



August 25, 2020

Whately Planning Board
4 Sandy Lane
Whately, MA 01373

**RE: DMCTC, Inc.
Marijuana Cultivation
7 River Road**

Dear Board Members:

On behalf of our client, Debilitating Medical Condition Treatment Centers, Inc. (DMCTC), we respectfully submit this application for Site Plan Review for outdoor and greenhouse cultivation of marijuana on an existing agricultural field at 7 River Road. The site of the proposed facility is currently used for commercial hay production, and includes a single-family home, barn and small ground-mounted solar array.

The property is currently owned by the Rawls family. DMCTC will be the licensed marijuana cultivator and lease the land through a separate legal entity, MIDCO CHY MA, LLC, that is affiliated with DMCTC.

DMCTC will be licensed by the Cannabis Control Commission (CCC) as an outdoor cultivator, which allows DMCTC to operate a greenhouse *without* supplemental grow lights, but the majority of the cultivation will occur in the existing agricultural fields on the property. Additional site improvements are proposed to support this operation, including the construction of a gravel parking lot, irrigation well, propane tanks, and mechanical equipment.

This letter discusses how the proposed project complies with the requirements of the Whately Zoning Bylaw. A set of site plan drawings is enclosed.

Site Overview

The site totals approximately 52 acres, which includes 2 parcels. The front, 21-acre, parcel is the site of essentially all proposed construction and cultivation activities. The rear parcel is predominantly wetland, except for a narrow strip of land that extends along the southern lot line of the front parcel. This strip contains agricultural field and an access road.

A single-family house, barn and small ground-mounted solar array are located near the front of the property, approximately 300 feet from the street. The remaining land consists of active agricultural fields with some wooded wetland area on the front parcel and extensive wooded wetlands on the rear parcel.

The property is a flag lot with 93 feet of frontage on River Road, and the existing barn is located within the property line setback. These two conditions do not conform to the zoning bylaw in the existing condition, as described in a later section of this letter.

Zoning District/Land Use

The entire property is zoned Agricultural/Residential but encompasses two zoning districts. The land within 400' of River Road is zoned A/R1 and the remaining land is zoned A/R2. Under the Whately Zoning Bylaw (§171-8), marijuana cultivation is a permitted use in zone A/R2 by special permit from ZBA with Site Plan Review by the Planning Board.

All structures that house cannabis, and all activities that involve handling of cannabis would occur within a security fence that will coincide with the boundary of A/R2. The existing house and barn, located in A/R1, are proposed to be used for administrative functions and storage of non-cannabis equipment and materials. The proposed parking lot is also located in this zone. The applicant would like to retain the right to have the facility manager live on the property in the existing house, and requests that the Board determine whether this arrangement is allowable under the bylaw.

Nonconformance

The following aspects of the property do not conform to the Whately Zoning Bylaw in the existing condition. We have submitted a Special Permit application to the ZBA that requests a finding allowing the existing nonconformance to continue with the proposed use.

Frontage

The property includes frontage of 93 feet on River Road, which is less than the minimum required frontage of 200 feet for a lot with public water in zones A/R1 and A/R2. As per §171-12 of the Whately Zoning Bylaw, the ZBA may grant a Special Permit for the proposed use on the existing non-conforming lot if it finds that the proposed use *“will not be substantially more detrimental to the neighborhood than the existing nonconforming use and that it will not increase the danger of groundwater pollution or contamination.”*

The nonconformance is insufficient frontage. The impacts to the neighborhood of the project are very similar to the existing use as they relate to property frontage. The purpose of frontage requirements is to ensure adequate access to a property from a public way and as a means of controlling the density of development. The proposed site plan provides for access by employees, deliveries, and emergency vehicles. Sightlines from the driveway are excellent in both directions, and we are not aware of any traffic issues at the site. The proposed project will continue to utilize the site for an agricultural use and preserve much of the existing open space. Overall, it is our opinion that there will be no increase in impact due to the reduced frontage of the property.

Due to the stringent regulation of pesticides that may be used on a cannabis crop in Massachusetts, the proposed cultivation operation will not increase the risk of groundwater contamination from the site. Only organic fertilizers will be used, and CCC regulations allow only those pesticides that are in EPA category 25(b), known as “minimum risk pesticides”. Category 25(b) includes compounds that EPA has determined “pose little or no risk to human health or the environment” and are exempt from EPA regulations on toxicity due to their inherent safety.

Setback

An existing barn is located within 15 feet of the property line near the front of the site. The required front yard setback is 50 feet. The project proposes to continue using the barn for the storage of non-cannabis agricultural materials and equipment, which is identical to the current use.

General Zoning Requirements

Dimensional Regulations

The proposed project complies with the dimensional regulations under §171-8, except as noted in the previous section describing the existing nonconformances. A summary of how the proposed site complies is included on the site plan drawings.

§171-28.6 requires marijuana establishments to be located at least 50 feet from any property line. All cannabis will be grown on land at least 50 feet from a property line. We propose to construct a security fence between the 50-foot setback and the property line to allow for access to fields by equipment and maintenance of field edges. We proposed to delineate the 50-foot setback line with permanent timber or metal posts to ensure compliance with the bylaw.

Parking and Loading

The proposed site will have approximately 10 year-round employees. For short periods of 2-3 weeks, most notably fall harvest time, the site population will increase to a maximum of 60 people. The site plan includes a gravel parking lot providing spaces for the full-time employees, visitors, and ADA spaces.

Overflow parking for seasonal peaks will be provided along the entry drive and on the land south of the parking lot. Note that seasonal farm workers typically arrive to the site in groups, and the overall parking demand during peak times will be significantly less than one vehicle per person.

A loading area for the site is proposed within the security fence between the greenhouses and maintenance/headhouse structures. Cannabis product will be picked up by small un-marked vehicles, typically cargo vans or sport utility vehicles. These vehicles will enter the greenhouse via the east-facing roll-up doors to allow for secure loading. Pickups, which are expected to occur up to 5 times per week (primarily in the fall) are scheduled at variable times to prevent tracking. All cannabis product is transported by a state-licensed transport company, which may or may not be the same entity that operates the facility. Storage of materials (both cannabis and non-cannabis) will be inside the secure perimeter fence.

Signs

Proposed signs will be located along the entrance at Christian Lane as shown on the site plan. Signage will list the address of the property and prohibit unauthorized entry to the site. Neither the name of the owner/operator, nor the nature of the grow operation will be identified on the signs.

Environmental Performance Standards

The project is designed to meet the standards established by §171-15. Specifically:

1. No unusual noise-producing equipment is proposed. The noise from the site will be consistent with normal agricultural practices. New, modern fan equipment will be used to ventilate greenhouses.
2. Odor control is discussed in more detail later in this letter.
3. The proposed use does not generate dust or fumes. Odors will be addressed as discussed later in this letter.
4. Flammable materials will include gasoline and diesel fuel for equipment, and propane for heating stored in two 1,000 gallon tanks. Excess gasoline and diesel will not be stored on site. Propane storage will be constructed in compliance with NFPA 58.
5. Greenhouses will be covered in standard poly sheeting, typical of small greenhouse structures.
6. Radioactivity: Not Applicable
7. The site will be accessed from a single driveway off River Road. Sightlines from this driveway are excellent, and it is sufficiently separated from the nearest intersection at Pilvinis Road. The small proposed parking lot is located directly behind a large existing barn that will remain.

8. The greenhouses are constructed with open space between each bay to allow stormwater to be disbursed over the large, flat site and encouraged to infiltrate to groundwater. Soil testing showed poorly-draining soils with shallow groundwater, which are not conducive to infiltration. Greenhouses will be constructed on gravel surfacing to eliminate the creation of new impervious surface.
9. In addition to tilling and other disturbance directly related to cultivation activities, disturbances will be required for construction of the proposed greenhouses, driveway, and parking lot. Silt fence and/or straw wattle will be used at the downslope edges of the site to prevent sediment from leaving the site.

Landscaping

Landscaping will include: Maintaining existing specimen trees along the existing drive entry drive to screen the residential property to the north. The northern property line will be planted with native / adapted deciduous trees planted in a staggered pattern, within a 30' wide planted buffer. Tree species, as noted on LC-3 were selected for being native, hardy, having excellent animal habitat potential, and for their large size, and screening potential at a distance. It is the intention that all areas outside of cultivated fields are to be prepared and seeded with native grasses.

Requirements Specific to Marijuana Establishments

Allowed Locations

Setbacks from Certain Land Uses

The enclosed Neighborhood Plan identifies the land uses present within 1,000 feet of the site and shows the limit of the 500' buffer around the proposed Marijuana Establishment (measured from the property line of the parcel, for simplicity). None of the restricted land uses are located within 500' of the project.

Residential Units

No residential units exist or are proposed within the secure perimeter of the cultivation facility. The applicant proposes that the facility manager have the option to live on-site. We request that the Board clarify whether this would be acceptable under the zoning bylaw.

Additional Setback

All structures housing cannabis and all land used for growing cannabis are located more than 50 feet from the property line. As noted in an earlier section, we propose to construct fencing inside the setback for field access and to utilize the existing barn for storage of non-cannabis equipment and materials.

Permitting Standards

The project is designed to meet the marijuana-specific design standards established by §171-28.6.D. Specifically:

1. Dimensional Requirements: Dimensional requirements are met, except for the existing nonconformances noted above. All structures housing cannabis and all land used for growing cannabis meet the setback requirements. As noted elsewhere in this letter, we proposed to re-use the existing house and barn for support functions and storage that do not involve the handling of cannabis, and we propose to construct the security fence within the setback. The property line setbacks are proposed to be staked in the field with permanent timber or metal posts to delineate the land where cannabis may be grown.

2. Parking and Loading Requirements: Parking and loading will be provided as described in an earlier section of this letter. A small parking lot is provided for year-round employees, and ample space is available for short periods of time when seasonal workers are present.
3. Site Screening: The site security fence includes a privacy screen to obscure the operation of the facility. Additional landscaping is proposed along the north property line to break up the fence line and provide a natural buffer. Adequate natural screening exists on other areas of the site and will remain. The parking lot and secure entrance to the site are screened by an existing barn that will remain.
4. Lighting & Security: Exterior lighting is shown on the site plan and consists of the minimum lighting necessary to allow for employees to walk between the greenhouse and the proposed parking areas. Additional wall-mounted lights will be provided only as required by the building code at entrances. Exterior lighting will be dark sky compliant and programmed to turn off after employees leave for the evening and remain off overnight. Security cameras will be infrared low-light cameras that function with ambient light and do not require additional site lighting.

The facility will be licensed for outdoor cultivation and will not be allowed to use grow lights. CFL work lights will be utilized for safety when workers are on site before sunrise or after sunset.

Details of the proposed security plan are confidential. A meeting with the Chief of Police is scheduled to review the site plan and discuss the security plan prior to our meeting with the Board. Cameras will be infrared, capable of operation based on ambient light and do not require artificial lighting. Secure areas of the site will be surrounded by an 8' chain-link fence with privacy screen. Security personnel will be at the site any time employees are working and will monitor the site 24-hours per day.

5. Noise & Odors: Noises produced from the site will be consistent with typical agricultural production, including tractors and other conventional farm equipment. Greenhouses will have conventional fans for ventilation, which will feature new modern equipment.

DMCTC will take a multi-pronged approach to managing odor in its greenhouse and outdoor facilities. In its greenhouses, exhaust fans will be fitted with an activated high volume carbon filter and finely tuned negative air pressure to trap cannabis terpenes and scrub odor from the exhaust air. These carbon filters are industry standard for the removal of terpene compounds in cannabis cultivation facilities, and work through both adsorption and chemisorption processes. If applied correctly, efficiency of 99.9%, as stated by several vendors, can be achieved. Personnel will be trained in odor mitigation protocols for the greenhouses, including sealing internal greenhouse environments from the outside and routine maintenance of the carbon filtration systems.

The majority of the plants will be grown outdoors in the open air. These fields will be located behind the proposed greenhouses and are more than 400' from the nearest residence. The rear cultivation field, which makes up approximately half of the outdoor grow areas, is more than 1,300 feet from the nearest residence. DMCTC will be planting low odor varieties, including Northern Lights, Tangie, Pineapple Express, Wedding Cake, GG4, and various other strains that have relatively mild odor. DMCTC will continue to be careful in the selection of genetics that have low VOC counts. The proposed low-odor varieties will be further graded by odor potential, with the lowest-odor varieties grown in the front fields nearest the greenhouses. The fields include wooded vegetative environmental buffers, especially the rear field which is surrounded on all sides. The wooded buffers will be retained and are generally

located in protected wetland areas. The vegetative buffers deflect odor upwards, away from ground level, and support dissipation.

6. Energy Efficiency: The proposed project is for outdoor cultivation, which provides dramatic energy efficiency improvement against indoor cultivation operations. This compares favorably with indoor cannabis cultivation, which use significant energy due to the need for horticultural lighting, dehumidification, and HVAC systems. CCC regulations recognize this environmental benefit and provides certain benefits to outdoor cultivation licensees.

DMCTC will use no supplemental horticultural lighting – only sunlight – in both its greenhouse and outdoor cultivation process, natural cooling as well as low impact mechanized exhaust fans, and conduct its outdoor cultivation operation within the natural growing season of the local environment. The proposed project will utilize high-efficiency equipment and fixtures wherever possible. The existing small solar array will be retained and integrated to the site electrical system.

7. Water Efficiency: DMCTC will irrigate all of its plants using filtered water from a new private well. The primary element to DMCTC’s water efficiency plan will be in the delivery of water to the plants. A drip irrigation system will be used to supply all plants with water and nutrients. Drip irrigation systems can save up to 80% more water than more traditional irrigation systems. Drip irrigation reduces water loss due to evaporation, and reduces the overall water used by delivering precise quantities of water and nutrients to each individual plant. Moreover, water and nutrient levels will be monitored daily to tailor irrigation to deliver the exact amount of water and nutrients delivered to the plants -- no more or less than is needed. Irrigation will be scheduled using timers ensuring all plants receive the appropriate amount of water and nutrients. All irrigation runoff from the greenhouses will be re-used on the outdoor crops, leading to virtually zero waste.

The project team explored the use of rainwater harvesting to supplement well water. It was determined that it would not be feasible to capture rainwater due to both the style and layout of proposed “light touch” greenhouse design. The greenhouses will be simple gothic style frames with poly sheeting roof and sides. Greenhouses will be constructed as multiple stand-alone units separated by walkways. The greenhouses would not have gutters, and the only plausible way to capture rainwater would be with a series of drip-strips or French drains. Unfortunately, regulated marijuana cultivation requires extremely high-quality water to grow plants that can pass stringent CCC testing requirements, and captured surface water poses significant challenges during water treatment as compared to groundwater. However, the dispersed nature of the greenhouses, which are constructed with gravel surfacing and are generally not watertight at ground level, encourages stormwater to infiltrate into the ground at much greater rates than a large gutter-connected greenhouse.

8. Hazardous Materials: Hazardous Materials: DMCTC anticipates using only products that the EPA considers minimum risks to control pests, including neem-based organic sprays. Pesticides will only be used outside of its cultivation area, and only as allowed under the Wetlands Protection Act and MDAR regulations. While EPA has identified minimum risk active ingredients, CCC and MDAR will inspect marijuana and marijuana products produced for the presence of pesticides on cannabis. DMCTC therefore pursues a low volume, light touch approach to the use of these materials. DMCTC anticipates using Nutrichem 20-20-20, Stimplex Silica 0-60-40 as nutrients.

DMCTC anticipates having a 1-2,000 gallon propane tank on site to supply greenhouse heaters with fuel. DMCTC may additionally have limited quantities of gasoline to supply farm vehicles and equipment,

similar in quantity to what area households may store.

All materials that have toxicity or potential to be hazardous will be stored in accordance with department of agriculture guidelines while following the directions of the products label and MSDS. DMCTC does not anticipate having anything onsite that cannot be purchased by general households. All pesticides and nutrients will be in accordance with stringent CCC guidelines and stored and labeled to prevent application by untrained staff/visitors. These materials will also be locked and secured to ensure limited access by personnel. Cleaning materials and waste will be stored in designated areas with clear guidelines on disposal and storage.

The project team has met with the Fire Chief to have an initial conversation about the safety plan for 7 River Road, and will be meeting again with the Chief prior to the ZBA hearing to review the site plan in detail.

9. Signs: The proposed signage is indicated on the plan and discussed in an earlier section of this letter. Signage will comply with all pertinent regulations.
10. Greenhouses: As shown in the attached plans and details, proposed greenhouses are consistent with the definition in the zoning bylaw. Greenhouses will have gravel floors. The front portion of the site consists of Prime Farm Soils, which are almost entirely located in the A/R1 district within 400 feet of River Road. The proposed greenhouses will not disturb prime farm soils. Outdoor fields are proposed to be constructed with hoop house frames for the purpose of pulling blackout tarps over the plants for a few hours per day, seasonally.
11. Buildings: No new buildings are proposed. An existing single-family farmhouse and barn will be re-purposed for support activities that do not involve the handling or storage of cannabis.
12. Marketing: The proposed facility will not engage in consumer marketing activities. Products are sold to licensed marijuana manufacturers or retailers. The facility will not be open to the public.
13. Hours of Operation: General operation will occur during normal business hours for agricultural work, with generally longer hours (sunrise to sunset) during harvest time. Security personnel may be at the site at any time, up to 24-hours per day.
14. Retailer Liimits: Not applicable.
15. Applications:
 - a. Land Owner:
Rawls Family
15 Desperado Drive
Laramie, WY

Licensee:
Debilitating Medical Conditions Treatment Centers, Inc.
11-13 Hampden Street
Springfield, MA 01103
 - b. See Attached

- c. John Hanmer
36 Hickory Lane
Hampden, MA 01036
 - d. Employees: 10 full-time year-round with additional seasonal employees peaking at 60 during fall harvest.
 - e. Security precautions are summarized above. The project team has scheduled a meeting to review security with the Chief of Police prior to the ZBA hearing.
16. Site Plan Review: A site plan review application is in process. It is anticipated that the site plan will be submitted to the Planning Board at their meeting on 8/25/20. A traffic summary is attached to this Special Permit application and will be provided to the Planning Board as well.
17. Reporting: Noted. The applicant will comply with the reporting requirements.
18. Change in License or Owner: Noted. The applicant will comply with the notice requirements.
19. Change in Ownership: Noted. The applicant does intend to eventually purchase the property from the current landowner. If possible, the applicant respectfully requests that the Board issue a condition of approval providing automatic special permit renewal if the land is purchased by the applicant.
20. Host Community Agreement: The signed HCA is attached.

Conclusion

We are confident the proposed plan addresses the requirements of the Whately Zoning Bylaw and will gladly incorporate additional comments from the Board and Town departments. We look forward to presenting this site plan to the Board at your next meeting.

Sincerely,

Berkshire Design Group



Christopher Chamberland, P.E.
Principal

cc: Jared Glanz-Berger, DMCTC, Inc.