

Laramie Rivers Conservation District

5015 Stone Road Laramie, WY 82070 (307) 721-0072

January 30, 2024

Mr. Joe Wilmes Assistant Planner 1002 S. 3rd Street Laramie, WY 82070

RE: Huffer Estates Subdivision Application (SD-01-24)

Dear Mr. Wilmes,

I am writing to comment on the proposed Huffer Estates subdivision application (SD-01-24) for 27.5 acres located near Centennial, WY. Pursuant to State Statute §§ 18-5-306, all Wyoming conservation districts are mandated to provide recommendations regarding the site's soil suitability, erosion control, and sedimentation/flooding problems for subdivision requests. The Laramie Rivers Conservation District ("LRCD") offers the following comments for your consideration as they pertain to LRCD's mission of conserving natural resources and serving local landowners.

The U.S. Department of Agriculture's Web Soil Survey provides various soil and natural resource data for specific sites. Enclosed with this letter is a copy of the Dwellings and Small Commercial Buildings Suitability Web Soil Survey report. The report indicates that the parcels with Greyback cobbly soils will be somewhat limited for construction due to the large stones present in these soils.

Due to the parcel's topography, location, and soil type, erosion may be of concern. As such, care should be taken to minimize land disturbance during construction events. The parcels located adjacent to the North Fork of the Little Laramie River should conserve the riparian habitat present to minimize negative water quality impacts due to sediment loading or increased water erosion from any removed vegetation. In addition, all construction vehicles and equipment should be cleaned before arriving on site to prevent the spread of invasive weeds. Additionally, LRCD highly recommends quickly reclaiming disturbed areas to minimize wind erosion and can provide native grass seed recommendations for restoring lands or conserving water, upon request.

Regarding utilities, LRCD encourages all rural small-acreage landowners to test their well water every three to five years. Given the floodplain area overlap and proximity to the Little Laramie River, LRCD also recommends the septic tanks be designed to minimize leaching into the river.

Please do not hesitate to reach out should you have any questions. Thank you for the opportunity to comment on the application.

Sincerely,

Holly Dyer Rangeland & Watershed Resource Specialist 307-223-3270

Dwellings and Small Commercial Buildings

Soil properties influence the development of building sites, including the selection of the site, the design of the structure, construction, performance after construction, and maintenance. This table shows the degree and kind of soil limitations that affect dwellings and small commercial buildings.

The ratings in the table are both verbal and numerical. Rating class terms indicate the extent to which the soils are limited by all of the soil features that affect building site development. *Not limited* indicates that the soil has features that are very favorable for the specified use. Good performance and very low maintenance can be expected. *Somewhat limited* indicates that the soil has features that are moderately favorable for the specified use. The limitations can be overcome or minimized by special planning, design, or installation. Fair performance and moderate maintenance can be expected. *Very limited* indicates that the soil has one or more features that are unfavorable for the specified use. The limitations generally cannot be overcome without major soil reclamation, special design, or expensive installation procedures. Poor performance and high maintenance can be expected.

Numerical ratings in the table indicate the severity of individual limitations. The ratings are shown as decimal fractions ranging from 0.01 to 1.00. They indicate gradations between the point at which a soil feature has the greatest negative impact on the use (1.00) and the point at which the soil feature is not a limitation (0.00).

Dwellings are single-family houses of three stories or less. For dwellings without basements, the foundation is assumed to consist of spread footings of reinforced concrete built on undisturbed soil at a depth of 2 feet or at the depth of maximum frost penetration, whichever is deeper. For dwellings with basements, the foundation is assumed to consist of spread footings of reinforced concrete built on undisturbed soil at a depth of about 7 feet. The ratings for dwellings are based on the soil properties that affect the capacity of the soil to support a load without movement and on the properties that affect excavation and construction costs. The properties that affect the load-supporting capacity include depth to a water table, ponding, flooding, subsidence, linear extensibility (shrink-swell potential), and compressibility. Compressibility is inferred from the Unified classification. The properties that affect the ease and amount of excavation include depth to a water table, ponding, flooding, slope, depth to bedrock or a cemented pan, hardness of bedrock or a cemented pan, and the amount and size of rock fragments.

Small commercial buildings are structures that are less than three stories high and do not have basements. The foundation is assumed to consist of spread footings of reinforced concrete built on undisturbed soil at a depth of 2 feet or at the depth of maximum frost penetration, whichever is deeper. The ratings are based on the soil properties that affect the capacity of the soil to support a load without movement and on the properties that affect excavation and construction costs. The properties that affect the load-supporting capacity include depth to a water table, ponding, flooding, subsidence, linear extensibility (shrink-swell potential), and compressibility (which is inferred from the Unified classification). The properties that affect the ease and amount of excavation include flooding, depth to a water table, ponding, slope, depth to bedrock or a cemented pan, hardness of bedrock or a cemented pan, and the amount and size of rock fragments.

Information in this table is intended for land use planning, for evaluating land use alternatives, and for planning site investigations prior to design and construction. The information, however, has limitations. For example, estimates and other data generally apply only to that part of the soil between the surface and a depth of 5 to 7 feet. Because of the map scale, small areas of different soils may be included within the mapped areas of a specific soil.

The information is not site specific and does not eliminate the need for onsite investigation of the soils or for testing and analysis by personnel experienced in the design and construction of engineering works.

Government ordinances and regulations that restrict certain land uses or impose specific design criteria were not considered in preparing the information in this table. Local ordinances and regulations should be considered in planning, in site selection, and in design.

Report—Dwellings and Small Commercial Buildings

[Onsite investigation may be needed to validate the interpretations in this table and to confirm the identity of the soil on a given site. The numbers in the value columns range from 0.01 to 1.00. The larger the value, the greater the potential limitation. The table shows only the top five limitations for any given soil. The soil may have additional limitations]

Dwellings and Small Commercial Buildings–Albany County Area, Wyoming												
Map symbol and soil name	Pct. of map unit	Dwellings without basements		Dwellings with basements		Small commercial buildings						
	unit	Rating class and limiting features	Value	Rating class and limiting features	Value	Rating class and limiting features	Value					
143—Cryaquolls, 1 to 9 percent slopes												
Cryaquolls, frequently flooded	70	Not rated		Not rated		Not rated						

Dwellings and Small Commercial Buildings–Albany County Area, Wyoming													
Map symbol and soil name	Pct. of map unit	Dwellings without basements		Dwellings with basements		Small commercial buildings							
		Rating class and limiting features	Value	Rating class and limiting features	Value	Rating class and limiting features	Value						
168—Greyback very cobbly sandy loam, 1 to 6 percent slopes													
Greyback	70	Somewhat limited		Somewhat limited		Somewhat limited							
		Large stones	0.56	Large stones	0.56	Large stones	0.56						
						Slope	0.01						

Data Source Information

Soil Survey Area: Albany County Area, Wyoming Survey Area Data: Version 20, Sep 5, 2023

