Expansion Water Rights in the Oakley Fan

Critical Ground Water Areas

Tim Luke, IDWR
02/05/2015, Burley
Critical Ground Water Areas (CGWAs)

• Idaho Code Section 42-233a
  – “A ground water basin, or designated portion thereof, not having sufficient ground water to provide a reasonably safe supply for irrigation, or other uses in the basin at the then current rates of withdrawal, ...”
Critical Ground Water Areas (CGWAs)

• Idaho Code Section 42-233a
  – “The Director may approve a ground water management plan” that “shall provide for managing the effects of ground water withdrawals on the aquifer from which the withdrawals are made...”
Critical Ground Water Areas (CGWAs)

• Effect of designation is a moratorium on further appropriations of water (no new water rights or uses)

• As Per § 42-233a, Director may:
  – require measurement and reporting of ground water withdrawals
  – order right holders, based on priority rights, to reduce pumping until there is sufficient ground water (issued by September 1 and effective for following year)
Critical Ground Water Areas (CGWAs)

- Eight CGWAs designated in Idaho between 1962 and 1982
Critical Ground Water Areas (CGWAs)

• Oakley Area (IDWR Administrative Basin 45)
  – Goose Creek – Rock Creek CGWA, January, 1962
  • Encompassed most of Basin 45 (Goose CK drainage) and portion of Basin 47 (Rock Creek)
  • Modified/Reduced in 1967 to three separate areas
    – Artesian City
    – Cottonwood
    – Oakley Kenyon
  – West Oakley Fan CGWA, January, 1982
Expansion Water Rights in CGWAs

  – “… a claim to the expanded use of a ground water right, which use was expanded in violation of the mandatory permit requirements, may be decreed in a general water rights adjudication* if the expansion occurred after the designation of the critical ground water area, before the commencement of the adjudication, and before the date of enactment of this section. The priority date for the right decreed shall be June 30, 1985.”

* General Adjudication is Snake River Basin Adjudication
Expansion Water Rights in CGWAs

- Idaho Code Section 42-1416B
  - “Water shall be deemed unavailable to fill the rights for expanded use..., unless the director finds that a management plan exists which will, within a time period acceptable to the director, limit the average annual water withdrawals from the aquifer designated in the critical ground water area to no more than the average annual recharge to the aquifer.”
Expansion Water Rights in CGWAs

- Idaho Code Section 42-1416B
  - Within two (2) years after the general adjudication final decree*, “the director shall make a finding as to whether an adequate management program exists to bring withdrawals into balance with recharge.”

Expansion Water Rights in CGWAs

- Idaho Code Section 42-1416B
  - If the director finds an adequate management program does not exist, he shall order expansion right holders “to cease or reduce withdrawal of water until such time as the director determines that withdrawals have been brought into balance with recharge and sufficient ground water is available to resume or increase withdrawals.”
  
  - “The director’s order shall be issued before September 1 and shall be effective for the following growing season.”
Expansion Water Rights in CGWAs

• Idaho Code Section 42-1416B
  – If an adequate management program does not exist, the director would seek curtailment of expansion rights only
  – Curtailment authority under IC § 42-1416B limited to expansion rights
  – IDWR not considering at this time any reduction or curtailment of water use under IC § 42-233a
Expansion Water Rights in CGWAs

Idaho Code § 42-1416B – Definitions

**Expanded Use:** “an increase in the number of acres irrigated under a valid ground water right without any increase in the rate of diversion or volume of water diverted.”

**Management Program:** “a program to recharge the aquifer, limit withdrawals from the aquifer, or provide surface water supplies for all, or portion, of the land irrigated with water withdrawn from the aquifer,...”
Expansion Water Rights in CGWAs

Idaho Code § 42-1416B – Definitions

**Recharge:** “all processes, natural or artificial, which add water to the aquifer.”

**Withdrawals:** “all processes, natural or artificial, which take water from the aquifer.”
Expansion Water Rights in CGWAs

• Suggested Timeline for § 42-1416B
  – February, 2015 – April 1, 2016
    • Decide on and/or develop management program and submit to director
    • IDWR anticipates 1 plan for all or most expansion rights
  – April - August, 2016 or earlier
    • IDWR review of mgmt. program/plan, if submitted
    • Director issues findings (order) regarding adequacy of management program – decision affects continued use of expansion rights
## Expansion Rights – Oakley CGWAs

<table>
<thead>
<tr>
<th>CGWA</th>
<th>Rights</th>
<th>Acres</th>
</tr>
</thead>
<tbody>
<tr>
<td>Artesian City</td>
<td>13</td>
<td>1,467</td>
</tr>
<tr>
<td>Cottonwood</td>
<td>2</td>
<td>131</td>
</tr>
<tr>
<td>West Oakley Fan</td>
<td>6</td>
<td>189</td>
</tr>
<tr>
<td>Oakley Kenyon</td>
<td>56</td>
<td>10,591</td>
</tr>
<tr>
<td>West Oakley &amp; Oakley Kenyon</td>
<td>4</td>
<td>344</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>80</strong></td>
<td><strong>12,722</strong></td>
</tr>
</tbody>
</table>
## Expansion Rights – Oakley CGWAs

<table>
<thead>
<tr>
<th>Irrigation District</th>
<th>Rights</th>
<th>Acres</th>
</tr>
</thead>
<tbody>
<tr>
<td>Goose Creek</td>
<td>16</td>
<td>3,678</td>
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<tr>
<td>Southwest</td>
<td>49</td>
<td>5,908</td>
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<tr>
<td>Goose Creek &amp; Southwest</td>
<td>3</td>
<td>2,297</td>
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<tr>
<td>None</td>
<td>12</td>
<td>839</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>80</strong></td>
<td><strong>12,722</strong></td>
</tr>
</tbody>
</table>

See IDWR website for list of Expansion Rights by owner, CGWA & Irrig. Dist.
Legend

- Critical Ground Water Areas
- Southwest Irr Dist
- Goose Creek Irr Dist
- Cities
- IDWR Admin Basins
- Interstate
- State
- U.S.
Recharge vs. Withdrawals

Estimate of Recharge-Withdrawals across CGWAs using Eastern Snake Plain Aquifer Model 2.1 (ESPAM2.1) for period of record 1999 – 2009

<table>
<thead>
<tr>
<th>Recharge (natural &amp; incidental)</th>
<th>Withdrawals (crop consumptive use ground &amp; surface water)</th>
<th>Net Recharge</th>
</tr>
</thead>
<tbody>
<tr>
<td>+69,615 AF</td>
<td>-181,815 AF</td>
<td>-112,200 AF</td>
</tr>
</tbody>
</table>

Note: - Recharge-Withdrawal values not available for portions of CGWAs.
- SWID-GCID 2013 mitigation activities resulted in 54,000 AF of credit or benefit to ESPA for ESPA water right delivery calls.
Oakley CGWAS
Water Levels & Trends