

CLAIMS

1. An assembly for handling biological material, comprising:

a substantially planar interface including at least one port therein; and

a component retaining element, spaced apart from said substantially planar interface, configured to retain a component for handling biological material;

wherein at least one of said substantially planar interface and said component retaining element are moveable to bring said at least one port and said component retaining element into registration with one another to allow, when in use, a fluid communication pathway between a component retained by said component retaining element and a container associated with said substantially planar interface through said at least one port.
2. An assembly according to claim 1, wherein said substantially planar interface is rotatable about an axis of rotation substantially perpendicular to the plane of said substantially planar interface.
3. An assembly according to claim 1 or claim 2, wherein said component retaining element is longitudinally moveable along an axis substantially perpendicular to the plane of said substantially planar interface.
4. An assembly according to claim 3, wherein said component retaining element is longitudinally moveable to urge, when in use, a component retained by said component retaining element into engagement with said at least one port.
5. An assembly according to any preceding claim, wherein said component retaining element is substantially laterally immovable within the plane of said component retaining element.
6. An assembly according to any preceding claim, wherein said component retaining element comprises an arm terminating in a component retaining head.
7. An assembly according to any preceding claim, further comprising an enclosure, said component retaining element being formed as part of said enclosure, and wherein said enclosure is configured to operably receive said substantially planar interface.

8. An assembly according to any preceding claim, wherein said substantially planar interface comprises a plurality of ports.
9. An assembly according to claim 8, wherein each port is arranged radially outwardly of a central longitudinal axis of said substantially planar interface.
10. An assembly according to any preceding claim, wherein said at least one port of said planar interface is a resealable port.
11. An assembly according to claim 10, wherein said resealable port comprises a septum seal.
12. An assembly according to claim 11, wherein said substantially planar interface and said septum seal are co-moulded.
13. An assembly according to any preceding claim, wherein said substantially planar interface further comprises a removable aseptic barrier disposed over said at least one port.
14. An assembly according to claim 13, wherein said removable aseptic barrier comprises a fastener portion operably coupled to an aseptic skin, said aseptic skin being removably disposed over said at least one port.
15. An assembly according to claim 14, wherein said fastener portion is slidably received within a slot formed in said substantially planar interface, said fastener portion being moveable within said slot between a first configuration, in which the aseptic skin is disposed over said at least one port, and a second configuration, in which the aseptic skin is removed from said at least one port.
16. An assembly according to any one of claims 13 to 15, further comprising an aseptic barrier removal system, said aseptic barrier removal system configured to operably engage a portion of said removable aseptic barrier and to remove said removable aseptic barrier from said at least one port, in use.
17. An assembly according to any preceding claim, wherein said substantially planar interface comprises a coupling element configured to operably couple to a corresponding coupling element of a container.

18. An assembly according to any preceding claim, wherein said substantially planar interface comprises one or more drive elements arranged to cooperate with a drive mechanism.
19. An assembly according to any preceding claim, wherein said component retaining element comprises an actuator configured to actuate, when in use, at least a portion of a component retained by said component retaining element.
20. An assembly according to any preceding claim, further comprising a container fluidly coupled to said at least one port of said substantially planar interface.
21. An assembly according to claim 20, further comprising an expandable receptacle operably coupled to said substantially planar interface and configured to fluidly communicate with said container through said substantially planar interface.
22. An assembly according to claim 21, wherein said expandable receptacle comprises a flexible bag, or a receptacle comprising an expandable side wall.
23. An assembly according to any preceding claim, further comprising a component for handling biological material retained by said component retaining element.
24. An assembly according to claim 23, wherein said component comprises a receptacle, a connector, or a receptacle fluidly connected to a connector.
25. A method of introducing material into, or removing material from, a component of an assembly for handling biological material, comprising:
 - providing an assembly according to any preceding claim;
 - retaining a component, suitable for handling biological material and including at least one port, to said component retaining element;
 - moving at least one of said substantially planar interface and said component retaining element to bring said at least one port of said component into registration with said at least one port of said substantially planar interface;
 - providing a fluid communication pathway through said at least one port of said substantially planar interface and said at least one port of said component;

introducing material into, or removing material from, said component through said fluid communication pathway.

26. An assembly for handling biological material, comprising:

a first biological handling element, comprising a first volume having a first port;

a second biological handling element, comprising a second volume having a second port;

an aseptic connecting element, configured to aseptically fluidly connect said first port and said second port to provide aseptic fluid communication between said first volume and said second volume;

an aseptic disconnecting element, configured to aseptically fluidly disconnect said first port and said second port to prevent aseptic fluid communication between said first volume and said second volume;

wherein at least one of said first biological handling element and said second biological handling element are moveable to bring said first port and said second port into registration with one another to allow, when in use, said aseptic connecting element to aseptically fluidly connect said first port and said second port, and to allow, when in use, said aseptic disconnecting element to aseptically fluidly disconnect said first port and said second port.

27. An assembly according to claim 26, wherein said first biological handling element comprises a substantially planar interface having said first port, said first port fluidly coupled, or configured to be fluidly coupled, to said first volume.

28. An assembly according to claim 26 or claim 27, wherein said second biological handling element comprises a component retaining element retaining a component having said second volume and said second port.

29. An assembly according to any one of claims 26 to 28, wherein said aseptic connecting element and said aseptic disconnecting element are a unitary aseptic connecting and disconnecting element.

30. An assembly according to claim 29, wherein said unitary aseptic connecting and disconnecting element is an aseptic connector.

31. An assembly according to any one of claims 26 to 29, wherein said first port comprises a first tube, said second port comprises a second tube, and said aseptic connecting element comprises an aseptic tube welder.
32. An assembly according to any one of claims 26 to 29, or claim 31, wherein said first port comprises said first tube, said second port comprises a second tube, and said aseptic disconnecting element comprises an aseptic tube sealer.
33. A method of handling biological material, comprising:
- moving at least one of a first biological handling element, comprising a first volume having a first port, and a second biological handling element, comprising a second volume having a second port, to bring said first port and said second port into registration with one another;
- aseptically fluidly connecting said first port and said second port, thereby providing fluid communication between said first volume and said second volume;
- transferring biological material from said first volume to said second volume, or from said second volume to said first volume; and
- aseptically fluidly disconnecting said aseptically fluidly connected first port and second port, thereby preventing fluid communication between said first volume and said second volume.
34. The method according to claim 33, wherein the step of aseptically fluidly connecting said first port and said second port comprises aseptically welding said first port to said second port.
35. The method according to claim 33 or claim 34, wherein the step of aseptically fluidly disconnecting said first port and said second port comprises aseptically sealing said connected first port and second port to provide an aseptically sealed first port and an aseptically sealed second port.