafeteria as the requirements for recognition is not high – it only involves Healthy Eating Promotion such as poster displays, calories display and provision of safe drinking water.  
  – Joint food safety carnivals  
  – Healthy Cafeteria is one of the strategies to create an environment that promotes and supports healthy eating. Implementing healthy cafeterias is mandatory for government sectors (administrative) – in stages. For non government entities, it is optional. Pre requisites have been set and must be followed.  
  • A clear evaluation process has been designed for the healthy cafeteria programme. |
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| **Mongolia** | • Winter temperature average -35°C, while the summer averages +30°C, therefore retail trade is only practiced from July–September.  
  • At present, the focus is on food safety and regulations cover selling foods only in designated areas  
    - Strategy: Formation of Multi-sectional party between government offices and private sector  
    - Quality assurance for certified foodservices ‘Clean Food Good Taste’ sign  
    - Sustainable management  
  • Criteria include food sanitation standards – place, utensils, personnel, bacteriological conditions  
  • Foodservices association incorporates with local government offices inspect their premises according to the CFGT standards; Consumer feedback to the officers when finding the sanitation problem in the foodservices. |
| **Philippines** | • Food safety focus for informal sector foods at present. No organized activities on promoting healthier diets through informal food sector  
  • Food safety Act [Law Republic Act No. 10611]  
  • Primarily adheres to the Philippine Constitution’s declaration to protect and promote the right of the people and keep its populace from the threat of trade malpractices and substandard and hazardous products |
| **Sri Lanka** | • Food is regulated by the Food Act No. 26 of 1980 and the amended Act of 1990, Municipal Councils Ordinance and its by laws by which all street food is “Illegal.” However, the street food sector has expanded significantly.  
  • Approximately 500-600 street food vendors in the informal food retail sector in Colombo City. Use of food carts, temporary stalls, mobile food vans is common. Tuk Tuk Mobile food vendors sell mainly bakery products and pastries, while street vendors/market stalls sell a variety of foods included packets of rice and curry, light snacks, sliced fruits.  
  • The focus so far has been on food safety. There are few initiatives for promoting healthy diets  
    - Health education of food vendors regarding poor practices that can increase NCDs in consumers; implementation of Healthy Canteen Policy; using social media (FB) in promoting healthy foods among the public.  
    - Food handler training programs for street food vendors and home based food producers  
  • Challenges: Street food is illegal but exists. There is a huge demand for these foods  
    - Very high turnover of food handlers in the informal food sector.  
    - Seasonal variations in number of street vendors: high numbers during festive seasons.  
    - Consumers are sensitive to prices – which in turn forces vendors to prepare food items using substandard raw material and re-use oil for frying.  
    - Inadequate knowledge and training among food handlers regarding food safety, hygiene procedures and healthy food.  
    - A recent trend is emergence of home based food industry who sell products using mobile apps/food delivery services which are difficult to regulate. |
### 3.3.3 Best practice examples

**Singapore: healthy diets in informal food sector: good practices and lessons learned**

**Ms Anne Low, Singapore Health Promotion Board**

Singapore’s food service landscape is varied and includes food court stalls, hawker center stalls, caterers and bakers (online) dessert kiosks. The country follows an eco-systemic approach to influence supply and demand of healthier options. (Figure 1). It addresses all aspects of the model from food supply chains and supporting industry capabilities in new product development to on ground awareness and consumer education to promote healthier diets. A multi-stakeholder partnership model to make healthier options available and accessible is supported by the Singapore Health Promotion Board.

The country has identified two key objectives to promoting healthy diets:

- Reduce calorie intake: Identify food that is lower in calories (<500 kcal) compared to other food
- Improve diet quality: Select food cooked with healthier ingredients (oil with lower content of saturated fat or noodles/rice higher in wholegrains, drinks with no/lower in sugar).

In promoting actions for healthier street foods, the country follows key strategies and a comprehensive mix of intervention tools (Figure 1)

1. **Demand generation for healthier foods among consumers:**
   - Create awareness – with easy to identify Healthier Choice tag at front of stall/place and on-site
   - Generate interest – trial and purchase through continuous promotion
   - Debunk Myths – Tasty food can be healthy too
(2) Generate buzz to encourage trial and build confidence amongst F&B operators; competitions, publicity etc..

(3) Regular Monitoring: 40% of 13,000 stalls across hawker centres and coffee shops with at least one healthier option.

**Target:** As of March 2019, 7,400 (~50%) food and drink stalls in hawker centers and coffee shop offer at least one healthier option in their menus.

Figure 1. Eco Systemic approach to influence supply and demand of healthier foods.

Figure 2 Building a Healthier Food eco-system with a Comprehensive Mix of Intervention Tools
Lessons learnt and challenges

- Start small with iconic partners, and target specific food at popular locations
- Walk the ground, follow an iterative process of fine tuning and find the best mix of tools
- Keep implementation simple and efficient for scalability and sustainability
- Leverage on key stakeholders strengths and build industry capabilities
- Lack of timely data to evaluate program efficacy
- Change and sustain consumer behavior
- Price parity of healthier ingredients e.g. wholegrain noodles are more expensive
- Physical constraints – lack of space in stalls for diet displays etc

Hongkong: Healthy diets in food sector in Hong Kong: EatSmart Restaurant Star +

Ms Mandy Kwan, Department of Health, Hong Kong

The EatSmart restaurant star is not strictly part of the informal food sector landscape, but the experience has several learning facts that can be adapted to informal sector foods. The objective of EatSmart restaurant star campaign was to educate, empower and enable the community to have easier access to healthier dishes when eating out and encourage, empower and enable food premises operators to provide a wider choice of healthier dishes.

Figure 3. EatSmart dishes and criteria
To enroll as an EatSmart Restaurant, an outlet has to provide at least five EatSmart dishes highlighted by the relevant logos and place the decal near the entrance/prominent location of the eatery (Figure 3).

In order to be accredited as EatSmart, numerous requirements need to be met on ingredients, preparation, cooking methods and mode of serving. Ongoing support is offered to restaurants to sustain the efforts and a guidebook, a briefing session and recipe vetting are offered. Monitoring occurs via unscheduled visits and a renewal of status is done through an annual process/visit.

An evaluation of the campaign provided information to revisit and revise the programme. Information from the evaluation are provided below:

- The programme brings business to the restaurants; more patrons chose EatSmart restaurants.
- There was positive feedback from staff on healthier cooking and eating, and frontline staff were more likely to promote healthier dishes to clients.
- Health is not a priority criteria for consumers when choosing restaurants which is a challenge; priorities in descending order are price (70%), taste (60%), location (60%), hygiene (41%); cuisine (35%) and then healthfulness (14%–9%) as shown by a small study carried out by Hong Kong.

The EastSmart Restaurant Star + introduced a three-star rating scheme and was launched based on the results of evaluation.

- One star – One-star EatSmart Restaurant” by offering at least five dishes with More Fruit and Vegetables
- Two star – Encourages EatSmart Restaurants to provide special offer on the EatSmart dishes to promote their order.e.g. Vegetable dish as an add-on Item

**Important lessons learnt**

- Government leadership is important.
- Work with trade sector to understand concerns, assist to formulate practical strategies that create a significant impact, are practical and attract customers, and motivate others participation. To succeed, the scheme need to be in the interest of the restaurants and promote business.
- Tried and tested tailormade materials for training and information – Organize cooking demonstrations and recipe competition to motivate new tasty healthy EatSmart dishes
- Interests of patrons on price, taste and location have to be met.
3.3.4 Session 4: Linkage and/or integration with other sector or programmes or initiatives

Expanding Food Control Systems and to Promote healthier diets

**Dr Citra Prasetyawati, Food Safety Expert, Indonesia**

At present the SEAR and WPRO region countries face multiple food safety challenges with a high incidence of food borne illnesses [SEAR: 150 million illnesses with 175,000 deaths, WPR: 125 million illnesses, 50,000 deaths]. Pathogenic bacteria (Salmonella, Vibrio, Bacillus cereus), antibiotics residue (Chloramphenicol), natural bio toxins (aflatoxin, histamine), heavy metals (mercury, cadmium), physical contaminants, food labelling and poor temperature control are problems. Food safety is an important part of healthy diets since unsafe foods prevents suitable intake of nutrients and affects nutrition status.

Common food safety challenges in the informal food sector include the use of unsafe raw materials; water sources, lack/absence of cold chain facilities (electricity, cold chain appliances) and hygiene facilities (running water, trash bins, food safety equipment for handlers) and poor awareness of food safety by food handlers.

Countries could explore if food safety frameworks could be broadened to integrate aspects of supporting healthier diets as discussed in the draft WHO SEARO, 2019 Food Safety Framework, without compromising ongoing and future food safety activities.

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Figure 4. Integrating safe and healthy diets
### Healthy diets and its alignment within selected elements of a food control system

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<tr>
<th>Elements of a food control system</th>
<th>Healthy diet initiatives</th>
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| **Policy and Legal Framework**   | Develop coordinated policy to include regulation for healthy diets as a part of control system. Some practical examples of policies that regulated at the source. Examples/opportunities:  
  - Regulations on food fortification  
  - Labelling requirement to include nutrition information  
  - Policies on salt and sugar reduction  
  - Regulations to restrict content of trans fatty acid in edible oils and fats |
| **Risk-based Inspection**        | Inspections/monitoring to enforce the implementation of policies and regulations are an opportunity to monitor specific aspects of healthier diets.  
  - Modern risk-based food inspection assesses the effectiveness of any measures taken to prevent foodborne diseases and facilitates improvement of measures to manage foodborne risks. Examples/opportunities:  
  - Hazard specific control programmes such as to monitor aflatoxin levels which is associated with stunting  
  - Cold chain to facilitate supply and storage of fresh and perishable foods  
  - Facilitating investment on hygiene facilities and potable water  
  - Certification/licensing/recognition of food facilities based on current level of hygiene and nutrition i.e. food star award system |
| **Laboratory System**            | Analysis of foods – e.g. trans fat content |
| **Education, Information, and Communication** | Consumers play a significant role in initiating behavioral changes both for food safety and nutrition. Sufficient information and awareness of consumers is essential to increase demand. Examples/opportunities:  
  - Information for consumers: star rating or other flagging of healthier diets  
  - Food safety campaigns to include promotion/information on healthy diets (i.e. 3 five keys)  
  - Consumer education to promote healthy diets i.e. salt and sugar reduction  
  - Training for food handlers on two inter-related topic: food safety and healthier diets |
| **Data and Information**         | Combining food safety inspections with monitoring of healthier foods. |

**Challenges of Expanding Food Control System to promote healthier diets in informal sector:**

- Cross-sectoral, well planned coordination based on the country’s institutional and specific situation, is needed. To establish coordinated policy and joint programmes is challenging; which agency should lead? Local authorities/municipal corporations are best positioned but maybe reluctant due to mandates, staff and capacity gaps; funding issues.
- Involvement of food business operators and their associations is essential and for vendors who are not part of associations, outreach is difficult.
- Lack of adequate staff and capacity of food safety departments/units
- Concerns regarding compromising implementation of food safety measures.

**Best Practice**

**Screening for food safety and scale up to include healthier diets; the Kolkata experience**

**Prof Indira Chakravarty, Chief Adviser, Public Health Engineering Department, Govt. Of West Bengal.**

In Kolkata, a situational analysis provided information that identified street vendors as most vulnerable, primarily women, refugees and displaced populations. It is a key employment opportunity since little start-up capital is required. Problems with street foods/informal sector food retailers included the questionable quality and safety of food and beverages, unsanitary food handling, use of inadequate quantity and the unsafe quality of water, poor personal hygiene of vendors, improper washing of utensils, poor sanitation around the vending site, open garbage accumulation, no segregation of organic/inorganic garbage, difficulties for vendors/ producers to access facilities – water, latrines, garbage bins etc and, contamination from the open environment. Other problems included illegal actions by vendors; repeated over use of cooking fuels and poor processing technologies that may affect nutrient quality, unhealthy dietary composition, scant knowledge on healthy diets, poor health of vendors, lack of coordination among stakeholders, no mechanisms to support vendors or customers.

Inclusive engagement with street food vendors, consumers and relevant stakeholders were essential for planning interventions. The main issues identified were the need to improving safety and hygiene standards and improving the nutritive value and encouraging healthy dietary composition. Improving awareness of vendors in all respects, and similarly customer awareness was also found to be essential. A supportive environment in terms of potable water, overall cleanliness of the areas including proper garbage disposal opportunities were identified as urgent needs.

**Other challenges**

- extremely limited regulatory manpower for monitoring, training, and awareness generation.
- the existing monitoring process was cumbersome, time consuming, needing laboratory support and costly.
- the existing food safety assessment method did not identify the cause of the problem
- and therefore could not support future prevention.

As an initial step, a screening tool was developed to screen food vendors and grade them according to food safety practices and personal hygiene [best, good, fair and poor practices]. The tool was visual, – simple, easy to implement,
cost effective, fast and used a scientifically acceptable method. Grading vendors using a scoring method and one that would allow identification of the cause for unhealthy/unsafe food was practical and useful since prevention measures could be initiated. This includes adaptation of standard guidance to the context.

The testing is at two levels. Level 1 – Simple Audio Visual screening/testing (No Lab support needed) – ISO 16066:2017. Quick and easy audio-visual assessment at primary level, segregating vendors into various categories identify the cause of the problems, so that poorly functioning vendors could be identified for Level 2 testing including traditional Laboratory linked methods. Once vendors are screened, they are sent for training depending on their grading.

The contents of the screening include the following

<table>
<thead>
<tr>
<th>1. Raw Material</th>
<th>1.1. Fresh, 1.2. Good Quality (Visually), 1.3. Healthier and seasonal raw ingredients used preferentially</th>
</tr>
</thead>
<tbody>
<tr>
<td>2. Storage of Raw material</td>
<td>2.1. Washed and Cleaned, 2.2. Separated from cooked food</td>
</tr>
<tr>
<td>3. Processing and Cooking</td>
<td>3.1. Use of clean equipment’s, amenities’ etc., 3.2. Clean hands and overall personal cleanliness of handler, 3.3. Use of potable water, 3.4. Through cooking done</td>
</tr>
<tr>
<td>4. Transportation to street food stall/kiosk</td>
<td>4.1. Properly packed/covered, 4.2. Reach area within a short time (Maximum 4 hours), 4.3. Unpacked using clean hands</td>
</tr>
<tr>
<td>5. Display/sale of food</td>
<td>5.1. Food is kept covered, 5.2. Sold using clean food grade holding utensils and serving utensils with no damage, 5.3. Disposable utensils not reused ........................................6. Use of left overs/garbage management, 6.2. Segregated into Inorganic and Organic wastes</td>
</tr>
<tr>
<td>7. Personal Hygiene and Health of Food Handlers</td>
<td>7.1. Wash hands with soap and water before touching food, 7.2. Wear clean clothes/apron, ..................................................7.7. Loose hair tied and covered</td>
</tr>
<tr>
<td>8. Overall cleanliness</td>
<td>8.1. Working surface clean and hygienic, 8.2. Kiosk cleaned with safe cleaning agent, 8.3. Placement not near any latrine /garbage dump/dirty area, 8.4. Surrounding area clean/not congested, 8.5. Properly illuminated</td>
</tr>
<tr>
<td>10. Nutrition</td>
<td>10.1. Use of healthy Seasonal vegetables and fruits 10.2. Healthy cooking methods eg. Steaming, boiling, sauté etc. 10.3. Avoid of repeated heating/use of oil</td>
</tr>
</tbody>
</table>

This tool could be expanded to include specific questions on healthy diet. e.g. multiple re-use of cooking oil.
Urban policies, built environment and practices and promoting healthier diets

Asst. Prof. Piyapong Boossabong, School of Public Policy, Chiang Mai University, Thailand.

Poor food systems contribute towards unhealthy diets. Inadequate food production – food distribution/poor availability of fresh foods – affects food wholesale and retail trades including the informal food sector. Urban policies towards healthier diets should promote transformation of food systems through actions which would impact both formal and informal retail of foods, including street foods.

To promote healthier diets in cities, a focus on upgrading urban and peri urban agriculture is essential.

Promoting informal food services/vendors to use fresh and safe raw materials from trusted urban and peri-urban farmers is difficult. Persuasion through incentivization with subsidized schemes; lower price than the market price is a possibility, though it is a difficult proposition without robust urban agriculture methods and food supply. However, other aspects of the built environment could support healthier, safer diets:

- Regulating the nutritional quality of food and hygiene of foods sold in the cities through zoning.
- Providing safe, piped drinking water, sanitary facilities & basic waste disposal facilities.
- Promoting waste management innovation – e.g recyclable trash and collections (food waste into compost).

Examples of the practices toward healthier diets

- Facilitating the formation of an inclusive association of street food consumers to promote healthier and safer street foods (e.g. promoting Good Agricultural Practices (GAP), Community Supported Agriculture (CSA) and Participatory Guarantee System (PGS) to ensure fresh and safe raw materials).
- Behavior change should occur in parallel to structural changes; concepts such as ‘nudging’15 maybe useful in promoting behavior change. Stimulating behavioral changes (“nudging”) of street food vendors by regular ‘soft’ reminders, providing

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information about customer perception and preferences of nutritional quality and good hygiene are possible options;

* Support for transforming healthy diets into the authentic flavor of regular street food customers – use of chefs for recipe development, demonstrations etc.

* Use of soft policies may be more sustainable than regulations: e.g. providing a new image for street foods in the 21st century; rebranding vendors and street foods. Moving from “stick” to “carrot” approach: Annual awards for best street vendor of the zone (healthier, cleaner foods); rebranding street food vendors from “street cook” to “chef” to stimulate quality enhancement and good hygiene.

* Initiating a mutual monitoring system (e.g. monitor by other anonymous street vendors that can provide friendly feedback direct to each other).

* Enhancing relations and mutual responsibilities between street food vendors and consumers by creating platforms for communication.

* Farming in public institutions including hospitals and schools.

3.3.5 Session 5: Leadership, convergence with other initiatives and sectors.

**Leadership of Mayors and local government**

*Shri. Atin Ghosh, Deputy Mayor, Kolkata Municipal Corporation (KMC), Govt. of West Bengal*

Champions are needed to drive system change. Political leadership is vital for promoting policies, sustaining programmes and allocation of resources. Street foods are mainly an urban phenomenon, and considering the many large cities in Asia, much of the responsibility for healthier informal sector foods lie with local governments/municipal corporations. As with other actions, leadership of policymakers is essential to promote successful implementation of actions to improve food safety and healthier diets through informal food sector. Leadership of officials, technical experts to support processes, and provide appropriate methodology including monitoring is vital. Safety and healthfulness of street food can be best ensured if all stake holders such as the municipality, police, consumers and vendors work together. Facilitation rather than punishment should be the norm with empathy/understanding of the vendor’s points of view and facilitation of solutions. Kolkata, India is an example where the City Corporation takes responsibility for promoting and implementing substantial hygiene control regulations for street foods and other informal sector foods. Kolkata is a city with a large population and has huge numbers and variety of street food vendors/stalls; approximately 16 thousand street food vendors, some of whom are ambulatory and others with fixed kiosks. The Kolkata Municipal Corporation (KMC), the erstwhile Calcutta Municipal Corporation (CMC) was the first city to initiate studies on street foods for better management and hygiene regulation.
Legal frameworks (national and sub national), ordinances and regulations: enablers and impediments to promote healthier diets

Dr Manisha Shridhar, Regional Adviser Intellectual Property and Trade, WHO SEARO

Civil law and common law have varying implications on the enforcement of regulations and bylaws, including land use and zoning, access rights to public space, basic infrastructure provision or public health standards. Local governments play a key role in managing the informal sector; some administrations have bylaws or regulations that specifically target the informal food sector. However, they are often constrained by weak capacity, fragmented responsibilities and limited finances. In addition to ‘formal regulations’ there are regulations/norms that govern the informal food sector. These are mostly related to the use of public space/land rights, zoning and hawking. Where national food related policies

Case study: Kolkatta, India

Manpower of food safety inspectors is essential as well as infrastructure. Both have been expanded using municipal funding, ensuring sustainability. Interest and awareness generation is created through site visits, publicity through media. Municipal officials including the Mayor personally takes to the streets on a regular basis to check on the status of street food, discuss with vendors, customers, local Police and others to find out their difficulties, starting from taste and quality; usage of ingredients, availability of water; garbage disposal; lighting; accessibility; cleanliness of area and any other related problems.

For monitoring purposes, Kolkata’s officials have worked with the Bureau of India Standards (BIS), the standard creating agency of Government of India to create a revised ISO Standard (IS 16066:2017) which provides a quick, simple and non-laboratory linked audio – visual screening for first level selection of safe foods (vendors). The screening method also helps in identification of the cause of the problem as more than 40 individual indicators are used. The screening is currently focused on food safety. The feasibility of expanding to cover some aspects of healthy informal sector foods is being explored.
targeting the informal food sector exist, they typically focus on food safety issues which are usually specific; water, sanitation, and hygiene standards. However, for healthy diet actions within the informal sector, there are no specific regulations.

**Examples**

**India:** The national law that protects workers of the informal sector is India’s Street Vendors (Protection of Livelihood and Regulation of Street Vending) Act (2014). As per the Act, anyone with ‘no other means of livelihood’ is eligible for street vending. The Act supersedes the National Policy on Urban Street Vendor (NPUSV) 2009, which was not legally binding. The act reversed many restrictive bylaws and regulations, which made vending illegal and formalization impossible.

**Malaysia:** Street vending/ hawking is only permitted with a license, which is granted through the local councils. One important national policy is the “Food Hygiene Regulation” from 2009, which includes provisions to ensure a high level of sanitary and hygiene in the food industry, particularly among food handlers (including street vendors). This regulation also mandates a Food Handler Training Programme (FHTP), known as Sekolah Latihan Pengendali Makanan (SLPM), which was developed by the Ministry of Health.

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**Leveraging synergies between informal and formal food sectors for healthier diets**

**Assoc. Prof. Visith Chavasit, Institute of Nutrition, Mahidol University, Thailand**

Population based actions to improve the food environment such as reformulation and fiscal policies may impact on informal sector foods as well. Reformulation of products is an ‘upstream’ game changer: harnessing reformulation efforts of industry to make changes in base ingredients used in informal food sector. Upstream changes such as reformulation of food ingredients/products is one important way of improving healthfulness of street foods. For example, reducing salt in soy and other sauces, or by substitution with potassium salt, ban of manufacture of oils with trans fat > 2 %, fortification of wheat four are actions with substantial downstream effects. By naturally merging the healthier food products/ingredients into these food services, a healthier diet can be obtained. Such impact is also dependent on awareness of consumers and demand for products.
Panel discussion 1: Potential for making street foods healthier: practical challenges and solutions

The discussions in panel 1 created an in depth understanding of the informal food retail sector with a view of the perspectives of both vendors and consumers, supply of raw produce/materials in an urban setting and on how food safety measures could be practically extended to promote healthier diets.

Consumer perspectives: expectations and demands: Prof Pulani Lanerolle, Faculty of Medicine, University of Colombo, Sri Lanka

Perception of the value of a diet is dependent on socio economic and educational status; for the poor, value depends on price and quantity whereas for the higher income groups, value would be on nutrition, taste or culture. Low-income consumers, who make up the bulk of consumers of street foods are significantly more conscious of value and price than higher-income consumers. There seems to be a common perception that healthier food options are more expensive, but this is not always the case. Evidence shows that consumers are driven mostly by price, convenience and taste rather than healthfulness and nutrition. Changing consumer awareness of the importance of healthy diets is a key area

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Table 4. Upstream interventions leading to healthier diets in informal food sector

<table>
<thead>
<tr>
<th>Product reformulation and fiscal policies</th>
<th>Impact on informal food sector</th>
</tr>
</thead>
<tbody>
<tr>
<td>More availability and reduced cost of reformulated bread, noodles with whole grain</td>
<td>Increased usage, create demand for healthier products.</td>
</tr>
<tr>
<td>Fortification of wheat flour with multiple micronutrients</td>
<td>Base flours used in making food products will be higher in micronutrients</td>
</tr>
<tr>
<td>Reformulated soy sauce and other such base ingredients with less sodium and use of potassium chloride</td>
<td>Base ingredient for cooking will contain less salt.</td>
</tr>
<tr>
<td>Fiscal policies on sugar content of beverages including concentrates</td>
<td>Less sugar in beverages sold in informal sector</td>
</tr>
<tr>
<td>Regulating import and production of edible oils with &gt; 2 % trans fat</td>
<td>Less exposure to trans fat for consumers of street foods</td>
</tr>
<tr>
<td>India’s plan for repurposing used cooking oils (RUCO): consumption of Used Cooking Oil (UCO) poses adverse health effects. FSSAI has fixed a limit for Total Polar Compounds at 25 percent beyond which the vegetable oil shall not be used. Used cooking oil is either not discarded and sold to street vendors. Repurpose Used Cooking Oil (RUCO) is an ecosystem that will enable the collection and conversion of UCO to biodiesel.</td>
<td>Less exposure to trans fat and other adverse by products to consumers.</td>
</tr>
</tbody>
</table>
of intervention irrespective of the source of the foods since increased demand for healthier options is likely to drive change. Provision of professional support to demonstrate how healthy, yet low cost food or meal options can be made and sold was identified as a need.

**Perspectives of food vendors: Ms Mandy Kwan, Department of Health, Hong Kong**

The primary objective of any food retailer/vendor is to obtain a profit. Vendors often perceive that improving nutritional quality means higher expenditure for raw materials (meat, fresh vegetables, healthier oils) that would lead to higher cost of foods, causing a drop in sales. Therefore, any changes/regulations must be done with the concurrence and support of vendors. Availability of civil society groups such as vendors association is a means of outreach and would enable better representation of informal food vendors. An inclusive process from early on where public, private and civil societies and informal actors are involved in the multistakeholder dialogue stands a better chance of success. Vendors are also unlikely to be motivated by practices that are environmentally friendly unless incentivized. e.g. discontinuing the use of solid fuels for cooking and, less use of plastic bags etc. Incentivization of vendors – through pricing, subsidies, publicity and recognition are practical measures that will improve vendor buy – in to promoting healthy diets

**Food supply chains and pricing: Dr Warren T.K Lee, Senior Nutrition and Food Systems Specialist, FAO**

Biophysical and environmental drivers, innovation, technology, political and economic drivers influence food systems. Improving nutrition requires addressing all stages of agri-food systems horizontally and vertically, to make the food system nutrition-sensitive. Food supply chains include production systems, storage and distribution, processing and packaging, retail and markets. Food environments reflect the food supply chains and eventually affects consumer behaviour and, quantity, quality and safety of foods. Creating connectivity between farmers in peri urban areas and street food vending in cities through shorter food supply chain that become cost effective could be a game changer to promote healthy diets.

**Expanding food safety initiatives to encompass food quality: Prof. Indira Chakravarty, Chief Adviser, Public Health Engineering Department, Govt. Of West Bengal.**

Street foods are an ever increasing phenomenon not only in urban cities and towns, but are also expanding to semi-urban and rural areas. There has been little focus to date on improving food quality – vendors lack information and incentives and are therefore less inclined to follow health directives. Some of the game changers in terms of expanding food safety initiatives to promote healthier diets include political leadership, empathy and understanding the point of view of vendors, offering practical solutions to their issues and comprehensive ongoing monitoring. In depth understanding/situational assessment of the problem and moving beyond symptomatic control to address its root causes is important and will be contextual to each city/area. Improving safety and hygiene standards
and vendor and customer awareness are important. A failure of authorities to recognize the informal food sector as part of the urban food economy makes the sector invisible in official statistics for planning and investment.

**From a wider perspective of the region, can food safety initiatives be extended to cover healthier diets? Carla Meijia, Food Technologist, World Food Programme, Regional Bureau for Asia and the Pacific**

To date, policy in low- and middle-income countries on street food and other informal food retailers has been focused on food safety rather than diet quality. Investments to ensure the competitiveness of this sector to help make nutritious foods accessible and affordable to local populations could perhaps strengthen nutrition security. However, in most countries in Asia, food safety systems are not robust, are underfunded and have inadequate capacity to implement and monitor legislations and regulations. These deficiencies need to be considered before expanding food safety to include healthy diet promotion. If such aspects are not taken into consideration, food safety programmes maybe negatively affected.

**Panel discussion 2. Key actions and way forward**

The second panel discussion summarized the key elements of the information presented in plenaries, country presentations and discussions. The information was used as a starting point for country discussions on next steps.

**Guidance frameworks/tools needed. Ms Ann Low, Singapore Health Promotion Board**

Guidance tools/frameworks need to be based on a clear understanding of the context of the informal food sector; common cooking practices, types of food sold, extent of sales and, expectations of both vendors and consumers. They should be practical, easily understandable and focus on the change in a few items/points. Step by step actions would be most feasible. National food-based dietary guidelines (FBDGs) provide context-specific advice and principles on healthy diets and lifestyles, which are rooted on sound evidence, and respond to a country’s public health and nutrition priorities. These could be the basis for driving change.

**Communication with the public-consumer awareness and education: Jessica Blankenship, Nutrition Specialist, UNICEF, East Asia and Pacific Region**

Communication is an important and underutilized tool for awareness and creating demand. Consumers’ food choices and dietary behaviour can be markedly affected by communication and information. There is a need to initially understand which sources consumers go to for obtaining health/nutrition information. Considering that changing nutrition practices is extremely difficult takes and time, it is best to deliver tried and tested messages to promote healthier diets among informal foods. The role of selected determinants such as uncertainty, knowledge, involvement, health-related motives and trust, as well as message content variables, are as important as the message itself. Messages must be
simple and directed to specific audiences. They must address 1-2 identified key practices. Anything beyond will be unsuccessful.

**Regulatory issues and monitoring: Ms Citra Prasetyawati, Food Safety Expert, Indonesia**

Food safety cannot be only about preventing people from getting food poisoning or falling sick due to food-borne illnesses, but must tackle the full spectrum of diet-related health risks. Food safety initiatives appear to be the most logical programme to add on promotion of healthy diets for the informal food sector. However, in most countries investment in food safety of informal sector foods and/or their monitoring is almost non-existent. The focus is on formal sector, considering the volume, exports, etc. Therefore, when planning interventions for monitoring the informal food sector, the capacity of food safety systems to take on the added burden of promoting healthier diets needs to be considered.

**Labelling, recipe standardization: Dr Visith Chavasit, Mahidol University, Thailand**

Typical menu labelling or food labelling is unlikely to be successful or useful. Standard, conventional labelling of informal sector foods will not be feasible due to the varying nature of foods, changes in recipes from day to day as well as from vendor to vendor. While standardized recipes could be provided, it would be impossible to monitor adherence to recipes or to assess quality. Obviously, labelling would be needed, but on a macro level such as being practiced by Singapore and Hong Kong.
4. Recommendations and way forward

Key principles for a policy framework to promote healthy diets through the informal food sector

Leadership and policy frameworks
- Government / city leadership is essential
- Informal food sector needs to be considered in urban planning
- Consideration of the policy environment including legal and regulatory aspects is important.

Multisectoral collaboration: Convergence with other initiatives/sectors
- Identify a lead agency who will take overall responsibility – most often it would be city municipal corporations.
- Gather and use data to inform policies and plan interventions, including comprehensively mapping the informal food service landscape; identifying base ingredients of common street vended foods; costing healthier formulations, professional reformulation of popular street foods etc.
- Coordinate across multiple sectors to develop policies and plans, implement and monitor – include local government, food safety officials.
- Consult and involve vendors associations and other stakeholders
- Recognize and support the connectivity between formal and informal sectors in some areas – reformulation of base/raw materials. Therefore, public private partnerships are vital.

Linking with existing programmes
Link with existing programmes; all countries have some ongoing initiatives to build on – e.g. food safety. Such actions would be more sustainable than starting anew.
- Improving food safety in informal food sector.
- Healthy City – actions would be city or region specific and recognize that cultural foods are not always healthy and that it does not mean that recipes cannot change over time
Communication and advocacy

- Incentivize, facilitate, recognize and reward: Facilitation of processes including technical support for recipes, communication to improve knowledge and attitudes of vendors and consumers is important.
- Utilize new technologies and communication methods to create awareness, build capacity and also to monitor any programmes.
- Recognize and address new methods of vending – home cooked or vendor prepared and sold through apps, Facebook etc
- Start small; e.g. focus on settings (govt. cafeterias, school vending stalls) rather than the entire informal retail sector.

Operational information

- Keep any initiative simple, practical and pragmatic. Promote overall healthfulness through focusing on a few key elements or ingredients (sodium, unrefined flour/foods, trans fat free oils); the focus should be to promote healthier foods rather than healthy foods.
- Keep interventions practical; for example, baking may need electricity and equipment not available to street vendors.

Monitoring

- Monitor implementation of policy measures.
- Gather and use data to inform policies and plan interventions, including comprehensively mapping the informal food service landscape; identifying base ingredients of common street vended foods; costing healthier formulations, professional reformulation of popular street foods etc.

Practical considerations for interventions to ensure healthier diets

- Identify policy space and existing programmes for sustainability and reduction of infrastructure and personnel costs.
- Consider including formal and informal food systems stakeholders, recognizing that both are crucial resources to address food security and nutrition with settings-based solutions: food safety programmes, school food programmes and canteens, government department settings are possibilities.
- Innovative schemes such as public private partnerships should be considered
- Design robust but simple monitoring and evaluation mechanisms. Explore the feasibility of connecting to an already existing monitoring system such as that for food safety.
Supply, meal preparation and demand considerations are listed below

<table>
<thead>
<tr>
<th>Supply</th>
<th>Food/meal production</th>
<th>Demand</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Provide strong support from govt including incentives to draw in business</td>
<td>• Focus on one or two key elements (country specific) in the base product (rice) or ingredient (salt or sugar) for introducing change.</td>
<td>• Educate consumers using innovative ways, aligned with new lifestyles and times.</td>
</tr>
<tr>
<td>• Identify and reformulate raw materials – single foods or food ingredients; rice, sauces</td>
<td>• Communicate with vendors associations and support use of healthier and safe ingredients and base materials.</td>
<td>• Use champions to create demand for healthier diets</td>
</tr>
<tr>
<td>• Increase connectivity and supply of fresh raw materials such as fruit and veg through fiscal and other policies</td>
<td>• Address taste through developing innovative recipes and alternative ingredients.</td>
<td>• Use innovative yet simple labelling methods; nutrient lists are difficult to manage due to recipes not being standardized (not feasible); easily recognizable logos maybe an option.</td>
</tr>
<tr>
<td>• Facilitate fuel supply, cooking equipment, stalls, carts, potable water</td>
<td>• Educate and facilitate use of new technologies, or recipe reformulation, for vendors</td>
<td>• Support with promotional materials, awards, publicity</td>
</tr>
<tr>
<td>• Educate and facilitate use of new technologies, or recipe reformulation, for vendors</td>
<td>• Keep labelling simple; to encourage healthier food choices at point of purchase</td>
<td>• Use nudging for behavior change</td>
</tr>
</tbody>
</table>

**Strengths**

- Lessons learnt from other countries; best practices
- Interest in healthier and more natural foods and sustainability increasing globally
- Easy, novel communication methods
- No organized resistance such as with formal food industry
- No large scale marketing and promotion of street foods

**Challenges**

- No global or regional evidence based guidance or tools
- Inadequate data from countries on context specific situations
- Countries have not recognized informal food sector issues in promoting healthier diets
- Working across multiple sectors; e.g. conflicts with food safety guidance which may promote more fried, salty foods for reducing food borne diseases and spoilage.
- Pricing – healthier foods are usually more expensive
- Lack of adequate consumer awareness and interest
- Poverty and low education status of vendors and consumers
- Monitoring is a challenge due to lack of staff, competing priorities
**Information needs**

Better understanding the role, operators and consumer practices and profiles in the purchase of food prepared in the street and small restaurants/outlets. Identification of itinerant food vendors and small restaurant operators in each area/city and their activities is vital before initiating actions to support healthier diets.

Information is needed, but not limited to the following

- Policy landscape
- Types of foods and their quality in terms of nutrition – probably country and locality specific
- Points of sale, needs for infrastructure, equipment, information and training
- Groups and associations of informal operators
- Research recommendations
- Future studies need to evaluate whole meals to identify if they provide adequate nutrients and compare snack foods to determine whether it is the snack foods that are more unhealthy than the whole meals. An analysis would also indicate how these meals can be made healthier.

**Recommendations for WHO and FAO**

Develop policy advocacy materials, and a compendium of case studies of lessons learnt and examples of promoting healthy diets in the informal food sector.

Provide technical support to countries to implement the activities identified in the country action plans.
Annex 1:
Message of the Regional Director

Distinguished representatives and participants, partners and technical colleagues,

Welcome to this crucial meeting on promoting healthy diets through the informal food sector.

Although our Regional Director, Dr Poonam Khetrapal Singh, would have very much liked to attend this event, she is unable to due to a prior commitment. I therefore, take great pleasure in delivering this message on her behalf.

The Regional Director would first like to thank WPRO colleagues and partners at the FAO for co-organizing and collaborating with us at this event. She very much appreciates your efforts and emphasizes their importance.

She notes that many countries across the South-East Asia Region, as across Asia and the world, are increasingly burdened by undernutrition, overweight and obesity, along with a range of NCDs. She observes that this is negatively impacting public health and impeding sustainable development more generally.

Dr Khetrapal Singh says that the informal food sector, which produces, processes, caters to and/or transports retail sales of fresh or prepared street foods, plays a critical role in the food environment, especially for the urban poor.

She observes that from a public health perspective, the focus of policies and programmes involving the informal food sector have, historically, been on food safety. She nevertheless asserts that we must also look at how we can identify opportunities to harness the sector to promote healthy diets.

Indeed, though street food remains a key source of ready-to-eat, low-cost meals, the health risk posed by such food maybe of concern. The evidence on the composition of food prepared and sold through the informal sector is only slowly emerging, though indicates that street food is mainly consumed by children and young adults, and that its nutritional quality is usually suboptimal, including by being high in energy, saturated fats, trans-fats, sodium and sugar.

The Regional Director notes that though there is no global guidance on measures to support healthy street food, the Region’s action plan to reduce the double burden of malnutrition, which was endorsed at the Sixty-ninth Session of the Regional Committee, does highlight the need to leverage the informal sector as a critical actor in addressing all forms of malnutrition.
To do this, at the same time as protecting the cultural and community role market vendors have in sustaining traditional diets, strategic thinking is needed. She says we must also keep in mind that the informal sector is a significant means of employment, with many actors involved in the chain of production and sale.

Distinguished participants and partners,

The Regional Director highlights the salience of this meeting and welcomes the opportunity to discuss the informal food sector beyond food safety, including by looking at food supply chains, involved actors, capacity development and investments, and the key role of good legislation backed by routine monitoring.

She says this inter-regional meeting provides an outstanding forum to exchange information and good practices that exist in both regions, and looks forward to being apprised of how the meeting has aided the prioritization of key actions and contributed to the development of preliminary guidance for promoting healthy diets.

Dr Khetrapal Singh wishes you a productive and engaging meeting.

I echo that sentiment and wish you a comfortable stay in Bangkok.

Thank you.
## Annex 2: Country Action Plans

<table>
<thead>
<tr>
<th>Bangladesh</th>
<th><strong>Current status</strong>&lt;br&gt;Data/information on informal sector and nutrition unavailable&lt;br&gt;Only sporadic health/nutrition education&lt;br&gt;Under Ministry of Local Govt &amp; Food and Industry: mobile courts are functional&lt;br&gt;Zoning is available and zonal food inspectors are in place but not much progress in addressing informal sector in nutrition, though food safety work is ongoing</th>
<th><strong>Responsible agency and stakeholders</strong>&lt;br&gt;Bangladesh Food Safety Authority (lead agency) – has started working targeting the informal sector in collaboration with the local govt.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Next steps</strong>&lt;br&gt;Address data gaps: mapping of street food vendors; initially larger cities (infrastructure, food supply understand consumers); nutrition values of street foods, consumer behaviours,&lt;br&gt;Sensitization/advocacy of policy makers using evidence&lt;br&gt;Urban planning – examine feasibility of zoning areas for hawkers and assess options and interest for scaling up the concept of ‘Orange Cart’&lt;br&gt;Health/Nutrition education – both consumers and vendors to align supply and demand</td>
<td><strong>Technical assistance</strong>&lt;br&gt;Yes – Overall guidance from WHO and expertise&lt;br&gt;FAO – revisit the curriculum for risk based inspection&lt;br&gt;WFP – fill the nutrient gap analysis&lt;br&gt;Study tour to India to study methods used by the food safety and standards authority of India (FSSAI)</td>
<td></td>
</tr>
<tr>
<td>Country</td>
<td>Current status</td>
<td>Responsible agency and stakeholders</td>
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<tr>
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<tr>
<td>India</td>
<td><strong>Data available. Communication material also available.</strong> Communication ongoing for some groups of urban consumers Cluster Approach (50 or more) being done – through the street food hub project. The focus is on food safety Clean Fruits and Vegetable market – just launched Organic market through the Jaivik Bharat initiative Technical material available Generate more data and scale up data collection with support of State/City, including more district level data Scale up the above projects and include nutrition parameters, making use of available information/evidence Communication to the urban groups of consumers but some rural pockets. Need to extend reach. Communication materials need review prior to wider dissemination. At present too many messages Mobile vendors need to be addressed in convergence with the local police (Local models may be looked at for best practices) Linking of data is essential – make a large database to start monitoring and evaluation Technical assistance not needed</td>
<td>FSSAI/health department; police; Municipal Corporations Since multiple agencies working together, convergence issues arise</td>
</tr>
</tbody>
</table>
| Indonesia | **Plans developed for improving informal food sector under the healthy cities movement (Jakarta)** **Next steps** Dissemination and advocacy meeting related stakeholders;  
- Piloting at the provincial level (DKI Jakarta).  
  - Stickerization not only for food safety but also for healthy food (less sugar, salt, and fat)  
  - Healthy food apps for the restaurant  
- Development of monitoring and evaluation instrument and mechanism framework for pilot Simultaneous healthy diet promotion for consumers and vendors | Local government, Ministry of Health, Ministries of Agriculture, Trade, Education |
<table>
<thead>
<tr>
<th>Sri Lanka</th>
<th><strong>Current status</strong></th>
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</thead>
<tbody>
<tr>
<td>Little information on nutrition related aspects</td>
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<tr>
<td>Actions are only on food safety and not on nutrition</td>
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**Next Steps**

Goal: Colombo municipal council to promote healthier lunch packets (lunch parcels containing rice and curries) by adopting a healthy plate concept to standardize proportions of food groups as recommended in the Food Based Dietary Guidelines of Sri Lanka. Initial pilot and then scale up

**Specific objectives**

- To conduct a market survey (as part of situational analysis) to identify the spectrum of the whole meal lunch packets sold within the city; dietary content;
- To design a healthier lunch pack (if necessary) in terms of its safety hygiene and nutritional value
- Communicate to public
- To design a mechanism for its implantation monitoring evaluation and enforcement

**Urban planning:** Explore ways to improve locations (zoning) and provide water and sanitation, sustainable waste disposal and locations for segregated collection of waste

Situational analysis: map where food is prepared, explore improving transport time, how to improve raw material (link with agriculture); Comprehensive sampling and analysis of lunch packs

**Research needs**

To map the informal food sector landscape with regard to modes of selling (street, mobile, kiosks) Source (home cooked, small factories; point of sale) vendors, consumer profiles/behaviours etc; information on food safety, and nutrition – sources of fat, contents of lunch parcels

<table>
<thead>
<tr>
<th>Responsible agency and stakeholders</th>
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<tbody>
<tr>
<td>Colombo Municipal Corporation</td>
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<tr>
<td>Urban Development Authority, Ministry of Health,</td>
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<tr>
<td><strong>Activities</strong></td>
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<tr>
<td>To formulate a working group comprising of ministry of health (Nutrition, food safety directorates, Faculty of Medicine), Canteen associations, CBO</td>
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</table>

Required possible technical assistance: WHO/FAO, academia

Documentation and dissemination of information regarding the program and effectiveness
<table>
<thead>
<tr>
<th>Thailand</th>
<th><strong>Current status</strong></th>
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<tbody>
<tr>
<td></td>
<td>Data is available in terms of licensing but partial data on food safety &amp; nutrition</td>
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<tr>
<td></td>
<td>Health/nutrition education: Through the Thai Health Foundation – Health literacy to producer for license including physical health check. Healthy eating behaviours not efficiently disseminated to the consumer.</td>
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<td></td>
<td>Street food management model in 12 provinces</td>
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<tr>
<th><strong>Next Steps</strong></th>
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<tr>
<td>Design the scale up of the project (Street Food Management Model Development in Thailand) and identify parameters for monitoring.</td>
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<thead>
<tr>
<th><strong>Objectives of project:</strong></th>
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<tbody>
<tr>
<td>To develop prototypes of street food management for new target areas emphasizing sale &amp; consumption of vegetables and fruits, and standard requirements.</td>
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<tr>
<td>To develop system &amp; mechanism on street food management with cooperation of network partners</td>
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<td>To promote literacy of consumers for changing behavior of vegetables and fruits consumption</td>
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<tr>
<td>Goals: Promote sales &amp; consumption of safe fruits &amp; vegetables; Achieve street food standards requirement (health, economic, social and culture)</td>
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<tr>
<td>Develop system &amp; mechanism to manage SF by local authority</td>
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<th><strong>Expected outcomes:</strong></th>
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<tr>
<td>Local policies to promote safe street food for consumers’ health &amp; well-being</td>
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<tr>
<td>Learning centers and services of safe street food</td>
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<tr>
<td>Sustainably management of street food standard by network partners</td>
</tr>
<tr>
<td>Knowledge on policy &amp; measures to promote safe &amp; adequate fruits &amp; vegetables</td>
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<tr>
<td>Reduction of risk of non communicable diseases and increase consumption of healthy food</td>
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<td>Country</td>
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<td>Cambodia</td>
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<th><strong>Current status</strong></th>
<th><strong>Next steps</strong></th>
<th><strong>Responsible agency and stakeholders</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>WHO/FAO Inter-Regional meeting to promote healthy diets through the informal food sector in Asia</td>
<td>Cambodia</td>
<td>Malaysia</td>
<td>WHO/FAO Inter-Regional meeting to promote healthy diets through the informal food sector in Asia</td>
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<tr>
<td>Country</td>
<td>Current status:</td>
<td>Responsible agency and stakeholders</td>
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<tr>
<td>Mongolia</td>
<td>No activities for healthy diets in informal sector</td>
<td>Ministry of Health</td>
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<td><strong>Next Steps</strong></td>
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<td></td>
<td>Work with hospital canteens to identify common dishes that are low in salt.</td>
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<td>Prepare education messages for consumers</td>
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<td></td>
<td>Making available common dishes that are lower in salt (huushuur) in cafeterias.</td>
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<td>Philippines</td>
<td>No activities beyond food safety actions in informal food sector</td>
<td>City Corporation</td>
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<td><strong>Next steps</strong></td>
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<td>Select one city (Malabon) to reduce sugar consumption in beverages</td>
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<td>Vendors – Educate and Advocate the preparation of beverages (variety of choice for sugar content 25%, 50% 75%)</td>
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<td></td>
<td>• Provide a logo to the food vendors.</td>
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<td>Customers – create a demand</td>
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<td>Orientation be given to the population the good point of have less sugar</td>
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<td>To introduce the promotion of logo</td>
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<td></td>
<td>Using sugar meter for monitoring of the content of sugar in a random visit (Refractometer as advised by Ms. Mandy Kwan of Hongkong)</td>
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<td></td>
<td><strong>Support:</strong></td>
<td>Request support of expert with Kolkata experience on a monitoring tool.</td>
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<tr>
<td>Vietnam</td>
<td>No specific activities beyond food safety for informal sector workers</td>
<td>Local government</td>
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<td></td>
<td><strong>Next steps</strong></td>
<td>Ministry of Health</td>
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<tr>
<td></td>
<td>Dissemination of information from this meeting and advocacy meeting related stake holders</td>
<td>Food and Drug Department</td>
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<td></td>
<td>Improve overall promotion and awareness on healthy diets</td>
<td>Ministries of Agriculture, Trade, Science and Technology,</td>
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<td></td>
<td>Develop healthier foods recommendation for street vendor and provide training course for vendors;</td>
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<td></td>
<td>Technical support from WHO, FAO</td>
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</tbody>
</table>
Annex 3:
List of participants

India
1. Ms Rohini Saran
   Deputy Lead
   Food Fortification Resource Centre
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    Malaysia
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Ministry of Health  
Malaysia

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Cambodia

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Drugs and Food Department  
Ministry of Health  
Cambodia

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21. Mr Vu Sy Thanh  
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Ministry of Health  
Vietnam

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Ministry of Health  
Vietnam

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World Food Programme  
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WHO SECRETARIAT  

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Dhaka, Bangladesh  

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Jakarta, Indonesia  

42. Dr Renu Garg  
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45. Dr Weeraya Karnpanit  
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WHO/FAO Inter-Regional meeting to promote healthy diets through the informal food sector in Asia

20–22 August 2019, Bangkok, Thailand