

**STATEMENT OF WORK
WATERING FACILITY (614)
SOUTH DAKOTA
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These deliverables apply to this individual practice. For deliverables for other planned practices, refer to those specific Statements of Work.

DESIGN

Deliverables:

1. Pre-design conference with client and Natural Resources Conservation Service (NRCS) representative.
2. Design documentation that demonstrates that the criteria in the NRCS conservation practice standard have been met and are compatible with other planned and applied practices. Include:
 - a. Identification of client needs, documentation of discussion with client, and a recommended method of resolution.
 - b. Practice purpose(s) as identified in the conservation plan.
 - c. Location of planned practice installation shown on a farm or ranch plan map.
 - d. List of required permits to be obtained by the client.
 - e. Impacts on adjacent properties and structures.
 - f. Certification of compliance with NRCS national and state utility safety policy (NEM Part 503 - Safety, Subpart A - Engineering Activities Affecting Utilities, 503.0 through 503.6).
 - g. List of facilitating practices.
 - h. Practice standard criteria-related computations and analyses to develop plans and specifications including but not limited to:
 - i. Capacity
 - ii. Materials
 - i. Climatic Considerations (e.g. freezing)
2. Sufficient copies of written plans and specifications, including sketches and drawings, that adequately describe the requirements to install the practice and to obtain necessary permits.
3. Specific detailed requirements for Watering Facility design and the development of construction plans and specifications are outlined in the South Dakota Engineering and Spot Checking Manual (SDEDSCM), under the Trough or Tank Practice Requirements. Where specific forms or job sheets are mentioned in the SDEDSCM, an equivalent may be substituted. The guidance contained in this manual shall be considered as the minimum acceptable for this practice.
4. Design Report as appropriate (NEM Part 511 - Design, Subpart B - Documentation, 511.10 and 511.11).
5. Quality Assurance Plan (NEM Part 512 - Construction, Subpart D - Quality Assurance Activities, 512.30 through 512.33).
5. Operation and Maintenance Plan.
6. Certification that the design meets NRCS standards and specifications and is in compliance with applicable laws and regulations (NEM Part 505 - Non-NRCS Engineering Services, Subpart A - Introduction, 505.0 and 505.3).
7. Develop and sign an engineer's cost estimate based on project quantities. Provide revised cost estimates in the event of changes to project quantities or completion of final design.
8. Develop a list of practices for the project that includes the practice unit and extent. Provide a revised list of practices, practice units, and extents in the event of changes to these values or completion of the final design.
9. Provide an anticipated installation schedule.
10. Design modifications during installation as required.

INSTALLATION

Deliverables:

1. Pre-installation conference with client, NRCS representative, and contractor.
2. Verification that client has obtained required permits.
3. Staking and layout according to plans and specifications including applicable layout notes.
4. Installation inspection.

- a. Actual materials used (NEM Part 512 - Construction, Subpart C – Evaluation of Construction Materials, 512.20 through 512.23; Subpart D - Quality Assurance Activities, 512.33).
 - b. Inspection records
 - c. Document compliance with Quality Assurance Plan.
5. Specific detailed requirements for Watering Facility installation are outlined in the SDEDSM, under the Trough or Tank Practice Requirements. Where specific forms or job sheets are mentioned in the SDEDSM, an equivalent may be substituted. The guidance contained in this manual shall be considered as the minimum acceptable for this practice.
 6. Facilitate and implement required design modifications with client and original designer.
 7. Advise client/NRCS on compliance issues with all federal, state, tribal, and local laws, regulations and NRCS policies during installation.
 8. Certification that the installation process and materials meet design and permit requirements.

CHECK OUT

Deliverables:

1. As-Built documentation.
 - a. Extent of practice units applied
 - b. "Red-line" drawings (NEM Part 512, Construction, Subpart F – As-builts, 512.50 through 512.52)
 - c. Final quantities
2. Specific detailed requirements for Watering Facility checkout design and the development on construction plans and specifications are outlined in the SDEDSM, under the Trough or Tank Practice Requirements. Where specific forms or job sheets are mentioned in the SDEDSM, an equivalent may be substituted. The guidance contained in this manual shall be considered as the minimum acceptable for this practice.
3. Certification that the installation meets NRCS standards and specifications and is in compliance with permits (NEM Part 505 – Non-NRCS Engineering Services, Subpart A - Introduction, 505.3).
4. Progress reporting.

REFERENCES

- NRCS South Dakota Field Office Technical Guide (eFOTG), Section IV, Conservation Practice Standard – Watering Facility, 614.
- NRCS National Engineering Manual (NEM)
- NRCS National Environmental Compliance Handbook
- NRCS Cultural Resources Handbook
- SDEDSM