

Precision Well Placement: Two intersections on the first attempt with Deep Guide.

CAN, Alberta | Cvictus Inc. EHR Panel | 311mm Vertical open hole intersect

A critical milestone for the Cvictus project was achieved on the first attempt. Hazen advised on well placement, then used Deep Guide to guide the directional provider into successful intersections with both target wells.

Challenge:

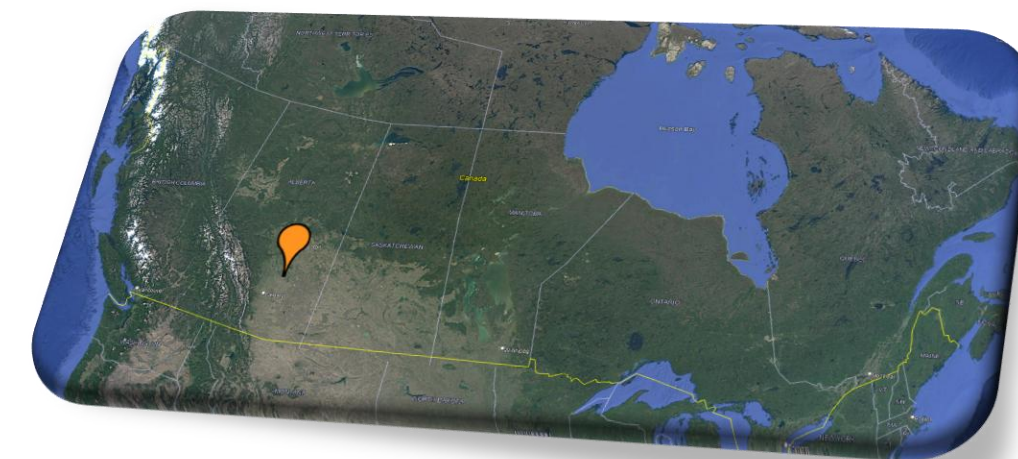
The EHR well design required two horizontal production wells drilling east to intersect a vertical well within the Mannville coal. Precise TVD placement was critical to position both the wells and intersection in the optimal production interval. The vertical well also housed the ranging sensor, which had to remain intact until both intersections were complete. With a 311mm (12.25") wide vertical target, maintaining sensor access and positional accuracy throughout the operation was essential.

Solution: Deep Guide Ranging with Bedrock

During early project engagement, Hazen identified the need to preserve the Deep Guide sensor location in the Vertical well until both Horizontal wells were connected. Working with the directional provider, the first horizontal was planned to TD within 1 m of the Vertical and across the path of the second horizontal. This allowed the vertical well and sensor to remain intact while the second Horizontal was drilled to intersect both wells at the planned connection point. With the Deep Guide sensor positioned in the vertical well, Hazen used its at-bit magnet sub to provide precise relative positioning and real-time guidance to the directional provider through final well placement and intersection.

Result:

After geo-steering the first horizontal within the Mannville coal, Hazen detected the BHA 73 m from the target and guided the well to TD approximately 1 m north and 0.5 m below the vertical. The second horizontal was similarly geo-steered within the coal and detected by Hazen 62 m from the target. From there, Hazen guided the directional provider to intersect the vertical well and continue into the first Horizontal at the planned TVD. Both intersections were confirmed by monitoring pressure response while pumping on the intersecting well. Both targets were successfully intersected on the first attempt, completing a critical milestone for the Cvictus project.



Hazen Bedrock Visualizer

