Sapient Methodology Overview for ACRE

July 2018

ValuePath is Sapient's unique, well-developed, collaborative project management process. ValuePath has a proven track record for quickly delivering Salesforce projects that consistently meet or exceed our client's expectations. Part of what makes ValuePath such an exceptional tool is its ability to be flexible and collaborative, while providing appropriate structure to our project management capabilities. ValuePath is a collaborative process with a high level of involvement between your team and ours. It starts with traditional analysis that helps define your business needs through extensive requirements workshops, to help us analyze your detailed business needs. At the conclusion of the Definition phase, Sapient performs a gap analysis to ensure the project is on track for time and budget, while also gaining agreement from you that our requirements definitions are in alignment with yours. From there, Sapient moves into a design phase that lays the foundation for iterative agile build and test. Each iteration contains both a Sapient-led System Test and a County-led User Acceptance Test (UAT) that serves as acceptance for the iteration functionality. After all iterations are complete, a final UAT is followed by Deployment and Training. Sapient uses agile development techniques which permit us to build requirements faster, and to produce working prototypes and demo application functions shortly after completing the initial application design.

Embracing Change

ValuePath recognizes that circumstances change over the course of a project - new technologies arise, legislation and regulation are introduced, and project sponsors change, for example. By revisiting a product backlog of requirements when planning each development sprint, while also considering the latest round of user feedback, the team can quickly adjust course to build exactly what the customer wants. To enable this, ValuePath defines a key project role of Product Owner to be ACRE's voice of all stakeholders to the development team.

Agile / Discipline Paradox

While ValuePath is designed to handle change, these projects actually require more discipline and adherence to time-boxed schedules and ceremonies than traditional waterfall implementations. While the solution itself is flexible and able to evolve to best meet needs of the end users, the project follows a strict cadence of ceremonies to support this. Agile leverages the power of time-boxing to keep projects on schedule and ensure teams are motivated and focused with their efforts. Agile projects require end users to test and accept the solution increments after each sprint. Agile also requires the team to meet after each sprint and retrospect on what is working, and where to improve how the team operates.

Working Software Focus

In ValuePath, working software is the primary measure of progress. Focusing the team energy on building and testing a "potentially shippable" increment of working software, and away from writing stacks of documentation, accelerates delivery. Salesforce as a platform has declarative tools that make design self-evident to system administrators, reducing the need to maintain documentation as system settings and configurations are changed. Agile projects focus on standing up an "MVP" (minimum viable product) before adding supporting features, ensure a usable product is available earlier, and help the Product Owner solicit feedback and make better prioritization decisions more quickly.

Agile benefits over Waterfall methodologies:

- Lower Risk – ACRE participation throughout the project, ACRE gets to see the solution early and often
- Flexibility – ACRE can adjust course as needs evolve or become more clear
- Productivity – high-priority items are built first and less time is spent on documentation, more on working software
- Higher Quality – testing built into each Sprint, ACRE interacts with the software immediately
- Reduced Time to Market – can go live after any Sprint delivering a shippable product
- More Fun – sustainable pace for ACRE and team with more interaction
- Delighted customers – change is expected. Accommodating new ideas if other ideas of lower priority are pushed to a future release
- Improved return on investment – since the most important ideas are prioritized and built first, and each release is potentially shippable, ACRE can maximize their ROI and stop when it gets diminished
- Reduced costs – the highly collaborative nature of the approach, and focus on working software over documentation, creates efficiency
- Fast results – see results every 2-3 weeks
- Confidence to succeed in a complex world – big, complex problems are broken into smaller pieces

Team Roles for Agile Development

There are a number of roles that are key to the success of any agile development framework. These roles are outlined below and should be established early in the project lifecycle.
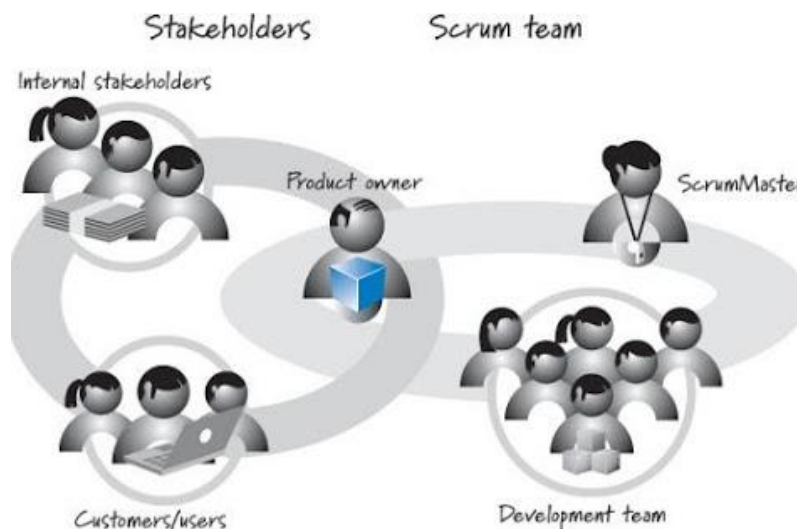
Product Owner

The ACRE Product Owner (PO) role is a key to successful implementation in the ValuePath methodology. The PO is the lead individual responsible for representing ACRE and ensuring the project team understands the business value of each User Story. This role should always be a single person, not a

committee, and they should incorporate elements of the roles of product manager, product marketer, project manager, business analyst, and acceptance tester.

PO Responsibilities:
- Defines/Confirms each User Story and Acceptance Criteria
- Chases down answers from stakeholders so that Sapient doesn't have to
- Obtains feedback from end-users and stakeholders on delivered functionality
- Collects sprint review and sprint UAT results
- Triages feedback (bugs and new requirements) into Product Backlog
- Acts as decision maker on User Story priority within Product Backlog
- Maintains Product Backlog so that top priorities are groomed and planned for development
- Signs off on User Stories as Done
- Participates in Sprint Planning and Sprint Review Meetings

Scrum Master

The Scrum Master function is really the bridge between the Product Owner and the Development Team. This individual is the protector of the team who works to remove distractions and impediments so that the team can stay focused on their work and adhere to the sprint rituals.

Scrum Master Responsibilities:
- Facilitate team stand-ups
- Help to remove blockers
- Work with the Product Owner to ensure needs of the team are met, so that the team can start working without delay
- Monitor the development team velocity to ensure expected progress is being made

Development Team

The Development Team is cross-functional, meaning it has multiple and different skill sets. It's a collective group of architects, developers, designers, configurators, and testers working together as a team to deliver the product or service.
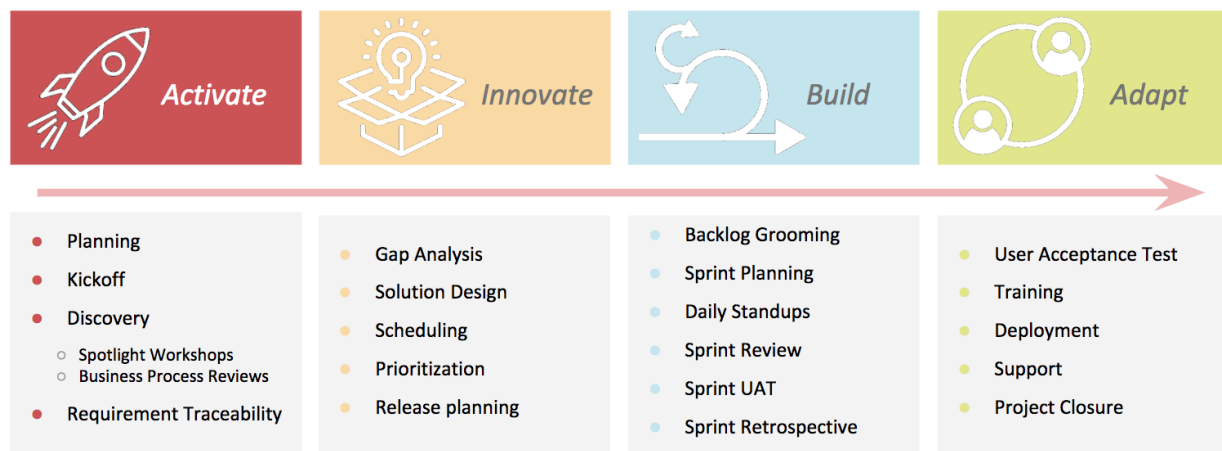
Development Team Responsibilities:

- Create and deliver the products or services
- Fulfill commitments based on assigned tasks

ValuePath Lifecycle

One benefit of agile-based development is the ability to release a "potentially shippable" product to production following each sprint. This is especially useful for established agile teams working to enhance an existing production system. However, when starting a new project, an upfront Product Inception period is appropriate. Here, the Product Owner works with Project Sponsors and Stakeholders to identify Project Goals and articulate a **Product Vision**. The Product Vision informs a set of high-level User Stories called Epics, which are populated into a **Product Backlog** of requirements. To support this, ValuePath includes the upfront ACRE Definition Phase**.** This will be part of the Activate phase of our methodology and will be completed before moving into iterative development.

ValuePath follows distinct phases for project delivery: Activate, Innovate, Build and Adapt

Activate	Innovate	Build	Adapt
● Planning ● Kickoff ● Discovery ○ Spotlight Workshops ○ Business Process Reviews ● Requirement Traceability	● Gap Analysis ● Solution Design ● Scheduling ● Prioritization ● Release planning	● Backlog Grooming ● Sprint Planning ● Daily Standups ● Sprint Review ● Sprint UAT ● Sprint Retrospective	● User Acceptance Test ● Training ● Deployment ● Support ● Project Closure

Based upon our response to the RFP, we have developed a preliminary set of scope items. We will review and refine this detail within the Statement of Work (SOW) and ultimately via the Definition Phase. The SOW defines key responsibilities for both ACRE and Sapient, since success for this project is highly dependent on your involvement. The advantage of our Agile approach is that it anticipates change. When that occurs, change will be accommodated provided that the total level of effort remains static.

During the Activate phase we seek to gain a solid understanding of the existing and future environment through engagement with ACRE and their vision, personas, interactions and processes.

Activate Phase Goals

- Articulate the project vision and scope
- Identify and align the key stakeholders
- Rapidly produce key inputs for the subsequent phases of work

Activate Phase Activities:

- Project Planning
- Project Launch & Agile Alignment – Sapient-led sessions to help ACRE understand Sapient's approach to the Agile project lifecycle

There are a number of key components to the Activate Phase, each of which are defined in more detail below:
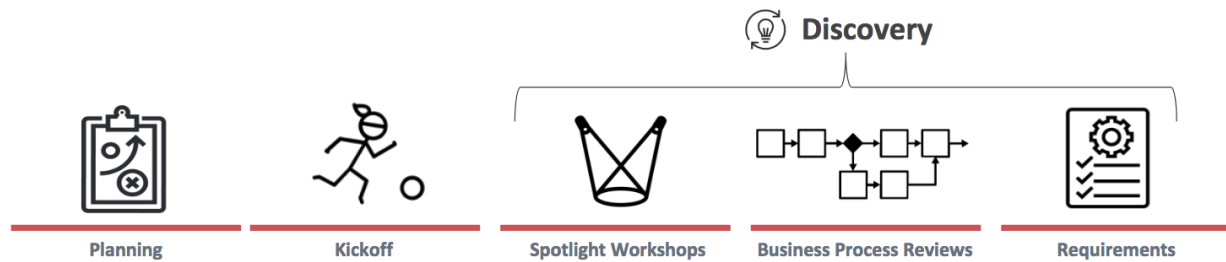
Planning

Project Documentation/Deliverables

All documentation that will be provided is specified in the Statement of Work. The team will mutually agree to tools for document management, source control, collaboration and other support functions during the course of the Project.

Sapient assumes that our joint project teams will use ProjectForce, Sapient's customized version of Salesforce.com, for sprint planning, user stories, issue, and defect tracking.

Kickoff

We schedule a project kickoff meeting with you to launch the project. This provides the opportunity to introduce our team who will be working on the project, and for us to get to know your team. We encourage you to invite key project stakeholders including the project sponsor and executive team, subject matter experts and process owners. Our agenda for this meeting typically looks like this:

- Introduce Team Members
- Confirm understanding of project scope and work approach
- Establish a communication schedule for project status meetings and standups
- Plan next steps including the Business Process Review workshop
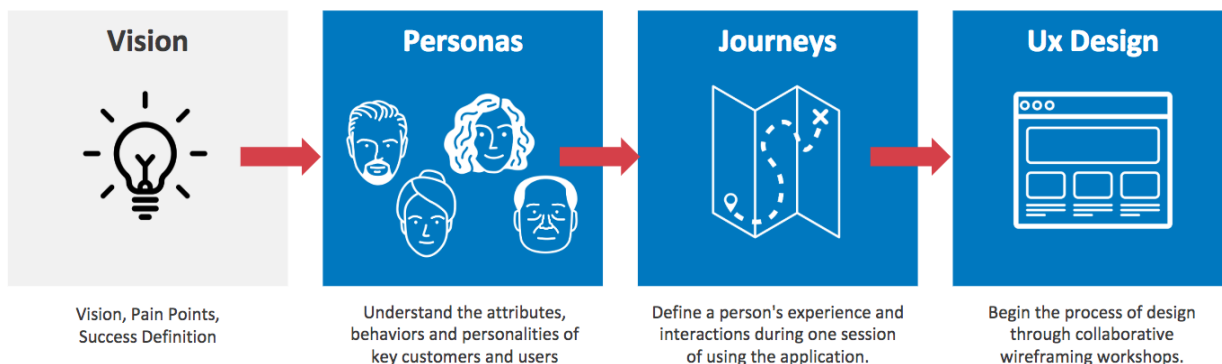- Get access to your instance of Salesforce

Discovery

The Activate Phase continues with our **Spotlight Workshops** intended to define the customer Experience**, followed by Business Process Review** (BPR) workshops. These are critical events for our shared project success and is where we shed light on current processes and challenges and understand the drivers for your solution. The requirements will be captured in plain business language in the form of User Stories that you will confirm before we commence development work on the project.

Spotlight workshops:
Sapient's Transformation Spotlight workshops are intended to define ACRE's vision for the customer or end user experience from the outside looking in.
Goals of the Spotlight workshops include:
- Understanding current pain points, business drivers and success factors
- Understanding needs of a broad cross-section of personas
- Define expected interactions with the application
- Start to design the user experience commensurate with the vision of the program

Vision	**Personas**	**Journeys**	**Ux Design**
Vision, Pain Points, Success Definition	Understand the attributes, behaviors and personalities of key customers and users	Define a person's experience and interactions during one session of using the application.	Begin the process of design through collaborative wireframing workshops.

Business Process Review (BPR) workshops:
This is a critical event for our shared project success and is where we shed light on current processes and challenges as we work to understand the business processes the application will ultimately reflect.

- The BPR consists of sessions and discussions around ACRE business processes. The Scope Elements defined in the SOW drive the discussion and the agenda for the BPR workshop which includes:

  - Mapping of business process flows, and discussion around optimization to those processes for the future
  - Determining process automations
  - Define areas where further investigation and analysis will be required

- Process owners and key subject matter experts (SMEs) should be invited to participate in the workshop as appropriate. Stakeholders don't need to be involved for the entire meetings. We

will work with ACRE to set a specific agenda for the BPR workshops to make it easy to identify when the appropriate people are needed, and for how long

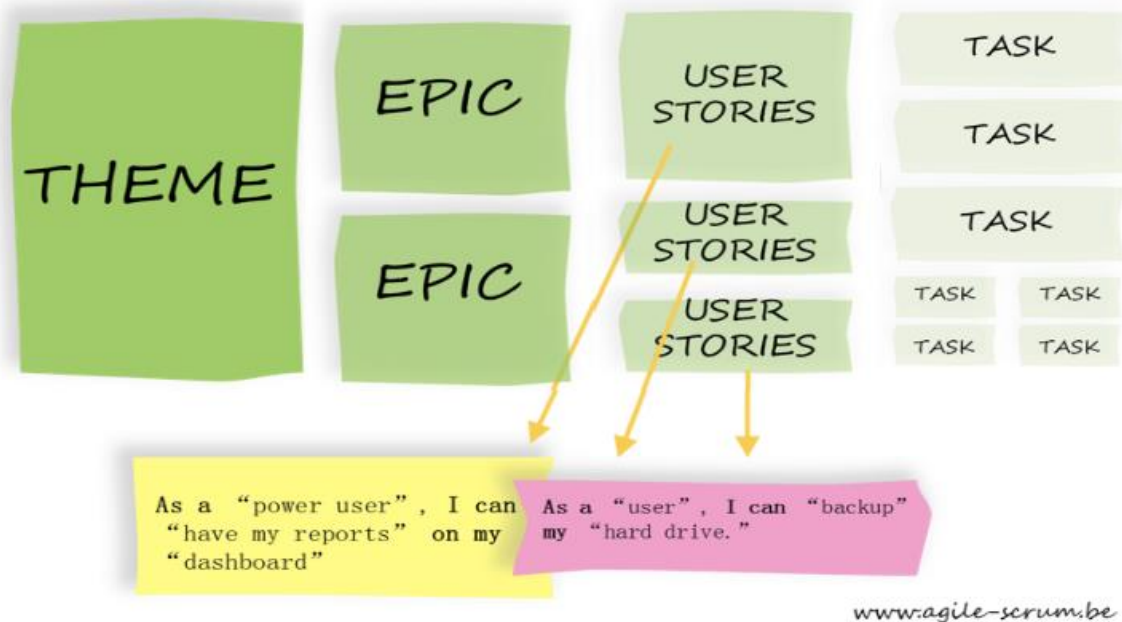● On completion of the BPR, ACRE's business process will be confirmed and documented.

Requirements

Following Agile principles, requirements take the form of User Stories. A user story is a tool used in Agile software development to capture a description of a software feature from an end-user perspective. The user story describes the type of user, what they want and why. A user story helps to create a simplified description of a requirement. Below is an example of a user story.
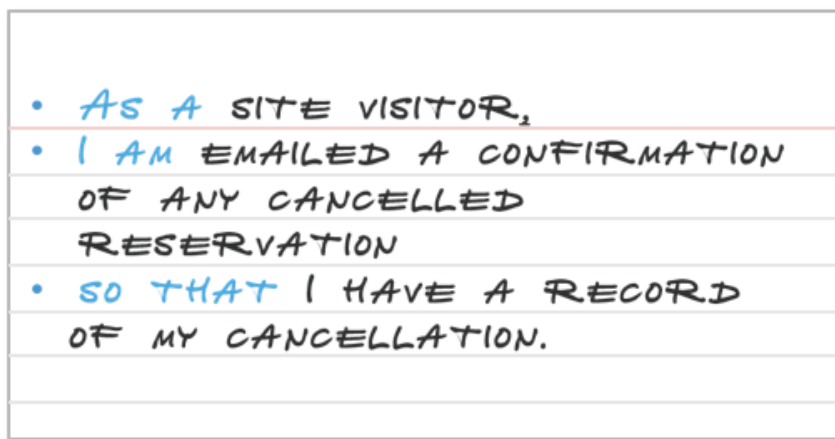
During the Activate phase, we will develop a set of Epic level user stories that map to a business process, persona, journey and/or a requirement from the RFP. We write user stories at a lower level during detailed design as we move into the Build phase. Below is an illustration of the hierarchy of Epics and User Stories.

THEME EPIC EPIC USER STORIES USER STORIES USER STORIES TASK TASK TASK TASK TASK TASK TASK

As a "power user", I can "have my reports" on my "dashboard"

As a "user", I can "backup" my "hard drive."

www.agile-scrum.be

Requirements Traceability

Sapient will provide a Requirements Traceability Matrix that will ensure traceability back to the customers functional, non-functional, and contractual requirements as outlined in the RFP. As part of each Epic and User Story definition, Sapient will capture which requirement(s) the User Story fulfills and as part of the requirements review process we produce a detailed report with this information for the customer to confirm that we are addressing all of their requirements. This information is also tracked in ProjectForce, which allows for easy reporting and identification of specific requirements as part of the Build Phase whether the requirement is related to a User Story in a Sprint or in the Product Backlog there is visibility back to the original requirements.

Activate Phase Outputs:

- Completed Agile Alignment session(s)
- Business goals (including KPIs)
- Product backlog – a prioritized list of work items that can consist of features, enhancements, defects, technical work and knowledge acquisition. The Product Owner (see ACRE Obligations below) will be responsible for prioritizing a product backlog in Sapient's ProjectForce instance of Salesforce. The priority of the product backlog is based on considerations such as business value, risk, dependencies, readiness, desired launch date etc., as determined by ACRE. The features added to the product backlog will be written in user story format and organized into themes via Epics.
- Level of effort estimates for all product backlog items
- Identification by the Product Owner of "Required" backlog items, whose total level of effort may not account for more than sixty percent of the total contracted level of

effort. The remaining backlog items will be identified as "Desired" and prioritized in the Release Plan accordingly.

- Revised business process flow diagrams
- User experience principles & design approach
- Epics and /or User Stories with traceability back to the original scope and/or RFP requirements
- Governance examples include: Communications plan, RACI, Meeting plan, how teams will work

During the Innovate Phase, the Sapient project team processes the outputs and information gathered during the Activate Phase to develop high-level design documentation and a projected project schedule organizing epics and milestone activities into 2-3 week sprints. When using Agile development methodologies, the design approach and detailed technical specifications may not be solidified at this stage of the project. The design outputs of the Innovate Phase may be updated throughout the project to account for shifting ACRE priorities and additional detail discovered during sprint reviews.

Innovate Phase Goals

Create a shared vision of the technical architecture of the project
Define the high-level data model
Articulate user experience principles

There are a number of key activities to the Innovate Phase, each of which are defined in more details below:
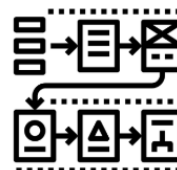
| Gap Analysis | Solution Design | Prioritization | Release Planning |

Gap Analysis

Project Scope and Work Effort Reconciliation

- With the completion of the BPR and the Activate Phase, we assign resources and determine the estimated work effort needed to complete the work associated for each of ACRE's requirements. We then evaluate the estimates and compare them with the original scope estimates to create a Gap Analysis.
- If there are significant discrepancies between the project scope as defined in the SOW and the requirements gathered during Activate, we will review them with ACRE and determine the appropriate actions. We may reevaluate the scope and identify requirements to be moved to a backlog or to future phase, adjust the project budget, and/or re-evaluate project schedules.
- ACRE will have the opportunity to review all of the documented requirements and their associated work effort estimates. We'll get ACRE's approval to proceed and update the requirements accordingly.

Solution Design

The Solution Design presentation describes the technical architecture, functional architecture, object model and key features at a high level. This effort seeks to:

- Describe the high-level system components and business processes required to implement ACRE's requirements
- Defines the object model, user processes, automation techniques, data management, third party partners, and any other system design considerations

Elements included in the solution design:

- Object Model (ERD)
- Wire frames & Design Comps
- Security Model
- Third Party apps
- Technical architecture
- Integration Map

Prioritization

- Once the Gap Analysis has been completed and ACRE has given their approval to proceed, the Product Owner needs to Prioritize the Backlog. While ACRE's business priorities will be the main driver for this prioritization, the product owner will need to work with the Sapient technical team to ensure technical dependencies are taken into account.
- Once the backlog has been prioritized, the Sapient project manager can build out the Release Plan. In addition to taking into account the estimated work effort determined during Analysis, the number of team members and their allocation also need to be considered when mapping out the number of sprints it will take to complete the work.

Iteration (1 week to 1 calendar month)
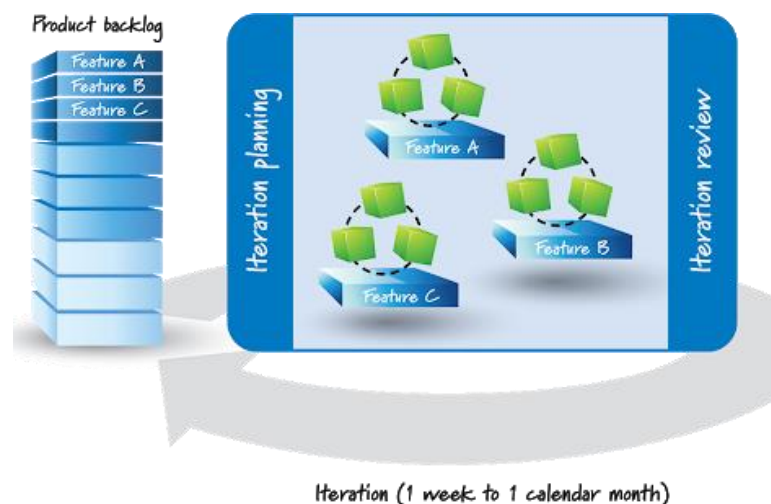
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Release Planning

A project schedule that aligns with your business needs and constraints will be developed. Project Iterations of 2-3 weeks in length will be defined with high level dates and objectives for each iteration, but the details will be defined immediately before the start of each iteration. We will track and report progress for each iteration throughout the project.

- **Release Plan**

  The Release Plan is a high-level plan for multiple Sprints that reflects expectations about when features will be implemented. It serves as a base to monitor progress within the project.

- **Executive Design Presentation**

  The Innovate Phase closes with an Executive Presentation, that includes a review of the Solution Design, and the outcomes of the Gap Analysis and the Release Plan. When building the Solution Design, if there is further discovery about changes to level of effort, a second Gap Analysis may need to be presented as well. In Agile development, the design document may evolve over time as sprint reviews are completed and more detail is discovered throughout the project.

Innovate Phase Outputs

- Solution Design - Document that describes the overall solution at a high-level including the technical architecture, functional architecture, object model and key features. This document does not require sign-off and is intended to evolve over the course of the project.
- Draft Technical Architecture
- Release Plan – A high-level plan for multiple Sprints that reflects expectations about when features will be implemented. It serves as a base to monitor progress within the project. It will contain a prioritized sequence of Sprint themes, an outline of goals for each Sprint, and time boxed dates for each Sprint. It will consider outside factors such as architectural issues or project dependencies. All Required backlog items will be mapped to planned Sprints and one or more placeholder Sprints will be created for Desired backlog items.
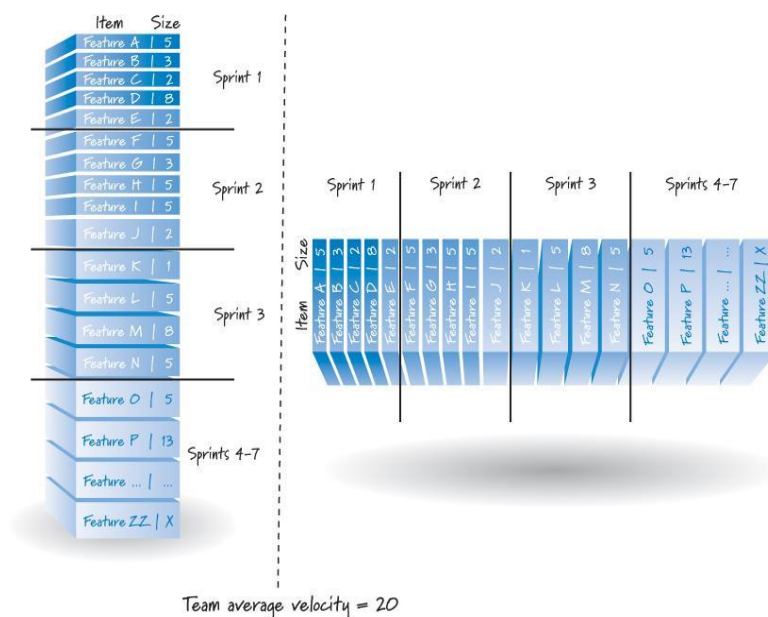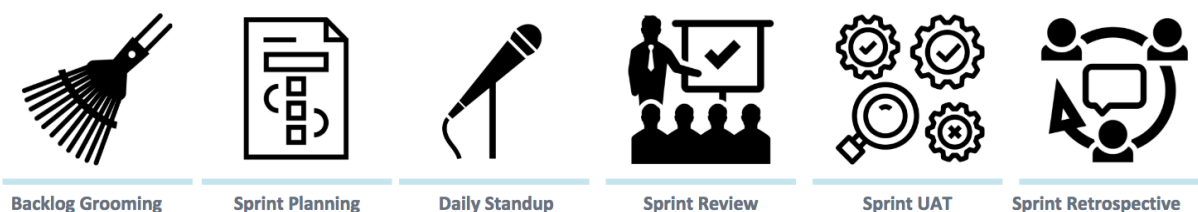
Build   The Build Phase is where the iterative development process starts.

Build Phase Goals

- Identify, develop and test the highest priority functionality to the point where it is potentially ready for release into production, given acknowledged constraints on team velocity and time.
- Once a Sprint is complete, the team reacts in subsequent Sprints by adjusting scope accordingly to maximize the impact of the work.
- As needed, the Product Owner re-orders the backlog of User Stories to match ACRE's goals and KPIs. Team Grooming will follow this order.

Build Phase Activities (ceremonies)

Backlog Grooming	Sprint Planning	Daily Standup	Sprint Review	Sprint UAT	Sprint Retrospective

Sprint Overview

The following diagram summarizes the key components of a sprint. Each of the key components are described in more detail:
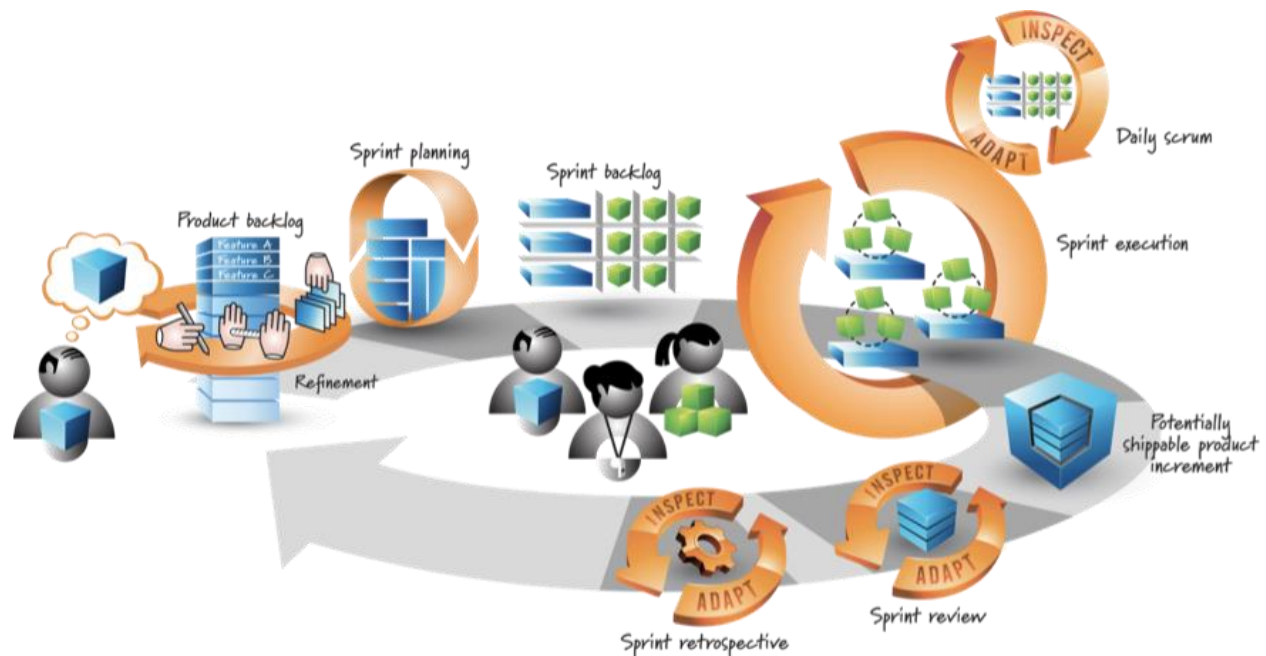
Product Backlog

Product Owner and the team review the backlog of User Stories, in the order in which they appear, to ensure they are fully defined, reviewed, clarified, analyzed and broken down into workable User Stories that can be estimated and slotted into upcoming Sprints.

- Grooming Meeting conducted at least a few days before each Sprint
- Outcome: Well-groomed Sprint candidate list

Sprint Planning

- The Product Owner and team select User Stories that have been groomed and estimated, based on priority order in the backlog to be considered Sprint candidates.
- The Product Owner approves Acceptance Criteria for each User Story in the Sprint candidates list, and determines, along with the team, which User Stories will be included in the Sprint Backlog based on priority, estimate, remaining contracted level of effort, team recommendations and established velocity.
- ACRE acknowledges that once the Sprint Backlog has been identified, they are fixed for that Sprint.

Daily Scrum Meeting

Daily scrum meetings are short discussions with the development team to discuss work completed since the last meeting, work planned for completion before the next meeting, any obstacles to completing their work.

Sprint Execution – Complete all User Stories committed for the current Sprint to meet the definition of Done. For this project, a Ticket is deemed Done if ALL of the following criteria has been met:

- The specified work or requirement has been completed or met;
- The specified Acceptance Criteria for the work or requirement has been met (i.e. reviewed and tested) by Sapient; and
- The User Story is ready for release for ACRE review or testing.

Sprint Review

Meeting to demonstrate deliverables completed as part of the Sprint with the business stakeholders. Conducted on the last day of the Sprint.

Sprint Related Testing

- **System Testing -** following the Build during each sprint, Sapient completes System Testing. System testing has an immediate goal of ensuring the system is sufficiently tested before end users are invited to complete sprint level User Acceptance Testing.
- **User Acceptance Testing -** after the Build and system test for each sprint, users will complete a Sprint UAT to ensure the Sprint functionality works as expected. Sapient will provide templates; however, ACRE is assumed to come up with their own real-world scenarios and scripts to test. This ensures that testing reflects the intended business use in your organization. We find that our clients are better equipped to identify the critical scenarios you will encounter when running your business. Any bugs should be logged using the Sapient ProjectForce tool.

  UAT Guidelines
  - *Test Driven Design* - Acceptance test cases should be written along with user stories to drive development efforts and establish valid testing scenarios. Documenting high-level test cases up front should alleviate the need to build out excessive documentation later in the project.
  - *Continuous Testing* - Test cases should be developed and executed throughout the project, rather than in a contained sprint or phase.
  - *Rapid Feedback/Resolution* Frequent testing cycles should allow for quick turnaround times for ACRE feedback. The product owner should be signing off on functionality within a prescribed time frame every sprint, and the project team should have dedicated time to demo newly delivered functionality and resolve bugs each sprint.

Sprint Retrospective

The sprint retrospective is a meeting to review lessons learned and apply any improvement ideas for the next Sprint.

Build Phase Outputs

Sprint Backlog – a breakdown of User Stories set for the Sprint into individual tasks; an estimate of the time required to complete each task; and an allocation of the tasks within the Development Team.
Completed User Stories – requirements that are developed, tested, and production ready
Sprint UAT – ACRE will perform User Acceptance Testing for completed User Stories that were demonstrated in the Sprint Review during the subsequent Evaluation Period

The final project phase includes, training go-live and deployment.

Final User Acceptance Test   **Training**   **Deployment**   **Support**   **Project Closure**

Final User Acceptance Test (UAT)

Final UAT is conducted by ACRE to ensure the end-to-end solution supports valid business scenarios. These tests follow real business scenarios using real data. Each scenario may cover multiple user stories and solution components. Final UAT determines readiness for deployment to production.

Goals include:
- Continuous Testing
- Rapid Feedback/Resolution
- Everyone Contributes

Training, Deployment

Getting the project completed is a key milestone of ValuePath. However, careful planning and coordination are needed to reduce impacts to your business and improve adoption by users. This includes focus on key launch and adoption activities, for example final data migration, training for users and administrators and preparing for go-live. Although these tasks take place towards the end of the project, planning for these activities happens early in the project life cycle. We're here to help and work with you to define your implementation schedule and meet your deployment objectives.

Project Closure

The project closure process consists of a project retrospective with the entire team and a review of the functionality delivered.

Methodology Tools

Status Reporting

The Sapient Project Manager will provide a weekly status report in writing to the ACRE Project Manager and Product Owner. The weekly report will include the percentage of completion for each User Story, the pass rate for User Story Tests, key Project delivery milestone status, estimated completion date for each milestone, as well as other information relevant for the delivery of the Project as may be agreed upon between the parties. This report will track action items and escalations between the Sapient Project Manager and ACRE Project Manager and Product Owner. A weekly project status call will be setup between the Sapient Project Manager and ACRE Project Manager to review the content of the weekly status report.

Tools

Sapient recommends that our joint project teams use ProjectForce, Sapient's customized version of Salesforce.com, for sprint planning, User Stories, issue, and defect tracking. The team will mutually agree to tools for document management, source control, collaboration and other support functions during the course of the Project.

ProjectForce is a comprehensive management tool built on the Salesforce platform that links everything together for easy access, collaboration and tracking. You will be provided credentials to ProjectForce through Sapient's Salesforce Community portal, providing real-time visibility into your project including:

- Requirements status
- Milestone status
- Project plan with sprints, objectives, and dates
- Project issues, defects and support requests

During a project, collaboration is critical; Sapient provides a forum for team members to share comments, propose new ideas, and share knowledge, files, and data. **Salesforce Chatter** is a communication tool similar to Facebook news feed that allows for real-time streaming of comments, incorporated into Sapient's ProjectForce to enable real-time collaboration on requirements, defects, risks, and tasks.