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INTERNATIONAL UNION FOR THE PROTECTION OF NEW VARIETIES OF PLANTS

Geneva

DRAFT

ADLAY

UPOV Code: COIXX_MAY

Coix lacryma-jobi L. var. *ma-yuen* (Rom. Caill.)
 Stapf

GUIDELINES

FOR THE CONDUCT OF TESTS

FOR DISTINCTNESS, UNIFORMITY AND STABILITY

prepared by (an) expert(s) from Japan

to be considered by the

*Technical Committee at its fifty-first session,
 to be held in Geneva from March 23 to 25, 2015*

Disclaimer: this document does not represent UPOV policies or guidance

<i>Botanical name</i>	<i>English</i>	<i>French</i>	<i>German</i>	<i>Spanish</i>
<i>Coix lacryma-jobi</i> L. var. <i>ma-yuen</i> (Rom. Caill.) Stapf, <i>Coix</i> <i>ma-yuen</i> Roman.	Adlay, Coix	Coix, Larme de Job	Coix, Tränengrass	Coix, Lágrimas de David o de Job

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.

* 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. Subject of these Test Guidelines

These Test Guidelines apply to all varieties of *Coix lacryma-jobi* L. var. *ma-yuen* (Rom. Caill.) Stapf.

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:

500g of seed.

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*

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

3.1.2 The two independent growing cycles may be observed from a single planting, examined in two separate growing cycles.

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 The optimum stage of development for the assessment of each characteristic is indicated by a number in the second column of the Table of Characteristics. The stages of development denoted by each number are described in Chapter 8.

3.3.3 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 Each test should be designed to result in a total of at least 100 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 *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. In the case of observations of parts taken from single plants, the number of parts to be taken from each of the plants should be 1.

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 For the assessment of uniformity, a population standard of 1% and an acceptance probability of at least 95% should be applied. In the case of a sample size of 100 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 further examined by testing a new seed stock to ensure that it exhibits the same characteristics as those shown by the initial 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 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: length (characteristic 6)
- (b) Stigma: anthocyanin coloration (characteristic 10)
- (c) Time of maturity (characteristic 12)
- (d) Grain: main color (characteristic 15)

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*

(*) Asterisk 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

MG, MS, VG, VS – see Chapter 4.1.5

(a)-(c) See Explanations on the Table of Characteristics in Chapter 8.

(+) See Explanations on the Table of Characteristics in Chapter 8.

14-92 See explanations on growth stages in Chapter 8.

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

English	français	deutsch	español	Example Varieties Exemples Beispielsorten Variedades ejemplo	Note/ Nota
1. QN VG 14 (a)					
Seedling: anthocyanin coloration	Plantule : pigmentation anthocyanique	Keimpflanze: Anthocyanfärbung	Plántula: pigmentación antociánica		
absent or weak	absente ou faible	fehlend oder schwach	ausente o débil	Okayamazairai	1
medium	moyenne	mittel	media	Nakasatozairai	2
strong	forte	stark	fuerte	Akishizuku	3
2. QN VG 39 (+) (a)					
Plant: growth habit	Plante : port	Pflanze: Wuchsform	Planta: hábito de crecimiento		
upright	dressé	aufrecht	erecta	Okayamazairai	1
semi upright	demi-dressé	halbaufrecht	semierecta	Akishizuku	3
spreading	étalé	breitwüchsig	extendida	Kitanohato	5
3. QN MS 51-59 (+) (a) (b)					
Leaf blade: length	Limbe : longueur	Blattspreite: Länge	Limbo: longitud		
short	court	kurz	corto	Hatojira	3
medium	moyen	mittel	medio	Nakasatozairai	5
long	long	lang	largo	Okayamazairai	7
4. QN MS 51-59 (+) (a) (b)					
Leaf blade: width	Limbe : largeur	Blattspreite: Breite	Limbo: anchura		
narrow	étroit	schmal	estrecho	Kitanohato	3
medium	moyen	mittel	medio	Hatoyutaka, Nakasatozairai	5
broad	large	breit	ancho		7
5. QN VG 51-59 (a)					
Culm: glaucosity	Tige : glaucescence	Halm: Bereifung	Macollo: glaucescencia		
absent or weak	absente ou faible	fehlend oder schwach	ausente o débil	Nakasatozairai, Okayamazairai	1
medium	moyenne	mittel	media	Akishizuku	2
strong	forte	stark	fuerte		3
6. (*) QN MS 61-69 (+) (a)					
Plant: length	Plante : longueur	Pflanze: Länge	Planta: longitud		
short	courte	kurz	corta	Hatoyutaka	3
medium	moyenne	mittel	media	Akishizuku	5
long	longue	lang	larga	Okayamazairai	7
7. QN MS 61-69 (+) (a) (b)					
Culm: diameter	Tige : diamètre	Halm: Durchmesser	Macollo: diámetro		
small	petit	klein	pequeño	Hatojira, Ohotsuku No.1	1
medium	moyen	mittel	medio	Akishizuku, Nakasatozairai	3
large	grand	groß	grande	Okayamazairai	5

English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
8. QN MG VG 61-69 (a) (b)					
Inflorescence: number of bracts	Inflorescence : nombre de bractées	Blütenstand: Anzahl der Deckblätter	Inflorescencia: número de brácteas		
few	faible	wenige	bajo	Kitanohato	3
medium	moyen	mittel	medio	Nakasatozairai	5
many	élevé	viele	alto	Akishizuku	7
9. QN MS 61-69 (+) (a) (b) (c)					
Bract: length	Bractée : longueur	Deckblatt: Länge	Bráctea: longitud		
short	courte	kurz	corta	Hatochikara	3
medium	moyenne	mittel	media	Okayamazairai	5
long	longue	lang	larga		7
10. (*) QN VG 61-69 (a)					
Stigma: anthocyanin coloration	Stigmate : pigmentation anthocyanique	Narbe: Anthocyanfärbung	Estigma: pigmentación antocianica		
absent or weak	absente ou faible	fehlend oder schwach	ausente o débil	Hatojiro, Okayamazairai	1
medium	moyenne	mittel	media		3
strong	forte	stark	fuerte	Akishizuku, Miyagizairai	5
11. QN MS VG 80-92 (c)					
Plant: distribution of infructescences	Plante : distribution des infructescences	Pflanze: Verteilung der Fruchststände	Planta: distribución de las infrutescencias		
apical quarter	quart apical	im apikalen Viertel	en el cuarto apical		1
apical half	moitié apicale	in der apikalen Hälfte	en la mitad apical	Hatojiro, Kuroishizairai	2
apical three quarters	trois quarts apicaux	im apikalen Dreiviertel	en los tres cuartos apicales	Hatochikara, Hatoyutaka	3
throughout	partout	durchgehend	en la totalidad		4
12. (*) QN MG 89 (a)					
Time of maturity	Époque de maturité	Zeitpunkt der Reife	Época de madurez		
early	précoce	früh	temprana	Hatojiro	3
medium	moyenne	mittel	media	Nakasatozairai	5
late	tardive	spät	tardía	Okayamazairai	7
13. QN MS VG 92 (+) (a)					
Grain: ratio length/width	Grain : rapport longueur/largeur	Korn: Verhältnis Länge/Breite	Grano: relación longitud/anchura		
low	bas	klein	baja	Ohotsuku No.1	1
medium	moyen	mittel	media	Hatojiro	2
high	élevé	groß	alta	Akishizuku	3
14. QN MG 92 (a)					
Grain: weight of 100 seeds	Grain : poids de 100 grains	Korn: Hundertkorngewicht	Grano: peso de 100 semillas		
low	petit	gering	pequeño		3
medium	moyen	mittel	medio	Hatoyutaka, Nakasatozairai	5
high	grand	hoch	grande		7

English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
15. (*) PQ VG 92 (+) (a)					
Grain: main color	Grain : couleur principale	Korn: Hauptfarbe	Grano: color principal		
white	blanc	weiß	blanco		1
light brown	brun clair	hellbraun	marrón claro	Nakasatozairai	2
dark brown	brun foncé	dunkelbraun	marrón oscuro	Hatojiro	3
purple	pourpre	purpurn	púrpura	Ohotsuku No.1	4
grey	gris	grau	gris		5
black	noir	schwarz	negro	Kuroishizairai	6
16. QN MG 92 (+) (a)					
Grain: hardness	Grain : dureté	Korn: Härte	Grano: dureza		
soft	mou	weich	blando	Hatochikara, Hatojiro	1
medium	moyen	mittel	medio	Akishizuku, Okayamazairai	2
hard	dur	hart	duro	Hatoyutaka	3
17. QN VG 92 (a)					
Decorticated grain: length	Caryopse : longueur	Geschältes Korn: Länge	Cariópside: longitud		
short	court	kurz	corta		1
medium	moyen	mittel	media	Akishizuku	2
long	long	lang	larga		3
18. QN VG 92 (a)					
Decorticated grain: width	Caryopse : largeur	Geschältes Korn: Breite	Cariópside: anchura		
narrow	étroit	schmal	estrecha		1
medium	moyen	mittel	media	Akishizuku	2
broad	large	breit	ancha		3
19. QN VG 92 (a)					
Decorticated grain: intensity of brown color	Caryopse : intensité de la couleur brune	Geschältes Korn: Intensität der braunen Farbe	Cariópside: intensidad del color marrón		
light	claire	hell	claro		3
medium	moyenne	mittel	medio	Akishizuku	5
dark	foncée	dunkel	oscuro		7
20. QL VG 92 (+)					
Endosperm: type	Endosperme : type	Endosperm: Typ	Endospermo: tipo		
glutinous	glutineux	mit Gluten	glutinoso		1
non-glutinous	non glutineux	ohne Gluten	no glutinoso		2

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) Characteristics containing the 2-digit code in the second column of the Table of Characteristics should be examined as indicated below:

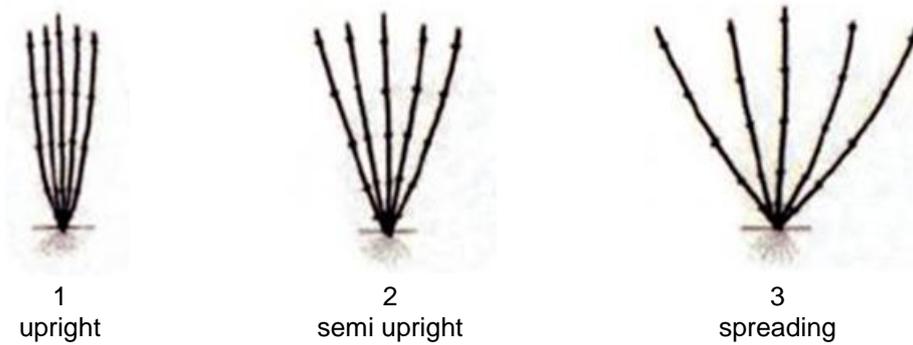
- 1: Leaf development
 - 10: First leaf through coleoptile
 - 11: First leaf unfolded
 - 14: 4 leaves unfolded
 - 19: 9 or more leaves unfolded:
- 2: Tillering
 - 20: No tillers
 - 21: Beginning of tillering: first tiller detectable
 - 29: End of tillering. Maximum number of tillers detectable
- 3: Stem elongation
 - 31: First node at least 1 cm above tillering node
 - 39: Flag leaf stage: flag leaf fully unrolled, ligule just visible
- 5: Inflorescence emergence
 - 51: Beginning of heading: tip of inflorescence emerged from sheath, first spikelet visible
 - 55: Middle of heading: half of inflorescence emerged
 - 59: End of heading: inflorescence fully emerged
- 6: Flowering
 - 61: Beginning of flowering: first anthers visible
 - 65: Full flowering: 50% of anthers mature
 - 69: End of flowering: all spikelets have completed flowering but some dehydrated anthers may remain
- 7: Development of fruits
 - 71: Watery ripe: first grains have reached half their final size
 - 73: Early milk
 - 75: Medium milk: grain content milky, grains reached final size, still green
 - 77: Late milk
- 8: Ripening
 - 83: Early dough
 - 85: Soft dough: grain content soft but dry. Fingernail impression not held
 - 87: Hard dough: grain content solid. Fingernail impression held
 - 89: Fully ripe: grain hard, difficult to divide with thumbnail
- 9: Senescence
 - 92: Over-ripe: grain very hard, cannot be dented by thumbnail
 - 93: Grains loosening in day-time

- (b) To be observed on the longest culm.

- (c) To be observed on the largest bract.

8.2 Explanations for individual characteristics

Ad. 2: Plant: growth habit



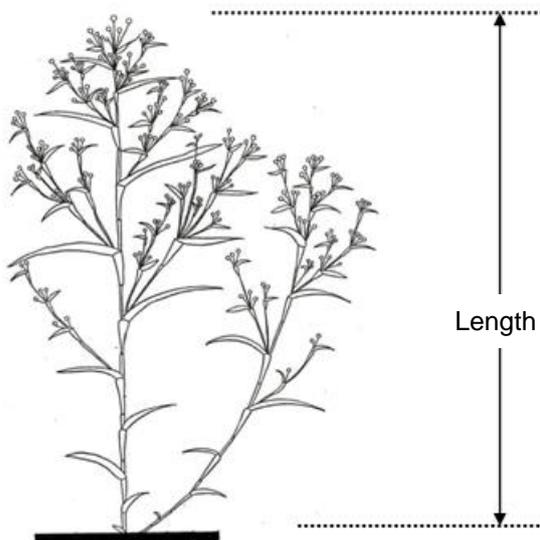
Ad. 3: Leaf blade: length

To be observed at the middle of the longest culm.

Ad. 4: Leaf blade: width

To be observed at the middle of the longest culm on the broadest part of the blade.

Ad. 6: Plant: length

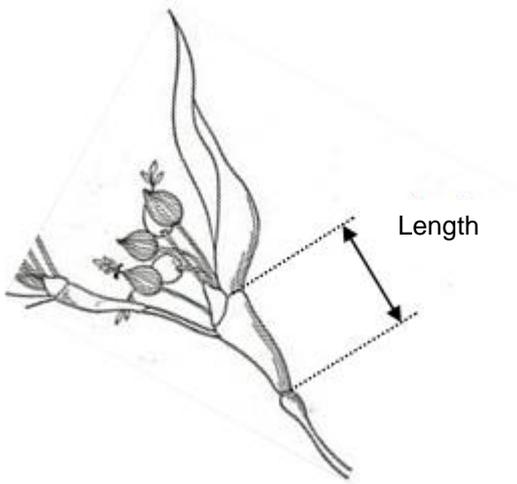


Ad. 7: Culm: diameter

To be observed at the middle of the internode in the central part of the longest culm.

Ad. 9: Bract: length

To be observed on the longest bract of the inflorescence.



Ad. 13: Grain: ratio length/width



1
low



2
medium



3
high

Ad. 15: Grain: main color

The main color is the color with the largest surface area. In cases where the areas of the main and secondary color are too similar to reliably decide which color has the largest area, the darkest color is considered to be the main color.

Ad. 16: Grain: hardness

To be observed as the ease with which the grain can be broken by hand.

Ad. 20: Endosperm: type

To be observed by reaction to solution of 3% Potassium Iodide and 0.1% Iodine. Glutinous type endosperm is stained to reddish purple, non-glutinous type endosperm is stained to dark blue purple.

9. Literature

Fujioka S., 1994-99: The Grand Dictionary of Horticulture (volume 1-3), Shogakukan, Tokyo, JP, pp1159

Ishida K., 1981: Hatomugi, Nosan Gyoson Bunka Kyokai (Nobunkyo), Tokyo, JP pp45-48

Tetsuka T., Tajiri T., 2009: Tokusan Shubyo, Nihon Tokusan Nosakumotsu Shubyo Kyokai (Tokusan shubyo), Tokyo, JP, pp6-15

Osada T., 1989: Illustrated Grasses of Japan, Heibonsha, Tokyo, JP

10. Technical Questionnaire

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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	Application date: (not to be filled in by the applicant)
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TECHNICAL QUESTIONNAIRE
to be completed in connection with an application for plant breeders' rights

1. Subject of the Technical Questionnaire

1.1 Botanical name

1.2 Common name

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:
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#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)

(.....) 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 developed)

.....

4.1.4 Other []
(please provide details)

.....

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:
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4.2 Method of propagating the variety

4.2.1 Seed-propagated varieties

- (a) Self-pollination []
- (b) Cross-pollination []
 - (i) population []
 - (ii) synthetic variety []
- (c) Hybrid []
- (d) Other []
(please provide details)

[]

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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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 Plant: length (6)		
very short		1 []
very short to short		2 []
short	Hatoyutaka	3 []
short to medium		4 []
medium	Akishizuku	5 []
medium to long		6 []
long	Okayamazairai	7 []
long to very long		8 []
very long		9 []
5.2 Stigma: anthocyanin coloration (10)		
absent or weak	Hatojiro, Okayamazairai	1 []
weak to medium		2 []
medium		3 []
medium to strong		4 []
strong	Akishizuku, Miyagizairai	5 []
5.3 Time of maturity (12)		
very early		1 []
very early to early		2 []
early	Hatojiro	3 []
early to medium		4 []
medium	Nakasatozairai	5 []
medium to late		6 []
late	Okayamazairai	7 []
late to very late		8 []
very late		9 []

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Characteristics	Example Varieties	Note
5.4 (15) Grain: main color		
white		1 []
light brown	Nakasatozairai	2 []
dark brown	Okayamazairai	3 []
purple	Ohotsuku No.1	4 []
grey		5 []
black	Kuroishizairai	6 []

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6. Similar varieties and differences from these varieties

Please use the following table and box for comments 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>Plant: length</i>	<i>short</i>	<i>medium</i>
Comments:			

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#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)

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

Yes [] No []

(If yes, please provide 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.

Authorities may allow certain of this information to be provided in a confidential section of the Technical Questionnaire.

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9. Information on plant material to be examined or submitted for examination

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, pesticide) | Yes [] | No [] |
| (c) Tissue culture | Yes [] | No [] |
| (d) Other factors | Yes [] | No [] |

Please provide details for 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	<input type="text"/>		
Signature	<input type="text"/>	Date	<input type="text"/>

[End of document]