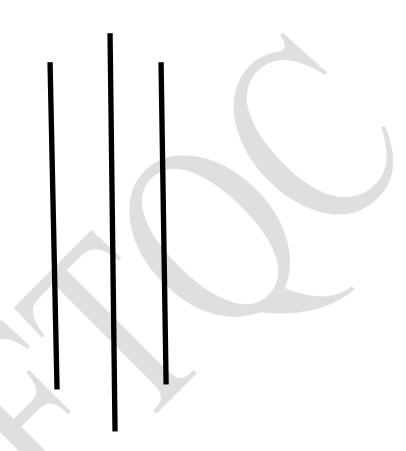
ANNUAL BULLETIN

2072/73 (2015/16)





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Preface

This Annual Bulletin IS regular publication of the Department of Food Technology and Quality Control. It provides information on various food and feed related activities accomplished during the fiscal year 2072/73 (2015/16) by this department. It includes the activities on enforcement of Food Act -2023, Food Regulation -2027, Feed Act -2033 ,Feed Regulation-2041, food and feed related analysis through laboratory services, food technology research and development, training to food entrepreneurs and various nutrition related activities.

The purpose of this publication is to disseminate as well as familiarize the role and the activities undertaken by this department. It also helps create awareness about food adulteration situation in the market. With this, consumer may be benefited for their right of food in the market for their health and nutritional well-being.

I hope this publication will be helpful not only to those who are related to food researches but to all consumers, civil societies interested in food safety, quality, technology and nutrition including all other related stakeholder.

This bulletin is the outcome of the efforts made by all staff members of the department. I would like to thank all the staff members of this department including all the editorial board members: Mr Gyanandra Prasad Mandal, Madan Kumar Chapagain, Ananda Kumar Chalise, Mr Kashi Nath Ghimire, Dashu Ram Chapagain, Dr. Susmita Gautam and Subash Chandra Osti and Ashok Gautam for assist the compilation of data and especially the coordinator Mr Nawa Raj Dahal and the member secretary Mr Kashi Nath Ghimire for their untiring efforts in bringing out this publication in this get up.

.....

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Executive Summary

In the fiscal year 2072/73 B.S. (2015/16 A.D.), Department of Food Technology and Quality Control has accomplished the following targets as per the approved annual program:

- In this fiscal year, in total 2120 food and feed samples were collected as per the Food and Feed Acts during market inspection of 43 different districts from the Quality Control Division under this department, 5 regional offices and 20 food inspection units. Among them samples were found to be substandard, which is 10% of total collected samples.
- In this year, 206 cases were filed to the respective District Administration Offices who has violated the provisions of Food Acts and Regulation.
- As a surveillances visit and monitoring, food/feed industries were inspected 1137 times, and suggestions were given to improve the safety and hygienic condition of those industries.
- Altogether 1812 times different hotels/restaurants/sweet shops were inspected and provided guideline and suggestion to improve the sanitation and hygiene.
- A total number of 1267 licenses of food/feed industries were renewed and 329 new licenses were issued.
- A total number of 33,043 food/feed samples (excluding 215 samples for nutritional composition) were analyzed at various laboratories of this department.
- Altogether 20 post harvest trial studies were conducted at this department including the regional offices. Three research programs were conducted at the Central Food Laboratory.
- A total number of 32 training programs with varying duration on different food processing technology packages were organized, where 676 possible entrepreneurs participated.
- Total 14 training programs on Food and Nutrition were organized by National Nutrition Programs and RFTCQOs. A total number of 305 participants were trained.

- Nutritional and public awareness programs were developed and disseminated for mass communication through radio, and Television.
- A total amount of NRs. 20,065,310.00 (NRsTwenty million sixty five thousand three hundred ten rupees) was collected as revenue by providing different services, mainly laboratory testing services, from this department.
- Central Food Laboratory has developed necessary documents as required by ISO 17025. Quality Policy and Objectives were developed and kept in place. In house and abroad trainings were provided to Lab personnel covering GCMS, HPLC, AAS, documentation, proficiency testing and housekeeping.

Introduction

Background

Department of Food Technology and Quality Control (DFTQC) is one of the four departments under the ministry of Agriculture and cooperatives (MOAC) of Government of Nepal (GON). It was established in 1961 A.D. as the Department of Food in Singh Durbar, which later in 1965 was sifted to the present location of Barbar Mahal, Kathmandu. In 1966, the name Department of Food was renamed as Food Research Laboratory. It became Central Food Research Laboratory in 1980 and the most of the time of its history existed with this name. In the year 2000, the Central Food Research Laboratory was given the name "Department of Food Technology and Quality Control (DFTQC)" and became the fourth department under the Ministry of Agriculture and Cooperatives. From the very beginning, DFTQC has devoted its efforts for ensuring the availability of safe, quality and nutritious food to Nepalese people through a number of activities in the area of food quality control, development and dissemination of food processing technologies as well as food and nutrition programs. As mandated by the Government of Nepal, DFTQC is the sole government agency to execute the food and feed acts and regulations in the country.

Vision

Ensure the availability of wholesome, safe and nutritious food for all Nepalese

Mission

Execution of laws and regulations and education / awareness to producers, traders and consumers in partnership with government agencies, industries, farmers and consumer associations

Goal

DFTQC has the following three major goals

- Ensure the safety and quality of food supply in the market
- Promote food processing industries by developing and disseminating appropriate technologies
- Improve the nutritional status of Nepalese people

Objectives

The following are the main objectives of the department

- Reduce the incidence of hazards (adulteration) related to food/feed
- Facilitate the national/international trade related to food and agriculture
- Reduce the post harvest loss through the development and dissemination of appropriate processing/preservation technologies
- Increase the establishment of small scale food industries
- Improve the knowledge, attitude and practice of consumers on food safety, quality and nutrition

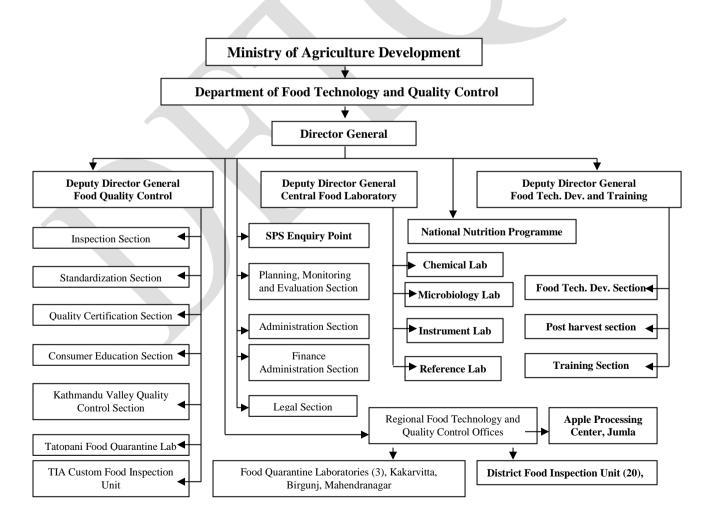
• Improve the food consumption status of Nepalese people in general and of vulnerable groups and communities.

Human Resource

DFTQC has a total number of 237 staff members including experts having advanced education from local as well as foreign universities in the field of food technology, nutrition, chemistry, botany and others.

Organizational Structure

Under the department, there are currently Two Divisions (Food Quality Control Division and Food Technology Development and Training Division), One Central Food Laboratory, One National Nutrition Programme, One SPS National Enquiry Point, 5 Regional Offices (Biratnagar, Hetauda, Bhairahawa, Nepalganj and Dhangadhi), 4 Food Quarantine Laboratories (Kakarbhitta, Birgunj, Mahendranagar and Tatopani); One Trivuwan International Airport Custom Inspection unit; 20 District Food Inspection Units (Jhapa, Sunsari, Saptari, Siraha, Udayapur, Dhanusha, Mahottari, Sarlahi, Chitawan, Parsa, Rautahat, Tanahu, Kapilbastu, Nawalparasi, Kaski, Dang, Bardiya, Surkhet and Kanchanpur) and One Apple Processing Unit (Jumla). The Existing structural network of the department is as follwing:



Annual Progress Report F/Y : 2072/73 (2015-16 AD)

1. Food Quality Control Program

Department of Food Technology and Quality Control has implemented following major programs in this fiscal year as an effort of enforcing food safety and quality control as well as consumer awareness.

The main programs were as follows:

- 1. Food/feed inspection
- 2. Food industry licensing
- 3. Development of new food standard
- 4. Consumer awareness campaign
- 5. Export/import certification

1.1. Market Inspection and Legal Action

Food markets, supermarkets and food/feed industries were inspected and samples were collected as per food/feed legislation. Altogether 2120 food samples were formally collected during inspection from 41 districts. The details of sample collection are given in Tables 1, 2, 3, and 4. The district wise sample collection is given in Annex 1. On the basis of total collected samples throughout the country, 10.0% of the total samples were found to be not complying with the standards; whereas 206 numbers of cases were filed.

| S.N. | Office | Total samples | Non-compliance (No) | Non-compliance (%) |
|------|----------------------------|------------------|------------------------|-----------------------|
| 1 | QCD, Kathmandu | 551 | 105 | 19.0 |
| 2 | RFTQCO, Biratnagar | 304 | 32 | 11.0 |
| 3 | RFTQCO, Hetauda | 334 | 17 | 5.0 |
| 4 | RFTQC, Bhairahawa | 300 | 36 | 12.0 |
| 5 | RFTQCO, Nepalgunj | 300 | 11 | 4.0 |
| 6 | RFTQCO, Dhangadi | 301 | 7 | 2.0 |
| 7 | Apple Processing Centre | 30 | 0 | 0.0 |
| | Total | 2120 | 208 | 10.0 |

| Table 1. Summary of Sample Collection and Situation of Standard by offices |
|--|
|--|

| S.N. | Development Region | Samples Collected | Non- compliance (No.) | Non- compliance (%) |
|-------|-----------------------------------|----------------------|-----------------------------|------------------------|
| 1 | Eastern Development Region | 304 | 32 | 10.52 |
| 2 | Central Development Region | 885 | 122 | 13.79 |
| 3 | Western Development Region | 300 | 36 | 12.0 |
| 4 | Mid-Western Development Region | 330 | 11 | 3.33 |
| 5 | Far-Western Development Region | 301 | 7 | 2.32 |
| Total | | 2120 | 208 | 9.81 |

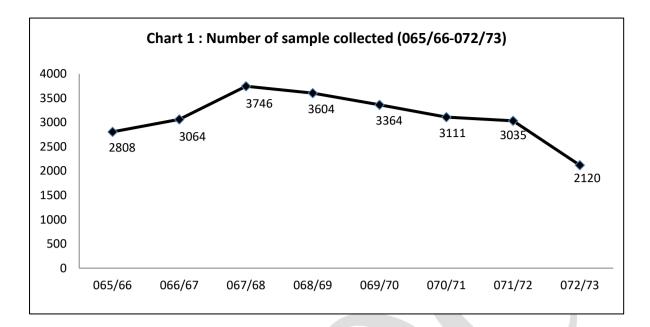
 Table 2. Summary of Sample Collection and Situation of Standard by Regions

As shown in the table 3, food group –cereals, legumes and their products were collected in the highest numbers (894) and the highest rate of non-compliance was found for the food group of processed drinking water (29.75%)

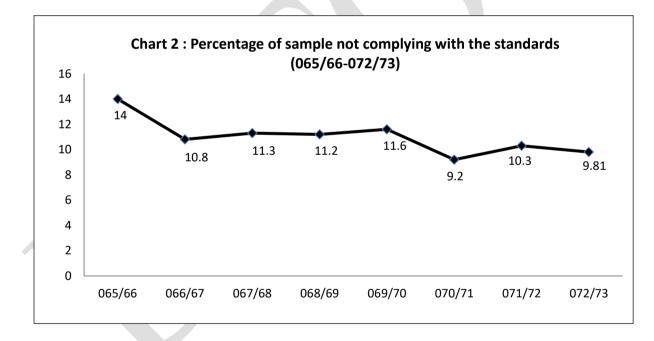
| S.N. | Food Groups | Samples | Non-compliance | Non-compliance |
|-------|-------------------------------------|-----------|----------------|----------------|
| | | Collected | (No.) | (%) |
| 1 | Processed Drinking Water | 121 | 36 | 29.75 |
| 2 | Milk and Milk Products | 141 | 34 | 24.11 |
| 3 | Fats and Oils | 253 | 32 | 12.75 |
| 4 | Salt | 24 | 0 | 0.0 |
| 5 | Cereals, legumes and their products | 894 | 53 | 5.93 |
| 6 | Sweets and Confectionaries | 95 | 3 | 1.16 |
| 7 | Fruits and Vegetables | 123 | 6 | 4.80 |
| 8 | Tea, coffee and spices | 272 | 15 | 5.51 |
| 9 | Feed | 75 | 16 | 21.33 |
| 10 | Sweetening Agents | 57 | 4 | 7.01 |
| 11 | Meat and meat products | 12 | 0 | 0.0 |
| 12 | Other food products | 53 | 9 | 16.98 |
| Total | | 2120 | 208 | 9.81 |

Table -3: Summary of non-compliance according to commodity groups

The Chart 1 shows that the trend of collection of samples in the eight fiscal years slightly changed and found declining when compared the last four fiscal years. This may be due to the focus of the development to the focus on the inspection of industries, hotel and restaurants.



As given in the Chart 2, the percentage of non-compliance in the last seven fiscal years was found in the range of 9-14; slightly declined from 14 to 9 upto seven fiscal years and this year it was slightly decreased to 9.81.



As given in the Table 4, altogether 206 cases were filed by different offices under the department.

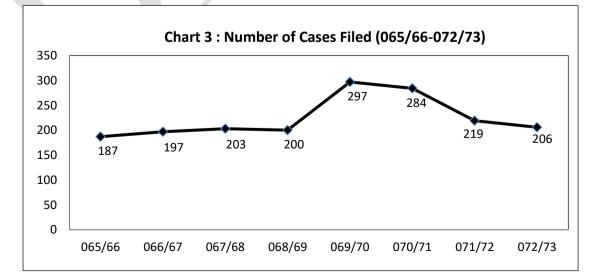
| S.N. | Office | Cases Filed (No) |
|-------|--------------------|------------------|
| 1 | QCD, Kathmandu | 54 |
| 2 | RFTQCO, Biratnagar | 11 |
| 3 | RFTQCO, Hetauda | 101 |
| 4 | RFTQC, Bhairahawa | 9 |
| 5 | RFTQCO, Nepalgunj | 13 |
| 6 | RFTQCO, Dhangadi | 18 |
| Total | | 206 |

Table-4: No of Cases Filed by Offices

As shown in the Table 5, 206 cases were filed during this fiscal year on the basis of commodity group. The detail of case filed is given in Annex 2.

Table-5: Cases Filed by Commodity Groups

| S.N. | Food Groups | Cases Filed (No.) |
|-------|-------------------------------------|----------------------|
| 1 | Fats and Oils | 55 |
| 2 | Cereals, legumes and their products | 37 |
| 3 | Processed Drinking Water | 26 |
| 4 | Sweets and Confectionaries | 6 |
| 5 | Milk and Milk Products | 23 |
| 6 | Tea, coffee and spices | 18 |
| 7 | Fruits and Vegetables | 12 |
| 8 | Salt | 0 |
| 9 | Feed | 3 |
| 10 | Sweetening Agents | 2 |
| 11 | Other food products | 24 |
| Total | | 206 |



1.2 Industry Inspection

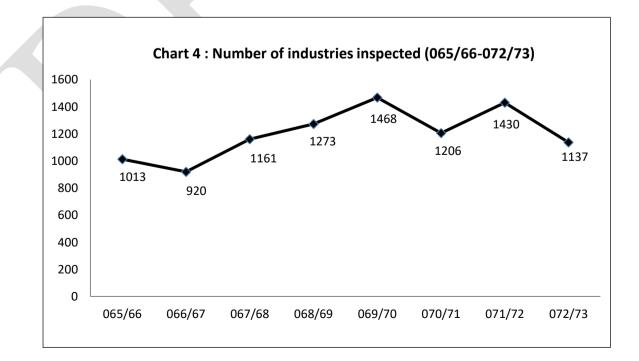
Altogether **1137** inspections were made in food and feed industries under the program of food and feed industry inspection. Industry inspections were made focusing on:

- ✓ Industry licensing and renewing
- ✓ Product packaging and labeling
- ✓ Premises and surrounding environment of industry
- ✓ Processing technology and processing flow chart
- ✓ Production plant condition
- ✓ Ingredients and additives used
- ✓ Storage condition of raw and finished products
- ✓ Good manufacturing practices and Good hygienic practices

Necessary suggestions for improvement in safety and quality product were given to owner and technical personnel.

Table- 6. Summary of Industry Inspection

| S.N. | Office | Industries Inspected |
|-------|-------------------------|----------------------|
| 1 | QCD, Kathmandu | 247 |
| 2 | RFTQCO, Biratnagar | 140 |
| 3 | RFTQCO, Hetauda | 222 |
| 4 | RFTQC, Bhairahawa | 265 |
| 5 | RFTQCO, Nepalgunj | 229 |
| 6 | RFTQCO, Dhangadi | 60 |
| 7 | Apple Processing Centre | 3 |
| Total | | 1137 |

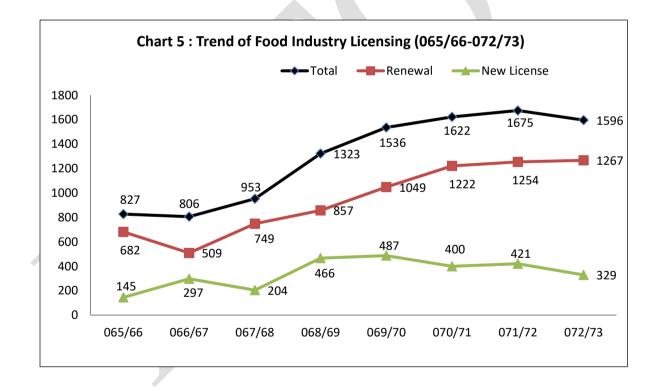


1.3 Food Industry Licensing

All food / feed industry is liable to be issued a license on behalf of DFTQC as per food and feed law. The issued license is to be renewed annually. Altogether 329 new licenses were issued and 1267 licenses were renewed during this fiscal year.

| S.N. | Office | New Issue (No.) | Renewal (No.) | Industry Recommendation | Total (No.) |
|------|--------------------|--------------------|------------------|----------------------------|-----------------|
| 1 | QCD, Kathmandu | 63 | 421 | 221 | 705 |
| 2 | RFTQCO, Biratnagar | 61 | 247 | 159 | 467 |
| 3 | RFTQCO, Hetauda | 48 | 185 | 100 | 333 |
| 4 | RFTQC, Bhairahawa | 65 | 157 | 201 | 423 |
| 5 | RFTQCO, Nepalgunj | 57 | 148 | 84 | 289 |
| 6 | RFTQCO, Dhangadi | 35 | 109 | 45 | 189 |
| | Total | 329 | 1267 | 810 | 2406 |

Table-7: Situation of Licensing and Recommendation of food industries



1.4 Food Export Import Inspection and Certification

In this fiscal year, a total number of 25,290 samples were analyzed for export/import certification. The detail of the samples analyzed is given in Table.

| S.N. | Office | Number of Samples | | |
|------|------------------------------------|-------------------|--|--|
| 1 | TIA Inspection Unit | 993 | | |
| 2 | RFTQCO, Biratnagar | 2511 | | |
| 3 | RFTQCO, Hetauda | 4 | | |
| 4 | RFTQCO, Bhairahawa | 8155 | | |
| 5 | RFTQCO, Nepalgunj | 4229 | | |
| 6 | RFTQCO, Dhangadhi | 1831 | | |
| 7 | Food Quarantine Lab, Kakadvitta | 1886 | | |
| 8 | Food Quarantine Lab, Birgunj | 5293 | | |
| 9 | Food Quarantine Lab, Tatopani | 83 | | |
| 10 | Food Quarantine Lab, Mahendranagar | 305 | | |
| | Total | 25,290 | | |

Table -8 : Samples analyzed for import/export inspection and certification

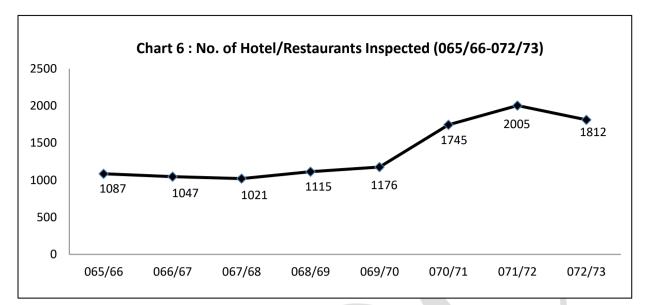
1.4 Markets, Hotels, Restaurant and Sweet Shop Inspection

In this fiscal year 2072/73, altogether 1812 market, hotel, restaurants and sweetshops were inspected by different offices as given in Table.

Table-9: Hotel, Restaurant and Sweet Shop Inspection

| S.N. | Office | Total Inspections |
|------|-------------------------|-------------------|
| 1 | QCD, Kathmandu | 210 |
| 2 | RFTQCO, Biratnagar | 517 |
| 3 | RFTQCO, Hetauda | 382 |
| 4 | RFTQC, Bhairahawa | 134 |
| 5 | RFTQCO, Nepalgunj | 239 |
| 6 | RFTQCO, Dhangadi | 312 |
| 7 | Apple Processing Centre | 18 |
| | Total | 1812 |

As shown in Chart 6, the number of hotels, restaurants and sweet shops inspected has increased significantly up to last seven year but during this fiscal year it is slightly decreased.



1.5 Highway Hotel/Restaurant Inspection and Standardization

In this fiscal year, 205 hotels and restaurants at highways were inspected and standardized and provided with different color stickers according to their grades. The detail of the standardization is given in the table below.

Table-10: Hotel Restaurant Sticker

| S.N. | Location | Total | Category | | | Remarks |
|------|--------------------|-----------|-----------|--------|-----|---------|
| | | Inspected | Excellent | Medium | Low | |
| 1 | Itahari, Sunsari | 46 | 14 | 25 | 7 | |
| 2 | Biratnagar, Morang | 112 | 16 | 63 | 33 | |
| 3 | Kohalpur, Banke | 47 | 9 | 11 | 27 | |
| | Total | 205 | 39 | 99 | 67 | |

1.6 Joint Monitoring (Rapid Response Team)

In this fiscal year, markets, industries and shops were inspected 535 times in the modality of joint monitoring with the involvement of local administration, government agencies, consumer groups, journalists etc. The detail of the standardization is given in the table below.

Table-11: Joint Monitoring in the Rapid Response Team

| S.N. | Office | Total Inspection |
|------|--------------------|------------------|
| 1 | QCD, Kathmandu | 52 |
| 2 | RFTQCO, Biratnagar | 447 |
| 3 | RFTQCO, Hetauda | 23 |
| 4 | RFTQC, Bhairahawa | 23 |
| 5 | RFTQCO, Nepalgunj | 21 |
| 6 | RFTQCO, Dhangadi | 7 |
| | Total | 535 |

Consumer awareness

The information education and communication materials were disseminated in total of 1017 times through FM, radios and Television. The detail is given in the table below:

| S.N. | Office | Total dissemination (Times) |
|------|--------------------|---------------------------------|
| 1. | DFTQC ,Kathmandu | 232 |
| 2. | RFTQCO, Biratnagar | 365 |
| 3. | RFTQCO, Hetauda | 90 |
| 4. | RFTQC, Bhairahawa | 90 |
| 5. | RFTQCO, Nepalgunj | 90 |
| 6. | RFTQCO, Dhangadi | 90 |
| 7. | APC, Jumla | 30 |
| 8. | FQL, Kakadvitta | 15 |
| 9. | FQL, Birgunj | 15 |
| 10. | FQL, Tatopani | 15 |
| 11. | FQL, Mahendranagar | 15 |
| | Total | 1017 |

Table-12: Consumer Awareness message dissemination

2 Laboratory Analysis of Food/ Feed

2.2 Analysis of Food/Feed

Central food laboratory, regional food laboratories and food laboratories at customs points perform laboratory analysis of food/feed for various purposes such as:

- Compliance of Food and Feed Act/ Regulation
- Standardization
- Licensing (Issue and renewal)
- Certification
- Requested and complaint samples
- Others

In the fiscal year 2072/73, a total number of **33,043** samples were analyzed for various purposes and 473 (1.43%) samples didn't meet the prescribed standards. The analytical results according to different laboratories are given in the table below.

| S.N. | Laboratory | Total samples | Non- compliance | Non- compliance |
|-------|---------------------------------------|------------------|--------------------|--------------------|
| | | analyzed | (No.) | (%) |
| 1 | CFL, Kathmandu | 3160 | 314 | 9.9 |
| 2 | RFTQCO, Biratnagar | 3424 | 50 | 1.46 |
| 3 | RFTQCO, Hetauda | 2151 | 96 | 0.78 |
| 4 | RFTQCO, Bhairahawa | 9142 | 48 | 0.52 |
| 5 | RFTQCO, Nepalgunj | 4926 | 11 | 0.22 |
| 6 | RFTQCO, Dhangadhi | 2640 | 20 | 0.75 |
| 7 | Food Quarantine Lab, Kakadvitta | 1886 | 1 | 0.05 |
| 8 | Food Quarantine Lab, Birgunj | 5296 | 1 | 0.01 |
| 9 | Food Quarantine Lab, Tatopani | 83 | 7 | 8.43 |
| 10 | Food Quarantine Lab, Mahendranagar | 305 | 4 | 1.32 |
| 11 | Apple Processing Centre, Jumla | 30 | 0 | 0 |
| Total | | 33,043 | 473 | 1.43 |

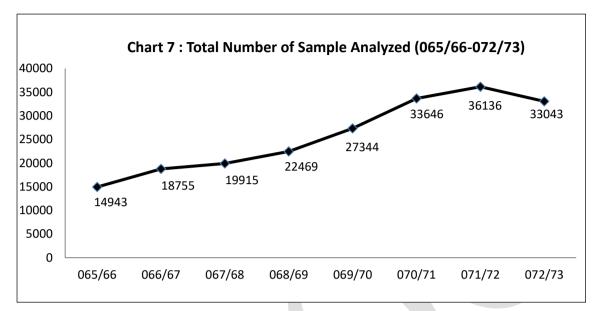
 Table -13 : Summary of Laboratory Analysis of Food and Feed Samples

As shown in Table 14, the highest number of samples analyzed was for the food group cereals, pulses and their products, while the non-compliance percentage of food samples analyzed in the laboratory was found to be highest for processed drinking water followed by milk and milk products.

| S.N. | Food Groups | Total Samples Analyzed | Sub- Standard (No.) | Sub- Standard (%) |
|-------|---------------------------------|---------------------------|---------------------------|-------------------------|
| 1 | Processed Drinking Water | 864 | 130 | 15.04 |
| 2 | Sweetening Agent | 700 | 6 | 0.86 |
| 3 | Sweets & Confectionary | 1647 | 24 | 1.46 |
| 4 | Salt | 24 | 0 | 0 |
| 5 | Milk & Milk Products | 1540 | 100 | 6.50 |
| 6 | Tea & Coffee | 444 | 9 | 2.02 |
| 7 | Fruits & Vegetable Products | 1427 | 31 | 2.17 |
| 8 | Fats & Oil | 5190 | 40 | 0.77 |
| 9 | Feed and Feed Ingredients | 289 | 22 | 7.61 |
| 10 | Spices & Condiments | 899 | 5 | 0.56 |
| 11 | Cereal, Pulses & their products | 16158 | 64 | 0.40 |
| 12 | Meat and Meat Products | 271 | 3 | 1.11 |
| 13 | Other Food Products | 3590 | 39 | 1.08 |
| Total | | 33043 | 473 | 1.43 |

Table 14. Summary of Laboratory Analysis according to Commodity Groups

As shown in Chart 7, the total number of samples analyzed in the laboratories under the department has more than doubled in the last seven fiscal year.



3 Food Technology Development & Training

In the fiscal year 2072/073, the following activities were conducted at the Food Technology Development and Training Division as well as 5 regional offices under the department.

- Product Development and Trail Study
- Food Processing Skill Training
- Consultancy Services

3.1 Product Development and Trail Study

The various studies conducted under the product development and trial study and their respective outcome are given in the table below:

| S.N. | Name of the study | Conducted by |
|------|--|---------------------------------|
| 1 | Preparation of Syrup and Jelly from Ground Apple | DFTQC |
| 2 | Formulation of Cereal Bars from Different Cereals and Binders | DFTQC |
| 3 | Preparation of Ginger Paste and its Shelf-life Study | DFTQC |
| 4 | Product Development and Shelf life Study of Oyster Mushroom | DFTQC |
| 5 | Preparation of Natural Fruit Lather from Different Fruits | DFTQC |
| 6 | Product Development from Germinated Wheat Grass and Barley Grass | DFTQC |
| 7 | Formulation and Development of Nutritious Soup for Lactating Mother | DFTQC |
| 8 | Formulation and Development of Nutritious Mixed Bread from Maize, Wheat, Soybean and Green Vegetables with Spices | DFTQC |
| 9 | Effect of Germination on Phytic Acid content of Amaranth Seeds | RFTQCO, Biratnagar |
| 10 | Preparation and Quality evaluation of Akabare Chilly Sauce | RFTQCO, Biratnagar |
| 11 | Preparation and Quality Evaluation of Ground Aapple Nectar | RFTQCO, Biratnagar |
| 12 | Quality Evaluation of Buckwheat Flour Incorporated Chapatti (Roti) | RFTQCO, Hetauda |
| 13 | Preparation and Quality Evaluation of Ready-to-serve Flavored Milk Fortified with Soya milk | RFTQCO, Hetauda |
| 14 | Study on the Preparation of Fresh Gundruk Pickle and its Quality Evaluation. | RFTQCO, Hetauda |
| 15 | Preservation of Plum Juice | RFTQCO, Bhairahawa |
| 16 | Preparation and Quality Evaluation of Vegetable Instant rice | RFTQCO, Bhairahawa |
| 17 | Quality Evaluation of Raw Milk Sold in Nepalgunj Market | RFTQCO, Nepalgunj |
| 18 | Preparation and Quality Evaluation of Linseed product (Tisyauri) | RFTQCO, Dhangadhi |
| 19 | Formulation of Bay-Berry Squash | RFTQCO, Dhangadhi RFTQCO, |
| 20 | 20 Formulation of Raspberry Squash | |

Table-15: Summary of Product Development and Trial Studies

3.2 Summary of Research Study Conducted

Table 16: Summary of the research study conducted for year 2072/73

| S.N. | Name of the study | Conducted by |
|------|---|--------------|
| 1. | Comparative Study of Nutritional and Physio chemical Quality of Fibre rich Bread Made From Different Composite Flours | DFTQC |
| 2. | Study on the status of food waste in restaurants of Kathmandu valley | DFTQC |
| 3. | Study on Formulation soya and maize mixed recipe | DFTQC |

3.3 Food Processing Training

In the fiscal year 2072/73, a total number of 646 (325 males and 321 females) potential entrepreneurs were trained in different aspects of food processing. The details of the trainings are given in the table below.

| | | | Number of | | |
|-------|--|------------|--------------|--------|-------|
| S.N. | Name of the training | Office | Participants | | |
| | | | Male | Female | Total |
| 1. | Food Processing Training (3 trainings) | DFTQC | 14 | 46 | 60 |
| 2. | RFTQCO (2 training) | Biratnagar | 16 | 24 | 40 |
| 3. | RFTQCO (2 training) | Hetauda | 3 | 51 | 54 |
| 4. | RFTQC (2 training) | Bhairahawa | 3 | 47 | 50 |
| 5. | RFTQCO (2 training) | Nepalgunj | 5 | 35 | 40 |
| 6. | RFTQCO (2 training) | Dhangadi | 5 | 37 | 42 |
| 7. | GMP/HACCP/ISO and Ginger, Lentil, Milk Processing Training (under NTIS/PACT Programme) (5 trainings) | DFTQC | 65 | 35 | 100 |
| 8. | AppleandFoodProcessingTraining (2 training) | Jumla | 12 | 28 | 40 |
| 9. | Quality Control Training (12 trainings) | | 195 | 55 | 250 |
| Total | Total | | | 358 | 676 |

3.4 Consultancy Service

During the fiscal year 2072/73 (2015/2016), technical consultancy services related to food processing were provided to **663** different entrepreneurs, interested individuals and organizations from different districts. Consultancy services were provided mostly on different areas of processing such as wine, sausage, sauce, stick noodles, ketchup, pickles, jam and processing of apple juice, nettle powder, plum and mushroom etc. Furthermore, technological advices were provided on preservation of orange nectar, establishment of fruits processing industries, raw milk handling and transportation (chilling centers), factory plant lay out and machinery requirements for establishment of bakery industry.

4 Food and Nutrition

The following food and nutrition activities were conducted by the National Nutrition Programme and regional offices in the Fiscal Year 2072/073 (2015/2016)

- Nutritional analysis of different non- conventional and traditional agro and forest based food
- Food and nutrition education and communication
 - Radio program preparation and dissemination
 - Radio message (Spot Ad.) preparation and dissemination
- Weaning food promotion Program
 - Research on weaning food and recipe development
 - Survey on feeding practices of childern under 2 years
- Food and nutrition training

4.1 Nutritional analysis of foods

Altogether 215 samples were analyzed for their nutrient content. Classification of analyzed samples is presented in the Table below and analysis report is given in Annex 1

| S.N. | Food items | No. of sample |
|-------|----------------------------|---------------|
| 1. | Cereals & Cereals products | 26 |
| 2. | Green and dry leafy | 15 |
| | Vegetables | |
| 3. | Salt | 140 |
| 4. | Condiments and spices | 1 |
| 5. | Feed | 1 |
| 6. | Miscellaneous foods | 32 |
| Total | | 215 |

Table 18. Types of foods analyzed for nutrient content

4.2 **Food and nutrition education and communication**

4.2.1 Food and nutrition message through radio :

Three radio spots "*Gharelu Khaja Swastha Poshilo Ra Taja*", *Esthaniya Tahama Utapadan Vayeka Khadyabastuko Upayog gari Kuposhanbata Jogaun in* Doteli language and "*Swachha, Sasto ra Poshilo Khana , Swostha Jiwanko Chahana*" were prepared and broadcasted 790 times through Kantipur , Image F.M, local F.Ms of mountain, Hill and Terai region. Food Fare Festival notice broadcasted 42 times through Hits and Valley FMs.

4.3 Food and nutrition training

All together 14 food nutrition training programs were conducted in five regional offices, which covered a wide range of food and nutrition topics participated by nurse, female health volunteers, primary health teachers etc. The detail is given in Table below:

| S.N. | Office | Number of | Participants | | |
|------|--------------------|-----------|--------------|--------|-------|
| | | training | Male | Female | Total |
| 1. | National Nutrition | 3 | 15 | 45 | 60 |
| | Program | | | | |
| 2. | RFTQCO, | 2 | 0 | 49 | 49 |
| | Biratnagar | | | | |
| 3. | RFTQCO, Hetauda | 2 | 10 | 35 | 45 |
| 4. | RFTQCO, | 2 | 1 | 49 | 50 |
| | Bhairahawa | | | | |
| 5. | RFTQCO, | 2 | 10 | 30 | 40 |
| | Nepalgunj | | | | |
| 6. | RFTQCO, | 2 | 0 | 40 | 40 |
| | Dhangadhi | | | | |
| 7. | APC, Jumla | 1 | 4 | 16 | 20 |
| | Total | 14 | 40 | 264 | 304 |

Table-19: Summary of food and nutrition training

5 SPS National Enquiry Point

The enquiry point is the single government body responsible to provide "answers to all reasonable questions" from interested countries, as well as for the provision of relevant documents.

Up to 2072/73, the following activities were accomplished:

- 26 SPS enquiry services were provided
- 1 SPS website update training
- 3 publication of Codex/OIE doucuments

Up to this fiscal year the following rules, regulations and guidelines were notified as given in the table below.

 Table- 21 : SPS notifications

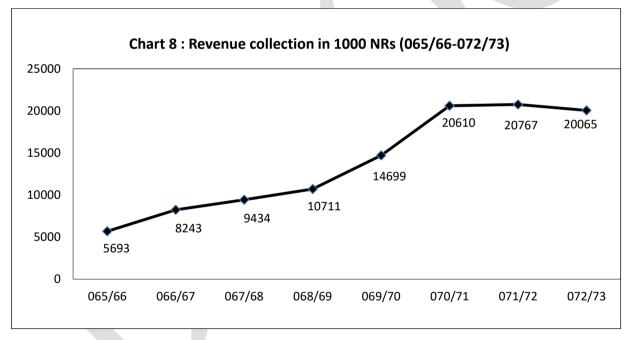
| S.N. | Notification | |
|------|---|--|
| 1. | Quarantine pest of gerbera, carnation, cauliflower | |
| 2. | Standard of Rice Bran Oil | |
| 3. | Quarantine Standards for Day Old Chicks, Table Egg | |
| 4. | Proposed quality standard for Corn flakes, Preservatives | |
| 5. | Proposed mandatory quality standard for fortified wheat flour | |
| 6. | Plant Protection Rule, 2010 | |
| 7. | Plant Protection Act, 2007 | |
| 8. | Plant Protection Act, 2007 - Extension of the comment Period (Add.) | |
| 9. | Notification regarding the establishment of animal | |
| 10. | National Plant Quarantine Pests of apple, citrus, | |
| 11. | Standards of Maize (corn), wheat, paneer, cinnamon powder and wheat flour | |
| 12. | All Products - Phytosanitary Certificate - Extension of the comment period (Add.) | |
| 13. | Directives on Export Import Inspection and Quality Certification System (Food) | |
| 14. | Brief recap of the Original Notification (Add.) | |
| 15. | Blended Edible Vegetable Oil Standard | |
| 16. | Avian influenza (bird flu) (Emergency Notification) | |
| 17. | Animal Slaughterhouse & Meat Inspection Act and Regulation | |
| 18. | Animal Quarantine Working Procedure, 2007 | |
| 19. | Animal Health & Livestock Services Act, 1998 and Regulation (Add.) | |
| 20. | All Food Products - Directives on Export-Import (Add.) | |
| 21. | Phytosanitary Certificate | |
| 22. | Processed Drinking Water/Mineral Water | |
| | | |

6 Revenue Collection

DFTQC collects revenues from services like laboratory analysis and licensing. In this fiscal year, RFTQCO, Bhairahawa has collected the highest revenue followed by FQL, Birgunj. The detail of revenue collection has been shown in **Table**.

| S.N. | Office | Revenue (NRs) |
|------|--------------------------------|------------------|
| 1 | DFTQC | 25,93,615.00 |
| 2 | RFTQCO, Biratnagar | 22,68,617.00 |
| 3 | RFTQCO, Hetauda | 12,68,040.00 |
| 4 | RFTQCO, Bhairahawa | 57,10,305.00 |
| 5 | RFTQCO, Nepalgunj | 26,94,125.00 |
| 6 | RFTQCO, Dhangadhi | 14,40,920.00 |
| 7 | Apple Processing Centre, Jumla | 17,688.00 |
| 8 | FQL, Kankadvitta | 10,07,850.00 |
| 9 | FQL, Birgunj | 29,20,200.00 |
| 10 | FQL, Tatopani | 23,200.00 |
| 11 | FQL, Mahendranagar | 1,20,750.00 |
| | Total | 2,00,65,310.00 |





7 Other Activities

7.1 National Reconstruction Authority Program

During the fiscal year 2072/073 altogether 4 food fare festivals were organized at different regions throughout the country. The main aim of the prgram was to improve food habit and to promote Nepalese traditional foods. The progam was especially focused on earthquake victimised area for sustainability of the local peaople. A detail of the program is tabulated below.

 Table 23 : Food fare festivals onganized in FY 2072/73

| S.N. | Organizing Office | Venue | Date (B.S) |
|------|--------------------|-----------------|---------------|
| 1. | DFTQC | Bhrikutimandap, | 2073-3- 10,11 |
| | | Kathmandu | |
| 2. | RFTQCO, Biratnagar | Okhaldhunga | 2073-2-21,22 |
| 3. | RFTQCO, Hetauda | Sindhuli | 2073-2-29,30 |
| 4. | RFTQCO, Bhairahawa | Lamjung | 2073-3-3,4 |

7.2 Other Projects

In this fiscal year Department of Food Technology and Quality Control conduct the following Projects:

- Government Funding Project
 - Agriculture and Food Security Project (AFSP)
 - NTIS Project
- Foreign Funding Project
 - WHO (collaborating food safety programs)
 - o IFPRI
 - UNIDO (Phase III Project) and JICA support
 - PTB Project
 - PACT Project

Detail of above project progress report was publishing separately

| S.N. | District | Samples Collected | Non- compliance (No) | S.N. | District | Samples Collected | Non- compliance (No) |
|------|--|----------------------|----------------------------|------|--------------|----------------------|----------------------------|
| 1 | Arghakhanchi | 6 | 1 | 20 | Mahottari | 51 | 1 |
| 2 | Baitadi | 13 | 0 | 21 | Makawanpur | 44 | 5 |
| 3 | Bajhang | 25 | 0 | 22 | Morang | 63 | 2 |
| 4 | Banke | 92 | 7 | 23 | Nawalparasi | 17 | 10 |
| 5 | Bara | 39 | 0 | 24 | Palpa | 12 | 0 |
| 6 | Chitwan | 95 | 9 | 25 | Parsa | 47 | 2 |
| 7 | Dadeldhura | 15 | 2 | 26 | Pyuthan | 4 | 0 |
| 8 | Dang | 126 | 3 | 27 | Routahat | 6 | 0 |
| 9 | Dhankutta | 6 | 0 | 28 | Rupandehi | 64 | 7 |
| 10 | Doti | 26 | 1 | 29 | Sankuwasabha | 11 | 0 |
| 11 | Gorkha | 5 | 0 | 30 | Saptari | 55 | 6 |
| 12 | Ilam | 8 | 0 | 31 | Sarlahi | 52 | 0 |
| 13 | Jhapa | 14 | 7 | 32 | Siraha | 37 | 3 |
| 14 | Jumla | 30 | 0 | 33 | Sunsari | 62 | 4 |
| 15 | Kailali | 98 | 3 | 34 | Surkhet | 48 | 1 |
| 16 | Kanchanpur | 124 | 1 | 35 | Tanahu | 98 | 11 |
| 17 | Kapilvastu | 8 | 1 | 36 | Terhathum | 17 | 2 |
| 18 | Kaski | 90 | 6 | 37 | Udaypur | 31 | 8 |
| 19 | Kathmandu, Dhading, Nuwakot, Sindhupalchok, Bhaktapur, Lalitpur, Kavre | | 105 | | • | - | - |

Annex -1 District wise sample collection F/Y 2072/073

| S.N. | District | Cases Filed | S.N. | District | Cases Filed |
|------|------------|-------------|------|------------|-------------|
| 1 | Banke | 8 | 12 | Kapilvastu | 2 |
| 2 | Bara | 47 | 13 | Bhaktapur | 4 |
| 3 | Chitwan | 42 | 14 | Kathmandu | 40 |
| 4 | Dadeldhura | 2 | 15 | Makawanpur | 2 |
| 5 | Lalitpur | 10 | 16 | Morang | 5 |
| 6 | Achham | 1 | 17 | Parsa | 10 |
| 7 | Dang | 3 | 18 | Rupandehi | 7 |
| 8 | Doti | 1 | 19 | Bhojpur | 1 |
| 9 | Jhapa | 3 | 20 | Bardiya | 2 |
| 10 | Kailali | 14 | 21 | Udaypur | 1 |
| 11 | Kanchanpur | 1 | | | |

Annex -2 District wise cases filed F/Y 2072/073

Annex:3

Nutrition Laboratory Food Analysis Report F/Y 2072/073

| - | | | | | • • • | 1 20/2 | | | | | | | | |
|-----|----------|--------------------------------|---------------|-------------------|----------|--------------|------------------|-----------|--------------------------|------|-----------------|-----------|-------------------|------------------------|
| S.N | Date | Samples name | Moisture % | Total Ash % | Fat % | Protein % | C. Fibre % | Carb % | Energy Kcal/ 100gm | | lodine (ppm) | P (mg) | Vit- C (mg) | Sodium Ben (ppm) |
| 1 | | Salted biscuit | 2.35 | 3.63 | 16.31 | 10.94 | ND | 66.77 | 457.63 | | | | | |
| 2 | 50 | Merogold biscuit | 1.84 | 1.49 | 9.77 | 6.71 | 0.2 | 79.99 | 434.73 | | | | | |
| 3 | 072.4.20 | Rum pum biscuit | 1.69 | 1.66 | 16.43 | 7.87 | 0.49 | 71.86 | 466.79 | | | | | |
| 4 | 02: | Fit kit biscuit | 1.66 | 2.01 | 11.21 | 5.03 | 0.59 | 79.5 | 439.01 | | | | | |
| 5 | | Coconut biscuit | 3.88 | 1.26 | 9.98 | 6.79 | 1.27 | 76.82 | 424.26 | | | | | |
| 6 | | Gyan atta | | | | | | | : | 7.89 | | | | |
| 7 | | Shahnai brand atta | | | | | | | ÷ | 6.57 | : | | | |
| 8 | | Kalpa atta | | | | | | | | 9.76 | ÷ | | | |
| 9 | | Pavitra atta | | | i | | | | | 4.42 | | | | |
| 10 | 23 | Chakki atta | | | : | | | | | 8.04 | | | | ••• |
| 11 | 072.5.23 | Hulas flour | | | | | | | | 4.29 | | | | ••• |
| 12 | 07 | Fortane chakki atta | | | : | | : | | | 3.56 | : | | | |
| 13 | | Atta | | | ÷ | : | | | | 4.15 | | | | |
| 14 | | Atta | : | | | | | | | 5.75 | | | | ••• |
| 15 | | Maida ramilo | | | | | | | | 1.35 | | | | |
| 16 | | Hulas flour | | | | | | | | 4.54 | | | | |
| 17 | _ | Liquid food for sick(FBT-1) | 79.95 | 3.78 | 0.96 | 6.26 | 0.09 | 8.96 | 69.52 | 1.02 | | 95.96 | | |
| 18 | 072.6.11 | Liquid food for sick(FBT-2) | 71.59 | 0.95 | 0.6 | 5.85 | 0.27 | 20.72 | 111.76 | 0.74 | | 90.4 | | |
| 19 | 07 | Atta multi grain | 9.8 | | 2.12 | 4.2 | | | | | | | | |
| 20 | | Sital chini ko pod | 9.78 | 7.33 | 1.31 | 7.8 | 21.3 | 52.48 | 252.91 | | | | | |
| 21 | - | Veg. pizza | 39.76 | 2.14 | 6.16 | 7.19 | | | | | | | | |
| 22 | .8.21 | Veg. pizza | 49.3 | 1.87 | 2.49 | 2.72 | | | | | | | | |
| 23 | 072 | Chicken pizza | 36.47 | 2.82 | 14.42 | 3.56 | | | | | | | | |
| 24 | | Saussage pizza | 36.11 | 1.41 | 20.18 | 4.23 | | | | | | | | |
| 25 | | Mutton pizza | 39.76 | 2.02 | 9.14 | | 0.35 | | | | | | | ••• |
| 26 | 6 | Chicken pizza | 36.91 | 3 | 11.3 | | 0.43 | | | | | | | |
| 27 | 8.2(| Cheese pizza | 37.82 | 2.34 | 9.32 | | 0.26 | | | | | | | ••• |
| 28 | 072.8.26 | Tomato pizza | 47.63 | 1.76 | 6.25 | | 0.7 | | | | | | | |
| 29 | | Mushroom pizza | 45.27 | 2.28 | 6.7 | | 0.49 | | | | | | | |
| 30 | | Cheese pizza | 48.26 | 1.8 | 6.92 | | 0.54 | | | | | | | |

| S.N | Date | Samples name | Moist ure % | Total Ash % | Fat % | Prote in % | C. Fibre % | Carb % | Energ y Kcal/ 100gm | Fe (mg) | lodin e (ppm) | P (mg) | Vit-C (mg) | Sodium Ben (ppm) |
|-----|-----------|------------------------------|----------------|-------------------|-------|---------------|------------------|-----------|------------------------------|------------|-------------------------|-----------|---------------|------------------------|
| 31 | | Mushroom pizza | 56.3 | 2.05 | 6.89 | 11.14 | 0.29 | 23.33 | 199.89 | | | | | |
| 32 | | Capsicum pizza | 58.05 | 1.98 | 3.79 | 9.8 | 0.34 | 26.05 | 177.51 | | | | | |
| 33 | 072.9.26 | Cheese pizza | 38.3 | 2.61 | 5.86 | 12.73 | 0.24 | 40.26 | 264.7 | | | | | |
| 34 | 072. | Mixed pizza | 49.07 | 2.33 | 6.54 | 13.84 | 0.28 | 27.94 | 225.98 | | | | | |
| 35 | | Veg. pizza | 43.6 | 5.1 | 3.81 | 9.84 | 0.56 | 37.09 | 222.01 | | | | | |
| 36 | | Chicken pizza | 43.25 | 2.41 | 5.69 | 15.56 | 0.17 | 32.92 | 245.13 | | | | | |
| 37 | | Veg. pizza | 51.71 | 1.85 | 5.18 | 11.76 | 0.56 | 28.94 | 209.42 | | | | | |
| 38 | 4 | Cheese pizza | 47.24 | 1.22 | 3.48 | 14.01 | 0.58 | 33.47 | 221.24 | | | | | |
| 39 | 072.10.24 | Mushroom pizza | 51.32 | 1.43 | 1.82 | 8.23 | 0.56 | 36.64 | 195.86 | | | | | |
| 40 | 72.1 | Capsicum pizza | 53.14 | 1.47 | 4.96 | 10.59 | 0.37 | 29.47 | 204.88 | | | | | |
| 41 | Ö | Mixed pizza | 49.03 | 1.77 | 5.06 | 16.73 | 0.53 | 26.88 | 219.18 | | | | | |
| 42 | | Chicken pizza | 52.18 | 1.75 | 4.96 | 11.39 | 0.33 | 29.39 | 207.76 | | | | | |
| 43 | .28 | Sitake mushroom(fresh) | 82.75 | 0.83 | 0.13 | 2.57 | 2.54 | 11.18 | 56.17 | ÷ | | | | |
| 44 | 072.10.28 | Sitake mushroom(dry) | 14.42 | 7.32 | 2.07 | 21.08 | 18.06 | 37.05 | 251.15 | | | | | |
| 45 | 0 | Biscuit | | | | | 0.48 | | | | | | | |
| 46 | | Veg.berger | 34.83 | 1.7 | 13.35 | 7.94 | 0.88 | 41.3 | 317.11 | | | | | |
| 47 | 1.9 | Spicy berger | 42.26 | 1.65 | 17.93 | 7.67 | 0.85 | 29.64 | 310.61 | | | | | |
| 48 | | Fish berger | 41.83 | 1.63 | 12.31 | 8.32 | | | | | | | | |
| 49 | | Grilled berger | 47.44 | 1.68 | 12.22 | 8.06 | 0.37 | 30.23 | 263.14 | | | | | |
| 50 | | Chicken berger | 40.47 | 1.79 | 13.61 | 7.85 | 0.23 | 36.05 | 298.09 | | | | | |
| 51 | 72.11.18 | Feed | | | | 20.67 | | | | | | | | |
| 52 | 72.12.28 | Ground apple | 86.55 | 0.41 | ND | 2.5 | 1.52 | 9.02 | 46.08 | | | | | |
| 53 | | Biscuit | 1.03 | 1.41 | | 2.48 | | | | | | | | |
| 54 | 073.1.5 | Biscuit | 0.9 | 1.43 | | 2.75 | | | | | | | | |
| 55 | | Biscuit | 0.92 | 1.46 | | 2.67 | | | | | | | | |
| 56 | | Chicken berger | 56.92 | 1.26 | 10.88 | 5.87 | 4.22 | 20.85 | 204.8 | | | | | |
| 57 | | Veg.berger | 45.2 | 2.42 | 9.65 | 3.49 | 0.72 | 38.52 | 254.89 | | | | | |
| 58 | 073.1.21 | Veg.berger | 53.57 | 2.31 | 6.07 | 4.27 | 1.29 | 32.49 | 201.67 | | | | | |
| 59 | 073.1.21 | Cheese berger | 62.99 | 3.29 | 0.87 | 7.5 | 2.55 | 22.8 | 129.21 | | | | | |
| 60 | | Veg.berger | 52.08 | 1.95 | | 5.71 | 3.2 | | | | | | | |
| 61 | | Veg.berger | 56.15 | 1.07 | 0.78 | 4.69 | 0.8 | 36.81 | 173.02 | | | | | |
| 62 | 073.1.27 | Lapsi pulp | 83.81 | | | | | | | | | | 32.49 | |
| 63 | | Fried green chilli pickle | 2.54 | 9.7 | 48.43 | 0.53 | 17.15 | 21.65 | 524.59 | | | | | |
| 64 | | Akabare pickle | 67.95 | 9.7 | 6.9 | 2.25 | 5.35 | 7.85 | 102.5 | | | | | |
| 65 | - | Dried radish pickle | 63.09 | 5.4 | 11.14 | 0.49 | 4.47 | 1 | 163.86 | | | | | |
| 66 | 073.1.28 | Hing lapsi pickle | 15.7 | 1.2 | ND | ND | 2.17 | | 323.72 | | | | | |
| 67 | - | Timur ko chhop | 5.36 | 25.5 | 13 | 2.48 | 27.49 | 26.17 | | | | | | |
| 68 | | Lapsi pickle | 46.93 | 1.1 | 0.2 | 0.55 | 1.45 | | 203.08 | | | | | |
| 69 | | Lapsi candy | 16.38 | 0.4 | ND | ND | 1.04 | | 328.72 | | | | | |
| 70 | | Mix spices pickle | 15.98 | 6.2 | 55.98 | 2.73 | 16.93 | 3.18 | 527.46 | | | | | |

| S.N | Date | Samples name | Moisture % | Total Ash % | Fat % | Protein % | C. Fibre % | Carb % | Energy Kcal/ 100gm | Fe (mg) | lodine (ppm) | P (mg) | Vit-C (mg) | Sodium Ben (ppm) |
|-----|----------|-----------------|---------------|----------------|----------|--------------|------------------|-----------|--------------------------|------------|-----------------|--------|---------------|------------------------|
| 71 | 31 | Orange juice | | | | | | | | | | | | 171.0 |
| 72 | 073.1.31 | Grape juice | | | | | | | | | | | | 175.0 |
| 73 | 07: | Soda luice | | | | | | | | | | | | 167.0 |
| 74 | .13 | Mlti grain soup | | | | | | | | | | | | |
| 75 | 73.2.13 | Sutkari soup | | | | | | | | | | | | |
| 76 | | SALT-HH3903 | | | | | | : | | | 52 | | | |
| 77 | | SALT-HH3902 | | | | | | | | | 57 | | | |
| 78 | | SALT-HH3001 | | | | | | | | | 48 | | | |
| 79 | | SALT-HH2998 | | | | | | | | | 40 | | | |
| 80 | | SALT-HH2986 | | | | | | | | | 39 | | | |
| 81 | | SALT-HH2988 | | | | | | : | | | 38 | ••• | | |
| 82 | | SALT-HH2996 | | | | | | | | | 29 | | | |
| 83 | | SALT-HH3004 | | | | | | : | | | 42 | | | |
| 84 | | SALT-HH2994 | | | | | : | : | | | 52 | | | |
| 85 | | SALT-HH2993 | | | | | | : | | | 47 | | | |
| 86 | | SALT-HH3007 | | | | | | | | : | 43 | | | |
| 87 | | SALT-HH2995 | | | | | | | | | 61 | | | |
| 88 | | SALT-HH3009 | | | ÷ | | | | | | 23 | | | |
| 89 | | SALT-HH2987 | | | | | | | | | 45 | | | |
| 90 | | SALT-HH0845 | | | | | | | | | 50 | | | |
| 91 | | SALT-HH0863 | | | | | | | | | 44 | | | |
| 92 | | SALT-HH0861 | | | | | | | | | 18 | | | |
| 93 | 27 | SALT-HH0862 | | | | | | | | | 45 | | | |
| 94 | 072.2. | SALT-HH0849 | | | | | | | | | 52 | | | |
| 95 | 07: | SALT-HH0853 | | | | | | | | | 10 | | | |
| 96 | | SALT-HH0864 | | | | | | | | | 62 | | | |
| 97 | | SALT-HH0866 | | | | | | | | | 45 | | | |
| 98 | | SALT-HH0847 | | | | | | | | | 23 | | | |
| 99 | | SALT-HH0856 | | | | | | | | | 67 | | | |
| 100 | | SALT-HH0852 | | | | | | | | | 39 | | | |
| 101 | | SALT-HH0855 | | | . | | | | | | 63 | | | |
| 102 | | SALT-HH2653 | | | | | | | | | 0 | | | |
| 103 | | SALT-HH2660 | | | | | | | | | 21 | | | |
| 104 | | SALT-HH2671 | | | | | | | | | 10 | | | |
| 105 | | SALT-HH2665 | | | | | | | | | 59 | | | |
| 106 | | SALT-HH2667 | | | | | | | | | 0 | | | |
| 107 | | SALT-HH2655 | | | | | | | | | 49 | | | |
| 108 | | SALT-HH2651 | | | | | | | | | 59 | | | |
| 109 | | SALT-HH2670 | | | | | | | | | 68 | | | |
| 110 | | SALT-HH2664 | | | | | | | | | 12 | | | |
| 111 | | SALT-HH2658 | | | | | | | | | 21 | | | |
| 112 | | SALT-HH2649 | | | | | | | | | 61 | | | |

| S.N | | Samples name | Moisture % | Total Ash % | Fat % | Protein % | C. Fibre % | Carb % | Energy Kcal/ 100gm | Fe (mg) | lodine (ppm) | P (mg) | Vit-C (mg) | Sodium Ben (ppm) |
|-----|----------|-----------------|---------------|-------------------|-------|--------------|------------------|-----------|--------------------------|------------|-----------------|-----------|---------------|------------------------|
| 113 | | SALT-HH2657 | | | | | | | | | 15 | | | |
| 114 | | SALT-HH1423 | | | | | | | | | 45 | | | |
| 115 | | SALT-HH1443 | | | | | | | | | 58 | | | |
| 116 | | SALT-HH1421 | | | | | | | | | 47 | | | |
| 117 | | SALT-HH1427 | | | | | | | | | 59 | | | |
| 118 | | SALT-HH1425 | | | | | | | | | 57 | | | |
| 119 | 072.2.27 | SALT-HH1429 | | | | | | | | | 12 | | | |
| 120 | | SALT-HH1433 | | | | | | | | | 58 | | | |
| 121 | | SALT-HH1431 | | | | | | | | | 64 | | | |
| 122 | | SALT-HH1435 | | | | | | | | | 58 | | | |
| 123 | | SALT-HH1441 | | | | | | | | | 34 | .1 | | |
| 124 | | SALT-HH1437 | | | | | | | | | 70 | | | |
| 125 | | SALT-HH1439 | | | | | | | | | 47 | | | |
| 126 | | SALT-HH3979 | | | | | | | | | 12 | | | |
| 127 | | SALT-HH3988 | | | | | | | | | 15 | | | |
| 128 | | SALT-HH3980 | | | | | | | | | 34 | | | |
| 129 | | SALT-HH1124 | | | · | | | | | | 62 | | | |
| 130 | | SALT-HH1108 | | | | | | | | | 12 | | | |
| 131 | | SALT-HH1122 | | | | | | | | | 15 | | | |
| 132 | | SALT-HH1110 | | · | | | | | | | 51 | | | |
| 133 | | SALT-HH2972 | | | | | | | | | 23 | | | |
| 134 | | SALT-HH2981 | . | | | | | | | | 58 | | | |
| 135 | | SALT-HH1120 | | | | | | | | | 13 | | | |
| 136 | | SALT-HH1129 | | | | | | | | | 54 | | | |
| 137 | | SALT-HH1116 | | | | | | | | | 10 | | | |
| 138 | | SALT-HH2968 | | | |) | | | | | 77 | | | |
| 139 | | SALT-HH2964 | | | | | | | | | 52 | | | |
| 140 | ►. | SALT-HH2977 | | | | | | | | | 48 | | | |
| 141 | 2072.3.7 | SALT-HH2965 | | | | | | | | | 41 | | | |
| 142 | 207 | SALT-HH2985 | | | | | | | | | 52 | | | |
| 143 | | SALT-HH2975 | | | | | | | | | 62 | | | |
| 144 | | SALT-HH2967 | | · | | | | | | | 38 | | | |
| 145 | | SALT-HH2712 | | | | | | | | | 17 | | | |
| 146 | | SALT-HH2715 | | | | | | | | | 25 | | | |
| 147 | | SALT-HH2706 | | | | | | | | | 15 | | | |
| 148 | | SALT-HH2717 | | | | | | | | | 0 | | | |
| 149 | 1 | SALT-HH1076 | | | | | | | | | 51 | | | |
| 150 | 1 | SALT-HH1072 | | | | | | | | | 62 | | | |
| 151 | 1 | SALT-HH1074 | | | | | | | | | 64 | | | |
| 152 | 1 | SALT-HH1080 | | | | | | | | | 65 | | | |
| 153 | 1 | SALT-HH1066 | | | | | | | | | 56 | | | |
| 154 | 1 | SALT-HH1060 | | | | | | | | | 68 | | | |
| 155 | 1 | SALT-HH1068 | | | | | | | | | 55 | | | |
| 156 | 1 | SALT-HH1078 | | | | | | | | | 68 | | | |
| 157 | | SALT-HH1082 | | | | | | | | | 15 | | | |

| S.N | | Samples name | Moisture % | Total Ash % | Fat % | Protein % | C. Fibre % | Carb % | Energy Kcal/ 100gm | Fe (mg) | lodine (ppm) | P (mg) | Vit-C (mg) | Sodium Ben (ppm) |
|-----|---|--------------|---------------|----------------|-------|--------------|------------------|-----------|--------------------------|------------|-----------------|--------|---------------|------------------------|
| 158 | | SALT-HH1064 | | | | | | | | | 68 | | | |
| 159 | | SALT-HH1962 | | | | | | | | | 71 | | | |
| 160 | | SALT-HH2452 | | | | | | | | | 68 | | | |
| 161 | | SALT-HH2434 | | | | | | | | | 58 | | | |
| 162 | | SALT-HH2438 | | | | | | | | | 65 | | | |
| 163 | | SALT-HH2450 | | | | | | | | | 66 | | | |
| 164 | | SALT-HH2433 | | | | | | | | | 62 | | | |
| 165 | | SALT-HH2444 | | | | | | | | | 63 | | | |
| 166 | | SALT-HH2447 | | | | | | | | | 66 | | | |
| 167 | | SALT-HH2453 | | | | | | | | | 70 | | | |
| 168 | | SALT-HH2446 | | | | | | | | | 66 | -1 | | |
| 169 | | SALT-HH2437 | | | | | | | | | 60 | | | |
| 170 | | SALT-HH2441 | | | | | | | | | 61 | | | |
| 171 | | SALT-HH2440 | | | | | | | | | 59 | | | |
| 172 | | SALT-HH3294 | | | | | | | | | 79 | | | |
| 173 | | SALT-HH3286 | | | | | | | | | 48 | | | |
| 174 | | SALT-HH3291 | | | ••• | | | | | | 39 | | | |
| 175 | | SALT-HH3275 | | | | | | | | | 49 | | | |
| 176 | | SALT-HH3278 | | | | | | | | | 56 | | | |
| 177 | | SALT-HH3298 | | | | | | | | | 32 | | | |
| 178 | | SALT-HH3287 | | | | | | | | | 30 | | | |
| 179 | | SALT-HH3284 | | | | | | | | | 85 | | | |
| 180 | | SALT-HH3289 | | | | | | | | | 68 | | | |
| 181 | | SALT-HH3281 | | | | | | | | | 70 | | | |
| 182 | | SALT-HH3282 | | | | | | | | | 36 | | | |
| 183 | | SALT-HH3296 | | | | | | | | | 56 | | | |
| 184 | | SALT-HH3313 | | | | | | | | | 19 | | | |
| 185 | | SALT-HH3307 | | | | | | | | | 14 | | | |
| 186 | | SALT-HH3321 | | | | | | | | | 11 | | | |
| 187 | | SALT-HH3303 | | | • ••• | | | | | | 15 | | | |
| 188 | _ | SALT-HH3308 | | | | | | | | | 0 | | | |
| 189 | | SALT-HH3311 | | | | | | | | | 13 | | | |
| 190 | _ | SALT-HH3299 | | | | | | | | | 14 | | | |
| 191 | | SALT-HH3317 | | | | | | | | | 14 | | | |
| 192 | | SALT-HH3304 | | | | | | | | | 31 | | | |
| 193 | | SALT-HH3319 | | | | | | | | | 16 | | | |
| 194 | | SALT-HH3312 | | | | | | | | | 35 | | | |
| 195 | | SALT-HH3989 | | | | | | | | | 15 | | | |
| 196 | | SALT-HH3990 | | | | | | | | | 19 | | | |
| 197 | | SALT-HH3982 | | | | | | | | | 43 | | | |
| 198 | | SALT-HH3977 | | | | | | | | | 31 | | | |
| 199 | | SALT-HH3975 | | | | | | | | | 30 | | | |
| 200 | | SALT-HH3976 | | | | | | | | | 45 | | | |
| 201 | | SALT-HH3994 | | | | | | | | | 19 | | | |
| 202 | | SALT-HH3983 | | | | | | | | | 19 | | | |

| S.N | Samples name | Moisture % | Total Ash % | Fat % | Protein % | C. Fibre % | Carb % | Energy Kcal/ 100gm | Fe (mg) | lodine (ppm) | P (mg) | Vit-C (mg) | Sodium Ben (ppm) |
|-----|--------------|---------------|----------------|-------|--------------|------------------|-----------|--------------------------|------------|-----------------|--------|---------------|------------------------|
| 203 | SALT-HH3985 | | | | | | | | | 50 | | | |
| 204 | SALT-HH2381 | | | | | | | | | 37 | | | |
| 205 | SALT-HH2367 | | | | | | | | | 60 | | | |
| 206 | SALT-HH2363 | | | | | | | | | 105 | | | |
| 207 | SALT-HH2364 | | | | | | | | | 105 | | | |
| 208 | SALT-HH2365 | | | | | | | | | 61 | | | |
| 209 | SALT-HH2375 | | | | | | | | | 51 | | | |
| 210 | SALT-HH2374 | | | | | | | | | 29 | | | |
| 211 | SALT-HH2362 | | | | | | | | | 33 | | | |
| 212 | SALT-HH2378 | | | | | | | | | 76 | | | |
| 213 | SALT-HH2366 | | | | | | | | | 59 | . 1 | | |
| 214 | SALT-HH2371 | | | | | | | | | 58 | | | |
| 215 | SALT-HH2382 | | | | | | | | | 83 | | | |

Annex:4 Scope of Department of Food Technology and Quality Control



- Department 6 Food Technology and Quality Control (1)
 Regional Office (Food Technology and Quality Control (5)
 District Level Office (1)
 District Food Inspection Unit (20) *****
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X Food Quarantine Laboratory (4) Food Inspection Unit (Tribhuvan International Airport)