

TG/ZINNIA(proj.1)
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# INTERNATIONAL UNION FOR THE PROTECTION OF NEW VARIETIES OF PLANTS GENEVA

DRAFT

#### **ZINNIA**

UPOV Code: ZINNI

Zinnia L.

#### **GUIDELINES**

#### FOR THE CONDUCT OF TESTS

#### FOR DISTINCTNESS, UNIFORMITY AND STABILITY

prepared by an expert from Mexico

to be considered by the

Technical Working Party for Ornamental Plants and Forest Trees at its forty-fourth session, to be held in Fukuyama City, Hiroshima Prefecture, Japan from November 7 to 11, 2011

#### Alternative Names:\*

Botanical nameEnglishFrenchGermanSpanishZinnia LZinniaZinniaZinniaMiguelito,<br/>Carolina

The purpose of these guidelines ("Test Guidelines") is to elaborate the principles contained in the General Introduction (document TG/1/3), and its associated TGP documents, into detailed practical guidance for the harmonized examination of distinctness, uniformity and stability (DUS) and, in particular, to identify appropriate characteristics for the examination of DUS and production of harmonized variety descriptions.

#### ASSOCIATED DOCUMENTS

These Test Guidelines should be read in conjunction with the General Introduction and its associated TGP documents.

<sup>\*</sup> These names were correct at the time of the introduction of these Test Guidelines but may be revised or updated. [Readers are advised to consult the UPOV Code, which can be found on the UPOV Website (www.upov.int), for the latest information.]

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#### 1. <u>Subject of these Test Guidelines</u>

These Test Guidelines apply to all varieties and species of *Zinnia sp.* Jacq. and their interspecific hybrids.

#### 2. Material Required

- 2.1 The competent authorities decide on the quantity and quality of the plant material required for testing the variety and when and where it is to be delivered. Applicants submitting material from a State other than that in which the testing takes place must ensure that all customs formalities and phytosanitary requirements are complied with.
- 2.2 The material is to be supplied in the form of seed.
- 2.3 The minimum quantity of plant material, to be supplied by the applicant, should be:

seed-propagated varieties: 20 seeds

#### JAPAN and GB PROPOSE: SUFFICIENT SEEDS TO PRODUCE 40 PLANTS

The seed should meet the minimum requirements for germination, species and analytical purity, health and moisture content, specified by the competent authority. In cases where the seed is to be stored, the germination capacity should be as high as possible and should, be stated by the applicant.

- 2.4 The plant material supplied should be visibly healthy, not lacking in vigor, nor affected by any important pest or disease.
- 2.5 The plant material should not have undergone any treatment which would affect the expression of the characteristics of the variety, unless the competent authorities allow or request such treatment. If it has been treated, full details of the treatment must be given.

#### 3. Method of Examination

#### 3.1 Number of Growing Cycles

The minimum duration of tests should normally be a single growing cycle.

#### 3.2 Testing Place

Tests are normally conducted at one place. In the case of tests conducted at more than one place, guidance is provided in TGP/9 "Examining Distinctness".

#### 3.3 Conditions for Conducting the Examination

3.3.1 The tests should be carried out under conditions ensuring satisfactory growth for the expression of the relevant characteristics of the variety and for the conduct of the examination.

- 3.3.2 Because daylight varies, color determinations made against a color chart should be made either in a suitable cabinet providing artificial daylight or in the middle of the day in a room without direct sunlight. The spectral distribution of the illuminant for artificial daylight should conform with the CIE Standard of Preferred Daylight D 6500 and should fall within the tolerances set out in the British Standard 950, Part I. These determinations should be made with the plant part placed against a white background. The color chart and version used should be specified in the variety description."
- 3.4 Test Design
- 3.4.1 In the case of seed-propagated varieties, each test should be designed to result in a total of at least 20 plants.

#### JAPAN and GB PROPOSE 40 PLANTS

- 3.4.2 The design of the tests should be such that plants or parts of plants may be remove for measurement or counting without prejudice to the observation which must be made up to the end of the growing cycle.
- 3.5 Additional Tests

Additional tests, for examining relevant characteristics, may be established.

- 4. Assessment of Distinctness, Uniformity and Stability
- 4.1 Distinctness
  - 4.1.1 General Recommendations

It is of particular importance for users of these Test Guidelines to consult the General Introduction prior to making decisions regarding distinctness. However, the following points are provided for elaboration or emphasis in these Test Guidelines.

#### 4.1.2 Consistent Differences

The differences observed between varieties may be so clear that more than one growing cycle is not necessary. In addition, in some circumstances, the influence of the environment is not such that more than a single growing cycle is required to provide assurance that the differences observed between varieties are sufficiently consistent. One means of ensuring that a difference in a characteristic, observed in a growing trial, is sufficiently consistent is to examine the characteristic in at least two independent growing cycles.

#### 4.1.3 Clear Differences

Determining whether a difference between two varieties is clear depends on many factors, and should consider, in particular, the type of expression of the characteristic being examined, i.e. whether it is expressed in a qualitative, quantitative, or pseudo-qualitative manner. Therefore, it is important that users of these Test Guidelines are familiar with the recommendations contained in the General Introduction prior to making decisions regarding distinctness.

#### 4.1.4 Number of Plants / Parts of Plants to be Examined

Unless otherwise indicated, for the purposes of distinctness, all observations on single plants should be made on 20 plants or parts taken from each of 20 plants and any other observations made on all plants in the test, disregarding any off-type plants. For seed-propagated varieties, unless otherwise indicated, all observations on single plants should be made on 20 plants or parts taken from each of 20 plants and any other observations made on all plants in the test.

#### 4.1.5 Method of Observation

The recommended method of observing the characteristic for the purposes of distinctness is indicated by the following key in the second column of the Table of Characteristics (see document TGP/9 "Examining Distinctness", Section 4 "Observation of characteristics"):

MG: single measurement of a group of plants or parts of plants

MS: measurement of a number of individual plants or parts of plants

VG: visual assessment by a single observation of a group of plants or parts of plants

VS: visual assessment by observation of individual plants or parts of plants

Type of observation: visual (V) or measurement (M)

"Visual" observation (V) is an observation made on the basis of the expert's judgment. For the purposes of this document, "visual" observation refers to the sensory observations of the experts and, therefore, also includes smell, taste and touch. Visual observation includes observations where the expert uses reference points (e.g. diagrams, example varieties, side-by-side comparison) or non-linear charts (e.g. color charts). Measurement (M) is an objective observation against a calibrated, linear scale e.g. using a ruler, weighing scales, colorimeter, dates, counts, etc.

Type of record: for a group of plants (G) or for single, individual plants (S)

For the purposes of distinctness, observations may be recorded as a single record for a group of plants or parts of plants (G), or may be recorded as records for a number of single, individual plants or parts of plants (S). In most cases, "G" provides a single record per variety and it is not possible or necessary to apply statistical methods in a plant-by-plant analysis for the assessment of distinctness."

In cases where more than one method of observing the characteristic is indicated in the Table of Characteristics (e.g. VG/MG), guidance on selecting an appropriate method is provided in document TGP/9, Section 4.2.

#### 4.2 Uniformity

4.2.1 It is of particular importance for users of these Test Guidelines to consult the General Introduction prior to making decisions regarding uniformity. However, the following points are provided for elaboration or emphasis in these Test Guidelines:

- 4.2.2 The assessment of uniformity for seed-propagated varieties should be according to the recommendations for cross-pollinated varieties in the General Introduction. The assessment of uniformity for hybrid varieties depends on the type of hybrid and should be according to the recommendations for hybrid varieties in the General Introduction.
- 4.3 Stability
- 4.3.1 In practice, it is not usual to perform tests of stability that produce results as certain as those of the testing of distinctness and uniformity. However, experience has demonstrated that, for many types of variety, when a variety has been shown to be uniform, it can also be considered to be stable.
- 4.3.2 Where appropriate, or in cases of doubt, stability may be tested, either by growing a further generation, or by testing a new seed stock to ensure that it exhibits the same characteristics as those shown by the previous material supplied.
- 5. <u>Grouping of Varieties and Organization of the Growing Trial</u>
- 5.1 The selection of varieties of common knowledge to be grown in the trial with the candidate varieties and the way in which these varieties are divided into groups to facilitate the assessment of distinctness are aided by the use of grouping characteristics.
- 5.2 Grouping characteristics are those in which the documented states of expression, even where produced at different locations, can be used, either individually or in combination with other such characteristics: (a) to select varieties of common knowledge that can be excluded from the growing trial used for examination of distinctness; and (b) to organize the growing trial so that similar varieties are grouped together.
- 5.3 The following have been agreed as useful grouping characteristics:
  - (a) Plant: height (characteristic 1)
  - (b) Plant: growth habit (characteristic 2)
  - (c) Leaf: length (characteristic 8)
  - (d) Flower head: type (characteristic 15)
  - (e) Only varieties with one flower head color: Flower head: color (characteristic 27) with the following groups:

Gr. 1: whitish (JAPAN PROPOSE DELETE)

Gr. 2: white

Gr. 3: yellow

Gr. 4: orange

Gr. 5: green

Gr. 6: gicen

Gr. 7: red

5.4 Guidance for the use of grouping characteristics, in the process of examining distinctness, is provided through the General Introduction and document TGP/9 "Examining Distinctness".

#### 6. Introduction to the Table of Characteristics

#### 6.1 Categories of Characteristics

#### 6.1.1 Standard Test Guidelines Characteristics

Standard Test Guidelines characteristics are those which are approved by UPOV for examination of DUS and from which members of the Union can select those suitable for their particular circumstances.

#### 6.1.2 Asterisked Characteristics

Asterisked characteristics (denoted by \*) are those included in the Test Guidelines which are important for the international harmonization of variety descriptions and should always be examined for DUS and included in the variety description by all members of the Union, except when the state of expression of a preceding characteristic or regional environmental conditions render this inappropriate.

#### 6.2 States of Expression and Corresponding Notes

- 6.2.1 States of expression are given for each characteristic to define the characteristic and to harmonize descriptions. Each state of expression is allocated a corresponding numerical note for ease of recording of data and for the production and exchange of the description.
- 6.2.2 In the case of qualitative and pseudo-qualitative characteristics (see Chapter 6.3), all relevant states of expression are presented in the characteristic. However, in the case of quantitative characteristics with 5 or more states, an abbreviated scale may be used to minimize the size of the Table of Characteristics. For example, in the case of a quantitative characteristic with 9 states, the presentation of states of expression in the Test Guidelines may be abbreviated as follows:

State	Note
small	3
medium	5
large	7

However, it should be noted that all of the following 9 states of expression exist to describe varieties and should be used as appropriate:

State	Note
very small	1
very small to small	2
small	3
small to medium	4
medium	5
medium to large	6
large	7
large to very large	8
very large	9

6.2.3 Further explanation of the presentation of states of expression and notes is provided in document TGP/7 "Development of Test Guidelines".

### 6.3 Types of Expression

An explanation of the types of expression of characteristics (qualitative, quantitative and pseudo-qualitative) is provided in the General Introduction.

#### 6.4 Example Varieties

Where appropriate, example varieties are provided to clarify the states of expression of each characteristic.

- 6.5 Legend
- (\*) Asterisked characteristic see Chapter 6.1.2
- QL Qualitative characteristic see Chapter 6.3
- QN Quantitative characteristic see Chapter 6.3
- PQ Pseudo-qualitative characteristic see Chapter 6.3
- (+) See Explanations on the Table of Characteristics in Chapter 8.2

### 7. <u>Table of Characteristics/Tableau des caractères/Merkmalstabelle/Tabla de caracteres</u>

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
1.	Plant: height	Plante: hauteu	Pflanze: Höhe	Planta: altura		
(+)						
QN	short	basse	niedrig	pequeña		3
	medium	moyenne	mittel	media		5
	tall	haute	hoch	grande		7
2.	Plant: growth habit	Plante: port	Pflanze: Wuchsform	Planta: porte		
(+)			w uchstorm			
QN	upright	dressé	aufrecht	erecto		3
PQ JAPAN	semi upright	demi–dressé	halbaufrecht	semierecto		5
	spreading	étalé	breitwüchsig	abierto		7
3.	Plant: branching	Plante: ramification	Pflanze:	Planta: ramificación		
(+)		rammeation	Verzweigung	rannicación		
QN	absent or weak	absente ou faible	fehlend oder gering	ausente o débil		1
	medium	moyenne	mittel	media		2
	strong	forte	stark	fuerte		3
4.	Stem: anthocyanin coloration	Tige: pigmentation anthocyanique	Stiel: Anthocyanfärbung	Tallo: pigmentación antociánica		
QL	absent	absente	fehlend	ausente		1
	present	présente	vorhanden	presente		9
5.	Stem: intensity of anthocyanin coloration	Tige: intensité de la pigmentation anthocyanique	Stiel: Intensität der Anthocyanfärbung	Tallo: intensidad de la pigmentación antociánica		
	weak	faible	gering	débil		3
	medium	moyenne	mittel	media		5
	strong	forte	stark	fuerte		7

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>6.</b> (+)	Stem: density of pubescence			Tallo: densidad de pubescencia		
QL	sparse			escaza		3/ <mark>1</mark>
	medium	JAPAN, IL		media		<mark>5/2</mark>
	dense			densa		<mark>7/3</mark>
7.	Leaf: shape			Hoja: forma		
(+)						
QL	4 ovate			ovada		1
PQ <sub>JA</sub>	3 narrow ovate			ovada estrecha		2
	2oblanceolate			oblanceolada		3
	<mark>1</mark> lanceolate <mark>japan</mark>			lanceolada		4
8.	Leaf: length	Feuille: longueur	Blatt: Länge	Hoja: longitud		
(+)						
QN	short	courte	kurz	corta		3
	medium	moyenne	mittel	media		5
	long	longue	lang	larga		7
9.	Leaf: folding	JAPAN AGREE OPINION OF IL		Hoja: doblamiento		
(+)		AN IL				
QN	absent			asente		1
	present			presente		9
10.	Leaf: twisting			Hoja: torsión		
(+)						
QL	absent			ausente		1
	present			presente		9

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
11.	Leaf: width	Feuille: largeur	Blatt: Breite	Hoja: anchura		
QN	narrow	étroite	schmal	estrecha		3
	medium	moyenne	mittel	media		5
	broad	large	breit	ancha		7
12.	Leaf: intensity of green color	Feuille: intensité de la couleur	Blatt: Intensität der Grünfärbung	Hoja: intensidad del color verde		
QN	light	verte claire	hell	claro		3
	medium	moyenne	mittel	medio		5
	dark	foncée	dunkel	oscuro		7
13.	Leaf: base of the leaf: anthocyanin coloration			Hoja: base de la hoja: coloración antociánica		
QL	absent			ausente		1
	present			presente		9
14.	Peduncle: length	Longueur du pédoncule du capitule terminal	Längedes Blütenstiels des Terminalblütenstan des	Pedúnculo: longitud	MOVING AFTER CHARAC 19 JAPAN	
QN	short	court	kurz	corto		3
	medium	moyen	mittel	medio		5
	long	long	lang	largo		7
15.	Flower head: type		JAPAN: LIKE	Capítulo : tipo		
(+)			MUMS			
QN	single			sencillo		3
	semi double			semi doble		5
	double			doble		7

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
16.	Only double or semidouble			<u>Sólo capítulos</u> semidobles o		
(+)	varieties: Flower head: type			dobles: Capítulo: tipo		
QL	anemone			anémona		1
	pompon			decorativo		2
	cactus			cactus		3
17.	FLOWER HEAD: NUMBER OF RAY FLORETS	JAPAN '				
<mark>NE</mark> W QN	low			pocos		3
	medium			medio		5
	high			muchos		7
18.	Flower head:	Capitule: diamètre	Blütenstand:	Capítulo: diámetro		
(+)	diameter		Durchmesser			
QN	small	petit	klein	pequeño		3
	medium	moyen	mittel	medio		5
	large	grand	groß	grande		7
19.	Ray floret: shape			Flor ligulada: forma		
(+)				тогша		
QL	elliptic			eliptica		1
	narrow obovate			obovada estrecha		2
	medium obovate			obovada media		3
	broad obovate			obovada amplia		
20.	Ray floret: twisting			Flor ligulada: torsión		
(+)				tot sion		
QL	absent			ausente		1
	present			presente		9

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
21.	Ray floret: folding			Flor ligulada: doblamiento		
(+)				dobiamiento		
QL	absent			ausente		1
	present			presente		9
22.	Ray floret: length			Flor ligulada: longitud		
QN	short			corta		3
	medium			media		5
	long			larga		7
23.	Ray floret: sinus			Flor ligulada: seno		
(+)						
QL	absent			ausente		1
	present			presente		9
24.	Ray floret: Sinus: depth of sinus			Flor ligulada: Seno: profundidad de seno		
QN	small			pequeña		
Q.	medium			media		
	large			grande		
25.	Ray floret: number of colors of inner side	Capitule: nombre de couleurs	Blütenstand: Anzahl Farben	Flor ligulada: número de colores del lado interno		
PQ	one	une	eine	uno		1
	two	deux	zwei	dos		2
	more than two			más de dos		3
26.	Only varieties with one color: Ray floret: color of inner side			Solo variedades con un color: Flor ligulada: color del lado interno		
PQ	RHS Colour Chart			Carta de colores RHS		

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
27.	Only varieties with two colors: Ray floret: main color of inner side			Solo variedades con dos colores: Flor ligulada: color principal del lado interno		
PQ	RHS Colour Chart			Carta de coloresRHS		
28.	Only varieties with two colors: Ray floret: secondary color of inner side			Solo variedades con dos colores: Flor ligulada: color secundario del lado interno		
	RHS Colour Chart			Carta de colores RHS		
<b>29.</b> (+)	Ray floret: distribution of secondary color of inner side	Ray Floret: Color of base Either RHS Or Mentioned colors (IL)		Flor ligulada: variedades con dos colores: lado interno: distribución del color secundario		
PQ	lower side			parte basal		1
	upper side			parte superior		2
	spots			manchas		3
	bands			bandas		4
30.	Only varieties with more than two colors: Ray floret: tertiary color of inner side			Solo variedades con más de dos colores: Flor ligulada: color terciario del lado interno		
PQ	RHS Colour Chart			Carta de colores:RHS		
31.	Only varieties with more than two colors: Ray floret: distribution of tertiary color of inner side			Solo variedades con más de dos colores: Flor ligulada: distribución del color terciario del lado interno		
PQ	lower side			parte basal		
	upper side			parte superior		
	spots			manchas		
	bands			bandas		

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
32.	Only single and semi double varieties: Disc color	r		Solo variedades sencillas y semidobles: Color del disco		
PQ	RHS ColourChart			Carta de coloresRHS		
33.	Time to flowering	Époque du début de floraison	Zeitpunkt des Blühbeginns	Periodo de floración		
QN	early	précoce	früh	temprana		3
	medium	moyenne	mittel	media		5
	late	tardive	spät	tardía		7

### 8. <u>Explanations on the Table of Characteristics</u>

### 8.1 Explanations for individual characteristics

### Ad. 1: Plant: height

3 5 7 short medium tall

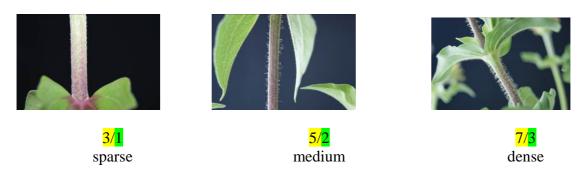
### Ad. 2: Plant: growth habit



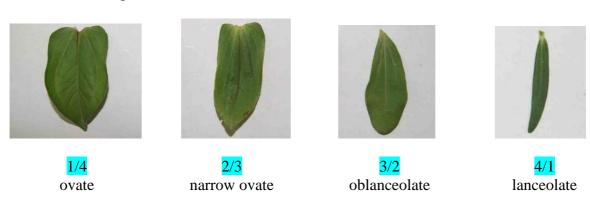
### Ad. 3: Plant: branching

1 2 3 absent or weak medium strong

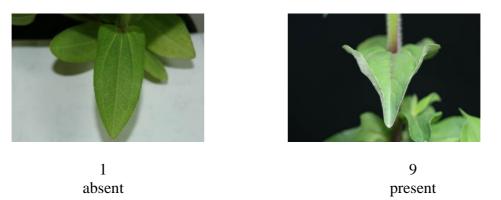
Ad. 6: Stem: density of pubescence



Ad. 8: Leaf: shape



Ad. 9: Leaf: folding



### Ad. 10: Leaf: twisting





1 absent

9 present

### Ad. 14: Peduncle: length



3 short



5 medium



7 long

### Ad. 15: Flower head: type



3 single



5 semi double



7 double

Ad. 17: Flower head: attitude

upright semi upright horizontal

Ad. 18: Flower head: diameter



Ad. 19: Ray floret: shape

1 2 3 elliptic narrow obovate medium obovate broad obovate

Ad. 20: Ray floret: twisting

1 9 absent present

### Ad. 21: Ray floret: folding

1 9 absent present

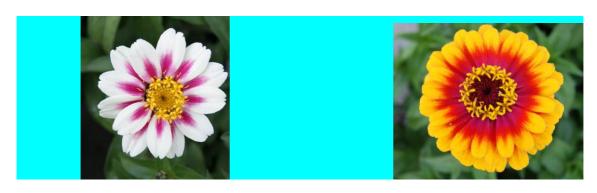
Ad. 22: Ray floret: length

3 5 7 short medium long

Ad. 23: Ray floret: sinus

1 9 absent present

### Ad. 30: Ray floret: inner side: distribution of secondary color



base of ray floret

remaining part

### 9. <u>Literature</u>

Calderon de Rzedowski, G y J, Rzedowski, 2006: Flora Fanerogámica del Valle de México. Ed. Instituto de Ecologia A.C. y Comisión Nacional para el Conocimiento y Uso de la Biodiversidad. México, MX, 983 p.

Smith A.R., 226.Zinnia L. In: Flora of North America Vol.21. Oxford University Press.

Torres, A.M., 1963: Taxonomy of Zinnia. Brittonia 15: 1-25

## 10. <u>Technical Questionnaire</u>

TEC	HNIC	AL QUESTIONNAIRE	Page {x} of	{y}	Reference Number:	
					Application date: (not to be filled in by the appl	licant)
and this	the cas where Techni	to be completed in conne e of hybrid varieties wh the parent lines are to be	ich are the subject submitted as a ld be complete	pplication ect of an part of t	NAIRE  n for plant breeders' rights application for plant breeders' he examination of the hybrid v ch of the parent lines, in addit	ariety,
1.	Subje	ect of the Technical Que	stionnaire			
	1.1	Botanical name	innia L.			
	1.2	Common name Z	innia			
2.	Appli	icant				
	Name	e				
	Addr	ess				
	Telep	phone No.				
	Fax N	No.				
	E-ma	il address				
	Breed	der (if different from app	blicant)			
3.	Propo	osed denomination and l	oreeder's referei	nce		
	-	osed denomination ailable)				
	Breed	der's reference				

TECHNICAL QUESTIONNAIRE	Page $\{x\}$ of $\{y\}$	Reference Number:

Information on the breeding scheme and propagation of the var	riety
4.1 Breeding scheme	
{ ASW 15 (Chapter 10: TQ 4.1) – information on breeding se	cheme }
"Variety resulting from:	
"4.1.1 Crossing	
"(a) controlled cross (please state parent varieties)	[ ]
( x ( female parent male parent	)
"(b) partially known cross (please state known parent variety(ies))	[ ]
( x ( female parent male parent	)
"(c) unknown cross	[ ]
"4.1.2 Mutation (please state parent variety)	[ ]
"4.1.3 Discovery and development (please state where and when discovered and how	[ ] v developed)
"4.1.4. Others	r 1"
"4.1.4 Other (please provide details)"	[ ]"

<sup>&</sup>lt;sup>#</sup> Authorities may allow certain of this information to be provided in a confidential section of the Technical Questionnaire.

TECHNICAL QUESTIONNAIRE	Page $\{x\}$ of $\{y\}$	Reference Number:

	propagating the variety	
{ GN 31 (Chapt	ter 10: $TQ 4.2$ ) – information on	method of propagating the variety }
xample 1		
"4.2.1 Seed	-propagated varieties	
"(a)	Self-pollination	[ ]
"(b)	Cross-pollination	
	(i) population	[ ]
	(ii) synthetic variety	[ ]
"(c)		[ ]
	{ see GN 32 for example}	
"(d)		[ ]
# 10 mm		
"4.2.2 Vege	etatively propagated varieties	
{se	ee Example 2}	[]
"4.2.3 Othe	r	[ ]"
	se provide details)"	
		u,

TECHNICAL QUESTIONNAIRE	Page $\{x\}$ of $\{y\}$	Reference Number:

Example 2		
"4.2.1 Vegetative propagation		
"(a) cuttings		[ ]
"(b) in vitro propagation		[ ]
"(c) other (state method)		[ ]
"4.2.2 Seed		[ ]
"4.2.3 Other (please provide details)"		[ ]"
{ GN 32 (Chapter 10: TQ 4.2) – informatio	n on n	nethod of propagation of hybrid varieties }
"In the case of hybrid varieties the production separate sheet. This should provide details of hybrid e.g.		•
"Single Hybrid		
() female parent	X	() male parent
"Three-Way Hybrid		
() female line	X	() male line
() single hybrid used as female parent		x () male parent
"and should identify in particular:		
"(a) any male sterile lines "(b) maintenance system of male sterile	e lines	,, ·

TECHNICAL QUESTIONNAIRE	NICAL QUESTIONNAIRE Page {x} of {y} Reference Number:						
5. Characteristics of the variety to be indicated (the number in brackets refers to the corresponding characteristic in Test Guidelines; please mark the note which best corresponds).							
Characteristics		Example Varieties	Note				

TECHNICAL QUEST	IONNAIRE	Page {x} o	of {y}	Reference Nu	ımber:
6. Similar varieties  Please use the follow candidate variety differ (or are) most similar. examination of distinct	ing table and rs from the va This inform	box for co riety (or va action may	omments to rieties) wh help the e	ich, to the best	t of your knowledge, is
Denomination(s) of variety(ies) similar to your candidate variety	Character which your variety diffe similar va	candidate ers from the	of the ch	the expression aracteristic(s) ne <b>similar</b> iety(ies)	Describe the expression of the characteristic(s) for <b>your</b> candidate variety
Example	{ GN 33 } (Chapter 10: TQ 6) – similar varieties }			• .	
Comments:					

TEC	HNIC	AL QUE	ESTIONNAIRE	Page {x} o	of {y}	Reference Number:		
<sup>#</sup> 7.	*7. Additional information which may help in the examination of the variety							
7.1	In addition to the information provided in sections 5 and 6, are there any additional characteristics which may help to distinguish the variety?							
	Yes	[ ]		No	[ ]			
	(If yo	es, pleaso	e provide details)					
7.2	Are	there any	y special condition	ns for growin	ng the vari	ety or conducting the examination?		
	Yes	[ ]		No	[ ]			
	(If yo	es, pleas	e provide details)					
7.3	Othe	er inform	ation					
{ <b>G</b> 1	N 34 (	Chapter	10: TQ 7.3) – var	iety use}				
{ <b>A</b> S	SW 16	(Chapt	er 10: TQ 7.3) –	where a pho	tograph of	the variety is to be provided }		
"A r	eprese	entative c	color image of the	variety shou	ıld accomp	pany the Technical Questionnaire."		
8.	Auth	norizatio	n for release					
	(a) Does the variety require prior authorization for release under legislation concerning the protection of the environment, human and animal health?							
		Yes	[ ]	No	[ ]			
	(b)	Has su	ch authorization b	een obtaine	d?			
		Yes	[ ]	No	[ ]			
	If the answer to (b) is yes, please attach a copy of the authorization.							

<sup>&</sup>lt;sup>#</sup> Authorities may allow certain of this information to be provided in a confidential section of the Technical Questionnaire.

TECH	HNICAL (	QUESTIONNAIRI	Page {x} of	{ <b>y</b> }	Reference N	Number:			
9.	Information on plant material to be examined or submitted for examination.								
•	ctors, such	ression of a charac n as pests and dise e culture, differen	ase, chemical tre	atment (e	e.g. growth 1	retardants or	pesticides),		
such must	ession of the treatment. be given.	nt material should ne characteristics of If the plant mater In this respect, plant examined has been	f the variety, unle rial has undergon ease indicate belo	ess the co	mpetent aut eatment, full	thorities allowed the control of the	w or request he treatment		
	(a) Mie	croorganisms (e.g.	virus, bacteria, pl	hytoplasr	na)	Yes [ ]	No [ ]		
	(b) Che	emical treatment (6	e.g. growth retard	ant, pesti	cide)	Yes [ ]	No [ ]		
	(c) Tis	sue culture				Yes [ ]	No [ ]		
	(d) Oth	ner factors				Yes [ ]	No [ ]		
	Please pr	ovide details for w	here you have inc	dicated "y	es".				
{ AS	<b>W 17</b> (C	hapter 10: TQ 9.3)	– tests for the pr	esence of	virus or oth	ner pathogen	s}		
"9.3 Has the plant material to be examined been tested for the presence of virus or other pathogens?									
	Yes [ ] (please provide details as specified by the Authority)								
	No	[	]''						
10. I hereby declare that, to the best of my knowledge, the information provided in this form is correct:									
	Applicant	t's name							
	Signature				Date				