

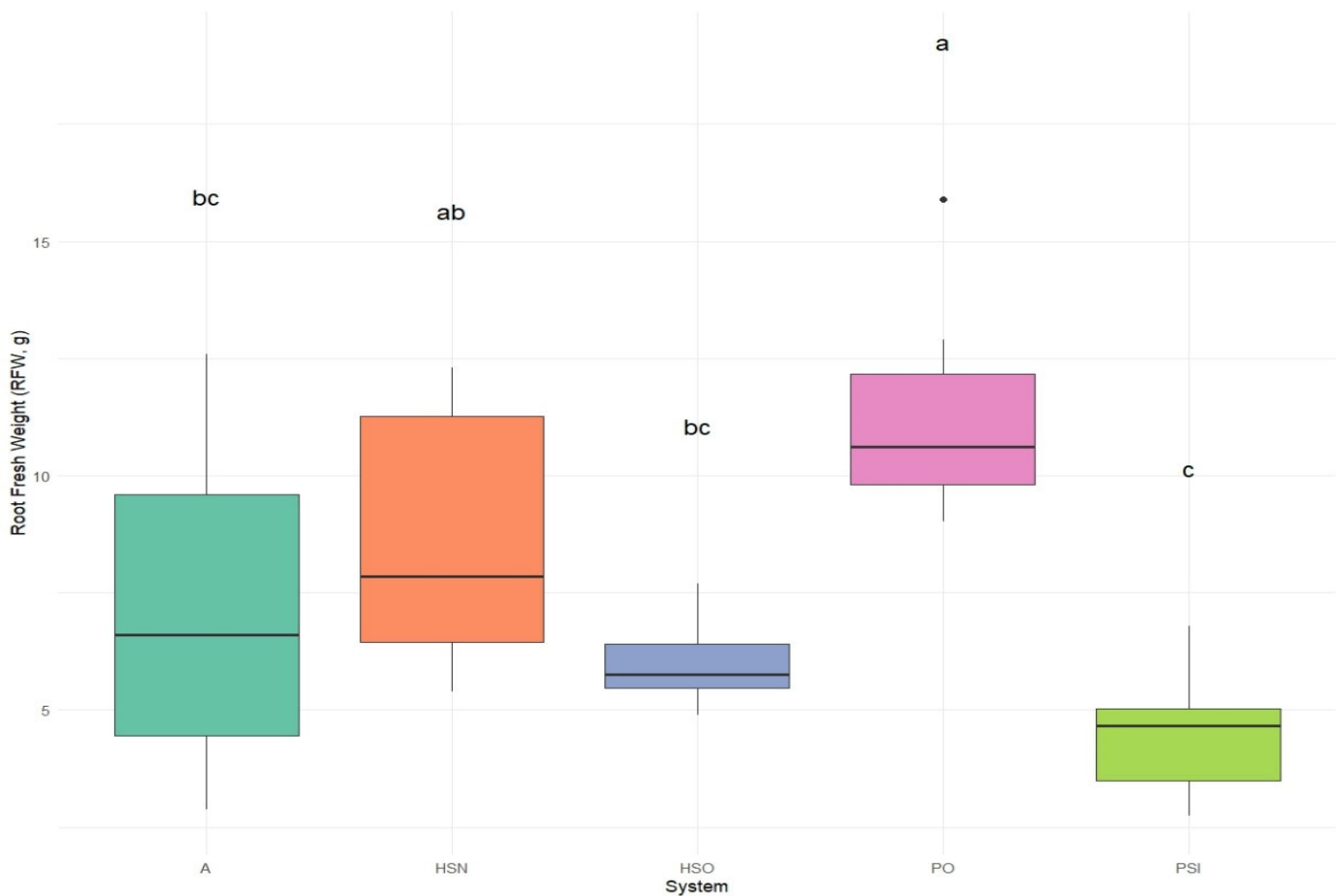
## Supplementary material

Table S1. The different two components of PCA. The values in bold are the significative, and each component is represented by the percentage variability in the middle column. In the right column is the cumulative variance.

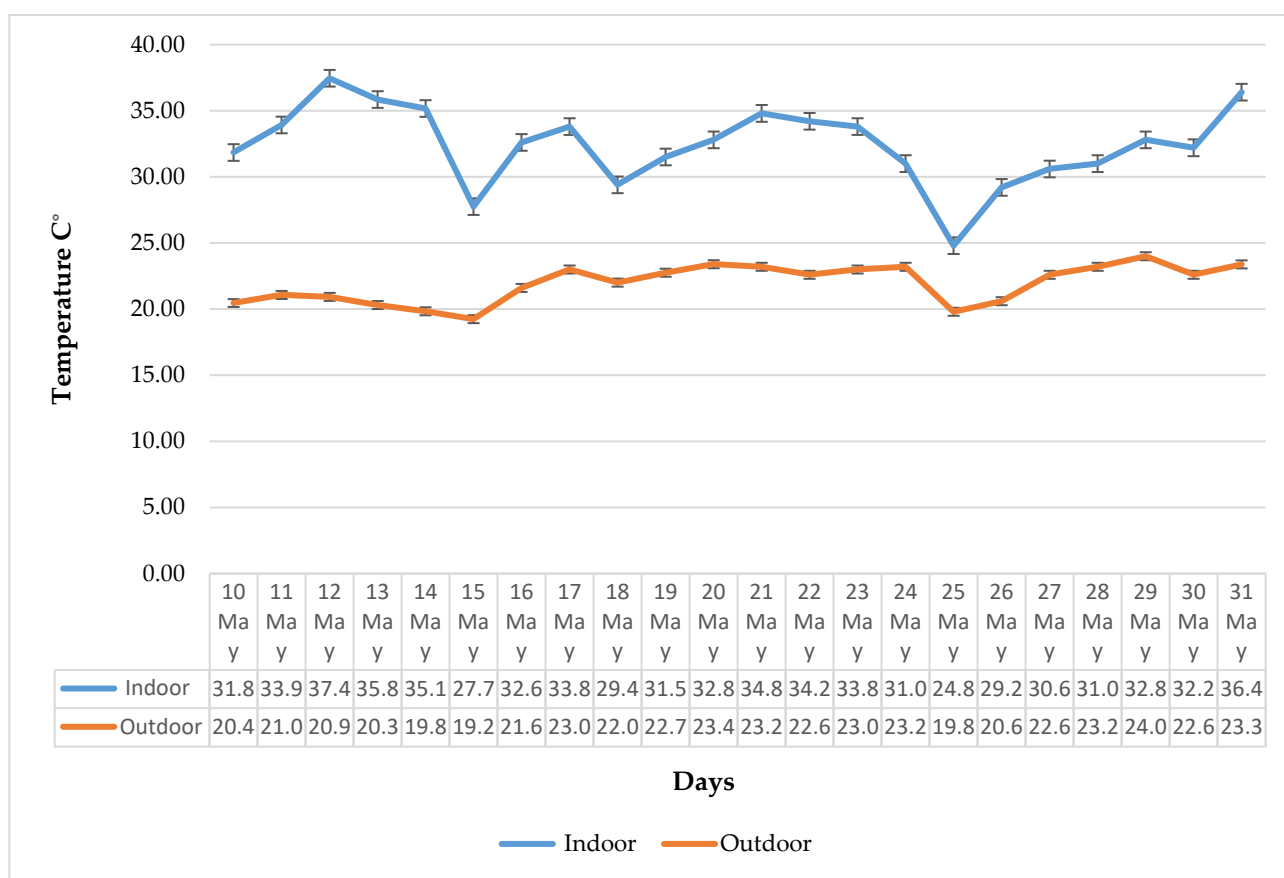
| <i>Components</i> | <i>eigenvalue</i> | <i>variance.percent</i> | <i>cumulative.variance.percent</i> |
|-------------------|-------------------|-------------------------|------------------------------------|
| <i>Dim.1</i>      | <b>6,30</b>       | <b>41,97</b>            | <b>41,97</b>                       |
| <i>Dim.2</i>      | <b>3,77</b>       | <b>25,15</b>            | <b>67,12</b>                       |
| <i>Dim.3</i>      | 1,69              | 11,28                   | 78,41                              |
| <i>Dim.4</i>      | 1,41              | 9,37                    | 87,78                              |
| <i>Dim.5</i>      | 0,71              | 4,72                    | 92,50                              |
| <i>Dim.6</i>      | 0,46              | 3,10                    | 95,59                              |
| <i>Dim.7</i>      | 0,29              | 1,90                    | 97,49                              |
| <i>Dim.8</i>      | 0,17              | 1,13                    | 98,63                              |
| <i>Dim.9</i>      | 0,09              | 0,57                    | 99,20                              |
| <i>Dim.10</i>     | 0,06              | 0,37                    | 99,57                              |
| <i>Dim.11</i>     | 0,03              | 0,22                    | 99,79                              |
| <i>Dim.12</i>     | 0,02              | 0,13                    | 99,93                              |
| <i>Dim.13</i>     | 0,01              | 0,05                    | 99,98                              |
| <i>Dim.14</i>     | 0,00              | 0,02                    | 100,00                             |
| <i>Dim.15</i>     | 0,00              | 0,00                    | 100,00                             |



**Figure S1.** On the left is the glasshouse; on the right is the indoor equipment.



**Figure S2.** Root average fresh weight of lettuce plants grown with different systems. A root FW (bc); HSN (ab); HSO (bc); PSO (a); PSI (c). Different letters indicate significant differences at  $P < 0.05$  (ANOVA, Tukey's test,  $n=6$ ). The higher root FW yield is represented by PSO, followed by HSN, A, HSO, and PSI systems.



**Figure S3. The monthly average temperature. As can be seen, the maximum average air indoor T was 37 C° on 12 May, and the maximum outdoor air temperature was 24 C° on 29 May.**