

The IPPC ePhyto Solution

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November 2019**



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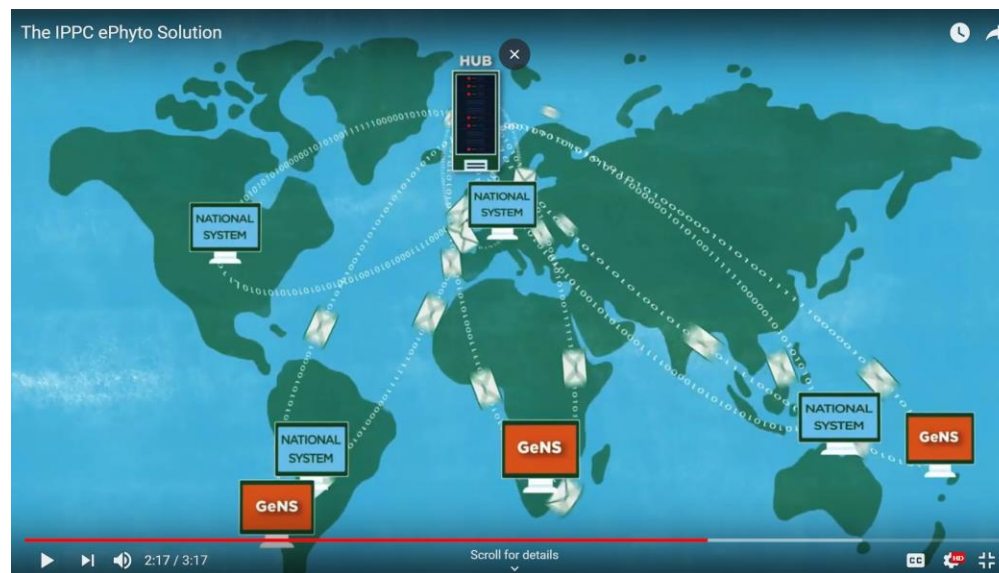


International Plant
Protection Convention



Improving Safe Trade in Plants and Plant Products

ePhyto in 3 Minutes



https://www.youtube.com/watch?time_continue=2&v=gjDz7aOv-Ys

The IPPC ePhyto Solution Project *-in brief-*

- facilitates the electronic exchange of phytosanitary certificates, including re-export certificates;
- simplified setup and participation;
- establishes a single set of rules to ensure harmonization;
- developing and developed countries can participate regardless of infrastructure (national systems and/or internet based system);
- the only project of its kind among the “three sisters”, recognized by WTO-SPS agreement (IPPC Secretariat, Codex & OIE);
- built for less than US\$1 million using industry standard solutions;



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The IPPC ePhyto Solution Project *-in brief-*

Simply put, the ePhyto solution is just another way to exchange phytosanitary certificates and re-export certificates; ePhyto is not mandatory and is not intended to replace the paper process, but instead provides another option to enhance and help facilitate safe trade



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What is an ePhyto?

- ePhyto is short for “electronic phytosanitary certificate”.
- ePhyto is the electronic **equivalent** of a paper phytosanitary certificate (ISPM 12)
- ePhyto is not a PDF or a fax



NOT a paper certificate



NOT a scan of a paper certificate

What is an ePhyto?

Standardized XML schema – part of an ePhyto

Paper representation

```
<?xml version="1.0" encoding="UTF-16" ?>
<SPSExportDocument>
  <SPSConsignment>
    <ram:ConsignorSPSParty>
      <ram:Name>TEST SA</ram:Name>
      <ram:SpecifiedSPSAddress>
        <ram:LineOne>Rivadavia 157, NEUQUEN (8300), NEUQUEN</ram:LineOne>
      </ram:SpecifiedSPSAddress>
    </ram:ConsignorSPSParty>
    <ram:ConsigneeSPSParty>
      <ram:Name>TEST ORGANIC INC.</ram:Name>
      <ram:SpecifiedSPSAddress>
        <ram:LineOne>901 S 2nd Street - Mount Vernon.WA 99899</ram:LineOne>
      </ram:SpecifiedSPSAddress>
    </ram:ConsigneeSPSParty>
    <ram:ExportSPSCountry>
      <ram:ID>AR</ram:ID>
      <ram:Name>NULL</ram:Name>
    </ram:ExportSPSCountry>
    <ram:ImportSPSCountry>
      <ram:ID>US</ram:ID>
      <ram:Name>NULL</ram:Name>
    </ram:ImportSPSCountry>
    <ram:TransitSPSCountry>
      <ram:ID>CL</ram:ID>
      <ram:Name>NULL</ram:Name>
    </ram:TransitSPSCountry>
    <ram:UnloadingBaseportSPSLocation>
      <ram:Name>LOS ANGELES - USA</ram:Name>
    </ram:UnloadingBaseportSPSLocation>
    <ram:ExaminationSPSEvent>
      <ram:OccurrenceSPSLocation>
        <ram:Name>NULL</ram:Name>
      </ram:OccurrenceSPSLocation>
    </ram:ExaminationSPSEvent>
    <ram>MainCarriageSPSTransportMovement>
      <ram:ModeCode>1</ram:ModeCode>
      <ram:UsedSPSTransportMeans>
        <ram:Name>Container ship</ram:Name>
      </ram:UsedSPSTransportMeans>
    </ram>MainCarriageSPSTransportMovement>
    <ram>IncludedSPSConsignmentItem>
      <ram:IncludedSPSTradeLineItem>
        <ram:SequenceNumeric>0</ram:SequenceNumeric>
        <ram>Description languageID="en">Fresh Pear</ram>Description>
      </ram:IncludedSPSTradeLineItem>
    </ram>IncludedSPSConsignmentItem>
  </ram:Consignment>
</SPSExportDocument>
```

No phytosanitary certificate can be issued until an application is completed (7 CFR 353)

UNITED STATES DEPARTMENT OF AGRICULTURE
ANIMAL AND PLANT HEALTH INSPECTION SERVICE
PLANT PROTECTION AND QUARANTINE

PHYTOSANITARY CERTIFICATE

TO: THE PLANT PROTECTION ORGANIZATION(S) OF
Argentina

PLACE OF ISSUE
Almirante, Georgia

DATE INSPECTED
April 10, 2018

FOR OFFICIAL USE ONLY

NO

F-F-13121-03278302-7-N

FORM APPROVED
OMB NO. 5975-9022

CERTIFICATION

This is to certify that the plants, plant product or other regulated articles described herein have been inspected and/or tested according to appropriate official procedures and are considered to be free from the quarantine pests, specified by the importing contracting party and to conform with the current phytosanitary requirements of the importing contracting party including those for regulated non-quarantine pests.

DISINFESTATION AND/OR DISINFESTATION TREATMENT

1. DATE

2. TREATMENT

3. CHEMICAL (active ingredient)

4. DURATION AND TEMPERATURE

5. CONCENTRATION

6. ADDITIONAL INFORMATION

DESCRIPTION OF THE CONSIGNMENT

7. NAME AND ADDRESS OF EXPORTER
Global Seed Company LLC
10201 Stillmead Drive
Cincinnati, Ohio 45242

8. DECLARED NAME AND ADDRESS OF THE CONSIGNEE
Argentina Food Industry
Av. Colombia 4300
C1425GBR
Buenos Aires, 10001 Argentina

9. NAME OF PRODUCE AND QUANTITY DECLARED
(1) 100 Pounds Cereals (Seeds)

10. BOTANICAL NAME OF PLANTS

11. NUMBER AND DESCRIPTION OF PACKAGES
(1) 1 Carton

12. DESTINATION MARKS

13. PLACE OF ORIGIN
(1) USA

14. DECLARED MEANS OF CONVEYANCE
Air transport

15. DECLARED POINT OF ENTRY
Argentina

WARNING: Any alteration, forgery, or unauthorized use of this phytosanitary certificate is subject to civil penalties of up to \$250,000 (7 U.S.C. Section 7734b) or punishable by a fine of not more than \$10,000, or imprisonment of not more than 5 years, or both (16 U.S.C. Section 1001).

ADDITIONAL DECLARATION

Page 1 of 1

16. DATE ISSUED
April 10, 2018

17. NAME OF AUTHORIZED OFFICER (Type or Print)
Soumya Sagarana

18. SIGNATURE OF AUTHORIZED OFFICER

No liability shall attach to the United States Department of Agriculture or to any officer or representative of the Department with respect to this certificate.

PPQ Form 577 FEB 2001 Previous editions are obsolete after 6/00/01



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What is an ePhyto? – Is it secure?

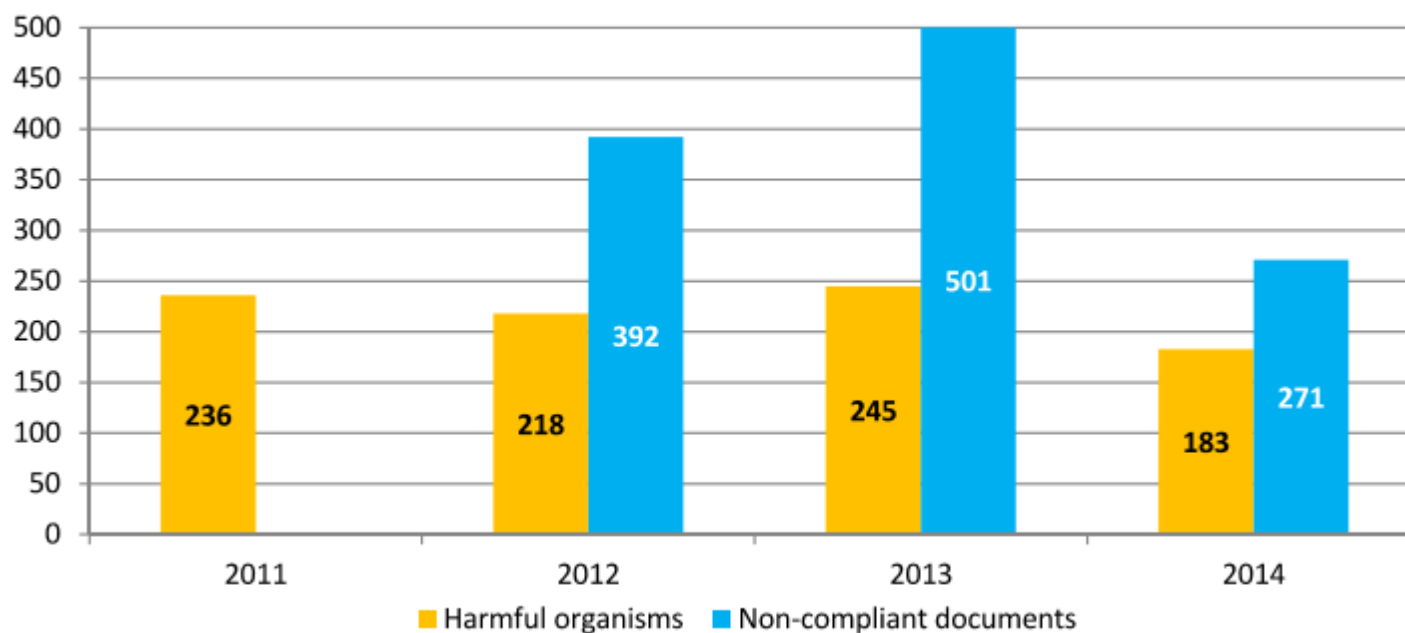
- The NPPO officer is the only one that can issue and approve an ePhyto
 - ✓ Each role is assigned by the NPPO officer and they are restricted to what they can do in the system
- The IPPC Secretariat approves, grant and verifies country's access to the system
- The Hub cannot not read, nor can it store the content of the data from a certificate
- Information may be stored in the GeNs but is exclusively available to the specific country to which it belongs



Why ePhyto? – Example-

Non-compliant documents trigger a higher number of import rejections than actual plant health issues (harmful organisms):

Overview of EUROPHYT interceptions of cut flowers and foliage notified in 2011-2014:



Source: EUROPHYT & Union Fleurs databases

Helps address....

- **Inefficient processes in place** - help reduce labor intensive activities such as the physical moving of paper certificates, couriered services or reentry of data
- **Fraudulent certificates** – government to government electronic exchange will significantly lower the risk of counterfeiting certificates
- **Millions of emails sent** – in the grains industry alone more than 275 million emails are sent annually to process the estimated 11,000 shipments of grain transported on the ocean worldwide
- Any **re-issuing of paper** phytosanitary certificates has a **tremendous cost** for business
 - Time and money
 - **Deterioration of commodities waiting for clearance**
 - Customer claims for late deliveries or bad quality
- **Mountains of paper**, a lot of it expensive paper, are produced, printed and stored or destroyed on an annual basis
- **Most Important** – Access to a dependable, timely and affordable food supply where and when it is needed



What is the IPPC ePhyto Solution Specifically?

Hub

System to facilitate exchange of ePhytos between NPPOs

National systems link to each other via the HUB

GeNS

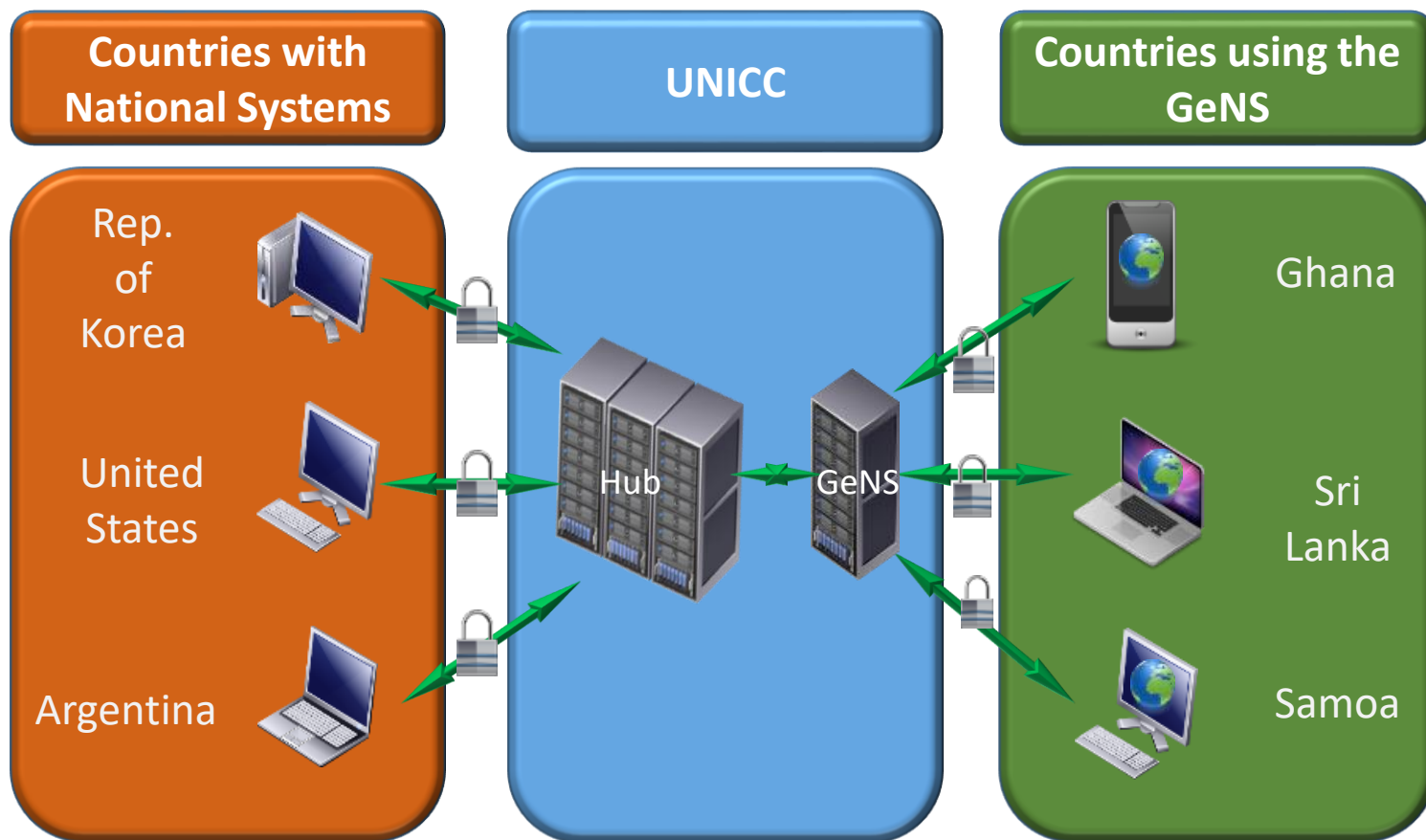
Generic ePhyto National System

Centralized web-based system to allow countries without their own systems to produce, send and receive ePhytos through the hub

Harmonized message

Uniform format, structure and accompanying codes and lists where applicable

Hub and GeNS



Benefits of the Hub

- single harmonized set of rules
- maintains the benefits of harmonization over the long term
- avoids costly bilateral agreements
- creates uniform conditions for trade
- both developing and developed countries can participate
- facilitates inclusion of national systems when in place
- simplified setup and participation

Hub

System to
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Benefits of the GeNS

- defined exchange mechanism and a standardized UN/CEFACT schema
- facilitates the issuance / authorization of an ePhyto
- generates and transmits ePhytos
- allows printing of incoming or outgoing certificates as needed
- receives incoming ePhytos
- enables NPPO to check the authenticity of an ePhyto after receipt
- data related to NPPOs certificates can be extracted
- ePhytos can be stored for later reference
- connected to the Hub to facilitate harmonized data and secure certificate transfer
- facilitates reporting

GeNS

Generic ePhyto National System

Centralized web-based system to allow countries without their own systems to produce, send and receive ePhytos through the hub



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Harmonization of data

- Hub and the GeNS follow a harmonized set of rules
- Availability of a validation tool for the XML
- Codes and list are based on the Appendix 1 of ISPM 12 Phytosanitary Certificates for countries to access the IPPC ePhyto Solution
- Harmonization work will be ongoing and is very important for future “automation”

Harmonized message

Uniform format, structure and accompanying codes and lists where applicable



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Harmonization of data – *Examples* -

- ✓ International Standards Organization List of Alpha 2 codes
- ✓ EPPO global database for pest scientific information available in the GeNs
 - Search by common name (in different languages) or by botanical name
- ✓ Product description, types, intended use, package codes, modes of transport, trade and transport locations, unit of measure and status codes

Looking Ahead

- GeNS was released in July 2019
- Interface and exchanges with other systems in progress
 - Working towards integration with Customs single windows systems
 - Traces system in Europe
- Application modernization (offline, Mobile app....)
- Working towards integration with Customs single windows systems
- Continued methods for streamlining the system



Steps to get involved

Hub

Step 1: Get prepared

- It is mandatory to have the capacity to produce ePhytos
- must have a system capable of producing certificates
- read all relevant documents Technical Information
- the NPPO representative intending to register for the Hub should contact their Official Contact Point

Step 2: Registration

- the NPPO representative can register to the Hub by going to <https://www.ephytoexchange.org/AdminConsole/> and clicking 'Register NPPO'
- The Official IPPC Contact Point validates the registration

Step 3: Onboarding

- the NPPO representative will then receive all relevant onboarding documents needed to implement the Hub

GeNs

Step 1: Get prepared

- Consider the following factors as they will shape the strategy for implementing ePhyto; Function, Governance, Operational and Legal models, stakeholder consultation and lastly change management

Step 2: Registration

- the NPPO representative should send a message to the IPPC Secretariat at ippc@fao.org
- The IPPC Secretariat will provide the necessary setup document which must be completed in order to create that country's version of the GeNs

Step 3: Onboarding

- Once the NPPO representative fills in all relevant onboarding documents needed to implement the GeNs, the UNICC will set up a test instance for the country and they can begin testing

Learn more about ePhyto:

To read more about ePhyto and how to register for the system review the following links:

<https://www.ippc.int/en/ephyto/>

<https://www.ephytoexchange.org/landing/>

Make sure to follow us on LinkedIn and Twitter to keep updated on all ePhyto news and progress

Click on the icons below to take you directly to these platforms



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INTERNATIONAL YEAR OF
PLANT HEALTH
2020

Contact us

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