Technical Peer-Review of San Luis Obispo Valley Groundwater Basin Groundwater Sustainability Plan and Flow Modeling

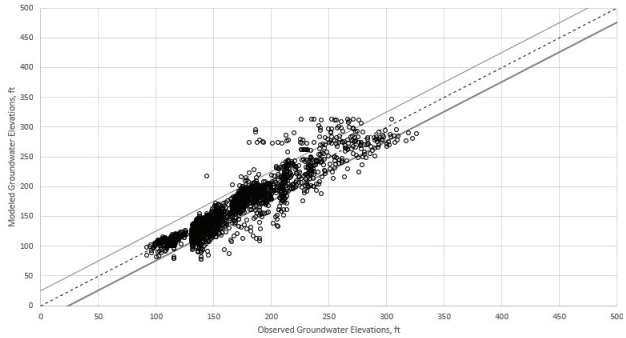
County of San Luis Obispo, California

CLIENT

County of San Luis Obispo - Public Works

HIGHLIGHTS

- **USGS GSFLOW model**
- **Compliant with SGMA**
- **Independent party's perspective to instill stakeholder confidence**



Calibration plot of observed groundwater elevations

DBS&A was retained to assist and support the County of San Luis Obispo with a technical review of the San Luis Obispo Valley Groundwater Basin (SLOVGB) Groundwater Sustainability Plan (GSP) and associated surface water and groundwater (SW-GW) flow modeling efforts utilizing the U.S. Geological Survey (USGS)'s GSFLOW model platform. The model peer review was sought to provide confidence to the community stakeholders in the soundness of the model and to ensure that it is consistent with model objectives and in compliance with the Sustainable Groundwater Management Act (SGMA).

We performed the review progressively through the modeling process at key milestones, such as after model conceptualization, calibration, and prediction, as appropriate. Our objectives focused on evaluating the potential impacts of proposed projects and management actions associated with the GSP, as well as evaluating the model calibration of the integrated numerical model of the Basin.

Our initial task involved reviewing GSP chapters (administrative and public drafts) associated with the basin setting, monitoring network, and projects and management actions, as included in the integrated flow model. We provided comments and recommendations in the form of technical memorandums for each chapter(s)/sections reviewed.

Once familiarized with the SLOVGB GSP, DBS&A reviewed the SW-GW flow modeling, including providing review and comment on the model's:

- Approach, conceptualization, and design
- Calibrations and water budgets
- Results for reasonableness
- Sensitivity and uncertainty analysis

DBS&A produced technical memoranda to summarize our technical comments to aid in confirming that the modeling is SGMA-compliant and to assure community stakeholders of the dependability of the model and its suitability to inform the Groundwater Sustainability Agency's groundwater management decisions.