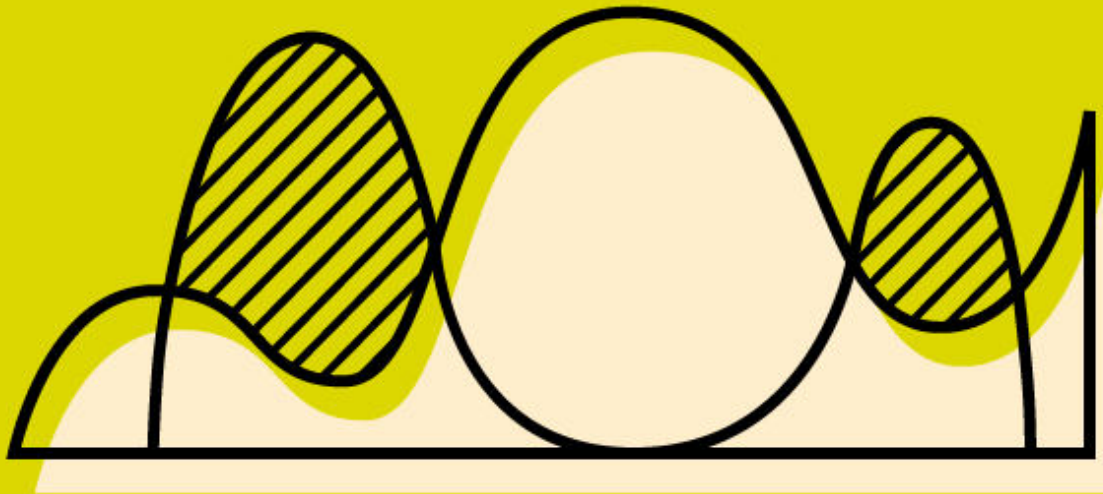


THE MODERN SHOPPING CART

# BETWEEN THE PHYSICAL AND THE DIGITAL

*A qualitative research by the Digital Experience Research Centre of NTT Data*



# users in tech research series

“

*We discover and understand the **underlying motivations** that bring people close to technology and their **behaviour** when they interact with it*



We wanted to understand how users **users feel** through the **different steps** of the in-store experience



To enhance a shopping experience in which we **weave the digital and physical worlds** together to respond to the users' feelings through **emotional design**

# We had a walk with users and explored the future



- 14 users
- Mix of gender , age and background
- Early and late majority tech adaptors

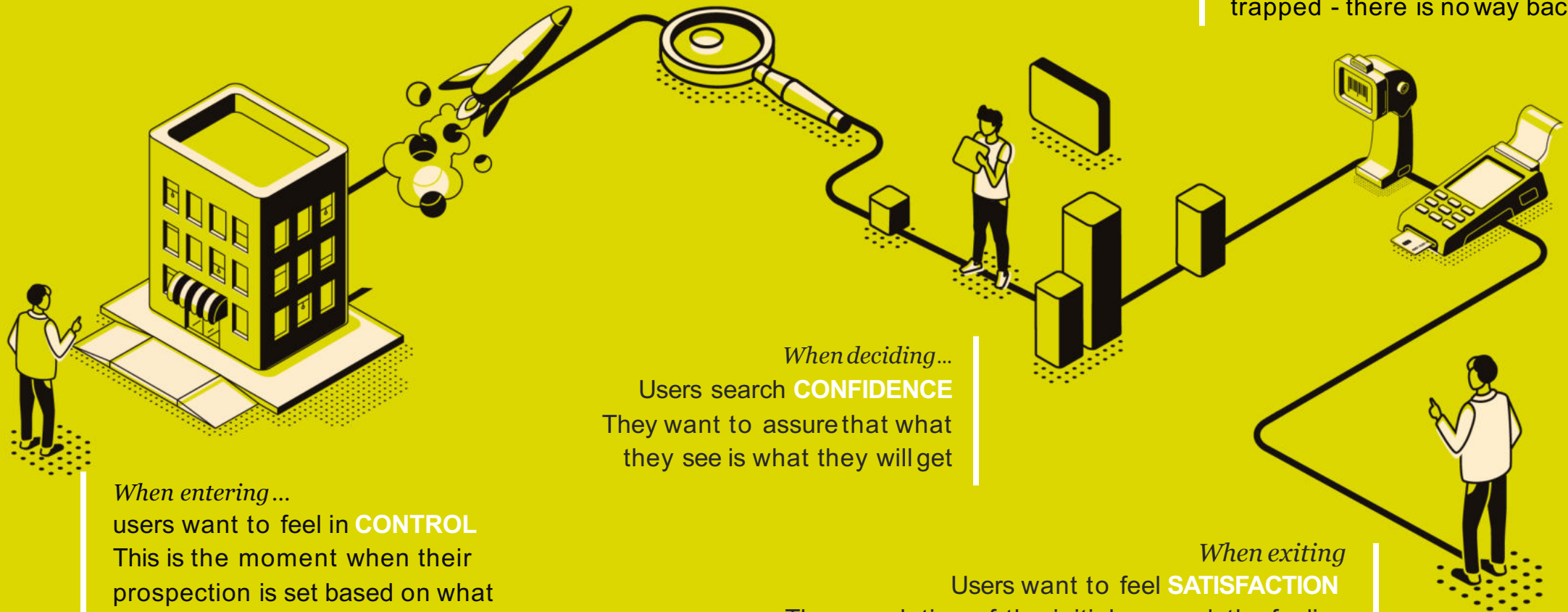


- Fashion retail
- Banking
- Supermarket retail
- Insurance



- In store shadowing  
*We took users to specific stores to understand the emotional journey throughout the shopping experience*
- Co- brainstorm  
*We capitalized on positive feelings and desired outcomes to come up with future solutions*

# The intensity of 5 feelings are crucial through the in-store experience



*When entering...*  
users want to feel in **CONTROL**  
This is the moment when their prospection is set based on what they feel, see and hear

*When searching a product...*  
users look for **AUTONOMY**  
They want to be able to find their way according to their own free will and needs of the moment

*When deciding...*  
Users search **CONFIDENCE**  
They want to assure that what they see is what they will get

*When transacting*  
Users want to feel **COMFORT**  
They make a last evaluation and any unexpected, negative surprise creates discomfort as users might feel trapped - there is no way back

*When exiting*  
Users want to feel **SATISFACTION**  
The completion of the initial use goal, the feeling they had a fair deal and overall experience will make them decide to come back

## PHASE 1 ENTERING



### GOAL - RAISE AWARENESS

Guide the the users' first impression of the store, focussing on the **visceral level of the experience** to enhance the perceptive qualities of the store or brand.

Before

I'm not sure if this specific store is appropriate for what I'm looking for



After

I'm convinced this will be worth the experience, I have a good gut feeling

“

*Entering a store fore the first time can make me feel a bit **uncomfortable**. Especially when I'm dealing with important cases or purchases , I need to know if this is the right place.*

“

*When I enter a store, **I want to know if it's worth the effort**. I try to estimate how much time I will spend and how probable it is that I will find what I'm looking for.*

“

*I'm getting nervous and hopeless when I **feel overwhelmed by the amount of people or objects** that I see.*

PHASE 1  
**ENTERING**



USERS LOOK FOR

# CONTROL

The less familiar users are with a certain store or brand the more crucial it is to feel in control and be able to determine whether they will start the physical experience or if they will abandon. The context and circumstances in which the user is finds himself highly influence the need for control.

**FREEDOM OF CHOICE**  
to choose the path

**UNDERSTANDING**  
of the store composition

*offer*



**PREDICTANCE**  
of time and effort

**TRUST**  
In the environmental triggers such as colours, lights, sounds and smells

PHASE 1  
ENTERING



USERS LOOK FOR

# CONTROL



## Ideas from users

- Recognition of frequent visitor and personalized information on new arrivals, welcome or guidance
- Smart shopping list or preference (nutrition , style , size) assessment and road filtering through augmented reality
- Smart assistant at store entrance to assess users' needs and guide them the right way
- *Time in store* estimation according to use goals
- Avoidance of crowded spaces by distribution of users

## IMMERSIVE DESIGN CUE

**CREATE A 2 WAY UNDERSTANDING**  
Collect the user's needs and wants and make him understand how the store works according to his specific needs





## PHASE 2 SEARCHING



### GOAL – BOOST INTEREST

*Make the journey as interesting as the destination so users get inspired and get a memorable experience finding what they are looking for*

*Before*

I see lots of categories and ranges of products



*After*

I have arrived exactly at the right range of products for me



“ *If within the first minute of searching for an item I do not find it, I lose hope and re-evaluate if I need that article in the first place, especially if there is no help around.*

“ *I don't want to be depending on unsure circumstances such as the present of a sales person to be able to find what I'm looking for, I want to have all the means possible to be able to be self-sufficient.*

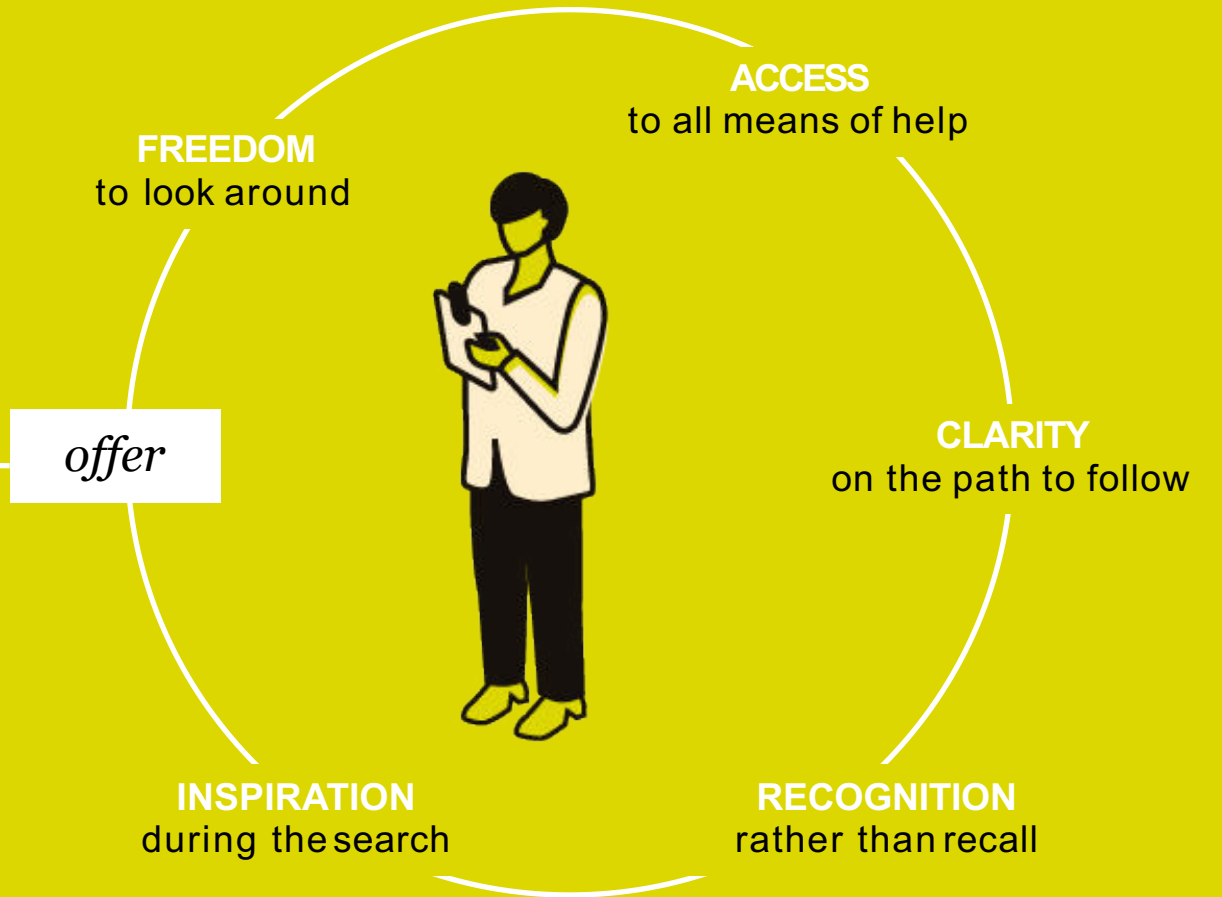
PHASE 2  
**SEARCHING**



USERS LOOK FOR

# AUTONOMY

Based on digital intuitive shopping experiences, there is a high tendency for browsing independently for products. The need for having autonomy goes hand in hand with the physical size of the store. The bigger the store, the bigger the barrier for users to look for help.





USERS LOOK FOR

# AUTONOMY



## Ideas from users

- Smart shopping cart help users navigate through the store
- Call for assistance through mobile application
- Alerts around recommendations while users navigate through the rows
- Incorporated filter navigation to guide users through augmented reality through their smart phone
- For already users; use profile data such as purchase history or preferences to guide users

## IMMERSIVE DESIGN CUE

### FACILITATE SEARCHING & BROWSING

Narrow down options in a personalized way and come up with a pool of options to arise curiosity by combining surprise and trust: the non expected in a way that users have confidence



*I don't know where to start looking*

*Well... What are your preference?*

*Where should I start.. In fact I don't know what I'm looking for*

*As far as I know you, I'm pretty sure you will like this*

*You are right, I like this!*

## PHASE 3 DECIDING



### GOAL - RAISE CONSIDERATION & INTENT

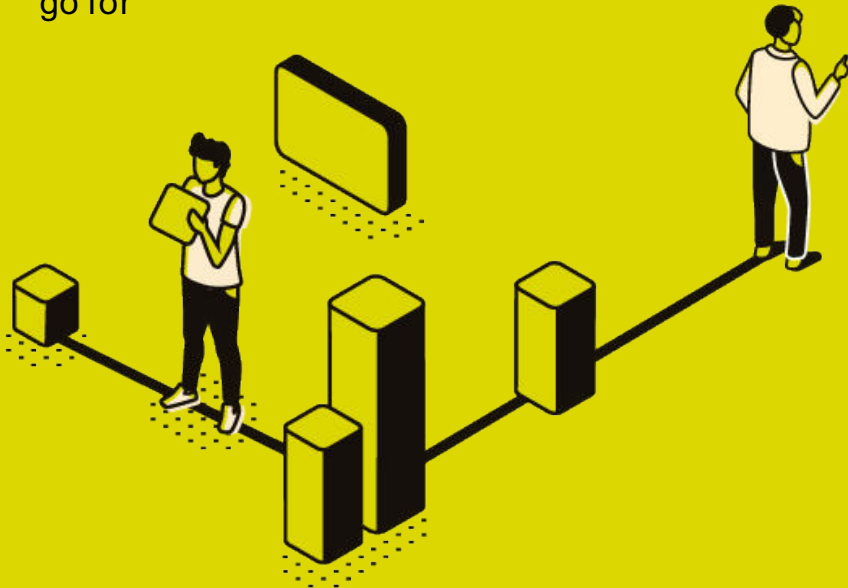
*Give contextual and targeted content to the user that helps them to decide which product to buy.*

**Before**

I don't know which of the selected products I should go for

**After**

I'm convinced I'll buy the best option



“

*When deciding on whether or not to buy a product, I'm looking for objective information that is not related to the brand or store where I am at. **I highly value opinions of peers,** especially when related to the technical and functional characteristics of a product or service.*

“

*I don't want to feel responsible for **something that was out of my hands** when buying something and then realizing it is not aligned with my needs.*

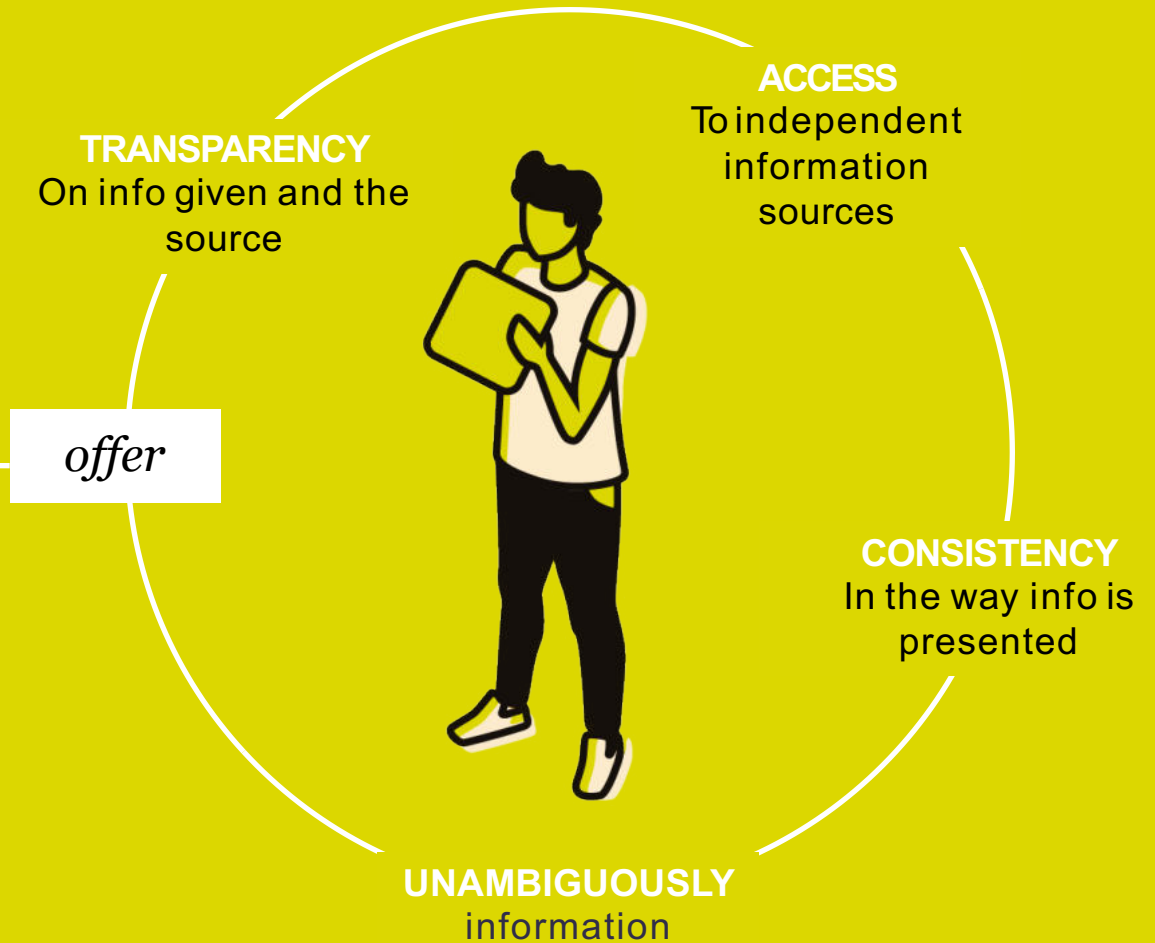
PHASE 3  
**DECIDING**



USERS LOOK FOR

# CONFIDENCE

Nowadays, the sense of transparency is a must in all types of interactions between a brand and a user. Users need to feel that they have all information required so they can be confident that they make a choice that best suits their needs.



## PHASE 3 DECIDING



USERS LOOK FOR

# CONFIDENCE



### Ideas from users

- Avoid effort by adding augmented reality when deciding on which clothes to buy, so pre-elimination can be done
- Social shopping : see your friends recipes and the ingredients they bought for that
- Use smartphone to scan an item and call up product information according to the personal configuration and preferences of the user
- Make it easy to users to understand the product-specs by using personalized examples of conditions, for example through smart packaging

## IMMERSIVE DESIGN CUE

### REVIEWS AND INFORMATION

Give access to the users to get different types of information coming from different sources around the products they are seeing and make it easy and straight forward to compare pros and cons



*I don't know what to focus onto decide*

*Look, this is what other people like us say*

*Aha, I'll go for that one then*

## PHASE 4 TRANSACTION



### GOAL – STIMULATE CONVERSION

Once users have decided they want to purchase a product, make sure the stage of transaction is smooth so they don't change their mind at the last minute

Before

The product is not yet mine



After

This product is now owned by me and I feel good with this



“ It makes me **uneasy to not to know what will be the final sum of my payment**, because I would feel ashamed to not have this amount of money when paying.

“ When I see a huge waiting line at the cash and I don't give high importance to the product I'm about to buy, **I might reconsider if the waiting time is worth it**

“ Once **a product will be mine**, my friends might judge me on my choice

PHASE 4  
**TRANSACTION**



USERS LOOK FOR

# COMFORT

Users today have no doubts around the safety of the financial transaction process. At this stage, the product will become a possession and especially if the product expresses the character of the user, it's important to feel comfortable about social judgement.

*offer*

**A SPOTLESS  
CHECK OUT  
FLOW**

**REASSURANCE**

**RECONFIRMATION**  
That they will purchase  
the right object

**EASE**  
by telling users the  
purchase is reversible



**INSPIRATION**  
on what they will  
be able to do with  
the product



## PHASE 4 TRANSACTION



USERS LOOK FOR

# COMFORT



### Ideas from users

- Contactless check out by automatic canning of product
- Smart cart counting objects and showing specs and total price
- Use the online check out process by recognition of the products to purchase
- Inform of the total amount which will be discounted from a user's pre-set budget
- Help users with their money-management by showing how much they are spending for different categories of products
- Timely advise about the date and amount of direct debit, strengthening the information about benefits and services of the purchased products.
- Inspire the user about what he can do with the products that he will buy.

## IMMERSIVE DESIGN CUE

### SMOOTHLESS CHECK OUT

Help users smoothly complete the experience by using the power of buying online from the retailer while being physically present in the store.



*Am I 100%  
sure I sure  
buy this?*

*Don't worry, just  
walk through, it's  
fine. You can  
always come back.*

*That went  
smooth.*

## PHASE 5 EXITING



### GOAL – STIMULATE ADVOCACY

Keep delighting users, collect their feedback and turn them into fans who talk about the store and refer it to their friends

Before

My use goal has been completed

After

I feel like telling my friends that this was a good experience



“ When I exit a store I like to have **ticked off all my tasks and know it was all worth it.** I sometimes wish I could teleport myself home. I like the feeling of having brand new things that I want to try right away.

“ When I feel like I have not been treated well by in-store service, I consider to look for an alternative with similar conditions

“ I’ll recommend a purchase or experience to a friend only if I feel smart about it, I don’t want to be judged

“ I sometimes feel a bit worried imagining **how I will think about this purchase in the future.** I don’t want to regret

PHASE 5  
**EXITING**



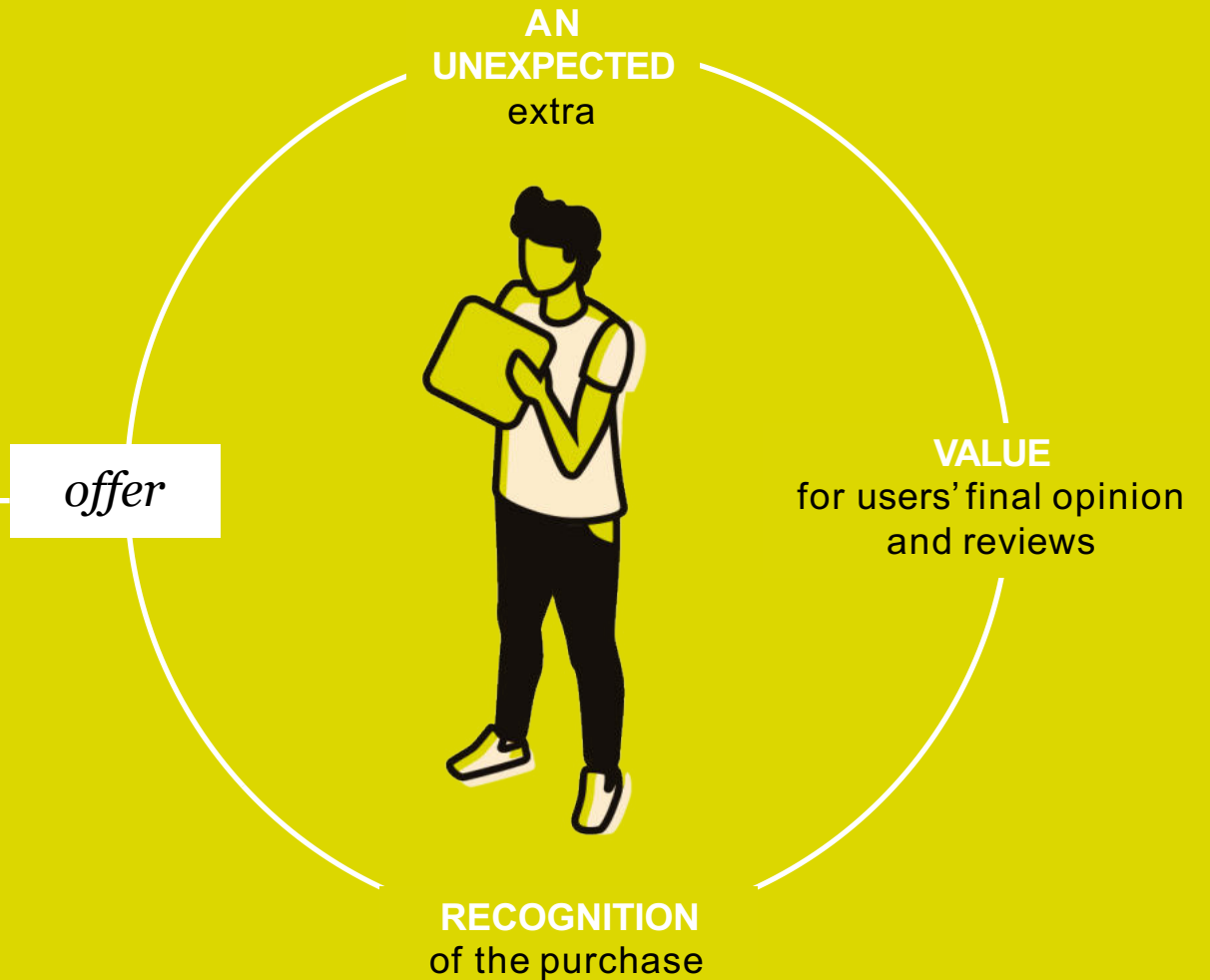
USERS LOOK FOR

# SATISFACTION

Users rate experience almost as important as price and product as brand differentiator.

The more long-term commitment the product represents, the more value users give to treatment over the efficiency.

Users are considering how others will view their actions or how they will think about them in the future.





USERS LOOK FOR

# SATISFACTION



## Ideas from users

- 'Recommend to friends' feature
- 'Did you forgot something?' feature
- Give the possibility to come out of the store with the purchased clothes, and shipping home the old ones.
- Options for shipment
- When users are charged via direct debit, strengthen the information about benefits and services of the purchased products.
- Enhance the experience and engagement by adding benefits based in amount of purchases using gamifications triggers.
- Give access to become part of a community

## IMMERSIVE DESIGN CUE

### THE FINAL DELIGHTMENT

Ameliorate the global experience adding extra services to cover user needs beyond their expectations and to show them their purchase will be worth it.



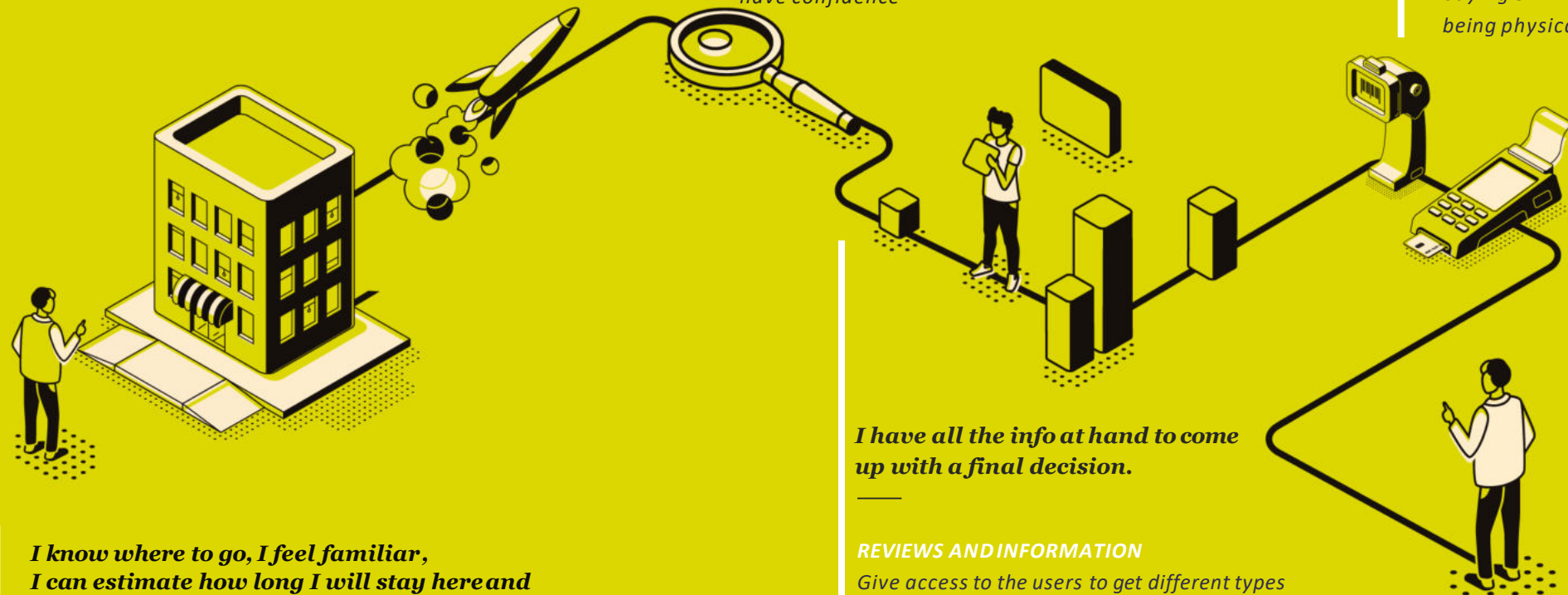
*I wish I was already at home*

*Can I help you with something more?*

*In fact yes, thanks!*

**The ideal journey**

# The ideal journey | An episodic dialogue



*I know where to go, I feel familiar,  
I can estimate how long I will stay here and  
how the experience will be*

## 2-WAY UNDERSTANDING

assess the users' needs and wants before starting the experience and make him understand how the store works responding to this assessment

*I easily find my way to the range of products  
that fit me*

## FACILITATE SEARCHING AND BROWSING

Narrow down options in a personalized way and come up with a pool of options to arise curiosity by combining surprise and trust: the non expected in a way that users have confidence

*I have all the info at hand to come  
up with a final decision.*

## REVIEWS AND INFORMATION

Give access to the users to get different types of information coming from different sources around the products they are seeing and make it easy and straight forward to compare pros and cons

*The check out went super  
smooth. I'm extra convinced  
I'm purchasing the right thing.*

## SMOOTHLESS CHECK OUT

Help users smoothly complete the experience by using the power of buying online from the retailer while being physically present in the store.

*This was nice and comfortable,  
I'll recommend it to my friends*

## THE FINAL DELIGHTMENT

Ameliorate the global experience adding extra services to cover user needs beyond their expectations and to show them their purchase will be worth it.

**Crafting the ideal  
journey**

# Crafting the journey | a multi-sensorial episodic experience

*Emotional experiences make a profound imprint on our longterm memory. We generate emotion and record memories in the limbic system, a collection of glands and structures in the brain's foldy gray matter.*

- Aaron Walter, "Design for emotion"

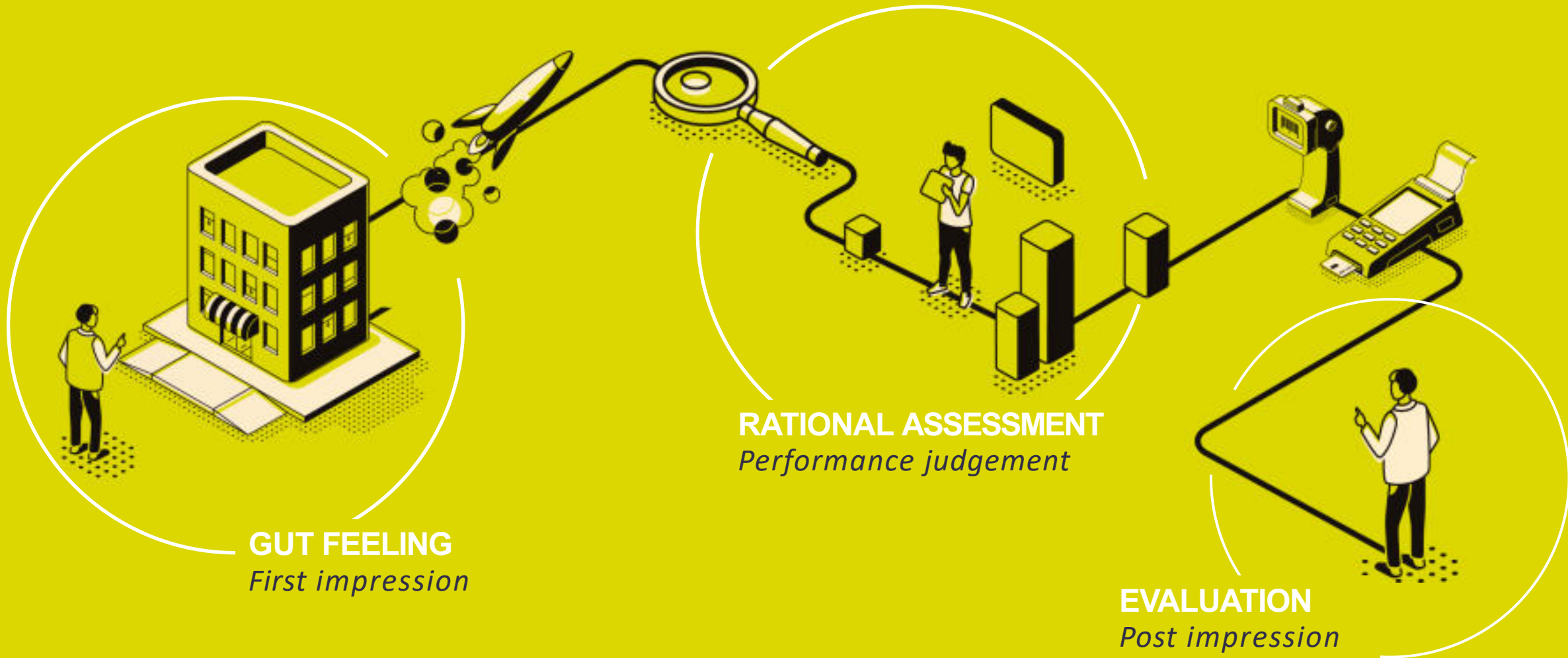
Design to trigger users' emotions **on 3 levels** throughout the journey

Consider that events are **interlinked and intertwined**



# Crafting the journey | a multi-sensorial episodic experience

Design to trigger users' emotions on **3 levels** throughout the journey



# Crafting the journey | a multi-sensorial episodic experience

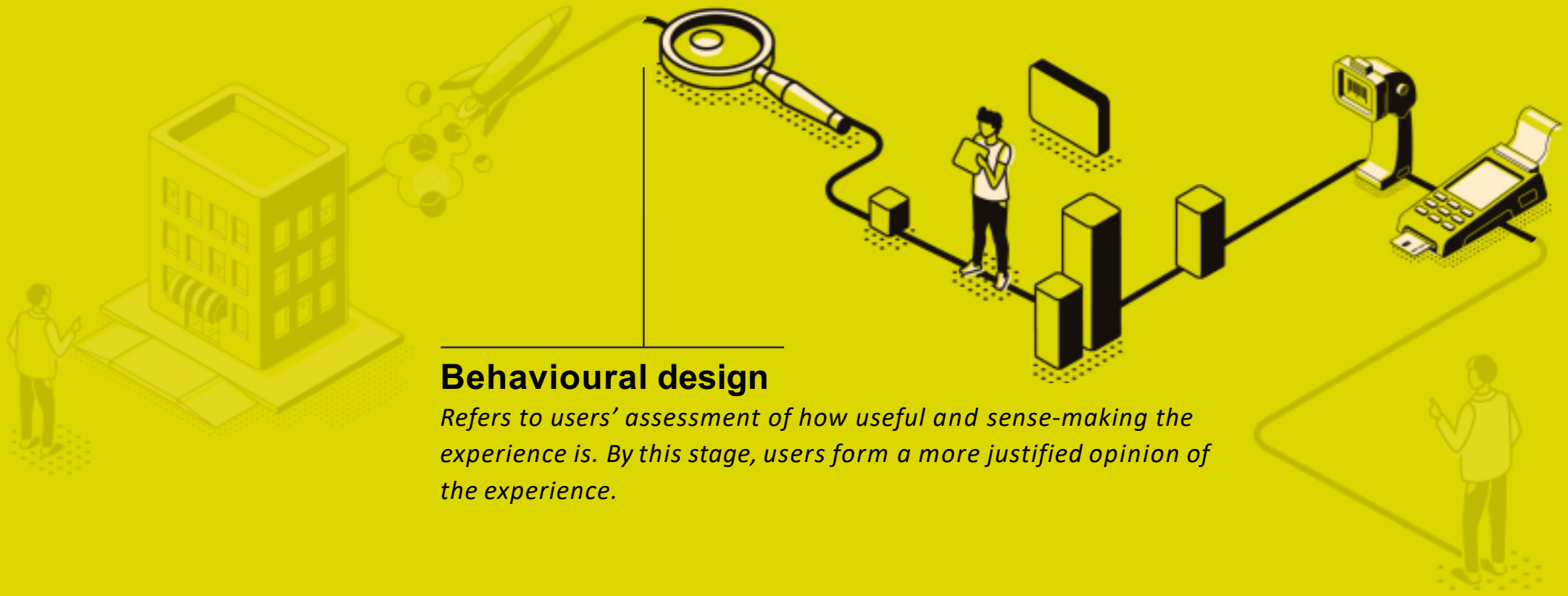
Design to trigger users' emotions on **3 levels** throughout the journey



- Organize focus groups to assess users' expectations around the appearance and attributes of a brand
- Prototype solutions and shadow users in-store to understand their reactions

# Crafting the journey | a multi-sensorial episodic experience

Design to trigger users' emotions on **3 levels** throughout the journey



- Be true when designing, users will lose trust in the experience when it's seen as marketing related (e.g. Smartmirrors)
- Co-create with users to assure that the experience makes sense to them and is useful

# Crafting the journey | a multi-sensorial episodic experience

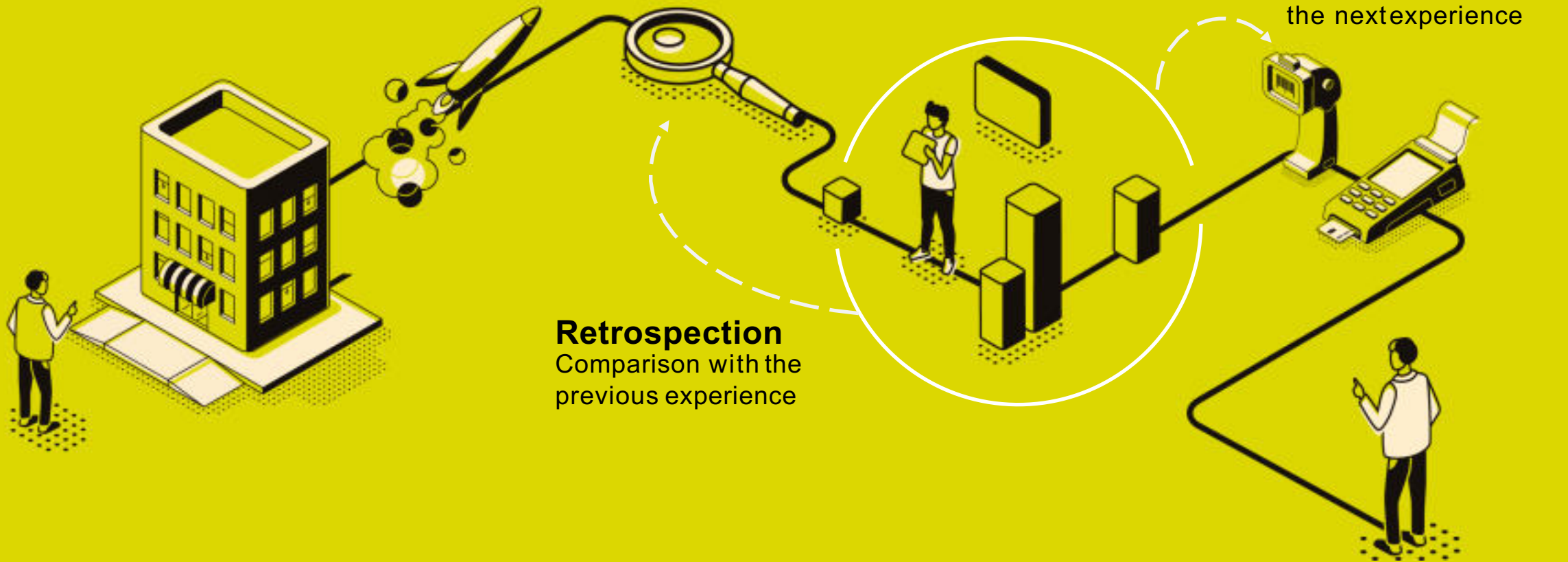
Design to trigger users' emotions on **3 levels** throughout the journey



- Assess reviews of users and use them as input for UX research questions

# Crafting the journey | a multi-sensorial episodic experience

Consider that events are  
**interlinked and intertwined**



- Be consistent in the design of the different touch points
- Build up through the experience
- Map the complete user journey including all multi-channel touch points

# THANK YOU

**The modern shopping cart | Between the physical and the digital**

*A qualitative research by the Digital Experience Research Centre of NTT Data*

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Research Center

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- Book: Designing for emotion - Aaron Walter
- <https://medium.com/@avimair/why-is-emotion-so-important-in-ux-1db4945cfdb5>
- The document has been designed using resources from Pexels.com and Freepik.com