

# Teaching Culture through Storytelling

Design Thinking & Innovation  
Case Study

Section: C3, Week 3



D'source Project



Open Design School



MoE's Innovation Cell



**THINK!  
DESIGN**

# **Design Thinking & Innovation (DT&I)**

Section: C3.0

Week 3



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# **Design Thinking & Innovation (DT&I)**

**Prof. Ravi Poovaiah**  
IDC School of Design, IIT Bombay



# DT&I Case Study

## C3 Teaching Culture through Storytelling

Module C3:

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C3.1

# Culture through Storytelling



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Project 3

# Introducing Culture to Children through Storytelling

*Under guidance of Prof Ravi Poovaiah*

*Project by Astha Kabra*  
126330006, Interaction Design  
Industrial Design Centre, IIT Bombay

A black circle containing the text "THINK! DESIGN" in yellow, bold, sans-serif capital letters.

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Culture... is that complex whole which includes knowledge, beliefs, arts, morals, law, customs, and any other capabilities and habits acquired by as a member of society.”

Sir Edward B. Tylor's

Cultural Anthropologist



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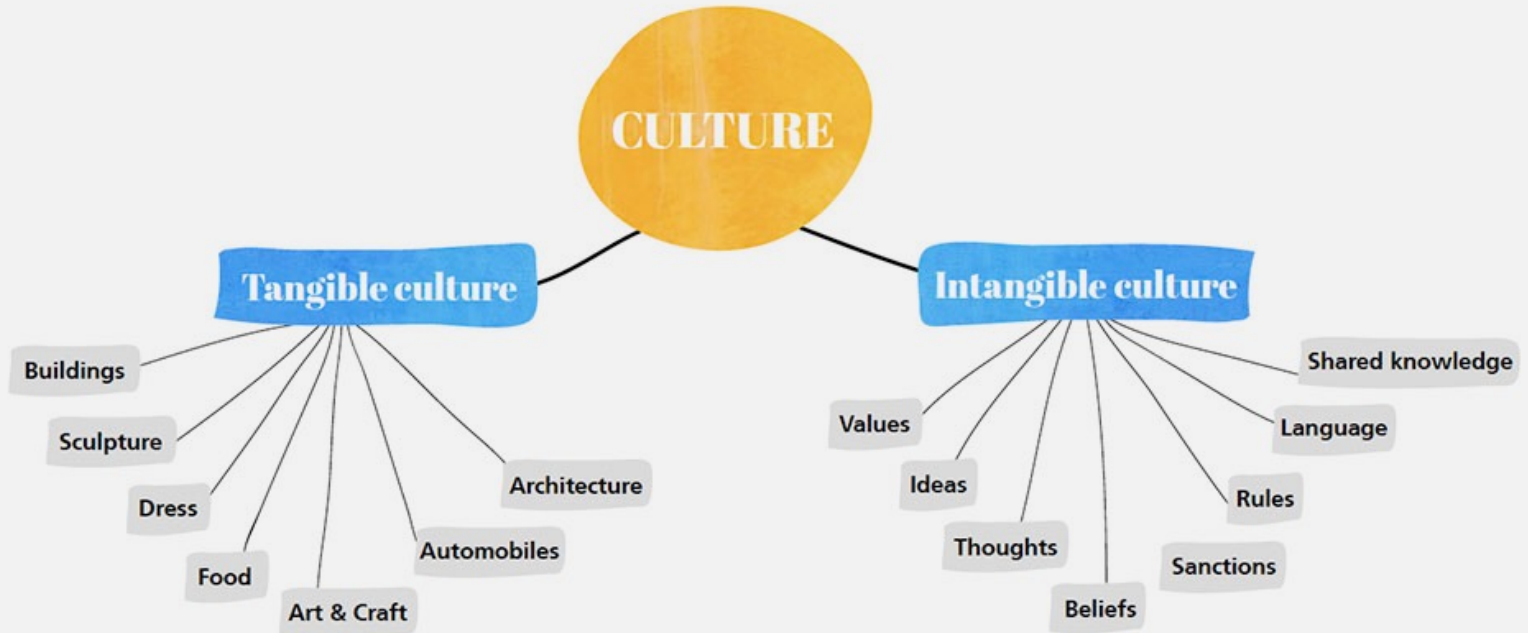
#### CONCEPT OF CULTURE

Culture is a way of life.

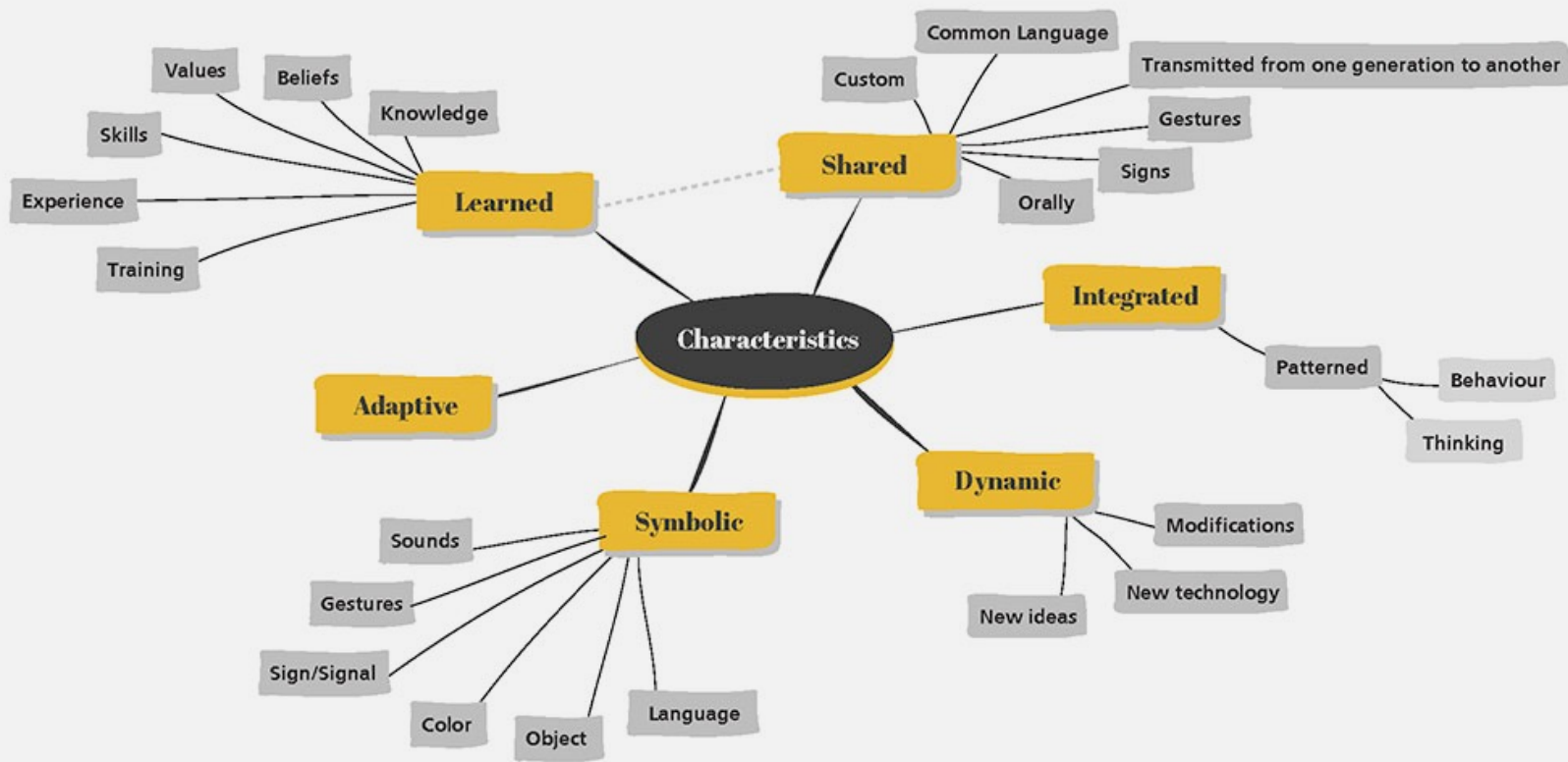
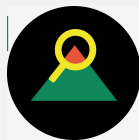
It's representation of the way in **which we think** (value) and **do things** (behavior) and the material products they produce.



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**THINK!  
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BELIEFS

TRADITION

LANGUAGE

STORIES

RELIGION

culture

MUSIC

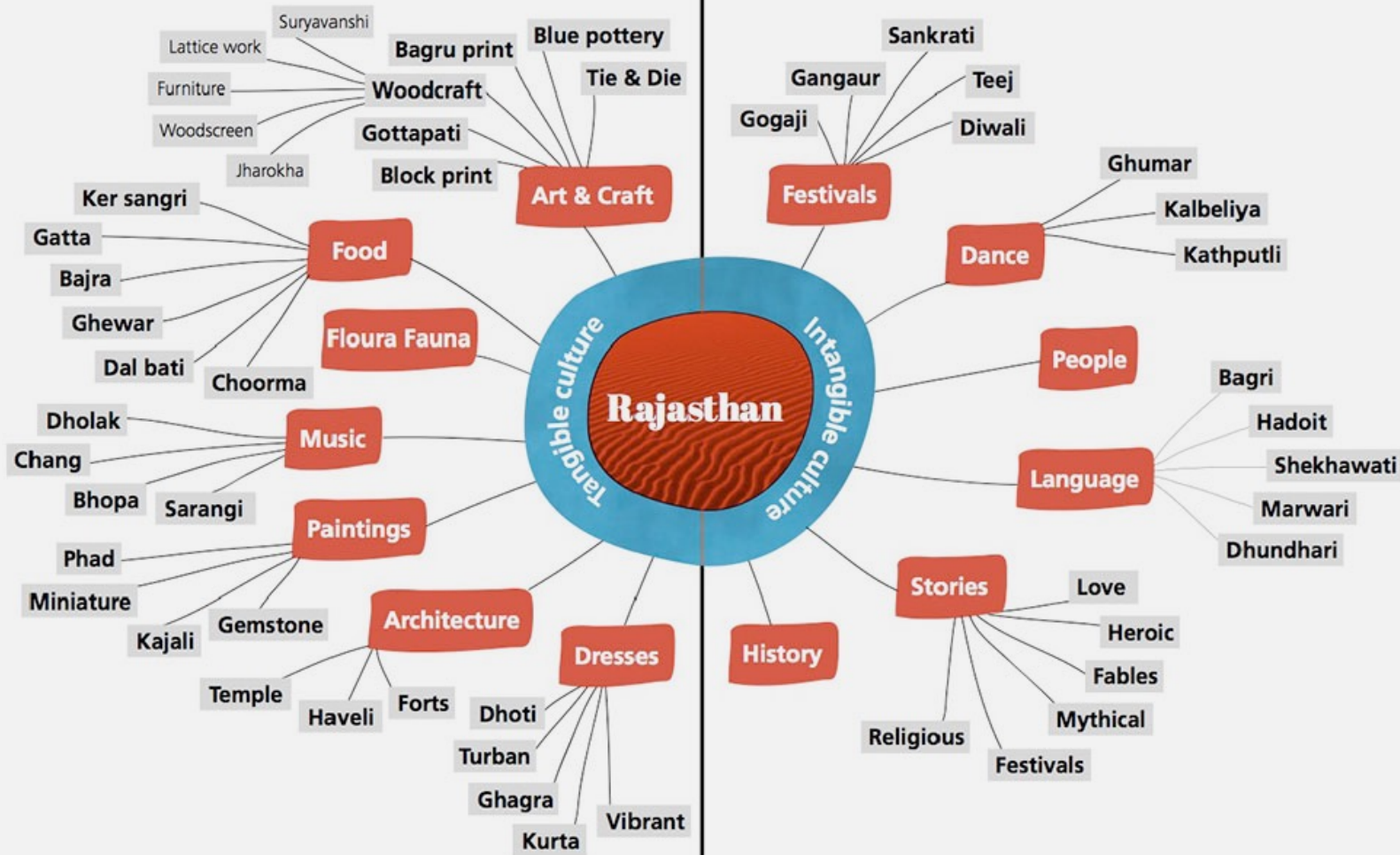
CLOTHES

IDENTITY

FOOD

HERITAGE

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quest è il caso in cui non sono i figli a far affondire le idee, quanto più è, più sono molti i figli che si sono

## धुम्रपान निषेध

दिल्ली की मुख्यमंत्री शीला दीक्षित ने अब खेलों से जुड़े निर्माण कार्य में लगे

## सूचना और प्रसारण

Il presente è un'opera di fantasia. Tutti i nomi e le situazioni sono inventati con la sola finalità di rendere più interessante la lettura. Sono vietate espressamente tutte le ristampe o le riproduzioni non autorizzate dalla casa editrice.

## जट रिस्की, आफ्टर विस्की





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## Importance

Many families along with their children migrate from their home towns to urban cities, while trying to fit in the urban lifestyle they ignore their own culture and native language.

Children who are not completely aware about their own culture can face problems like identity loss or alienation from their grandparents or other family members.

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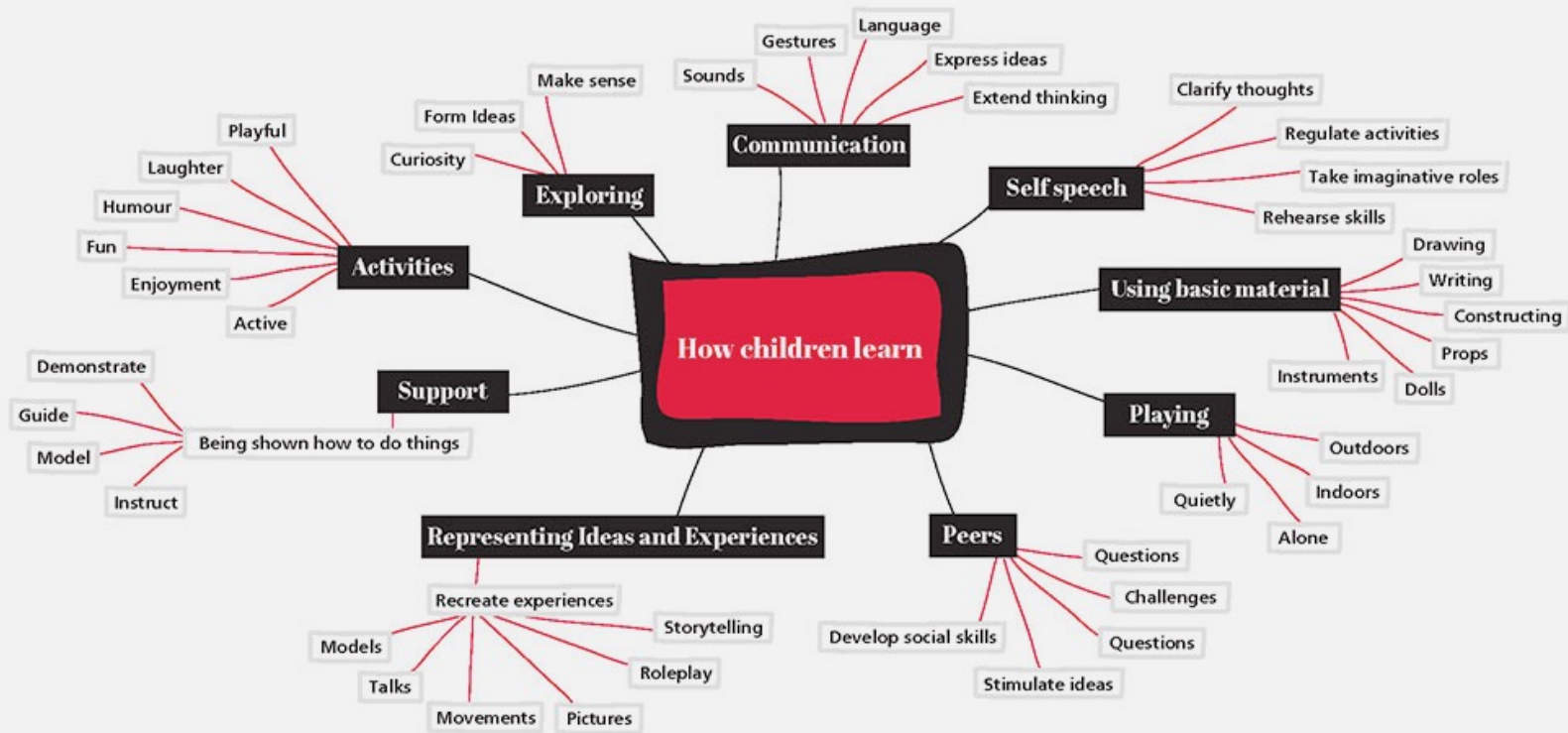
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## Project Brief

The aim is to promote, foster and propagate the cultural heritage and value system of Rajasthan amongst children.

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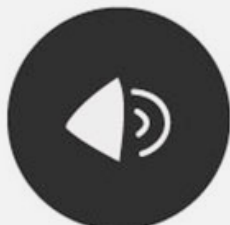
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## LEARNING STYLES



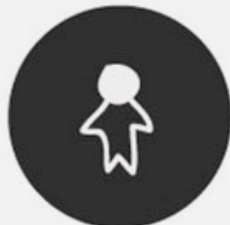
**VISUAL**  
(spatial)



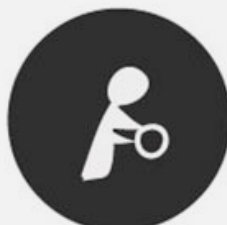
**AURAL**  
(auditory/musical)



**SOCIAL**  
(interpersonal)



**SOLITARY**  
(intrapersonal)



**PHYSICAL**  
(kinesthetic)



**LOGICAL**  
(mathematical)



**VERBAL**  
(linguistic)



# AGE GROUP

piaget stages of cognitive development

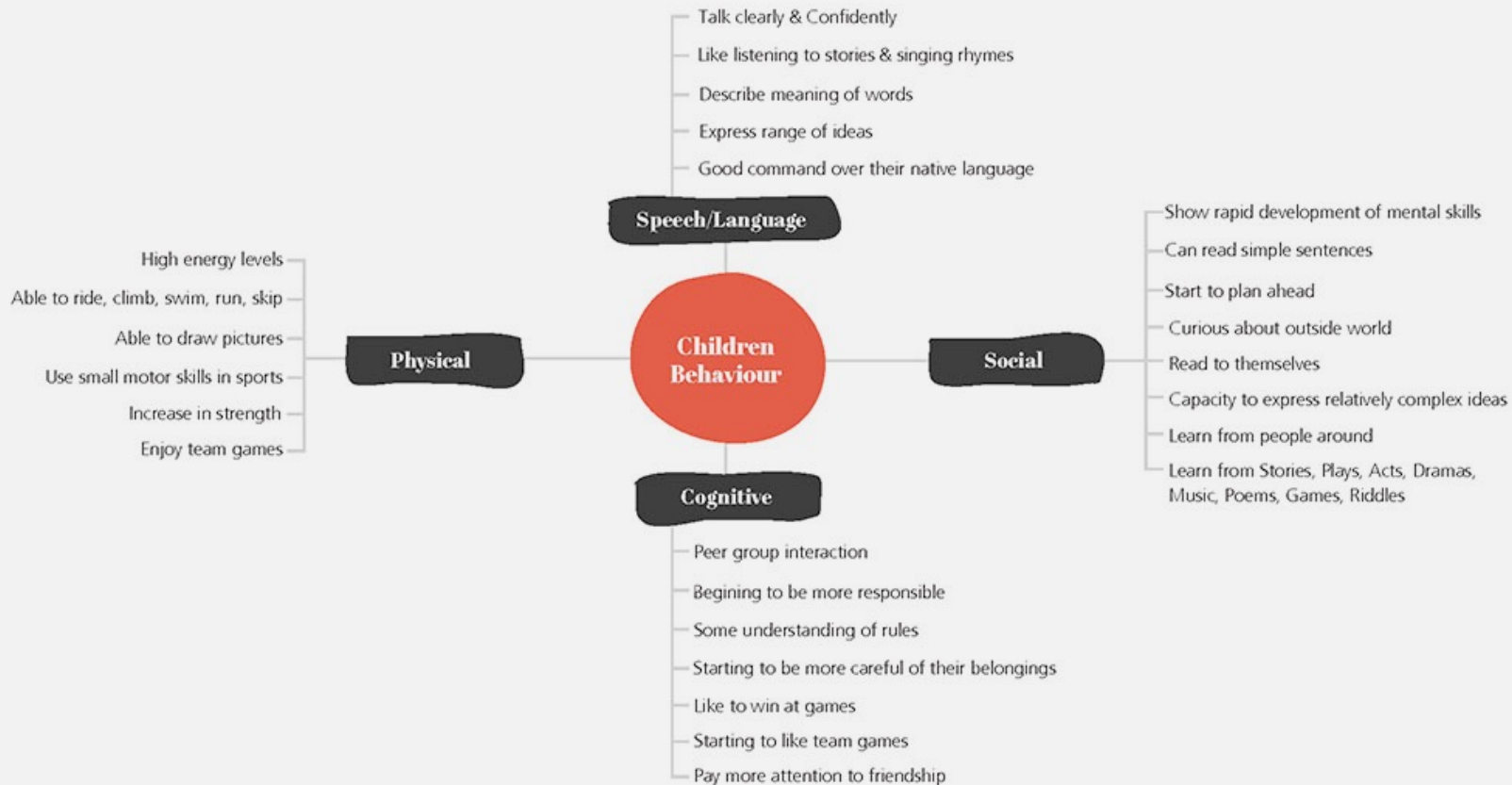


4-7 years old

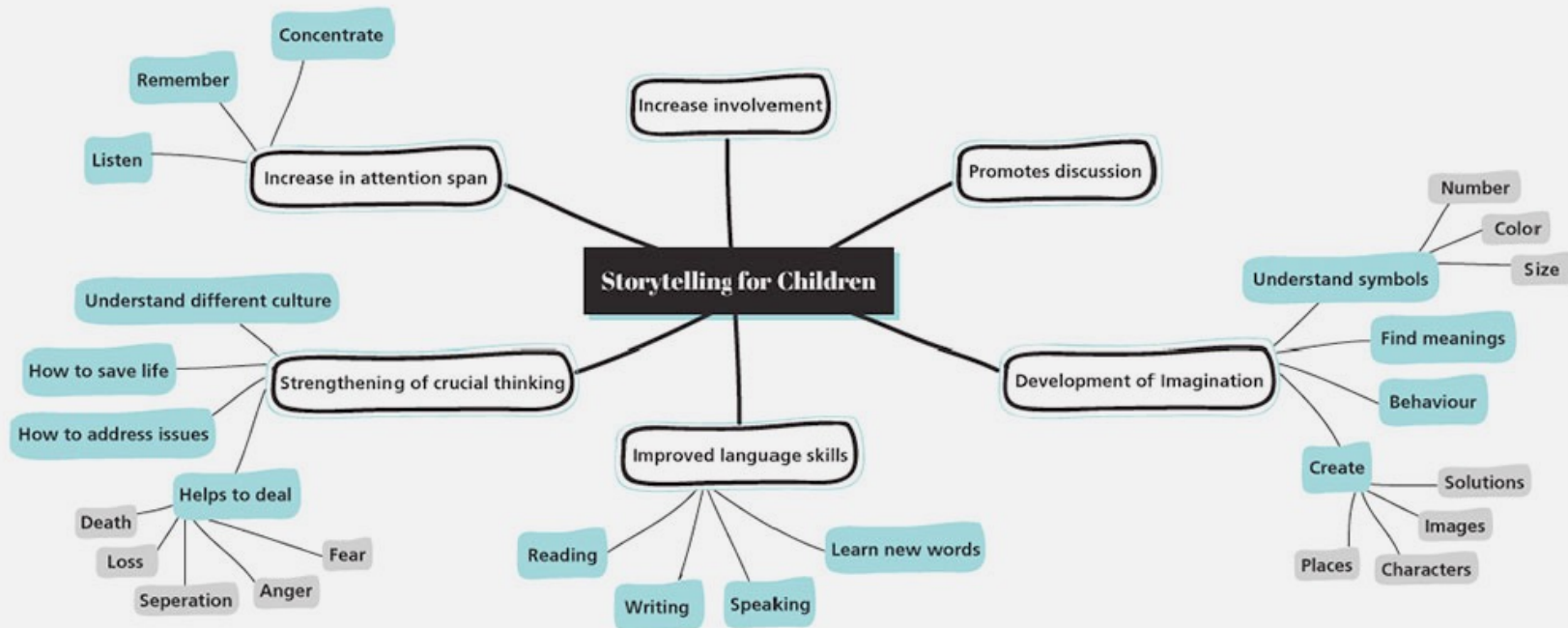
## Intuitive Phase

- Children at this stage tend to be so certain of their knowledge.
- Their thinking becomes more logical.
- They tend to become very curious and ask many questions.
- Concepts attached to concrete situation - Time, Space and Quantity are understood and can be applied.

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**THINK!  
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## Storytelling in Rajasthan



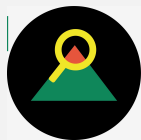
Kathputli (Puppets)



Phad Painting (Scroll)



Kaavad (Mobile Temple)



## Kaavad

- The term kaavad comes from 'kivad' meaning door
- Numerous hinged panels that open outwards
- Multiple narratives
- To make a wish, or celebrate the birth of child or offer there gratitude for the fulfillment of the wish.



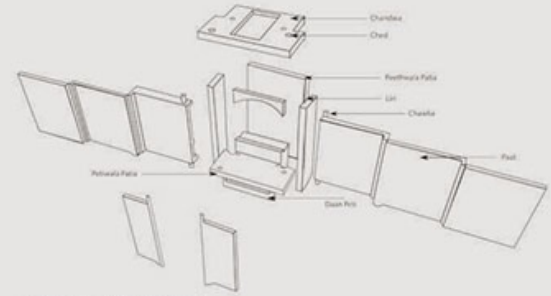


## Kaavad

# Structure and Order

- Usually one foot high and has 12 to 16 panels or pats that are hinged together.
- Each panel has a name and the images drawn on the panels have predefined locations.
- At the base is a donation box on which it states the donation will be used for feeding cows.

THE KAAVAD TRADITION OF RAJASTHAN



4: Kaavad parts as identified by the makers



5: Outer shrine with Vishnu, Krishna and Kankarabhai in hidden or open past

6: Inner shrine with Zam Sika Lakshman in revealed through the open or hidden past



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## Projects inspired by Kavaad:



**Kaavad: Traveling Shrine: Home**

Gulam Mohammed Sheikh



**Home**

Nina Sabnani



## Children and Technology:

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### INTERACTIVE PUPPETRY

<http://design-io.com/projects/PuppetParadeCinekid/>



### FUNKY FOREST

<http://design-io.com/projects/FunkyForestSAM/>



### WEATHER WORLDS

<http://design-io.com/projects/WeatherWorlds/>

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# IDEATION



## CONCEPT 1

# Kevad

Unfold the Stories

- The cover of tablet with narrative which can be explored and learned by unfolding each and every flap through auditory and visual inputs.
- Allows to interpret and explore new stories.
- The story goes through several variations as tablet will have different stories integrated in it.
- Interactivity with combination of sound, visuals and narrative on pressing the touch points,.



## Kevad

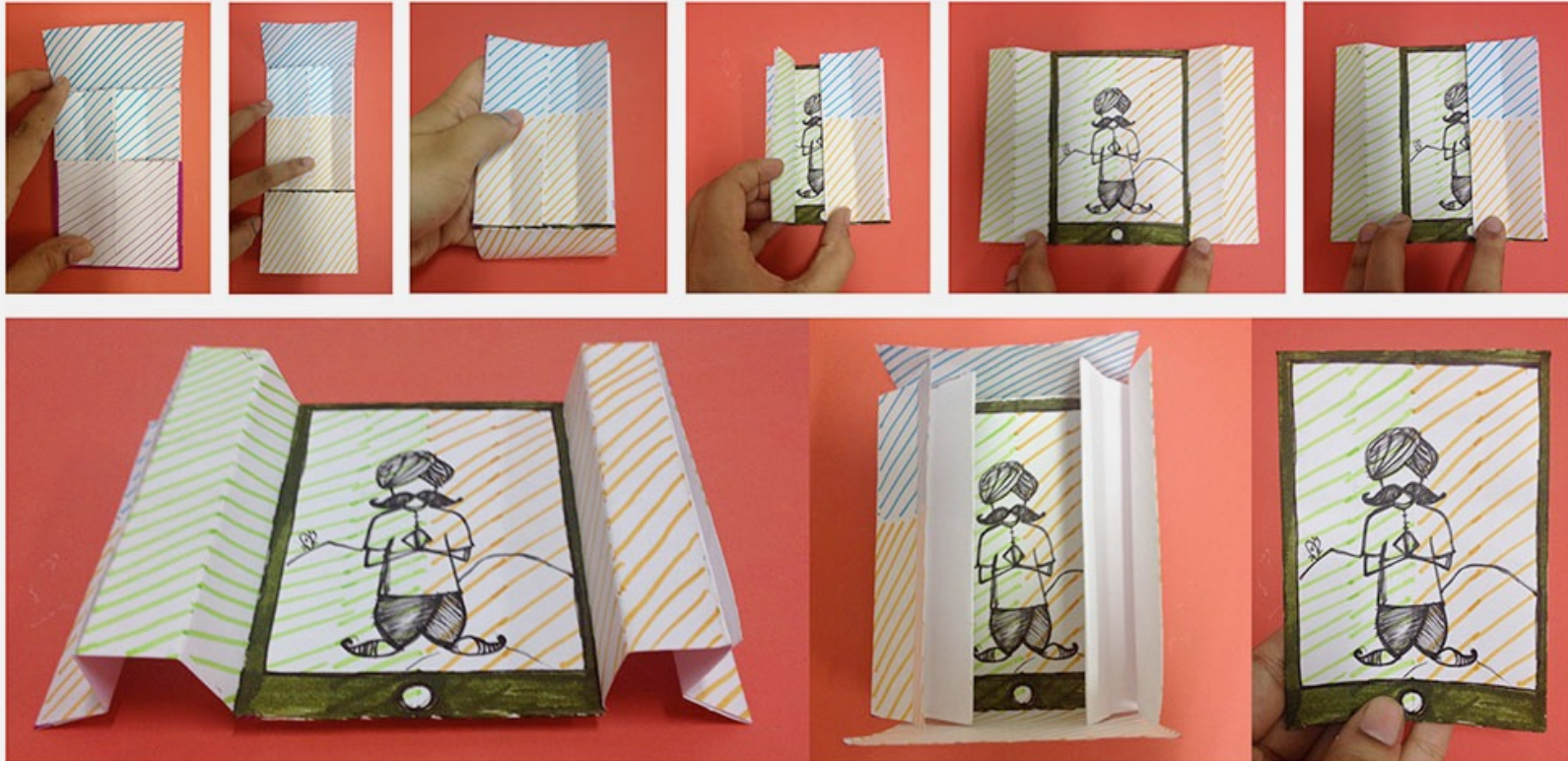
Unfold the Stories



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AUDIO + VISUAL + NARRATIVE





CONCEPT 2

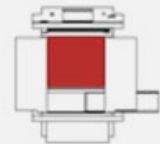
# Experiential Kaavad

Interactive Installation (Museum/Airport/Malls)

- Kaavad installation of life size.
- Panels can be unfolded/unlocked step by step with set of tasks giving information about the Rajasthani culture.
- Activities like playing an instrument or looking through Jharokha to get the next fold unlocked or knowing some facts about Rajasthan can be a part of the interactivity
- Experiential Kaavad aims to give jist of Rajasthani culture with cultural artifacts incorporated with it to make it playful and fun.

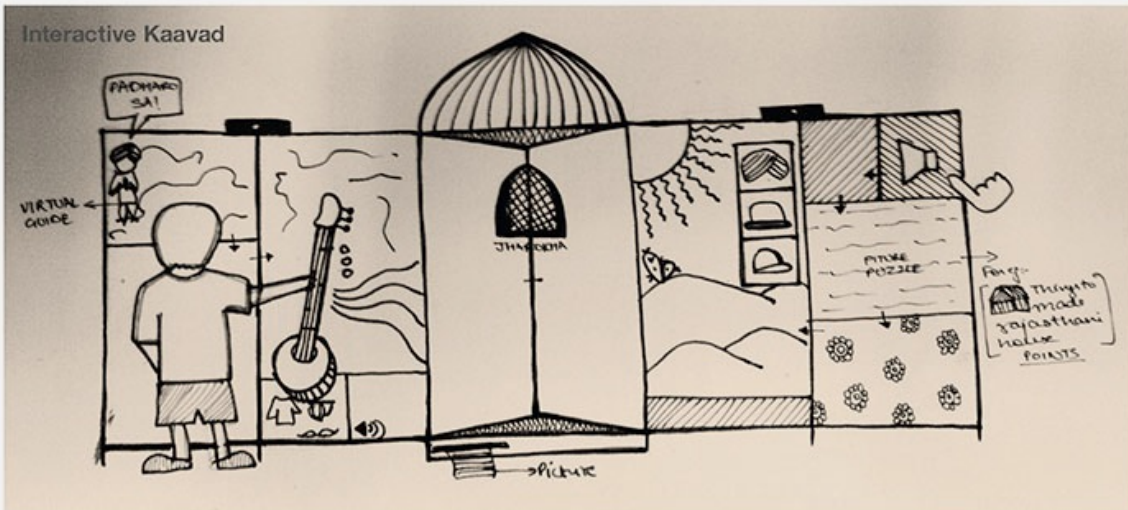


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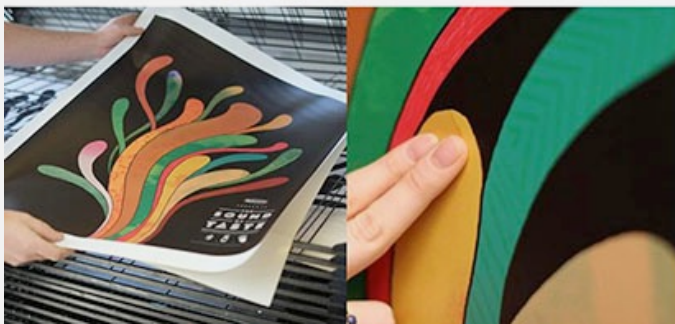
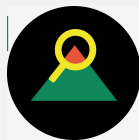


## CONCEPT 2

Interesting Facts(cow dung), Introduce concept of Rain water harvesting(well), Hospitality, Art & Craft



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### CONCEPT 3.1

Interactive Visual Narrative

## Conductive Ink

(Map/Story/Facts)

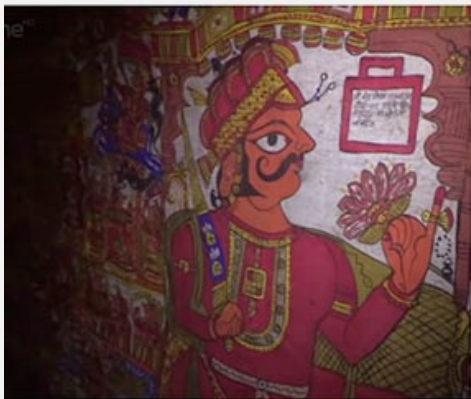
The visual narrative reacts to the touch of the child by giving audio feedback(narrative).

Accessible platform for children to get creative with technology in fun and intuitive way.

Story Book or Puzzle with 3-D pop-ups, audio and light feedback for bringing it to life.



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## CONCEPT 3.2

Interactive Poster/Board

# Light Sensitive Ink

(Map/Story/Facts)

The content can be printed in light sensitive ink so that the visuals becomes visible only with heat(lamp/torch)

Color change is from colorless to colored when exposed to sunlight or heat

Children can explore stories with magical and enjoyable experience. Increases curiosity which results in better understanding.











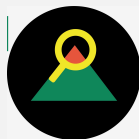
## Evaluation Matrix

### Concept

The concept was evaluated intuitively on basis of physical, emotional, cognitive and social engagement that the user will experience.

	Physical Engagement	Cognitive Engagement	Emotional Engagement	Social Engagement
 <b>Concept 1</b> <b>Kevad</b> Unfold the stories <i>Audio + Visual + Narrative</i>	LOW	HIGH	MEDIUM	LOW
 <b>Concept 2</b> <b>Experiential Kaavad</b> Interactive Installation <i>Interactive + Activity + Artefacts</i>	HIGH	HIGH	HIGH	HIGH
 <b>Concept 3</b> <b>Interactive Visual Narrative</b> Interactive Poster/Painting <i>Map + Story + Facts</i>	HIGH	MEDIUM	MEDIUM	HIGH
 <b>Concept 4</b> <b>Interactive Board</b> Interactive dark room storytelling <i>Map + Story + Facts</i>	HIGH	HIGH	MEDIUM	LOW

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## Final Concept Deliverables

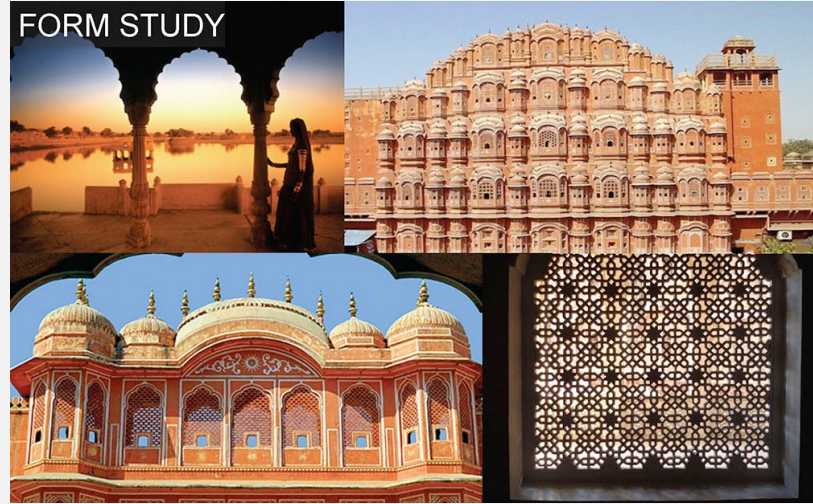
Research till now	Deliverables for Installation
Kaavad Structure Architecture	Structure
Colour Texture Art Craft Traditional painting	Visual Language
Kaavad History Tales Story of folk songs Cultural habits Daily Chores Humour Poem Food	Story
Activities	Activity Flow
Sequence	Interaction

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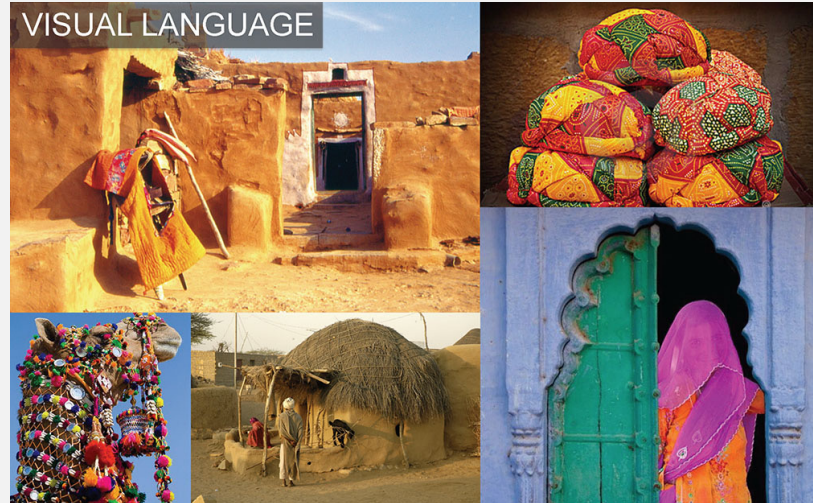


## Form Study and Visual Language Study:

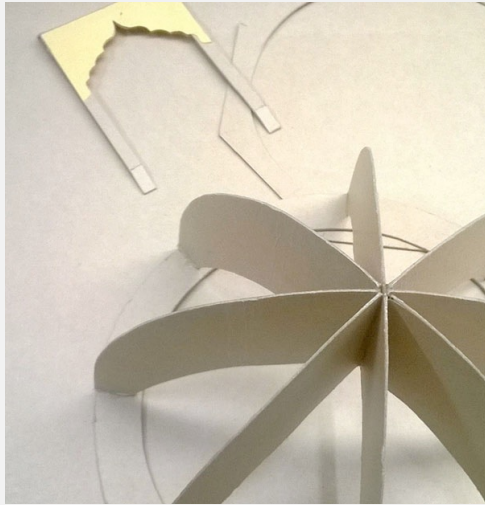
FORM STUDY



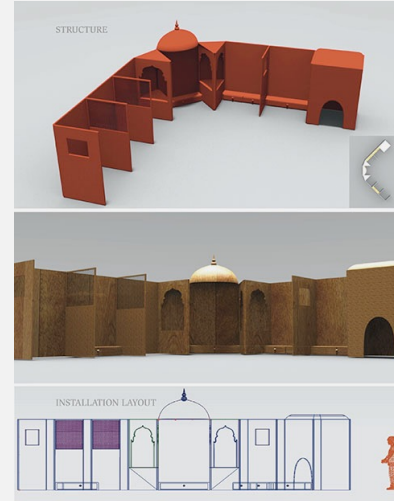
VISUAL LANGUAGE



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STRUCTURE  
**Explorations**



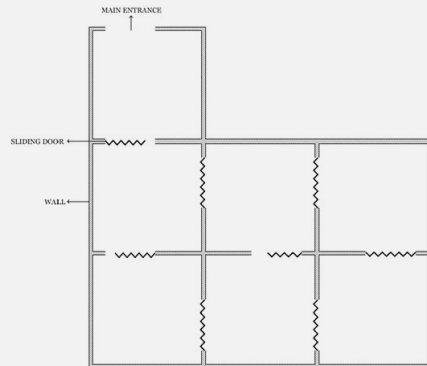
## Concept 1

#kaavad  
#jharokha  
#jump  
#peek  
#hide  
#playful  
#interactive

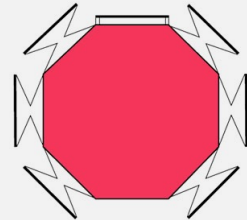
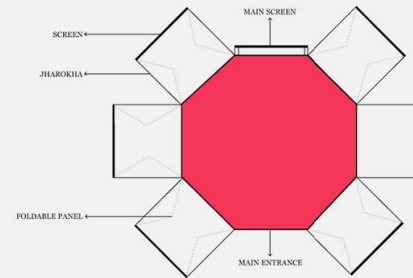
*PROBLEM: Not Flexible. Structure is rigid and it can't be moved unlike the doors 'pats' in kaavad*

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## Concept 2



## Concept 3

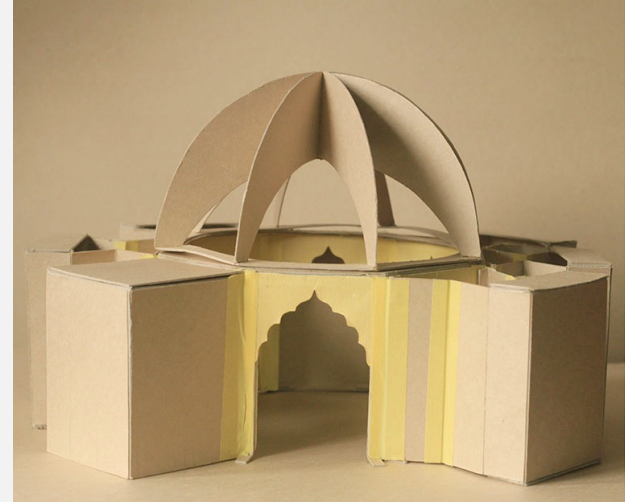


C3.1-034

50



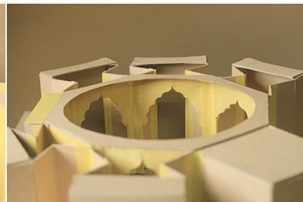
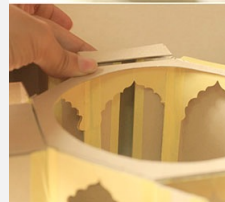
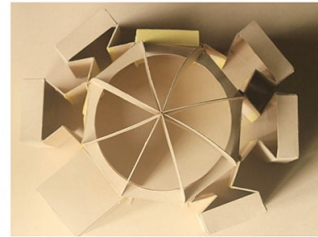
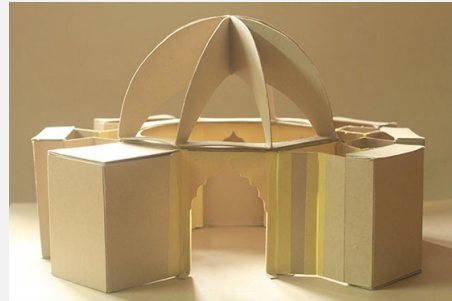
## Paper Prototyping:



### Final Concept

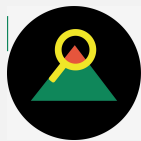
#kaavad  
#jharokha  
#chattris  
#peek  
#hide  
#bend  
#playful  
#interactive  
#curiosity  
#fun  
#discover

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ACTIVITY 3



C3.1-036



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ACTIVITY 4





ACTIVITY 1



ACTIVITY 5



ACTIVITY 6



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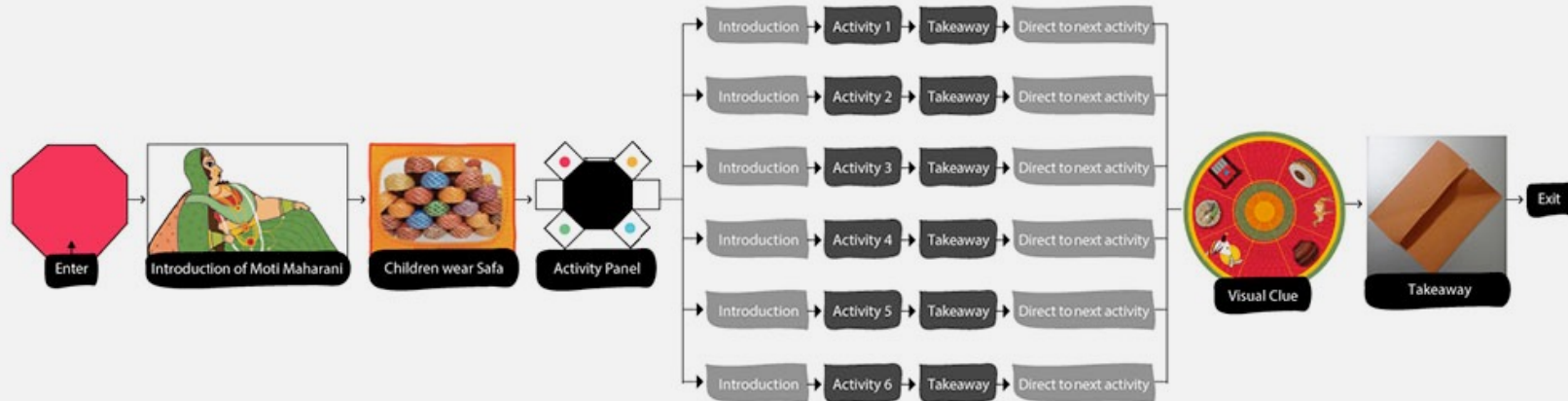




THINK!  
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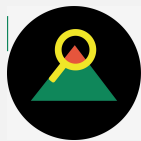


## Activity Plan

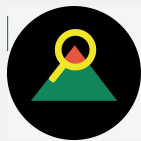




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# Feedback

## Story

### Engaging story

*"Tell me the story of Moti Maharani again"*

*"Where do they get water when it's over"*

### Interesting Activities and wanted to perform task

*"We also give food to our birds when we eat" (relating to the cultural context)*

*"I know how to play Dholak, so If I play the puppets.."*

*"Show the puppet dance again"*

*"So if I move the chakki it will make roti's?"*

### Got curious and asked questions and engaged in a conversation with their mother

*"I have eaten Bajra Ka roti once in Chokhi dhani and I like it"*



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## Feedback

### Takeaway

The game triggered kids to find out more about the Rajasthan.

*"What is this city called"*

*"Why is it blue in color"*

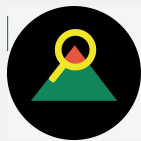
They played again and again with everyone in the house with the takeaway, even though they could not read everything.

They put there own names to the symbols illustrated.

*"The topi, sorry! I choose the pagadi"*

**Did not know how to spell the symbols.**

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Thank you



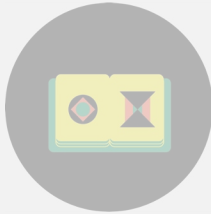
**Thanks for  
Listening**

**DT&I Case Study**  
Section: C3  
Week 3



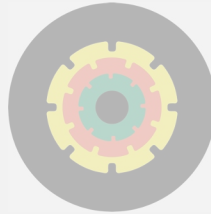
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# DT&I Course – Week 3:



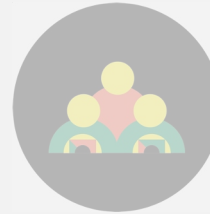
DT&I  
Process  
(20%)

- > Secondary Research
- > Info Gathering
- > Referencing



DT&I  
Tools  
(20%)

- > 5W + 1H Answers
- > 5W + 1H Matrix Table



DT&I  
Project  
(50%)

- > Secondary Research
- > 5W + 1H



DT&I  
Cast Study  
(10%)

- > Case Study Project 'Teaching Culture Through Storytelling'

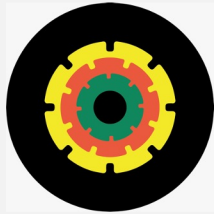
THINK!  
DESIGN

# DT&I Course – Week 4:



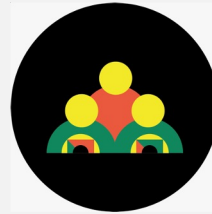
DT&I  
Process  
(20%)

- > Secondary Research
- > Referencing



DT&I  
Tools  
(20%)

- > User Participant Mapping



DT&I  
Project  
(50%)

- > Secondary Research
- > User Mappings



DT&I  
Case Study  
(10%)

- > Case Study Project 'Design of Pesticide Sprayer'



## Supporting Organizations:



D'source Project



Open Design School



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## Credits:

**Presented by:**  
Prof. Ravi Poovaiah



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## Credits:

**Camera & Editing:**  
Santosh Sonawane



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## Credits:

Think Design Animation:  
Rajiv Sarkar



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## Credits:

**Graphic Icons:**  
Shweta Pathare



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## Credits:

End Title Music:  
C P Narayan



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