OPERATOR:	FIELD:	DISCOVERY DATE:	ONSTREAM DATE:	STATUS:	RESERVES (MMBOE):	WATER DEPTH (m)	DEVELOPMENT TYPE:
Angola							
BP Exploration (Angola) Limited	Cromio (Block 18)	2000	2007	Under Dev.	108,750,000	1,233	Subsea Satellite to Floating Production
BP Exploration (Angola) Limited	Paladio (Block 18)	2000	2007	Under Dev.	180,000,000	1,230	Subsea Satellite to Floating Production
BP Exploration (Angola) Limited	Plutonio (Block 18)	1999	2007	Under Dev.	300,000,000	1,362	Floating Production
Cabinda Gulf Oil Company (CABGOC)	Tombococ (Block 14)	2000	2007	Under Dev.	142,050,000	506	Subsea Satellite to Fixed Production
Esso Exploration & Production Angola Ltd	Batuque (Kizomba C Block 15)	2000	2007	Firm Plan	265,275,000	725	Floating Production
Esso Exploration & Production Angola Ltd	Chocalho (Kizomba A Block 15)	1999	2004	Producing	314,250,000	1,147	Extended Reach Drilling
Esso Exploration & Production Angola Ltd	Dikanza (Kizomba B Block 15)	1998	2005	Under Dev.	250,500,000	1,154	Subsea Satellite to Floating Production
Esso Exploration & Production Angola Ltd	Hungo (Kizomba A Block 15)	1998	2004	Producing	727,500,000	1,202	Floating Production
Esso Exploration & Production Angola Ltd	Kissanje (Kizomba B Block 15)	1997	2005	Under Dev.	545,550,000	1,011	Floating Production
Esso Exploration & Production Angola Ltd	Marimba (Kizomba Block 15)	1998	2006	Under Dev.	235,500,000	1,289	Subsea Satellite to Floating Production
Esso Exploration & Production Angola Ltd	Xikomba (Kizomba Block 15)	1999	2003	Producing	137,625,000	1,355	Floating Production
Total E&P Angola Ltd	Dalia (Block 17)	1997	2006	Under Dev.	918,000,000	1,360	Floating Production
Total E&P Angola Ltd	Dalia II (Block 17)	1998	2007	Firm Plan	712,500,000	1,100	Subsea Satellite to Floating Production
Total E&P Angola Ltd	Girassol B (Block 17)	1996	2001	Producing	810,750,000	1,360	Floating Production
Total E&P Angola Ltd	Girassol C1 (Jasmim Block 17)	1996	2007	Probable	108,750,000	1,375	Subsea Satellite to Floating Production
Total E&P Angola Ltd	Jasmim (Girassol C1-C4 Block 17)	2000	2003	Producing	352,891,500	1,292	Subsea Satellite to Floating Production
Total E&P Angola Ltd	Rosa (Block 17)	1998	2007	Under Dev.	735,000,000	1,405	Subsea Satellite to Floating Production
Equatorial Guinea							
Amerada Hess (Ex Triton Energy Company)	Ceiba (Block G)	1999	2000	Producing	253,818,000	700	Floating Production
Amerada Hess (Ex Triton Energy Company)	Ebano (Block F-2)	2002	2007	Under Dev.	66,750,000	625	Extended Reach Drilling and/or Subsea
Amerada Hess (Ex Triton Energy Company)	Okume (Block G-5)	2001	2007	Under Dev.	153,526,095	503	Floating Production
Mobil Equatorial Guinea Inc	Topacio	1996	1997	Producing	47,000,250	579	Subsea Satellite to Floating Production
Mobil Equatorial Guinea Inc	Zafiro South	2001	2003	Producing	150,000,000	600	Floating Production
Ivory Coast							
CNR International (Cote d'Ivoire) SARL	Baobab (CI-40)	2001	2005	Under Dev.	204,232,500	1,000	Floating Production
Nigeria							
Elf Petroleum Nigeria Limited	Usan EPS (OPL 222)	2002	2007	Possible	30,000,000	750	Floating Production
Esso Exploration & Production Nigeria Ltd	Erha (OPL 209)	1999	2006	Under Dev.	630,000,000	1,036	Floating Production
Nigerian Agip Oil Company Ltd	Abo Central & North (OML 125 Ex OPL 316)	1996	2003	Producing	197,625,000	580	Floating Production
Shell Nigeria Explo & Prod Company (SNEPCO)	Bonga Main (OML 118) (Ex OPL 212)	1996	2005	Under Dev.	881,550,000	1,030	Floating Production

Source: **Infield Systems Limited**

圖4-1-30-1 Angola及Congo深水及超深水最具未來潛能區塊之油氣蘊藏量。

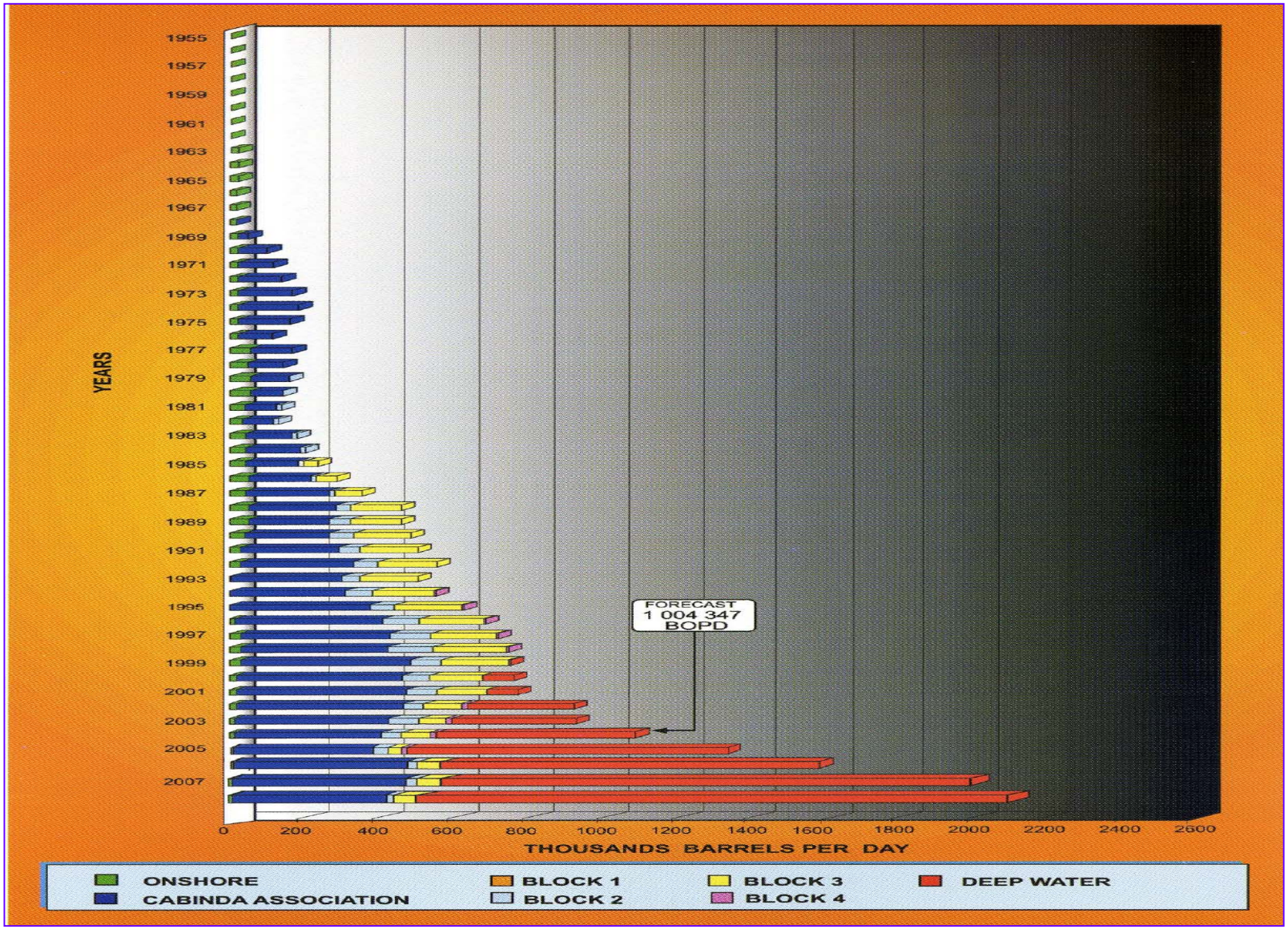


圖4-1-31 Angola及Congo深水及超深水最具未來潛能區塊，及各區塊之油氣蘊藏(2)

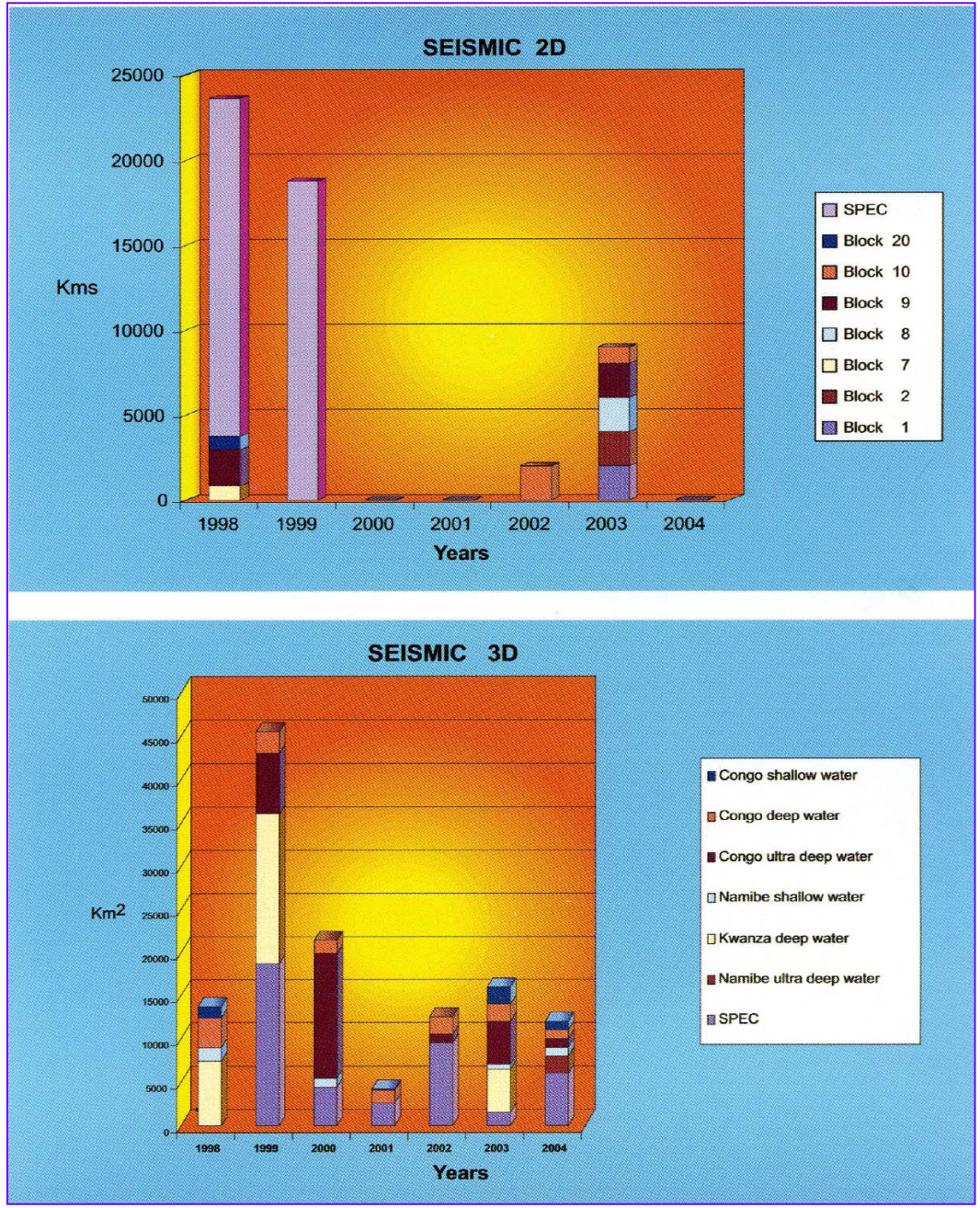


圖4-1-31 Angola及Congo深水及超深水最具未來潛能區塊，及各區塊之油氣蘊藏(3)

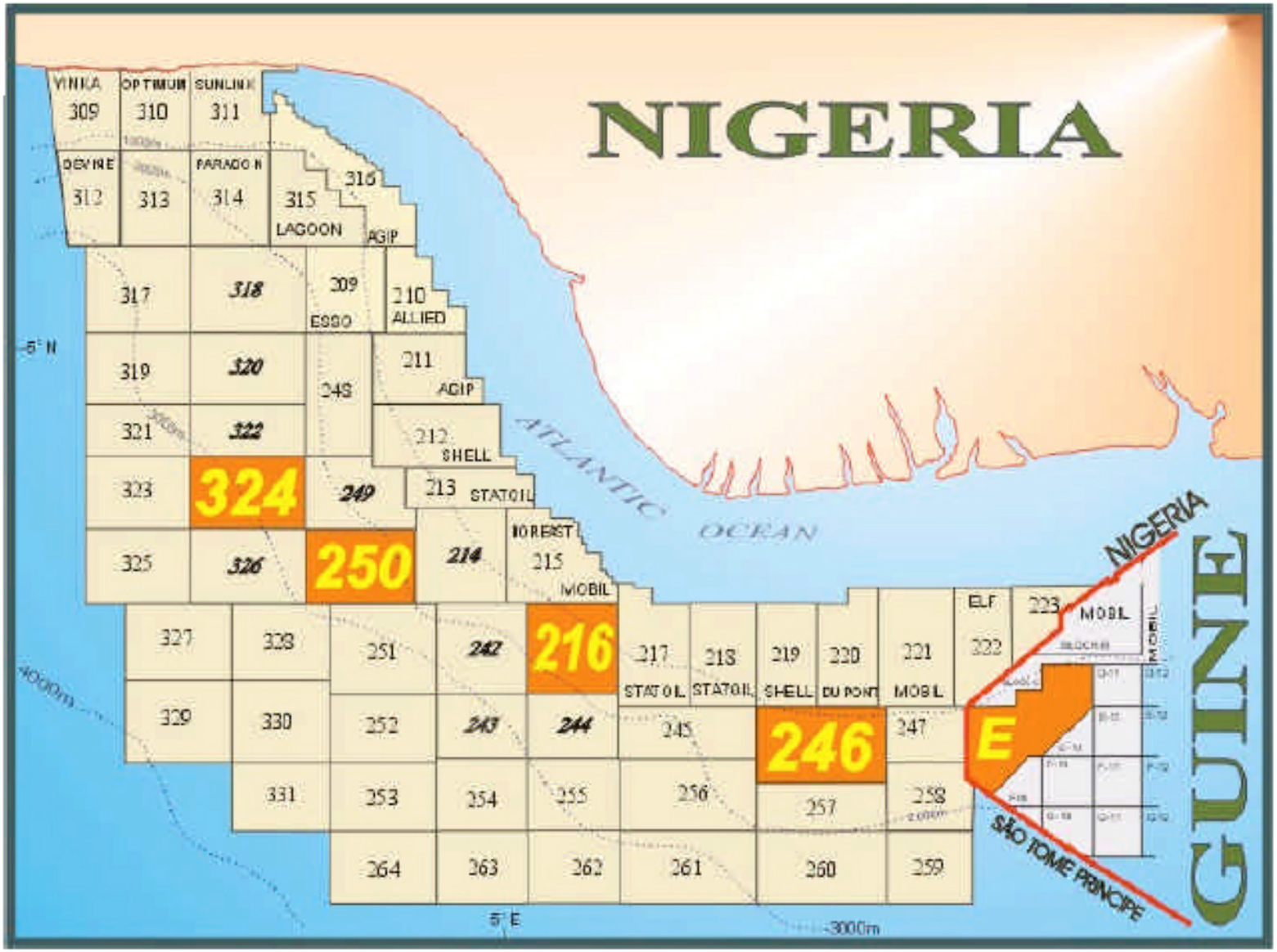
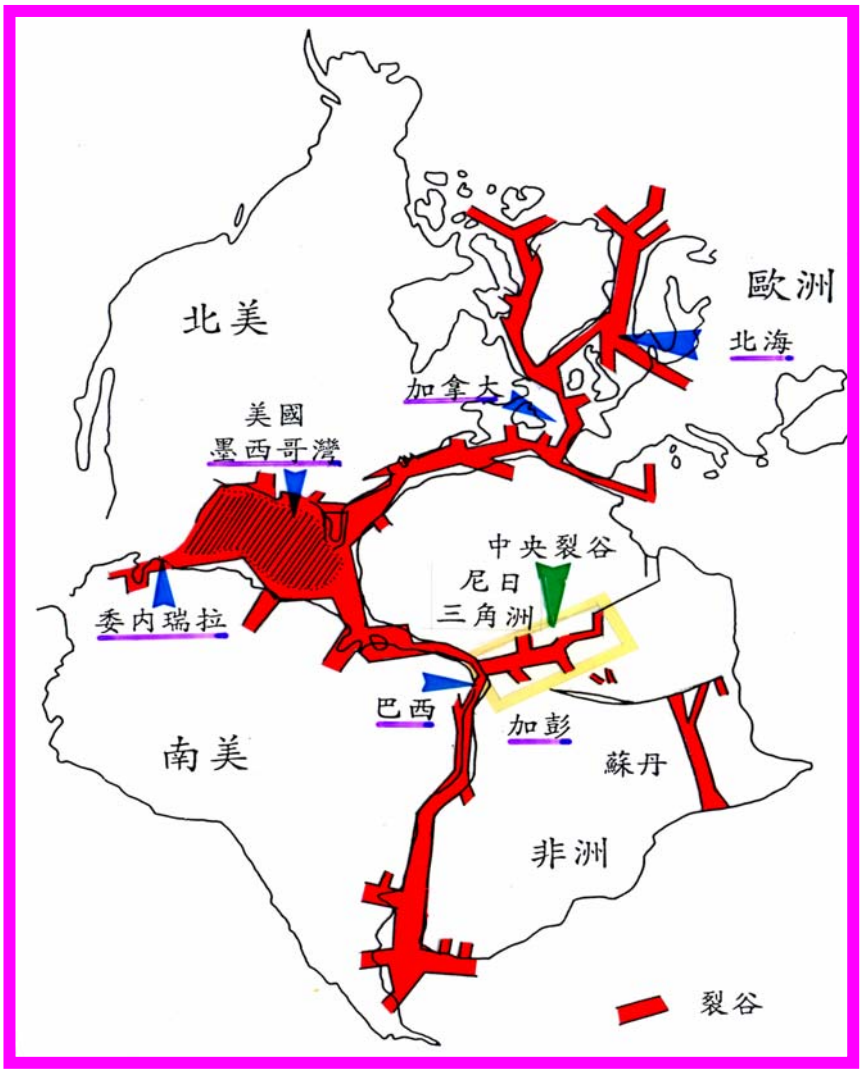
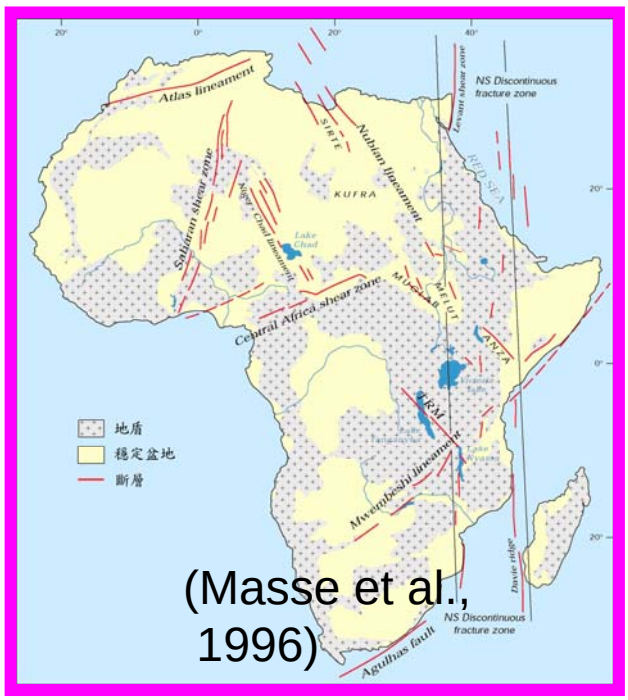


圖4-1-33 Nigeria之深水區塊，積極展開探勘之中 。



中生代裂谷群



(Masse et al., 1996)

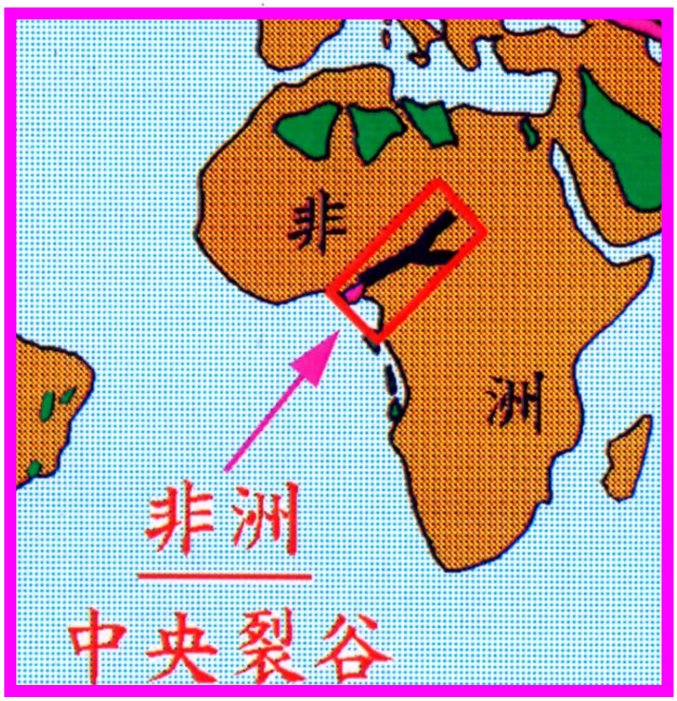
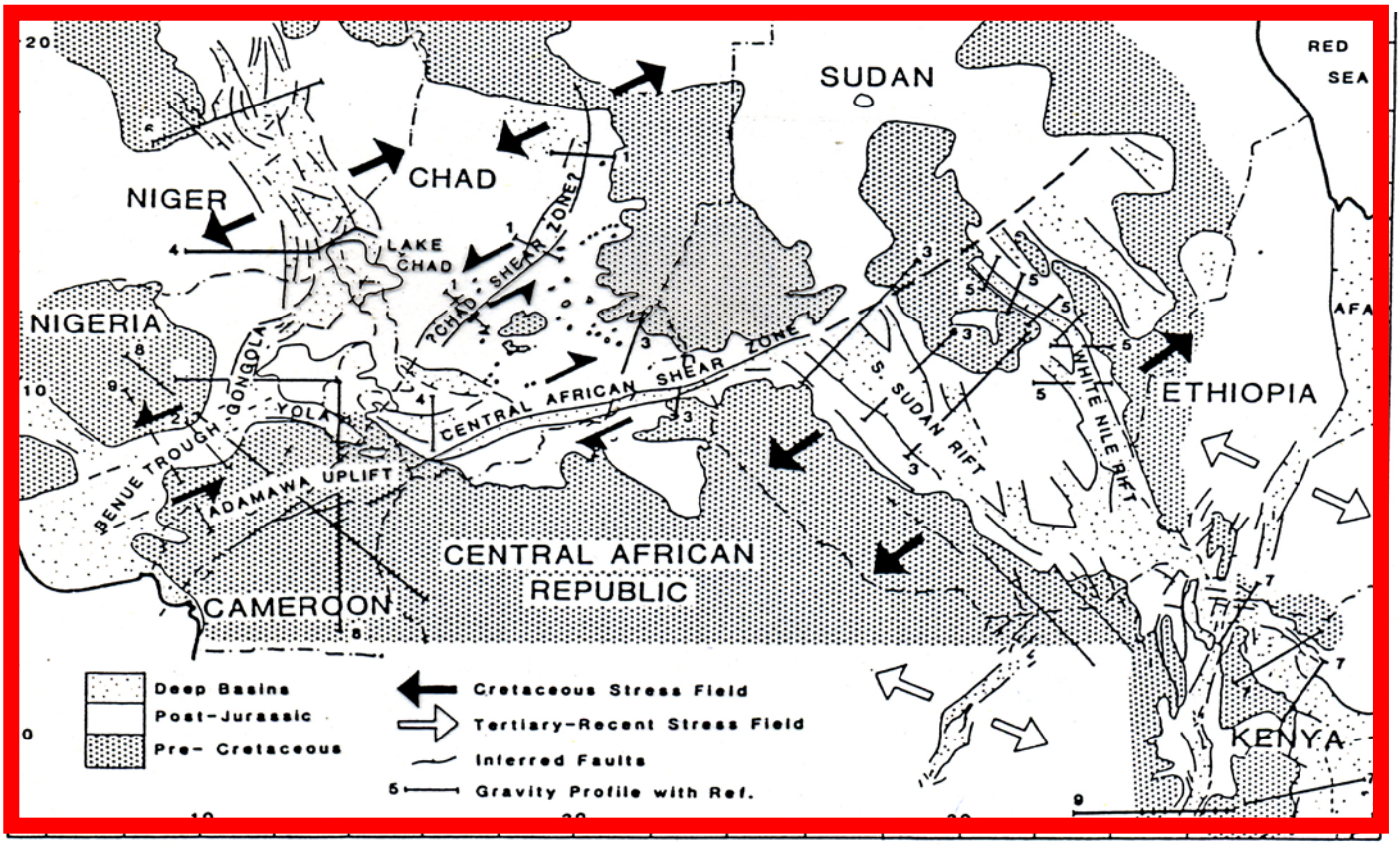


圖4-2-1 非洲大陸三個主要張裂性斷層地塹系統



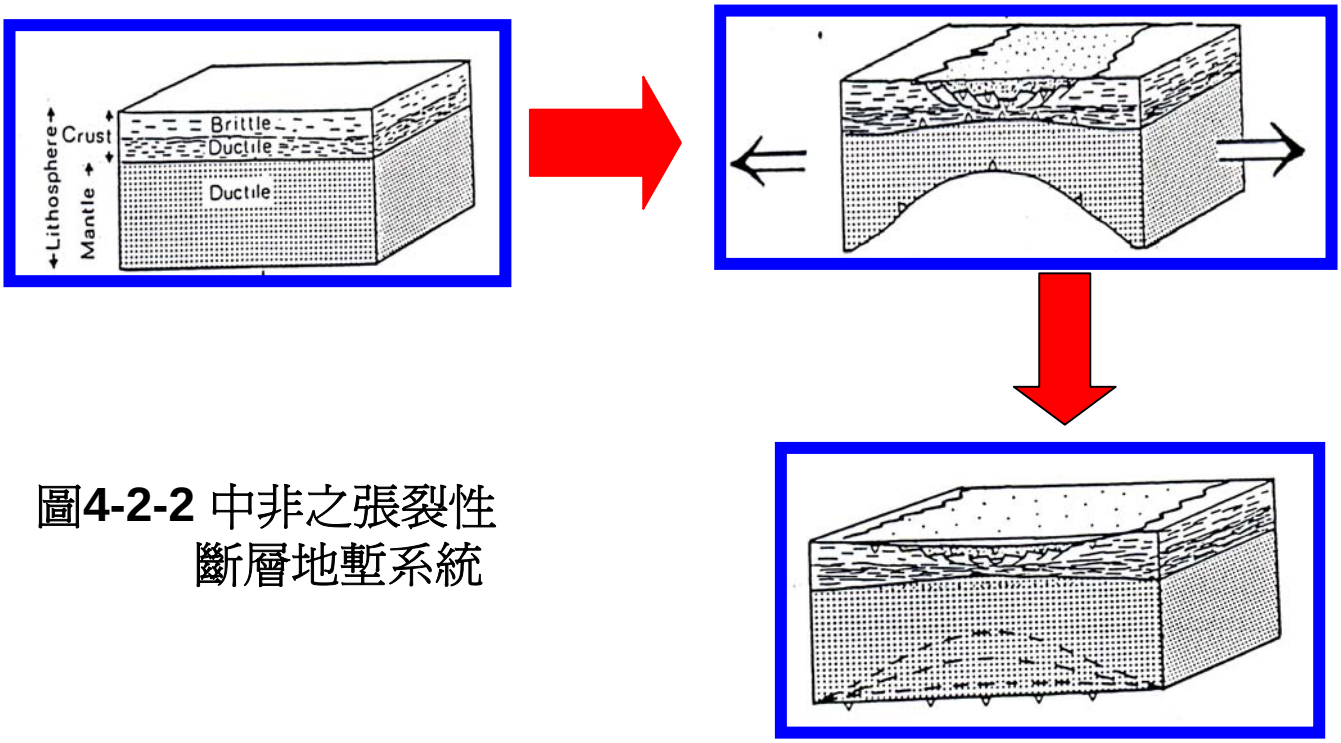


圖4-2-2 中非之張裂性斷層地塹系統

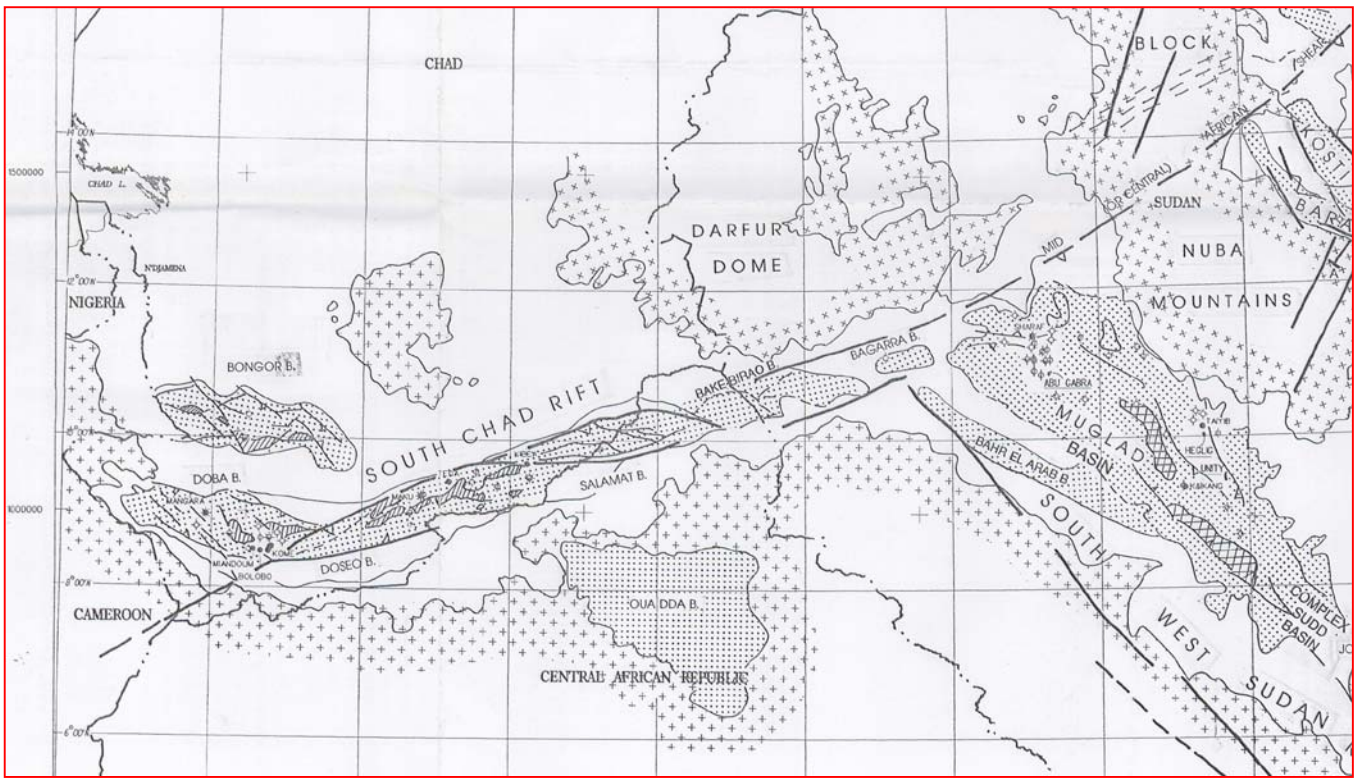


圖4-2-3 查德南部盆地之中非張裂性 剪切斷層系統

查德張裂盆地分布位置

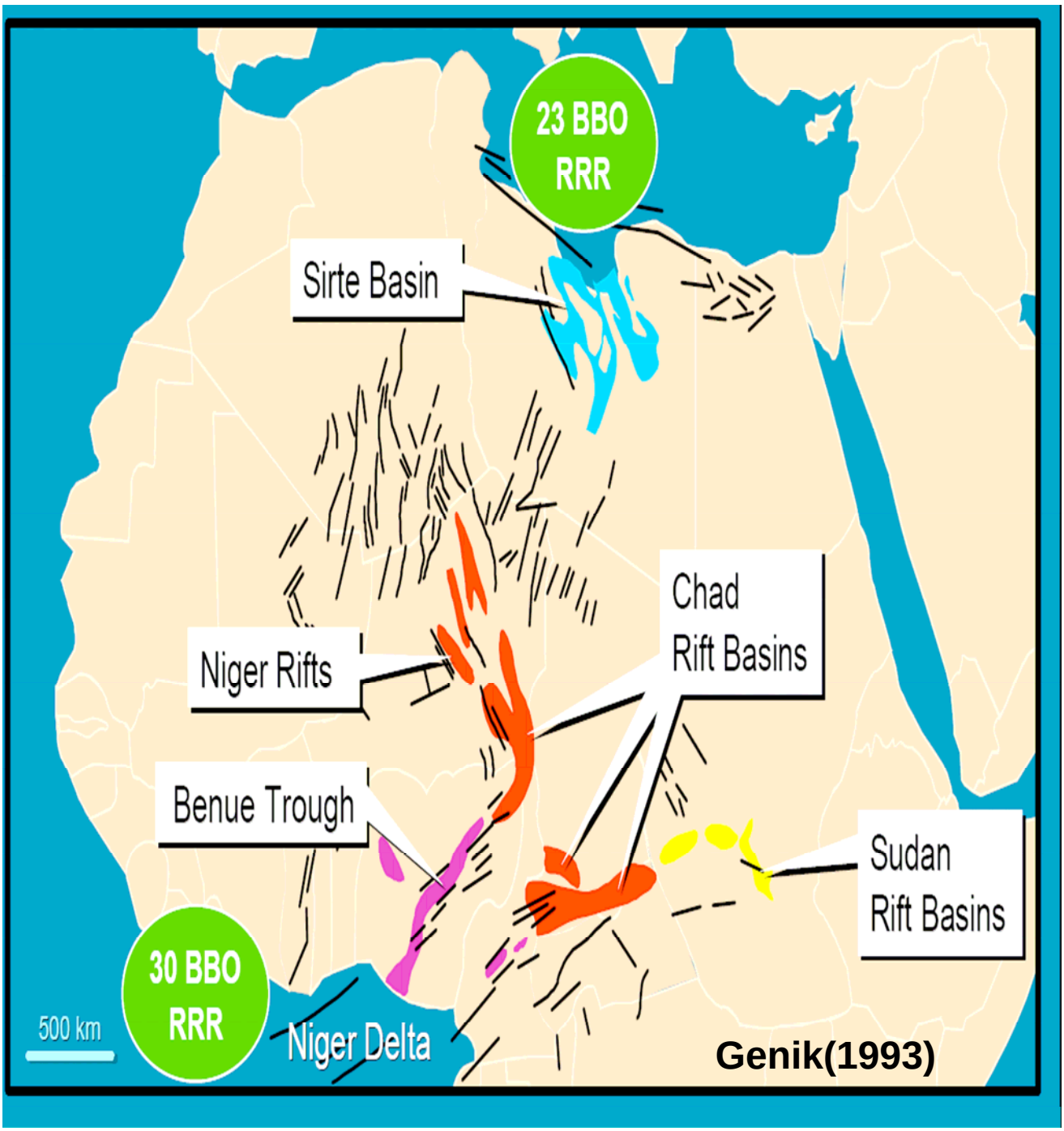


圖4-2-4 查德南部之四個開裂盆地

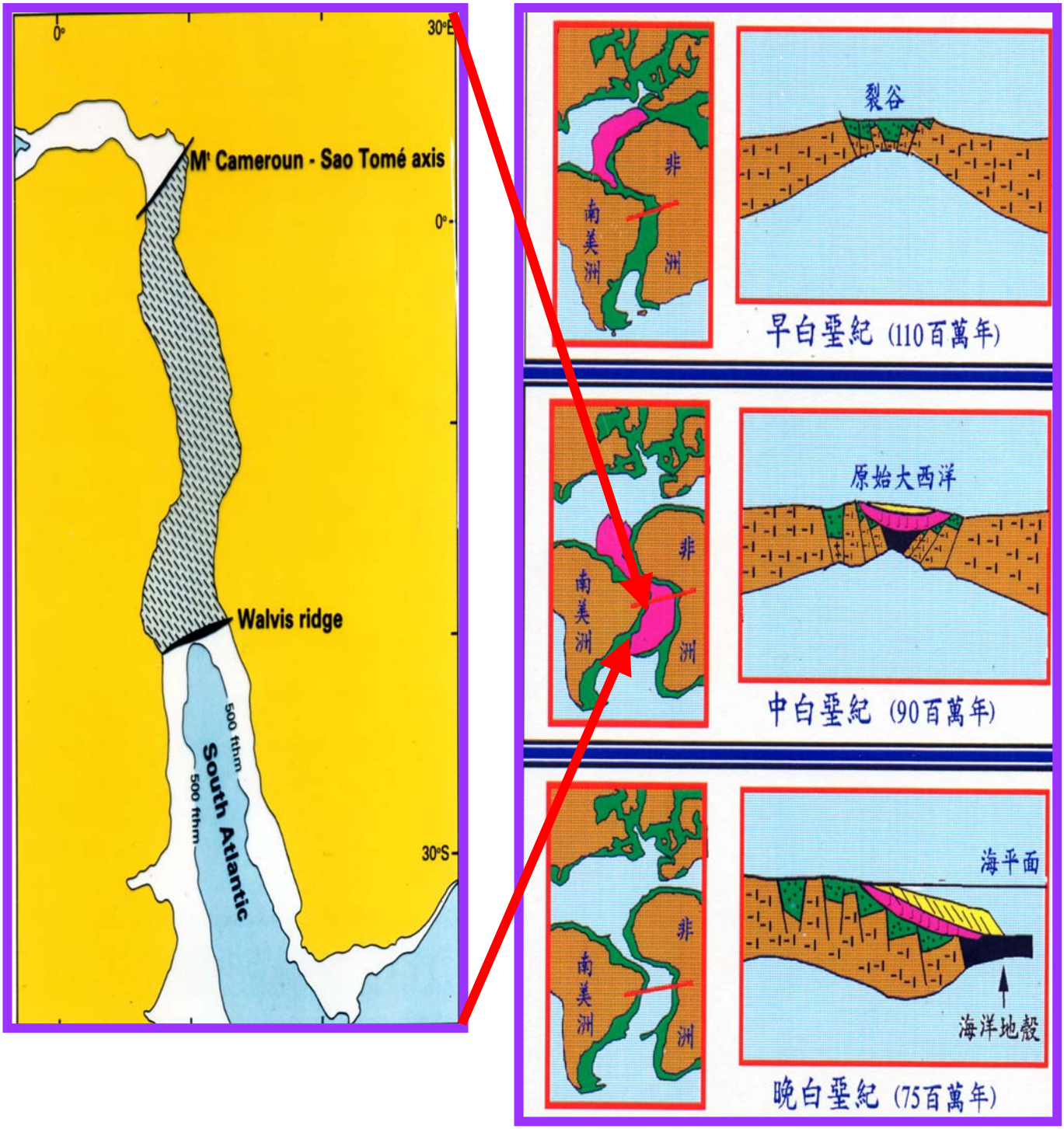


圖4-2-5 查德南部的盆地主要係因大西洋的開裂及擴張而發生。

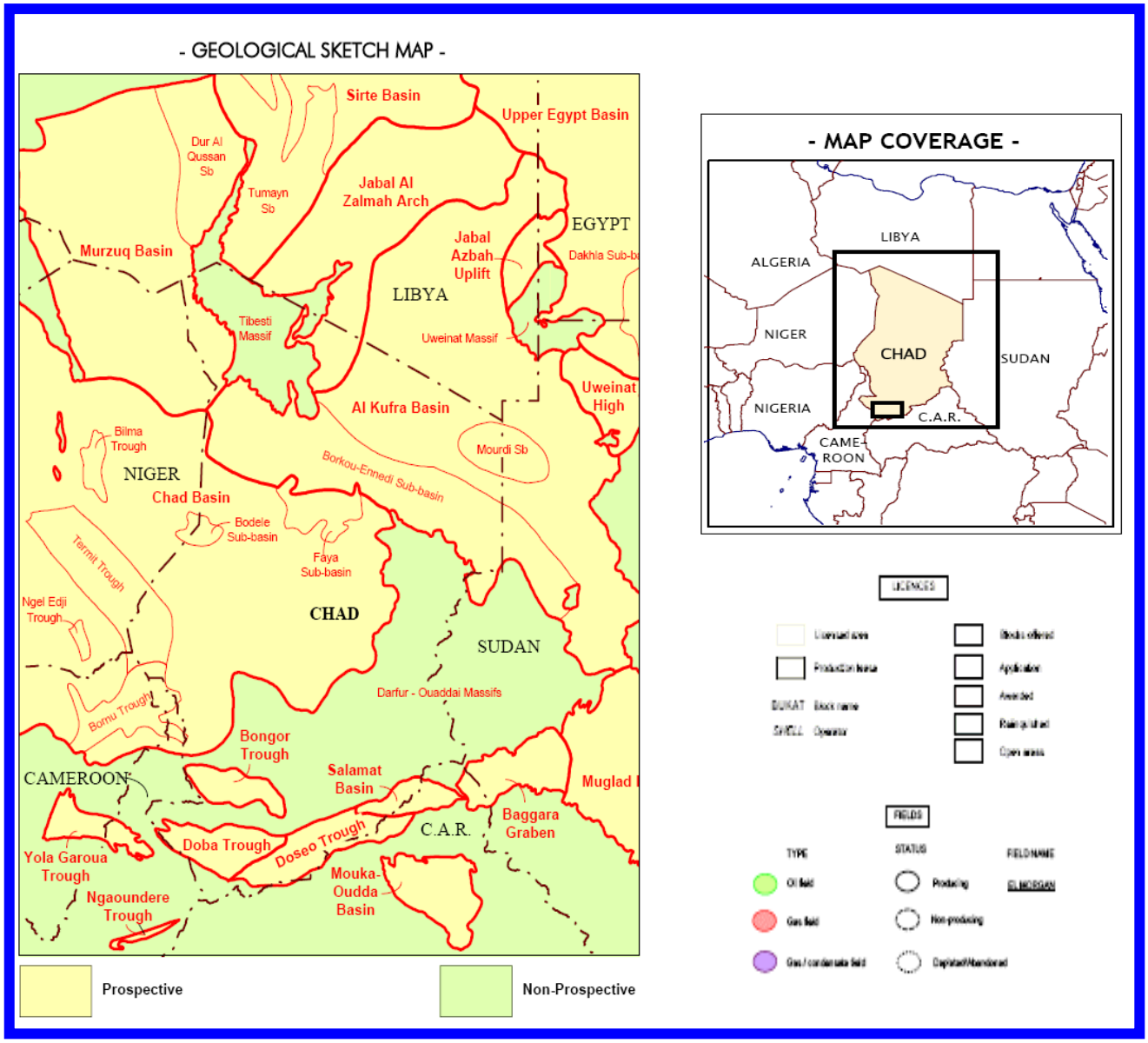
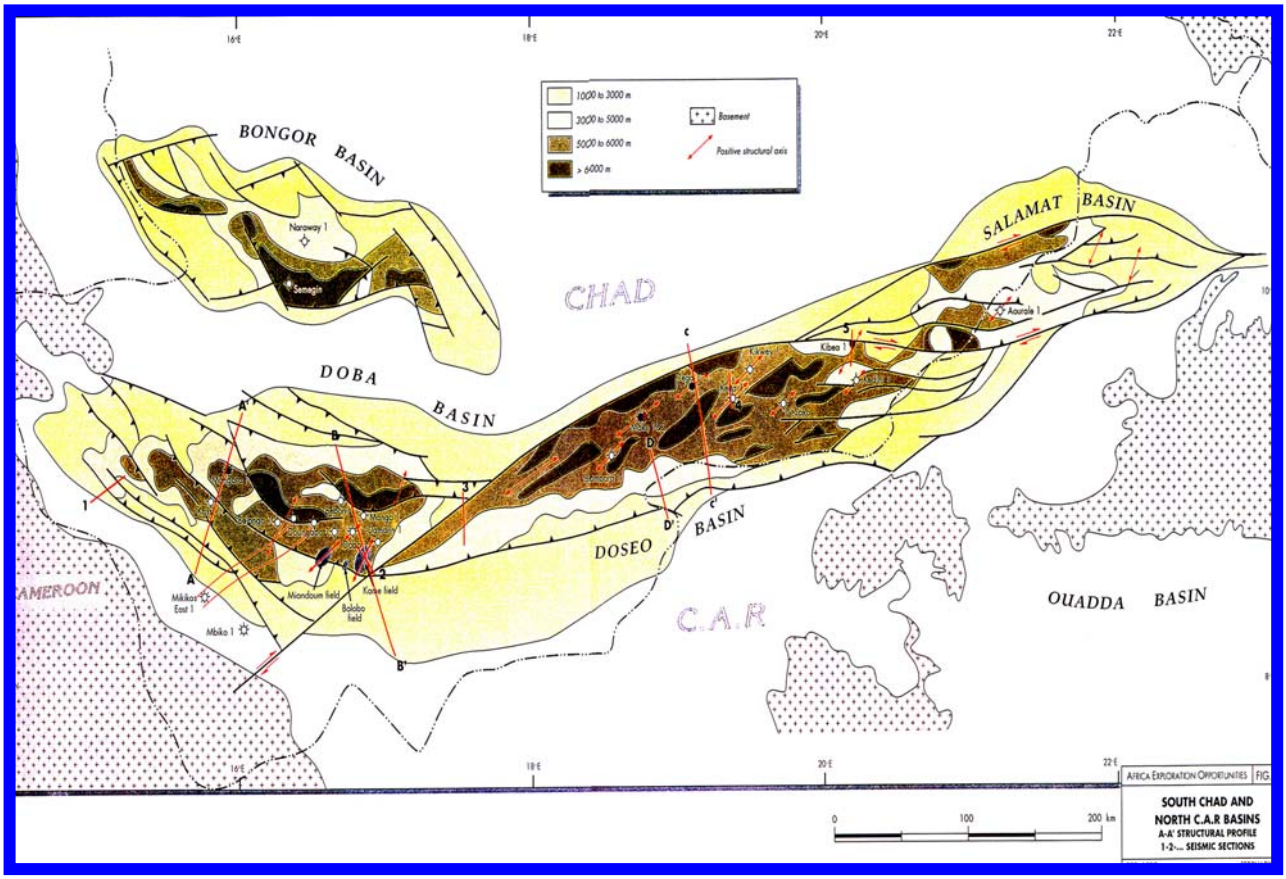


圖4-2-6 查德Doba及DoseoBongor及Salamat盆地之分布位置



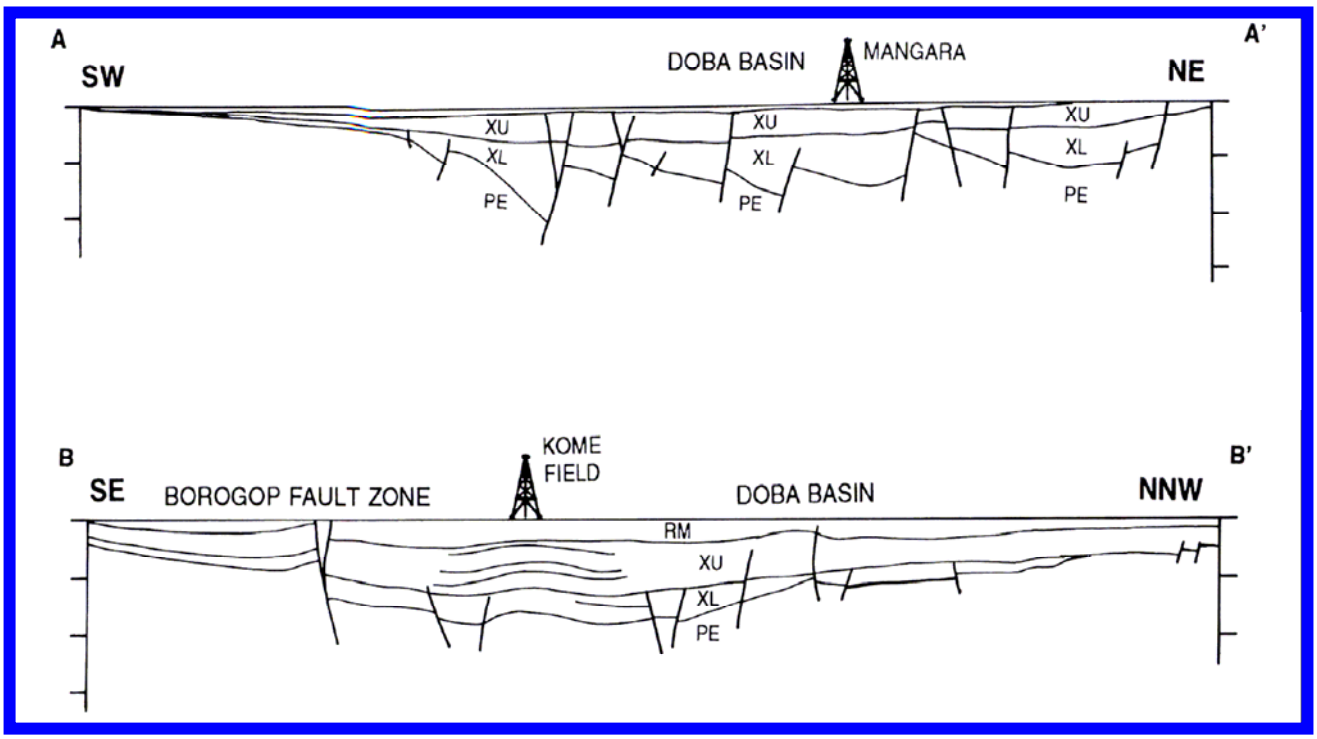


圖4-2-7 查德南部之四個油氣盆地上；及通過油田區之地質剖面圖(下)。圖中顯示此等盆地之形式與特性受此幾乎東西向延伸大斷裂之控制。

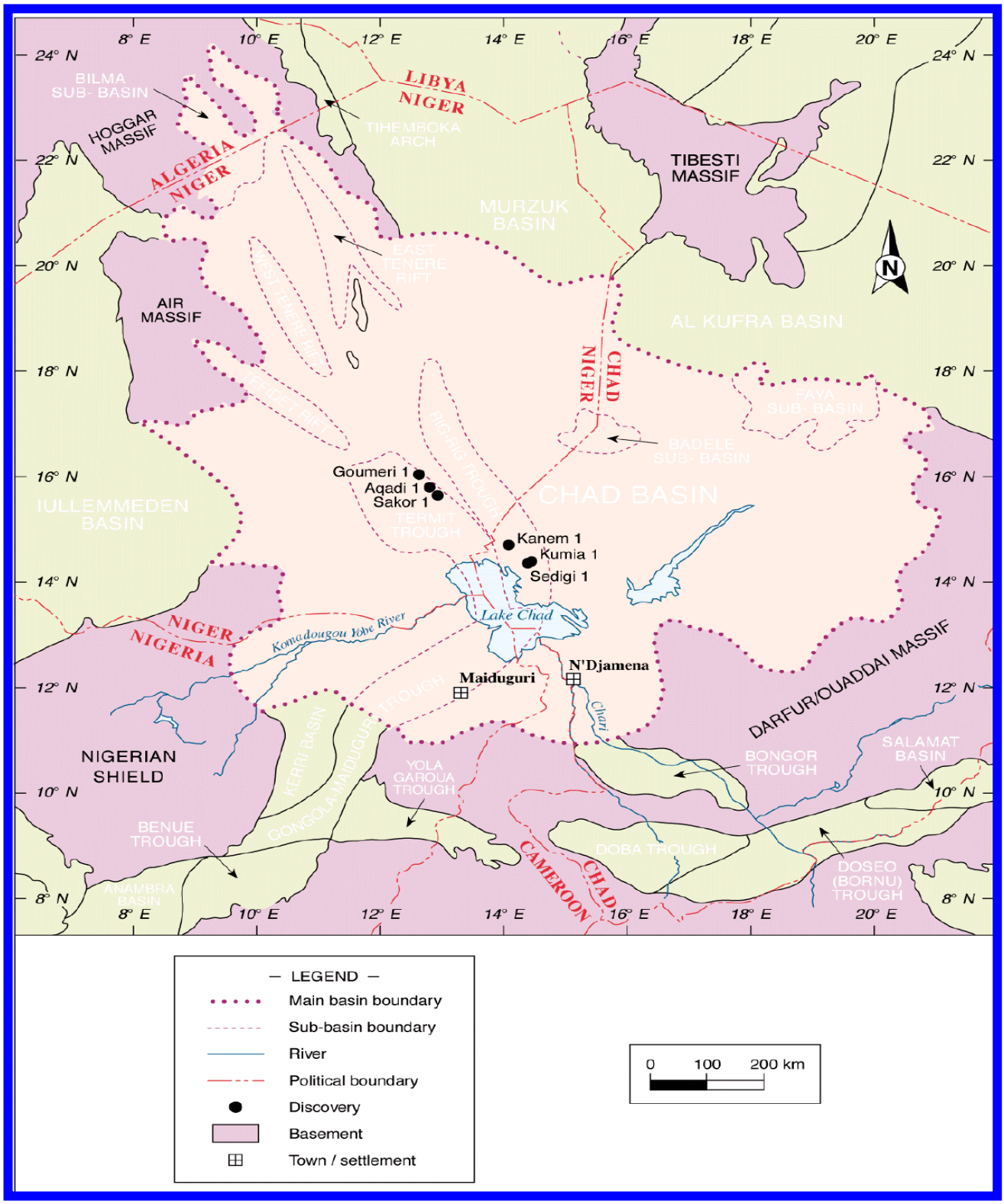


圖4-2-8 查德南部盆地之基盤深度。

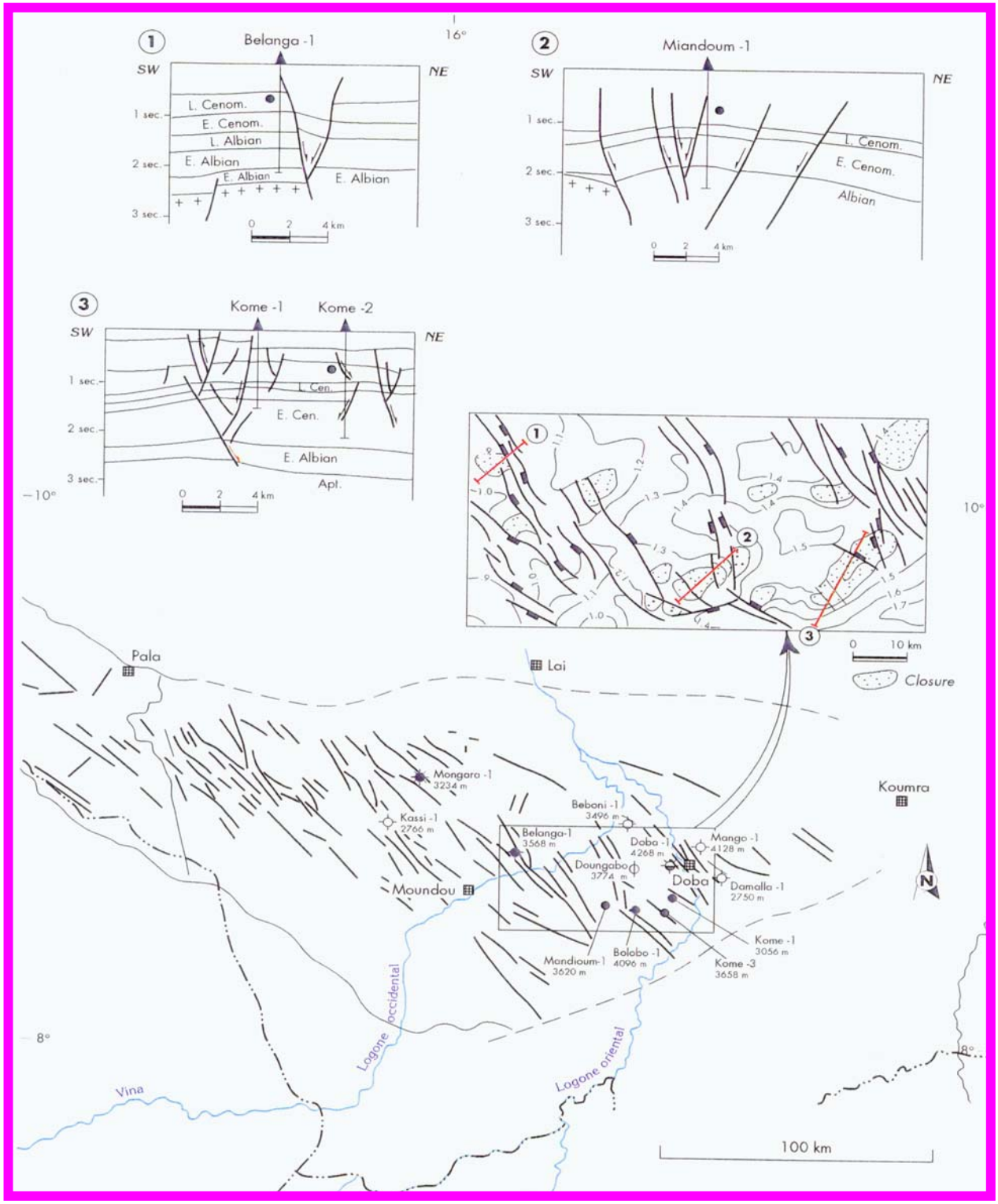


圖4-2-9 盆地之外型受晚白堊紀擠壓關係因而形成花狀構造。由此時期所形成之褶曲構造，褶曲方向大多呈爲**N40°～N60°**走向，對於油氣之儲聚極爲重要。

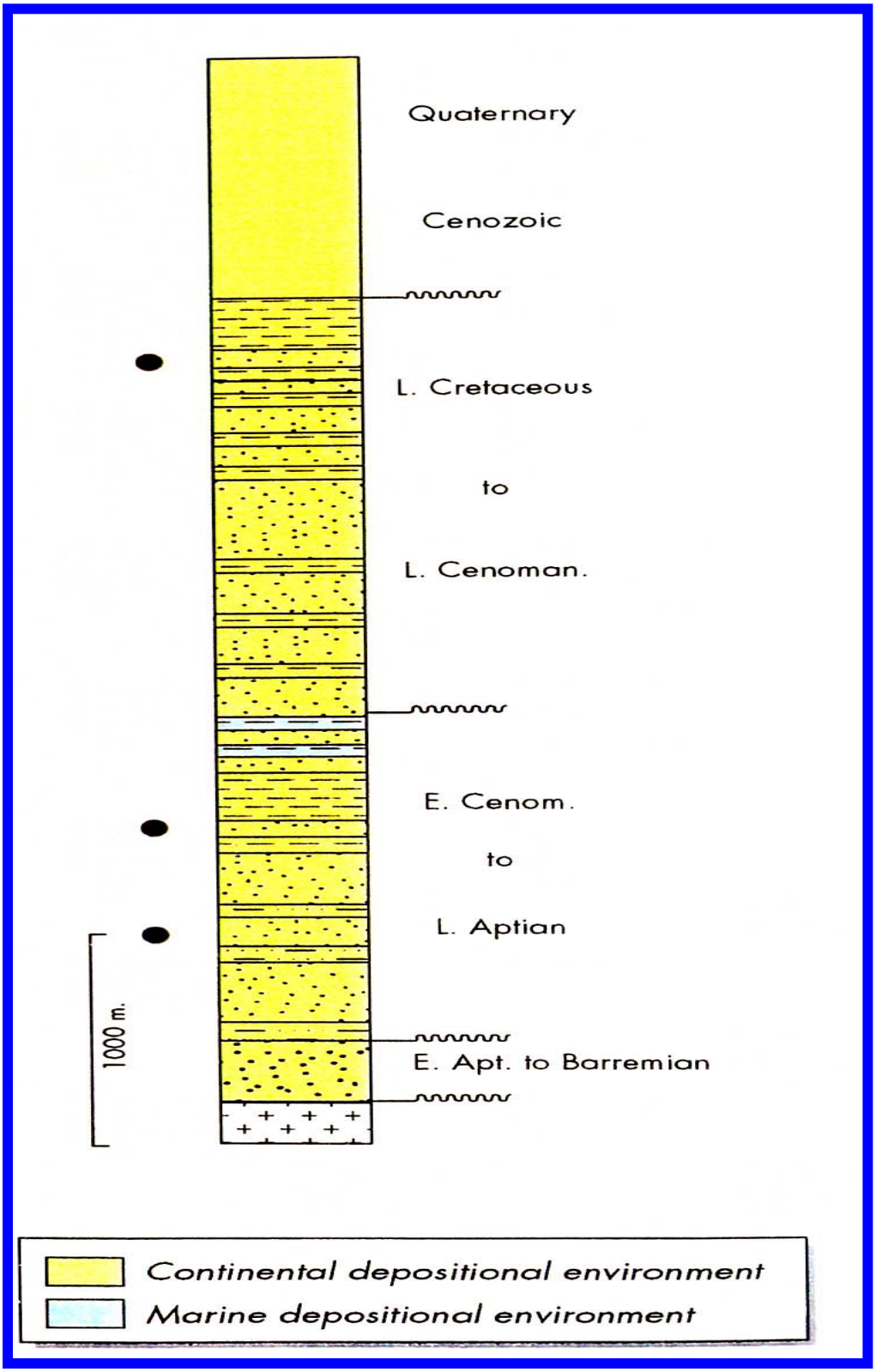


圖4-2-10 Doba盆地之岩相

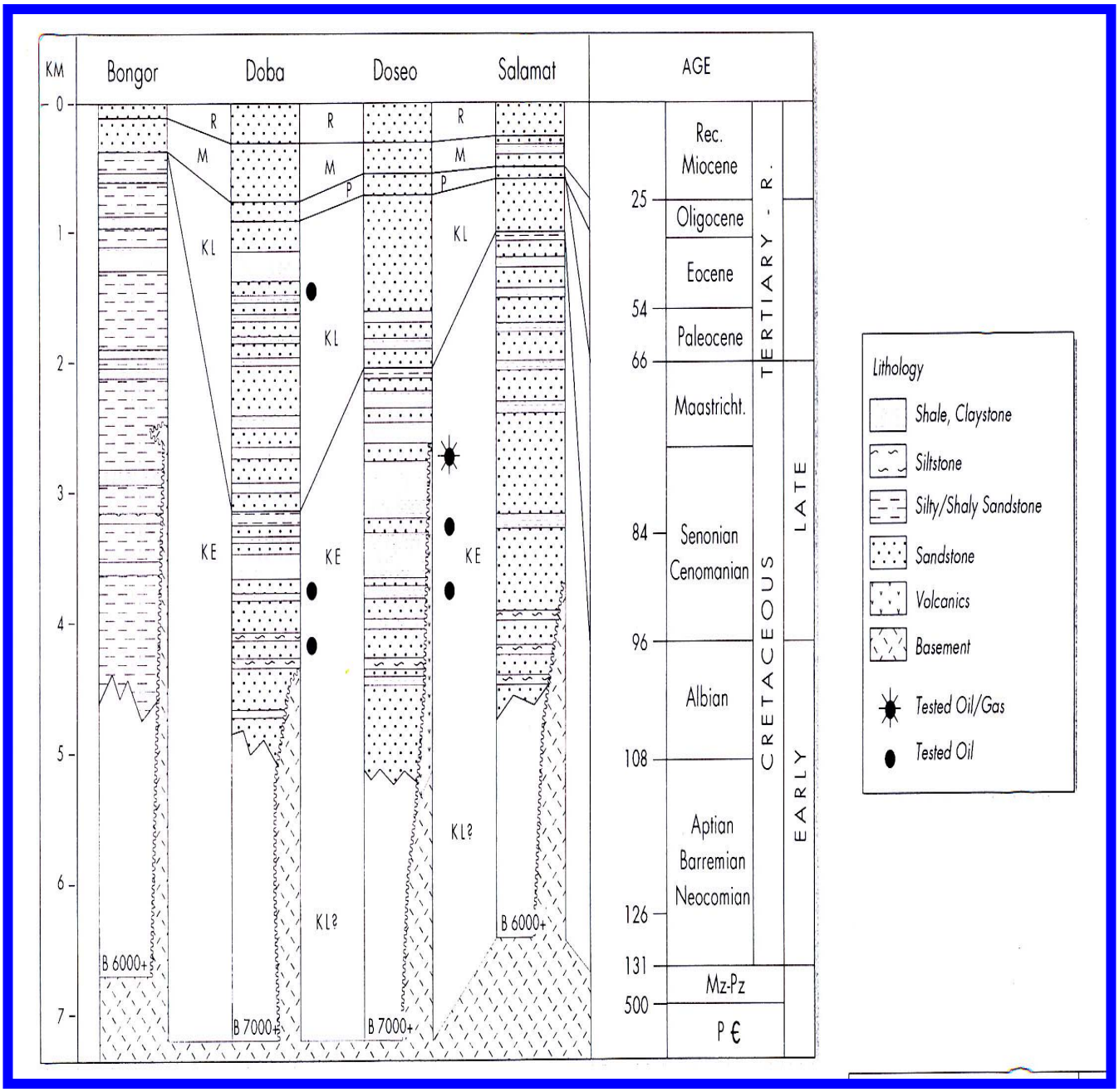


圖4-2-11 Doba與與查德南部盆地之岩相

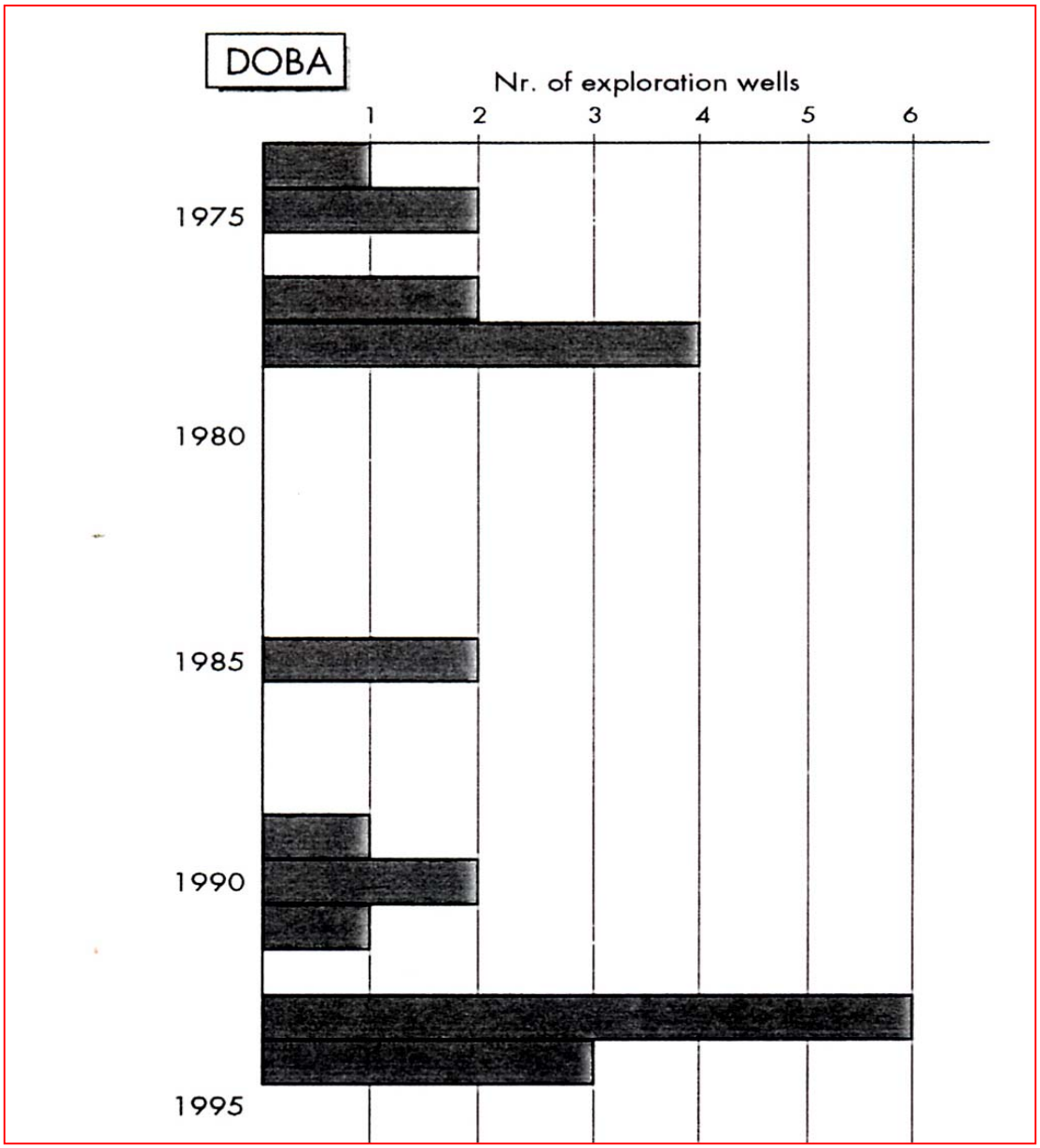


圖4-2-12 Doba盆地目前已五口井發現油氣

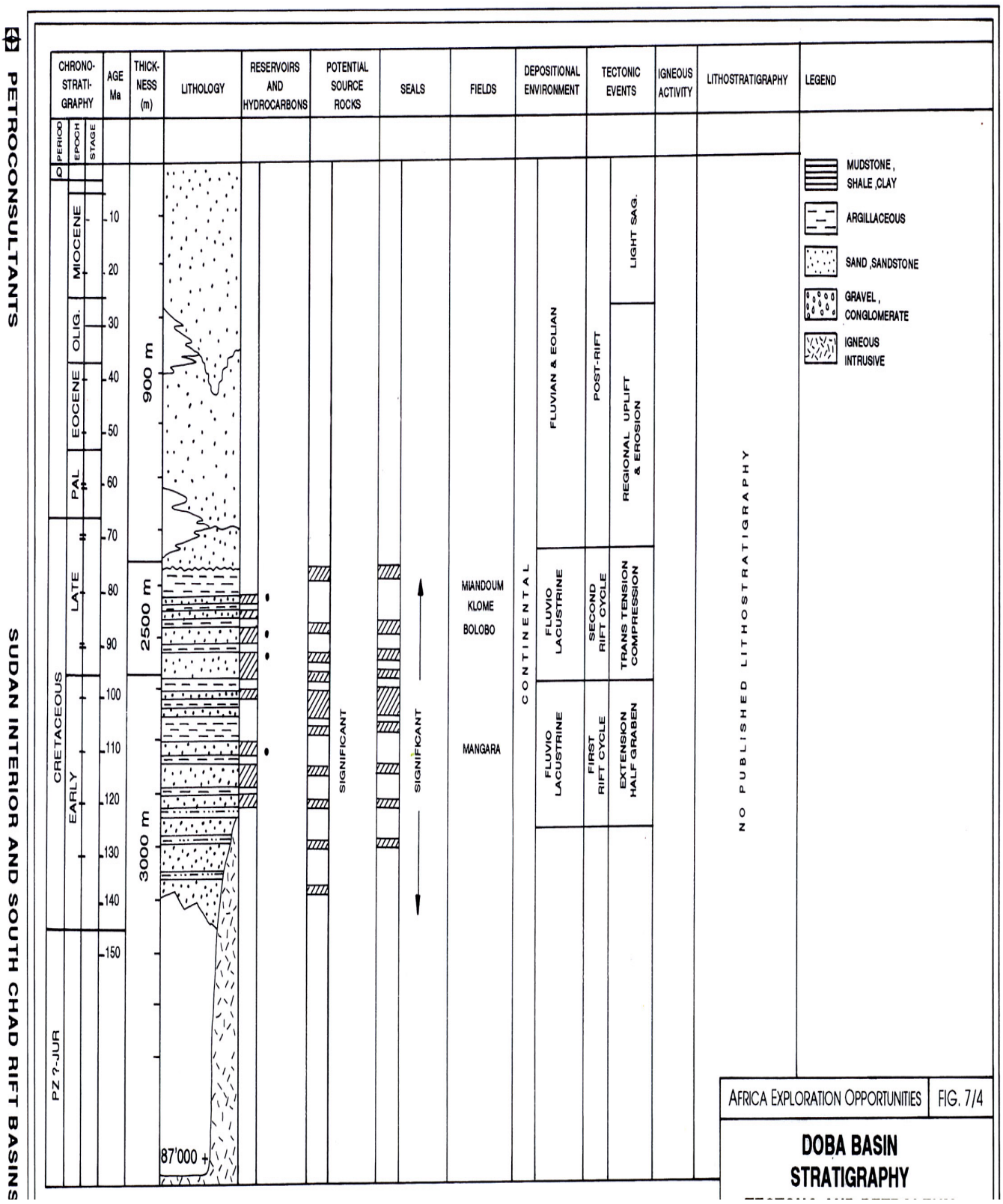


圖4-2-13 Doba盆地之石油儲聚系統

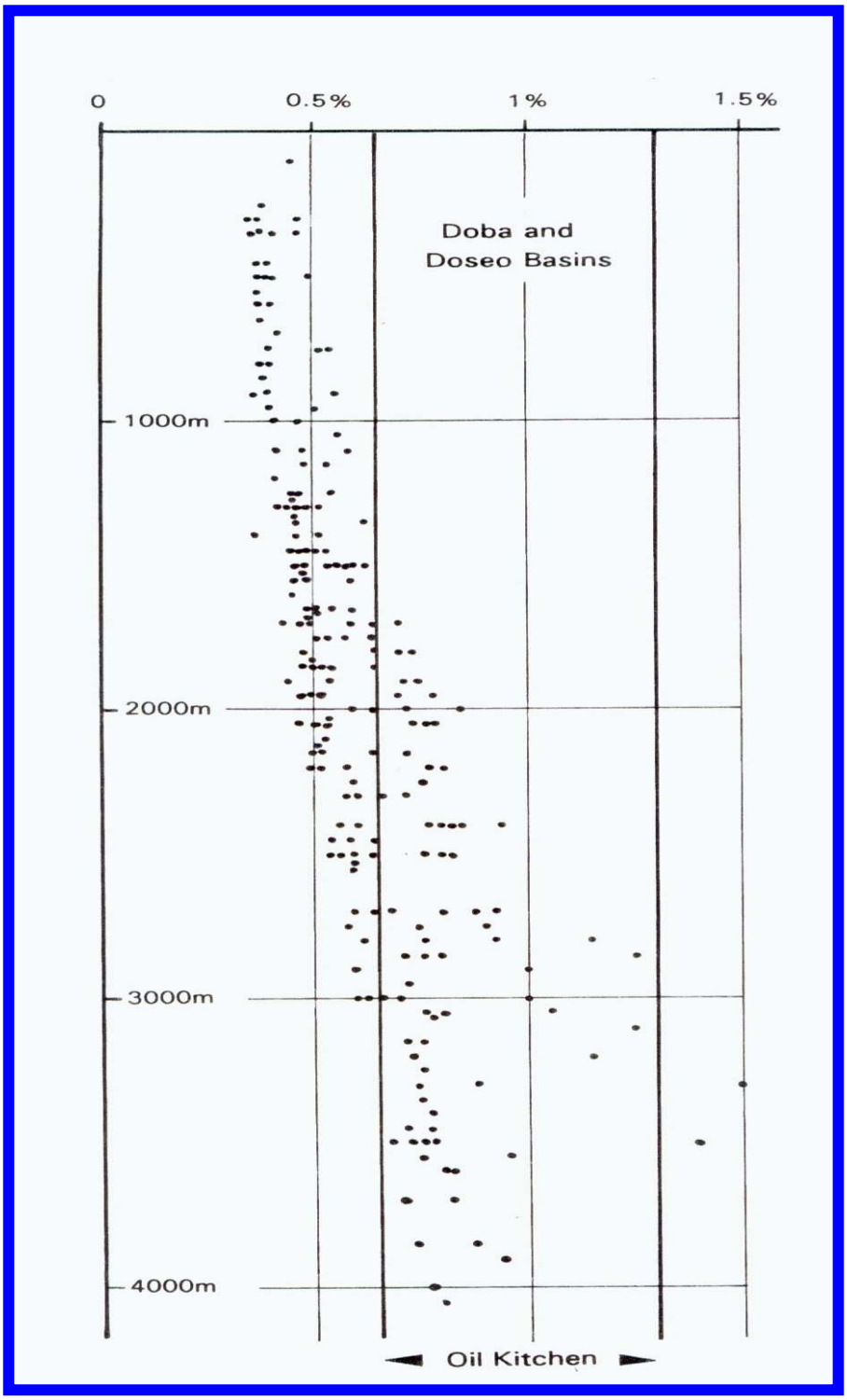
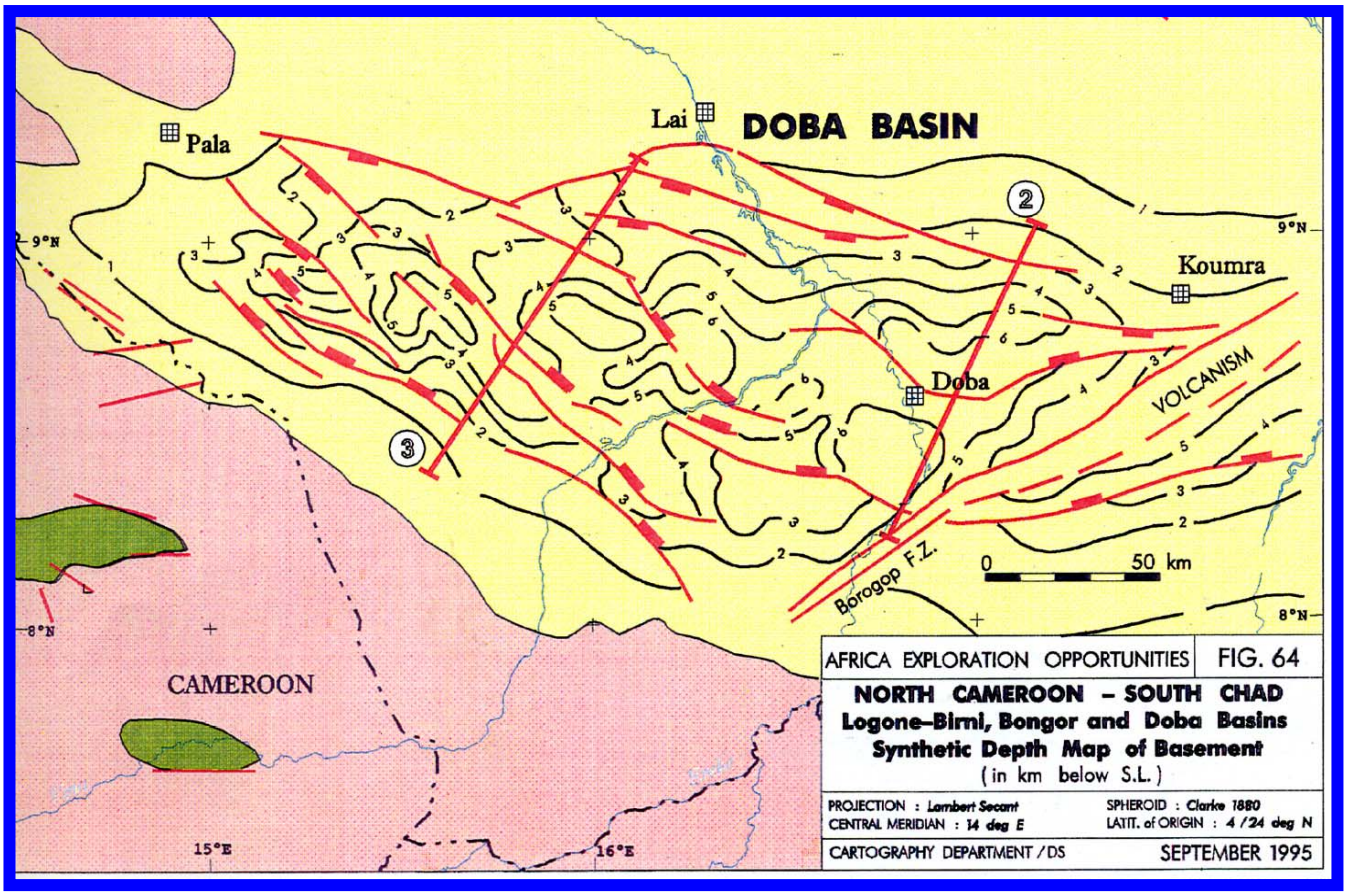


圖4-2-14 Doba和Doseo盆地之成熟度(Ro)深度圖，顯示其油窗頂部深約在2,500公尺左右。



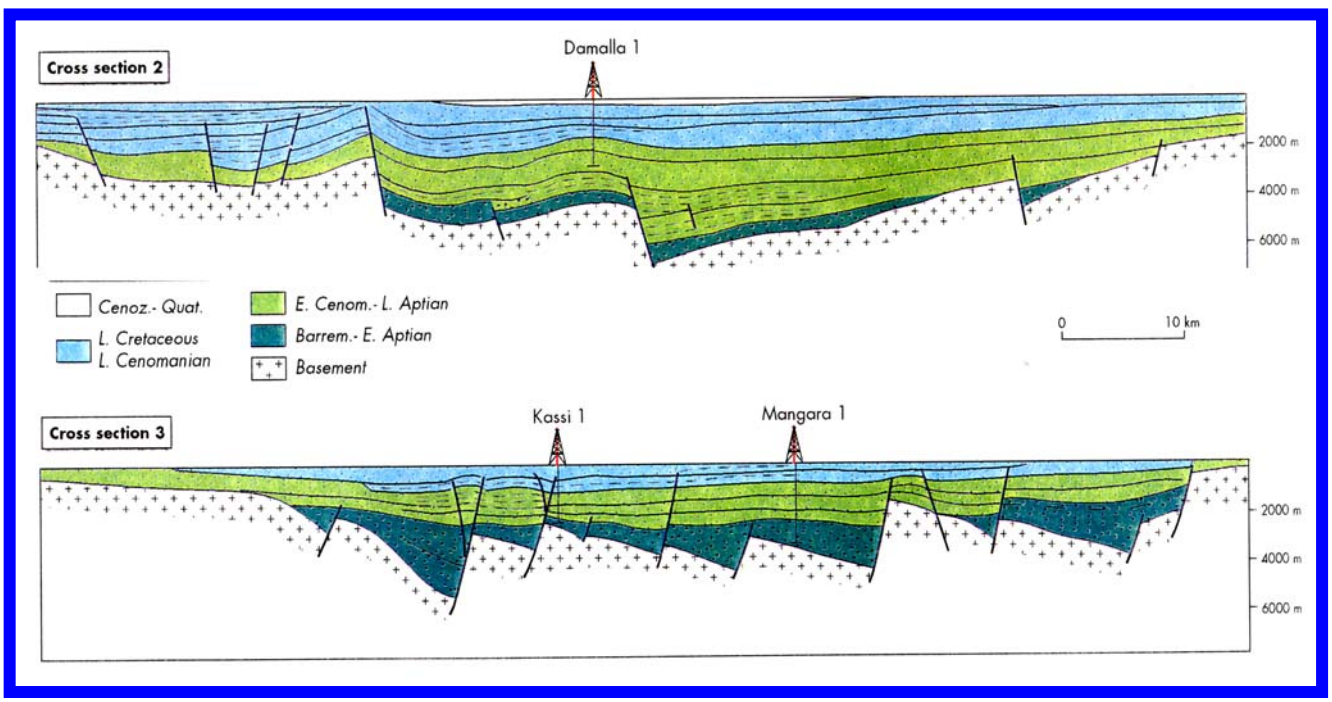
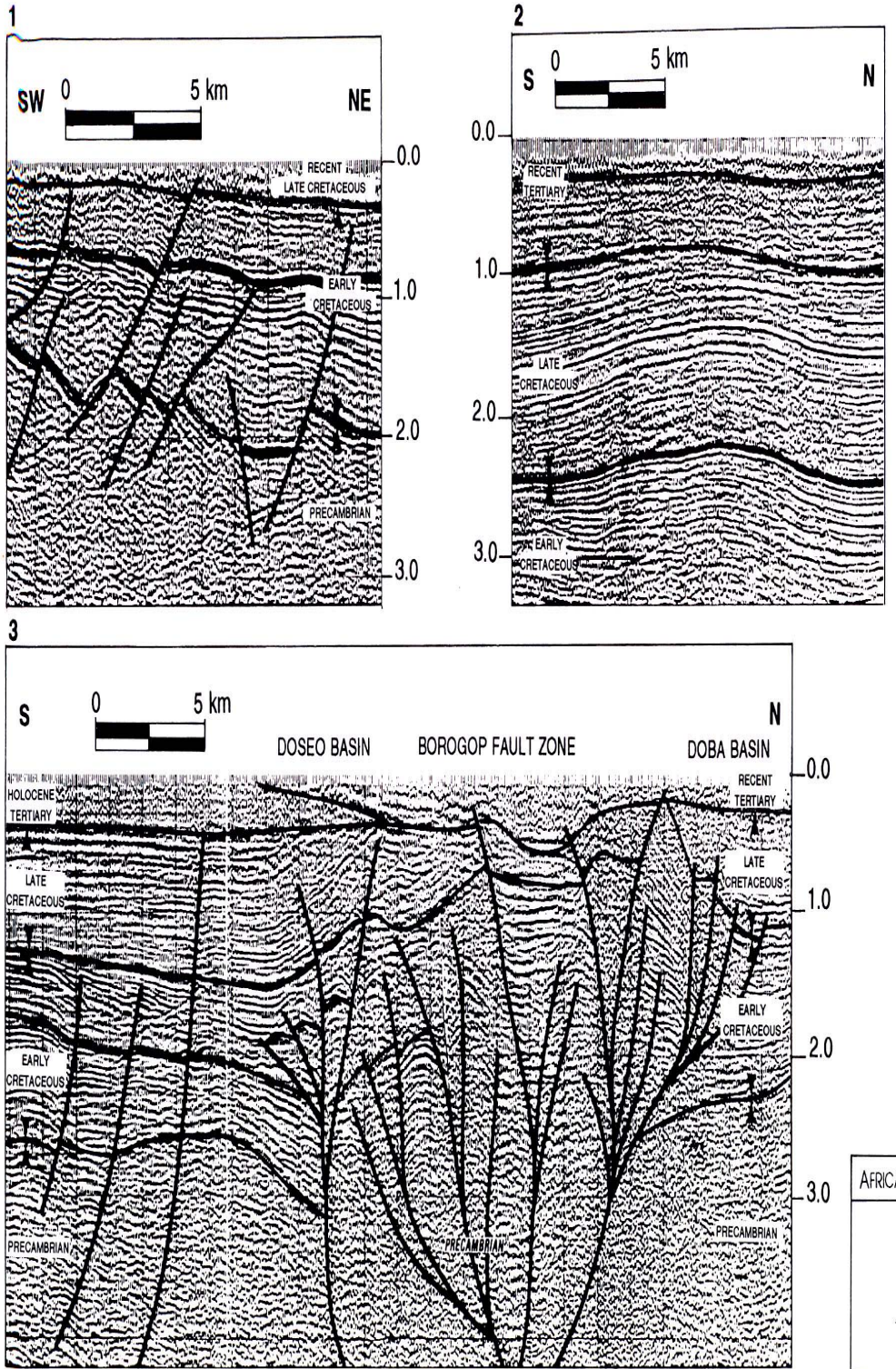


圖4—15 Doba盆地之探勘標的主要爲Santonian之背斜構造盆(上)；及通過油田區之地質剖面圖，顯示此等盆地爲因張裂而形成之半地塹(下)。



AFRICA EXPLORATION OPPORTUNITIES | FIG. 7/3

DOBA BASIN
SEISMIC SECTIONS
1, 2 AND 3

CRD / BV FEBRUARY 1995

圖4-2-16 Doba盆地花狀斷層甚爲發育，形成較好之封閉構造 。

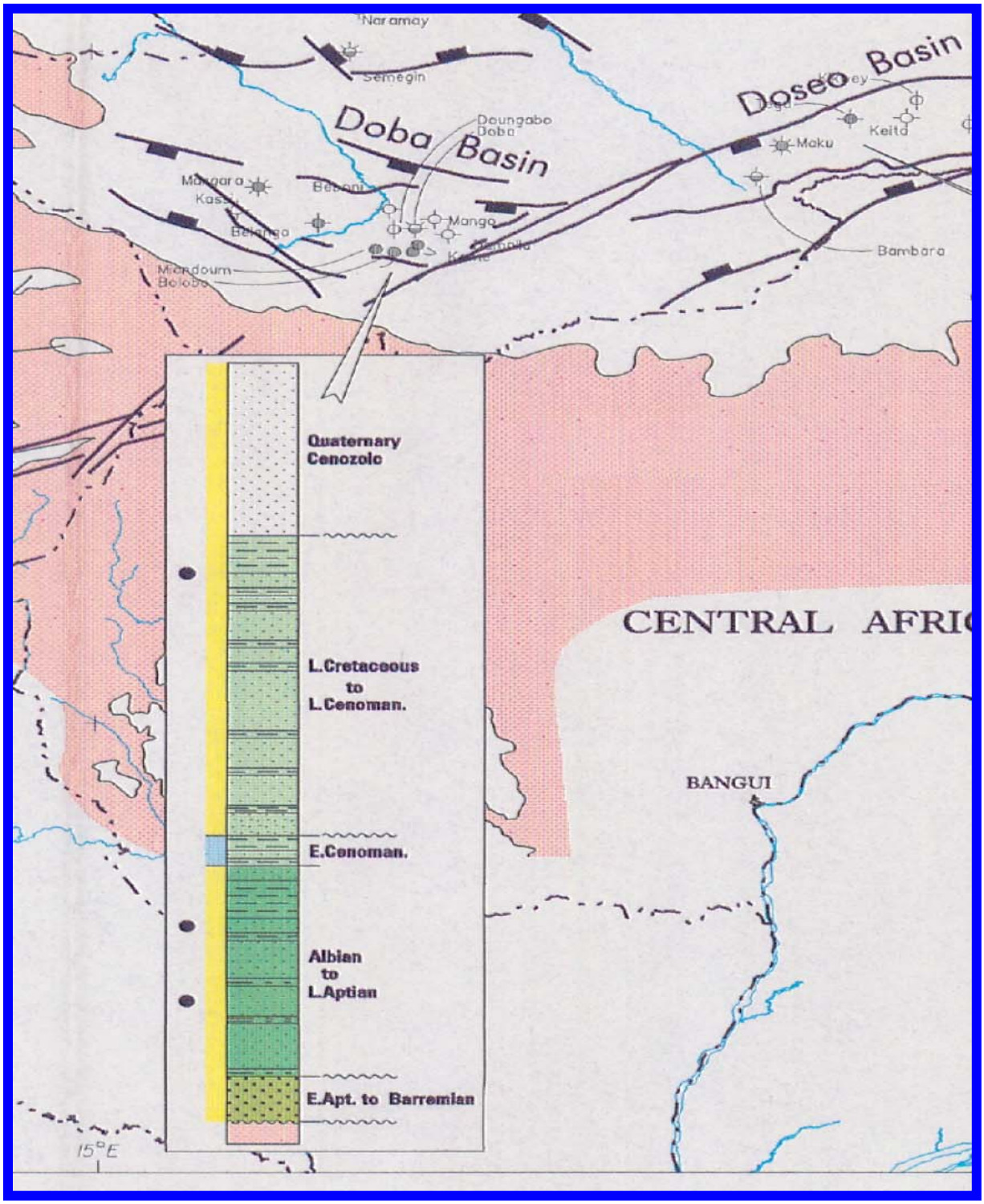


圖4-2-17 鑽探結果顯示在早白堊紀及晚白堊紀之儲集層中，仍蘊藏相當大量之油氣

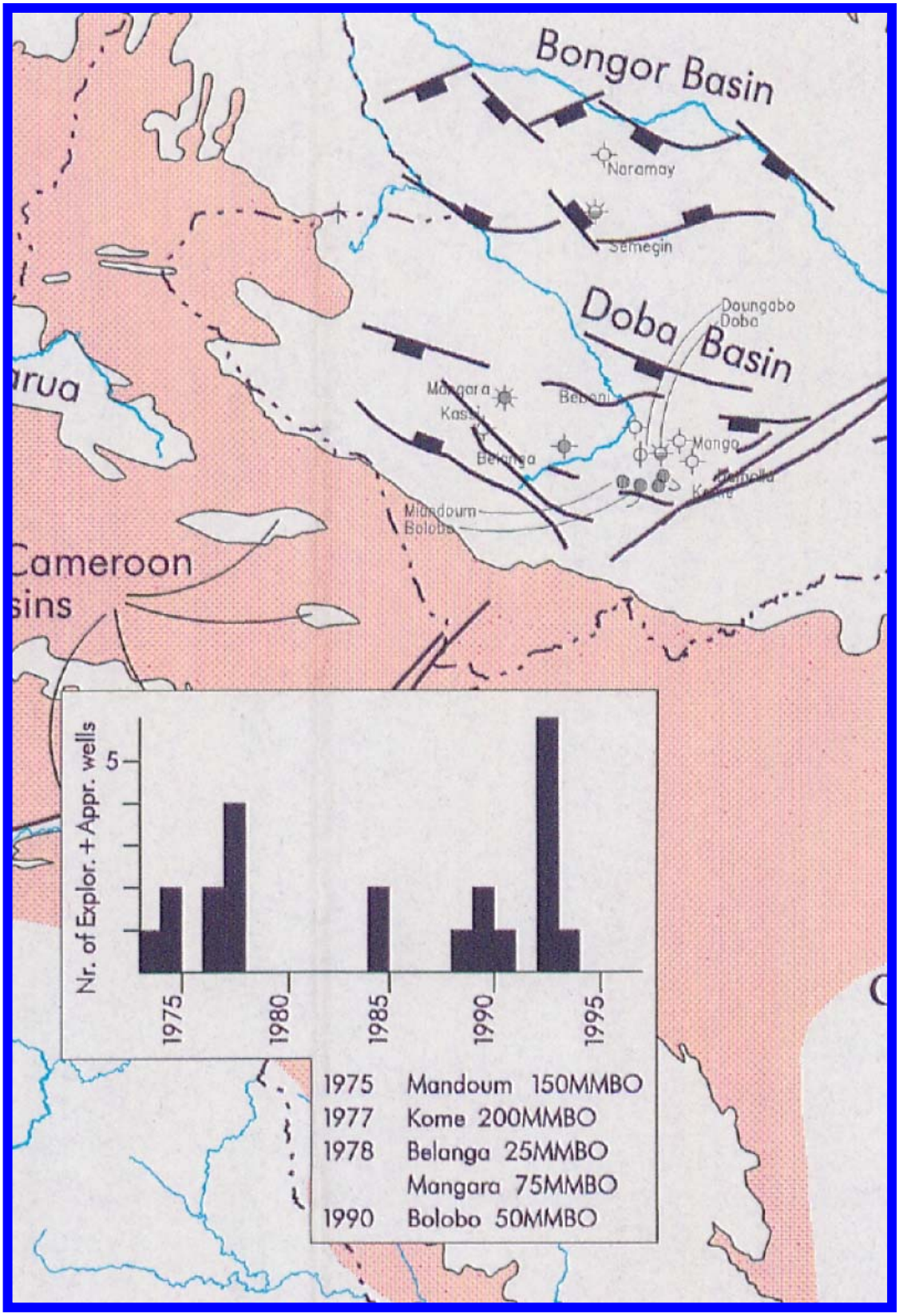


圖4-2-18 Doba盆地之晚白堊系中已發現油氣蘊藏，其蘊藏量達425百萬桶；而早白堊系亦發現一個7,500萬桶之油氣蘊藏。

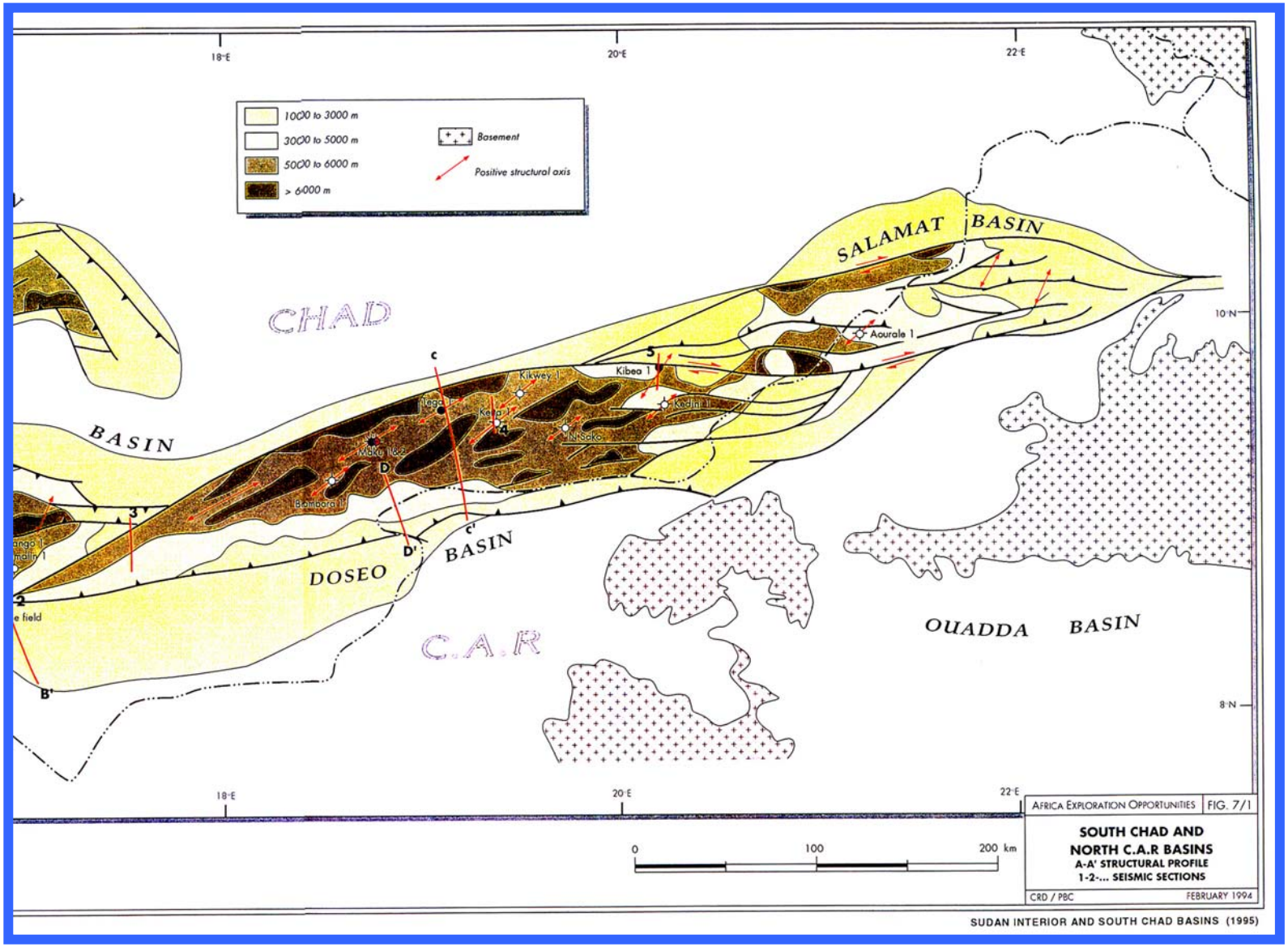


圖4-2-21 Doseo及Salamat盆地位於Chad南部。

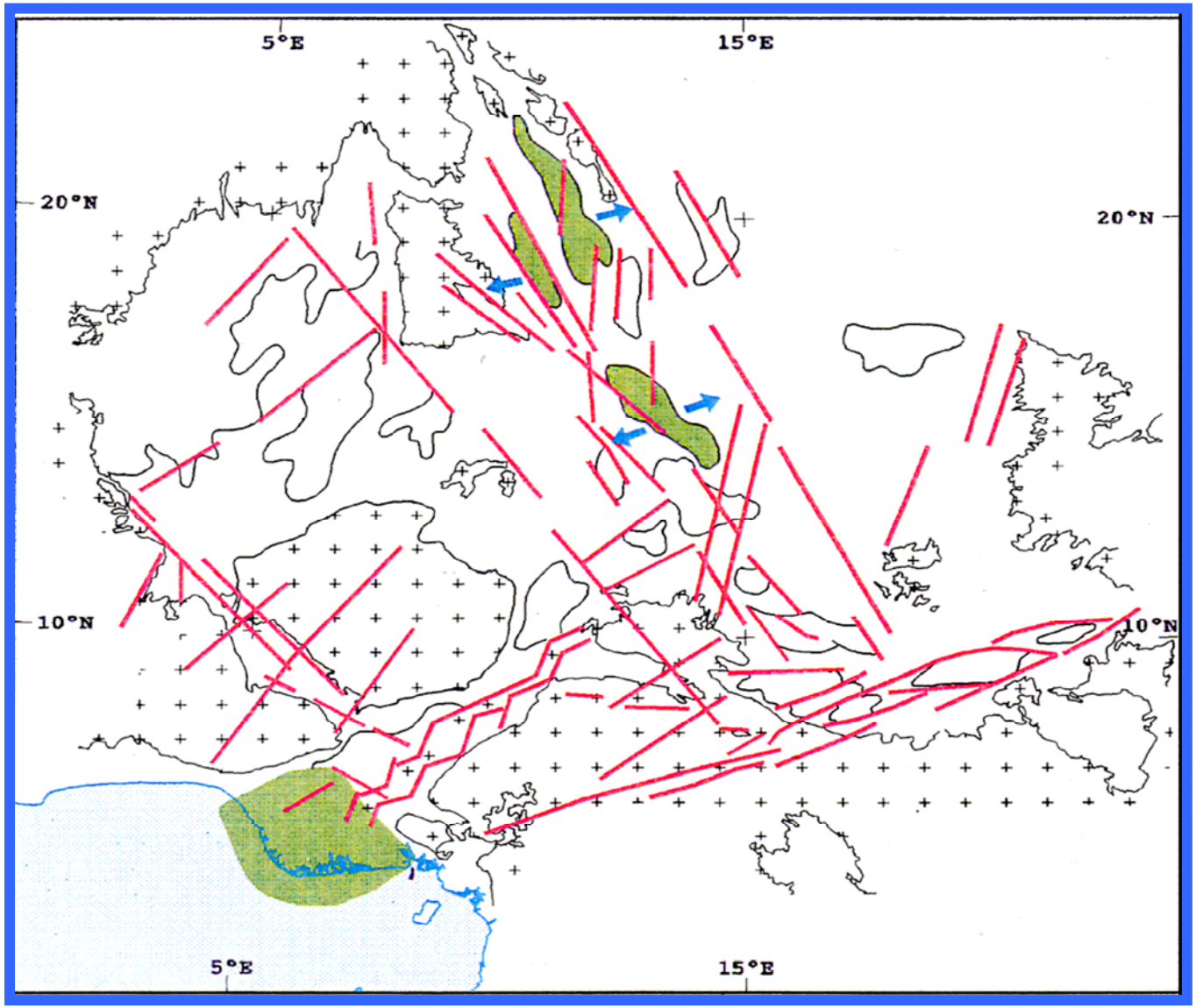


圖4-2-22 此盆地自從開裂後，持續受Benue及Borogo兩大斷裂帶之控制。

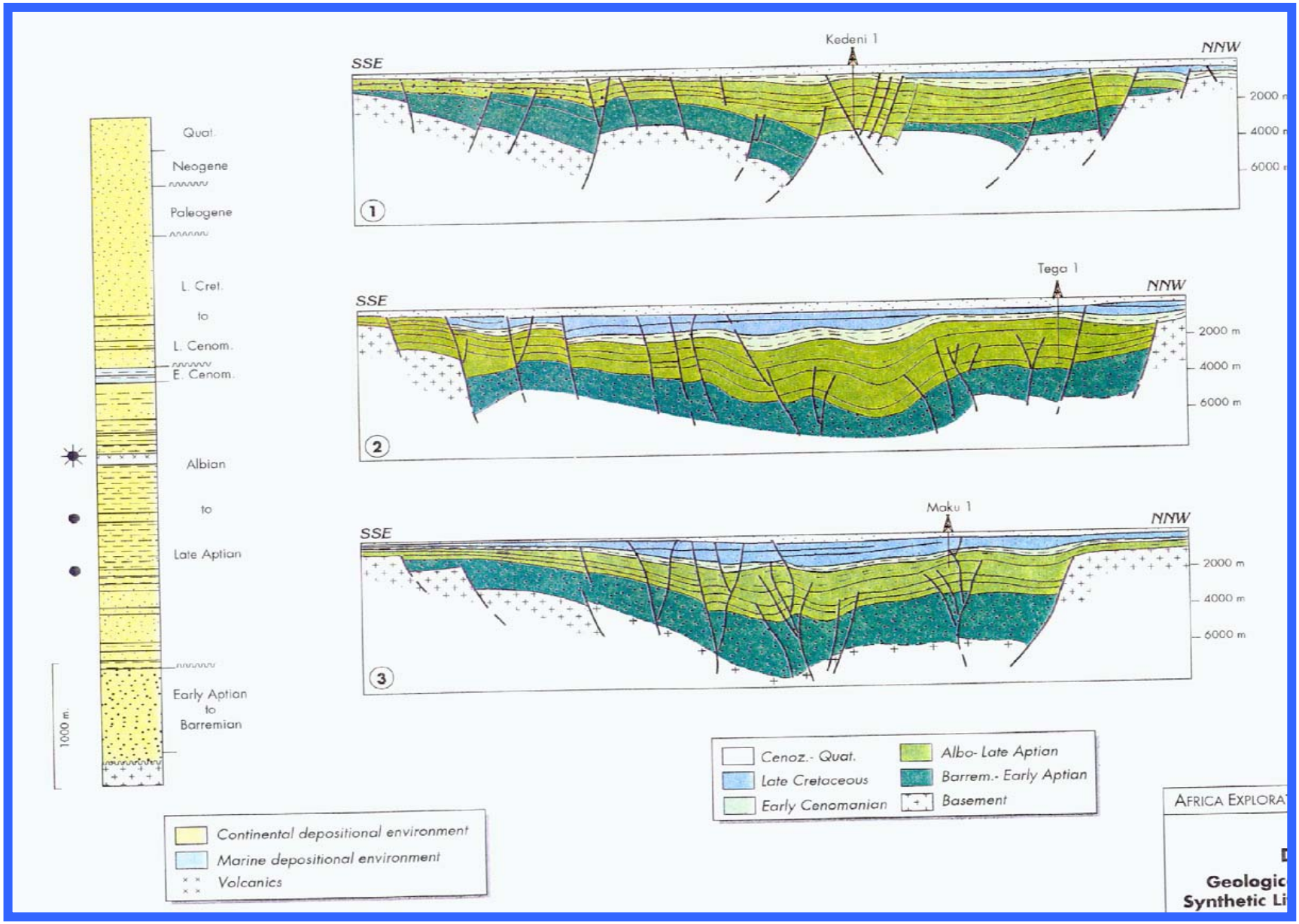


圖4-2-23 Doseo及Salamat盆地爲因張裂而形成之半地塹

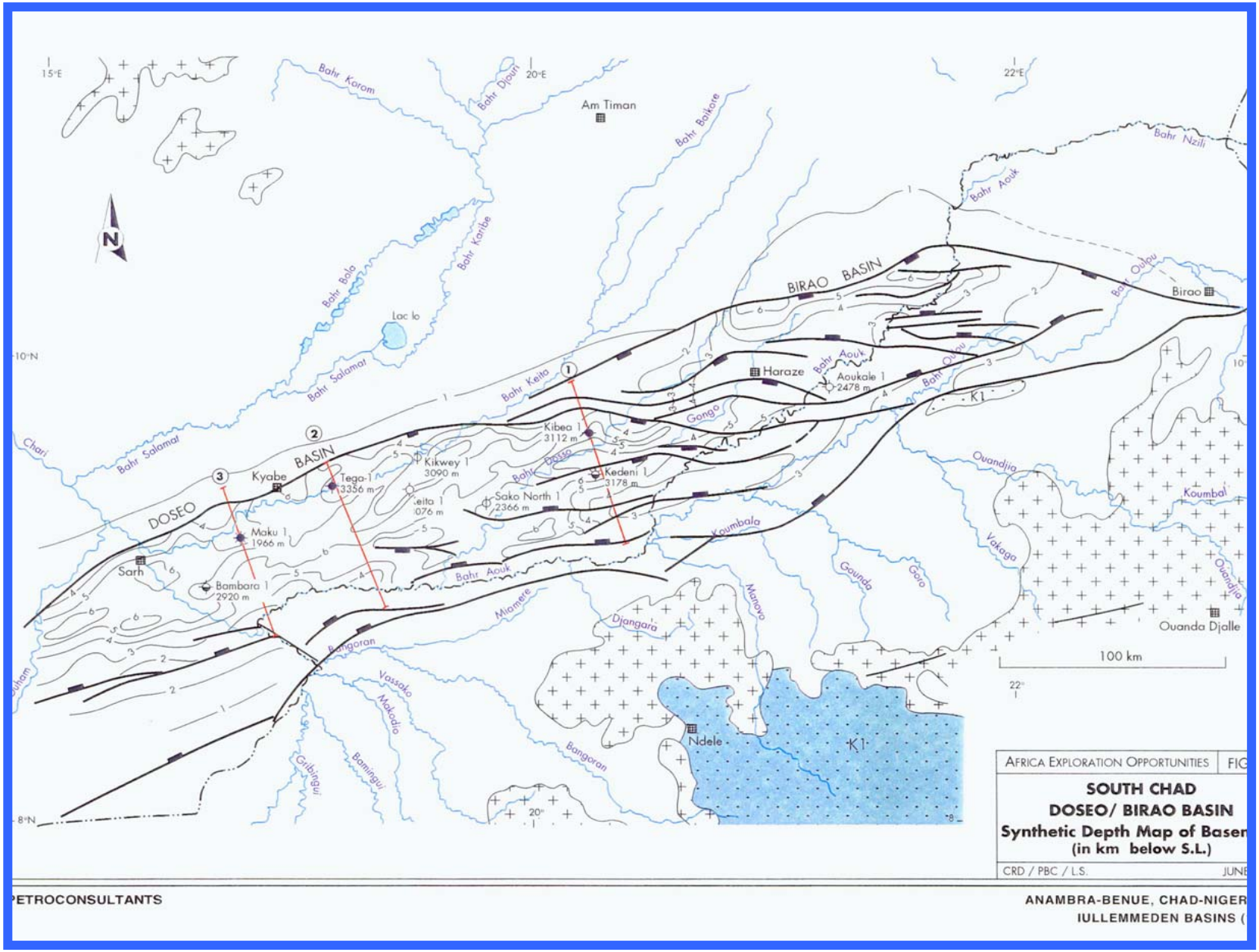


圖4-2-24盆地形成了以N 70° E方向爲主之褶曲及隆起構造群

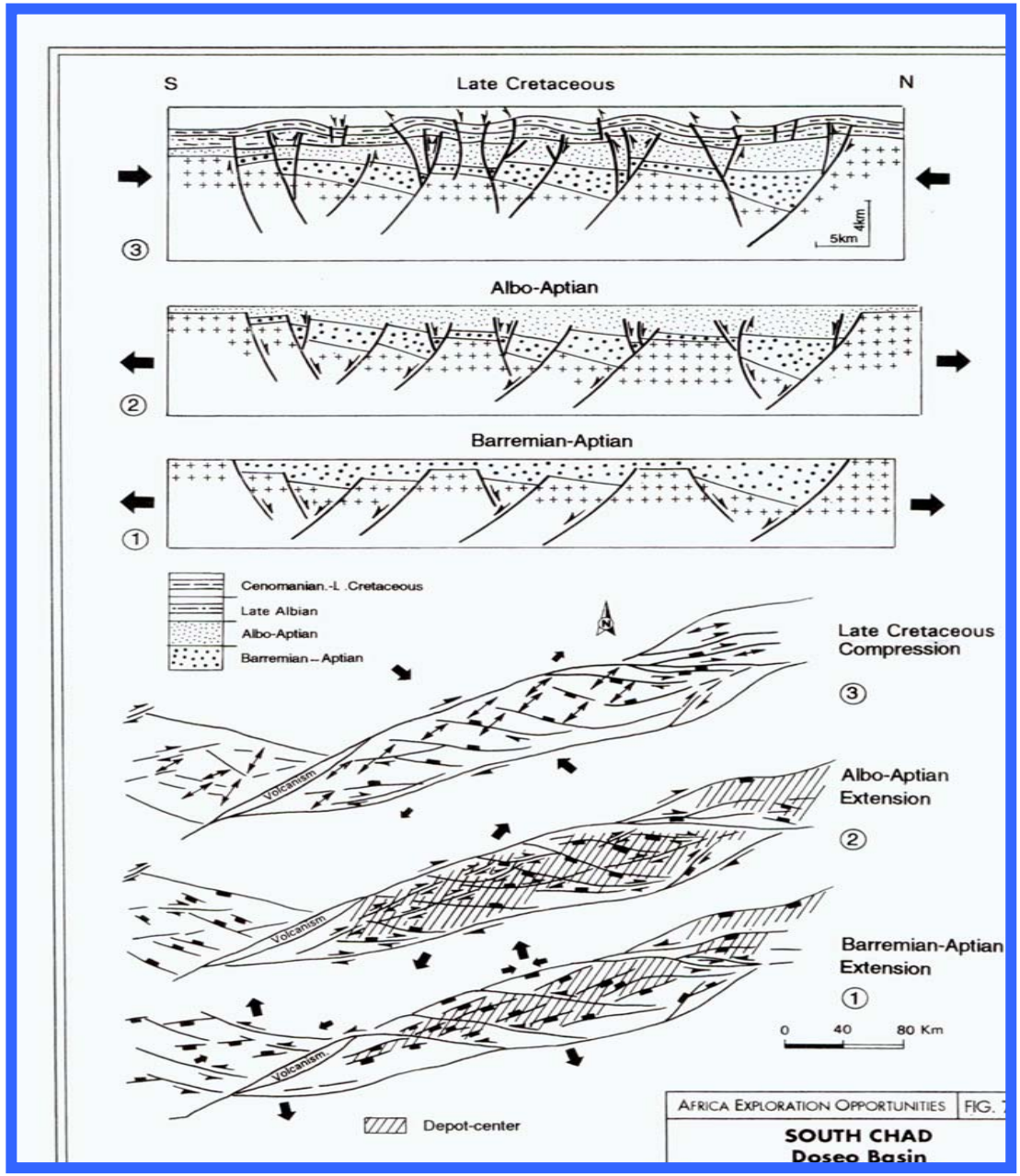


圖4-2-25 Doseo盆地之演化史