

- ### LEGEND
- - - - - STUDY AREA
 - - - - - PERMIT BOUNDARY
 - - - - - MINE PIT BOUNDARY
 - E1 COAL BOTTOM STRUCTURE CONTOUR (INTERVAL = 20 FT)
 - \oplus 2420 BOREHOLE/WELL LOCATION AND E1 COAL THICKNESS (FEET ABOVE MEAN SEA LEVEL)
 - E1 COAL OUTCROP
 - E1 COAL SUBCROP
 - - - - - INCREASED WEATHERING AREA
 - 13 SECTION
 - TOWNSHIP & RANGE

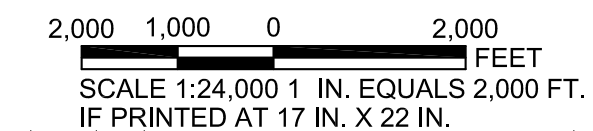
REFERENCE

Study Area: Golder 10/18/2007
 Permit Boundary: Norwest, 11/12/2009.
 Mine Pit Boundary: Norwest, 01/20/2010.
 Borehole & Well Locations: Interstate Engineering, Inc., 06/16/2010 and 04/23/2008 and Norwest 7/09/2007.
 Coal Seam Thickness, Outcrop, Subcrop, Increased Weathering Area: Norwest, 06/02/2008.
 Township, Range and Section: ND HUB, 6/20/2006.
 Projection: StatePlane, North Dakota South, NAD27, Feet.

NOTES

These were created as part of the geologic model for the mine plan. Contours are based on inverse distance squared and triangulation calculations and have occasional contouring breaks.

E1 Coal not encountered in every borehole shown on figure.



REV	DATE	DES	COMPLETENESS	COMMENT	EGM	RDT	JRH
07/09/10		EGM					
		DES					

PROJECT: SOUTH HEART COAL LLC
 SOUTH HEART LIGNITE MINE
 SOUTH HEART, NORTH DAKOTA



TITLE: **E1 SEAM BOTTOM STRUCTURE**

NORWEST CORPORATION	PROJECT No.	4284-01-400	FILE No.	E1 Seam THK & ELV.dwg
	DESIGN	EGM	03/11/08	SCALE AS NOTED
	CADD	EGM	01/22/10	REV. 1
	CHECK	RDT	02/10/10	
	REVIEW	JRH	02/15/10	

Figure 2.3-13