

# Presentation to ITAC



## **Agency Vision**

Make Arizona the #1 state in the nation through continuous improvement efforts.

## **Agency Mission**

Deliver effective and efficient enterprise support services to state agencies to allow them to focus on their unique missions.

## **Project Name**

State of Arizona – Department of Administration

June 23, 2021

# The Problem

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Business owners go through multiple touchpoints with state agencies during their business journey



## User pain-points

- Users feel confused about requirements and feel unsure which agency site to use
- Users feel uncertain due to lack of transparency on end to end process completion
- Users may be discouraged to use online forms since similar manual data input is needed across multiple systems

## State pain-points

- Lack of integrated user information makes it difficult to track records and leads to increased processing times
- Silos of technology and information lead to inefficient operations and duplicative technology systems

# The Vision

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*The state's vision is to make Arizona an attractive place for Business owners and enable them to kickstart and operate their business seamlessly*



## GOAL

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Establish a Business One Stop portal that provides a single online location to help citizens & businesses plan, start, grow, move, & close businesses in Arizona.

# How we will get there

## Current state systems



azdor.gov  
aztaxes.gov



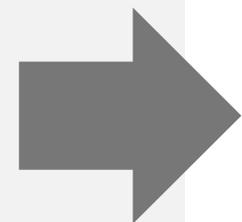
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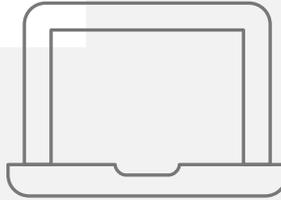
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**ARIZONA**  
COMMERCE AUTHORITY

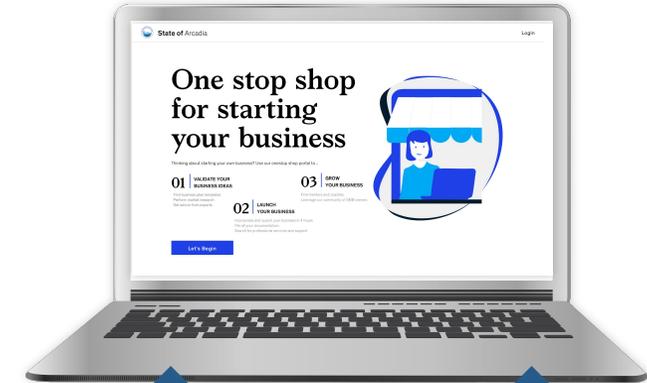
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## Future state integrated systems



Application layer (API, Webservice, etc.)  
Secured data transfer  
Enhanced security protocols



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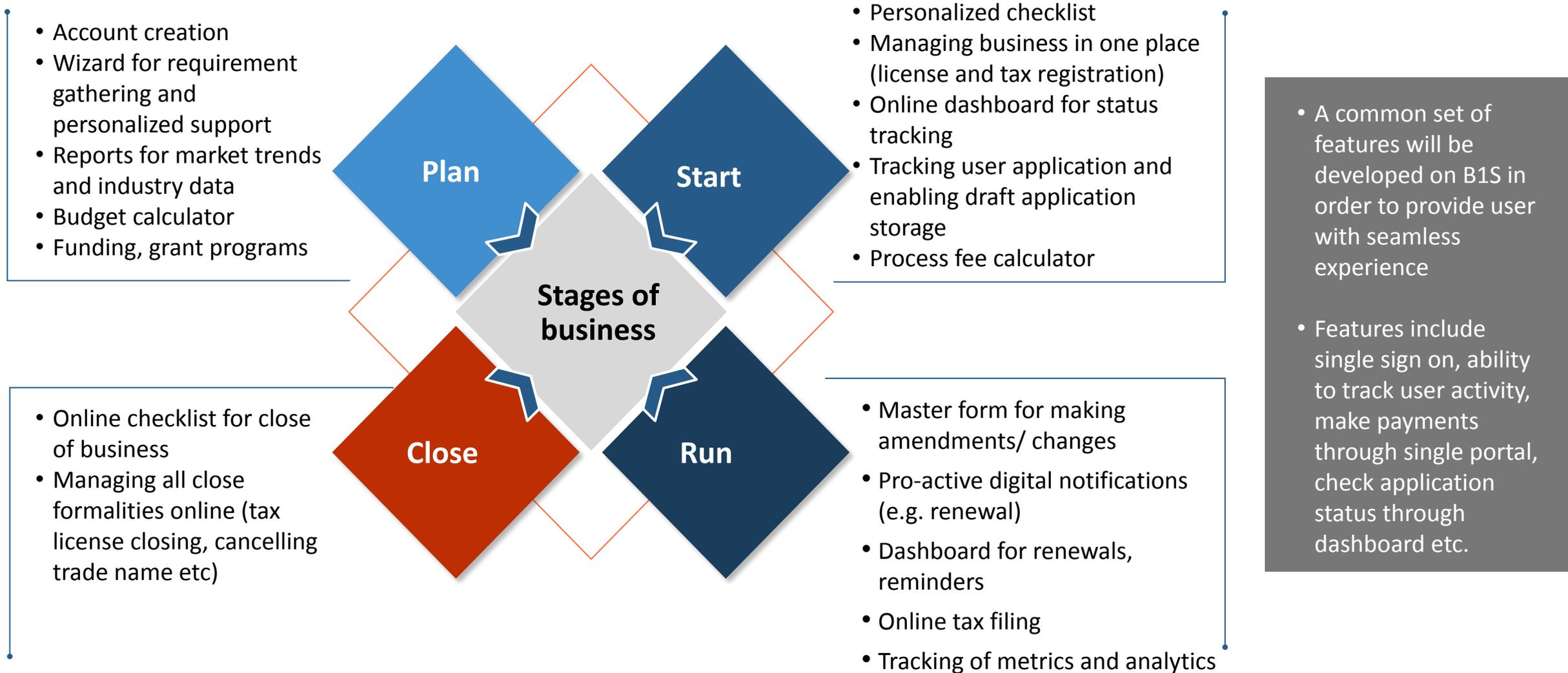
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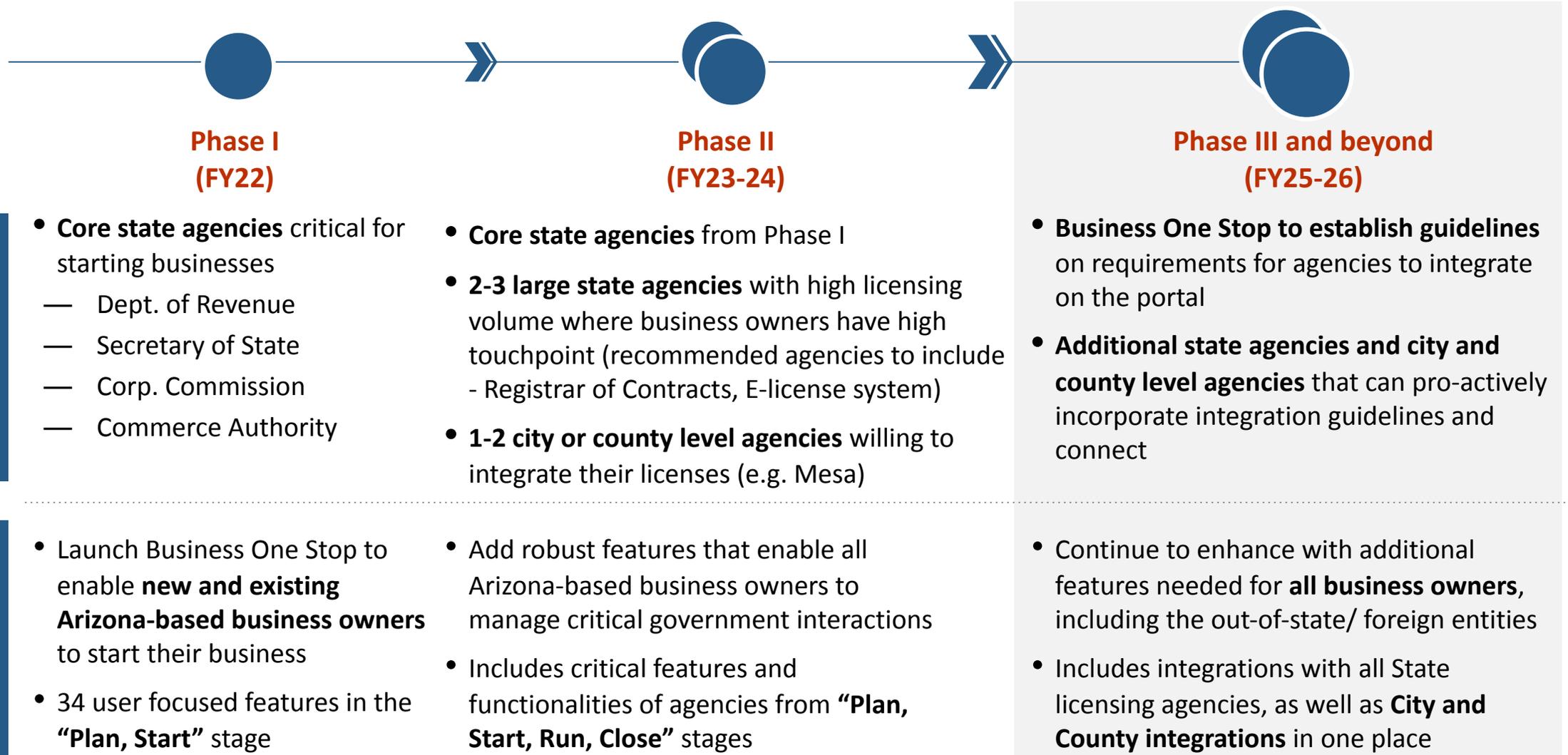
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# The proposed set of features enhances the business owner experience at each stage of the journey



# Strategic progression of Business One Stop



# Efforts to Date

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- FY20 Assessment and Feasibility Study using \$1M in APF funding.
- Provided [recommendations to the State](#) on how best to achieve the goals of the portal.
- Developed a design plan that documents the [business requirements](#) and shared understanding of the future state of the portal.
- Developed a functional demonstration [prototype](#) using the ADOT “SuperPortal”
- Developed the product roadmap.
- US Digital Response (<https://www.usdigitalresponse.org/>) User Experience research.

# A number of considerations were made in order to build a Business One Stop portal; eAZ Super portal platform was found to be the most viable option

## Considerations

### Technology stack consideration

How **viable is the technical solutions** across the stack? (Scalable infrastructure, ability to integrate through restful functionalities, secured database, customizable interface and integrated applications and code repository for teams)

### Security

What kind of **security protocols** are present or need to be developed? (network segmentation, DMZ, active directory, encryption, etc.)

### Ease of Development

How easy is it for **code development** and how **flexible** is it to use off-the-shelf libraries and expand features?  
How much is the **control on DevOps processes** and core technology?

### Talent requirement

Can the organization leverage **existing talent** or hire the right skill set easily in the market?

### Cost

How much does it **cost across these parameters** in the short and long term – ownership, maintenance, development, testing, production, network?

### Additional considerations

What other elements need to be considered?

Most viable option

The pros and cons were evaluated for the following alternatives:

1 eAZ Super portal platform

2 Building from scratch

3 3<sup>rd</sup> party applications:

- CMS applications (e.g. Backbase, Adobe experience manager, Sitecore)
- Other vendors (e.g. PCC)

# The eAZ platform is technically viable and has existing momentum to build Business One Stop (1/2)

+ Pros    
 - Further investigation/development need    
 - Cons    
   Best option(s)

Considerations	eAZ Super portal platform	Building from scratch	3 <sup>rd</sup> party applications
<b>Technology stack consideration</b>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> <b>Scalable infrastructure</b> with Azure commercial cloud</li> <li><span style="color: green;">+</span> <b>Restful integration</b> with a few agencies and developed basic APIs; ability to integrate new technologies</li> <li><span style="color: green;">+</span> <b>Secured MS SQL database</b> being used</li> <li><span style="color: green;">+</span> <b>Great tool for source code</b> management (Team foundation services)</li> <li><span style="color: green;">+</span> <b>Customizable interface</b> based on agency needs</li> <li><span style="color: orange;">-</span> Could integrate some <b>off-the-shelf libraries</b> and solutions in the existing platform</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> Robust technology stack could be selected, however it will be similarly viable to eAZ stack leading to <b>duplication of effort</b></li> <li><span style="color: green;">+</span> <b>Easier to leverage off-the-shelf solutions</b> not considered in eAZ development</li> <li><span style="color: green;">+</span> Can <b>experiment with new technologies without constraints</b> of an existing architecture</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> <b>Robust technology stack</b> could be selected across 3<sup>rd</sup> party solutions (e.g. backbase, adobe experience manager) however, it will be similarly viable to eAZ stack leading to <b>duplication of effort</b></li> <li><span style="color: green;">+</span> <b>Easier to leverage off-the-shelf solutions</b> already existing on the applications</li> <li><span style="color: green;">+</span> <b>New technologies and future-proof functionalities</b> packaged in newer releases</li> </ul>
<b>Security</b>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> Implemented <b>required government security protocols</b> and integrating their own (network segmentation, DMZ, active directory, database encryption, etc)</li> <li><span style="color: orange;">-</span> <b>Further development required for state security requirements</b> based on the agency being integrated</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: orange;">-</span> All required <b>security protocols will need to be integrated</b></li> <li><span style="color: red;">-</span> <b>Duplication of effort</b> on creation network segmentation, DMZ, etc that are already developed for eAZ</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: orange;">-</span> <b>Security patches</b> provided by vendor, however require system platform updates (maintenance)</li> <li><span style="color: orange;">-</span> All required <b>state security protocols</b> will need to be included</li> <li><span style="color: red;">-</span> <b>Duplication of effort</b> on creation network segmentation, DMZ, etc that are already developed for eAZ</li> </ul>
<b>Ease of Development</b>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> Easy development for <b>developers in Azure stack</b>, Microsoft libraries available</li> <li><span style="color: green;">+</span> <b>More control over the core technology</b> to perform optimization and bug fixes</li> <li><span style="color: red;">-</span> <b>Longer time to market</b> depending on resource availability across agencies</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> <b>Easy development for developers</b> based on technologies selected (azure, aws more viable options)</li> <li><span style="color: green;">+</span> <b>More control over the core technology</b> to perform optimization and bug fixes</li> <li><span style="color: red;">-</span> <b>Longer time to market</b> depending on resource availability across agencies</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: orange;">-</span> <b>Platform training</b> may be required for developers</li> <li><span style="color: red;">-</span> <b>Less control on core technology</b> since it needs to be managed through vendors</li> <li><span style="color: green;">+</span> <b>Time to market potentially shorter</b> for some solutions with existing functionalities</li> </ul>

# The eAZ platform is technically viable and has existing momentum to build Business One Stop (2/2)

+ Pros    
 - Further investigation/development need    
 - Cons    
  Best option(s)

Considerations	eAZ Super portal platform	Building from scratch	3 <sup>rd</sup> party applications
Talent Need	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> Microsoft stack used all across agencies; <b>existing talent</b> in the organization can be leveraged</li> <li><span style="color: green;">+</span> Ability for developers to <b>think creatively</b> for solutions and work with <b>newer technologies</b></li> </ul>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> <b>Existing talent</b> could be leveraged and technology could be chosen accordingly</li> <li><span style="color: green;">+</span> Ability for developers to <b>think creatively</b> and work with <b>newer technologies</b></li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> <b>Additional talent hiring</b> may be required (e.g. Java developers for Back-base and Adobe solutions), <b>training or tech administrative role</b> may need to be established if vendors with Business One Stop functionality chosen</li> </ul>
Cost	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> <b>Costs could be controlled</b> by paying only for what is needed, not buying unused functionality</li> <li><span style="color: red;">-</span> <b>Customized solutions</b> may lead to higher <b>maintenance cost</b> in the long term</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> Similar cost as eAZ leading to <b>duplication of costs</b></li> <li><span style="color: red;">-</span> Additional <b>cost of ownership</b></li> </ul>	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> Potentially <b>lower maintenance costs</b> in the</li> <li><span style="color: red;">-</span> Additional <b>cost of licensing</b></li> <li><span style="color: red;">-</span> Additional <b>network costs</b> depending on hosting options</li> <li><span style="color: orange;">-</span> Potentially <b>higher long term costs</b></li> </ul>
Additional consideration	<ul style="list-style-type: none"> <li><span style="color: green;">+</span> <b>Existing momentum</b> across agencies to make Business One Stop a reality</li> <li><span style="color: green;">+</span> ~<b>80% of citizen data mapped in MVD database</b> that can be leverage for user identity</li> <li><span style="color: red;">-</span> <b>Minimal documentation available</b>, need to be streamlined and recorded</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> Teams will need to <b>realign on new platform</b> and technology</li> <li><span style="color: red;">-</span> <b>User identity need to be established</b> or MVD connection need to be integrated</li> <li><span style="color: green;">+</span> <b>Documentation</b> can be recorded from the beginning</li> </ul>	<ul style="list-style-type: none"> <li><span style="color: red;">-</span> Teams will need to <b>realign on new platform</b> and technology</li> <li><span style="color: red;">-</span> <b>User identity need to be established</b> or MVD connection need to be integrated</li> <li><span style="color: green;">+</span> <b>Documentation</b> can be recorded from the beginning</li> </ul>

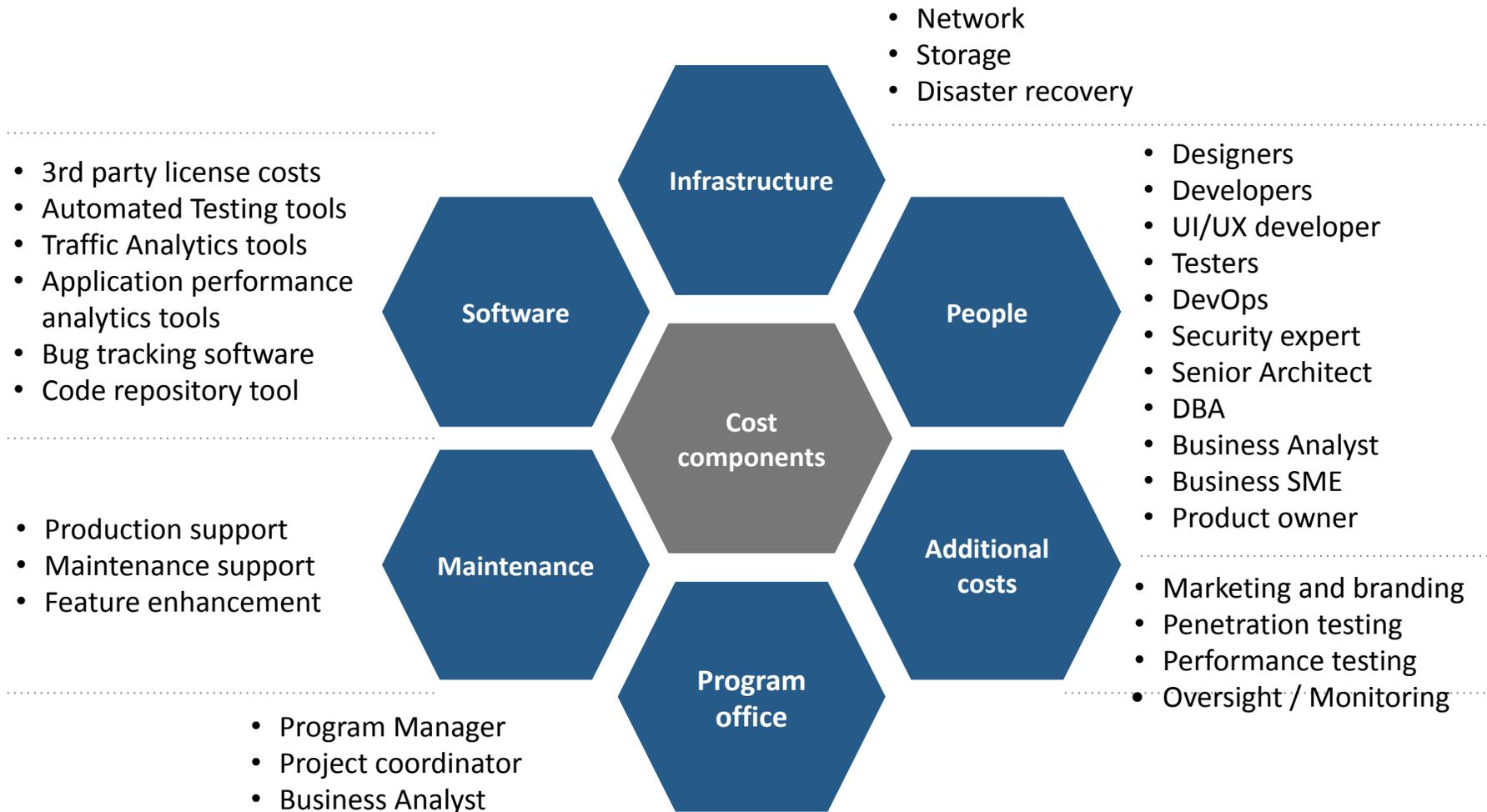
**Irrespective of the alternatives above, the following development will need to take place to make Business One Stop a reality:**

- Development of APIs/ web services across agencies for integration on Business One Stop
- Establishment of governance board and business model to manage/ operate the portal
- Implementation of security protocols required by the state

# Project Timeline

Milestone / Task	Estimated Start Date	Estimated Finish Date
Project Kick-off - Review all requirements, schedule and milestones.	July 1, 2021	July 1, 2021
PI 1: Project start up, Planning, Requirements refinement & Design	July 1, 2021	July 13, 2021
PI 2: Development, Quality Assurance Review, User Acceptance Testing, Deployment	July 13, 2021	August 24, 2021
PI 3: Development, Quality Assurance Review, User Acceptance Testing, Deployment	August 24, 2021	October 5, 2021
PI 4: Development, Quality Assurance Review, User Acceptance Testing, Deployment	October 5, 2021	November 16, 2021
PI 5: Development, Quality Assurance Review, User Acceptance Testing, Deployment	November 16, 2021	December 28, 2021
PI 6: Development, Quality Assurance Review, User Acceptance Testing, Deployment, MVP Launch	December 28, 2021	February 8, 2022

# Budget Categories for Business One Stop



## Key highlights

- The cost assessment looked at **both** costs for B1S directly and costs agencies will incur to adapt legacy systems.
- The cost components include the initial set-up and development cost as well as **5 years of** annual recurring cost to cover ongoing maintenance, support and enhancements

# Governor's Budget Proposal

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- The Executive Budget for FY22 includes **\$7.8 million** to continue developing a Business One-Stop portal.
  - The budget includes both the costs for B1S directly and the costs agencies will incur to integrate/adapt legacy systems.
  - This initial funding will support launching Business One Stop to enable new and existing domestic (in-state) business owners to start their business.
  - This phase includes 34 functions - including for user account management and high-volume, critical-path functions for core agencies in the 'Plan' and 'Start' stages of the business lifecycle.\*
- In future phases, the portal will be expanded, adding features intended to foster business growth and relocation. All three project phases can be completed by FY 2025 for a total development and maintenance cost of \$32.2 million

# Breakdown by Phases

## PHASE 1

### Cost Estimate (Fiscal Year 2022)

Development	\$6,010,749
People	\$5,898,881
Software	\$39,920
Additional costs	\$71,948
Operations	\$1,748,079
Maintenance	\$1,008,800
Program Management Office	\$677,952
<u>Infrastructure</u>	<u>\$61,327</u>
TOTAL	\$7,758,828

## PHASE 2

### Cost Estimate (Fiscal Year 2023 & 2024)

Development	\$9,404,021
People	\$9,180,285
Software	\$79,840
Additional costs	\$143,896
Operations	\$6,210,270
Maintenance	\$4,670,085
Program Management Office	\$1,417,530
<u>Infrastructure</u>	<u>\$122,655</u>
TOTAL	\$15,614,291

## PHASE 3

### Cost Estimate (Fiscal Year 2025 & 2026)

Development	\$3,971,370
People	\$3,747,634
Software	\$79,840
Additional costs	\$143,896
Operations	\$4,821,659
Maintenance	\$3,195,147
Program Management Office	\$1,503,857
<u>Infrastructure</u>	<u>\$122,655</u>
TOTAL	\$8,793,029

### **Phase 1 Only Totals**

Phase 1 Development Costs:	\$6,010,749
5 Year Operational Costs:	\$8,740,395
<b><u>5 Year Phase 1 Grand Total:</u></b>	<b><u>\$14,751,144</u></b>

### **Project Totals**

5 Year Development Costs:	\$19,386,140
5 Year Operational Costs:	\$12,780,008
<b><u>5 Year Grand Total:</u></b>	<b><u>\$32,166,148</u></b>

# What Success Looks Like

## Change Management

- Project Milestones
  - Communications
  - Training
  - Other CM Actions

## Measures of Success

- Application Launch
- Public Improvement & Maintenance Releases
- Customer Journeys Delivered (Project Milestones)
- Customer Satisfaction
- Time to market: How long it takes to submit an application (start to submit).
- Mental load. How hard, confusing, frustrating, otherwise easy, intuitive is the registration process

# Q & A Session