#### II. PLANT QUARANTINE

The information presented below is not updated and is the same as the information presented earlier in the previous edition of the plant protection profiles from Asia-Pacific countries, which was published in 2007.

#### List of Key Legislation/Regulations/Rules

- Ordinance on the Plant Protection and Quarantine, Order No. 11/2001/L of 8 August 2001
- 2002 Regulation on Plant Protection, the Regulation on Plant Quarantine and the Regulation on Management of Plant Protection chemical, Decree No. 58/2002/ND-CP of 3 June 2002
- 2004 Decision 16/2004/BNN-BVTV of 20 July 2004 of the Minister of Agriculture and Rural Development providing Procedures for Plant Quarantine Inspection and Recording of Regulated Articles.
- 2005 List of Regulated Articles of the S.R.Vietnam, Decision No. 73/2005/QD-BNN of 14 November 2005 (MARD).
- 2005 List of Plant Quarantine Pests of the S.R.Vietnam, Decision No. 72/2005/QD-BNN of 14 November 2005 (MARD).

Web sources for further information: https://www.ppd.gov.vn; https://www.ippc.int

Policies (regarding plant quarantine)	Yes	No
Does phytosanitary legislation cover domestic quarantine?	X	
Does phytosanitary legislation cover import quarantine?	X	
Does phytosanitary legislation cover export quarantine?	X	
Does phytosanitary legislation cover living modified organisms?		Х
Is plant quarantine a separate organization from animal quarantine?	X	
Other policy initiatives (under review/progress)		
Web source for further information:		

Organization of Plant	Responsible Organizational Unit
<b>Quarantine Functions</b>	(Ministry/Department/Unit)
Pest Risk Analysis	MARD/PPD
National standards development	MARD/PPD
International notifications	MARD
Import:	
Import permits	MARD/PPD
Import inspections	MARD/PPD
Emergency action	MARD/PPD
Export:	
Phytosanitary certificates	MARD/PPD
Treatment of commodities	Fumigation companies under PPD'authorization.

Infrastructure	Year: 2005
Number of plant quarantine officers authorized to inspect/certify	413
Total qualified personnel for plant pest risk analysis	14
Quarantine offices	
entry points (sea/air/land/mail = total)	67
post-entry plant quarantine containment facilities	2
other offices	12
Quarantine service diagnosis laboratories	12

In-country recognized pest diagnostics capabilities (incl. universities, etc.)	
Number of laboratories for insect/mite (arthropod) samples	15
Number of laboratories for bacteria samples	10
Number of laboratories for virus samples	2
Number of laboratories for fungus samples	15
Number of laboratories for mycoplasma samples	12
Number of laboratories for nematode samples	15
Number of laboratories for plant/weed samples	13
Number of laboratories for other pests (snail, slug, rodents, etc.)	5

Pest Free Areas According to ISPM 10	Responsible Organizational Unit (Ministry/Department/Unit)		
Overall management	MARD/PPD		
- surveillance	MARD/PPD		
<ul><li>management</li></ul>	MARD/PPD		
<ul><li>certification</li></ul>	MARD/PPD		
List of target pest species and crops I	SPM 4		Number of sites in [year]
List of target pest species and crops I	SPM 10		Number of sites in [year]

## **Key Situation Indicators**

International Trade		Year: 2005
Main Import Plant Commodities	Main countries/areas of origin	Quantity (tons)
Malt	French, Australia, Denmark,	158 614
	Belgium, England, Germany	
Wheat	USA, Australia, China, Russia, India	719 117
Maize	USA, China, Japan, India	55 000
Main Export Plant Commodities	Main destination countries	
Coffee	USA, Belgium, England, Germany,	974 759
	French, Italy, Poland, Japan, Korea,	
	Spain.	
Rice	Indonesia, Philippines, Malaysia	4 059 738
	Nigeria, Algeri, Congo	
Pepper	India, Pakistan, EU	111 913

Cooperation Projects			
Title (Purpose/Target)	Donor	Amount	Years (start-end)
Phytosanitary Capacity Building	NZAID		2002-2005
Project for the Mekong Region			
Improvement of Plant Quarantine	JICA		2005-2007
treatment against Fruit Fly on			
fresh fruits			
Intergrating effective phosphine	ACIAR		2001-2004
fumigation practices into grain			
storage system in China, Viet Nam			
and Australia			

Title of government follow-up programmes	Amount	Years (start-end)
National Programme for surveying and detecting early	\$10 000 per year	2005
quarantine pests		
National pests survey programme for plants and	\$100 000	2005-2007
plant products in Viet Nam		

#### **Key Operation Indicators**

Institutional Functions	Year: 2005
Number of import permits issued	400
Number of import inspections carried out	1 259
Number of emergency phytosanitary treatments taken on imports	1 259
Number notifications of non-compliance	
Number of conventional phytosanitary certificates issued	100 643
Number of electronic phytosanitary certificates issued	

Number of quarantine pests intercepted		Year:
Top three commodity	Top three pest/commodity	# of interceptions

Lists of Regulated Pests	Year of last update	Insects	Pathogens	Plants
Number of quarantine pests	2005	25	21	11
Number of regulated non-quarantine pests				
Number of regulated import articles				
Web source for further information:				

Pest Risk Analysis	Insects	Pathogens	Plants
No. of PRA completed and documented (according to ISPM)			5
Web source for further information: https://www.ppd.gov.vn			

#### **Progress and Constraints**

#### Main Progress in Recent Years (legislation, policies, infrastructure, investments, training, etc.)

- There were several legal documents, phytosanitary standards/procedures reviewed and established in accordance with International Regulations.
- Maintaining cooperation with other countries in managing pests, training, exchanging information, supporting technical equipment, etc.

#### Main Constraints (personnel, infrastructure, administrative, operational, training, etc.)

- Human resources shortage, including lack of leading and experienced experts in applying international phytosanitary standards, carrying out PRA, qualified staff for inspecting, testing and verify the equivalence of phytosanitary measures, etc.
- Database to serve phytosanitary operations is not adequate
- Legal document system is inadequate and inconsistent
- Infrastructure and equipment is still poor.

Implementation of ISPM	Relevance		Implementation			Planned/Actual		
International Measures	low	medium	high	none	partial	most	full	Year of full implementation
ISPM 01 Principles of plant quarantine as related to international trade		X				х		2001
ISPM 02 Guidelines for pest risk analysis			X		X			2001
ISPM 03 Code of conduct for the import and release of exotic biological control agents			х	х				2008
ISPM 04 Requirements for the establishment of pest free areas		X			X			2006
ISPM 05 Glossary of phytosanitary terms			X		X			2007
ISPM 06 Guidelines for surveillance			X				X	2007
ISPM 07 Export certification system			X		X			2007
ISPM 08 Determination of pest status in an area			X				X	2006
ISPM 09 Guidelines for pest eradication programmes			X	х				2008
ISPM 10 Requirements for the establishment of pest free places of production and pest free production sites			X		X			2007
ISPM 11 Pest risk analysis for quarantine pests			X		x			2007
ISPM 12 Guidelines for phytosanitary certificates		X			X			2007
ISPM 13 Guidelines for the notification of noncompliance and emergency action		X		X				2008
ISPM 14 The use of integrated measures in a systems approach for pest risk management		х		Х				2009
ISPM 15 Guidelines for regulating wood packaging material in international trade		х			Х			2008
ISPM 16 Regulated non-quarantine pests: concept and application		х		Х				2009
ISPM 17 Pest reporting		Х		Х				2008
ISPM 18 Guidelines for the use of irradiation as a phytosanitary measure		х		Х				2010
ISPM 19 Guidelines on lists of regulated pests			X	х				2009
ISPM 20 Guidelines for a phytosanitary import regulatory system			X	х				2008
ISPM 21 Pest risk analysis for regulated non-quarantine pests			Х	х				2010
ISPM 22 Requirements for the establishment of areas of low pest prevalence		х		Х				2010
ISPM 23 Guidelines for inspection		X		X				2008
ISPM 24 Guidelines for the determination and recognition of equivalence of phytosanitary measures		X			X			2009
ISPM 25 Consignments in transit		Х		Х				2010
ISPM 26 Establishment of pest free areas for fruit flies (Tephritidae)		Х		Х				2010
ISPM 27 Diagnostic protocols for regulated pests			X	Х				2008
ISPM 28 Phytosanitary treatments for regulated pests								
ISPM 29 Recognition of pest free areas and areas of low pest prevalence								
ISPM 30 Establishment of areas of low pest prevalence for fruit flies (Tephritidae)								
ISPM 31 Methodologies for sampling of consignments								
Comments/Constraints	-	-			-	-	-	

#### Comments/Constraints

Up to now, there are 27 ISPMs published by IPPC and several specifications are also developed accordingly. These are key documents for member countries to implement their standard harmonization. The implementation of ISPM in many countries is facing difficulties. Particularly, developing countries like Viet Nam. In general, requirements and regulation of ISPMs are normally higher than national standards. After comparative assessment between ISPMs and phytosanitary legal documents, the main gaps indicated that the awareness of stakeholders in respect to ISPMs is limited and there is not yet legal framework for some ISPMs so that the implementation of ISPMs could not apply at present condition of Viet Nam. Furthermore, human resources, technical capacity and technical information are big gaps in question, particularly existing capacity of PPD does not meet adequately requirements of these standards such as ISPM No. 4, 10, 11 and others.

#### III. SURVEILLANCE, PEST OUTBREAKS AND INVASIVE SPECIES MANAGEMENT

The information presented below is not updated and is the same as the information presented earlier in the previous edition of the plant protection profiles from Asia-Pacific countries, which was published in 2007.

## List of Key Legislation/Regulations/Rules for Surveillance, Pest Reporting and Emergency Actions

- 2001 Ordinance on the Plant Protection and Quarantine, Order No. 11/2001/L of 8 August 2001
- 2002 Regulation on Plant Protection under Decree No. 58/2002/ND-CP of 3 June 2002
- 2005 Decision No. 82/2005/QD-BNN of 10 November 2005 (MARD) Pest surveying Procedure for crops.

#### Web source for further information: –

Policies (regarding invasive/migratory species management)	Yes	No
National strategy to control serious field pest outbreaks?	X	
National strategy to control migratory or periodically occurring pests?	X	
National strategy to eradicate serious newly invaded exotic pests?		
Other policies: (e.g. subsidies, etc.)		
Web source for further information: https://www.ppd.gov.vn		

Organization of Outbreak Management Functions	Responsible Organizational Unit
	(Ministry/Department/Unit)
Field/Storage Pest Outbreaks	(e.g. BPH, bollworm, etc.)
Response strategy/plans	MARD/PPD
Surveillance	MARD/PPD
Control	MARD/PPD
Migratory Pest Outbreaks	(e.g. locusts, birds, armyworm)
Response strategy/plans	MARD/PPD
Surveillance	MARD/PPD
Control	MARD/PPD
New Exotic Pest Eradication	(e.g. coconut beetle)
Response strategy/plans	MARD/PPD
Surveillance	MARD/PPD/Plant Protection Sub-Departments
Control/eradication	MARD/PPD/Plant Protection Sub-Departments
Reporting to bilateral or international organizations	MARD/PPD

Infrastructure	Year: 2005
Number of designated staff for <b>surveillance</b> of field pests of national importance	1 200
Number of designated staff for <b>surveillance</b> of migratory and periodically occurring pests	800
Number of designated staff for <b>surveillance</b> of invasive species	100
Number of designated staff for <b>control</b> of field pests of national importance	2 000
Number of designated staff for <b>control</b> of migratory and periodically occurring pests	2 500
Number of designated staff for <b>eradication</b> of invasive species	100

#### **Key Situation and Operation Indicators**

(Outbreaks and invasions in the past 2 years)

New exotic species found established in country	Insects	Pathogens	Weeds
Total number for year: [most recent]			
Total number for year: 2004-2005	3		
Total number on record			

Eradication or internal quarantine actions taken against economically important species				
Name of species	Mexican Bean Weevil			
	Zabrotes subfasciatus			
Year of first discovery	2005			
Passway	Commercial Bean			
Location of first discovery	Markets			
Area affected [ha]	Small			
Area treated [ha]	Small			
Control method	Fumigation			
Expenditures				

Pest outbreak actions	Outbreak 1	Outbreak 2	Outbreak 3
Name of species	Brown planthopper		
	Nilaparvata lugens		
Year of outbreak	2005		
Area affected [ha]	209.039 ha		
Estimated damage \$			
Area treated by government [ha]	33 494		
Expenditures by government [\$]	Insecticide		
Control method			
More information			

#### **Progress and Constraints**

## Main Progress in Recent Years (legislation, policies, infrastructure, investments, training, etc.)

- Applying Geographical Information System (GIS) for pests surveillance and warning.
- There are several farmers and officers trained by IPM Programme.

#### Main Constraints (personnel, infrastructure, administrative, operational, training, etc.)

- Fund for surveillance is limited.
- Knowledge of farmers needs to be improved.
- Lack of technical equipment.

#### IV. PEST MANAGEMENT

The information presented below is not updated and is the same as the information presented earlier in the previous edition of the plant protection profiles from Asia-Pacific countries, which was published in 2007.

#### List of Key Legislation/Regulations/Rules for Pest Management

- Ordinance on the Plant Protection and Quarantine, Order No. 11/2001/L of 8 August 2001
- 2002 Regulation on Plant Protection, the Regulation on Plant Quarantine and the Regulation on Management of Plant Protection Drugs, Decree No. 58/2002/ND-CP of 3 June 2002

Web source for further information: https://www.ppd.gov.vn; https://www.ippc.int

Policies (regarding pest management)	Yes	No
Do you have policies encouraging organic or low-pesticide use production	X	
Is IPM specifically mentioned in laws or policy documents?	X	
Do you have official Good Agricultural Practice (GAP) or any other relevant food safety (ecofood, etc.) standards for pest management?	X	
Is pest management extension separate from general extension?	X	
Other policies: (subsidies, production inputs, etc.)		
Web source for further information: https://www.ppd.gov.vn		

Organization of Plant	Responsible Organizational Unit
<b>Protection Functions</b>	(Ministry/Department/Unit)
Policy development	MARD/PPD
Pest management research	MARD/PPD + National Inst. of Plant Protection (NIPP),
	Viet Nam Academy of Agriculture Sciences, Southern Fruit
	Research Institute (SOFRI)
Control recommendations	MARD/PPD + Institutes, Academy
Pest management extension	MARD/PPD
IPM training	MARD/PPD
GAP training	MARD/PPD

Infrastructure	Year: 2006
Number of technical officers for pest management	500
Number of central, regional, provincial or state offices	4 regions +
	64 provinces
Number of district and village level field offices	1 000
Number of field/extension agents for pest management advice	64
Number of field/extension agents trained in IPM-FFS facilitation	90
Number of government biocontrol production/distribution facilities	2
Number of government biopesticide production/distribution facilities	2
Number of general extension staff involved in pest management	128
Number of designated plant protection technical officers for extension	128

## **Key Situation and Operation Indicators**

Pest Management	Yes	No
Does the country have a National IPM Programme?		
If yes, give Name and Address of IPM Programme:	v	
National IPM Coordinator, PPD, Tel: 84 4 533 0778	X	
E-mail: ipmppd@fpt.vn		
Does the country have specific IPM extension programmes?	v	
If yes, in which crops?: Rice, cotton, vegetable, green tea, citrus, maize, sweet potato	X	
Does the country have specific IPM research programmes?	**	
If yes, in which crops?: Rice, cotton, vegetable	X	
Does the country have specific GAP extension programmes?		
If yes, in which crops?: Dragon fruit	X	
Does the country have specific GAP research programmes?		
If yes, in which crops?: vegetable	X	

Market shares (estimated value, volume or area under control)	Year:
Size of chemical pest control market	
Size of biopesticides market	
Size of biological control agents market	

Major pest control requiring crops (requiring most pesticide applications)	$1^{\mathrm{st}}$	2 <sup>nd</sup>	3 <sup>rd</sup>
Affected crop	Rice		
Name(s) of pest(s)	Brown planthopper		
	Nilaparvata lugens		
Estimated crop loss			
Affected area			
Number of pesticide applications			
or amount of pesticide used			
Government action taken	Yes		

Cooperation Projects			
Purpose/Target	Donor	Amount	Years (start-end)
IPM on rice	Denmark		2000-2006
IPM on Vegetable	FAO		1996-2007
IPM on cotton	FAO-EU		1996-2004
IPM on tea	CIDSE (Norway)		1996 to now
Purpose/Target of government follow-up programmes		Amount	Years (start-end)

Pest Management Extension	Year: 2005	
Number of farmers trained in IPM during the year	94 700	
Number of IPM-FFS conducted during the year	176 (vegetable)	
	40 (cotton)	
Number of farmers trained in GAP standards during the year		
Area under IPM/low pesticide management [ha]	> 29 provinces (DANIDA)	
Area under organic/pesticide-free management [ha]		
Crops in which IPM or other ecology friendly programmes are successfully implemented: <i>Rice</i> , <i>cotton</i> , <i>vegetable</i>		
Crops grown organic/pesticide-free:		

#### **Progress and Constraints**

#### Main Progress in Recent Years (legislation, policies, infrastructure, investments, training, etc.)

- IPM Training: 2 620 Trainers (Training of Trainers); 5 918 farmer trainers (training of farmer trainers); 31 185 FFS; 944 119 trained farmers (FFS).
  - Farmer analysis skills and critical thinking improved.
  - Farmers have become more independent in decision-making.
  - Positive impact on human health and environment. Farmer trainers play important role in developing district and commune agricultural development plans.
  - IPM field studies have had significant impact on provincial decision-maker in determining policy regarding recommendations on pesticide management, seed rates and nitrogen application.
- Impact of IPM: insecticides (-60%); all pesticides (-30%); seed rate (-16%); nitrogen (-15%); yield (+8%); input cost (-8%); income (16%).

#### Main Constraints (personnel, infrastructure, administrative, operational, training, etc.)

- It is difficult to control pests in the field.
- There is no method for controlling effectively BPH and stunt disease in practical conditions of Viet Nam.

#### V. PESTICIDE MANAGEMENT

The information presented below is not updated and is the same as the information presented earlier in the previous edition of the plant protection profiles from Asia-Pacific countries, which was published in 2007.

#### List of Key Legislation/Regulations/Rules

- 2002 Regulation on Management of Pesticide, issued together with the Government's Decree No. 58/2002/ND-CP of 3 June 2002
- 2002 Regulations on Procedures for Registration, Production, Formulating, Re-Packaging, Export, Import, Trading, Storage, Transport, Usage, Disposal, Labeling, Seminars and Advertisement of Pesticides, issued 18 December 2002 together with Decision No. 145/2002/QD-BNN issuance.
- 2003 Regulations on Control of Pesticide Quality and Residue and Field Trial of Pesticides for Registration in Viet Nam; Issued in conjunction with Decision No. 50/2003/QD-BNN dated 25 March 2003 by the Ministry of Agriculture and Rural Development.
- 2002 Regulation on the Issue Professional Certificate for Production, Formulation, Re-Packaging and Business of Pesticide, issued in conjunction with Decision No. 91/2002/QD-BNN on 11 October 2002 by the Ministry of Agriculture and Rural Development.
- 2005 List of Pesticide allowed to use, restriction and prohibition of usage in Viet Nam, issued with Decision No. 22/2005/QD-BNN of 22 April 2005 by the Ministry of Agriculture and Rural Development.

Web source for further information: –

Policies (regarding pesticide management)	Yes	No
Do you have national pesticide reduction targets?		x
If yes, what is the target:		X
Have you ratified the Rotterdam (PIC) Convention?		X
Have you ratified the Stockholm (POP) Convention?	X	
Have your ratified the Basel Convention? (hazardous wastes)	X	
Have your ratified the Montreal Protocol? (MeBr phasing-out)		
Have you reported the observance of the Code of Conduct to FAO according to Art. 12 of the Code?		X
Have you adopted Good Laboratory Practices (GLP)?	X	
Pesticide Registration		
Do you require pesticides to conform to relevant FAO or WHO specifications?	X	
Do you allow the "me-too" registration and sale of generic pesticides?	X	
Do you require data on product equivalence for generic registration?	X	
Do you conduct country-specific risk assessments for		
occupational risks?		X
consumer risks?		X
environmental risks?		X
Have you adopted the Global Harmonized System (GHS) for pesticides hazards evaluation and labelling?	X	
Do you accept evaluation results from other countries?		X
Do you accept field studies conducted in other countries?		х
Do you require environmental fate studies?	X	

Incentives/Disincentives		
Do you have a special tax on pesticides to cover externality costs?		X
Do you subsidize or provide low-cost pesticides?		Х
Do you subsidize or provide low-cost biopesticides?	X	

Organization of Plant	Responsible Organizational Unit
<b>Protection Functions</b>	(Ministry/Department/Unit)
Legislation	MARD/PPD
Registration	MARD/PPD
Licensing of shops	MARD/ State PPD
Licensing of field applicators	MARD/PPD
Enforcement/inspections	MARD/PPD/Inspection Division
Testing of pesticide efficacy	MARD/PPD/Pesticides Div/Pesticides Control Center North
Development of pesticide use	MARD/PPD
recommendations	WARD/FFD
Safe use training/extension	MARD/PPD
Food residue monitoring	MARD/PPD
Environmental monitoring	Ministry of Natural Resources and Environment
Health monitoring	Ministry of Health
Other Stakeholders:	
Pesticide Industry Association	
Civil Society Organizations	Vietnam Plant Protection Assoc. (VPPA)
(NGO, etc.)	Victiani Fiant Flotection Assoc. (VFFA)

Infrastructure	Year: 2005
Number of registration officers	6
Number of enforcement officers	2
Number of department quality control laboratories	2
Number of quality control laboratory personnel	24
Number of department residue analysis laboratories	2
Number of residue laboratory personnel	24

## **Key Situation Indicators**

Pesticide Trade:	Tons	\$ '000 Value
Imports	35 000	231 875
Manufacture		
Export		
Domestic Use/Sales		
Pesticide Use Profile: 2005	Tons (a.i./formulation to be specified)	\$ '000 Value
Agriculture	35 000	
Chem. Insecticides	33%	
Chem. Fungicides	32%	
Chem. Herbicides	29%	
Chem. Others: e.g. molluscicide, acaricide	1%	
Other: e.g. Avamectrin, Bt, Neem		
Other purposes	328	
TOTAL	35 328	> 231 875

## **Post Registration Monitoring**

Testing, Quality Control and Effects in the Field	Yes	No
Do you have significant problems with low-quality pesticides in the market?	X	
Do you have significant problems with pesticide resistance?	X	
Do you have a list of pesticides under close observation for problems		X
Source for more information: –		

Health and Environmental Information	Yes	No
Do you maintain data on pesticide poisoning cases?		X
Do you have a system to monitor pesticide residues in food?	X	
Do you have a system to monitor pesticide residues in the environment?	X	
Do you have significant problems of environmental contamination from pesticides?	X	
Do you have data on pesticides effects on wildlife and ecosystems?		X
Source for more information: –		

Pesticide Disposal	Yes	No
Do you have system to collect and safely dispose of used containers and small quantities of left-over pesticides?	X	
Do you have an inventory of outdated and obsolete pesticides in the country? (e.g. banned and no longer traded, but still in storage)	X	
Do you have illegal trade in pesticides? if yes: what is the estimated amount:		х
Source for more information: –		

## **Key Operation Indicators**

Registration/Regulation/Monitoring	Year:		
Registi ation/Regulation/Monitoring	a.i.*	Trade Name	
Number of registered pesticide products	590	1 743	
Number of registered biopesticides (Avamectrin, Bt, Neem, etc.)		60	
Number of restricted-use pesticides/formulations	17	29	
Number of banned pesticides	29		
Number of licensed outlets	updating		
nber of licensed field applicators (professional and/or farmers) updati		ating	
Number of licensing violations reported during year	>2 000		
Number of quality control analyses conducted during year	ar 2 000		
Number of food samples analyzed for pesticide residues during year	nber of food samples analyzed for pesticide residues during year updating		
Number of samples exceeding MRL	updating		
Number of environmental samples analyzed for pesticide residues	updating		

<sup>\*</sup> active ingredient

Pesticides Rest	tricted in Recent Years
Year	Name of active ingredient or hazardous formulation

<b>Pesticides Ban</b>	ned in Recent Years
Year	Name of active ingredient
2005-2006	updating

Cooperation Projects			
Purpose/Target	Donor	Amount	Years (start-end)
Purpose/Target of government follow-up pr	ogrammes	Amount	Years (start-end)

#### **Progress and Constraints**

#### Main Progress in Recent Years (legislation, policies, infrastructure, investments, training, etc.)

- Legal document of pesticide management is more and more comprehensive
- Number of Biopesticide increased
- New equipments

#### Main Constraints (personnel, infrastructure, administrative, operational, training, etc.)

- Lack of equipments for pesticide residue and quality analysis
- Lack of human resource for this area
- Pesticide resistance
- Pesticide residue level on agricultural products is big issue

#### VI. ADDITIONAL ISSUES OF INTEREST

Genetically Modified Crops	
Name of GMO Crop	Area under Cultivation [ha]

### Appendix I

## Tables showing analyses of 25th session country reports

At the 25<sup>th</sup> Session of the Asia and Pacific Plant Protection Commission held in Beijing, China, from 27-31 August 2007, 19 country reports were presented by representatives of the Commission's member countries and Japan. The member countries were requested to follow the established guidelines for country reports. The topics covered by the reports were analyzed separately with details as follows:

#### **CONTENTS**

## **Analysis of Each Topic Covered by the Country Reports**

#### 1. Introduction

#### 2. Outbreaks of Major Pests

- 2.1 General Reporting According to Guidelines
- 2.2 Crop with Pest Outbreaks
- 2.3 Causal Organism
- 2.4 New Invasive Species

#### 3. Integrated Pest Management

- 3.1 National IPM Policy
- 3.2 IPM Programmes
- 3.3 Results from IPM Research
- 3.4 International Cooperation
- 3.5 Development of Pest Control
- 3.6 Pest Control Extension

#### 4. Plant Quarantine

- 4.1 NPPO Structure and Organization
- 4.2 Implementation of ISPM ISPM 15: Wood Treatment
- 4.3 ISPM 2/11: Progress of Risk Assessment
- 4.4 ISPM 19: List of Regulated Pests
- 4.5 ISPM 10: Pest-free Places
- 4.6 Use of IPP for Information Exchange
- 4.7 Phytosanitary Capacity Evaluation and Training
- 4.8 Proposals for RSPMs and ISPMs

#### 5. Pesticides

- 5.1 List of Regulations and Legislation
- 5.2 Status of Ratification and Implementation of Rotterdam Convention, Challenges and Opportunities
- 5.3 Implementation of International Code of Conduct
- 5.4 Monitoring and Management of Pesticide Residues
- 5.5 Development and Application Status of Biopesticides Including Botanical Pesticides
- 5.6 List of Banned/Prohibited Pesticides (Year, Insecticides, Fungicide, Herbicide)
- 5.7 Name and Address of National Authority for Pesticide Registration

#### 6. Development of International Cooperation Projects or Programme for Plant Protection

#### 7. Name of National Plant Protection Organization

#### 8. Conclusion

**Table 1:** Report Guideline Topics
Covered by the Country Reports

**Table 2:** Conclusion (in the Country Reports)

## **Guidelines for Country Report**

#### 1. Introduction

Guidelines for Country Report:

General review of progress including technical, policy/legal, infrastructural and institutional development and challenges in national plant protection since 2003.

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
1.1 Highlights																				
General Introduction			X	x	x	x	x	x	x	x	x	x	X	X	x	X	x	x	x	17
Highlights of progress																				
technical progress	IRA	IPM	X		х		X			х	х					х	х	х		10
new projects	Х		Х		х		X		х	х	х	х			х	X	X	X	X	13
policy/legal																				
new legislation			X	х		х	X	х	х	х	х	х				X	х	х	х	13
new policies			X	х			X	х	х	х	х	X			X	X	X	X	X	13
new infrastructure	х		X			х	X		х	х	х	х		X	х	х	х			12
institutional changes	X	х	X	х		х	X		х	х			X		X		X			11
challenges																				
lack of facilities		х				X			х	х	х						X			6
lack of qualif. pers.		х				х			Х	Х	х						X			6
lack of tech. assist.				х					Х		х						Х			4
global warming			X																	1

<sup>\*</sup> Japan is not a member country of APPPC.

### 2. Outbreaks of Major Pests

Guidelines for Country Report:

Infested crops, causal organism, estimated loss; actions and areas covered by control measures; management of invasive species

#### 2.1 General Reporting According to Guidelines

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
2.1 Responses																				
No response				X				X				x	X			X				5
infested crops		х	х		х	х	Х			х	х				х			х	х	10
causal organisms		х	х		х	х	х		х	х	х			х				х	х	11
estimated loss		х																		1
control measures/area		х	х		х	х												х	х	6
invasive species	X	Х	Х			Х								Х	Х		Х	Х	Х	9

<sup>\*</sup> Japan is not a member country of APPPC.

## 2.2 Crops with Pest Outbreaks

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
2.2 Crops																				
No response				Х				х	Х			х	х			Х	х			7
Rice		X	Х				Х			Х	X			Х				Х	Х	8
Fruit					Х	Х					X			Х						4
Vegetables											X			Х						2
Corn																				
Coconut palms		Х													Х				Х	3
Cotton											X			Х						2
Sugarcane														Х						1
Wheat			Х																	1
Soy-/Mungbean																				
Potato						Х					X									2
Peanut																				
Cassava																				
Sweet potato																				
Jute																				
Oil palms																				
Date Palm																				
Ornamental palms																				
Aquatic weeds																				
Mangoes					Х						X			Х				X		4
Others	Х										Х									2

<sup>\*</sup> Japan is not a member country of APPPC.

## 2.3 Causal Organism

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
2.3 Pests																				
No response				х				х				х	х		х					5
No outbreaks																	Х			1
ВРН		Х	Х			Х				Х						X	X		Х	7
rice stem borer			х																	1
Rodents										Х										1
Armyworm																				0
Helicoverpa amigera																				0
Grasshopper/Locust			X		X	X														3
rice blast			X				X									X				3
rice leave beetle																				0
sheath blight																X				1
corn stem borer																				0
Diamond back moth		X						X												2
Swarm. caterpillar/rice																				0
rice water weevil																				0
rice sheath brown rot																				0
rice tungo virus																				0
potato 28-spotted beetle																				0
potato late blight																				0
red spider mite																				0
fruit fly					Х	X								X				X		4
Golden Apple Snail		X								X										2
rhinoceros beetle																				0
Wooly aphid/sugarcane																				0
Others	X		X		X	X	X	X		X	X			X		X			X	11

<sup>\*</sup> Japan is not a member country of APPPC.

#### 2.4 New Invasive Species

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
2.4 Invasive Pests																				
Brontispa (Coconut beetle)		х							х						х				х	4
Citrus cancer																				
Current lettuce aphid																				
European house borer																				
Willow Sawfly																				
Stenocranus pacificus																				
Partenium weed																	X			1
Leaf miner Liriomyza																				
Phoma black stem sunfl.																				
coconut mite																				
White peach scale																				
Bean weevil																				
Mexican bean weevil																				
Salvinia																	X			1
Water Hyacinth																	X			1
Weedy rice																		X		1
# Species Reported		1			9				1						1		3	1	1	17

<sup>\*</sup> Japan is not a member country of APPPC.

### 3. Integrated Pest Management

Guidelines for Country Report:

- 3.1 National IPM Policy
- 3.2 IPM Programmes sources amount of inputs impact of implementation
- 3.3 Results from research programmes concerned
- 3.4 International cooperation
- 3.5 Development of pests control insect diseases nematodes weeds
- 3.6 Pest control extension small farmers

## **3.1 National IPM Policy**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.1 IPM Policy																				
no/vague response	x		х	X				X		x			X							6
IPM Policy/Planning			X			X	X		X		X	х		X	X	X	х	X	х	12
IPM legislation									X		X									2
IPM expert group:			X																	1
IPM Section/Stations		х	X		Х						X									4
Natl. IPM funding						Х												X		2
IPM practice guidelines							X													1
Policies promoting																				0
End to pesticide subsidy																				0
Pesticide reduction targets			х		х	х										х		х		5
GAP standards			Х			Х					Х			Х	X		Х	X		7
Organic product standards																	х			1
IPM accreditation												Х								1

<sup>\*</sup> Japan is not a member country of APPPC.

## **3.2 IPM Programmes**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.2 IPM Programme																				
no response	х			х						ICM			X							4
IPM Activities		х	X		X		х	X	X		X	х		X	х	х	х	X	х	14
National IPM Programme		X	X		X		Х		X		X	х		X	х	X		X		11
IPM stations		X	X		X				x		X				x					6
Sources																				0
external support									X		X	х							х	4
only internal																				0
																				0
Impact																				0
Farm. pestic. reduct.		X	X		X									X		X	X	X		7
Yield/income increase		X	X		X												X	X		5
control/produc. efficency		X	X								X									3
reduced outbreaks			X														X			2
biopesticide increase			X		X			X	X							X	X			6
nat. pesticide reduction		x			x			х						X		X	X	X		7

<sup>\*</sup> Japan is not a member country of APPPC.

#### 3.3 Results from IPM Research

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.3 IPM Research																				
no response	х	X		х				х		ICM	х	х	х	х	х				х	11
Institutions																				0
ARC																				0
national IPM center					Х				Х											2
University																				0
Other/Project																				0
web database					Х															1
Research Areas																				0
Invasive Species									Х								Х			2
Weed IPM																	Х			1
Vector IPM																				0
Key pest density																		Х		1
Biocontrol			Х		Х	Х										Х	Х	Х		6
Biopesticides			Х		Х	Х										Х	Х	Х		6
Chemical Control																Х	Х			2
Cultural control																	Х			1
Resistance																	Х			1
Biodiversity																				0
GM																				0
Crops, general			X		Х	Х			Х							Х	Х			6
vegetables					Х												Х			2
fruits					Х											Х				2
rice					Х				Х							Х				3
cotton																				0
corn																				0
sun flowers																				0
wheat																				0
sugarcane																				0
potato							X													1
soybean							Х													1
tomato							X													1
strawberry							X													1
Others (okra, asparagus, orchid, etc.)																Х		Х		2

<sup>\*</sup> Japan is not a member country of APPPC.

#### **3.4 International Cooperation**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.4 International																				
no response													x	X						2
Internat. coop	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х			Х	Х	Х	Х	Х	17
external support		Х	X		Х	X			X		X	X					X		Х	9
FAO									X	X	X	Х					X		Х	6
EU																	X			1
DANIDA																			Х	1
Norway												Х								1
ADB																				0
WB												Х								1
IFAD																				0
Pacific Community				X																1
Reg. IPM Veg. Programme		X							X										X	3
Others (WTO, ASEAN, etc.)			X		Х	X			X	X	Х					X	X	X	Х	10

<sup>\*</sup> Japan is not a member country of APPPC.

## **3.5 Development of Pest Control**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.5 Pest Control																				
no response				х								х	X							3
insect	Х		х		х	Х	Х		х	х	х			Х		Х	х	Х		12
diseases	Х		Х		Х				Х	Х	Х			Х		Х	Х	Х		10
weeds																	Х	X		2
nematodes						Х														1
locust					Х															1
																				0
Methods																				0
Biological control		Х	Х		Х	Х			Х	Х						Х	Х	X		9
Chemical		X				Х			Х	Х	Х			Х		Х	Х	X	Х	10
Biopesticides			Х		х	Х		х		Х	Х			Х		Х	Х	Х		10
Cultural/sanitation						Х											Х			2
Surveillance/Forecasting			Х		Х	Х			Х	Х						Х	Х			7
Resistance			Х							Х					X		Х			4
Mechanical/Physical			Х							Х				Х	Х					4
Natural control			Х			Х										X	Х		X	5
Pheromones																X				1
Sterile insect technique																		X		1
Crops, general			X		X	X	X		X	X							X	X	X	9
rice		X	X		X		X		X	X				X		X	X	X	X	11
vegetables			X		X		X		X	X				X			X	X	X	9
fruits			X		X	X	X			X				X		X				7
cotton					X									X						2
plantation																				0
corn															X			X		2
flowers																				0
wheat																				0
sugarcane														X						1
coffee																				0
coconut		X																	X	2
strawberry							X													1
citrus																X		X		2

<sup>\*</sup> Japan is not a member country of APPPC.

#### 3.6 Pest Control Extension

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
3.6 Extension																				
no response	X			x			x			x			X		x					6
FFS		X	X		X	X		X	X		X	х				х	X	X		11
Master/IPM Trainers		х	X						х			х					х	X		6
Farmer trainers		х	х									х					х	х		5
Media, etc.			х								х			х		х		х		5
IPM demonstration																х				1
pest control service			х																	1
spray services/demos			X		х											х				3
biocontrol facilities					Х											х		Х	Х	4
Neem factories											X							X		2

<sup>\*</sup> Japan is not a member country of APPPC.

#### 4. Plant Quarantine

Guidelines for Country Report:

- 1. NPPO organization
  - a. New or reorganized national plant protection organization (NPPO) structure with functions;
  - b. Plant quarantine (external and domestic if appropriate) network;
  - c. List of plant protection legislation, regulations, etc. with years promulgated;
  - d. Highlights of significant updates of new or revised plant protection legislation and regulations;
  - e. Name(s) and address of national plant quarantine authority-director general(s) and institution(s).
- 2. Status of Implementation of International Standards for Phytosanitary Measures (ISPMs) and APPPC Regional Standards for Photosanitary Measures (RSPMs), constraints; Planned time frame for implementation of ISPM 15.
- 3. Progress of pest risk analysis.
- 4. Progress in preparation of lists of regulated pests in accordance with ISPM 19.
- 5. Establishment of pest free places of production and pest free production sites.
- 6. Use of International Phytosanitary Portal (IPP) for information exchange, setting up national phytosanitary information website; other forms of distribution for the information.
- 7. Phytosanitary capacity evaluation (PCE); training on phytosanitary capacity building.
- 8. Proposal on Regional Standards for Phytosanitary Measures (RSPMs) and ISPMs to be set or revised; possible contribution for RSPM development to the Commission.

## 4.1 NPPO Structure and Organization

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.1 NPPO																				
no response																			X	1
a. NPPO structure																				
Description of PQ	X	х	x	х	X	X	X	х	X	х	X	X	X	X	х	X	X	X		18
Description of PO			х																	1
organization chart										х			X							2
year of reorganization										х			X							2
b. Plant quarantine																				
personnel	X		X			X	X		X	X		X		X		X	X			10
facilities	X		х						X	Х	X	X		X		X	X			9
c. Legislation/year		х		х		х	X	х	X	х	X	X	X	X	х	х	х	X		15
d Undates / plans															v					14
d. Updates / plans	X		X	Х		X	X		X	X	X	X		X	Х	X	Х	X		14
e. Quarantine address																				
(different from IPP point)																х				1

<sup>\*</sup> Japan is not a member country of APPPC.

## **4.2** Implementation of ISPM

	_				_										_					
	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.2 Status of ISPM																				
No answer																				4
Vague answer	7/			X				X	37			X	.,			.,		X		10
No problem	X	X	X			X			X		X		X		X	X			X	0
details																				0
details																				0
ISPM 01 – Principles										х										1
ISPM 02 – PRA	Х									^	Х		х	Х			Х			5
ISPM 03 – biocontrol	_ ^									Х	Λ		Α	Α			Α			1
ISPM 04 – pest free areas										^										0
ISPM 05 – glossery										х										1
ISPM 06 – surveillance										X	Х									2
ISPM 07 – export certif										X	Λ									1
ISPM 08 – pest status										X										1
ISPM 09 – pest eradicatio										X										1
ISPM 10 – pest free sites			х							X			х		X					4
ISPM 11 – quaran pests	Х		Λ							Λ			Α		Α					1
ISPM 12 – phytosan certif	Α									Х										1
ISPM 13 – notif non-com										X				Х						2
ISPM 14 – IPM										X				A						1
ISPM 15 – wood pack			х				Х			X							Х			4
ISPM 16 – regul non-quar			- 1				Λ.			X							-			1
ISPM 17 – pest reporting										X										1
ISPM 18 – irradiation																				0
ISPM 19 – list of reg pest			Х				Х			х	Х						х			5
ISPM 20 – import reg sys										X										1
ISPM 21 – regul non-quar			Х		X		X													3
ISPM 22 – low pest										х										1
ISPM 23 – inspection										х										1
ISPM 24 – equivalence										X										1
ISPM 25 – consignments										х										1
ISPM 26 – fruit flies																				
ISPM 27 – protocols																				
-																				
RSPM 01 heat treatm																				
RSPM 02 training																				
RSPM 03 Tephritid free																				
RSPM 04 Thephritid stat																				
NSPM																				
preparation																				

<sup>\*</sup> Japan is not a member country of APPPC

#### **ISPM 15: Wood Treatment**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
ISPM 15							Х													
No answer	х	X	X	х	X	х		X	X		х	X	X	X	X	X		х	X	16
import										X										1
export										X							X			2
treatment by MeBr																	X			1
treatment by heat treatm.																				

<sup>\*</sup> Japan is not a member country of APPPC.

#### 4.3 ISPM 2/11: Progress of PRA

#### Definition

Pest Risk Analysis: The process of evaluating biological or other scientific and economic evidence to determine whether a pest should be regulated and the strength of any phytosanitary measures to be taken against it [FAO, 1990; revised IPPC, 1997]

Pest Risk Analysis (PRA) consists of three stages: initiating the process for analyzing risk, assessing pest risk, and managing pest risk.

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.3 PRA																				
No answer/none		X		X				X	Х	X		X			X	X			X	9
General response	X		X		X	X	X				х		X					х		8
Have used PRA	X		X		X		X						X	X			Х	х		8
too difficult/lack experts																				0
Status																				0
Qua. Commodities																				0
Import Comm/origin	X				X															2

<sup>\*</sup> Japan is not a member country of APPPC.

## **4.4 ISPM 19: List of Regulated Pests**

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.4 ISPM 19 lists																				
No info	X	X		х	X			х	х			X		х	x			x	X	11
No list											X									1
List of Regulated pests			х			х	X			X			Х				X			6
List quarantine pests														Х		X				2
List non-quarantine pests																				

<sup>\*</sup> Japan is not a member country of APPPC.

#### 4.5 ISPM 10: Pest free Places

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.5 Pest free areas																				
No response	х	Х		Х	х		X	х	Х					Х		х		х	х	11
No sites						Х				X		Х					Х			4
Have sites		Х									х		х		Х					4
NPPO verification																				0
external verification																				0
"private" sites																				0
Free of:																				
fruit fly		X								X										2
papaya ringspot virus																				0
white rust/chrysanthemum																				0
mango weevil															X					1
Apple/codling moth		X																		1
Others															X					1
Crops																				
pineapple																	X			1
tomato													X							1
potato													X							1
onions																				0
ornamentals																				0
cirus																				0
mangoes											X				X					2

 $<sup>\</sup>ensuremath{^{*}}$  Japan is not a member country of APPPC.

## 4.6 Use of IPP for information exchange (updated in July 2009)

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.6 Use of IPP for information	n exc	char	ıge *	**																
IPPC contact point	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	18
IPP editor	1	1	1	3	1	2	5	2	3	9	4	2	1	1	1	1	1	2	1	42
Official pest report	25		2			2						1								30
Description of NPPO	1	1	1		3	1	1			1			1		1			1	1	13
Emergency actions	3																			3
Entry points	3				1		2			1		1	2					1		11
List of regulated pests	5	3	1										1			1			1	12
Phytosanitary restrictions	6	1	1		1	2	2			5			2		6			5	1	32
Rationale for phytosanitary requirements	5																			5
Non-compliance										1									2	3
Organizational arrangements													3							3
Pest status												1	1							2
Publications	10	4	2	3	2	2	2	2	2	9	2	2	3	2	2	1	3	2	12	67
News	8	1																		9
Websites	17	1	1		1	1				3			9		3		1		3	40
Projects	5	7	6	6	4	19		1	3	2	2	1		1	13	1	1	17	12	101
Members	3			2	2	2	2						5			6			1	23

<sup>\*</sup> Japan is not a member country of APPPC.

#### 4.7 Phytosanitary Capacity Evaluation and Training

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.7 PCE																				
No answer	x	х	x	x	X	х		x	х			х	x	X	x	x		x	X	15
PCE conducted							х				х						х			3
Training needs assessm.																				0
Training																				
organized							X			х							х			3
participated										х							X			2
international							X			х							X			3
national																				0
Topics																				
PCE/building										х										1
pest risk analysis																				0
Phyto treatment										Х										1
legislation										Х										1
biosecurity																				

<sup>\*</sup> Japan is not a member country of APPPC.

<sup>\*\*</sup> https://www.ippc.int/IPP/En/nppo.jsp

#### 4.8 Proposals for RSPMs and ISPMs

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
4.8 Proposals																				
No proposal	х	х		х	х	Х	х	х	X		х	х	Х	х	Х	х	х	Х	х	17
RSPM			х							х										2
ISPM			х																	1
able to contribute	Х						Х			Х	Х						Х			5

<sup>\*</sup> Japan is not a member country of APPPC.

#### 5. Pesticides

Guidelines for Country Report:

- 5.1 List of regulations and legislation
- 5.2 Status of ratification and implementation of Rotterdam Convention, challenges and opportunities
- 5.3 Implementation of International Code of Conduct
- 5.4 Monitoring and management of pesticide residues
- 5.5 Development and application status of biopesticides incl botanical pesticides
- 5.6 List of banned/prohibited pesticides (year, insecticide, fungicide, herbicide)
- 5.7 Name and address of national authority for pesticide registration

#### 5.1 List of Regulations and Legislation

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.1 Legislation																				
No response	X			X									X							3
General response			X		Х			X			х	X			X	Х		X	X	9
List of legislation		X				X	X		X	X		X		X				X		8
																				0
Manufacture/export							X							X						2
Registered products							X			x	х			X		х		X	X	7
																				0
Consumption data											х	X								2
Local formulation																				0
Illegal import																				0

<sup>\*</sup> Japan is not a member country of APPPC.

## **5.2** Status of Ratification and Implementation of Rotterdam Convention, Challenges and Opportunities

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.2 Rotterdam																				
No response	х	х	х	х	х	х						х	х	х				х		10
Vague/unknown								х	х		х				х				х	5
Rotterdam ratified							х			х						х	х			4
Rotterdam implemented							X			Х	X					X	Х			5
Actual ratification																				
Challenges																				
enforcement capacities																				0
risk assessment expertise																				0
stakeholder consensus																				0
m-parathion; monochrot.																				0

<sup>\*</sup> Japan is not a member country of APPPC.

## **5.3** Implementation of International Code of Conduct

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.3 Code of Cond.																				
No/vague response	X	х	X	х		х		X	X			X	X	X	X	X			X	13
Implemented					х		X			х	х						х	X		6
																				0
GAP										х	х						х	х		4
Safe use training																	х	х		2
Product stewardship							х											х		2
Licensing of handlers										х										1
Pesticide standards										х								Х		2
Pesticide recommendations																				0
Pesticide disposal														·				X		1

<sup>\*</sup> Japan is not a member country of APPPC.

#### 5.4 Monitoring and Management of Pesticide Residues

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.4 Residues																				
No response	X			X		X			х				X	х		х			х	8
Vague response		Х						Х			Х	Х								4
Residue laboratory					Х												Х	Х		3
annual analyses			X																	1
exceeding MRL			X															Х		2
Enforcement linkage																				0
Registration / MRL setting		X													X			Х		3
Import/export											X				X					2
Post-registration / policy										X										1
Blood																				0
Water							X			X								X		3
Resistance																				0
Food							X			Х							X			3
Fruits										X										1
Vegetables										X										1
Treated crops																	X			1
Others (soil, sediment, etc.)																		X		1

<sup>\*</sup> Japan is not a member country of APPPC.

#### 5.5 Development and Application Status of Biopesticides Including Botanical Pesticides

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.5 Biopesticides																				
No/vague response	X	x		X				X		х		х	х	x	X				х	10
used			X		X	X	X				X					X	X	X		8
registered			X		X		X				X					X		X		6

<sup>\*</sup> Japan is not a member country of APPPC.

### 5.6 List of Banned/Prohibited Pesticides (Year, Insecticide, Fungicide, Herbicide)

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.6 List Banned																				
No response	X	x	X	х	х	х		X				х	X		x					10
No of banned a.i.									х		х			х			х	X	х	6
List of banned							X			х								X		3
insecticide										х										1
fungicide										X										1
herbicide										х										1
rodenticide										X										1
fumigants										Х										1
No. of restricted											Х			X						2
Cancelled registrations										X	Х						X		X	4

<sup>\*</sup> Japan is not a member country of APPPC.

#### 5.7 Name and Address of National Authority for Pesticide Registration

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
5.7 Registration		X			х		х		X	х	х	x		X	х		X	х		11
No response	X		X	X		X		X					X						X	7
Address																X				1
Same as NPQO																				

<sup>\*</sup> Japan is not a member country of APPPC.

# **6.** Development of International Cooperation Projects or Programme for Plant Protection

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
6. Cooperation																				
No response	х			х				х					х	х		х				6
Coop. needs	'-				х				х	х	х	х								5
Intern. memberships							Х		X	X	X	X			х		Х		х	8
Bilateral cooperation					х	х	X			X	X						X			6
PQ Courses/workshops										X		х								2
Donors																				0
Denmark																				0
World Bank									Х			Х							х	3
EU									Α.			74							74	0
ASEAN						Х			х											2
CFC						Λ.			Α.											0
Germany			Х																	1
NRI/CAB			- 1																	0
Australia						Х			X	х	Х								Х	5
New Zealand						Λ.			X	Α	X								X	3
Japan						Х			X		Λ.								X	3
China						X			X	х									Λ.	3
South Korea						X			X	X										3
USA						X			Α	Α										1
Netherlands			X			Α														1
FAO Vegetable/FAO		Х	X							Х		Х							Х	5
Oxfam		Λ	^						Х	Λ		Λ.							Λ	1
Others									Α		Х							х	х	3
Projects											Λ	Х						^	Λ	1
IPM											X	X							Х	3
Plant Quarantine						Х					X	X							X	4
PP						Λ					X	Λ					Х		Λ	2
Pesticide			Х				Х				X						Λ			3
Migratory locust & Kaz			^								Λ									0
Migratory pests –S. Korea																				0
Cotton IPM/EU																				0
Cotton bollworm/CFC																				0
Cotton Bt/NRI Cabi	1																			0
Obsolete pestic./GTZ																				0
ACIAR fruit fly/Austr																				0
ASEAN IPM Knowledge																				0
Fruit fly treatment																			Х	1
NZAID-Mekong	1						_												Λ.	0
* Ianan is not a member country of	A DDD		<u> </u>		<u> </u>	<u> </u>		<u> </u>	<u> </u>		<u> </u>	<u> </u>		<u> </u>	L					

<sup>\*</sup> Japan is not a member country of APPPC.

## 7. Name of National Plant Protection Organization:

 ${\it Guidelines for \ Country \ Report:}$ 

Name of the Chief:

Designation:

Office Address:

Phone and Fax:

E-mail:

Website:

In addition, please provide name and address of **head and institutions** who should be **officially contacted** for future consultation, nomination, invitation, etc. if necessary for administrative procedures.

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
7. NPPO		х				X			х											3
No response	x			х															х	3
NPP Organization			X		X		X	х		X	х	X	X	X	X	х	х	X		13
Contact(s)													X			Х				2
different from IPP																				0

<sup>\*</sup> Japan is not a member country of APPPC.

## 8. Conclusion

**Table 1: Report Guideline Topics Covered by the Country Reports** 

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
1. Introduction																				
1.1 Highlights	X	X	Х	X	X	X	X	X	Х	x	х	X	X	X	х	X	X	X	X	19
2. Outbreaks																				
2.1 Infested crops		х	х			х	х			х	х				х			х	х	9
2.2 Causal organisms		х	х		х	х	х		х	х	х						х		х	10
2.3 Estimated loss		х	х																	2
2.4 Control Measures	х	х	х			х	х			х	х				х			х	х	10
2.5 Invasive species	х	х	х			х									х		х	х	х	8
3. IPM																				
3.1 IPM policy		Х	Х		Х	Х	Х	Х	х		х	Х		Х	х	Х		Х	Х	14
3.2 IPM programmes		Х	Х		Х	Х	Х	Х	Х		Х	Х		Х	х	Х	Х	Х	Х	15
3.3 IPM research							х		х									х		3
3.4 Cooperation		х	х		х		х		х		х	х						х	х	9
3.5 Pest control		х	х		х	х		х	х		х					х	Х	х	х	11
3.6 Extension		х	х				х		х		Х	х				х		х		8
4. Plant Quarantine																				
4.1 NPPO structure	x	х	х	Х	Х	х	х		х	х	х	х	х	Х	х	х	Х	Х		17
PQ network	1	X	X			X	Х													4
Legislation		Х	х	х		х	х	х	х	х	х	х	Х	х	х	х		х		15
Updates	х	х	х	х		х	х		х	х	х	х	X		х	х	х	х		15
Address													х			х				2
4.2 ISPM		х	х			х	х		х	х	х		Х	х	х	х	X			12
ISPM 15			Х							х							х			3
4.3 PRA	х		х		х		х				х		х	х				х		8
4.4 Regulated pests			х			х	х	х		х	х		х				Х			8
4.5 Pest free places			х			х				х	х	х	х				X			7
4.6 IPP			х			X	X			х	X		X				X			7
4.7 PCE							х			х	X						X			4
4.8 Proposals			х							х	х						X			4
5. Pesticides													X		x	X		X	X	5
5.1 Regulations		х	х			х	х		х	х	х	х		х		х	х	х	х	13
5.2 Rotterdam							Х		Х	х	х					Х	Х			6
5.3 Code					х		х			х	х						X	х		6
5.4 Residues		х	х		х		х			х	х	х			х		Х	х		10
5.5 Biopesticides			Х		X	Х	Х	X		х	Х					X	Х	Х		10
5.6 Banned							Х		Х	Х	X			X			X	X	X	8
5.7 Address																				0
6. Cooperation	Х	X	Х		Х	Х	Х		Х	Х	Х	Х			Х		Х	Х	Х	14
7. NPPO Address													Х			X				2
8. Conclusion				X					Х	Х					Х	Х	х	Х		7

<sup>\*</sup> Japan is not a member country of APPPC.

**Table 2: Conclusion (in the Country Reports)** 

	Australia	Cambodia	China	Fiji Islands	India	Indonesia	Japan*	Korea, DPR	Lao PDR	Malaysia	Myanmar	Nepal	New Zealand	Pakistan	Philippines	Rep. of Korea	Sri Lanka	Thailand	Viet Nam	TOTAL
8. Conclusion																				
No response	x	х	х		х	х	Х	х			Х	х	х	х					х	12
Two response	- A		- A		- 1	- 1	- 1	- 1			- 1	- 1	Α.	- 1					- 1	12
Importance of																				
WTO/trade									х	X					X					3
Intern. coordination									X											1
IPM/environment/GAP									X						X	х	X			4
Pesticides/food safety										х						х	х			3
PP&Q/Challenges				х					х							х				3
Quality control										х										1
Biodiversity									х											1
Production/poverty																				0
Control of weedy rice																		х		1
Need to strengthen																				
Infrastructure				х					х	х										3
Human resources									х	X										2
Laws/enforcement				х												х		х		3
SPS standards									X	X					X					3
PRA									х											1
Pesticide reduction																	X			1
Pest diagnosis									X	X										2
Extension																				0
Farmer decision-making																				0
High farm productivity																				0
international coop										Х										1
IPM/GAP															Х		Х	х		3
biocontrol																	Х			1
APPPC info exchange																Х				1
ISPM implementation										Х										1
GAP implementation										X					X		X	х		4

<sup>\*</sup> Japan is not a member country of APPPC.

## **Implementation of International Standards for Phytosanitary Measures (ISPMs)**

(Period 2007-2008)

**Relevance:** (1) l = low; (2) me = medium; and (3) h = high.

**Implementation:** (1) N = none; (2) P = partial; (3) M = most; and (4) F = full.

		ralia		adesh		Cambodia		ma	lands		lia		nesia	**		, DPR		PDR	o ion	19514	ımar		nepai	ealand		stan	pines		Republic of Korea	Sri Lanka		land		Viet Nam	]	pro	files	es fro subn 7-200	nitted	
	Implementation of ISPMs during the period 2007-2008	Anstralia	TOTAL	Bangladesh		Caml	5	China	Fiii Islands		India		Indonesia	Ianan**	dho	Korea, DPR		Lao PDR	Molecuio	Mais	Myanmar	N.	aki	New Zealand		Pakistan	Philippines		Republic	SriL		Thailand		Viet		Relevance			Implementation	
No.	International Standards for Phytosanitary Measures (ISPMs)	Relevance	Implementation	Relevance	Implementation	Relevance	Relevance	Implementation	Relevance	Implementation	Relevance	Relevance	Implementation	Relevance	Implementation	Relevance	Relevance	Implementation	Relevance	Implementation	Kelevance	Relevance	Implementation	Relevance	Implementation	Implementation	Relevance	Relevance	Implementation	Relevance	Implementation	Relevance	Palayanga	Implementation	1 (low)	me (medium)	h (high)	N (None)	P (Partial)	F (Full)
01	Principles of plant quarantine as related to international trade	h	F	h	Fr	ne -	h	F	h	P	h I	F h	М	h	M	h N	1 1	l N	h	P 1	n M	I h	М	h :	F I	n M	h I	i h	F	h	F	h N	M m	ne M	1	2	17	1	2 8	8 8
02	Guidelines for pest risk analysis	h	F	h	F	- F	h	F	h	М	h	Fh	F	h	F	h F	1	l N	h	M	ne F	h	M	h	Fn	ne M	h	h	F	h	М	h I	N I	n P	1	2	16	2	4 5	5 9
03	Code of conduct for the import and release of exotic biological control agents	h	F	h :	М	- F	me	М	h	М	h N	И h	F	me	M	me N	1 m	e P	me	Pn	ne F	h	N	h	F n	ne M	h l	i h	F	me	Р	h I	Fŀ	n N	0	8	11	2	5 7	7 6
04	Requirements for the establishment of pest free areas	h	F	h	Р	- N	me	Р	h	P I	h P	h	N	h	F	me N	1 1	l N	h	P n	ne N	h	Р	h	F	1 P	h l	7 h	F	-	-	1 1	V m	ne P	3	4	11	6	8 (	) 5
05	Glossary of phytosanitary terms	h	F	h	Fr	ne -	h	F	h	F	h I	F h	. M	h	F	h I	7 m	e P	h	Fn	ne F	h	F	h :	F I	n M	h l	7 h	F	h	F	h	F l	n P	0	3	17	0	3 2	2 14
06	Guidelines for surveillance	h	F	h	Р	- F	h	F	h	F	h N	M h	P	h	F	h N	1 1	l N	h	M n	ne F	h	М	h	Fn	ne M	h l	F h	F	h	М	h l	P ł	ı F	1	2	16	1	5 6	5 8
07	Export certification system	h	F	h	F	- N	1 h	F	h	F	h l	F h	F	h	F	h F	7 h	n M	h	М	h N	I h	М	h	F	n F	h l	h	F	h	F	h I	Fŀ	n P	0	0	19	0	1 5	5 14
08	Determination of pest status in an area	h	F	h	Р	- F	h	F	h	F	h N	Иh	F	h	F	h I	7 1	l N	h	M	ne F	h	Р	h :	Fn	ne P	h l	l h	F	me	Pr	ne	P ł	n F	1	4	14	2	7 2	2 9
09	Guidelines for pest eradication programmes	h	F	h	Р	- F	h	F	h	P	h N	M m	e P	h	F	me N	J 1	l N	h	M	ne F	h	Р	h :	F	1 P	h l	h	F	me	P	ne ]	P ł	n N	2	5	12	3	10 2	2 5
10	Requirements for the establishment of pest free places of production and pest free production sites	h	F	h	Р	- N	I h	F	h	Р	h N	И m	e N	h	F	h I	₹ 1	I N	h	Fn	ne F	h	N	h I	Fn	ne P	h I	N h	F	me	Р	h l	F I	n P	1	4	14	5	6	1 8
11	Pest risk analysis for quarantine pests	h	F	h	F	- F	h	F	h	М	h I	F h	F	me	М	h I	m	ie N	h	P	ne F	h	N	h :	F	n M	h l	i h	F	h	М	h	Fł	n P	0	3	16	2	5 4	4 9
12	Guidelines for phytosanitary certificates	h	F	h	F	- N	1 h	F	h	F	h l	F b	. F	h	F	h I	7 h	ı P	h	F	h M	I h	М	h :	F I	n M	h l	F h	F	h	F	h I	F m	ne P	0	1	18	0	2 4	4 14
13	Guidelines for the notification of noncompliance and emergency action	h	F	h	F	- N	l h	F	h	Р	h I	∃ h	M	h	F	h F	7 1	l N	h	M	ne F	h	N	h :	F n	ne P	h I	h	F	me	Р	h I	Fm	ne N	1	4	14	4	4 2	2 10
14	The use of integrated measures in a systems approach for pest risk management	h	F	h :	М	- F	h	F	h	F	h N	М 1	N	h	F	h N	1 1	I N	h	P m	ne F	h	Р	h	F n	ne P	h I	h	F	-	-	1 1	V m	ne N	3	3	12	5	5 2	2 7

Implementation of ISPMs during the period 2007-2008		Australia		Bangladesh		hodia		China	Fiji Islands		India		Indonesia		an**	npr	Korea, DPR		Lao PDR		***************************************		Nepal		New Zealand	stan		Philippines	of 17 and	or worea	anka		Thailand		Viet Nam		Responses from 19+1 profiles submitted (2007-2008)				
						Cambodia		Ch		Fiji E			Indo		Japan**		Korea		Lao		Malaysia		Ne		New Z		Pakistan		D	Republic of Korea		Sri Lanka			Viet		Relevance			Implementation	
No.	International Standards for Phytosanitary Measures (ISPMs)	Relevance	Implementation	Relevance	Implementation	Relevance	Implementation	Implementation	Relevance	Implementation	Relevance	Implementation	Relevance	Implementation	Implementation	Relevance	Implementation	Relevance	Implementation	Relevance	Relevance	Implementation	Relevance	Relevance	Implementation	Relevance	Implementation	Relevance Implementation	Relevance	Implementation	Relevance	Implementation	Relevance	Implementation	Tunlementation	1 (low)	me (medium)	h (high)	N (None)	P (Partial) M (Most)	F (Full)
15	Guidelines for regulating wood packaging material in international trade	h	F	h	F	-	N I	F	me	М	h	F	h	F h	F	h	M	h	F	h F	me	M	h	P ł	n F	h	М	h I	7 h	F	h	M	h	Fn	ne l	P 0	3	16	1	2	5 12
16	Regulated non-quarantine pests: concept and application	h	F	h	М	-	N I	ı P	me	Р	h	М	h I	N m	e M	h	N	1	N r	ne N	1 me	Р	h :	N I	ı F	me	Р	h I	h	F	-	-	1	N r	ne l	N 2	6	10	7	5	4 3
17	Pest reporting	h	F	h	F	-	P	F	h	M	h	M	h l	M h	M	h	M	1	N	h N	1 me	Р	h l	M	n F	me	Р	h I	i h	M	-	-	me l	M	ne I	N 1	4	13	2	3	9 5
18	Guidelines for the use of irradiation as a phytosanitary measure	h	F	h	Р	-	N n	e P	1	N	h	M	h I	N m	е -	h	N	1	N r	ne F	me	N	h	N ł	n N	me	Р	h I	me	e N	me	М	h	Fn	ne l	N 2	8	9	10	5	2 2
19	Guidelines on lists of regulated pests	h	F	h	М	-	P l	F	-	-	h	M	h	Fm	e M	h	Р	1	N	h N	1 h	Р	h	F	n F	me	Р	h I	h	F	-	-	h	F	h l	N 1	2	14	2	5	4 7
20	Guidelines for a phytosanitary import regulatory system	h	F	h	F	-	N I	ı F	h	F	h	M	h I	M h	М	h	F	1	N	h F	me	М	h l	M ł	n F	h	F	h I	h	F	h	F	h	F	h l	N 1	1	17	3	1	5 11
21	Pest risk analysis for regulated non- quarantine pests	h	F	h	P	-	N I	ı M	h	P	h	M	h	- m	e M	h	Р	1	N r	ne F	me	Р	me :	N I	ı F	me	М	1 -	h	F	h	M	1	N	h l	N 3	5	11	5	5	5 3
22	Requirements for the establishment of areas of low pest prevalence	h	F	h	Р	-	N n	e P	h	N	h	Pı	ne	P h	F	h	F	1	N	h N	1 me	Р	h	N I	n P	me	Р	h Ì	N h	F	-	-	1	N n	ne l	N 2	5	11	7	7	1 4
23	Guidelines for inspection	h	F	h	F	-	P I	F	h	F	h	F	h l	M h	F	h	M	1	N	h F	me	M	h l	M ł	n F	h	F	h I	i h	F	h	M	h	Fn	ne I	N 1	2	16	2	1	5 12
24	Guidelines for the determination and recognition of equivalence of phytosanitary measures	h	F	me	Р	-	N I	ı F	h	F	me	P	ne :	P h	F	h	М	1	N	h M	1 me	М	h	P	n F	me	М	1 -	h	F	-	- 1	1	N n	ne !	P 3	6	9	3	5	4 6
25	Consignments in transit	1	N	me	P	-	N I	F	h	F	me	P	ne l	M h	M	h	M	1	N	ne N	1 me	Р	h	N I	n F	h	M	h I	h	F	-	-	me	N	ne I	N 2	2 7	9	6	3	5 5
26	Establishment of pest free areas for fruit flies (Tephritidae)	h	F	h	Р	-	N I	ı P	h	М	h	М	h I	N h	F	h	Р	1	N r	ne N	l me	М	me :	N I	ı F	me	М	h I	h	F	-	-	1	N n	ne I	N 2	5	11	7	4	4 4
27	Diagnostic protocols for regulated pests	h	F	h	Р	-	N I	М	me	Р	h	М	h I	M h	F	h	P	1	N r	ne F	me	Р	h	N I	n F	me	Р	h I	h	F	-	-	me	P	h l	N 1	5	12	4	8	3 4
28	Phytosanitary treatments for regulated pests	h	-	-	-	-	- 1	ı F	h	М	-	-	h I	N h	F	-	-	h	N	h M	1 me	Р	h	- l	n -	-	-	h l	7 h	F	-	-	me	М	-	- 0	2	11	2	1	3 4
29	Recognition of pest free areas and areas of low pest prevalence	h	-	-	-	-	- 1	ı M	-	-	-	-	1 1	N h	F	-	-	h	N	h N	l me	Р	h	Р.	-   -	-	-	h I	7 h	М	-	-	1	N	-	- 2	1	8	4	2	2 2
30	Establishment of areas of low pest prevalence for fruit flies (tephritidae)	h	-	-	-	-	- 1	м	-	-	-	- 1	ne l	N h	F	-	-	h	N	h N	l me	Р	h	N I	l N	-	-	h N	N me	M	-	-	me	Р	-	- 1	4	7	6	2	2 1
31	Methodologies for sampling of consignments	h	-	-	-	-	- 1	F	-	-	-	-	h	P h	F	-	-	h	N	h N	l me	Р	h	P ł	n P	-	-	h I	h	F	-	-	1	N	-	- 1	1	10	3	5	0 3

\*\* Note:
Japan is not a member of APPPC.