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(57) Abstract :  
 A system 100 for metal cladding over a substrate 204 using a heating device 102 includes a microwave valve 104, a quartz glass 202, a mode stirrer, a vacuum pump 212 to remove air from the chamber 106 and an inlet to supply inert gas into the device 102. The top surface of substrate 204 is spread with clad powder 206 and susceptor material 210 is spread over a separator 208 which is placed over the clad powder 206, to absorb the microwave energy and transfer the heat energy quickly to melt the clad powder 206 placed over substrate 204 to form a layer of clad material 206.

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