

COMMONWEALTH OF PENNSYLVANIA
Before The
ENVIRONMENTAL HEARING BOARD

COMMONWEALTH OF PENNSYLVANIA, :
DEPARTMENT OF ENVIRONMENTAL :
PROTECTION, :

Plaintiff, :

v. :

EQT Production Company, :

Defendant. :

EHB Docket No. 2014 - _____

NOTICE TO DEFEND

If you wish to defend against the claims set forth in the following pages, you must take action within 30 days after this complaint and notice are served, by entering a written appearance personally or by attorney and filing in writing with the Board your answers, defenses or objections to the claims set forth against you. You are warned that if you fail to do so the case may proceed without you and a judgment may be entered against you by the Board without further notice for any claim or relief requested by the Department.

YOU SHOULD TAKE THIS PAPER TO YOUR LAWYER AT ONCE. IF YOU DO NOT HAVE A LAWYER OR CANNOT AFFORD ONE, CONTACT THE SECRETARY TO THE BOARD AT (717)787-3483.

COMMONWEALTH OF PENNSYLVANIA
Before The
ENVIRONMENTAL HEARING BOARD

COMMONWEALTH OF PENNSYLVANIA,	:	
DEPARTMENT OF ENVIRONMENTAL	:	
PROTECTION,	:	
	:	
Plaintiff,	:	EHB Docket No. 2014 - _____
	:	
v.	:	
	:	
EQT Production Company,	:	
	:	
Defendant.	:	

COMPLAINT FOR CIVIL PENALTIES

The Commonwealth of Pennsylvania, Department of Environmental Protection (hereinafter "Department"), hereby files this Complaint for Civil Penalties, pursuant to Section 605 of The Clean Streams Law, 35 P.S. § 691.605; and 25 Pa. Code § 1021.71, and avers as follows:

Parties

1. The Department is the agency with the duty and authority to administer and enforce The Clean Streams Law, Act of June 22, 1937, P.L. 1987, as amended, 35 P.S. §§ 691.1-691.1001 ("Clean Streams Law"); Section 1917-A of the Administrative Code of 1929, Act of April 9, 1929, P.L. 177, as amended, 71 P.S. §§ 510-17 ("Administrative Code"); and the rules and regulations promulgated thereunder.
2. EQT is a Pennsylvania Corporation, having its principal office and place of business located at 625 Liberty Avenue, Suite 1700, Pittsburgh, PA 15222.

Jurisdiction

3. The Environmental Hearing Board has jurisdiction over this matter pursuant to Section 4 of the Environmental Hearing Board Act, 35 P.S. § 7514, and Section 605 of The Clean Streams Law, 35 P.S. § 691.605.

Factual Background

4. EQT owns and operates a natural gas well facility known as the Phoenix Pad S (Exhibits A and B), which includes a well pad and impoundment, authorized by, *inter alia*, Department Permits numbered ESX10-117-0223 and 117-21148, and located in Duncan Township, Tioga County, Pennsylvania.

5. Pad S is located in the Rock Run watershed, which is designated by the Department's regulations as High Quality ("HQ"). 25 Pa. Code § 93.91.

6. In documents dated October 12, 2010, and submitted to the Department in support of a permit application, EQT describes the fluid containment structure (identified in those documents as "Impoundment 2") to be constructed at Pad S as a "6 million gallon freshwater impoundment."

7. The construction of Impoundment 2 encompassed blasting areas of the sandstone bedrock. After constructing Impoundment 2 (Exhibits A and B) in the fall of 2011, EQT expressed its intent to change the use of Impoundment 2 from a "freshwater impoundment" to use as a well site "pit" to store flowback fluid from Marcellus drilling operations for reuse in completion operations.

8. On January 11, 2012, the Department inspected the Pad S location and discovered three to five cubic yards of solid material placed in Impoundment 2. EQT informed the Department that the material was soil contaminated by drilling mud from a release at their Pad C. The Department issued a Notice of Violation ("NOV") to EQT on January 23, 2012 for unpermitted storage of residual waste.

9. On January 18, 2012, the Department met with EQT to discuss EQT's proposal to construct a centralized wastewater impoundment adjacent to Impoundment 2. EQT requested that the Department allow it to construct the proposed centralized wastewater impoundment prior to actually applying for or receiving the permit to do so, due to EQT's need to utilize the impoundment in early 2012. The Department did not agree to this request.

10. On April 30, 2012, EQT obtained water samples from groundwater Monitoring Wells 1 ("MW-1") and 5 ("MW-5") (Exhibit A), which showed unusually high conductivity (3,216 micro mhos ("umhos") in MW-1 and > 4,000 umhos in MW-5). EQT installed those monitoring wells to assess groundwater in connection with EQT's proposal to build the centralized wastewater impoundment.

11. On May 7, 2012, EQT notified the Department of the high chloride concentrations detected in MW-1 and MW-5 from the sampling event on April 30, 2012 (996 mg/l in MW-1 and 6,640 mg/l in MW-5). Department staff informed EQT of its concerns regarding the integrity of Impoundment 2 at that time.

12. On May 9, 2012, in response to a reported flowback fluid release that occurred on May 8, 2012, the Department inspected Impoundment 2 and an adjacent area where EQT proposed to build the centralized wastewater impoundment at Pad S, and found the following:

- a. An estimated 300 to 500 gallons of flowback fluid was released onto the ground in a channel along the east side of the impoundment access road (Exhibit B);
- b. The release occurred while pumping flowback fluid from Impoundment 2 through a 12-inch line to the gas well pad to be utilized for hydraulic fracturing;
- c. The 12-inch line, which was reused from another site, had a 2-inch hole in the bottom that had not been patched, and the line had not been pressure tested prior to beginning the flowback fluid transfer;
- d. The flowback fluid traveled south for approximately 250 to 300 feet down the length of the channel and into a rock apron located near the Pad S limit of disturbance, and evidence of a flow path into the woods was observed beyond the rock apron and Pad S limit of disturbance; and,
- e. Field conductivity measurements of standing puddles indicated the release was primarily confined to the channel, but a puddle was located outside the channel near the point of release from the 12-inch line.

13. The Department's May 9, 2012 inspection report included a NOV for the following:

- a. Failure to contain pollutional substances and wastes from completion of the well(s) in a pit, tank, or series of pits and tanks, in violation of 25 Pa. Code § 78.56(a);
- b. Creating the potential to pollute waters of the Commonwealth, in violation of Section 402 of The Clean Streams Law, 35 P.S. § 691.402; and,
- c. The unpermitted discharge of residual waste onto the ground, in violation of Section 301 of the Solid Waste Management Act, 35 P.S. § 6018.301.

14. On May 10, 2012, the Department inspected Impoundment 2 to verify the status of EQT's cleanup of the release and found the following:

- a. The entire length of the impacted channel had been excavated;
- b. A 3-foot deep sump excavated off the end of the rock apron was full of black liquid;
- c. Standing water was observed in the excavation at the top of the channel, near the point of release from the 12-inch line;
- d. Two seeps with elevated conductivity emerged from the side wall of the excavated channel from the direction of the southeast corner of Impoundment 2; and,
- e. Additional truckloads of flowback fluid were being deposited into Impoundment 2.

15. Between May 14 and May 16, 2012, the Department observed additional truckloads of flowback fluid being deposited into Impoundment 2.

16. On May 18, 2012, the Department advised EQT that Impoundment 2's liner may be compromised, and the Department requested EQT to: evaluate the origins of the seeps with elevated conductivity; evaluate the integrity of the liner; and ensure that all water from the seeps was captured and handled properly.

17. In correspondence provided by EQT to the Department, on May 22, 2012, EQT's consultant, Casselberry and Associates, referred to a proposed "hydrogeologic investigation of the extent of the groundwater contamination caused by the leaks from the reserve pit"

18. On May 24, 2012, EQT informed the Department that "6 to 7" holes were observed in the liner of Impoundment 2, in the northeast corner where the transfer of fluids had been occurring. This area with the holes in the liner was also in the area where the contaminated soil was deposited in the impoundment on January 11, 2012. The holes were discovered by EQT on May 21, 2012, during a visual inspection of the liner, and, according to EQT, the transfer of flowback fluid from Pad C to Impoundment 2 was ceased upon that discovery.

19. On May 30, 2012, EQT notified the Department that groundwater with high conductivity was detected for the first time in: Monitoring Well-2 ("MW-2") (Exhibit A), which was installed to monitor groundwater in connection with the proposed centralized wastewater impoundment; and in a spring located 250 feet northeast and downgradient from MW-2 (the "Northeast Spring").

20. At 9:40 p.m. on May 30, 2012, EQT reported to the Department that Impoundment 2 was leaking.

21. On May 31, 2012, the Department inspected Impoundment 2 and found the following:

- a. The Northeast Spring (Exhibit A) showed high conductivity when field tested by EQT's consultant (>30,000 umhos/cm) and by the Department (>19,990 umhos/cm);
- b. Trees and shrubs along the spring discharge flow path were stressed, as evidenced by yellowing/brown leaves and some defoliation;
- c. Stressed vegetation further downgradient beyond the end of the flow path;
- d. Elevated field conductivity measurements in Rock Run, an unnamed tributary to Rock Run, and a seep entering a large upstream wetland;
- e. Fluid was being removed from Impoundment 2, but this removal ceased at approximately noon; and,
- f. EQT stated that the hydraulic fracturing of the Phoenix 590935 well, assigned permit number 37-117-21115, was expedited to use most of the flowback fluid

in Impoundment 2, and that any remaining flowback fluid would be removed and transported to tanks on Phoenix Pad E.

22. The Department's May 31, 2012 inspection report included a NOV for the following:

- a. Failure to contain polluttional substances from the drilling, altering or completing of the well(s) in a pit, tank or series of pits and tanks, in violation of 25 Pa. Code § 78.56(a);
- b. The unpermitted discharge of production fluids, an industrial waste, into waters of the Commonwealth, in violation of Section 301 of The Clean Streams Law, 35 P.S. § 691.301;
- c. The unpermitted discharge of industrial waste into waters of the Commonwealth, in violation of Section 307 of The Clean Streams Law, 35 P.S. § 691.307;
- d. The unpermitted discharge of polluttional substances into waters of the Commonwealth, in violation of Section 401 of The Clean Streams Law, 35 P.S. § 691.401; and,
- e. The unpermitted discharges of residual waste, in violation of Section 301 of the Solid Waste Management Act, 35 P.S. § 6018.301.

23. EQT started pumping fluid from Impoundment 2 to the well pad for use in hydraulic fracturing of the 590935 gas well on June 1, 2012, at approximately 7:00 p.m.

24. On June 4, 2012, EQT's consultant, Casselberry and Associates, identified new seeps of flowback fluid along the west side of Impoundment 2 ("West Seeps") (Exhibits A and B).

25. Between June 1, 2012 and June 8, 2012, the Department inspected Impoundment 2 six (6) times to collect field conductivity measurements and to assess the extent of the flowback fluid release. During those inspections, the Department:

- a. Noted that Impoundment 2 was being drained, and seep fluid was being captured by trenches and sumps; and,
- b. Observed stressed and dying vegetation west of Impoundment 2 for the first time on June 4, 2012 and June 5, 2012.

26. On June 6, 2012, the Pennsylvania Fish and Boat Commission ("PFBC") installed data loggers to capture continuous temperature and conductivity readings in Rock Run and in the unnamed tributary at Station A (also known as Sand Spring) and Station W, where the Department had proposed routine sampling.

27. On June 7, 2012, the Department documented its discovery of two (2) new seeps of flowback fluid in an area labelled the "Danzer Seeps." (Exhibit A).

28. On June 7, 2012, EQT finished constructing the "West Trenches" to collect the West Seeps.

29. On June 11, 2012, the Department inspected Impoundment 2, collected field conductivity measurements, and found the following:

- a. Impoundment 2 had been drained, its liner was being pressure washed, and sediment in the bottom of the pit was being solidified for off-site disposal;
- b. Approximately 75-100 holes, as estimated by EQT, were observed in the liner; and,
- c. EQT had installed conductivity recorders in the West Trench sumps.

30. The Department's June 11, 2012 inspection report included a NOV for the following:

- a. Failure to maintain an impermeable pit or tank that contains polluttional substances, in violation of 25 Pa. Code § 78.56(a)(4);
- b. Failure to manage a pit, when a liner becomes torn or otherwise loses its integrity, to prevent the pit's contents from leaking, in violation of 25 Pa. Code § 78.56(a)(4)(iv); and,
- c. Failure to take necessary measures to prevent polluttional substances from directly or indirectly reaching waters of the Commonwealth, in violation of 25 Pa. Code § 91.34(a).

31. On June 12, 2012, the Department inspected Impoundment 2 and found the following:

- a. The holes in the liner appeared to have been made by punctures up through the liner, rather than down into the subgrade material; and,
- b. EQT stated that it had discovered the holes on June 8, 2012, when emptying Impoundment 2.

32. On June 13, 2012, the Department started routine weekly sampling. Between June 13, 2012 and June 27, 2012, the Department inspected Impoundment 2 six (6) times to document field measured conductivity and assess the extent of the flowback fluid release. During those inspections, the Department noted that sumps to capture fluids from the Danzer Seeps were being excavated, and that field-measured conductivity in the unnamed tributary to Rock Run remained elevated.

33. On June 22, 2012, EQT submitted its site characterization plan to the Department, which documented that EQT found more than 200 holes in the bottom of the Impoundment 2 liner.

34. In the month of July 2012, the Department inspected Impoundment 2 nine (9) times to complete field conductivity monitoring and routine sampling and to assess the extent of the unpermitted release of flowback fluid from the Impoundment. During that month, the Department documented the continued presence of stressed vegetation.

35. In the month of August 2012, the Department inspected Impoundment 2 ten (10) times to complete field conductivity monitoring and routine sampling.

36. On August 2, 2012, the Department conducted both an aerial inspection and a field inspection of Impoundment 2 to assess the extent of the impacts to the environment caused by the unpermitted release of flowback fluid from the Impoundment. Aerial photographs depicted the extent of stressed, defoliated, and dead vegetation previously documented from the field. The following was documented:

- a. Stressed Beech saplings were observed adjacent to the west side of the impoundment access road;
- b. Mature trees in the wooded area south of the impoundment were beginning to show signs of stress, including leaves turning brown from the outer edges inward;
- c. Two new separate clusters of stressed vegetation were located south of the proposed centralized impoundment. The most apparent of these appeared to be in line with the Danzer Seeps;
- d. Stressed vegetation was observed in the area of the West Seeps (Exhibit C) and Northeast Spring; and,
- e. That further investigation of the impacted areas south of the current and proposed impoundments was necessary to fully characterize the pollution and address the impacts to the environment caused by the unpermitted release of flowback fluid from the Impoundment.

37. On August 9, 2012, the Department inspected the Phoenix Pad S and found the following:

- a. Fluid was seeping out from beneath a patched, unbermed liner and discharging onto the ground in the northeast corner of the well pad where a row of tanks was staged; and,
- b. Elevated conductivity was measured in the wetland off the east corner of the pad and in ponded water located at a nearby bedrock outcropping.

38. The Department's August 9, 2012 inspection report included a NOV for, among other things, the following:

- a. The unpermitted discharge of residual waste, in violation of Section 301 of the Solid Waste Management Act, 35 P.S. § 6018.301;

- b. The unpermitted discharge of industrial waste into waters of the Commonwealth, in violation of Section 307 of The Clean Streams Law, 35 P.S. § 691.307;
- c. The unpermitted discharge of a pollutorial substance into waters of the Commonwealth, in violation of Section 401 of The Clean Streams Law, 35 P.S. § 691.401; and,
- d. The unpermitted discharge of industrial waste into waters of the Commonwealth, in violation of Section 301 of The Clean Streams Law, 35 P.S. § 691.301.

39. In a letter, dated August 10, 2012, the Department requested additional information from EQT concerning the extent of the unpermitted release of flowback fluid from Impoundment 2. The request specifically covered the information collected by EQT's consultant in connection with an evaporation/leak study, documentation of fluids delivered to and hauled out of Impoundment 2, and the results of EQT's forensic study of the pit liner.

40. On August 20, 2012, EQT began installing monitoring wells MW-7 through MW-15. (Exhibit A) These were the first wells installed to investigate the impacts to groundwater impacts from the unpermitted release of flowback fluid.

41. On August 28, 2012, EQT provided some, but not all, of the information requested in the Department's letter of August 10, 2012. EQT did not provide the: data underlying the conclusions set forth in its evaporation/leak study; any records regarding fluid deliveries or withdrawals between April 30, 2012, and May 2, 2012; and complete results of EQT's forensic study of the pit liner.

42. In September 2012, the Department inspected Impoundment 2 six (6) times to complete field conductivity monitoring and routine sampling. On September 7, 2012, EQT submitted for the first time the results of surface water sampling conducted since the start of the investigation in May 2012. The Department also documented that the removal of the liner from the south half of the Impoundment floor had been completed on September 12, 2012, and excavation of the soils on the Impoundment floor had begun.

43. On September 24, 2012, the first round of sample results from wells MW-7, MW-8S, MW-8D, MW-9, MW-11, and MW-12 showed elevated concentrations of chloride and other constituents of flowback fluid.

44. On September 24, September 25, and September 26, 2012, the Department inspected Phoenix Pad S and found the following:

- a. A sump discharge with elevated conductivity, located in the southeast corner of the well pad, was first observed by the Department on September 24, 2012;
- b. The Department notified EQT by e-mail of the discharge on September 24, 2012, and requested EQT to contain the discharge and identify the source;

- c. The sump discharge was sampled on September 25, 2012, and it did not appear that EQT had implemented any remedial containment measures;
- d. Sample results from September 24, 2012 and September 25, 2012 showed elevated chlorides, sulfate, and strontium in the discharge; and,
- e. Field conductivity was still elevated when EQT personnel on site were shown the discharge on September 26, 2012.

45. The Department's September 26, 2012 inspection report included a NOV for, among other things, the following:

- a. Creating the potential to pollute waters of the Commonwealth, in violation of Section 402 of The Clean Streams Law, 35 P.S. § 691.402; and,
- b. The unpermitted discharge of residual waste into waters of the Commonwealth, in violation of Section 301 of the Solid Waste Management Act, 35 P.S. § 6018.301.

46. On October 9, 2012, PFBC conducted a fish survey at a historic sampling site in Rock Run to document any changes to the fish community since its previous survey conducted in August 2005. The results of the October 2012 survey showed a brook trout population estimate of 996 per hectare which was much lower than the 2005 estimate of 2,187 brook trout per hectare. The results of the October 2012 survey also showed a brook trout biomass of 5.12 kg/hectare which was much lower estimate than the 2005 survey results that showed 36.17 kg/hectare.

47. In December 2012, PFBC ceased its continuous temperature and conductivity monitoring in Rock Run and the unnamed tributary at Stations A and W. PFBC's data demonstrated that elevated conductivity (>150 umhos/cm) had been present in all locations downstream of the discharge. Elevated conductivity was present in the unnamed tributary at Station W for at least 150 days between June 2012 and November 2012.

48. Between October 2012 and July 2013, the Department inspected Impoundment 2 twenty (20) times to complete field conductivity monitoring and routine sampling and to observe EQT's work on reclaiming Impoundment 2. The Department completed an additional aerial inspection May 31, 2013 which documented that the adverse impacts to vegetation from the unpermitted release of flowback fluid from Impoundment 2 were still present (Exhibit B).

49. On July 1, 2013, EQT's consultant, Groundwater Sciences Corporation, reported that reclamation of Impoundment 2 was completed.

50. On November 27, 2013, monitoring well MW-22 (Exhibit A) was installed to further define the extent of groundwater contamination. Results from samples collected on December 23, 2013, showed elevated concentrations of chloride and other constituents of flowback fluid.

51. EQT's unpermitted release of flowback fluid through multiple holes in the liner continuously entered the groundwater beneath Impoundment 2 until EQT drained the Impoundment. EQT's flowback fluid flowed, migrated, seeped, and leached from the Impoundment 2 site in different directions, and that fluid continues to enter into and pollute a number of surface waters downgradient of Impoundment 2. Those surface waters include the unnamed tributary to Rock Run, Rock Run, the Danzer Seeps (Number 1 and Number 2), the West Seeps (Upper and Lower), and the North Spring.

52. As of the date of this Complaint, waters of the Commonwealth continue to be polluted from the unpermitted release of flowback fluid and/or its constituents from Impoundment 2 to groundwater and surface waters (Exhibits D through H). Surface and groundwater monitoring and remediation are ongoing.

53. Since April 30, 2012, to the date of this Complaint, the Department, as part of its investigation in this case, has conducted at least 65 inspections, collected at least 200 water samples, and incurred at least \$112,296.00 in costs and expenses.

The Clean Streams Law

54. EQT is a "person" as defined by Section 1 of The Clean Streams Law, 35 P.S. § 691.1.

55. Rock Run and the unnamed tributary to Rock Run are each a "Water of the Commonwealth" as defined by Section 1 of The Clean Streams Law, 35 P.S. § 691.1.

56. The groundwater under and surrounding Impoundment 2 is a "Water of the Commonwealth" as defined by Section 1 of The Clean Streams Law, 35 P.S. § 691.1.

57. Flowback fluid from Marcellus drilling operations is an "industrial waste" as defined by Section 1 of The Clean Streams Law, 35 P.S. § 691.1.

58. All persons who discharge industrial waste must first obtain a permit from the Department to discharge industrial waste in any manner, directly or indirectly, into waters of the Commonwealth, pursuant to Sections 301 and 307 of The Clean Streams Law, 35 P.S. §§ 691.301 and 691.307.

59. Flowback fluid from Marcellus drilling operations is a "pollutant" as defined by 25 Pa. Code § 91.1. Flowback water from Marcellus drilling operations is also a "substance of [a] kind or character resulting in pollution," as that phrase is used in Section 401 of The Clean Streams Law, 35 P.S. § 691.401.

60. The presence of flowback fluid from Marcellus drilling operations in any water of the Commonwealth, constitutes "pollution" as defined by Section 1 of The Clean Streams Law,

35 P.S. § 691.1. To the extent that flowback water from Marcellus drilling operations, and/or its constituents, continues to be present in any water of the Commonwealth after the date that this Complaint is filed with the Environmental Hearing Board, the pollution continues, and EQT continues to incur liability for additional penalties.

61. The presence of flowback fluid from Marcellus drilling operations in the groundwater under and surrounding Impoundment 2 constitutes "pollution" as defined by Section 1 of The Clean Streams Law, 35 P.S. § 691.1. To the extent that flowback water from Marcellus drilling operations, and/or its constituents, continues to be present in the groundwater under and surrounding Impoundment 2 after the date that this Complaint is filed with the Environmental Hearing Board, the pollution continues, and EQT continues to incur liability for additional penalties.

62. Section 401 of The Clean Streams Law, 35 P.S. § 691.401, states in relevant part that

It shall be unlawful for any person ... to put or place into any of the waters of the Commonwealth, or to allow or permit to be discharged from property owned or occupied by such a person ... into any of the waters of the Commonwealth, any substance of any kind or character resulting in pollution as herein defined. Any such discharge is hereby declared to be a nuisance.

63. Section 1 of The Clean Streams Law, 35 P.S. § 691.1, defines pollution as:

contamination of any waters of the Commonwealth such as will create or is likely to create a nuisance or to render such waters harmful, detrimental or injurious to public health, safety or welfare, or to domestic, municipal, commercial, industrial, agricultural, recreational, or other legitimate beneficial uses to livestock, wild animals, birds, fish or other aquatic life, including but not limited to such contamination by alteration of the physical, chemical or biological properties of such waters, or change in temperature, taste, color or odor thereof, or the discharge of any liquid, gaseous, radioactive, solid or other substance into such waters.

64. The Environmental Hearing Board sets the penalty amount pursuant to Section 605 of The Clean Streams Law, 35 P.S. § 691.605, by considering the willfulness of the violation, the damage or injury to waters of the Commonwealth and their uses, the cost to the Department of enforcing the provisions of the Act, cost of restoration, deterrent effect, and other relevant factors.

COUNT I

VIOLATIONS OF SECTIONS 301 AND 307 OF THE CLEAN STREAMS LAW

65. Paragraphs 1 through 64, above, are incorporated herein as though fully set forth.

66. EQT has violated, and continues to violate, Sections 301 and 307 of The Clean Streams Law, 35 P.S. §§ 691.301 and 691.307, by, without a permit or other authorization of the Department:

- a. placing or permitting the placement of flowback fluid from Marcellus drilling operations and/or its constituents into the unnamed tributary to Rock Run, Rock Run, the Danzer Seeps (Number 1 and Number 2), the West Seeps (Upper and Lower), and the North Spring;
- b. discharging or permitting the flow of flowback fluid from Marcellus drilling operations and/or its constituents into the unnamed tributary to Rock Run, Rock Run, the Danzer Seeps (Number 1 and Number 2), the West Seeps (Upper and Lower), and the North Spring;
- c. discharging or permitting the discharge of flowback fluid from Marcellus drilling operations and/or its constituents, directly and/or indirectly, the unnamed tributary to Rock Run, Rock Run, the Danzer Seeps (Number 1 and Number 2), the West Seeps (Upper and Lower), and the North Spring;
- d. placing or permitting the placement of flowback fluid from Marcellus drilling operations and/or its constituents into the groundwater under and surrounding Impoundment 2;
- e. discharging or permitting the flow of flowback fluid from Marcellus drilling operations and/or its constituents into the groundwater under and surrounding Impoundment 2; and,
- f. discharging or permitting the discharge of flowback fluid from Marcellus drilling operations and/or its constituents, directly and/or indirectly, into the groundwater under and surrounding Impoundment 2.

67. EQT's discharging or permitting the discharge of industrial waste, or permitting the placement and/or flow of flowback fluid from Marcellus drilling operations and/or its constituents into the groundwater under and surrounding Impoundment 2, or into any other water of the Commonwealth, was not authorized by any permit or regulation, and thereby constitutes violations of Sections 301 and 307 of The Clean Streams Law, 35 P.S. §§ 691.301 and 691.307, and a nuisance under the same sections.

68. Analytical results from samples collected between April 30, 2012 through June 26, 2014 (the most recent sampling event for which data has been submitted) continue to demonstrate that flowback fluid from Marcellus drilling operations and/or its constituents are entering into, and therefore impacting, waters of the Commonwealth.

WHEREFORE, the Department respectfully requests the Environmental Hearing Board to assess a civil penalty pursuant to Section 605(a) of The Clean Streams Law, 35 P.S. § 691.605(a), in the amount of up to and including TEN THOUSAND DOLLARS (\$10,000.00) per day for each day that:

- a. Prior to the filing of this complaint, EQT placed, discharged, or permitted the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate; and
- b. Beginning October 8, 2014, EQT continues to place, discharge, or permit the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate.

COUNT II

VIOLATIONS OF SECTION 401 OF THE CLEAN STREAMS LAW

69. Paragraphs 1 through 68, above, are incorporated herein as though fully set forth.

70. EQT did and continues to, without any permit and in violation of Section 401 of The Clean Streams Law, 35 P.S. § 691.401, put or place flowback fluid and/or its constituents into waters of the Commonwealth.

71. EQT did and continues to, in violation of Section 401 of The Clean Streams Law, 35 P.S. § 691.401, allow or permit flowback fluid and/or its constituents to be discharged to waters of the Commonwealth.

72. Analytical results from samples collected between April 30, 2012 through June 26, 2014 (the most recent sampling event for which data has been submitted) continue to demonstrate that flowback fluid from Marcellus drilling operations and/or its constituents are impacting waters of the Commonwealth

WHEREFORE, the Department respectfully requests the Environmental Hearing Board to assess a civil penalty pursuant to Section 605(a) of The Clean Streams Law, 35 P.S. § 691.605(a), in the amount of up to and including TEN THOUSAND DOLLARS (\$10,000.00) per day for each day that:

- a. Prior to the filing of this complaint, EQT placed, discharged, or permitted the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate; and
- b. Beginning October 8, 2014, EQT continues to place, discharge, or permit the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate.

COUNT III

UNLAWFUL CONDUCT CAUSING WATER POLLUTION
UNDER SECTION 611 OF THE CLEAN STREAMS LAW

73. Paragraphs 1 through 72, above, are incorporated herein as though fully set forth.
74. Section 611 of The Clean Streams Law, 35 P.S. § 691.611, provides in relevant part that “[i]t shall be unlawful ... to cause air or water pollution.”

75. Section 1 of The Clean Streams Law, 35 P.S. § 691.1, defines pollution as:

contamination of any waters of the Commonwealth such as will create or is likely to create a nuisance or to render such waters harmful, detrimental or injurious to public health, safety or welfare, or to domestic, municipal, commercial, industrial, agricultural, recreational, or other legitimate beneficial uses to livestock, wild animals, birds, fish or other aquatic life, including but not limited to such contamination by alteration of the physical, chemical or biological properties of such waters, or change in temperature, taste, color or odor thereof, or the discharge of any liquid, gaseous, radioactive, solid or other substance into such waters.

76. EQT has caused, and continues to cause, water pollution to waters of the Commonwealth in that EQT has rendered such waters harmful, detrimental or injurious to public health, safety or welfare, and/or to domestic, municipal, commercial, industrial, agricultural, recreational or other legitimate beneficial uses, and/or livestock, wild animals, birds, fish or other aquatic life.

77. EQT has caused, and continues to cause, water pollution to waters of the Commonwealth in that EQT has altered the chemical and biological properties of waters of the Commonwealth.

78. EQT has caused, and continues to cause, pollution to waters of the Commonwealth by discharging liquid, gaseous, solid or other substances into waters of the Commonwealth.

WHEREFORE, the Department respectfully requests the Environmental Hearing Board to assess a civil penalty pursuant to Section 611 of The Clean Streams Law, 35 P.S. § 691.611, in the amount of up to and including TEN THOUSAND DOLLARS (\$10,000.00) per day for each day that EQT placed, discharged, or permitted the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate.

COUNT IV

VIOLATIONS OF THE CLEAN STREAMS LAW,
RULES AND REGULATIONS 25 PA. CODE § 91.34

79. Paragraphs 1 through 78, above, are incorporated herein as though fully set forth.
80. 25 Pa. Code § 91.34(a), provides that persons engaged in an activity which includes the impoundment, production, processing, transportation, storage, use, application or disposal of pollutants shall take necessary measures to prevent the substances from directly or indirectly reaching waters of the Commonwealth through accident, carelessness, maliciousness, hazards of weather or from another cause.
81. EQT is engaged in the impoundment, storage, use, and application of flowback fluid.
82. EQT knew or should have known that careless use of its 6 million gallon impoundment would likely result in the release of flowback fluid to the environment, including waters of the Commonwealth.
83. EQT failed to take measures necessary to prevent flowback fluid and/or its constituents from directly and/or indirectly reaching waters of the Commonwealth by failing to:
- a. Cease the deposition of fluids into Impoundment 2 after detecting elevated levels of chlorides and other constituents of flowback fluid in groundwater near Impoundment 2 on April 30, 2012;
 - b. Take active measures to remove fluid from Impoundment 2 after the detection of elevated levels of chlorides and other constituents of flowback fluid in groundwater near Impoundment 2 on April 30, 2012;
 - c. Promptly define the extent of impacts from flowback fluid and/or its constituents to waters of the Commonwealth;
 - d. Ensure that all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2 were adequately trained;
 - e. Ensure that all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2 were properly advised of the nature and limitations of Impoundment 2's liner;
 - f. Ensure that all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2 took adequate measures to avoid compromising the integrity of Impoundment 2's liner;
 - g. Ensure that all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2 were advised of the potential consequences if proper practices were not followed

when depositing fluids into Impoundment 2 or withdrawing fluids from Impoundment 2;

- h. Advise all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2 of the potential consequences if proper practices were not followed when depositing fluids into Impoundment 2 or withdrawing fluids from Impoundment 2; and,
- i. Supervise properly all personnel depositing fluids into Impoundment 2, withdrawing fluids from Impoundment 2, or treating fluids within Impoundment 2.

84. Analytical results from samples collected from April 30, 2012 through June 26, 2014 (the most recent sampling event for which data has been submitted) continue to demonstrate that flowback fluid from Marcellus drilling operations and/or its constituents are adversely impacting waters of the Commonwealth

WHEREFORE, the Department respectfully requests the Environmental Hearing Board to assess a civil penalty pursuant to Section 605(a) of The Clean Streams Law, 35 P.S. § 691.605(a), for violations of 25 Pa. Code § 91.34 in the amount of up to and including TEN THOUSAND DOLLARS (\$10,000.00) per day for each day that EQT placed, discharged, or permitted the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate.

Department's Consolidated Statement of Proposed Penalty

85. Pursuant to Section 605 of The Clean Streams Law, 35 P.S. § 691.605, the Board is to consider specific factors in determining the appropriate amount of the penalty to be imposed upon one who violates the statute, regulations, or orders of the Department. Those factors are "the willfulness of the violation, damage or injury to waters of the Commonwealth or their uses, cost of restoration, and other relevant factors." *Id.*

86. "Other relevant factors" include costs incurred by the Department, savings to the violator and a deterrent effect. *Commonwealth, DEP v. Leeward Construction, Inc.*, 2001 EHB 870.

87. The injuries inflicted on waters of the Commonwealth, and the uses of those waters of the Commonwealth, are fully set forth in the preceding paragraphs. As pled in counts I through IV above, the Department believes and therefore avers that civil penalties in the amount of at least \$4,532,296 are warranted for those violations and injuries to waters of the Commonwealth.

88. As of the date of filing this complaint, the Department is without information to determine how much EQT saved as a result of these violations, but this amount, to be determined through discovery, should be included in the penalty assessed by this Honorable Board.

89. This Honorable Board, therefore, should impose a civil penalty of at least \$4,532,296.00, which includes the Department's costs referenced in paragraph 88, plus the savings realized by EQT.

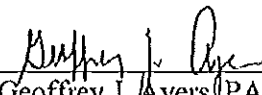
WHEREFORE, the Department respectfully requests the Environmental Hearing Board to assess a civil penalty pursuant to Section 605(a) of The Clean Streams Law, 35 P.S. § 691.605(a), in the amount of up to and including TEN THOUSAND DOLLARS (\$10,000.00) per day for each day that:

- a. Prior to the filing of this complaint, EQT placed, discharged, or permitted the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate; and
- b. Beginning October 8, 2014, EQT continues to place, discharge, or permit the flow of flowback fluid from Marcellus drilling operations and/or its constituents into waters of the Commonwealth, together with costs incurred by the Department and such other relief the Board deems appropriate.

Respectfully submitted,

COMMONWEALTH OF PENNSYLVANIA,
DEPARTMENT OF ENVIRONMENTAL
PROTECTION,

Dennis A. Whitaker
PA I.D. No. 53975
Chief Counsel



Geoffrey J. Ayers, PA I.D. No. 63888
Regional Counsel
208 West Third Street
Williamsport, PA 17701

Date: October 7, 2014

Exhibit A: Monitoring well and surface water sampling locations.

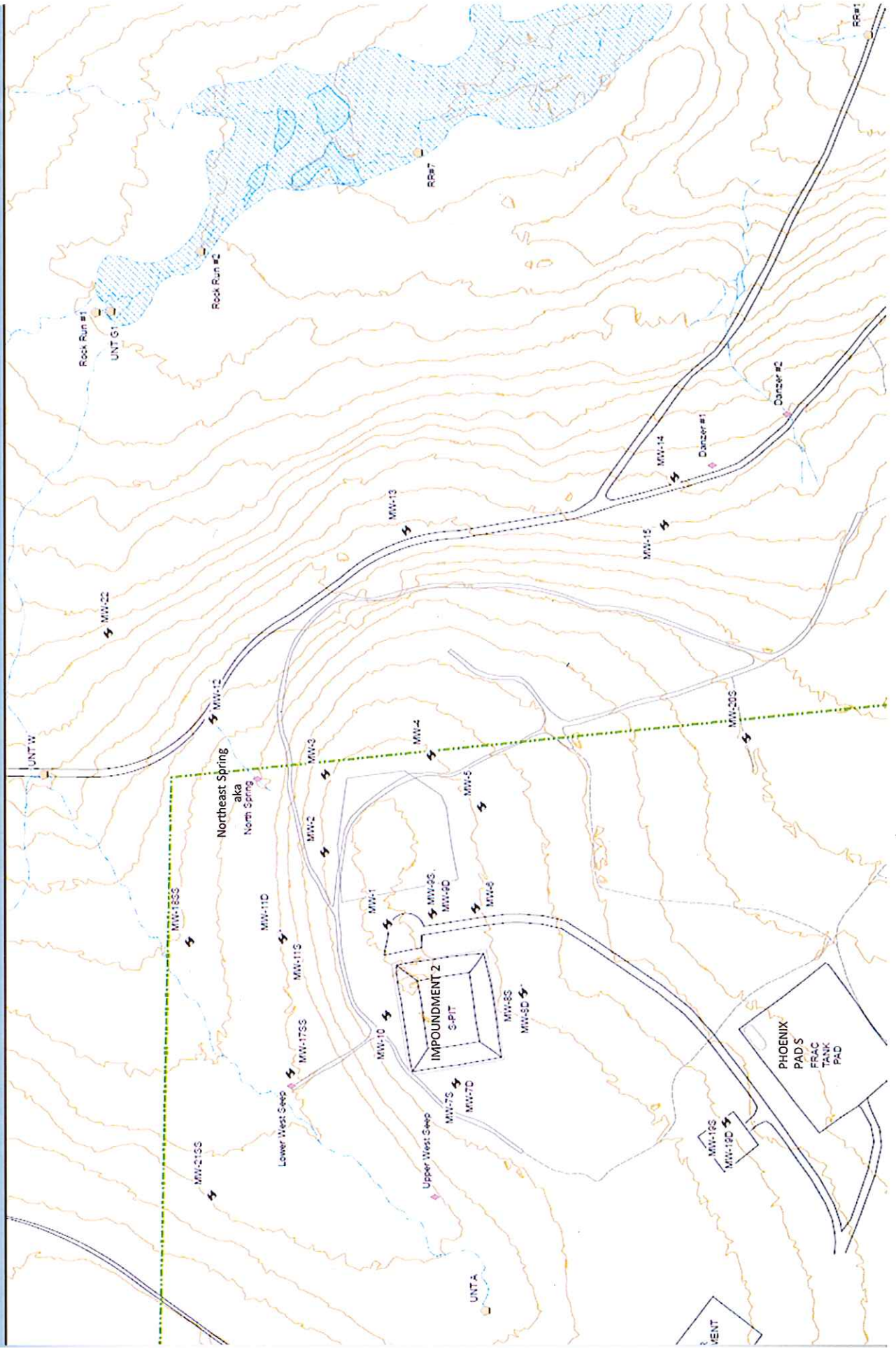


Exhibit B: EQT Phoenix Pad S site overview. Photo taken 5/31/13.

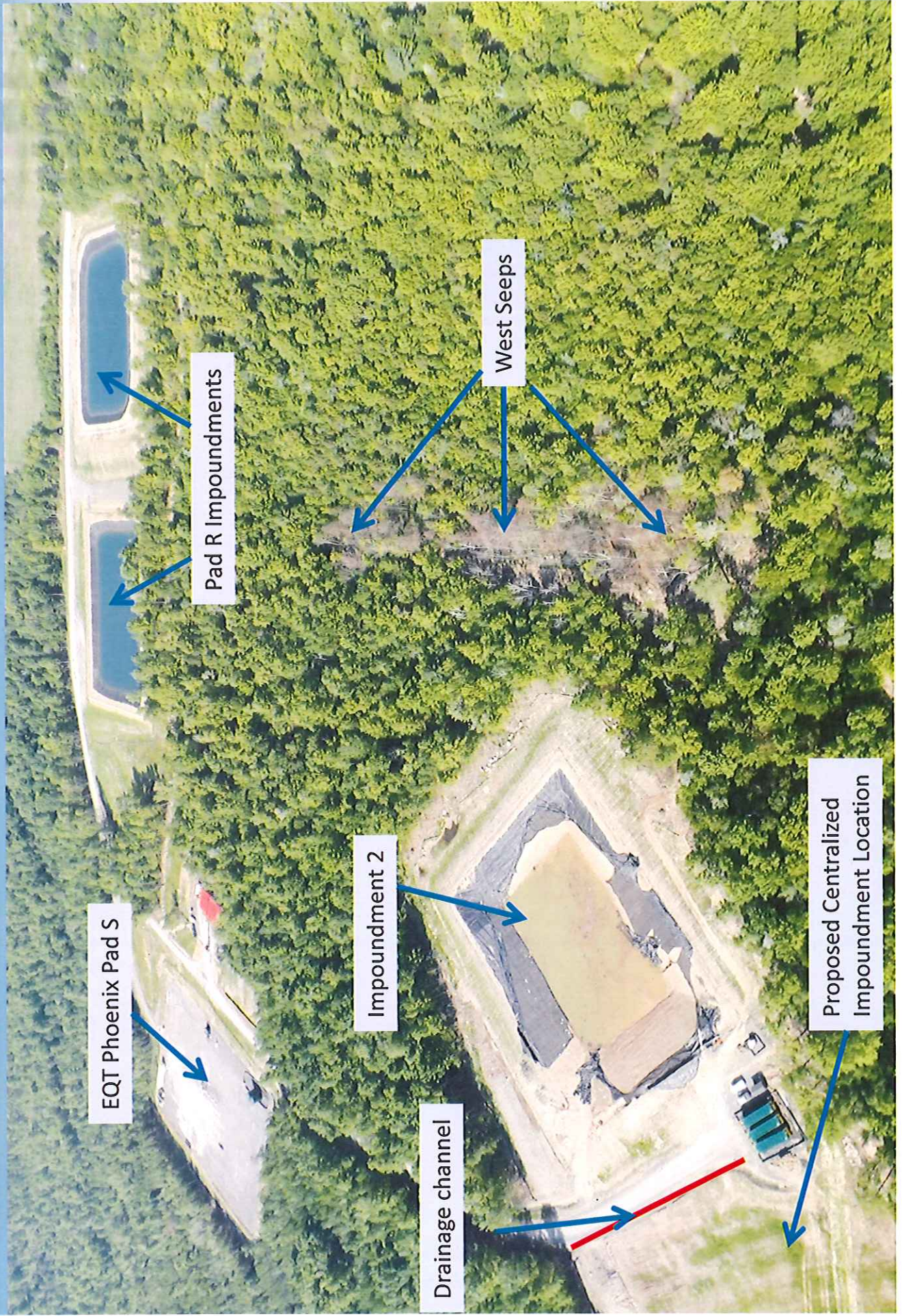


Exhibit C: View of Impoundment 2 looking SE. West Seeps impacted area in foreground. Photo taken 8/2/12.



Exhibit D: Water quality Danzer 1 spring.

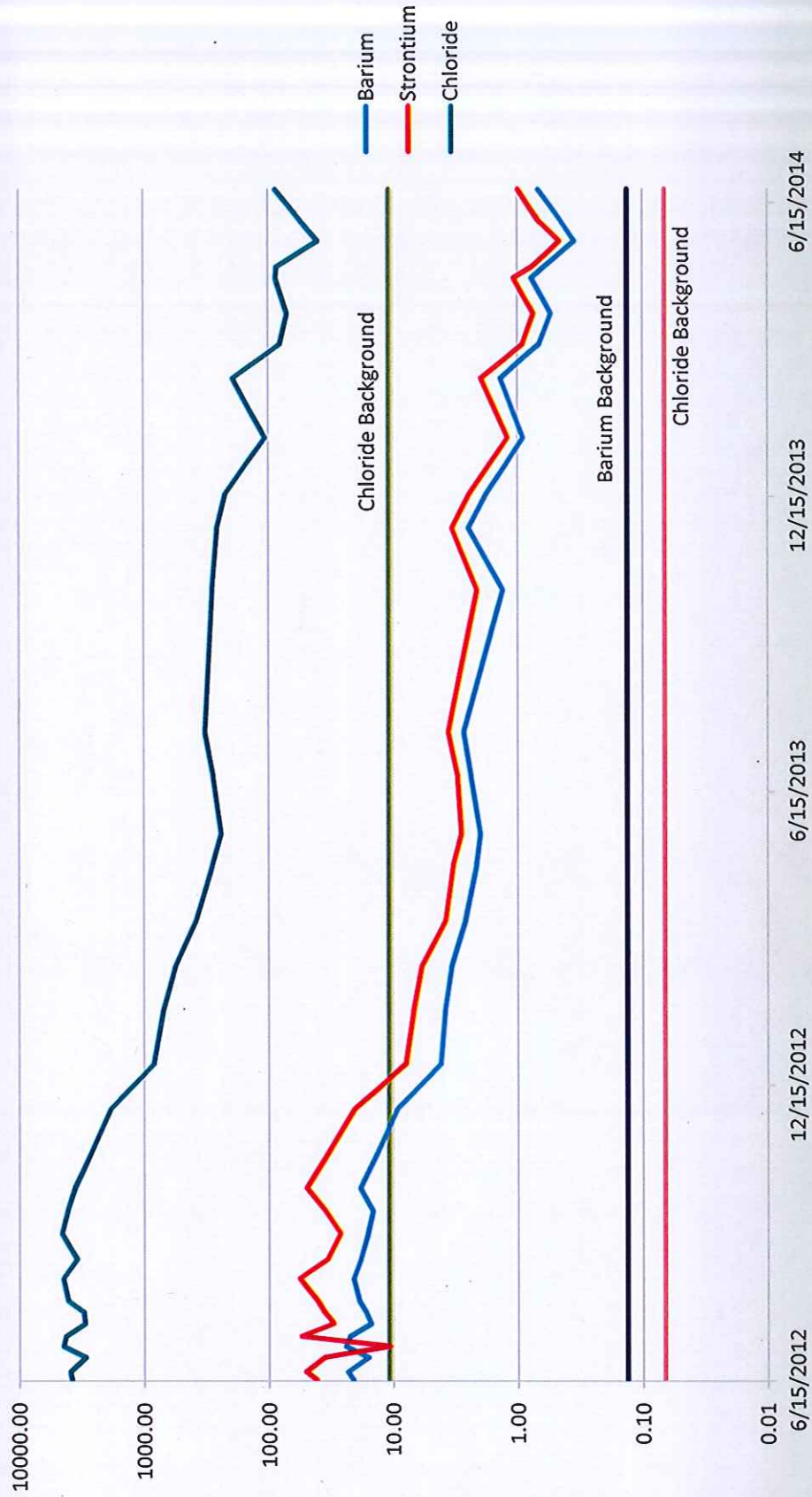


Exhibit E: Water quality lower west seeps.

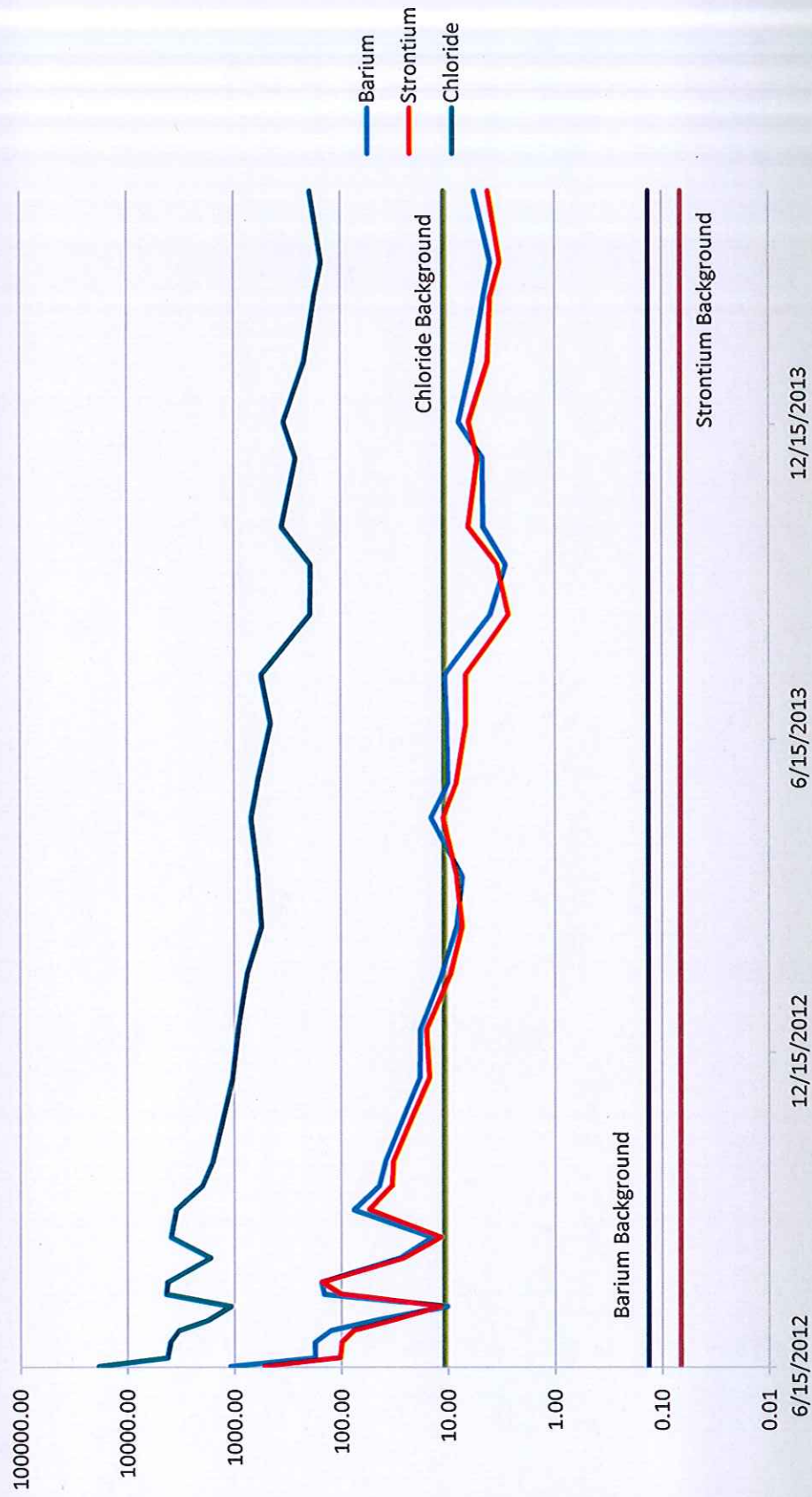


Exhibit F: Groundwater chloride concentrations in mg/L- May 30, 2012.
Secondary Maximum Contaminant Level (SMCL) is 250 mg/L.

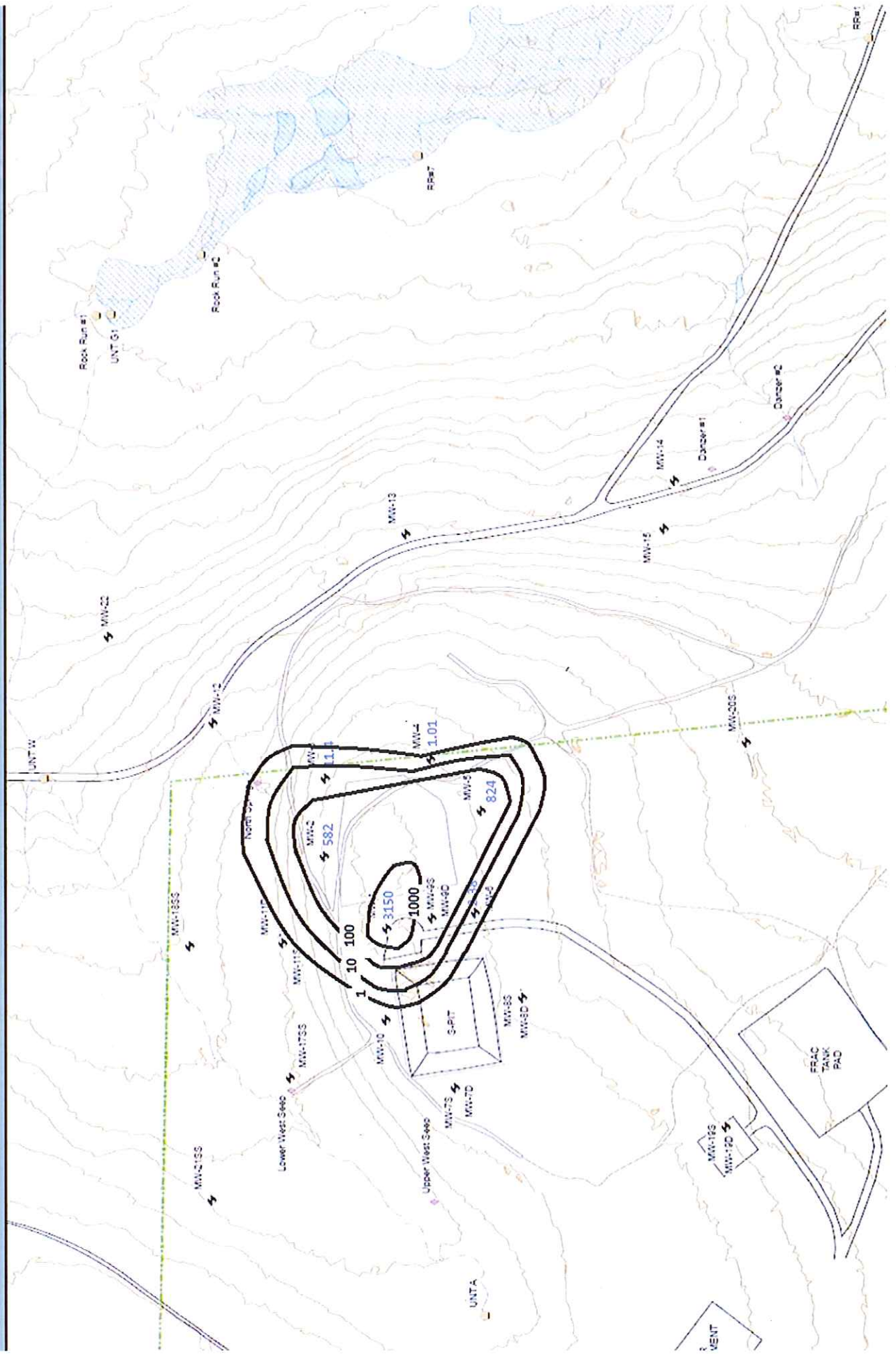


Exhibit G: Groundwater chloride concentrations in mg/L - June 25, 2014, Secondary Maximum Contaminant Level (SMCL) is 250 mg/L.

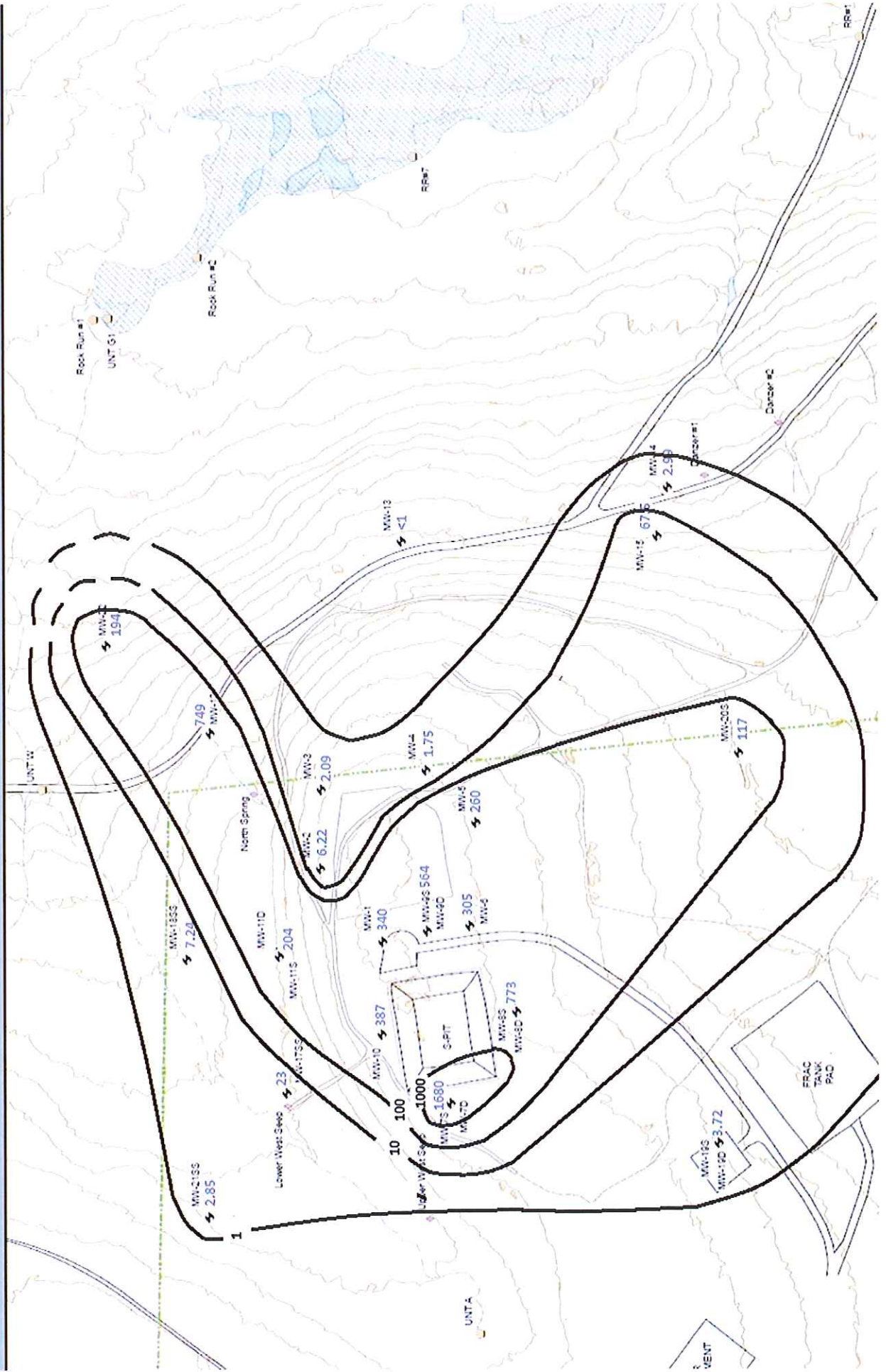


Exhibit H: Chloride concentrations versus time in select wells.

