IAC Chapter 69 Summary

For On-Site Wastewater Treatment and Disposal Systems

Minimum Septic Tank Capacity Requirements

| 0-4 Bedroom homes | 1,250 gallons |
|--|--------------------------|
| 5 Bedroom homes | 1,500 gallons |
| 6 Bedroom homes | 1,750 gallons |
| 7 + Bedroom homes (or serves >15 persons) | Determined by the DNR |
| Garbage disposal, water softener, whirlpool bath | Add 250 gallons per unit |

Note: Minimum septic tank liquid holding volume shall be two times the estimated daily sewage flow. Please see Chapter 69 for full septic tank construction requirements.

Soil Absorption System Size Chart (in feet based on PERC results)

| Min. per inch | 2 BR 300gpd | 3 BR 450 gpd | 4 BR 600 gpd | 5 BR 750 gpd | 6 BR 900 gpd |
|---------------|-------------|--------------|--------------|--------------|--------------|
| 1-5 | 160 | 200 | 260 | 340 | 400 |
| 6-15 | 200 | 300 | 400 | 500 | 600 |
| 16-30 | 300 | 400 | 500 | 600 | 700 |
| 31-45 | 400 | 500 | 600 | 800 | 900 |
| 46-60 | 500 | 600 | 700 | 900 | 1,100 |

Note: If Percolation test results were less than 1 minute per inch or more than 60, an alternative system would be more suitable.

Minimum Setback Requirements

| Minimum distance (ft.) from | Septic Tank | Absorption Field |
|--|-------------|------------------|
| Private water supply well | 50 | 100 |
| Public water supply well | 200 | 200 |
| Groundwater heat pump borehole | 50 | 100 |
| Lake or reservoir | 50 | 100 |
| Stream or pond | 25 | 25 |
| Edge of draining ditch | 10 | 10 |
| Dwelling or other structure (including home) | 10 | 10 |
| Property lines (unless easement is signed) | 10 | 10 |
| Other subsurface waste treatment system | 5 | 10 |
| Water lines continually under pressure | 10 | 10 |
| Suction water lines | 50 | 100 |
| Foundation drains or subsurface tiles | 10 | 10 |

| Sewer Construction | Minimum distance from private water supply | Minimum distance from public water supply |
|-------------------------------------|--|---|
| Schedule 40 PVC | 10 | 25 |
| Sewer pipe (watertight & rot-proof) | 50 | 75 |

General Rules of Chapter 69

- All sewage must be treated prior to discharging into soil on onto surface. There is no such thing as a direct surface discharge from a tank i.e. into a ditch, field tile or field being grandfathered in. These are illegal.
- → If treated wastewater discharges onto the surface or into a water supply, a NPDES General Permit No. 4 must be obtained prior to installation. This is applied through the Iowa DNR and can take six months to process. <u>All</u> systems, which serve more than 1,500 gallons per day, must be approved through the DNR by submitting a site plan.
- → If treated wastewater discharges into the soil, a treatment system must be installed which includes both primary treatment (septic tank) and secondary treatment (leach field) sections. Systems using less than 1,500 gallons per day require a septic system permit, which is applied through the local County Sanitarian.

Sewer construction

- → Sewer pipe must be a minimum 4 inches in diameter, and laid out to the following minimum grades: 4 inch = 12 inches per 100 feet; 6 inch = 8 inches per 100 feet.
- → There must be a cleanout where the building sewer leaves the house, at least every 100 feet thereafter, and at each change in direction or grade of 45° or more.
- → The location of the system is important and a soil evaluation (percolation test or qualified soil analysis) is required before any soil absorption system is installed. Please contact the County Sanitarian for percolation test procedure.

Septic Tanks

- → Septic tank systems should not be used for disposal of chemical wastes or grease in large quantities. For chemical wastes or grease ("high strength waste"), contact the sanitarian for assistance.
- Septic tanks should be clean-outs every 3-5 years to prevent solids from flowing into the leach field. Regular maintenance is the key to a long-lasting trouble-free system. See the manufacturer's instructions or your County Sanitarian for details. Clean outs must be performed by a state-registered septic tank pumpers only. See Chapter 68 for details.

Absorption Field

- → The bottom of leach field lines must be installed at least 3 foot above the seasonal high groundwater level unless the area is tiled.
- → Do not place drain spouts in or around leach field lines and never construct over the septic tank or leach field. Driveway crossings may have connecting lines of schedule 40 PVC that is protected from freezing.
- → Leach lines (laterals) should be buried between 6 and 36 inches deep (18 to 24 inches is recommended), at least 6 feet apart, either level or following the natural soil topography while the bottom remains level, and should not exceed 100 feet in length each.
- → If poor soil types, high groundwater level, or insufficient level to bedrock is evident a conventional system may not be suitable. An alternative system may be more suitable. Please contact the County Sanitarian if any of these circumstances occur.

This summary is by no means intended to outline every requirement of Chapter 69. For a complete document visit www.legis.state.ia.us/Rules/2001/iac/gnac/gnac1877/gnac1946/gna1947.pdf Or contact your County Sanitarian.

This Document was summarized by the Grundy County Sanitarian 319-824-1212.