

***Spirodela polyrhiza* (L.) Schleid**  
**Simplified standard protocol: NP/SPI/2**

Examination office	Naktuinbouw	
Reference of the protocol	NP/SPI/2	
Date of preparation of the protocol	01/12/2021	
Date of entry into force of the protocol	01/12/2010	
Botanical taxon:	<i>Spirodela polyrhiza</i> (L.) Schleid	
Common Name (when known):	veelwortelig kroos (NL); greater duckweed (EN); Teichlinse (D)	
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 <a href="#">Click or tap here to enter text.</a>	
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:500	Seed: <a href="#">Click or tap here to enter text.</a>
Minimum number of plants observed by measuring or counting:	Vegetative:10	Seed: <a href="#">Click or tap here to enter text.</a>
Give description of when observations should take place	<p>Observations on the leaves should be made at fully developed, vital plants.</p> <p>Other observations should be made at fully developed, vital plants.</p> <p>Observation period: from July 1 to at least September 30.</p>	

<p>Uniformity:</p> <ul style="list-style-type: none"> <li>- 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.</li> </ul>	
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 *Spirodela polyrhiza* (L.) Schleid (NP/SPI/2)**

	Characteristic	Expression	Note
1	Roots: number	very few few medium many very many	1 3 5 7 9
2	Root: length	very short short medium long very long	1 3 5 7 9
3	Root: color (in full grown stage)	green transparent	1 2
4	Leaf: length	very short short medium long very long	1 3 5 7 9
5	Leaf: width	very narrow narrow medium broad very broad	1 3 5 7 9
6	Leaf: shape	circular broad elliptic ovate obovate	1 2 3 4
7	Leaf: intensity of green color of upper side	very light light medium dark very dark	1 3 5 7 9
8	Leaf: color of lower side	green red	1 2
9	Leaf: color of margin	transparent green red	1 2 3
10	Leaf: shape of apex	slightly pointed rounded flattened	1 2 3
11	Leaf: shape of base	pointed rounded	1 2
12	Leaf: intensity of anthocyanin coloration of upper side	absent or very weak weak medium strong very strong	1 3 5 7 9

13	Leaf: intensity of anthocyanin coloration of lower side	absent or very weak weak medium strong very strong	1 3 5 7 9
14	Leaf: thickness	thin medium thick	1 2 3
15	Leaf: profile in longitudinal section	concave plane convex	1 2 3
16	Leaf: conspicuousness of veins	weak medium strong	1 2 3
17	Speed of multiplication	very slow slow medium fast very fast	1 3 5 7 9
Literature:			
<p>Chittenden, F.J., 1951: Dictionary of Gardening. The Royal Horticultural Society. Oxford at the Clarendon Press, GB.</p> <p>Cross, J.W., 1994: Duckweed as a Primary Feedstock for Aquaculture. A Summary of its Potential Advantages. Missouri Botanical Garden.</p> <p>Graf, A.B., 1992: Hortica: A Color Cyclopedia of Garden Flora: In All Climates and Indoor Plants. Roehrs Co.</p> <p>Landolt, E., Kandeler, R., 1987: Biosystematic investigations in the family of duckweeds (Lemnaceae). Veröffentlichungen des Geobotanischen Institutes der Eidg. Tech. Hochschule Stiftung Rübel 95, CH, 638 pp.</p> <p>Meijden, R. van der, Weeda, E.J., Adema, F.A.C.B., Jonckheere, G.J. de, 1983: Heukels' Flora van Nederland. Wolters-Noordhoff, Groningen, NL.</p> <p>Vasseur, L., Aarssen, L.W. &amp; Lefebvre, D.D., 1991: Allozymic and morphometric variation in Lemna minor (Lemnaceae). Plant Systematics and Evolution 177, pp. 139 to 148.</p>			