

Building a collaborative relationship with a travel buddy for multimodal journey planning

As cities are leaning towards promoting sustainable transport modes, the number of multimodal journeys will grow. To provide seamless and personalised experience, we are envisioning the future where smart agents know us better and suggest what we want one step ahead. AI-enabled assistants can automate many tasks and make decisions on behalf of users. However, human needs are complex and fluid unlike how machines process information and manage tasks. How can we fill this gap and build a engaging relationship with a travel buddy that assists multimodal travelers throughout their journeys?

Needs and requirements of multimodal travelers

Multimodal travelers have a comparatively favorable attitude towards public transportation and bikes. There are also a group of people who opt for multimodal journeys because there is no other option. One key determinant that influences a route choice is instrumental determinant that includes time efficiency, flexibility in terms of time and place of departure, cost and et cetera. Situational factors such as hours (whether it is day or night), weather, and mood also matter to multimodal travelers. A country's mobility infrastructure should be considered as well. Travelers require different types of assistance depending on the characteristics of a journey, such as whether they have to be on time, have a concrete destination or not, a route or a destination is familiar or not, and the motives of a trip.

The role and the relationship with a travel buddy

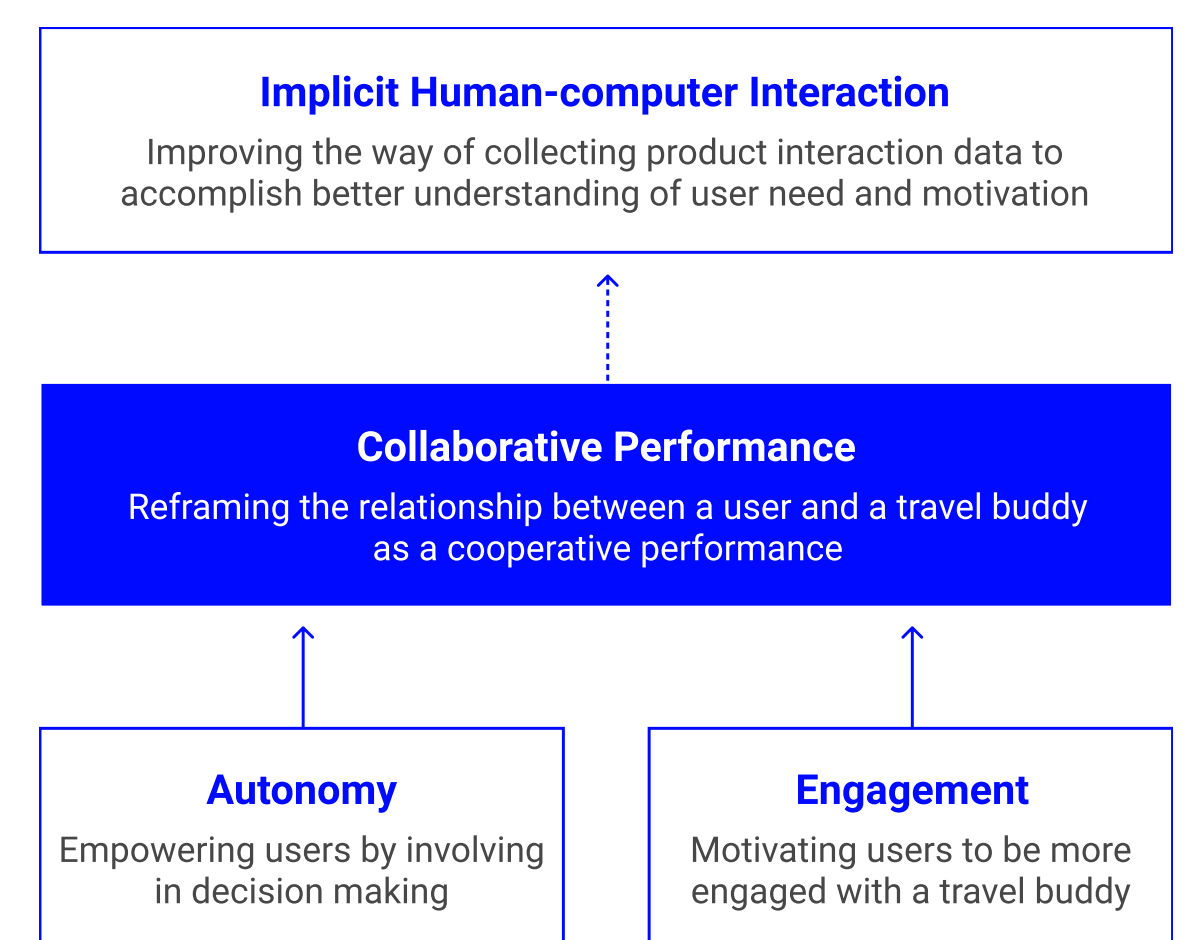
People envision a travel buddy in the future to be aware of their preference and latent needs. As the focus is shifting towards the well-being of individuals, they want a travel buddy to foster a positive experience with a multimodal journey. Multimodal travelers want a travel buddy to be a mediator that connects them with surroundings helping them to explore and discover places.

Problem Definition

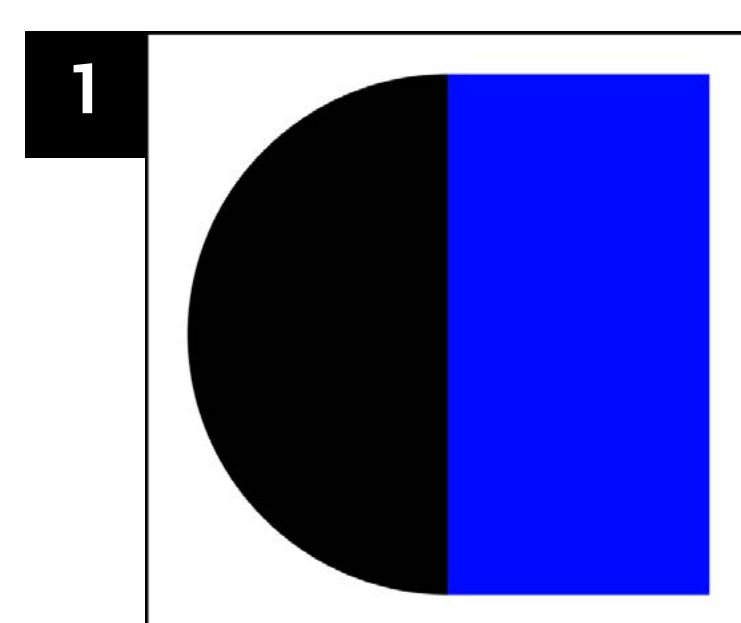
Accuracy and ease of use are directly linked to adoption. However, simplicity might lead to incongruence with how travelers plan and make a journey neglecting factors that are important determinants in human decision-making and end up giving recommendations. Users should be involved to optimize routes.

To build a collaborative relationship with a travel buddy

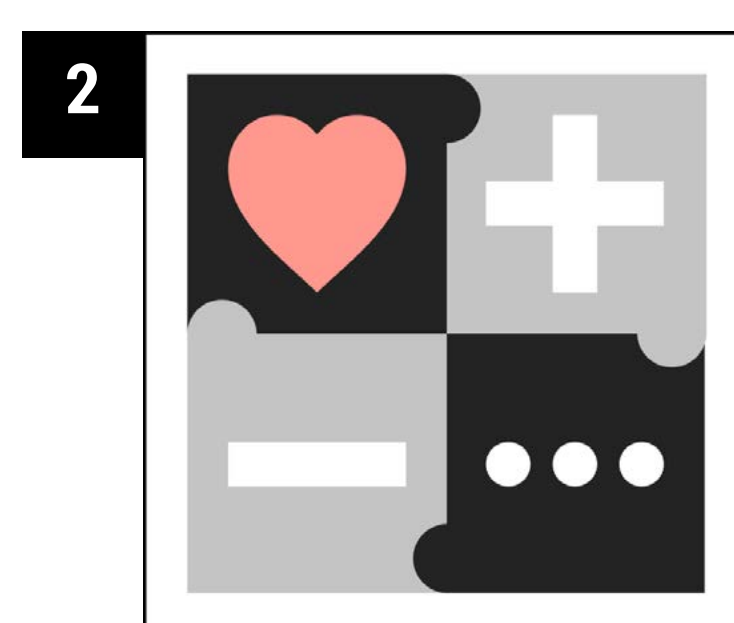
A travel buddy should give autonomy to users and provide engaging experience to facilitate a collaborative performance to become a more adaptive and predictive being.



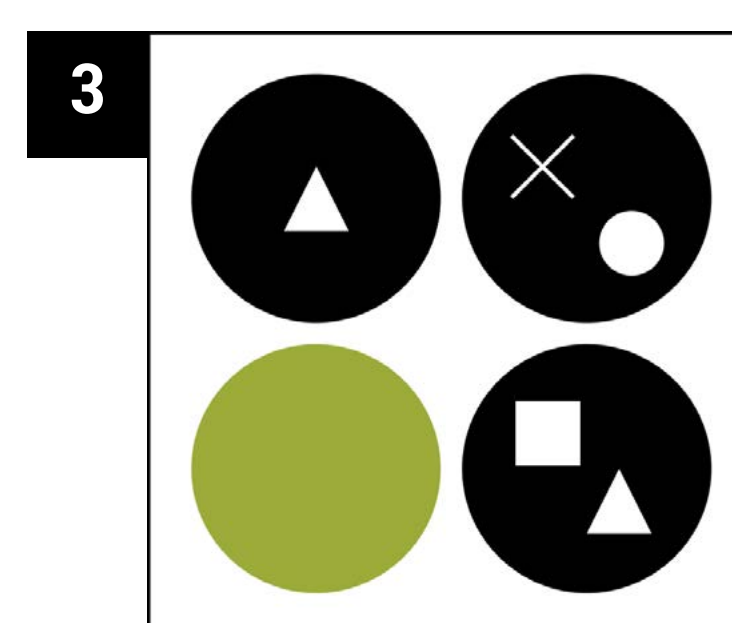
Manifesto: guidelines for designing a travel buddy



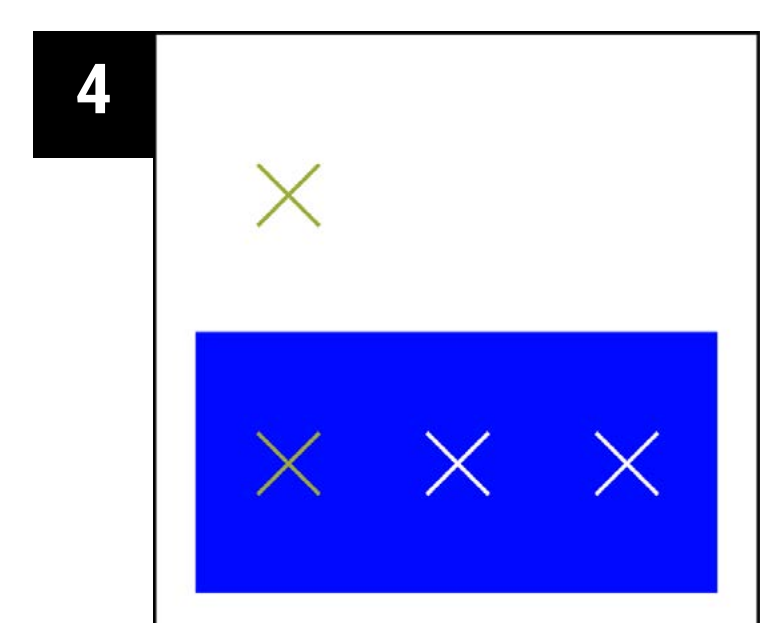
1 Aim to establish a relationship that is valuable a both sides.



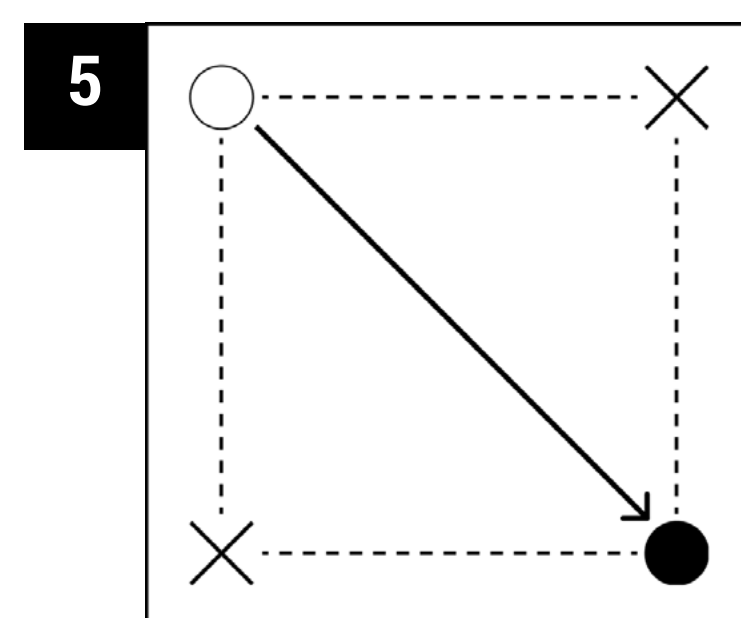
2 Be aware of users' personal dispositions when determining the attitude to approach users.



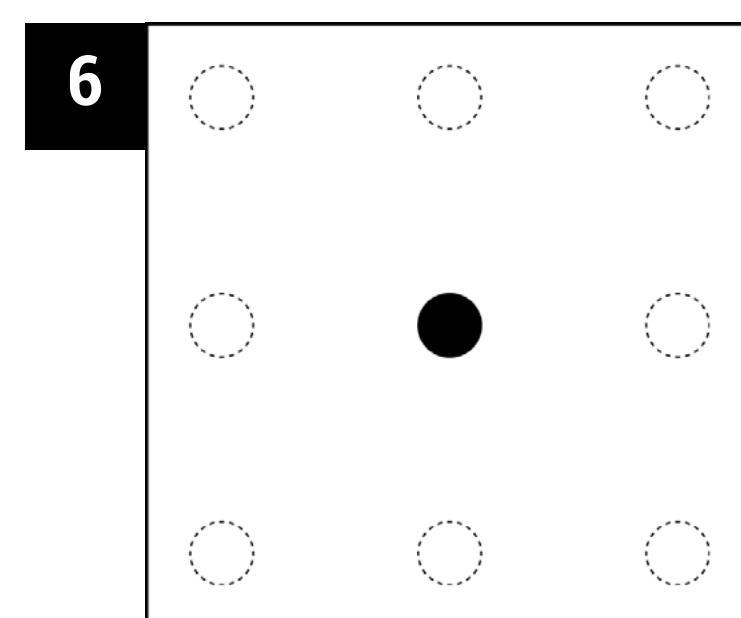
3 The different motives and contexts of each trip should be considered.



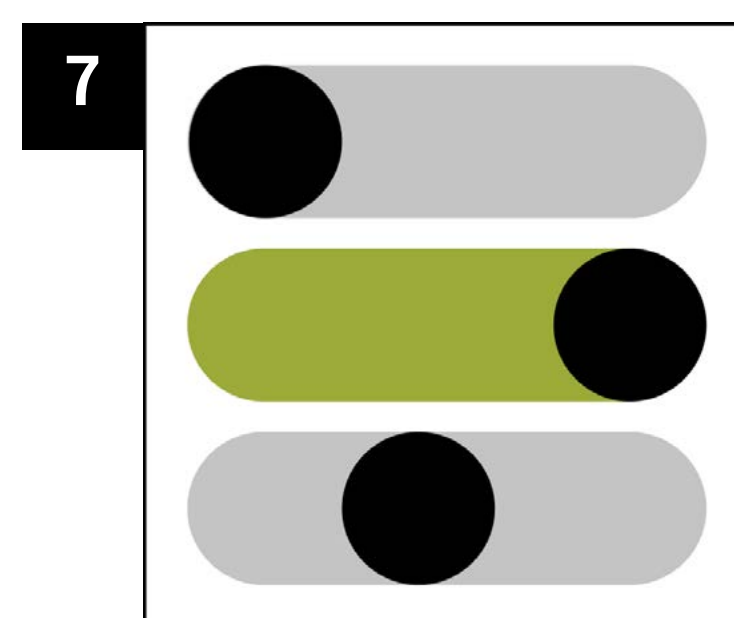
4 Show the value of collaborating with a travel buddy.



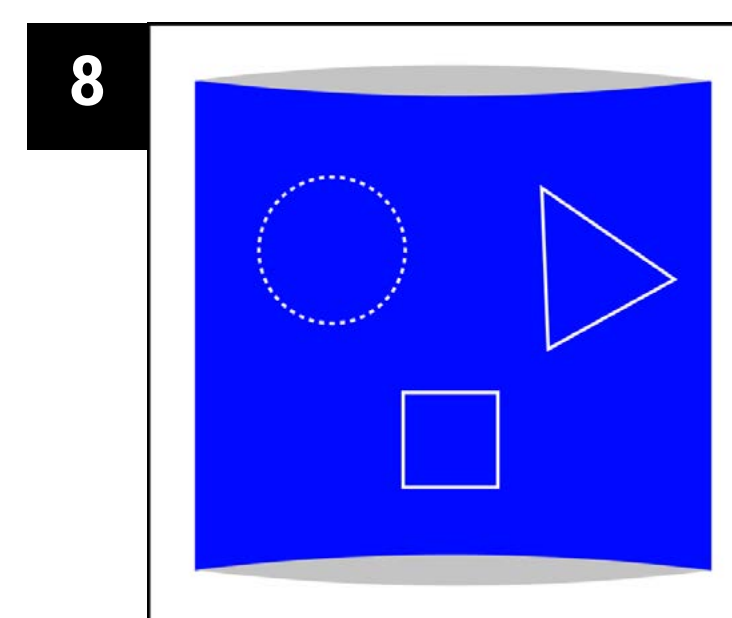
5 Use positive experiences that multimodal travelers appreciate.



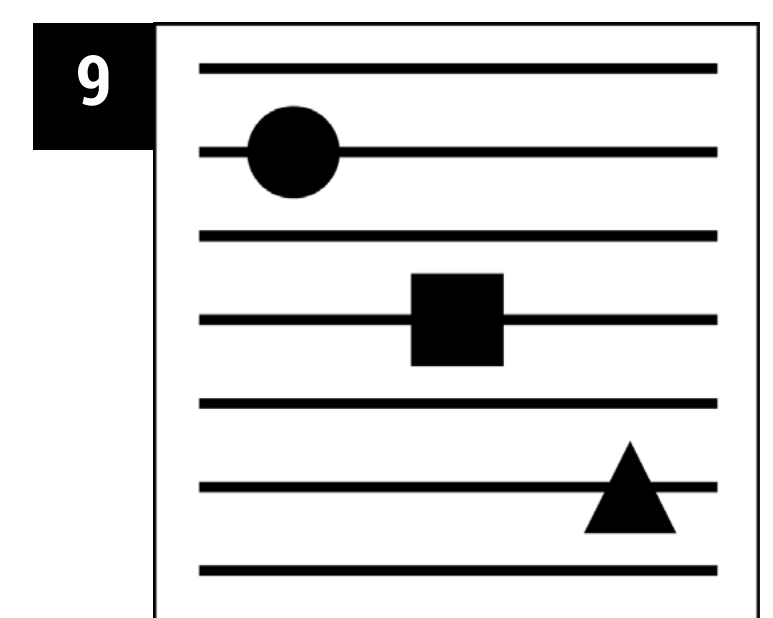
6 Be less assertive, but be there when needed.



7 Let users be in control of their journeys.



8 Would you commit to someone who is not honest?



9 Use cognitive cues to linger longer in users' heads.