

Supporting Information S4. Web Server and User Guide for pLoc-mPlant

For the convenience of most experimental scientists, the web-server of pLoc-mPlant predictor has been established. Moreover, to maximize their convenience, a step-by-step guide is given below.

Step 1. Opening the web-server at <http://www.jci-bioinfo.cn/pLoc-mPlant/>, you will see the top page of pLoc-mPlant on your computer screen, as shown in **Fig.S1**. Click on the [Read Me](#) button to see a brief introduction about the predictor.

Fig.S1. A semi screenshot of the top page of pLoc-mPlant

pLoc-mPlant: predict subcellular localization of plant proteins with both single and multiple sites

| [Read Me](#) | [Supporting Information](#) | [Citation](#) |

Enter query sequences

Enter the sequence of query proteins in FASTA format ([Example](#)): the number of protein sequences is limited at 5 or less for each submission

[Submit](#) [Cancel](#)

Or, upload a file for batch prediction

Enter your e-mail address and upload the batch input file ([Batch-example](#)). The predicted result will be sent to you by e-mail once completed; it usually takes 1 minute or so for each protein sequence

Upload file: [Browse](#)

Your Email:

[Batch submit](#) [Cancel](#)

Step 2. Either type or copy/paste the sequences of query plant proteins into the input box at the center of **Fig.S1**. The input sequence should be in the FASTA format. For the examples of sequences in FASTA format, click the [Example](#) button right above the input box.

Step 3. Click on the [Submit](#) button to see the predicted result. For instance, if you use the three protein sequences in the [Example](#) window as the input, after 10 seconds or so, you will see the following on the screen of your computer. (1) The names of the subcellular locations numbered from 1 to 12 covered by the current predictor are shown on the top. (2) The query protein 004130 of example-1 corresponds to "3" meaning it belonging to "chloroplast" only; the query protein P15290 of example-2 corresponds to "2, 4" meaning it belonging to "cell wall" and "cytoplasm"; the query protein P54609 of example-3 corresponds to "2, 4, 9",

meaning it belonging to “cell wall”, “cytoplasm”, and “nucleus”. All these results are fully consistent with experimental observations.

Step 4. As shown on the lower panel of **Fig.S1**, you may also choose the batch prediction by entering your e-mail address and your desired batch input file (in FASTA format of course) via the “Browse” button. To see the sample of batch input file, click on the button Batch-example. After clicking the button Batch-submit, you will see “Your batch job is under computation; once the results are available, you will be notified by e-mail.”

Step 5. Click on the [Citation](#) button to find the papers that have played the key role in developing the current predictor of pLoc-mPlant.

Step 6. Click the [Supporting Information](#) button to download the Supporting Informations mentioned in this paper.