DEPARTMENT OF ACCOUNTING AND GENERAL SERVICES ANNUAL REPORT ON GOALS, OBJECTIVES AND POLICIES

January 2019

Program ID/Title: AGS 221 / Public Works – Planning, Design, and Construction

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I. Goal

Improve the quality of construction and renovation of facilities.

- II. Objectives and Policies
 - A. #1 Acquire quality design for construction and renovation of facilities.
 - 1. Continue to update requirements for design consultants contained in the Design Consultant Criteria Manual (DCCM). Implement new requirements mandated by law, codes, regulations, and ordinances, etc.
 - 2. Continue to educate users, consultants, suppliers, contractors, and others on DAGS standards, project specifications, budgetary constraints, policies and procedures to promote clear understanding of requirements and realistic expectations, based on a more rigorous financial analysis, for projects. Meet with professional architectural/engineering and construction industry organizations on a regular basis to obtain technical and administrative feedback.
 - 3. Expand use of database software (such as Google Suites) for a document storage and retrieval system that will facilitate coordination and tracking of DAGS-PWD/user agency design phase work tasks such as design submittal reviews. Target improvement objectives:
 - a. Electronic Plan File Room (Platform)
 - b. Project Files/Documents
 - B. #2 Improve design and construction performance
 - 1. Continue to consider alternative procurement methods for construction awards with consideration given to bidders' experience and qualifications, past performance, capacity to do the work, and other criteria rather than base awards primarily on low bid.

- 2. Closely monitor and advise consultants and contractors of desired outcomes for satisfactory or better performance.
- 3. Initiate more efficient and paperless communication, verification, and archiving per the Governor's eSign initiative and improving on the way government conducts business.
- 4. Implement changes to existing processes and procedures with the goal of improving on project delivery based on the constraints of scope, schedule and budget.
- C. #3 Subject to the results of cost analysis of payback, present value and other financial analysis techniques, continue to recommend and undertake energy efficiency/conservation projects for DAGS buildings and for other User agency facilities as requested and as funding permits.
- III. Action Plan with Timetable
 - A. Objectives/Policy #1 Acquire high quality design for construction and renovation of facilities.
 - 1. Past Year Accomplishments
 - a. Objective #1.1 Updated the DCCM in February 2018 and August 2018.
 - b. Objective #1.2 Continued meetings and discussions with the General Contractors Association (GCA), the Building Industry Association (BIA), the Associated Builders and Contractors, Inc. (ABC), the Subcontractors Association of Hawaii (SAH), the American Council of Engineering Companies of Hawaii (ACECH), and other government agencies to share information and update parties on policies and procedures regarding design and construction matters.
 - c. Objective #1.3 Implemented the following:
 - i. Implemented an upgrade to Google to a version (Google Suites) that enhances security.
 - ii. Substantially completed development of an electronic database of plans and drawings to permit access by authorized consultants to facilitate efficiencies in the design process.
 - 2. One year Bi-annual update of DCCM to improve project delivery timeliness, quality, cost and efficiency on design and construction

performance. Continue to update the PWD internet website to provide user-friendly access to forms, instructions and information for clients and contractors. Continue staff, consultant, contractor and client training in utilizing the project collaboration platform. Roll out web interface for submission of professional services qualification information and materials.

- Two years Continue to improve website information tailored to the needs of the design and construction communities. Continue to refine DCCM. Utilize the project collaboration platform for all projects initiated by DAGS Public Works Division.
- 4. Five years Upgrade the computerized automated project database and recordkeeping systems. Continue to evolve the website according to industry standards.
- B. Objectives/Policy #2 Improve construction performance
 - 1. Past Year Accomplishments
 - a. Objective #2.1 Continued to explore other construction procurement methods as alternatives to the low bid method. Statewide ESPC encompassing additional Oahu state office buildings and neighbor island State office buildings is ongoing with an estimated contract amount of approximately \$18 million.
 - i. Completed and awarded a design-build contract for the Hawaii State Hospital New Patient Facility.
 - ii. Assisted in the completion and execution of a service contract to provide chilled water as part of a cooling system for eight buildings in the Capitol District.

Continued use of "Indefinite Quantity Contracting" for the installation of Disaster Warning and Communication System Devices (sirens) statewide with geographic contracts. The geographic contracts were procured to allow for the most competitive pricing for each geographic region rather than doing a statewide contract.

Public Works Division staff continue to participate in online ondemand workshops on State Procurement procedures to assure compliance with State Procurement Office requirements and departmental requirements.

b. Objective #2.2 – Implemented a quality control process to assess overall project performance on selected projects based on review of

change orders and other documentation using the constraints of scope, schedule and budget to assess performance. Process included identifying lessons learned events and situations to improve future project performance by all involved in the project delivery process including consultants and contractors.

- c. Objective #2.4 Implemented the following initiatives:
 - i. To facilitate improvement in the overall project delivery process by initiating projects at an earlier stage implemented a request process via a Comptroller's Memorandum to all user agencies to initiate their project requests to the Public Works Division as soon as possible.
 - ii. To strengthen the consultant selection process, implemented changes to facilitate improvements in the overall selection process.
 - iii. To ensure staff remain up to date in planning, design and construction management processes and practices using an on-line, on-demand training program. Specific topics covered to date included scheduling and risk management. Other topics including quality controls, and project and construction management will be covered as part of the overall training program.
 - iv. Implemented a process to review and, as deemed necessary, revise and/or reinforce procedures, based in part on the knowledge gained in training (refer above to iii.). Changes to date in the process of implementation include a focus on risk management and a reemphasis on project schedules.
- 2. One year Continue to consider alternative procurement methods to low bid awards. Establish instructions for staff, consultants, and contractors on using a boiler plate specification for use of the Electronic Procurement System (HePS) electronic bidding system. Evaluate feasibility of the HePS procurement system for construction projects.
- 3. Two years Bid out all projects using an electronic procurement system instead of the current hard copy sealed bids. Determine appropriate alternative procurement methods for various situations. Provide customer service training for staff. Obtain outside trainers for in-house staff training if necessary.

Complete transactions for all project business with online archiving and services.

- 4. Five years Increase utilization of online collaboration construction management platform to expedite the decision-making process and overall project delivery process from bidding out projects, initiating projects in the planning stage, implementing the design process, improving construction management, and ensuring quality control.
- C. Objective/Policy #3 Continue to do energy efficiency/conservation projects for DAGS buildings and for other user agency facilities as funding permits.
 - 1. Past Year Accomplishments:
 - a. The following energy efficiency/conservation related projects were bid opened or awarded:
 - i. Awarded a design-build contract for the Hawaii State Hospital New Patient Facility. Energy related efficiency requirements include LEED Silver certification, natural ventilation, daylighting, high efficiency lighting (LED), high efficiency plumbing fixtures, and high efficiency air conditioning equipment.
 - b. Continued construction of DAGS Facilities, ESPCs for other Oahu facilities and neighbor island State facilities during FY 2018.
 - c. The following energy efficiency/conservation related projects are currently under construction:
 - i. Hawaii State Hospital New Patient Facility, LEED Silver goal.
 - ii. Kona Judiciary Complex, LEED Silver goal.
 - d. The following energy efficiency/conservation related projects completed construction during FY2018 and are seeking LEED Silver certification:
 - i. Waimano Ridge, Improvements to Buildings and Site, LEED Silver goal.
 - ii. New Nanakuli Public Library, LEED Silver goal.
 - iii. Former Lihue Courthouse Renovation, LEED Silver goal that includes energy efficient lights, motion sensors,

building insulation to reduce air conditioning requirements, and other features.

- iv. Keelikolani Building, Install PV System and Replace Upper Roof, 100kW system installed.
- v. Kamamalu Building, Renovation, LEED Silver certification.
- e. Implemented a process for a more rigorous financial analysis of proposed projects utilizing both payback and discounted cash flow analysis techniques for the following types of projects:
 - i. Projects for the installation of PV systems.
 - ii. Project for chilled water services for a cooling system for eight buildings in the Capitol District.
- 2. One year:
 - a. Continue to refine energy efficiency projects that incorporates financial analysis techniques such as payback and present value methods and processes during the design and construction phases of selected projects.
 - b. Review/evaluate/assess "lessons learned/results" from ESPC projects and projects that incorporated LEED, building commissioning, during the design and construction phases to determine benefits and costs.
 - c. Continue working on the Statewide ESPC program that includes other Oahu State facilities and neighbor island State facilities.
- 3. Two years Continue to plan, design and construct energy and costefficient buildings. Refine design requirements, methodology, incorporate new technology and material. Subject to funding, implement the recommendations of the retro-commissioning investigations conducted for the public libraries. Develop and implement an Energy Conservation Implementation Plan in conjunction with the Central Services Division. The DAGS Public Buildings, Statewide, Energy Conservation Planning project was started for this purpose.
- 4. Five years Develop and implement revised Policies and Procedures and/or changes to the DCCM on the use of LEED/energy initiatives and building commissioning and retro-commissioning processes as appropriate during the design and construction phases for other projects. Retro-

commission public buildings every five (5) years as required by Act 155, subject to funding being made available.

IV. Performance Measures

A. Customer Satisfaction Measure

Acquire high quality construction and renovation of facilities.

- 1. Review, evaluate and measure user and staff ratings of consultants and for all projects through customer satisfaction surveys and polling.
- 2. Obtain, analyze and record evaluations from user agencies on the performance of consultants and project results.
- 3. Follow-up with consultants and contractors with less-than-satisfactory ratings and results.
- B. Program Standard Measure

Acquire good quality construction and renovation of facilities.

- 1. Obtain feedback from users on the quality of workmanship.
- 2. Obtain feedback from users on the amount of maintenance required postconstruction/renovation compared with maintenance prior to construction.
- 3. Continue to measure and evaluate the number and types of change orders.
- 4. Measure and evaluate the project schedules.
- C. Cost Effectiveness Measure

Acquire high quality construction and renovation of facilities.

- 1. Continue to evaluate changes in the number, value, and types of change orders during construction.
- 2. Measure and evaluate the number of projects that are completed on schedule and within budget.