

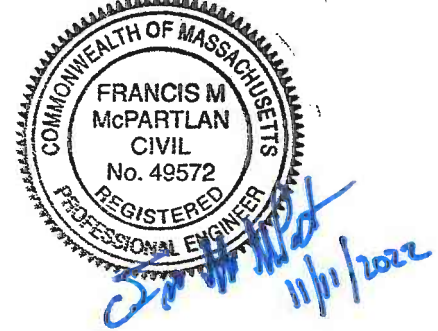
Memo

JN 6907

Date: November 11, 2022

To: Town of Dudley Conservation Commission

From: Frank McPartlan, PE (MA)

RE: Stormwater Management Memorandum - Redevelopment**35-37 Chase Avenue****Dudley, Massachusetts****Existing Conditions**

The subject property is approximately 14.93 acres and has been used as a mill facility for over a century. The existing pavement and building configuration has been in place for approximately 50 years. The project area is bordered to the north by Brandon Road, the west by Chase Avenue, and the east by the French River.

The existing site consists of approximately 150,934 square feet of pavement and 97,199 square feet of building area, inclusive of the existing building demolished due in part to site safety concerns, for a total of 248,133 square feet of existing impervious surfaces.

The Project

The Applicant proposes to construct a phased redevelopment of the existing Mill facility at 35-37 Chase Avenue. The applicant converted a portion of building 6 into a Dispensary, along with associated paved parking, gravel parking, and utilities. Stormwater management areas and swales mitigated this disturbance to the site and is documented under previous permit applications. This application continues the project in three phases: the redevelopment of the remainder of Building 6; the redevelopment of Buildings 1, 7, 8, and 9; and the construction of an approximately 55,450 square foot greenhouse.

The proposed site will consist of approximately 122,464 square feet of pavement and 121,909 square feet of building area, for a total of 244,373 square feet of proposed impervious surface. This represents an overall reduction of 3,760 square feet of impervious surfaces.

Stormwater Management Standards*Standard 1: Untreated discharges*

No new stormwater conveyances are proposed as part of this project. An existing stormwater discharge will be repaired. This stormwater discharge previously received flow from existing buildings and untreated flow from storm inlets. The existing storm inlets will be replaced with

deep sump hooded catch basins, providing TSS removal. The proposed building roof leaders will be routed through a header pipe to this discharge as well, eliminating overland flow across pavement to this discharge point.

Standard 2: Peak Rate Control and Flood Prevention

The proposed project complies to the maximum extent practicable. Previously permitted stormwater management controls have been constructed under MassDEP 146-0758. Additionally the overall impervious surfaces within the project area have been reduced by 3,760 square feet, further reducing peak discharges from the project area.

Standard 3: Recharge to Groundwater

The proposed project reduces overall impervious surfaces by approximately 3760 square feet, therefore increasing recharge to groundwater. In addition, where feasible gravel has been used in lieu of pavement for parking areas (MassDEP 146-0758) and fire access. The existing subsurface soil profiles consist of approximately 5 feet of urban fill

Additional groundwater recharge is not feasible on the property due to an existing Activities and Use Limitation on the site (Site Number 2-0015663).

Standard 4: 80% TSS Removal

The proposed redevelopment will provide deep sump hooded catch basins where existing stormwater inlets are replaced, providing TSS removal to the maximum extent feasible on site.

A Long Term Pollution Prevention Plan has been prepared for the property.

Standard 5: Higher Potential Pollutant Loads (HPPL)

The existing and proposed uses of the project site does not constitute land use with higher potential pollutant loads, therefore Standard 5 does not apply to the proposed project.

Standard 6: Critical Areas

The project area is located within the limits of a Zone II mapped for the Dudley Water Department (PWS2080000). The existing conditions and proposed site conditions do not provide any significant alterations to stormwater runoff.

Standard 7: Redevelopments and Other Projects Subject to the Standards only to the maximum extent practicable

The project is subject to the Stormwater Management Standards only to the maximum Extent Practicable as a Redevelopment Project. Certain standards are not fully met, however documentation of Standards 1, 8, 9, and 10 are provided.

Standard 8: Construction Period Pollution Prevention and Erosion and Sedimentation Control

The proposed project is subject to the filing of an Environmental Protection Agency Notice of Intent (EPA NOI), the Stormwater Pollution Prevention Plan (SWPPP) will be prepared prior to construction. This document will be prepared to satisfy the requirements of the EPA NOI and the Standard 8 Construction Period Pollution prevention and Erosion and Sedimentation Control Plan.

Standard 9: Operation and Maintenance Plan

Please refer to the attached Stormwater Operation and Maintenance Plan.

Standard 10: Prohibition of Illicit Discharges

An illicit discharge statement will be prepared after approvals are received and prior to construction.