



LITHUANIAN
RESEARCH CENTRE
FOR AGRICULTURE
AND FORESTRY

Plum cultivar evaluation on *Prunus cerasifera* Ehrh. Rootstock in Lithuania

Juozas Lanauskas, Darius Kviklys,
Nobertas Uselis, Loreta Buskienė

Institute of Horticulture, Kauno 30, 54333 Babtai,
Kaunas district, Lithuania; j.lanauskas@lsdi.lt



InnoFruit

Advancement of non-technological innovation
performance and innovation capacity in fruit
growing and processing sector in selected
Baltic Sea Region countries



LITHUANIAN
RESEARCH CENTRE
FOR AGRICULTURE
AND FORESTRY

Material and methods

20 plum cultivars on *Prunus cerasifera* seedling rootstock were tested in 2012-2017 at the Institute of Horticulture of Lithuanian Research Centre for Agriculture and Forestry.

Plum trees were spaced at 4.5 x 2.5 m and trained as spindles, orchard floor management included frequently mown grass in the alleyways with herbicide strips along tree rows.

Each experimental plot included 3 fruit trees number of replications – 4. Total number of accounting trees – 12.



Fig. 1. Cumulative plum tree yield, 2014–2017

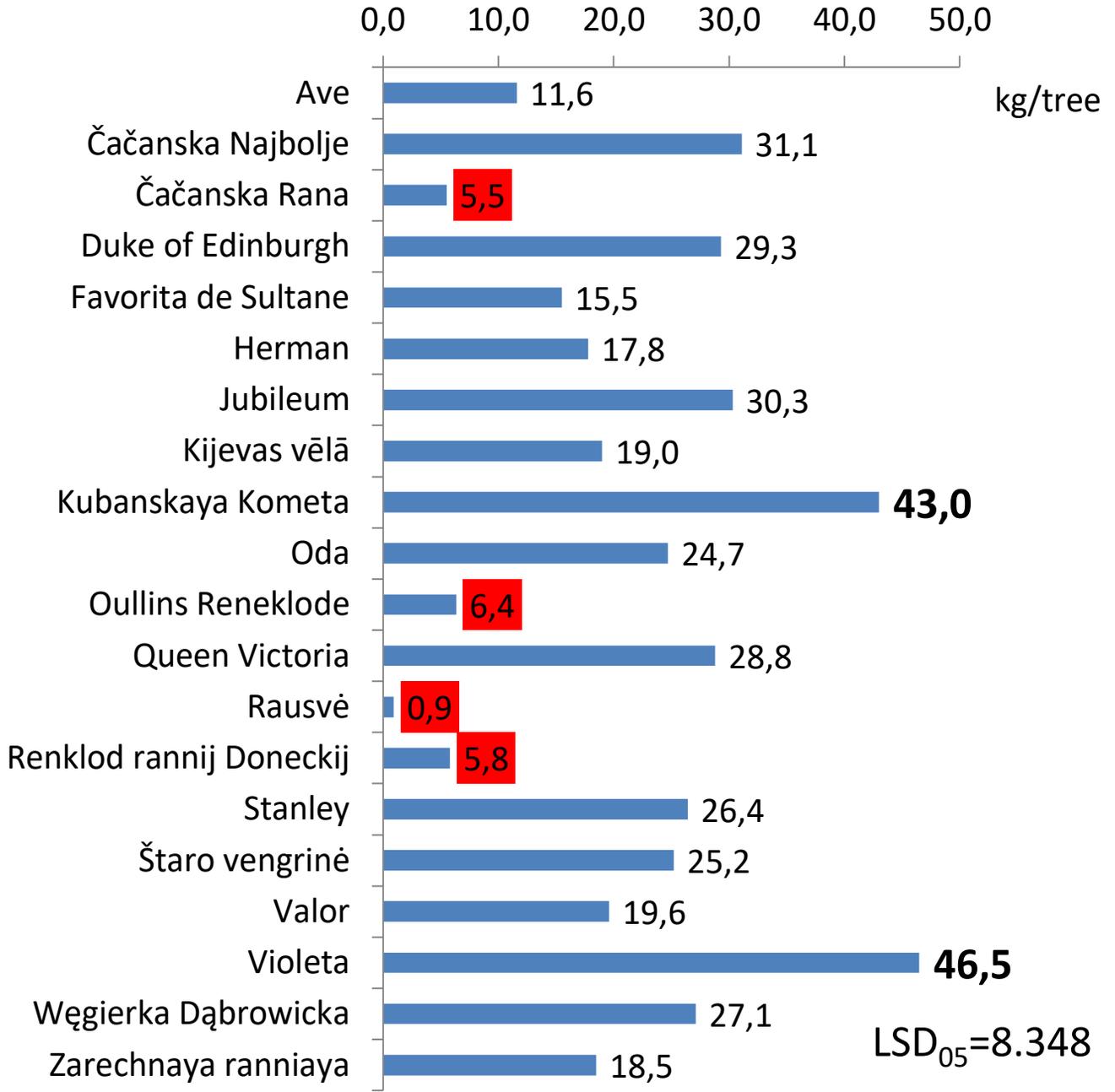


Fig. 2. Average fruit weight, 2014–2017

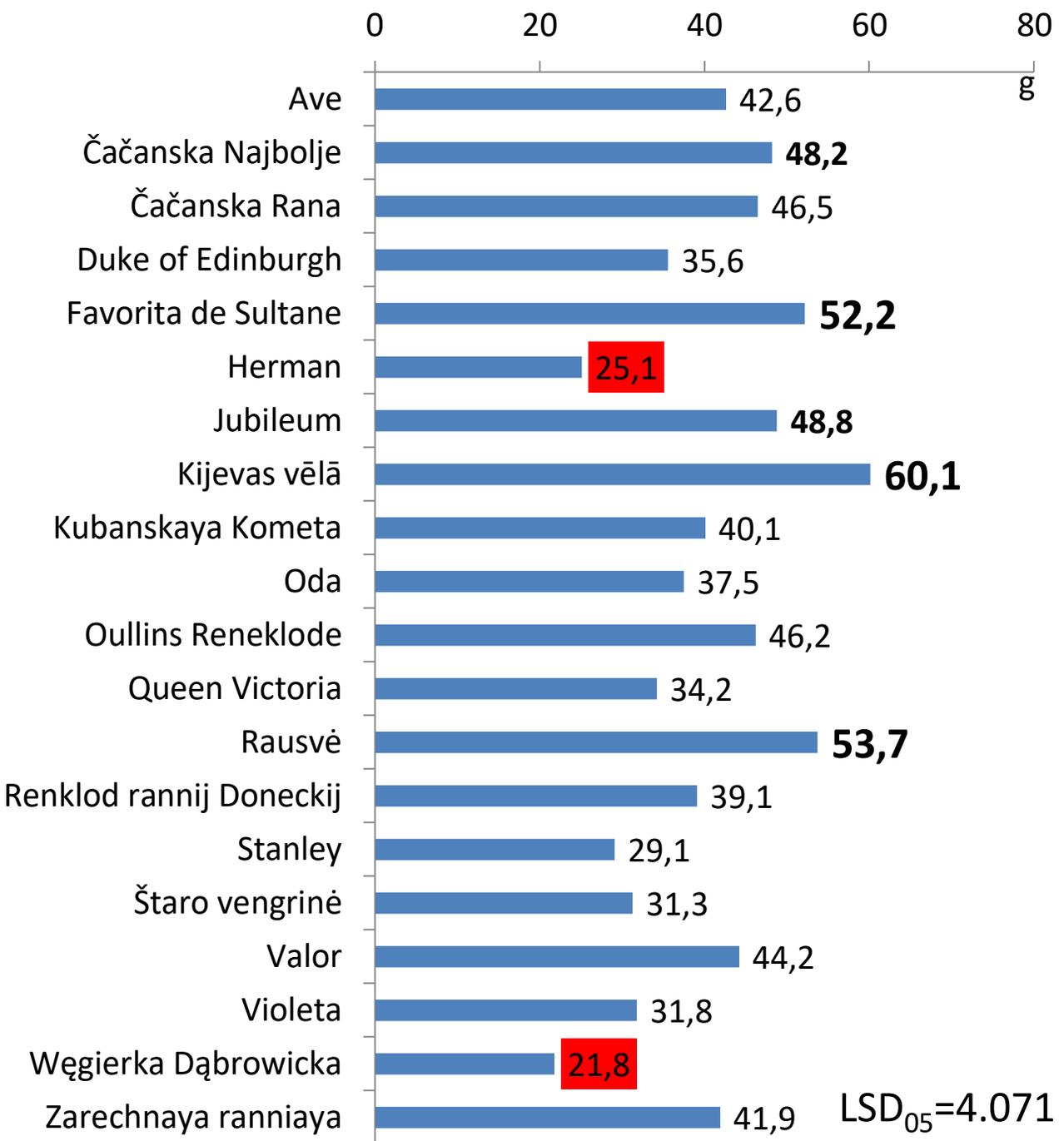




Fig. 3. Soluble solids content in fruit, 2014–2017

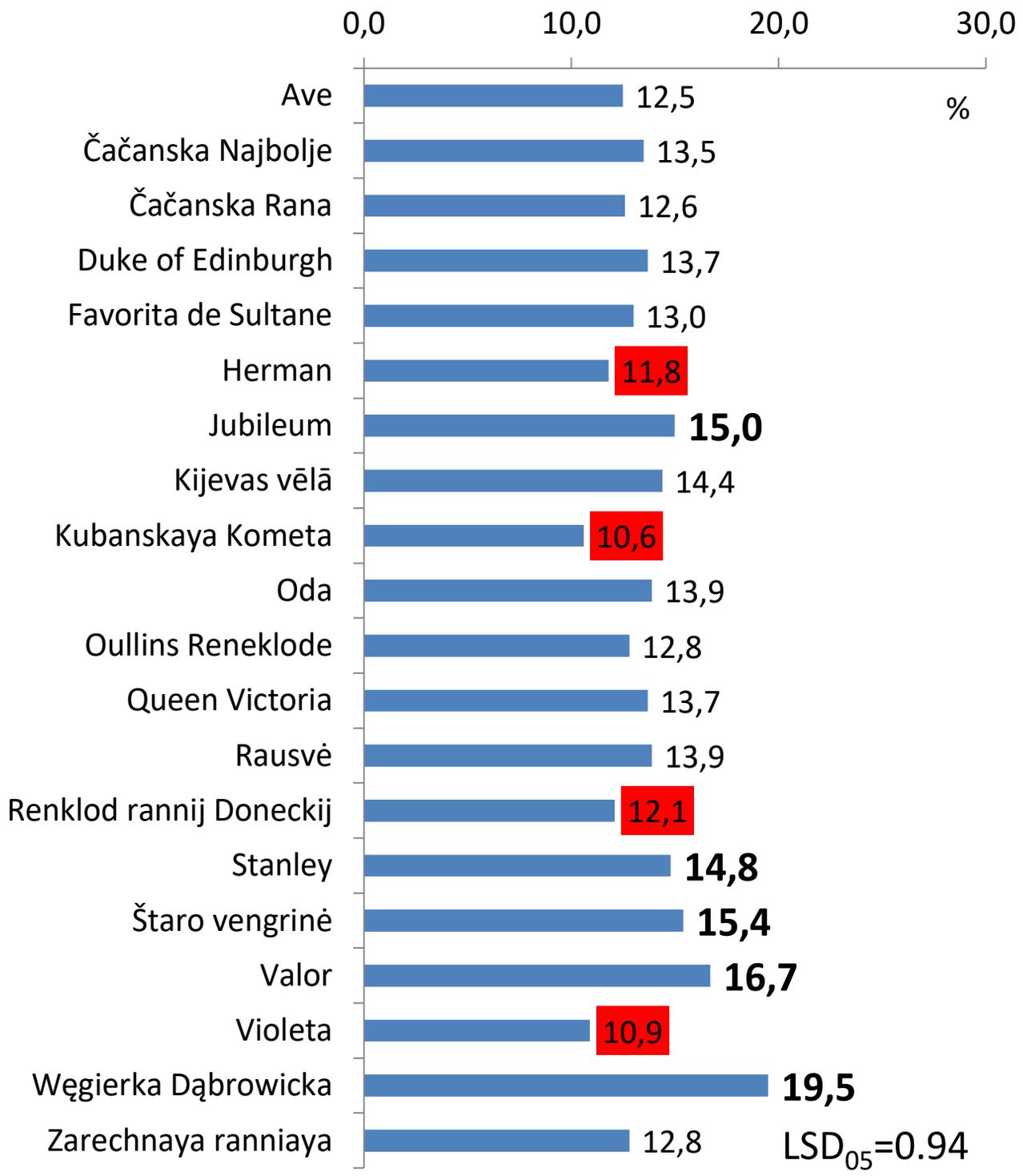


Fig. 4. Fruit flesh firmness, 2014–2017

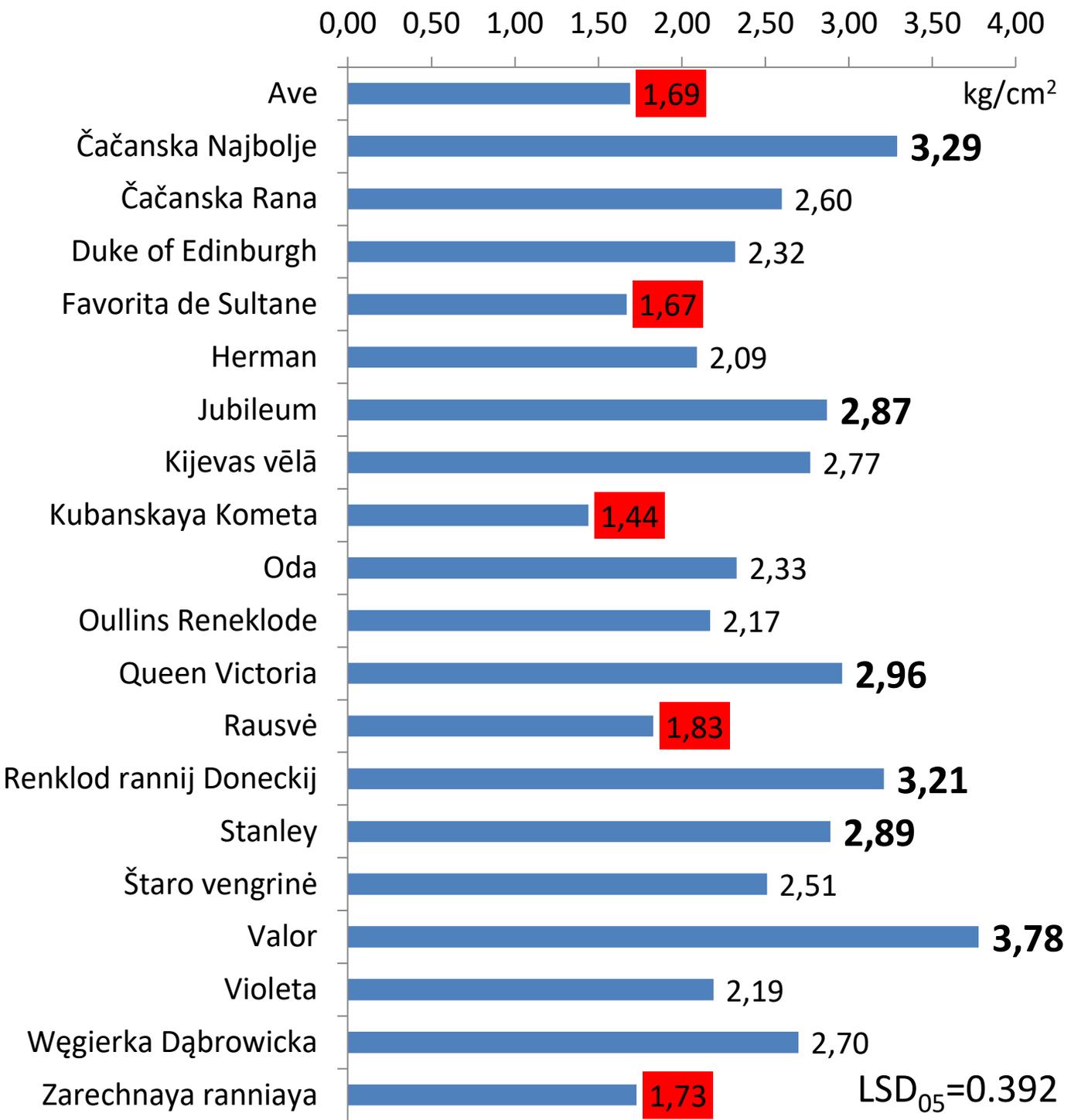


Table 1. Attributes of sensory fruit quality
(1-5* score scale)

Cultivar	Appearance	Pits separation from the flesh	Taste	Overall rating
Ave	4.4	4.0	4.0	4.1
Čačanska Najbolje	4.7	4.9	4.7	4.7
Čačanska Rana	4.8	4.4	4.6	4.7
Duke of Edinburgh	4.0	4.2	3.9	4.0
Favorita de Sultane	4.6	3.7	4.4	4.5
Herman	3.8	4.7	4.2	4.2
Jubileum	4.8	4.6	4.5	4.6
Kijevas vėlā	4.6	3.0	4.4	4.3
Kubanskaya Kometa	4.2	3.7	3.9	4.1
Oda	4.6	3.8	4.5	4.5
Oullins Reneklode	4.1	3.9	4.3	4.2
Queen Victoria	4.0	4.3	4.2	4.2
Rausvė	4.4	4.7	4.5	4.5
Renklod rannij Doneckij	4.1	4.2	3.7	4.0
Stanley	4.3	4.0	4.5	4.5
Štaro vengrinė	4.3	4.7	4.4	4.5
Valor	4.6	4.1	4.4	4.4
Violeta	4.4	3.6	3.4	3.9
Węgiełka Dąbrowicka	4.2	4.6	4.6	4.4
Zarechnaya ranniaya	4.5	3.5	3.9	4.3

* 1 – the lowest quality, 5 – the highest quality



Summary of the report

Cultivar	Yield	Fruit weight	Soluble solids content	Flesh firmness	Overall fruit rating	Survived fruit trees	Balance of pluses and minuses
Ave				-			
Čačanska Najbolje	+	+		+	+		+4
Čačanska Rana	-				+	+	
Duke of Edinburgh	+					+	
Fav. de Sultane		+		-	+	+	
Herman		-	-			-	
Jubileum	+	+	+	+	+	-	+4
Kijevas vėlā		+				+	
Kuban. Kometa	+		-	-		+	
Oda					+	-	
Oullins Renekl.	-					+	
Queen Victoria				+			
Rausvė	-	+		-	+	+	
Renklod rannij Doneckij	-		-	+		+	
Stanley			+	+	+	+	+4
Štaro vengrinė			+		+	+	+3
Valor			+	+		+	+3
Violeta	+		-		-	+	
Węgiełka Dąbrowicka		-	+				
Zarechnaya ranniaya				-		+	