

Project -2

Bedside Storage for hospital

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Guide :
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Introduction

Hospital range



Hospital needs

- Doctors & Medical staff
- Medical equipments
- Hospital furniture *

Focus

Bedside storage



Survey

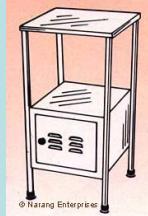
End users:

- patient
- Doctor
- Medical staff
- Patient's caretaker



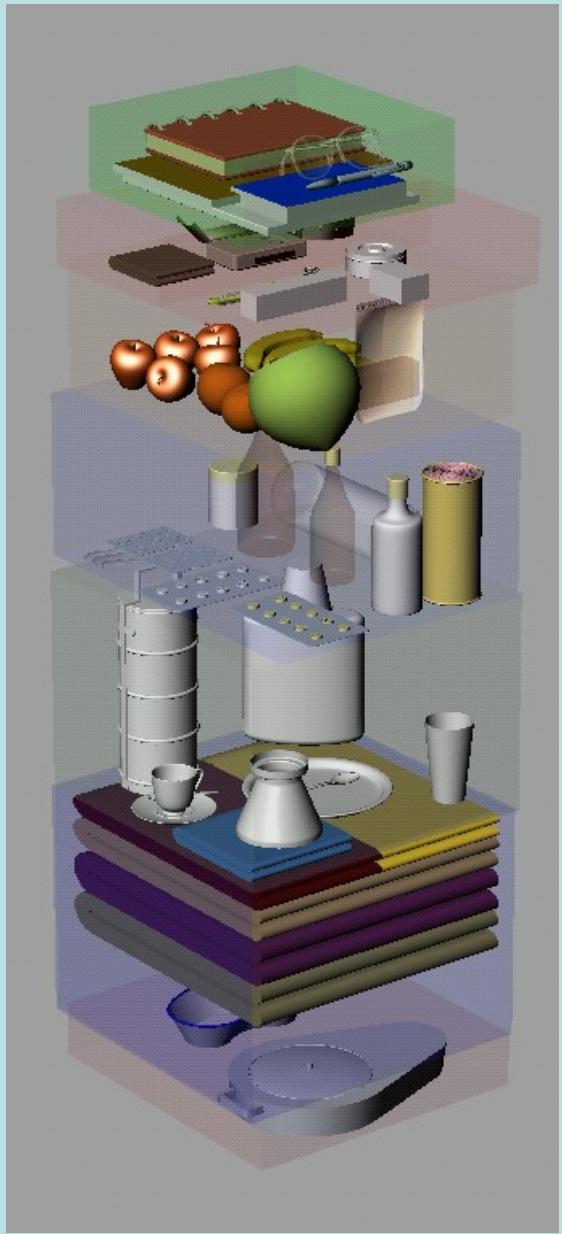
Market survey

- Available models (Indian & imported)



- Manufacturer
- Transportation

Space layout & volumetric study



Problems & scope of design

- Movement
- Space
- Visibility
- Accessibility
- Top surface
- Cleaning
- Maintenance
- Manufacturing
- Transportation
- Aesthetics

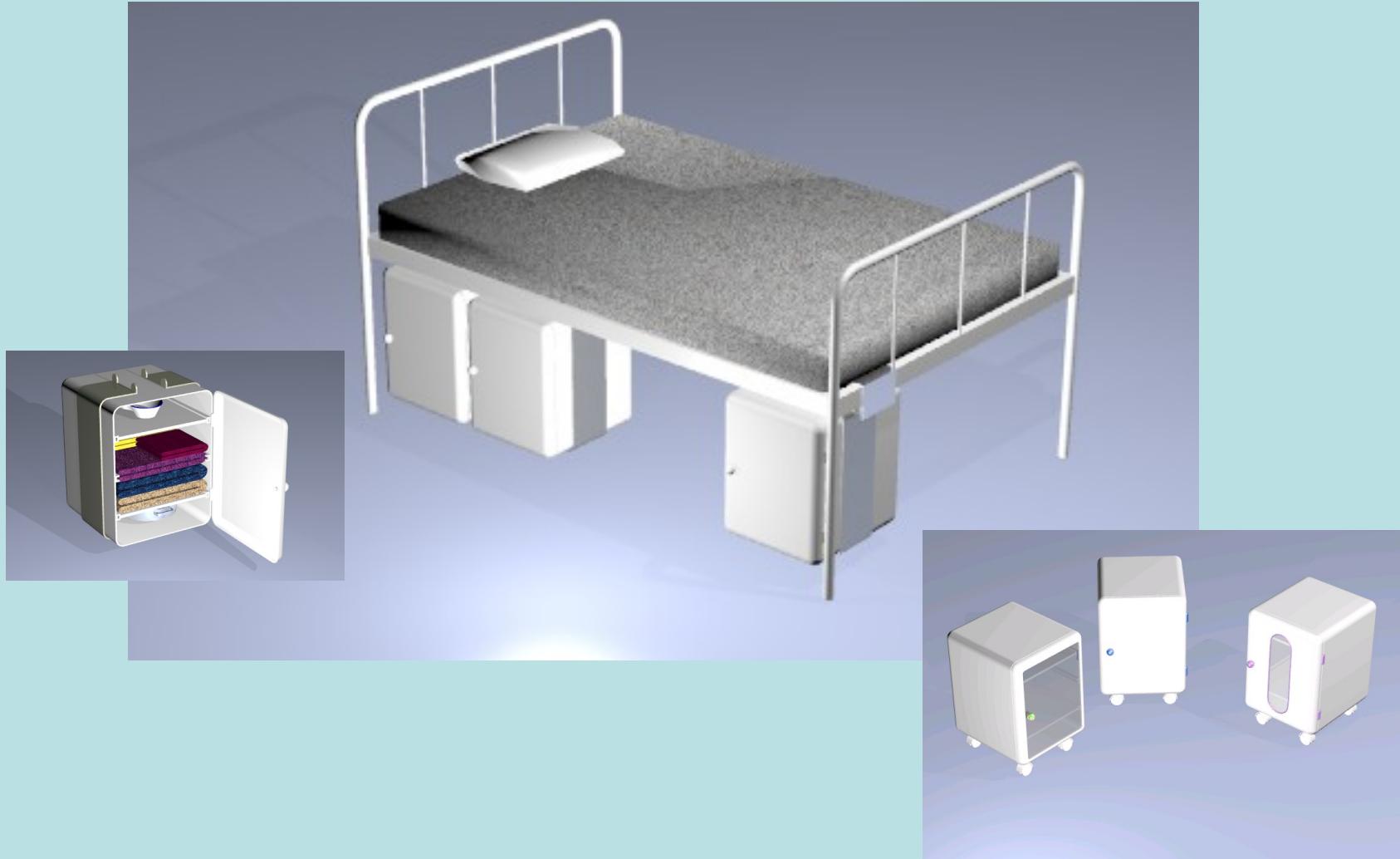


Product brief

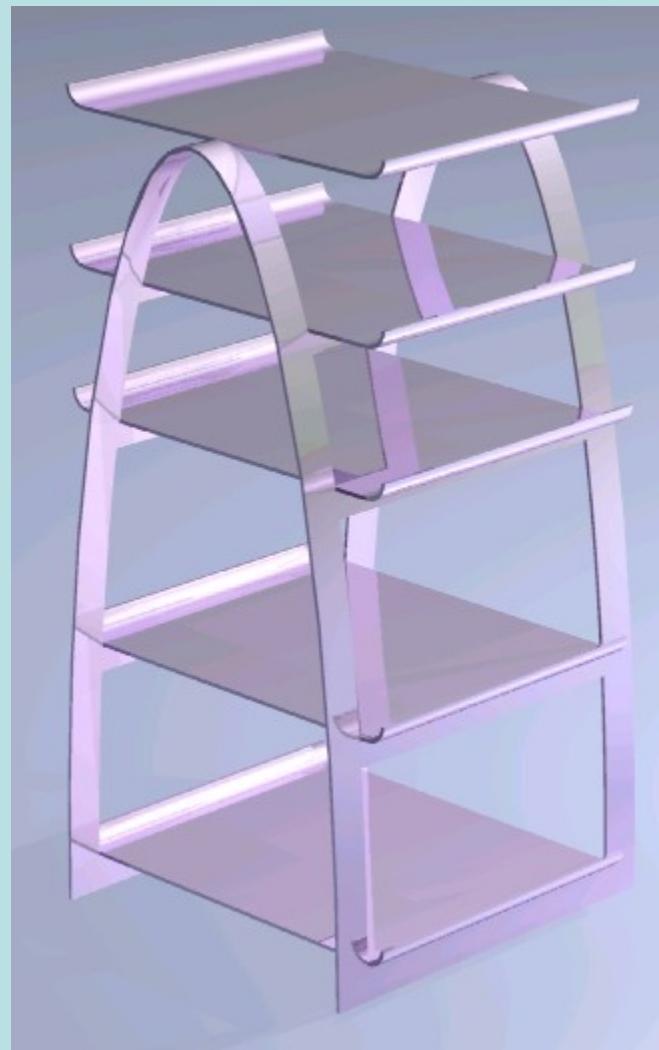
- Space
- User
- Manufacturing
- Maintenance
- Transportation
- Aesthetic

Concept generation

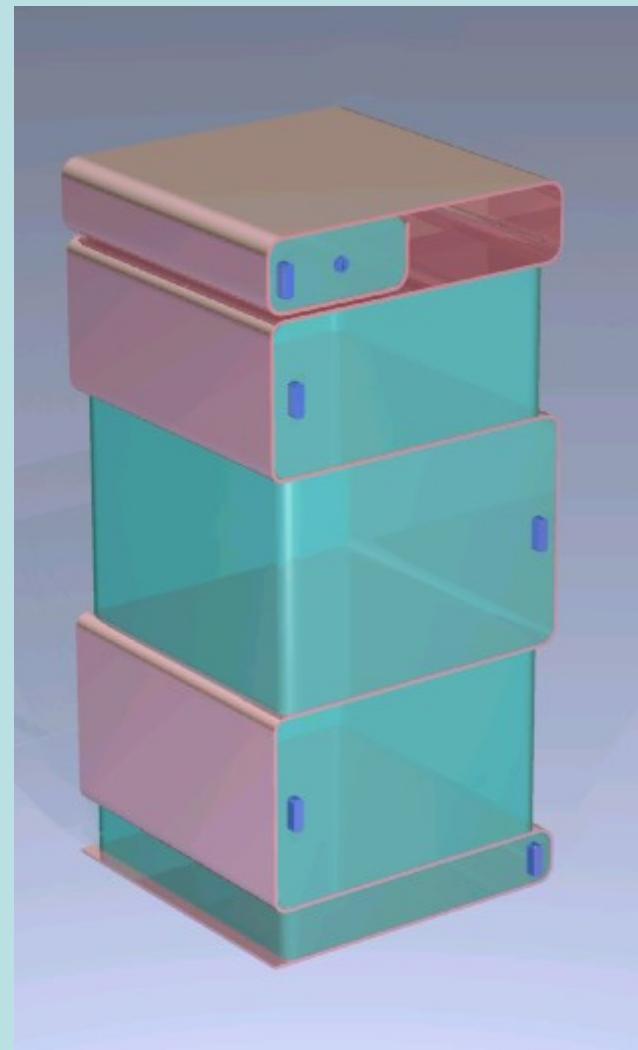
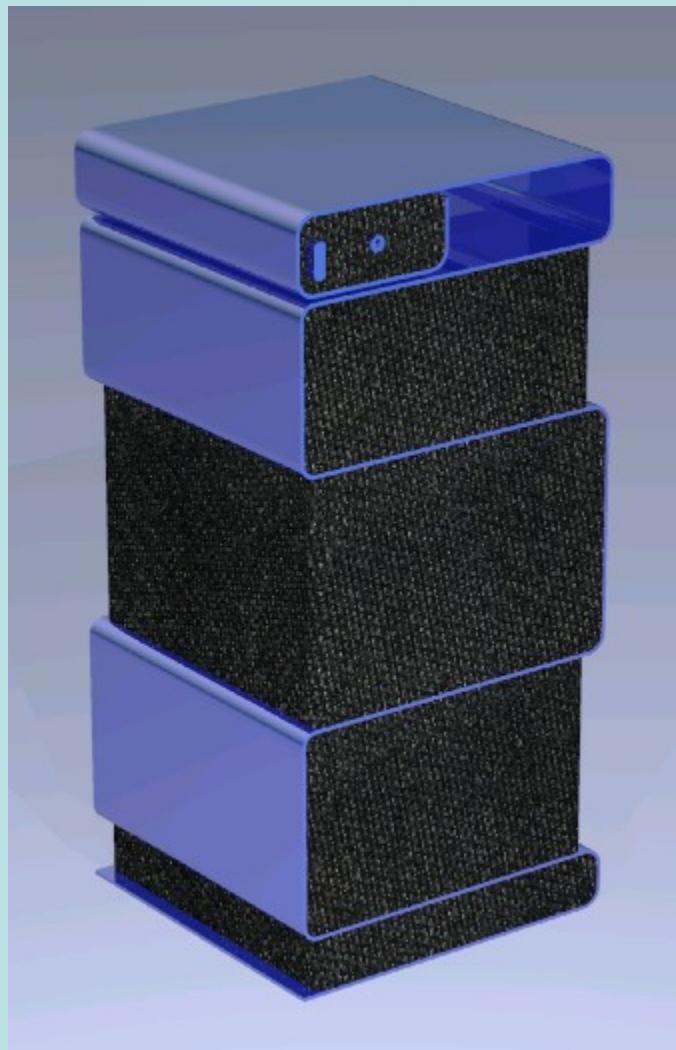
Concept 1)



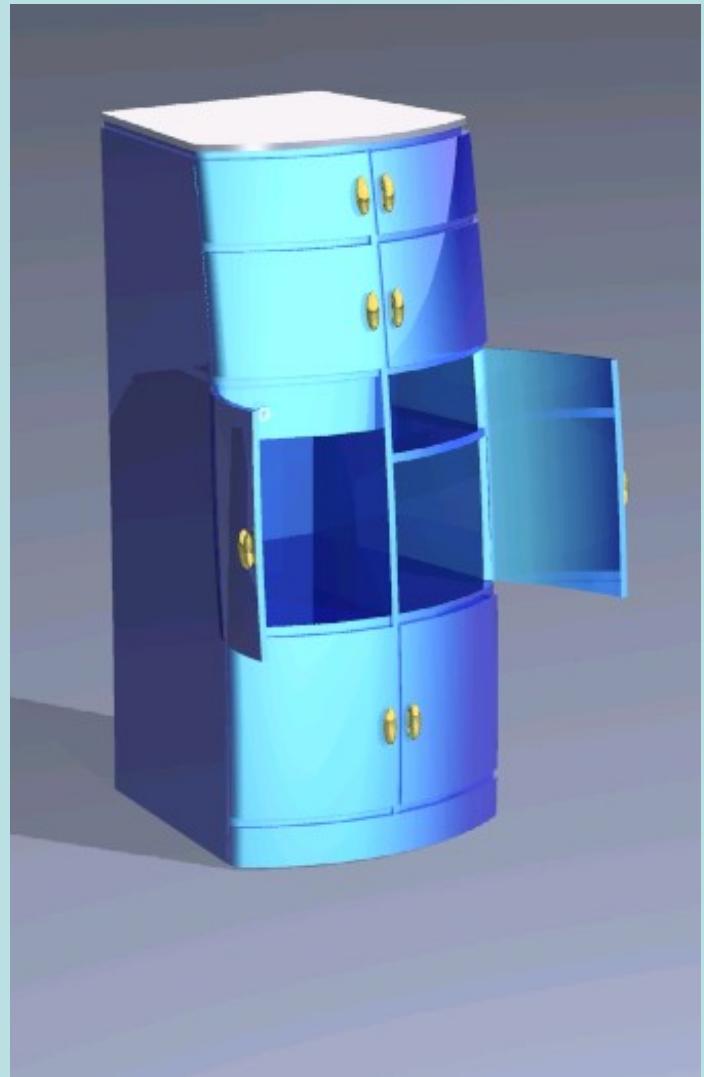
Concept 2)



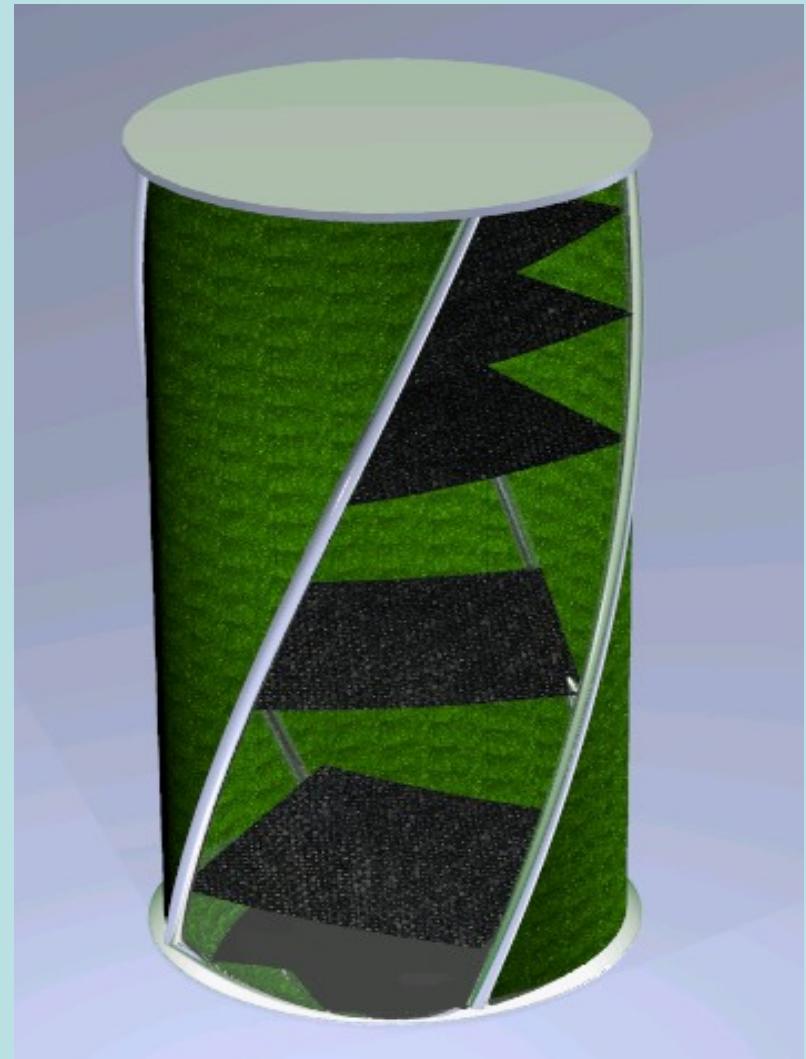
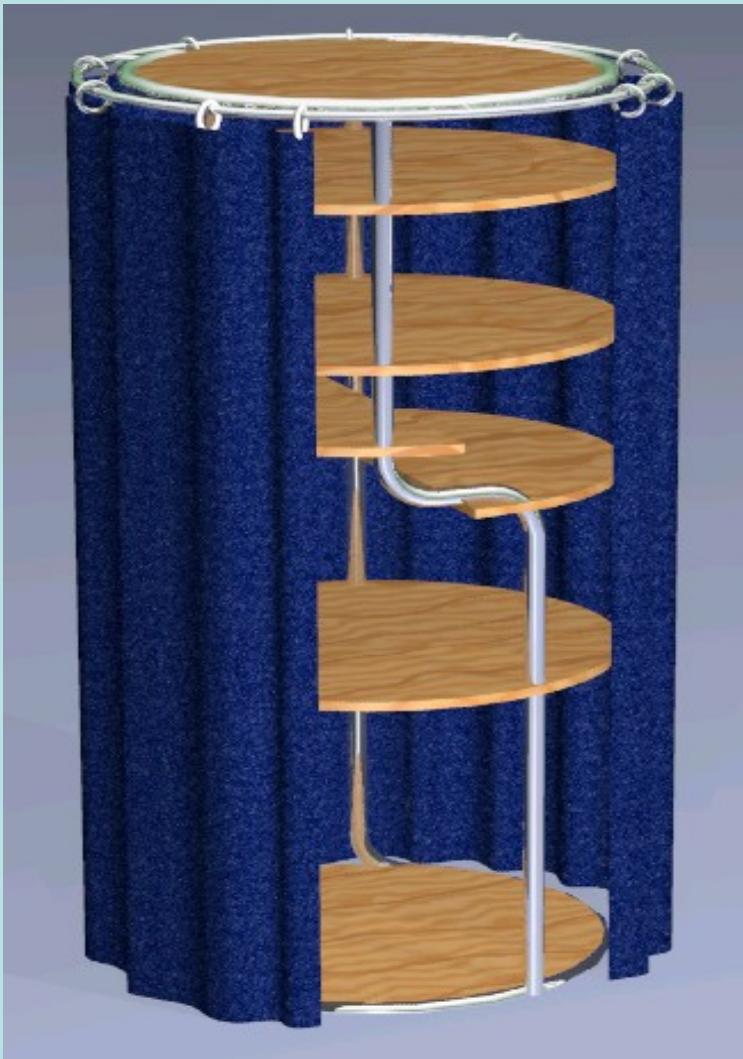
Concept 3)



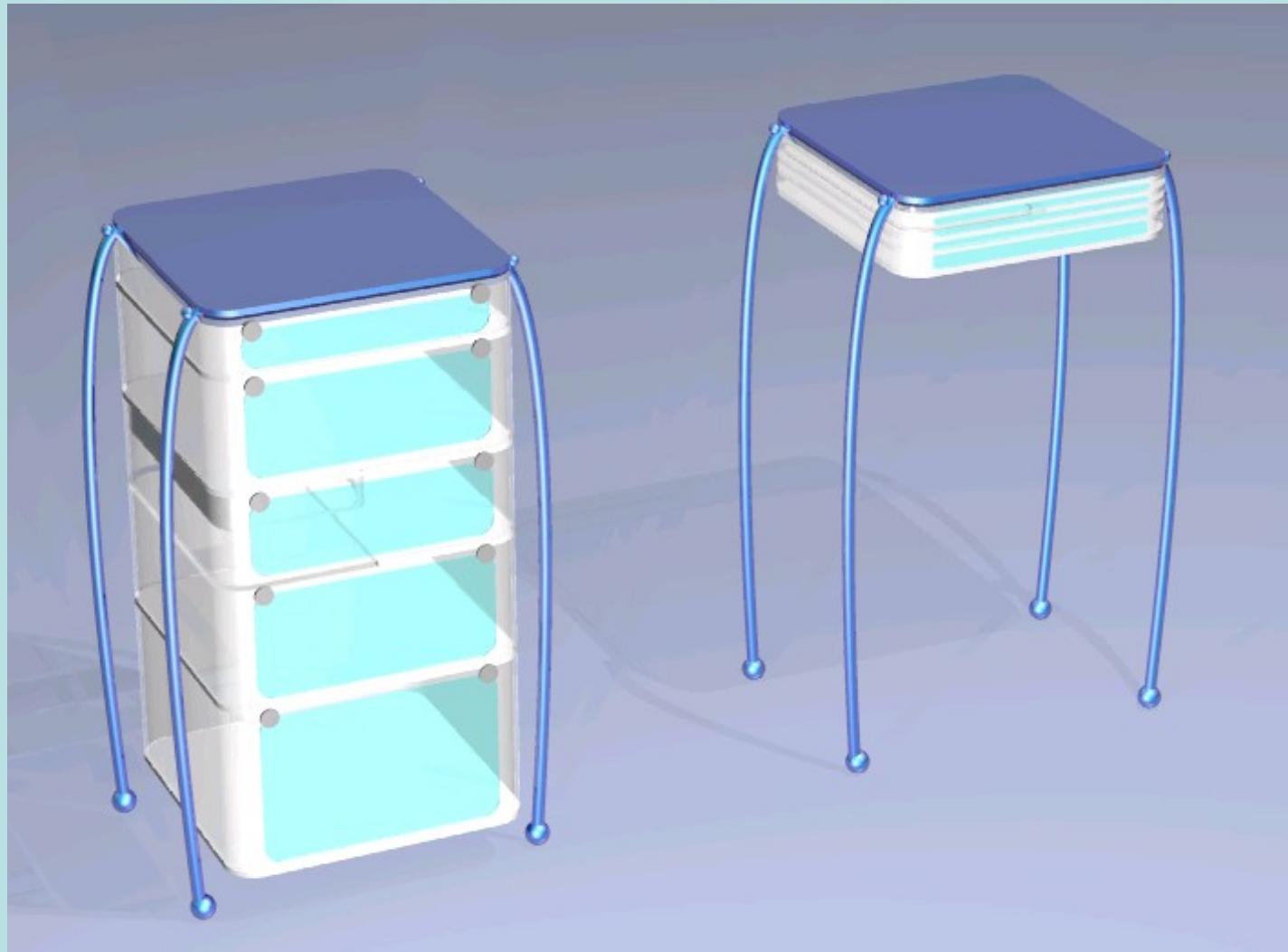
Concept 4)



Concept 5)



Concept 6)



Concept 7)



Concept 8)



Concept evaluation

Parameters	C1	C2	C3	C4	C5	C6	C7	C8
Storage 25 %	20	15	25	25	20	15	22	25
Accessibility 15 %	5	15	10	12	12	8	12	15
Visibility 10 %	2	10	4	4	6	10	8	8
Hygiene &safety 10 %	3	8	6	10	8	10	6	10
Mobility 5 %	3	4	4	4	4	4	4	4
ManSfg. Ease 10 %	6	10	6	6	6	8	7	8
Assembling ease 10 %	4	10	4	4	6	8	9	5
Transportation 5 %	3	1	1	1	3	4	5	3
Cost 5 %	1	5	2	3	4	5	5	3
Aesthetics & semantics 5 %	1	2	3	3	5	2	4	5
AVERAGE	48	80	65	72	74	74	82	86

Final concept



Refinement of final concept

Problems in final concept

Manufacturing

- Cutting of sheet metal
- Bending of sheet metal
- Joinery detailing
- Stability
- Sharp edges treatment
- Rigid looks
- no closed space

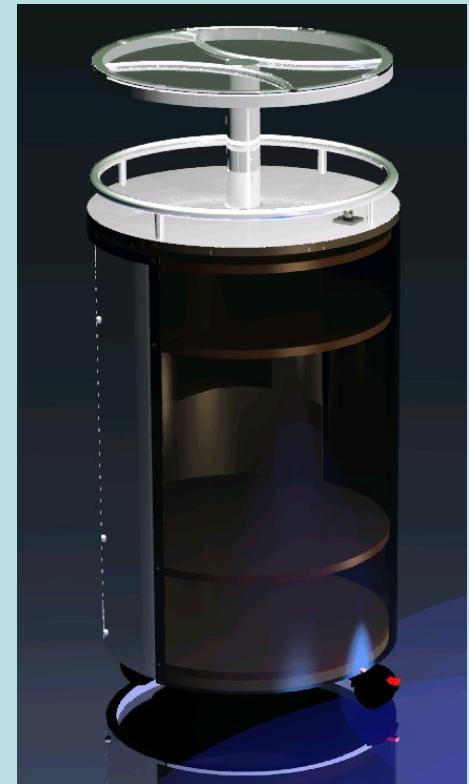
Design variation



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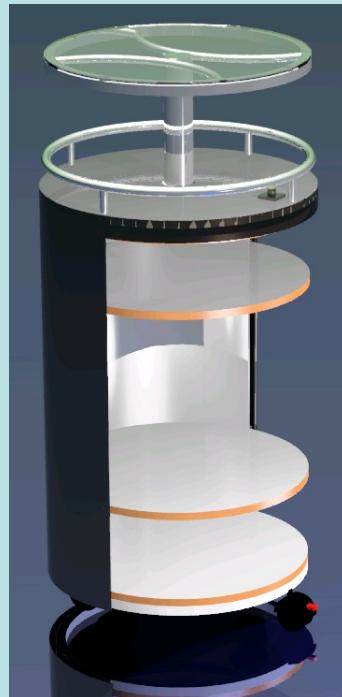
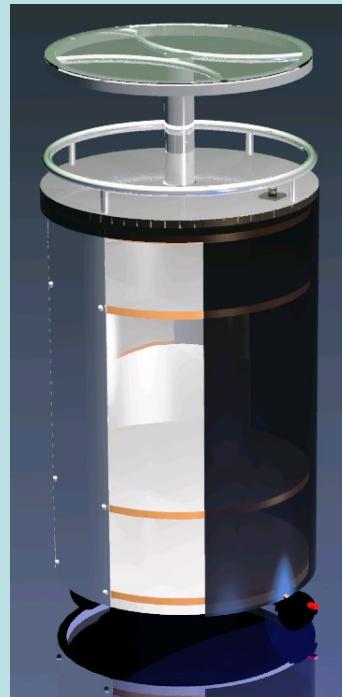
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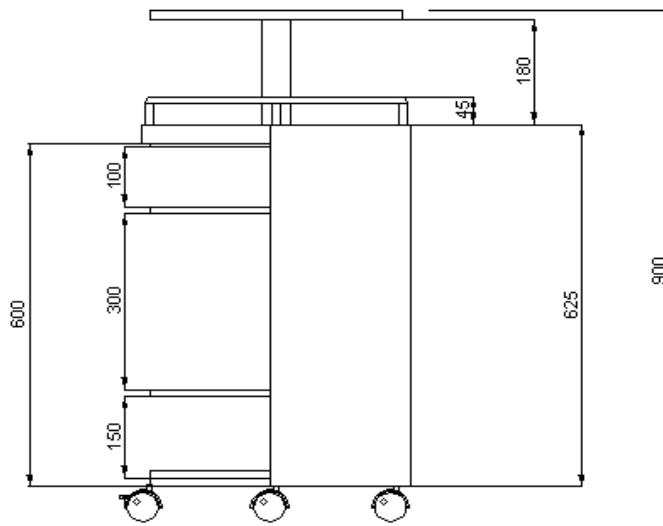
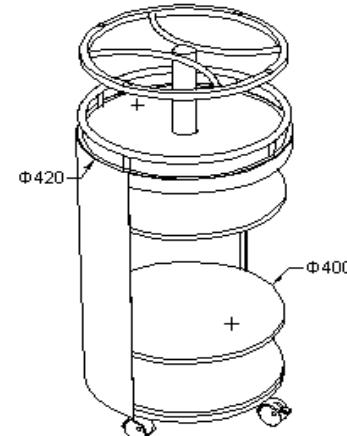
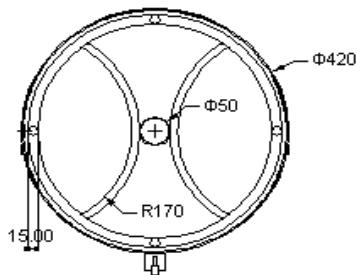
Final design



Final design

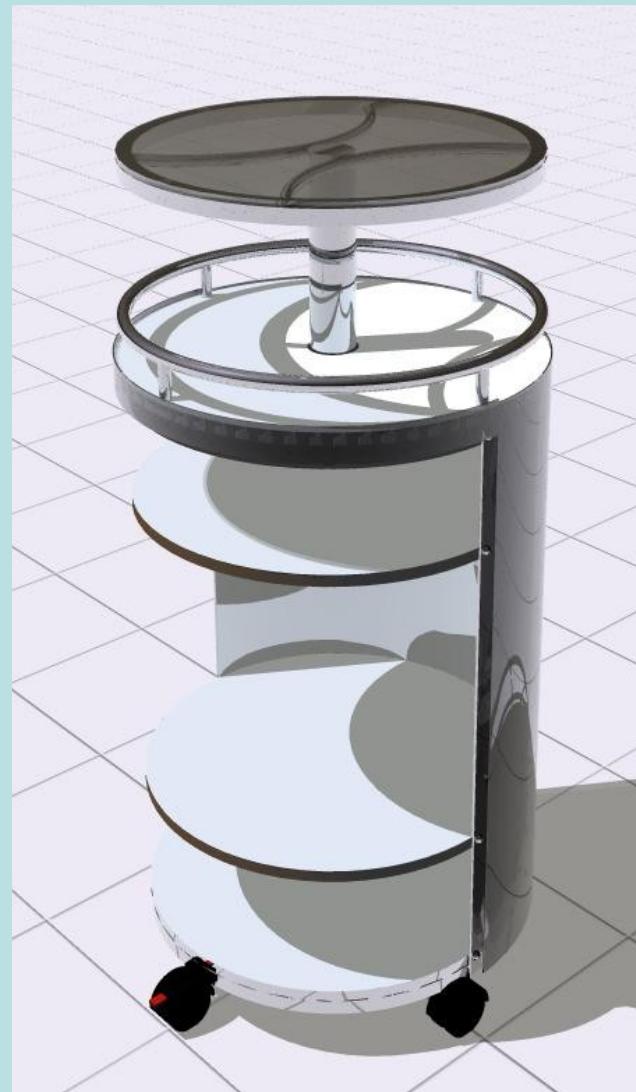


Drawing



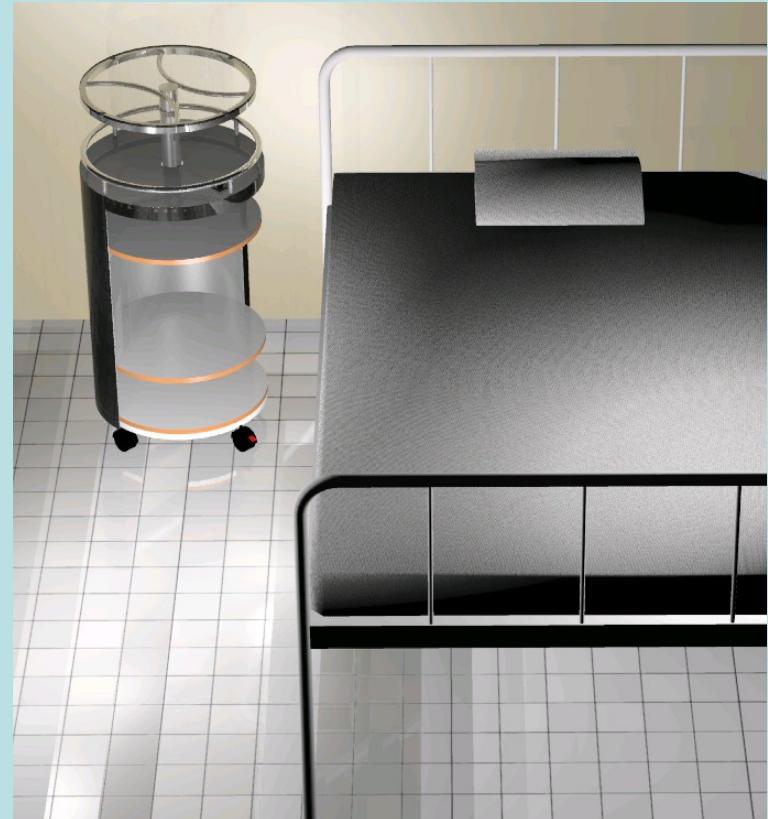
Materials

- Stainless steel
- Ecolene
- Glass
- Acrylic



Features of final design

- Free movement & orientation
- Closed space
- Easy to open & close
- Easy accessibility
- Sufficient visibility
- Top surface
- Easy to clean & less maintenance
- Safety

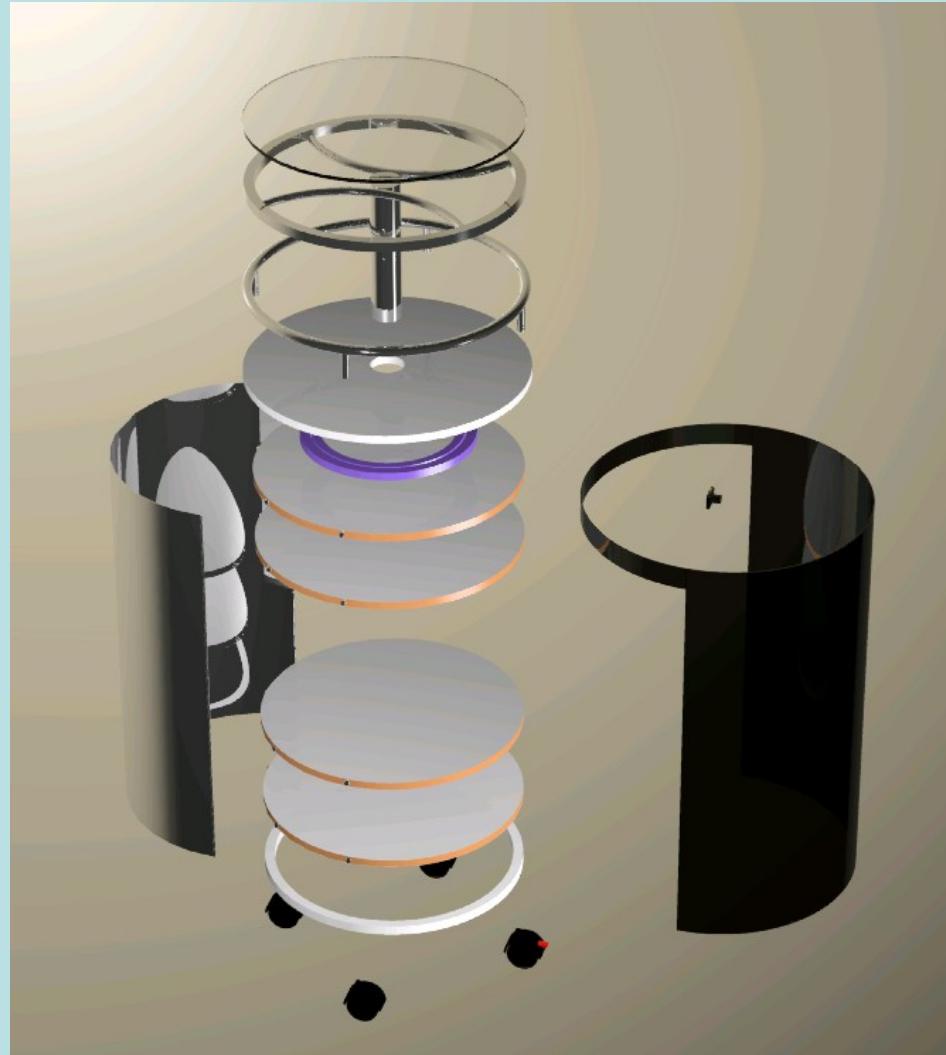


Features of final design



Features of final design

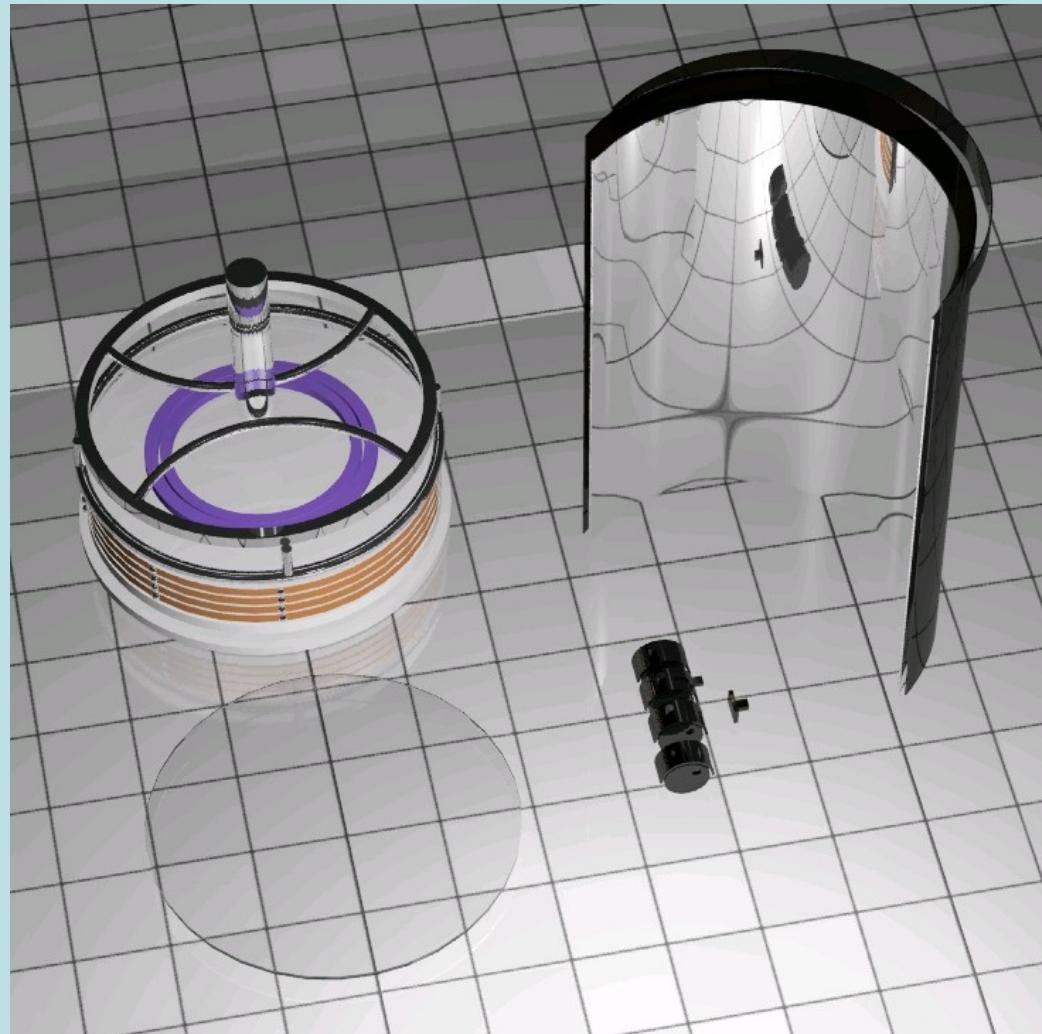
- Manufacturing
- Mass production



Features of final design

Transportation

- Easy to manufacture
- Stackable
- Easy to assemble



Features of final design

- Aesthetics



Features of final design

- Cost

Cost is Rs 5000/-
including 20 % profit margin

Mass production: Rs 3800/-

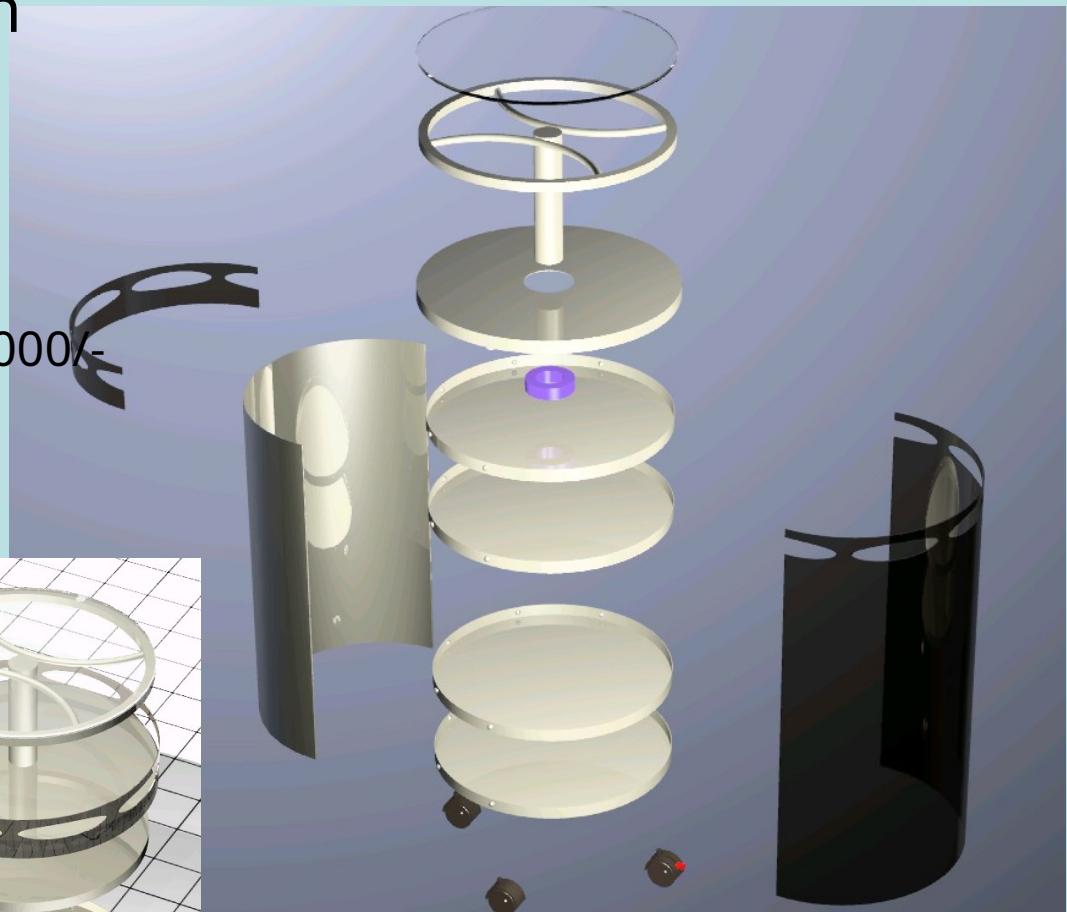
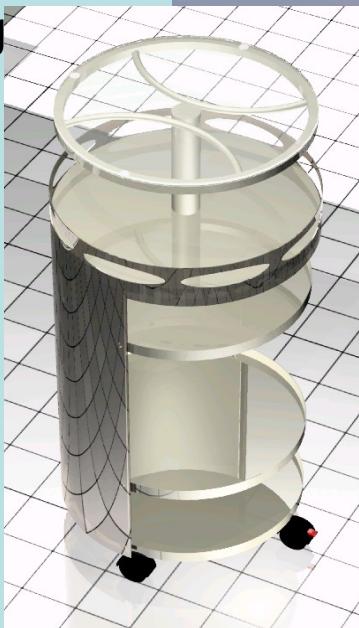


Features of final design

Change in material & design detailing

Cost reduction : Rs 3000-2000/-

Stainless steel plates
or
Fiber glass molding



Evaluation of final design

Storage 25%	25
Accessibility 15%	14
Visibility 10%	8
Hygiene & safety 10%	10
Mobility 5%	5
Manufacturing ease 10%	9
Assembling ease 10%	8
Transportation 5%	5
Cost 5%	3
Aesthetics 5%	5
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Average	92



Thank you

