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| **Type of Material used for Incubator Shell/Insulation material** | **Pros** | **Cons** | **Optimisation** |
| Acrylic | * Attractive visibly * Does not require any manual work/designing as all parts are sculpted and cut using the 3D printer and laser cutter | Expensive  3D printer and laser cutter required to assemble parts | N/A |
| Wood/plywood | * Cheap and available locally * Light and can easily be incorporated in field models | Liable to rot due microorganisms and moisture  Plywood breaks if not carefully handled | Impregnating |
| Glass | * Attractive visibly | Fragile to work with as it breaks easily | N/A |
| Stainless Steel sheet metal | * Rust and corrosion- resistant * Easy to clean | * Expensive * Prone to overheating * Heavy | N/A |
| Polystyrene foam (Styrofoam) box | * Cheap and available locally * Light and can easily be incorporated in field models * Recommended to achieve lower ambient temperatures (< 25 °C), | Favours bacterial and fungal growth  Can be damaged in the process of cleaning/sterilisation  Melts easily in case of over heating | N/A |
| Hard Plastic cooler box | * Cheap and available locally * Easy to clean and sterilize * Can achieve a set temperature of 37 °C to 44.5 °C * Takes less time approximately 45 - 96 minutes to reach set temperature * Energy consumption stands at 0.78 - 1.05 kWh/24h in cold environments (3.5 to 7.5 °C) |  | N/A |
| Cardboard box | * Cheap and readily available * Light and can easily be incorporated in field models | * Not waterproof so easily gets destroyed by moisture * Not heat-resistant so gets burned in case of over heating * Incubator shell has to be shut tight to avoid heat dissipation and this is very difficult to achieve with cardboard boxes without the survival blanket * Not recommended for use at lower ambient temperatures since this set up with similar to slightly * Greater power consumption observed | Insulating with polystyrene foam |