

**ZONING BOARD OF ADJUSTMENT  
MEETING MINUTES March 20, 2019**

**APPROVED**

**STATE OF TEXAS           §**

**COUNTY OF TARRANT   §**

**CITY OF BEDFORD       §**

**The Zoning Board of Adjustment of the City of Bedford, Texas, met in work session at 5:30 PM and regular session at 6:00 PM to discuss items on the agenda in the Council Chamber of City Hall, 2000 Forest Ridge Drive on the 20<sup>th</sup> day of March, 2019, with the following members present:**

Chairman:

Vice Chairperson:

Members:                   Jack Thompson  
                                      Charles Baetz  
                                      Gina Day  
                                      Scott Kim

Constituting a quorum.

Staff present included:

Emilio Sanchez                Planning Manager  
Kristtina Starnes              Planning and Zoning Coordinator

(The following items were considered in accordance with the official agenda posted on the 13th day of March, 2019.)

**CALL TO ORDER**

Work Session was called to order at 5:33 PM.

**WORK SESSION**

The Board and Staff reviewed and discussed items on the regular agenda.

Elections for Chairman and Vice Chairman were nominated and appointed:

Chairperson:                Gina Day  
Vice Chairman:             Jack Thompson

Work Session was adjourned at 5:54 PM.

**REGULAR SESSION**

The Zoning Board of Adjustment convened in the Council Chamber at 5:55 PM and the Regular Session began.

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**CALL TO ORDER**

Chairperson Day called the meeting to order at 6:00 PM and read the Zoning Board of Adjustment meeting format aloud.

*Good Evening, my name is Gina Day. I am Chairperson for the Bedford Zoning Board of Adjustment. I now call this regularly noticed meeting to order.*

*A quorum is present, so the Board may proceed with its scheduled agenda.*

*Prior to commencing our hearing, I would like to review our meeting format for the benefit of those in the audience.*

*Each case will be called in its regularly scheduled order as shown on the agenda.*

*The City Staff will make a staff presentation to the Board.*

*The applicant will be given an opportunity to make a presentation in person or by a representative.*

*Those individuals in the audience in support of or opposition to the proposed request will be given an opportunity to make a presentation to the Board.*

*The Board asks that all individuals and parties presenting information on each request please direct their comments to factual information, and not to speculation or subjective comments.*

*The applicant will be given an opportunity for a brief rebuttal as the applicant has the burden of providing the necessity and the justification for his or her request.*

*The Board will close its public hearing to discuss and consider the facts presented. In order for a request to be granted, there must be a minimum of three votes in favor of the request.*

*Please remember that the Zoning Board of Adjustment is a quasi-judicial body. A formal record is made of each hearing and each case. The Board is permitted to act only upon factual information or evidence that is presented by the staff and by parties making presentations at the public hearing on each case.*

**OFFICER ELECTIONS**

- 1. Consider approval of the following Zoning Board of Adjustment meetings minutes:  
a) October 18, 2017 regular meeting**

Motion: Board Member Baetz made a motion to approve the meeting minutes of October 18, 2017.

Board Member Kim seconded the motion and the vote was as follows:

Ayes: Board Members Baetz, Kim, Vice-Chairman Thompson and Chairperson Day

Nays: None

Abstention: None

Motion approved 4-0-0. Chairperson Day declared the motion approved.

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**PUBLIC HEARING**

- 3. Public hearing and action upon Special Exception Case PZ-ZBA SPECIAL EXCEPTION-2019-50007, a request from Section 5.11 of the City of Bedford Zoning Ordinance for Atmos Energy to replace their current 80-foot communication tower with a 109-foot tower, which will be relocated to an adjacent building. The property is known as Lot 1B, Block 6, Bedford Forum Addition, located at 2000 Reliance Parkway, Bedford Texas, and the zoning district is Planned Unit Development (PUD). The property is generally located east of Reliance Parkway and south of Bedford Road. (PZ-ZBA SPECIAL EXCEPTION-2019-50007)**

Chairperson Day recognized Emilio Sanchez, Planning Manager, who gave an overview of Appeal Case PZ-ZBA SPECIAL EXCEPTION-2019-50007.

This request is for a special exception for 2000 Reliance Parkway. The owner of the property is Atmos Energy. They are requesting a special exception to construct a 109-foot tower that will be dedicated to their use only. So there will not be any co-location of any cellular services on this tower. This is a requirement for Atmos to be able to control their automated valves across the metroplex so they can reach out and turn off certain valves in a gas line, so if there is an emergency that gas is able to be shut off remotely without putting anyone in harm's way.

The applicant is requesting this special exception due to the fact that it's taller than allowed. 35 feet is the tallest monopole allowed by right. To have a monopole of 35 feet, it is required to have two times the distance within the property to have that pole to fall within that property. In this instance, it is 109 feet, and to double that distance equals 218 feet. The property is not that large.

Currently the existing tower that is on site is only 80 feet in height. It is a lattice-type design that uses guy wires to maintain its 90-degree angle to the ground. Sometimes they are able to achieve that, and other times over time those wires have to be maintained. In this instance, the applicant is not able to hire a consultant to go to the top of the tower to inspect the top of the tower because of the age of the facility and the consultants were concerned that it doesn't meet their standards to be able to put a human being on top of that. So there were some safety concerns in regards to being able to do maintenance or inspections.

Board Member Baetz said the City requires twice the height and he believes that is outdated. He asked if that can be addressed in the future.

Emilio Sanchez said that can be looked at in the future. He said that monopoles designed today are designed to collapse amongst themselves or along a particular area, so it's designed to snap instead of falling like a tree would fall. It doesn't fall over, it snaps and falls in place, kind of like a house of cards coming straight down.

Board Member Baetz asked if there are provisions to taking the existing tower down.

Emilio Sanchez said that it is his understanding that the existing tower will go away once the new tower is online.

Bill Bauman, applicant, 2300 Springmere Drive, Arlington, Texas.

Mr. Bauman is appearing on behalf of Atmos Energy to present this case to the ZBA board.

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Mr. Bauman addressed the existing tower on the facility. It has become somewhat unsafe in its age and the ability to maintain it toward the top. In the interest of safety, along with other items to be presented, he is asking the board for approval to replace this tower. In replacing it, one of the things that came up talking to staff was that the tower that exists now is toward the homes. Their proposal is even though they are increasing the height they are moving it away from the houses and as close to the building as possible. They are as far away from the homes they can get without putting the tower in front of the building.

Atmos is beginning to remotely control high pressure valves for quick shut-downs in case of emergency. There are several within the metroplex and DFW Airport area that need to be reached via this taller tower.

They are increasingly having a more difficult time communicating with all of their remote sites, and there are more structures and taller structures and a canopy of trees that have grown over the years, making it more difficult to reach those sites.

There are other cities to the west, namely Haltom City and North Richland Hills, which are having a difficult time talking to the base due to its shorter height.

Atmos calls this the "heartbeat site" because it's a critical site for Atmos and their ability to respond in emergency situations. Due to the cyber security and safety rules, they don't allow any co-location for any of the cellular carriers to be on this tower. This will not be a co-location of four or five different arrays. It will not occur on this site.

Valmont Structures is the engineering company and tower design company

Failure of a steel monopole occurs when a point is reached where the induced stresses exceed the yield strength of the material. At this point, the deflections induced in the material are no longer temporary. Hence, a permanent deflection in the monopole would exist. In other words, there's a designed weak point for a failure. If it has to give, it will give at that point.

The term failure above refers to local buckling at a designated point on the pole. Local buckling does not cause a free falling pole. Rather, it relieves the stresses from the pole at this location. Monopoles are flexible, forgiving structures, which are not generally susceptible to damage by impact loads such as wind gust or earthquake shocks.

When local buckling occurs, a relatively small portion of the shaft distorts and "kinks" the steel. When the pole begins to bend the exposure area is reduced and therefore, the force due to wind is decreased as well. Even though buckling exists, the cross section of the pole is capable of carrying the entire vertical load. Therefore, wind induced loads could not conceivably bring this type of structure to the ground due to the excellent ductile properties, design criteria, and failure mode. In other words, they're designed to snap in the middle and fall down on themselves. That's the design.

To their knowledge, Valmont has never experienced an in service failure of a communication pole due to weather induced overloading. They have withstood hurricanes Hugo, Andrew and Katrina.

Chairperson Day asked Mr. Bauman if he is an engineer.

Mr. Bauman said no, he is a city planner by trade.

Chairperson Day asked if the tower is constructed in one piece or in several pieces.

Mr. Bauman said these are generally erected in three sections.

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Chairperson Day asked if a crane has to be used to put it up.

Mr. Bauman said yes, but the crane is usually there for one day. The construction is usually complete in one day or less. The sections of the tower are wider at the base and thinner at the top, so they can be stacked. That creates some extra stability as well.

Chairperson Day asked if each piece is stress-tested.

Mr. Bauman said he is not the engineer but referred the board to the letter.

Chairperson Day asked if there's anything at the base of the pole that prevents people from climbing up the pole, or if there's any type of security to prevent kids from trying to climb it.

Mr. Bauman said they are slick and there are no climbing hooks. Generally these poles are maintained, and at 109 feet a bucked truck is generally used to go up there.

Board Member Baetz asked if this monopole is similar to a cellular tower.

Mr. Bauman said it is similar. The weight difference is substantial. He said this would be hundreds of pounds less than a typical cellular tower designed for colocation with multiple carriers.

Chairperson Day asked if there runs any health risk or radiation risk.

Mr. Bauman said the transmitters are about 100-watt to 200-watt, similar to a 100-watt light bulb. The equipment on this type of tower are not used for cellular communications. These are used to talk to hospitals. If an emergency happened, a signal would be sent out to area facilities to prepare.

Chairperson Day asked if the tower were to fall and some damaged occurred, would the City be responsible or Atmos be responsible for the damage.

Mr. Bauman said an attorney would need to be consulted and he cannot answer that question. He has had a question regarding one-to-one radius before. As the cities have seen these towers functioning over 30+ years, there's less and less concern of tower failures.

Chairperson Day asked if it is galvanized.

Mr. Bauman said yes it is.

Board Member Baetz asked Emilio Sanchez if Staff is recommending this case for approval.

Emilio Sanchez said there is not really a recommendation to approve or deny cases on the Board of Adjustment as a technical advisor. The reason why it's not being administratively approved is because of the requirement for the height and the fall. The applicant has made it clear that the pole is designed to fall in place instead of outward, which the requirement for the two-for-one fall radius is mainly for falling out and not in on itself. If the Board is asking him to approve or deny, he said the applicant has made an adequate request for approval.

Chairperson Day opened the public hearing at 6:20 p.m.

Chairperson Day closed the public hearing at 6:20 p.m.

The Board discussed the case.

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Board Member Baetz said that he spoke with his brother who is a cellular tower engineer, and he said that monopoles are what cities are preferring. They are nicer and cleaner and didn't say anything negative about them.

Motion: Board Member Baetz made a motion to approve special exception case PZ-ZBA SPECIAL EXCEPTION-2019-50007.

Board Member Kim seconded the motion and the vote was as follows:

Ayes: Board Members Baetz, Kim, Vice Chairman Thompson and Chairperson Day

Nays: None

Abstention: None

Motion was 4-0-0. Chairperson Day approved special exception case PZ-ZBA SPECIAL EXCEPTION-2019-50007.

**ADJOURNMENT**

Chairperson Day adjourned the Zoning Board of Adjustment meeting at 6:33 p.m.

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Gina Day, Chairperson  
Zoning Board of Adjustment

ATTEST: \_\_\_\_\_  
Kristtina Starnes  
Planning & Zoning Coordinator