



TG/219/1

ORIGINAL: English

DATE: 2004-03-31

INTERNATIONAL UNION FOR THE PROTECTION OF NEW VARIETIES OF PLANTS
GENEVA

PERILLA

(*Perilla frutescens* (L.) Britton var.
japonica Hara)

*

**GUIDELINES
FOR THE CONDUCT OF TESTS
FOR DISTINCTNESS, UNIFORMITY AND STABILITY**

Alternative Names:^{*}

Latin	English	French	German	Spanish
<i>Perilla frutescens</i> (L.) Britton var. <i>japonica</i> Hara	Perilla	Pérille	Perilla, Schwarznessel	Perilla

ASSOCIATED DOCUMENTS

These guidelines should be read in conjunction with document TG/1/3, “General Introduction to the Examination of Distinctness, Uniformity and Stability and the Development of Harmonized Descriptions of New Varieties of Plants” (hereinafter referred to as the “General Introduction”) and its associated “TGP” documents.

* 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.]

<u>TABLE OF CONTENTS</u>	<u>PAGE</u>
1. SUBJECT OF THESE TEST GUIDELINES	3
2. MATERIAL REQUIRED	3
3. METHOD OF EXAMINATION.....	3
3.1 Duration of Tests.....	3
3.2 Testing Place.....	3
3.3 Conditions for Conducting the Examination.....	3
3.4 Test Design	4
3.5 Number of Plants / Parts of Plants to be Examined.....	4
3.6 Additional Tests	4
4. ASSESSMENT OF DISTINCTNESS, UNIFORMITY AND STABILITY	4
4.1 Distinctness	4
4.2 Uniformity.....	5
4.3 Stability	5
5. GROUPING OF VARIETIES AND ORGANIZATION OF THE GROWING TRIAL	5
6. INTRODUCTION TO THE TABLE OF CHARACTERISTICS	6
6.1 Categories of Characteristics.....	6
6.2 States of Expression and Corresponding Notes.....	6
6.3 Types of Expression.....	6
6.4 Example Varieties	6
6.5 Legend.....	6
7. TABLE OF CHARACTERISTICS/TABLEAU DES CARACTÈRES/MERKMALSTABELLE/TABLA DE CARACTERES.....	7
8. EXPLANATIONS ON THE TABLE OF CHARACTERISTICS	13
8.1 Explanations covering several characteristics	13
8.2 Explanations for individual characteristics	13
9. LITERATURE	14
10. TECHNICAL QUESTIONNAIRE.....	15

1. Subject of these Test Guidelines

These Test Guidelines apply to all varieties of *Perilla frutescens* (L.) Britton var. *japonica*Hara.

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 seeds.

2.3 The minimum quantity of plant material, to be supplied by the applicant, should be:

25 g, or 6,000 seeds.

2.4 The seed should meet the minimum requirements for germination, species and analytical purity, health and moisture content, specified by the competent authority.

2.5 The plant material supplied should be visibly healthy, not lacking in vigor, nor affected by any important pest or disease.

2.6 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 *Duration of Tests*

The minimum duration of tests should normally be two independent growing cycles.

3.2 *Testing Place*

The tests should normally be conducted at one place. If any characteristics of the variety, which are relevant for the examination of DUS, cannot be observed at that place, the variety may be tested at an additional place.

3.3 *Conditions for Conducting the Examination*

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.

3.3.1. Type of observation

The recommended method of observing the characteristic is indicated by the following key in the second column of the Table 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

3.4 Test Design

3.4.1 Each test should be designed to result in a total of at least 60 plants, which should be divided between 2 replicates.

3.4.2 The design of the tests should be such that plants or parts of plants may be removed for measurement or counting without prejudice to the observations which must be made up to the end of the growing cycle.

3.5 Number of Plants / Parts of Plants to be Examined

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.

3.6 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 minimum duration of tests recommended in Section 3.1 reflects, in general, the need to ensure that any differences in a characteristic are sufficiently consistent.

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.

4.2 *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 For the assessment of uniformity of mainly self-pollinated varieties a population standard of 2% and an acceptance probability of at least 95% should be applied. In the case of a sample size of 60 plants, 3 off-types are allowed.

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. Grouping of Varieties and Organization of the Growing Trial

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 is 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) Seed: color of testa (characteristic 2)
- (b) Seedling: color (characteristic 3)
- (c) Leaf blade: color of upper side (characteristic 11)
- (d) Leaf blade: color of lower side (characteristic 13)

5.4 Guidance for the use of grouping characteristics, in the process of examining distinctness, is provided through the General Introduction.

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*

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.

6.3 *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 Section 6.1.2
- QL Qualitative characteristic – see Section 6.3
- QN Quantitative characteristic – see Section 6.3
- PQ Pseudo-qualitative characteristic – see Section 6.3
- MG Single measurement of a group of plants or parts of plants – see Section 3.3.1
- MS Measurement of a number of individual plants or parts of plants – see Section 3.3.1
- VG Visual assessment by a single observation of a group of plants or parts of plants – see Section 3.3.1
- VS Visual assessment by observation of individual plants or parts of plants – see Section 3.3.1
- (a) See Explanations on the Table of Characteristics in Chapter 8, Section 8.1
- (+) See Explanations on the Table of Characteristics in Chapter 8, Section 8.2

7. Table of Characteristics/Tableau des caractères/Merkmalstabelle/Tabla de caracteres

		English	français	deutsch	español	Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
1.		VG Seed: size	Semence: grosseur	Samen: Größe	Semilla: tamaño		
QN	small		petite	klein	pequeña	Bora	3
	medium		moyenne	mittel	mediana	Perro, Saeyeupsil	5
	large		grosse	groß	grande	Daeyeup, Pergro	7
2. (*) VG Seed: color of testa		Semence: couleur du tégument	Samen: Farbe der Samenschale	Semilla: color del tegumento			
PQ	white		blanche	weiß	blanco	Daeyeup	1
	grey		grise	grau	gris		2
	beige		beige	beige	beige	Pergro	3
	ochre-yellow		ocre-jaune	ockerfarben gelb	ocre-amarillento		4
	brown		brune	braun	marrón	Perro	5
	purplish		pourpre	purpurn	purpúreo		6
3. (*) VG Seedling: color		Plantule: couleur	Keimpflanze: Farbe	Plantula: color			
PQ	green		verte	grün	verde	Pergro, Perlime	1
	purplish red		rouge-pourpre	purpurrot	rojo púrpura	Perro, Saeyeupsil	2
4. VG Plant: number of branches (when fully developed)		Plante: nombre de ramifications (à plein développement)	Pflanze: Anzahl von Verzweigungen (bei voller Entwicklung)	Planta: número de ramificaciones (en completo desarrollo)			
QN	(a) absent or very few	nul ou très petit	fehlend oder sehr gering	ausente o muy bajo			1
	few	petit	gering	bajo	Pergro		3
	medium	moyen	mittel	medio	Perro, Saeyeupsil		5
	many	grand	groß	alto	Perlime		7

		English	français	deutsch	español	Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
5.	VG/ MS	Plant: height	Plante: hauteur	Pflanze: Höhe	Planta: altura		
QN	(a)	short	basse	niedrig	baja	Dasil	3
		medium	moyenne	mittel	media	Perro, Saeyeupsil	5
		tall	haute	hoch	alta	Pergro	7
6.	VG (+)	Stem: shape in cross section	Tige: forme de la section transversale	Stengel: Form im Querschnitt	Tallo: forma de la sección transversal		
PQ	(a)	circular	circulaire	kreisförmig	circular		1
		ribbed	côtelée	gerippt	acanalada	Perlime, Perro	2
		square	carrée	quadratisch	cuadrada	Pergro, Saeyeupsil	3
7.	VG	Stem: hairiness	Tige: pilosité	Stengel: Behaarung	Tallo: vellosidad		
QN	(a)	absent or very weak	absente ou très faible	fehlend oder sehr gering	ausente o muy débil		1
		weak	faible	gering	débil	Perro	3
		medium	moyenne	mittel	media	Saeyeupsil	5
		strong	forte	stark	fuerte	Pergro, Perlime	7
8.	VG/ MS	Leaf blade: length	Limbe: longueur	Blattspreite: Länge	Limbo: longitud		
QN	(a)	short	court	kurz	corto	Purple	3
		medium	moyen	mittel	medio	Perro, Saeyeupsil	5
		long	long	lang	largo	Pergro	7
9.	VG/ MS	Leaf blade: width	Limbe: largeur	Blattspreite: Breite	Limbo: anchura		
QN	(a)	narrow	étroit	schmal	estrecho		3
		medium	moyen	mittel	medio	Perro, Saeyeupsil	5
		broad	large	breit	ancho	Pergro	7
		very broad	très large	sehr breit	muy ancho	Perlime	9

	English	français	deutsch	español	Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
10.	VG Leaf blade: shape	Limbe: forme	Blattspreite: Form	Limbo: forma		
(+)						
PQ	(a) lanceolate	lancéolé	lanzettlich	lanceolado		1
	ovate	ovale	eiförmig	oval	Perro	2
	circular	circulaire	kreisförmig	circular		3
	cordate	en forme de cœur	herzförmig	cordiforme	Namchun, Pergro	4
11.	VG Leaf blade: color of upper side	Limbe: couleur de la face supérieure	Blattspreite: Farbe der Oberseite	Limbo: color del haz		
(*)						
PQ	(a) yellowish green	vert jaunâtre	gelblichgrün	verde amarillento	Saeyeupsil	1
	green	verte	grün	verde	Pergro, Perlime	2
	greyish green	vert grisâtre	graugrün	verde grisáceo		3
	purplish	pourpre	purpurn	purpúreo	Perro	4
12.	VG Leaf blade: intensity of color of upper side	Limbe: intensité de la couleur de la face supérieure	Blattspreite: Intensität der Farbe der Oberseite	Limbo: intensidad del color del haz		
QN	(a) light	claire	hell	claro		3
	medium	moyenne	mittel	medio	Pergro	5
	dark	foncée	dunkel	oscuro	Perlime, Perro	7
13.	VG Leaf blade: color of lower side	Limbe: couleur de la face inférieure	Blattspreite: Farbe der Unterseite	Limbo: color del envés		
(*)						
QL	(a) greenish	verdâtre	grünlich	verdosado	Pergro	1
	purplish	pourpre	purpurn	purpúreo	Bora, Hojiso, Perro Perlime	2

					Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
	English	français	deutsch	español		
14.	VG	Leaf blade: intensity of purplish color of lower side	Limbe: intensité de la couleur pourpre de la face inférieure	Blattspreite: Intensität der Purpurfarbe der Unterseite	Limbo: intensidad del color purpúreo del envés	
QN	(a)	very light	très claire	sehr hell	muy claro	1
		light	claire	hell	claro	Perlime
		medium	moyenne	mittel	medio	5
		dark	foncée	dunkel	oscuro	Perro
		very dark	très foncée	sehr dunkel	muy oscuro	Bora, Purple
15.	VG	Leaf blade: profile	Limbe: profil	Blattspreite: Profil	Limbo: perfil	
QN	(a)	concave	concave	konkav	cóncavo	Perro
		plane	plan	flach	plano	Pergro, Saeyeupsil
		convex	convexe	konvex	convexo	7
16.	VG	Leaf blade: blistering	Limbe: cloquère	Blattspreite: Blasigkeit	Limbo: abullonado	
QN	(a)	absent or very weak	nulle ou très faible	fehlend oder sehr gering	ausente o muy débil	1
		weak	faible	gering	débil	Pergro, Perlime
		medium	moyenne	mittel	medio	Perro
		strong	forte	stark	fuerte	7
17.	VG	Leaf blade: incisions of margin	Limbe: découpures du bord	Blattspreite: Randeinschnitte	Limbo: incisiones del margen	
QN	(a)	very weak	très faibles	sehr gering	muy débiles	1
		weak	faibles	gering	débiles	3
		medium	moyennes	mittel	medias	Pergro, Saeyeupsil
		strong	fortes	stark	fuertes	7
		very strong	très fortes	sehr stark	muy fuertes	Purple
						9

		English	français	deutsch	español	Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
18.	VG	Leaf blade: type of incision of margin	Limbe: type de découpage du bord	Blattspreite: Typ des Randeinschnittes	Limbo: tipo de incisión del margen		
PQ	(a)	crenate	crénelé	gekerbt	crenada		1
		serrate	dentelé	gesägt	serrada	Pergro, Saeyeupsil	2
		dentate	denté	gezähnt	dentada	Perro, Purple	3
19.	VG	Leaf blade: depth of incisions of margin	Limbe: profondeur des découpures du bord	Blattspreite: Tiefe der Randeinschnitte	Limbo profundidad de las incisiones del margen		
QN	(a)	shallow	peu profondes	flach	poco profundas	Pergro	3
		medium	moyennes	mittel	medias	Perlime, Saeyeupsil	5
		deep	profondes	tief	profundas	Purple	7
20.	VG	Inflorescence: position	Inflorescence: position	Blütenstand: Stellung	Inflorescencia: posición		
PQ		terminal only	seulement terminale	nur terminal	solamente terminal		1
		predominantly terminal	le plus souvent terminale	vorwiegend terminal	predominante terminal	Pergro, Saeyeupsil	2
		axillar	axillaire	axillar	axilar	Perro	3
21.	VG	Inflorescence: number of clusters	Inflorescence: nombre des bouquets	Blütenstand: Anzahl von Gruppen	Inflorescencia: número de racimos		
QN		few	petit	gering	bajo	Purple	3
		medium	moyen	mittel	medio	Pergro, Saeyeupsil	5
		many	grand	groß	alto		7
22.	VG	Inflorescence: length of clusters when most flowers are open	Inflorescence: longueur des bouquets au moment de l'ouverture de la plupart des fleurs	Blütenstand: Länge der Gruppen zum Zeitpunkt der Öffnung der meisten Blüten	Inflorescencia: longitud de los racimos en momento de la abertura de la mayoría de flores		
QN		short	courts	kurz	corta	Purple	3
		medium	moyens	mittel	media	Pergro, Saeyeupsil	5
		long	longs	lang	larga		7

					Example Varieties/ Exemples/ Beispielssorten/ Variedades ejemplo	Note/ Nota
	English	français	deutsch	español		
23.	VG	Flower: size	Fleur: taille	Blüte: Größe	Flor: tamaño	
QN	small	petite	klein	pequeño	Pergro	3
	medium	moyenne	mittel	mediano	Saeyeupsil	5
	large	grande	groß	grande		7
24.	VG	Flower: color	Fleur: couleur	Blüte: Farbe	Flor: color	
QL	white	blanche	weiß	blanco	Pergro, Saeyeupsil	1
	reddish purple	pourpre rougeâtre	rötlichviolett	púrpura rojizo	Bora	2
25.	VG	Flower: intensity of reddish purple color	Fleur: intensité de la couleur pourpre rougeâtre	Blüte: Intensität der rötlichvioletten Farbe	Flor: intensidad del color púrpura rojizo	
QN	light	claire	hell	claro		3
	medium	moyenne	mittel	medio		5
	dark	foncée	dunkel	oscuro	Bora	7
26.	VG	Calyx: anthocyanin coloration	Calice: pigmentation anthocyanique	Kelchblatt: Anthocyansfärbung	Cálix: pigmentación antociánica	
QN	absent or very weak	nulle ou très faible	fehlend oder sehr gering	ausente o muy débil		1
	weak	faible	gering	débil	Pergro	3
	medium	moyenne	mittel	media		5
	strong	forte	stark	fuerte	Bora	7
27.	VG	Time of flowering	Époque de floraison	Zeitpunkt der Blüte	Época de la floración	
QN	early	précoce	früh	temprana	Dasil	3
	medium	moyenne	mittel	media	Pergro, Saeyeupsil	5
	late	tardive	spät	tardía	Perlime	7
28.	MG	Dry seed: weight	Graine sèche: poids	Samen: Gewicht	Grano seco: peso	
QN	low	petit	niedrig	pequeño		3
	medium	moyen	mittel	medio	Perro	5
	high	grand	hoch	grande	Pergro	7

8. Explanations on the Table of Characteristics

8.1 *Explanations covering several characteristics*

Characteristics containing the following key in the second column of the Table of Characteristics should be examined as indicated below:

- (a) Unless otherwise indicated, all characteristics on the plant, stem and leaf should be recorded on fully grown plants before opening of the first flowers

8.2 *Explanations for individual characteristics*

Ad. 6: Stem: shape in cross section



1
circular



2
ribbed

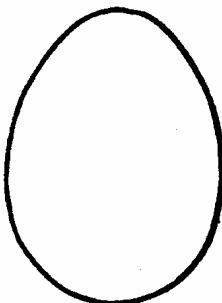


3
square

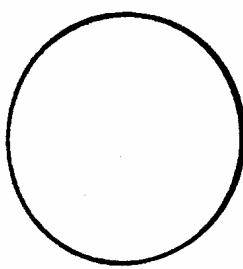
Ad. 10: Leaf blade: shape



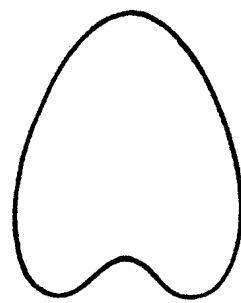
1
lanceolate



2
ovate



3
circular



4
cordate

9. Literature

Brenner, D.M., 1993: "Perilla, Botany, Uses and Genetic Resources," In: J.Janick and J.E. Simon (Eds), New Crops, Wiley, New York. pp. 322-328.

Burgmans, J., Scheffer, J.: "Perilla – an Asian Culinary Herb," Ruakura Agric. Research Center, New Zealand.

Koezuka, Y., Honda, G. Tabata, M., 1985: "Genetic control of anthocyanin production," Shoyakugaku Zasshi 39: 228-231.

Tanaka, T., 1976: "Tanaka's cyclopedia of edible plants of the world," Keigaku Publishing Co., Tokyo

10. Technical Questionnaire

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
		Application date: (not to be filled in by the applicant)
<p style="text-align: center;">TECHNICAL QUESTIONNAIRE to be completed in connection with an application for plant breeders' rights</p>		
1. Subject of the Technical Questionnaire		
1.1 Latin Name	<i>Perilla frutescens</i> (L.) Britton var. <i>japonica</i> Hara	
1.2 Common Name	Perilla	
2. Applicant		
Name		
Address		
Telephone No.		
Fax No.		
E-mail address		
Breeder (if different from applicant)		
3. Proposed denomination and breeder's reference		
Proposed denomination (if available)		
Breeder's reference		

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
-------------------------	-----------------	-------------------

4. Information on the breeding scheme and propagation of the variety

4.1 Breeding scheme

Variety resulting from:

4.1.1 Crossing

- (a) controlled cross []
(please state parent varieties)
- (b) partially known cross []
(please state known parent variety(ies))
- (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 developed)

4.1.4 Other []
(please provide details)

4.2 Method of propagating the variety

4.2.1 Seed-propagated varieties

- (a) Self-pollination []
- (b) Other []
(please provide details)

4.2.2 Other []
(please provide details)

TECHNICAL 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
5.1 Seed: color of testa (2)		
white	Daeyeup	1[]
grey		2[]
beige	Pergro	3[]
ochre-yellow		4[]
brown	Perro	5[]
purplish		6[]
5.2 Seedling: color (3)		
green	Pergro, Perlime	1[]
purplish red	Perro, Saeyeupsil	2[]
5.3 Leaf blade: color of <u>upper</u> side (11)		
yellowish green	Saeyeupsil	1[]
green	Pergro, Perlime	2[]
greyish green		3[]
purplish	Perro	4[]
5.4 Leaf blade: color of <u>lower</u> side (13)		
greenish	Pergro	1[]
purplish	Bora, Hojiso, Perro Perlime	2[]

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
-------------------------	-----------------	-------------------

6. Similar varieties and differences from these varieties

Please use the table, and space provided for comments, below to provide information on how your candidate variety differs from the variety (or varieties) which, to the best of your knowledge, is (or are) most similar. This information may help the examination authority to conduct its examination of distinctness in a more efficient way.

Denomination(s) of variety(ies) similar to your candidate variety	Characteristic(s) in which your candidate variety differs from the similar variety(ies)	Describe the expression of the characteristic(s) for the similar variety(ies)	Describe the expression of the characteristic(s) for your candidate variety
<i>Example</i>	<i>Leaf blade: color of lower side</i>	<i>green</i>	<i>purplish</i>

Comments:

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 yes, please provide details)

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
-------------------------	-----------------	-------------------

7.2 Special conditions for the examination of the variety

7.2.1 Type of culture

- in greenhouse/ as a sprout vegetable []
- in the open / as an ornamental []
- in the open / as an oil seed crop []

7.2.2 Season of growing

- spring []
- summer []
- autumn []
- winter []

7.2.3 Are there any other special conditions for growing the variety or conducting the examination?

Yes [] No []

7.2.4 If yes, please give details:

7.3 Other information

8. Authorization 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 such authorization been obtained?

Yes [] No []

If the answer to (b) is yes, please attach a copy of the authorization.

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
-------------------------	-----------------	-------------------

9. Information on plant material to be examined.

9.1 The expression of a characteristic or several characteristics of a variety may be affected by factors, such as pests and disease, chemical treatment (e.g. growth retardants or pesticides), effects of tissue culture, different rootstocks, scions taken from different growth phases of a tree, etc.

9.2 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 the plant material has undergone such treatment, full details of the treatment must be given. In this respect, please indicate below, to the best of your knowledge, if the plant material to be examined has been subjected to:

- | | | |
|---|---------|--------|
| (a) Microorganisms (e.g. virus, bacteria, phytoplasma) | Yes [] | No [] |
| (b) Chemical treatment (e.g. growth retardant or pesticide) | Yes [] | No [] |
| (c) Tissue culture | Yes [] | No [] |
| (d) Other factors | Yes [] | No [] |

Please provide details of where you have indicated "yes":
.....

10. I hereby declare that, to the best of my knowledge, the information provided in this form is correct:

Applicant's name

Signature

Date

[End of document]