

PETRO - TECH
PERUANA S.A.



Geosc-136-01
INTEROFFICE MEMO

To : Pedro Alarcon
From : H. Cornejo / V. Peralta
Reference : Proposal well: LO6-23
Date : April 24, 2001

It is recommended to drill the location "B" from LO6 Platform, using conductor N° 23 having as primary objective Basal Salina formation (upper and lower sections) in a reservoir block of approximately 300 acres, where is located the last well completed in Basal Salina LO6-25, which tested an initial production of 1878 BOPD, 0% WC, 1740 psi WHP, 3/8" choke, 929 GOR. Based on results of this well, it has been recommended a second location (Loc. "B") with the purpose to continue the development of the Basal Salina in the same reservoir block of well mentioned above. It is necessary to mention that the depth of the lowest know oil encountered in well LO6-25 was 7780 feet. We estimate a possible OWC at -8250', in the downthrown side of the major north-south dipping towards west LO6 fault.

Results of this location will help to determine the size of the new faulted block.

The objective Basal Salina is expected at 1.43 msec. approx. 7850 ft. MD (-7280 ft. VSS) (See figs. 1 thru 4 & 7). The estimated final total depth is 8700 feet, with a maximum vertical angle of 25° and S 34° W, as programmed direction.

It is expected to find 150 feet of vertical net sand thickness in the upper Basal Salina and about 200 feet in the lower section (figs. 5 & 6).

Secondary objective Mogollon 5800 ft. MD (5400 ft. SS), has a vertical net sand thickness of 150 feet.

Estimated reserves of 300 MBO and an IPR of 300 BOPD, are expected.

Logging program includes DLL-MSFL-GR, FDC-CNL-GR, Dipmeter and Check Shot for 3D seismic calibration.

ECONOMIC SUMMARY

Investment MU\$	1044
Reserves, MBO	300
Present Worth, at 15% M\$	2,370
AROR, %	>100
Pay out, years	0.60

c.c.:	W. Kallop	B. Bruce	C. Valdizan	Well File
	F. Thorndike	R. Sagarbarria	J. Meyers	V. Delgado (2)
	L. Chan	M. Chavez	G. Ruesta	

CENTRAL FILE
GEOSCIENCES

206-23

PETRO-TECH PERUANA S.A.		GEOLOGIC PROGNOSIS		LOCATION "B"	
AREA LOBITOS		OFFICIAL WELL NUMBER Z2B -24-081-D-LO6		PETRO-TECH N° LO6-23	
PRIMARY OBJECTIVE BASAL SALINA		SECONDARY OBJECTIVE MOGOLLON		TYPE OF WELL DEVELOPMENT	
SURFACE COORDINATES (WGS-84) * 9508,657.06 mN ; 459,054.37 mE		TARGET COORDINATES (WGS-84) 9508,016.00 mN , 458,626.00mE			
E L E V A T.	KB: 50 FT WATER DEPTH 335 FT GROUND LEVEL FT	W DIRECTION OF DEVIATE WELL S34°W E ANGLE CONDUCTOR L FROM VERTICAL VERT. L RECOMMENDED DEPTH OF K.O.P. 1500 FT. BUILD UP ANGLE AT 4°/100FT.	T A R G E T	DRILLED DEPTH 7850 FT. VERTICAL DEPTH 7330 FT. HORIZONTAL DRIFT 2600 FT. LIMITS (DIAMETER) TOP: 200 BASE: 400	T O T D E P.
ESTIMATED FINAL 8700 FT		HORIZONTAL DRIFT 3000 FT		MAX. ANGLE 25°	
S T R A T I G R A P H I C S E Q U E N C E	FORMATION / MEMBER		DRILLED TOP (MD/FT)	VERT. TOP (VD/FT)	SUBSEA TOP (SS/FT)
	TALARA		AT SURFACE		
	CHACRA		2300	2250	2200
	RIO BRAVO		3900	3750	3700
	PALEGREDA		5100	4800	4750
	MOGOLLON		5800	5450	5400
	SAN CRISTOBAL		6350	5950	5900
	UPPER BASAL SALINA		7850	7330	7280
	LOWER BASAL SALINA		8250	7700	7650
	BALCONES		8500	7900	7850
	TD.		8700	8100	8050
OBSERVATIONS					
C O N T R. L O G I N G E V A L U A T I O N	BIT SAMPLES TO BE TAKEN RECOMMENDED FOR PALEO-PALYNOLOGY	EVERY 30 FT. FROM SURFACE TO 5500 FT. AND 10 FT. FROM 5500 TO TD. PALEONTOLOGY EVERY 120' FROM SURFACE TO 6000 PALEONTOLOGY EVERY 60' FROM 6000 TO TOTAL DEPTH PALYNOLOGY AT REQUEST OF LIMA OFFICE			REMARKS
L O G I N G	RECOMMENDED OPEN HOLE	DLL-MSFL-GR, FDC-CNL-GR.			
G I N G	RECOMMENDED AFTER CASING	GR-CCL			
N E A R B Y	NEARBY WELLS FOR CORRELATION	LO6-22R, LO6-25, LO6-20			
E V A L U A T I O N	SIDEWALL CORES	AT REQUEST OF LIMA OFFICE			
A L O G G E R	CONVENTIONAL CORES	NOT CONSIDERED			
T E S T I N G	GAS LOGGER FORMATION TESTING	GAS LOGGER UNIT NOT CONSIDERED			
RECOMMENDED BY H. CORNEJO / J.VILCA		DATE: APRIL 2001	REVIEWED BY M.CHAVEZ		DATE: APRIL 2001
			APPROVED BY P. ALARCON		DATE: APRIL 2001

CENTRAL FILE
GEOSCIENCES

455000

457500

LO4-18R

9510000

CROSSLINE 431

LOBITOS PROSPECT
Seismic Time Structure Map
Near Top Basal Salina Formation
Scale 1:20000 WGS-84
C.I. 0.02 sec. By J. Vilca

1.800

1.700

1.800

1.700

1.600

1.600

LO6-9X

NR

1.500

Location B

LO6-14

LO6-20

LO6-19

LO7

L

9507500

CENTRAL FILE
GEOSCIENCES

Figure 1

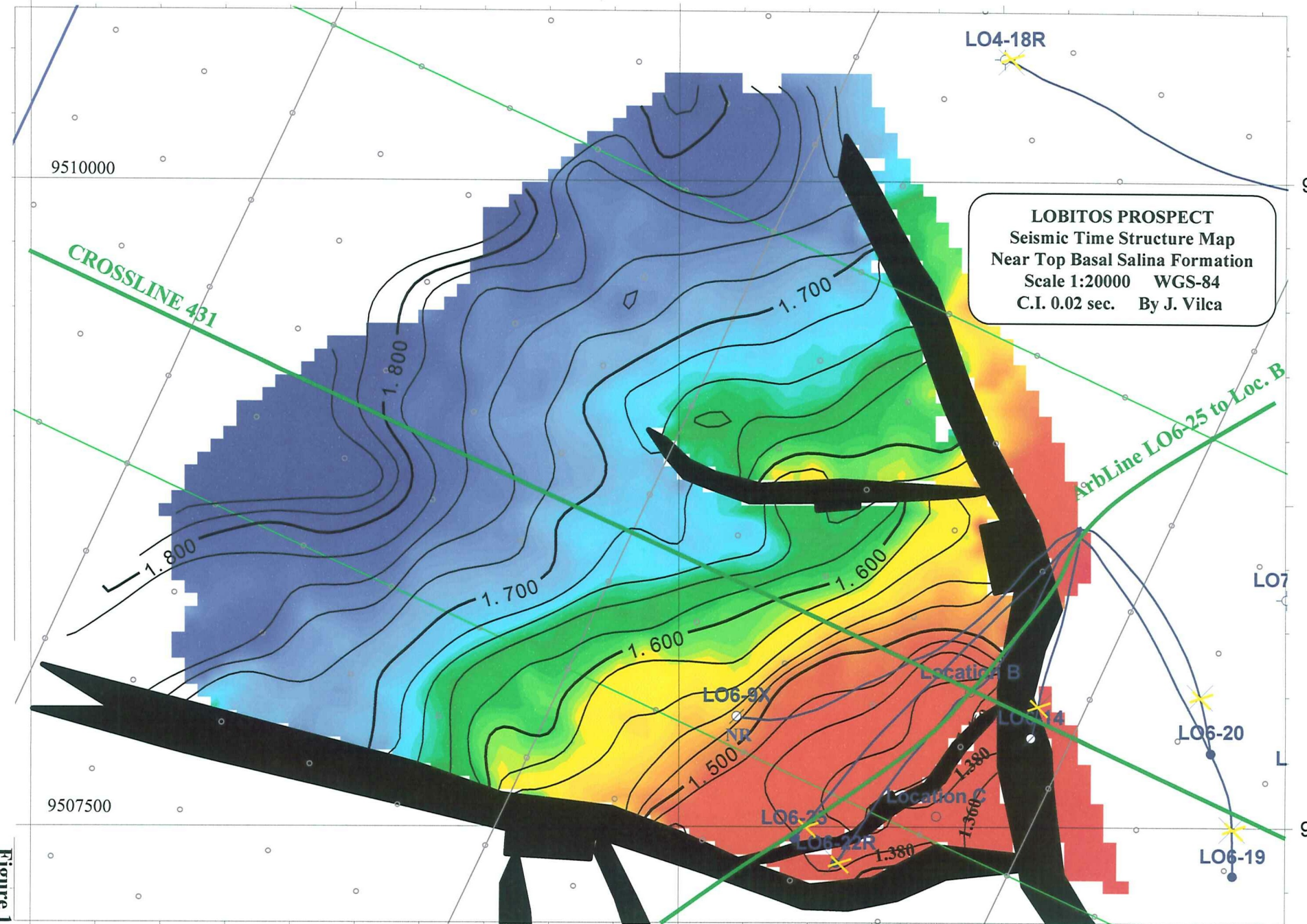


Figure 2

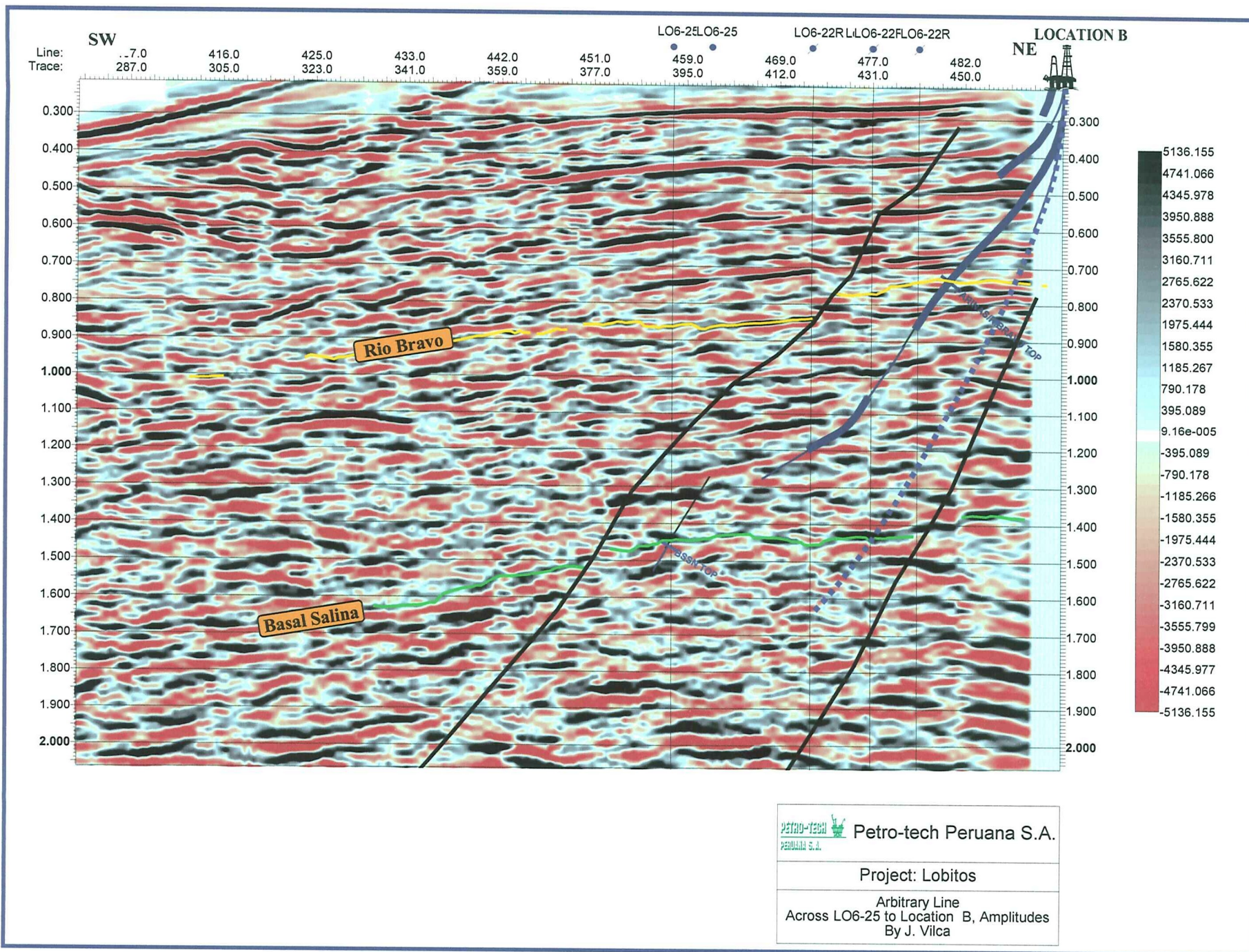
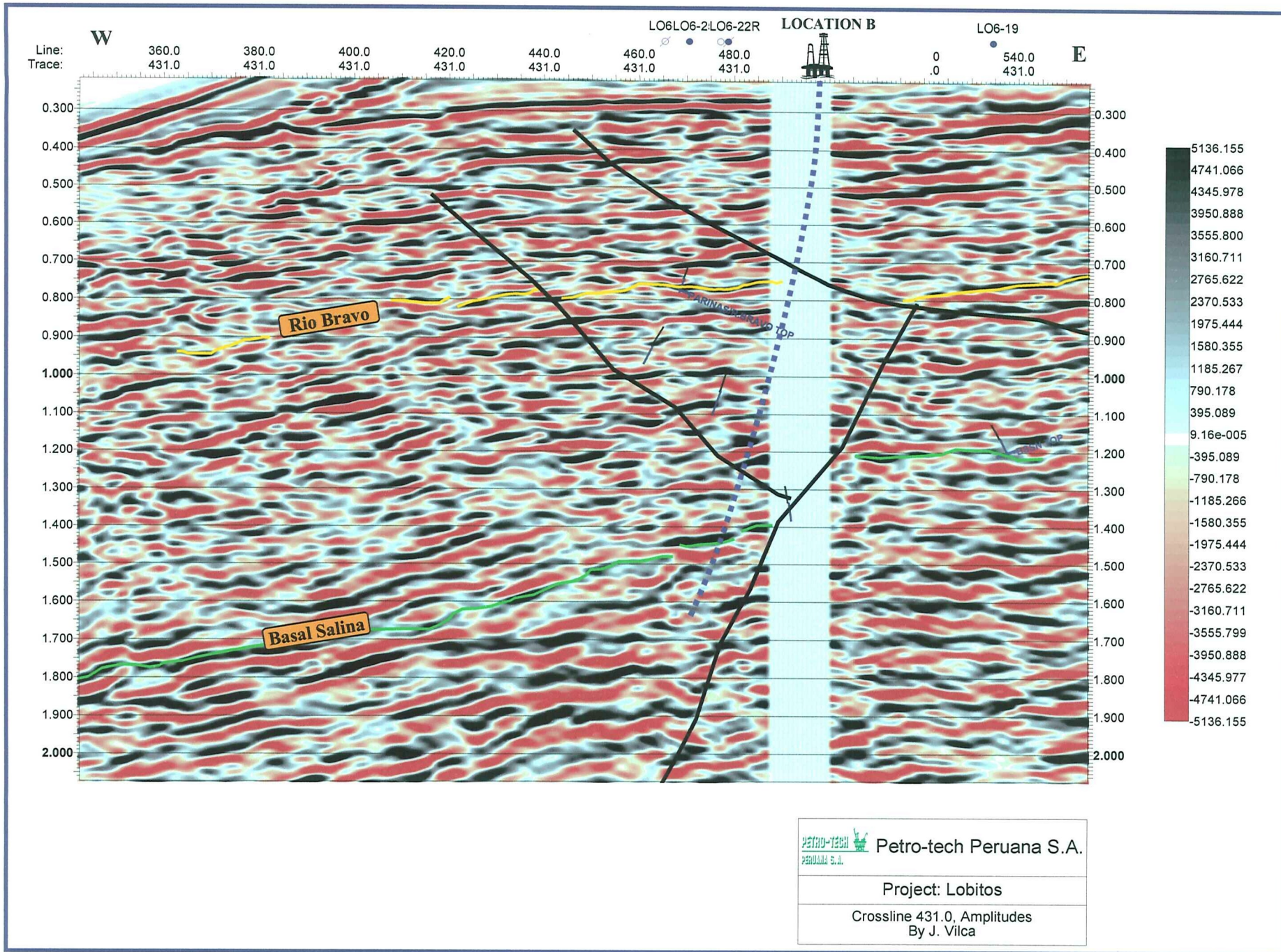


Figure 3



CENTRAL FILE
GEOSCIENCE

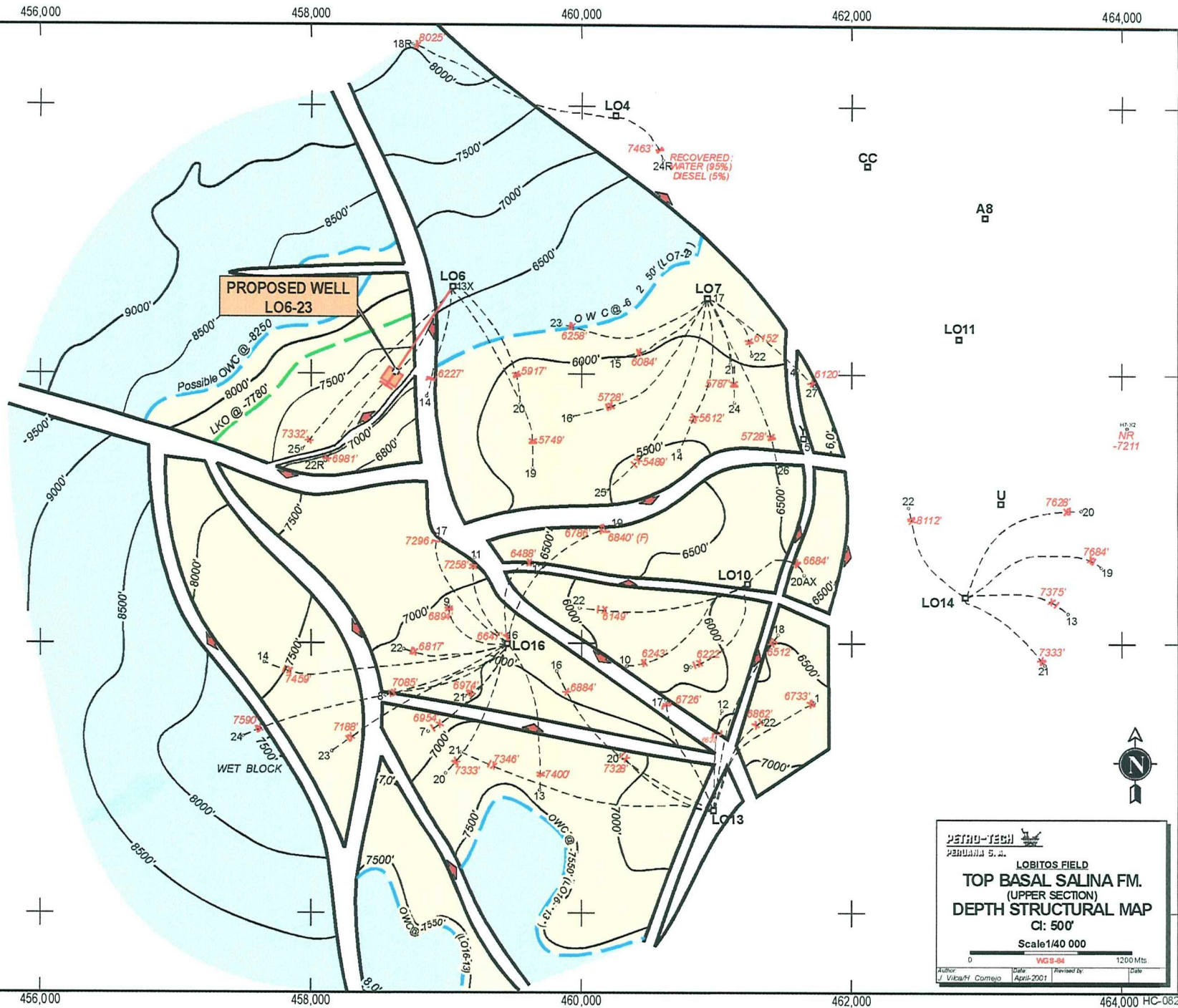
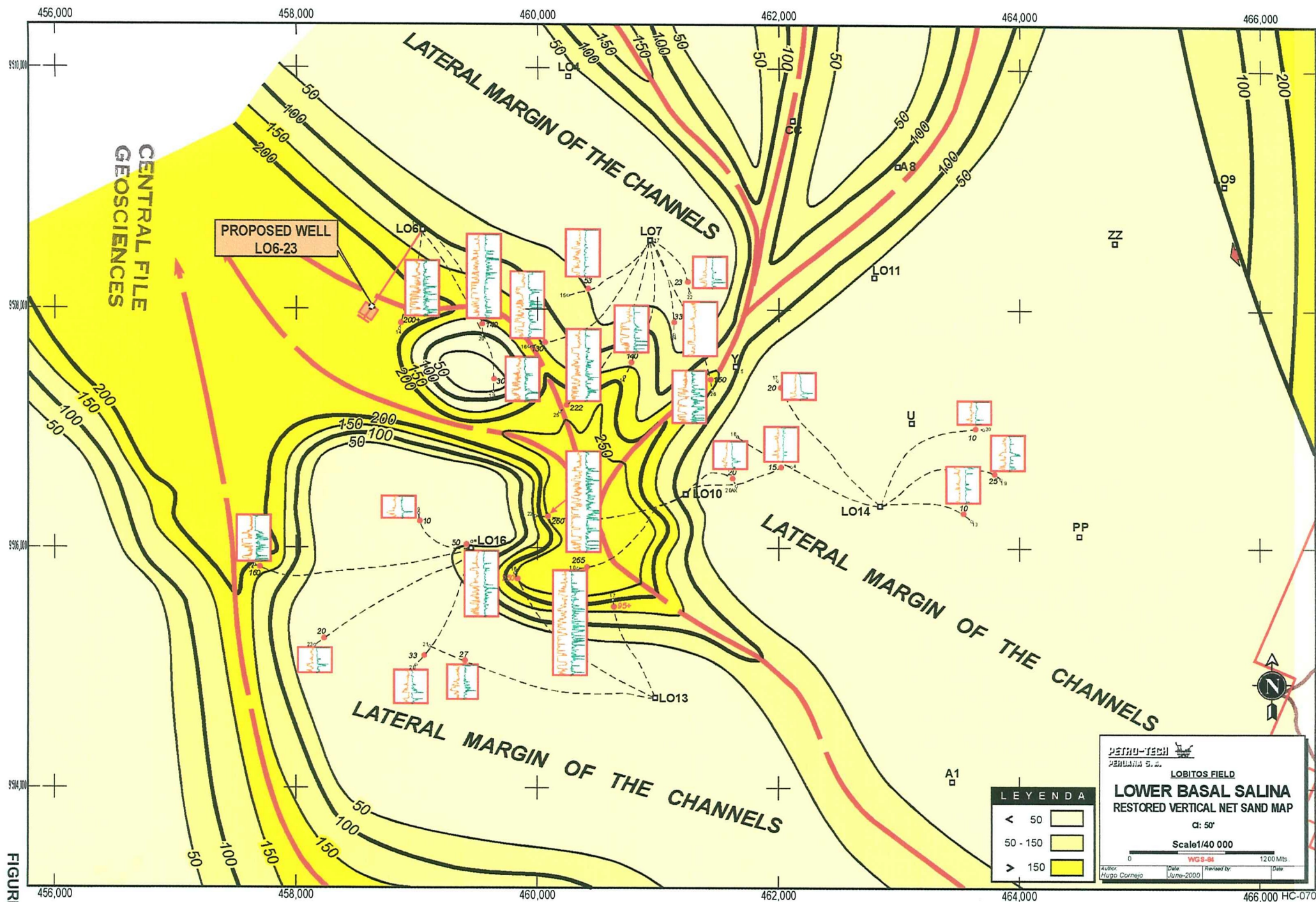


FIGURE 4



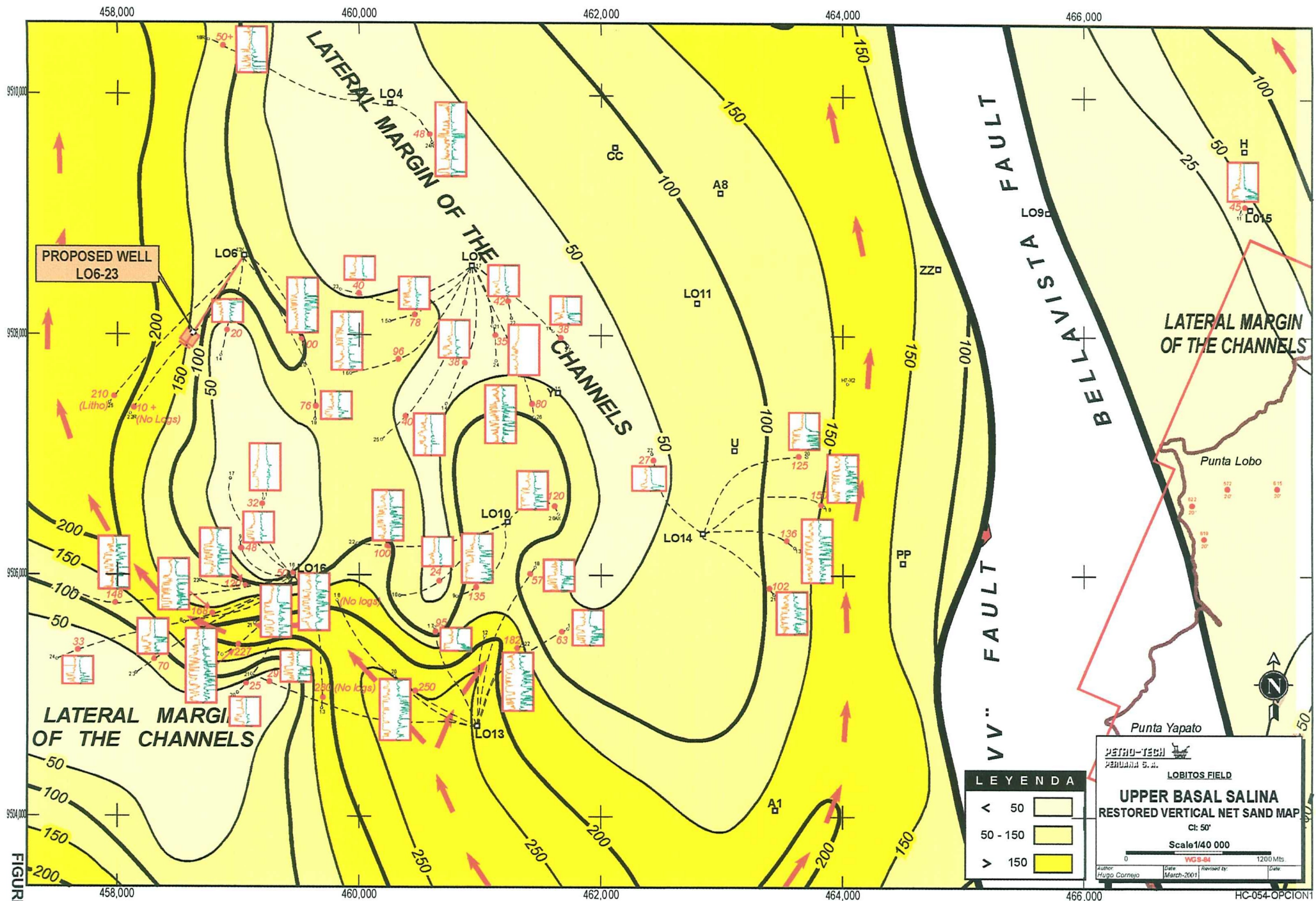
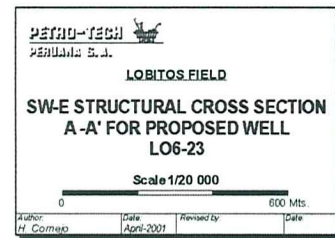
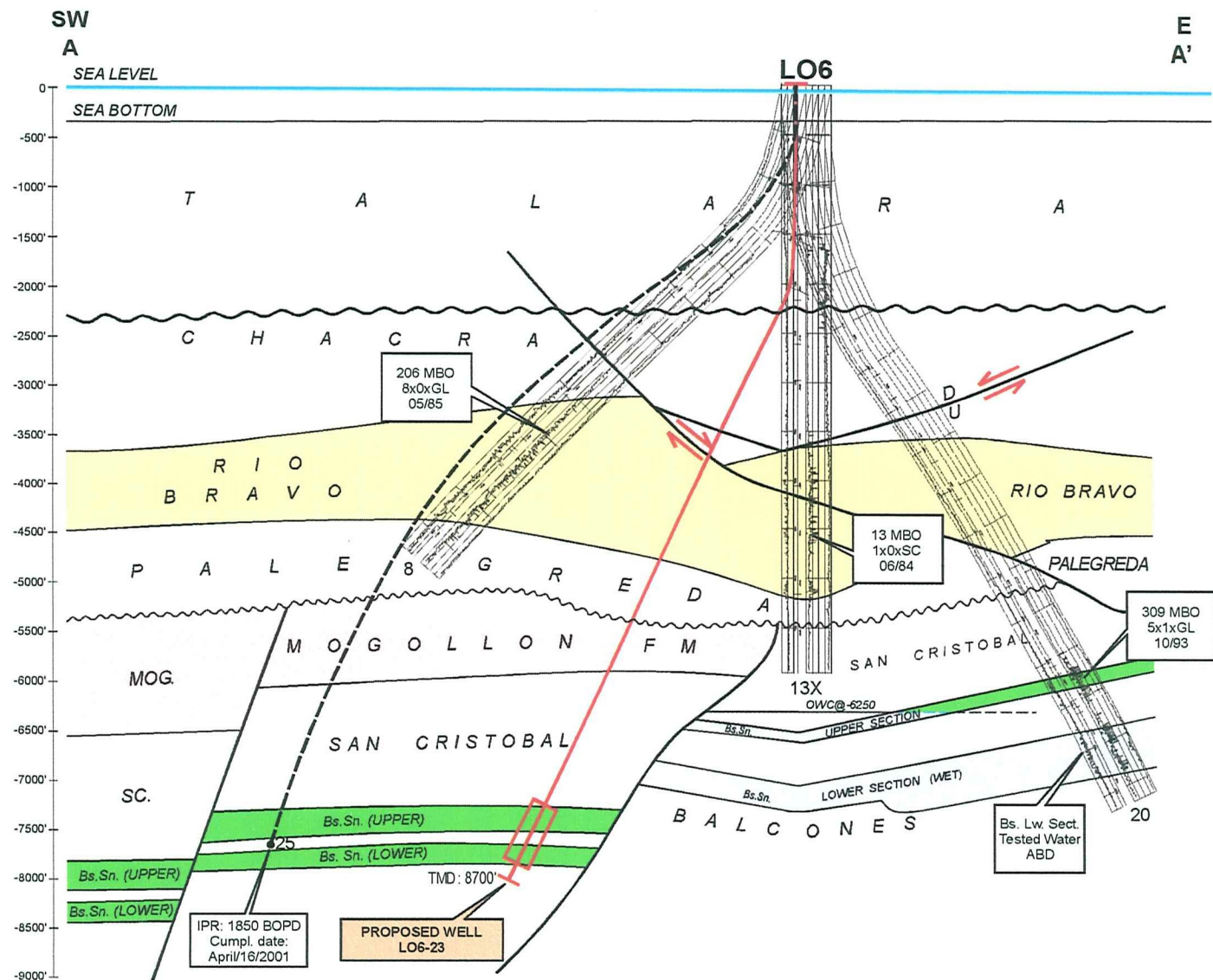


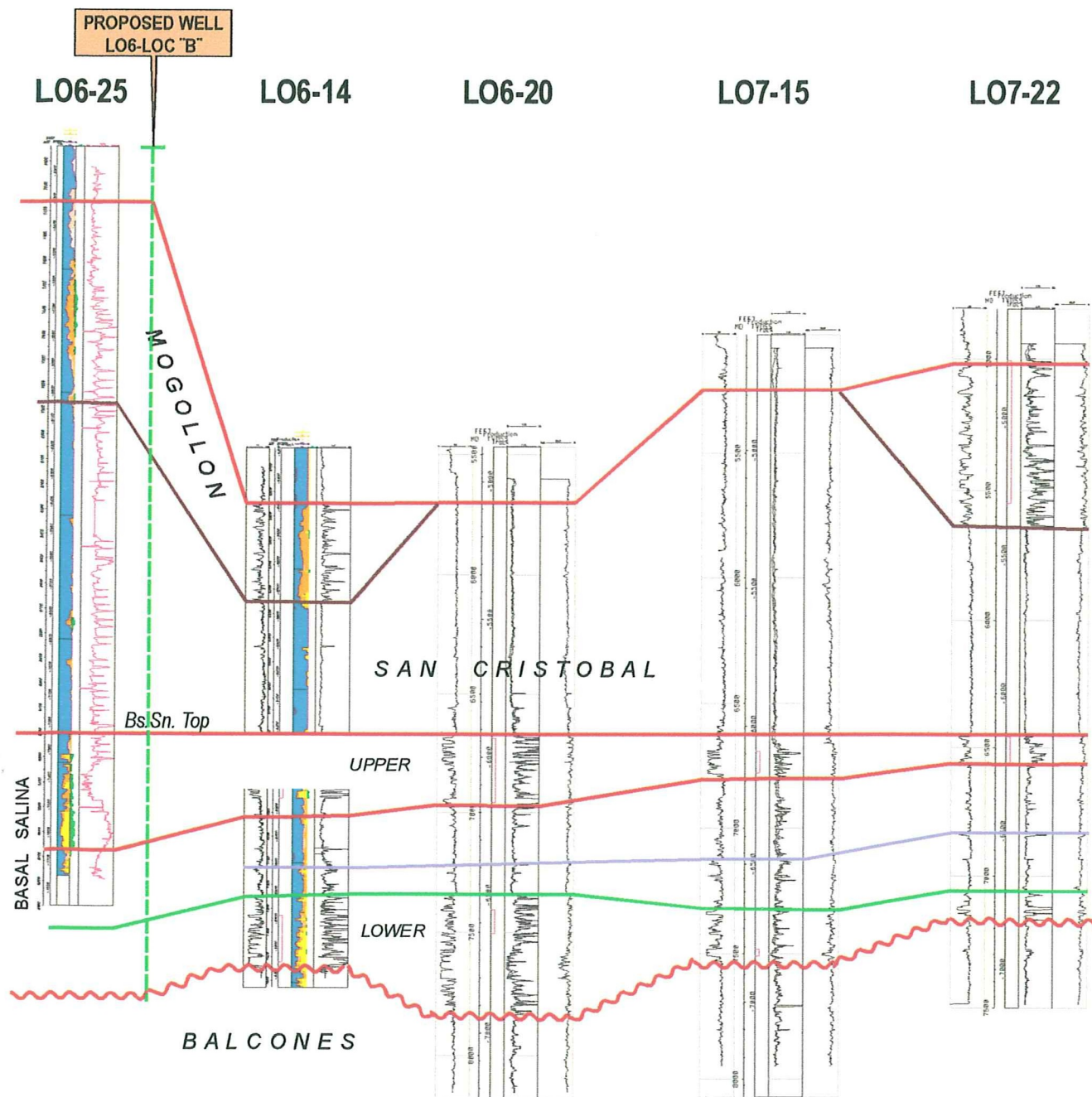
FIGURE 6

CENTRAL FILE
GEOSCIENCES

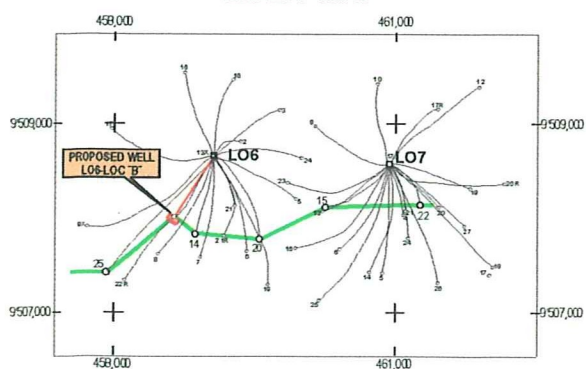


NW

SE



INDEX MAP



PEIRO-TECH
PERU S.A.

LOBITOS FIELD
NW-SE
STRATIGRAPHIC CROSS SECTION
SHOWING THE BASAL SALINA
PROPOSED WELL LO6-LOC "B"

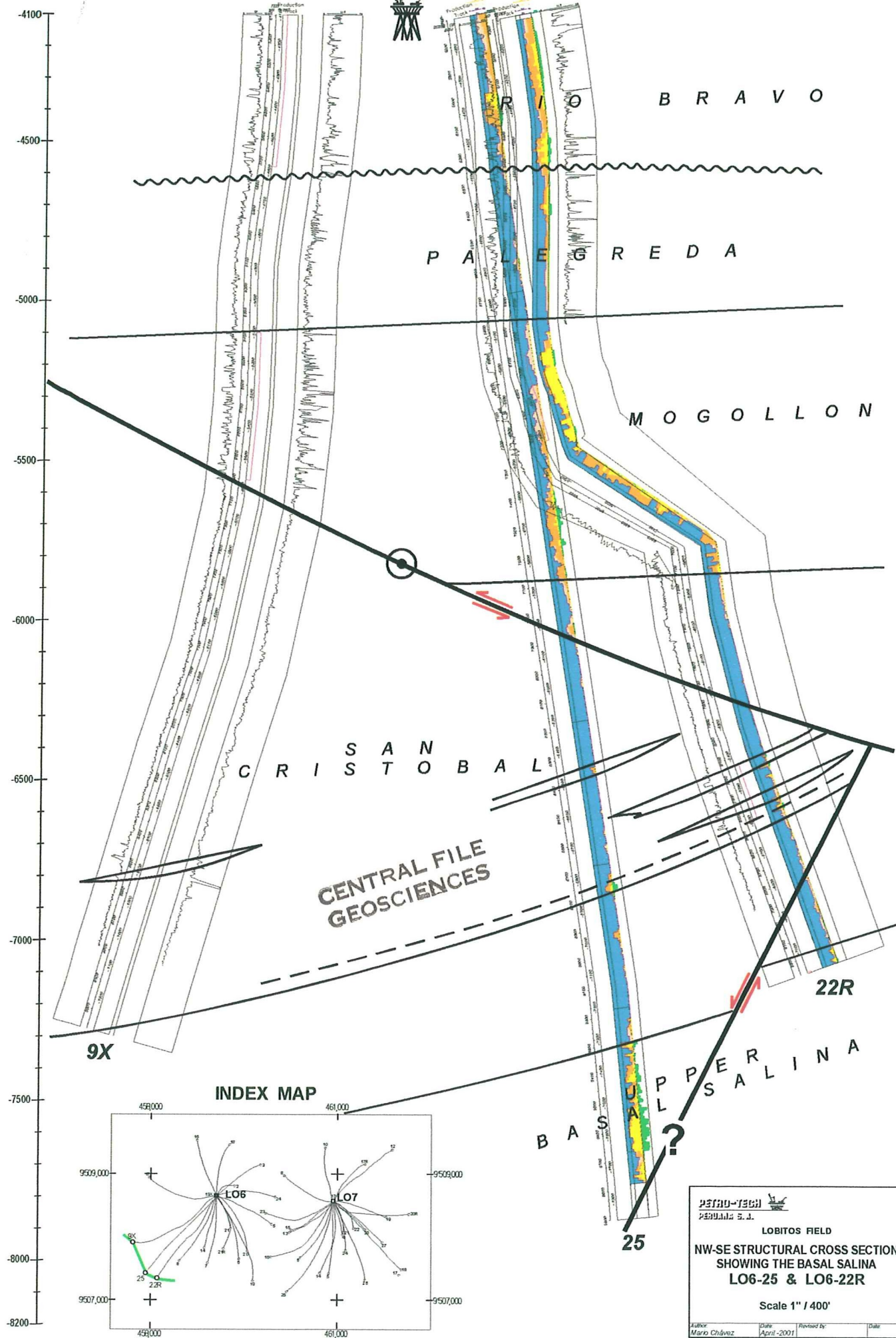
Graphic Scale

Author: Mario Chávez Date: April-2001 Revised by: Date:

NW

LO6

SE



MCH-039

FIGURE 9