



## Spacecraft Package Housing Design and Analysis

U R Rao Satellite Centre (URSC) of Indian Space Research Organization (ISRO) has developed Spacecraft Package Housing Design and Analysis. Design and analysis methods developed at URSC is being used for spacecraft and payloads for various subsystems viz. Power packages, Data handling packages and payloads.



## **Salient Features**

- Housing material is low density alloy with high strength and it is ideal for aerospace application.
- Modular configuration and number of modules are selectable.
- + Ease of assembly and disassembly.
- + Motherboard concept is adopted to remove inter module harness.
- + Micro heat pipes for thermal management to withstand on high heat loads.
- + Designed to Meet Launch load requirements (Vibrations & Shocks).
- + EMI/EMC compatible.
- + The housing designs are scalable to meet different packages requirement with minimal modification.

## **Major Specifications**

+	No. of module	: 1-14
+	Mounting configuration	: Horizontal/ Vertical
+	PCB size	: 50X50 mm to 400X400 mm
+	Mass of the package	: 1- 16 Kg
+	Thermal Management Capacity	: 1-80 W
+	Mother board size	: 100X100mm to 250X250mm.
+	Connector Type	: Micro D, ITT type 90 deg bend

## **Technology Transfer**

URSC/ISRO offers to provide consultation on Spacecraft Package Housing Design and Analysis by URSC to industries in India with adequate experience and facilities. Industries interested in obtaining knowhow may write giving details of their present activities, infrastructure and facilities.

