



**TWO/33/8**

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GENEVA

**TECHNICAL WORKING PARTY  
FOR  
ORNAMENTAL PLANTS AND FOREST TREES**

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WORKING PAPER ON TEST GUIDELINES FOR IMPATIENS

*(Impatiens valerianella Hook. f.)*

*Document prepared by experts from France*

## I. Subject of these Guidelines

This Test Guidelines apply to all varieties of *Impatiens vallerianella* Hook. f. of the family Balsaminaceae.

## II. Material Required

1. The competent authorities decide when, where and in what quantity and quality the plant material required for testing the variety is to be delivered. Applicants submitting material from a State other than that in which the testing takes place must make sure that all customs formalities are complied with. As a minimum, the following quantity of material is recommended:

- 20 rooted cuttings
- 125 grams for seed propagated varieties

2. The plant material supplied should be visibly healthy, not lacking in vigor or affected by any important pests or diseases.

3. The plant material must not have undergone any treatment unless the competent authorities allow or request such treatment. If it has been treated, full details of the treatment must be given.

## III. Conduct of Tests

1. A test should normally be conducted for one growing period after the year of establishment. If distinctness and/or uniformity cannot be sufficiently established in one growing period, the test should be extended for a second growing period.

2. The test should normally be conducted at one place. If any important characteristics of the variety cannot be seen at that place, the variety may be tested at an additional place.

The size of the tests should be such that plants or parts of plants may be removed for measurement and counting without prejudice to the observations which must be made up to the end of the growing period. Each test should include a total of 20 plants for vegetatively propagated varieties and 60 plants for seed propagated varieties. Separate plots for observation and for measuring can only be used if they have been subject to similar environmental conditions.

4. Additional tests for special purposed may be established.

## IV. Methods and Observations

1. All observations determined by measurement or counting should be made on 10 plants or parts taken from each of 10 plants vegetatively propagated varieties and on 20 plants or parts taken from each of 20 plants for seed propagated varieties..

2. For the assessment of uniformity of vegetatively propagated varieties a population standard of 1% with an acceptance probability of at least 95% should be applied. In the case of a sample size of 20 plants, the maximum number of off-types allowed would be 1. **(To be checked)**

For the assessment of uniformity of seed propagated varieties the breeding history of the variety has to be taken into consideration.

3. Unless otherwise indicated, all observations should be made on typical organs of 20 plants at the time of mid maturity, this being the time when petal colour is at its most intense.
4. 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 DE 6500 and should fall within the tolerance set out in British Standard 950, Part I. These determinations should be made with the plant part placed against a white background.

#### V. Grouping of Varieties

1. The collection of varieties to be grown should be divided into groups to facilitate the assessment of distinctness. Characteristics which are suitable for grouping purposes are those which are known from experience not to vary, or to vary only slightly, within a variety. Their various states of expression should be fairly evenly distributed throughout the collection.
2. It is recommended that the competent authorities use the following characteristics for grouping varieties:
  - (a) Leaf : variegation on upper side (characteristic 9)
  - (b) Flower : type (characteristic 19)
  - (c) Flower : number of colours (characteristic 21)
  - (d) Flower : main colour (characteristic 22)

#### VI. Characteristics and Symbols

1. To assess distinctness, uniformity and stability, the characteristics and their states as given in the Table of Characteristics should be used.
2. Notes (numbers), for the purposes of electronic data processing, are given opposite the states of expression for each characteristic.
3. Legend:
  - (\*) Characteristics that should be used on all varieties in every growing period over which examinations are made and always be included in the variety descriptions, except when the state of expression of a preceding characteristic or regional environmental conditions render this impossible.
  - (+) See Explanations on the Table of Characteristics in Chapter VIII.

## VII. Table of characteristics/Tableau des caractères/Merkmalstabelle/Tabla de caracteres

English	Français	Deutsch	Español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>1 Cotyledon : size</b>	<b>Cotylédon : taille</b>				
very small	très petite				1
small	petite				3
medium	moyenne				5
large	grande				7
very large	très grande				9
		<i>to delete or to be kept for seed cvs. ?</i>			
<b>2* Plant : height of foliage</b>	<b>Plante : hauteur du feuillage</b>				
low	basse			Pink Ice	3
medium	moyenne			Rosebud Lavender	5
high	haute			Thomas	7
<b>3* Plant : width or diameter ?</b>	<b>Plante : largeur or diamètre ?</b>				
narrow	Etroite				3
medium	Moyenne			Pink Ice	5
broad	Large			Cesilie	7
<b>4 Stem : anthocyanin at upper third</b>	<b>Tige : anthocyane au tiers supérieur</b>				
absent or very weak	absente ou très faible			Gumbo	1
weak	Faible			Piquant	3
medium	Moyenne			Cesilie	5
strong	Forte			Burgund	7
very strong	très forte				9
<b>5* Leaf : length (including petiole)</b>	<b>Feuille : longueur (pétiole compris)</b>				
short	Courte				3
medium	Moyenne			Pink Ice	5
long	Longue				7
<b>6* Leaf : width</b>	<b>Feuille : largeur</b>				
narrow	Etroite				3
medium	Moyenne			Pink Ice	5
Broad	large				7
<b>7* Leaf : ratio length/width</b>	<b>Feuille : rapport longueur/largeur</b>				
Small	petit				3
Medium	moyen				5
Large	grand				7
<b>8* Leaf : shape</b>	<b>Feuille : forme</b>				
Elliptic	elliptique				1
Ovate	ovale				2

English	Français	Deutsch	Español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>9*TQ</b>	<b>Leaf : variegation of upper side</b>	<b>Feuille : panachure sur la face supérieure</b>			
absent	Absente			Gumbo	1
present	Présente			Pink Ice	9
<b>10*TQ</b>	<b>Leaf : ground color on (or of ?) upper side</b>	<b>Feuille : couleur de fond face supérieure</b>			
green	verte			Gumbo	1
red	rouge				2
<b>11*</b>	<b>Leaf : intensity of ground color of upper side</b>	<b>Feuille : intensité couleur de fond face supérieur</b>			
light	claire				3
medium	moyenne			Cesilie	5
dark	foncée				7
<b>12</b>	<b>Leaf : ornamentation of upper side</b>	<b>Feuille : ornemen- tation de la face supérieure</b>			
absent	absente				1
present	présente				9
					<i>proposal to delete</i>
<b>13</b>	<b>Leaf : size of ornamentation of upper side</b>	<b>Feuille : taille de l'ornementation de la face supérieure</b>			
small	petite				3
medium	moyenne				5
large	grande				7
					<i>proposal to delete</i>
<b>14</b>	<b>Leaf : color of ornamentation of upper side</b>	<b>Feuille : couleur de l'ornementation de la face supérieure</b>			
cream	crème				1
yellow	jaune				2
yellow and red	jaune et rouge				3
					<i>proposal to delete</i>
<b>15*</b>	<b>Leaf : color between veins of lower side</b>	<b>Feuille : couleur entre les nervures de la face intérieure</b>			
green	verte				1
red	rouge				2
					<i>proposal to delete the asterisk</i>
<b>16</b>	<b>Leaf : color of veins on lower side</b>	<b>Feuille : couleur des nervures sur la face intérieure</b>			
green	verte			Gumbo	1
red	rouge			Didi Orange	2

English	Français	Deutsch	Español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>17</b>	<b>Petiole : anthocyanin coloration of upper side</b>	<b>Pétiole : anthocyane sur la face supérieure</b>			
	absent or very weak	absent ou très faible			1
	weak	faible			3
	medium	moyenne			5
	strong	forte			7
	very strong	très forte			9
<b>18</b>	<b>Peduncle : anthocyanin coloration</b>	<b>Pédoncule : couleur de l'anthocyane</b>			
	absent or very weak	absent ou très faible		Gumbo	1
	weak	faible		Didi Orange	3
	medium	moyenne			5
	strong	forte			7
	very strong	très forte			9
<b>19*TQ</b>	<b>Flower : type</b>	<b>Fleur : type</b>			
	single	simple		Gumbo	1
	double	double		Didi Orange	2
<b>20*TQ</b>	<b>Flower : diameter</b>	<b>Fleur : diamètre</b>			
	very small	très petit			1
	small	petit		Pink Ice	3
	medium	moyen			5
	large	grand		Gumbo	7
	very large	très grand			9
<b>21*TQ</b>	<b>Flower : number of colors</b>	<b>Fleur : nombre de couleurs</b>			
	one	une			1
	two	deux			2
<b>22*TQ</b>	<b>Flower : main color</b>	<b>Fleur : couleur principale</b>			
	RHS Colour Chart (Indicate reference number)	indiquer la couleur du code RHS			
<b>23*TQ</b>	<b>Flower : secondary color</b>	<b>Fleur : couleur secondaire</b>			
	RHS Colour Chart (Indicate reference number)	indiquer la couleur du code RHS			
<b>24*+</b>	<b>Upper petal : width</b>	<b>Pétale supérieur : largeur</b>			
	Narrow	Petite		Gumbo	3
	Medium	moyenne			5
	Broad	grande		Piquant	7

English	Français	Deutsch	Español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>25*+ Lateral petal : width</b>	<b>Pétale latéral : largeur</b>				
narrow	petite				3
medium	moyenne				5
broad	grande				7
<b>26*TQ Petal : differently colored zone at base</b>	<b>Pétale : zone colorée différemment à la base</b>				
absent	absente			Gumbo	1
present	présente			Piquant	9
<b>27* Petal : size of the differently colored zone at base</b>	<b>Pétale : taille de la zone colorée différemment à la base</b>				
small	Petite				3
medium	Moyenne			Piquant	5
large	Grande				7
<b>28* Petal : color of the differently colored zone at base</b>	<b>Pétale : couleur de la zone colorée différemment à la base</b>				
RHS Colour Chart (Indicate reference number)	indiquer la couleur du code RHS				
<b>29 Time of beginning of flowering</b>	<b>Floraison : époque de début de la floraison</b>				
early	précoce				3
medium	moyenne				5
late	tardive				7

X. Technical Questionnaire

	Reference Number (not to be filled in by the applicant)
<p>TECHNICAL QUESTIONNAIRE to be completed in connection with an application for plant breeders' rights</p>	
1. Species	<p style="text-align: center;"><i>Impatiens walleriana</i> Hook. f.  IMPATIENS</p>
2. Applicant (Name and address)	
3. Proposed denomination or breeder's reference	



4. Information on origin, maintenance and reproduction of the variety

4.1 Origin

(a) Seedling (indicate parent varieties)

..... [ ]

(b) Mutation (indicate parent variety)

..... [ ]

(c) Discovery (indicate where and when)

..... [ ]

(d) Other (specify)

..... [ ]

4.2 Method of reproduction

- cuttings [ ]

- *in vitro* propagation [ ]

- other (state method) [ ]

4.3 Other information

5. Characteristics of the variety to be indicated (the number in brackets refers to the corresponding characteristic in Test Guidelines; please mark the state of expression which best corresponds).			
Characteristics	Example Varieties	Note	
<b>5.1 Leaf: variegation of upper side (9)</b>			
absent	Gumbo	1[ ]	
present	Pink Ice	9[ ]	
<b>5.2 Leaf: ground color on upper side (6)</b>			
green	Gumbo	1[ ]	
red		9[ ]	
<b>5.3 Flower: type (19)</b>			
single	Gumbo	1[ ]	
double	Didi Pink	2[ ]	
<b>5.4 Flower: diameter (21)</b>			
small	Pink Ice	3[ ]	
medium		5[ ]	
large	Gumbo	7[ ]	
<b>5.5(i) Flower: main color (22)</b>			
RHS Colour Chart (indicate reference number)	.....		
<b>5.5(ii) Flower: main color (22)</b>			
white		1[ ]	
pink		2[ ]	
blue pink		3[ ]	
orange		4[ ]	
red		5[ ]	
purple		6[ ]	
violet		7[ ]	
other color (indicate) .....		8[ ]	

Characteristics	Example Varieties	Note
<b>5.6 Flower: secondary color (23)</b>		
white		1[ ]
pink		2[ ]
blue pink		3[ ]
orange		4[ ]
red		5[ ]
purple		6[ ]
violet		7[ ]
other color (indicate)		8[ ]
<b>5.7 Petal: zone at base (26)</b>		
absent	Gumbo	1[ ]
present	Piquant	9[ ]

6. Similar varieties and differences from these varieties

Denomination of similar variety	Characteristic in which the similar variety is different <sup>o)</sup>	State of expression of similar variety	State of expression of candidate variety
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<sup>o)</sup> In the case of identical states of expressions of both varieties, please indicate the size of the difference.

7. Additional information which may help to distinguish the variety

7.1 Resistance to pest and diseases

7.2 Special conditions for the examination of the variety

7.3 Other information

A representative color photo of the variety should be added to the Technical Questionnaire.

