

# STI SP001 ANNUAL TANK INSPECTION CHECKLIST

Environmental & Regulatory Services Division  
Bureau of Petroleum Products and Tanks  
P.O. Box 7837, Madison, WI 53707-7837  
(608) 267-9795 (608) 266-7874

**INSTRUCTIONS:** Fill in ALL applicable data. A copy of this completed form shall be kept on site; available for viewing by the authorized Wisconsin Inspection Agency upon request

Tank Address Location Information:	Tank Information:
Company Name	Tank Number
Number and Street	Product Stored
City, State, Zip Code	Tank Capacity

**Inspection Guidance/Results:**

- Inspectors shall be knowledgeable of the purpose of each piece of equipment, method of operation, and if applicable, the manufacturers maintenance, inspection, testing requirements and instructions.
- This Inspection is intended for monitoring the external AST condition and its containment structure. This inspection does not require a certified inspector. It shall be performed by an owner's designated inspector who is familiar with the site and can identify changes and developing problems.
- The checklist items below are the minimum requirements for inspection; an individual AST may require more in-depth inspections. Conversely, some of the checklist items may not be applicable to an individual tank system.
- For equipment not included in the STI SP001 standard, follow the inspection, maintenance, and testing schedules and procedures as recommended by the manufacturer.
- Upon discovery of water in the primary tank, secondary containment area, interstice, or spill container, remove promptly or take other corrective action. Before discharge to the environment, inspect the liquid for regulated products or other contaminants and disposed of it properly.
- **(\* designates an item in a non-conformance status. This indicates that action is required to address a problem. Document corrective actions in the comment section.**
- Non-conforming items important to tank or containment integrity (cracks, tank or containment deformation, etc.) require evaluation by an engineer experienced in AST design, a certified inspector, or a tank manufacturer who will determine the corrective action. Note the non-conformance and corresponding corrective action in the comment section.
- Retain the completed checklists for 36 months.
- **In the event of severe weather (snow, ice, wind storms) or maintenance (such as painting) that could affect the operation of critical components (normal and emergency vents, valves), an inspection of these components is required immediately following the event.**

1.0 Tank Containment			
Item	Status	Item	Status
<b>1.1</b> Do the containment structures exhibit any: Delamination of caulk Holes Washout Liner degradation Corrosion Leakage Paint failure Tank settlement	<input type="checkbox"/> Yes* <input type="checkbox"/> No <input type="checkbox"/> N/A		

**2.0 Tank Foundation and Supports**

Item	Status	Item	Status
<b>2.1</b> Foundation settlement or washout?	<input type="checkbox"/> Yes* <input type="checkbox"/> No	<b>2.4</b> Concrete pad/ring wall cracking or spalling?	<input type="checkbox"/> Yes* <input type="checkbox"/> No <input type="checkbox"/> N/A
<b>2.2</b> Corrosion, cracking, or paint failure of supports?	<input type="checkbox"/> Yes* <input type="checkbox"/> No <input type="checkbox"/> N/A	<b>2.5</b> Grounding/ bonding straps secured and in good condition?	<input type="checkbox"/> Yes <input type="checkbox"/> No*
<b>2.3</b> Water drains away from tank?	<input type="checkbox"/> Yes <input type="checkbox"/> No*		

**3.0 Cathodic Protection**

Item	Status
<b>3.1</b> Corrosion protection system tested, maintained, and operational in accordance with the requirements of Comm 10.520?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A

**4.0 Tank Shell, Heads, Roof**

Item	Status	Item	Status
<b>4.1</b> Tank paint in good condition with no signs of failure?	<input type="checkbox"/> Yes <input type="checkbox"/> No*	<b>4.3</b> Tank roof has low points or standing water?	<input type="checkbox"/> Yes* <input type="checkbox"/> No
<b>4.2</b> Does the tank steel exhibit any: <ul style="list-style-type: none"> <li>• Dents</li> <li>• Buckling</li> <li>• Bulging</li> <li>• Corrosion</li> <li>• Cracking</li> </ul>	<input type="checkbox"/> Yes* <input type="checkbox"/> No		

**5.0 Tank Equipment**

Item	Status	Item	Status
5.1 Visible signs of valve leakage, damage, or corrosion?	<input type="checkbox"/> Yes* <input type="checkbox"/> No	5.8 Anti-siphon, check, and gate valves cycle open-close and/or operate correctly?	<input type="checkbox"/> Yes <input type="checkbox"/> No*
5.2 Automatic air/electric valves operational (cycle open-close)?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A	5.9 Fire and shear valves cycle open-close easily, fusible link installed, and test ports are sealed with a pipe plug?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A
5.3 Interstitial monitoring equipment functional? Sight gauges clear or electronic gauges activate alarm.	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A	5.10 Spill container in good condition with all connections tight and drain valves operable and closed?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A
5.4 Flame arrestors unobstructed, corrosion-free, and maintained, inspected, in accordance with manufacturers instructions?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A	5.11 Leak detectors for underground piping pass functionality test? (ERS-10778 LLD)	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A
5.5 Product liquid level gauges in good condition and operable?	<input type="checkbox"/> Yes <input type="checkbox"/> No*	5.12 Overfill equipment functional?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A
5.6 Pressure regulator valve functional?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A	5.13 Expansion relief valve in correct orientation?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A
5.7 Emergency vent covers, pressure/vacuum poppets, and moving vent components move freely, are unobstructed, and have no evidence of seat and sealing surface degradation due to: <ul style="list-style-type: none"> <li>• Corrosion</li> <li>• Damage</li> <li>• wear</li> </ul>	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A		

**6.0 Insulated Tanks**

Item	Status	Item	Status
6.1 Does the inspection of the tank insulation exhibit: <ul style="list-style-type: none"> <li>• Missing sections</li> <li>• Areas of moisture</li> <li>• Mold</li> <li>• Damage</li> </ul>	<input type="checkbox"/> Yes* <input type="checkbox"/> No <input type="checkbox"/> N/A	6.2 Does the insulation cover or jacket exhibit damage that will allow water intrusion?	<input type="checkbox"/> Yes* <input type="checkbox"/> No <input type="checkbox"/> N/A

**7.0 Miscellaneous**

Item	Status	Item	Status
7.1 Are electrical boxes, conduit and wiring intact, sealed and secure?	<input type="checkbox"/> Yes <input type="checkbox"/> No*	7.3 Buried piping exposed?	<input type="checkbox"/> Yes* <input type="checkbox"/> No
7.2 Emergency disconnect is easily identifiable and shuts-off all power when actuated?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A	7.4 Out-of-service pipes capped or blank flanged?	<input type="checkbox"/> Yes <input type="checkbox"/> No* <input type="checkbox"/> N/A

**Comment/Corrective Action:**

---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---



---

**Inspector Signature:** \_\_\_\_\_

**Date:** \_\_\_\_\_