BioSep: an ingenious solution for long term perfusion

Retention system for perfusion, concentration and washing

BioSep Acoustic perfusion

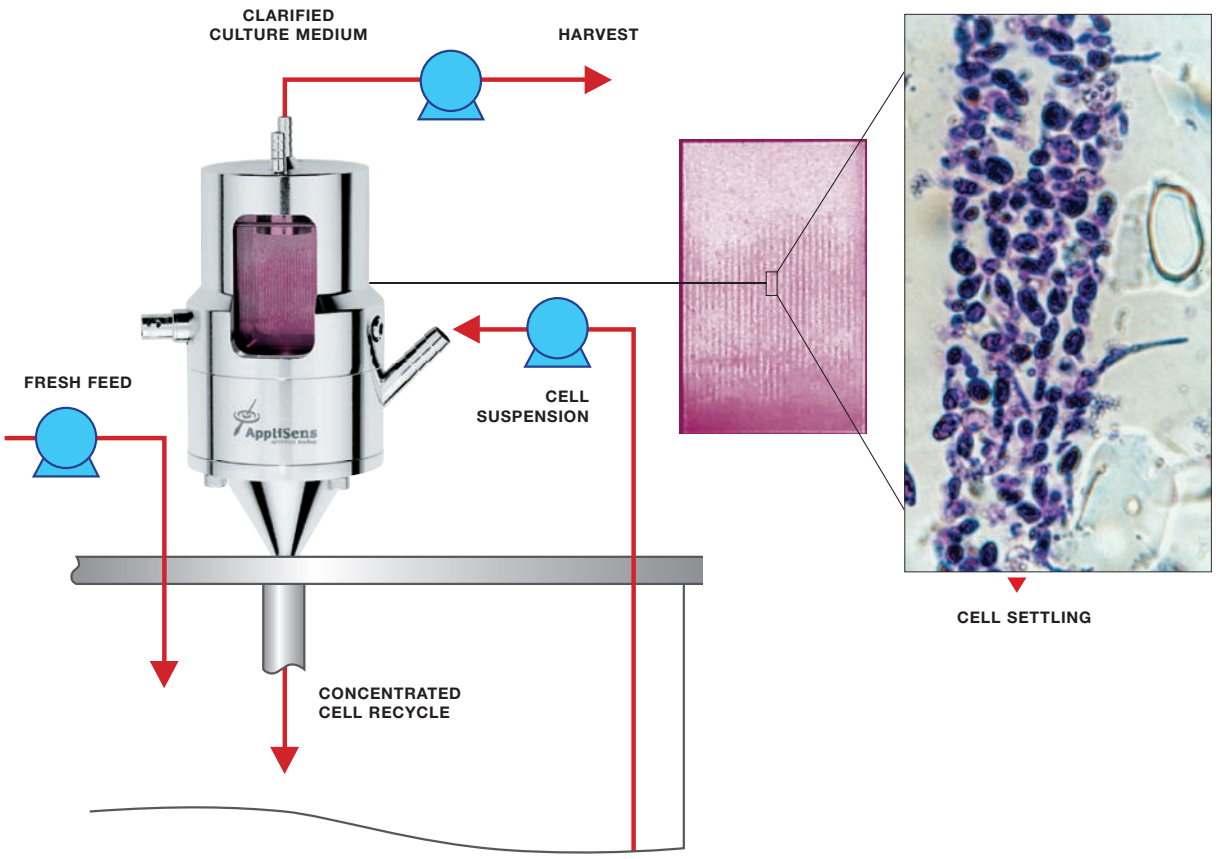
The Applikon BioSep system is a unique, cell retention device for high-density perfusion processes. Using high frequency resonant ultrasonic waves to separate cells from product instead of a physical mesh or membrane, it offers all the benefits of traditional devices but without their inherent problems and limitations.

Other applications for the BioSep:

- cell concentration
- cell washing

The BioSep, based on the technology of acoustic resonance, is a non fouling / non clogging retention system. It can be applied in continuous mode for many months which makes the BioSep the most favourable instrument for perfusion cultures. The BioSep can be applied in both R&D (min. 1L/day), process development and on production scale (1000L/day) with linear scale up. Screening of cells and medium optimalisation typically are applications in the R&D segment. Furhtermore the BioSep can be seen as the first step in the DownStream Processing. The economic advantages are evident and described in literature.
The technology of the BioSep is also very attractive for applications such as concentration of cell / particles and washing (e.g. beads).

The Biosep has a capacity of 1L to 1000L/day, divided over five different models. BioSep is using SonoSep Technology



Typical configuration of acoustic cell retention system.