



Vista Evolution

Presentation to World Vista

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January 18, 2014



VA Defining
HEALTH **EXCELLENCE**
CARE in the 21st Century

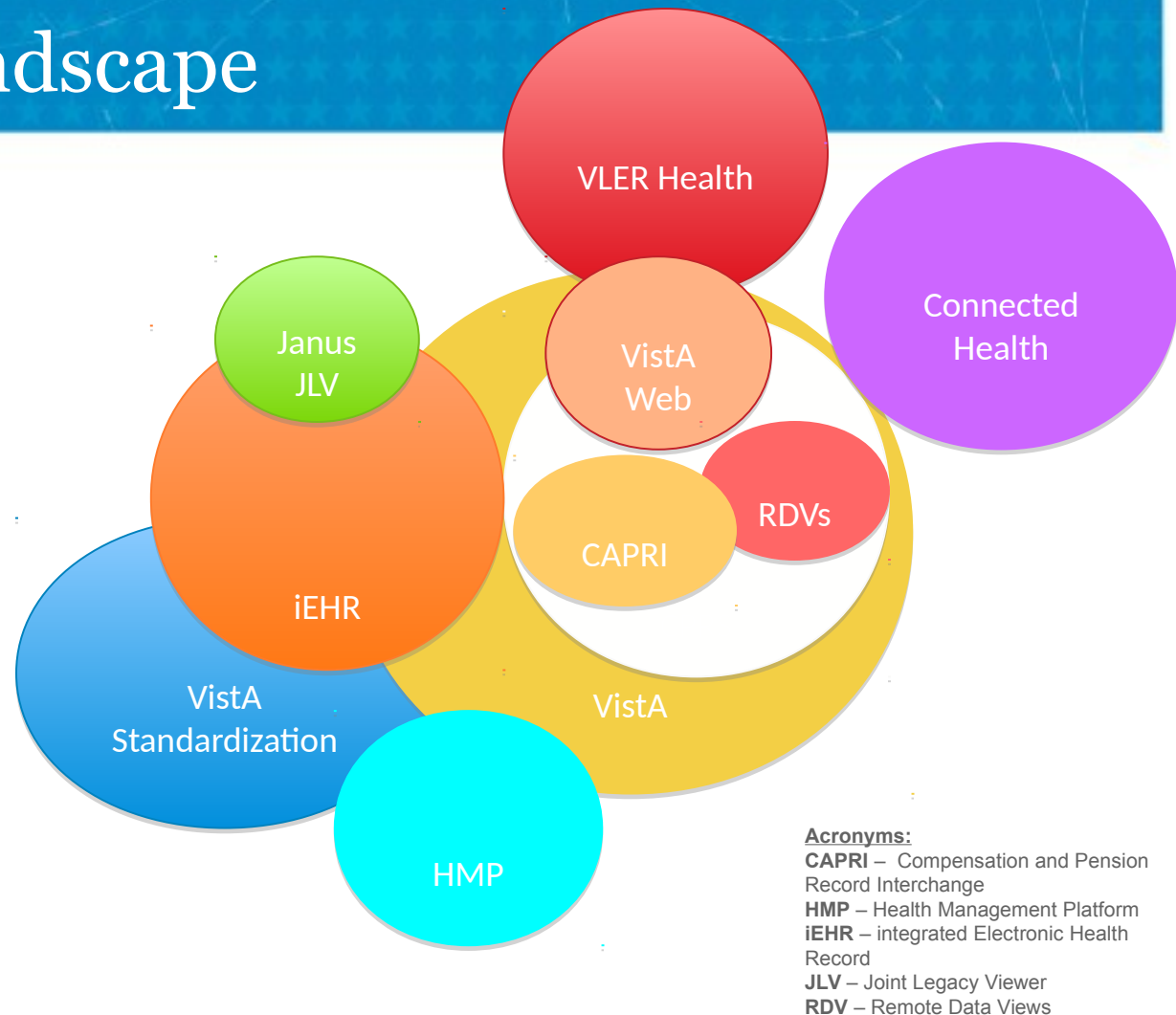
Background

- In 2013, VA and Department of Defense (DoD) Secretaries made decisions that require a change in electronic health record strategy
- The VA EHR core will be VistA-based
- Our mission has not changed

‘to care for him who shall have borne the battle and for his widow, and his orphan’

Current VA Landscape

Over the past several years, various products have been developed across the VA landscape, creating a complex suite of applications



'Conceptual' representation of current EHR/HIT Landscape

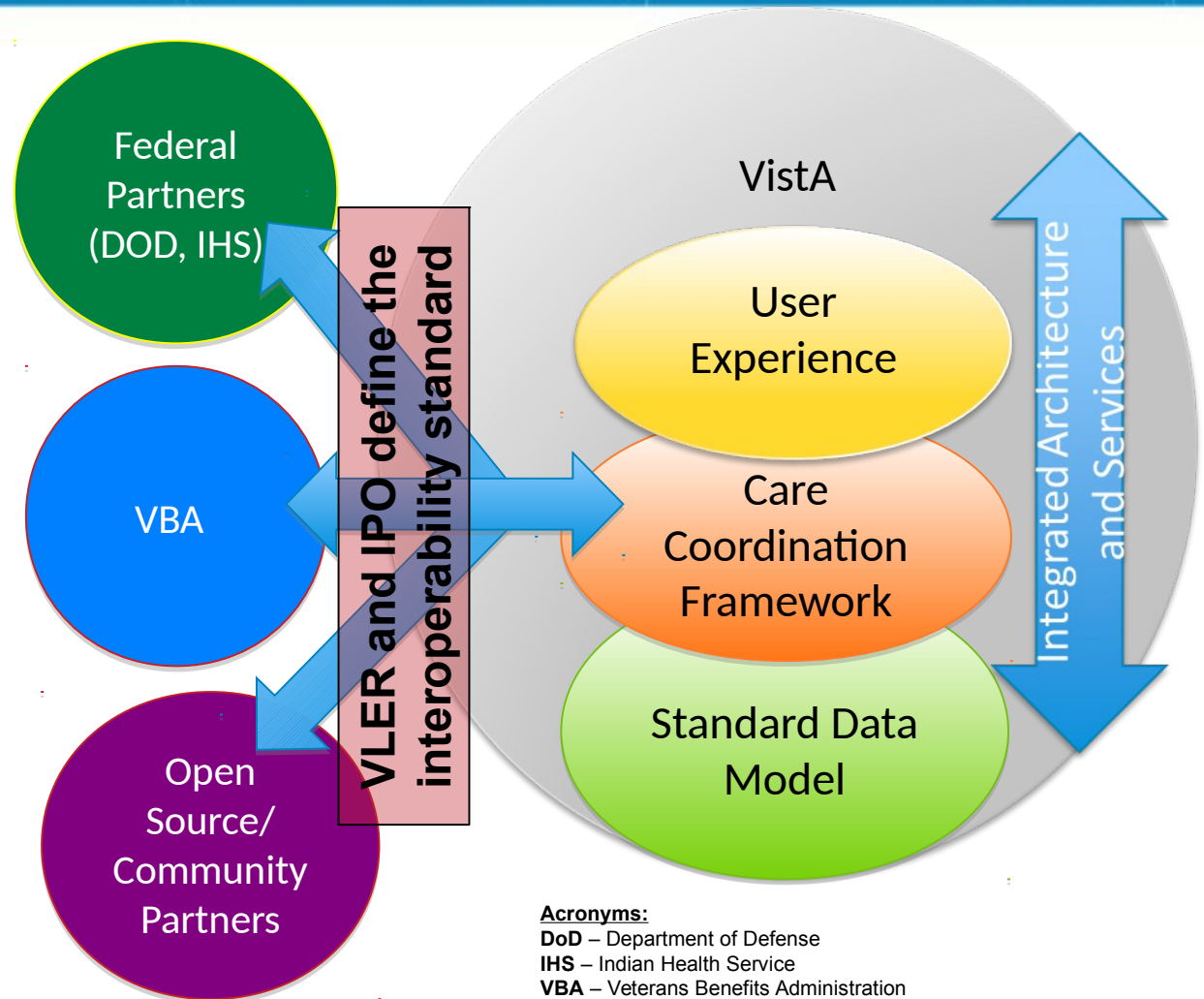
VistA Evolution Program Goals

The VistA Evolution Program will support this strategic plan through continual investment and delivery of scalable and modular EHR and HIT products to **Improve the quality, safety, efficiency and satisfaction in healthcare for Veterans through:**

- Interoperability
- Implementation of an open and extensible EHR system
- Establishment of interoperability between VA and DoD EHR systems
- Re-engineering of business processes in collaboration with users of health IT

Interoperability

By 2017, we will have an architecture and framework that supports interoperability, care coordination, meaningful use and partnership



Three Key Interoperability Concepts

Technical (syntactic) Interoperability

- Allows computers to reliably **exchange** data, so it can be read at least by humans.
- Accomplished with messaging **protocols** and data **formats**.

Semantic Interoperability

- Allows computers to unambiguously and consistently determine **meaning** of the data for presentation and decision support.
- Accomplished with standardized **terminologies** like ICD10 and SNOMed.

Process Interoperability

- Allows computers to exchange and track **workflows** as patients or orders move between organizations; includes **care plans**.
- Accomplished with standardized **business process notation** or **workflow protocols**.
 - Ex. 1: sending prescription requests from VistA to community pharmacies;
 - Ex. 2: tracking care plans for follow up on cancer suspicion from X-ray
 - Ex. 3: continuing polytrauma care plans as patients move between VA and DoD.

How Do We Get to Seamless Interoperability ?

Principles

- **Mapping to National Standards is the correct approach**
 - VA investment will improve interoperability with DoD and other Healthcare Partners
- **“First No Harm”**
 - VA must balance permitted uses of shared data with our level of confidence in coding and content accuracy
 - The possibility and degree of harm.
- **100% mediation is NOT to be expected.**
 - Mediation rates in Clinical/Health Data Repository (CHDR) are ~80%
 - This is still an improvement over No Data.

How Do We Get to Seamless Interoperability ?

Interagency Program Office (IPO)

- Provide and maintain complete, accurate, and meaningfully interoperable data from all domains required to achieve clinical objectives and meet regulatory requirements (semantic interoperability)

VistA Evolution

- Improve technical infrastructure for health data interoperability while reducing overall system complexity (improved syntactic interoperability)
- Convert to standards-based services, formats, protocols and data models
- Enable expanded and improved data exchange with partner providers

VistA Evolution Program Objectives

1. Provide program structure, management and governance to oversee requirements management, acquisition, risk management, communications, training, and transition planning.
2. Establish and maintain flexible system and enterprise architectures that support interoperability with internal and external partners and support new applications and features that meet clinical needs.
3. Establish and maintain methods to develop business (clinical and administrative) processes and to revise existing procedures and policies that advance VA healthcare and health informatics capabilities.

VistA Evolution Program Principles

This VistA Evolution Program Plan (VEPP) is based on the following principles to ensure the highest standards of program execution:

- Focus on our Service Members, Veterans and their Family members.
- Enable health care that applies the appropriate and most efficient resource to the task of providing the highest quality care while maintaining a focus on prudent custodianship of tax payer resources.
- A cohesive, forward looking architecture which maintains affordability while enabling a steady and reliable evolution forward, which incorporates state of the art technology while leveraging the knowledge base and processes that create a patient-centric health care environment.

VistA Evolution: The Product

The VistA Evolution product provides the infrastructure and open, extensible platform on which tools and services can be integrated in support of Veterans' evolving needs, in pace with the technological landscape. The VistA Evolution Product will be incrementally developed and deployed through FY17.

The VistA Evolution Product will:

1. Deliver on the VA and DoD Secretaries' commitments to accelerate full health data interoperability between the VA and DoD.
2. Tie together disparate threads of clinical data into one care coordination plan available to the entire clinical care team.
3. Deliver the greatest quality of care that supports the health status goals of Service Members, Veterans, and the Family members
4. Will be incrementally delivered through FY17

VistA Evolution Product Vision

The 4-year product vision for the VistA Evolution Product includes:

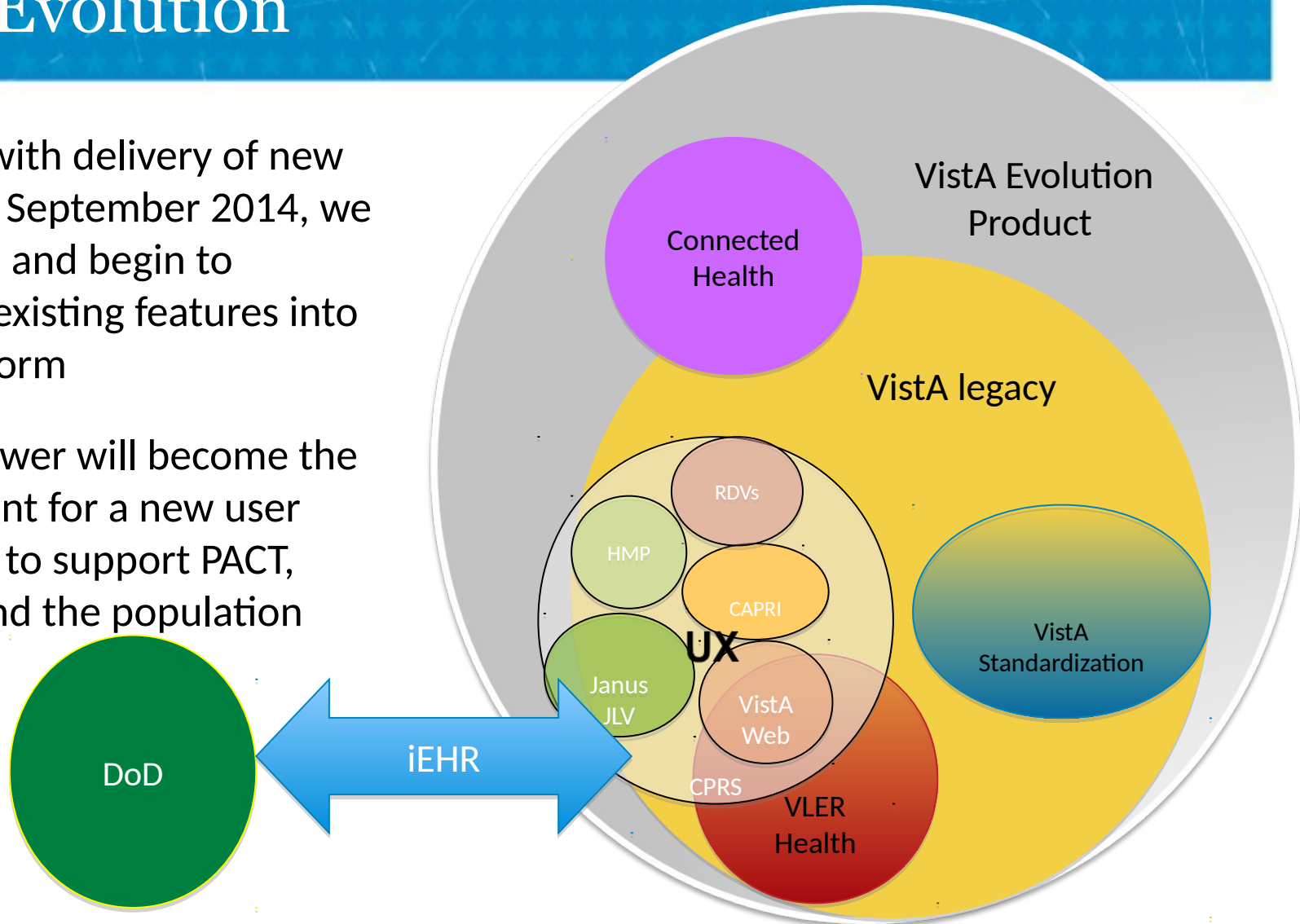
- **A user experience that integrates information for improved quality of clinician and patient reasoning;**
- **Sharable CDS to promote best clinical practices tailored to the patient's clinical condition and health-related goals;**
- **Capabilities for clinicians, managers, and researchers to define and manage patient populations;**
- **Management of activities that improve human and material resource utilization and clarify plans of care for all members of the team including the patient;**
- **Explicit incorporation of patient goals in the care plan, to support patient-defined terms of success, and;**
- **Enterprise-wide deployment.**

This pathway supports the triple goals of improving the experience of care, improving the health of populations, and reducing per capita costs of health care.

Vista Evolution

Beginning with delivery of new features by September 2014, we will analyze and begin to synthesize existing features into a new platform

A single viewer will become the starting point for a new user experience to support PACT, patients, and the population



VistA Evolution Initial Operating

Capabilities (IOC): September 2014

- **Capabilities enabled at two sites: Hampton Roads and San Antonio**
 - **Advanced User Interface Tools (via Health Management Platform)**
 - 'Google-like' Search across database
 - HL7 Context-Aware 'InfoButtons' integrated into UI
 - Medication Review tool
 - **VA/DoD Information Sharing (via Joint Legacy Viewer)**
 - **Immunizations**
 - Modernize VistA immunization files, incorporate required 'CVX' format
 - Facilitates enabling of read/write/exchange + adv clinical decision support in FY15
 - Enables new sources of adoption: VA Innovations, OpenCDS, IHS RPMS
 - **Laboratory Information System Acquisition**
 - Modernization and automation of 'back-end' lab processes
 - Facilitates data exchange , business process interoperability, and enhanced CDS
 - **VistA Standardization**
 - Certification of 74 standardized VistA application routines in production (complete)

VistA Evolution Full Operating Capability (FOC) : September 30, 2017

Phase Two of the VistA Evolution is referred to as the Full Operating Capability (FOC) and will be implemented from the end of IOC (September 30th, 2014) and completed by September 30th, 2017.

The functional focus areas for FOC will:

- Propagate the usability features and end-user experience throughout all VistA Evolution to improve user adoption, productivity and satisfaction;
- Continue the adoption and implementation of interoperability standards for sharing clinical records across organizations;
- Enable patient-centered care coordination as the care model woven throughout the design, and;
- Finalize the enterprise deployment of state-of-the-art laboratory and pharmacy ancillary systems, while leveraging process re-engineering to ensure best practice operations for efficiencies, quality of care and patient safety.

The resulting VistA Evolution FOC application suite and underlying technical architecture will represent a state-of-the-art enterprise EHR solution that is compliant with ONC MU Stage 1 and 2 functionality and Certified EHR Technology (CEHRT) requirements.

Questions:

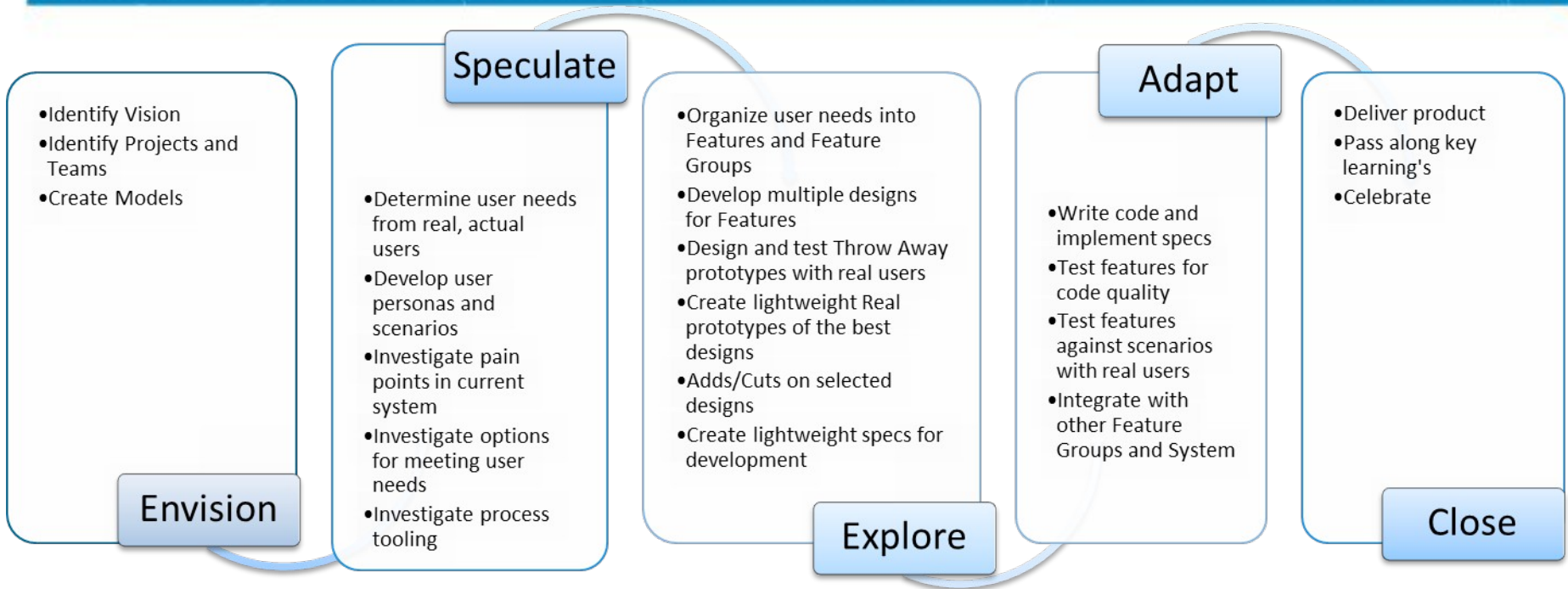
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Back-Up Slides

Product Management: Feature Driven Design Process



- Allows for substantial upfront design and *iteration* and evolution in development
- This is needed to deliver features requiring highly refined design for UI/UX controls, layout and interaction