

McHenry County Department of Health
Division of Environmental Health
Onsite Wastewater Treatment System Design Review Checklist

PERMIT #: _____

REVIEW DATE: _____

STAFF NAME (print): _____

Review Type: Initial Revised
Review Status: Approved Not approved

General Information

- C NC NA V: Plat of survey confirms lot dimensions, easements, restricted areas
- C NC NA V: 4, (5 if incorporated area), copies of design
- C NC NA V: All copies include signature and license expiration date of designer
- C NC NA V: Completed MCDH application and applicable fees
- C NC NA V: Completed IDPH well application
- C NC NA V: Preliminary design review completed

Site Plan/Design Review

- C NC NA V: Scaled design shown at 1":10', 1":20' or 1":30'
- C NC NA V: Referenced benchmark provided
- C NC NA V: Access road labeled
- C NC NA V: Direction indicated on design
- C NC NA V: Flood hazard concerns addressed
- C NC NA V: Water supply type and location indicated for subject and neighboring properties
- C NC NA V: Existing OWWTS type and locations indicated on subject property
- C NC NA V: Existing OWWTS type and locations indicated for neighboring properties (proposed wells)

Required lateral separation dimensions provided

- C NC NA V: OWWTS to structures
- C NC NA V: OWWTS to nearest property line
- C NC NA V: OWWTS to well(s) on subject property
- C NC NA V: OWWTS to well(s) on neighboring properties
- C NC NA V: OWWTS to water service lines on subject or neighboring properties
- C NC NA V: OWWTS to existing or proposed underground utilities
- C NC NA V: OWWTS to existing or proposed storm water structures
- C NC NA V: OWWTS to driveway and parking areas
- C NC NA V: OWWTS Class V injection well meeting all applicable setbacks or IEPA waiver

Soils information

- C NC NA V: Soil test completed within one year
- C NC NA V: Correct soil boring locations
- C NC NA V: Significant characteristics (slope, parent material, limiting layers, etc.)
- C NC NA V: New parcel requirements (parcels <10 acres created after 9-1-1990)
- C NC NA V: Moderately slow soils – LPP or duplex pumps to alternating seepage fields

Design criteria

- C NC NA V: Design calculations provided
- C NC NA V: Verification of existing design criteria in historical permit records if applicable (replacement)
- C NC NA V: Correct square footage of seepage area provided (type 1-4 and type 5 application bed)
- C NC NA V: Correct square footage of basal area provided (type 5 systems)
- C NC NA V: 100% future septic system replacement area provided
- C NC NA V: Non-domestic waste and domestic strength of waste concerns addressed

Side profile and field detail

- C NC NA V: Side profile of OWWTS from building to filed provided
- C NC NA V: Seepage field detail (side profile of trench, bed, type 4 or 5), including chisel plow notes if applicable.
- C NC NA V: Type 1-3 systems (trenches 9' center to center)
- C NC NA V: Type 4 and 5 systems (seepage areas 12' spacing provided)

C= Compliant or completed, NA= Not applicable, NC= Not compliant or not complete, V = Variance requested, (")= inches, (')= feet.

NOTE: Enter additional comments on supplemental review comments sheet.

Critical elevations review

- C NC NA V: Building sewer inverts, tank inverts and distribution component inverts
- C NC NA V: Perforated pipe inverts and/or bottom of seepage area invert(s)
- C NC NA V: Required separation from seepage area to limiting layer provided
- C NC NA V: 1% minimum pitch provided for all gravity fed sewer lines (NOTE: serial dist. req. 1" min. drop from tank)
- C NC NA V: Existing and proposed 1' contours
- C NC NA V: LPP calculations (NOTE: LPP design calculation worksheet must be completed)

Pipe material specifications

- C NC NA V: All solid pipe schedule 40 PVC or greater
- C NC NA V: Cleanouts provided every 50' (gravity fed sewer only, structure to tank)
- C NC NA V: Perforated pipe or chamber specifications

Septic tank (s)

- C NC NA V: Size
- C NC NA V: Garbage grinder statement provided
- C NC NA V: IDPH Approved
- C NC NA V: Access riser to finished grade
- C NC NA V: Effluent filter NSF approved (required if LPP without ATU)

Lift Station(s)

- C NC NA V: Size
- C NC NA V: Construction specifications
- C NC NA V: Access riser to 6" above finished grade
- C NC NA V: Pump specifications
- C NC NA V: Dose volume
- C NC NA V: High water alarm (audio visual) and reserve capacity
- C NC NA V: Force main freeze protection
- C NC NA V: Quick disconnect device
- C NC NA V: Weep hole specifications

Aerobic treatment unit (s)

- C NC NA V: ANSI/NSF Class I
- C NC NA V: Alarm (audio visual)
- C NC NA V: Access riser to finished grade

Other design considerations

- C NC NA V: OWWTS and structure served on common property (NOTE: Utilize deed restriction form if applicable)
- C NC NA V: Water meter reading in gallons or tens of gallons (non-residential)
- C NC NA V: Estimated population meets IDPH non-community program requirements
- C NC NA V: MCDH registration of SWHT or non-residential ATU
- C NC NA V: Food establishment meets public health ordinance requirements

Variances

- C NC NA V: All applicable variances requested on design or variance request form
- C NC NA V: Administrative approval
- C NC NA V: Critical variances recorded on a Notice of Variance form with the Recorder's Office

Verify prior to completing review and/or final approval

- C NC NA: Active Department files (health review, permit, RFS, registration, annual health permit), update if applicable
- C NC NA: Review fee required or paid and all previous review comments adequately addressed
- C NC NA: Availability of community sewer or water
- C NC NA: Design consistent with municipal and/or subdivision plat notes
- C NC NA: Notice of Variance Form recorded
- C NC NA: Deed Restriction form recorded
- C NC NA: IEPA waiver for proposed Class V injection well setback distances
- C NC NA: IDPH well application approved and signed
- C NC NA: Well variance rationale added to IDPH well variance quarterly log (replacement wells)
- C NC NA: App. stormwater permit conf. (FHA present, >5000sq.ft. disturbance & non-certified communities)
- C NC NA: All applicable MCDH stamps added to design
- C NC NA: Approval stamp sign off on design
- C NC NA: Statistical information and review status entered (Onbase: re-index permit info. sheet, ABS: application info. Pg.)
- C NC NA: MCDH approval letter completed

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NOTE: Enter additional comments on supplemental review comments sheet.