Prepare the inoculum from *Spirulina platensis* strain to inoculate 800 mL of Zarrouk medium contained in 1000 mL Erlenmeyer flask.
2 Supplement the Zarrouk medium with 2.5%, 5.0% and 10% clarified buffalo mozzarella cheese whey. The components of Zarrouk medium (per liter) are as follows: 16.8g NaHCO$_3$, 0.5g K$_2$HPO$_4$, 2.5g NaNO$_3$, 1.0g K$_2$SO$_4$, 1.0g NaCl, 0.2g CaCl$_2$, 0.04g MgSO$_4$$\cdot$7H$_2$O, 0.08g EDTA, 1ml of A5 solution, 1ml of B6 solution.

3 Keep the inoculum growing mixotrophically for 4 days on experimental apparatus under the same light intensities as the culture inoculated by it.

4 Keep the cultures under temperature of 25 °C and constant sterile aeration promoted by pumps (JAD Air Pump S-510) at a specific flow rate of 0.5 vvm (volume of air per volume of medium per minute), and the only light source from fluorescent lamps of 45 W with a luminous intensity of $238 \text{ } \mu$mol m$^{-2}$ s$^{-1}$ measured by Q201 quantum radiometer (Macam Photo-Metrics Ltd., Livingston, Scotland).

5 Use a light regime of 12-hour light, 12-hour darkness