White Paper of the City of Farmers Branch and Concerned Citizens Regarding the Town of Addison's Violations of The Texas Water Code and its Water Use Permit

September 24, 2014

Contacts

Representing City of Farmers Branch

JeffCivins
Haynes and Boone, LLP
600 Congress Ave. Suite 1300
Austin, Texas 78701
(512) 867-8438
Jeff.Civins@haynesboone.com

Representing Concerned Citizens of Farmers Branch

Scott Deatherage Gardere Wynne Sewell LLP Thanksgiving Tower 1601 Elm Street, Suite 300 Dallas, Texas 75201 (214) 999-4979 sdeatherage@gardere.com

Table of Contents

A Description of Farmers Branch Creek and Its Local Importance
Addison's On-Going Refusal to Comply with the Permit2
1. General Background
2. TCEQ Meeting and Farmers Branch and Landowners Meeting with Addison
Addison's Violations
Addison initiated construction and impounded water without a permit in violations of the Texas Water Code
a. Addison commenced construction without a permit in violation of the Texas Water Code
b. Addison failed to install a well for make-up water resulting in impoundment and damage to the Creek ecology in violation
of the Texas Water Code
Addison has failed to maintain adequate continuous daily flow as required by the Permit
3. Addison has been using a different aquifer than that specified in the Permit as an alternate source of make-up water
a. Addison drilled to the Woodbine aquifer to save money
b. Addison claims it had authority to not drill to the Trinity, but a
permit amendment was required, which Addison never obtained5
c. Water from the Woodbine aquifer fails to meet Texas Surface Water Quality Standards
4. Addison has failed to maintain a riparian buffer of native vegetation as
required by the Permit6
Impacts Resulting from Addison's Violations
Erratic supply of make-up water disrupts the natural daily flow and the ecology of the Creek
2. Erratic flow has caused property damage to certain landowners
3. Reduced flow has allowed stagnation in the Creek resulting in the
breeding of mosquitoes and an increased West Nile Virus risk
4. Addison's failure to comply has caused Farmers Branch and the landowners to
suffer a frustrating, time consuming, and expensive process to attempt to obtain
compliance8
Request for Relief

White Paper of the City of Farmers Branch and Citizens Regarding the Town of Addison's Violations of The Texas Water Code and its Water Use Permit

The City of Farmers Branch and citizens of Farmers Branch who own land along or near Farmers Branch Creek filed complaints with the Texas Commission on Environmental Quality (TCEQ) requesting enforcement action against the Town of Addison. The complaints arise from Addison's refusal to comply with the Texas Water Code and with Texas Water Use Permit No. 5383A issued by the TCEQ to Addison (Tab 1). To assist the TCEQ in its evaluation of our complaints, we have collected pertinent supporting documentation, which is included in a tabbed addendum.

In summary, Addison's violations of the Texas Water Code and of the Permit include the following:

- 1. Addison initiated construction and impounded water without a permit.
- 2. Addison has failed to maintain adequate continuous daily flow as required by the Permit.
- 3. Addison has been using a different aquifer than that specified in the Permit as an alternate source of make-up water.
- 4. Addison has failed to maintain a riparian buffer of native vegetation as required by the Permit.

We cannot emphasize enough on behalf of Farmers Branch and its citizens how frustrating, time consuming, and expensive the process has been to attempt to convince Addison to pump adequate water to maintain the Creek's natural flow and ecology. We request that the TCEQ compel Permit compliance, and by doing so, allow the ecosystem to be restored and the downstream residents and City Park users to again enjoy the beautiful natural amenity of the Creek.

Executive Summary

The Permit authorized Addison to construct and modify reservoirs on the Creek, contingent on Addison pumping water from the Trinity Aquifer to make up evaporation losses resulting from construction and operation of these reservoirs. The Permit also required Addison to maintain a riparian zone along the reservoirs.

Addison has violated the Water Code by constructing the reservoirs more than eight (8) months before the Permit was issued, and has violated the Permit by failing to pump sufficient water to make up for evaporation on a daily basis, by pumping make-up water from the Woodbine Aquifer, which has poorer water quality than the Trinity Aquifer, and by ignoring the requirement to install a riparian buffer. Although Addison allocated \$40 million for its Vitruvian Park development, the focal point of which is the reservoirs, it decided not to drill into the Trinity Aquifer in order to save a few hundred thousand dollars and it has refused to pump

enough water to maintain flow in the Creek even though it would only cost a few thousand dollars a year to do so.

Addison's position appears to be that it need not comply with the Permit as written. These continuing permit violations have threatened the continued vitality of the Creek, adversely affecting its ecology and surrounding areas, creating adverse health and aesthetic effects, and adversely affecting the downstream landowners and citizens of Farmers Branch.

A Description of Farmers Branch Creek and Its Local Importance

Farmers Branch Creek is an urban creek classified by the USGS as a perennial stream (<u>Tab 2</u>). The 6+ mile creek originates in Farmers Branch and passes through a comer of Addison-approximately 500 yards- before re-entering Farmers Branch (<u>Tab 3</u>). The reservoirs on the Addison portion of the Creek, which are the subject of the Permit, serve as a focal point for Addison's Vitruvian Park development.

The Creek has historical significance: the first settlement in Dallas County was founded in 1842 along its banks. The fact the Creek flowed continuously resulted in a thriving ecosystem and was a significant factor to development along it, up to and including the present. Four Farmers Branch city parks are located on the Creek as well as a number of homes whose owners value its natural beauty and thriving ecosystem. Letters from those residents confirm the fact that for over 40 years- until Addison's reservoir development- the Creek has not gone dry (Tab 4).

Addison's unlawful development and operation of its reservoirs have resulted in inadequate and interrupted flow to the Creek. This interrupted flow has resulted in adverse impacts on the Creek and on the surrounding parks and residents, including destruction of habitat for the Creek's fish, wildlife, and waterfowl, damage to the structural integrity of the Creek banks, and creation of breeding grounds for mosquitoes.

To address these adverse impacts, the City of Farmers Branch and its residents have made numerous overtures to Addison, seeking to encourage it to comply. Unfortunately, Addison has repeatedly rebuffed those overtures and refused to acknowledge the validity of the concerns of Farmers Branch and its citizens and the fact that it is- and has been- out of compliance with the Permit for four years.

Addison's On-Going Refusal to Comply with the Permit

1. General Background

Over the last four summers, Addison has pumped insufficient water to keep the Creek flowing; starting from the time Addison began construction of the dams to provide a lake system as part of the Vitruvian Park mixed use development. That system consisted of two reservoirs, water features or waterfalls, and supporting recirculating pumps. According to Addison's own documents, Addison has spent approximately \$40 million on the Park and related amenities (Tab 5). Addison, however, refuses to spend a few thousand dollars per year to comply with the Permit and pump adequate water to maintain continuous water flow in the Creek below its reservoirs. Addison also claims drilling to the required aquifer is too expensive. It also has

refused to install and maintain a riparian zone along the reservoirs as required by the Permit and unfortunately removed the old growth trees and undergrowth that sheltered the Creek's ecosystem in that section of the Creek and replaced it with manicured non-native turf. Tab 6 includes aerial photos of the Creek showing the difference in the riparian zone before Addison began construction, during construction, and after construction and operation of the Vitruvian Park development. Photographs in Tab 7 of Vitruvian Park show manicured non-native turf in the riparian zone.

2. TCEQ Meeting and Farmers Branch and Landowners Meeting with Addison

We were asked by the TCEQ to attempt to negotiate a resolution of these violations with Addison. We scheduled a meeting in Austin with Jim Sallans and Catie Arnold of the agency, to which we invited Addison, on July 2, 2014, to discuss our concerns and how best to address them. In spite of Addison's failure to show up for the meeting, Mr. Sallans suggested we continue to try to negotiate a resolution with Addison. As the Chronology in Tab 8 and related documents in Tabs 9 through 28 demonstrate, we attempted to negotiate in good faith with Addison seeking to develop a schedule that would lead them to compliance with their permit terms that might be embodied in an administrative compliance order issued by the agency. Unfortunately, Addison, as evidenced by these communications, has demonstrated that it does not intend to comply with the Permit.

Addison's Violations

- 1. Addison initiated construction and impounded water without a permit in violation of the Texas Water Code.
 - a. Addison commenced construction without a permit in violation of the Texas Water Code.

An aerial photo taken on September 17,2010 (<u>Tab 6</u>) shows construction under way and water being impounded in the second reservoir, more than eight (8) months prior to granting of the Permit by TCEQ on May 20, 2011. Photographs taken in March 2011 (<u>Tab 29</u>) further demonstrate that construction was well underway before the Permit was granted.

b. Addison failed to install a well for make-up water resulting in impoundment and damage to the Creek ecology in violation of the Texas Water Code.

The well necessary to supply make-up water and prevent impoundment of water was not installed until October 2011 (<u>Tab 30</u>) and, according to Addison's pumping records, did not begin pumping until July- August 2012, almost two (2) years after Addison began construction in the Creek and impounding water (<u>Tab 31</u>). As demonstrated in the photos in Tabs <u>12</u> and <u>29</u>, Addison's impoundment and failure to install a make-up water well resulted in intermittent flow in the Creek resulting in untold damage to the ecosystem.

2. Addison has failed to maintain adequate continuous daily flow as required by the Permit.

As is demonstrated in the flow analysis graphs prepared by TRC (Tabs <u>25</u> & <u>32</u>), the consultant engaged by Farmers Branch, Addison has failed to maintain continuous daily flow as required by the Permit and as needed for the fish and wildlife of a perennial stream.

Special Conditions 6. A. and B. of the Permit state:

- 6. A. This amendment does not allow Permittee to impound State water in Reservoir No. 2 or additional State water in reservoir No. 1. Permittee shall provide and maintain suitable outlets in good working condition in the reservoirs to <u>pass all inflows of State water downstream</u> and maintain the reservoirs full.... (Emphasis added).
- 6. B. Permittee shall maintain and operate an alternate source of water with sufficient production to <u>ensure no State water is used</u> as a result of this amendment ...To account for potential use of State water due to evaporation; Permittee shall supplement the reservoirs with water from the groundwater well in the amount of a minimum of 5.82 acre-feet per year.... (Emphases added).

Special Condition 6. A. requires that Addison "pass all inflows of State water downstream..." Under the permit, Addison may not take State water at any time; the burden is on it to ensure that it does not. Addison has failed to comply with this requirement. The Creek is classified as a perennial stream (Tab 2), and residents who live along the Creek have never seen it dry up until the construction and operation of the additional reservoir and other water features (Tab 4). We had requested that Addison either continue the discharge of adequate flows of water from its existing well until a replacement well is completed into the Trinity or, in the alternative, that it comply with Special Condition 6.C. and cease impoundment of water. Although Addison has increased pumping, it has still failed to assure adequate daily flow on a continuous basis (Tabs 25 & 32).

TRC and Addison's consultant agreed on a method for calculating the amount of make-up water required to account for evaporation from the reservoirs and water features operated by Addison. However, the consultants could not agree on whether evaporation must be calculated for both reservoirs or only the newer one (Tabs 11 & 18). TRC concluded that both reservoirs must be included, and Addison took the position that only the newer reservoir should be included.

The permit references reservoirs plural and so does the November 18, 2010 TCEQ memorandum regarding the permit (Tabs $\underline{1} \& \underline{33}$). Physically, if both reservoirs are not part of the evaporation calculation, it is not possible to make sure the water coming in at the top of the upper reservoir makes it over the dam at the lower reservoir and into the Creek.

Addison has not hesitated to use the 2,300 gallons per minute ("GPM") pumps to pump sufficient water to keep the water features and waterfalls in the Park operational, but objects to using the 35 GPM pumps to pump sufficient water to make up for evaporation from both reservoirs and to keep the Creek flowing on a daily basis. We estimate that the cost to pump sufficient make-up water would be less than \$5000 a year to pump from the Woodbine and less

than \$13,000 a year to pump from the Trinity (Tab 34).

3. Addison has been using a different aquifer than that specified in the Permit as an alternate source of make-up water.

Despite the Permit requirement that the make-up water well be drilled to the Trinity Aquifer, Addison chose to drill to the Woodbine Aquifer to save money.

Special Condition 6. B. of the permit requires that Addison "maintain and operate an alternate source of water with sufficient production to ensure no State water is used as a result of this amendment." That provision goes on to state that Addison "has identified groundwater from the Trinity Aquifer as the alternate source of water for this project." Special Condition 6.C. expressly provides that: "This amendment is contingent upon the Permittee's maintenance of the alternate source of water identified in Special Condition B" [that is, the Trinity Aquifer]. It then specifies the remedy "[i]n the event the groundwater well will not be used as the alternate source,...Permittee shall immediately cease impoundment of water under this amendment and either apply to amend this permit with documentation of the new alternate source of water, or voluntarily forfeit the amendment."

a. Addison drilled to the Woodbine aquifer to save money.

Addison apparently never intended to comply with the Permit's requirement to supply evaporation make-up water from the Trinity Aquifer. The construction specification prepared by Kleinfelder, Addison's consultant, in July 2011, less than 2 months after the Permit was granted, requests a bid for a 700-foot deep well-the approximate depth of the Woodbine Aquifer (Tab 35). The Trinity aquifer is located at 1500 to 1600 feet below ground surface, approximately twice the depth of the Woodbine aquifer. A July 5, 2012 letter from Kleinfelder to Addison (Tab 30) and a February 7, 2013 letter from Addison's City Manager to the TCEQ (Tab 36) state the well was drilled to the Woodbine to save costs. Addison's settlement offer to Farmers Branch outlined in the August 25, 2014 email from John Hill to Jeff Civins proposes to study the aquifer issue for one year rather than comply with the Permit, citing the "high cost" of \$700,000 to drill the well to the Trinity (Tab 27). The cost to install the well to the Woodbine Aquifer was only \$95,000 (Tab 37).

Addison has made repeated claims that compliance with the Permit terms was too expensive. However, the cost to comply with laws is a prerequisite of any construction project. Addison had a \$39.8 Million budget (Tab 5) to complete the job in accordance with the law but chose instead to spend money on amenities for the development rather than installing a proper well that would pump clean water to pass through to the ecosystem and those already living downstream. Thus, plenty of funds were available to drill to the Trinity Aquifer; Addison simply decided to save a small amount of money in the overall \$40 million Vitruvian budget, in disregard of its legal obligations.

b. Addison claims it had authority to not drill to the Trinity, but a permit amendment was required, which Addison never obtained.

Issuance of the Permit was based on the representation that the Trinity would be "the alternate

source of water," and that representation not only was relied upon by both the agency and Farmers Branch in their review of the application, it was expressly incorporated into the amended permit. Addison, however, instead completed the well into the Woodbine in October of 2011. Addison maintains that the July 5, 2012 letter Kleinfelder sent to it (Tab 30) and the February 7, 2013 letter the Town sent to the TCEQ (Tab 36) somehow authorized the use of the Woodbine instead of the Trinity. As recently as Addison's July 8, 2014 Council Meeting, Addison's City Manager continued to claim that it was exceeding the terms of a newly amended Permit.

Addison is legally required to seek a permit amendment to use a different aquifer through the formal permit amendment process, with notice and the opportunity for comment and hearing. Permits may not be amended by a permittee notifying the agency of a deviation nor by an agency staffer giving permission to deviate from the Permit. Despite repeated requests, Addison has never supplied documentation that any such "permission" was provided. Addison's claim that it was not required to go through the amendment process to change aquifers has no legal support, and Addison offers none.

c. Water from the Woodbine aquifer fails to meet Texas Surface Water Quality Standards.

The Woodbine aquifer is known to be of poorer water quality than the Trinity aquifer and, in fact, water samples from the Woodbine failed Texas Surface Water Quality Standards for total dissolved solids (TDS), chlorides and sulfates by a factor of four times or greater (Tab 38).

As a technical matter, there was a reason for requiring that the Trinity Aquifer be used for make-up water, because its quality, though not equivalent, was close to surface water quality standards (641 mg/L TDS as compared to the water quality standard of 500 mg/L) and the Creek's water quality could be maintained by mixing. KBA, Addison's consultant, suggests two sample results establish that the quality of Farmers Branch Creek, the maintenance of which is independently required by Special Condition 6. E., is not adversely affected by use of water from the Woodbine. Leaving aside for the moment whether those sample results were representative of the water quality of Farmers Branch (we do not believe they were), there is nothing in the KBA report that refutes TRC's conclusion regarding the relatively poor quality of the water in the Woodbine, including, for example, the fact that the Woodbine has TDS of 2000 to 2400 mg/L, 4 to 5 times higher than the water quality standard.

4. Addison has failed to maintain a riparian buffer of native vegetation as required by the Permit.

Special Condition 6. D. of the Permit states that to protect water quality of the reservoirs and the ecosystems downstream, Addison is required to "maintain a riparian buffer zone of permanent vegetation around the perimeter of the reservoir complex averaging 50 feet in width with the exception of reasonable access areas" and that this zone "be graded to have a slope of no more that 15% where feasible and planted with native vegetation at a density to ensure complete coverage at maturity." The TCEQ Memorandum discusses the need for the riparian buffer to protect the Creek's ecosystem (Tab 33). Addison instead has maintained a manicured lawn of non-native grass up to the banks of the reservoirs. See Tab 6 for an April 2010 aerial photograph

Of the old growth riparian zone along the Creek and September 2010 and February 2014 aerials showing that growth has been removed and <u>Tab 7</u> for photographs showing the manicured non-native turf that was installed in its place in violation of the Permit.

The lack of buffer results in the potential for adverse impacts on the water quality of the Creek associated with, among other things, runoff of pesticides, herbicides, fertilizer, and bacteria from pet wastes down the slope of the banks into the creek. The fact that Addison has re-zoned this area to allow for high-density urban development (an increase in density by a factor of 5) significantly exacerbates the potential impacts as well as our concerns.

A virtual tour showing the planned five-fold expansion of the Vitruvian Park development demonstrates that a riparian buffer was not installed, which will cause runoff into the Creek to expand greatly. See http://www.vitruvianpark.com/future.html.

Impacts Resulting from Addison's Violations

1. Erratic supply of make-up water disrupts the natural daily flow and the ecology of the Creek.

As the data developed by TRC shows (Tabs 25 & 32), Addison's inconsistent pumping of makeup water to its reservoirs, particularly in the summer months when evaporation rates are the highest, has caused the Creek to suffer erratic flow, significantly disrupting the Creek's ecology, which is dependent on daily flow at an adequate rate. The obligation to pump adequate water is a daily obligation, not one that can be made up by pumping more water on another day, week, or month.

In addition, Addison has caused significant harm to the Creek's ecology by pumping poor quality water from the unpermitted Woodbine Aquifer (<u>Tab 38</u>), and, in the earlier years, by pumping no water for almost two (2) years before the pump began operating (<u>Tab 31</u>).

2. Erratic flow has caused property damage to certain landowners.

The erratic flow of water in the Creek also has resulted in damage to certain landowners' property. The erratic flow of water causes expansion and contraction of the Creek's banks, which causes the concrete bagwalls that protect against erosion to crack and fail. Some landowners have spent thousands or tens of thousands of dollars on these bagwalls and other erosion controls.

3. Reduced flow has allowed stagnation in the Creek resulting in the breeding of mosquitoes and an increased West Nile Virus risk.

Reduced flow has caused pooling of stagnant water creating not only odors and impacts on the ecology, but also creating a breeding ground for mosquitoes. The potential risk associated with low flow is demonstrated by Farmers Branch reporting several confirmed cases in 2012 of West Nile Virus by residents living near the Creek.

4. Addison's failure to comply has caused Farmers Branch and the landowners to suffer a frustrating, time consuming, and expensive process to attempt to obtain compliance.

As the City and the residents have discovered through the course of trying to resolve this issue, Addison has resolutely refused to comply with the terms of the Permit from the earliest stages of construction to the present. Numerous calls and complaints have been made to Addison's City Manager and others, and Addison keeps saying "it just wants to be a good neighbor." However, in our ongoing attempts to convince Addison to comply with the Permit, it refuses to do so. *To date, the citizens' consultant and attorney fees alone are in excess of \$100,000.00*. Because of the continued disregard of the Permit, the landowners, the City of Farmers Branch, and most importantly the Creek, its ecosystem, and the fish, wildlife, and wild fowl that make it their home, have been at the mercy of Addison.

Request for Relief

The City of Farmers Branch and affected citizens requested in their complaints that the TCEQ take enforcement action to compel Addison to comply with its Permit. This document is being presented to support those complaints and the actions requested below:

- 1. Compel Addison to restore the natural continuous daily flows with pumping of make-up water of sufficient quantity to maintain Creek flows, to drill the make-up water well to the Trinity Aquifer, and to install the riparian buffer along the banks of the reservoirs.
- 2. Issue sanctions against Addison for its disregard of the Permit terms and State law over several years and continuing today.
- 3. Establish stipulated penalties in any agreed order such that sanctions can be issued readily if Addison violates the Permit in the future.
- 4. Require Addison to make information regarding its ongoing efforts to comply publicly available, e.g., by posting real time pumping data and other pertinent information on its website.
- 5. If Addison continues to refuse to comply with its Permit, evaluate the appropriateness of revocation of the Permit and removal of the dams and restoration of the original creek channel, based on Addison's disregard for the Permit, state law, and the impact of its actions on the downstream neighbors and the Creek.

We would greatly appreciate the TCEQ's prompt action to compel Addison to comply with its Permit and to protect Farmers Branch Creek and the citizens who live and appreciate the ecological value of the Creek.