



**Trade Facilitation  
Measures in Processed  
Food Trade**

Economic & Policy Analysis Directorate  
Policy Branch

October 1998



Agriculture and  
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**TRADE RESEARCH SERIES**



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## Preface

This report is part of the Trade Research Series that Agriculture and Agri-Food Canada (AAFC) is undertaking to support discussions in connection with multilateral and bilateral trade negotiations. The purpose of the series is to create an inventory of research that will make it easier for stakeholders to identify concerns, issues and opportunities associated with such discussions. The research is for the most part directed to areas in which little or no information has been circulated rather than to areas in which a broad base of literature already exists. More information on the series of Trade Research studies is available on the AAFC website [[www.agr.ca/policy/epad](http://www.agr.ca/policy/epad)], or by contacting Brian Paddock, Director of the Policy Analysis Division, Policy Branch [*e-mail: paddobr@em.agr.ca; phone: (613) 759-7439*].

This report was originally prepared as part of Canada's commitment to the Task Force on Food of the Asia Pacific Economic Cooperation (APEC). In particular, it forms part of a larger report that analyzes food processing and distribution issues among APEC economies. This report discusses trade facilitation measures and their impacts from APEC's perspective.

APEC was formed in 1989 in response to the growing interdependence among Asian-Pacific economies. (APEC is currently comprised of 18 member economies and 3 member designates.) Begun as an informal dialogue group with limited participation, APEC has since become the primary vehicle for promoting open trade and practical economic cooperation among Asian-Pacific economies. The Task Force on Food is part of this process.

While written as an APEC report, the content is information that is as relevant in a multilateral trade context as it is in a regional trade context. It is from this perspective that this report is being published as part of the Trade Research series.





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## Introduction

Trade regulatory measures such as quality standards, information regulations, customs procedures and food safety standards all can be considered trade facilitation measures. They improve the efficiency of trade by reducing the costs incurred by APEC citizens in ascertaining the safety, quality and value of products. They also can be considered trade barriers. With limitations to the application of tariffs, trade regulatory measures have an increased probability of being used for the purpose of affecting trade flow.

While some technical or regulatory services are desirable and necessary to protect APEC citizens, excessive or inappropriate such services may create inefficiencies or be counter to their well-being. Technical services may increase the costs of both goods and inputs, through their direct effects on the movement of inputs, goods and services, and their effects on industry contestability, innovation and dynamism. Further, inappropriate regulatory services may impinge on trade and reduce the degree of choice open to APEC citizens. Taking a longer view, inappropriate regulatory services may lead to a mis-allocation of natural resources, investment, and human capital. They may lead to fixed investments in value-added activities in inappropriate locations and be counter to proper environmental and resource husbandry by distorting the relative returns to different resources and commercial initiatives.

The objective of this report is to discuss trade facilitation measures and their impacts. In particular, we describe the role of customs procedures and summarize the work being done by the APEC Sub-Committee on Customs Procedures. Next, we examine briefly the impacts of labelling, quality assurance and marketing services. (Further analysis of APEC labelling issues is planned for this year (1998) by China). This is followed by a more in-depth analysis of sanitary and phytosanitary (SPS) measures. We examine the degree of harmonization of specific SPS measures among APEC economies as well as how these measures are evolving over time. From a more general perspective, we then examine the governance of food safety and quality, enumerating some of the influencing factors. Finally, we summarise our analysis and provide alternatives for possible next steps in developing policy alternatives.



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## Chapter 1: Customs Procedures

***Customs Administrations need to work with business to develop a faster, better border—one that balances goals of enforcement and public protection with goals of facilitation and competitiveness.***

***APEC-SCCP***

APEC leaders recognize the role that customs procedures and services play in either facilitating or impeding trade. As customs issues are broadly based covering all traded commodities, goods and services, a special sub-committee has been struck—the APEC Subcommittee on Customs Procedures (SCCP). The SCCP’s mandate is to deal with customs-related issues in a comprehensive manner. As agriculture and food products are perishable by nature, delays and incongruities within the supply chain can prove particularly costly. Consequently, it is appropriate to draw attention to the work of the SCCP and to raise areas of particular interest to the agriculture and food industries.

The intent of Customs Procedures and Services in general, is to protect the well-being of citizens. However, the nature of agriculture and food products is such that unnecessary delays associated with inefficiently delivered procedures and services can actually have effects counter to public well-being. Delays in the supply chain may result in both higher proportions of outright product loss as well as greater risk of food-related illness. Inefficiently delivered and drawn out customs procedures can have precisely the opposite effect on both commercial and societal well-being than intended. Conversely, credible but timely and efficiently delivered customs procedures and services are likely to have significant and positive effects on commercial and societal well-being, especially for food products.

Discussions within APEC Customs Administrations, the SCCP and elsewhere suggest several tangible benefits of improved Customs procedures. Improved customs clearance and inspection procedures are more timely, efficient, and predictable. Timeliness is important for food products in particular because it reduces carrying costs as well as lowers the likelihood of deterioration in quality or outright loss. Improvements in transparency and predictability lower the risks of engaging in trade and tend to lower costs throughout the supply chain and ultimately to consumers.

Improvements in timeliness and predictability also facilitate complimentary activities and improvements in the efficiency of the business community, encouraging “just-in-time” inventory practices and promoting business competitiveness. Computerization of customs procedures results in time and cost savings due to the reduced need to prepare, handle, store and deliver customs documentation. Taken together, the consequence of such collective action will be to lower the total time and costs in getting a product to APEC consumers, while concomitantly lowering health risks.

The Customs Administrations of APEC are searching for faster, less costly and better ways to facilitate trade and protect the well-being of their citizens. Because the results will affect business in the region, the SCCP is committed to providing a process for shaping the future customs environment of the Asia-Pacific region. The SCCP is working with APEC governments and business interests in an effort to simplify and in some instances, harmonize procedures in ways that have practical benefits. The SCCP allows scope for APEC Customs Administrations to modernize at their own pace (recognizing the varying levels of development and the differing emphasis on aspects of customs’ mandates across the region). At the same time, it attempts to provide meaningful benchmarks for measuring progress.

The SCCP’s Guiding Principles (FACTS) are as follows:

- **Facilitation:** While ensuring proper enforcement of customs laws and regulations, APEC Customs Administrations should strive to improve facilitation of customs clearance procedures.
- **Accountability:** Customs Administrations should account for their actions through a transparent and easily accessible process of administration and/or judicial review.
- **Consistency:** Customs laws, regulations, administrative guidelines and procedures should be applied in a uniform manner within each economy.
- **Transparency:** Customs laws, regulations, administrative guidelines and procedures should be publicly available in a prompt and easily accessible manner.
- **Simplification:** Customs laws, regulations, administrative guidelines and procedures should be simplified so that customs clearance proceeds without undue burden.

The SCCP suggests that, for traders to benefit fully from a certain, transparent and hassle-free trading environment, they must be assured that any changes are based solidly on the twin pillars of integrity and credibility. An operating environment where the costs of doing business are cut substantially, can only be achieved if business can trust those in authority. For APEC Customs Administrations, integrity is enhanced and credibility conferred by the fact that SCCP members enjoy the full support and commitment of their governments. This is particularly important because areas such as agriculture and food, health controls, quotas and tariff rates, often require consultation and cooperation across several ministries. Some of the APEC-SCCP’s Action Plan deliverables include:

- **Harmonization of Tariff Structure with the HS Convention:** To ensure consistency of application, certainty and a level playing field for business through the HS Convention through the standard international harmonized system (HS) for the classification of goods.

- **Transparency of Customs Procedures, including Information on Customs Laws, Regulations, Administrative Guidelines, Procedures and Rulings:** To ensure traders have all the pertinent information for business decisions through the provision of accurate, consistent and user-friendly information.
- **Simplification and Harmonization on the Basis of the Kyoto Convention:** To improve efficiency in customs clearance and the delivery of goods in order to benefit importers, exporters and manufacturers through simplified customs procedures and best practices.
- **Adoption and Support for the UN/EDIFACT:** To use the standard UN electronic messaging format for automated systems, the United Nations/Electronic Data Interchange for Administration, Commerce and Transport (UN/EDIFACT), to promote an electronic highway for business.
- **Adoption of the Principles of the WTO Valuation Agreement:** To facilitate administration of the World Trade Organization's Valuation Agreement on standard procedures for valuing goods.
- **Adoption of the Principles of the WTO Intellectual Property (TRIPS) Agreement:** To implement border enforcement procedures for protecting intellectual property rights.
- **Introduction of Clear Appeals Provision:** To provide business with an opportunity to challenge potentially erroneous or inequitable customs decisions through mechanisms for transparent, independent and timely appeals.
- **Introduction of an Advance Classification Ruling System:** To establish simplified procedures for providing classification information prior to importation, thus bringing certainty and predictability to international trading and helping traders to make sound business decisions based on legally binding advice.
- **Provisions for Temporary Importation (e.g. acceding to the A.T.A. Carnet Convention or the Istanbul Convention):** To help move goods such as commercial samples, professional equipment, tools of trade and exhibition material across borders with a high degree of certainty as to how these goods will be treated by customs by having standard procedures for admitting goods on a temporary basis.
- **Harmonization of APEC Data Elements:** To develop a comprehensive directory supported in UN/EDIFACT which includes a simplified "core set" of data elements, largely derived from commercially available data, that would satisfy the standard data requirements of the majority of APEC trade transactions and so facilitate the exchange of information and provide a foundation for common forms and electronic commerce.
- **Adoption of Risk Management Techniques:** To focus customs enforcement efforts on high-risk goods and travellers and facilitate the movement of low-risk shipments, through a flexible approach tailored to each APEC economy.

- **Adoption of Guidelines on Clearance of Express Consignments:** To implement principles contained in the WTO Guidelines, the international standard procedures for clearance of express goods, and to work in partnership with express industry associations.

As mentioned above, the delivery (or failure in the delivery) of credible and fair customs procedures and services efficiently and on a timely basis, can have a tremendous effect on the efficiency of the entire APEC food chain. This delivery has direct implications for both the economic health and well-being of APEC citizens. Consequently, initiatives which focus on timeliness and the amelioration or elimination of delays without undermining the integrity of customs procedures and services, are of particular concern to the food industry. The following are some examples:

- **Pre-approval release:** “Pre-approval” a range of low-risk goods eliminates the necessity for business to provide repetitive information on shipments.
- **Pre-arrival release:** Through the transmission of shipment information while the goods are en route, customs decides whether to examine or release the shipment prior to its arrival. This type of customs pre-clearance could greatly reduce time-related economic losses and health concerns associated with delays of perishable products.
- **Risk management:** Concentrate customs resources on areas of greatest risk and thereby provide faster and consistent service for low-risk shipments and decrease business trading costs. Targeting high-risk areas and maintaining records over time can also mean improved service for those traders with a history of good compliance.
- **Periodic verification or audit:** Periodic verification/audit assesses the level of compliance over an extended period of time rather than shipment-by-shipment reviews, and focuses on building compliance levels with clients. This shifts some of the emphasis and effort away from government enforcement and toward industry self-regulation and accountability.

In its 1996 Report to Economic Leaders, the APEC Business Advisory Council remarked that the following were involved in an average international trade transaction:

- 27 to 30 different parties,
- 40 documents,
- 200 data elements (30 of which are repeated many times) and
- re-keying of 60-70% of all data at least once.

Such a remark suggests that APEC’s efforts to involve business more fully in deliberations over trade reforms are well-founded and, if anything, should be strengthened to increase the practical content of such reforms. Even without embracing new and innovative methods, the better sharing of existing information and reduction of duplication and overlap in regulatory services will give sizable gains in both time and efficiency. The challenge, of course, is to make it so.

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## Chapter 2: Information Services and Regulations

Economic analysis has shown that markets are generally more efficient:

- the better the consumer information is,
- the more cheaply and effectively information can be conveyed,
- the easier it is for consumers to understand and discriminate between existing information, and
- the lower are the costs of choosing badly.

In the formative years of economics, participants in the market place transferred information instantly and costlessly, or so it was presumed.

We know that such a presumption was naive and now pay increasing attention to the “Economics of Information” how information is transferred, the cost of transfer, and the nature of the individuals and institutions involved in the transfer. Economic theory suggests that imperfect and asymmetrically-held information leads to one of two outcomes: either a market fails to exist for a product consumers actually desire or, the market provides lower quality products than would be optimal. Consequently, services and regulations which make information available and understandable, such as labelling, quality assurance and market information services (LAMIS), correct asymmetries and improve efficiency and well-being. LAMIS are governments’ and industries’ response to the need for information.

APEC leaders have recognized the importance of LAMIS in conveying meaningful information to consumers and other participants in the market. At the request and direction of APEC leaders, the Australian Department of Primary Industries contributed a discussion paper on labelling and related issues in 1996. The People’s Republic of China will undertake a major project in this area in 1998. In both of these undertakings, the emphasis is on “Getting Services Right”. Our role is to draw attention to initiatives already underway, as well as to highlight relevant findings from other sources.

With increasing globalization, government regulations have come under increasing scrutiny. One response to this increased scrutiny is to move away from traditional forms of regulation and toward interventions that complement, rather than mask, market functions. There is increased interest in techniques which ensure that consumers have reliable and sufficient information to protect themselves from unfair seller behaviour or questionable quality

products. LAMIS should establish a common nomenclature which leaves less room for misunderstanding between parties and thus provide a means of tracking the product through the value chain (that is, from production through to consumption). By establishing a better correspondence between agents' actions and the consequences borne therefrom, such information services increase the likelihood of self-regulation throughout the food value chain.

When appropriately designed, LAMIS serve several functions of interest to industry and consumers. They provide:

- a common language or framework which better facilitates exchange in the market.
- a payment settlement mechanism.
- as a dispute settlement mechanism, displacing (often costly) arbitration in some instances or providing a frame of reference for arbitration in others.
- a basis for product differentiation and preference-based marketing, reducing waste.
- better accountability up and down the value chain, both through official regulatory agencies and through self-regulation.

There are several areas where labelling and composition standards play a role of interest to APEC citizens, such as labelling of:

- ingredients,
- nutritional value,
- potential allergens,
- usage or processing,
- ethnic or religious concerns,
- environmental concerns,
- genetically altered or transgenic products,
- country of origin, and
- other social, health and safety concerns.

If each APEC economy maintains separate and distinct labelling and information requirements, these services impede trade. If APEC economies work together to establish a common nomenclature and consistent reporting formats, such information services will facilitate greater international and domestic trade, improving general well-being throughout the APEC region.

Moreover, if means of diagnosis and tracking are components, such information systems may lower the need for economies to invest in costly policing programs. Their presence allows the market to play a greater role in disciplining economic fraud or product misrepresentation. In other words, bureaucratic interventions can at least be partially displaced by the cumulative judgement of market participants. Few businesses would sell



suspect or substandard goods if they knew that their reputations would be ruined, as would their prospects of future sales. These systems allow consumers greater sovereignty and cast governments more as facilitators in the development of efficient transfer mechanisms for commodities, services and information.

Labelling is a critical component of the “orderly marketing” function of regulations and regulatory services. To facilitate orderly marketing, LAMIS must fulfill one or both of two functions. One, it must impart information to either buyers or consumers that is consistent across related (competing) products and of value to them. Two, it must be useful in the tracking and diagnosis of problems in the food chain. Labelling requirements and/or information which do not perform one of these two functions or which duplicate other requirements or information must be regarded as extraneous and as imposing undue additional costs in the marketing of commercial products.

The simplest case of reducing quality uncertainty is a straight-forward inspection by buyers prior to purchase. Economists call these “search” goods, distinguishing them from “experience” goods which the buyer samples or experiences. In the absence of quality assurance services, discriminating buyers must incur “search” costs in order to inspect and choose among competing heterogenous products.

The need to search a range of heterogenous goods makes competitive pricing less likely. Searching both quality and price is more costly than searching price alone. The costs of becoming an informed buyer or consumer can become prohibitive in the absence of a quality assurance service.

In the economic analysis of labelling and quality assurance systems, some dangers in practical implementation have been identified: a) quality assurance standards that are established and administered solely by and for producer groups are not likely to be socially optimal; b) if captured, such services can be used to create an exclusive club and restrict competition; c) grades/standards are most beneficial when they are relevant to buyers but not easily discerned by their visual inspection.

To be fully effective labelling, quality assurance services, and marketing information services must go hand in hand. Labelling and quality assurance services are most useful if they are well-known and convey information that is both meaningful and easily understood by buyers, sellers and consumers alike. Systems that contain extraneous or excessively complex information simply increase costs and confusion and typically result in less competitive behaviour. Likewise, even the best standards and labelling requirements are of little use and actually serve as impediments, if sellers and buyers (whether foreign or domestic) are unfamiliar with them. Conversely, widely circulated and well-designed labelling and quality assurance systems encapsulate information in a finite set of measurable characteristics, allowing the (non-specialist) consumer to make reasonably informed decisions based on previous experience with the products. One can thereby effectively limit the incidence of consumer disappointment and concomitantly increase the likelihood of consumer satisfaction, presumably the ultimate aim of any food-related quality assurance system.

LAMIS are present in all APEC economies, but manifested in different ways. The general intent of these services is to allow consumers to make informed choices and to lower the risk of fraud or misrepresentation. When implemented with care, such services facilitate trade, promote greater competition, improve accountability up and down the value chain, and lower waste and costs throughout the food sector. If combined with diagnosis and tracking

mechanisms, LAMIS also have the potential to raise the level of self regulation in the sector, reducing the need for other forms of bureaucratic intervention and regulation. Poorly designed LAMIS can have effects that are precisely to the contrary. They can impart inappropriate signals to market participants, drive up costs throughout the value chain, limit access to markets, and lower levels of general well-being. By acting collectively and with due consideration, APEC economies can ensure that LAMIS contribute positively to trade, accountability and general well-being.

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## Chapter 3: Sanitary and Phytosanitary Measures

Embracing trade liberalisation as an objective, APEC has consistently endorsed GATT principles. In the 1991 Seoul Declaration, APEC economies agreed to four specific objectives: to sustain the growth and development of the region, to enhance positive gains through increased economic interdependence, to develop and strengthen multilateral open trading, and to reduce barriers to trade in a manner consistent with GATT principles. In the Osaka Action Agenda (1995), APEC economies reiterated the importance of WTO consistency and agreed to expand and accelerate trade and investment initiatives to realize the vision of free and open trade in the region by 2010 for developed economies and 2020 for developing economies.

At present, 16 of 18 APEC economies are members of the World Trade Organization and thus are signatories to the Agreement on the Application of Sanitary Phytosanitary Measures (WTO-SPS Agreement). This agreement concerns the application of food safety and animal and plant health measures. It recognises that governments have the right to establish measures to protect human, animal and plant life and health. According to the Agreement, members should apply these measures only to the extent necessary and not use them to discriminate against other members with similar health conditions.

The WTO-SPS Agreement encourages harmonization of measures through the adoption of international standards, guidelines and recommendations. Such measures have been developed by the Codex Alimentarius Commission (Codex), the Office International des Epizooties (OIE), and organizations operating within the International Plant Protection Convention (IPPC). Members may have measures which result in a higher level of protection as determined through risk assessment. The WTO-SPS Agreement recognises that developing members with limiting resources may encounter difficulties in complying with importing members' SPS measures. With this in mind, the developing members are permitted time-limited exceptions from the Agreement's obligations.

The WTO-SPS Agreement promotes transparency of regulations by requiring members to:

- a) provide an official publication of regulations;
- b) have one entry point responsible for providing SPS documents, and procedures information; and
- c) notify other members through the WTO-SPS Secretariat of proposed changes to their measures.

The following provides a brief synopsis of the three major international organizations referenced in the WTO-SPS Agreement, Codex, OIE and IPPC.

**Codex:** The Codex Alimentarius Commission (Codex) established in 1962, is an international inter-governmental organization with the major objectives of protecting the health of consumers on a global scale and ensuring fair practices in the food trade. The Food and Agriculture Organization (FAO) and the World Health Organization (WHO) fund it jointly. Its membership consists of over 159 Countries. Sixteen of eighteen APEC economies are members of Codex (as of October 1997).

Codex provides a forum for the exchange of information and ideas relative to food quality and safety issues. It sets food standards, hygienic and technical practices and related guidelines and recommendations which countries may use both to protect consumers and to facilitate trade. Codex performs its work through committees composed of delegates from member countries. There are two types of committees: general subject committees such as Food Labelling, and commodity committees such as Fresh Fruits & Vegetables. In order for Codex to adopt a new food standard, it must proceed through an eight-step process which provides time for countries and interested parties to comment.

All standards, procedures and codes, approved by Codex, are in the following 13 volumes:

VOLUME 1A	General Requirements
VOLUME 1B	General Requirements (Food Hygiene)
VOLUME 2A	Pesticide Residues in Foods (General Texts)
VOLUME 2B	Pesticide Residues in Foods (Maximum Residue Limits)
VOLUME 3	Residues of Veterinary Drugs in Foods
VOLUME 4	Foods for Special Dietary Uses
VOLUME 5A	Processed and Quick-Frozen Fruits and Vegetables
VOLUME 5B	Fresh Fruits and Vegetables
VOLUME 6	Fruit Juices
VOLUME 7	Cereals, Pulses (Legumes) & Derived Products
VOLUME 8	Fats and Oils
VOLUME 9	Fish and Fishery Products
VOLUME 10	Meat and Meat Products & Soups and Broths
VOLUME 11	Sugars, Cocoa Products & Chocolate & Misc. Products
VOLUME 12	Milk and Milk Products
VOLUME 13	Methods of Analysis and Sampling

Codex does not identify specifically which components of the standards, guidelines or other recommendations are SPS measures. Instead its content is organized as standards, codes, guidelines and principles. In general, most Codex Code of Hygienic and Technical Practice

tend to be SPS-oriented. The actual standards are largely related to composition parameters and thus have only a marginal SPS focus. However, numerous exceptions occur. Because the WTO-SPS Agreement references Codex as a basis for establishing acceptable SPS measures, the WTO and Codex are examining means to identify Codex text which are specifically SPS-oriented. This will facilitate the administration of the WTO-SPS Agreement.

Many Codex measures are open to interpretation, making it difficult to determine equivalency or harmonization of practices among nations (economies). For example, the Recommended International Code of Practice - General Principles of Food Hygiene, Section 3, Hygiene Requirements in Production/Harvesting Area states, "food should not be grown or harvested where the presence of potentially harmful substances would lead to an unacceptable level of such substances in the food." What is considered harmful, at what level of exposure, and whether in "the presence of" are ambiguous. With notable exceptions, the Codex code of practices and guidelines tends to be written in this manner. (The exceptions include recommended maximum residue limits (MRLs) for pesticides and veterinary drugs.) Since there may be different interpretations of the Codex code, adoption does not imply equivalency or harmonization of SPS measures. More discussion on SPS measures in Codex is provided later.

**OIE:** Created by the International Agreement of 25 January 1924, Office International des Epizooties (OIE) currently has 147 member countries. As the world organization for animal health, OIE's main objectives are:

- to inform governments of the occurrence and course of animal diseases throughout the world, and of ways to control these diseases;
- to coordinate, at the international level, studies devoted to the surveillance and control of animal diseases; and
- to harmonize regulations for trade in animals and animal products among member countries. Sixteen of the eighteen APEC economies are members of OIE (as of November 1997).

The main function of OIE is to inform governmental veterinary services of the occurrence and course of epizootic diseases. Upon an outbreak of disease which may have serious repercussions on public health or on the economy of animal production, the affected country reports the incident to the OIE Central Bureau. This information is transmitted immediately by fax, telex, telegram or electronic mail to countries directly at risk.

Besides operating an early warning system, OIE also produces written material which facilitates trade. The OIE Manual of Standards for Diagnostic Methods and Vaccines (the Manual) provides standardized techniques and vaccine control methods. The International Animal Health Code (the Code) provides standards for international trade. Specifically, the Code defines the animal health conditions to fulfil in order to avoid the risk of transmitting infectious diseases from one country to another. Part 1 of the Code presents procedures for notifying at the international level diseases of animals, ethical rules for international trade and certification, the principles of import risk analysis, and the organization of import and export procedures. Part 2 outlines for each disease, the animal health conditions which a country should fulfil before exporting live animals, semen, embryos, meat and milk.

While Part 1 of the Code is written in general terms open to interpretation, OIE established procedures to resolve issues of interpretation among member countries. Through these procedures, a more definitive Code is evolving. Part 2 of the Code defines the conditions for establishing the disease status of countries and regional zones. Through assessing these conditions, OIE documents the status of each member country for each disease and provides a standard, international determination of animal health.

**IPPC:** The International Plant Protection Convention (IPPC), in effect since 1952, is an international treaty administered by the FAO. Currently, 105 signatory countries adhere to IPPC principles, 12 are APEC economies. The principle objective of the IPPC is to maintain and increase international cooperation in controlling pests and diseases of plants and plant products, and in preventing their introduction and spread across national boundaries.

The provisions of the IPPC include:

- a) adopting of measures specified in the convention by each country;
- b) setting up official plant protection organizations in each country which inspect for plant pests or diseases, issue phytosanitary certificates, and carry out research in the field of plant protection; and
- c) regulating trade of plants and plant products.

The initial IPPC document provided a process by which member countries could define their country-specific phytosanitary measures. No formal mechanism was in place to develop a common set of measures among member countries. However since then, the FAO has adopted a number of international standards concerning phytosanitary measures. These include: principles in plant quarantine, codes of conduct for importing biological agents, guidelines for pest risk analysis, and requirements for pest free areas. Where trade disputes arise between countries concerning phytosanitary measures, the IPPC provides a process for resolution. Currently, the approach of the IPPC is less prescriptive and thus less definitive in establishing international SPS measures than are Codex and OIE. However, if approved by the FAO, IPPC will create a set of measures for plant health similar to that developed by OIE for animal health.

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## Chapter 4: Analysis of SPS Measures

The purpose of this analysis was to examine the degree and trends toward harmonization of standards of APEC economies as referenced in the WTO-SPS Agreement; Codex Alimentarius, Office International des Epizooties (OIE) and the International Plant Protection Convention (IPPC). Two separate components comprised the analysis. The first involved a comparison of Maximum Residue Levels (MRLs) to draw inferences about the current degree of harmonization. The second involved reviewing WTO-SPS notifications to ascertain trends in changes to SPS measures.

**Comparison of MRLs:** MRLs are only a small portion of the total set of SPS measures in Codex. However, they are definitive and measurable. While harmonization of MRLs does not strictly infer harmonization of other SPS measures, comparing MRLs of APEC member economies to those of Codex does provide some insight toward the degree of harmonization that exists.

The analysis used two products, pineapples and rice. While it was not possible to obtain regulatory information from all 18 member economies, adequate information was obtained to ascertain the degree of harmonization in APEC toward an international standard. The review was limited to the following 12 economies; Australia, Canada, Chile, Japan, Korea, Malaysia, Mexico, New Zealand, Singapore, Chinese Taipei, Thailand and USA.

Ten substances for rice and 13 for pineapples are listed in the MRL regulatory information of Codex. MRLs for each of these substances for each economy were obtained from a data base maintained by the Canadian Pest Management Regulatory Agency (PMRA). This information is readily available from the PMRA website:

*[http://hwcweb.hwc.ca/main/hc/web/prma/english/mrls/mrls\\_eng.html](http://hwcweb.hwc.ca/main/hc/web/prma/english/mrls/mrls_eng.html)*

The majority of the regulatory information was relatively current with the exception of Chile and Malaysia. The information from Mexico was undated.

Tables I and II summarize the MRL information obtained from each economy for rice and pineapple, respectively. A dash mark (-) implies that residue of the substance should be undetectable. In this regard, the regulations of Taiwan and the USA are explicit about residues which are not listed in their respective regulations; such substances should be undetectable in food crops.

Table 1: Pesticide Residue Levels Permitted with Rice (mg/kg)

SUBSTANCE	CODEX	AUSTRALIA	CANADA	CHILE	JAPAN	KOREA	MALAYSIA	MEXICO	NEW ZEALAND	SINGAPORE	CHINESE TAIPEI	THAILAND	U.S.A.
CARBARYL	5.00	5.00	0.10	5.00	--	1.00	3.00	5.00	5.00	5.00	0.50	--	5.00
CHLORFENIUNPHOS	0.05	0.05	0.10	0.05	--	0.05	0.05	--	0.05	0.05	0.20	--	--
CHLORPYRIFOS	0.10	0.10	0.10	0.10	--	0.10	--	--	0.10	0.10	0.10	--	--
CHLORPYREFOS-METHYL	0.10	0.10	0.10	0.10	0.01	0.10	0.10	--	0.10	0.10	--	--	6.00
2,4-D	0.05	0.20	0.10	0.20	0.20	0.05	0.20	0.10	0.05	0.20	--	--	--
DISULFOTON	0.50	--	0.10	--	0.07	0.50	0.50	--	0.50	0.50	0.10	--	0.75
DIQUAT	5.00	5.00	0.10	--	--	0.02	0.20	--	5.00	5.00	--	--	--
ENDOSULFAN	0.10	0.10	0.10	0.10	--	0.10	0.10	--	0.10	0.10	--	--	--
ETRIMFOS	0.10	--	0.10	--	--	0.20	--	--	0.10	0.10	--	--	--
FENTIN	0.10	0.10	0.10	--	--	0.05	0.10	--	0.10	--	0.10	--	--
FENTHION	0.10	--	0.10	0.10	--	0.10	0.10	0.10	0.10	0.10	0.10	--	0.50
GLYPHOSATE	0.10	--	0.10	--	0.20	0.10	--	--	0.10	--	0.10	--	0.10
PARAQUAT	10.00	10.00	0.10	0.50	0.10	0.50	0.50	--	10.00	10.00	0.20	--	0.05
Date of Information	Jul. 1995	Aug. 1996	Oct. 1997	Dec. 1982	Mar. 1996	Jul. 1996	Nov. 1990	N/A	Apr. 1996	Apr. 1996	Feb. 1994	Oct. 1996	Jan. 1997



**Table 2: Maximum Residue Levels Permitted in Pineapple (mg/kg)**

SUBSTANCE	CODEX	AUSTRALIA	CANADA	CHILE	JAPAN	KOREA	MALAYSIA	MEXICO	NEW ZEALAND	SINGAPORE	CHINESE TAIPEI	THAILAND	U.S.A.
DELTAMETHRIN	0.01	--	0.10	--	--	0.01	0.05	--	0.01	0.01	--	--	--
DISULFOTON	0.10	--	0.10	--	0.05	0.10	--	--	0.10	--	0.10	--	2.00
ETHOPROPHOS	0.02	--	0.10	--	--	0.02	--	--	0.02	--	--	--	--
FENAMIPHOS	0.05	--	0.10	--	--	0.05	0.05	--	0.05	0.05	--	--	0.30
GUAZATINE	0.10	--	0.10	--	0.20	0.10	0.10	--	0.10	--	--	--	--
HEPTACHLOR	0.01	0.01E	0.10	--	--	0.01	0.01	--	0.01	0.01	--	0.05	0.02
METHOMYL	0.20	--	0.10	--	1.00	0.20	--	0.20	0.20	--	--	--	--
METHIDATHION	0.05	--	0.10	--	--	--	2.00	--	0.05	--	0.50	--	--
OXAMYL	1.00	--	0.10	--	0.50	1.00	--	--	1.00	1.00	--	--	1.00
TRIADIMEFON	3.00	--	0.10	--	0.50	3.00	--	--	3.00	--	0.50	--	3.00
Date of Information	Jul. 1995	Aug. 1996	Oct. 1997	Dec. 1982	Mar. 1996	Jul. 1996	Nov. 1990	N/A	Apr. 1996	Apr. 1996	Feb. 1994	Oct. 1996	Jan. 1997

For agricultural chemicals not listed as permitted residues, Section B.15.002 (1) of the *Food & Drugs Regulations (Canada)* permits their presence in an amount not exceeding 0.1 mg/kg. In the case of certain substances, residue levels lower than 0.1 mg/kg have been officially declared as regulatory MRLs when the toxicological evidence indicates that the risk may be significant at the 0.1 mg/kg level.

Clause 257 (a) of the *New Zealand Food Regulations* states that “any imported food may contain proportions of pesticides not greater than the proportions specified for that food in the current edition of the FAO/WHO Codex Alimentarius Commission publications titled *Pesticide Residues in Food (CAC Vol. 2)* or *Residues of Veterinary Drugs in Food (CAC Vol. 3)*.” As a result New Zealand’s regulatory MRLs for pineapple and rice are identical to Codex.

TABLE III summarizes the percentage of regulatory MRLs *greater than or identical to* Codex in the 12 economies. When a regulatory-based MRL is greater than the Codex MRL, the regulation is less stringent, thus market access should not be affected negatively.

**Table 3: Percentage of Regulatory MRLs Greater Than or Identical to Codex Standard**

ECONOMY	RICE	PINEAPPLE
AUSTRALIA	69%	10%
CANADA	69%	70%
CHILE	54%	0%
JAPAN	15%	20%
KOREA	69%	90%
MALAYSIA	54%	50%
MEXICO	23%	10%
NEW ZEALAND	100%	100%
SINGAPORE	85%	40%
CHINESE TAIPEI	38%	20%
THAILAND	0%	10%
USA	38%	50%

When comparing Codex with regulatory MRLs for the presence of pesticides in or on pineapple, the percentage of MRLs identical or less stringent in national regulations than Codex ranged from 25% (Thoprophos and Triadimefon) to 58% (Heptachlor). In the case of rice, the range was from 25% (Diquat and Paraquat) to 75% (2,4-D). Tables IV and V show the percentage of pesticide use with MRLs greater than or identical to Codex.

**Table 4: Percentage of 12 APEC Economies with MRLs Greater Than or Identical to Codex by Pesticide Type for Rice**

PESTICIDE	PERCENTAGE
DIQUAT	25%
PARAQUAT	25%
ETREINFOS	33%
DISULFOTON	42%
FENTIN	42%
CARBARYL	50%
GLYPHOSATE	50%
CHLORPYRIFOS	58%
ENCLOSULFAN	58%
CHLORFENUMPHOS	67%
CHLORPYREFOS-METHYL	67%
2,4-D	75%
FENTHION	75%

**Table 5: Percentage of 12 APEC Economies with MRLs Greater Than or Identical to Codex by Pesticide Type for Pineapple**

PESTICIDE	PERCENTAGE
ETHOPROPHOS	25%
TRIADIMEFON	25%
METHOMYL	33%
METHIDATHION	33%
OXAMYL	33%
DELTAMETHRIN	42%
DISULFOTON	42%
GUAZATHINE	42%
FENAMIPHOS	50%
HEPTACHLOR	58%

**Assessment of WTO-SPS Notifications:** The second component of analysis involved a review of SPS Notifications submitted to the WTO Secretariat during the 11-month period, January 1 to November 30, 1997. During this time-frame, notifications were submitted by Canada, Chile, Japan, Korea, Malaysia, Mexico, New Zealand, Singapore, Philippines, Thailand and USA.

Under the provisions of the WTO-SPS Agreement, all Members of WTO (except the least-developed members which may delay the implementation of the Agreement until 2000) are required to notify other members through the WTO Secretariat about proposed regulatory amendments:

“...whenever an international standard, guideline or recommendation does not exist or the content of a proposed sanitary or phytosanitary regulation is not substantially the same as the content of an international standard, guideline or recommendation, and if the regulation may have a significant effect on the trade of other members.”

Not all changes to SPS regulations are required to be documented through the WTO notification process. However, some economies (e.g. Canada) do submit all changes as a matter of course. In order to facilitate the process, the WTO Secretariat publishes notifications based on information contained in regulatory proposals submitted by WTO members. The notification form contains 12 sections as noted below. Detailed information concerning proposed changes are also available.

Main Headings of WTO-SPS Notifications:

- Name of member notifying and, if applicable, the name of the local government involved
- Agency responsible
- Products covered in terms of tariff item numbers as specified in national schedules deposited with WTO
- Title and number of pages of the notified document
- Description of content
- Objective and rationale
- Whether or not an international standard, guideline or recommendation exists and if so identify deviations
- Relevant documents and language(s) in which these are available
- Proposed date of adoption
- Proposed date of entry into force
- Final date for comments
- Where the text of the proposal may be obtained

The analysis involved a review of 93 SPS notifications submitted by 11 member economies during the 11-month period. Table VI summarizes information for each SPS notification.

**Table 6: Summary of WTO-SPS Notifications by APEC Economies  
(between January and November 1997)**

WTO-SPS NOTIFICATION NO.	1 SPS CATEGORIES	2 COUNTRY/ REGION SPECIFIC	3 TRADE IMPACT	4 RELATIONSHIP TO INTERNATIONAL STANDARDS
CAN 16	FOOD	NO	LS	NCIS
CAN18	FOOD	NO	MS	proposed policy is additional to OIE requirements
CAN 17	FOOD	NO	LS	
CAN 19	FOOD	NO	LS	NCIS
CAN 20	FOOD	NO	LS	NCIS
CAN 21	FOOD	NO	LS	NCIS
CAN 22	FOOD	NO	LS	NCIS
CAN 23	FOOD	NO	LS	NCIS
CAN 24	FOOD	YES	MS	complies with WHO request of April 1996 to ban ruminant ingredients in ruminant feed
CAN 25	FOOD	NO	LS	proposal aligned with Codex standards, except where an international standard does not exist
CAN 26	FOOD	NO	LS	proposal aligned with Codex standards, except where an international standard does not exist
CAN 27	ANIMAL	YES	LS	NCIS
CAN 28	ANIMAL	YES	UTD	NCIS
CAN 29	FOOD	NO	UTD	proposal states that it is consistent with international recommendations
CAN 30	FOOD	NO	LS	NCIS
CAN 31	ANIMAL	YES	MS	NCIS
CHL 2	FOOD	NO	LS	proposal aligned with Codex standards, except where an international standard does not exist
CHL 3	PLANT, ANIMAL	NO	LS	NCIS
CHL 4	ANIMAL	YES	MS	NCIS
CHL 5	ANIMAL	NO	LS	text is in line with OIE rules except where international standard does not exist

**Table 6: Summary of WTO-SPS Notifications by APEC Economies  
(between January and November 1997)**

WTO-SPS NOTIFICATION NO.	1 SPS CATEGORIES	2 COUNTRY/ REGION SPECIFIC	3 TRADE IMPACT	4 RELATIONSHIP TO INTERNATIONAL STANDARDS
CHL 6	ANIMAL	NO	UTD	NCIS
CHL 7	FOOD	NO	UTD	NCIS
CHL 8	FOOD	NO	UTD	NCIS
CHL 9	FOOD	NO	UTD	NCIS
CHL 10	FOOD	NO	UTD	NCIS
CHL 11	ANIMAL	NO	UTD	NCIS
CHL 12	ANIMAL	NO	UTD	NCIS
JPN 20	FOOD	NO	LS	standard developed in accordance with Codex HACCP guidelines
JPN 21	FOOD	NO	LS	NCIS
JPN 22	FOOD	NO	LS	revision on pH value based on Codex of hygienic practical for low-acid foods
JPN 23	FOOD	NO	LS	NCIS
JPN 24	ANIMAL	NO	LS	proposals developed according to concepts provided by OIE
JPN 25	FOOD	NO	MS	NCIS
JPN 26	FOOD	NO	UTD	NCIS
JPN 27	FOOD	NO	UTD	NCIS
JPN 28	ANIMAL	NO	LS	proposals developed according to concepts provided by OIE
KOR 33	FOOD	NO	LS	NCIS
KOR 34	FOOD	NO	UTD	part of the objective of the proposal is to harmonize standards, guidelines and recommendations with international counterparts
MYS 4	FOOD	NO	MS	NCIS
MYS 3	FOOD	NO	MS	NCIS
MYS 2	FOOD	NO	LS	OIE animal health code used as the standard when such guidelines exist
MEX 117	ANIMAL	NO	UTD	NCIS
MEX 118	ANIMAL	NO	UTD	NCIS

**Table 6: Summary of WTO-SPS Notifications by APEC Economies  
(between January and November 1997)**

WTO-SPS NOTIFICATION NO.	1 SPS CATEGORIES	2 COUNTRY/ REGION SPECIFIC	3 TRADE IMPACT	4 RELATIONSHIP TO INTERNATIONAL STANDARDS
MEX 119	PLANT	NO	MS	NCIS
MEX 120	FOOD	YES	UTD	NCIS
MEX 121	FOOD	NO	MS	NCIS
MEX 122	FOOD	NO	MS	NCIS
MEX 123	FOOD	NO	MS	NCIS
MEX 124	FOOD	NO	UTD	NCIS
MEX 125	FOOD	NO	UTD	NCIS
MEX 126	ANIMAL	NO	UTD	NCIS
MEX 127	ANIMAL	NO	UTD	NCIS
MEX 129	ANIMAL	NO	UTD	NCIS
MEX 130	PLANT	YES	UTD	NCIS
NZL 8	FOOD	NO	MS	NCIS
NZL 9	FOOD	NO	MS	NCIS
NZL 10	FOOD	NO	MS	NCIS
NZL 12	FOOD	NO	MS	NCIS
NZL 13	FOOD	NO	MS	NCIS
NZL 14	FOOD	NO	LS	consistent with Codex
SGP 1	FOOD	NO	MS	NCIS
PHL 1	FOOD	NO	MS	consistent with IPPC
PHL 2	FOOD	NO	MS	consistent with IPPC
PHL 3	FOOD	NO	MS	consistent with IPPC
PHL 5	FOOD	YES	MS	consistent with OIE animal health code
THA 5	FOOD	NO	MS	NCIS
USA 73	FOOD	NO	MS	NCIS
USA 74	FOOD	NO	MS	NCIS
USA 75	FOOD	NO	MS	deviates from Codex standard
USA 76	FOOD	YES	LS	in accordance with IPPC
USA 77	FOOD	NO	LS	NCIS
USA 78	FOOD	YES	MS	NCIS
USA 79	FOOD	NO	LS	NCIS
USA 80	FOOD	YES	MS	NCIS
USA 81	FOOD	NO	MS	NCIS

**Table 6: Summary of WTO-SPS Notifications by APEC Economies  
(between January and November 1997)**

WTO-SPS NOTIFICATION NO.	1 SPS CATEGORIES	2 COUNTRY/ REGION SPECIFIC	3 TRADE IMPACT	4 RELATIONSHIP TO INTERNATIONAL STANDARDS
USA 82	FOOD	NO	LS	NCIS
USA 83	FOOD	NO	LS	NCIS
USA 84	FOOD	NO	MS	NCIS
USA 85	FOOD	NO	LS	NCIS
USA 86	FOOD	NO	LS	NCIS
USA 87	FOOD	YES	LS	NCIS
USA 88	FOOD	NO	LS	NCIS
USA 89	FOOD	NO	LS	NCIS
USA 90	ANIMAL	YES	LS	NCIS
USA 91	FOOD	NO	LS	NCIS
USA 92	FOOD	NO	MS	MRLS for vinclozolin currently exist within the Codex
USA 93	FOOD	NO	LS	NCIS
USA 94	FOOD	YES	MS	in accordance with article 6, para 1 of IPPC
USA 95	FOOD	YES	MS	in accordance with article 6, para 1 of IPPC
USA 96	FOOD	NO	MS	NCIS
USA 97	FOOD	YES	LS	NCIS
USA 98	FOOD	NO	UTD	NCIS
USA 99	FOOD	NO	MS	NCIS

- Notes:
1. Notifications categorized by type of product: food, animal or plant.
  2. "yes" – notification concerns trade with specific trading partner(s).
  3. "LS" – less stringent.  
"MS" – more stringent.
  - "UTD" – unable to determine impact on trade.
  4. "NCIS" – no current international standard exists.

Each notification was categorized as dealing with food, animal and/or plant SPS measures. As well, each was classified as being a general SPS measure or one concerning product from a specific trading partner. Each notification was assessed from a trade impact perspective, and where possible classified as being "Less Stringent" or "More Stringent". In carrying out this assessment, "Less Stringent" and "More Stringent" were considered from the perspective of a firm or an individual attempting to gain access to a market. In this context, "Less Stringent" would be synonymous with reducing existing transaction costs of shipping into the notifying economy, while "More Stringent" would indicate the opposite, increasing transaction costs.



SPS measures exist for health and safety reasons. Judging them on the basis of their impact on trade is difficult. When a proposal was considered to be “More Stringent”, that proposal would not necessarily have an adverse affect on the consumer. In certain cases, regulations which increase the stringency of sanitary or health-related requirements could also serve to increase confidence in the food supply and thus provide added value for the consumer. This in turn, could increase demand, such that trade actually increases. For example, a proposal from Canada, SPS Notification # CAN/18, which imposes conditions that countries must meet in order to export bovine commodities into Canada, is potentially more stringent from a supplier’s perspective. But, it provides a good example of potential benefit to the consumer. These particular conditions reduce the risk of transferring Bovine Spongiform Encephalopathy (BSE). Further, notification of proposals, whether or not they are more stringent than existing measures, can improve the transparency and consistency of regulations, which potentially reduce transaction risks.

In the case of proposals involving either food additives or an MRL for an agricultural chemical, all such proposals that would establish a new positive listing were considered to be trade liberalizing. This is because most, if not all APEC economies use the concept of positive listing to regulate both food additives and MRLs for agricultural chemicals. Under this type of regulatory system, if a food additive or an MRL is not listed in the regulations, then that substance may not be used and any detectable residue would be in violation of the national regulations. The Canadian regulation that permits 0.1 mg/kg as a general residue level for pesticides in those cases where one is not specifically listed, is a notable exception.

Proposals were also assessed as to whether or not they were an adoption of an international standard, guideline or recommendation. Where possible, the international measure was identified. Table VI summarizes the 93 notifications that were reviewed. Seventy-nine percent of the notifications fell within the jurisdiction of Codex; 18% within the jurisdiction of OIE and 3% within the jurisdiction of the IPPC.

Sixty-eight of the 93 notifications, or 73%, stated that there was no relationship to an existing international standard. Furthermore, 40% of the notifications was considered to be “less stringent”, 36% “more stringent” and the remaining 24% not being readily classified.

The data evaluated suggest that a few member economies of APEC are pursuing an active policy of harmonization with existing international standards, guidelines and recommendations referenced in the WTO-SPS Agreement. The fact that 73% of the notifications stated that the proposal was not related to an existing international standard, may indicate that the reporting APEC economies are showing leadership. This may warrant the development of new, or the revision of existing, international standards, guidelines and/or recommendations. It also demonstrates that SPS measures are not static. Development of new production and processing procedures, of new inputs and products, as well as, of improved health and safety scientific evidence, generates a need for constantly evolving SPS measures.



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## Chapter 5: Governance of Food Safety and Quality

The economies of APEC are extremely diverse. Not surprisingly, a diversity in governments' involvement in food quality and safety also exists. The various economies differ significantly in their perceptions regarding the degree to which governments, commercial interests and their interrelationship should play a role. Because of perishability, distance and limits of transportation, historical experiences of food security and safety, as well as other factors, regulations relating to the food sectors in APEC economies developed independently and differently.

To understand the scope of differences, it is useful to enumerate some of the main factors influencing the governance of food safety and quality:

- inherently different health risk among types of food
- climate and natural endowments
- cultures / history
- religious, ethnic and ideological influences
- consumer tastes and preferences
- food industry structure
  - primary production methods
  - processing methods
  - food storage methods
  - distribution methods
- consumer food preparation methods
- government structure

Each of these factors influences the level of resources, private and public, required for assuring food safety and quality. All APEC economies seek to ensure that food supplies are safe and wholesome. The following outlines five differing means employed by APEC economies in assuring food safety and quality. To some degree, components of each method can be found in the food systems of each economy.

**Government authority.** In some economies, governments act in an authoritative fashion on consumers' behalf and take pre-emptive measures *before* rather than remedial measures *after* in assuring food safety and quality. In this case, the government provides inspection services of food products, preparation and handling systems.

**Hybrid systems: consumer led, government implemented.** Governments still have a role to play in the implementation and enforcement of health-related regulations, but consumer associations and advocacy groups play a leading role as public watchdogs and setting standards.

**Hybrid systems: government-industry collaboration.** The government, in consultation with industry and scientific experts, establishes standards and procedures and serves as scrutineer, but industry is responsible for implementation and enforcement.

**Buyer beware by default.** Either because of philosophy or simply out of practical necessity, a buyer beware culture prevails and the onus is placed on consumers to ensure that they are not adversely affected by the food that they eat. Although most economies have established public food health and safety standards and regulations, some lack the financial, physical and technical resources needed to implement and enforce these regulations. Consequently, a *de facto* buyer beware system exists.

**Buyer beware by design.** A new kind of buyer beware culture is emerging in some APEC economies. This approach recognizes the consumers as the final arbitrator of value and that an ignorant or poorly informed consumer is a consumer without power. If regulatory services can be delivered in such a way that consumers can make informed decisions, the market itself (i.e., the collective actions of consumers) may provide sufficient discipline to curb behaviour that is counter to general well-being.

By focusing on the reasons for fundamental differences in food production, processing and preparation, and regulatory services, we can find better working solutions to facilitate trade among economies while minimizing the risk of food-borne illness.

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## Summary and Conclusions

Trade regulatory measures such as, quality standards, information regulations, customs procedures and food safety standards all are trade facilitation measures. They improve the efficiency of trade by reducing the costs incurred by APEC citizens in ascertaining the safety, quality and value of products. Depending on their nature, however, they can also serve as impediments to trade. With limitations to the application of tariffs, trade regulatory measures have an increased probability of being used for the purpose of affecting trade flow.

The objective of this report is to provide insight on trade facilitation measures and their impacts. It examines the role of customs procedures and summarizes the work being done by the APEC Sub-Committee on Customs Procedures. Next it looks at the impacts of labelling, quality assurance and marketing services. A more in-depth analysis of sanitary and phytosanitary (SPS) measures follows along with the degree of harmonization of SPS measures and how they are evolving over time. From a more general perspective, the governance of food safety and quality identifies some of the factors that influence it in APEC economies. Exploring these measures and discussing their purpose and current degree of harmonization, will lead to a more informed process for developing and adopting policy alternatives.

The efficiency and timely delivery of credible and fair customs procedures and services can have a tremendous effect on the entire APEC food-value chain and has direct implications for both the economic well-being and health of APEC citizens. Consequently, initiatives which focus on timeliness and the amelioration or elimination of delays, without undermining the integrity of customs procedures and services, are of particular concern to food interests. The APEC Business Advisory Council notes that an average international trade transaction involves: 27-30 different parties, 40 documents, 200 data elements (30 of which are repeated), and re-keying of 60-70% of all data at least once. Without embracing new and innovative methods, sizable gains in both time and efficiency can be had simply through better sharing of existing information, reduction of duplication and overlap in regulatory services. This does not involve pushing the frontier, but simply making better use of what exists already.

Labelling, Quality Assurance and Market Information Services (LAMIS) are present in all APEC economies, but manifested in different ways. When implemented with care, such services facilitate trade, promote greater competition, improve accountability up and down the value chain, and lower waste and costs throughout the food sector. Poorly designed

services can have effects that are precisely to the contrary. They can impart inappropriate signals to market participants, drive up costs throughout the value chain, limit access to markets, and lower levels of general well-being. By acting collectively and with due consideration, APEC economies can ensure that labelling, quality assurance and market information services contribute positively to trade, accountability and general well-being.

The WTO-SPS Agreement promotes transparency of regulations by requiring WTO members to:

- a) publish all regulations;
- b) have one entry point responsible for providing SPS documents, and procedures information; and
- c) notify other members through the WTO-SPS Secretariat of proposed changes to their measures.

Three major international organizations are referenced in the WTO-SPS Agreement: Codex, OIE and IPPC. They collectively provide a general set of sanitary and phytosanitary measures. As demonstrated, international acceptance of SPS measures of these organizations does not imply that the objective of equivalency or harmonization, at the detailed level, is fully established. The broad scope for interpretation of measures and the lack of a mechanism for establishing an internationally acceptable set of detailed measures could significantly hamper this objective.

One of the purposes of this module is to examine the degree and trends toward harmonization to national standards specifically referenced in the WTO-SPS Agreement. Two components comprise the analysis. The first involves a comparison of Maximum Residue Levels (MRLs) to draw inferences about the current degree of harmonization. The second involves reviewing WTO-SPS notifications to ascertain trends in changes to SPS measures.

The report compares regulatory MRLs of APEC economies with Codex for the presence of agricultural chemicals in or on pineapple and rice. The percentage of MRLs identical or less stringent than Codex range from 25% and 75%, indicating harmonization of MRLs does not exist.

In the second component, analysis of the data suggests that a few member economies of APEC are pursuing an active policy of harmonization with existing international standards, guidelines and recommendations referenced in the WTO-SPS Agreement. The fact that 73% of the notifications does not relate to an existing international standard may indicate that the reporting APEC economies are showing leadership. This may warrant the development of new, or revision of existing, international standards, guidelines and/or recommendations. It also demonstrates that SPS measures are not static. Development of new production and processing procedures, of new inputs and products, as well as, of improved health and safety scientific evidence, generates a need for constantly evolving SPS measures.

The economies of APEC are extremely diverse. Not surprisingly, a diversity in governments' involvement in food quality and safety also exists. Because of perishability, distance and limits of transportation, historical experiences of food security and safety, as well as other factors, regulations relating to the food sectors in APEC economies developed independently

and differently. By focusing on the reasons for fundamental differences in food production, processing and preparation, and regulatory services, we can find better working solutions to facilitate trade among economies while minimizing the risk of food-borne illnesses.

The information and discussion presented in this report strongly suggest that all members of APEC can gain significantly from improved trade facilitation measures. The data indicate that complete harmonization of these measures will be difficult. However, improved harmonization through efficient regulations is obtainable. The challenge will be to develop policy alternatives which promote this objective.





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