Water Quality Management
Plans for Agriculture
in the Geronimo and Alligator Creeks Watershed

Brian Koch
Texas State Soil and Water Conservation Board

Geronimo Creek WPP Agricultural NPS
Workgroup Meeting
June 8, 2010
Role of Texas State Soil and Water Conservation Board

Water Quality Mandate
(Texas Agriculture Code §201.026)

TSSWCB is the lead agency in Texas responsible for planning, implementing and managing programs and practices for preventing and abating agricultural and silvicultural (forestry-related) nonpoint source water pollution.
Texas Conservation Partnership

Providing Conservation Assistance to Private Landowners for 70+ Years

- **LOCAL**
  - 216 Soil and Water Conservation Districts (SWCDs)

- **STATE**
  - Texas State Soil and Water Conservation Board (TSSWCB)

- **FEDERAL**
  - U.S. Department of Agriculture - Natural Resources Conservation Service (USDA-NRCS)
Critical Other Partners

- Texas AgriLife Extension Service
  - Education and demonstration of BMPs
  - Soil testing campaigns
- Texas Forest Service
  - Silvicultural NPS mgmt
- Texas Department of Agriculture
  - Lead state agency for the regulation of pesticide use and application
- Texas AgriLife Research
  - Research and demonstration of BMP effectiveness
- USDA Agricultural Research Service
  - Research and demonstration of BMP effectiveness
The soil conservation district is the workshop through which those who love the land pool their efforts and information in making land more stable and productive and our country more prosperous and a better land in which to live.

The fact that landowners themselves have the responsibility for voting in a district, formulating its program, administering its business and entering into cooperative agreements with their fellow landowners, makes soil conservation districts a democracy in action.

V.C. Marshall
Father of the Texas SWCD Program
Only 1 SWCD for Geronimo Creek Watershed

- Comal-Guadalupe SWCD #306

- Board of Directors
  - Russell Bading, Chairman
  - Larry Damerau, Vice Chairman
  - Carroll Lindeman, Secretary
  - Guy Anderson
  - Kathryn Brady

Office
3251 N Hwy 123 Bypass
Seguin, TX 78155

Meeting Location
Producer’s Co-op
210 S Castell Ave
New Braunfels, TX xxxxx
Implementation Strategy

- Proactively address agricultural and silvicultural sources of pollutants through voluntary implementation of BMPs by private landowners to bring impaired waterbodies back into compliance with water quality standards or to prevent waterbodies from becoming impaired.
How Is This Done?

- Technical assistance for private landowners to develop Water Quality Management Plans (WQMPs) that implement BMPs
- Financial assistance for private landowners through traditional cost-share programs to implement WQMPs/BMPs
- Research on effectiveness of BMPs
- Education on and Demonstration of BMPs
Water Quality Management Plans

- Site-specific plan for land improvement measures developed through SWCD for agricultural lands
- Provides farmers and ranchers a voluntary opportunity to achieve a level of pollution prevention or abatement consistent with state water quality standards
- Includes appropriate and essential land treatment practices, production practices, management measures, or technologies applicable to the planned land use
- Best available management and technology as described in NRCS Field Office Technical Guide
WQMP statutory authority

- Created by the 73rd Texas Legislature in 1993 through Senate Bill 503 (often referred to as 503 Program, or 503 plans, or 503 cost-share)

- Voluntary enrollment in WQMP Program for farmers and ranchers, except that the 77th Texas Legislature in 2001 (Senate Bill 1339) said poultry operations must obtain a WQMP
WQMPs

- Site specific plans with a combination of BMPs for the treatment of identified resource concerns

- Based on:
  - Soil types
  - Planned land use/production goals
  - Known/potential water quality/natural resource problems (SWAPA)
  - Other site specific factors (topo, etc.)
WQMPs

- Cover the entire farm or ranch
- Specifically designed to achieve pollution prevention/abatement
  Consistent with Texas water quality goals
- Texas Water Code §26.121
Technical Criteria for WQMPs

NRCS Field Office Technical Guide (FOTG)

To view all approved practices for selected county:

- Select region
- Select county
- Select Section IV
- Select A. Conservation Practices
FOTG “essential practices” for each land use:

- **Cropland**
  - Conservation crop rotation
  - Residue mgmt.

- **Pastureland**
  - Prescribed grazing
  - Livestock water

- **Rangeland**
  - Prescribed grazing
  - Livestock water

- **Wildlife**
  - Wildlife mgmt.

- **Forestland**
  - Forest mgmt.
WQMPs also include:

- Nutrient management
- Pest management
- Animal waste management system
- Waste utilization
- Irrigation water management
WQMPs also include:

- Erosion control measures to bring soil loss to acceptable levels (T)
- Erosion control to treat other forms of erosion (i.e. gullies) according to FOTG quality criteria
- Other practices to meet site specific concerns
Why have a WQMP?

- Abate/prevent erosion and promote conservation
- A strategic “management” plan for your operation
- “Assurance” policy – state-certified proof that you aren’t just sitting around doing nothing
- Demonstrate that voluntary conservation programs promote agricultural production and environmental quality as compatible goals
- Demonstrate that agriculture is doing our part to protect water quality
- Resolve water quality complaints through voluntary process with SWCD and TSSWCB
WQMPs

What Does A Plan Contain?

- District-Cooperator Agreement
- Request for Planning Assistance
- Soils Map & Interpretations
- Conservation Plan Map
- Narrative Record of decisions (practices) needed to implement WQMP
- Implementation schedule indicating years practices are to be applied
- Worksheets used during the inventory and planning process of developing WQMP
- NRCS Practice Standards and engineering designs
- Signature sheet to verify individual's privacy
How to get a WQMP?

- An individual requests planning assistance through their local SWCD

- The WQMP is usually developed by the SWCD Technician with NRCS and TSSWCB assistance

- The WQMP is approved by the landowner, the SWCD and NRCS and then certified by the TSSWCB

- Producer implements the WQMP on their land

- Annual status reviews are conducted to ensure that the landowner implements BMPs as agreed to in the implementation schedule
Financial Assistance

State (TSSWCB) or Federal (NRCS) assistance is obtainable for certain conservation practices

- **TSSWCB**
  - 503 or 319 or WSEP cost-share

- **NRCS**
  - Farm Bill Programs (EQIP, WHIP, WRP, AWEP)
  - Local Work Group meetings to set priorities
TSSWCB Financial Assistance

- TSSWCB limits cost-share rate to 75% and maximum amount to $15,000 per WQMP
- Each SWCD sets its own rate and maximum not to exceed state

- Practices for cost-share must be approved by TSSWCB
- SWCD must also approve practices for cost-share (may be more restrictive than state list)

- Each SWCD sets average cost of each practice based on local economics

- Applies regardless of funding source (503, 319)
# TSSWCB Cost Share Program - Practice Eligibility

<table>
<thead>
<tr>
<th>Code</th>
<th>Practice Name and Unit</th>
<th>Minimum Life Span (Yrs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>313</td>
<td>Waste Storage Facility (no.)</td>
<td>10</td>
</tr>
<tr>
<td>314</td>
<td>Brush Management (acre)</td>
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<tr>
<td>316</td>
<td>Animal Mortality Facility (no.)</td>
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<td>317</td>
<td>Composting Facility (no.)</td>
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<tr>
<td>324</td>
<td>Deep Tillage (acre)</td>
<td>5</td>
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<tr>
<td>332</td>
<td>Contour Buffer Strips (acre)</td>
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<tr>
<td>342</td>
<td>Critical Area Planting (acre)</td>
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<tr>
<td>350</td>
<td>Sediment Basin (no.)</td>
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<tr>
<td>351</td>
<td>Well Decommissioning (no.)</td>
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<tr>
<td>359</td>
<td>Waste Storage Lagoon (no.)</td>
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<tr>
<td>360</td>
<td>Closure of Waste Impoundments (no.)</td>
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<tr>
<td>362</td>
<td>Diversion (ft.)</td>
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<tr>
<td>378</td>
<td>Pond (no.)</td>
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<tr>
<td>382</td>
<td>Fence (ft.)</td>
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<td>386</td>
<td>Field Border (ft.)</td>
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<tr>
<td>390</td>
<td>Riparian Herbaceous Cover (acre)</td>
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<td>391</td>
<td>Riparian Forest Buffer (acre)</td>
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<td>393</td>
<td>Filter Strip (acre)</td>
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<td>410</td>
<td>Grade Stabilization Structure (no.)</td>
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<td>412</td>
<td>Grassed Waterway (acre)</td>
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<tr>
<td>430</td>
<td>Irrigation Water Conveyance, Pipeline (ft.)</td>
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<tr>
<td>436</td>
<td>Irrigation Storage Reservoir</td>
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<tr>
<td>441</td>
<td>Microirrigation (all needed components)</td>
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<tr>
<td>442</td>
<td>Sprinkler-low pressure-new installations</td>
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<tr>
<td>442</td>
<td>Sprinkler – Conversion to low pressure</td>
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<tr>
<td>442</td>
<td>Sprinkler – Chemigation equipment</td>
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<tr>
<td>443</td>
<td>Surface – Shallow flood, rice (all needed components)</td>
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<tr>
<td>443</td>
<td>Surface – Surge valves</td>
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<td>447</td>
<td>Irrigation System, Tailwater Recovery (no.)</td>
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<td>462</td>
<td>Precision Land Forming (acre)</td>
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<td>464</td>
<td>Irrigation Land Leveling (acre)</td>
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<tr>
<td>512</td>
<td>Pasture and Hayland Planting (acre)</td>
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<td>516</td>
<td>Pipeline (ft.)</td>
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<tr>
<td>521</td>
<td>Pond Sealing or Lining (no.)</td>
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<tr>
<td>550</td>
<td>Range Planting (acre)</td>
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<td>552</td>
<td>Irrigation Regulating Reservoir (no.)</td>
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<tr>
<td>558</td>
<td>Roof Runoff Structure (no.)</td>
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<td>560</td>
<td>Access Roads (hard surface lanes) (ft.)</td>
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<tr>
<td>600</td>
<td>Terrace (ft.)</td>
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<td>606</td>
<td>Subsurface Drain (ft.)</td>
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<tr>
<td>612</td>
<td>Tree/Shrub Establishment (acre)</td>
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<td>614</td>
<td>Watering Facility (no.)</td>
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<td>634</td>
<td>Manure Transfer (no.)</td>
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<tr>
<td>638</td>
<td>Water and Sediment Control Basin (no.)</td>
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<tr>
<td>642</td>
<td>Water Well (no.)</td>
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<tr>
<td>642</td>
<td>Well Head Protection (no.)</td>
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</tbody>
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TSSWCB
Regional
Offices &
Cost
Share
Areas

June 8, 2010
Resources for WQMPs

Local:
Comal-Guadalupe SWCD #306

TSSWCB - Wharton Regional Office
1120 Hodges Lane
Wharton, TX  77488
979-532-9496

On the Web:
http://www.tsswcb.state.tx.us/wqmp
Thanks!

Any Questions?
Brian Koch
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Texas State Soil and Water Conservation Board

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