UNDERWATER SOLUTIONS INC.

INSPECTION AND CLEANING (SEDIMENT REMOVAL) OF THE 120,000-GALLON ELEVATED RIVETED STEEL WATER STORAGE TANK

VILLAGE OF INTERLAKEN D.P.W.
INTERLAKEN, NEW YORK

NOVEMBER 10, 2015

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SCOPE:

On November 10, 2015, Underwater Solutions Inc. inspected the 120,000-gallon elevated riveted steel potable water storage tank to provide information regarding the overall condition and integrity of this structure and removed the sediment accumulation found on the floor.

EXTERIOR INSPECTION:

The entire exterior of this water storage tank and all components was inspected, to include walls and coating, anchor bolts, concrete support footers, support components, center riser column, support legs, manway, ladders, catwalk, overflow, roof and hatch.

Walls And Coating

The exterior steel wall panels and the rivets that secure the panels together were inspected and found appearing sound and free of obvious fatigue (pitting) of the steel wall panels or deterioration of the rivets at this time.

The protective coating applied to the exterior steel sidewalls was found having poor adhesion value and is nearing expiration. Cracking, lifting and peeling of the coating applied to the tank walls has resulted in exposure of the primary coating throughout approximately 20% of these wall surfaces, while complete coating loss and steel exposure exists throughout approximately 20% of these walls at this time.

No obvious fatigue (pitting) of the steel wall panels was evident, rather mild to moderate surface corrosion exists at this time.

The majority of the steel rivets that secures the exterior wall panels together remain having good adhesion value, providing adequate protection for the rivets at this time.

During this inspection, the average Dry Film Thickness of the exterior wall panels was measured. The average dry film thickness of the protective coating that remains having good adhesion value on the exterior wall panels was found to measure 13.2 mils. The average dry film thickness of the exposed primary coating was found to measure 6.1 mils at this time.

The American Water Works Association (AWWA) recommends a dry film thickness of 7.0 to 10.0 mils of coating film thickness be applied to the exterior surfaces of riveted steel potable water storage tanks to provide adequate protection for riveted steel structures.

The protective coating applied to the bowl base was also found having poor adhesion value and is nearing expiration. Peeling of the coating has resulted in exposure of the underlying steel throughout approximately 10% of these surfaces at this time. No obvious fatigue (pitting) of these steel panels was evident, rather mild to moderate corrosion exists at this time.

The majority of the steel rivets that secures the bowl base panels together remain having good adhesion value, providing adequate protection for the rivets at this time.

Roof

The steel roof panels and the rivets that secure these panels together were also found appearing sound and free of obvious fatigue (pitting) of the steel panels or deterioration of the rivets at this time.

The protective coating applied to the steel roof panel and rivet surfaces is nearing expiration.

Peeling and lifting of the coating has resulted in exposure of the primary coating throughout approximately 10% of the panel surfaces, while complete coating loss has resulted in exposure of the underlying steel panel surfaces throughout approximately 25% of the roof panels and throughout approximately 5% of the rivets at this time.

No obvious fatigue (pitting) of the steel panels or deterioration of the rivets showing steel exposure was evident, rather mild to moderate corrosion exists at this time.

The average Dry Film Thickness of the exterior roof panels was measured. The average dry film thickness of the protective coating that remains having good adhesion value on the exterior roof panels was found to measure 9.7 mils. The average dry film thickness of the exposed primary coating was found to measure 2.3 mils at this time.

The American Water Works Association (AWWA) recommends a dry film thickness of 7.0 to 10.0 mils of coating film thickness be applied to the exterior surfaces of riveted steel potable water storage tanks to provide adequate protection for riveted steel structures.

Catwalk

A 22" wide riveted steel catwalk extends around the circumference of the bowl and was found securely riveted in place and appearing sound and free of obvious fatigue or failures at this time.

The 36" tall angle iron and flat bar safety railings bolted to this catwalk were found to be properly and securely installed and free of obvious fatigue or failures at this time.

The protective coating applied to the steel catwalk and safety railing surfaces has poor adhesion value and is nearing expiration. Peeling of the coating applied to these surfaces has resulted in exposure of the underlying steel throughout approximately 20% of these surfaces at this time.

No obvious fatigue or deterioration of these steel surfaces was evident, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the coating system applied to these surfaces within the areas of good adhesion was found to be 12.5 mils at this time.

Hatch

One, 24" by 24" steel hatch provides access to the tank interior through the roof.

This hatch was found in good working condition and was found secured with a steel pin secured to a chain, preventing accidental opening.

The protective coating applied to the interior and exterior surfaces of this steel hatch was found having poor adhesion value and is peeling. This condition has resulted in exposure of the underlying steel throughout approximately 10% of all surfaces of this hatch.

No obvious fatigue or deterioration of this steel hatch was evident, rather mild to moderate corrosion exists within the areas showing steel exposure at this time.

Overflow

A 4" inside diameter steel overflow pipe penetrates the top wall panel approximately 8" below the junction of where the roof and walls meet. This pipe extends away from the tank approximately 6" and extends through a 4" inside diameter 90° directing this pipe down, while being supported to the tank wall with two sets of bolted standoffs. This pipe then extends through the catwalk, continues down and is supported to the south-westernmost tower support leg with five stainless steel clamps and terminates approximately 5-1/2" above the concrete tower leg support footer.

Although the outlet end of this pipe was found to be slightly compressed, it remains un-obstructed, allowing for proper flow, while no screen found was installed at the end of this pipe at this time.

Anchor Bolts

The 1-1/2" diameter anchor bolts that extend up from a 96" by 96" by 12" tall concrete support footer at the base of each of the six tower support leg, through a steel plate welded to the base of each tower support leg, were found having one nut securely installed and appearing sound at this time.

The protective coating applied to this steel hardware was found showing a decline in film thickness, causing mild blotch rusting. Coating loss throughout less than 5% of the surfaces of each anchor bolt and associated nut has resulted in exposure of the underlying steel of this hardware.

No obvious fatigue or deterioration of these nuts and bolts was evident, rather mild surface corrosion exists at this time.

Center Riser Column, Support Legs And Concrete Support Footers

A 48" inside diameter welded steel center riser column was found appearing sound and free of obvious fatigue (pitting) of the steel at this time.

The protective coating applied to these welded steel surfaces was found showing a decline in film thickness, poor adhesion value and has nearly expired.

Peeling of the coating was observed throughout approximately 10% of the length of this riser column, resulting in exposure of the underlying steel. No obvious fatigue (pitting) of the steel was evident within these areas of steel exposure, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the coating system applied to these welded steel surfaces was found to measure 4.5 mils and is below the dry film thickness of 7.0 mils recommended by the American Water works Association.

The 72" by 72" by 10" tall concrete support footer located at the base of the center riser column was found having an area of concrete spall measuring approximately 36" in length by 4" in width and with an average maximum depth of 1-1/2" and has resulted in exposure of the reinforcement steel. The surrounding and underlying concrete within this area of spall remains sound, and although mild surface corrosion exists on the surfaces of the exposed reinforcement steel, no obvious fatigue or deterioration of this reinforcement steel was evident at this time.

An accumulation of mildew throughout the lower 20' of the center riser column has caused a reduction in the aesthetics of this structure.

Each of the six riveted steel H-beam steel tower support legs were found appearing sound and free of obvious fatigue or failures at this time.

The protective coating applied to each support leg was found having poor adhesion value and is peeling throughout approximately 10% of the surfaces of each support leg, resulting in exposure of the underlying steel.

No obvious fatigue (pitting) of the steel was evident within these areas of steel exposure, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the coating system applied to the tower support legs was found to average 12.1 mils at this time.

The 96" by 96" by 12" tall concrete support footer located at the base of each support leg were found having cracks throughout less than 5% of their surfaces. These cracks were found having an average length of 31" and having a maximum width 1/2" at this time. These cracks were sounded and found free of obvious voids or spalls at this time.

Support Components

Twelve, 6" by 6" steel cross member struts and eighteen, 1-1/2" diameter steel diagonal cross braces, to include the hardware that support these components in place, was inspected and found appearing sound, free of obvious fatigue or failures and securely installed at this time.

The protective coating applied to the surfaces of these steel components was found having poor adhesion value and is nearing expiration.

The protective coating applied to the steel cross member struts was found having poor adhesion value and is peeling, resulting in exposure of the underlying steel throughout approximately 5% of the surfaces of each cross member, to include the hardware that secures these cross members to the tower support legs.

No obvious fatigue (pitting) of these cross members was evident within the areas of steel exposure, while no obvious deterioration of the hardware (rivets) that secures these cross members in place was evident at this time.

The average dry film thickness of the coating system applied to these cross members was found to measure 11.7 mils at this time.

The protective coating applied to the steel diagonal cross braces was found having poor adhesion value and is peeling. This condition has resulted in exposure of the underlying steel throughout approximately 5% of the length of each diagonal brace and associated securing hardware.

No obvious fatigue or deterioration of these diagonal braces or securing hardware was evident within the areas of coating loss, rather mild surface corrosion exists at this time.

The average dry film thickness of the coating system applied to the diagonal braces was found to measure 9.8 mils at this time.

Manway

One, 16” by 12” inside diameter steel manway penetrates the center riser column, located approximately 30” above the riser column base and is securely installed and free of obvious leakage.

Secondary coating adhesion loss throughout approximately 10% the surfaces of the manway lid and securing bar has resulted in exposure of the underlying primary coating, while complete coating loss and steel exposure was observed throughout less than 5% of the 3” deep by 1” thick steel manway trunk, resulting in exposure of the underlying steel.

No obvious fatigue or deterioration of the manway trunk surfaces was evident within these areas of steel exposure, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the secondary coating that remains having good adhesion value was found to be 14.6 mils. The average dry film thickness of the exposed primary coating was found to be 3.9 mils at this time.

Ladders

Three welded steel ladders provide access to the roof of this water storage tank.

The bottom welded steel ladder extends from approximately 6' above the ground up to the catwalk and is supported to the easternmost tower support leg with ten sets of bolted standoffs.

A second welded steel ladder extends from the catwalk to the roof and is supported to the tank wall with three sets of bolted standoffs.

A third welded steel ladder extends from the edge of the roof up to the center of the roof and is supported to the 6" diameter riser tube of the 16" diameter finial ball located within the center of the roof. Two iron wheels bolted to the base of this ladder at the outside edge of the roof were found in good condition, allowing this ladder to rotate throughout the circumference of the roof

Each ladder was found to be properly and securely installed and free of obvious fatigue, while fall prevention systems do not exists on these ladders at this time.

The protective coating applied to each welded steel ladder was found having poor adhesion value. Cracking and peeling the coating applied to each ladder has resulted in exposure of the underlying steel surfaces throughout approximately 5% of each ladder. Although mild surface corrosion was evident within the areas of steel exposure found throughout these ladder surfaces, no obvious fatigue or deterioration of the ladder side rails or rungs was evident at this time.

INTERIOR INSPECTION:

The entire interior of this water storage tank and components was inspected, to include sediment accumulations, floor, piping, walls and coating, overhead, overflow and aesthetic water quality.

Sediment Accumulations

A non-uniform layer of accumulated precipitate having no measurable depth was found throughout the floor.

After completing this inspection, all precipitate was vacuumed from the floor.

Floor

After removing the accumulated precipitate, these steel floor panels and the rivets that secure these panels together were inspected and found appearing sound and free of obvious fatigue (pitting) of the steel panels or deterioration of the rivets at this time.

The protective coating applied to these steel panels and rivets was found having poor adhesion value and has expired.

Numerous coating blisters have ruptured, resulting in exposure of the underlying steel panel and rivet surfaces throughout approximately 30% of the floor at this time.

No obvious fatigue (pitting) of the steel panels or deterioration of the rivets was found within these 1/4" to 1" diameter areas of coating loss and steel exposure, rather moderate to heavy corrosion exists at this time.

The average dry film thickness of the coating system applied to the floor was found to measure 5.6 mils at this time.

The American Water Works Association (AWWA) recommends a dry film thickness of 10.5 to 15.5 mils of coating film thickness be applied to the interior surfaces of riveted steel potable water storage tanks to provide adequate protection for riveted steel structures.

Mild staining exists throughout all floor surfaces due to the accumulation of precipitate.

Piping

A 48" inside diameter pipe penetrates the center of the bowl and is flush within the tank floor.

This pipe penetration was free of obvious obstructions and was found without flow at the time of this inspection.

This riser pipe was not penetrated during this inspection due to OSHA confined space regulations, yet the coating system applied to these steel surfaces was well observed and found having poor adhesion value and is blistering, resulting in exposure of the underlying steel.

No obvious fatigue (pitting) of these steel surfaces was evident within these 1/8" to 1/4" diameter areas of coating loss and steel exposure, rather mild to moderate corrosion exists at this time.

Walls And Coating

The interior walls were inspected beginning at the floor and by spiraling the circumference of the tank bowl up to the water surface.

These steel wall panels, to include the rivets that secures the panels together, were inspected and found appearing sound and free of obvious fatigue (pitting) of the steel at this time.

The protective coating applied to these steel wall panel and rivet surfaces was found having poor adhesion value and has expired.

Adhesion loss consisting of blistering and peeling of the protective coating was observed throughout approximately 40% of all surfaces and was observed throughout all elevations of the interior wall panels and rivets, resulting in exposure of the underlying steel panel and rivet surfaces at this time.

No obvious fatigue (pitting) of the steel wall panels or deterioration of the rivets was evident within these 1/4" to 2” diameter to 8” by 10” areas of coating loss, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the coating system applied to the interior walls was found to measure 6.3 mils at the time of this inspection.

The American Water Works Association (AWWA) recommends dry film thickness of 10.5 to 15.5 mils of coating film thickness be applied to the interior surfaces of welded steel potable water storage tanks to provide adequate protection for the steel.

Very mild staining exists throughout the interior walls, extending from approximately 12” below overflow level down to the floor.

Overhead

All overhead panels, to include the spider supports, were inspected from the water surface.

These steel panels and the rivets that secure these panels together were found appearing sound and free of obvious fatigue of the steel panels or deterioration of the rivets at this time.

The protective coating applied to the steel overhead panels and rivets was found having poor adhesion value and has expired.

Peeling of the coating system was observed throughout approximately 40% of these surfaces, resulting in exposure of the underlying steel panel and rivet surfaces at this time. A decline in the coating film thickness has caused blotch rusting to show through the coating throughout approximately 20% of the surfaces at this time.

No obvious fatigue (pitting) of the steel panels or deterioration of the rivets was evident within these areas of coating loss and coating fatigue, rather mild to moderate corrosion and corrosion staining exists at this time.

Each of the twenty-four, 7/8" diameter steel spider support rods located at the junction of where the roof and walls meet that extend from the walls to a connecting plate within the center of this support were found appearing sound and properly installed at this time.

The protective coating applied to these surfaces was found having poor adhesion value and is peeling throughout approximately 60% of each support and connecting ring. Although corrosion was observed throughout these steel surfaces, no obvious fatigue or deterioration of these supports was evident art this time.

Overflow

The overflow consists of a 4" inside diameter pipe penetrating the top wall panel, located approximately 8" below the junction of where the roof and walls meet.

This overflow pipe extends into the tank through a 90° elbow directed up, having a 6" diameter bushing installed at its end, serving as a funnel and terminating approximately 6" below the junction of where the roof and walls meet.

This overflow pipe was free of obvious obstructions at the time this inspection was completed.

Aesthetic Water Quality

The aesthetic water quality was found to be good throughout this entire tank, allowing unlimited visibility for this inspection.

CONCLUSION:

It is the opinion of Underwater Solutions Inc. that that this riveted steel elevated potable water storage tank appeared mostly sound and free of obvious leakage, yet requires rehabilitation within the near future, as the exterior coating system has nearly expired and the interior coating system has expired, resulting in exposure of the underlying steel surfaces of this tank and support components.

The exterior riveted steel wall surfaces appeared sound, while no obvious fatigue (pitting) of the steel panels or deterioration of the rivets that secures the panels was evident at the time this inspection was completed.

The protective coating applied to these surfaces shows poor adhesion value and is nearing expiration. Cracking, lifting and peeling of the coating has resulted in exposure of the primary coating throughout approximately 20% of the walls, while complete coating loss has caused exposure of the underlying steel throughout approximately 20% of these surfaces at this time.

The average dry film thickness of the protective coating within the areas of good adhesion was found to measure 13.2 mils, while the average dry film thickness of the exposed primary coating was found to measure 6.1 mils at the time this inspection was completed.

The riveted steel roof surfaces also appeared sound, while no obvious fatigue (pitting) of the steel panels or deterioration of the rivets was evident at the time this inspection was completed.

The protective coating applied to the roof dome is nearing expiration and is lifting and peeling throughout approximately 10% of these surfaces. This condition has resulted in exposure of the underlying primary coating, while complete coating loss has caused exposure of the underlying steel panels throughout approximately 25% of the steel panels and approximately 5% of the rivets at this time.

No obvious fatigue (pitting) of the steel panels or deterioration of the rivets was evident in the areas of steel exposure, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the protective coating within the areas of good adhesion was found to measure 9.7 mils, while the average dry film thickness of the exposed primary coating was found to measure 2.3 mils at the time this inspection was completed.

The riveted steel surfaces of the bowl base appeared sound and free of obvious fatigue or failures at this time.

The protective coating applied to the bowl base was also found having poor adhesion value and is nearing expiration and is peeling. This condition has resulted in exposure of the underlying steel throughout approximately 10% of these surfaces, and although mild to moderate corrosion exists within these areas of steel exposure, no obvious fatigue (pitting) of these steel panels was evident at this time.

The American Water Works Association (AWWA) recommends dry film thickness of 7.0 to 10.0 mils of coating film thickness be applied to the exterior surfaces of welded steel potable water storage tanks to provide adequate protection for the steel.

The riveted steel catwalk and associated bolted steel safety railings that extends throughout the circumference of the bowl was found securely riveted in place and appearing sound at this time.

The protective coating applied to the steel catwalk and safety-railing surfaces was found having poor adhesion value and is nearing expiration. Peeling of the coating has caused exposure of the underlying steel throughout approximately 20% of these surfaces at this time.

No obvious fatigue or deterioration of these steel surfaces was evident, rather mild to moderate corrosion exists at this time.

The average dry film thickness of the coating system applied to these surfaces within the areas showing good adhesion value was found to measure 12.5 mils at this time.

The anchor bolts located at the base of each tower support leg were found to be securely installed, and although mild coating fatigue and minimal steel exposure was found on the surfaces of this steel hardware, no obvious fatigue of deterioration of these surfaces was evident a the time this inspection was completed.

All support components, tower support legs and center riser column appeared sound and free of obvious fatigue or failures at this time.

The protective coating applied to these steel support components, center riser column and tower legs was found having poor adhesion value and is nearing expiration.

Numerous areas of coating loss throughout all elevations of the tower support legs and center riser column has caused exposure of the underlying steel. Although mild to moderate corrosion was found within these areas of steel exposure, no obvious fatigue (pitting) of the steel was evident at this time. The average dry film thickness of the coating applied to the tower legs was 4.5 mils and the average dry film thickness of the coating applied to the tower legs was 12.1 mils at the time this inspection was completed.

The protective coating applied to the cross members and diagonal braces was also found having poor adhesion value and is peeling. This condition has resulted in isolated areas of coating loss and steel exposure throughout these surfaces, while no fatigue or failures of these supports was evident within the areas of steel exposure, yet mild to moderate corrosion exists at this time.

It is our recommendation that all exterior surfaces of the tank bowl, support components and associated exterior components be abrasive blasted to white or near white metal. We recommend then re-coating these surfaces in an effort to halt corrosion, prevent fatigue and provide good protection for the steel, while improving the aesthetics of this elevated potable water storage tank.

The outlet for the exterior overflow pipe was found without a screen, allowing access to the interior of this pipe/tank.

It is our recommendation to install a screen at the end of this pipe in an effort to prevent access.

The hatch that provides access to the tank interior through the roof remains in good working condition and was found secured with a pin, preventing accidental opening.

It is our recommendation to install a lock on this hatch in an effort to prevent unwanted access to the tank interior.

The three ladders that provide access to the tank roof were found without a fall prevention system.

It is our recommendation that when this tank is rehabilitated, that a fall prevention system or safety cage be installed on these ladders to allow safe access to the roof of this structure.

The interior riveted steel floor, wall and overhead surfaces to include the spider support rods were found appearing sound and free of obvious fatigue or failures at this time.

The protective coating applied to these surfaces has expired and no longer seals or provides protection for the steel panels of rivets that secures these panels together.

Blistering and peeling of the entire interior coating system has resulted in exposure of the underlying steel surfaces of the floor, walls and overhead, to include the rivets that secures these panels together. Although exposed steel showing corrosion exists throughout the entire interior of this tank, no obvious fatigue of the steel wall panels or associated rivets was evident at the time this inspection was completed.

It is our recommendation that all interior floor, wall, overhead and interior component surfaces be abrasive blasted to white or near white metal. We recommend then re-evaluating these surfaces to determine the extent of steel fatigue and developing a corrective action for structural rehabilitation.

We recommend then re-coating the entire interior and component surfaces of this tank within the next two years using an A.N.S.I. /N.S.F.61 approved coating for use in structures containing potable water in an effort to halt corrosion, prevent steel fatigue and to provide good protection for these riveted steel surfaces.

The pipe penetration within the floor of this structure was free of obvious obstructions at the time this inspection was completed.

As always, we recommend re-inspection and cleaning of all water storage facilities in accordance with state and federal mandates, A.W.W.A. standards, and be completed by an experienced and authorized inspection corporation.

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UNDERWATER SOLUTIONS INC.
Christopher A. Cole, Project Manager

This report, the conclusions, recommendations and comments prepared by Underwater Solutions Inc. are based upon spot examination from readily accessible parts of the tank. Should latent defects or conditions which vary significantly from those described in the report be discovered at a later date, these should be brought to the attention of a qualified individual at that time. These comments and recommendations should be viewed as information to be used by the Owner in determining the proper course of action and not to replace a complete set of specifications. All repairs should be done in accordance with A.W.W.A. and/or other applicable standards.

1 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

2 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

3 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

4 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

5 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

6 *Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)*

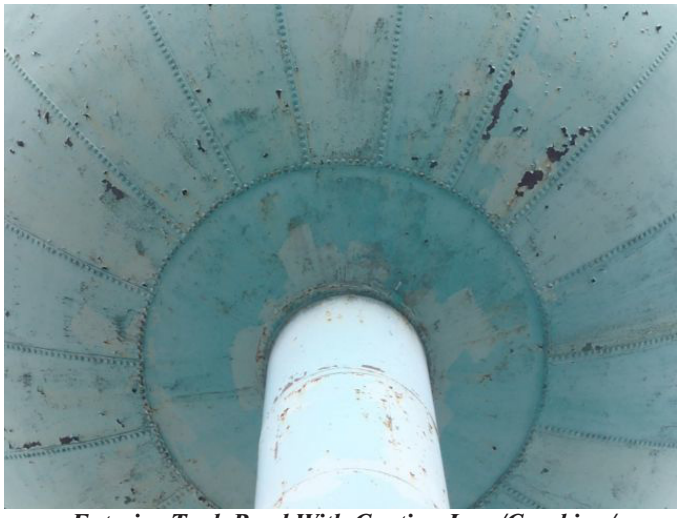
7 ***Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

8 ***Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

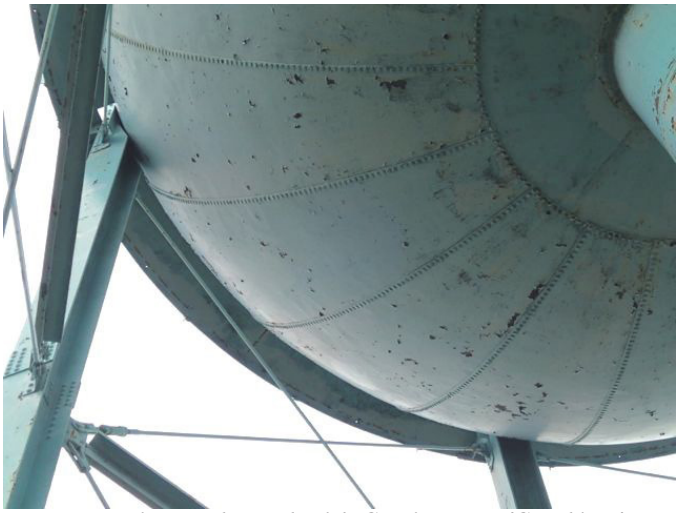
9 ***Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

10 ***Exterior Wall With Coating Loss/Cracking/Lifting/ Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

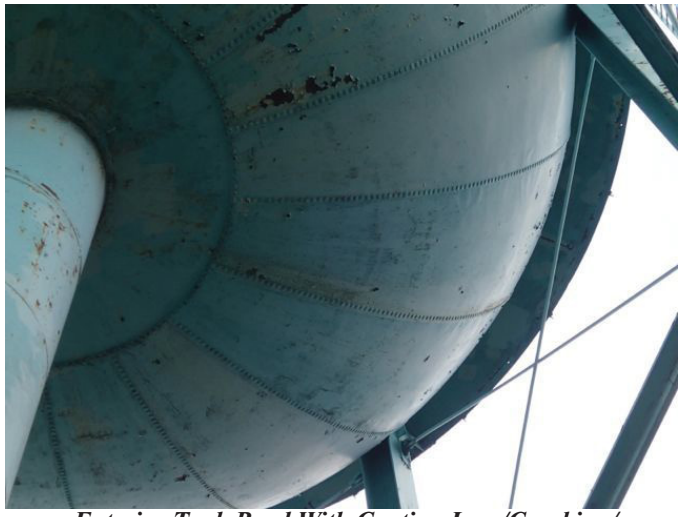
11 ***Exterior Tank Bowl With Coating Loss/Cracking/ Lifting/Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***



12 ***Exterior Tank Bowl With Coating Loss/Cracking/ Lifting/Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***



13 ***Exterior Tank Bowl With Coating Loss/Cracking/ Lifting/Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***



14 ***Exterior Tank Bowl With Coating Loss/Cracking/ Lifting/Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

15 ***Exterior Tank Bowl With Coating Loss/Cracking/ Lifting/Peeling, Exposed Primary Coating, Exposed Steel And Mild To Moderate Surface Corrosion (Nearing Expiration)***

16 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

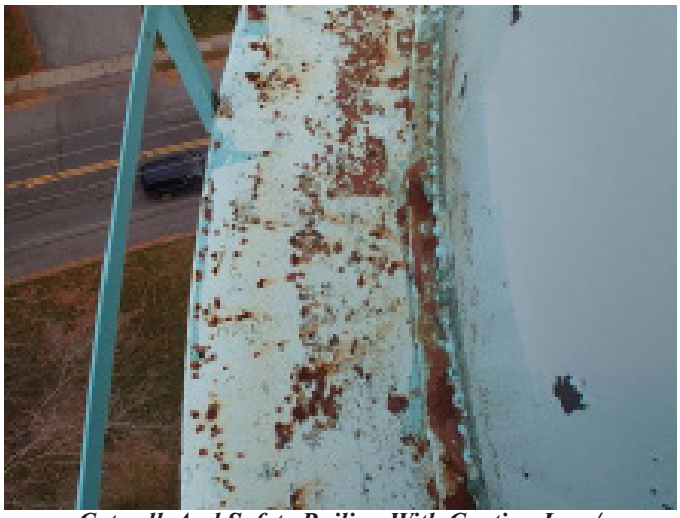
17 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

18 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

19 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

20 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

21 ***Roof Panels With Coating Loss/Peeling/Lifting, Exposed Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***



22 ***Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)***

23 ***Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)***

24 ***Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)***

25 *Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)*

26 *Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)*

27 *Catwalk And Safety Railing With Coating Loss/ Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)*

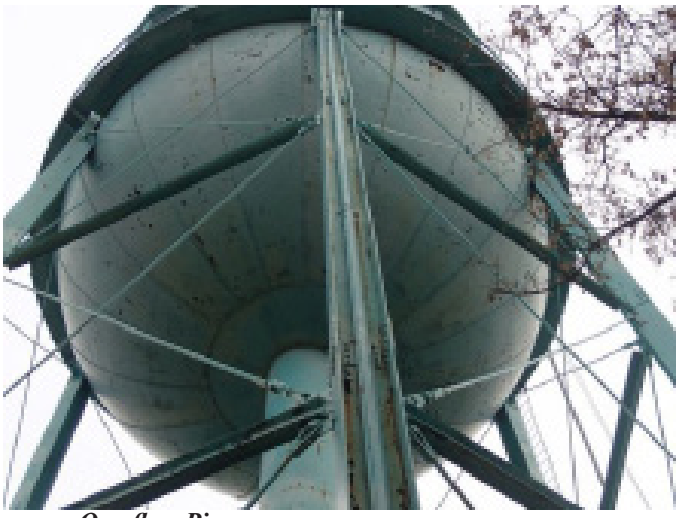
28 *Safety Railing With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate (Nearing Expiration)*

29 *Open Hatch With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion*

30 *Closed Hatch With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion*

31 ***Secure Hatch***

32 ***Overflow Pipe***



33 ***Overflow Pipe***

34 ***Un-Secure Overflow Pipe (No Screen)***

35 ***Anchor Bolt With Coating Loss, Mild Blotch Rusting, Exposed Underlying Steel And Mild To Moderate Corrosion***

36 ***Anchor Bolt With Coating Loss, Mild Blotch Rusting, Exposed Underlying Steel And Mild To Moderate Corrosion***

37 *Center Riser Column With Coating Loss/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mildew (Nearing Expiration)*

38 *Center Riser Column With Coating Loss/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mildew (Nearing Expiration)*

39 *Center Riser Column With Coating Loss/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mildew (Nearing Expiration)*

40 *Concrete Support Footer With Spall, Exposed Reinforcement Steel And Mild Surface Corrosion*

41 *Concrete Support Footer With Spall, Exposed Reinforcement Steel And Mild Surface Corrosion*

42 *Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)*

43 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

44 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

45 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

46 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

47 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

48 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

49 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

50 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

51 ***Support Leg With Coating Loss/Peeling, Exposed Underlying Steel And Mild To Moderate Corrosion (Nearing Expiration)***

52 ***Concrete Support Footer With Cracking***

53 ***Concrete Support Footer With Cracking***

54 ***Concrete Support Footer With Cracking***

55 *Concrete Support Footer With Cracking*

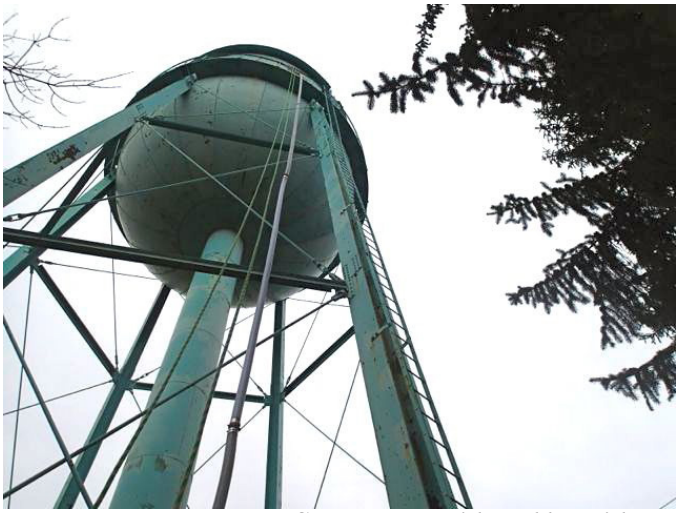
56 *Cross Member With Coating Loss/Peeling, Exposed Underlying Steel And Mild Surface Corrosion (Nearing Expiration)*

57 *Cross Member With Coating Loss/Peeling, Exposed Underlying Steel And Mild Surface Corrosion (Nearing Expiration)*

58 *Cross Member With Coating Loss/Peeling, Exposed Underlying Steel And Mild Surface Corrosion (Nearing Expiration)*

59 *Manway With Secondary Coating Loss, Exposed Underlying Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion*

60 *Manway With Secondary Coating Loss, Exposed Underlying Primary Coating, Exposed Underlying Steel And Mild To Moderate Corrosion*



61 *Easternmost Tower Support Leg With Ladder With Coating Loss/Cracking/Peeling, Exposed Underlying Steel And Mild Surface Corrosion*

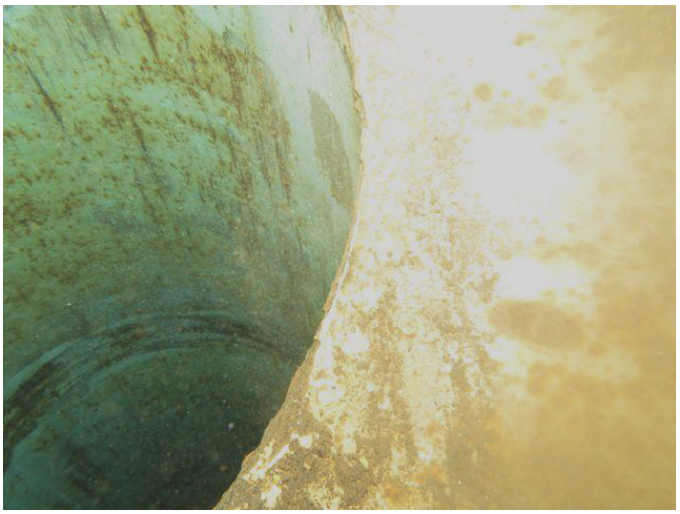
62 *Ladder With Coating Loss/Cracking/Peeling, Exposed Underlying Steel And Mild Surface Corrosion*

63 *Ladder With Coating Loss/Cracking/Peeling, Exposed Underlying Steel And Mild Surface Corrosion*

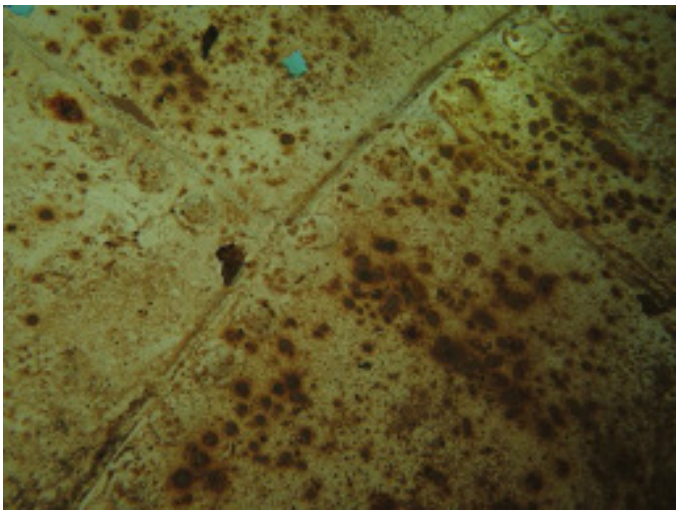
64 *Roof Access Ladder And Finial Ball*

65 *Immeasurable Sediment*

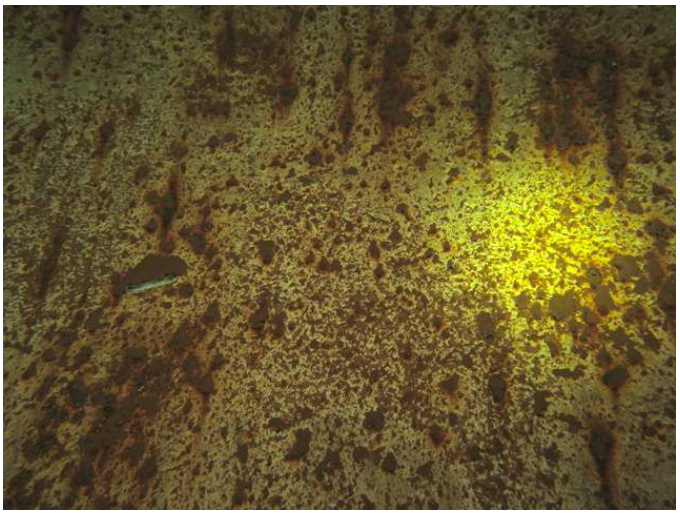
66 *Immeasurable Sediment*



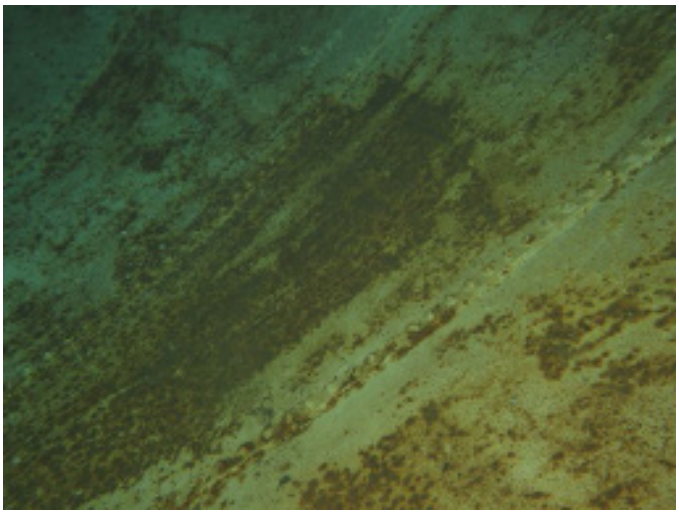
67 ***Immeasurable Sediment***



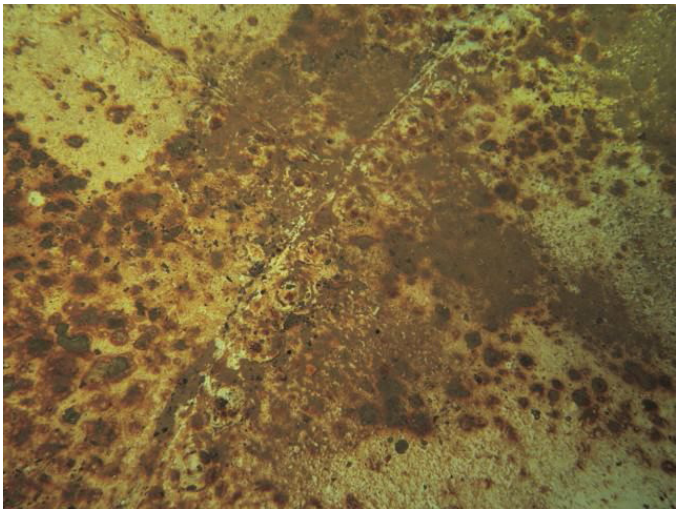
68 ***Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)***



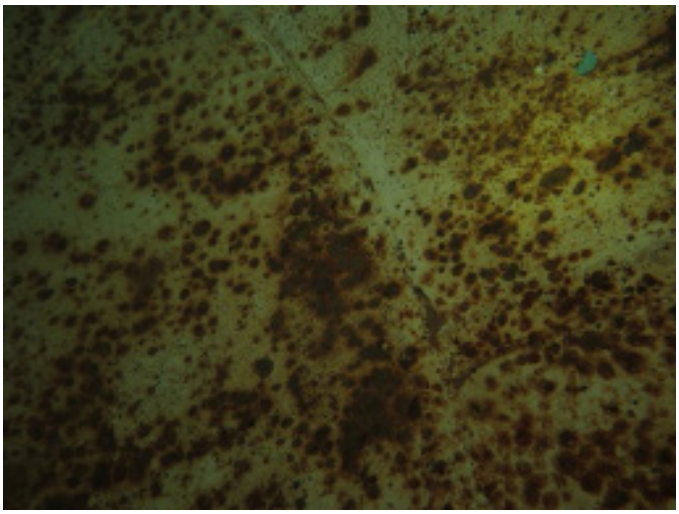
69 ***Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)***



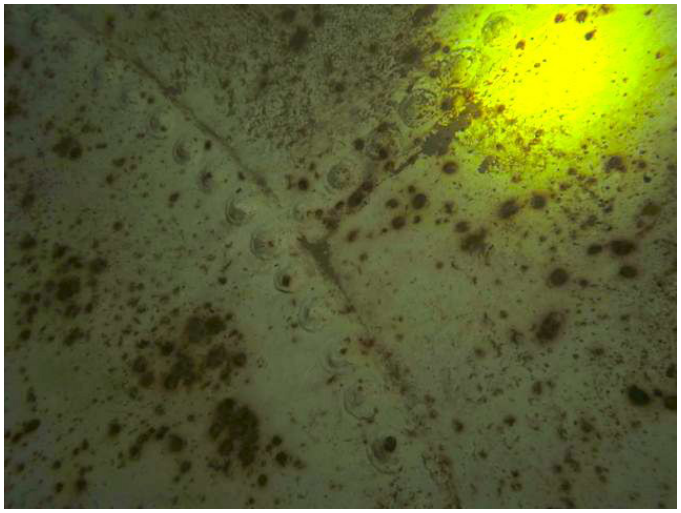
70 ***Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)***



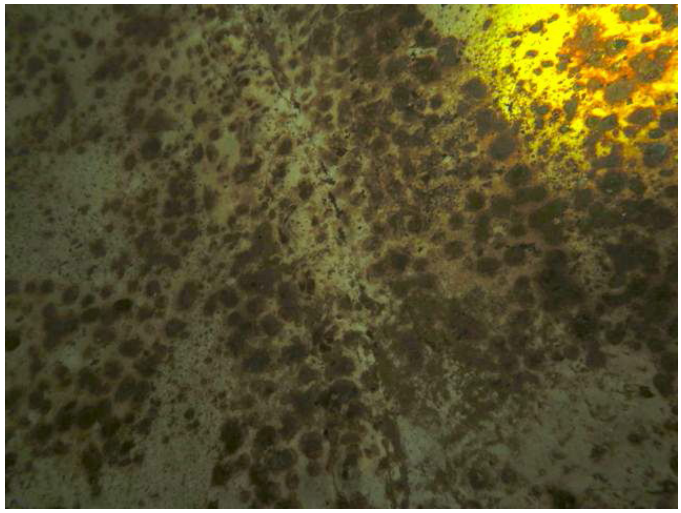
71 ***Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)***



72 ***Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)***



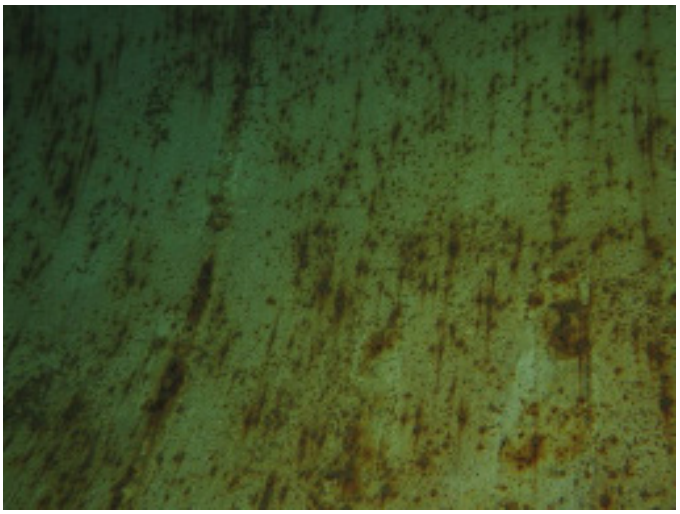
73 *Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)*



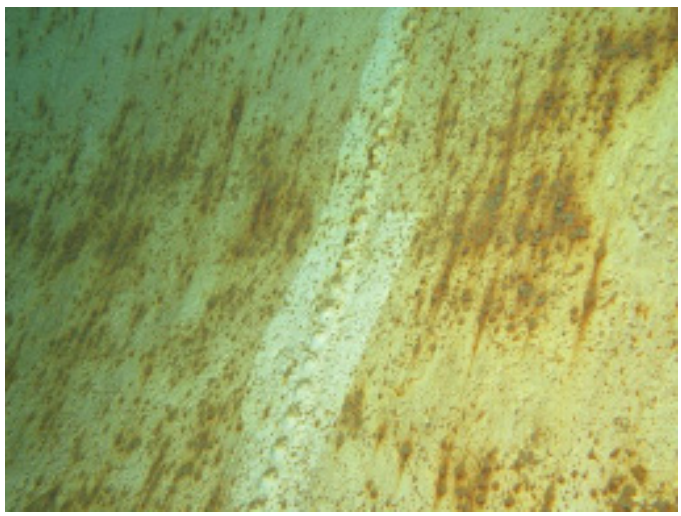
74 *Floor With Coating Loss, Ruptured Coating Blisters, Exposed Underlying Steel, Moderate To Heavy Corrosion And Mild Staining(Expired)*

75 *Flush Pipe With Coating Loss/Blisters, Exposed Underlying Steel And Mild To Moderate Corrosion*

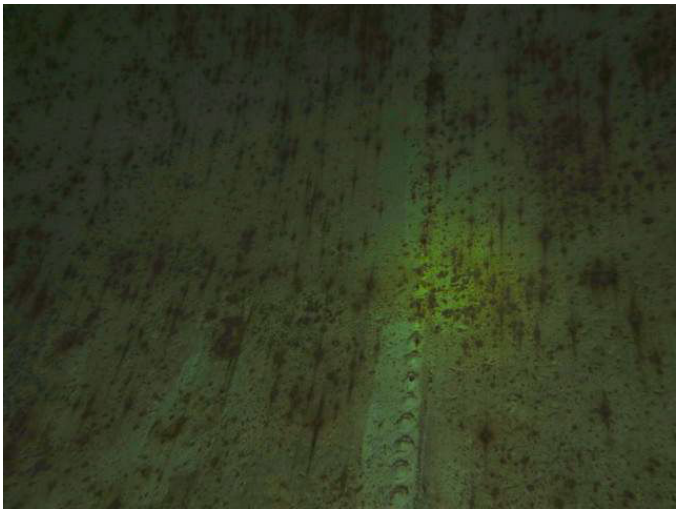
76 *Flush Pipe With Coating Loss/Blisters, Exposed Underlying Steel And Mild To Moderate Corrosion*



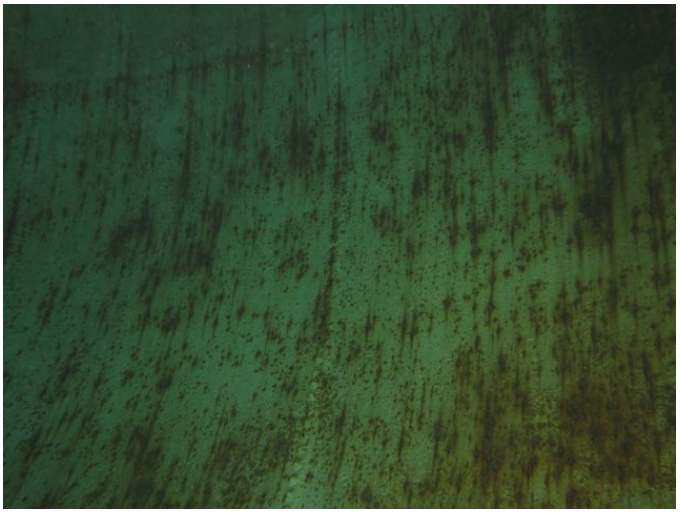
77 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*



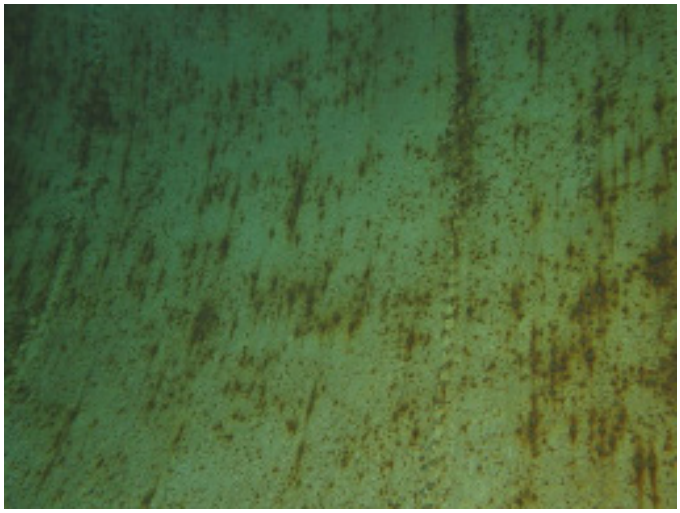
78 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*



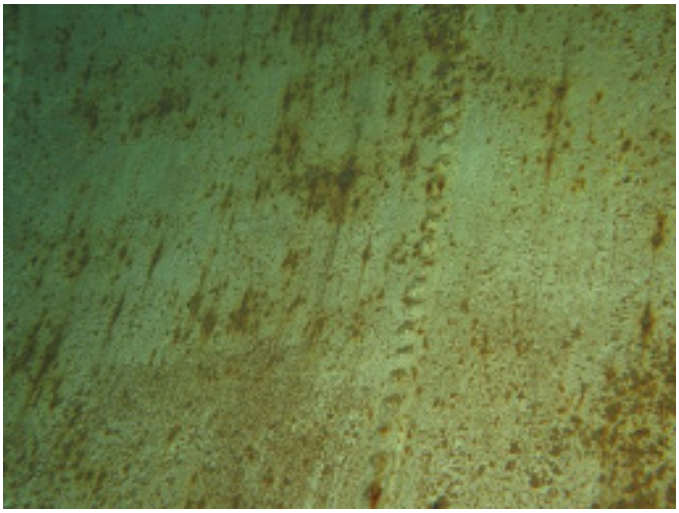
79 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



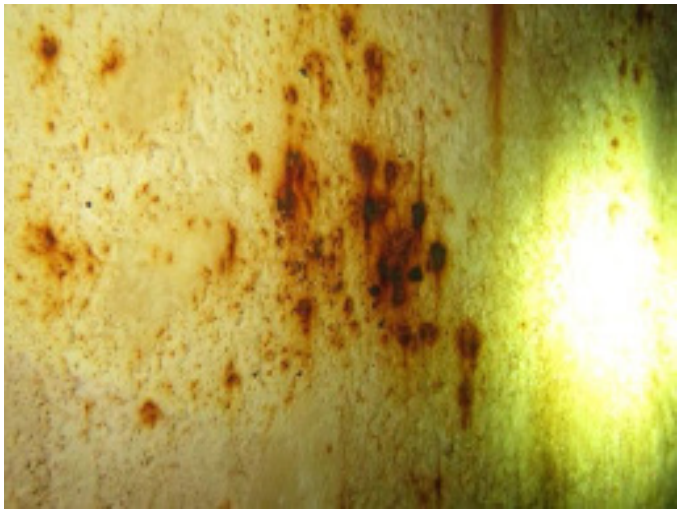
80 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



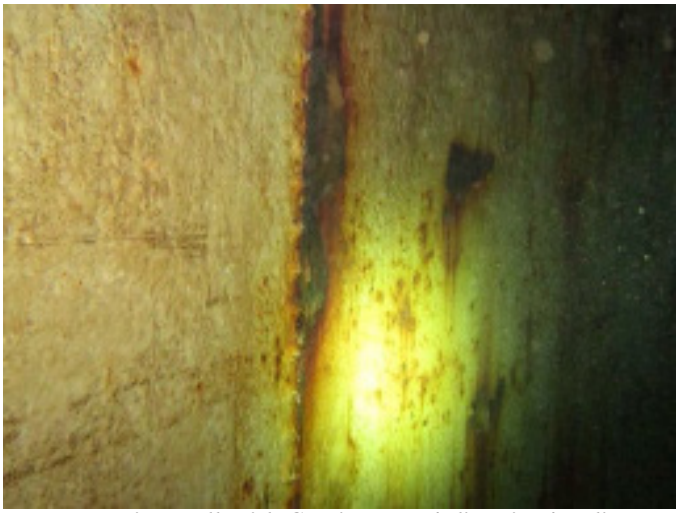
81 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



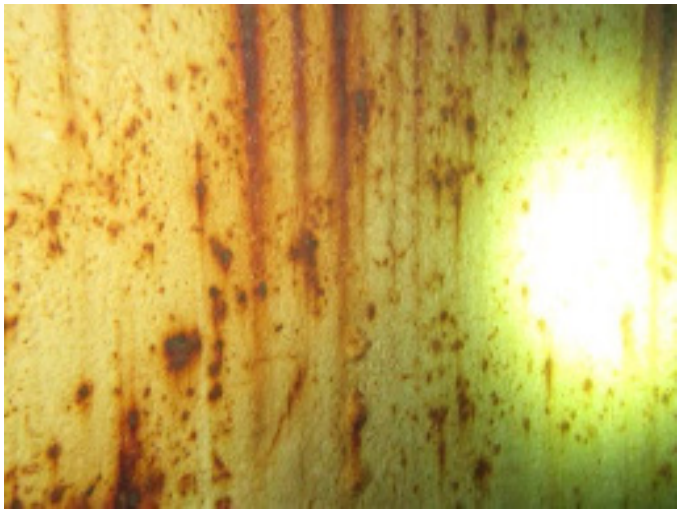
82 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



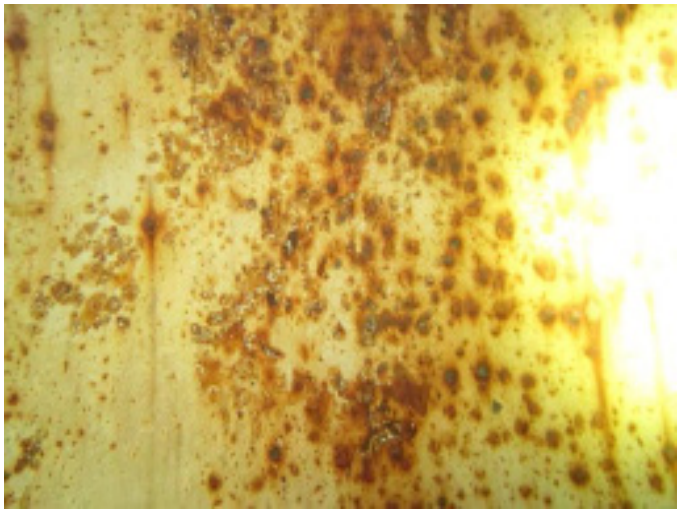
83 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



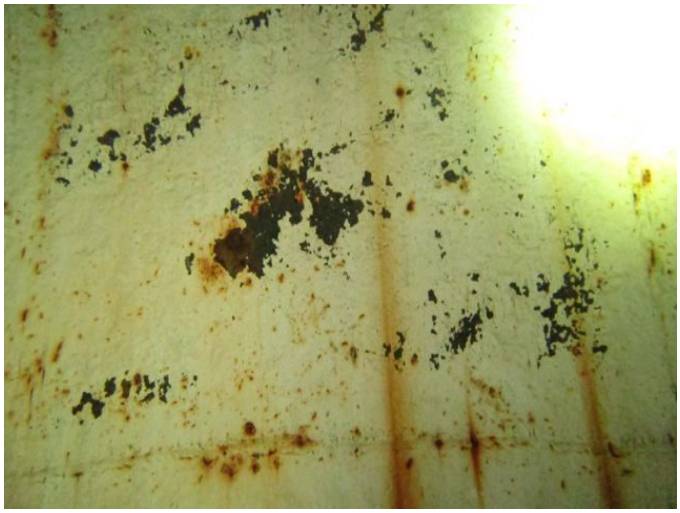
84 ***Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)***



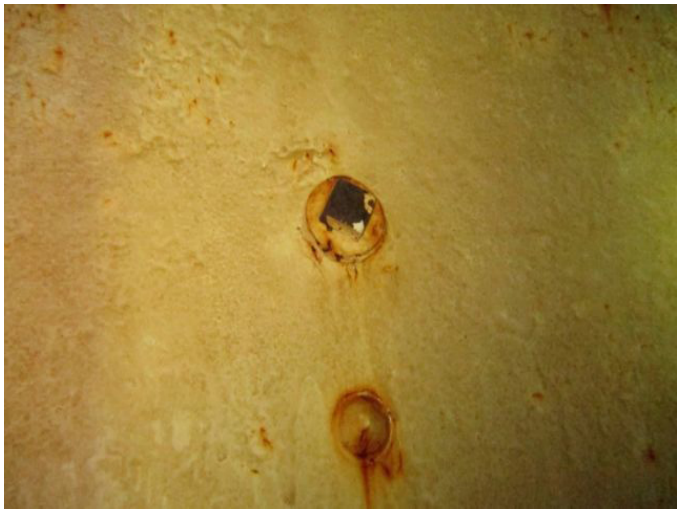
85 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*



86 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*

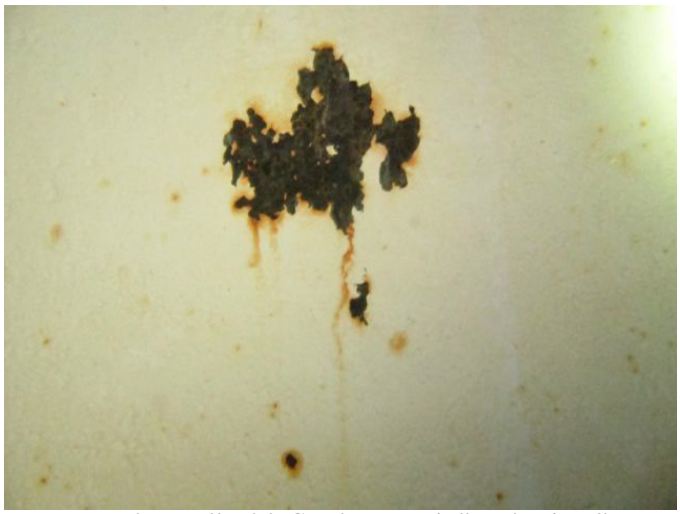


87 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*

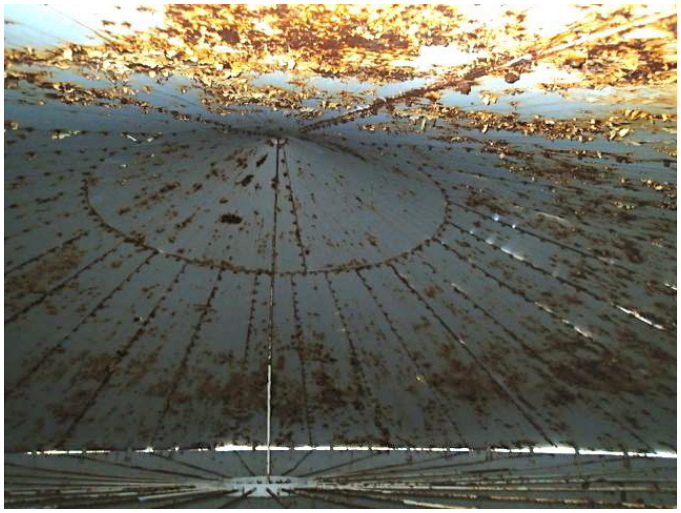


88 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*

89 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*



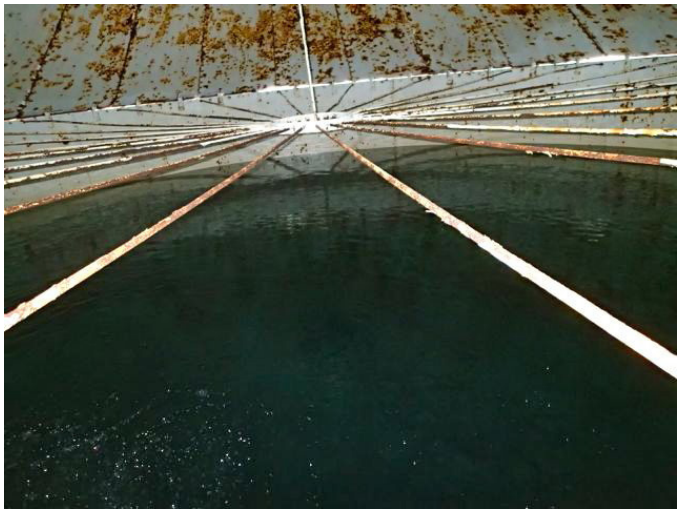
90 *Interior Wall With Coating Loss/Blistering/Peeling, Exposed Underlying Steel, Mild To Moderate Corrosion And Mild Staining (Expired)*



91 ***Overhead With Coating Loss/Peeling, Exposed Underlying Steel, Blotch Rusting And Mild To Moderate Corrosion And Staining***

92 ***Overhead With Coating Loss/Peeling, Exposed Underlying Steel, Blotch Rusting And Mild To Moderate Corrosion And Staining***

93 ***Overhead With Coating Loss/Peeling, Exposed Underlying Steel, Blotch Rusting And Mild To Moderate Corrosion And Staining***



94 ***Overhead Steel Spider With Coating Loss/Peeling, Exposed Underlying Steel, Blotch Rusting And Mild To Moderate Corrosion And Staining***

95 ***Overflow Pipe***

96 ***Discharge During Cleaning***