

Choosing Anthropometric variables and dimensions:

Anthropometric variables (with their dimension) for our workstation design are listed below—

- 1. Stature:** We choose 50th percentile stature (171.725 cm). So that, average people can reach it.
- 2. Hip Height:** We choose 95th percentile hip height (104.1 cm). So that, when smaller people sit, they can manage their leg.
- 3. Sitting Height:** We choose 95th percentile sitting height (92 cm). So that, everyone can sit.
- 4. Sitting Eye Height:** We choose 50th percentile sitting eye height (74 cm). So that, average people can maintain their eye position.
- 5. Sitting Shoulder Height:** We choose 95th percentile sitting shoulder height (67.2 cm). So that, everyone can sit.
- 6. Sitting Elbow Height:** We choose 95th percentile sitting elbow height (25.51 cm). So that, smaller height people can place their hand on the table.
- 7. Sitting Thigh Height:** We choose 50th percentile sitting thigh height (14 cm). So that, smaller people can adjust their legs when they sit.
- 8. Sitting Knee Height:** We choose 50th percentile sitting knee height (54.3 cm). So that, average height people can sit.
- 9. Sitting Popliteal Height:** We choose 50th percentile sitting popliteal height (44 cm). So that, maximum people can sit without any difficulty.
- 10. Shoulder Elbow Length:** We choose 95th percentile shoulder elbow length (39.525 cm). So that, small people can sit with comfort.
- 11. Elbow-Fingertip Length:** We choose 50th percentile elbow-fingertip length (45 cm). So that, any task can be effectively performed by a significant number of people.
- 12. Forward Grip Reach:** We choose 50th percentile forward grip reach (69.4 cm). So that, maximum people can easily take anything from the table.
- 13. Arm Length, Vertical:** We choose 5th percentile arm length, vertical (67.95 cm). So that, maximum people can easily do any work.
- 14. Abdominal Depth, Sitting:** We choose 50th percentile abdominal depth, sitting (22.83 cm). So that, they can sit with comfort.
- 15. Buttock-Popliteal Depth, Sitting:** We choose 95th percentile buttock-popliteal depth, sitting (51.05 cm). So that, smaller height people can easily manage to sit.

16. Shoulder Breadth (Bideloid): We choose 95th percentile shoulder breadth (bideltoid) (55 cm). So that, people with the low shoulder can sit with comfort.

17. Hip Breadth, Sitting: We choose 95th percentile hip breadth, sitting (47.025 cm). So that, anyone can sit.

18. Hand Length: We choose 5th percentile hand length (17 cm). So that, anything on the table is easily accessible to the maximum number of people.