Cape Pickle, LLC

Project Address: 51 Evergreen Circle, Mashpee MA 02649

Company Address: 166 Hollidge Hill Lane Marstons Mills, MA 02648

NITROGEN MITIGATION FEE UPDATE – 5Dec24

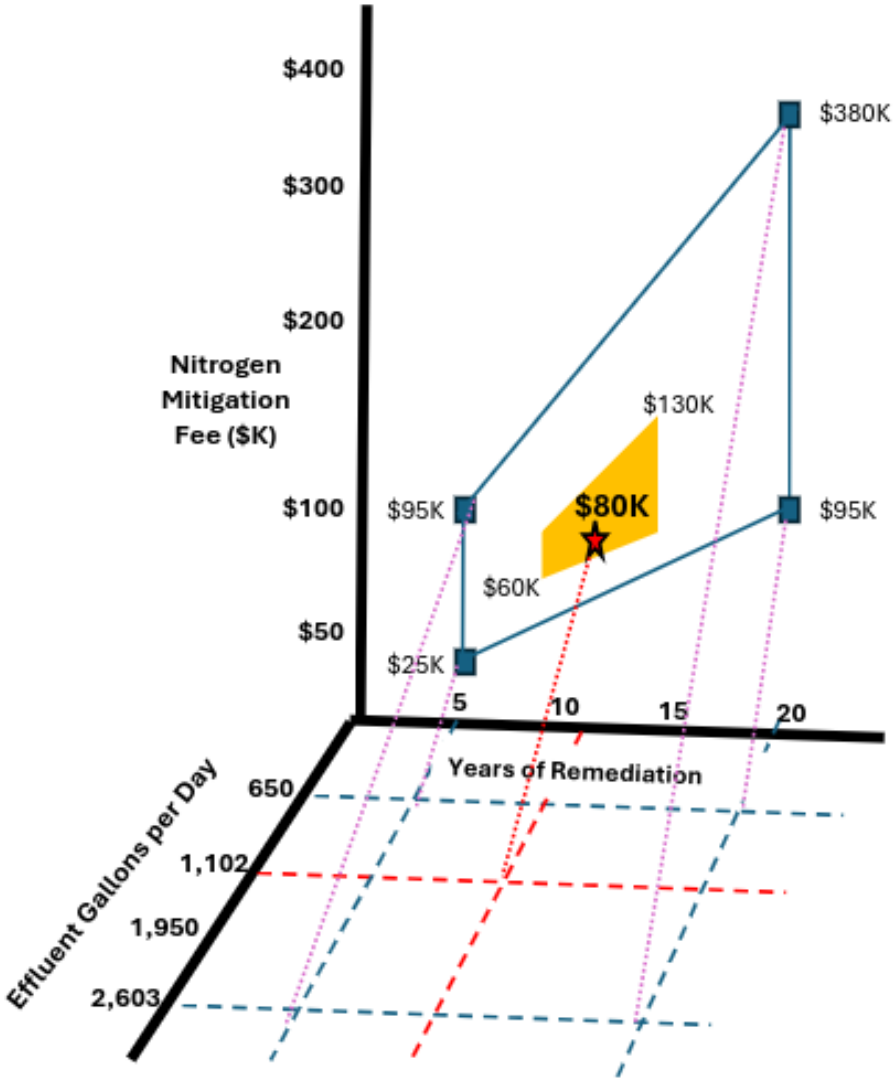
This document represents the final communication by the applicant on nitrogen fee to the Cape Cod Commission Staff and Subcommittee for File # 24023 - an indoor recreation facility proposed for development at 51 Evergreen Circle, Mashpee.

The recommended nitrogen mitigation fee proposed for full commission review should consider the following:

- Commission staff stated in the 2Dec hearing that the fee should be proportional to the project output. The nitrogen fee should not be punitive.
- Commission staff stated in the 2Dec hearing that Phase 5 of the Mashpee Clean Water Plan sewer installations will reach Evergreen Circle in 2035-2040. 2035 is ten years from the projected opening of this facility.
- 2018 RPP requirement that remediation must be completed within five years' time is not aligned with mandates of sweeping reform being driven by the 2023 MA Clean Water Act M.G.L.c,32. There are Mashpee town-wide sewer installations ongoing through the Mashpee Clean Water Plan. This will drive substantial estuary health recovery, and the total plan should be considered in this project's fee proposal.
- Mashpee Clean Water Plan will provide sewer to this location well before 20 years' time as mentioned by both applicant and staff at the 2Dec hearing. Therefore, the fee should not be based on a 20-year remediation.
- The discussion of inflation at the 2Dec hearing ignored documented technological advancements made over the past 10 years that reduce nitrogen remediation costs at wastewater plants and Mashpee will remediate nitrogen in newly constructed facilities.
- An argument for or against a fee increase or reduction should not be based upon inflation nor upon technological advances. The stated RPP fee is the basis, and the arguments for fee adjustments should be proportional to the projected actual effluent output of and the duration of likely remediation before sewer availability.
- Total effluent matters. Low flow urinals/toilets, as well as like-facility water data previously provided substantiate lower output than the basis of the RPP estimate, and that effluent will be at 10 ppm-N per I/A septic capabilities. Less water, less discharge, less nitrogen to mitigate.

The two most critical and relevant factors discussed at the 2Dec hearing that influence fee determination are 1) total effluent (gallons per day at 10ppm-N) and 2) period of mitigation (years).

The range of potential nitrogen mitigation fees based on these factors is shown in the following figure:



The figure shows fees for a range of 650 to 2,603 gallons per day effluent and 5 to 20 years of remediation. The potential fees for this range are approximately $25K to $380K.

However, this total range is not relative to this facility given the details previously shared in the 22Nov document, the 2Dec hearing, a 3Dec email, and this document.

A more practical range of fee would be based on a flow of 1,000 to 1,500 gallons per day and a remediation period of 8 to 12 years. The fee range for this narrower range is $60K to $130K.

The star at $80K represents a fee calculated on an operating basis of 1,102 gallons per day effluent and 10 years remediation – the most likely outcome given all details previously provided.

A fee in the range of $60K to $130K is appropriate for this facility considering neither the exact period of remediation nor output is fixed. It is proposed that the subcommittee select a fee within this more appropriate range for full commission review. Such a fee would be proportional to the project's projected actual output and remediation period before connecting to the town sewer.