



MEMORANDUM

TO: Water Resources Commission

FROM: Thomas M. Byler, Director
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SUBJECT: May 15-16, 2018 Water Resources Commission Meeting

Strategic Planning

I. Introduction

During this meeting, the Commission and Department staff will discuss strategic planning more in-depth. No decisions will be made at this meeting.

II. Background

The Secretary of State's 2016 performance audit recommended that the Department develop a long-term plan to prioritize its responsibilities and set clear measurable goals for water sustainability. While the Integrated Water Resources Strategy (IWRS) provides a comprehensive, high-level framework, the Department would benefit from a strategic plan that more directly focuses on the agency's priorities, processes, functions, and what the Department will work on over the next five years. Toward that end, the Commission and Department agreed to embark on a strategic planning effort.

During Phase 1 of the planning effort, the Department outlined the purposes of strategic planning, identified what products would be produced, and developed the planning process. The Department concluded Phase 1 in August 2017 and identified three reasons for doing strategic planning:

1. To prioritize our work;
2. To continue to improve as a positive and productive workplace; and
3. To improve our internal and external communications.

To accomplish the three objectives identified, the Department identified three "tracks" to pursue in order to build a strategic plan during Phase 2:

1. Core values and core competencies – Identify the core principles that drive our work and the knowledge or expertise in a given area, discipline, or service (or more simply, it is what we do and the skills or functions that make us unique).
2. Employee initiatives – Determine what efforts or actions to take to better enable employees to accomplish their work. This can include efforts like training, tools, technology, and improvements to communication.

3. Work prioritization – Identify the priority areas or focus areas for strategic development over the next five years. This work is separate from the day-to-day work of the Department, which will continue.

A status of each of these three tracks is provided below. The Department's tentative timeline for adoption of the strategic plan by the Commission is the fall of 2018.

III. Core Values

Core values are the principles that guide how the Department operates and completes its work. The Staff Strategic Planning Committee reviewed input gathered from staff and developed a draft list of core values. The committee presented the list to Department managers in late March and together the two groups finalized the core values, which are listed below:

- *Integrity* – We are accountable for all that we do. We act with honesty and promote transparency.
- *Service* – We are dedicated to providing outstanding service and treating everyone equitably in our management and stewardship of state resources.
- *Technical Excellence* – We base our resource decisions on law, science, and expertise.
- *Teamwork* – We are united in our mission, relying on one another and working together with the communities we serve.
- *Forward-Looking* – We seek innovative and practical solutions to the water challenges of today and tomorrow.

The Department is now working on incorporating these values into our operations as an organization.

IV. Employee Initiatives

Another track of strategic planning is to identify employee initiatives to pursue over the next five years. Employee initiatives are actions or efforts that will better enable employees to accomplish their work. The Department gathered some ideas from a work inventory exercise completed by managers with some input from staff. Additional input will be gathered through a short, all-staff survey to be launched in mid-May. The survey will ask staff to identify barriers that keep them from doing their work, suggestions for how to overcome those barriers, tools and training that could help staff, and ways to improve the Department's internal and external communication. After reviewing the survey results, the Department will host a few focus groups with staff representatives from various Divisions and Sections to discuss the results and vet potential employee initiatives. Department management will consider staff input and identify the subset of employee initiatives the Department will pursue over the next five years.

V. Work Prioritization Through Focus Areas

In order to help prioritize its work, the Department, in consultation with the Commission, stakeholders, and partner agencies, will identify priority issues for the next five years in its strategic plan. The Department does not intend to develop a long list of tasks to include in the strategic plan but to hone in on broader focus areas for strategic development and improvement.

The intent of this effort is to identify strategic areas of focus that will help us better accomplish our mission.

Work plans created after the development of the strategic plan will then outline more detail of what the Department intends to do and when it intends to do it. The work plans will balance the Department's day-to-day responsibilities with work in these focus areas. By carving out space for strategic development and improvement, the Department can improve how it does its day-to-day work and better position itself to accomplish its mission and vision.

VI. Commission Discussion: Focus Areas

The primary focus of the May Commission meeting will be to hear Commissioner's perspectives on potential focus areas; however, no decisions will be made. Attachment 1 contains a summary of the input provided by stakeholders and Department managers on potential strategic focus areas. Due to limited time, not all focus areas will be discussed during the meeting; rather, discussion will center on potential focus areas of most interest to the Commissioners.

Commissioners are asked to review the document and be prepared to identify up to ten areas that they would like to discuss as a group on May 15 and May 16. If a focus area is missing from this list, Commissioners will be asked to share that at the meeting.

After discussion with the Commission, the Department will begin the process of narrowing the list. This will include further engagement of Department staff, stakeholders, other partners, and the Commission.

VII. Conclusion

At the May Commission meeting, the Commission and the Department will discuss potential focus areas, or areas of the strategic development, that the Department could select and pursue in its five-year strategic plan. Commissioners are asked to identify up to ten focus areas to discuss.

Attachment:

1. Identification of Potential Strategic Focus Areas

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Potential Strategic Focus Areas for the Oregon Water Resources Department 2019-2024

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Introduction

As part of the Oregon Water Resources Department's strategic planning, the Department will identify priority issues or "focus areas" for the next five years. In strategic planning, the Department is reflecting on what special initiatives to prioritize over the next five years. The Department does not intend to develop a long list of tasks to include in the strategic plan but to hone in on broader focus areas for strategic development and improvement. For this effort, the goal is to identify strategic areas of focus to better accomplish our mission, not reiterate the Department's day-to day-work. Work plans will be created after development of the strategic plan to outline in more detail what the Department intends to do.

The effort to identify strategic focus areas involves three components. First, the Department will gather input on potential ideas for focus areas. Second, the Department will solicit feedback on those ideas generated from the Commission, Department staff, stakeholders, and other partners. That feedback will inform the Department as it narrows the list and selects focus areas as the third component of this effort. This document lays out the initial information gathered as part of the process of identifying potential focus areas.

Background – Why Develop a Strategic Plan?

Organizations often have varying reasons why they take on strategic planning. Before starting its strategic planning efforts, the Department reflected on why it wanted to develop a strategic plan and what it wanted the plan to accomplish. In 2017, the Department identified the three reasons why it wanted to develop a strategic plan:

1. **Prioritize our work** – As highlighted in the 2016 Secretary of State's Audit, the Department has too much to do given current resources and responsibilities. The strategic plan will communicate what the Department intends to accomplish in the next five years as well as highlight what the Department does not have the time or resources to do within that timeframe. This will include ongoing Department work (e.g., regulation of the distribution of water) and recommended actions from the Oregon Integrated Water Resources Strategy (IWRS).
2. **Continue to improve as a positive and productive workplace** – The Department hopes to identify what the agency is doing well, opportunities for improvement, and what defines the agency's culture. Our goal is to continue to improve efficiency and service delivery, while fostering a positive work environment.
3. **Improve our communication** – Through strategic planning, the Department hopes to identify practical ways to promote efficient and effective communication, both internally and externally.

To accomplish these three objectives, the Department is pursuing three "tracks" in its strategic planning. The focus of this document is the "work prioritization" track where the Department will seek focus areas to determine what strategic development and improvements it will seek over the next five years.

The second track is identifying Department core values and core competencies. Core values are the principles that guide how the Department operates and completes its work. They shape staff's interactions with external customers and internally with others in the Department. A core competency

is knowledge or expertise in a given area, discipline, or service where an organization provides value to its customers. More simply, it is what the agency does and the skills or functions that make us unique.

The third track is employee initiatives. This track involves identifying what the Department can undertake to assist employees to be better able to do their jobs. This can include tools, training, technology, and communication improvements, which help provide employees with what they need to do their work efficiently and effectively. As mentioned above, this document focuses on the work prioritization track of the Department's strategic planning. However, some employee initiatives were mentioned when stakeholders and managers provided input on potential strategic focus areas. Those contributions are included in this document for future reference during employee initiatives conversations.

Connection to Oregon's Integrated Water Resources Strategy

The IWRS provides a broad vision of what Oregon's agencies, industries, communities, and people need to do in order to understand and meet Oregon's water needs using an integrated approach. The 2017 IWRS spells out "what" generally needs to happen in order to better understand and meet Oregon's water needs, both consumptive and environmental. It does not include the finer details of implementation, such as what will be done, when, and by whom. The Department's strategic plan identifies those recommended actions of the IWRS and other development work that the Department intends to undertake in the next five years. Work plans adopted after the strategic plan is adopted will then provide the details of what specifically the Department will do and when the work will be accomplished. Therefore, one can also consider the Department's strategic plan as a bridging document between the IWRS and Department work plans. It identifies what portions of the IWRS the Department will work on over the course of the next five years and points to the work plans that will address these objectives.

Methods for Collecting Information on Potential Focus Areas

For this initial discussion of potential strategic focus areas, the Department collected information through consultation and conversation with stakeholders and Department management. Future work on the work prioritization efforts within the Department's strategic planning will include Department staff and other Department partners, such as agency partners and tribes.

Stakeholder and Manager Input

The Department held a number of meetings with stakeholders to gather input on what the stakeholders believed the Department should focus on over the next five years for strategic development. The Department asked stakeholders to share three to five focus areas. When identifying potential focus areas, stakeholders were asked to describe the focus area and what actions they would like the Department to take in that area over the next five years. The Department requested managers also provide input on what focus areas to consider. Managers were invited to provide suggestions of potential focus areas or actions related to both their section and the Department as a whole.

The following were the potential focus area ideas shared with our stakeholders and managers to inspire thought and conversation. As you can see, most are very broad and many overlap. Stakeholders and managers were invited to talk about strategic development efforts that fit in these broad areas or to identify a different focus area not listed.

- Climate change adaptation & resiliency
- Compliance
- Dam safety
- Data collection and monitoring
- Data tool and product development
- Field presence
- Groundwater
- Inter-agency coordination
- Measurement and reporting
- Process and operational improvements
- Surface water
- Un-adjudicated water right claims
- Water infrastructure
- Water right transactions
- Water planning and development
- Water supply and demand forecasts
- Water use efficiency and conservation
- Well construction standards
- Other

Key Assumptions and Limitations

When asked to identify potential focus areas, both stakeholders and Department management were asked to assume the Department will not receive any new resources to devote to any focus area. They were also asked to not request or recommend pursuing changes in statutory authority as potential areas of strategic focus or action. The Department will continue to pursue additional resources and needed statute changes. However, at this time, Department leadership wanted to explore what strategic improvements would be possible to make within existing resources and authorities. In fact, being able to articulate what improvements are possible within existing resources and authorities can further understanding of the need for additional resources and new/ revised authorities.

Most of the suggestions offered for focus areas fit within these limitations. However, some still offered suggestions for new authorities. Others highlighted the need and importance of work that the Department would need additional resources to do. To acknowledge and include these items, work that would require additional resources is indicated with *italicized* text. If text is italicized, it means that the Department cannot complete that work within existing resources and authorities.

Disclaimers

This document includes potential actions within each of the focus areas. The list of actions is not comprehensive, but rather a starting point for a conversation. The actions are not listed in any particular order. Inclusion of an action does NOT mean the Department will pursue the action. **The summarized input included in the document represents the views of a mix of stakeholders and managers and is not intended to convey agreement or support by any one group or the Department.**

Next steps

This document will be shared the Water Resources Commission to aid in strategic planning discussions that will take place in Maupin, Oregon on May 15 and 16, 2018. Commissioners are asked to identify up to ten focus areas to discuss in Maupin. Following the May meeting, the Department will refine the list of focus areas and solicit additional feedback on how to narrow the list in June. The Department will reach out for additional feedback from stakeholders, Department staff, agency partners, and other partners. This may take the form of a survey, focus groups, and/or individual conversations. The feedback collected will be considered as the Department narrows the list to identify a handful of focus

areas for its five-year strategic plan. Those focus areas will then be included in the strategic plan and presented to the Commission for its consideration in the fall of 2018.

Potential Focus Areas Identified and Discussed

The following pages provide summaries of the input received on potential focus areas for the Department's strategic plan. Each focus area includes a half page to two page summary using the format identified and described in the text box below.

Name of Potential Focus Area
<p>General Input This section includes a short description of what this focus area generally entails or could include.</p> <p>Related IWRS Recommended Actions This is a bulleted list of IWRS Recommended Actions that are related to this focus area.</p> <p>Potential Actions within this Focus Area This section includes a list of potential actions within a focus area. The list is not comprehensive, but rather a starting point for a conversation. The actions are not listed in any particular order. Inclusion of an action does NOT mean the Department will pursue the action. As mentioned above, italicized text indicates that an action cannot be accomplished within existing resources and statutory authorities.</p>

Business Operations

Summary of Potential Focus Area

Business operations are the services and processes necessary for the Department to function as an organization. Business operations are often part of the Administrative Services Division, which also includes Fiscal Services and Human Resources. However, other Department divisions have business operation considerations and work as well.

Related IWRS Recommended Actions

- IWRS Recommended Action 10.G
- IWRS Recommended Action 8.B

Potential Actions within this Focus Area

Improve Documentation of Internal Policies (IWRS R.A. 10.G) – Although Department rules provide more detail than statute, they still leave room for interpretation. Inconsistent application of rules can be confusing to staff, customers, and stakeholders. The Department should document the approach to decision-making, particularly related to permit reviews. Managers and staff need to set aside time to clearly document any decision-trees and thought processes into desk manuals that can be understood and communicated to others. This would likely take 1 to 3 biennia to complete, depending on the specific plan of action pursued and the list of policies the Department would choose to document.

Succession Planning (IWRS R.A. 8.B) – Managers and senior staff in the Department have very specific skill sets as well as institutional knowledge to convey. Some employees have expressed an interest in management. Managers are documenting technical methods and knowledge, whenever they can. Managers will need to give themselves and their staff permission to take the time needed to train together and pass along institutional knowledge outside of day-to-day operations. This should be done before the next wave of retirements.

Create Additional Opportunities for “Self-Service” – The purpose of this action is to make information from the Administrative Services Division more readily accessible to agency managers and staff. The extent of this potential series of actions would need to be scoped out, but could include: 1) leveraging technology (iLearn, intranet page, etc.) to provide “frequently asked for information” to employees/managers, and 2) using Workday which will enable employees and managers to access employee and position data that previously was only available via request. The value of this effort is that time currently spent creating reports and other ad hoc requests could be shifted to new incoming core work or for future development actions. Some of this work has already been started and will be ongoing.

Develop Long-Term Strategy for Managing Public Records and Public Record Requests – With recent updates to public record law and an increase in public record requests, there is a need to develop a long-term strategy and system for properly managing the Department’s public records (e.g., proper naming, filing, and destroying at the appropriate time) and responding to public record requests. This updated system would help ensure the Department is able to release records according to timelines and other requirements in state law. It could also assist with improving documentation of internal policies and succession planning by helping organize information for reference.

Climate Change Adaptation and Resiliency

Summary of Potential Focus Area

Each summer, Oregon is water-short, with junior water users regulated in favor of senior water rights. In the winter, communities often experience flooding in neighborhoods, along rivers and streams. Climate change exacerbates the conditions at both ends of the scale—from drought and fire to heavy rain and snow. These wide-ranging impacts mean that all sectors—public and private—must implement adaptation and resiliency strategies. In this focus area, the Department would identify and pursue those adaptation and resiliency strategies that it can provide to communities and the state as a whole to help address water supply challenges associated with a changing climate.

Related IWRS Recommended Actions

- IWRS Recommended Action 5.A
- IWRS Recommended Action 5.B
- IWRS Recommended Action 5.5A
- IWRS Recommended Action 10.B
- IWRS Recommended Action 13.E

Potential Actions within this Focus Area

Continue to Develop Strategies for Drought Response and Mitigation (IWRS R.A. 5.B, 5.5A) – Similar to providing tools, the Department could further develop both short-term and long-term strategies for responding to drought and mitigating the impacts of drought. A stakeholder pointed to the example of the North Santiam Drought Contingency Planning Efforts as a type of action a basin can pursue to prepare for and respond to droughts. The Department could identify and promote these options to basins and communities.

Identify Opportunities for Winter Storage (IWRS R.A. 13.E) – Oregon has witnessed declining snow packs and studies indicate that warmer, wetter winters will become a more frequent scenario that impacts all water uses. Oregon has an opportunity to store winter water and use it during peak season, summer months. The Department could explore opportunities to pilot winter storage projects. This may require a review of SB 839 (Water Project Grants and Loans) to see if the legislation created barriers for projects to access funds, such as the requirement for 25% of storage for instream needs.

Update Irrigation Seasons (IWRS R.A. 5.B) – As climate change occurs there may be a need to update the timing of the irrigation season in basins around the state.

Provide Tools for Climate Change Adaptation (IWRS R.A. 5.B) – *One suggested action was to develop and provide tools to communities to help them adapt to climate change as they seek to address water supply needs. Specific tools were not shared when suggesting this action. Some suggested that the Department partner with other agencies and organizations to identify and develop these tools as it is unlikely the Department could do this work without additional resources.*

Pursue Strategies Recommended by 2016 Drought Task Force (IWRS R.A. 5.A, 5.b, and 5.5A) – *The 2016 Legislature passed HB 4113 which establishes a [Task Force on Drought Emergency Response](#). The Department staffed this Task Force which researched and evaluated potential tools to prepare for or deal*

with drought emergencies. While the Department could pursue some of the recommendations, most would require additional resources or other action by the Legislature.

Develop Basin Water Supply Forecasts (IWRS R.A. 5.A, 5.5A) – *Understanding available water supply is a key component of understanding what water is available currently or may be available under a changing climate. It is also a first step in creating a water budget. The Department has not developed a water supply forecast recently and could partner with others like the Oregon Climate Change Research Institute to develop basin-specific water supply forecasts that basins could use in water planning.*

Gather and Collect Drought Data (IWRS R.A. 5.A, 5.5A) – *As noted in the 2017 IWRS, stakeholders, technical groups, and agency staff need better drought-related information that helps Oregon identify drought stages, impacts (economic, social, and environmental), and vulnerabilities (among communities and ecosystems). Without this information, Oregon communities will not be adequately prepared for, or able to adapt to, climate change. Some work can begin immediately, but requires a budget package in order to have adequate technical capacity.*

Complex Basin or Region-Specific Issues

Summary of Potential Focus Area

The Department routinely and increasingly is confronted with complex basin issues across the state. Basins such as the Willamette, Deschutes, Umatilla, Walla Walla, and Klamath are all navigating water supply challenges that are complex technically, politically, and socially. The issues often are unique to the basin, shaped by the physical and social geography of the place. These complex basin issues require extensive attention and coordination by the Department in order to make forward progress. They may also require solutions tailored to the basin and issue, as opposed to a statewide policy, tool, or approach.

Related IWRS Recommended Actions

- IWRS Recommended Action 10.B and 10.D
- IWRS Recommended Action 13.B

Potential Actions within this Focus Area

Develop a Post-Reallocation Implementation Plan in Willamette Basin (IWRS R.A.9.C, 10.B) – The Willamette Reservoirs are flood-control reservoirs that also provide water for irrigation and releases for fish. The reallocation study will identify how much water should be dedicated to fish flows, municipal/industrial use, and agriculture. This focus area requires the development of a post-reallocation implementation plan that includes: management of reservoir-water releases (who determines the releases); conversion of minimum perennial stream flows (both storage and live flow) to instream water rights; management of reservoir-water contracts, including a contract with the federal government for protection of instream flows; and the protection of storage releases.

Determine Next Steps in Deschutes Basin (IWRS R.A. 9.C) – The Department recently co-funded a Bureau of Reclamation WaterSMART Basin Study in the Deschutes Basin. In this action the Department could bring basin interests together to determine what next steps to take in addressing that basin's water supply needs. Depending on what next steps are identified, the Department may need additional resources to do that work.

Continue to Work on Tribal Settlements (IWRS R.A. 9.C) – For this action the Department would continue to work with tribes and other parties to resolve tribal water needs and water right claims. There is value in investing time and resources in cooperative approaches to tribal settlements.

Assign Department Project Managers to Basins – This would involve identifying a point person within the Department who coordinates efforts to address basin issues. This person would serve in a project management capacity. Unless additional resources were obtained, staff assigned to this role would need to be relieved of their current duties in order to take on this work.

Contract with Third Parties to Facilitate Dialogue – The Department could obtain the resources to hire third parties to help facilitate dialogue in basins dealing with complex water issues. These neutral conveners would work with Department staff and basin interests to identify and pursue solutions to basin challenges over the course of a few to several years, depending on the challenge.

Dam Safety

Summary of Potential Focus Area

The original focus of Oregon's dam safety program was the review and approval of designs for new dams. A majority of Oregon's dams were constructed decades ago, with some more than 100 years old. As a result, the dam safety program now focuses on evaluating the condition of existing dams through regular inspections and providing feedback to owners regarding needed safety improvements. Important updates to statute, forms, databases, and other resources will improve the dam safety program and dam safety throughout the state.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.C
- IWRS Recommended Action 5.5B and 5.5C
- IWRS Recommended Action 7.C
- IWRS Recommended Action 10.E
- IWRS Recommended Action 10.F

Potential Actions within this Focus Area

Update Dam Safety Statutory Authorities (IWRS R.A. 7.C) – Oregon has insufficient statutory authority compared to accepted national standards for states to deal with unsafe and potentially unsafe dams. Since most of the dam safety statutes are dated, the State engineer has been working with the Director's Office on potential proposed changes to these statutes. If legislation is introduced in 2019 and passes, a rules advisory committee (RAC) and rule development will be necessary in 2020.

Develop Guidance for Feasibility Studies of New Reservoirs (IWRS R.A. 10.E) – The Technical Services Division could work with the Water Resources Development Program to develop objectives and provide guidance for storage projects (reservoirs, groundwater recharge, and combination projects). Guidance for feasibility studies, preliminary designs, and final project work are all needed to make sure they are practical, complete, and include needed financial, environmental, or public safety considerations. This work has already been started and will likely last through June 2020, barring unforeseen delays.

Conduct Dam Owner Outreach (IWRS R.A. 7.C) – The Department needs to make more rapid progress on maintenance and rehabilitation backlogs at Oregon dams, and needs to reach out to dam owners to do so. The State Engineer is scheduling meeting with dam owners around the State to review best reservoir design, operations, maintenance practices, as well as emerging issues regarding engineering and seismic standards, and provide information on technical and financial resources that might be available. Other states have had success with this approach. This work could begin as early as November 2018, with initial focus on placed-based planning locations.

Modernize Dam Safety Inspection Forms & Databases (IWRS RA 1.C and 10.F) – This action is to update/improve the efficiency and security of the dam safety database, to determine the status of dam safety/deficiencies, and to improve efficiency in correspondence with dam owners and others. This work is currently in progress and expected to last through 2020.

Data Collection and Monitoring

Summary of Potential Focus Area

The Department operates more than 250 stream and reservoir gages throughout the state, maintaining an extensive long-term record for many of them. Additionally, the Department monitors approximately 380 water wells on a quarterly basis, and measures another 500 project wells monthly to annually. These networks of gages and monitored water wells inform water planning, permitting, and management decisions. Beyond the day-to-day data collection and processing, the Department could make this a focus area for strategic development by placing additional emphasis on data collection efforts that address specific data and information needs for the Department and others in Oregon. In addition, the Department could work on ways to make data collected more accessible.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.B
- IWRS Recommended Action 8.B and 8.C

Potential Actions within this Focus Area

Promote Science Collaboration (IWRS R.A. 1.B) – A robust approach to science at the Department is absolutely essential. A robust approach includes sound study design, placement of measurement and monitoring devices, data collection methods and documentation, and data quality assurance. The Technical Services Division could work with other divisions to cooperate on study design and implementation, provide data collection training, and review and approve data analysis and conclusions. This would likely take 1 to 2 biennia to fully build a program and then collaboration would be ongoing.

Work with Schools to Train Potential New Staff (IWRS R.A. 8.B and 8.C) – With limited resources, the Department could consider partnering with various universities to train students to do some of the data collection (e.g., streamflow measurements) and other work traditionally done by Department staff. This would help train a new generation of water resource professionals, while helping the Department collect data needed for management decisions. Any effort on this front would require special attention on quality assurance and control.

Employee Initiatives

Summary of Potential Focus Area

Employee initiatives are those actions or efforts the Department can undertake in order to better equip or enable Department employees to do their work. In the Department's 2017-2018 strategic planning efforts, employee initiatives is its own "track" and the Department is going to collect additional information on this issue in order to identify what employee initiatives it would like to pursue in the next five years. However, during the work prioritization discussions a number of employee initiative ideas came up. They are documented below and will be pulled into the Department's conversation on employee initiatives.

Related IWRS Recommended Actions

- N/A

Potential Actions within this Focus Area

Improve Agency Coordination/Training – Develop a program that integrates staff from various sections into programs/projects outside of their routine duties. For example, for a short period of time, (perhaps a day a week for a few months) a WRDP member could blend with the Transfer Section and shadow staff to learn the program, and possibly be given a project to work on. There is a need and value within the agency to expose staff to other programs and other staff in the agency. This could provide training, job experience, relationship building, and improve communication between sections. This program could be developed in the 2019-2021 biennium.

Start an Agency Mentoring Program – Institute a more formal program whereby junior staff are assigned a manager or senior staff member that provides development guidance, organizational insights, and leadership. The specific details of the program would need to be scoped out. This program would foster relationships and provide for broader staff understanding of the state and organizational culture. This program could be developed in the 2019-2021 biennium.

Focus on Staff Development – Identify backups for each Administrative Services Division position/role (identify and take advantage of cross-training opportunities). Identify training and development needs for each role (to keep the Department prepared for what's coming next). Ensure the Department structure facilitates efficient and effective work flow. The purpose of doing this work is to ensure those administrative functions/processes do not stop due to absence or vacancy. It would also foster a team approach to the work, improve communication, reduce work flow obstacles, contribute to a positive work culture, increase motivation, and retention of staff. This work could start in 2019 and would be ongoing.

Revive the Transfer Staff Annual Training Program – Conduct training annually for Transfer staff (both Salem and Field), with training content developed collaboratively with Field Services Division (FSD) and Groundwater Section (GW). This would ensure that Salem and field Transfer staff are not only operating on the same page as each other, but also on the same page as FSD/GW staff. This is something that could be instituted within 6 months. Several weeks of time will be needed to facilitate discussions to develop and prepare training content and materials.

Improve Communication between TACS and the Field Services Division (FSD) & Groundwater Section (GW) – Develop regular meetings with TACS, FSD & GW staff to collaborate on problem-solving discussions and decisions. Shared problem-solving will result in more fully vetted decisions that can be embraced and implemented in a consistent manner by all divisions. Consistent implementation will result in less confusion and fewer questions on particular issues for both the Department customers/water users and internal staff alike. This is something that the sections are working on implementing within the next 3 to 6 months and continue on an ongoing basis. A minimal amount of time will be needed to schedule meetings; however, a fair amount of time will be needed to document discussion topics and conclusions.

Training Exercises with FSD (IWRS Recommended Action 10.F) – Technical Services could work with Field Services to enhance and maintain skill levels of field staff in measurement and surveying. The Department can build on cooperative agreements with USGS to leverage/gain access to training and skill-building. Complete coursework can go into iLearn to employees' employment records. Some efforts have been made on this front and additional action could start immediately.

Develop a Standard Communication Protocol for Field Projects between Salem and Field Offices – Field Services could assist with developing protocol steps that would apply to all division sections. Examples might include semi-regular updates on projects or issues that involve personnel from both field and Salem offices. The Secretary of State's audit identified communication as one of the largest issues for staff within the agency. This would take 1-2 years to develop and begin implementing.

Field Services – Regulation and Compliance

Summary of Potential Focus Area

This focus area includes the regulation of surface and groundwater use according to Oregon Water Law (see page 35 for Well Construction and Compliance). The goal of pursuing this focus area would be to improve/increase compliance with water rights in order to increase understanding, reduce waste, and illegal use. Actions taken under this area could include developing new tools and increasing use of existing tools to facilitate more efficient and effective regulation of water use. Stakeholders expressed a desire for the Department to continue to focus on this work, which only the Department has the authority to do. Some stakeholders called for more aggressive action to pursue compliance and take strong enforcement actions.

Related IWRS Recommended Actions

- IWRS Recommended Action 8.B and 8.C
- IWRS Recommended Action 10.F

Potential Actions within this Focus Area

Provide Enforcement Tools for Quicker Resolution of Violations (IWRS R.A. 10.F) – In some cases illegal action is causing harm to other water right holders and staff have to spend significant time to get users into compliance. To gain better compliance, potential ideas include: (1) The Department rarely issues civil penalties to non-compliant water users. Under the existing rules, the Department could pursue civil penalties and increase the civil penalty amounts applied during enforcement. Larger penalty amounts could serve as a better deterrent. (2) Determine if under ORS 540.060, Watermasters (with Region Manager or other appropriate approval) or law enforcement can issue citations for water law violations. (3) Update the Division 260 rules to allow a civil penalty assessment that is commensurate with the financial gain of the violator. Improve the rules for more timely application and remove the loophole that a user can get a notice numerous times in the same season, but if they get in compliance for each notice there is no penalty. (4) Consider authority to address illegal dams more efficiently. In some cases the Department spends years trying to work with landowners to get ponds legal and in some cases they refuse. The Department needs a better process in which to address these illegal activities. These proposals could help field staff gain compliance faster on water law violations, which can reduce the injury to existing water users. These proposals could likely be done in two years.

Develop a True Physical Location ID for Points of Diversion (IWRS R.A. 10.F) – For this action the Department would develop a true Physical Location ID for PODs that correlates to GPS coordinates or some measure of spatial location as well as to the proper water right(s) associated with the POD. This would involve developing a framework and database, populating the database with current information, and ground-truthing the data to verify its accuracy. This would provide a more accurate location for diversions, increase the usefulness of the SigPOD program, and make it easier to develop distribution lists. This would likely take 3-5 years to do.

Update Division 250 (IWRS R.A. 10.F) – Modify existing Division 250 rules that dictate how and when field staff can enter property to do their work. Align rules with statutory authority found in ORS 536.037, as the rules are more restrictive than the law. Under the rules, staff can't enter property to inspect water use if the Department thinks illegal use is occurring.. This would likely take at least two years to complete.

Obtain MOA or Statewide Exemption from Department of State Lands for Citing Gages (IWRS R.A. 10.F) – The goal of this action would be to obtain a statewide exemption or develop a streamlined review process to allow efficient approval to construct gages necessary to measure streamflow. This action could be implemented as early as 2019-2021.

More Aggressively Pursue Compliance and Waste (IWRS R.A. 10.F) – As part of this action the Department could more aggressively pursue water right compliance through increased use of Division 410 and Division 400. More generally, the Department could reduce illegal use of water by more aggressively using its authorities to ensure that beneficial use of water is without waste.

Educate Water Right Holders on How to Read and Use Their Water Right (IWRS R.A. 8.C) – *Some water right holders do not fully understand their water right and, therefore, may unintentionally be illegally using water. Educating those with water rights to promote awareness and understanding of what they have the right to use may increase voluntarily compliance. While this is already done to some extent by watermasters, a more active education program would require additional staff or a shift in workload prioritization.*

Modify or eliminate the automatic stay allowed under ORS 536.075 or require a bond be filed in which injured water right holders could file a claim against (IWRS R.A. 10.F) – *A party affected by a final order of the WRD can appeal the order to the courts. Upon filing, they get an automatic stay, instead of having to request a stay from the court. The automatic stay can injure other water right holders. This type of action undermines the Prior Appropriation Doctrine.*

Financing Water Resource Work

Summary of Potential Focus Area

In an area of limited and decreasing funding, one potential focus area is to seek alternative sources of funding or funding that can be leveraged to make the most of existing funds. This includes funding for the Department itself and more broadly for others doing work to meet their water supply needs across the state, such as funding for water planning and projects that communities may undertake.

Related IWRS Recommended Actions

- IWRS Recommended Action 10.E
- IWRS Recommended Action 13

Potential Actions within this Focus Area

Further Develop the Loan Component of Water Project Grants and Loans (IWRS R.A. 10.E and 13.E) –

The Department has developed most of the fundamental pieces of hosting a loan program (with assistance from OBDD). However, additional development is needed to have a solid program able to review, award, and manage loans. This includes setting up the accounting structure as well as project inspection policies and procedures. It could also include promotion and advertisement of the loan opportunity. Securing additional proceeds from Lottery Revenue Bonds is not a guarantee. Investing in and promoting the loan component of the program will help the Department generate revenue to build a sustainable funding program. This work would likely pick up in late summer 2019 and last through 2020.

Explore and Leverage Other Funding (IWRS R.A. 13.A, 13.B, 13.C, 13.D, 13.E)– This work would involve looking at ways that federal funds, such as WaterSmart grants, and private funds (e.g. Meyer Memorial Trust or other private foundational grants) can be combined with state resources for various projects. The North Santiam Drought Contingency effort and the use of Bureau of Reclamation WaterSmart grant is an example of leveraging additional resources to solve complex water supply challenges.

Explore Ways to Increase Department Funding (IWRS 13.A and 13.B) – Given limited funds, particularly General Fund dollars, it may be worthwhile to investigate other potential sources of funding for Department operations. This could build upon previous work done by a Commission Subcommittee. To demonstrate need for funding, the Department could better document need and value of investing in the Department and its work. Attention would also need to be paid to how to obtain alternative sources of funding while maintaining General Fund investments. There is a concern that if other sources of Department funding are located, General Fund dollars would be pulled and the Department would see no net increase in resources.

Groundwater Hydrology

Summary of Potential Focus Area

Groundwater hydrology strategic development work could include data collection and analysis, tool development, and use of administrative tools to increase understanding and improve management of groundwater resources. Stakeholders frequently mentioned the need for additional groundwater studies, but that work cannot be completed without additional staff and resources.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.A and 1.C
- IWRS Recommended Action 8.C
- IWRS Recommended Action 10.G
- IWRS Recommended Action 11.E

Potential Actions within this Focus Area

Develop Internal Groundwater Data Management Tools (IWRS R.A. 1.C) – To build internal tools for data management and analysis and to communicate groundwater conditions to the public, the Department plans to recruit for the NRS-5 Chief Data Scientist Position, which is currently vacant. The Chief Data Scientist will have strong data management skills that allow integration with IS-managed databases and platforms, assessment of large and complex datasets, and development/improvement of applications for internal and external use. These tools will access the Department’s available datasets during application reviews; interference investigations; responses to data requests from the Department and others; and other technical support duties. The position will build on the 2015 “Groundwater Vulnerability Map” and other existing information to develop a set of online maps, tables, infographics, storyboards, etc., to communicate groundwater conditions in Oregon to the public on an ongoing basis. Each tool would likely take around 6 months to complete.

Develop Groundwater Desk Reference (IWRS R.A. 10.G) – Develop a desk reference on groundwater technical reviews, compile various Internal Management Directives, and document institutional knowledge into a groundwater section desk reference. Coordinate with WRSD, FSD, TSD, and DO on some aspects of workflow (e.g., when and how do GW section staff interact with applicants and their agents within the application process – informal process vs formal re-review vs protest). The Groundwater Section has run on stable institutional knowledge for many years. Significant staff turnover in the past few years, development of significant new data analysis tools, an increase in applications received, challenges from proponents of denied or conditioned applications, and a number of recent interference complaints across the state indicate the need to document best-practices for uniform technical practices. This would take roughly a year to complete.

Designate New Groundwater Administrative Areas (IWRS R.A. 11.E) – Several groundwater aquifers have been identified as over-appropriated in recent application reviews. These areas should be designated in rule. Over-appropriated aquifers should be delineated and communicated to the public and internally in a widely accessible format; at present, the only documentation is in various technical reviews that reside in individual application files. Reclassification is a good tool to prevent additional impacts to the resource. Depending on the level of priority and interest, the Department could regularly present a classification for consideration by the Water Resources Commission

List the Various Strategies Communities Can Follow to Better Understand and Address Groundwater Supply Issues (IWRS R.A. 8.C) – One suggested action was for the Department to list out the range of efforts and strategies the Department and communities could undertake to better understand and address groundwater supply issues, ranging from strategic data collection to a full basin study and basin plan. As part of this list, the Department could also identify when each strategy may be appropriate or sufficient for answering the specific questions or addressing the specific concerns related to the aquifer or basin of interest.

Update Statewide Approach for Determining Groundwater Availability – This strategy could include a shift in Department policy, where the Department must have conclusive data prior to making a finding that groundwater is available for a new allocation.

Continue to Link Groundwater-Related Databases (IWRS R.A. 1.C) – *Migration of the groundwater database has allowed better information sharing between agency divisions. This work would have the Department continue to assess, improve, and link data tools. One example is linking the water use reporting system with databases of meter readings by field staff and groundwater staff. This requires coordination with other TSD sections and perhaps other divisions. This would improve access to department data to support decision-making and allow the Department to cross check customer-reported information (e.g., water use and water level data) with Department-collected data at the same location. This work would take approximately 2-3 years.*

Undertake Additional Groundwater Studies (IWRS R.A. 1.A) – *There is an interest in completing additional groundwater studies across the state. This action is not possible within existing resources. Additional staff and other resources are required to undertake additional groundwater studies.*

Exempt well/use reform – *Reform stock water exemption, ¼ mile buffer (to match division 9), and prohibit exempt uses when an aquifer is over-appropriated.*

Information Services

Summary of Potential Focus Area

The Information Services Section provides agency and public access to information necessary for sound water management decisions through application development, data management, and technical support. Information services work is fundamental to the operations of the Department as many decisions and work products are dependent on information management and various tools. Information as a strategic focus area encompasses efforts to make various upgrades and transitions in services in order to be able to continue and improve upon information service capabilities.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.C

Potential Actions within this Focus Area

Migrate to Office 365 Cloud (IWRS R.A. 1.C) – The State is migrating to the subscription-based Microsoft Office 365 in the cloud. This service provides the Office Suite, Email, SharePoint, and One Drive services at a cost of approximately \$200 - \$300 per user per year plus initial license cost. This will require IT work to set up a fully connected member of the State Office 365 cloud. This work could occur over the next 1 to 3 biennia.

Perform Database Upgrade (IWRS R.A. 1.C) – The SQL Server Database that powers the vast majority of Department data is several years old and customer support for it ended in July 2017. The final end of life for this product is July 2022. The Department is working on the costs and tasks required to upgrade this critical part of Department’s information services. This is ongoing work.

Pursue Legacy Data Upgrades – Data Center (IWRS R.A. 1.C) – The Water Rights Information System is increasingly being used for purposes that require more and more precision. Remapping water rights using better control sources and bringing the data entry up to standard is a significant workload over and above what the current four Data Tech positions can handle. Filling the fifth position for which the Department has position authority would enable the Department to dedicate a position to improving legacy data and reducing the number of poly-pointed places of water right use. Some of this is current work that will likely continue over the next biennium.

Server Room Upgrades (IWRS R.A. 1.C) – *The agency currently has on-premises servers which are nearing or past their life cycle. Purchasing new servers for on-premises deployment now has to have special approval from the Office of the State CIO. The Department is currently getting information and quotes for moving the servers to Microsoft’s Azure Cloud. This option allows the Department to easily increase computer resources, memory, and disk space as needed and pay for only what the Department needs. It also provides the capability of having servers located in diverse physical locations should a disaster hit Western Oregon. This work could occur over the next 1 to 2 biennia.*

Pursue Additional Development Support (IWRS R.A. 1.C) – *Application Development is typically aligned with Department priority projects (i.e., the agency “IT project list”). However, there are many competing top-level priorities that vie for resources. Budget cuts from 2009 eliminated key Information Services positions that the Department have only partially recovered. For example, prior to 2009, the Department had a System Administrator, Application Developer, and Database Administrator - all at an IS7 level.*

When the current Information Services Manager took over the position, he kept the duties of System Administrator and Database Administrator, leaving the Application Developer as an IS7. The Department was able to add an IS5 developer position in the 2013 Legislative Session. A full-time Database Administrator/Developer would go a long way to being better able to provide application development resources for Departmental initiatives. This could occur after the 2019 Legislative Session at the earliest.

Inter-Agency Coordination

Summary of Potential Focus Area

Each local government responsible for land use management coordinates with various state agencies to ensure that state agency actions, such as permitting, comply with statewide planning goals and local comprehensive plans. The Water Resources Department, for example, coordinates with local governments on actions involving applications for water use permits, transfers, water exchanges, instream water rights, and reservations for economic development.

This focus area centers on strategic improvement in the coordination of agencies in water management. Stakeholders noted that as available money to fund government services gets tighter, the importance of inter-agency coordination will grow. Some mentioned that the natural resource agencies generally do a good job coordinating. Others discussed the need to reduce any redundancy and to seek more efficiency in what data are collected by different groups.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.C
- IWRS Recommended Action 6.B

Potential Actions within this Focus Area

Identify Other Opportunities for Agency Efficiency (IWRS R.A. 6.B) – Conduct an internal review to identify areas where inter-agency coordination can lead to efficient use of resources and improved outcomes. This could include areas such as conservation coordination, drought response, and project funding.

Review Various Agency Monitoring to Identify Redundancy and Opportunities for Efficiency (IWRS R.A. 1.C and 6.B) – Agencies monitor various aspects of water throughout the state. Where possible, efforts could be made to streamline monitoring. The recent 2018 Monitoring Summit and STREAM Team efforts are examples of current agency coordination that could be built upon to further coordinate data collection and management.

Process Improvements

Summary of Potential Focus Area

Process improvements center on bettering how a task is accomplished, not what will be accomplished. These efforts can include increases in efficiency, new technologies, etc. This distinction is critical because changes in what will be done or other forms of content changes are located under other focus areas. For example, improving the efficiency of processing a water right application is a process improvement. Changing what is considered in the water right application process would fall under the “Water Right Transactions” focus area.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.B, 1.C
- IWRS Recommended Action 10.G

Potential Actions within this Focus Area

Pursue Electronic Application and Fee Submittal (IWRS R.A. 10.G) – Develop a pilot project to facilitate electronic submittal of Instream Lease Applications and fee payment. Currently, water-right related applications and fees can only be submitted via hard-copy sent via U.S. Mail or over-the-counter at OWRD Headquarters in Salem. This would be a first step in assessing the feasibility of OWRD transitioning to acceptance of water right-related applications and fee payments via electronic means. There are many reasons to pursue this action including:

- Responding to customer requests to pay application fees with their credit card.
- Modernizing the way in which OWRD can accept applications. If set up well, information from electronically submitted applications could “plug into” WRIS; thereby reducing staff time and resources to manually input the data. Potentially, there could also be a way to build in some sort of checks and balances so as not to accept incomplete applications.
- Reduce ASD staff time and resources to track/log check payments and write receipts.
- Reduce the amount of paper that is currently generated by receipt of applications and checks.

This could be accomplished within the next 3 to 4 years. A large amount of time will likely be required to develop the foundational structure and electronic tools by the Information Services Section.

Improve Water Use Permit Application Review Process (IWRS R.A. 10.G) – Different Divisions in the Department would work together to clarify and improve the process for review of water use permit applications. This could include establishing a better checklist for those involved in reservoir/dam design, and those involved in groundwater and well construction reviews. This could take 1-2 biennia.

Process and Operational Improvements for Division 33 (IWRS R.A. 10.G) – Continue to look for ways to streamline the Division 33 components of the water right application process. The Department needs to determine how best to allow other agencies to comment appropriately and give them a reasonable amount of time to do so. It would take about 6 months to a year to develop review forms that allow other agencies to provide comments that the Department can use to evaluate an application.

Seek Out Other Process Efficiencies – The Department could review processes and identify potential improvements, including automation or other technological solutions. This may include modernizing paper-based processes and record keeping, potentially shifting to electronic tools where practical.

Identifying and pursuing these actions would save time and/or other resources that could then be devoted to new incoming core work or other development work. This could be started at any time and the time it would take would vary based on the process being reviewed and the number of internal and/or external parties involved.

Surface Water Hydrology

Summary of Potential Focus Area

The Department's Surface Water Hydrology Section includes three programs. Hydrographics provides surface water data collection oversight and guidance, and among other responsibilities, maintains the records for gage and stream measurements. Surface Water Availability assesses surface water availability in rivers and streams throughout the state, provides streamflow statistics, and manages streamflow records database. Water Use Reporting manages the reported use of water from government agencies, as well as reported water use from permit holders that are required to report through a permit condition. Surface water hydrology work touches on a number of other potential focus areas such as climate change adaptation and resiliency, data collection and monitoring, water planning, development and management, and water use measurement and reporting.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.C

Potential Actions within this Focus Area

Update Water Availability (IWRS Recommended Action 1.C) – WRD established a Water Availability Reporting System (WARS) in the mid-1990s to help with basin planning and water right permit evaluations. The WARS program uses streamflow data from the years 1958-1987, also known as the base period. The Department is updating the water availability analysis to a more recent historical base period of water years 1981-2010. This is a significant investment of time and energy, scheduled to take approximately three years to complete; therefore, 2021 is the earliest this could be completed.

Un-adjudicated Water Right Claims

Summary of Potential Focus Area

Claims to the use of surface water that predate the Oregon Water Code are required to go through a formal administrative judicial process known as an adjudication to have their water right claims quantified, documented, and eventually incorporated into the prior appropriation system. Several basins in Oregon have un-adjudicated water right claims and/or federal reserved water rights. One potential strategic focus area could be to adjudicate those basins in order to determine and quantify the pre-1909 water rights and federal reserved rights.

Related IWRS Recommended Actions

- IWRS Recommended Action 2.C

Potential Actions within this Focus Area

Adjudicate Basins Over Time – Adjudicate water rights and federal reserved rights in basins where they have not yet been adjudicated. Significant progress cannot be made on this item without additional resources.

Water Infrastructure

Summary of Potential Focus Area

Water infrastructure includes pipelines, pumps and pumping stations, water treatment systems, wastewater systems, dams and reservoirs, levees, headgates, tidegates, drainage systems and water wells, etc. Much of the nation's water infrastructure is aging and will soon reach the end of its useful life. Ensuring that Oregon's water infrastructure is well maintained and functioning is important for a variety of public health and safety reasons, but also for meeting the state's economic needs. Some stakeholders noted a desire to remember and pursue both green and gray infrastructure as a strategic focus area. This focus area addresses general water supply infrastructure. More details around dams are included under the Dam Safety topic on page 11.

Related IWRS Recommended Actions

- IWRS Recommended Action 7.A, 7.B, and 7.C
- IWRS Recommended Action 10.C

Potential Actions within this Focus Area

Ensure Public Investments are Strategic (IWRS R.A. 13.C, 13.D, and 13.E) – Public investments in water infrastructure should produce public benefits. Those investments should follow some overall strategy. Recommendations for that strategy included basing funding decisions on water availability by basin/region, economic productivity, and ecological importance.

Approach Infrastructure with a Holistic View (IWRS 7.A, 7.B, and 7.C) – Pursue programs that promote both green and gray infrastructure as potential solutions to instream and out-of-stream water supply needs.

Quantify and Prepare for Extreme Events: Floods and the Cascadia Earthquake (IWRS R.A. 5.5B and 5.5C) – *Analyses to better understand seismic and flood risks to water infrastructure are needed. This is in part due to the lack of occurrence of a major flood in Oregon during the past 20 years, or major earthquake in the last 200 years. There is clear evidence that a very large earthquake and major flooding will occur, but little history of how to most efficiently analyze and design infrastructure for these effects. To ensure public safety and the resiliency of our water supplies, the Department needs to take action to quantify and characterize these events, so that Oregonians can design/build and rehabilitate infrastructure appropriately. This work would likely last October 2019 through 2024.*

Conduct Future-Casting (IWRS 7.A, 7.B, and 7.C) – *When examining water infrastructure needs, consider doing some future-casting work. That is, estimate projections of what it would cost in the future to address infrastructure needs compared to today.*

Water Planning, Development, and Management

Summary of Potential Focus Area

Water planning, development, and management encompasses the work done by the Department, individuals, communities, and basins to identify, understand, and meet instream and out-of-stream water needs. It uses data and information, water right transactions, and other tools/resources to help chart a path forward for water management. Current tools the Department has for partnering with others to do this work include Place-Based Planning, Feasibility Study Grants, and Water Project Grants and Loans.

Related IWRS Recommended Actions

- IWRS Recommended Action 1
- IWRS Recommended Action 2
- IWRS Recommended Action 3
- IWRS Recommended Action 5
- IWRS Recommended Action 5.5
- IWRS Recommended Action 6
- IWRS Recommended Action 7
- IWRS Recommended Action 9
- IWRS Recommended Action 10
- IWRS Recommended Action 13.C, 13.D, 13.E

Potential Actions within this Focus Area

Develop Guidance for Individuals and Communities Interested Water Planning and Projects (IWRS R.A. 9.A, 10.E, 13.C, 13.D, 13.E) – Currently the Department has limited guidance for its applicants/grantees on what they can or should consider doing with grant funds. There is a need for additional guidance in each area of the Water Resources Development Program. Place-Based Planning could use guidance for how to tackle each planning step. Feasibility Study Grant applicants would benefit from guidance describing what a grant could investigate for conservation, reuse, and storage projects and guidance suggesting potential sequencing of different feasibility studies. Water Project Grants and Loans could benefit from application guidance videos. Development and review of these guidance documents would likely require input from all Divisions in the Department. Guidance for applicants will help increase the quality of grant/loan applications (and subsequent studies/projects) and outputs from place-based planning. This also creates an opportunity to use WRDP to address other agency needs; for example, guidance on what storage feasibility studies should consider to better address dam safety. An example of such guidance is included under the Dam Safety focus area on page 11. This work could start anytime and could last through 2024, tackling guidance development in phases and doing the most important first.

Evaluate Water Resources Development Program Components (IWRS R.A. 9.A, 10.E, 13.C, 13.D, 13.E) – Each program component of Place-Based Planning, Feasibility Study Grants, and Water Project Grants and Loans (including Seasonally Varying Flows), needs a review to determine program, policy, rule, and statute changes needed to improve the program. *Both stakeholders and the Department see the need to evaluate Place-Based Planning as the Department ends the pilot phase to better shape what form of planning program the Department wants to have.* Feasibility Study Grants has been around for 10 years

and are long overdue for an evaluation and update. The Department, applicants, and stakeholders have also seen that Water Project Grants and Loans could use some updates based on lessons learned in the past 2 years. This presents an opportunity to conduct grant program evaluations in a coordinated fashion and look to see how the Department can update the program components to better fit together. This would include a thorough review of policies, procedures, rules, and statutes internally as well as consulting participants in the program for their feedback. It could also include the formation and consultation of a workgroup on water development to seek input on how WRDP and its program components can improve and evolve to better meet needs. The review could occur through December 2020, with action take to pursue improvement opportunities in 2021-2024.

Develop a Long-Term Vision for Place-Based Planning (IWRS R.A. 9.A) – Building off of the evaluation listed above, a suggestion was made to chart out the long-term vision for Place-Based Planning or other Department investments in water planning. Planning is necessary to determine how best to address water supply and other water challenges, as well as to identify water projects to help meet water supply needs. The Department should determine what role it wants to have in water planning.

Update Basin Characterizations (IWRS R.A. 1, 2, 3, 5, 5.5, 6, 7, 9, 10) – *The Department’s Basin reports, written 30 to 50 years ago, characterize the water resources of each of Oregon’s 18 administrative basins. In the intervening years, much has changed about the physical systems, and emerging issues such as groundwater-surface water interactions, climate change, and land-use change have made updates critical to understanding how water flows into and through the basins, how much water is available, what challenges must be addressed, and where the data gaps are. These updates could be completed in 2-3 biennia at the earliest. Initial scoping could be completed within existing resources, but full updates would require additional resources. While included under water planning and development, this action has ties to climate change adaptation and resiliency, groundwater hydrology, surface water hydrology, and many other potential focus areas.*

Water Right Transactions

Summary of Potential Focus Area

A core responsibility of the Department is evaluating and acting upon water right applications and other transactions related to instream and out-of-stream water use. Under Oregon law, almost all water users must apply for and receive a water right before initiating water use. This focus area could include updating the rules that govern this work and eliminating backlogs. Stakeholders expressed a desire for the Department to continue to focus on this work, which only the Department has the authority to do.

Related IWRS Recommended Actions

- IWRS Recommended Action 2.E
- IWRS Recommended Action 10.G

Potential Actions within this Focus Area

Develop a Mitigation Strategy or Set of Standards (IWRS R.A. 10.G) – The Department has received an increase in the number of requests to mitigate the impact of new groundwater and surface water appropriations. Mitigation is currently required for new groundwater use in portions of the Deschutes Basin on a programmatic basis. For other areas of the state, the sufficiency of mitigation is determined on a case-by-case basis. Updating and developing mitigation programs would benefit those areas where acquiring a new surface water or groundwater use permit is otherwise not possible. It is important for mitigation requirements and any standards to be clear. Therefore statewide and/or basin-by-basin mitigation standards need to be developed and implemented. A statewide framework could set forth the legal authorities and possibly basic parameters, while basin-specific rules could provide more specific mitigation details. Developing a statewide or set of basin programs could take between 3 and 5 years depending on the scope of the effort.

Update Division 77 (IWRS R.A. 10.G) – A rulemaking is needed to clarify that an existing storage water right can also be transferred instream and to develop and define the sideboards within which this may occur. Currently, Division 77 only clearly identifies that a storage water right can be leased instream. This rulemaking would seek to clarify that existing storage water rights can be both leased and transferred to an instream water right. Ideally this would be completed in the next 1 to 2 years.

Perform Tune-Up of Division 310 (IWRS R.A. 10.G) – There was a process improvement group that met a couple years ago that recommended this rulemaking. The rule currently does not mention the opportunity to settle protests that are filed. This would not be a major rulemaking, but the tune-up would be very beneficial and is important for the Water Rights section.

Fix Portions of Division 33 (IWRS R.A. 10.G) – The Division 33 rules are confusing. Some simple fixes would improve implementation of the rules. A major update is also needed to simplify the rules without compromising the protections the rules provide for Sensitive, Threatened and Endangered fish.

Eliminate Certificate Backlog (IWRS R.A. 10.G) – The current certificate backlog (as of April 1, 2018) is 1,121. The Department is looking at claims of beneficial use filed about four years ago. When the Department gets the backlog down to about 200, the Department will be able to review claims the same year they are submitted, which will be a big improvement for the Certified Water Rights Examiner and

the water user. Another benefit of eliminating the backlog is the Department might be able to shift staff to help process other water right transactions.

Eliminate Municipal Extension Backlog (IWRS R.A. 10.G) – Due to a series of events, there are about 45 municipal use permits that have extensions pending with development deadline dates expired, as far back as the mid-1990s. Much of the workload is pending with ODFW at this point. The Department needs to get this backlog processed so the affected municipalities all have a clear understanding of their current water allocations.

Promote and Incentivize Tools to Dedicate Water Instream (IWRS R.A. 10.G) – To further its work to restore streamflows, the Department could promote and incentivize the tools it has to legally dedicate water to instream use. Tools include instream leases, instream transfers, and the allocation of conserved water program.

Improve Applicant Expectations (IWRS R.A. 10.G) – As allocations of new water become more difficult to obtain, the Department needs to update public education tools to better inform applicants about the chances for application approval. This should reduce the number of applications, of all types, that are received but have little chance for approval. This action should improve customer service, while providing applicants with a better, upfront, understanding of how their application will be processed. *This action would benefit if there were new resources focused on outreach and education.*

Consider Additional Ways to Use Reimbursement Authority (IWRS R.A. 10.G) – The Department currently has the ability to use its reimbursement authority in a limited set of programs: certificates, transfers, and extensions. The reimbursement authority provides the Department the ability to enter into a voluntary agreement with an applicant for expedited agency action on a decision. Under such an agreement, the applicant pays the cost to hire additional staff, contract for services, or provide additional services to the applicant not otherwise available. As a strategic action, the Department could thoughtfully expand its use of this program for a broader set of water right transactions.

Update the Water Right Transfer Process (IWRS R.A. 10.G) – *Applicants are turning to transfers as a way to access rights for new uses of water. In the transfer process, the Department has little ability to correct well construction problems or to update the conditions of use of existing permits in a manner appropriate to the current state of water demand and availability. Review of transfers is currently limited to assessment of injury or enlargement of a water right. The current process does not allow, for example, consideration of rules of the Commission (such as basin plan rules), application of water level and water use measurement and reporting conditions, or requirements that wells subject to a transfer process meet minimum construction standards before the transfer is approved. This would require input from all divisions and external stakeholder outreach, and may require legislative action to enact statute changes or develop rules applicable to permit amendments. This could likely take 3-5 years.*

Implement Automatic Renewal of an Instream Lease if Resubmitted and Meets Certain Conditions (IWRS R.A. 10.D) – *If an instream lease is resubmitted within five years and meets certain conditions, it could qualify for an automatic renewal. An initial step of this action would be to scope out when an instream lease application would qualify for automatic renewal or expedited review. Work would also be needed to determine if an automatic renewal or expedited process would be appropriate and what those processes would entail. The benefit of this action is that it would reduce staff workload and allow them to devote their time to other issues.*

Consider Providing Districts and Others Opportunity to Process Transactions In-House – In an era of limited resources, the Department could consider delegating some water right transaction decisions to local entities, similar to the current district pilot project. A process would need to be developed for verification and oversight but this may improve the efficiency of these transactions. One goal of this action would be to promote mutual efficiencies in recordkeeping and measurement.

Water Use Efficiency and Conservation

Summary of Potential Focus Area

One of the more widely recognized approaches to managing demand for water—and stretching supplies of water—is water conservation. Water conservation, as defined in state law, is a means of eliminating waste or otherwise improving the efficiency of water use by modifying the technology or method of diverting, transporting, applying or recovering water. Water use efficiency and conservation as a strategic focus area could involve promoting and incentivizing water use efficiency and conservation or exploring new tools to accomplish this work. This topic was mentioned frequently by stakeholders as an important focus area, but without a lot of detail.

Related IWRS Recommended Actions

- IWRS Recommended Action 10.A
- IWRS Recommended Action 11.B

Potential Actions within this Focus Area

Promote Water Use Efficiency and Conservation (IWRS R.A. 10.A) – Provide incentives for improving voluntary water use efficiency and increasing conservation when it is not required.

Increase Instream Protection of Conserved Water (IWRS R.A. 11.B) – Review existing programs and work with stakeholders to identify where improvements can be made in order to ensure water use efficiency and conservation projects result in increased streamflows.

Promote Agricultural Water Management and Conservation Plans (IWRS R.A. 10.A) – Promote voluntary use of this tool in order to improve conservation and help agricultural users meet future water needs. Only have an Agricultural WMCP as a requirement if an irrigation district or other entity wants to take on more responsibilities or have more flexibility, as is done currently with the in-district transfer program.

Water Use Measurement and Reporting

Summary of Potential Focus Area

All government entities that hold water rights in Oregon, including federal and state agencies, cities, counties, schools, irrigation districts, and other special districts, are required by Oregon water law to annually report their water use. Beginning in the early 1990s, some water use permits issued to nongovernmental users included a water measurement and annual reporting requirement. Water-use reporters submit their information to the Department via its website and this information is then available to the public.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.B and 1.C
- IWRS Recommended Action 2.B

Potential Actions within this Focus Area

Continue to Link Water-Use Related Databases (IWRS R.A. 1.B, 1.C, and 2.B) – “Significant points of diversion” (SigPOD) and other water use data currently do not interact with the Water Use Reporting (WUR) and the Water Right Information System data. The Water Use Reporting Database may serve as a good portal / host for all user-reported water use data. Linking these data would improve accessibility and usability, as well as link already-existing data sets together for the first time. If prioritized, linking the data could be completed as soon as 2019-2021.

Obtain Authority to Require Water-Use Reporting (IWRS R.A. 1.B, 1.C, and 2.B) – *Water use information from the Significant points of diversion” (SigPOD) devices are typically not reported to the Department. While Watermasters generally can require water measurement under ORS 540.310 for the purposes of water distribution and management, they cannot require reporting of water use under this provision. Allow the Department to require water use reporting where measurement is required. Requiring reporting would require action at the Legislature.*

Well Construction and Compliance

Summary of Potential Focus Area

The Well Construction Program protects Oregon's groundwater aquifers from depletion, waste, contamination, and loss of artesian pressure. The program administers minimum well construction standards, well inspections, well constructor continuing education, exempt use well recording, landowner well construction permits, geotechnical hole standards, special standard application reviews, and well constructor licensing. The program works to ensure that well constructors and landowners understand the importance of protecting aquifers using proper construction, maintenance, and abandonment techniques.

Related IWRS Recommended Actions

- IWRS Recommended Action 1.C
- IWRS Recommended Action 10.F
- IWRS Recommended Action 11.E
- IWRS Recommended Action 12.A
- IWRS Recommended Action 13.B

Potential Actions within this Focus Area

Develop and Implement Columbia River Basalt Group (CRBG) Standards (IWRS R.A. 7.A, 11.E, 12.A) – Like the Commission has done in Mosier, the Department could create special area well construction standards for all new and deepened wells completed into the CRBG. These geologic formations are complex and many of the well construction problems over the years have been concentrated in these areas, leading to commingling, contamination, and loss of artesian pressure. Hydrogeologists and well construction experts, given enough lead time, can provide information and guidance to drillers in the field. This would involve a budget package for additional technical staff and a rulemaking with stakeholders and department staff, including Well Construction, Groundwater, and potentially representatives from the field. This could be done during the 2019-21 biennium at the earliest.

Improving Enforcement (IWRS R.A. 10.F) – Simplify the enforcement process. This would potentially involve a rulemaking to establish the standards and procedures for an improving the enforcement program. Rulemaking would include stakeholders, Department staff, including Well Construction, and Groundwater. Next biennium (2019-2021) is the earliest this could be undertaken.

Longer Lead Time for All Start Cards / Consultation Prior to Drilling (IWRS R.A. 7.A, 11.E, 12.A) – Well drillers file a "start card," to signify their intent to construct a well. Currently, a driller may submit the start card the same day work begins. By the time the Department processes the notification, the well is often complete and the drill rig has departed the work site. A longer Start Card lead time would be helpful when inspectors are arranging their schedules to be present during the well construction process. Lead time would also provide an opportunity for department staff to consult with the driller prior to the beginning of construction, bringing potential problems to the well constructor's attention before they are encountered on site. This helps to prevent construction deficiencies, including commingling, contamination, and loss of artesian pressure. Inspections and interactions with drillers are most effective if Department staff can be on site when the seal is placed. A longer lead time for Start Cards would require a statute change unless associated with special area well construction standards, which are

developed by rule. A budget package would be needed for added technical capacity. This could begin during the 2019-21 biennium at the earliest.

Restructure Groundwater & Well Construction Funds into One (IWRS R.A. 13.B) – *The Department manages four groundwater and well construction-related fees, whose monies are not fungible and cannot be combined into one coherent groundwater management program. They include: Start Card (Water Resources Department Operating Fund); Geotechnical Hole (Water Resources Department Geotechnical Fund); Well Constructor Licensing (Water Resources Department Water Right Operating Fund); and the Exempt Use Program (Water Resources Department Water Right Operating Fund). Well inspection and groundwater hydrogeologist positions have been left vacant, because of the inability to cover expenses in salary and benefits. Fees, by statute, are collected from different parties at different times, and it is difficult to tell a coherent story about the need and management of these fees. Restructure these funds so that staff and stakeholders can more clearly see the status of funds and how they are used. The 2021 legislative session is likely the earliest this effort could be tackled.*

Regulation of Pump Installers & Measuring Tubes (IWRS R.A. 1.C, 7.A, 12.A) – *Set and enforce standards for the installation of water well pump equipment (<7.5 Horsepower) on residential property and require measuring tubes in all wells. This would allow the Department to verify that casing heights have not been adjusted; that wells are properly covered and protected after pumps are installed; that measuring tubes are properly installed; that water meters are properly installed and maintained; that backflow prevention devices are properly installed; and that wells are properly chlorinated after pump installation occurs. The regulation of pump equipment would not include the inspection of electrical connections. The 2021 legislative session is the earliest this could be addressed.*