



Grand Junction Geological Society

<http://www.gjgs.org/>



This Month's Presentation

**Benjamin (Ben)
Haveman, P.G.**

will present a talk on:

**Best Management Practices
for Characterization of a
Shallow Brine
resource in a Sabkha
Environment and Related
QA/QC Considerations**

The speaker will speak in-person although
we will also have Zoom available.

Guests Are Always Welcome

Abstract and Speaker's Bio Are on The
Next Page

Meeting Time and Location

October 21, 2026

Joint meeting with the CMU Geology Students

6:30 p.m.

Saccomanno Lecture Hall (Room 141) in the Wubben
Science Building at Colorado Mesa University

Zoom Details

Join Zoom Meeting

<https://coloradomesa.zoom.us/j/85413694364>

Meeting ID: 854 1369 4364

One tap mobile

[+17193594580](tel:+17193594580),85413694364# US

[+12532158782](tel:+12532158782),85413694364# US (Tacoma)

Join by SIP

85413694364@zoomcrc.com

[Join instructions](#)

Important Announcements

Abstract

Best Management Practices for Characterization of a Shallow Brine resource in a Sabkha Environment and Related QA/QC Considerations

Benjamin (Ben) Haveman, P.G.

Adequately evaluating a shallow brine aquifer for the purpose of resource estimation requires a systematic approach with unique considerations given to quality control and quality assurance. Key components include delineating the aquifer geometry, a thorough investigation of hydrogeological parameters, and a defensible sampling plan to determine mineral grade variances. This presentation describes the depositional setting and typical characteristics of sabkha environments, then addresses the main variables to consider and pitfalls to avoid when attempting initial characterization of a fluid ore body using recent work in the Umm as Samim sabkha of western Oman as a backdrop.

This presentation was originally prepared for and presented at the Society for Mining, Metallurgy, and Exploration (SME) Forum on the Geology of Industrial Minerals in Charlottesville, VA in April 2025.

Bio

Ben completed a B.S. in Geology at Colorado Mesa University in 2013. He lives in western Colorado with his wife and three daughters. Ben serves as a Project Geologist for RESPEC and operates out of their Grand Junction Office.

His experience includes analysis of drill core and cuttings for large- and small-scale mineral investigations, geotechnical and hydrogeological studies, participating at all levels of exploration program planning and management, as a contributing author on technical reports, instrument installation in support of mineral and geotechnical studies both at surface and in underground workings, and abandoned mine land reclamation and shaft abandonment projects on both the state and federal levels. Ben has been directly involved with domestic and international drilling operations and a diverse range of mineral deposits.