



# Stage 2 Preliminary Assessment

California Department of Technology, SIMM 19B (Rev. 2.1), Revision 5/21/2018

## 2.1 General Information

|   |          |
|---|----------|
| <b>Agency or State Entity Name:</b>             |          |
| Department of Consumer Affairs                  |          |
| <b>Organization Code:</b>                       |          |
| 1111  |          |
| <b>Proposal Name:</b>                           |          |
| Business Modernization Cohort 2 (BMC 2)         |          |
| <b>Department of Technology Project Number:</b> | 1111-014 |

## 2.2 Preliminary Submittal Information

|                                     |   |
|-------------------------------------|---|
| <b>Contact Information:</b>         |   |
| <b>Contact First Name:</b>          | <b>Contact Last Name:</b>                           |
| Lisa                                | Rangel  |
| <b>Contact Email:</b>               | <b>Contact Phone:</b>                               |
| Lisa.Rangel@dca.ca.gov              | 916-574-7742  |
| <b>Preliminary Submission Date:</b> | <b>Preliminary Assessment Transmittal:</b>          |
| 12/31/2020                          | 00 SIMM_19G1-Project_Approval_Executive_Transmittal |

## 2.3 Stage 2 Preliminary Assessment

### 2.3.1 Impact Assessment

|   | Yes                                 | No                                  |
|---|-------------------------------------|-------------------------------------|
| 1. Has the Agency/state entity identified and committed subject matter experts from all business sponsors and key stakeholders?   | <input checked="" type="checkbox"/> | <input type="checkbox"/>            |
| 2. Are all current baseline systems that will be impacted by this proposal documented and current (e.g., data classification and data exchange agreements, privacy impact assessments, design documents, data flow diagram, data dictionary, application code, architecture descriptions)?            | <input checked="" type="checkbox"/> | <input type="checkbox"/>            |
| 3. Does the Agency/state entity anticipate needing support from the California Department of Technology (CDT) Statewide Technology Procurement (STP) to conduct market research for this proposal (Market Survey, Request for Information)?   | <input type="checkbox"/>            | <input checked="" type="checkbox"/> |
| 4. Does the Agency/state entity anticipate submitting a budget request to support the procurement activities of this proposal?  | <input type="checkbox"/>            | <input checked="" type="checkbox"/> |
| 5. Could this proposal involve the development and/or purchase of systems to support activities included in Financial Information System for California (FI\$Cal) (e.g., financial accounting, asset management, human resources, procurement/ordering, inventory management, facilities management)? | <input type="checkbox"/>            | <input checked="" type="checkbox"/> |
| 6. Does the Agency/state entity have a designated Chief Architect or Enterprise Architect to lead the development of baseline and alternative solutions architecture descriptions?  | <input checked="" type="checkbox"/> | <input type="checkbox"/>            |
| 7. Will the Agency/state entity's Information Security Officer be involved in the development and review of any security related requirements?  | <input checked="" type="checkbox"/> | <input type="checkbox"/>            |
| 8. Does the Agency/state entity anticipate performing a business-based procurement to have vendors propose a solution?  | <input type="checkbox"/>            | <input checked="" type="checkbox"/> |

### 2.3.2 Business Complexity Assessment

|                             |     |                                  |                               |                                 |   |
|-----------------------------|-----|----------------------------------|-------------------------------|---------------------------------|---|
| <b>Business Complexity:</b> | 0.9 | <b>Business Complexity Zone:</b> | <input type="checkbox"/> High | <input type="checkbox"/> Medium | <input checked="" type="checkbox"/> Low |
|-----------------------------|-----|----------------------------------|-------------------------------|---------------------------------|---|



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| 2.4 Submittal Information   |   |
|---|---|
| <b>Contact Information:</b>   |   |
| <b>Contact First Name:</b>  | <b>Contact Last Name:</b>                                   |
| Lisa  | Rangel  |
| <b>Contact Email:</b>   | <b>Contact Phone:</b>                                       |
| Lisa.Rangel@dca.ca.gov  | 916-574-7742  |
| <b>Submission Date:</b>   | <b>Project Approval Executive Transmittal:</b>              |
| 12/31/2020  | 00 SIMM_19G1-Project_Approval_Executive_Transmittal         |
| <b>Submission Type:</b>   |   |
| <input type="checkbox"/> New Submission                               | <input type="checkbox"/> Updated Submission (Post-Approval) |
| <input checked="" type="checkbox"/> Updated Submission (Pre-Approval) | <input type="checkbox"/> <b>Withdraw Submission</b>         |
| <b>Reason: Budget issues</b>  |   |
| <b>If "Other," specify:</b>   |   |
|   |   |
|   |   |



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## Sections Updated (For Updated Submissions Only) – (check all that apply)

- |   |  |
|---|--|
| <input type="checkbox"/> 2.1 General Information                        | <input type="checkbox"/> 2.10.6 Implementation Approach  |
| <input type="checkbox"/> 2.2 Preliminary Submittal Information          | <input type="checkbox"/> 2.10.7 Architecture Information   |
| <input type="checkbox"/> 2.3 Stage 2 Preliminary Assessment             | <input type="checkbox"/> 2.11 Recommended Solution   |
| <input type="checkbox"/> 2.3.1 Impact Assessment                        | <input type="checkbox"/> 2.11.1 Rationale for Selection  |
| <input type="checkbox"/> 2.3.2 Business Complexity Assessment           | <input type="checkbox"/> 2.11.2 Technical/Initial IT Project Oversight Framework Complexity Assessment |
| <input type="checkbox"/> 2.4 Submittal Information                      | <input type="checkbox"/> 2.11.3 Procurement and Staffing Strategy                                      |
| <input type="checkbox"/> 2.5 Baseline Processes and Systems             | <input type="checkbox"/> 2.11.4 Enterprise Architecture Alignment                                      |
| <input type="checkbox"/> 2.5.1 Description                              | <input type="checkbox"/> 2.11.5 Project Phases   |
| <input type="checkbox"/> 2.5.2 Business Process Workflow                | <input type="checkbox"/> 2.11.6 High Level Proposed Project Schedule                                   |
| <input type="checkbox"/> 2.5.3 Current Architecture Information         | <input type="checkbox"/> 2.11.7 Cost Summary   |
| <input type="checkbox"/> 2.5.4 Current Architecture Diagram             | <input type="checkbox"/> 2.12 Staffing Plan  |
| <input type="checkbox"/> 2.5.5 Security Categorization Impact Table     | <input type="checkbox"/> 2.12.1 Administrative   |
| <input type="checkbox"/> 2.6 Mid-Level Solution Requirements            | <input type="checkbox"/> 2.12.2 Business Program   |
| <input type="checkbox"/> 2.7 Assumptions and Constraints                | <input type="checkbox"/> 2.12.3 Information Technology (IT)  |
| <input type="checkbox"/> 2.8 Dependencies                               | <input type="checkbox"/> 2.12.4 Testing  |
| <input type="checkbox"/> 2.9 Market Research                            | <input type="checkbox"/> 2.12.5 Data Conversion/Migration  |
| <input type="checkbox"/> 2.9.1 Market Research Methodologies/Timeframes | <input type="checkbox"/> 2.12.6 Training and Organizational Change Management                          |
| <input type="checkbox"/> 2.9.2 Results of Market Research               | <input type="checkbox"/> 2.12.7 Resource Capacity/Skills/Knowledge for Stage 3 Solution Development    |
| <input type="checkbox"/> 2.10 Alternative Solutions                     | <input type="checkbox"/> 2.12.8 Project Management   |
| <input type="checkbox"/> 2.10.1 Solution Type                           | <input type="checkbox"/> 2.12.8.1 Project Management Maturity Assessment                               |
| <input type="checkbox"/> Recommended                                    | <input type="checkbox"/> 2.12.8.2 Project Management Planning  |
| <input type="checkbox"/> Alternative                                    | <input type="checkbox"/> 2.12.9 Organization Charts  |
| <input type="checkbox"/> 2.10.2 Name                                    | <input type="checkbox"/> 2.13 Data Conversion/Migration  |
| <input type="checkbox"/> 2.10.3 Description                             | <input type="checkbox"/> 2.14 Financial Analysis Worksheets  |
| <input type="checkbox"/> 2.10.4 Benefit Analysis                        |  |
| <input type="checkbox"/> 2.10.5 Assumptions and Constraints             |  |

## Summary of Changes:

### Condition(s) from Previous Stage(s):

|                              |           |
|------------------------------|-----------|
| Condition #                  | ....      |
| Condition Category           | Select... |
| Other, specify               | ....      |
| Condition Sub-category       | Select... |
| Other, specify               | ....      |
| Condition                    |           |
| Assessment                   | Select... |
| Other, specify               | ....      |
| Agency/state Entity Response |           |
| Status                       | Select... |
| Other, specify               | ....      |
| Select + to add conditions.  |           |



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## 2.5 Baseline Processes and Systems

### 2.5.1 Description

The following Programs within the Department of Consumer Affairs' (DCA) umbrella have completed business process mapping and functional requirements identification needed for their business modernization initiative:

- Bureau of Household Goods and Services (BHGS)
- California Architects Board & Landscape Architects Technical Committee (CAB/LATC)
- Structural Pest Control Board (SPCB)
- Cemetery and Funeral Bureau (CFB)

They have identified multiple common requirements and decided to form together as "Business Modernization Cohort 2 (BMC 2)".

#### **BHGS**

BHGS licenses and regulates approximately 44,500 companies across the globe from small single-person businesses to major corporations. BHGS staff are responsible for licensing or registering companies, inspecting businesses, ensuring compliance with laws and regulations, conducting investigations, testing products to determine if they meet the required standards, conducting research and development, educating applicants and registrants, and initiating disciplinary action against companies which are in violation of regulations.

#### **CAB/LATC**

CAB/LATC licenses and regulates approximately 47,000 individual licenses. Staff within the CAB/LATC are responsible for consumer protection through the regulation of licensees and provide administrative oversight and support services. CAB/LATC also sets its own policies, procedures, and regulations to protect the public in the practice of architecture and landscape architecture. Architects design buildings to meet the owner's requirements for function, safety and durability, satisfy environmental standards, and contribute esthetically to the surrounding communities. Landscape Architects provide professional services for landscape preservation, development, and enhancement. These services include consultation, investigation, reconnaissance, research, planning, design, preparation of drawings, construction documents and specifications, and responsible construction observation.

#### **SPCB**

SPCB licenses and regulates approximately 29,000 individual licenses and organizations. Staff within the SPCB are responsible for the protection of the public in the practice of structural pest control. Structural pest is the control of household pests (including but not limited to rodents, vermin, and insects) and wood-destroying pests and organisms or other pests which may invade households or structures.

The practice of structural pest control includes engaging in, offering to engage in, advertising for, soliciting, or the performance of any of the following: identification of infestations or infections; the making of an inspection for the purpose of identifying or attempting to identify infestations or infections of household or other structures by such pests or organisms; the making of inspection reports; recommendations, estimates, and bids, whether oral or written, with respect to such infestation or infections; and the making of contracts, or the submitting of bids for, or the performance of any work including the making of structural repairs or replacements, or the use of pesticides, insecticides, rodenticides, fumigants, or allied chemicals or substances, or mechanical devices for the purpose of eliminating, exterminating, controlling or preventing infestations or infections of such pests, or organisms.

#### **CFB**

The CFB licenses and regulates approximately 13,500 individual and organization licenses. The CFB is responsible for the licensing, enforcement complaint investigations of funeral establishments, funeral directors, embalmers,



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apprentice embalmers, cemetery brokers/branch/additional, cemetery salespersons, cremated remains disposers, crematories, crematory managers, cemetery managers, and the nearly 200 licensed private cemeteries in the State.

## Baseline Systems

The DCA's Consumer Affairs System (CAS) and Applicant Tracking System (ATS) are two legacy systems used by BHGS, CAB/LATC, and SPCB, and CFB to support the current business processes of all units within these Programs.

ATS tracks and monitors activities for the license applications and cashiering. CAS provides licensing and enforcement functionality that tracks license-related activities such as license maintenance, renewals, complaint tracking, investigation activity tracking, and administrative and disciplinary actions.

In addition to CAS and ATS, program-specific systems include:

- SPCB utilizes a third-party Wood-Destroying Organism (WDO) system which tracks work completed by termite companies within the past two years and has cashiering capabilities.
- BHGS utilizes the California Public Utility Commission's (CPUC) Transportation Management Information System (TMIS) only for the household movers license type. CPUC's TMIS is a licensing system. In July 2018, the regulation of household movers was moved from CPUC to BHGS. With the upcoming business modernization initiative, it was agreed by CPUC, BHGS, and DCA's Office of Information Services (OIS) to not transfer the TMIS to BHGS and that it will be incorporated as part of the business modernization effort. BHGS currently accesses TMIS remotely to process license applications received and it is currently maintained by CPUC.
- LATC utilizes a Work Around System (WAS) which is used to track exam candidate data for applicants who have submitted information to become eligible to sit for the required exams.

### 2.5.2 Business Process Workflow

DCA's Organizational Improvement Office (OIO) have worked closely with each Programs' subject matter expert to develop "As Is" and "Could Be" business process maps for each program. These business maps are attached.

Attachment: 2.5.2 Process Maps

### 2.5.3 Current Architecture Information

|   |   |
|---|---|
| Business Function/Process(es)   | License Issuance                                      |
| Business Function/Process(es)   | License Renewal                                       |
| Business Function/Process(es)   | License Maintenance                                   |
| Business Function/Process(es)   | Complaint Intake                                      |
| Business Function/Process(es)   | Complaint Investigation                               |
| Business Function/Process(es)   | Disciplinary Actions                                  |
| Business Function/Process(es)   | Cashiering  |
| Business Function/Process(es)   | Refunds   |
| Business Function/Process(es)   | Inspections   |
| Business Function/Process(es)   | Reports   |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |   |
| Application, System or Component  | CAS   |
|   | Select + to add an application, system, or component. |
| COTS, MOTS or Custom  | Custom application                                    |
| Name/Primary Technology:  | CAS   |



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|   |  |   |                    |           |
|---|--|---|--------------------|-----------|
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No   | If "Yes," specify: | Select... |
|   | Server/Device Function                     | Mainframe   |                    |           |
|   | Hardware                                   | IBM Mainframe   |                    |           |
|   | Operating System                           | IBM ZOS   |                    |           |
|   | System Software                            | Natural   |                    |           |
| Select + to add system software.  |  |   |                    |           |
| System Interfaces   |  | DCA License Search, Franchise Tax Board (FTB), Child Support Services (CSS), Financial Accounting and Cashiering Electronic Transactions (FACET), CA Dept. Tax and Fee Administration (CDTFA), and various scheduled outbound files   |                    |           |
| Data Center Location  |  | State data center operated by CDT   |                    |           |
| Other, specify  |  |   |                    |           |
| Security  | Access (check all that apply)              | <input type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |                    |           |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:                          |                    |           |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication<br><input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |                    |           |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer   |                    |           |
|   |  | Title: Director   |                    |           |
|   |  | Business Program: DCA   |                    |           |
|   | Data Custodian                             | Name: Baird Cowan   |                    |           |
|   |  | Title: Chief Technology Officer   |                    |           |
|   |  | Business Program: DCA OIS   |                    |           |
| Business Function/Process(es)   |  | Initial applications submittal and evaluation   |                    |           |
| Business Function/Process(es)   |  | Application deficiency tracking   |                    |           |
| Business Function/Process(es)   |  | Exam scheduling, results and tracking   |                    |           |
| Business Function/Process(es)   |  | Cashiering  |                    |           |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |                    |           |
| Application, System or Component  |  | ATS   |                    |           |
| Select + to add an application, system, or component.   |  |   |                    |           |
| COTS, MOTS or Custom  |  | Modified off-the-shelf (MOTS)   |                    |           |
| Name/Primary Technology:  |  | Applicant Tracking System   |                    |           |
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No   | If "Yes," specify: |           |
|   | Server/Device Function                     | Application/Database  |                    |           |
|   | Hardware                                   | Sun   |                    |           |
|   | Operating System                           | Solaris   |                    |           |
|   | System Software                            | Oracle Forms  |                    |           |
| Select + to add system software.  |  |   |                    |           |
| System Interfaces   |  | DOJ/FBI - Fingerprint Data; FACET (State Accounting); Consumer Affairs System; Examination Data   |                    |           |
| Data Center Location  |  | Agency/state data center operated by Agency/state entity  |                    |           |
| Other, specify  |  | Click here to enter text.   |                    |           |
| Security  | Access                                     | <input type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff  |                    |           |



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|   |  |   |                    |
|---|--|---|--------------------|
|   | (check all that apply)                     | <input type="checkbox"/> Other, specify:  |                    |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal |                    |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:   |                    |
|   |  | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication  |                    |
|   |  | <input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery   |                    |
|   |  | <input type="checkbox"/> Other, specify:  |                    |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer   |                    |
|   |  | Title: Director   |                    |
|   |  | Business Program: DCA   |                    |
|   | Data Custodian                             | Name: Baird Cowan   |                    |
|   |  | Title: Chief Technology Officer   |                    |
|   |  | Business Program: DCA OIS   |                    |
| Business Function/Process(es)   |  | SPCB License Maintenance  |                    |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |                    |
| Application, System or Component  |  | WDO   |                    |
| Select + to add an application, system, or component.   |  |   |                    |
| COTS, MOTS or Custom  |  | Custom application  |                    |
|   | Name/Primary Technology:                   | WDO   |                    |
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No   | If "Yes," specify: |
|   | Server/Device Function                     | WDO: Simplivity   |                    |
|   | Hardware                                   | WDO: HP DL 380 Gen 10   |                    |
|   | Operating System                           | WDO: RedHat Enterprise Linux 7.5  |                    |
|   | System Software                            | WDO: Oracle WebLogic  |                    |
| Select + to add system software.  |  |   |                    |
| System Interfaces   |  | WDO: CAS, Optical Scanner Reader  |                    |
| Data Center Location  |  | State data center operated by CDT   |                    |
|   | Other, specify                             | <a href="#">Click here to enter text.</a>   |                    |
| Security  | Access (check all that apply)              | <input checked="" type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff                           |                    |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Other, specify:   Maintained by consultant  |                    |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal |                    |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:   |                    |
|   |  | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication  |                    |
|   |  | <input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery   |                    |
|   |  | <input type="checkbox"/> Other, specify:  |                    |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer   |                    |
|   |  | Title: Director   |                    |
|   |  | Business Program: DCA   |                    |
|   | Data Custodian                             | Name: Baird Cowan   |                    |
|   |  | Title: Chief Technology Officer   |                    |
|   |  | Business Program: DCA OIS   |                    |
| Business Function/Process(es)   |  | BHGS License Issuance   |                    |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |                    |
| Application, System or Component  |  | TMIS (maintained by CA Public Utility Commission)   |                    |





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|   |  |   |                    |
|---|--|---|--------------------|
|   |  | Select + to add an application, system, or component.   |                    |
| COTS, MOTS or Custom  |  | Custom application  |                    |
| Name/Primary Technology:  |  | Oracle  |                    |
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No   | If "Yes," specify: |
|   | Server/Device Function                     | Apex applications on the Oracle database 12c  |                    |
|   | Hardware                                   | 16G Memory- 2 CPUs (2 core)   |                    |
|   | Operating System                           | Oracle Linux Server release 6.9   |                    |
|   | System Software                            | Oracle  |                    |
|   |  | Select + to add system software.  |                    |
| System Interfaces   |  | California Highway Patrol and the Dept. of Insurance  |                    |
| Data Center Location  |  |   |                    |
| Other, specify  |  | San Francisco   |                    |
| Security  | Access (check all that apply)              | <input checked="" type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input checked="" type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |                    |
|   | Type of Information (check all that apply) | <input type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input type="checkbox"/> Confidential <input checked="" type="checkbox"/> Other, specify: Passenger Transportation            |                    |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication<br><input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |                    |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer   |                    |
|   |  | Title: Director   |                    |
|   |  | Business Program: DCA   |                    |
|   | Data Custodian                             | Name:   |                    |
|   |  | Title:  |                    |
|   |  | Business Program:   |                    |
| Business Function/Process(es)   |  | LATC Candidate Examination Information  |                    |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |                    |
| Application, System or Component  |  | WAS   |                    |
|   |  | Select + to add an application, system, or component.   |                    |
| COTS, MOTS or Custom  |  | Custom application  |                    |
| Name/Primary Technology:  |  | C# .net application   |                    |
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No   | If "Yes," specify: |
|   | Server/Device Function                     | MS SQL Server   |                    |
|   | Hardware                                   | Virtual   |                    |
|   | Operating System                           | Windows Server  |                    |
|   | System Software                            | n/a   |                    |
|   |  | Select + to add system software.  |                    |
| System Interfaces   |  | n/a   |                    |
| Data Center Location  |  |   |                    |
| Other, specify  |  | DCA – FDC   |                    |
| Security  | Access (check all that apply)              | <input type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |                    |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:                          |                    |
|   | Protective Measures                        | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication  |                    |





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|                 |                        |   |
|-----------------|------------------------|---|
|                 | (check all that apply) | <input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |
| Data Management | Data Owner             | Name: Kimberly Kirchmeyer   |
|                 |                        | Title: Director   |
|                 |                        | Business Program: DCA   |
|                 | Data Custodian         | Name: Baird Cowan   |
|                 |                        | Title: Chief Technology Officer   |
|                 |                        | Business Program: DCA OIS   |

Select + to add business functions/processes.

## 2.5.4 Current Architecture Diagram

Attachment: 2.5.4 Network Map

## 2.5.5 Security Categorization Impact Table

Attachment: 2.5.5 Security Categorization Impact Table

| SECURITY CATEGORIZATION IMPACT TABLE SUMMARY |                          |                                     |                          |
|--|--------------------------|-------------------------------------|--------------------------|
| SECURITY OBJECTIVE                           | LOW                      | MODERATE                            | HIGH                     |
| Confidentiality                              | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| Integrity                                    | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| Availability                                 | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |

## 2.6 Mid-Level Solution Requirements

Attachment: 2.6\_Mid-Level Solution Reqs v1.0



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## 2.7 Assumptions and Constraints

| Assumptions/Constraints  | Description/Potential Impact   |
|--|--|
| Project receives the funding requested                                     | Funding is a key factor for the success of this proposal. It is strongly assumed that necessary funding for this proposal will be granted and funding will be available throughout the lifecycle of this project via approved budget authority.  |
| Project tools available  | IT projects require special software and tools to manage successfully. IT and program staff to be equipped and trained on the appropriate project management, requirements management, and testing tools.  |
| Project will continue to be a high priority for the Programs and DCA       | The priority of this project is high, and it will remain at that level for the duration of the project.  |
| Standard operating hours   | Staff will be available during normal business hours (M-F, 8 a.m.– 5 p.m.), excluding state holidays.  |
| Technology is available to create a solution which meets the program needs | The appropriate technology is available and will be used in the development and implementation of the project.   |
| Project resources are available and engaged in project activities          | The resources required for this project are available in a timely manner and are engaged in project activities.  |
| Normal availability of services and resources persist                      | Throughout the project lifecycle, the Programs will continue to provide the same level and quality of services.  |
| Subject Matter Expert (SME) resources                                      | It is crucial that SMEs are available to the project. Specific staff will support implementation and cross-training to make the project a success.   |
| Warranty   | For this proposal to be successful, it is important that the solution will have a maintenance warranty or agreement to cover all unforeseen issues upon implementation, go-live, and continued production. Also, upgrades and configurations are necessary to continue to keep the system effective over time. |
| All Programs remain engaged and agree to continue as a cohort              | BHGS, CAB/LATC, SPCB, and CFB, have committed to remain as a cohort and to select the same solution and undergo all PAL activities at the same time.   |
| Details for financial analysis will be estimated                           | The estimate included in the Financial Analysis Worksheets (FAWs) is based on the best information available at the time after extensive market research. As knowledge and understanding grow to improve estimates, there may be changes to project cost.  |
| Select + to add assumptions/constraints.                                   |  |

## 2.8 Dependencies

| Element  | Description   |
|--|---|
| Hiring of a consultant to act as a project manager             | For this proposal to be implemented successfully, it will require a project manager to be hired who will be responsible for ensuring system implementation occurs according to the agreed upon project plans. |
| Vendor will train users on how to access and navigate solution | Vendor will provide superuser system training and train staff to be able to provide trainer support.  |



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|   |   |
|---|---|
| DCA OIS Support   | The Programs will rely on redirected and dedicated OIS support to collaborate with the subject matter experts and program leadership on an effective and feasible solution. Program staff and leadership are not experts in technology nor project management, so OIS support will be critical. |
| Funding   | Sufficient funding must first be identified before this proposal can be implemented.  |
| Data Dictionary   | The data dictionary must be completed prior to data migration.  |
| Data Migration  | Improving data accuracy prior to data migration is necessary before a system can be implemented.  |
| Cloud hosted solutions may have unexpected downtime where the system will not be available, this will be outside the control of the Programs. | Cloud solutions are generally reliable, and vendors will be held to service level agreements. The Programs will be dependent on the service provider and have an action plan in place to address possible compromises or failure of the system.   |
| User Authentication   | The new system will be dependent on Active Directory for User ID and authentication purposes.   |
| A requirements traceability matrix will help ensure that all requirements are met.  | Program staff will measure the new system results against business requirements to ensure that they meet business objectives. They will provide the vendor feedback and additional requirements, as needed.   |
| System Integrator   | BMC2 Project timeline will depend on acquiring an SI vendor successfully to implement the InLumon solution.   |

Select + to add dependencies.

## 2.9 Market Research

### 2.9.1 Market Research Methodologies/Timeframes

#### Methodologies Used To Perform Market Research (check all that apply):

|   |   |
|---|---|
| <input type="checkbox"/> Request for Information (RFI)  | <input type="checkbox"/> Trade shows  |
| <input type="checkbox"/> Internet Research  | <input type="checkbox"/> Published Literature                                     |
| <input checked="" type="checkbox"/> Vendor Forums/Presentation  | <input checked="" type="checkbox"/> Leveraged Agreements                          |
| <input checked="" type="checkbox"/> Collaboration with other Agencies/state entities or governmental entities | <input checked="" type="checkbox"/> Other, specify: Market Research Questionnaire |

|  |           |
|--|-----------|
| <b>Time spent conducting market research:</b>  | 5 months  |
| <b>Date market research was started:</b>       | 8/8/2019  |
| <b>Date all market research was completed:</b> | 12/6/2019 |

### 2.9.2 Results of Market Research



# Stage 2 Alternatives Analysis

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In order to conduct a thorough alternative analysis, the Programs and OIS initiated a comprehensive market research effort that drew on many different sources of information. This included DCA's IT portfolio, vendor demonstrations, questionnaires, and researching other states.

## 1. DCA's IT Portfolio

DCA's modernized IT licensing and enforcement portfolio now includes: Connect's Software as a Service (SaaS) with inLumon, BreZE with Versa Online/Versa Regulation, and Cannabis Licensing Enforcement and Reporting (CLEaR) with Accela.

- **Connect:** To gain exposure and determine if Connect's highly successful MVP implementation can meet the Program's business needs, DCA OIS provided a demonstration of Connect's MVP functionality for the Board for Professional Engineers, Landscape Surveyors, and Geologist's (BPELSG) from a practical business-user perspective.

inLumon's SaaS solution is cloud-based and meets CDT's Technology Letter (TL) 17-06: Update to Cloud Computing Policy – Infrastructure and Platform. This Cloud Computing policy required all Agencies/state entities to utilize cloud computing technologies first, for the delivery of IT services in a cost effective manner.

- **BreZE:** Since 2013, BreZE has been in the DCA IT portfolio. It provides licensing and enforcement of online submission of applications, evaluation of those applications, back office workflow tools, licensee continuing education, and enforcement intake and case tracking. A thorough demonstration was provided to the Programs in August of 2019.

BreZE is a configurable commercial-off-the-shelf (COTS) system that has limited system extensions (e.g., Cognos integration and custom license search) that were implemented over time. However, BreZE's COTS solution does not conform to CDT's TL 17-06 and is cost prohibitive.

- **CLEaR:** In 2017, the Bureau Of Cannabis Control (BCC) launched the CLEaR system with Accela's cloud-based solution. The system provides the "look and feel" of a custom web page, customized features, and ad hoc reporting features implemented for BCC. A thorough demonstration was provided to the Programs in August of 2019.

Accela's CLEaR is a cloud-based solution that is highly configurable, but it is not as flexible as a custom or platform-based solution.

## 2. Software Solution Demonstrations

OIS, on behalf of the Programs, coordinated several software solution system demonstrations. The demonstrations were performed August 2019 through the beginning of December 2019 and in some cases, at the request of the Programs, were demonstrated more than once. In total, nine solutions outside of DCA's IT Portfolio were demonstrated. Some solutions were presented by the solution vendor only as they do not outsource for solution integrators as the services are provided within the same company.

Below is the full list of the software vendor and/or solutions that were demonstrated:

- Thentia
- Grant Thornton – Infor
- InLumon
- Crowe LLP – Microsoft Dynamics 365
- PegaSystems



# Stage 2 Alternatives Analysis

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- VIP – Entellitrak
- VIP – Salesforce
- Accenture – Salesforce
- Estrada – OutSystems

These system demonstrations support that a robust marketplace exists for solutions that can meet the needs of DCA Programs interested in moving into an improved licensing and enforcement system.

OIS has confirmed these solutions can be implemented via an agile methodology that DCA will be pursuing for all IT projects moving forward.

### 3. Market Research Questionnaire

A Market Research Questionnaire was released on October 25, 2019 in lieu of a formal Request for Information. The Programs and OIS evaluated responses provided by the vendors and received a combination of COTS, and platform as a service (PaaS) solutions and Software as a Service (SaaS) recommendations from the vendor community. The most complete responses assisted in identifying potential project and maintenance and operations costs, software solution costs, project duration, development approach, and accessibility to integration with DCA’s Digital Ecosystem.

### 4. Communications with other Executive Officers from various States

CAB/LATC inquired with other Executive Officers from various states who have also either completed recent business modernization activities or have already completed them and what solutions they chose. The responses received were very informative and provided valuable insight regarding vendors which had previously provided a system demonstration to DCA’s Programs.

In conclusion, Programs considered various criteria to determine the best solution alternative to pursue. The best solution for this proposal meets the project goals and objectives, is cost effective, leverages the most modern technology, and follows the Programs’ and DCA’s strategic direction. A Software as a Service – inLumon solution available via a leveraged procurement agreement was deemed to be the best solution.

## 2.10 Alternative Solutions

### 2.10.1 Solution Type

Recommended

### 2.10.2 Name

inLumon Software as a Service (SaaS)

### 2.10.3 Description



# Stage 2 Alternatives Analysis

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This alternative would leverage a solution within the DCA’s IT portfolio which is being implemented for the Business Modernization Cohort 1 (BMC 1).

DCA recommends using a Software Licensing Program (SLP) to purchase new licenses and instances of the InLumon software. The new software instances would be developed to the specific BMC 2 requirements. While the same software is being used by BMC 1, the new instances purchased and developed for BMC 2 would have no impact to the continuous development of BMC 1.

Furthermore, DCA recommends using the cloud-based InLumon SaaS solution as it has proven to be a viable option to implement licensing and enforcement modernization quickly and efficiently, delivering mission critical functionality supporting telework and improved online capabilities for consumers, applicants and licensees.

A solicitation would be released to bring in a vendor to configure the software. The applicable BMC 2 business process diagrams, system requirements, and associated use cases developed during the planning activities would be leveraged in the BMC 2 SOW to assist in streamlining the configuration.

Through market research, this approach was proven to be the most cost effective and most effective at reducing key areas of project risk as DCA is familiar with this solution. In addition, putting the Programs in a position to modernize in the future given the open architected nature of a SaaS.

An agile implementation will be used with multiple releases, including a Minimum Viable Product (MVP) release, to deliver functionality throughout the project phase instead of only at the project’s conclusion. This approach was successfully used on the OIS-led Cannabis Licensing Enforcement and Reporting (CLEaR) Project. In addition, most recently with the success of the Business Modernization Cohort 1 programs, which delivered their MVP in September 2020.

The approach for procurement of additional instances and licenses of the inLumon solution, for BMC 2 programs, will allow the Programs and OIS to work with functionality which already exists and are familiar with. This will allow for a smooth transition to obtaining the benefits of key business process improvements such as online application submission and acceptance of credit card payments early in the project. This will increase stakeholder confidence, constituent satisfaction, and business buy-in.

The Programs have agreed to partner as a group and will be going through the PAL process together to share project costs and better negotiate competitive rates.

**Approach** (Check all that apply):

|                                     |  |
|-------------------------------------|--|
| <input checked="" type="checkbox"/> | Increase staff – new or existing capabilities  |
| <input checked="" type="checkbox"/> | Modify the existing business process or create a new business process                                      |
| <input type="checkbox"/>            | Reduce the services or level of services provided  |
| <input checked="" type="checkbox"/> | Utilize new or increased contracted services   |
| <input checked="" type="checkbox"/> | Enhance the existing IT system   |
| <input type="checkbox"/>            | Create a new IT system   |
| <input type="checkbox"/>            | Perform a business-based procurement to have vendors propose a solution                                    |
| <input checked="" type="checkbox"/> | Other, specify: Utilize open competition procurement (RFP) and formal solicitation for contracted vendors. |

**2.10.4 Benefit Analysis**

**Benefits/Advantages**

This option would utilize a leveraged procurement agreement to purchase license subscriptions for DCA’s existing cloud-hosted solution, inLumon.

Using existing DCA software allows for familiarity in transitioning off of legacy systems to a SaaS.

The recommended solution achieves project objectives in an acceptable timeframe.



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This option will provide a solution with an open-architected solution that can enhance or increase the level of service in the future.

SaaS has proven through market research to be modernized in their look and feel and highly capable of convenient methods of communication with the external user like text message, email updates, and mobile compatibility features. The open-architected and customizable nature of the solution facilitates an opportunity for incremental project software releases and future enhancements.

Select + to add benefits/advantages.

### Disadvantages

Programs will need to become familiar with a new solution and require an update in daily processing documentation. Program staff will receive training and require updates to current documentation.

While market research conducted indicates platform solutions are generally robust and capable of meeting a broad set of business objectives and requirements, any 'off the shelf' software by its nature runs some risk of not being able to meet requirements exactly in the manner the business intends.

Select + to add disadvantages.

### Anticipated Time to Achieve Objectives After Project Go-Live

| Objective Number  | Objective Timeframe                 |                          |                          |                          |                          |
|-------------------|-------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
|                   | Within 1 Year                       | 2 Years                  | 3 Years                  | 4 Years                  | Over 4 Years             |
| BHGS: 1.1 - 3.2   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| CAB/LATC:1.1 -3.1 | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| SPCB: 1.1 - 3.1   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| CFB: 1.1 – 3.1    | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Select + to add objectives.

### Anticipated Time to Achieve Financial Benefits After Project Go-Live

| Financial Benefit  | Within 1 Year                       | 2 Years                  | 3 Years                  | 4 Years                  | Over 4 Years             |
|--------------------|-------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
| Increased Revenues | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Savings       | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Avoidance     | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Recovery      | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

### 2.10.5 Assumptions and Constraints

Additional budget appropriation is needed.

Deploying this solution is not for the purpose of generating additional revenue.

The vendor will provide maintenance and operations services, functional and system administration knowledge transfer to state staff.

Current and future costs associated with the system will be paid for by the Programs.

The system will be scalable to meet future program needs.

Cost avoidance anticipated due to the lowered cost in paper transactions within the first year of software launch.

Utilization of email and text (SMS) will result in future cost avoidance for the programs.

Select + to add assumptions/constraints

### 2.10.6 Implementation Approach

**Identify the type of existing IT system enhancement or new system proposed (check all that apply):**

- Enhance the current system
- Develop a new custom solution
- Purchase a Commercial off-the-Shelf (COTS) system
- Purchase or obtain a system from another government agency (Transfer)





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- Subscribe to a Software as a Service (SaaS) system
- Other, specify: Platform Solution

**Identify cloud services to be leveraged (check all that apply):**

- Software as a Service (SaaS) provided by OTech
- Software as a Service (SaaS) provided by commercial vendor
- Platform as a Service (PaaS) provided by OTech
- Platform as a Service (PaaS) provided by commercial vendor
- Infrastructure as a Service (IaaS) provided by OTech
- Infrastructure as a Service (IaaS) provided by commercial vendor
- No cloud services will be leveraged by this alternative. Provide a description of why cloud services are not being leveraged:

**Identify who will modify the existing system or create the new system (check all that apply):**

- Agency/state entity IT staff
- A vendor will be contracted
- Inter-agency agreement will be established with another governmental agency. Specify Agency name(s):
- Other, specify: Leveraged procurement agreements will be used, where applicable.

**Identify the implementation strategy:**

- All requirements will be addressed in this proposed project in a single implementation.
- Requirements will be addressed in incremental implementations in this proposed project.
- Some requirements will be addressed in this proposed project. The remaining requirements will be addressed later.  
Specify the year when the remaining requirements will be addressed:

**Identify if the technology for the proposed project will be mission critical and public facing:**

- The technology implemented for this proposed project will be considered mission critical and public facing.

**2.10.7 Architecture Information**



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|   |  |   |   |
|---|--|---|---|
| Business Function/Process(es)   |  | Licensing<br>Applications<br>Examinations<br>Renewal<br>Cashiering<br>Enforcement<br>Reporting<br>License Search  |   |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |   |
| Application, System or Component  |  | Licensing, Applications and Enforcement   |   |
| Select + to add an application, system, or component.   |  |   |   |
| COTS, MOTS or Custom  |  | Custom  |   |
| Name/Primary Technology:  |  | Software as a Service – InLumon SaaS solution   |   |
| Runtime Environment   | Cloud Computing Used?                      | <input checked="" type="checkbox"/> Yes<br><input type="checkbox"/> No  | If "Yes," specify: Select...SaaS                                      |
|   | Server/Device Function                     | TBD   |   |
|   | Hardware                                   | TBD   |   |
|   | Operating System                           | TBD   |   |
|   | System Software                            | TBD   |   |
| Select + to add system software.  |  |   |   |
| System Interfaces   |  | DOJ/FBI - Fingerprint Data; FACET; CSS, FTB, Various Scheduled Outbound Files   |   |
| Data Center Location  |  | Other – Vendor’s Data Center  |   |
| Other, specify  |  | Government Cloud based service (FedRAMP)  |   |
| Security  | Access (check all that apply)              | <input type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |   |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:                          |   |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication<br><input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |   |
|   | Data Management                            | Data Owner  | Name: Kimberly Kirchmeyer<br>Title: Director<br>Business Program: DCA |
|   | Data Custodian                             | Name: Baird Cowan<br>Title: Chief Technology Officer<br>Business Program: DCA OIS   |   |



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Select + to add business functions/processes.

## 2.10.1 Solution Type

**Alternative**

## 2.10.2 Name

Accela (CLEaR)

## 2.10.3 Description

This alternative was necessary for the Programs to evaluate existing DCA systems as an alternative during Stage 2. This alternative would leverage a DCA licensing and enforcement IT system implemented for BCC under the DCA umbrella. The project period for this option is anticipated to be 18 months.

### Approach (Check all that apply):

- Increase staff – new or existing capabilities
- Modify the existing business process or create a new business process
- Reduce the services or level of services provided
- Utilize new or increased contracted services
- Enhance the existing IT system
- Create a new IT system
- Perform a business-based procurement to have vendors propose a solution
- Other, specify:

## 2.10.4 Benefit Analysis

### Benefits/Advantages

Accela is a solution DCA IT staff have previously assisted in implementing. COTS solutions are built based on industry best practices. Implementing a COTS solution will enable the Programs to refine processes to meet some of these industry wide best practices.

Solution exists in-house and could be configured to meet business program needs.

Reduces the risk of a lengthy RFP or leveraged procurement options

Accela allows a degree of customization for the public-facing components of the portal.

Accela is a cloud-based software solution currently available via leveraged procurement.

Select + to add benefits/advantages

### Disadvantages

Accela is a COTS solution. COTS solutions cannot be customized easily or at a low cost

Similar to Breeze, Accela is not an open architected platform type solution, which limits the ability for the system to interface with other software applications in real-time.

The Programs will be reliant on a vendor to make requested changes to the software, beyond in-house administrator functions, if business rules change

Select + to add disadvantages

### Anticipated Time to Achieve Objectives After Project Go-Live

| Objective Number        | Objective Timeframe                 |                          |                          |                          |                          |
|-------------------------|-------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
|                         | Within 1 Year                       | 2 Years                  | 3 Years                  | 4 Years                  | Over 4 Years             |
| <b>BHGS: 1.1 - 3.2</b>  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| <b>CAB/LATC:1.1-3.1</b> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| <b>SPCB: 1.1 - 3.1</b>  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| <b>CFB: 1.1 – 3.1</b>   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Select + to add objectives

### Anticipated Time to Achieve Financial Benefits After Project Go-Live

| Financial Benefit | Within 1 Year | 2 Years | 3 Years | 4 Years | Over 4 Years |
|-------------------|---------------|---------|---------|---------|--------------|
|-------------------|---------------|---------|---------|---------|--------------|



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|                    |                                     |                          |                          |                          |                          |
|--------------------|-------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
| Increased Revenues | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Savings       | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Avoidance     | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Recovery      | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

## 2.10.5 Assumptions and Constraints

DCA assumes additional state and vendor resources will need to be brought on board separate from the existing staff supporting each program.

The level of effort is presumed to be higher as data conversion will be needed.

Select + to add assumptions/constraints

## 2.10.6 Implementation Approach

**Identify the type of existing IT system enhancement or new system proposed (check all that apply):**

- Enhance the current system
- Develop a new custom solution
- Purchase a Commercial off-the-Shelf (COTS) system
- Purchase or obtain a system from another government agency (Transfer)
- Subscribe to a Software as a Service (SaaS) system
- Other, specify:

**Identify cloud services to be leveraged (check all that apply):**

- Software as a Service (SaaS) provided by OTech
- Software as a Service (SaaS) provided by commercial vendor
- Platform as a Service (PaaS) provided by OTech
- Platform as a Service (PaaS) provided by commercial vendor
- Infrastructure as a Service (IaaS) provided by OTech
- Infrastructure as a Service (IaaS) provided by commercial vendor
- No cloud services will be leveraged by this alternative. Provide a description of why cloud services are not being leveraged:

**Identify who will modify the existing system or create the new system (check all that apply):**

- Agency/state entity IT staff
- A vendor will be contracted
- Inter-agency agreement will be established with another governmental agency. Specify Agency name(s):
- Other, specify:

**Identify the implementation strategy:**

- All requirements will be addressed in this proposed project in a single implementation.
- Requirements will be addressed in incremental implementations in this proposed project.
- Some requirements will be addressed in this proposed project. The remaining requirements will be addressed later.  
Specify the year when the remaining requirements will be addressed:

**Identify if the technology for the proposed project will be mission critical and public facing:**

- The technology implemented for this proposed project will be considered mission critical and public facing.

## 2.10.7 Architecture Information



# Stage 2 Alternatives Analysis

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|   |  |   |                    |           |
|---|--|---|--------------------|-----------|
| Business Function/Process(es)   |  | Licensing<br>Examinations<br>Renewal<br>Cashiering<br>Enforcement<br>Reporting<br>License Search  |                    |           |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |   |                    |           |
| Application, System or Component  |  | Accela  |                    |           |
| Select + to add an application, system, or component.   |  |   |                    |           |
| COTS, MOTS or Custom  |  | Commerical off-the-shelf (COTS)   |                    |           |
| Name/Primary Technology:  |  | Accela  |                    |           |
| Runtime Environment   | Cloud Computing Used?                      | <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No   | If "Yes," specify: | Select... |
|   | Server/Device Function                     | TBD   |                    |           |
|   | Hardware                                   | TBD   |                    |           |
|   | Operating System                           | TBD   |                    |           |
|   | System Software                            | TBD   |                    |           |
| Select + to add system software   |  |   |                    |           |
| System Interfaces   |  | DOJ/FBI - Fingerprint Data; FACET (State Accounting); Child Support Services; Franchise Tax Board; Various Scheduled Outbound Files   |                    |           |
| Data Center Location  |  | Commercial data center Commercial data center   |                    |           |
|   | Other, specify                             |   |                    |           |
| Security  | Access (check all that apply)              | <input checked="" type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input checked="" type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |                    |           |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:                          |                    |           |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication<br><input checked="" type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |                    |           |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer   |                    |           |
|   |  | Title: Director   |                    |           |
|   |  | Business Program: DCA   |                    |           |
|   | Data Custodian                             | Name: Baird Cowan   |                    |           |
|   |  | Title: Chief Technology Officer   |                    |           |
|   |  | Business Program: DCA OIS   |                    |           |



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Select + to add business functions/processes

## 2.10.1 Solution Type

**Alternative**

## 2.10.2 Name

BreEZe – Versa Regulation/Online

## 2.10.3 Description

This alternative would leverage existing DCA licensing and enforcement IT systems currently within DCA’s IT portfolio.

### Approach (Check all that apply):

- Increase staff – new or existing capabilities
- Modify the existing business process or create a new business process
- Reduce the services or level of services provided
- Utilize new or increased contracted services
- Enhance the existing IT system
- Create a new IT system
- Perform a business-based procurement to have vendors propose a solution
- Other, specify:

## 2.10.4 Benefit Analysis

### Benefits/Advantages

BreEZe solution has been maintained by DCA IT staff for the several years.

Reduces the risk of a lengthy RFP or leveraged procurement options.

BreEZe’s application security would be internally controlled.

Select + to add benefits/advantages

### Disadvantages

BreEZe was developed and implemented for DCA Programs with different business needs than the BMC 2 Programs. While some business processes are similar, the Programs have some unique business processes. The State Auditor’s 2014-116 DCA BreEZe System Audit Report’s recommendations #17 and #18 emphasize the importance of using the entity’s own unique requirements.

BreEZe is a COTS system and not an open platform that allows for the integration of other custom applications. A COTS solution cannot be customized easily or at a low cost.

Because OIS staff supporting BreEZe staff are 100% dedicated to maintenance and operations tasks for the 18 Programs currently using BreEZe, there are limitations for staff redirection. As a result of this, there are additional positions included in the FAWs associated with this alternative.

Select + to add disadvantages

### Anticipated Time to Achieve Objectives After Project Go-Live

#### Objective Timeframe

| Objective Number | Within 1 Year                       | 2 Years                  | 3 Years                  | 4 Years                  | Over 4 Years             |
|------------------|-------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
| BHGS: 1.1 - 3.2  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| CAB/LATC:1.1-3.1 | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| SPCB: 1.1 - 3.1  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| CFB: 1.1 - 3.1   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Select + to add objectives



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| Financial Benefit  | Anticipated Time to Achieve Financial Benefits After Project Go-Live |                          |                          |                          |                          |
|--------------------|--|--------------------------|--------------------------|--------------------------|--------------------------|
|                    | Within 1 Year  | 2 Years                  | 3 Years                  | 4 Years                  | Over 4 Years             |
| Increased Revenues | <input type="checkbox"/>   | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Savings       | <input type="checkbox"/>   | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Avoidance     | <input checked="" type="checkbox"/>                                  | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| Cost Recovery      | <input type="checkbox"/>   | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

## 2.10.5 Assumptions and Constraints

### BreEze

DCA will be constrained in the marketplace to find vendors who are familiar working with the Versa Regulation/Online product, which may necessitate approval to conduct a Non-Competitive Bid (NCB). While the system is currently supported by predominantly state IT staff, DCA will have to temporarily augment staff in order to implement any new board/bureau on the BreEze system.

Select + to add assumptions/constraints

## 2.10.6 Implementation Approach

### Identify the type of existing IT system enhancement or new system proposed (check all that apply):

- Enhance the current system
- Develop a new custom solution
- Purchase a Commercial off-the-Shelf (COTS) system
- Purchase or obtain a system from another government agency (Transfer)
- Subscribe to a Software as a Service (SaaS) system
- Other, specify:

### Identify cloud services to be leveraged (check all that apply):

- Software as a Service (SaaS) provided by OTech
- Software as a Service (SaaS) provided by commercial vendor
- Platform as a Service (PaaS) provided by OTech
- Platform as a Service (PaaS) provided by commercial vendor
- Infrastructure as a Service (IaaS) provided by OTech
- Infrastructure as a Service (IaaS) provided by commercial vendor
- No cloud services will be leveraged by this alternative. Provide a description of why cloud services are not being leveraged:  
The BreEze system is housed within Tenant Managed Services on DCA-owned equipment.

### Identify who will modify the existing system or create the new system (check all that apply):

- Agency/state entity IT staff
- A vendor will be contracted
- Inter-agency agreement will be established with another governmental agency. Specify Agency name(s):
- Other, specify:

### Identify the implementation strategy:

- All requirements will be addressed in this proposed project in a single implementation.
- Requirements will be addressed in incremental implementations in this proposed project.
- Some requirements will be addressed in this proposed project. The remaining requirements will be addressed later.  
Specify the year when the remaining requirements will be addressed:

### Identify if the technology for the proposed project will be mission critical and public facing:

- The technology implemented for this proposed project will be considered mission critical and public facing.

## 2.10.7 Architecture Information





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|   |  |  |                                       |
|---|--|--|---------------------------------------|
| Business Function/Process(es)   |  | Licensing  |                                       |
| Business Function/Process(es)   |  | Renewals   |                                       |
| Business Function/Process(es)   |  | Enforcement (i.e. Investigations, Inspections & Compliance)  |                                       |
| Business Function/Process(es)   |  | License Maintenance  |                                       |
| Business Function/Process(es)   |  | Public Facing Online Portal  |                                       |
| Select + to add a business process with the same application, system, or component; COTS, MOTS or custom solution; runtime environment; system interfaces, data center location; and, security. |  |  |                                       |
| Application, System or Component  |  | Applications, Licensing and Enforcement  |                                       |
| Select + to add an application, system, or component.   |  |  |                                       |
| COTS, MOTS or Custom  |  | Commerical off-the-shelf (COTS)  |                                       |
| Name/Primary Technology:  |  |  |                                       |
| Runtime Environment   | Cloud Computing Used?                      | <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No  | If "Yes," specify: Select...Select... |
|   | Server/Device Function                     | Windows/Unix VMware  |                                       |
|   | Hardware                                   | Simplivity and Oracle  |                                       |
|   | Operating System                           | Unix and Windows   |                                       |
|   | System Software                            | Apache Linux/Apache Tomcat/AWS PostgreSQL RDS  |                                       |
| Select + to add system software   |  |  |                                       |
| System Interfaces   |  | FACET, DCA License Search, DOJ/FBI, Various Outbound files   |                                       |
| Data Center Location  |  | State data center operated by department of Technology   |                                       |
| Other, specify  |  |  |                                       |
| Security  | Access (check all that apply)              | <input checked="" type="checkbox"/> Public <input checked="" type="checkbox"/> Internal State Staff <input type="checkbox"/> External State Staff<br><input type="checkbox"/> Other, specify:  |                                       |
|   | Type of Information (check all that apply) | <input checked="" type="checkbox"/> Personal <input type="checkbox"/> Health <input type="checkbox"/> Tax <input type="checkbox"/> Financial <input type="checkbox"/> Legal<br><input checked="" type="checkbox"/> Confidential <input type="checkbox"/> Other, specify:               |                                       |
|   | Protective Measures (check all that apply) | <input checked="" type="checkbox"/> Technical Security <input checked="" type="checkbox"/> Identity Authorization and Authentication<br><input type="checkbox"/> Physical Security <input checked="" type="checkbox"/> Backup and Recovery<br><input type="checkbox"/> Other, specify: |                                       |
| Data Management   | Data Owner                                 | Name: Kimberly Kirchmeyer  |                                       |
|   |  | Title: Director  |                                       |
|   |  | Business Program: DCA  |                                       |
| Data Custodian  |  | Name: Baird Cowan  |                                       |
|   |  | Title: Chief Technology Officer  |                                       |
|   |  | Business Program: DCA OIS  |                                       |



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Select + to add business functions/processes.

## 2.11 Recommended Solution

### 2.11.1 Rationale for Selection

The recommended solution for addressing the Programs’ business needs is a SaaS solution which is being used for BMC 1, called inLumon. BMC 2 Programs will purchase separate licenses and instances of the software. InLumon is fully hosted and maintained in a cloud environment. Each program would pay a per-user license fee for the number of subscribed internal users and a separate fee structure for external users. The benefit of using a SaaS subscription cloud offering is the built-in security to protect data and applications, and is considered the most desirable option.

A procurement for the solution will be leveraged for subscriptions and external users. We will utilize a partner vendor who has successfully tested and implemented a process that meets our milestone approach and timelines. This alternative was chosen because it is likely to be the best value to each Program and DCA. The recommended solution was deemed to be the best fit considering the degree to which the solution satisfies the business objectives, leverages existing marketplace technology, provides an acceptable timeframe for implementation, and aligns with the Programs’, DCA, CDT, and the State of California’s IT strategic direction.

The recommended solution was weighed against other alternatives and it was determined to be the lowest risk for meeting scope, schedule, and budget. Additionally it would provide a solid foundation for extensibility and adaptability in meeting the future business needs of DCA.

This solution requires three limited term augmentation staffing for the Programs and five permanent augmentation of staffing for IT services. The SaaS solution alternative and its ability to be customized or augmented to interface in real-time with other software application provides the most flexibility in the short term and long term for Programs to meet all of their business objectives, including a significant increase in the ability to interact with applicants, licensees, and consumers via an online portal.

Attachment: 2.11.2 App C Tech Complexity v1.1

### 2.11.2 Technical/Initial CA-PMM Complexity Assessment

| Complexity                  |     | Complexity Zone                            |                         |
|-----------------------------|-----|--|-------------------------|
| Technical Complexity Score: | 1.0 | <input checked="" type="checkbox"/> Zone I | Low Criticality/Risk    |
|                             |     | <input type="checkbox"/> Zone II/III       | Medium Criticality/Risk |
|                             |     | <input type="checkbox"/> Zone IV           | High Criticality/Risk   |

### 2.11.3 Procurement and Staffing Strategy

#### Activity

#### System Integrator Consultant Solicitation

| Responsible<br>(check all that apply) | When Needed<br>(check all that apply) | Cost Estimate<br>Verification<br>(check all that apply) |
|---------------------------------------|---------------------------------------|---|
|                                       |                                       |   |



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|  |  |   |
|--|--|---|
| <input checked="" type="checkbox"/> Agency/state entity staff<br><input checked="" type="checkbox"/> STP staff<br><input type="checkbox"/> CDT Project Approvals and Oversight staff<br><input type="checkbox"/> CA-PMO staff<br><input type="checkbox"/> DGS staff<br><input type="checkbox"/> Contractor<br><input type="checkbox"/> Other, specify: | <input type="checkbox"/> Stage 3 Solution Development<br><input type="checkbox"/> Stage 4 Project Readiness and Approval<br><input checked="" type="checkbox"/> After project is approved (after Stage 4 Project Readiness and Approval) | <input checked="" type="checkbox"/> Market research conducted (MR)<br><input type="checkbox"/> Cost estimate provided (CE)<br><input type="checkbox"/> CDT CE<br><input type="checkbox"/> DGS CE<br><input type="checkbox"/> Request for Information (RFI) conducted<br><input checked="" type="checkbox"/> Comparable vendor services have been used on previous contracts (CV)<br><input checked="" type="checkbox"/> Leveraged Procurement Agreement (LPA) |
|--|--|---|

**Complete Only if Contractor Responsible for Activity**

|                            |   |                      |                    |
|----------------------------|---|----------------------|--------------------|
| <b>Procurement Vehicle</b> | RFP/ITMSA solicitation performed by CDT | <b>Contract Type</b> | Time and Materials |
| If "Other," specify:       |   | If "Other," specify: |                    |

**Activity**

Software Procurement

| Responsible<br>(check all that apply)  | When Needed<br>(check all that apply)  | Cost Estimate Verification<br>(check all that apply)   |
|--|--|--|
| <input checked="" type="checkbox"/> Agency/state entity staff<br><input checked="" type="checkbox"/> STP staff<br><input type="checkbox"/> CDT Project Approvals and Oversight staff<br><input type="checkbox"/> CA-PMO staff<br><input type="checkbox"/> DGS staff<br><input type="checkbox"/> Contractor<br><input type="checkbox"/> Other, specify: | <input type="checkbox"/> Stage 3 Solution Development<br><input type="checkbox"/> Stage 4 Project Readiness and Approval<br><input checked="" type="checkbox"/> After project is approved (after Stage 4 Project Readiness and Approval) | <input checked="" type="checkbox"/> Market research conducted (MR)<br><input type="checkbox"/> Cost estimate provided (CE)<br><input type="checkbox"/> CDT CE<br><input type="checkbox"/> DGS CE<br><input type="checkbox"/> Request for Information (RFI) conducted<br><input type="checkbox"/> Comparable vendor services have been used on previous contracts (CV)<br><input checked="" type="checkbox"/> Leveraged Procurement Agreement (LPA) |

**Complete Only if Contractor Responsible for Activity**

|                            |   |                      |   |
|----------------------------|---|----------------------|---|
| <b>Procurement Vehicle</b> | Software Licensing Program (SLP)          | <b>Contract Type</b> | Fixed Price                               |
| If "Other," specify:       | <a href="#">Click here to enter text.</a> | If "Other," specify: | <a href="#">Click here to enter text.</a> |

**Activity**

Project Manager Consultant, and Independent Validation and Verification Consultant

| Responsible<br>(check all that apply)   | When Needed<br>(check all that apply)   | Cost Estimate Verification<br>(check all that apply)  |
|---|---|---|
| <input checked="" type="checkbox"/> Agency/state entity staff<br><input type="checkbox"/> STP staff<br><input type="checkbox"/> CDT Project Approvals and Oversight staff<br><input type="checkbox"/> CA-PMO staff<br><input type="checkbox"/> DGS staff<br><input type="checkbox"/> Contractor<br><input type="checkbox"/> Other, specify: | <input type="checkbox"/> Stage 3 Solution Development<br><input checked="" type="checkbox"/> Stage 4 Project Readiness and Approval<br><input checked="" type="checkbox"/> After project is approved (after Stage 4 Project Readiness and Approval) | <input checked="" type="checkbox"/> Market research conducted (MR)<br><input type="checkbox"/> Cost estimate provided (CE)<br><input type="checkbox"/> CDT CE<br><input type="checkbox"/> DGS CE<br><input type="checkbox"/> Request for Information (RFI) conducted<br><input checked="" type="checkbox"/> Comparable vendor services have been used on previous contracts (CV)<br><input checked="" type="checkbox"/> Leveraged Procurement Agreement (LPA) |



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| Complete Only if Contractor Responsible for Activity |   |                      |   |
|--|---|----------------------|---|
| <b>Procurement Vehicle</b>                           | Request for Offer/Information Technology Consulting Services (ITMSA) performed by DCA | <b>Contract Type</b> | Time & Materials                          |
| If "Other," specify:                                 | <a href="#">Click here to enter text.</a>   | If "Other," specify: | <a href="#">Click here to enter text.</a> |

Select + to add activities.

|   | Yes                                 | No                       |
|---|-------------------------------------|--------------------------|
| Will any of the activities identified above result in a competitive or non-competitive solicitation that will be over the Agency/state entity's DGS delegated purchasing authority? | <input checked="" type="checkbox"/> | <input type="checkbox"/> |

## 2.11.4 Enterprise Architecture Alignment

The recommended solution provided in this document aligns with DCA's enterprise architecture.

### Information Technology Capability Table

| Information Technology Capability   | Existing Enterprise Capability to be Leveraged | New Enterprise Capability Needed    |
|---|--|-------------------------------------|
| Public or Internal Portal/Website   | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |
| Public or Internal Mobile Application   | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |
| Enterprise Service Bus  | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |
| Identity and Access Management  | <input checked="" type="checkbox"/>            | <input type="checkbox"/>            |
| Enterprise Content Management (including document scanning and eForms capabilities) | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |
| Business Intelligence and Data Warehousing  | <input checked="" type="checkbox"/>            | <input type="checkbox"/>            |
| Master Data Management  | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |
| Big Data Analytics  | <input type="checkbox"/>                       | <input checked="" type="checkbox"/> |



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| 2.11.5 Project Phases   |  |
|---|--|
| <b>Phase</b>  | <b>Initiation</b>  |
| <b>Description</b>  | <b>Phase Deliverable</b>   |
| In the initiation phase, project need was determined and project was defined. The project stakeholders and Program owners were identified and the scope of the business case for a new licensing and enforcement solution was documented. Business activities with DCA's OIO, were performed to provide business process reengineering, as-is process mapping, could-be process mapping, and development of stakeholder requirements.   | <ul style="list-style-type: none"> <li>-As-Is process maps with narratives</li> <li>-To-Be process maps with narratives</li> <li>-Stage 1 Business Analysis</li> <li>-Requirements Traceability Matrix</li> </ul>  |
| <b>Phase</b>  | <b>Phase Planning, Analysis, and Procurement</b>   |
| <b>Description</b>  | <b>Phase Deliverable</b>   |
| The project planning and approval phase will include requirements refining, use case refining, high level project timeline, and PAL completion. This phase will develop a roadmap of activities to follow. A supplemental procurement plan has been included in the submission as an attachment to provide additional details regarding anticipated procurements.   | <ul style="list-style-type: none"> <li>- PAL artifacts</li> <li>- Mid-Level Solution Requirements</li> <li>- Use Case Refinement</li> <li>- Market Research</li> <li>- Project plan and scope</li> <li>- Project budget</li> <li>- Project Management Plans</li> </ul> <p>There will be procurement planning and documentation finalized for all the contracts and agreements related to this proposal. Deliverables will include:</p> <ul style="list-style-type: none"> <li>• State approved solicitation documents for System Integrator and Software contracts</li> <li>• Leveraged agreements for additionally needed consultants.</li> </ul> |
| <b>Phase</b>  | <b>Sprint Planning</b>   |
| <b>Description</b>  | <b>Phase Deliverable</b>   |
| This is the phase where the project backlog and detailed individual Sprint goals will be developed. These Sprint goals further develop the requirements into User Stories. The requirements will be loaded into a requirements traceability tool, from which a User Story and a Defect tracking tool can link back directly to the requirements. Any software dependencies, system access, and technical infrastructure needs will be identified and integrated into the Project Schedule. Initial orientation meetings with participants in the development process (e.g., Product Owners, Sponsors, Project Manager, Project Director, etc.) to review key requirements of the Agile development process will occur to solidify an understanding of roles and responsibilities. | <ul style="list-style-type: none"> <li>- Sprint/Requirements Backlog</li> <li>- Updates to Project Management Plans, including System Development, Training, Testing Management Plans, and the Project Schedule</li> </ul>   |
| <b>Phase</b>  | <b>Sprint Execution (Milestones 1 and 2)</b>   |
| <b>Description</b>  | <b>Phase Deliverable</b>   |



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Sprint execution will be an iterative phase where the entire project team will repeat the same tasks and steps multiple times throughout the project phase to implement all requirements, User Stories, and remediate defects. Each Sprint will include a review of the User Story inventory to ensure sufficient detail and acceptance criteria exist to complete development, unit testing, a Product Owner functionality review/testing session, migration of User Stories and Defect remediations to a dedicated testing environment where vendor and state acceptance testing can occur, a production implementation plan, and Sprint Opening and Closing Ceremonies. Daily Scrum Meetings will occur each day and include state and vendor staff to check in on assignments, progress, and any existing impediments. Contingent upon planning, multiple Sprints may be required per Milestone, so an additional regression testing effort outside of the testing occurring in each Sprint will likely be necessary.

While the State and Vendor team will be functioning as a team throughout the Sprint Execution phase, some tasks will be owned by the State and others owned by the Vendor. For example, the vendor will own the development, configuration deployment, and unit/system testing tasks. The state will own the User Story review and state acceptance testing tasks. Other tasks will be a collaboration of vendor and state ownership. These responsibilities and roles will be further defined in the respective project plans

- Sprint Packages, which include the following work products: sprint backlog, product increment, acceptance criteria, sprint test scripts, sprint test results, sprint status report, sprint business processes, sprint training package, and testing instructions.
- Updates to Testing Management Plan
- Updated Project Schedules
- Monthly Status Reports
- Training Documentation
- Presentation materials in support of major Sprint-related meetings.

| Phase  | Maintenance and Operations   |
|--|--|
| Description  | Phase Deliverable  |
| <p>As soon as a group of User Stories is migrated to production after the Milestone 1 (i.e., MVP), Maintenance and Operations will begin. This is because once some form of software is in production, it will be anticipated that minor requests for enhancements to current production functionality may be requested in subsequent project releases. Maintenance and Operations will follow a similar Agile sprint based methodology as the project phase; however, the volume of system change is anticipated to be far less than during the project phase. During Maintenance and Operations, the Agile methodology will continue to be used, but frequency of deployments to production may decrease. This phase will also include an emphasis on completing knowledge transfer between vendor and state staff so that upon conclusion of the system integrator contract, the state can fully maintain the system.</p> | <ul style="list-style-type: none"> <li>- Updates to Maintenance and Operations Plan</li> <li>- Maintenance and Operations Report</li> <li>- Updates to Knowledge Transfer Processes</li> </ul> |



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| Phase | Project Closeout  |   |
|-------|---|---|
|       | Description   | Phase Deliverable   |
|       | <p>This phase will include activities comprising of administrative closure and project close out. Requirements will be traced to ensure the integrator and software provider implemented all required functionality. Lessons learned activities will commence. The initial drafting of the post implementation evaluation review (PIER) will commence.</p> <p>Select + to add project phases.</p> | <ul style="list-style-type: none"> <li>- Lessons learned</li> <li>- PIER</li> </ul> |

## 2.11.6 High Level Proposed Project Schedule

|  |           |  |           |
|--|-----------|--|-----------|
| <b>Proposed Project Planning Start Date:</b> | 12/1/2019 | <b>Proposed Project Planning End Date:</b> | 6/30/2021 |
| <b>Proposed Project Start Date:</b>          | 7/1/2021  | <b>Proposed Project End Date:</b>          | 1/30/2023 |

| Activity Name                          | Start Date | End Date  |
|--|------------|-----------|
| Stage 3 Solution Development           | 3/2/2021   | 5/17/2021 |
| Stage 4 Project Readiness and Approval | 5/18/2021  | 7/1/2021  |
| Milestone 1                            | 7/2/2021   | 1/10/2022 |
| Project Closeout                       | 1/11/2022  | 1/30/2023 |

Development, testing, training, deployment, and go-live for internal and external users is the delivery expectation for each milestone. All of the above are subject to change throughout the PAL Stages

## 2.11.7 Cost Summary

|  |              |
|--|--------------|
| Total Proposed Planning Cost:  | \$724,861    |
| Total Proposed Project Cost:   | \$11,784,861 |
| Total Proposed Future Operations IT Staff & OE&E Costs (Continuing): | \$5,327,689  |
| Total Proposed Annual Future Operations IT Costs (M&O):              | \$1,310,049  |

## 2.12 Staffing Plan

### 2.12.1 Administrative





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DCA and the Programs will provide the following staff for the administrative needs of the project:

1. Project Manager (DCA OIS) -The project manager (PM) will have experience with project implementation and will manage the project from initiation to closing. The PM will ensure that the project team completes the project for their designated functions. The PM will facilitate the development of project plans, manage the contractor’s performance of project tasks, and communicate with control agencies. The PM secures acceptance of deliverables from the project sponsor and stakeholders. The PM is responsible for communication, including status reporting, risk management, and escalation of issues that cannot be resolved by the project team.
2. Procurement Team (CDT, DCA Contracts, DCA OIS, and Programs) - The procurement team will include CDT’s Procurement Division, DCA Contract experts, DCA OIS experts, and management from each program. The procurement team will develop the Procurement Management Plan in accordance with CDT guidelines and will facilitate approval. The procurement team will review the solicitation document(s) and submit the final version(s), as appropriate, based on the procurement vehicle being utilized. The procurement team will facilitate the evaluation of supplier proposals/offers and will develop the evaluation and selection report and submit it for procurement documentation and to support contract(s) award.
3. Contracts Manager (CDT, DCA Procurement, OIS) -The contract manager is responsible for the oversight of the software solution, System Integrator contracts, and any other contracts supporting the project. The individual will participate in contractor performance reviews by reviewing and evaluating deficiencies, provide interpretation of project contracts to project team, recommend course of action on contractual issues, participate in procurement and contract meetings, monitor contractor deliverables, and monitor, analyze, and mitigate procurement-related risks and issues.
4. IT Support Team (OIS) – The IT support will include experts from OIS that will assist the PM throughout the project and facilitate hardware and software interfacing and connection. The IT Support team will provide legacy system support and conversion through the development and implementation of this project to facilitate a successful transition.

## 2.12.2 Business Program

Each Program will designate a product owner. The product owners will team with the PM during project development and delivery to test and validate system functions. The product owners will act as the key decision maker on system functionality and will work closely with the PM and vendor team on a daily basis through the project phase.

Additionally, each Program will dedicate one or more SMEs. The SMEs will work with the selected vendor and the PM to implement the solution. The Program's SMEs will be dedicated to the project and will also serve as the system’s user acceptance testers and execute testing at the direction of the PM and product owner. Staff experts will also perform data validation activities. In order for this project to be successful, it is required that staff prioritize it and dedicate the time necessary to ensure its completion.

## 2.12.3 Information Technology (IT)

DCA OIS will assign support resources to work with the vendor and Programs to address workstation related issues encountered when accessing the proposed solution via a web browser from DCA workstations. The resources will have experience with DCA’s computer workstation configurations, web browsers, and security configurations. The IT resources will be available throughout the project lifecycle to address workstation issues.

## 2.12.4 Testing



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All product owners and SMEs will act as testers. Under guidance of the project manager and informed by the vendor’s expertise, the testers will participate in software requirements meetings, as needed, to understand the business and functional requirements that the software must meet. They will perform testing based on the test plan and document any issues in a defect and enhancement tracking tool. Once the issue has been resolved, the testers will re-test and declare it fixed or report it again until the requirement has been successfully tested.

### 2.12.5 Data Conversion/Migration

DCA OIS staff, the product owners, and staff experts will participate in data conversion activities with the System Integrator. The supporting activities related to data conversion (e.g., data mapping, data mapping review, and data validation) will be completed by the Programs with the coordination and support of OIS resources and additional contractor resources.

### 2.12.6 Training and Organizational Change Management

Training for the recommended solution will be conducted by the vendor and included in the procurement contract. The vendor will work with the product owners and/or SMEs and PM to train program staff on how to utilize the software. DCA’s OIO will supplement the vendor provided training and provide on-site support and business process documentation as necessary to mitigate any business process change issues.

### 2.12.7 Resource Capacity/Skills/Knowledge for Stage 3 Solution Development

For Stage 3 Solution Development, OIS and DCA’s procurement staff have robust experience in dealing with the procurement vehicles identified for this project. Aside from leading the procurement phases of two large projects with similar scope (BreEZe, Accela and InLumon), OIS and DCA have successfully executed the purchase of many items off of leveraged procurement agreements. Furthermore, have also executed many CMAS contracts for IT services.

### 2.12.8 Project Management

#### 2.12.8.1 Project Management Risk Assessment

|   |   |
|---|---|
| Project Management Risk Score:          | 1 |
| Attachment: 2.12.8.1 App A PM Risk v1.0 |   |

#### 2.12.8.2 Project Management Planning

Are the following project management plans or project artifacts complete, approved by the designated Agency/state entity authority, and available for Department of Technology review?

|                                       |    |                   |
|---------------------------------------|----|-------------------|
| Project Charter                       | No | Draft in progress |
| Scope Management Plan                 | No | Draft in progress |
| Risk Management Plan                  | No | Draft in progress |
| Issue and Action Item Management Plan | No | Draft in progress |
| Communication Management Plan         | No | Draft in progress |
| Schedule Management Plan              | No | Draft in progress |
| Human Resource Management Plan        | No | Draft in progress |
| Staff Management Plan                 | No | Draft in progress |
| Stakeholder Management Plan           | No | Draft in progress |
| Governance Plan                       | No | Draft in progress |

### 2.12.9 Organization Charts

Attachment: 2.12.9 BMC 2 Org Chart

### 2.13 Data Conversion/Migration

Identify the status of each of the following data conversion/migration activities:

|  |             |                             |             |
|--|-------------|-----------------------------|-------------|
| Data Conversion/Migration Planning     | Not Started | Data Quality Assessment     | Not Started |
| Data Conversion/Migration Requirements | Not Started | Data Quality Business Rules | Not Started |



# Stage 2 Alternatives Analysis

California Department of Technology, SIMM 19B (Rev. 2.1), Revision 5/21/2018

|                              |             |                               |             |
|------------------------------|-------------|-------------------------------|-------------|
| Current Environment Analysis | Not Started | Data Dictionaries             | Not Started |
| Data Profiling               | Not Started | Data Cleansing and Correction | Not Started |

## 2.14 Financial Analysis Worksheets

Attachment: F.2-Financial-Analysis-Worksheets\_BMC2\_v1.4

### Preliminary Assessment – Department of Technology Use Only

|                                |           |
|--------------------------------|-----------|
| Original “New Submission” Date | 2/3/2020  |
| Form Received Date             | 2/18/2021 |
| Form Accepted Date             | 2/18/2021 |
| Form Status                    | Complete  |
| Form Status Date               | 4/1/2021  |

### Main Form – Department of Technology Use Only

|                                |           |
|--------------------------------|-----------|
| Original “New Submission” Date | 2/3/2020  |
| Form Received Date             | 2/18/2021 |
| Form Accepted Date             | 2/18/2021 |
| Form Status                    | Complete  |
| Form Status Date               | 4/1/2021  |
| Form Disposition               | Approved  |
| Form Disposition Date          | 4/1/2021  |