

STATE OF VERMONT

SUPERIOR COURT

**ENVIRONMENTAL DIVISION
Docket No. 127-10-17 Vtec**

JSCL, LLC CU Permit

DECISION ON THE MERITS

John A. DeVos, Jr. has operated a fuel hauling trucking company from his family’s organic dairy farm on Greenbush Road in Ferrisburgh, Vermont, for nearly forty years. Mr. DeVos hopes to continue his fuel hauling business from a new facility, separate from his family farm. He and his wife, Sue DeVos, therefore established their limited liability company – JSCL, LLC (“JSCL” or “Applicant”) – to purchase property in the Industrial Zoning District of Ferrisburgh on which to operate their fuel hauling trucking business. On that property, located on Tappers Crossing in the Town of Ferrisburgh, Vermont (“Town”), JSCL proposes to construct a trucking facility that would include an 8,000-square-foot maintenance and repair garage with offices, an outdoor truck-washing area, an above-ground fuel tank for refueling the trucks, and parking for nine trucks and eleven employee and visitor vehicles (“the Project”).

To this end, on September 13, 2016, JSCL submitted a conditional use approval application to the Town of Ferrisburgh Zoning Board of Adjustment (“ZBA”) for their proposed Tappers Crossing trucking facility. The ZBA conducted a site visit and seven or more hearings over the course of the following eleven months. During that time, JSCL made several revisions to its plans in response to concerns expressed by Town officials and some neighbors. Ultimately, the ZBA approved JSCL’s amended conditional use application on September 6, 2017, with conditions.

A group of neighbors (together, “Appellants” or “Neighbors”) appealed the ZBA’s approval.¹ JSCL cross-appealed.

The appeal proceeded through the pre-trial discovery process, mediation, and pre-trial motion practice. When all those efforts did not result in a full resolution, the Court thanked the

¹ Appellants are David Pierson, Jane Melrose, Aubrey Choquette, and Kenneth Villeneuve. Other neighbors participated in this matter as self-represented interested persons: Carol Allen, Andre Emmell, Matthew and Lisa Watkins, and Stephanie Warner.

parties for their efforts and scheduled a site visit and de novo trial. The trial was conducted over four-days, on July 1 to July 3, 2019, with a final day on August 13, 2019. The trial was held at the Mahady and Costello Courthouses in Middlebury and Burlington, Vermont. The site visit took place after the second day of trial. Post-trial, the parties submitted proposed findings of fact and conclusions of law; the post-trial filings were completed, and the matter came under advisement on October 1, 2019. The undersigned had other pre-existing work commitments that prevented him from researching and drafting this Merits Decision; I offer my regrets to the parties and the attorneys involved in this appeal for that delay.

Liam L. Murphy, Esq., represented Appellants in this appeal. Anthony R. Duprey, Esq., appeared on JSCL's behalf. The Town of Ferrisburgh ("Town"), which had limited involvement in this matter, was represented by James F. Carroll, Esq.

Based upon the evidence presented at trial, including that which was put into context by the site visit, the Court renders the following Findings of Fact and Conclusions of Law.

Findings of Fact

I. History of DeVos Fuel Hauling Business

1. John and Sue DeVos have owned and operated the Kimball Brook Organic Dairy Farm at 2263 Greenbush Road in Ferrisburgh, Vermont, for five or more decades. In 1973, Mr. DeVos was prompted to purchase a long-haul truck and trailer because of a spike in the cost of hay that he used to feed his herd. He used the truck and trailer to purchase lower-cost hay in other states. Trucking hay to and from their farm became a side business for the DeVoses.

2. Several years into his stint trucking hay, Mr. DeVos was approached by the distributor for a number of gasoline and diesel retail stations who asked if the DeVoses would be interested in trucking gasoline and diesel fuel to various retail stations. Mr. DeVos agreed to provide the requested trucking services. With the help of his wife and sons, Chris and Lee, Mr. DeVos has operated his fuel hauling business for nearly forty years from his dairy farm on Greenbush Road.

3. The DeVoses currently operate their fuel hauling business through their family corporation: J.A. DeVos & Sons, Inc ("J.A. DeVos").

4. Their operation follows a somewhat regular schedule. The fuel hauling trucks and trailers are stored at the dairy farm. Early each morning, J.A. DeVos drivers will arrive at the dairy farm,

confirm which truck they'll be operating that day, go through a safety inspection and check list, and then leave the farm, usually with an empty trailer, and depart for a wholesale fuel storage facility in either Burlington, Vermont, or Albany, New York. The DeVoses encourage their drivers to use the Albany facility because the fuel prices there are usually lower, and the Albany facility usually has a more significant supply of fuel than the Burlington facility. In fact, sometimes the Burlington facility will run out of fuel.

5. Most of the DeVos trucks will leave the dairy farm between 4:00 am – 5:00 am, although there are occasions when some drivers will leave with a truck and trailer before 4:00 am. There have also been occasions when Mr. DeVos will be notified that a retail station has run out of fuel. In such a case, Mr. DeVos will direct that a truck and trailer be immediately driven to Albany or Burlington, sometimes in the middle of the night, to pick up and supply gasoline or diesel fuel to the station in need.

6. J.A. DeVos currently maintains six or more long-haul trucks and trailers for use in its fuel hauling operations. The hope is to expand the fleet to nine long-haul trucks and trailers. Over its operational history, J.A. DeVos has operated as many as twelve trucks at one time, although the number of trucks has been reduced, principally due to the difficulty in finding qualified drivers to hire.

7. To drive to either the Albany, NY or Burlington, VT fuel supply depots, J.A. DeVos trucks travel 2 or more miles over Town roads from the DeVoses' dairy farm to reach U.S. Route 7, where the trucks and trailers will then either turn south on Route 7 to head towards Albany or north on Route 7 to head towards Burlington.

8. Once their tankers are full, the drivers will be dispatched to some of the forty or more retail fueling stations in Vermont and three or more in New Hampshire that are supplied by the distributor with whom J. A. DeVos has contracted. J.A. DeVos does not sell the gas and diesel fuel to the stations; its drivers are merely delivering the fuel to the stations for the distributor who hired J.A. DeVos.

9. An individual driver will be gone to pick up fuel and deliver to various retail stations for between six to eleven hours. When they have completed all of their assigned deliveries, their

trailer will usually be empty of fuel and they will return to the DeVos dairy farm. Most of the trucks with trailers return to the dairy farm by 5:00 pm.

10. Trailers that return to the dairy farm “empty” often have a residual amount of fuel left in their tanks or undercarriage fuel lines, estimated to be from a trace to fifty gallons. A driver can determine whether there is fuel left in the tank by inspecting a view window in the undercarriage pipes of the trailer. The one exception to this general rule is when J.A. DeVos purchases diesel fuel from the distributor for its own long-haul trucks. J.A. DeVos maintains a 4,000 gallon above ground diesel fuel tank at the dairy farm for use in fueling its own trucks. JSCL intends to relocate this above ground diesel fuel tank to the Tupper Crossing site, if it receives the necessary permits and can complete construction.

11. Each trailer has four separate tanks, so that it may carry and deliver up to four different grades of gasoline or diesel fuel. A tankers’ total capacity is 9,200 gallons.

12. The current DeVos trucks are from the 2003 to 2016 model years. Mr. DeVos credibly explained that he prefers to replace his trucks every three to four years, although he often has to wait for longer than estimated for a newly-order replacement truck to be delivered.

13. Mr. DeVos and town officials credibly testified that no recorded complaints have been made concerning the DeVos fuel hauling operations for the last thirty or more years. No report was received by the Court of municipal or state citations have been issued to J.A. DeVos or its drivers during that time period.

14. While the DeVoses and their corporation have operated their trucking business for nearly forty years from their dairy farm, they have never applied for or received a municipal land use permit for that business. It was unclear from the testimony provided if when the DeVoses began their trucking business a municipal permit was needed, nor was it clear whether their current operation should be regarded as a lawful pre-existing, nonconforming use of the dairy farm property. Mr. DeVos testified that when he first inquired of Town officials, he was advised that he did not need a zoning permit for his trucking business to operate on the dairy farm.

15. The undisputed trial testimony revealed that no recorded complaint about the DeVoses’ trucking business has been made to Town or state officials, nor was there any evidence presented

that the Town has ever considered serving a notice of alleged zoning violation upon the DeVoses or their corporation.²

16. The Town of Ferrisburgh Fire Chief credibly testified that in his many years as a Ferrisburgh firefighter and Chief, he has not been called upon to respond to an explosion or fire emanating from a J.A. DeVos fuel hauling truck or trailer. When presented with the neighbors' concerns about the proposed overnight parking of trucks and tankers at the proposed Tupper's Crossing site, the Fire Chief credibly testified that he does not share the neighbors' concerns. Rather, the Chief credibly explained that he has a greater concern, given his experience in responding to residential fires, with the storing of propane tanks for grills and automobiles with gas tanks on the neighbors' properties, especially when stored near a fire pit or grill.

17. Mr. and Mrs. DeVos created JSCL several years ago to distinguish its fuel hauling business from their dairy farming business. Even with the creation of JSCL, the DeVoses intend to keep their corporation – J.A. DeVos & Sons, Inc. – active for other business matters, to be operated from their dairy farm. These farm-based activities may include the future hauling of fuels.

II. Project Site and Surrounding Neighborhood

18. In 2015, JSCL purchased a 9.0± acre undeveloped plot of land on Tupper's Crossing. For several years prior to this purchase, Mr. DeVos investigated several alternate sites to locate JSCL's future trucking facility. He settled on the Tupper's Crossing site because that site had good soils, including soils with shale deposits; was generally level with little evidence of stormwater or groundwater flows; quick access to U.S. Route 7; and was located in the Industrial Zoning District ("Ind. District").

19. Tupper's Crossing is a Class III town highway. It is relatively short, travelling about 2,300 feet from its junction with U.S. Route 7 to its westerly end at its junction with Botsford Road. A railroad line bisects Tupper's Crossing, west of the JSCL parcel and the residential property that abuts it.

² While the parties debated whether the Greenbush Road operation required a zoning permit, or whether it did not need to comply with the Bylaws as a preexisting nonconforming use, that issue is not directly before the Court in this appeal. This is not an enforcement action. We do not consider the Greenbush Road use, other than to examine the fuel hauling business as it currently operates, so as to provide a better understanding of what JSCL proposes for its Tupper's Crossing site.

20. There are a total of five residential properties on Tupperts Crossing, and no commercial or industrial uses currently on Tupperts Crossing. There are, however, several commercial, retail, and industrial uses on nearby properties that have frontage on U.S. Route 7.

21. The proposed driveway on the JSCL site is located about 430 feet west of Route 7. In this section of Town, most lands between Route 7 and the railroad tracks (mentioned above and below) are located in the Ind. District. A copy of the Town Zoning Map, delineating the Town zoning districts, was admitted at trial as Applicant Exhibit 5. The lands along Tupperts Crossing not located in the Ind. District are located in the Rural Agricultural Zoning District.

22. The JSCL parcel is mostly located in the Ind. District, with a small portion of its northeasterly corner in the Rural Agricultural Zoning District. The northeasterly corner of this parcel will not be disturbed by the planned development.

23. The JSCL parcel mostly consists of open land, with a line of trees running near its westerly boundary. The parcel has 229.57 feet of road frontage along Tupperts Crossing, which runs along the southerly boundary of the parcel. See site plan, admitted as Applicant Exhibit 1, Sheet C1-01. The lot is approximately 560 feet deep. Id.

24. An area map was admitted at trial as Appellants' Exhibit 3 that depicts the JSCL parcel and the five residences along Tupperts Crossing, described below.

25. To the west, the parcel is bordered by a residential property owned and occupied by Irene Steady, who resides at that home with two disabled adults, who are relatives of Ms. Steady.³ Ms. Steady purchased her property in October of 2017; she and her relatives moved into the mobile home on the property in November of 2018.

26. The Steady residence is located about 250 feet from the proposed trucking terminal site improvements. In addition to her home residence, Ms. Steady has a shed and open carport on her property, as well as a barbeque grill and a fire pit that she and her relatives use regularly. While the Steady property abuts the JSCL parcel, there is no clear view of the JSCL parcel from the Steady property, due to the row of trees along their border, and the fact that the Steady property sits much lower in elevation than the JSCL parcel.

³ Ms. Steady chose not to enter her appearance as an Interested Person in this appeal, although she was called as a witness and provided compelling testimony.

27. Appellants Exhibit 6 includes photos of the exterior of Ms. Steady's home and outbuildings.

28. The western boundary of the Steady property runs parallel to railroad tracks that cross Tupper Crossing.

29. To the north, the JSCL parcel is bordered by open lands; these lands and the JSCL parcel were once part of a larger parcel that was subdivided to create the JSCL parcel.

30. To the east, the JSCL parcel is bordered by property owned by Aubrey J. Choquette and Kenneth Villeneuve, which sits at the junction of Tupper Crossing and U.S. Route 7. Messrs. Choquette and Villeneuve purchased this property in 2012, which they use as their primary residence. Their home's E-911 address is listed as U.S. Route 7. The front of their home faces U.S. Route 7, although they rarely use the front yard; their home activities, including gardening, use of a patio and grill, take place in the rear yard, which faces the JSCL parcel. Their property sits slightly higher in elevation than the JSCL property.

31. Appellants Exhibit 4 includes photos of the exterior of Messrs. Choquette and Villeneuve's home and their rear yard.

32. Mr. Choquette credibly testified about why they have chosen to mainly use the rear of their property, including the considerable traffic that passes in front of their property, which abuts U.S. Route 7. Mr. Choquette credibly reported that there is "significant" truck traffic along Route 7 that passes their home; he reported an estimate of about 12,000 vehicles passing in front of their home on Route 7 on an average work day. He noted that the traffic noise is so significant and steady that they choose not to open the windows on the front side of their house.

33. Messrs. Choquette and Villeneuve both testified about their concerns with having a trucking terminal abutting their home property. They believe the trucking terminal is much more akin to a "heavy industry use" and not a "light industry use," as defined in the Zoning Bylaws and Subdivision Regulations of the Town of Ferrisburgh ("Bylaws"). See Bylaws § 2.2. Mr. Choquette expressed concerns about the noise and air pollution that would emanate from the trucks, as well as the glare from the truck headlights and the lighting proposed for the JSCL site.

34. Under cross examination, Mr. Choquette admitted that many of the other possible uses that could be subject to conditional use approval in the Ind. District would likely have a greater

and more adverse impact upon them than the proposed JSCL truck terminal, servicing no more than nine trucks and trailers that are away from the neighborhood for most of the day. Some of the other conditional uses Mr. Choquette discussed included a warehouse, a public utility, an animal hospital or veterinary clinic, a gas station, a contractor's yard, a public garage, or a mine, quarry, sand, or gravel pit. Bylaws §4.5(C).

35. South of the JSCL parcel, across Tupperts Crossing, is the home of Stephanie M. Warner, who lives with her father, Jason Warner. Their home address is 187 Tupperts Crossing. Ms. Warner's brother lives in a separate home on the same property. Ms. Warner reported that she and her family members have lived on this property for most of their lives.

36. By Ms. Warner's estimate, Route 7 is "a short distance away." The westerly boundary of the Warner property is parallel to the railroad tracks that cross Tupperts Crossing.

37. The Warner home is located about 150 feet from the proposed trucking terminal site improvements, which are to be located on the opposite side of Tupperts Crossing from her home. Appellants Exhibit 5 includes photos of Ms. Warner's property and views to and from the JSCL project site.

38. Both Ms. Warner and Ms. Steady explained that freight trains regularly travel along train tracks that parallel their westerly property line at the rate of 2-3 per day, with several passenger tourist trains also passing in the early evenings of summer. The train traffic is less in the evening hours, with about one or two trains between the hours of 9:00 pm and 5:00 am. Ms. Steady explained that she has gotten use to the trains and their occasional whistles, and that the train traffic does not bother her.

39. Some of the railroad freight cars and tankers that travel across Tupperts Crossing on these train tracks carry gasoline and diesel fuel. As a train approaches and passes over Tupperts Crossing, its whistle is blown for about 60 seconds.

40. Ms. Warner explained that several years ago, the railroad crossing on Tupperts Crossing was improved to include cross bars and lights that are activated by an approaching train.

41. Ms. Warner's father and one or more members of Ms. Steady's family used to drive large trucks, including on Tupperts Crossing. Ms. Warner and Ms. Steady are familiar with truck traffic

and reported that delivery and milk trucks often travel on Tupper Crossing. There are several nearby farms that use Tupper Crossing for their truck traffic route.

42. Ms. Warner expressed concerns that the fuel tankers to be parked on the JSCL property would present explosion risks and increase the risk of fire or explosions on their property, due to their frequent use of a gas barbeque grill and fire pit. Ms. Steady expressed similar concerns. Ms. Warner also expressed concerns about the lights from the truck and site lights, especially since her property is directly across Tupper Crossing from the project site. Trucks turning around and parking on the JSCL site will likely shine their headlights onto the Warner property.

43. Farther west on Tupper Crossing, by about two tenths of a mile, is the home of Carol L. Allen, whose address is 339 Tupper Crossing. Ms. Allen owns her home and has lived there for twelve or more years.

44. The Allen home is on the other side of the railroad tracks from the JSCL parcel and the Steady and Warner homes. The Allen home is on the southerly side of Tupper Crossing. Appellants Exhibit 8 includes photos of the exterior of Ms. Allen's home.

45. The railroad tracks delineate one of the boundary lines between the Ind. District and the Rural Agricultural Zoning District. See Applicant Exhibit 5. Because of this delineation, Ms. Allen's property is in a different zoning district than the JSCL parcel.

46. Even though U.S. Route 7 is less than a half mile away, Ms. Allen and her fellow neighbors consider their neighborhood as quiet, rural, and distinct from the steady traffic of Route 7. Ms. Allen explained that she cannot see Route 7 from her house and that Route 7 is "not part of my neighborhood."

47. Using a game camera that she installed on her front porch, Ms. Allen counted the trains, trucks and cars that passed along Tupper Crossing during several different 24-hour periods. She then prepared a spreadsheet to detail the traffic she recorded; her traffic spreadsheet was admitted at trial as Appellants' Exhibit 21. Ms. Allen's records reveal light but consistent car and truck traffic passing by her home, as well as occasional train traffic. One or more trains regularly pass by between the hours of 1:00 am and 6:00 am.

48. However, due to the location of her home, Ms. Allen's traffic count did not record the traffic that passed in front of the JSCL property, although given the short distance between the two properties, Ms. Allen's traffic count provides some insight into the Tupper's Crossing traffic.

49. Ms. Allen and her neighbors are concerned about the truck traffic and other impacts that the proposed project will bring to their neighborhood. In particular, Ms. Allen is concerned that JSCL trucks being operated in the evening and early morning will shine their headlights onto her home, particularly as the trucks turn into and through the project site.

50. Many neighbors also expressed safety concerns that the proposed project will bring to their neighborhood. They fear that the returning tankers even with just fumes or little fuel in their tanks will have a potential for exploding. The Court was not provided with evidence of such explosions occurring at any truck terminals or while other trucks and trailers were transporting fuel.

51. The final Tupper's Crossing residence is owned by David Pierson and Jane Melrose. Their home is also located in the adjoining Rural Agricultural Zoning District. While their property has frontage on Tupper's Crossing, their home address is 888 Botsford Road, since their home is closest to and is orientated towards Botsford Road. Nonetheless, the rear of their home faces across a field, towards the JSCL parcel.

52. Mr. Pierson is concerned about the possibility of truck headlights from the JSCL property shining towards their home. He also expects that they will be able to hear the truck engines. Mr. Pierson noted that the JSCL parcel is at a slightly higher elevation than their home and believes that JSCL truck noises will travel down the sloping hill, towards their home.

53. Mr. Pierson noted that they can hear traffic noises from U.S. Route 7, although he explained that he considers it as simply "white noise" or "background noise."

54. Traffic on Tupper's Crossing is relatively light. In addition to the delivery and milk trucks mentioned above, that traffic includes personal vehicles, farm vehicles (i.e.: haying equipment, manure spreaders, and feed supply vehicles), and area residents walking along the road.

III. Proposed Facility and Site Improvements

55. JSCL wishes to improve its property on Tupper's Crossing to serve its fuel hauling business. The site improvements were detailed by JSCL engineer John Pitrowiski and depicted on the site

plans (Applicant Exhibit 1) and demonstrative slide show (Applicant Exhibit 6), both prepared by Mr. Pitrowiski. The site improvements would include the following:

- a. An 8,000 square foot commercial building to serve as an interior space to do light repairs and maintenance on the fuel-hauling trucks.
- b. The first floor of the building will include an 1,100 square foot office area and a 6,900 square-foot area for the truck repairs and maintenance to take place. Above the office space will be a second floor, which will consist of another 1,100 square foot area for additional office and storage space.
- c. JSCL, through its engineer, presented design plans for the building that depict the architectural style and dimensions of the building; these design plans are depicted in Mr. Pitrowiski's slide show (Applicant Exhibit 6) at Slides 6 and 7. As shown, the design incorporates three roof-top cupolas, hay loft style attic doors below the roof peak on the south side, and a façade on the front side of the building which will help the proposed structure blend into the Town's rural and agricultural landscape.
- d. The front (southerly side) of the building will be 80 feet wide and will face Tupper's Crossing; it will include a large overhead door in its center, with two smaller entry-type doors on either side of the overhead door. See Exhibit 6, Slide 6. This wall will also include several smaller windows and the hay loft attic door, mentioned above. There will be five automobile parking spaces in front of the building, and one extra parking space designated for handicap parking. There will be an additional five automobile parking spaces along the westerly side of the building, for a total of eleven parking spaces.
- e. The westerly side of the building, facing Ms. Steady's property, will be 100 feet long and also contain a large overhead door, with a small entry way door to the right of the overhead door. See Exhibit 6, Slide 7.
- f. The easterly and northerly sides of the building will not have large overhead doors. The north side, measuring 80 feet wide, will have one small entry/exit door and several windows. The easterly side, measuring 100 feet long, will have several windows but no doors. See Exhibit 6, Slides 6 and 7.
- g. The site plan (Exhibit 1, Sheet C2-01; also shown on Exhibit 6, Slide 3) depicts the pattern for truck traffic entering and exiting the site, as well as the paved portion of the entrance and the area surrounding the building. The site plan also depicts the parking area for up to nine trucks and trailers on a gravel parking area, west of the building and pavement. A truck and trailer washing area will be located west of the building and east of the gravel parking area.
- h. An eight-foot tall metal mesh security fence will surround the paved area, building, and gravel parking area. A gate will be located parallel to and east of the front wall that will allow trucks and trailers to enter the fenced-in area. The gate will be motorized and activated by a keypad. Another gate, located parallel to and south of the westerly wall, will allow trucks and trailers to exit the fenced-in area. Id. Truck

drivers and Town fire and safety departments will be provided with the access code to enter and exit the gated and fenced area.

i. Trucks will travel in one direction through the site, entering through the motorized gate east of the building, driving around the rear of the building, parking in the spaces near the westerly boundary when necessary, and exiting the site through the gate just south of the southwest corner of the building. Backup alarms on the trucks and trailers will be deactivated while on the site.

j. There will also be a security system with cameras, so that activity within and around the building and fenced areas can be monitored from on and off site.

k. Heating, ventilation, and air conditioning units and other electrical equipment, as well as a fenced dumpster area will be located to the rear of the building. The heating system will be fueled by used motor oil collected through the truck maintenance and servicing process.

l. Farther behind the building will be a concrete pad on which a 4,000-gallon diesel fuel storage tank will be located. This is the same tank that is now located on the DeVoses' dairy farm. It is used now to fuel the J.A. DeVos trucks and is proposed to be used by JSCL to fuel its trucks from the Tupper's Crossing site. The location of the concrete pad and above-ground diesel fuel tank is identified on the site plan (Applicant Exhibit 1, Sheet C2-01) and the details of the concrete pad, sheltering for the diesel tank, and the grit/oil/water separator are detailed on Exhibit 1, Sheet C8-03.

m. This concrete pad will have a 12" skirt around its exterior edges to contain any fuel spills. The pad will have a drain near its center, which will direct any possible spills to a 12" drainpipe that then directs the spilled fluid to an oil, grit, and water separator. See Exhibit 1, Sheet C2-01.⁴

n. All light fixtures will be down-cast, use high efficiency LED bulbs, be dimmable during non-business hours, and controlled by motion sensors. The lights will be dimmed or off during non-business hours, and when no employees or drivers are at the project site. There will be ten fixtures mounted on the sides of the building; lights on the east and west sides of the building will be mounted at ten feet high and the lights on the south and north sides of the building will be mounted at fifteen feet high. There will also be seven pole mounted lights, installed at 15 feet high, around the driveway and parking areas. See Exhibit 1, Sheet L2-01. The height of these pole lights will be lower than conventional parking lot pole lights. These characteristics will result in a minimizing of the impacts on the surrounding neighbors from the project's lights.

o. The building, pavement, and other site improvements will encompass 1.52± acres of the 9.0± acre site, thereby causing about 16.9% of the JSCL parcel to be

⁴ See "JSCL, LLC Tupper's Crossing Facility Spill Prevention, Countermeasure & Control Plan" by Trudell Consulting Engineers, created June 2019, a copy of which was admitted at trial as Applicant Exhibit 23.

occupied with improvements which constitute impervious surfaces.⁵ The limit for site improvement lot coverage in this Ind. District is no more than 40%. Bylaws § 4.5(c)(10).

56. Mr. DeVos estimates that JSCL will employ one full-time and up to six part-time employees at the new facility, not counting the truck drivers. The regular business hours of operation for the office and garage employees will be 8:00 am to 5:00 pm, Monday through Saturday. The office and garage will not be open to the public; there will be no retail operations. The only visitors expected to the site will be tire, oil, and truck parts vendors.

57. These new facilities will only be used for the operation of the JSCL fuel trucking business.

58. JSCL proposes a different operational day for the truck drivers. Generally, most drivers will arrive at the facility on or after 5:00 am. The drivers' workday will be staggered, depending upon their scheduled route and the demand for fuel distribution. The driver with the last shift may not return to the new facility until 10:00 pm, although most trucks and tankers will return to the JSCL site by 5:00 pm. This estimated driver workdays are based up on the experience of J.A. DeVos drivers, working from the DeVoses' dairy farm. Historically, J.A. DeVos's drivers have worked between six and eleven hours on a given workday.

59. JSCL hopes to employ up to nine truck drivers, although the expectation is that JSCL will begin operations with no more than seven truck drivers. Qualified truck drivers are currently in short supply.

60. Mr. DeVos also expects that he will occasionally receive calls that request an emergency delivery of fuel because a retail station has run out of fuel. In such an instance (and as he has done in the past from his dairy farm), a driver will be asked to arrive at the facility in the middle of the night to take a truck and trailer to one of the fuel supply facilities, fill the tanker, and deliver the needed fuel. At trial, Mr. DeVos did not supply an estimate of how frequently he would receive such calls, other than to say it was not a regular occurrence. However, he noted that some of his drivers prefer to pick up their assigned truck and tanker earlier than 5:00 am, so that they may complete their deliveries earlier in the afternoon.

⁵ These site improvements and lot coverage calculations follow a customary practice of not including the areas to be disturbed by the stormwater and wastewater treatment systems or the landscaping and screening additions.

61. Once a truck driver arrives at the JSCL facility in the early morning hours, they will park their personal vehicle, inspect the truck and tanker assigned to them, run it for a short while as a warming up exercise, and then leave for the day. Once each of the drivers leaves for the day, there will be little activity at the facility until the end of the day.

62. Once the driver leaves the facility, they will drive to U.S. Route 7, some 750 feet away, and travel to either Burlington, VT or Albany, NY to fill their tanker with fuel, and then deliver that fuel to their assigned retail stations. Once the driver completes their last delivery, they will return to the JSCL facility with an empty tanker. A driver can confirm that the tanker is empty of fuel through gauges and view shields on the undercarriage tanker lines. Even with these functions, “empty” tankers have been known to have residual fuel remaining in the tanker, from simply fumes to as much as 50 gallons.

63. When a driver returns to the JSCL facility, they will refuel the truck from the above-ground diesel tank on site, so that the truck will be prepared for the next day’s travels. They will also wash the truck and tanker at the washing area, then park the truck and tanker at one of the nine truck and trailer parking spaces inside the security fence, near the westerly boundary. There will be no more than thirty truck and tanker washings per week, which is allowed under the stormwater treatment permit JSCL secured from the Department of Environmental Conservation (“DEC”), which is a subdivision of the Vermont Agency of Natural Resources (“ANR”).

64. The water discharged from the truck washing will be directed to sheet flow over a vegetated area and directed to a detention pond to the north of the developer portion of the property. A sketch of this area and how the wash water will sheet flow is depicted on Exhibit 6 at 47.

65. The permitted stormwater treatment plans provide for the flow of water from the truck washing to flow down a shallow slope in a northerly direction, over a vegetated surface.

66. The wastewater and potable water supply systems for the JSCL facility are depicted on Applicant Exhibit 1, Sheet C3-01. DEC determined that the proposed wastewater and potable water supply systems conformed to the applicable ANR regulations and approved these systems, pursuant to Permits #WW-9-1325, WW-9-1325-1, and WW-9-1325-2, all of which were admitted into evidence as Applicant Exhibit 22.

67. JSCL's plans are to receive potable water from the municipal water supply system and to treat its wastewater in a to-be-constructed on-site mounded leach field and supporting system. The details of the approved on-site wastewater system are detailed on Applicant Exhibit 1, Sheets C3-01, C8-01, and C8-02.

68. JSCL's grading and stormwater treatment plans also received DEC approval. The grading and treatment plans are detailed on Applicant Exhibit 1, Sheets C2-02, C8-02, and C8-04. These stormwater treatment plans incorporate a series of grass channels, stormwater ponds, a level spreader, and riprap to manage stormwater flow from the impervious surfaces (roof and pavement), which allow for stormwater to be adequately treated before leaving the project site.

69. DEC determined that JSCL's grading and stormwater treatment plans conformed to the then-existing State of Vermont Stormwater Regulations and on May 31, 2017 issued Permit Number 7728-9015, which authorized JSCL to construct and discharge under General Permit 3-9015 (effective through May 31, 2022). A copy of this permit and authorization was admitted at trial as Applicant Exhibit 16.

70. A portion of a delineated Class II wetland is located on the northeasterly corner of the JSCL property and continues onto lands of others to the north. See Applicant Exhibit 1, Sheet C1-01. The site improvements will not encroach into this wetland or its 50-foot protection buffer. The proposed systems will also protect this wetland from untreated stormwater that will flow over the proposed project site.

71. Landscaping plans are depicted on Applicant Exhibit 1, Sheet L1-01. These plans include the creation of a large berm on the east side of the property, as well as the planting of 93 trees and various shrubs, mostly Vermont native species; those plantings are detailed on Applicant Exhibit 14. The planting plans went through several revisions as the ZBA conducted its several hearings. This berm and plantings will partially screen the view from the east of the building and the project site.

IV. Anticipated Impacts and Mitigation Efforts

72. Several neighbors expressed concerns that the diesel tanks on the trucks and the fuel tanker trailers with even a small amount of residual fuel that would be stored overnight at the project site will bring the possibility of hazardous material spills and explosions to their

neighborhood. No evidence was presented to the Court of either the J.A. DeVos facility at the dairy farm, nor of any similar trucking terminal ever having experienced the spills and explosions that the neighbors fear. In fact, the Fire Chief provided credible testimony that the neighbors will more likely be exposed to the potential for fuel explosions from their own automobile tanks and propane grill tanks, especially those being stored in close proximity to their open fire pits and grills.

73. The neighbors also expressed some concerns about the site lighting plans, although those concerns seemed to have diminished somewhat after JSCL officials and experts explained the use of lower light poles and downcast boxed lighting on the building that would minimize the sight of a light's illuminating element from off site. The light glow may be observable from off site, particularly at the nearby homesteads, but no testimony was offered that the lighting elements would be visible off site. Eliminating the view of the lighting elements reduces the impact from light fixtures because a view of only what a light illuminates has less impact than the light source itself.

74. There were greater concerns expressed about the truck headlights spilling onto neighboring properties, particularly as the trucks drive around the JSCL building and pull into the parking spaces near the western boundary of the JSCL property. The wire mesh security fence may provide some shielding of these headlight illuminations, but there is no doubt that truck headlights, particularly from trucks operated during the early morning or evening hours, will be seen from the Warner, Allen, and Pierson/ Melrose residences. The eight-foot tall security fence will have a screening mesh that will partially screen truck lights from the interior parking areas.

75. Most of the neighbors testified that the noise from U.S. Route 7 traffic is noticeable at their residences, in the day and even in the night. Also, the train noises, including whistles, from the occasionally passing trains is also heard from all the Tappers Crossing residences.

76. Neighbors sincerely assert that theirs is a quiet, lightly traveled road with pastoral rural views. While their neighborhood affords beautiful scenic views to the west and beyond, their neighborhood is also characterized by the noises emanating from the heavily-travelled commercial corridor of U.S. Route 7 that is just several hundred feet to the east, and the

occasional, but consistent train traffic to the west. All neighbors also acknowledged that large delivery and agricultural trucks travel on Tupper's Crossing on a regular basis.

77. The proposed project will bring additional noises to this neighborhood from the truck traffic that enters and exits the project site. Given that J.A. DeVos currently operates with six truck drivers, and the proposed JSCL project site will accommodate no more than nine trucks and trailers, the volume of JSCL trucks entering and exiting the site will be relatively small, when compared to the heavy truck traffic on U.S. Route 7, and even when compared to the modest volume of delivery and other trucks that travel over Tupper's Crossing.

78. Some of the JSCL trucks and trailers will travel over Tupper's Crossing in the early morning and evening hours, when other traffic on Tupper's Crossing is less than during the day. But there was no evidence presented that truck and other vehicle traffic on U.S. Route 7 is eliminated at night. In fact, JSCL's noise expert credibly estimated that the additional noises brought to the neighborhood by the JSCL project will not exceed the noise levels already experienced in the neighborhood. He based his estimate upon the monitoring of actual noises currently occurring in the neighborhood, actual noise readings from existing JSCL trucks, and estimates of the noises that will emanate from the JSCL trucks once the JSCL project site is fully constructed and operational.

79. JSCL's noise expert conducted monitoring of the existing noises experienced on the western and eastern sides of the project site, along Tupper's Crossing. That expert provided the details of where and how these monitors were located, how long the monitoring was conducted, and the results of that monitoring in his report, admitted at trial as Applicant Exhibit 26 ("RGS Updated Noise Assessment").

80. The two monitors, one placed upon the southeastern edge of the proposed building site and one near the western boundary line, are referred to as "long-term monitors" as they recorded existing sound levels over several days. Id. at 6.

81. The expert also located a third noise monitor, along the northern boundary of Tupper's Crossing and about 165 feet from U.S. Route 7. This monitor is referred to as a "short-term monitor" since it recorded sound levels for a shorter period of time (less than a day). Id.

82. Sound levels are often measured in decibels (“dB”). When sound levels are measured in the field, it is important to note whether the sound level is being recorded at the source of the sound or, if not, how far away the monitor is from the sound source. When determining adverse impacts upon neighbors, the most relevant recordings reported can be at either the neighbor’s boundary line, from their yard, or within their home.

83. As a person or sound monitor moves away from the sound source, the perceived sound level decreases, due to the way in which sound disburse, much like the ripples caused by a rock thrown in a pond: the ripples lose energy and diminish as they move away from the source.

84. Sound monitoring can be assessed and reported is several ways. One common way of describing sound levels is the “Continuous Equivalent Sound Level, or Leq. This descriptor denotes the average sound pressure level over a defined period of time, such as one second, one hour or one day.

85. For the purpose of these noise assessments, the sounds recorded by the monitors on the JSCL site were reported in one-second intervals (Leq_{1 sec.}). Sounds from the short-term monitor were analyzed using these one-second intervals, while the sounds recorded on the long-term monitors were agglomerated into ten-minute intervals (Leq_{10 min.}) and overall daytime and nighttime periods for analysis. The recorded sounds are averaged over the time period specified.

86. Prior court decisions also have referenced the L_{MAX} format, sometimes described as measuring instantaneous noise. JSCL’s engineer explained that one second interval sound recordings (Leq_{1 sec.}) are also often referred to as “L_{S MAX}” (denoting a 1-second time constant). A sound meter can be set to record at this level (as well as the “L_{F MAX}” level for “instantaneous” or 1/8th-second time constant) to capture the highest and lowest sound levels measured during a given monitoring session. Applicant Exhibit 26 at 23.

87. We anticipate that sound reported in the L_{S MAX} (or Leq_{1 sec.}) format would not differ significantly from sounds reported in the L_{F MAX} (or Leq_{1/8 sec.}) format. We arrive at this conclusion because we do not anticipate that the human ear can discern a significant difference between an instantaneous sound measured over a 1/8th of a second time frame and an instantaneous sound measured over a one second time period. If there is a basis for viewing these two manners of

reporting sound as measurably different, we were not provided an explanation for such a difference at trial.

88. In fact, JSCL's engineer credibly explained that past reports from sound engineers, as referenced by the former Vermont Environmental Board and our Supreme Court, that have used the "L_{MAX}" notation, were actually referencing sound recordings over a one second period of time. See Applicant Exhibit 26 at 23 (noting that "in the precedents set by the former Environmental Board under Vermont Act 250, the time response is not specified, but in the Barre Granite case which set the 55 dBA L_{MAX} precedent the metric L_{S_{MAX}} (a 1-second response time) was used. Since that time, the maximum Leq 1-second has also been used as it is comparable to the L_{S_{MAX}}"). We will use the notations provided by the expert in this case, keeping in mind the overlap between terms described above.

89. One other uniqueness concerning perceived and measured sound is that multiple sounds at similar or differing sound levels do not add up arithmetically. For example, two or more sounds at the same decibel level do not result in the doubling of the perceived or measured sound level. Rather, the two sounds at the same level result in a slight increase of the total decibels perceived of about 3 dB. Id. at 25. A difference in sound level of less than 3 dB is "generally not perceptible." Id. at 20.

90. A sound that is louder than another sound that accompanies it will always dominate the less loud sound. Sound levels that are 10 dB louder than another sound are perceived to be twice as loud as the lesser sound.

91. One further distinction to consider when attempting to ascertain sound levels is that the human ear is not equally sensitive to all frequencies of sound. Sounds at some frequencies seem louder than others, despite having the same decibel level as measured by a sound meter; human hearing is much more sensitive to medium pitched sounds than to lower pitched sounds. Id. at 22. An idling heavy truck often emits lower pitched sounds than a truck that has been accelerated.

92. Because of this difference in perceived sounds at differing pitches, sound testing authorities have established "frequency weightings" as a filtering mechanism, so that reported sound recordings more closely mimic the sounds perceived by the human ear. While there are

several recognized sound frequency weightings, the most commonly used weighting for environmental noise analysis and regulation purposes is referred to as the “A” weighting. When using this “A” frequency weighting, the sound levels are reported as “dBA.” Id.⁶

93. We note that the Bylaw provision that references sound differences brought to a neighborhood prohibits “noise which is excessive at the property line and represents a significant increase in noise levels in the vicinity of the [proposed] development so as to be incompatible with the reasonable use of the surrounding area.” Bylaws § 8.1. This provision also references a limit of “seventy decibels at the property line,” but does not offer guidance on the time period over which sound levels should be recorded and reported. Id.

94. All of these characteristics concerning sound, whether it is measured in “sound power” or “sound pressure” can be difficult to grasp and retain.⁷ Thankfully, JSCL’s engineer credibly provided some examples of sound levels that are commonly perceived, such as those sounds evidenced in quiet rural and suburban areas (such as a slow-passing or idling car, often evidenced in the 50–60 dBA range), a vacuum cleaner (70–80 dBA range), or a riding lawn mower or snowmobile (90–100 dBA range). Applicant Exhibit 26 at 21.

95. The current, pre-development sounds recorded by the short-term monitor evidenced existing sound levels of 55 to 75 dBA Leq _{1 sec.} This short-term monitor was located within the right-of-way of Tupper Crossing, about 165 feet west of Route 7. Those same or similar sounds were also recorded on the long-term monitors at slightly different levels. The western monitor, located near the westerly boundary of the JSCL parcel, 180 feet north of Tupper Crossing and 350 feet east of the rail road tracks, recorded higher sound levels than the eastern monitor, due in part to the occasionally passing trains. The western monitor recorded daytime sound levels at between 40 to 74 dBA Leq _{10 min.}, with train sounds accounting for the levels between 65 and 74 dBA Leq _{10 min.} When the train sounds are excluded from the sound study, the western monitor recorded the remaining sound levels during the daytime of between 40 to 50 dBA Leq _{10 min.}, while

⁶ The less frequently used frequency weightings are referred to as “B” and “C.” JSCL’s noise expert didn’t rely upon these alternate frequency weightings and we do not so rely in these Findings.

⁷ “Sound power” is a means by which to measure the intrinsic sound emitted by a specific source. “Sound pressure” measures the perception of a sound at a certain distance from the source and under certain conditions, such wind, trees and vegetation, etc. Sound power is a constant value for a specific source; sound pressure will vary over differences in distance from the source. Applicant Exhibit 26 at 25.

sounds recorded during the nighttime by this western monitor were reported at between 35 to 49 dBA Leq_{10 min}. Id. at 3–5.⁸

96. For the eastern monitor, which was about 800 feet west of U.S. Route 7 and 200 feet north of Tupperts Crossing, the reported sound levels were between 47 to 55 dBA Leq_{10 min} for the daytime and between 38 to 52 dBA Leq_{10 min} for the nighttime. Id.

97. Average daytime sound levels in the area are 52 dBA as recorded by the eastern monitor and 56 dBA as recorded by the western monitor. Average nighttime sound levels are 47 dBA as recorded by the eastern monitor and 52 dBA as recorded by the western monitor.

98. The existing soundscape of the area is composed primarily of traffic noise from U.S. Route 7, local traffic on Tupperts Crossing, occasional passing trains, and regular biogenic and geophonic sounds (e.g. bird calls, wind in the trees, etc.). Applicant Exhibit 26, at 4.

99. These monitoring results were not credibly contradicted at trial. In fact, other than anecdotal testimony, the JSCL noise monitoring reports and the author’s testimony were the only noise evidence presented at trial.

100. JSCL’s engineer provided credible estimates of the types of noise levels that the proposed project would bring to the Tupperts Crossing neighborhood. First, he recorded the sound pressure levels created by one of the current J.A. Devos trucks performing various functions that could occur at the proposed project site, including idling, accelerating onto a public roadway, and travelling on a roadway at 20 miles per hour while passing by a sound monitor. This exercise revealed the following sound pressure levels of an actual J.A. Devos truck:

- Heavy truck idling, as measured from 55 feet away: 59 dBA;
- Heavy truck pulling out of a driveway and accelerating onto a roadway, as measured from 75 feet away: 71 dBA;⁹ and
- Heavy truck passing by on a roadway, as measured from 66 feet away: 65 dBA.

⁸ While excluding the train noise reports provides a picture of what noise level is experienced when trains are not passing, we must emphasize that the train noises are a consistent, if occasional, component of the noises that this neighborhood currently experiences.

⁹ We believe it important to note that no boundary, and no Neighbor’s residence is only 75 feet away. In fact, the closest residence, the Warner residence, is twice that distance away, at 150 feet.

Id. at 8. The engineer used the recorded sound pressure levels to calculate the actual sound power levels, or intrinsic sound emissions in dBA, of the truck – for use in the CadnaA sound modelling described below.

101. JSCL’s engineer provided credible and uncontested testimony of modelling what the planned truck activity will generate for noise at the JSCL project site. He used the CadnaA software in constructing his modelling, which is an internationally accepted acoustical software program that has been accepted for many years in the United States and abroad as a reliable sound modeling methodology, including in proceedings concerning Vermont municipal land use review, Act 250 review, and before the former Vermont Environmental Board, this Court, and the Vermont Supreme Court. Id. at 9.

102. The CadnaA software takes into account source sound power levels, surface reflection and absorption, atmospheric absorption, geometric divergence, meteorological conditions, walls, barriers, earthen berms, and terrain, all in determining the proper sound pressure estimates. Id.

103. The Federal Highway Administration (“FHWA”) maintains a schedule of noise emission sound levels from across the country for over 6,000 types of vehicles as they pass by a noise monitor. These FHWA vehicle noise schedules are known as “the Reference [of noise] Energy [for] Mean Emission Levels,” often referred to as “REMEL.” Id. The REMEL schedule is based upon actual sound recordings of some 6,000 vehicle types, recorded from 1993 to 1995. Id. at 9, fn. 3, 4.

104. To present a prediction of the noises to be produced and realized at and near the JSCL site on Tupper’s Crossing, JSCL’s engineer used the CadnaA software, calibrated to the JSCL site and its surroundings. He then produced seven scenarios to estimate the truck sounds that would be realized on the project site:

1. One-Hour Scenario — A conservative one-hour equivalent $Leq_{(1-hr)}$ scenario that included nine trucks entering the site, driving around the back of the building, and then exiting, over the course of one hour. . . .
2. Southern Maximum FHWA Scenario— A “maximum” scenario when sources are located on the southern half of the site which included one truck accelerating out of the driveway, another truck driving on the southern side of the site, and another truck

idling in the parking area. This scenario included FHWA standard noise emission data. . . .

3. Southern Maximum JSCL Scenario — A “maximum” scenario when sources are located on the southern half of the site which included one truck accelerating out of the driveway, another truck driving on the southern side of the site, and another truck idling in the parking area. This scenario included only the measured noise emission data from the JSCL truck tested on July 5, 2017. . . .
4. Northern Maximum FHWA Scenario— A “maximum” scenario when sources are located on the northern half of the site which included one truck accelerating along the eastern side of the building, another truck driving around the northwest corner of the building towards the parking area, and another truck idling in the parking area. This scenario included FHWA standard noise emission data. . . .
5. Northern Maximum JSCL Scenario— A “maximum” scenario when sources are located on the northern half of the site which included one truck accelerating along the eastern side of the building, another truck driving around the northwest corner of the building towards the parking area, and another truck idling in the parking area. This scenario included only the measured noise emission data from the JSCL truck tested on July 5, 2017. . . .
6. Single Night Truck FHWA Scenario— A scenario where only one truck is exiting the site at night. This scenario included FHWA standard noise emission data. . . .
7. Single Night Truck JSCL Scenario— A scenario where only one truck is exiting the site at night. This scenario included only the measured noise emission data from the from the JSCL truck tested on July 5, 2017. . . .

Id. at 10–11.

105. Using these various scenarios and making computations using the CadnaA software program, the JSCL engineer credibly reported the likely sound levels, as emitted at the project site and rippling away from the site. His predictions are detailed in seven demonstrative figures (one for each scenario), reproduced in the RGS Updated Noise Assessment, as Figures 8 through 14, inclusive. Applicant Exhibit 26 at 12–18.

106. As is true for all sound emissions, these modellings detail credible estimates that the sound levels are highest directly at the point of the source (either the JSCL truck or the estimates based upon the FHWA REMEL data), and then lessening as one moves away from the source. As the sound estimates diminish, they approach the location of the JSCL boundary line, the neighbors’ boundary lines, and their homes.

107. It is important to recognize that inputs for the CadnaA model are not sound *pressure* levels measured over a defined length of time, but rather the sound *power* level or intrinsic sound emission of a particular source. The model then takes the intrinsic sound emission and estimates the resulting sound pressure levels at various distances away from the source. It is the Court's understanding that Scenario 1, the "One-Hour Scenario," estimated average sound pressure levels in dBA at various distances over a one-hour period, while Scenarios 2-7 modeled maximum sound pressure levels – what has been called L_{MAX} in other cases – in dBA at various distances. See Applicant Exhibit 26 at 11, 18 (discussing one-hour average sound levels for Scenario 1 and maximum sound levels for the other scenarios).

108. When comparing the sound level estimates reported on these figures, there is a consistent difference of between 4 to 9 dB of the estimated sound pressure levels reported when based upon the FHWA data (Figures 9, 11, and 13; Applicant Exhibit 26 at 13, 15, and 17) and the actual JSCL truck testing (Figures 10, 12, and 14; Exhibit 26 at 14, 16, 18). The sound estimates based upon the actual JSCL truck testing are consistently lower than the estimates based upon the FHWA REMEL data. We find that the estimates based upon the actual JSCL truck testing are more reliable estimators of the noise levels that will be produced at the JSCL site for two reasons: first, we conclude that estimates based upon real-life sound readings are likely more accurate than estimates based upon national estimates, which are often an amalgamation of many similar vehicles. Second, we note that the FHWA REMEL vehicle samples are based upon a testing of 6,000 vehicles recorded between 1993 and 1995, which would represent vehicles that were older than the current JSCL trucks. Mr. DeVos credibly represented that the current JSCL trucks span the 2003 to 2016 model years, and he hopes and expects to cycle new trucks into the JSCL fleet every three to six years. There was credible, uncontested testimony offered at trial that newer trucks are quieter than older trucks.

109. The scenario model based upon the presence of nine trucks on site within a one-hour span estimated sound levels outside the neighboring residences or at the JSCL boundary line of 17 dBA to 39 dBA $Leq_{1 hr}$.¹⁰ The highest reading would be experienced outside the Warner residence, located across Tupper's Crossing from the JSCL site. However, even at the Warner

¹⁰ It appears that the CadnaA software estimates the sound pressure levels in the dBA format only.

residence, and for that matter, at all the Tuppers Crossing residences, these estimated sound levels are at or below the actual average daytime and nighttime sound levels the residences currently experience without the JSCL project in operation. We arrived at this finding by comparing the readings of existing sounds over daytime and nighttime periods at the proposed site (see ¶ 96, above) with the estimated sound levels for future truck operations that are depicted in Figure 8 (Exhibit 26 at 12), which evidences sound level estimates at nearby residences of between 17 to 39 dBA Leq _{1hr}.

110. The maximum sound level estimates based upon the JSCL truck readings (Figures 10, 12, and 14) and those based upon the FHWA REMEL readings (Scenarios 2, 4, and 6 illustrated by Figures 9, 11, and 13) are all below the 70 dBA level referenced in Bylaw § 8.1, with two minor exceptions, each recorded at the southern and eastern boundaries of the JSCL site, and only when a truck is entering the site from Tuppers Crossing. At the point of truck entry, the estimated sound reading at its highest is 71 dBA. Id.

111. Using the more reliable estimates of truck noises based upon the testing of an existing JSCL truck, the maximum sound levels to be experienced outside the nearby residences ranged from 45 to 59 dBA when multiple trucks would be operating at or near the southern boundary of the project site (“Southern Maximum JSCL Scenario,” as represented in Figure 10); from 41 to 54 dBA when multiple trucks would be operating at or near the eastern and northern boundaries of the project site (“Northern Maximum JSCL Scenario,” as represented in Figure 12); and from 45 to 62 dBA when a single truck would be exiting the project site at night (“Single Night Truck JSCL Scenario,” as represented in Figure 14).

112. These various estimated maximum sound levels, as to be experienced outside the neighboring residences, will be lower than many sound levels currently experienced along Tuppers Crossing, pre-development.

Conclusions of Law

We conducted a site visit and multi-day trial concerning this appeal, since the Town determined that it wished for its land use determinations to be reviewed on a *de novo* basis. However, we are not directed or authorized to conduct a full *de novo* review of all the factual and legal issues raised by a pending application. Rather, we are only authorized to consider the

factual and legal issues raised in an appellant’s statement of questions. See 10 V.S.A. § 8504(h) and V.R.E.C.P. 5(g). We therefore look to the Statements of Questions filed by Appellants and Cross-Appellant (JSCL) in this appeal.

I. JSCL Statement of Questions.

JSCL, in its Statement of Questions, challenges each of the seven conditions imposed by the ZBA in its September 17, 2017 approval of JSCL’s conditional use application. The conditions imposed by the ZBA in its conditional use approval are summarized as follows:

Condition 1 asserts that JSCL or its principals “disturbed” the soils at the location of the original entrance point and directed that “[t]his elevation must be returned to the 228’ [elevation] level and reseeded before the landscaping plan is implemented.”

Condition 2 limits the hours of operation to 5:00 am to 10:00 pm, “Daily.”

Condition 3 requires that JSCL truck tankers are to be “empty” when entering and returning to the site. Fuel for the trucks themselves is exempted from this prohibition.

Condition 4 prohibits noise levels from exceeding “70 decibels at any border.”¹¹

Condition 5 directs that the landscaping plan revised as of Aug. 2, 2017 shall be implemented, and that the site landscaping shall be reviewed for conformance with that plan after completing.

Condition 6 requires that JSCL request a new review of its stormwater treatment systems for conformance with new State Stormwater Regulations, which were implemented after JSCL received its stormwater permit, per the recommendation of the Town of Ferrisburgh Conservation Committee. By its terms, that Stormwater Permit, issued on May 31, 2017 (Permit Number 7728-9015) is effective through May 31, 2022. A copy of this permit and authorization was admitted at trial as Applicant Exhibit 16.

Condition 7 directs that JSCL revise its plans for an earthen berm on the eastern side of its parcel (including plantings) so that the berm be increased to a uniform height, so that its “highest edge should extend north [to] the north edge of the paving.”¹²

All of JSCL’s legal challenges concern the conditions imposed by the ZBA. Questions 1 and 2 specifically ask whether conditions 1–7 are “appropriate,” or whether they should be “revised,

¹¹ The ZBA decision reveals that the same JSCL engineer who testified at our trial also testified at two or more of the ZBA hearings, and noted that the trucks noises emanating from the site would not exceed 70 decibels, except for at the southern border, presumably only when the trucks cross the border to enter and exit the site from and to Tappers Crossing. See ZBA Sept. 13, 2017 Decision, a copy of which was attached to Appellants’ Notice of Appeal, filed Oct. 3, 2017.

¹² Our quotation here may not be entirely accurate, since Condition 7 is handwritten and contains revisions. Id. at 8.

clarified, or struck from the decision of this Court.” JSCL Statement of Questions, filed Nov. 28, 2017, at 1. We note that because this is a *de novo* appeal, we will be conducting our own independent review, which in this case will include what conditions are appropriate or should be imposed to bring the pending application into conformance with the applicable Bylaw provisions. See Bylaws § 9.5 (authorizing the ZBA to “attach such reasonable conditions and safeguards, as it may deem necessary to implement the purpose of these bylaws and the [enabling] Act.”); see also 10 V.S.A. § 8504(h) (directing that the Environmental Division shall “apply[] the substantive standards that were applicable before the tribunal appeal from . . . [when] hold[ing] a *de novo* hearing on those issues which have been appealed . . .”). Thus, our review renders JSCL’s Questions 1 and 2 **MOOT**. We will address JSCL’s remaining Questions, to the extent they are not moot, in the context of any conditions we impose during our review and our discussion of Appellants’ Questions.

Appellants’ Questions generally ask this Court to review whether the proposed project, as designed and revised, conforms to various provisions of the Town of Ferrisburgh Zoning Bylaws (“Bylaws”). With that in mind, we turn to the legal issues presented by Appellants in their Statement of Questions, filed on October 25, 2017.

II. Appellant/Neighbors’ Statement of Questions.

1. Appellants’ Question 1:

By their Question 1, Appellants ask whether JSCL’s proposed project complies with the Bylaws, as amended on November 2, 2010. A copy of those Bylaws, which were the Bylaws in effect when JSCL filed its complete application, was admitted at trial as Applicant Exhibit 2. We therefore refer to that Exhibit 2 for our review to determine JSCL’s proposed compliance with the applicable Bylaw provisions. Since Appellants’ remaining six Questions refer to specific Bylaw provisions, we address compliance with those specific provisions when addressing the latter Questions.

Development in the Ind. District is governed by Bylaw § 4.5, the purpose for which is to provide an area for limited growth of new light industry and the continuation of the present industrial uses. Industrial use should be subject to review to protect residential amenities. They should be located with easy access to highway and rail

services. The size of the industrial uses should be restricted to protect the residential character in adjoining districts.

Bylaws § 4.5. Several of these purpose provisions are accomplished by the JSCL proposed project: it will have easy access to highway services; rail services are only several hundred feet away, although not needed for this project. Moreover, the project site greatly exceeds the minimum lot size of two acres. *See id.* And the proposed project will only have a single curb cut on Tupper's Crossing, so as to limit its access to a single way, as the purpose provision instructs. *Id.*

One of the legal issues frequently discussed by the parties at trial and in their post-trial filings is whether the proposed project constitutes "light industry." We address that legal question and its implications below in our conditional use discussion, specifically in relation to the Project's impacts on "[t]he character of the area affected." *See* Bylaws § 9.5(A). Before turning to conditional use review, we address the remaining requirements of the Ind. District pursuant to Bylaw § 4.5.

The JSCL parcel and project conforms to all remaining dimensional requirements of Bylaw § 4.5: as noted above, the parcel is in excess of 2 acres in size; has over 200 feet of road frontage on Tupper's Crossing; and exceeds the minimum lot width and depth. *See* Bylaws § 4.5(C) Dimensional Standards.¹³

The building height does not exceed the maximum height of 35 feet and the lot coverage, including pavement, does not exceed the maximum lot coverage of 40%. *Id.* In fact, the actual lot coverage (16.9%) is less than half of that lot coverage maximum.

Permitted uses in the Ind. District are limited to an accessory dwelling, efficiency or 1 bedroom; a home day care; or home occupation. Bylaws § 4.5(B). There are other uses allowed in the Ind. District, but those uses are allowed only if they receive conditional use approval. The allowed conditional uses are:

1. One family dwelling, including specifically state licensed or registered residential care home or group home serving not more than six persons who are developmentally disabled or physically handicapped, except that no such home shall be considered as a permitted single-family residential use if it is located within 1,000 feet of another such home.

¹³ The Bylaws contain a typographical error: it contains two § 4.5(C). We therefore include the title for this section—Dimensional Standards and Conditional Uses—to differentiate between the two.

2. Two family dwelling
3. Day care facility
4. Enclosed light manufacturing industries
5. Warehouse
6. Public utility
7. Gasoline station
8. Enclosed service and repair
9. Freight and trucking terminal
10. Contractor's yard
11. Public garage
12. Animal hospital or veterinary clinic, provided that animals are housed at least 200 feet from any residential district
13. Parking lot
14. Accessory use
15. Mine, quarry, sand, sub-soil, or gravel pit
16. Accessory dwelling, 2 bedroom
17. Storage trailer
18. Public utility power generating plants and transmission lines
19. Regional solid waste management facilities certified under 10 VSA Chapter 159
20. Hazardous waste management facilities for which a notice of intent to construct has been received under Section 6606(a) of Title 10
21. Other similar uses which meet the intent of purpose statement upon finding by the Zoning Board that the use is of the same general character as those permitted and which will not be detrimental to the other uses within the District or to the adjoining land uses.

Bylaw § 4.5(C) Conditional Uses.

We provide this complete list of the uses that may be permitted upon conditional use approval to provide some context of uses that can be lawfully allowed, so as to help determine how best to classify the use JSCL proposes.

Most relevant to our analysis here is that a "freight and trucking terminal" is authorized as a conditional use. The Bylaws provide that such a use includes "[t]he buildings, facilities, and

parking areas used for the loading, dispatching and storage of freight, freight vehicles, including but not limited to trains, buses and trucks.” Bylaw § 2.2: Specific Definitions.

Both Appellants and JSCL have referred to the Project as a “trucking terminal,” and the proposal fits specifically within the definition above. See id. While Appellants challenge the Project’s compliance with several conditional use standards, they do not appear to suggest that the proposed use should be excluded from conditional use review altogether. We therefore conclude that the Project “may be permitted”, provided that it meets the applicable standards set forth in the Bylaws. See Bylaws § 4.5(C) Conditional Uses; see also Bylaws § 9.5 (setting the standards for conditional use review).

With our review of these preliminary Bylaw requirements, we turn to Appellants’ challenges to the project’s conformance to Bylaw provisions specifically listed in Appellants’ six remaining Questions.

2. Appellants’ Question 2:

By their Question 2, Appellants ask whether JSCL’s proposed project complies with the applicable conditional use provisions and standards, found in Bylaw § 9.5. This is perhaps the most substantive portion of our review, since these provisions and standards require us to review the possible impacts the project may bring to the surrounding community.

Bylaw § 9.5 directs that the ZBA, and by implication this Court when an appeal is taken:

shall review the proposed use for compliance with all applicable standards as contained in these regulations. This review shall specifically include consideration of the stated purpose of the district in which the proposed use is to be located. In granting such conditional use, the board may attach such reasonable conditions and safeguards, as it may deem necessary to implement the purposes of these bylaws and the Act [24 V.S.A., Chap. 117].

Bylaws § 9.5.

We therefore continue our analysis with a review of the general and specific conditional use standards raised by Appellants, including a “consideration of the stated purpose of the district” where relevant. Id.

A. General Conditional Use Standards (Bylaw § 9.5(A))

Pursuant to the general conditional use standards, the Project must not “adversely affect” any of the following: 1) the capacity of existing or planned community facilities; 2) the character

of the area affected; 3) traffic on the roads and highways in the vicinity; 4) the Town Plan and bylaws in effect; 5) the utilization of renewable energy resources; and 6) the appropriate use or development of adjacent property. Bylaws § 9.5(A). We therefore consider the possible adverse impacts that the proposed project may cause under these general conditional use standards.

1. The capacity of existing or planned community facilities. For purposes of our review, “community facilities” has been defined as including only “water supply, sewage disposal, fire protection, school services, recreation facilities, solid waste facilities or police protection.” In re Meaker, 156 Vt. 182, 185 (1991). The most credible and mostly uncontested testimony revealed that the Town’s existing and planned community facilities have the capacity to adequately accommodate the proposed JSCL project, and that the project will not jeopardize any of these facilities. It will be developed on a parcel within the Ind. District, just several hundred feet west of the main north/south highway for western Vermont. The parcel contains level or gently sloping lands with adequate drainage and sufficient areas for the proper treatment of stormwater within the property. The development will be served by available access to a municipal potable water supply system and its planned on-site wastewater treatment system, both of which have been approved by the DEC.

The DEC has also approved JSCL’s proposed on site stormwater treatment system and has concluded that its proposed system complies with the stormwater treatment rules and regulations in effect at the time JSCL filed its complete application. This DEC approval, issued on May 31, 2017, is effective through May 31, 2022.

Since that stormwater approval was granted, ANR has revised its stormwater treatment regulations. At trial, Neighbors asked that the Court require JSCL to immediately seek a review of its proposed stormwater treatment system for conformity with the revised regulations. This request mirrors the request of the Town Conservation Commission, which the ZBA adopted as the basis for its Condition 6, cited above. We were not provided with reference to a legal precedent or authority for this Court to require JSCL to seek a reopening of its stormwater permit. No appeal was taken from that permit approval; by its terms, that permit expires in just over two

years and must be renewed. We decline to follow Appellants' request, since it would ignore the vested rights and permit expiration point for the previously approved stormwater permit.¹⁴

Though municipal roads are not typically considered "community facilities" in this context, the Town Road Foreman credibly spoke of the capacity of area Town roads to accommodate the JSCL traffic. See In re Meaker, 156 Vt. at 185. His assessment was reinforced by the fact that the JSCL traffic would be mostly using state highways (U.S. Route 7 and beyond) and a mere several hundred feet of Town roadways. The Road Foreman concluded that the relocation of the Davos fuel trucking business from Greenbush Road to Tupper's Crossing would be of benefit to his maintenance of Town roads. We adopt the Road Foreman's conclusions.

The Town Fire Chief provided credible and compelling testimony concerning the capacity and adequacy of his Fire Department and, if necessary, adjoining town fire departments, to respond to fire or other emergencies at the proposed JSCL site, including emergencies involving hazardous materials. The Court is convinced that the Fire Chief's assessment is correct: that the likelihood of fire or explosions at the JSCL site are far less than the likelihood of fire or explosions at the nearby residential properties. The Court was provided with no examples of fire or explosions involving the J.A. DeVos trucks and trailers which have operated without conflict or complaint for over thirty years. In contrast, the Chief provided his experience and concerns regarding how propane and automobiles, with gas tanks, are stored on the neighboring residential properties in close proximity to open fire pits and gas barbeque grills.

Neighbors offered testimony at trial from a retired Illinois firefighter, now living in Panton, Vermont: Mr. Howard Hall. Mr. Hall recounted responding in Illinois to dangerous gasoline and hazardous materials fires. However, he admitted to having no familiarity with J.A. DeVos' decades-long trucking operation, and little actual knowledge of the capabilities and capacities of the Ferrisburgh Fire Department and surrounding municipal fire departments. Despite this lack of knowledge, Mr. Hall insisted that he had the ability to predict how quickly area fire departments would be overwhelmed by a likely fire at the JSCL site. His self-assuredness led the Court to assign little to no credibility to his testimony.

¹⁴ JSCL's Question 5, on cross-appeal, challenges the ZBA's Condition 6. Question 5 asks whether the condition should be eliminated given that JSCL has a valid DEC approval. Because our review is *de novo*, and because we conclude that it is not necessary to reopen stormwater review, we conclude that JSCL's Question 5 is **MOOT**.

For all these reasons, we conclude that the existing community facilities have the capacity to accommodate the JSCL project and will not be adversely affected by this project.

2. The character of the area affected. The general conditional use standards set out in the Bylaws mandate that a “proposed use will not adversely affect . . . [t]he character of [the] area affected.” Bylaws § 9.5(A)(2). This mirrors language from the former enabling statute which has now been repealed. See 24 V.S.A. § 4407(2)(A) (repealed by 2003, Adj. Sess. No. 115) (stating: “general standards shall require that the proposed conditional use shall not adversely affect . . . [t]he character of the area affected.”) The current enabling statute differs from the repealed statute in two principal ways. First, it includes a clause defining the character of the area according to the policies and purposes of zoning bylaws and municipal plans. See 24 V.S.A. § 4414(3)(A)(ii). Second, it replaces “shall not adversely affect” with “shall not result in an undue adverse effect.” See id.

While we must adhere to the requirements of the current enabling statute, we have interpreted the decision to retain the outdated language to mean that the municipality wants conditional use review to consider both the character of the area as it exists (as was done under the former enabling statute) and the character of the area as defined in purpose and policy statements in the zoning bylaws and municipal plan (as is called for in the new enabling statute). In Rublee 246 White Birch Lane CU, No. 140-11-15 Vtec, slip op. at 8–10 (Vt. Super. Ct. Envtl. Div. Aug. 23, 2016) (Walsh, J.). We have also held, and the Vermont Supreme Court has affirmed, that the terms “shall not adversely affect” and “shall not result in an undue adverse effect” are “interchangeable in application.” In re Grp. Five Invs., LLC Conditional Use Application, No. 34-3-11 Vtec, slip op. at 11 (Vt. Super. Ct. Envtl. Div. Dec. 4, 2012) (Durkin, J.) aff’d sub nom. In re Grp. Five Invs. CU Permit, 2014 VT 14, 195 Vt. 625, overruled in part on other grounds by In re Confluence Behavioral Health, LLC, 2017 VT 112 (Vt. Dec. 8, 2017).

In short, we must determine whether the Project will have an undue adverse impact on the character of the area, as it is defined by the existing uses in the area as well as the purpose and policy statements in the Bylaws and the municipal plan.¹⁵ In considering this standard, we

¹⁵ Appellants have challenged the Project’s impacts on the character of the area both in terms of “physical” (or aesthetic) and noise impacts. This section is limited to physical impacts. We address noise impacts together with other noise issues later in this Decision, to avoid repeating our discussion of the evidence.

are guided by the two-prong analysis, known as the “Quechee test,” used in reviewing state land use (Act 250) permits. See In re Grp. Five Invs. CU Permit, 2014 VT 14, ¶ 12 (approving use of the Quechee test as guidance in defining undue adverse impacts in zoning bylaws). Under the Quechee test,

[the Court first] determines if the proposed project will have an adverse ... impact, and if so, it considers whether the adverse impact would be undue. An adverse impact is considered undue if *any one* of the three following questions is answered in the affirmative: (1) does the project violate a clear, written community standard ...; (2) does the project offend the sensibilities of the average person; and (3) has the applicant failed to take generally available mitigating steps that a reasonable person would take to improve the harmony of the proposed project with its surroundings.

In re Times & Seasons, LLC, 2008 VT 7, ¶ 8, 183 Vt. 336 (citations omitted).

a. *The existing character of the area*

As noted in our Findings of Fact, the character of this neighborhood has several of the attractive attributes that the Neighbors detailed at trial: the settings, particularly to the west, are scenic and sometimes tranquil; the current Tupper's Crossings developments (excluding development of nearby properties along U.S. Route 7) are all residential in nature, located on relatively large or widely-spaced lots. But we cannot agree with Neighbors that an assessment of their neighborhood should be limited to their residences only. As we have noted, there are several commercial, retail, and industrial uses on nearby properties that have frontage on U.S. Route 7. Furthermore, each resident who testified at trial spoke of the noises from the heavy traffic along U.S. Route 7 and the occasional but consistent trains that pass on the nearby railroad tracks. Their testimony also confirmed the consistent agricultural and delivery truck traffic on their short roadway. Train noises, including the consistent whistle as it passes over Tupper's Crossing, are witnessed at all area residences. Interestingly, some of the passing trains include cars carrying gas and diesel fuel tankers. How the Neighbors can express concern about the unsubstantiated potential of JSCL tankers exploding, but express little concern about the fuel tankers on the passing trains is inexplicable to the Court.

In summation, we conclude that any assessment of the character of this area must include all neighboring properties and activities, including the highway traffic on U.S. Route 7 and the commercial, retail, and industrial development on adjoining properties along U.S. Route 7.

The building JSCL proposes to construct will consist of new building materials, but will incorporate traditional design elements often found in area buildings. While the building will be noticeable as new construction, it will have features that allow it to be viewed within the context of historic and preexisting development. It will, of course, not look like the residences immediately surrounding it. But with the roof lines, cupolas, front façade, and large barn doors it will look similar in appearance to area farm buildings. This design style was employed by a nearby new commercial structure which houses the “Dock Doctor’s” warehouse and retail facility on U.S. Route 7.

Along with the proposed building, the Project will include elements such as new fencing, parking facilities, and a fuel storage tank. While these elements are not out of place in the context of existing uses in the area, the Court recognizes that properties in the immediate vicinity are primarily residential in nature. Thus, the Project will have some adverse effect on the character of the area.

Although we conclude that the Project will have an adverse effect on the character of the area, we further conclude that the impact will not be undue. First, we see no indication that the Project violates any clear written community standards. Both the Town of Ferrisburgh Town Plan (“Town Plan”; a copy of which was admitted at trial as Applicant Exhibit 4) and the purpose provisions for the Ind. District (Bylaw § 4.5) encourage the development of “light industry,” particularly in this Town Zoning District. See Exhibit 4 at 4.

To the extent Appellants contend that the Project represents “heavy industry” and is therefore inconsistent with the purpose of the Ind. District, we address their argument below when evaluating the character of the area as defined by the purpose and policies of the Ind. District and the municipal plan. See 24 V.S.A. § 4414(3)(A)(ii).

Second, the Project will not offend the sensibilities of the average person. We recognize that Appellants, as residents in the immediate vicinity, have significant concerns about this development. However, considering the nature of surrounding land uses and the details of the

proposal described above, we cannot conclude that the Project would be shocking or offensive to the average person.

Finally, JSCL has taken reasonably available mitigating steps to improve the harmony of the Project with its surroundings. The proposed building incorporates traditional agricultural design cues. The proposed landscaping plan and fencing around the project site will mitigate negative impacts to views from surrounding properties. All lighting fixtures will be downcast, and pole-mounted lights will be set lower than most parking lot pole lights. Furthermore, the lights will be dimmed or turned off during non-business hours. We therefore conclude that the Project will not have an undue adverse effect on the existing character of the area.

b. *The character of the area as defined by municipal purposes and policies*

In assessing the character of this area, we must also consider what the municipality has determined that it wishes the area to become. See 24 V.S.A. 4414(3)(A)(ii) (requiring evaluation of “the purpose . . . of the zoning district in which the project is located, and specifically stated policies and standards of the municipal plan”). This community has chosen to classify this area as part of the Ind. District, in which “new light industry and the continuation of the present industrial uses” is encouraged. Bylaws § 4.5(A). The Town Plan also encourages “light industry” and “commercial and industrial uses that are low impact and compatible with the rural character of the town.” Town Plan § 1.2, Goal E.

The purpose of the Ind. District is, in relevant part,

to provide an area for limited growth of new light industry and the continuation of the present industrial uses. Industrial use should be subject to review to protect residential amenities. They should be located with easy access to highway and rail services. The size of the industrial uses should be restricted to protect the residential character in adjoining districts.

Bylaws § 4.5(A). This purpose does not specifically prohibit any uses. Furthermore, we have already concluded that the Project complies with the dimensional and locational standards implicated in the purpose statement.

However, Appellants maintain that the Project fits within the meaning of “heavy industry” as defined in the Bylaws, and therefore is inconsistent with the purpose of the Ind. District and the goals of the Town Plan. There is arguably an internal conflict within Bylaw § 4.5: it seeks to promote “light industry,” yet it allows “trucking terminals” as conditional uses despite the fact

that those uses are defined as “heavy manufacturing or industry.” See Bylaws §§ 4.5(A), (C); see also Bylaws § 2.2 (specific definitions). Nonetheless, we conclude that the Project is compatible with the character of the area envisioned by the Bylaws and the Town Plan. We reach this conclusion for several reasons, and we begin by examining the relevant Bylaw provisions more closely.

Zoning bylaws must be interpreted in accordance with the general rules of statutory interpretation. In re Champlain Oil Co. Conditional Use Application, 2014 VT 19, ¶ 7, 196 Vt. 29 (2014) (citation omitted). Thus, “[w]e adopt a construction that implements the ordinance’s legislative purpose and, in any event, will apply common sense.” Id. (quotation omitted). To remove ambiguity and reconcile the apparent conflict between the purpose and conditional use provisions of Bylaw § 4.5, “we determine [legislative] intent from a consideration of the whole and every part of the [Bylaw], the subject matter, the effects and consequences, and the reason and spirit of the law.” Ran-Mar, Inc. v. Town of Berlin, 2006 VT 117, ¶ 5, 181 Vt. 26 (quoting Boutin v. Conway, 153 Vt. 558, 562 (1990)) (internal quotations omitted). “We construe all parts of the . . . scheme together, where possible, as a harmonious whole.” Id. (citing In re Estate of Cote, 2004 VT 17, ¶ 10, 176 Vt. 293.).

Considering the relevant provisions together, we conclude that the purpose statement of the Ind. District is intended to frame the appropriate scale, intensity, and impact of a given use rather than to distinguish between uses solely based on whether they are nominally “light” or “heavy.” First, the list of allowable conditional uses in the Ind. District specifically includes “freight or trucking terminals.” Bylaws § 4.5(C) Conditional Uses. We regard this specific reference to provide more guidance than the general reference to “light industry” in the purpose statement. Second, trucking terminals are not the only allowable conditional uses which might be considered “heavy industry” according to the supplied definitions. The Ind. District also permits “contractor’s yard[s]” and “quarr[ies],” both of which are listed under the definition of “heavy manufacturing or industry.” Compare Bylaws § 4.5(C) Conditional Uses, with Bylaws § 2.2 (defining “heavy” industry). We cannot imagine that the drafters intended the Ind. District’s purpose statement to effectively prohibit three different conditional uses which are specifically

listed as allowable. See In re Southview Assocs., 153 Vt. 171, 175 (1989) (“We will avoid a construction that would render the legislation ineffective or irrational.”).

Other uses which are not classified as either “light” or “heavy” industry, such as public utility generating plants, hazardous waste management facilities, and mines, are also allowable conditional uses in the District. Compare Bylaws § 2.2 (defining “light” and “heavy” industry), with Bylaws § 4.5(C) Conditional Uses. These uses certainly have the potential to yield as much industrial activity as JSCL’s proposed project, and likely much more. That is not to say that any or all of these alternative uses would receive conditional use approval. We only note these comparisons in our rejection of Appellants’ assertion that JSCL’s proposed project is wholly inconsistent with the purpose of the Ind. District.

Finally, reading the full purpose statement itself supports our conclusion that its intent is to guide the reviewing body as to the appropriate scale and impact of development in the Ind. District. The first sentence specifically refers to “light industry,” but the remaining sentences highlight the importance of size and access considerations along with the protection of residential amenities and the character of adjoining districts. See Bylaws § 4.5(A). Taking these directives in context helps confirm our determination that the proposed JSCL project is compatible with the character of the area envisioned by the Bylaws.

Turning to the Town Plan, we conclude that the stated goals concerning industry reflect a similar concern for the appropriate scale and intensity of uses within the municipality. Goal E promotes “light industry,” along with low impact “commercial and industrial uses,” while recognizing the need to protect agriculture and maintain compatibility “with the rural character of the town.” See Town Plan § 1.2, Goal E. We do not find language specifically prohibiting or discouraging uses like the Project proposed here.

Though we determine that a proposal of the type advanced here is not fundamentally inconsistent with the purpose of the Ind. District or the policies of the Town Plan, we must still consider whether the Project itself will have an undue adverse impact on the character of the area as described therein. See 24 V.S.A. 4414(3)(A)(ii); see also In Rublee 246 White Birch Lane CU, No. 140-11-15 Vtec at 10 (Aug. 23, 2016).

As we have said, the proposal aligns with the purpose of the Ind. District in its location, size (considering lot coverage and minimum lot size), and limited access. The proposal also respects aspects of the historic and present local character by incorporating traditional design elements. The proposed landscaping plan, lighting plan, and fencing around the project site will further mitigate impacts on nearby properties. The Project will employ no more than nine truck drivers, one full-time and six part-time office and garage workers. The activities of the JSCL trucks and trailers will mostly be off site, as they receive and deliver fuels throughout Vermont and New Hampshire. The only outside truck activity at the JSCL site will be when the drivers arrive to pick up their assigned trucks and trailers, and when they return at the end of the day or evening. The site itself will appear from the outside and during the day as a facility with little or no activity. Though a trucking terminal in the abstract may not be considered “light industry” under the Bylaws, the proposal here is for a relatively small-scale operation designed in accordance with the purpose of the Ind. District and the goals of the Town Plan. See Bylaws § 4.5(A); Town Plan § 1.2, Goal E.

For all the reasons outlined above, we conclude that the Project will not have an adverse effect on the character of the area as defined by the purpose of the Ind. District and specifically stated policies and standards of the Town Plan. Since the Project will not have an adverse effect, we do not reach the second prong of the Quechee test.

We now move on to consider the remaining conditional use general and specific standards. Some of those standards have overlapping considerations, particularly in relation to this project’s anticipated impacts. To the extent possible, we address the standards in the numerical order outlined in the Bylaws, but will group our analysis when necessary. Generally, Neighbors expressed concerns that the JSCL project will impact their area with resulting traffic, noise, lighting glare, and disturbances in the nighttime.

3. Traffic on the roads and highways in the vicinity. The JSCL project will bring minimal additional truck and other vehicular traffic to this area, particularly when compared to the existing traffic on U.S. Route 7 and even when contrasted with the existing traffic on Tupper Crossing. JSCL will have no more than nine trucks and trailers in use at the site; each truck and

trailer unit will employ one round trip per day. Truck departures and returns will be staggered, so that it will be unlikely that truck traffic from all nine vehicles will occur at any one time.

There will be one full-time office employee at the site, with no more than six part time employees servicing the trucks. When these employees report to work, they will likely stay within the building at the site until their day shift is completed, thereby also employing only one round trip for their vehicles each day. These employees will work during the normal business hours of 8:00 am to 5:00 pm, Monday through Saturday. Other than these drivers and employees, the only other visitors to the project will be oil, tire and truck parts vendors, which will only visit occasionally, when needed. There will not be any retail operations at the facility; all business negotiations will be conducted over the phone or off site.

The Town of Ferrisburgh Road Foreman provided credible and mostly uncontested testimony that the JSCL project would not adversely impact the roads and highways that its trucks intend to use. In fact, the Road Foreman spoke credibly to the benefit for town highways that will flow from this relocation of the DeVos trucking operation, since the J.A. DeVos trucks currently travel several miles along town roads within the Rural Agricultural and Conservation Zoning Districts, just to get to U.S. Route 7. In contrast, the JSCL site will be a mere 430 feet from U.S. Route 7, thereby minimizing the impact upon Town roads and relocating this truck traffic to U.S. Route 7, which is much more capable of handling truck traffic. We were persuaded by the Road Foreman's testimony that Tappers Crossing is capable of handling the anticipated JSCL truck traffic, particularly for this short distance.

We limit our review here to the impact upon the traffic on the roads in the vicinity of the JSCL project, since that is the directive of Bylaw § 9.5(A)(3). The to-be-added truck and other vehicular traffic will be negligible, particularly when compared with the existing traffic on U.S. Route 7, and even when compared to the existing traffic on Tappers Crossing. We received no credible testimony or other evidence the JSCL traffic will have a significant impact upon area roadways. We therefore conclude that the proposed project will not have an adverse impact upon the traffic on the roads and highways in the vicinity.

4. The Town Plan and bylaws in effect. The question whether the Project will adversely affect the Town Plan and bylaws in effect overlaps significantly with our discussion of the

character of the area as defined by the purpose of the Ind. District and specifically stated policies and standards of the Town Plan. Appellants' argument here is the argument we addressed there. For the reasons outlined at pages 36 to 39, we conclude that JSCL's proposed project is consistent with the purpose provisions for the Ind. District and the provisions of the Town Plan raised by Appellants.

In addition, we must be cautious when reviewing guidance language in a town plan, or even purpose provisions in a bylaw. The purpose provisions of both the Bylaws and the Town Plan provide us with helpful guidance in our goal of determining the meaning of the Bylaw regulatory provisions. But very often, guidance or purpose language should not be regarded as regulatory in nature, since such language does not specifically prohibit or direct certain activity. In particular, the Town Plan notes that, under the heading of the "Purpose of the Town Plan," that its "[g]oals are long-range aspirations that serve as a broad planning and development guide. A goal describes the end condition that is sought." Exhibit 4 at 2.

In Champlain Oil Co., our Supreme Court cited this specific provision of this Town Plan provision and went on to conclude that "the town plan is designed to guide applicants and decisionmakers on a project's general characteristics but does not establish regulatory standards with which to judge the proposed project." Champlain Oil Co. Conditional Use Application, 2014 VT 19, ¶ 5, 196 Vt. 29 (citing In re JAM Golf, LLC, 2008 VT 110, ¶ 13, 185 Vt. 201). And in JAM Golf, the Supreme Court stressed that enforceable ordinances must contain "standards for the court to apply." In re JAM Golf, LLC, 2008 VT 110, ¶ 13. The Champlain Oil Court continued that reviewing Town Plan language as guidance, but not regulatory language "is precisely how the town plan says it should be interpreted." Champlain Oil, 2014 VT 19, ¶ 5

With these directives in mind, we conclude that the language of the Town Plan and the purpose language of Bylaw § 4.5 provide helpful guidance, but because of their verbiage ("should" and not "shall"), cannot not be considered as regulatory in nature. For this additional reason, we conclude that the JSCL proposed project does not adversely affect the Town Plan and the Bylaws now in effect.

5. Utilization of renewable energy resources. We were not made aware of any adverse impacts that this project may have upon the area's renewable energy resources. We note that

the project as proposed would incorporate only two components that may be regarded as renewable: first, the repurposing of used motor oil, collected from the trucks as they are serviced, as fuel for the building heating system; second, the use of high-efficiency LED lighting fixtures.

No suggestion was made during trial of other renewable energy resources that could be employed by the project, nor of any renewable energy resources that could be adversely impacted by this project. We therefore conclude that the JSCL project as proposed does not adversely affect the utilization of renewable energy resources.

6. The appropriate use or development of adjacent property.

The current development along Tappers Crossing, not counting the commercial, retail, and industrial development on nearby lands along U.S. Route 7, consists of residential development on larger lots. The nearest undeveloped property is north of the JSCL parcel; it lies in both the Ind. and Rural Agricultural Zoning Districts.

We have discussed traffic impacts, and we discuss in detail below the noise and light impacts upon adjoining neighbors. As to further development on adjacent properties, we do not perceive that the proposed JSCL development will have an adverse impact. We have concluded that the Project is compatible with the purpose of the Ind. District, and will not adversely affect the character of the area. We have further concluded that the Project is well below maximum lot-coverage restrictions, will bring minimal additional traffic, and will be relatively small in operational scale. We therefore cannot conclude that the JSCL development will have an adverse impact upon the appropriate use or development of adjacent properties.

B. Specific Conditional Use Standards (Bylaw § 9.5(B)).

This Bylaw provision, pursuant to its enabling statute (24 V.S.A. § 4414(3)(B)), authorizes the ZBA, and this Court in the case of an appeal, to “impose . . . other conditions [upon a permitted project] found necessary to protect the best interests of the surrounding property, the neighborhood or the town as a whole.” Bylaw § 9.5(B). The authority to impose conditions is not limited to the specific standards listed. Id. We begin our analysis with a review of the specifically listed standards.

1. Minimum lot size. The JSCL parcel is 9.0± acres in size; Bylaw § 4.5(C) establishes the minimum lot size as 2 acres. The proposed project will encompass 1.5± acres of the 9.0± acre

parcel, thereby resulting in a lot coverage of 16.9%. Neighbors suggested that the Court should require JSCL to acquire a larger parcel, although their request appeared principally premised upon exceeding the 10-acre jurisdictional threshold for Act 250. Their assertion that the proposed project site is “too small” is belied by the fact that the proposed project only utilizes 16.6% of the parcel. We do not comprehend any other justification for requiring JSCL to acquire additional lands. We conclude that an additional permit condition concerning lot size is not justified or warranted in this matter.¹⁶

2. Distance from adjacent or nearby uses, etc.

The JSCL parcel is relatively large, encompassing 9.0± acres, and the development will utilize about 1.5± acres, which is 16.6% of that parcel. Similarly, the adjacent parcels are relatively large, with a small percentage of the total area being utilized by the existing developments.

The Warner residence, located across Tupper's Crossing from the proposed development, will be about 150 feet from any of the proposed development. Within that 150 feet will be an eight-foot tall wire mesh security fence and landscaping designed to partially screen the JSCL activities from the neighboring properties. The Steady residence, while located on property immediately adjacent to the west, will have no view of the JSCL site since the residence is measurably lower in elevation and significantly screened by existing trees and other vegetation. The four remaining homes on or having frontage on Tupper's Crossing will each have views of the JSCL site, but will each be several hundred feet away from the JSCL site.

Neighbors expressed wishes that the JSCL project be farther away, or not at all near their homes. But no party provided the Court with a specific recommendation that the Court could adopt concerning an additional condition concerning the project's increased distance from the adjacent properties. From the record before us, we conclude that an additional condition is not warranted concerning the distance this project is from adjoining properties.

¹⁶ There was some suggestion that if the JSCL parcel was larger, the proposed development could be located farther back on the lot and would diminish the light and noise impacts from the project. No specific data was offered concerning what diminishment, if any, would be accomplished. This suggestion also did not take into account the presence of a Class II wetland on the adjoining lands to the north. We discuss below the possible light and noise impacts from the project as proposed.

3. Obnoxious or excessive noise, etc.

The anticipated impacts from the JSCL project are focused in three impact areas: (a) lighting (b) fire safety and other hazards; and (c) noise.¹⁷ To address the possible need for additional conditions to protect the best interests of the surrounding properties, neighborhood, or town as a whole pursuant to Bylaw § 9.5(B), we separately address these three impact areas. Our review is guided by the Bylaw directive that our focus must be on “obnoxious or excessive” impacts. Id.

a. Lighting glare.

Light fixtures will be installed on the building, at between ten and fifteen feet high. Pole lights will be used to illuminate the parking areas and internal access ways. All light fixtures will utilize high-efficiency LED bulbs; the area that the bulbs illuminate will be visible from on- and off-site, but not the light source itself. The building mounted lights will be controlled by dimmers and motion sensors. These design characteristics will reduce the off-site visual impact of the lights.

The light design and location are detailed in JSCL’s Site Plan (Applicant Exhibit 2) at Slide L2-01. This Sheet also incorporates estimates of lighting intensity, measured in foot candles (“fc”); the readings range from 2 fc immediately below the light fixture to 0.1 – 0.0 fc just within the property’s boundaries. Id. We conclude that while the project lighting may be visible from off-site, no off-site area will be illuminated by the lighting. We therefore conclude that the proposed lighting has been adequately designed to minimize off-site lighting impacts.

At trial, Neighbors expressed concerns about the truck headlights spilling onto their properties, particularly as the trucks drive around the JSCL building and pull into the parking spaces near the western boundary of the JSCL property. While we find that truck headlights will be seen occasionally from the Warner, Allen, and Pierson/ Melrose residences, particularly from trucks operated during the early morning and evening hours, we conclude that these impacts will not rise to the level of “obnoxious or excessive.” See Bylaws § 9.5. The eight-foot tall security fence will have a screening mesh that will partially screen truck lights from the interior parking areas; the earthen berm and landscaping along the eastern boundary will also provide screening

¹⁷ Traffic impacts are discussed elsewhere in this Decision, in reference to compliance with Bylaw § 9.5(A)(3).

for the eastern neighbors. Furthermore, activity at the site will be limited to nine trucks, representing 18 one-way trips per day, distributed between morning and evening. The limited truck activity, combined with limited operations during the nighttime hours and with the mitigating steps that JSCL has proposed, will not yield obnoxious or excessive headlight disturbances at surrounding residences. For all these reasons, we conclude that no further condition concerning lighting is necessary.

b. Fire safety and other hazards.

As we have already noted, the Town Fire Chief provided the most credible testimony concerning fire and other safety hazards on the JSCL site. He commended the JSCL design for its safety measures, including the security fencing around where trucks will be parked, and how hazardous materials, such as diesel fuel, oil, and other hazardous liquids will be stored on site and properly disposed of. While diesel fuel, gasoline, and other hazardous liquids will be present on the site, including the residual fuels in the otherwise empty tankers, the JSCL site and operational plans will adequately protect to minimize the potential for fire or exposure to hazards, both within and outside of the site.

We are helped in reaching these conclusions by several factors, including that the DeVoses and their corporation have operated a fuel trucking business for over thirty years without a single reported complaint or instance of fire or explosion. Second, while we understand why the Neighbors have concerns, we cannot subscribe to those concerns, since we were not provided with a single example of fuel tanker explosions, whether it be within the J.A. DeVos fleet or elsewhere in Vermont.

We therefore conclude that the JSCL plans minimize or eliminate the hazardous materials on its site that could be obnoxious or excessive. A further condition concerning hazardous materials treatments is therefore not necessary.

c. Noise.

Both this Specific Conditional Use Standard and the Performance Standard of Bylaw § 8.1 ask us to address the noise impacts of a proposed project. Since the § 8.1 Performance Standard offers an opportunity to discuss noise impacts in more detail, we discuss noise impacts in that section of our Decision, below. In that section, we also discuss the conditions concerning noise

that we believe necessary to have the proposed project conform with the Bylaw provisions concerning the project noise and its impacts upon the project's neighbors.

4. Minimum off-street parking and loading facilities.

All parking areas will be behind the eight-foot tall wire mesh security fence, in front of and to the west of the proposed building. The project will not require loading or unloading facilities. We conclude that no further condition is necessary concerning loading facilities. We discuss parking in more detail later in this Decision, and we impose certain conditions.

5. Landscaping and fencing.

Since the initial plans were submitted for the JSCL project, several revisions have been made to the landscaping plans, mostly in regard to plantings and screening, including the earthen berm to be added along the easterly boundary. These landscaping modifications will provide further screening of the headlights and, to a lesser extent, the noises perceived by the adjoining neighbors. With these modifications, we conclude that further conditions are not necessary, other than to complete the landscaping plans as depicted in Applicant Exhibits 2 and 6.¹⁸

6. Design and location of structures and service areas.

As we have noted elsewhere in this decision, the proposed building on the project site will consist of new building materials, but will incorporate some traditional designs often found in area buildings. While the building will be noticeable as new construction, it will have features that allow it to be viewed within the context of area construction.

The location of the JSCL structure is set back in excess of the minimum setbacks established by the Bylaws and affords an opportunity to install an eight-foot tall wire mesh security fence around the building and parking areas, so as to further distance and screen the activities on the JSCL site. Elsewhere in our analysis, we reject Appellants' suggestion that the JSCL parcel should be larger, to allow the building to be moved farther away from the roadway and nearby residences. We do not see a material benefit in a condition that would modify the building design or location and therefore decline to adopt such a condition.

¹⁸ The ZBA had previously required JSCL, through conditions 1 and 7 in its conditional use approval, to restore disturbed soils and revise plans for the earthen berm. JSCL's Question 6 challenges the ZBA's condition 7 regarding the berm. Because our review is *de novo*, and because we conclude that JSCL's current landscaping plans are adequate and no further conditions are necessary, JSCL's Question 6 is **MOOT**.

7. Size, location, and design of signs.

There was little discussion during trial of a sign at the property, other than identification or directional signs. Given the lack of significant signage planned for the project, we conclude that a further condition concerning signage is not necessary.

For all these reasons, we conclude that the JSCL proposed development, if completed according to the submitted plans, will conform to the general and specific conditional use standards of Bylaw § 9.5

3. Appellants' Question 3:

By their Question 3, Appellants ask whether the proposed JSCL project is compatible with "the stated purpose of the district in which the proposed use is to be located," as required by Bylaw § 9.5, considering the fact that the purpose of the Ind. District includes "limited growth of new light industry" and the Bylaws list "trucking terminals" as "Heavy Manufacturing or Industry." We address this Question by referencing our analysis above on this same issue. For the reasons stated above, pages 36 to 39, we conclude that the proposed project conforms with the purpose provision of Bylaw § 4.5. Thus, we answer Appellants' Question 3 in the affirmative.

4. Appellants' Question 4:

By their Question 4, Appellants ask whether the proposed project complies with the Performance Standards set forth in Bylaw Article VIII. That Article contains three separate Performance Standards; we address them in turn.

A. Section 8.1: Noise

This Bylaw provision directs that:

No noise which is excessive at the property line and represents a significant increase in noise levels in the vicinity of the development so as to be incompatible with the reasonable use of the surrounding area shall be permitted. Specifically, the sound pressure level should not exceed seventy decibels at the property line at any time, except for agricultural uses.

Bylaw § 8.1.

Appellants also challenge the Project's noise impacts under the general conditional use standards; specifically whether the impacts will "adversely affect . . . the character of the area affected" or "the appropriate use or development of adjacent property." Bylaws §§ 9.5(A)(2), (6). Those issues go to Appellants' Question 2, but we address all noise concerns in this section to

avoid duplicating our discussion of the evidence. Thus, we must determine whether noise from the Project will 1) represent “a significant increase in the noise levels . . . so as to be incompatible with the reasonable use of the surrounding area,” 2) “exceed seventy decibels at the property line,” or 3) adversely affect the character of the area or the use or development of adjacent property. See Bylaws § 8.1; Bylaws §§ 9.5(A)(2), (6). We look first to the existing noise levels for this neighborhood.

As noted in our Factual Findings ¶ 98, this neighborhood’s existing soundscape is composed primarily of traffic noise from U.S. Route 7, local traffic on Tupper’s Crossing, occasional passing trains, and regular biogenic and geophonic sounds (e.g. bird calls, wind in the trees, etc.). All neighbors who testified at trial also acknowledged that large delivery and agricultural trucks travel on Tupper’s Crossing on a regular basis.

As noted in our Factual Findings beginning at ¶ 95, residences near Route 7 experience regular traffic sound levels from 55 to 75 dBA Leq_{1 sec.} during the daytime, as recorded by the short-term monitor. Those same or similar sounds were also recorded on the eastern long-term monitor at slightly different levels, using an Leq_{10 min} format, as 47 to 55 dBA Leq_{10 min} during the daytime and 38 to 52 dBA Leq_{10 min} during the nighttime. The western long-term monitor, placed further from Route 7 but closer to the railroad tracks, generally recorded sound levels from 40 to 50 dBA Leq_{10 min} during the daytime, with train sounds accounting for increased sound levels between 65 and 74 dBA Leq_{10 min}. Route 7 traffic also registered on the western monitor, albeit at lower levels than the eastern monitor. During the nighttime, after excluding the reported noise levels from passing trains, the western monitor recorded sound levels from 35 to 49 dBA Leq_{10 min}.¹⁹ One or more trains regularly pass between 1:00AM and 6:00AM most days, thus the actual nighttime sounds experienced (especially west of the project site) are increased by the occasional passing trains. Overall, average daytime sound levels in the neighborhood are between 52 and 56 dBA, while average nighttime sound levels are between 47 and 52 dBA.

Though data from the short-term and long-term monitors was reported differently, in formats of Leq_{1 sec} and Leq_{10 min} respectively, we can reach certain informative conclusions about

¹⁹ We must again note that we do not wholly agree with the practice of excluding train noises, since they are part of this neighborhood’s noise experience. But we report it here to provide a complete range of nighttime noise levels.

the maximum sound pressure levels in the neighborhood. The Continuous Equivalent Sound Level, or Leq, descriptor for sound levels denotes the average sound level over a defined period of time. By nature, an average of value will be lower than or equal to the maximum value in the underlying data. Therefore, whether sound is reported as a 1-second average (Leq_{1 sec}) or a ten-minute average (Leq_{10 min}), the average is lower than or equal to the maximum sound pressure level experienced during the recording. In other words, the maximum sound pressure level must be at least as high as the reported average. With that in mind, daytime sound levels east of the project site are often 47 to 55 dBA and can reach at least 75 dBA near Route 7. Nighttime sounds can reach at least 52 dBA. Daytime sound levels west of the project site are often 40 to 50 dBA and can reach 74 dBA when trains pass by. Nighttime sounds can presumably reach 65 to 74 dBA considering the passing trains.

We note that JSCL's engineer reported estimated future sound levels in both the "maximum" format and the Leq formats. We appreciate this range of reporting, since it provides a more complete assessment of sound levels. It also provides us with a better opportunity to compare the actual sound levels with the estimates of future sound levels, should this project be completed and operational. We now turn to those estimates, based both upon actual readings from an existing JSCL truck in operation, and nationally recognized acoustical software and established sound readings compiled by recordings from over 6,000 vehicle types.

Our Factual Finding ¶ 104 explains the seven different types of sound scenarios used to provide a complete estimate of what the completed project will bring to this neighborhood. These scenarios include six estimates based upon "maximum" sound measurements, three using FHWA sound data and three using data from an actual JSCL truck. There is also one conservative one-hour average (Leq_{1 hr}) scenario, the first reported scenario and one based upon what is likely to be a rare actual occurrence: all nine trucks being operated at the site over the course of one hour).

The one-hour scenario shows that sound levels will range from 27–39 dBA Leq_{1 hr}, below the average existing daytime and nighttime noise levels, even if all nine trucks enter or exit the site over the course of an hour. The "maximum" scenarios using data from a JSCL truck, which we find most relevant to our analysis here, show maximum sound levels in the range of 41 to 59

dBA at residences along Toppers Crossing when multiple trucks would be operating within the boundaries of the project site. See our Factual Finding ¶ 111 for more detail. The last scenario using JSCL truck data shows maximum sound pressure levels in the range of 45 to 62 dBA at residences along Toppers Crossing when a single truck is exiting the site at night.²⁰ We therefore conclude that the estimated noises that this project will bring to this neighborhood from within the boundaries of the project site are comparable to or lower than the already-existing neighborhood noises. See Bylaw § 8.1 (forbidding “a significant increase in noise levels . . . so as to be incompatible with the reasonable use of the surrounding area”)

One variation to these sound level estimates occurs during the narrow instant when a truck is crossing the property line and project border as it enters and exits the project site. The estimates provide that the maximum sound pressure level at these instances may be as high as 71 dBA as measured at the point of entry or exit. In that instance, the sound pressure level approaches the sound power level, since the sound source (an individual truck) is at the boundary and the model is estimating sound pressure levels at that location. The boundary is also where Bylaw § 8.1 directs its most specific prohibition: “the sound pressure level should not exceed seventy decibels at the property line at any time, except for agricultural uses.” This is distinct, and perhaps in conflict with the first directive of Bylaw § 8.1, which prohibits “noise which is excessive at the property line and represents a significant increase in noise levels in the vicinity of the development so as to be incompatible with the reasonable use of the surrounding area.”

Even when trucks are entering and exiting the project site, noises to be experienced where neighbors will be reasonably using their nearby homes (in their yards, just outside of their homes, and in their homes) will be lower than the 70 dB limit of the Bylaw, and comparable to or lower than the already-existing noise levels for this neighborhood, since the JSCL truck will be 150 feet or more from each neighbor’s property. We therefore conclude that the proposed project conforms with the first directive of Bylaw § 8.1.

It is difficult for us to believe that the second Bylaw directive was meant to exclude all projects from approval that would have vehicles entering and exiting a project. We share JSCL’s

²⁰ As explained in the Findings of Fact, it is our understanding that the scenarios modeled with CadnaA software provide estimates of the maximum sound pressure levels – or L_{max} – experienced at nearby residences, with the exception of the one-hour scenario which provides estimates in the format of Leq 1 hour.

concern that such a narrow reading of Bylaw § 8.1 could be used to deny all projects that would have vehicles entering or exiting from the roadway, crossing the property line on the way into the site. As we know from the evidence in this case, traffic noise from Route 7 routinely exceeds 70 dBA and Tupper's Crossing itself already experiences truck traffic. Applying common sense, and reading Bylaw § 8.1 in context, we find that the 70 dBA limit was meant to exclude projects from approval when the project's internal operations caused sound pressure levels at the boundary to exceed 70 dBA – not where service vehicles might register sound levels of 70–71 dBA for the brief moment they cross the property line on their way in or out. See In re Champlain Oil Co. Conditional Use Application, 2014 VT 19, ¶ 7, 196 Vt. 29 (2014). The drafters' use of the term sound "pressure" levels, together with the agricultural exemption and stated concern for reasonable uses in the surrounding area, suggests that they wished to bar sound sources that would radiate outward from the project site to deliver a sound pressure reading at the boundary in excess of 70 dBA. We therefore conclude that the project as proposed will conform with the second and final directive of Bylaw § 8.1

We also note that the truck traffic will be minimal, given that there be no more than nine trucks that will make round trips to and from the project site each day, thereby equaling no more than 18 one-way truck trips in a day. Even so, we share some of the Neighbors' concerns about truck traffic in the middle of the night. Neighbors assert that JSCL essentially wants the ability of its truck drivers to be unrestricted, thereby having authority to operate 24 hours each day, and as many as seven days each week. We disagree with parts of this assessment, since Mr. DeVos credibly explained that many or most of the nine trucks will operate during the hours of 5:00 am to no later than 10:00 pm.²¹ There would be two exceptions to this general rule. First, when a retail station reports that it has run out of fuel, a J.A. DeVos truck has been dispatched to get fuel loaded in Albany, NY or Burlington, VT and deliver fuel to the requesting station. Mr. DeVos

²¹ Condition 2 of the ZBA's conditional use approval set hours of operation running from 5:00 am to 10:00 pm. JSCL's Question 3 asks whether that condition should be struck, or modified to set hours from 2 am to 7 pm. To the extent JSCL's Question 3 is not rendered moot by our *de novo* review, we answer in the negative. First, Mr. DeVos explained that the time between 5:00 am and 10:00 pm represents the bulk of JSCL's proposed operating hours. And second, allowing unrestricted operations beginning at 2 am is not responsive to Neighbor's well-founded concerns – nor is it reasonable given the nature of homes and businesses in the surrounding area.

credibly testified that this happens only infrequently, although he hoped for JSCL to continue to respond in this fashion.

The second type of exception to the stated operational times of 5:00 am to 10:00 pm is when drivers arrive at the site earlier because they prefer to do their deliveries earlier, so that they may complete their deliveries earlier, thereby ending their work day earlier. There was no estimate offered at trial of the frequency or percentage of JSCL drivers who would prefer to arrive at the site before 5:00 am.

As noted above, existing noise levels in this neighborhood generally run 5–10 dBA lower during the nighttime hours versus the daytime hours. For purposes of this evaluation, we regard nighttime hours as running from 10:00 pm to 5:00 am the following day. We also note that the frequency of traffic and trains on Tappers Crossing is generally reduced during the nighttime hours, thereby providing times where the actual noises for a given nighttime moment are even lower than the reported levels.

Given the lack of evidence presented on the proposed frequency for JSCL truck traffic during the nighttime, we conclude that conditions are necessary to ensure that the proposed project conforms to the mandates of Bylaw § 8.1. We will condition approval of JSCL's application as follows: JSCL is directed to minimize the frequency of truck drivers arriving at the project site before 5:00 am or after 10:00 pm. No trucks shall operate on Sundays or recognized Holidays, except in the case of emergencies. JSCL shall maintain a log of the arrival and departure times for its truck drivers and will make that log available to this Court and the parties to this appeal, for use during any hearing on a post-judgment motion to reopen these proceedings to determine whether the nighttime truck traffic has been "excessive at the property line and represents a significant increase in noise levels in the vicinity of the development so as to be incompatible with the reasonable use of the surrounding area," pursuant to Bylaw § 8.1. Finally, regardless of the time of day, noise levels from the Project shall not exceed 70 dBA L_{MAX} at the property line, with the exception of noise from trucks as they enter and exit the facility.²²

²² The ZBA previously required, through condition 4 in its conditional use approval, that noise levels not exceed "70 decibels at any border." JSCL's Question 4 challenges the ZBA's condition 4 by asking whether the noise limit should apply to trucks entering and exiting the facility. Because our review is *de novo*, and because we have imposed the conditions necessary to ensure that the Project complies with Bylaw § 8.1, we conclude that JSCL's Question 4 is **MOOT**.

We now consider whether noise impacts from the Project will adversely affect the character of the area, both as it exists and as defined in the purpose and policy statements in the Bylaws and Town Plan. See In Rublee 246 White Birch Lane CU, No. 140-11-15 Vtec at 8–10 (Aug. 23, 2016). We conclude that, as conditioned above, the Project’s noise impacts will not be adverse. See In re Grp. Five Invs. CU Permit, 2014 VT 14, ¶¶ 12–14 195 Vt. 625 (approving the use of the two-step Quechee test to guide adverse impact analysis in this context). “The word ‘adverse’ means unfavorable, opposed, hostile.” Re: Quechee Lakes Corp., Nos. 3W0411-EB and 3W0439-EB, Findings of Fact, Conclusions of Law and Order, at 17 (Vt. Envtl. Bd. Nov. 4, 1985) (citation omitted).

As explained above, the estimated average sound pressure levels over the course of an hour (even in the unlikely event that all nine trucks enter or exit the project site during that time) will be below the average existing daytime and nighttime noise levels in the neighborhood. The maximum estimated sound pressure levels at nearby residences, spanning 41 to 62 dBA across various scenarios using JSCL truck data, are not higher than existing daytime sound levels which often reach 55 to 75 dBA Leq_{1sec} to the east and consistently reach 65 to 74 dBA Leq_{10min} to the west. Thus, if trucks arriving or exiting at night are appropriately limited, sound levels from the Project will be comparable to or lower than existing sound levels.

Prior cases have considered noise pursuant to Act 250 Criterion 8 and established that noise impacts are adverse if they exceed 70 dBA L_{MAX} at the property line and 55 dBA L_{MAX} at surrounding residences. In re Application of Lathrop Ltd. P’ship I, 2015 VT 49, ¶ 80, 199 Vt. 19 (citing Re: Barre Granite Quarries, LLC, No. 7C1079 (Revised)-EB, slip op. at 80 (Vt. Envtl. Bd. Dec. 8, 2000)). However, the Vermont Supreme Court has also acknowledged that the “Barre Granite” standard “is applied flexibly to accommodate existing background noise and the project context.” See In re Application of Lathrop, 2015 VT 49, ¶¶ 81–85; see also In re Chaves Act 250 Permit Reconsideration, 2014 VT 5, ¶ 33, 195 Vt. 467, abrogated on other grounds by In re B & M Realty, LLC, 2016 VT 114, 203 Vt. 438. To the extent the standard is relevant in this municipal appeal, a rigid application would be “of questionable logic” when existing daytime sound levels regularly exceed 55 dBA due to nearby traffic on both U.S. Route 7 and the railroad tracks. See Re: McLean

Enters. Corp., No. 2S1147–1–EB, slip op. at 22 (Vt. Env'tl. Bd. Nov. 24, 2004) (noting “the need to consider a relative approach that would adjust the standard upward in areas with loud existing background noise”).

In the context of the existing soundscape, the Project’s noise impacts on residential amenities and adjoining properties or districts will be low. *See* Bylaws § 4.5(A) (review should aim to “protect residential amenities” and “the residential character in adjoining districts”); *see also* Town Plan § 1.2, Goal E (seeking to “[e]ncourage commercial and industrial uses that are low impact and compatible with the rural character of the town”). For all these reasons, we conclude that noise impacts from the Project will not be adverse, thereby negating the need to reach the second prong of the Quechee test. For these same reasons, we conclude that the Project’s noise impacts as conditioned here will not adversely affect the appropriate use or development of adjacent property. *See* Bylaws § 9.5(A)(6).

B. Section 8.2: Glare, Lights, and Reflection

This Bylaw provision directs that:

No glare, lights or reflection shall be permitted which are a nuisance to other property owners or tenants or which could impair the vision of a driver of any motor vehicle or which are detrimental to public health, safety and welfare.²³

Bylaw § 8.2.

We have already addressed the glare, lights and reflection that will emanate from the JSCL site, concluding that lighting impacts from the Project will not be obnoxious or excessive. See our discussion above at p. 44. All light fixtures will utilize high-efficiency LED bulbs; the area that the bulbs illuminate will be visible from on- and off-site, but not the light source itself. The building mounted lights will be controlled by dimmers and motion sensors. These design characteristics will reduce the off-site visual impact of the lights. Truck headlights will be seen only occasionally and will be partially screened. Because of these characteristics, including those that JSCL modified after receiving concerns expressed by the neighbors, we conclude that lighting impacts from the project will not be detrimental to public health, safety, or welfare and will not cause a nuisance to the surrounding neighbors.

²³ Bylaw § 8.2 goes on to provide an exception for solar energy collectors which is not applicable here.

C. Section 8.3: Fire, Explosive, and Safety

This Bylaw provision directs that:

No fire, explosive or safety hazard shall be permitted which significantly endangers other property owners or which results in a significantly increased burden on municipal facilities.

Bylaw § 8.3.

We have already addressed the potential for fire, explosive or safety hazard on and outside of the JSCL site. See our discussion above at pp. 32, 44–45. As we have already noted, the Town Fire Chief provided the most credible testimony concerning fire and other safety hazards on the JSCL site and the adequacy of his Fire Department and other nearby municipal fire departments. He commended JSCL for its design and safety measures, including the security fencing around where trucks will be parked, and how hazardous materials, such as diesel fuel, oil, and other hazardous liquids will be stored on site and properly disposed. While diesel fuel, gasoline, and other hazardous liquids will be present on the site, including the residual fuels in the otherwise empty tankers, the JSCL site and operational plans will adequately protect to minimize the potential for fire, explosion or exposure to hazards, both within and outside of the site.

The Fire Chief explained that certain prohibitions about parking tankers with hazardous fuels was intended to prohibit the parking of such vehicles on public highways, and should not be read as a prohibition against parking fuel tankers within a fenced security setting, such as JSCL proposes.

We also note that the Neighbors expressed concern that an international fire code could be read to prohibit JSCL's truck and tanker parking plans. Our understanding is that the State of Vermont has considered but has not adopted the international fire code that the Neighbors suggested. We decline to hold JSCL to a code standard that our State has not chosen to adopt.

We therefore conclude that the JSCL project as proposed conforms with Bylaw § 8.3. With that said, we conclude that the JSCL project as proposed conforms with all Performance Standards of Bylaw Art. VIII.

5. Appellants' Question 5:

By their Question 5, Appellants ask whether "the Proposed Fuel Trucking Terminal compl[ies] with the Parking requirements of Article VI of the Bylaws." Appellants' Statement of Questions, filed October 27 5, 2017, at 2.

Bylaw § 6.2 directs that "there shall be off-street parking spaces" for six general categories of developments. Given the components of JSCL project, we look for the requirements for a trucking terminal and office space. There is no directive specifically listing trucking terminals, although there is one for "Professional Office." Bylaw § 6.2(E). That provision requires that a proposed project involving a professional office space shall provide for "[o]ne parking space, plus one additional parking space for every two hundred square feet of floor space." Since there is a total of 2,200 square feet of office space proposed for the JSCL building, we calculate that this provision would require a total of twelve parking spaces. Since JSCL's site plan details eleven parking spaces, we will include a condition that the site plan be revised to either incorporate a twelfth parking space or reduce the office space square footage by 200 square feet. We conclude that the proposed project, as conditioned here, will conform to the parking space requirements of Bylaw § 6.2.

The remainder of the building (6,900 square feet) is devoted to truck maintenance and minor repairs. Also included in the site plan are details for parking spaces for each of the truck and tankers to be used at the facility. While there is no reference to truck terminals in Bylaw § 6.2(E), there is a final provision that purports to govern "Commercial, Business and Unspecified Uses." Bylaw § 6.2(F). The ZBA declined to apply this provision, noting that "it was judged unreasonable." ZBA Decision at 5. We concur. If we were to apply this provision to this proposed trucking terminal, more than thirty-two additional parking spaces would be required for a facility that would have little traffic during the work day, employing no more than one full-time employee and six part-time employees, with no commercial or business use or visitors, other than the office use, for which we have already calculated the parking requirements. The business of a trucking terminal is to accommodate trucks, and adequate parking for the planned trucks is already provided for in the site plan. Given that a use such as a trucking terminal is not

anticipated in Bylaw § 6.2, we decline to interpret it in such a way as to lead to the absurd result of requiring JSCL to revise its site plan to accommodate an additional thirty-two parking spaces.

6. Appellants' Question 6:

By their Question 6, Appellants ask whether the waiver provisions of Bylaw § 10.7, which allows for a waiver to be applied for and approved for certain dimensional requirements. Appellants' Statement of Questions, filed October 27 5, 2017, at 2. We agree with Appellants that a parking requirement is not a dimensional requirement. While there was some suggestion at trial that this provision could be used to allow JSCL's parking plan, we note that no specific waiver request was filed with JSCL's application. Bylaw § 10.7 requires that a request be made, and that JSCL fulfill certain conditions and requirements in order to receive such a waiver. Bylaws §§ 10.7(C) and (D). No showing for compliance with these conditions and requirements was offered at trial.

Furthermore, our analysis here makes further review of Bylaw § 10.7 unnecessary, since we have already concluded that the JSCL parking plan will conform with the applicable parking requirements of Bylaw § 6.2. We therefore conclude that the legal issue raised by Appellants in their Question 6 is **MOOT**.

7. Appellants' Question 7:

By their final Question, Appellants ask whether the JSCL proposed project complies with the setback provisions of Bylaw § 5.30, specifically as it relates to above-ground storage tanks of flammable liquids with a greater than 550-gallon capacity. The JSCL project includes a proposed 4,000-gallon diesel fuel storage tank, to be used to store and supply fuel for the truck engines. Appellants' Statement of Questions, filed October 27 5, 2017, at 2. It is proposed to be located behind the proposed building, on a concrete pad with a concrete apron to limit any spills. There will be a drain in the concrete pad, connected to an oil/grit/water separator which is detailed on Exhibit 1, Sheet C8-03. These plans have been approved by DEC.

JSCL's 4,000-gallon tank plans comply with the provisions of Bylaw § 5.30, which directs that the tank shall be located no less than eighty feet from all property lines and "be properly retained with dikes having a capacity not less than one and one-half times the capacity of the tanks surrounded." Id.

Appellants also reference the fuel tankers in their Question 7, asking whether the plan to park the “empty” tankers along the western boundary violates the provisions of Bylaw § 5.30. We conclude that § 5.30 does not apply to the tankers. First, we note that the tankers are not “storage” tanks. Rather, they are transportation vehicles, licensed and regulated for highway transportation of fuels.

Much discussion was had at trial concerning Mr. DeVos’s representation that the tankers would be “empty” when they returned to the JSCL site each night. While the tankers themselves may be empty, or at least devoid of fuel that could be delivered to a retail station, residual fuel and fumes would remain in the tanker lines, with some fuel even remaining in each of the four tanks located within each tanker. Mr. DeVos initially suggested that some returning tankers may contain as much as fifty gallons of fuel. In JSCL’s post-trial Proposed Facts and Conclusions, the suggestion is made that a condition be placed upon any approval that required “only residual petroleum, not to exceed 15 gallons” would be allowed in the returning tankers. That maximum amount would equate to 0.163% of the tanker’s 9,200-gallon capacity.

Appellants suggest that Mr. DeVos’s initial claim that the returning tankers would be “empty” should be the basis for an outright denial of JSCL’s pending conditional use application, on the basis that it was a material misrepresentation by an applicant’s agent. In support of this claim, Appellants presented evidence that J.A. DeVos trucks have been returned full of fuel to the existing operation at the DeVos dairy farm.

We decline to adopt Appellants’ suggestion for two reasons. First, the existing operation is not subject to any municipal permit requirements and is not representative of the proposal currently before the Court. Second, we found Mr. DeVos to be a credible witness, with nearly forty years of experience. When asked exactly what he meant by “empty,” he gave a credible explanation that, especially when not parked on exactly level ground when making its deliveries, the tanker lines may be left with some residual fuel. At trial, he estimated that these residual fuels may equate to as much as fifty gallons. We understand that with further analysis, JSCL has offered to abide by a condition that no returning tanker will have more than fifteen gallons of residual fuel once it returns to the site. We will condition our approval upon such a restriction. The only exception to this restriction will be when a JSCL tanker returns to the site to deliver up

to 4,000 gallons to its own above-ground diesel storage tank, which will employ safety precaution measures to contain any spill.

For all these reasons, we conclude that the project as proposed and as we condition herein complies with Bylaw § 5.30 regarding above-ground storage tankers on site.

Conclusion

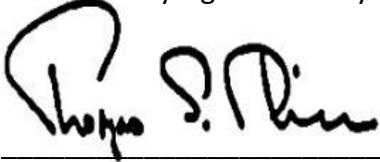
For all the reasons stated in this Merits Decision, we conclude that the JSCL conditional use application must be **APPROVED**. The conditions imposed by the ZBA are **VACATED** and replaced with the following conditions:

1. The project shall be completed in accordance with the Site Plans (Applicant Exhibit 1), except where modified by these conditions.
2. JSCL's site plan shall be revised to include an additional vehicular parking space, so as to increase the total vehicular parking spaces to twelve, not counting the truck and tanker parking spaces, so as to comply with Bylaw § 6.2(E). In the alternative, JSCL shall reduce its office space to a total of 2,000 square feet.
3. All plantings and earthen berms shall be installed and maintained according to JSCL's landscaping plans. Any diseased or dead trees or shrubs shall be replaced at the earliest planting opportunity, with the same or similar plantings.
4. No JSCL or other fuel tankers may return to the JSCL site unless such tankers shall be empty, which is defined as having no more than 15 gallons of residual fuel in the tanker and fuel lines.
5. The JSCL stormwater treatment system shall be constructed in accordance with DEC Permit/Authorization No. 7728-9015, approved on May 31, 2017 and effective through May 31, 2022. JSCL shall apply for and receive any necessary renewals of this stormwater treatment system permit.
6. Other than noise levels from trucks entering and exiting the project site, no noise levels from the facility shall exceed 70 dBA L_{MAX} at the property line.
7. Hours of operation for the JSCL office shall be from 8:00 am to 5:00 pm, Mondays through Saturdays
8. JSCL shall minimize the frequency of truck drivers arriving at the project site before 5:00 am or after 10:00 pm. No trucks shall operate on Sundays or state or federal holidays, except in the case of emergencies. JSCL shall maintain a log on the arrival and departure times for its trucks and drivers and will make that log available to this Court and the parties to this appeal, for use during any hearing on a post-judgment motion to reopen these proceedings to determine whether the nighttime truck traffic has been "excessive at the property line and represents a significant increase in noise levels in the vicinity of

the development so as to be incompatible with the reasonable use of the surrounding area,” pursuant to Bylaw § 8.1.

This completes the current proceedings before this Court. A Judgment Order accompanies this Merits Decision.

Electronically signed on May 29, 2020 at Brattleboro, Vermont, pursuant to V.R.E.F. 7(d).

A handwritten signature in black ink, appearing to read "Thomas S. Durkin". The signature is written in a cursive style with a large initial 'T' and 'D'.

Thomas S. Durkin, Superior Judge
Environmental Division