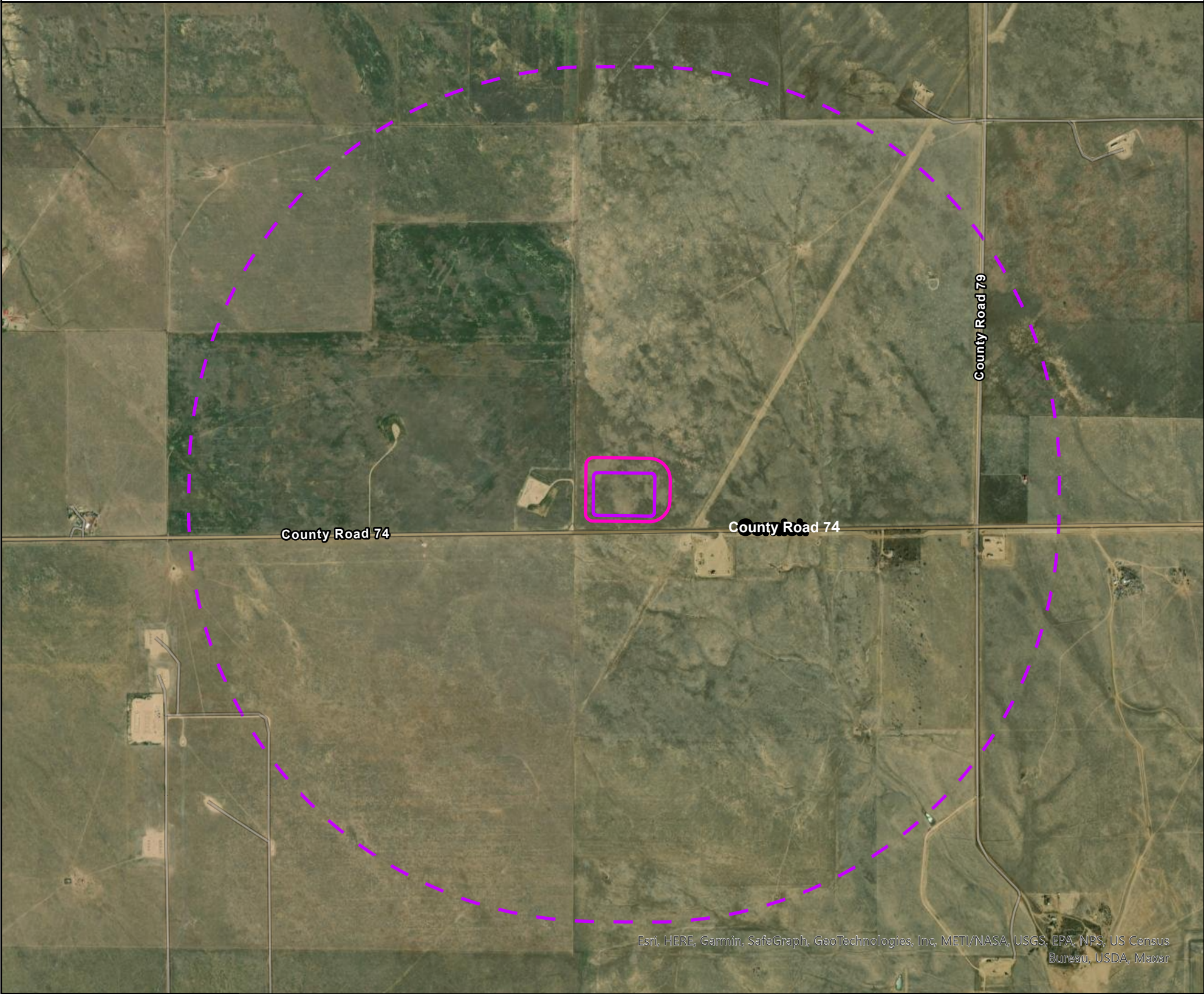


BISON IV OPERATING, LLC
BARRACUDA
SWSW SECTION 33, T7N R62W, 6th P.M.
WELD COUNTY, COLORADO

Prepared For: Prepared By:



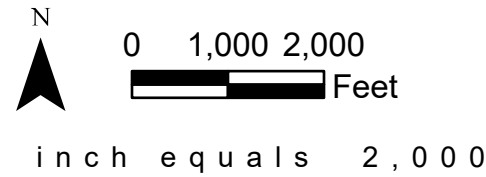
Map Location: C:\Users\rbeam\Documents\ArcGIS\Projects\Bison 4\Barracuda_Geologic Hazard Map.aprx



GEOLOGIC
HAZARD
MAP

- Oil & Gas (O&G) Location
- Working Pad Surface (WPS)
- One-Mile Radius around WPS

Projection: WGS 1984
Date: 09/26/2023
Drafted by: RB
Revised:



THERE ARE NO GEOLOGIC HAZARDS WITHIN ONE MILE OF THE WORKING PAD SURFACE.

Soil Types in Proposed Oil and Gas Location: Vona loamy sand (3-9% slopes); Olney loamy sand (0-3% slopes). None of these soil types are considered collapsible soils.

Resources Reviewed:
COGCC. GIS Online Interactive Map. cogccmap.state.co.us/cogcc_gis_online/. Accessed September 27, 2023.
Colorado Geological Survey. ON-001 Colorado Earthquake and Fault Map. <https://cgsarcimage.mines.edu/ON-001/>. Accessed September 27, 2023.
Colorado Geological Survey. ON-006-01 Statewide Landslide Inventory Map. <https://cologeosurvey.maps.arcgis.com/apps/webappviewer/index.html?id=9dd73db7fbc34139abe51599396e2648>. Accessed September 27, 2023.
Colorado Geological Survey. ON-006-06 Colorado Historic Coal Mines. <https://cologeosurvey.maps.arcgis.com/apps/webappviewer/index.html?id=1891e3149eda44af9dc8af81c4dc58a8>. Accessed September 27, 2023.
Colorado Geological Survey. ON-B-40M Radioactive Mineral Occurrences of Colorado and Bibliography. <https://cologeosurvey.maps.arcgis.com/apps/webappviewer/index.html?id=c5381e1335284d63bfa5d4b018b3372f>. Accessed September 27, 2023.
Natural Resources Conservation Service. Web Soil Survey. websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx. Accessed September 27, 2023.
Weld County Property Portal. co.weld.co.us/maps/propertyportal/. Accessed September 27, 2023.
White, J.L. and Greenman, C. 2008. Collapsible Soils in Colorado. Colorado Geological Survey, p. 57-61.

I certify that I am a Professional Geologist, having met the educational requirements and professional work experience required by C.R.S. 23-41-208(b). I have reviewed information pertaining to this Oil and Gas Location and the surrounding area, and have identified no Geologic Hazards within a one mile radius.

Benjamin Dwyer, P.G.
Geologist/Field Operations Coordinator
bdwyer@rpgres.com
(412) 720-4317

Signature

09/27/23

Date