



Food and Agriculture
Organization of the
United Nations



International
Plant Protection
Convention

INTERNATIONAL STANDARD FOR PHYTOSANITARY MEASURES 4

ISPM 4

ENG

Requirements for the establishment of pest free areas

Produced by the Secretariat of the
International Plant Protection Convention (IPPC)

This page is intentionally left blank

INTERNATIONAL STANDARDS FOR
PHYTOSANITARY MEASURES

ISPM 4

Requirements for the establishment of pest free areas

Produced by the Secretariat of the
International Plant Protection Convention
Adopted 2024; published 2024

© FAO 2024

Required citation:

IPPC Secretariat. 2024. *Requirements for the establishment of pest free areas*. International Standard for Phytosanitary Measures No. 4. Rome. FAO on behalf of the Secretariat of the International Plant Protection Convention.

The designations employed and the presentation of material in this information product do not imply the expression of any opinion whatsoever on the part of the Food and Agriculture Organization of the United Nations (FAO) concerning the legal or development status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. The mention of specific companies or products of manufacturers, whether or not these have been patented, does not imply that these have been endorsed or recommended by FAO in preference to others of a similar nature that are not mentioned.

The views expressed in this information product are those of the author(s) and do not necessarily reflect the views or policies of FAO.

© FAO, 2024



Some rights reserved. This work is made available under the Creative Commons Attribution-NonCommercial-ShareAlike 3.0 IGO licence (CC BY-NC-SA 3.0 IGO; <https://creativecommons.org/licenses/by-nc-sa/3.0/igo/legalcode>).

Under the terms of this licence, this work may be copied, redistributed and adapted for non-commercial purposes, provided that the work is appropriately cited. In any use of this work, there should be no suggestion that FAO endorses any specific organization, products or services. The use of the FAO logo is not permitted. If the work is adapted, then it must be licensed under the same or equivalent Creative Commons licence. If a translation of this work is created, it must include the following disclaimer along with the required citation: "This translation was not created by the Food and Agriculture Organization of the United Nations (FAO). FAO is not responsible for the content or accuracy of this translation. The original English edition shall be the authoritative edition."

Disputes arising under the licence that cannot be settled amicably will be resolved by mediation and arbitration as described in Article 8 of the licence except as otherwise provided herein. The applicable mediation rules will be the mediation rules of the World Intellectual Property Organization <https://www.wipo.int/amc/en/mediation/rules> and any arbitration will be conducted in accordance with the Arbitration Rules of the United Nations Commission on International Trade Law (UNCITRAL).

Third-party materials. Users wishing to reuse material from this work that is attributed to a third party, such as tables, figures or images, are responsible for determining whether permission is needed for that reuse and for obtaining permission from the copyright holder. The risk of claims resulting from infringement of any third-party-owned component in the work rests solely with the user.

Sales, rights and licensing. FAO information products are available on the FAO website (<https://www.fao.org/publications>) and can be purchased through publications-sales@fao.org. Requests for commercial use should be submitted via: <https://www.fao.org/contact-us/licence-request>. Queries regarding rights and licensing should be submitted to: copyright@fao.org.

When this ISPM is reproduced, it should be mentioned that current adopted versions of ISPMs are available for download on <https://www.ippc.int>.

For official reference, policy-making or dispute avoidance and settlement purposes, the only ISPMs that may be referred to are those published under <https://www.ippc.int/en/core-activities/standards-setting/ispms/#614>.

Publication history

This is not an official part of the standard

1993-05 Technical Consultation among Regional Plant Protection Organizations added topic *Pest free areas* (1993-001).

1993-05 Expert working group developed draft text.

1994-05 CEPM-1 revised draft text and requested that sufficient details be provided.

1995-05 CEPM-2 revised draft text for adoption.

1995-11 28th FAO Conference adopted the standard.

ISPM 4. 1995. *Requirements for the establishment of pest free areas*. IPPC Secretariat. Rome, FAO.

2015-06 IPPC Secretariat incorporated ink amendments and reformatted standards following revoking of standards procedure from CPM-10 (2015).

2017-04 CPM noted ink amendments to avoid the use of "trade partner". The IPPC Secretariat incorporated the ink amendments.

2010-03 CPM-5 added topic Revision to ISPM 4 (*Requirements for the establishment of pest free areas*) (2009-002) to the work programme.

2010-11 SC deferred.

2013-11 SC approved Specification 58.

2015-10 Secretariat revised Specification 58 to incorporate task on references to ISPM 4 as requested by the 2014-11 SC.

2020-12 / 2021-01 Expert working group met virtually and drafted standard.

2021-05 SC revised and approved for first consultation.

2021-07 First consultation.

2022-05 SC-7 revised and approved for second consultation.

2022-07 Second consultation.

2022-10 Revision of the draft by the steward.

2022-11 SC revised.

2023-05 SC revised and recommended the draft for adoption by CPM.

2024-04 CPM-18 adopted the standard.

ISPM 4. 2024. *Requirements for the establishment of pest free areas*. IPPC Secretariat. Rome, FAO.

Publication history last updated: 2024-04

CONTENTS

Adoption.....	4
INTRODUCTION.....	4
Scope	4
References	4
Definitions.....	4
Outline of requirements.....	4
BACKGROUND.....	4
IMPACTS ON BIODIVERSITY AND THE ENVIRONMENT	5
REQUIREMENTS	5
1. Initiation of a pest free area	6
1.1 Pest to be controlled.....	6
1.2 Identification of the area	6
1.3 Suitability of environmental conditions in the area.....	6
2. Establishment of the pest free area	6
2.1 Determination of pest status in the area	6
2.2 Controls on the movement of regulated articles.....	6
2.3 Establishment of buffer zones	7
2.4 Official declaration of pest free area	7
3. Maintenance of the pest free area	7
3.1 Regulatory framework.....	7
3.2 Surveillance for the maintenance of the pest free area.....	7
3.3 Notification of detection of the pest.....	7
3.4 Response to an outbreak.....	8
3.4.1 Delimiting survey to demarcate the outbreak area.....	8
3.4.2 Implementation of control measures	8
3.4.3 Increased surveillance in the outbreak area.....	8
3.5 Provisions for suspension, reinstatement or withdrawal of the pest free area status.....	8
4. Regular review and verification of implementation	9
5. Data collection, documentation and record-keeping	9
6. Communication and stakeholder engagement.....	9
7. Recognition of pest free areas.....	9

Adoption

This standard was first adopted by the Twenty-Eighth Session of the FAO Conference in November 1995. This first revision was adopted by the Eighteenth Session of the Commission on Phytosanitary Measures in April 2024 as the present standard.

INTRODUCTION

Scope

This standard describes the requirements for initiating, establishing and maintaining pest free areas (PFAs) as a phytosanitary measure to support the phytosanitary certification of plants, plant products and other regulated articles exported from the PFA or, if technically justified, as a phytosanitary measure required by the national plant protection organization (NPPO) of an importing country for the protection of an endangered area in its territory.

This standard does not cover pest free places of production or pest free production sites, the requirements for which can be found in ISPM 10 (*Requirements for the establishment of pest free places of production and pest free production sites*).

References

The present standard refers to ISPMs. ISPMs are available on the International Phytosanitary Portal (IPP) at www.ippc.int/core-activities/standards-setting/ispms.

Definitions

Definitions of phytosanitary terms used in this standard can be found in ISPM 5 (*Glossary of phytosanitary terms*).

Outline of requirements

A PFA is a phytosanitary measure that may be used to facilitate safe trade and protect plant resources. National plant protection organizations should consider a PFA to be a phytosanitary measure that, when used alone, is sufficient for managing the risk associated with a specified pest.

When initiating, establishing or maintaining a PFA, NPPOs should follow the requirements outlined in this standard. Requirements include programmes to establish and maintain a PFA, verification that PFA status has been attained or maintained, appropriate corrective actions for pest detections, proper documentation of these activities and appropriate record-keeping, and transparency and stakeholder communication.

In this standard, “pest” is used to refer to a “pest or group of pests”, except where the text explicitly refers to one pest species or to a group of pests. Where an area being established or maintained as a PFA covers all or parts of several countries, references in this standard to the NPPO that establishes or maintains the PFA, or to the NPPO of the country in which the PFA is situated, apply to the NPPOs of all the countries in which the PFA is situated.

BACKGROUND

A PFA is recognized as a pest risk management option that contracting parties may consider implementing as a phytosanitary measure to protect the plant resources of an area for agricultural, forestry or ecological conservation purposes, facilitate safe trade, or increase the market-access opportunities for exporting countries. Pest free areas can offer a cost-effective way for NPPOs and industry in both importing and exporting countries to manage pest risk.

According to Article IV.2(e) of the IPPC, the responsibility for the designation, maintenance and surveillance of PFAs lies with NPPOs. The operational principles outlined in ISPM 1 (*Phytosanitary principles for the protection of plants and the application of phytosanitary measures in international trade*) also require contracting parties to take into account the status of an area (e.g. PFA or area with a pest status of “absent” for the targeted pest) when determining phytosanitary measures for imports from that area.

A PFA may be applied to an entire country or a part or parts of it. A PFA may also cover areas in several adjacent countries. Within a single country, more than one PFA may be established for the same pest, depending on the geography of the country, the distribution of the pest and its hosts, and the biology of the pest.

When a PFA is established, it is usually for one pest species, but a PFA may also be established for a defined group of pests with similar biology.

IMPACTS ON BIODIVERSITY AND THE ENVIRONMENT

This standard may contribute to the protection of biodiversity and the environment by preventing the introduction of regulated pests into an area. When establishing and maintaining PFAs, countries are encouraged to consider phytosanitary procedures that minimize impact on the environment.

REQUIREMENTS

A PFA should be considered a phytosanitary measure that, when used alone, is sufficient for managing the pest risk associated with a specified pest. Where a PFA has been established and maintained in accordance with the requirements of this standard, additional phytosanitary measures in relation to the pest should not be imposed.

The requirements that should be met for a PFA to be established and maintained, and used as a phytosanitary measure for trade, are detailed below. Depending on the pest concerned, an individual or a combination of measures may be used to meet these requirements.

Requirements for the establishment and maintenance of a PFA by an NPPO include:

- programmes to establish a PFA;
- programmes to maintain PFA status;
- verification that a PFA has been attained and its status is maintained;
- corrective actions for detections of the specified pest;
- documentation of these activities and appropriate record-keeping; and
- transparency and communication with other NPPOs and stakeholders.

The following elements should be considered when establishing and maintaining a PFA:

- the necessity to base measures on the biology of the pest, the relevant pathways and the characteristics of the area;
- the availability of appropriate surveillance tools, technology and trained personnel to detect and identify the pest;
- the existence of an appropriate regulatory framework to support the establishment and maintenance of the PFA;
- the support from relevant stakeholders, such as domestic industries and local regulatory bodies; and
- the importance of communicating with and raising awareness among other NPPOs, stakeholders and the general public.

In addition, NPPOs may wish to consider the feasibility of establishing and maintaining the PFA in terms of resource availability (economic, human and technical) and the cost benefit.

1. Initiation of a pest free area

1.1 Pest to be controlled

When initiating the establishment of a PFA, an NPPO should first specify the pest that is to be controlled (including its scientific name) and identify valid detection and diagnostic methods and relevant aspects of its biology.

1.2 Identification of the area

The area being considered for a PFA may be a part or parts of a country, the entire country, or all or part of several countries. Pest free areas are generally delimited by readily recognizable boundaries, considered to coincide acceptably with a pest's biological limits. These may be administrative (e.g. country, province, commune or property boundaries) or they may be natural barriers such as bodies of water, mountains, deserts or other geographical features that prevent pest movement from one area to another.

The area should be described specifically enough to allow it to be readily identified. This is important when the NPPO is providing evidence to support the claim that the area is free of the pest, but also when the NPPO is subsequently reporting the status of the targeted pest in the PFA and when raising public awareness.

1.3 Suitability of environmental conditions in the area

The NPPO of the country in which the area is situated should determine the availability of host plants in the area. Potential differences in host susceptibility in the area, the climatic suitability of the area, and the potential for entry and establishment of the pest in the area should also be considered.

2. Establishment of the pest free area

2.1 Determination of pest status in the area

Once the pest has been specified and the area identified, the NPPO should determine the pest status in the area by conducting surveillance in accordance with the requirements outlined in ISPM 8 (*Determination of pest status in an area*) and ISPM 6 (*Surveillance*).

If an exporting country has declared a pest to be absent in an area in accordance with ISPM 8, then establishing a PFA in that area should not be required, unless there is technical justification by importing countries.

2.2 Controls on the movement of regulated articles

To prevent the entry of the pest into the area, the pest should be regulated in relation to the area, the potential pathways should be identified and appropriate controls on the movement of regulated articles should be established. The movement controls should depend on the assessed pest risk, including the probability of pest establishment. Such controls should include:

- regulation of the pathways and articles that require control;
- imposition of domestic restrictions, phytosanitary import requirements, or other measures to control the movement of regulated articles into or through the area; and
- inspection and testing of regulated articles where technically justified, examination of the relevant documentation and, where necessary for cases of non-compliance, the application of appropriate measures.

2.3 Establishment of buffer zones

Where the geographical isolation of the area is not adequate to prevent the natural spread of the pest into it, the establishment of a buffer zone should be considered. The population of the pest in the buffer zone should be maintained at or below a specified level, which should be verified by surveillance. The extent of the buffer zone should be determined by the NPPO, based on the distance over which the likely natural spread of the pest population to the area could not occur during the season when hosts are available. The NPPO should describe, with the use of supporting maps, the boundaries of the buffer zone.

2.4 Official declaration of pest free area

When the pest status is determined as absent (in accordance with ISPM 8) or eradication of the pest from the area is achieved (in accordance with ISPM 9 (*Guidelines for pest eradication programmes*)), the NPPO should make an official declaration that the area is free from the pest. All internal management procedures and measures to maintain the PFA (see section 3) should be in place before any declaration is made.

3. Maintenance of the pest free area

The NPPO of the country in which the PFA is situated should set up a programme to ensure maintenance of the PFA. This programme should be risk-based and should incorporate at least the following elements: a regulatory framework to control the movement of regulated articles; surveillance and collection of relevant data to inform the management of the PFA, including outbreak management; a framework for reporting pest detections; and a corrective action plan in case of an outbreak, with associated provisions for suspension and reinstatement of the PFA status.

3.1 Regulatory framework

The regulation of the pest through the controls on the movement of regulated articles (see section 2.2) should be sufficient to prevent its entry into the PFA. Where appropriate, buffer zones should be established to ensure early detection of the spread of the pest into the vicinity of the PFA. The measures should also allow traceability of regulated articles introduced into the PFA or moving within the PFA so that the appropriate corrective actions can be taken in a timely manner.

3.2 Surveillance for the maintenance of the pest free area

Surveillance should be conducted on a regular basis to verify that the absence of the pest from the PFA is maintained.

The decision about whether general surveillance for the pest is sufficient or specific surveillance is needed should be based on the risk of the pest's entry and establishment in the PFA and depends on the biology of the pest, the relevant pathways and the characteristics of the PFA.

General surveillance may be sufficient in cases where the pest has never been introduced into the PFA, nor into the surrounding areas, and there have been no records of the pest's presence in the PFA.

Specific surveillance to detect possible outbreaks of the pest at an early stage should be the standard procedure in all other cases. The type and frequency of the detection surveys should be based on an assessment of the potential for pest entry and establishment in the PFA and should allow detection of the pest with an appropriate level of confidence.

3.3 Notification of detection of the pest

A reporting framework should be established to ensure that detections of the pest in the PFA are immediately notified to the NPPO (or other competent authority delegated by the NPPO) and officially confirmed. In the event of immediate or potential danger of pest spread, such as when an outbreak occurs or a non-compliant commodity is intercepted, the relevant NPPOs should follow the guidance in

ISPM 13 (*Guidelines for the notification of non-compliance and emergency action*) and ISPM 17 (*Pest reporting*) and relevant bilateral arrangements.

3.4 Response to an outbreak

Preparedness for rapid intervention may be ensured by developing, in advance, a contingency plan to support the development and implementation of a corrective action plan in the event of an outbreak. The contingency plan may detail the triggers for corrective actions, plans for rapid technical assessment of the situation, the availability of financial and human resources, the roles and responsibilities of the parties concerned, and the operational activities that are likely to be needed. To assist in preparedness, regular simulation exercises may be used to review the effectiveness of the contingency plan.

In the event of the pest being detected in the PFA, the NPPO should determine, based on survey results, the corrective actions to be taken. An eradication programme should be initiated for an outbreak of a pest, but not for an interception when the consignment containing the pest can be immediately destroyed, or where evidence indicates that there is no risk of the pest establishing or causing economic damage.

An eradication programme should follow ISPM 9 and include the following steps.

3.4.1 Delimiting survey to demarcate the outbreak area

As soon as the detection of the pest outbreak has been officially confirmed in the PFA, a delimiting survey should be conducted to determine the boundary of the infested area. Based on this determination and an assessment of the pest biology, the relevant pathways and the characteristics of the PFA, an outbreak area within the PFA should be demarcated and the PFA status should be temporarily suspended therein. This demarcated outbreak area should consist of the infested area surrounded by a buffer zone, the size of which should depend on the biology of the pest, the availability of host plants and the ecological conditions.

3.4.2 Implementation of control measures

Control measures should be applied to prevent the pest moving out of the outbreak area by human activities (e.g. through the movement of infested host plants or plant products, or contaminated means of conveyance) or, to the extent that is reasonably achievable, by natural spread.

Measures to eradicate the pest should be implemented in accordance with ISPM 9.

3.4.3 Increased surveillance in the outbreak area

Surveys should be used in the outbreak area to determine and record the distribution of the pest and its population dynamics, and to assess the effectiveness of the eradication measures. This level of survey should be maintained until the pest is eradicated from the outbreak area.

3.5 Provisions for suspension, reinstatement or withdrawal of the pest free area status

Criteria for successful eradication in accordance with ISPM 9 should be established in advance of the need to eradicate an outbreak. These criteria should include the intensity of the survey in the outbreak area and the minimum period that the outbreak area needs to be free from the pest before lifting the suspension of the PFA.

If the criteria are fulfilled, then eradication may be officially declared successful and the temporary control and eradication measures may be lifted. The status of the full PFA may then be reinstated.

If the criteria for eradication within the outbreak area cannot be fulfilled within a reasonable time frame (as determined by the relevant NPPO in advance), then either the PFA status should be withdrawn or the delimitation of the PFA should be reviewed.

4. Regular review and verification of implementation

Once the PFA is established, including the administrative activities, the performance of the PFA maintenance programme should be regularly reviewed by the NPPO to verify correct implementation of the maintenance programme. This review should allow the NPPO to find and correct deficiencies, incorporate any new and relevant information on the pest or associated pathways, and adjust and improve the maintenance programme accordingly.

Traceability procedures for the movement of regulated articles should allow the verification of their origin and conformity with the phytosanitary requirements set for the PFA.

5. Data collection, documentation and record-keeping

The data from the surveillance (e.g. time of survey, number and type of plants inspected, number of samples taken for inspection, number of samples taken for laboratory analysis, diagnostic protocols used, data analysis methods used, results of the analyses, and other relevant information as required by ISPM 6) should be stored and kept. To facilitate traceability and verification, this information should be made available for as long as the PFA is based on these data.

The measures used to establish and maintain the PFA should be adequately documented. The documentation should be reviewed regularly, updated as needed, and include any amendments to the PFA maintenance programme. Records of the procedures to establish, implement and maintain corrective actions should be kept as needed or for at least 24 months, depending on the biology of the pest and the duration of the commodity being moved from the PFA.

6. Communication and stakeholder engagement

Individuals, groups or organizations other than the NPPO of the country in which the PFA is situated can also affect, or be affected by, the actions to establish and maintain the PFA. The NPPO may establish partnerships with stakeholders, which may include seeking contributions of resources.

Information about the establishment and maintenance of the PFA, including information about the methodology used, results of surveys and pest diagnostics, and other relevant information supporting the PFA claim, should be made available on request to other NPPOs and, if appropriate, to relevant stakeholders.

Maps and information about the measures applied to maintain the PFA may be communicated to relevant stakeholders.

To achieve the support of the community, NPPOs are encouraged to raise public awareness about PFAs in their territory, including the framework for reporting detections or cases of suspected presence of the pest in the PFAs, measures applied in the PFAs, and the importance of maintaining the PFAs.

7. Recognition of pest free areas

Recognition of PFAs should take place in accordance with ISPM 29 (*Recognition of pest free areas and areas of low pest prevalence*).

IPPC

The International Plant Protection Convention (IPPC) is an international plant health agreement that aims to protect global plant resources and facilitate safe trade. The IPPC vision is that all countries have the capacity to implement harmonized measures to prevent pest introductions and spread, and minimize the impacts of pests on food security, trade, economic growth, and the environment.

Organization

- » There are over 185 IPPC contracting parties.
- » Each contracting party has a national plant protection organization (NPPO) and an official IPPC contact point.
- » Ten regional plant protection organizations (RPPOs) have been established to coordinate NPPOs in various regions of the world.
- » IPPC liaises with relevant international organizations to help build regional and national capacities.
- » The secretariat is provided by the Food and Agriculture Organization of the United Nations (FAO).

International Plant Production Convention Secretariat
ippc@fao.org | www.ippc.int

Food and Agriculture Organization of the United Nations
Rome, Italy