

Strengthening national capacity for risk-based food import control within a One Health framework

SP4 One Health Project 2017

Training of Trainers (ToT) workshop on risk analysis to improve capacity of effective risk-based food import control in Nepal: Residential training

13-16 September 2017, Hotel View Bhrikuti, Godavari, Lalitpur, Nepal



Overview

The 4-day Training of Trainers workshop on risk analysis to improve capacity of effective risk-based food import control in Nepal was held in Godavari, Lalitpur, Nepal on 13-16 September 2017, coorganized by the Department of Food Technology and Quality Control (DFTQC), Ministry of Agriculture of Nepal and the Food and Agriculture Organization of the United Nations (FAO). The workshop was attended by a total of 32 people which included 5 special guests, 22 national participants from relevant agencies and organizations and 5 resource people. The agenda of the training is attached as Annex 1 and the list of participants is attached as Annex 2.

1. Background

Food products have been the third most valuable commodity group traded internationally, according to the report of the International Trade Statistics 2014 published by the World Trade Organization (WTO). Many countries, including developing countries, import significant proportion of their food supplies. Over the last decades, WTO has set two international agreements namely Sanitary and Phytosanitary Measures (SPS) and Technical Barriers to Trade (TBT) that defined a framework for control measures to protect the health of consumers and ensure fair practices in food trade. For the

countries that are Members to WTO, including Nepal, the international food standards developed by the Codex Alimentarius have become significant food safety reference documents to follow the agreement.

Nepal has set a priority on the capacity development item entitled "producers and exporters of selected farm products are enabled to access increased market opportunities by complying with SPS related requirements in the value chain of the products" outlined in the FAO Country Programme Framework (CPF) for Nepal. The CPF priority states that it focuses on exports, however Nepal has various trade situations with SAARC countries and in particular, significant amount of food items are traded with India. Import food control is one of the challenges for the relevant officers as this needs to involve various agencies including border control (custom), health, agriculture, food safety, plant and animal quarantine and inspection services.

In 2016 FAO published a comprehensive manual on food safety aspects of food import entitled "Risk Based Imported Food Control Manual (ISBN 978-92-5-109070-1)". The manual supports competent authorities in shaping a customized plan of action, based on an analysis of their specific country situation on imported food control. While respecting the principles, guidance and objectives agreed by the Codex Alimentarius Commission, different options for control measures can be selected and combined to implement a coherent set of import controls to best fit the needs of the country context.

Particular emphasis is given to risk-based framework in order to support Nepal in targeting priority risks. It is also important for the country to take a One Health approach due to the cross-cutting nature of the subject. In addition to the abovementioned FAO manual, key references include Codex Guidelines for import food control systems (CAC/GL 47-2003). With the opportunity of the One Health Project overarching the initiative, Nepal would benefit from the Training of Trainers workshop on risk-based imported food controls, together with subsequent trainings to be conducted by the trainees of the workshop.

2. Scope and objectives

The training covered all food items that can be covered by a One Health framework. Emphasis was put on the importance of applying the same risk-based approach to all the food items imported from India, China and other third countries, food items that are produced locally for domestic consumption and food items produced for exports. While the training is specifically targeted to technical elements of the imported food controls, the aim of the training included development of a set of recommendations from the technical level to the policy/decision makers.

The overall objective of the training-of-trainers workshop is to improve the effectiveness of the risk-based national imported food control system in Nepal within One Health framework. Through this ToT workshop, participants will:

- obtain basic understanding of the risk analysis within a One Health framework as well as an
 easy access to the full references on the requirement of effective imported food controls;
- be able to see themselves as trainers of the topic, and obtain all necessary tools and materials to replicate the trainings elsewhere;
- receive 3 concrete examples of good importing practices through a One Health approach from other countries;
- identify the challenges and opportunities on imported food control in Nepal and agree on immediate follow up actions with One Health approach that would help increasing the efficacy/effectiveness of the imported food control in Nepal; and
- be able to conduct a follow up activity with their colleagues (non-participants) whose work are relevant to the imported food controls within 3 months after the workshop.

3. Workshop discussions

Day 1

The inauguration ceremony invited a chief guest, Dr Keshav Prasad Premy, Joint Secretary, Ministry of Livestock Development (MOLD) who welcomed the participants to the training. In his remarks, he stated that this workshop is the first kind in Nepal that feature One Health for practical training and emphasized the importance for all stakeholders to realize various concrete benefits of taking collaborative approach for effective food safety management. The chair person, Dr Matina Joshi, Deputy Director General (DDG) of the Department of Food Technology and Quality Control (DFTQC), pointed out that the current food safety inspections system in Nepal is not at the optimal level in terms of costs and time thus there is a strong need in adopting a more systematic approach, incorporating risk-based system. She echoed Dr Premy that collaboration among relevant stakeholders under a One Health framework would be beneficial for the country's regulatory system as well as daily technical practices.

The master of the ceremony, Mr Mohan Krishna Maharjan, Officer in DFTQC, introduced the special guest Mrs Renu Adhikari, DDG, Department of Agriculture, National Consultant Dr Ganesh Dawadi, the Lead Consultant of the initiative who presented the objectives to the workshop which are to learn practical aspects of the risk based approach within One Health framework to address the challenges in imported food control in Nepal, and to modernize the practices with the tools and knowledge to be obtained. At the end of the ceremony, Mr Maharjan invited Dr Masami Takeuchi, Food Safety Officer, Food and Agriculture Organization of the United Nations (FAO) Regional Office for Asia and Pacific (FAORAP), who greeted all the participants on behalf of FAO and her colleague, Mr Arjun Singh Thapa, Programme Officer, FAO Nepal, and expressed FAO's keen interest on learn and benefit from Nepal's experience on food import controls. Mr Maharjan concluded the Inauguration ceremony by wishing a fruitful success of the training.

The training started with a presentation by Dr Takeuchi on the concept and principles of the Risk Analysis Framework applied to food safety and the introduction to the newly developed FAO manual on Risk Based Imported Food Control. Dr Takeuchi highlighted the key difference between "hazards" and "risks" and explained the effectiveness of applying standardized, risk-based and multi-factor criteria when managing food safety. The importance of risk communication was also emphasized to be conducted between risk managers and risk assessors as well as between the competent authorities and the general public including media. Ms Gokce Akbalik, Consultant, FAORAP, presented the objectives of implementing the risk-based imported food controls, which is to prioritize high risk food categories to have a focus so that relevant risk management actions can effectively targeted, and as a result, it leads to the eventual success in protecting public health as well as in facilitating efficient food trade.

As the Government of Nepal has requested FAO prior to the training, 3 examples of good practices on imported food controls from Australia, New Zealand and the United Kingdom were provided to the participants, followed by a discussion session which identified similarities, differences and possible approaches that Nepal can take in the future. Active discussions were held on various experience of the imported food controls in Nepal as well as possible gaps and shortcomings that quarantine officers (animal, plant and food) have faced. Dr Dawadi presented the current imported food controls in Nepal by indicating the major sites for imported food control in Nepal, relevant types of stakeholders and government officers involved in the control, as well as related pre-border document requirements. Before importing any items into Nepal, importers need to obtain an import license from Ministry of Commerce. Then, if the items are food items, depending on the types of the food items, the importers need to obtain relevant permits. If whole livestock items are the consignments, the importer needs to obtain a permit from Department of Livestock Services (DOLS)

for animal quarantine (pest and diseases) purposes. Same applies to the plant items as Plant Protection Department (PPD) issues a permit for plant quarantine purposes. If the items are processed food, DFTQC issues a permit. Importers may require to obtain more than 1 permit if they wish to import different types of food items (i.e., whole meat and processed meat). The application form for the DFTQC permit has been introduced by Dr Dawadi for further discussion during the training.

Day 2

Food items arriving in Nepali borders are first handled by the Customs Officers to verify required documents and to decide whether the products are allowed to enter, whether they need to obtain quarantine (animal, plant or food) clearance(s), or whether a further inspection by sampling and analysis is needed. Participants conducted relevant document reviews and identified some inconsistencies in various existing product categorizations, mainly due to the fact that each categorization has a different purpose and a different type of users.

Currently, Nepali Customs Officers refer to the Harmonized Commodity Description and Coding System, as known as "Harmonized System (HS) codes" developed by the World Customs Organization (http://www.wcoomd.org/en/topics/nomenclature/overview/what-is-the-harmonized-system.aspx). It comprises about 5,000 commodity groups; each identified by a six digit code, arranged in a legal and logical structure and is supported by well-defined rules to achieve uniform classification. The classification provides 25 overall categories for food items with multiple levels of sub-categories. Since the code list is the one that is internationally recognized and harmonized, and is used in the region and countries that Nepal has food trade with, participants recommended to provide all the Nepal border control offices with a common list based on the HS code that provides clear indication which quarantine clearance(s) would be required.

A similar attempt has already been made in 2012 and 29 food categories have been provided to the Customs Office. However, the list does not have a legal binding power for the Customs Officers to strictly follow the categorization, and HS codes were not referenced to the list, thus the actual use of the list remained impracticable. In 2016, DFTQC developed food categorization system for the purpose of various financial applications of Nepal Rastra Bank, and all items that are covered by DFTQC have been included in the 16 product categories. As the categorization incorporated all the considerations in feasibility of separating/merging the food groups, the final list has become quite a comprehensive yet concise list, however the list does not include food items that are handled by animal/livestock quarantine and plant quarantine systems, thus it is impracticable for the purpose of border control. Therefore, participants agreed that the common list to be provided to the Nepal border control offices can be an integrated list that considered all the existing food categorization systems with clear HS code references to facilitate speedy and consistent decision making for the border control process conducted by the Customs Officers. The integrated list will be useful for all the stakeholders, including the importers as it will inform them what quarantine processes they need to go through. As the issue of the list's legal binding power still remains, participants suggested to strategically implement the list into the system.

While discussing the process for import control in Nepal, participants highlighted the ongoing project to create an online registry system for importers. Current aim and provision for this activity are to have the system ubiquitous, and participants suggested that the system can have a future plan to cover all other elements such as food categorization as well as record of importer profiles. Application forms for all three quarantine clearances can be embedded into the system, and according to the food categories selected, relevant application(s) can automatically appear. Eventually the system also can be used for recording all the border control actions on food thus a similar database to the EU's Rapid Alert for Food and Feed System (RAFFS) can be generated from

the system. A participant suggested that in the future, Ministry of Health can be involved, to integrate human health related data (epidemiological data, food safety incident data and surveillance data) so that the system can be truly an integrated One Health system. While various innovative ideas have been raised, all participants agreed that all those elements need to be incorporated into the online system in a step-by-step manner. The first step is to create the food categorization system and the categories agreed would be incorporated into the online system, keeping in mind that flexibility is important, for future expansion of the online system.

In terms of information to importers, participants agreed that current webpage information to importers can be improved and further elaborated. Although the current webpage has already included all the critical and essential information and instructions, some food importers seem still unclear about what documents they need to prepare for what department(s), and what types of quarantine clearance(s) at the border point they need to anticipate. Therefore participants agreed to create more user-friendly and elaborated instructions for importers on the website, with the uploaded forms. Once the online system mentioned above is functional, such instruction webpage needs to be put together with the online system.

Creation of a commonly recognizable food categories for all stakeholders will be a significant first step for effective imported food control. Towards the risk-based control, the second useful step is to establish an effective risk categorization system. Performing a complete risk assessment on all imported food items, currently estimated as more than 240 food items coming into Nepal, and to conduct all respective risk management actions are simply not realistic. Also it is important to note that some particular concerns and interests exist over certain specific risks in the country/trade context. Risk categorization is a useful tool in prioritizing the products for further checks and when they are likely to pose any risks, it provides a defined set of criteria in selecting the most appropriate risk management option(s) to mitigate or minimize the risks.

In order for everyone to understand how risk categorization works, participants are divided into 4 groups and each group was provided with instructions to create a quick risk categorization system with hypothetical food import scenarios with four parameters: commodity, country of origin, importing volume and related risk factor(s). Based on the hypothetical scoring schemes participants set up for the categorization systems, all 4 groups calculated the total scores for all the unique scenarios they have developed. Two groups were assigned to use three categories (high risk, medium risk and low risk) while other two were assigned to use two categories (to act and not to act). Dr Takeuchi also provided 5 additional hypothetical scenarios for all 4 different group systems to categorize the risks, and participants realized that these multi-factor risk categorization systems would be effective to determine the appropriate and standardized risk management actions even when full risk assessment results are not available. Out of 5 scenarios, all groups came up with the same results for three simple scenarios and two other scenarios with more complex situations provided a slight range of management options depending on the groups' different perspectives on the trust level of the exporting country's control level as well as the level of concern in the Nepali context. The solid knowledge on how risk categorization works made participants realize the potential effectiveness of the system to be applied to the current imported food control system in Nepal. Participants agreed that once the abovementioned integrated food category list has been developed, establishing a systematic risk categorization is useful for Nepal to prioritize highrisk/concerned food items for imported food control system. It is also agreed that in order to do that, scientific experts' inputs are essential to set up scores for variables. As event-based or concernbased issues would change time to time, annual review of the priority list should be also projected. If/once the appropriate risk categorization has been successful, further consideration in setting up Designated Entry Points (DEPs) for more focused import control for high-risk food items can be considered.

The exercise on risk categorization stimulated participants to consider the critical significance of having sufficient and accurate data set. Participants stressed that the country currently does not have a comprehensive national data collection system. For example, Nepal does not have a national food consumption data to begin with. It is critically necessary in order to conduct any exposure assessment. Due to the cross-cutting nature of food safety, various food safety related data from different authorities such as plant agriculture, livestock, fisheries and aquaculture, forestry, public health, environment, commerce and trade are useful in setting up the benchmark to improve the systems for food safety management. Participants informed that they knew that various food safety related data do exist in the country for various purposes and at various locations/departments, but the effort to accumulate them and to compile them has not been made thus having access to such data and conducting various analyses are currently not possible. The participants agreed that there is a strong need to regularly collect and compile food related data form all relevant agencies and ministries to develop a set of national data. All discussed that online systems may enable comprehensive and systematic data collection. They also noted the need to strengthen food monitoring throughout the value chain and improve the national surveillance system for foodborne reportable diseases.

DAY 3

Once Customs Office decides to send samples to relevant quarantine offices, the analysis results need be returned by respective departments with official letters of clearance or rejection/holding recommendations. Certain products need to be cleared by multiple quarantine offices for different analysis, where briefly, plant quarantine on plant pests and diseases, animal quarantine on transboundary animal diseases and food quarantine on food safety. However, current system requires the Customs Office to obtain only one letter from a Ministry, therefore sometimes those products needing two types of quarantine may pass through the border after only one clearance is made. For example, currently Nepal is strengthening a quarantine process on meat from China due to a concern over transboundary animal diseases. However, current control system does not particularly focus on other relevant food safety issues such as the level of veterinary drug residues, thus the process can become incomplete. Dr Dawadi pointed out this particular gap and emphasized the need of DFTQC intervention to provide guidance to have an integrated quarantine system (One Health approach).

Another gap that participants raised was that relevant quarantine offices may not necessarily be able to know the final decisions made by the Customs Office on border clearance or rejection. Currently DFTQC, DOLS and PPD fully trust the decisions made by the Customs Office thus this particular gap has not been flagged as a serious need, however, in order for technical officers to properly collect the data and information on importers' practices for future reference/intervention, it is indeed essential that all relevant quarantine offices have information on final decisions. A well-established information channel between Customs and technical departments will effectively fulfill the gap. Enabling timely information exchange and communication among the relevant stakeholders would facilitate not only filling the gap but also reducing duplicate of efforts and as a result, Nepal would achieve a resource-effective and efficient imported food control system.

Participants flagged a specific need in improving bilateral communications with major trade partners. Nepal shares its border with only two countries: India and China, thus these two countries are the key countries that Nepal would like to establish effective direct communication channels with. When some technical queries arise with imported food in Nepal, communication is usually smooth with deporters from, for example, EU countries, as direct communication with the exporters is possible and intervention of authorities is minimum. However, when the items come from India and China, communication needs to be done through the official channels. While Nepal would benefit from having timely communication with specific counterparts, such as Food Safety Standards Authority of

India (FSSAI), China Inspection and Quarantine Services (CIQ) and China Food and Drug Administration (CFDA), the current set-up of communication with these two countries requires Nepal to go through rather formal and often bureaucratic communication channels with various Governmental Ministries and Authorities, thus there is a need in improving the situation. Participants asked Dr Takeuchi if INFOSAN secretariat can assist in facilitation of such communication between countries and she encouraged the participants to first increase the interaction with the INFOSAN secretariat and its community members, then to request their assistance in bilateral communication facilitation with India and China.

In addition, while there should be only one designated INFOSAN Emergency Contact Point (ECP) per country, INFOSAN welcomes multiple INFOSAN Focal Points (FPs) from various relevant sectors, therefore participants agreed to increase the number of Nepali FPs to INFOSAN in order to receive timely international information/alert on imported/exported food items. In this way, although ECP is still the only one to respond to any queries from INFOSAN secretariat, timely information sharing and data collection can be facilitated.

Dr Dawadi also highlighted a strong need for Nepal in establishing multi-disciplinary national team for food safety incident/emergency management. In response, Dr Takeuchi presented a Multi-Agency Coordination Group (MACG) model presented in the publication entitled "FAO/WHO framework for developing national food safety emergency response plans". The framework suggests countries to look into the existing multi-sectoral body to build on to make an MACG, rather than creating an MACG from the scratch. Participants agreed to review the functionality of the current National Codex Committee as the first step to assess the feasibility in strengthening the Committee to have more functional roles for food safety management. Current limitation is that the Committee is not bound with any relevant laws or regulations, thus while it is a good communication mechanism among different agencies and ministries working on food safety, the Committee is not authorized to make any risk management actions and decisions.

Nepal Food Act of 1966 is the only law that covers food safety in Nepal. There are mandatory standards on 110 food products and they are supposed to apply equally to imported foods. Although the Act was revised 5 times in the past, the amendments were rather cosmetic and all participants stated that it requires a significant revamp as fundamental modernization of the act is critically necessary; for example, inclusion of basic risk-based approach, farm-to-table approach (value chain) and One Health approach for integrated framework to set up the national food control system. In order for the Act to be modernized, participants agreed that an overall national policy on food safety needs to be developed considering all the systematic approaches that are useful for food safety management. In fact, recently an over-arching food safety policy of Nepal has been drafted by DFTQC in collaboration with other relevant departments and ministries, and it is now with the Ministry of Agriculture to initiate an internal consultation process.

While DFTQC is the lead of the process, all agreed that it is critical to have more active involvement of Ministry of Health and relevant department to cover the health side of food safety. Other closely related departments including livestock, trade and commerce and finance also need to be consulted, and the agreed Policy will be returned to the Ministry of Agriculture. Once the process is finished, then Ministry of Agriculture will submit the Policy to the Cabinet to have the final approval. If the issue is seen as a priority by the Cabinet, the process can go quick, however it is foreseen that the process may take much longer. A participant suggested and all agreed that while the Policy goes through the process, other relevant documents, including (revision of) Nepal Food Act, related regulations/rules and directives need to be updated/developed in parallel, to make sure that all the visions and ideas listed in the Policy will be reflected to those documents and no gaps/overlaps would occur. Dr Dawadi listed and collected all the laws and regulations relevant to food safety and participants agreed that all relevant legal documents need to be revisited to ensure effective

integration of the abovementioned modernized process. Dr Takeuchi offered technical review of the Policy prepared by the FAO legal office and participants agreed that the Policy in Nepali to be translated into English so that the review can be done by FAO. Participants also requested FAO to provide technical assistance in revising the Nepal Food Act.

As the workshop was a Training of Trainers, FAO provided a set of presentation modules for the participants to develop their own training programme. Ms Akbalik provided a brief overview on two of the modules: information exchange and communication and support functions to imported food control. Dr Takeuchi also provided an overview on one of the modules, risk management actions.

DAY 4

During the final technical session, participants discussed the way forward and developed a set of recommendations for the Government of Nepal as well as FAO. In addition to all the agreements and recommendations made during the past three days, participants stressed the importance of risk communication in Nepal. Participants agreed that conducting a series of targeted risk communication trainings would be beneficial for the country. First, a risk communication training for those who are in the competent authorities and risk managers is important to convey the key messages for everyone to understand what risk communication really means. Second, a media training on food safety is key for journalists to understand the importance of accurate reporting and consequences of misinformation on food safety. Third, general public needs to be sensitized so that they can demand for safer food and they will be able to understand what would affect their health and what would not. This also helps consumers to avoid an unnecessary panic. Lastly, food businesses, companies and importers also need to have a training on risk communication, as they are the front line people to act upon any needs of risk communication of food items they handle. The final set of key recommendations developed by participants during the workshop are listed in the section on conclusions and recommendations.

The closing session was facilitated by Mr Mohan Krishna Maharjan, who invited the guests of honour, Mr Sanjeev Kumar Karn, Director General of the DFTQC and Dr Matina Joshi, DDG of the DFTQC. Mr Karn thanked all the resource persons for the fruitful training workshop. He affirmed that the draft food safety policy is going through all the processes to be submitted to the Cabinet, and pointed out the importance of improving Nepal's imported food controls by integrating new approaches and techniques, since Nepal import a significantly large amount of food items. He informed the audience that DFTQC is currently working on the development of the new food inspection systems where they are obtaining international accreditation for their laboratories. Mr Karn also stressed DFTQC's commitment to improve Nepal food systems by involving industries and also by considering the capacity of the farmers. He closed his speech by thanking FAO Nepal as well as FAO RAP for provision of technical assistance to Nepal and emphasized their keen interest on continuous collaboration with FAO.

Dr Dawadi, in his closing remarks, thanked Dr Takeuchi for delivering this complex subject in an understandable way, and reminded the commitment of both FAO and the Nepali authorities on the follow-up actions. He stated that the workshop was able to diagnose the gaps in the Nepali imported food control system, and participants are now able to apply the risk categorization system and they can become resource persons to transfer the knowledge they gained through the training to other colleagues and stakeholders. He sincerely thanked all the participants for their valuable inputs and confirmed his continuous provision of assistance for this initiative. Three participants, Dr Kshitij Shrestha, Mr Madan Kumar Chapagai and Mr Basu Khatiwada also deliver their speeches during the closing session to express their reflections on the meeting and thanked the organizers and expressed their commitment to work in a risk-based framework within One Health approach, to deliver the message to their colleagues and to work together on the follow up actions. Dr Takeuchi thanked Mr

Karn for his vision and reminder to look closely the reality and feasibility, and appreciated the important One Health scope Ms Joshi explained on the first day. She also thanked her FAO colleagues, Mr Thapa and Ms Akbalik for efficient coordination and contributions. She highlighted the invaluable technical contributions made by Dr Dawadi and Dr Sedai. She once again emphasized the availability of FAO in further technical assistance upon a request by the Government of Nepal. The training was officially closed with the delivery of the certificates to all the participants by Mr Karn.

4. Conclusions and Recommendations

The 4-day workshop provided Nepali officers with solid knowledge of the risk-based, modern and efficient imported food control systems operated within a One Health framework. Through various presentations, good practice examples, working group activities and discussions, participants can now see themselves as trainers of the topic. Relevant training tools, including generic set of presentations and working group activity sheets were provided in both hard copies and soft copies for them to use in their own training events. Participants also confirmed their firm commitment to share this knowledge by conducting follow up activities with their colleagues and other stakeholders.

Most importantly the participants came up with a key set of recommendations and follow-up actions as follows:

- An integrated food categorization list will be developed with HS code references with indications
 of the required quarantine clearance to facilitate the decision making at the border by the
 Customs Officers;
- A webpage to provide instructions for food importers will be further elaborated with more instructions on the required pre-border forms and documents as well as border quarantine clearance processes according to the food categories;
- The online system that is currently being developed will include the tick box to select the
 relevant food category(ies) so that it automatically contributes to generation of importer
 profiles and recording border actions;
- Risk categorization for Nepal will be conducted to prioritize high-risk/concerned food items for imported food control system;
- National food data collection from all relevant departments will be streamlined and effective methodologies for such data compilation will be considered to make them accessible by all relevant officers;
- Interaction with the INFOSAN secretariat as well as its community members will be increased;
- Key officers from DFTQC, DOLS and PPD will be designated as Nepali Focal points to INFOSAN so that timely sharing of international information will be possible;
- Feasibility will be assessed on strengthening the National Codex Committee's functions to serve as a multi-agency coordination group for food safety incident management;
- Finalization and adoption of the modernized national food safety policy for Nepal will be accelerated (translation will be done by FAO Nepal and technical assistance will be provided by FAO Legal Office);
- Modernization will be done with the food safety relevant Acts, relevant regulations/rules and directives to make them in line with the abovementioned policy;
- A set of targeted risk communication trainings will be organized for regulators/managers, industry/importers, media and consumers.

5. Evaluation

Pre-workshop and post-workshop questionnaires were administered to measure the knowledge gain of the participants. The questionnaires also included commentary parts on their expectations (pre-workshop) and recommendations (post-workshop). Many participants wrote that their expectations

for the workshop were to 1) understand the concept of risk analysis framework and One Health approach; 2) learn how to incorporate such frameworks/approaches practically into imported food controls as well as food policy formulations in Nepal to have a risk-based approach to protect public health; 3) receive information on the effective tools such as risk categorization and risk management; and 4) receive examples of international practices on risk based imported food control.

As to the knowledge gain assessment, pre-workshop questionnaire scores (PRE) and post-workshop questionnaire scores (POST) were analysed by the Paired t-test. Those who did not return either one of the questionnaires were excluded from the analysis (N=17). With having the highest score of 18 and the lowest of 7, the means of PRE and POST were 10.59 (SD 1.94) and 16.12 (SD 2.12) respectively. Thus 95% confidence interval of this difference is from -6.83 to -4.23 and the t-value was calculated to be 9.0191 with the degree of freedom of 16. The result showed that the two-tailed P value of < 0.0001, thus in conclusion, the knowledge gain by the participants was extremely statistically significant.

Post-workshop comments from the participants showed that their expectations were fulfilled. Some participants emphasized the need to further incorporate a One Health approach in food policy making. Additional comments included the need for provision of hands-on trainings all relevant stakeholders, in particular for customs officers. Participants rated the subject relevance and usefulness of the workshop for their work, and the materials and handouts provided as very useful with 100% success. Quality of the workshop was evaluated as 78% whereas the technical inputs by the experts was found 94% useful.

Improvements suggested included having a longer period for training to dedicate more time on case studies; applying real data on risk categorization examples for practicality; visiting the customs and quarantine offices during the training; performing simulations of border control practices. The specific objectives determined before the workshop was successfully reached as follows:

- Level of knowledge and keen interest of the participants enabled their active involvement during the discussions and working group activities.
- Participants gained a significant knowledge from the trainings; the average of the replies for the confidence to provide a training on the subject to their colleagues was 88%.
- Participants received the hard copy of the manual and USB keys with training materials. They
 also declared commitment to share the knowledge they obtained during the training, such as
 further distribution of the materials to other stakeholders. They agreed to submit a half-page
 report on their actions within 3 months.
- Participants agreed to work collaboratively with all relevant departments under One Health approach on the decided follow-up recommendations.

Annex 1: Agenda

Wednesday 13 September 2017

#	Time	Agenda item	Note
1.	08.00 - 09.00	Registration	Pre-workshop
			questions distributed
2.	09.00 - 09.30	Opening session	
		Government of Nepal	
		FAOR Nepal	
3.	09.30 - 09.45	Presentation 1 : Objectives of the meeting	Ganesh Dawadi
4.	09.45 – 10.00	Photo session	All
5.	10.00 - 10.30	Tea/coffee break	Pre-workshop
			questions collected
6.	10.30 - 11.00	Presentation 2 : Introduction to the FAO	Masami Takeuchi
		manual	
7.	11.00 - 11.30	Presentation 3: Objective of imported	Gokce Akbalik
		food controls (policy objectives, imported	
		food controls principles and concepts,	
		design and implementation of imported	
		food controls)	
8.	11.30 – 12.00	Presentation 4: Basic concept of risk	Masami Takeuchi
		analysis framework for food safety in the	
		context of imported food control	
9.	12.00 - 13.00	Lunch	
10.	13.00 - 14.00	Presentation 5 : Good importing practices	Masami Takeuchi
		(Examples from Australia, New Zealand	Gokce Akbalik
		and United Kingdom)	
11.	14.00 - 15.00	Discussion session 1 : Model study: what	All
		would be suitable for Nepal?	
12.	15.00 - 15.30	Tea/coffee break	
13.	15.30 - 15.50	Presentation 6: Sites for imported food	Ganesh Dawadi
		control in Nepal and the stakeholder	
		analysis and currently required	
		documentations	
14.	15.50 - 16.30	Working group activity 1: Roles and	
		responsibilities of the stakeholders	
15.	16.30 - 17.00	Reporting back of WG 1	Compilation done by
			Ganesh Dawadi
16.	17.00 – 17.15	Wrap up of Day 1	Masami Takeuchi
	•	•	

Thursday 14 September 2017

Thatsady 11 September 2017			
#	Time	Agenda item	Note
17.	08.45 - 09.00	Presentation 7: Instruction for the	Gokce Akbalik
		working group activity 2: review of the	
		document / info	
18.	09.00 - 09.30	Working group activity 2: review of the	
		document / information requirement in	
		Nepal	
19.	09.30 - 10.00	Reporting back of WG2	
20.	10.00 - 10.30	Tea/coffee break	

21.	10.30 - 10.45	Presentation 8: Instruction for the	Masami Takeuchi
		working group activity 3: Risk	
		categorization	
22.	10.45 – 11.30	Working group activity 3: Nepalese food	
		safety situation: risk categorization	
23.	11.30 - 12.00	Reporting back of the WG 3	WGs
24.	12.00 - 13.00	Lunch	
25.	13.00 - 13.30	Discussion session 2 : risk categorization	All
26.	13.30 - 13.45	Presentation 9: Information	Gokce Akbalik
		exchange/communication	
27.	13.45 – 15.00	Presentation 10: Risk management	Masami Takeuchi
		actions	
28.	15.00 - 15.30	Presentation 11 : Situation report – what	Ganesh Dawadi
		is happening in Nepal (pre-border	
		controls, Border controls and Post-	
		border/in-country controls)	
29.	15.30 – 17.00	Working group activity 4: Identifying	WGs
		challenges and issues in Nepal in pre-	
		border controls, border controls and	
		post-border/in-country controls	
		(include tea/coffee break)	

Friday 15 September 2017

#	Time	Agenda item	Note
30.	09.00 - 10.00	Reporting back of WG 4	WGs
31.	10.00 - 10.30	Tea/coffee break	
32.	10.30 - 11.30	Working group activity 5: Suggested	WGs
		activities and recommendations	
		addressing the challenges/issues	
		identified during the working group	
		activity 4	
33.	11.30 – 12.00	Reporting back of the WG 5	WGs
34.	12.00 - 13.00	Lunch	
35.	13.00 - 14.00	Presentation 12: Legal and institutional	Gokce Akbalik
		frameworks and the importance of taking	
		a One Health approach	
36.	14.00 - 15.00	Presentation 13: Legal and institutional	Ganesh Dawadi
		frameworks in Nepal	
37.	15.00 - 15.30	Tea/coffee break	
38.	15.30 - 16.00	Discussion session 3 : Desired inter-	All
		agency coordination and collaborations	
		with stakeholders	
39.	16.00 - 16.45	Working group activity 6: Reviewing a	All
		flow chart and identifying the One Health	
		opportunities	
40.	16.45 – 17.00	Wrap up of Day 2	

Saturday 16 September 2017

#	Time	Agenda item	Note
41.	09.00 - 10.00	Presentation 14: Support functions	Gokce Akbalik
		(central management, scientific	
		support, inspection support,	
		legal/administrative supports)	
42.	10.00 - 10.30	Tea/coffee break	
43.	10.30 - 11.30	Discussion session 4: Nepalese	All
		situation on support functions	
44.	11.30 - 12.00	Presentation 15: Recommendations	Ganesh Dawadi
		and possible roadmap	
45.	12.00 - 13.00	Lunch	
46.	13.00 - 14.00	Discussion session 5 : Towards	
		agreement on follow up actions	
47.	14.00 – 14.30	Post-workshop questions	All
48.	14.30 - 15.00	Summary of the outcome	Ganesh Dawadi
49.	14.30 - 15.00	Closing session	
		Government of Nepal	
		FAOR Nepal	
50.	15.00 - 15.30	Tea/coffee and adjourn	

Annex 2: List of participants

Special guests

Keshav Prasad Premy Joint Secretary Ministry of Livestock Development premi_np@yahoo.com

Sanjeev Kumar Karn
Director General
Department of Food Technology and Quality
Control
skkarn@dftqc.gov.np

Roshika Shrestha Veterinary Doctor Department of Livestock Services roseeka7@gmail.com

Participants

Sanjay Bhandari Regional Food Technology and Quality Control Office, Biratnagar sanjaybrt2000@yahoo.com

Madan Kumar Chapagai Department of Food Technology and Quality Control, Babarmahal umchapagai@gmail.com

Bimal Kumar Dahal Department of Food Technology and Quality Control, Babarmahal bimaldahal16@yahoo.com

Santosh Dahal
Department of Food Technology and Quality
Control, Babarmahal
snt_dhl@yahoo.com

Suman Dhital
Department of Food Technology and Quality
Control, Babarmahal
dhital8081@gmail.com

Shishir Bahadur Gautam Customs Agent Association uttarason@gmail.com Renu Adhikari
Deputy Director General
Department of Agriculture
radhikari07@yahoo.com

Matina Joshi Baidya
Deputy Director General
Department of Food Technology and Quality
Control
mjoshi@dftqc.gov.np

Kiran Ghimire
National Plant Quarantine Programme,
Harihar Bhawan
Kiran.ghimire17@gmail.com

Anup Halwai Regional Food Technology and Quality Control Office, Hetauda anuphalwai@gmail.com

Rabindra Jha
Regional Food Technology and Quality Control
Office, Biratnagar
Rabindrajha21@gmail.com

Nirat Katuwal Regional Food Technology and Quality Control Office, Bhairahawa nirat1990@gmail.com

Bishnu Mani Khanal Customs Agent Association khanalbisnumani@yahoo.com

Basu Khatiwada Consumer Rights Nepal, Makawanpur bpkhatiwada@gmail.com Pragan Manandhar Nepal Chamber of Commerce nilimamanandhar@yahoo.com

Mohan Krishna Maharjan Departent Food Technology and Quality Control, Babarmahal mkmaharjan@gmail.com

Bhim Prasad Pulami
Department of Food Technology and Quality
Control, Babarmahal
Bhimpulami78@gmail.com

Pushpa Lal Rai Regional Food Technology and Quality Control Office, Biratnagar rai.anmol2011@gmail.com

Shashidhar Sedhai Vet. Standards and Drug Administration office, Budhanilakantha sedhaishashidhar@yahoo.com

RESOURCE PERSONS

Ganesh Dawadi FAO Nepal, Kathmandu ganesh.dawadi@fao.org

FAO SECRETARIAT

Arjun Singh Thapa Programme Officer, FAO-Nepal <u>Arjun.Thapa@fao.org</u>

Masami Takeuchi Food Safety Officer FAO Regional Office for Asia and the Pacific Masami.takeuchi@fao.org

Gokce Akbalik
Junior Food Safety Consultant
FAO Regional Office for Asia and the Pacific
Gokce.akbalik@fao.org

Kshitij Shrestha Department of Food Technology and Quality Control, Babarmahal kstha2000@gmail.com

Jyotsna Shrestha Regional Food Technology and Quality Control Office, Nepalganj jyotsnastha@yahoo.com

Navin Prasad Shrestha National Consumers Forum Anamnagar, Kathmandu npshrestha@gmail.com

Ram Nandan Tiwari Central Animal Quarantine Office, Harihar Bhawan tiwarinlbc@gmail.com

Durga Das Ulak Department of Health durgadulak@gmail.com

Damodar Sedai
Former Joint Secretary
Ministry of Agricultural Development
Presently, Adjunct Professor at
Purbanchal University
Himalayan College of Agricultural
Sciences & Technology
dsedai56@gmail.com

Recommended readings

CODEX Documents

Codex Guidelines for import food control systems

http://www.fao.org/fao-who-codexalimentarius/sh-

proxy/en/?lnk=1&url=https%253A%252F%252Fworkspace.fao.org%252Fsites%252Fcodex%252FStandards%252FCAC%2BGL%2B47-2003%252FCXG_047e.pdf

Principles and guidelines for national food control systems

http://www.fao.org/input/download/standards/13358/CXG 082e.pdf

Principles and guidelines for the exchange of information between importing and exporting countries to support the trade in food

http://www.fao.org/fao-who-codexalimentarius/sh-

proxy/en/?lnk=1&url=https%253A%252F%252Fworkspace.fao.org%252Fsites%252Fcodex%252FStan dards%252FCAC%2BGL%2B89-2016%252FCXG 89e.pdf

Principles and Guidelines for Monitoring the Performance of National Food Control Systems

http://www.fao.org/fao-who-codexalimentarius/sh-

<u>proxy/en/?lnk=1&url=https%253A%252F%252Fworkspace.fao.org%252Fsites%252Fcodex%252FStan</u> dards%252FCAC%2BGL%2B91-2017%252FCXG 091e.pdf

Other FAO Publications

Risk Based Imported Food Control Manual

http://www.fao.org/documents/card/en/c/caec22a2-b63d-4c27-861d-dd75788ec1d1/

Food safety risk analysis – A guide for national food safety authorities http://www.fao.org/docrep/012/a0822e.pdf

FAO/WHO guide for application of risk analysis principles and procedures during food safety emergencies

http://www.fao.org/docrep/014/ba0092e/ba0092e00.pdf