

DISCLAIMER

The present version of the national guideline has been accepted by the President of the CPVO for its use in technical examinations carried out on behalf of the CPVO or for the take-over of reports serving as a basis for a CPVO decision.

National protocol: NP/ECH-PCH/2

Examination office	Naktuinbouw	
Reference of the protocol	NP/ECH-PCH/2	
Date of preparation of the protocol	31/01/2025	
Date of entry into force of the protocol	01/03/2025	
Botanical taxon:	Echeveria DC. Pachyphytum hooleri (Salm-Dijck) A. Be.	
Common Name (when known):	Echeveria	
Way of propagation of the plants to be examined	Self or cross pollinated seed propagated <input type="checkbox"/> Vegetatively propagated <input checked="" type="checkbox"/>	
Number of growing cycles:	1 <input checked="" type="checkbox"/> 2 <input type="checkbox"/> Other <input type="checkbox"/> specify Click or tap here to enter text.	
List of grouping characteristics	Yes <input type="checkbox"/> if yes put as annex No <input checked="" type="checkbox"/>	
Minimum number of plants in trial	Vegetative:20	Seed: -
Minimum number of plants observed by measuring or counting:	Vegetative:1	Seed: -
Give description of when observations should take place	see: EXPLANATIONS ON THE TABLE OF CHARACTERISTICS	
<p>Uniformity:</p> <ul style="list-style-type: none"> - For the assessment of uniformity of vegetatively propagated, self-pollinated seed propagated varieties or F1-hybrids, a population standard of 1% and an acceptance probability of at least 95% should be applied. In the case of a sample size of 20 plants, 1 off-type is allowed. 		

Table of characteristics	Present <input checked="" type="checkbox"/> Not available <input type="checkbox"/>
Literature (when present, please annex to this document)	Present <input checked="" type="checkbox"/> Absent <input type="checkbox"/>

TABLE OF CHARACTERISTICS:

N°	Stage, Method	Characteristics	Examples	Note
1.	MS/VG	Plant height		
QN	(a)	very short	Amiech1901	1
		short		2
		medium	Bcec-12.001	3
		tall	Tsaech1802	4
		very tall		5

N°	Stage, Method	Characteristics	Examples	Note
2.	MS/VG	Leaf blade: length		
QN	(a)	very short	Tsaech1802	1
		short	Ubink 122	2
		medium	Ec-ech-02	3
		long	Ubink pv-01	4
		very long		5
3.	MS/VG	Leaf blade: width		
QN	(a)	very narrow	Texensis	1
		narrow	Ubink 122, Ovpearls08	2
		medium	Tsaech1704	3
		broad	Purple heart	4
		very broad	Ec-ech-02	5
4.	VG	Leaf blade: shape		
PQ		elliptic	Ovpearls08	1
		obovate	Asante Sana	2
		broad obovate	Purple heart	3
		oblanceolate	Doechresha	4
		spatulate	Pink Edge	5
5.	VG	Leaf blade: intensity of anthocyanin coloration		
QN	(a)	absent or very weak	Amiech2003	1
		weak	Lori	2
		medium	Tsech1710	3
		strong	Ovgrpp	4
		very strong	Tsaech1806	5
6.	VG	Leaf blade: main color of lower side where markedly different to upper side		
PQ	(a)	RHS Colour Chart (indicate reference number)		

N°	Stage, Method	Characteristics	Examples	Note
7.	VG	Leaf blade: main color of lower side where markedly different to upper side		
PQ	(a)	RHS Colour Chart (indicate reference number)		
8.	VG	Leaf blade: color on marginal zone of upper side (only if hue is markedly different to main color of upper side)		
PQ	(a)	whitish	White Pearl	1
		greenish	Miranda	2
		yellowish		3
		pinkish	Costa	4
		reddish	Ubink 273	5
		purplish red	Bcec-12.001	6
		purplish	Amiech2110	7
		brownish	Ovpearls08	8
9.	VG	Leaf blade: distribution on marginal zone		
PQ	(a)	at apex	Ubink 273	1
		distal quarter	Amiech2110	2
		distal half	Bcec-12.001	3
		distal three quarters	Ovpearls08	4
		throughout	Miranda	5
10.	VG	Leaf blade: type of margin		
PQ	(a)	entire	Ec-ech-02	1
		serrate	Amiech2009	2
		dentate		3
		undulate	Amiech2108	4
11.	VG	Leaf blade: shape in longitudinal section		
PQ	(a)	curved		1
		flat		2
		recurved		3

12.	VG	Leaf blade: shape in cross section		
PQ	(a)	strongly concave	Amiech2103	1
		medium concave	Ubink 126	2
		weakly concave	Miranda	3
		flat	Ovpearls08	4
		convex	Amiech2009	5
13.	VG	Leaf blade: shape of apex		
PQ	(a)	acuminate	Ubink 132	1
		acute	Red Shade	2
		apiculate	Doechva	3
		rounded	Serena	4
		lacinate	Starfire	5
14.	VG	Leaf blade: waxy layer		
QN	(a)	absent or very weak	Doechresha	1
		weak	Doechrusta	2
		medium	Ubink 126	3
		strong	Asante Sana	4
		very strong		5
15.	MS/VG	Inflorescence: length		
QN	(b)	very short	Ruby Blush	1
		short	Ubink 128	2
		medium	Ubink 126	3
		long	Ubink 132	4
		very long	Costa	5
16.	MS/VG	Inflorescence: number of flowers		
QN	(b)	few	Ubink 101	1
		medium	Ubink 215	2
		many	Amiech2102	3

17. MS/VG Peduncle: length

QN	(b)	very short	Ubink 67	1
		short	Doechresha	2
		medium	Apus	3
		long	Ubink pv-01	4
		very long		5

18. VG Peduncle: main color

PQ	(b)	whitish	Lola	1
		greenish	Sagitta	2
		yellowish		3
		pinkish	Amiech2105	4
		reddish	Ubink pv-01	5
		purplish red	Ubink pv-02	6
		purplish	Ovpearls01	7
		brownish	Amiech2112	8

19. VG Corolla: main color of outer side

PQ	(b)	whitish	Amiech2004	1
		greenish		2
		yellowish	Apus	3
		pinkish	Ubink 999	4
		orangish	Ruby Blush	5
		reddish	Amiech2112	6
		purplish red	Red Tip	7
		purplish		8

20. VG Corolla: secondary color of outer side

PQ	(b)	whitish	Sagitta	1
		greenish	Miranda	2
		yellowish	Amiech2112	3
		pinkish		4
		orangish	Tsaech1708	5
		reddish		6
		purplish red		7
		purplish		8

21. MS/VG Stamen: length

QN	(b)	short	Red Tip	1
		medium	Ovpearls07	2
		long	Amiech2111	3

EXPLANATIONS ON THE TABLE OF CHARACTERISTICS:

Explanations covering several characteristics

- (a) Observations should be made during the vegetative stage
- (b) Observations should be made during the flowering stage

LITERATURE:

The Cambridge Illustrated Glossary of Botanical Terms: by Michael Hickey and Clive King

Name that flower: by Ian Clarke and Heleen Lee

Botanisch woordenboek: by Henk Eggelte

Hortica: Color cyclopedia of Garden flora in all climates and Plants Indoor: by A.B. Graf

Dictionary of Gardening: Royal Horticultural Society