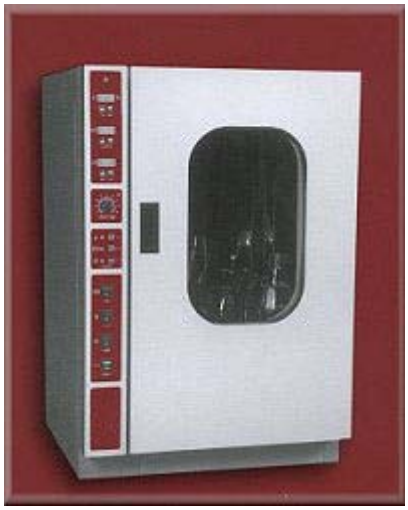
Vertiga-IM Shaker



Manufacturer: Thomson Instrument Company

Model: Vertiga 1M Shaker(#381150)

Primary Use: Small Scale Protein Expression in insect or Mammalian Cells

Description: Vertiga 1M has a platform that holds 12 plates and a top shelf. The orbit can be adjusted for doing Well Plates or Flasks, so whether one is screening or expressing, both needs are addressed. This unit has a cooling capability to 5°C, and can maintain between 5°C-60°C with 0.1 degree temperature fluctuation. Exterior dimensions are 26 in. width x 27 in.depth x 42in and a weight of 250 lbs.

The Vertiga IM shaker was developed as a collaboration project between JCIMPT and Thomson Instruments Company and is a modification of the Vertiga I Shaker which was developed for small scale expression in bacterial cells and which was adopted by the Joint Center for Structural Genomics (JCSG) for small scale expression studies. The Vertiga-IM is a second generation small-scale protein expression system [See References below] that enables screening of insect or mammalian (e.g. CHO and HEK293) cells in suspension. Three parameters were optimized using the Vertiga-I as a starting point: orbital path, throw distance, and temperature control. The throw distance for the circular orbit was optimized to one-half inch for use with the Thomson 24-well plates. However, the throw is adjustable to accommodate different vessel formats. Finally, the temperature control was upgraded from the peltier system used on the Vertiga-I to a compression refrigeration system, which is capable of maintaining a temperature from 5–60 °C (±0.1 °C).

References

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