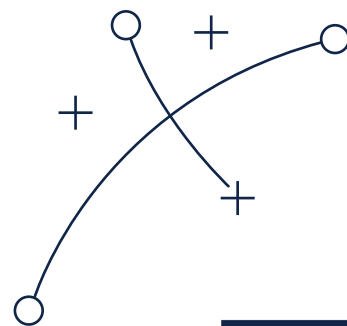


CX Playbook

Delivering digital foresight for
seamless customer experience





Contents

Introduction	4
What is CX?	6
Why is CX Important?	7
REI's CX Framework	8
Identify Your Customer	11
Understand Your Customer	12
Understand Service Design	12
Build customer personas	15
Map the Customer Journey	16
Build A Strategy Based On Your Understanding	19
Identify Metrics for Success	20
System Design	22
Gathering Product Requirements	22
Design The User Experience	25
A Note on Accessibility	25
Solution Ideation	26

Test Before Launch 29

The Importance of Usability Testing 30

Different Methods of Usability Testing 30

Evaluate and Improve 33

Execution 33

Collect Multiple Datapoints 34

Change Management 34

Increase Trust in Government 35

Sources 36

Appendix 37



Introduction

As the digital world continues to evolve at a rapid pace, customer expectations continue to rise. The private sector is investing heavily in customer experience (CX) with two-thirds of companies using it as a competitive advantage⁽¹⁾ and as global CX technology spending is expected to reach \$641 billion in 2022⁽²⁾. Government agencies are lagging behind the private sector and must keep pace to effectively meet mission objectives and improve trust in the government, especially as public trust hovers at near historic-low numbers⁽³⁾.

While improving customer experience might seem like an abstract concept, there are many laws in place that make it mandatory, such as the 21st Century Integrated Digital Experience Act (IDEA)⁽⁴⁾. IDEA was signed into law in December 2018, aiming to improve the digital experience for government customers. More bipartisan customer experience policies are also on the way, including the Trust in Public Service (TIPS) Act, which aims to improve trust in government by establishing customer experience as a central measure of performance⁽⁵⁾.

[REI Systems](#) is a technology company modernizing government IT to meet 21st century challenges. We believe it is our responsibility to help our clients leverage the power of technology to improve customer experience.



PLAYBOOK OBJECTIVE

The purpose of this playbook is to outline best practices for government agencies, and those that support them, for creating modernized applications and digital services that improve customer experience.

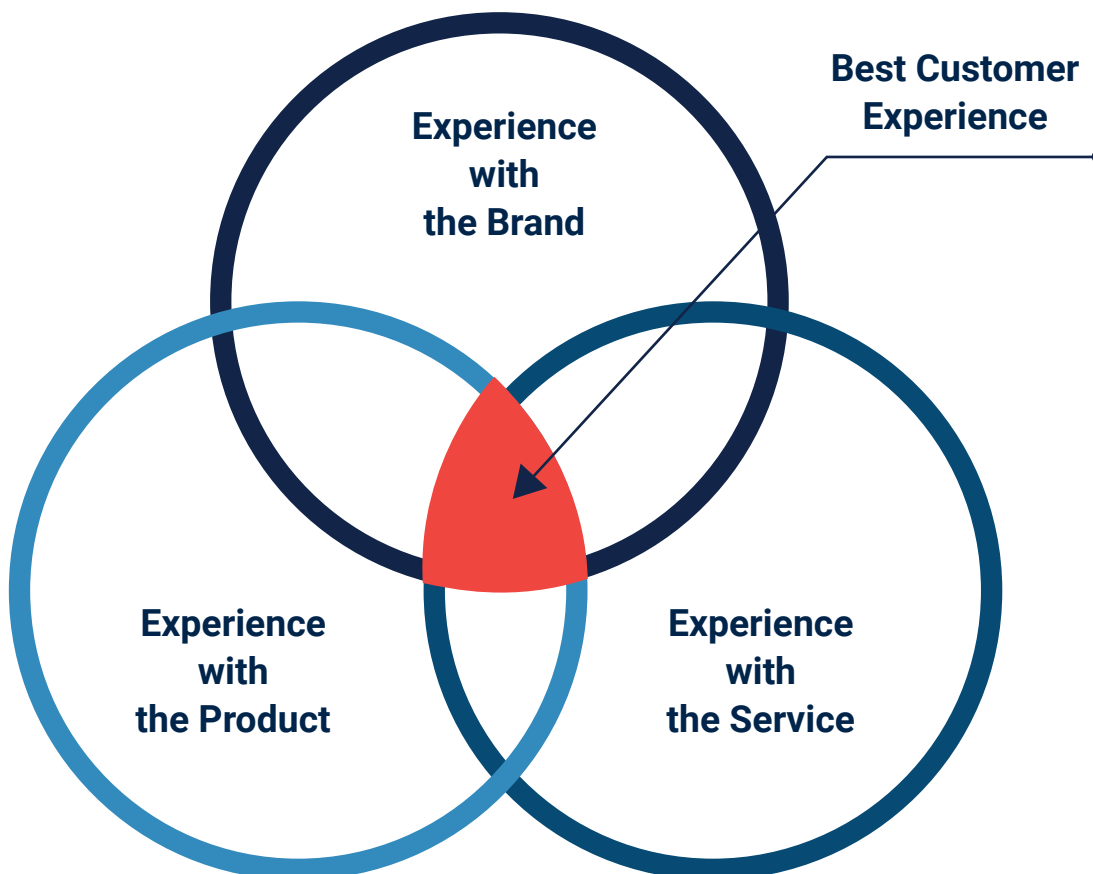




What is CX?

Customer Experience (CX), is your customers' holistic perception of your brand, including all their interactions with your products and services. It's their **total experience from start to finish**, which is often more than a one time "transaction." This can encompass everything from the accessibility of the information on your website, the usefulness of the content, and the tone of your communications to the ease in making transactions through your systems and the value of conversations with your helpdesk.

To improve customer experience, every individual at every level of your organization must embrace a **customer-first mindset** and understand how their actions contribute to the total customer experience.





“Think about how you feel when using Amazon’s services or Apple’s products. That is customer experience.”

Understanding your customer will help your organization achieve its mission objectives and **gain trust**. It requires empathy and curiosity, stripping assumptions to discover who your customers are, what drives them, and what they need from you.

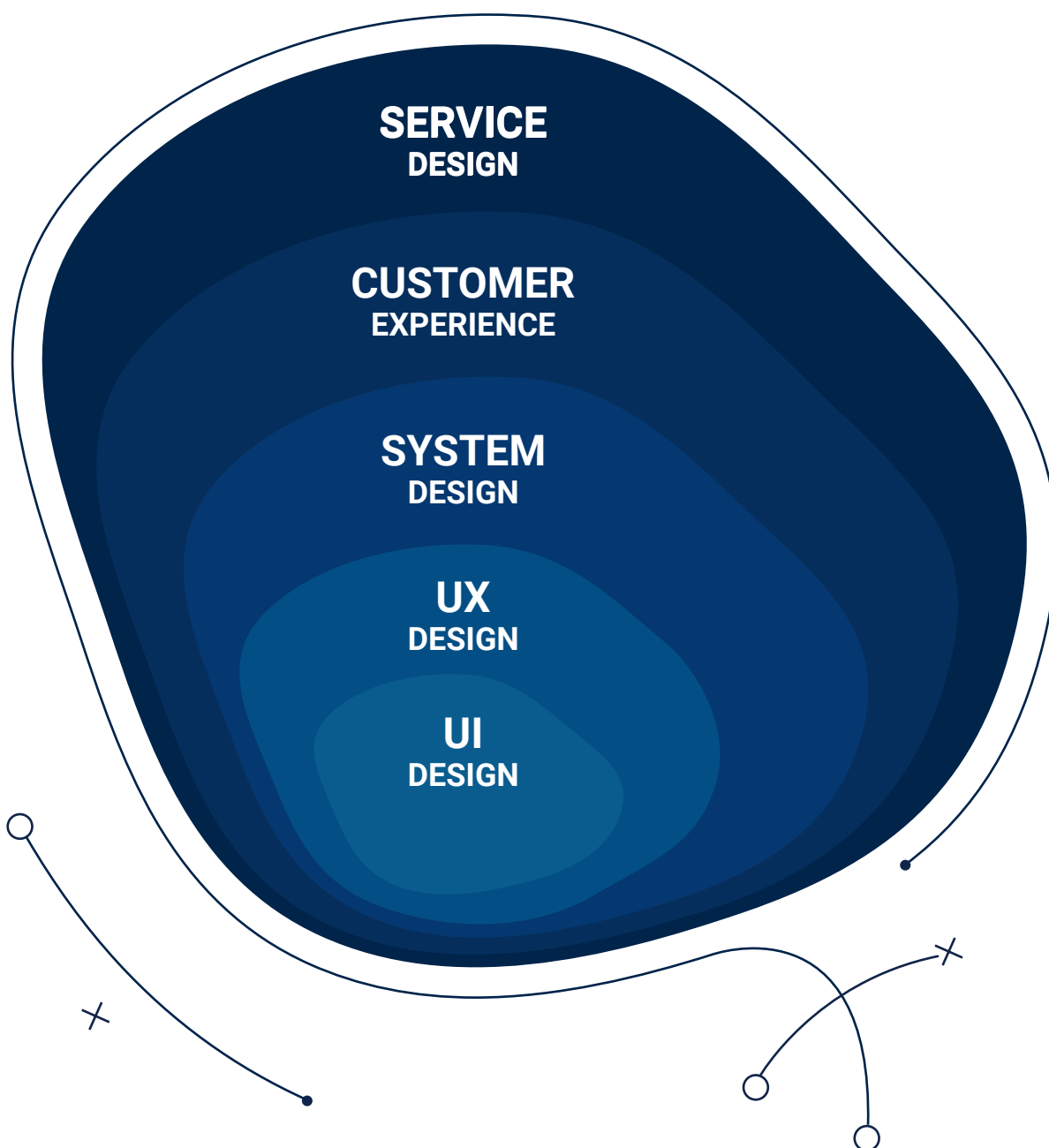
Why is CX Important?

Having a customer-first mindset and investing in a strategy focused on a consistent and positive customer experience early on will ultimately save time and money. When the products, services, and solutions you offer are designed with the customer in mind, you avoid spending an enormous amount of money and valuable time fixing problems resulting from a lack of or poor understanding of what your customers need. This is a common occurrence in software development, which can be mitigated with a proactive customer experience strategy.

REI is committed to advocating for our customers and making sure their voices and needs are met while creating products.

REI's CX Framework

There are many definitions, theories, and terms related to customer experience; in this playbook, we created a CX framework to help you understand our definitions and our view of the hierarchy between these terms.



Service Design

The intentional and holistic strategy and orchestration of the people, processes, and technology that enables the delivery of services to customers.

Customer Experience

Your customers' holistic perception of your agency or brand. It's their total experience interacting with you from start to finish.

System Design

The technology complement to service design, which encompasses the full technology solution architecture needed to power a service.

UX Design

The specific interactions and perceived ease and utility of a specific product or system. This is different from customer experience in that it's isolated to a specific product or system, while customer experience is about all the interactions they have with your brand.

UI Design

The outer appearance which presents color, layout, and overall visual design of a digital interface.

Our playbook will help you build a customer-focused approach by providing an ideal process from the start and highlighting tangible actions and best practices. While every project has different constraints, requirements, and stakeholders, the REI CX framework can serve as a guide to help you get started.



PLAY #1

IDENTIFY AND UNDERSTAND YOUR CUSTOMER

The word “customer” means different things to different people. Taking time to truly define who your customers are and what they need is a important first step.

Identify Your Customer

Identifying and understanding your customer requires a combination of tactics, such as analyzing available data, conducting interviews, surveying, monitoring online ratings and reviews, and social listening.

Questions to Consider:

- Who is your customer?
- Are they internal or external? Or both?
- What are the demographic factors that may affect how your customer interacts with your products and services (age, gender, race/ethnicity, marital status, occupation, location, life stage of your customer, etc.)?
- Is there a difference between your current customer base and your ideal customer base? If so, what are the differences?



Understand Your Customer

Identifying and understanding your customer requires a combination of tactics, such as analyzing available data, conducting interviews, surveying, monitoring online ratings and reviews, and social listening.

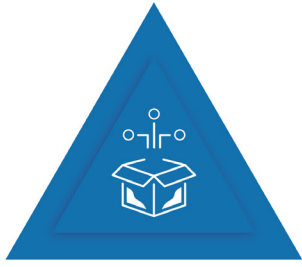
Questions to Consider:

- What are their goals?
- What are their motivations?
- What are their fears?
- Why are they coming to you?
- What problems are you trying to solve for them?
- What specific benefits are they seeking from you?
- Who can they go to instead of you?
- What are their current attitudes and beliefs?
- How do they typically consume information?
- How do they make decisions?
- How did they originally find out about you?

Understand Service Design

Many components come together to form the end customer experience. While we may be working on a specific product or platform, we operate within the context of a larger service. Service design can help inform our design process by analyzing and documenting the broader context of our project.

It's important to think of the "big picture" behind organizing resources to provide a positive customer experience. These resources—people, props, and processes, often called the "three Ps"—include digital platforms but extend beyond the scope of UI and UX. Service design plans and organizes these resources to optimize the assets and restrictions of a service.



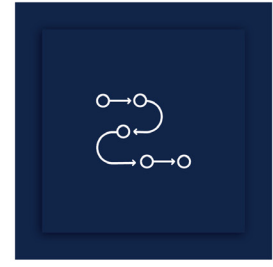
PROPS

Physical or digital artifacts, including products, used throughout the service



PEOPLE

Anyone who creates, uses, or is indirectly affected by the service



PROCESSES

Workflows, procedures, or rules needed to perform the service successfully

Design based on the Nielsen Norman Group methodology.

Service design involves three layers relating to customer experience, which can be organized into a service blueprint. Between each layer are the “lines” of interaction and visibility. The line of interaction indicates the extent to which the customer can directly interact with the product or service through touchpoints. What happens beyond the line of interaction could be documented in detail on a journey map. The line of visibility indicates the parts of the service the customer can see but not directly interact with.

Relevant Terms

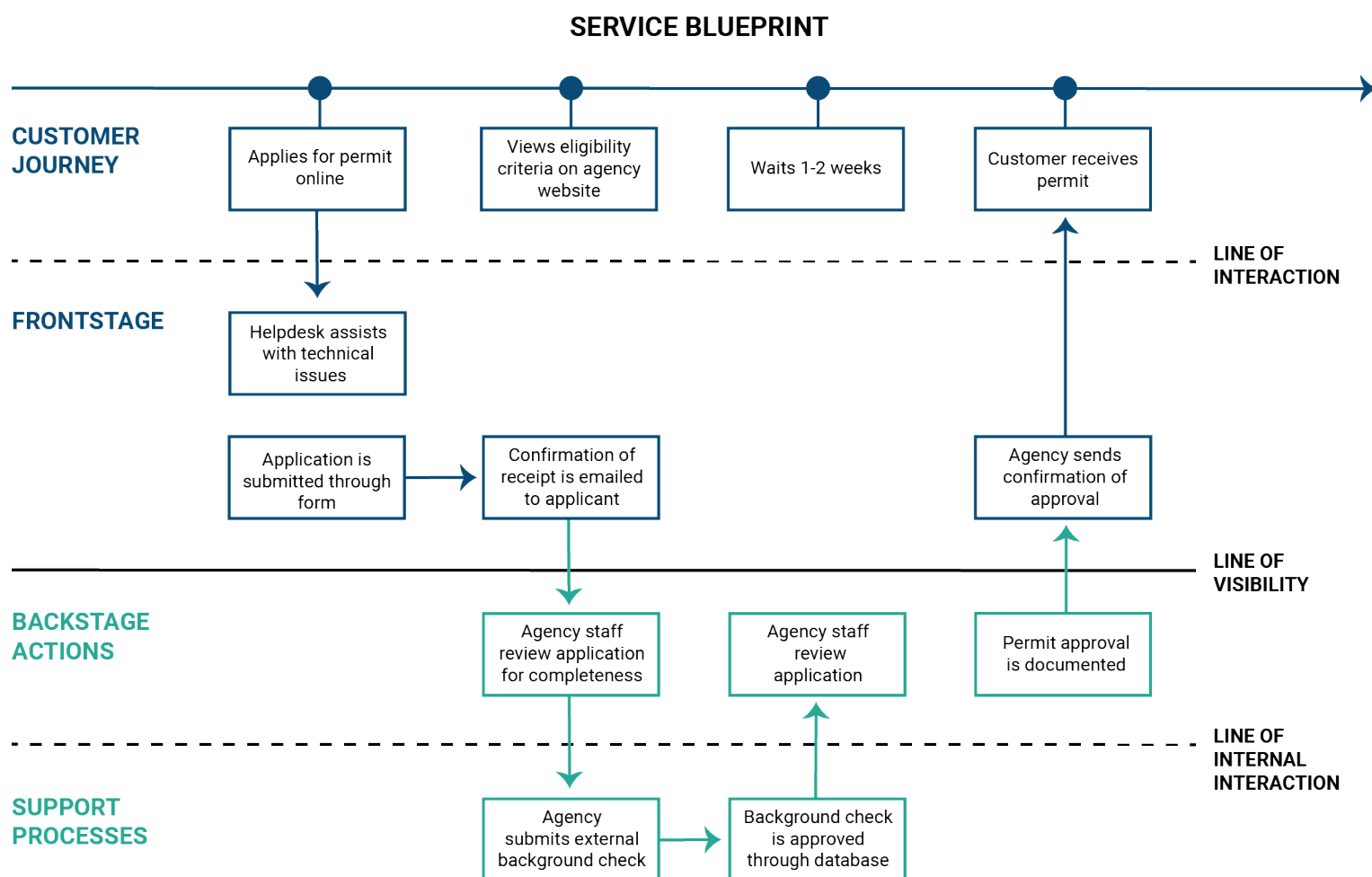
Front Stage: This portion of resources encompasses the touchpoints in the user’s journey. Any websites, apps, help desks, or products the customer directly interacts with constitute the front stage.

Backstage: This portion involves policies that govern a service, supporting technical infrastructure, platform architecture, and system design, all of which affect the customer experience but are not direct touchpoints for the end user.

Relevant Terms Continued

Line of visibility: The separation between the front and backstage, or that which the end user can and cannot see and interact with.

Line of interaction: The separation between that which the customer can directly interact with as a touchpoint and that which they cannot.



REI's service blueprint can help you in your journey; [Download File.](#)

Build customer personas

Personas are fictional characters that represent your different customer types. Building personas helps you get in the mindset and perspective of your specific customers so that you can design products, services, and systems to meet their exact needs. Gathering multiple personas gives you a reference for whether you are meeting the needs of all customers and can help with prioritization.



STEPHANIE
The Planner

37 years old, Program Director
Brooklyn, New York

PERSONAL DETAILS

Demographics: Married, 1 Child, English/Mandarin Chinese

Education: Master of Business Administration

Employment: IT Industry, 12 years

Income: \$78k - \$88k

TASKS

- Initiate and set goals for programs according to the strategic objectives of the organization.
- Planning the programs from start to completion involving deadlines, milestones and processes.
- Act as sole point of contact with the programme manager
- Establishing formal reporting arrangements on programme or project progress.
- Appraising options and submitting for approval.
- Managing the programme budget, including risk allowance.

ENVIRONMENT

- Attends frequent virtual meetings with team members and stakeholders.
- Works from home office.
- Spends much of her time sitting or standing at her home computer station, composing emails, and placing business calls.
- Moderately distracted by family members.

GOALS

- To reduce clutter of out-dated documents.
- Lead large group discussions to answer questions and remedy complaints.
- Improve schedule quality and consistency.
- Ensure that PMs be part of the strategic planning process.
- Have a detailed plan to identify potential risks before the project commences and creating a plan to mitigate those risks or prevent them from happening.
- Improve collaboration and communication.

FRUSTRATIONS

- Meeting unrealistic project deadlines and expectations clients and stakeholders have from them.
- Finding the right project management software.
- Not having the foresight to identify potential 'what if' scenarios in order to make up making up contingency plans.
- Increasing demands with insufficient resources.
- Disorganization of documents and miscommunication.

TECHNOLOGY

IT and Internet

Networking Software

Mobile Apps

Social Media

REI's persona template can help you in your journey; [Download File.](#)

Map the Customer Journey

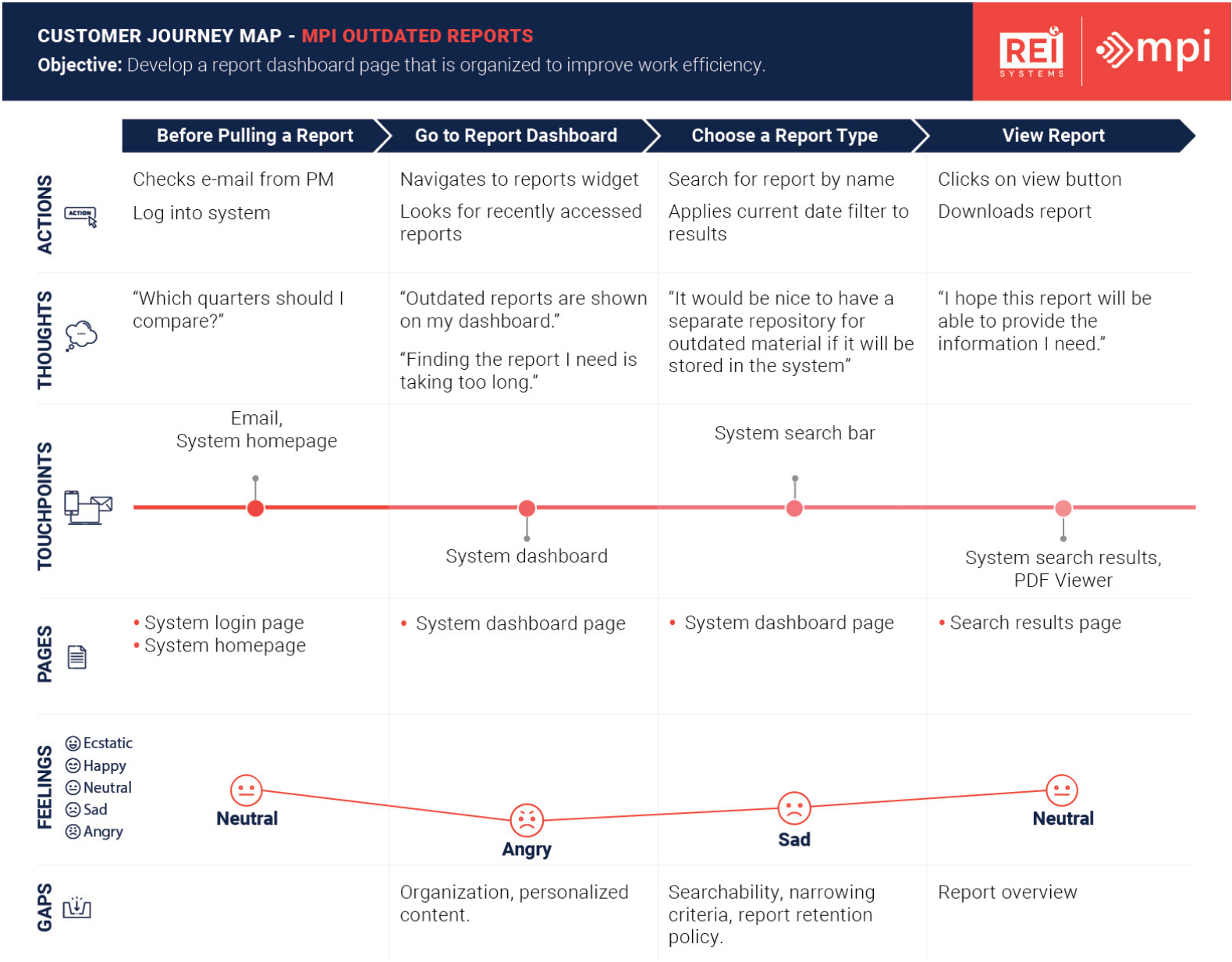
Mapping the customer journey can help you understand your current customer experience and identify roadblocks that need to be addressed. Note that there could be different customer journeys depending on the personas you identified. Create a visual depicting their entire journey from the initial touchpoint (or interaction) with your brand all the way through the end. When building the customer journey, be as detailed as possible.

Questions to Consider:

- What do you consider the initial touchpoint?
- Are there touchpoints before they become an official customer?
- How do your customers find out about you?
- What steps do they take along the way?
- What systems or tools do they have to use during these steps?
- What specific touchpoints do they have along the way?
- What do they think, feel, or need at each of these touchpoints?
- When do they drop off?
- Do they come back again?

For new initiatives, the customer journey map allows you to design products, services, and systems that are holistic, seamless, and consistent; a fractured or siloed journey creates customer frustration that hurts the bottom line. For improving existing initiatives, the customer journey map can help you pinpoint specific problems and can facilitate discussion on which areas to prioritize when there are time or budget constraints. This allows you to focus your resources on addressing the most critical and impactful items and avoids long-term user frustration that might lead to losing your customer.

Ideally, the customer journey map is a living document that is continuously reviewed and updated. The pace of technology and customer expectations is at an all-time high; organizations must continuously take “inventory” of their total experience to keep up with the pace.



REI’s journey map can help you in your journey; [Download File.](#)



PLAY #2

BUILD A STRATEGY

Putting the customer at the core of your strategy leads to a positive experience for both employees and customers, builds trust in your brand, and results in long lasting relationships.

Build A Strategy Based On Your Understanding

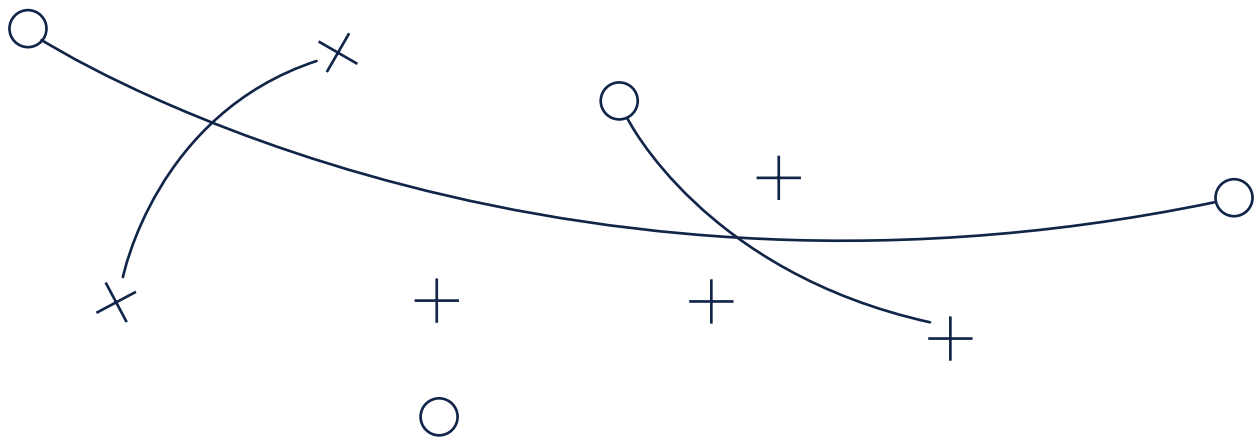
It is important to create a clear mission statement with a customer-first narrative and to incorporate a customer-centric mindset within your business operations. This includes building a customer-friendly environment, setting up measuring processes to reflect goals and feedback systems, opening channels of communication between employees and customers, and adjusting processes for continuous improvement based on the feedback. Below are elements to consider when building a strategic plan:

Questions to Consider:

Specifying your goals and objectives helps keep your process grounded in success criteria. This is important for keeping your design process focused and allowing you to articulate the value you provide.

- What outcomes do you want to achieve?
- What outcomes are your customers expecting?
- Are there current issues that need to be resolved?
- Are there consequences if these issues are not resolved in a specific timeframe?

Be as clear and specific as possible.



Identify Metrics for Success

A strong customer experience (CX) metrics methodology enables an organization to objectively assess the quality of the customer experience it offers. It also offers insights that support businesses in identifying areas for improvement, prioritizing investments, monitoring CX advancements, and aligning the organization around a single objective.

Questions to Consider:

- How are you going to measure success?
- What are your key performance indicators (KPIs)?
- Do you have baseline data to use for comparison?
- What specific metrics will you track?
- How are you going to track this information and how often?
- Are there gaps in your data collection?

Customer experience metrics can be divided into two major categories:

Behavioral <i>What they do</i>	Attitudinal <i>What they say, feel</i>
Page Views	CSAT (Customer Satisfaction)
Session Duration	NPS (Net Promoter Score)
Task Success	Feedback from Customer Surveys
Task Time	
Search Queries	

As a CX practice, we strive to increase customer loyalty and success, which requires measuring loyalty. Customer loyalty can be measured in one of two ways: attitudinal assessments or behavioral measures. It is critical that we measure both to produce dependable CX results. KPIs and goals are most frequently utilized for benchmarking across the industry.

Finally, these metrics help you increase trust in public service. In accordance with Executive Order 12862 – Setting Customer Service Standards, agencies are required to measure customer experience performance and benchmark that performance against the highest standards in the private sector. By documenting metrics and learning from them, we can improve customer experiences and garner more confidence in civil services.



System Design

System design is the technology complement to service design, answering the questions – what do the technology solutions and architecture look like? How can we best leverage technology to create a service that meets the customers' needs?

System design often includes elements the customer does not directly see or interact with. This can include managing software development lifecycles, licensing timelines, the integration between data sources, and the way a suite of technical products and processes is strategically designed to support the needs of a service. System design is critical to CX because of its role in keeping the service available and operational for customers.

Gathering Product Requirements

There are other types of requirements needed to understand product requirements fully: business requirements (such as branding elements, competitors, sales and marketing, and customer service), technical requirements (such as operating systems, devices, or any technical limitations), and user requirements (who is the user and how do they use the product). While it's tempting to jump into the specific product requirements (functionality), understanding the other requirements will help you think about the big picture. There are different methods for gathering requirements but the discussion and documentation is key. There must be an organized way to document the information and a process for capturing any changes along the way.

User Stories

In Agile methodology, a user story helps shift the requirements so it's stated from the perspective of a user. It is written in plain language and summarizes an end goal. These requirements should be driven directly by users and defines the acceptance criteria for software development. User stories are helpful for various roles, including business analysts, developers, and designers because the information helps everyone focus on the end-user.





PLAY #3

DESIGN THE USER EXPERIENCE

User experience (UX) is any interaction a user has with a product, application, system, or service, as well as the feelings users face while journeying towards their end-goal.

Design The User Experience

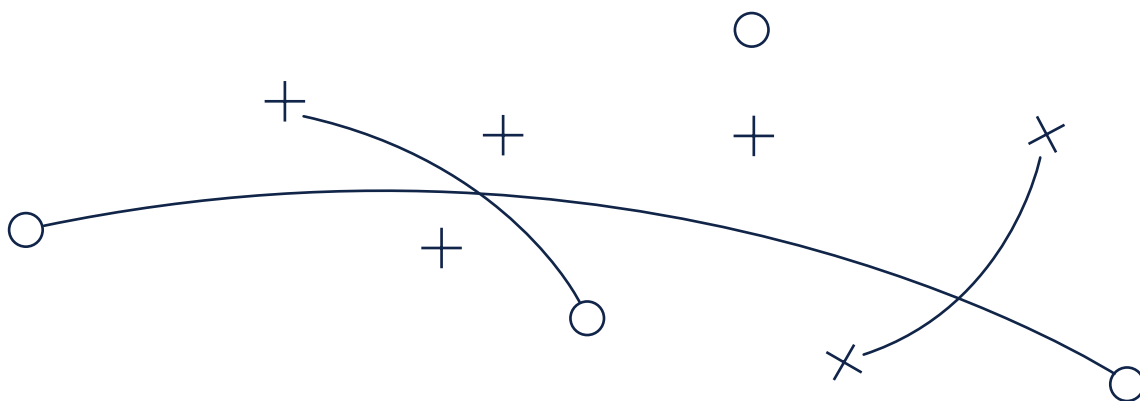
While user stories are helpful in understanding the end goal, user experience (UX) is about the journey the user takes and their experience as they attempt to get to that end destination. UX focuses on the design of individual customer touchpoints that contribute to the total customer experience. Many elements, such as written content, the look and feel, and the way a user navigates a system, contribute to the user experience. The customer personas you developed will help you identify the types of users you have so that you can design experiences based on their profiles.

A Note on Accessibility

Creating accessible websites and other digital platforms is the law. [Section 508 of the Rehabilitation Act](#) requires agencies to give people with disabilities equal access to information. At the most basic level, this involves checking color contrast, adding alternative text to images and graphics, ensuring your designs have a defined hierarchy that translates to semantic HTML, and testing keyboard navigation once a prototype is built by developers.

In the context of diversity and inclusion, **all users** benefit from accessibility best practices, not just a small subset. In addition to users who are affected by a permanent disability, there are many more users experiencing a temporary difficulty from short-term impairments or their environment. Users with wrist injuries could find alternative forms of interface navigation useful, or those with motion sensitivity would appreciate the ability to pause/play background animations on a website.

When software professionals design with accessibility at the forefront of their decisions, it doesn't need to be a separate set of concerns; rather, it should be what guides your team's UI design process. In addition, testing on a wide userbase with differing accessibility needs can reveal the pain points of an interface – and ways to get as close to success as possible.



Solution Ideation

Before jumping into ideation, it's important to prioritize the customers' needs. Most projects have budget or time constraints that will force a project to launch without all the bells and whistles. This prioritization exercise is critical to understanding what are "must-haves" vs. "nice-to-haves" and aligns everyone's expectations before diving into solutions. Document the "must-haves" vs. "nice-to-haves" and use it during ideation.

Diversity leads to the greatest innovations. Ideation is best conducted when different roles, such as designers, business analysts, developers, and product owners, are involved to weigh in with expertise and additional knowledge. During these sessions, you should explore as many ideas as possible, challenge assumptions, and think outside the box.

Ideation Techniques:

Brainstorming : A way to generate ideas that could solve a potential problem

User Interviews : One on one discussions that talk about a specific issue

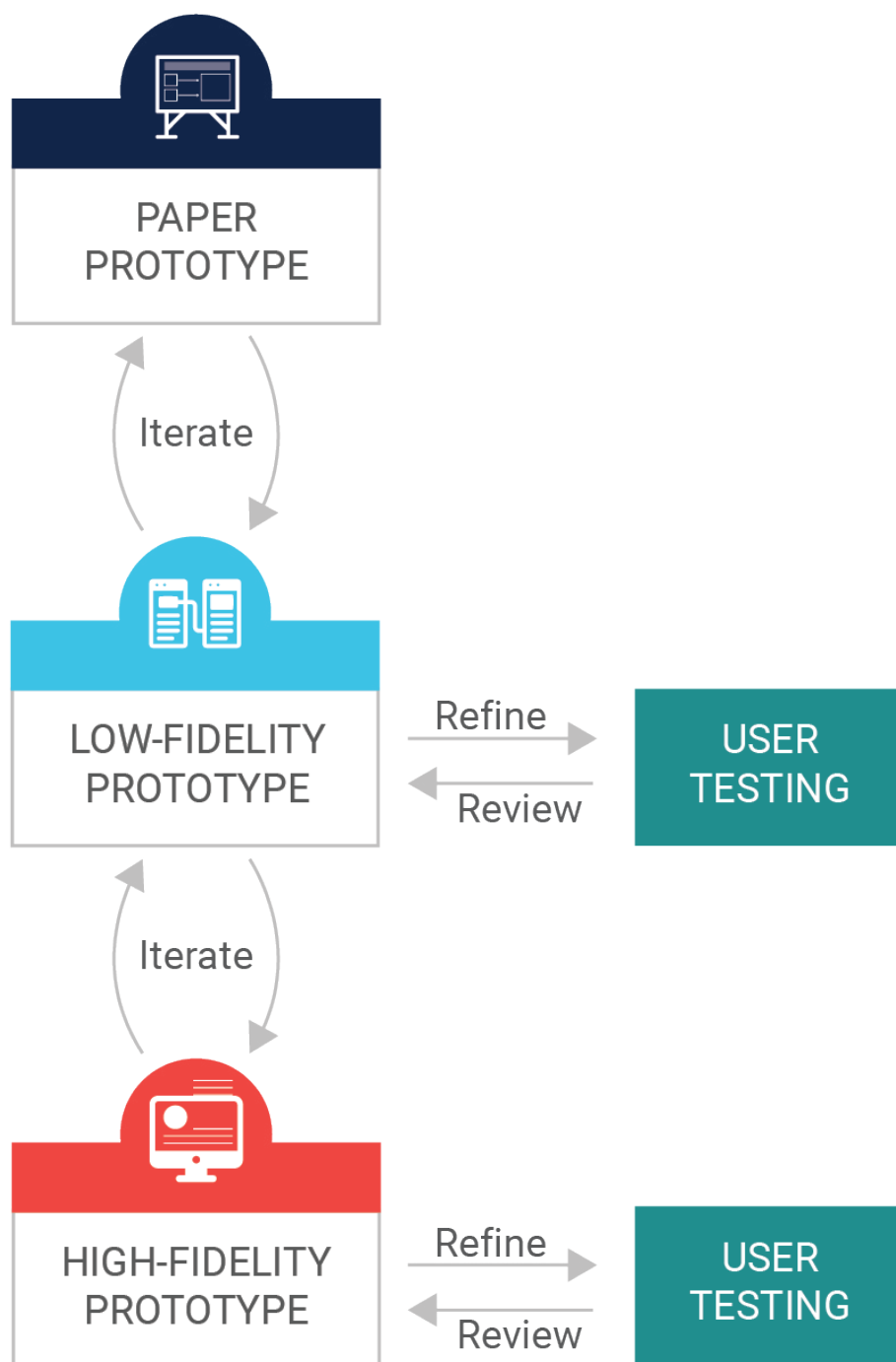
Low Fidelity Hand Sketches: A method used by many to depict the high-level structure and layout of the product/application

Conversations around technology possibilities and limitations may also occur during this phase and it is through deep collaboration that the best solutions, despite constraints, will surface.

Execution

After identifying and understanding your customer at a deeper level, developing a strategy, understanding the user requirements, and ideating, it is time to bring all the insights and ideas together. When it comes to experiences, the goal is to make it simple, intuitive, and delightful. Using industry standards and incorporating a design system, such as the [United States Web Design System \(USWDS\)](#), will help to achieve the consistency and simplicity you are trying to achieve.

Creating low fidelity wireframes (e.g. by hand or using a sketching tool such as Balsamiq) first will get the general idea of the proposed solution out for discussion. This is an iterative process that allows you to focus on functionality and navigation rather than the complex details of the application at this stage. Once there is alignment and approval on the process flows, you may move to creating high-fidelity prototypes. Mockups are designed to establish look-and-feel and are used as a visual basis for the prototypes. These prototypes will be highly detailed to accurately represent the final product. Continue to iterate and improve the design by testing and gathering user feedback along the way.





PLAY #4

TEST BEFORE LAUNCH

Testing during iterative phases is critical to ensuring that you are developing a solution to users' needs. Validation will confirm that you are on the right track, whereas the opposite will allow you to pivot and adjust.

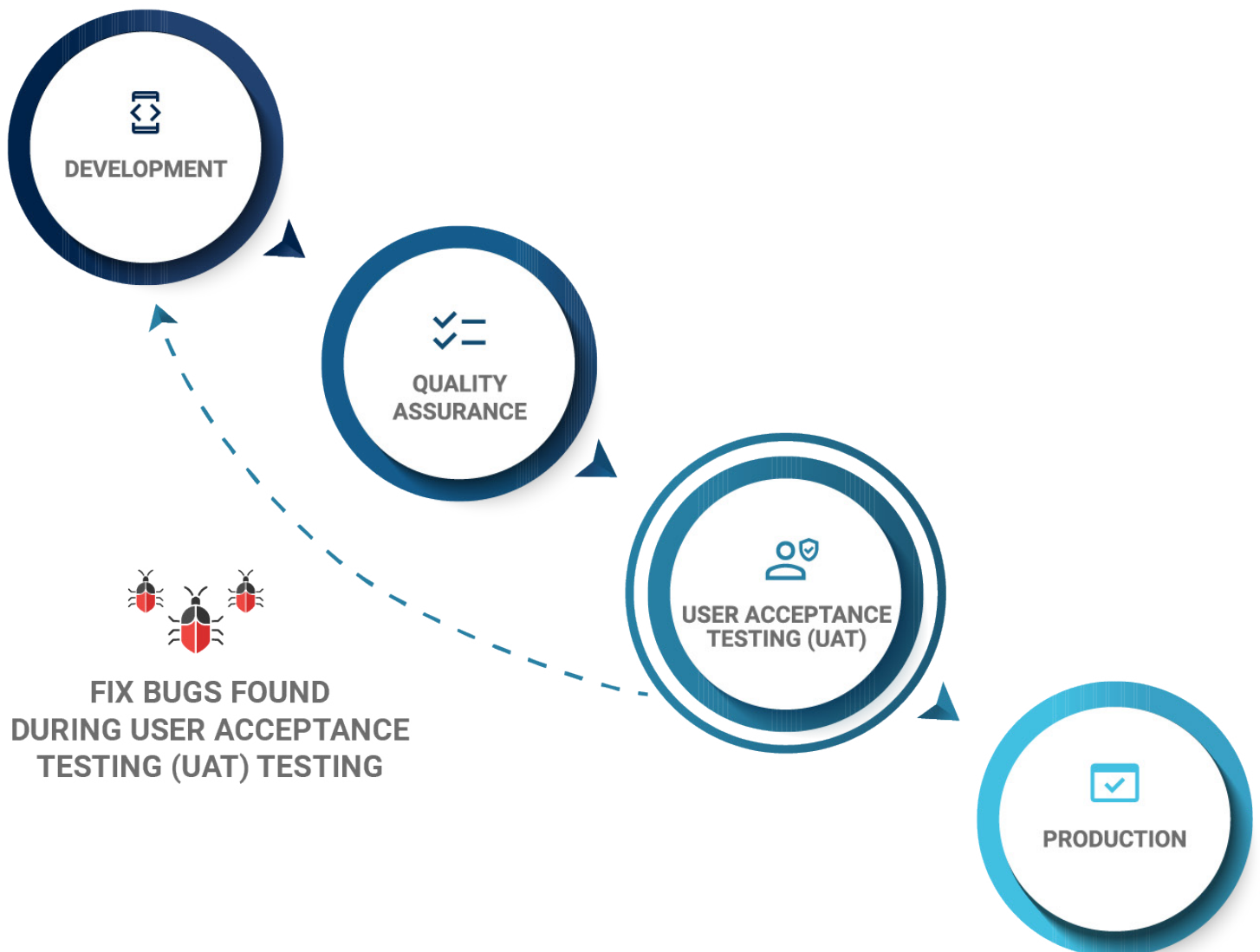
Test Before Launch

After the User Experience has been designed and while the product, application, system, or service is being created, include the UX in reviewing iterations of the design to ensure it is being developed according to the intended design and based on the strategy.

As the team creates each iteration of a solution, refer back to Play 2. Ask if the solution meets the objectives and goals you defined during that Play. Also, compare the solution to your user stories to ensure the solution you're building is what users truly want and need.

If your solution is not making progress toward goals, you may need to make adjustments to your approach. If so, now is the time to pivot and change directions.

Once the solution satisfies the users' needs identified in your research and meets the goals and objectives you defined in Play 2, you're ready for a more formal approach to user adoption.



The Importance of Usability Testing

Formal UAT and accessibility testing must be performed to ensure the product is working for users of all abilities and fall within acceptable standards.

Usability testing helps identify problems in the design, uncovers improvement opportunities, and provides the chance to learn more about users' behaviors and needs.

Different Methods of Usability Testing

A. Task-Oriented Testing

This method involves asking participants to complete typical tasks associated with the product. These tasks could include logging into a website, submitting information, or making a payment. When setting up a task, it is important to set a scenario so that users are informed and encouraged to interact with the product. The task prompt should also be open-ended and unbiased. During testing, those conducting the study can observe the click path, record significant quotes from participants, and track whether tasks were completed.

B. Accessibility Testing

Conducting heuristic analysis for accessibility ensures that designs meet 508 compliance requirements as well as web content accessibility guidelines (WCAG) in a test environment. Principles such as text hierarchy, color contrast, and timing are all taken into account.

C. Device/Browser/Operating System Testing

It is important to test the product on different screen sizes to confirm it is accessible on all types of devices. Designers also conduct browser testing and operating system testing to ensure the product works on various browsers and operating systems.

D. Maze Testing

This method uses unmoderated remote testing platforms to analyze user experience. Metrics such as heat maps, mis-clicks, success rate, and bounce rates are all recorded to acquire a better understanding of experience and to identify opportunities for improvement.

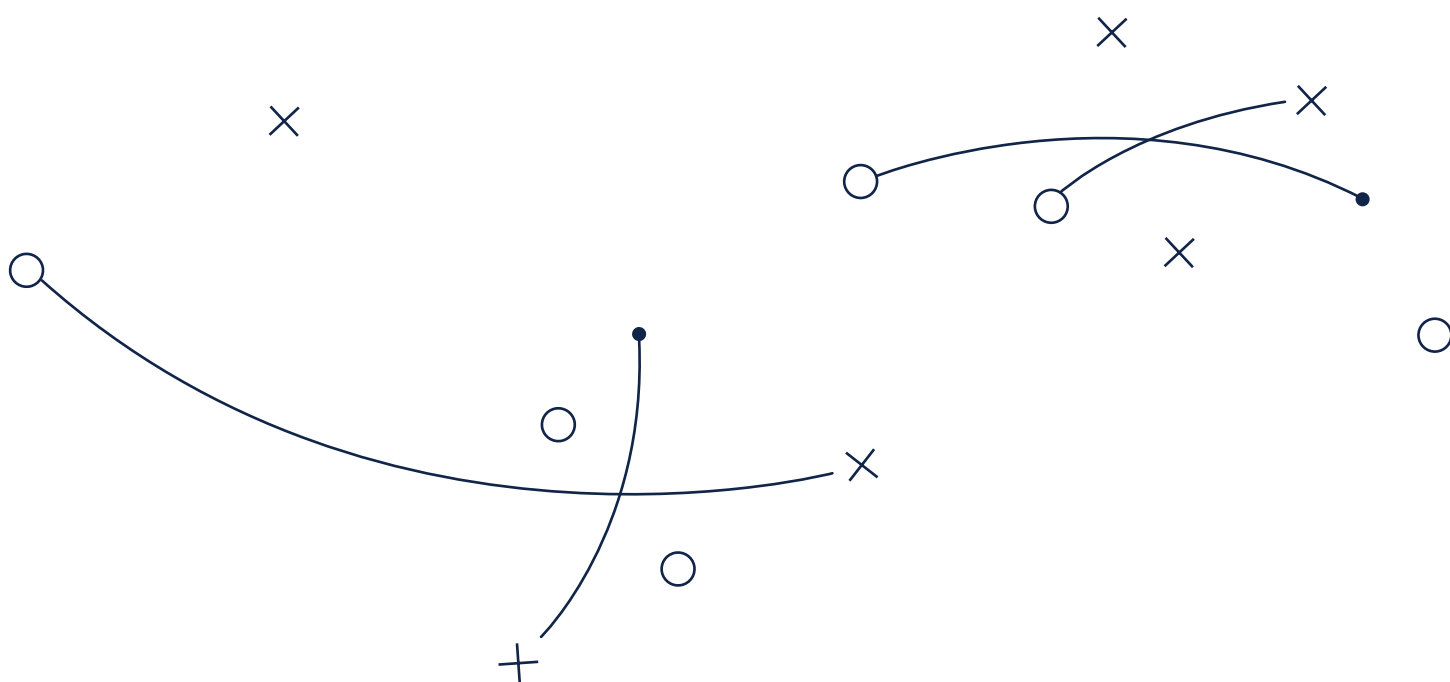
E. Card Sorting^[1]

This method observes how users create hierarchies when given information and provides insight on how to make a product more intuitive. First, create a set of cards that represent the content that users are meant to navigate. Participants are then asked to organize a set of concepts or topics in whatever way makes sense to them. After sorting, ask participants to explain their reasoning—why they separated the cards into certain groups, why they may have created hierarchies among the cards, etc. It is important to conduct this test with multiple users to understand trends.

Analyzing Feedback

Once all the feedback is collected, it's important to gather all the data in one place. There are many ways to analyze feedback. One method is to organize feedback into common themes. From these themes, insights can be brought to light. Strong insights should be easy to understand and inspire direct action.

[1] <https://www.nngroup.com/articles/card-sorting-definition/>





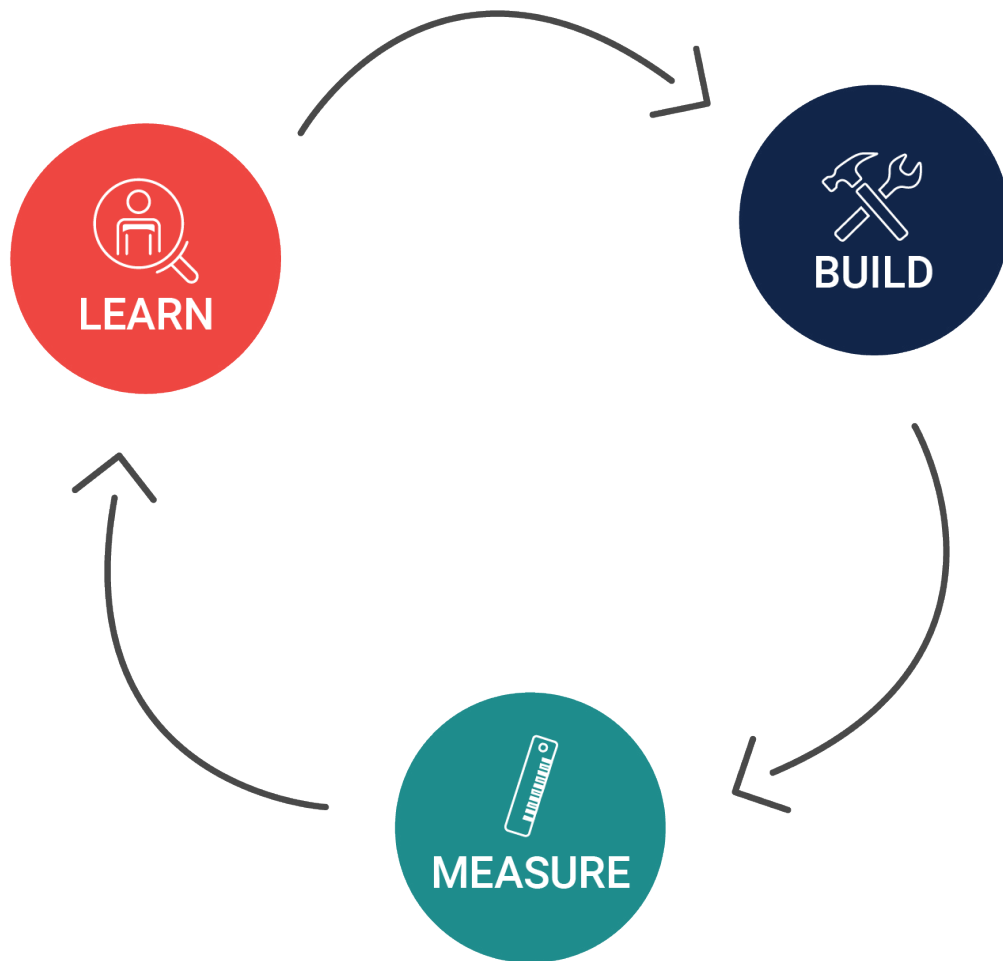
PLAY #5

CONTINUOUSLY EVALUATE AND IMPROVE

Two conditions will always hold true: Users' needs evolve over time, and there's always room for improvement. Once your product is launched, the work isn't over. Consistently evaluating your product's performance relative to users' needs not only will help you keep the user in focus, but also will help you identify early on when improvements need to be implemented.

Evaluate and Improve

A product is never done! Prior to user testing, have an evaluation and improvement plan in place that you can immediately activate after the product launches. You will want to start capturing data immediately so you can effectively measure the product's performance against the metrics identified in the strategy session (defined in Play 2). Remember, part of successful measurement and evaluation is consistency in data capture. Be sure to set up a regular cadence for gathering this data.



Execution

A product is never done! Prior to user testing, have an evaluation and improvement plan in place that you can immediately activate after the product launches. You will want to start capturing data immediately so you can effectively measure the product's performance against the metrics identified in the strategy session (defined in Play 2). Remember, part of successful measurement and evaluation is consistency in data capture. Be sure to set up a regular cadence for gathering this data.

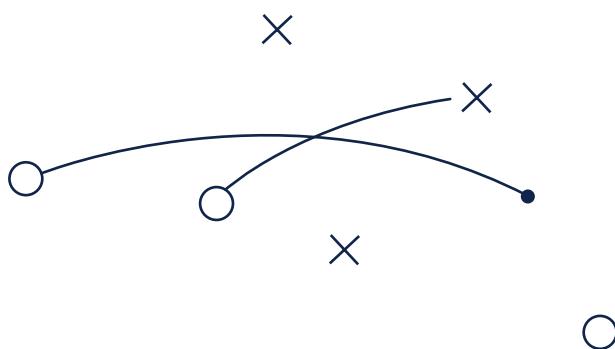
Collect Multiple Datapoints

Teams need to evaluate multiple behavioral and attitudinal metrics to holistically understand users' experience. Don't rely on just one metric to determine success or identify opportunities for future improvements. You need to analyze a cross-section of data that represents success in terms of delivering on the product strategy. For example, you might collect and analyze data from tracking user pathways and reviewing heat maps as well as soliciting feedback from surveys or user interviews.

Use the data gathered to refine your improvement plan, and keep in mind that the process for continuous improvement is not linear. If the data reveals that goals are not being met, revisit previous Plays to help determine where improvements can be made. Further, just as research and product development planning is documented, evaluations and subsequent improvements should be documented, as well.

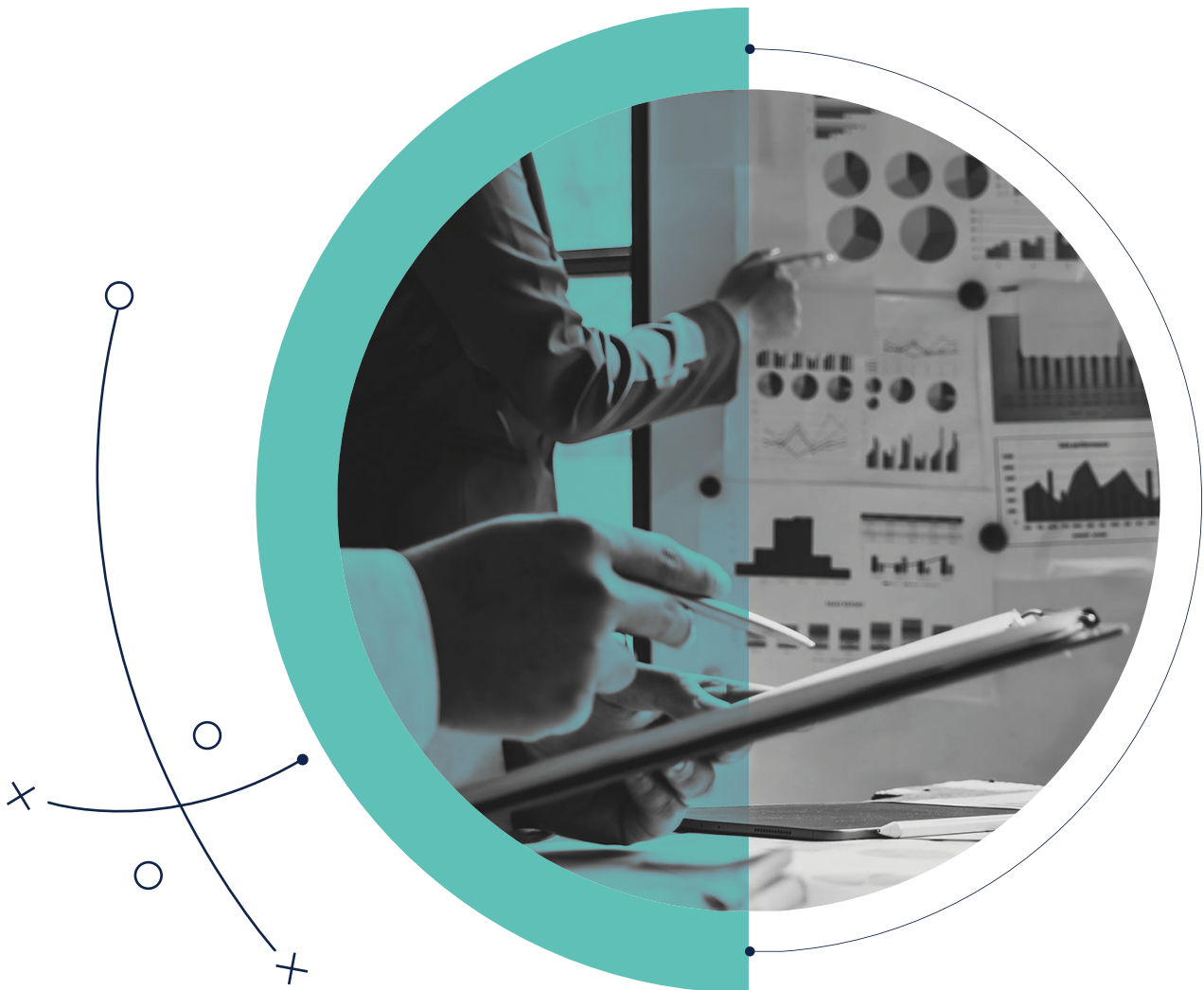
Change Management

Keep in mind that people generally have a hard time adjusting to change. For products that are being modernized or enhanced, any change needs to be strategically communicated and carefully managed – ahead of, during and after launch – for users to successfully adopt a product. Ideally, any major software development modernization project should have a corresponding change management plan to help users get to a point of acceptance.



Increase Trust in Government

Ultimately, improving existing products or creating new ones that better meet user needs can help increase trust in government. Customer experience is an ever-evolving topic, especially as technological innovations continue to push the possibilities and shape how we live, interact with each other, and make transactions. The federal government recognizes the need to get up to speed with the private sector, but there is a long way to go. Federal government contractors such as REI Systems are in a position to help with that effort through the effective design of technology centered around the humans who use them. Together, we can help increase trust in government by enhancing the public's experiences.



Sources

- (1) Pemberton, Chris. "Key Findings from the Customer Experience Survey." Gartner, <https://www.gartner.com/en/marketing/insights/articles/key-findings-from-the-gartner-customer-experience-survey>.
- (2) Shirer, Michael. "Spending on Customer Experience Technologies Will Reach \$641 Billion in 2022, According to New IDC Spending Guide." Business Wire, 6 Aug. 2019, <https://www.businesswire.com/news/home/20190806005070/en/Spending-on-Customer-Experience-Technologies-Will-Reach-641-Billion-in-2022-According-to-New-IDC-Spending-Guide#:~:text=Spending%20on%20Customer%20Experience%20Technologies,IDC%20Spending%20Guide%20%7C%20Business%20Wire>.
- (3) "Americans' Views of Government: Low Trust, but Some Positive Performance Ratings." Pew Research Center - U.S. Politics & Policy, Pew Research Center, 25 May 2021, <https://www.pewresearch.org/politics/2020/09/14/americans-views-of-government-low-trust-but-some-positive-performance-ratings/>.
- (4) Public Law 115–336 115th Congress an Act. <https://www.congress.gov/115/plaws/publ336/PLAW-115publ336.pdf>.
- (5) Text - S.1934 - 117th Congress (2021-2022): Trust in ... <https://www.congress.gov/bill/117th-congress/senate-bill/1934/text>.

Appendix



[CX Methodologies and Deliverables](#)



[UX Quick Start Guide](#)



[Service Blueprint](#)



[Persona - Extended](#)



[Persona](#)



[Journey Map](#)



SCAN ME

REI CX Resources

Scan QR code to retrieve and download REI's exclusive CX resource.

<https://www.reisystems.com/capabilities/customerexperience/cx-resources/>



45335 Vintage Park Plaza,
Sterling, VA 20166

Phone: (703) 480-9100 | Fax: (703) 689-4680

www.reisystems.com