

# *Seminar on Awareness Raising on the UPOV System of Plant Variety Protection*

## **Basic Principles of the UPOV Convention and Benefits of UPOV membership**

*Ms. Yolanda Huerta,  
Legal Counsel, UPOV*

*Nay Pyi Taw, Myanmar*

***December 5, 2016***

# Improved Varieties

## Hot pepper

Development of disease resistant variety



### **Dok-Ya-Cheong-Cheong**

Resistant to phytophthora blight/virus

Phytophthora blight (Fungal disease):

- above : **Resistant variety**
- below: **Susceptible variety**

# PREVIEW

1. **About UPOV and Plant Variety Protection**
2. **Key Provisions of the 1991 Act of the UPOV Convention**
3. **Benefits of UPOV membership**

# **UPOV: INDEPENDENT INTERGOVERNMENTAL ORGANIZATION**

**The International **Convention** for the  
Protection of New Varieties of Plants  
established in 1961**

**The International **Union** for the  
Protection of New Varieties of Plants**

**Union internationale pour la  
protection des **o**btentions **v**égétales**

# Act of 1961

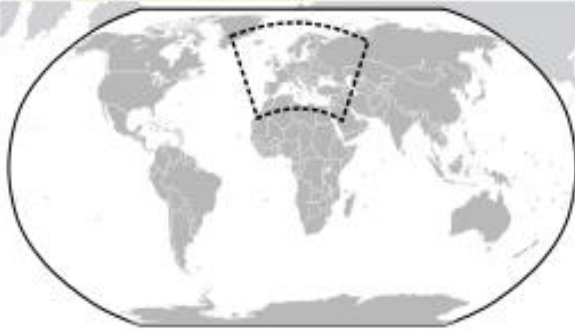
**“The Contracting States,  
Convinced of the importance  
attaching to the protection of new  
varieties of plants not only **for the  
development of agriculture** in their  
territory but also for safeguarding  
the interests of breeders, [...]”**



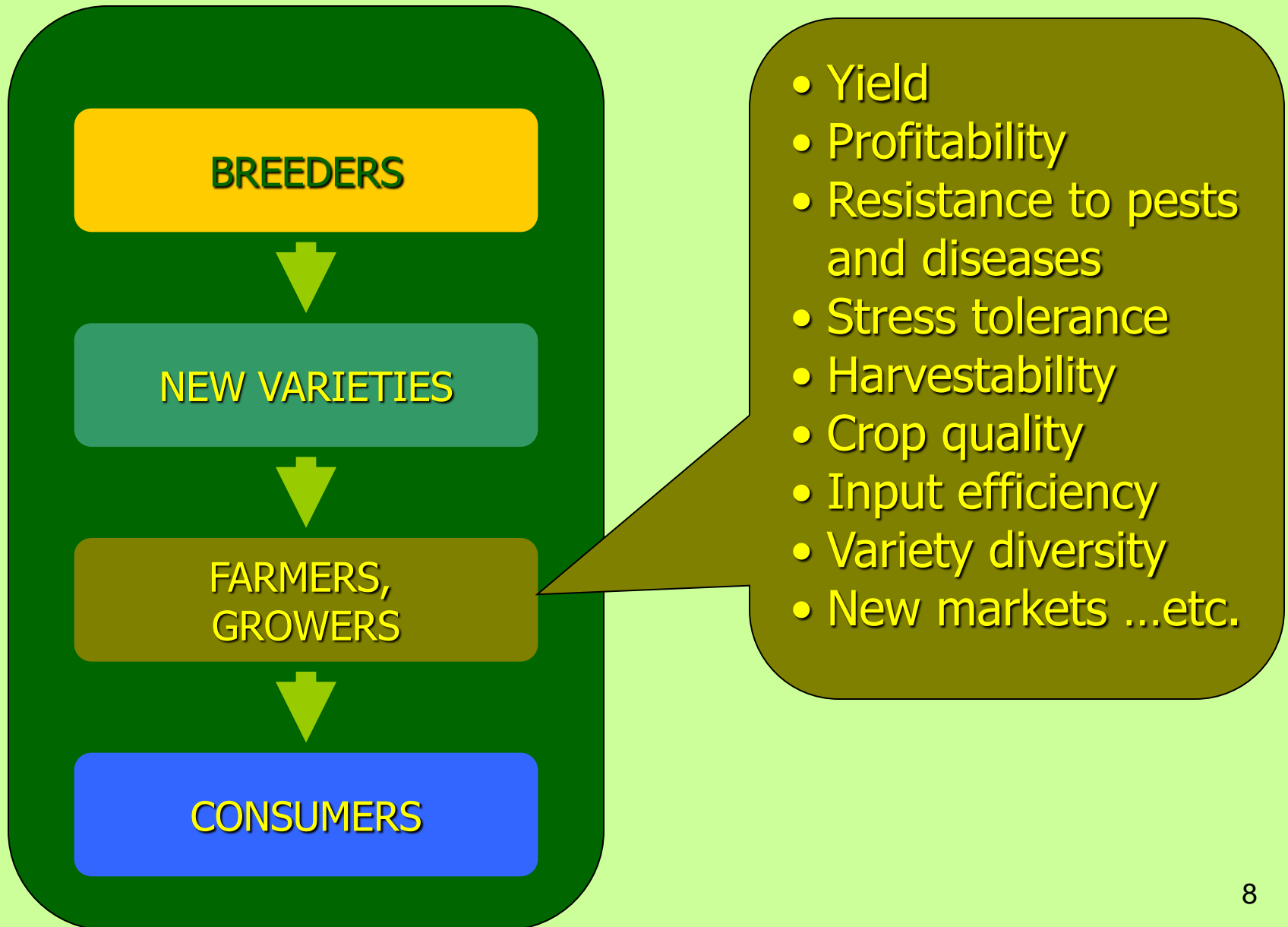
## **UPOV MISSION STATEMENT**

**“To provide and promote an effective system of plant variety protection, with the aim of encouraging the development of new varieties of plants, for the benefit of society”**





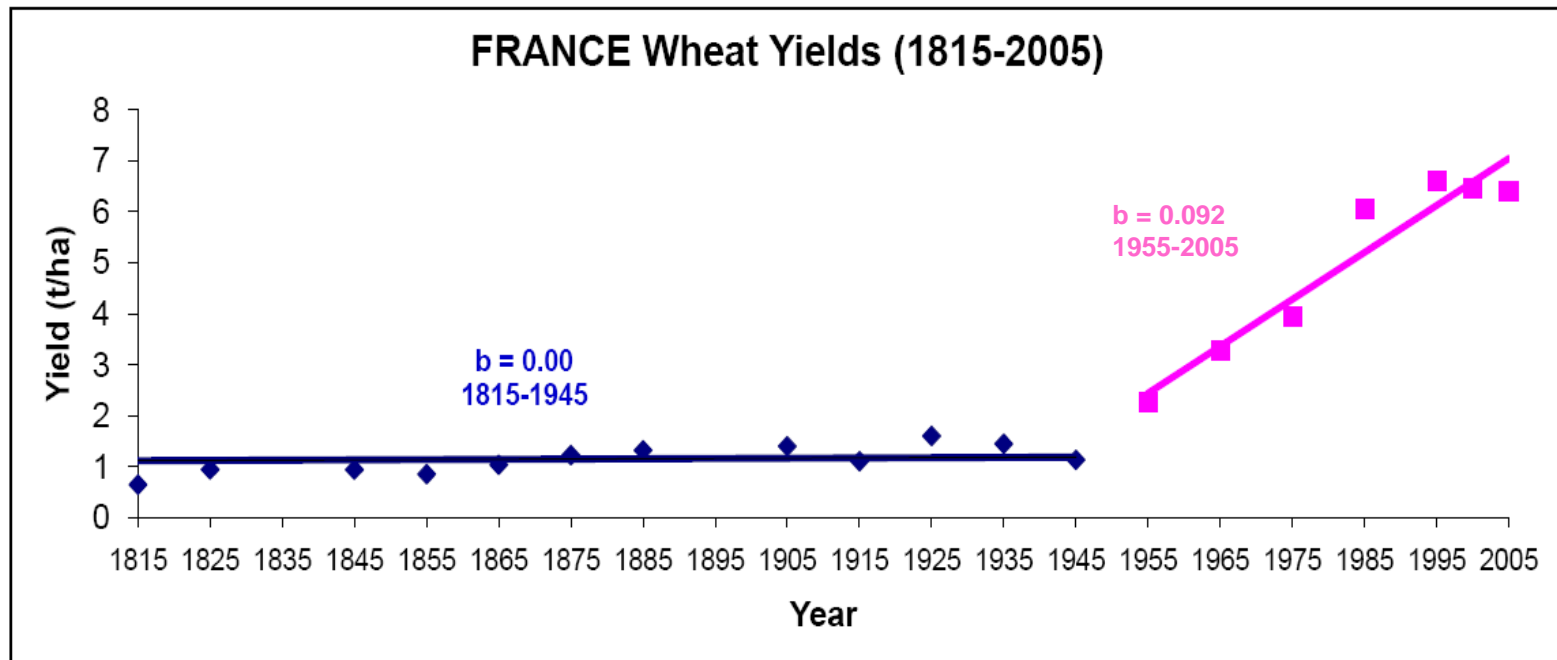
# Impact of Plant Variety Protection



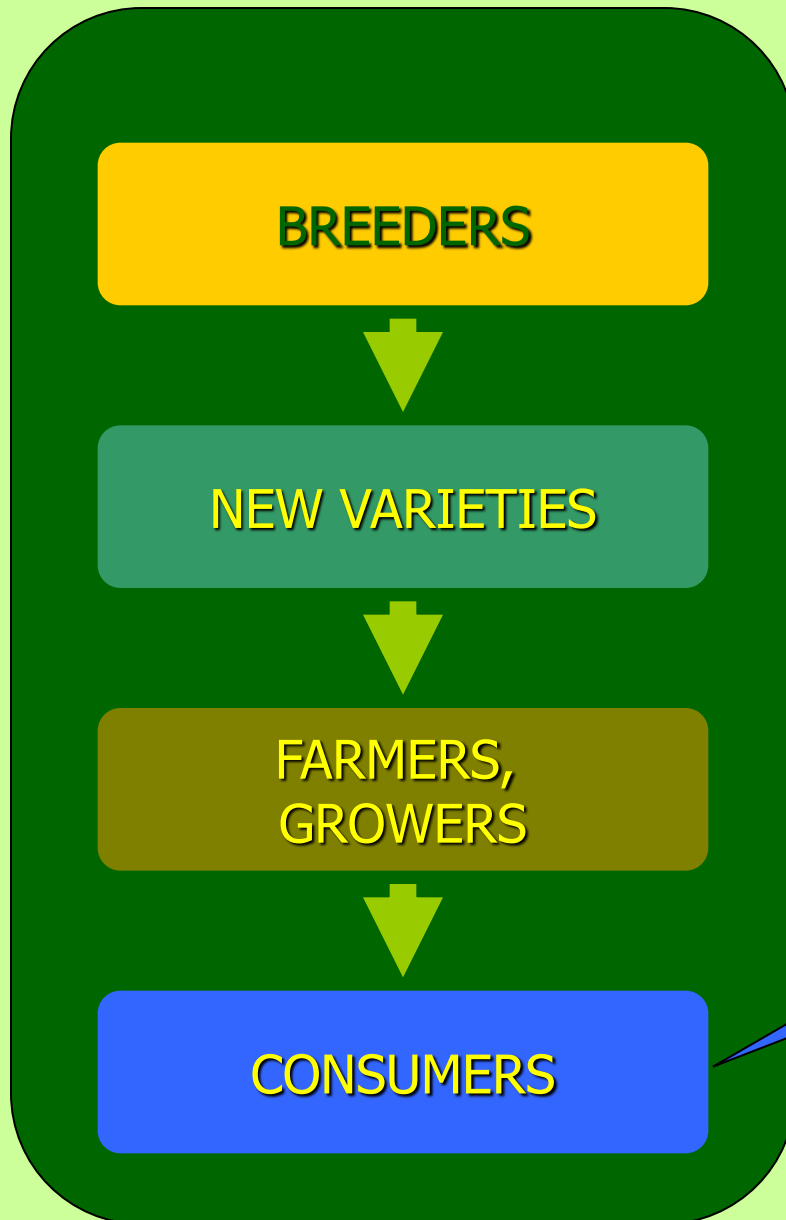


# Importance of Plant Breeding

## Evolution of Wheat yield in France



# Impact of Plant Variety Protection



- Reduced food cost
- Efficient land use
- Nutritional quality, taste etc.
- Storage quality
- Diversity of products

## Glucosinolate content

from 100  $\mu\text{moles}$  ('Jetneuf') to 12  $\mu\text{moles}$  ('Samourai')

LEAR: Low Erucic Acid



HOLLI: High Oleic and Low Linolenic



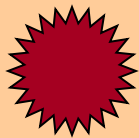
# UPOV

## UPOV MISSION STATEMENT

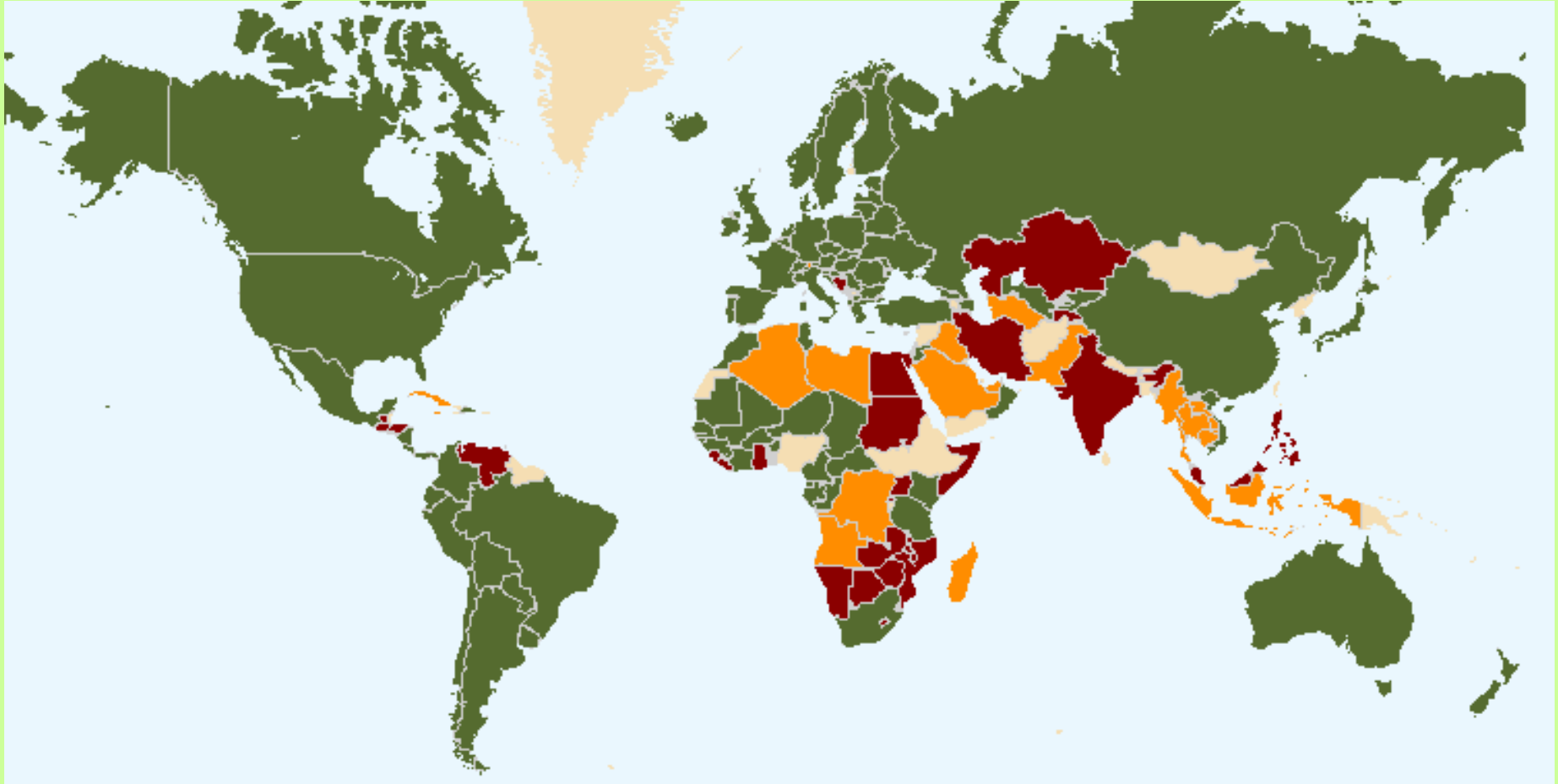
“To provide and promote an **effective system of plant variety protection (PVP), [...]**”



**Plant Breeder's Right (PBR)**



# UPOV status in 2016



The boundaries shown on this map do not imply the expression of any opinion whatsoever on the part of UPOV concerning the legal status of any country or territory

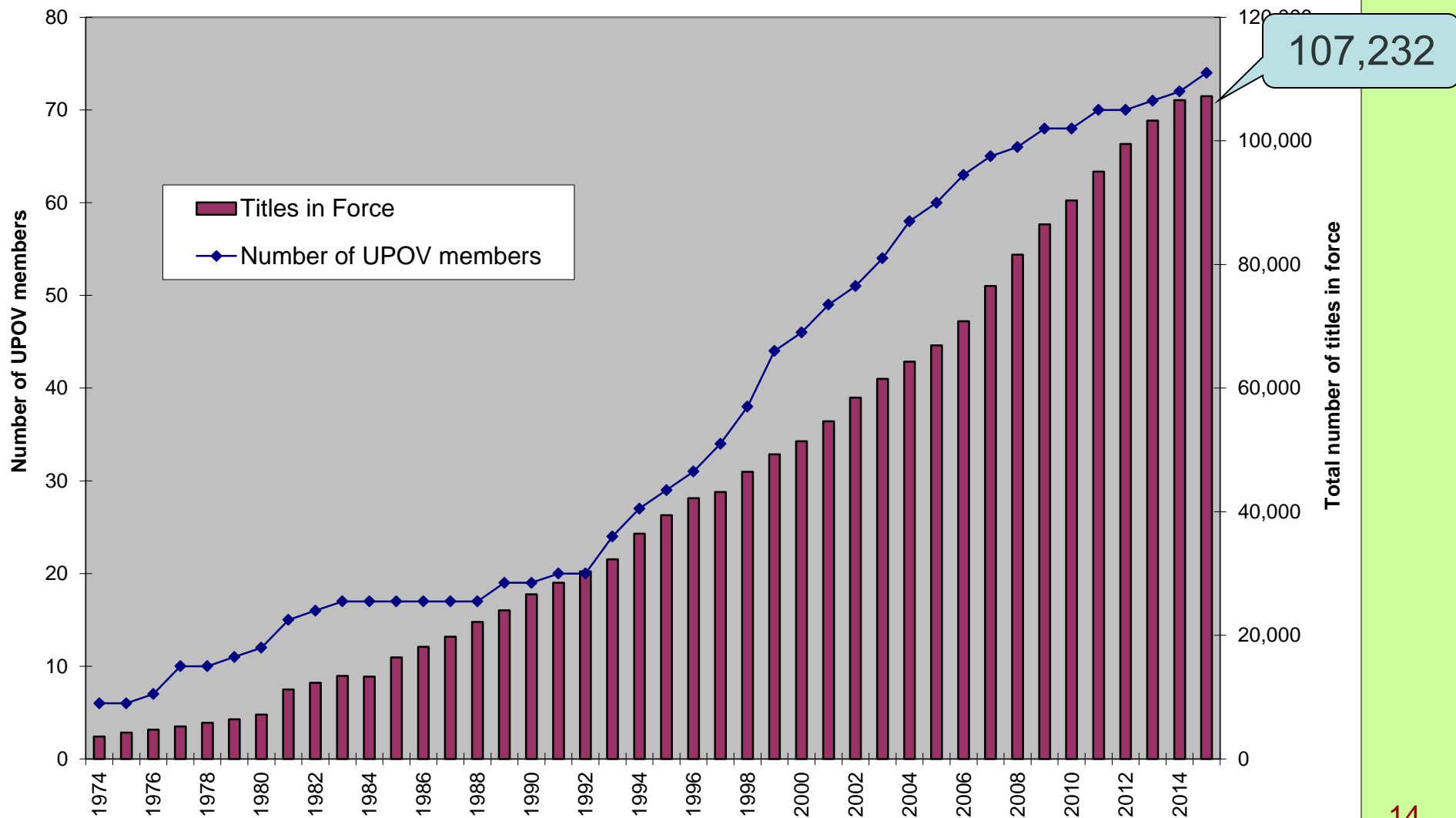
**Members of UPOV (74) covering 93 States**

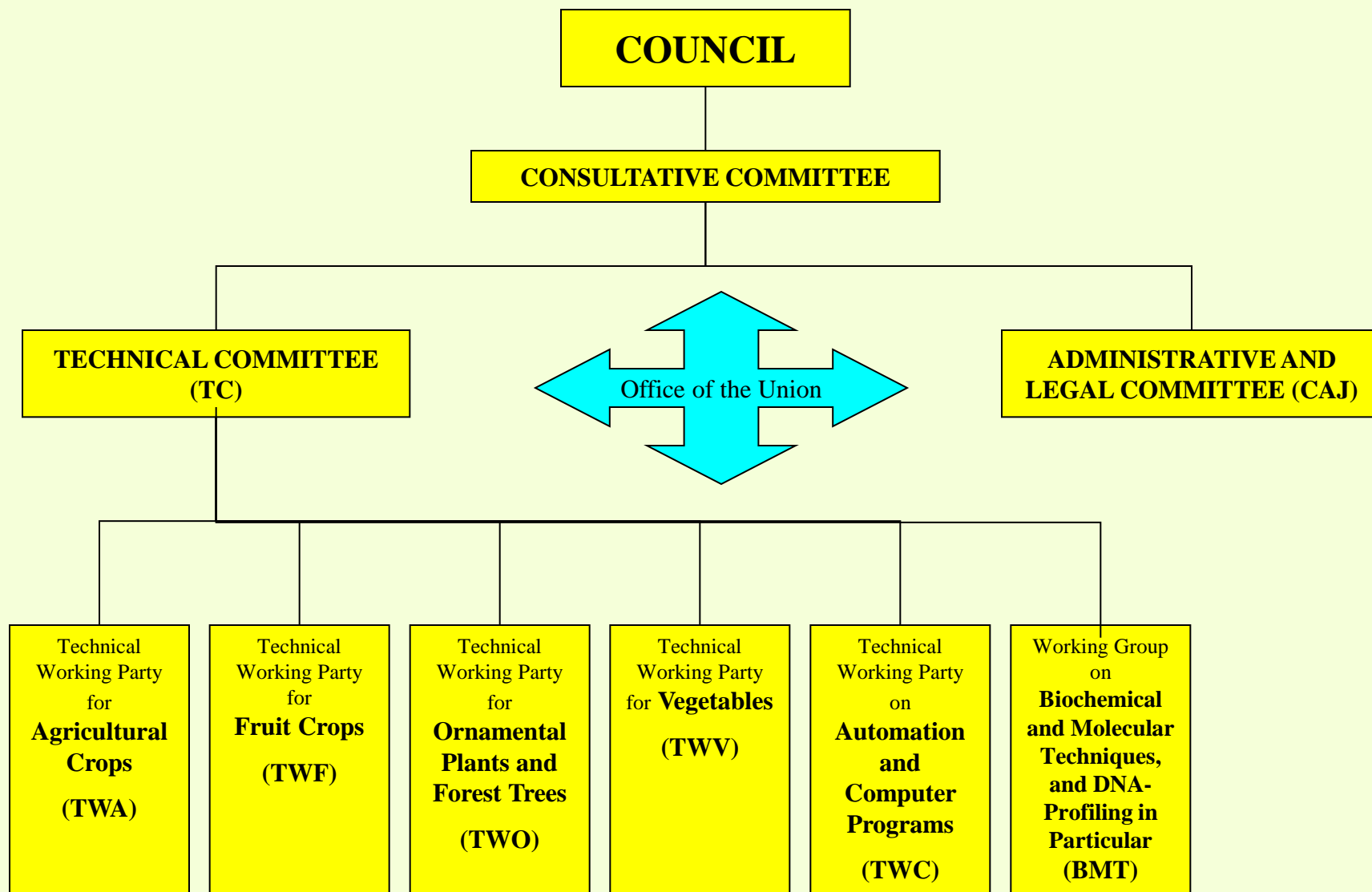
**Initiating States (15) and Organization (1)**

**States (25) and Organization (1) in contact with the UPOV Office**

# Plant variety protection statistics

PBR Titles in Force: All UPOV







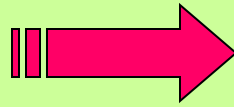
# PREVIEW

1. About UPOV and Plant Variety Protection
2. **Key Provisions of the 1991 Act of the UPOV Convention**
3. Further information about UPOV

# **SOME KEY PROVISIONS OF THE UPOV CONVENTION (1991 Act)**

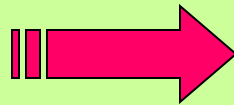
- (a) Breeders and varieties**
- (b) Genera and species
- (c) National treatment
- (d) Conditions of protection
- (e) Breeder's right and exceptions

**BREEDER**



**THE ONE ENTITLED TO  
PROTECTION**

**VARIETY**



**THE SUBJECT MATTER  
OF PROTECTION**

# BREEDER

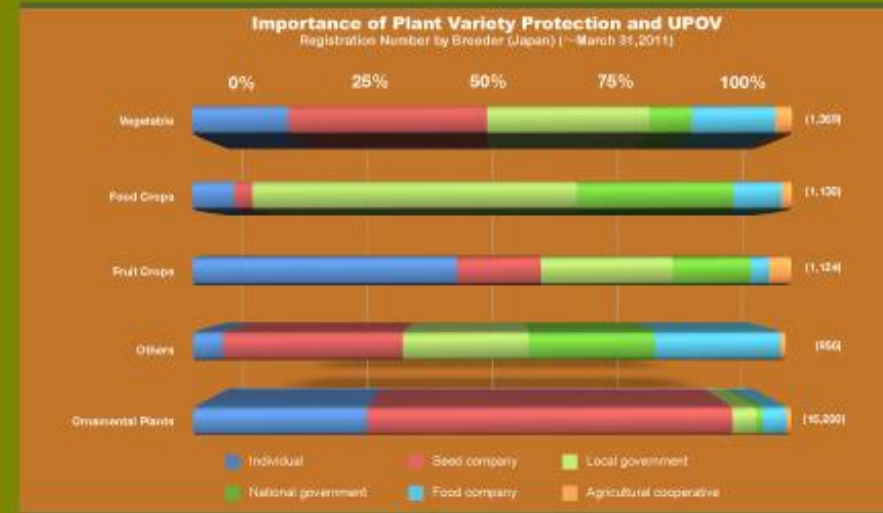
- the person who bred, or discovered and developed, a variety
- the person who is the employer of the aforementioned person or who has commissioned the latter's work, where the laws of the relevant Contracting Party so provide, or
- the successor in title of the first or second aforementioned person.

# **BREEDER**

The person who  
bred, or discovered  
and developed, a  
variety

## Who can protect a plant variety?

There are no restrictions on who can be considered to be a breeder under the UPOV system: **a breeder might be an individual, a farmer, a researcher, a public institute, a private company etc.**



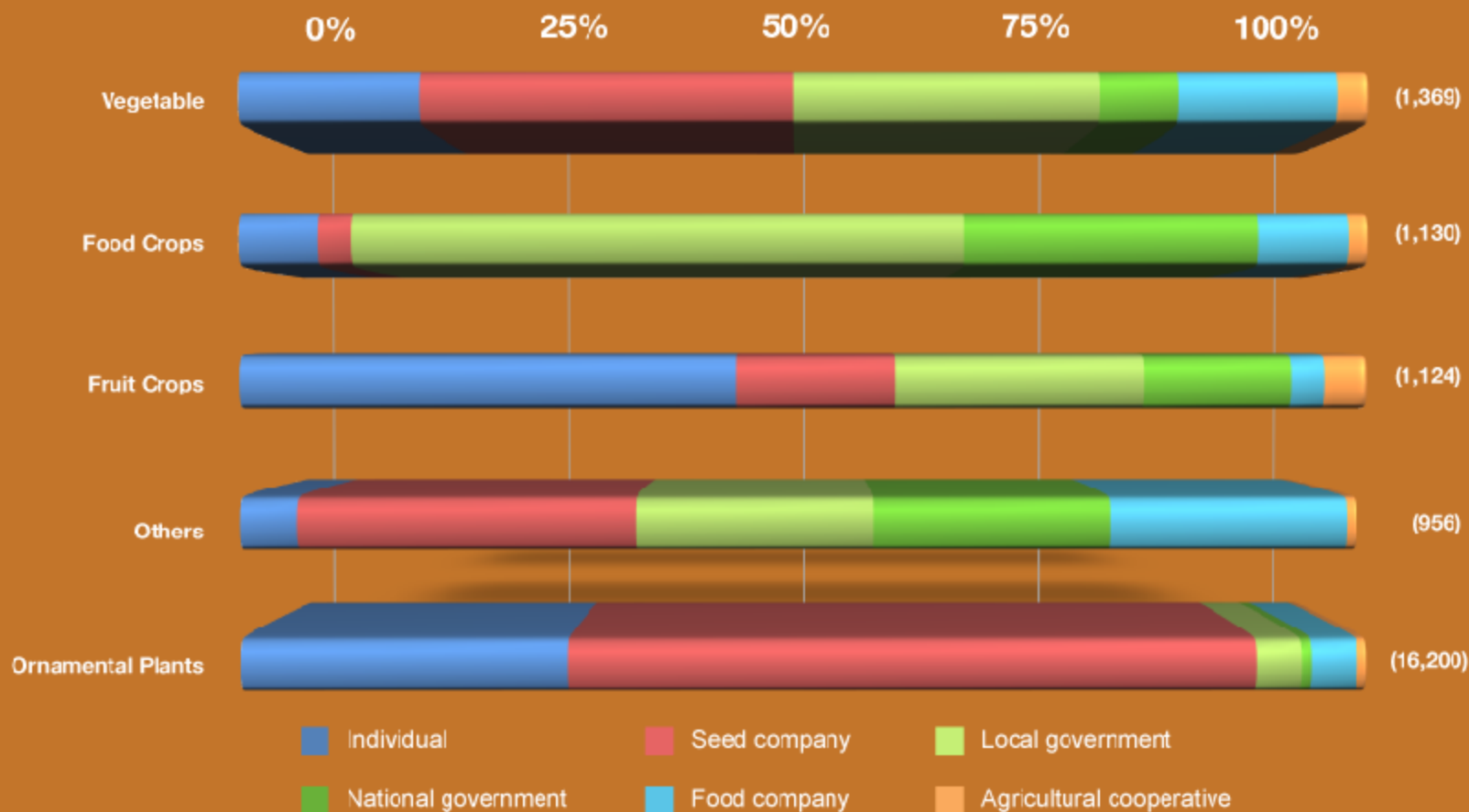
### Japan Registration Case Study

(click to see full view)



## Importance of Plant Variety Protection and UPOV

Registration Number by Breeder (Japan) (~March 31, 2011)



The situation in Japan illustrates that the UPOV system is used by all types of breeders (e.g. individuals, private companies, public institutes, cooperatives etc ...) and for all types of plants and crops.



# BREEDER

The person who  
bred, or discovered  
and developed, a  
variety



**DEVELOPMENT  
IS NECESSARY**

# BREEDER

The person who  
bred, or discovered  
and developed, a  
variety



## What is a Plant Variety?

The term "species" is a familiar unit of botanical classification within the plant kingdom. However, it is clear that within a species there can be a wide range of different types of plant. Farmers and growers need plants with particular characteristics and that are adapted to their environment and their cultivation practices.

A plant variety represents a more precisely defined group of plants, selected from within a species, with a common set of characteristics.



**SPECIES**  
(Click to display)

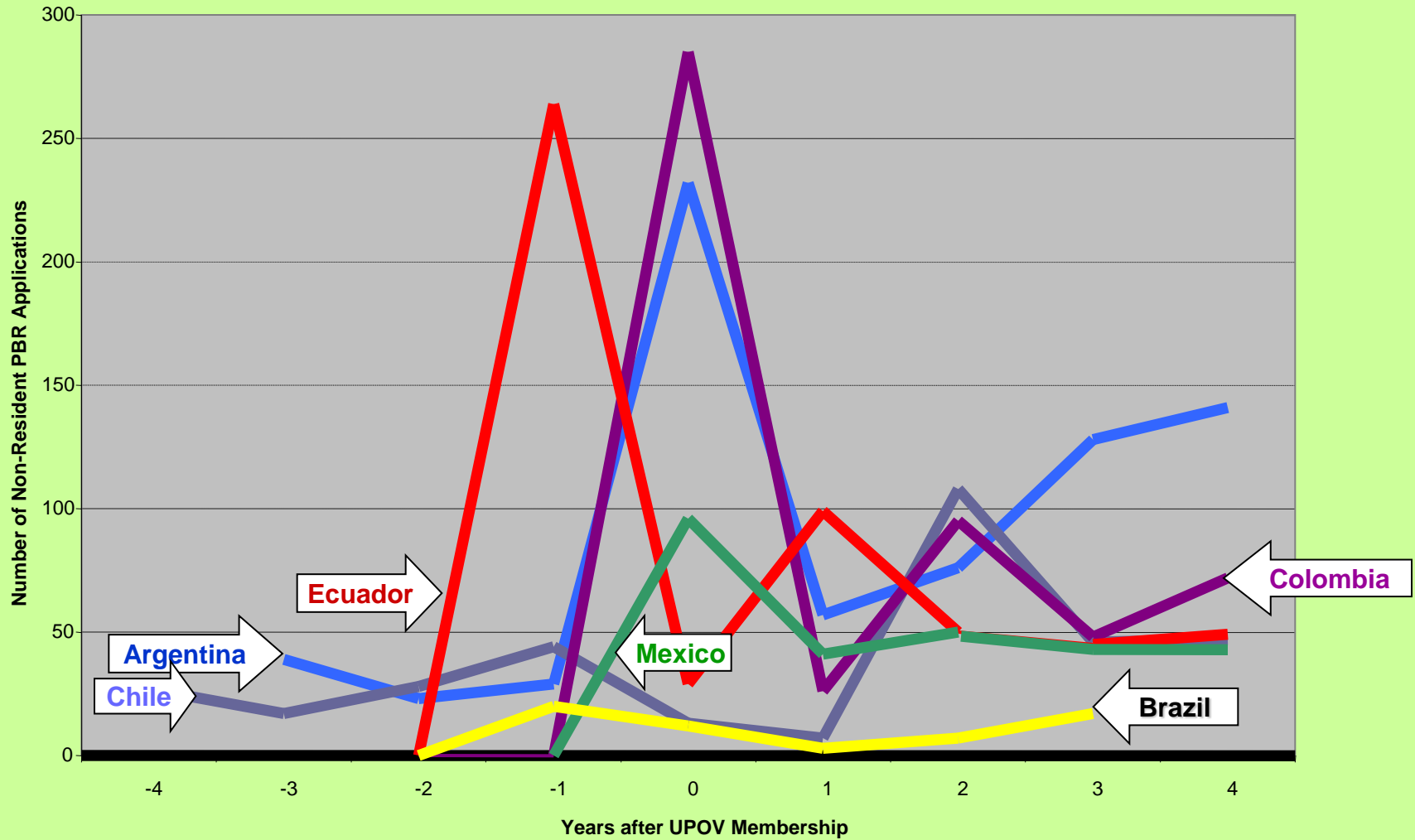
**PLANT KINGDOM**  
(Click to display)

**VARIETIES**  
(Click to display)

# **SOME KEY PROVISIONS OF THE UPOV CONVENTION (1991 Act)**

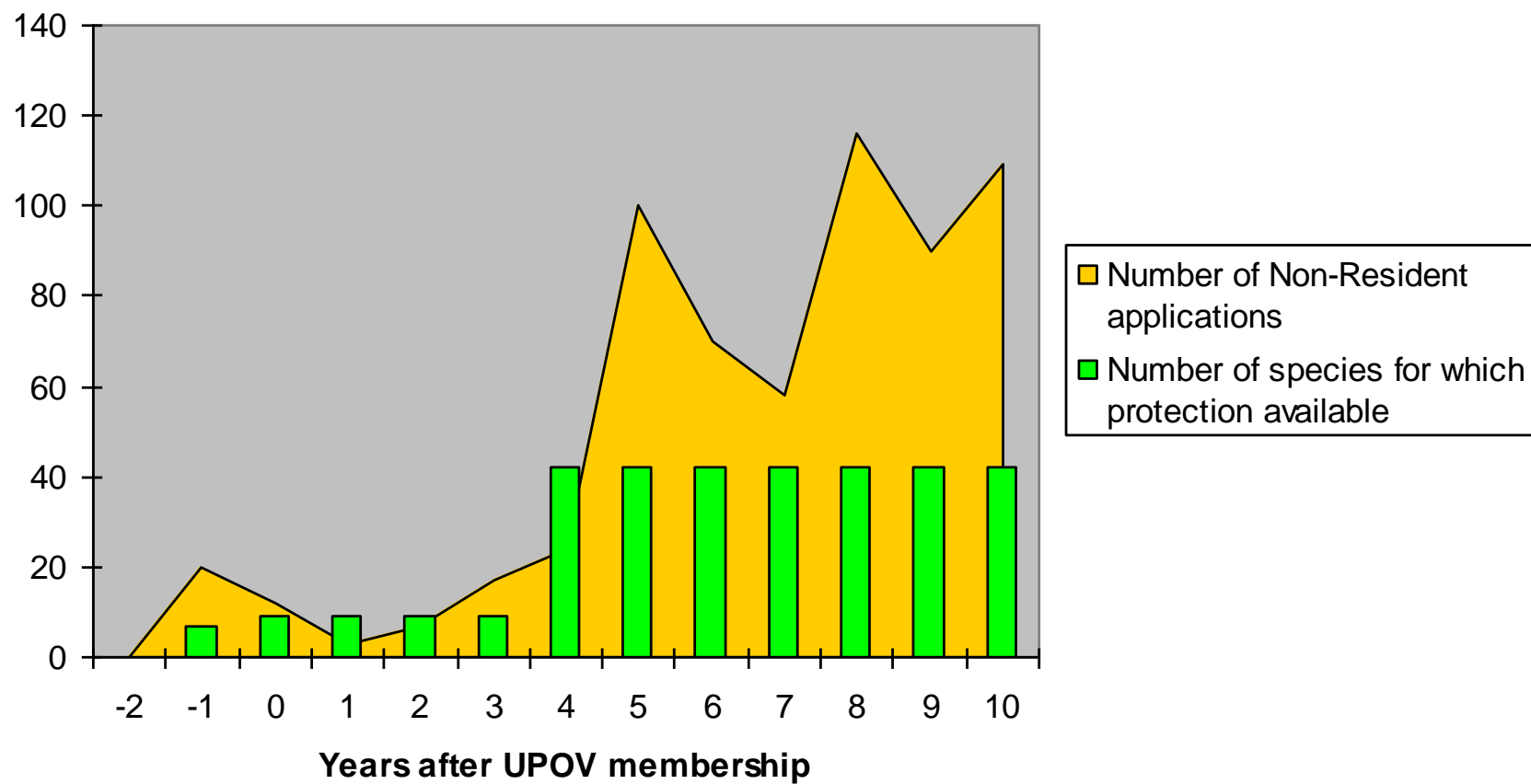
- (a) Breeders and varieties
- (b) Genera and species**
- (c) National treatment
- (d) Conditions of protection
- (e) Breeder's right and exceptions

**NON-RESIDENT PBR APPLICATIONS**  
(Selected Countries in Latin America)



Argentina, Chile, Colombia, Ecuador and Mexico provide protection for all genera and species of the plant kingdom.

## BRAZIL: Applications filed by Non-Residents





# MEETING the CHALLENGE

- Cooperation between Authorities can involve:
  - **purchase of DUS Test Reports** from other Authorities
  - **bilateral arrangements** to remove the need for duplication of DUS Tests
  - **centralized DUS testing** at regional or global level
- Cooperation with Breeders
- Support from UPOV
  - other members of the Union
  - UPOV Office

# **SOME KEY PROVISIONS OF THE UPOV CONVENTION (1991 Act)**

- (a) Breeders and varieties
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# NATIONAL TREATMENT

- National treatment, within the territory of a member of the Union, for nationals and residents of any other members of the Union

# **SOME KEY PROVISIONS OF THE UPOV CONVENTION (1991 Act)**

- (a) Breeders and varieties
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# CONDITIONS FOR GRANTING A BREEDER'S RIGHT

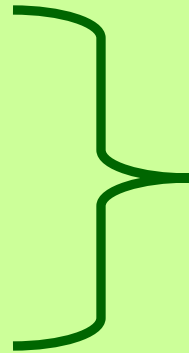
## *Criteria to be satisfied*

- NOVELTY

- DISTINCTNESS

- UNIFORMITY

- STABILITY



**“DUS”**

...

# CONDITIONS FOR GRANTING A BREEDER'S RIGHT

- **Novelty** : No sale or disposal earlier than
  - 1 year - own territory
  - 4 years - other territories (6 years - trees/vine) from the filing date
- Exception for varieties of recent creation (new members / extension of protection to additional genera or species)

# DISTINCTNESS

**Apple: Fruit color**

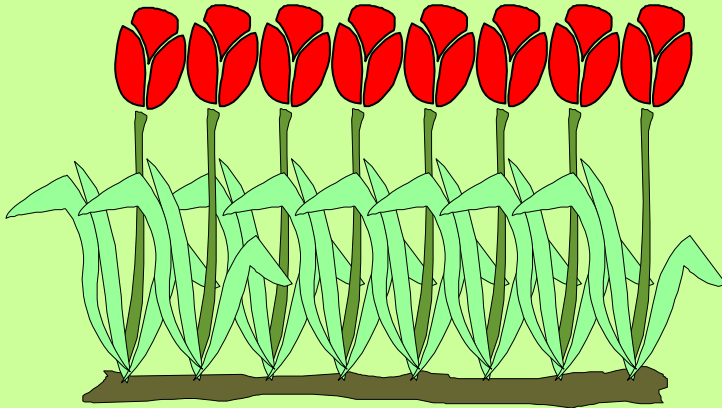


**Apple: Flower bud color**

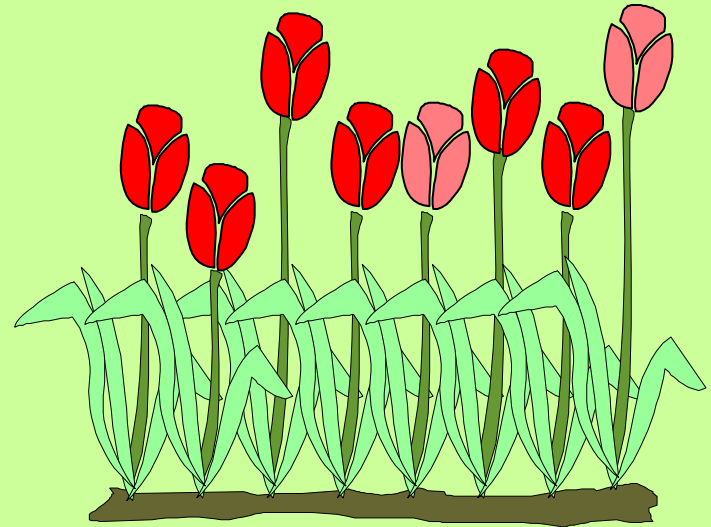




# UNIFORMITY

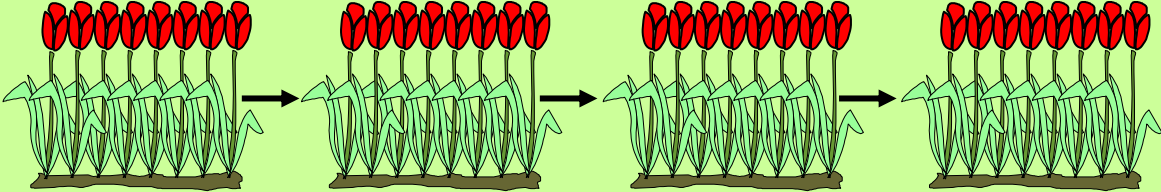


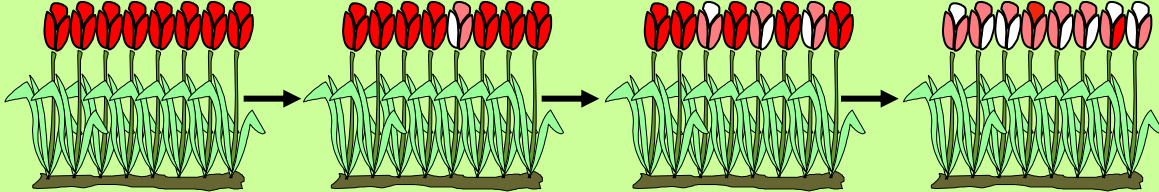
A uniform variety



A variety lacking uniformity

# STABILITY

Stable variety			
The relevant characteristics of the variety <u>do not change</u> through the generations.			
			
Original material	Generation 1	Generation 2	Generation N

Variety not stable / Variété non stable			
The relevant characteristics of the variety <u>change</u> through the generations. The plant grouping no longer retains the expression of the relevant characteristics of the original variety.			
			
Original material	Generation 1	Generation 2	Generation N

# Nature of the DUS Examination

## The “DUS Test” (field trial)



# **CONDITIONS FOR GRANTING A BREEDER'S RIGHT**

## **... Other requirements**

- VARIETY DENOMINATION**
- FORMALITIES**
- PAYMENT OF FEES**

**NO OTHER CONDITIONS!**

# DENOMINATION

- denomination must **enable the variety to be identified**
- **must be used** when offering **for** sale or marketing **propagating material** of the variety
- **same denomination in all UPOV members**, unless unsuitable
- must not be liable to mislead or to cause confusion (variety denomination classes)
- prior rights of third persons shall not be affected

# **SOME KEY PROVISIONS OF THE UPOV CONVENTION (1991 Act)**

- (a) Breeders and varieties
- (b) Genera and species
- (c) National treatment
- (d) Conditions of protection
- (e) Breeder's right and exceptions**

# MINIMUM DURATION OF PROTECTION

**TREES and VINES**                      **25** years

**OTHER PLANTS**                      **20** years

**To be counted from the date of grant**

# Authorization of breeder required for:

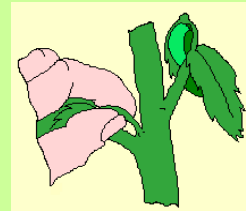
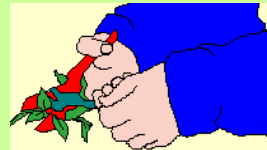
- Production or reproduction (multiplication)
- Conditioning for the purpose of propagation
- Offering for sale
- Selling or marketing
- Exporting
- Importing
- Stocking for any of the above purposes

*.... for any protected variety*



# MATERIAL COVERED

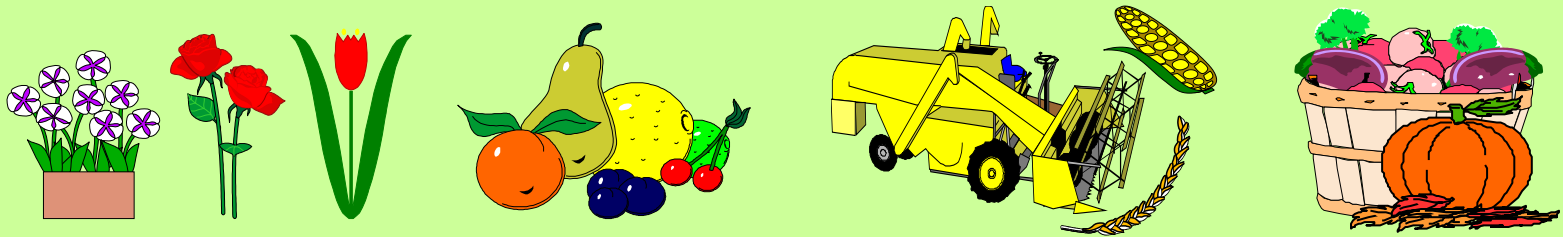
- All propagating material



- Harvested material under certain conditions
- Certain products (optional)

# MATERIAL COVERED

- All propagating material
- Harvested material



if obtained through **unauthorized use** of propagating material **unless**, reasonable **opportunity** for breeder to **exercise his right**

- **Certain products (optional)**

# VARIETIES COVERED

## VARIETIES:

- **not clearly distinguishable** from the protected variety
- whose production **requires the repeated use** of the protected variety  
*e.g. hybrids*
- which are **essentially derived** from the protected variety



## Vuyisile Phehane



• Delivering high performance varieties to subsistence/smallholder farmers

- Local licensing agreement with a South African company
  - for the commercialization of some of the ARC's citrus varieties.
  - A condition of the license: ensure the participation of smallholder citrus producers in the commercialization value-chain.
- Facilitated partnership with the Citrus Growers' Association to access ARC

# EXCEPTIONS TO THE BREEDER'S RIGHT

## Compulsory

Acts done:

- privately and for non-commercial purposes
- for experimental purposes
- breeding other varieties (breeder's exemption")

## Optional

Farm-saved seed

# EXCEPTIONS TO THE BREEDER'S RIGHT

- Compulsory

(i) Acts done privately **and** for non-commercial purposes

- propagation of a variety by a **farmer exclusively** for the production of a **food crop to be consumed entirely by that farmer and the dependents of the farmer** living on that holding

**therefore**

**“subsistence farming”** where these constitute acts done privately and for non-commercial purposes, may be considered by a UPOV member to be excluded from the scope of the breeder's right

Acts Possibly falling within the scope of the exception



# Breeder's Exemption

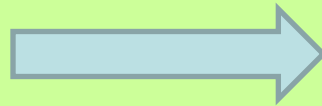
Utilizing protected varieties for breeding new varieties (Rep. of Korea)

'Daniela' tomato



Long shelf life

Segregation



Cross & selection

'Duessra' tomato



Long shelf life + more uniform fruit



# HOW TO BECOME A MEMBER OF UPOV

see documents UPOV/INF/13/1 and UPOV/INF/6/4 at  
[http://www.upov.int/members/en/upov\\_membership.html](http://www.upov.int/members/en/upov_membership.html)

**State/Intergovernmental Organization must:**

- **Have a law which conforms to the UPOV Convention**
- **Ask advice of the Council of UPOV**
- **If advice positive: deposit instrument of accession**



# PREVIEW

- 1. About UPOV and Plant Variety Protection**
- 2. Key elements of the 1991 Act of the UPOV Convention**
- 3. Benefits of UPOV membership**

# **BENEFITS OF PVP SYSTEM AND UPOV MEMBERSHIP**

## **(a) Breeders**

- Diversity of breeders
- Number of breeders
- Investment in breeding

## **(b) Improved varieties**

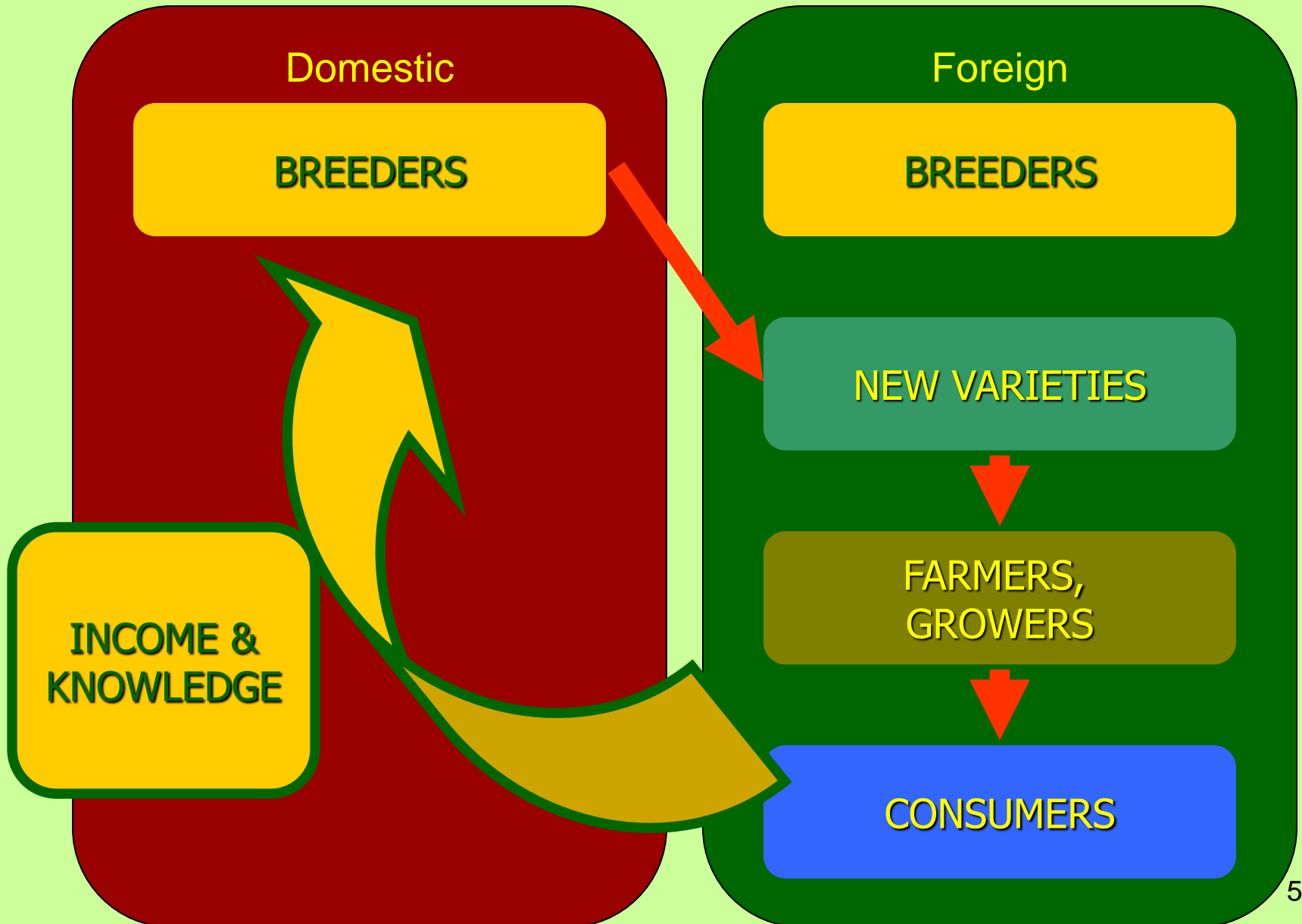
## **(c) Farmers, Growers, Consumers**

- Delivering improved varieties to farmers growers
- Delivering added value to consumers
- Income and Knowledge

## **(d) International dimension**

- Development of new industry on foreign markets
- Access to foreign varieties and enhanced domestic programs

# Benefits of UPOV



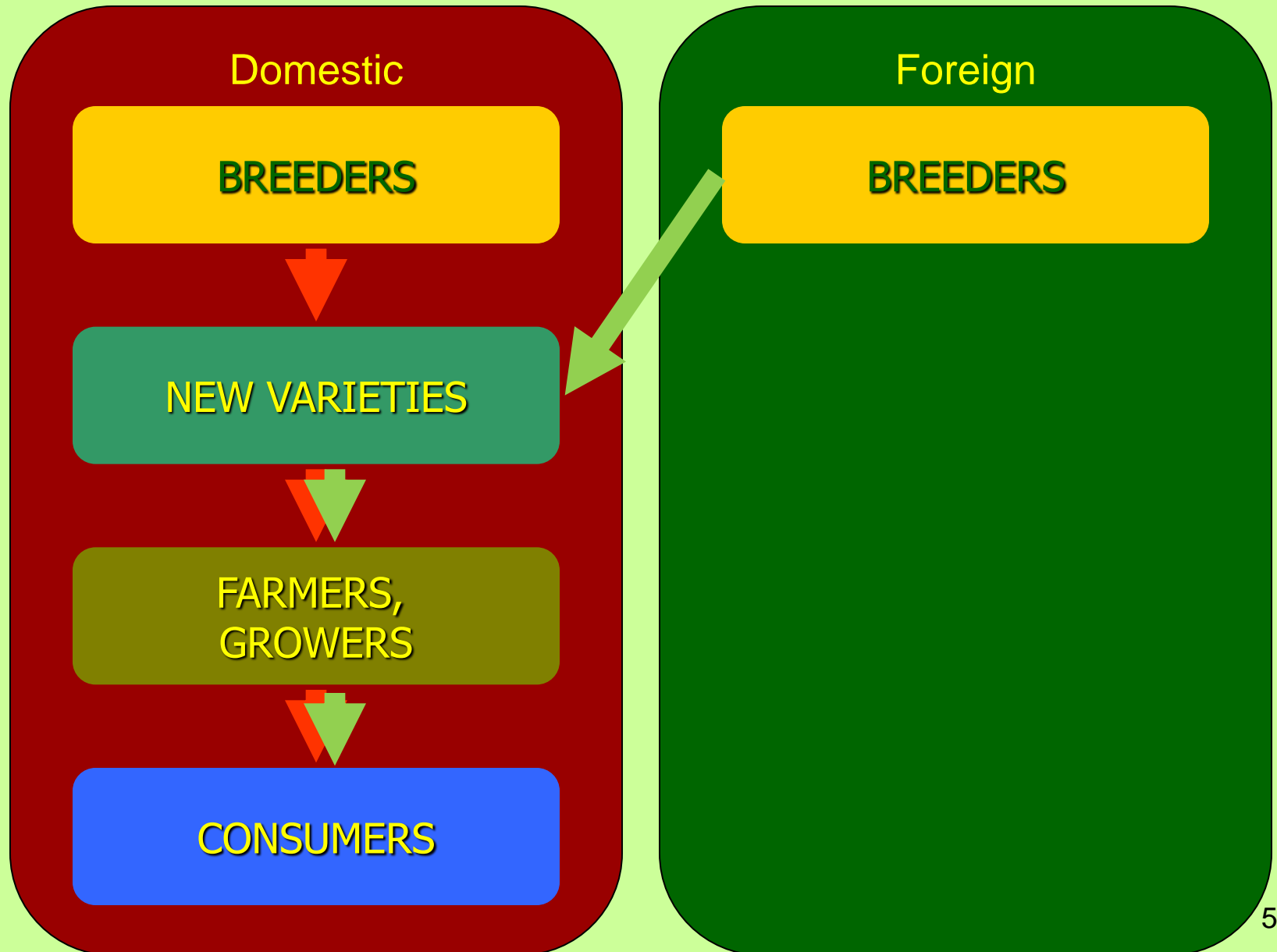
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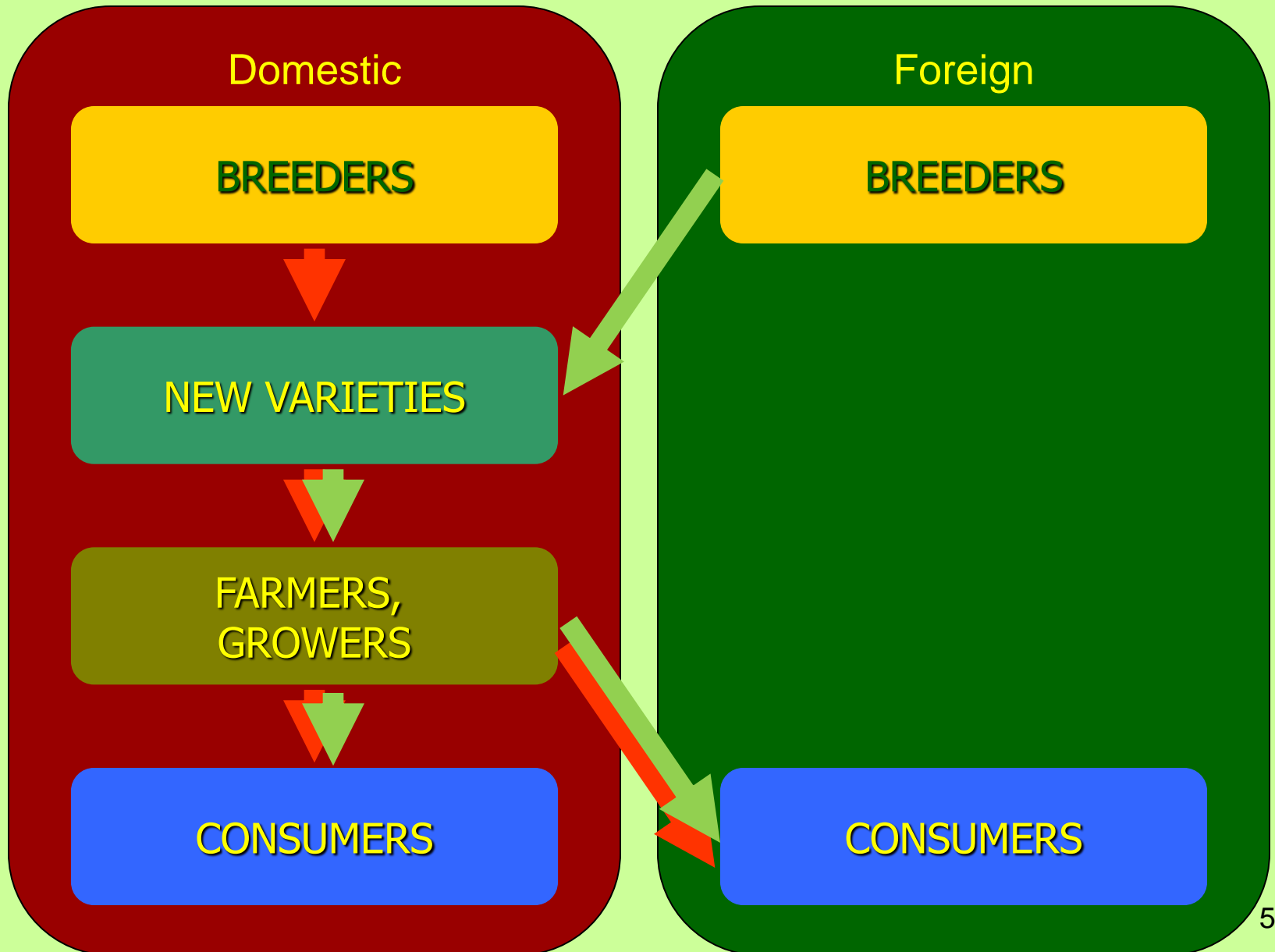
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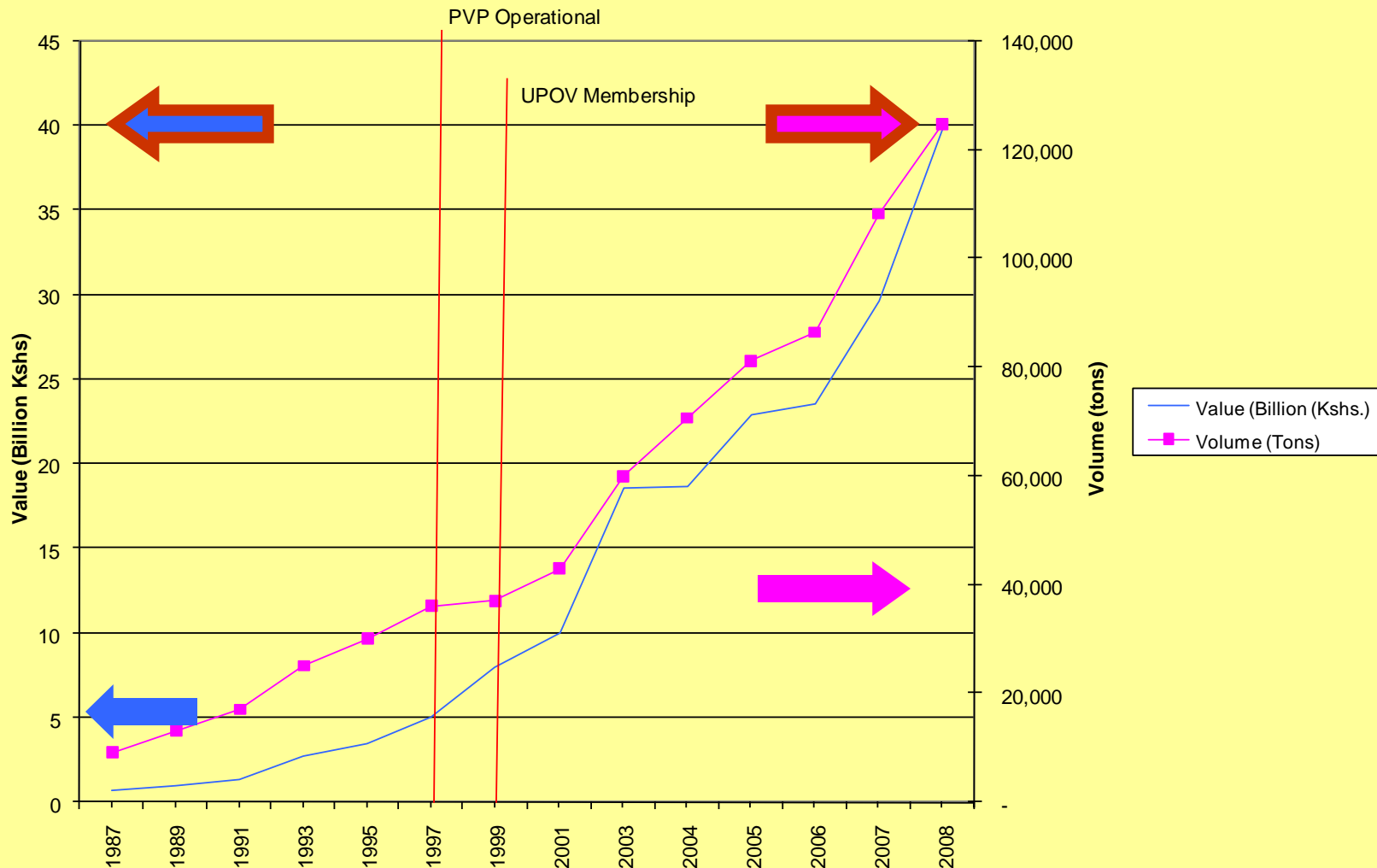


# Benefits of UPOV

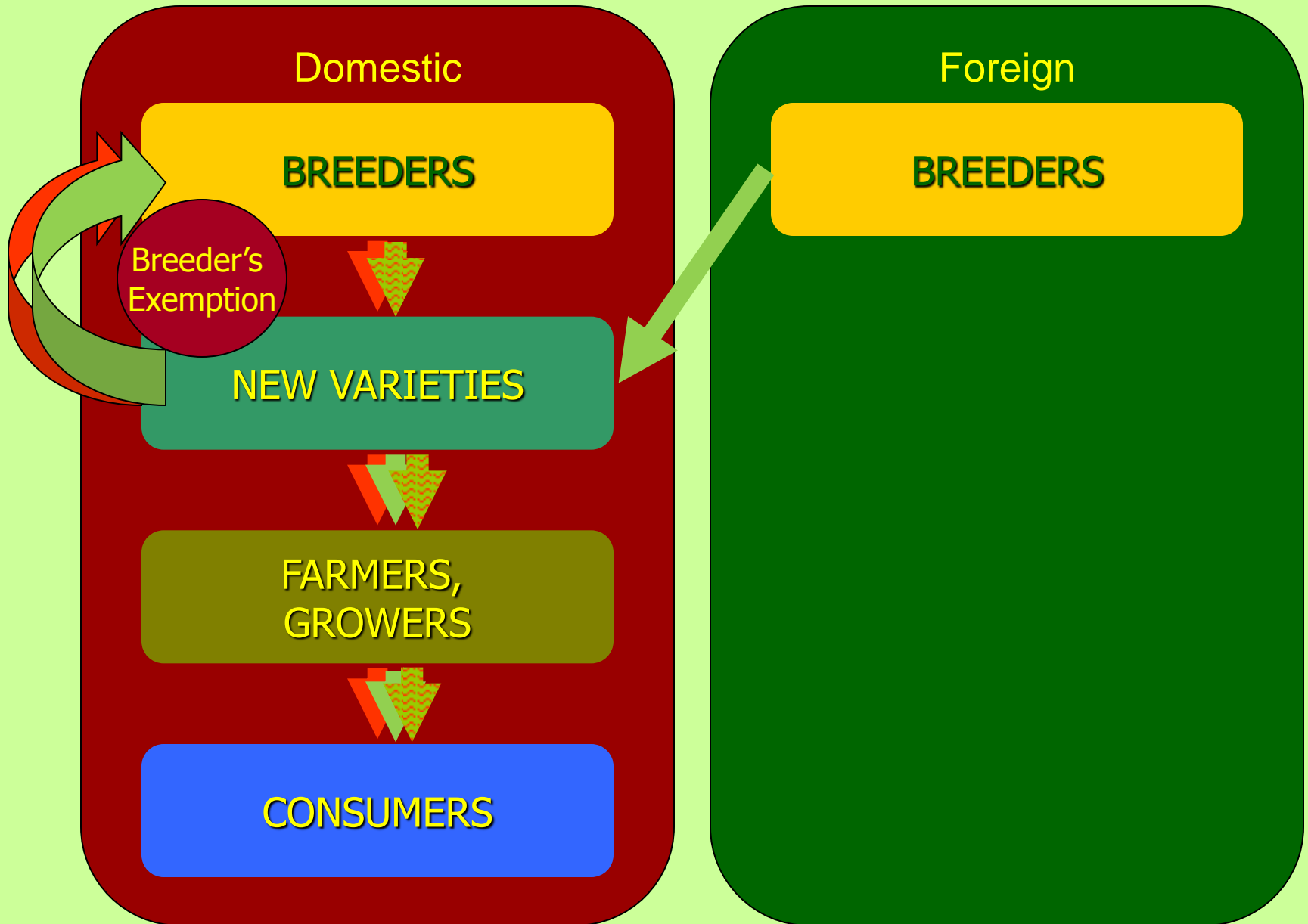


# International Market Development

## Export of Kenyan Cut Flowers

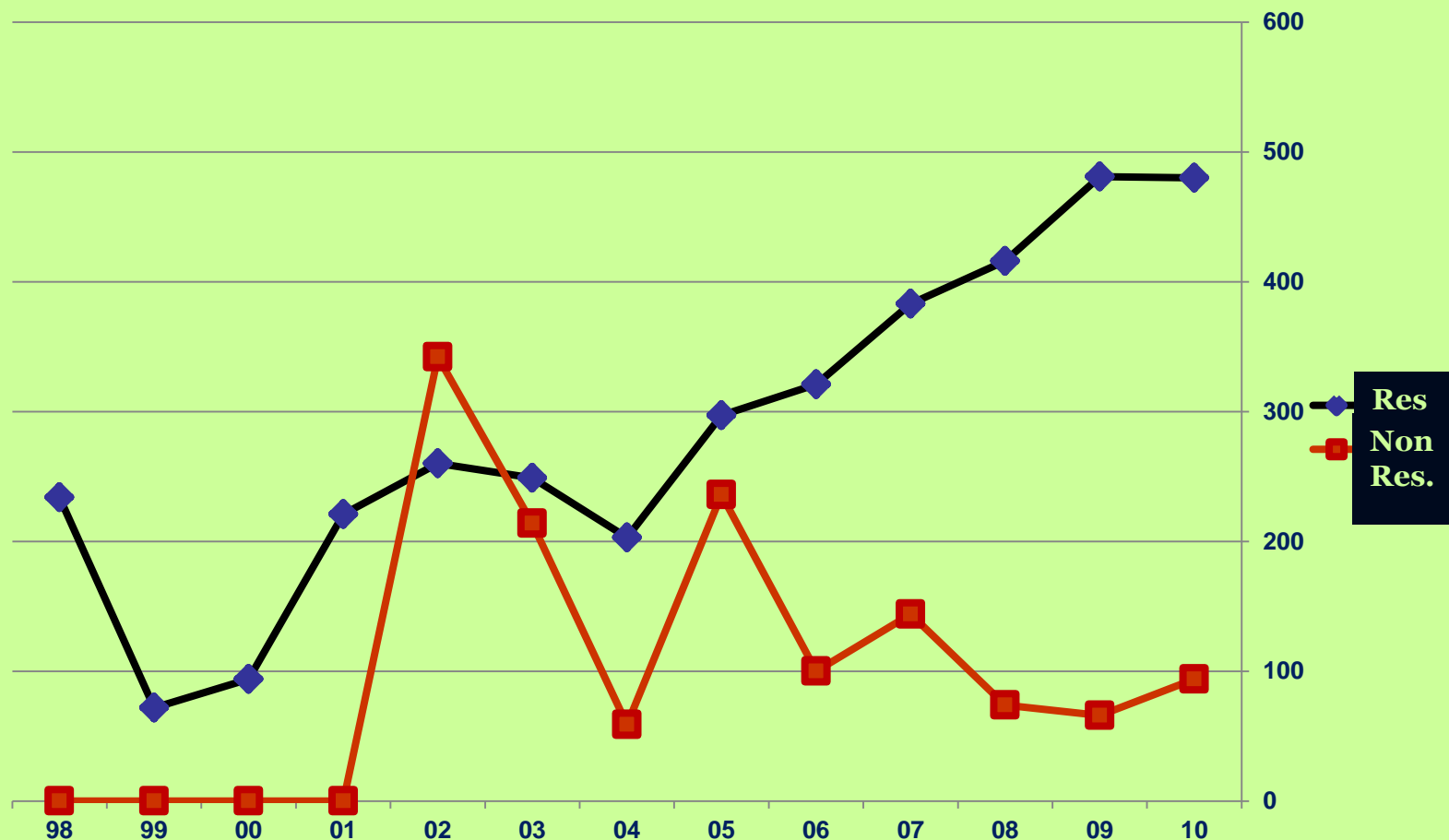


# Benefits of UPOV



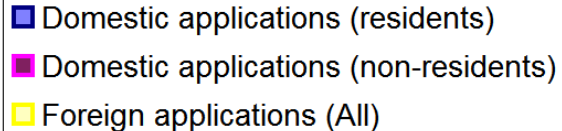
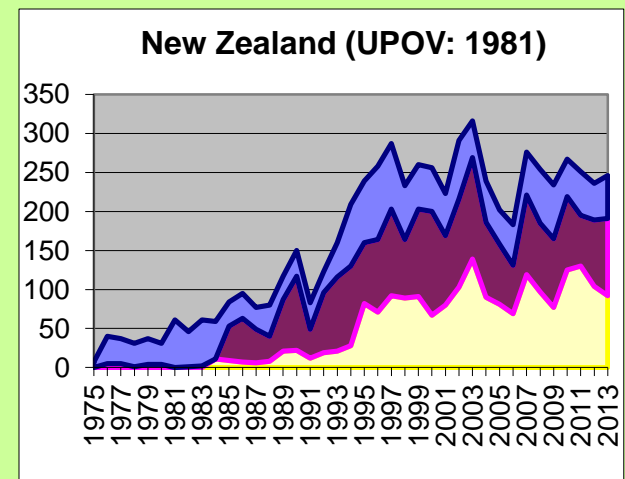
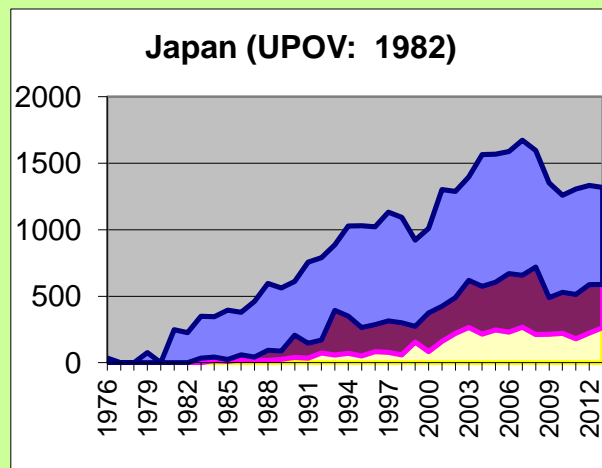
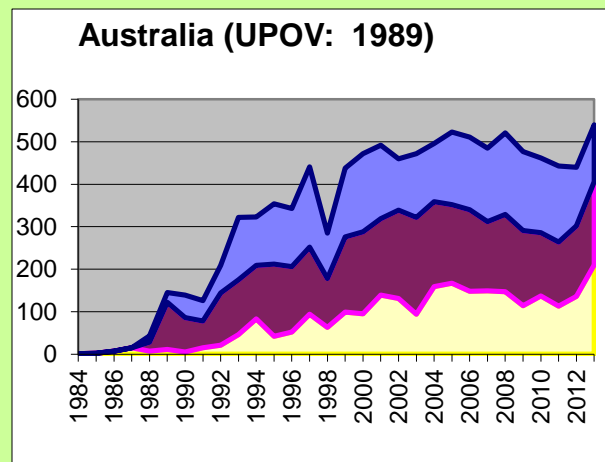
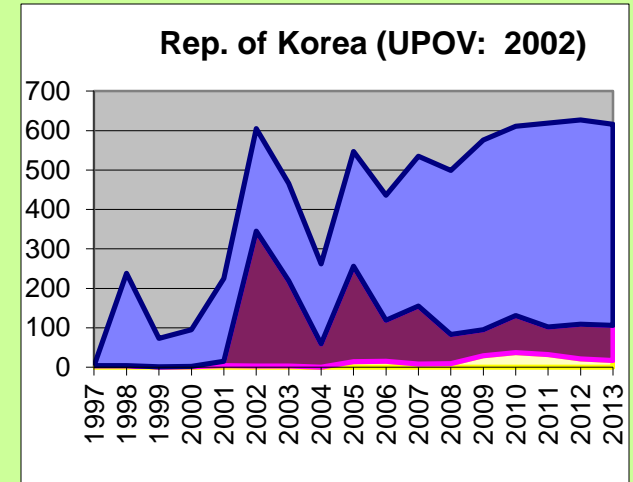
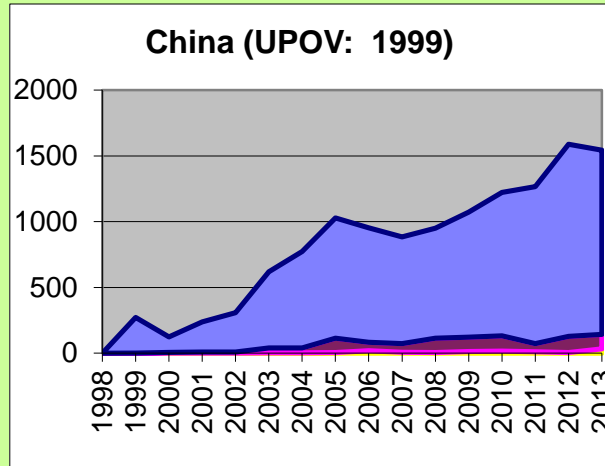
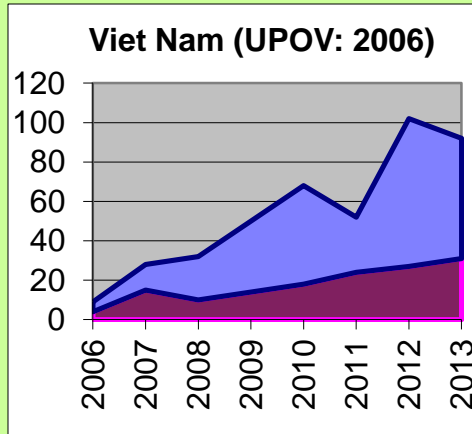


## Application Ratio of Residents/Non Res.



Dr. CHO, Il Ho (Symposium on Plant Variety Protection - Future Strategy for Enhancing the Effectiveness of the PVP System, Seoul July 13, 2011)

# International Perspective



# Benefits of UPOV

