

CLAIMS

What is claimed is:

1. A method, comprising:
 - forming a pocket and a receptacle in an end portion of a first panel, the pocket having an end opening and being contiguous with the receptacle;
 - coupling a magnet within the receptacle;
 - forming a pocket within a second panel that terminates at an end face of the second panel;
 - coupling a first shield portion of a ferromagnetic shield in the pocket of the second panel such that a second shield portion of the ferromagnetic shield extends from the end face of the second panel, an inner shield surface of the ferromagnetic shield being substantially flush with an inner second panel surface of the second panel; and
 - disposing the second shield portion of the ferromagnetic shield within the pocket of the first panel via the end opening to form a magnetic lap joint, wherein the inner shield surface and the inner second panel surface are substantially flush with an inner first panel surface of the first panel.
2. The method of claim 1, wherein forming the receptacle comprises forming a plurality of receptacles in the end portion of the first panel and wherein coupling the magnet within the receptacle comprises coupling a magnet in each of the plurality of receptacles.
3. The method of any one of the preceding claims, further comprising forming a pair of dowel bores at the end face of the second panel, coupling a dowel within each of the dowel bores, and forming a master dowel bore and a slave dowel bore in an end face of the first panel, the master dowel bore and the slave dowel bore being adapted to each receive a respective one of the dowels.
4. An apparatus, comprising:
 - a first panel having an end portion defining a pocket and a receptacle, the pocket having an end opening and being contiguous with the receptacle;
 - a magnet disposed within the receptacle and coupled therein;
 - a second panel having an end portion including an end face and defining a pocket terminating at the end face; and
 - a ferromagnetic shield having a first shield portion and a second shield portion, the first shield portion disposed within the pocket of the second panel and coupled therein, the

second shield portion extending from the end face of the second panel, an inner shield surface of the ferromagnetic shield being substantially flush with an inner second panel surface of the second panel,

wherein the second shield portion of the ferromagnetic shield is receivable within the pocket of the first panel via the end opening to form a magnetic lap joint, wherein the inner shield surface and the inner second panel surface are substantially flush with an inner first panel surface of the first panel.

5. The apparatus of claim 4, further comprising a dowel joint formed between the first panel and the second panel when the magnetic lap joint is formed between the first panel and the second panel.

6. The apparatus of claim 5, wherein the dowel joint comprises a pair of dowels, a master dowel bore, and a slave dowel bore.

7. The apparatus of claim 6, wherein the dowels extend from the second panel on either side of the pocket of the second panel, the master dowel bore being defined on one side of the pocket of the first panel, the slave dowel bore being defined on another side of the pocket of the first panel.

8. The apparatus of any one of claims 4 – 7, wherein the first panel defines a plurality of receptacles including the receptacle, wherein each of the plurality of receptacles includes a corresponding magnet disposed therein.

9. The apparatus of claim 8, wherein the receptacles are positioned in a staggered arrangement.

10. The apparatus of any one of claims 4 – 9, wherein the pocket of the first panel and the pocket of the second panel are similar to one another.

11. An apparatus, comprising:

an enclosure, the enclosure comprising a magnetic panel joint formed by:

a first panel carrying a magnet and comprising a first pocket;

a second panel comprising a second pocket; and

a ferromagnetic shield coupled within the second pocket and couplable within the first pocket via the magnet.

12. The apparatus of claim 11, wherein the enclosure substantially restricts ingress and egress of light through the enclosure.

13. The apparatus of any one of claims 11 – 12, wherein the magnetic panel joint substantially restricts ingress and egress of light through the magnetic panel joint.
14. The apparatus of any one of claims 11 – 13, wherein an inward facing ferromagnetic shield surface of the ferromagnetic shield is substantially flush with an inward facing second panel surface of the second panel.
15. The apparatus of claim 14, wherein an inward facing first panel surface is substantially flush with the inward facing ferromagnetic shield surface when the ferromagnetic shield is coupled within the first pocket via the magnet.
16. The apparatus of any one of claims 11 – 15, further comprising an alignment dowel bore defined by one of the first panel or the second panel and a corresponding alignment dowel carried by the other one of the first panel or the second panel.
17. The apparatus of claim 16, wherein the first panel defines a receptacle receiving the magnet, the alignment dowel bore is defined by the first panel and is coplanar with the receptacle, and the alignment dowel includes a ferromagnetic material.
18. The apparatus of any one of claims 16 – 17, wherein the alignment dowel bore comprises a master dowel bore, further comprising a slave dowel bore defined by the first panel or the second panel and a corresponding alignment dowel carried by the other of the first panel or the second panel.
19. The apparatus of any one of claims 11 – 18, wherein the first panel and the second panel comprise end faces, one of the end faces carries a face magnet and the other one of the end faces carries a corresponding face ferromagnetic segment.
20. The apparatus of any one of claims 11 – 19, wherein exterior surfaces of the first panel and the second panel are substantially flush or otherwise visually contiguous.
21. The apparatus of any one of claims 4 – 19, whereby the magnetic joint substantially restricts ingress and egress of light therethrough.
22. A platform for sequencing DNA comprising an enclosure adapted to shield against dust, light and/or electromagnetic emissions, the platform comprising:
 - a first panel,
 - a second panel, and at least one magnetic panel joint for coupling the first and second panels together to form the enclosure, wherein the at least one magnetic panel joint is configured to restrict the ingress and egress of light.
23. The platform according to clause 22 wherein the magnetic panel joint comprises a ferromagnetic shield.