TASK D5:

Construct CLR(1) and LALR(1) Parssing table and parse the ababe string following CLR(1) and LALR(1) parsing mechanism (if there are conflicts point themout).

S + ababc | DE A + ale B + bale C+ c D + d (LE)

E + e/E

Augumented Grammar:

S'+.S

S - ab ABC / DE

A → . a 1. E

B → . bA /€

 $C \rightarrow c$

D -> .d /.(E)

E -> · e/·E

Canonical collection of CLR(1): D > .(E),e (Io LAID) OF SLEET ? HAY?

7	+ CLR(1) Parssing Table:															
		a	b	c	d	e	()	\$	S	A	В	C	D	E	
	0	S ₂			Sy		S ₅	g _g :		1			io?	3		
	1								Accept							
	2		Se													
	3			(late		S8	49.75	-62.0	8n					4	7	
	4					88		ad.								
	5					S10		811						= =	9	-
	6	Siz	84	1. 1							(1	5. L				
	7							3	82	43	9 24	3 - 14				
	8			M				9	810		F1-8	400	4 1			
	9		Batt	lanx.				S ₁₃		14.1	oria,	(miles)	100	11		
	10		- the sta	15 P.	Harr			810		3/2	19.8	ned de	ESTUC	1		
	11		SIS	86								14	leto	9		
	12		₹3													
	13					89										
	14			517								16				
	15	S19		84							18					
	16							8,								
	17							87								
	18			Ys						200						
	19			83												

⇒ Parssing String 'ababc':

Stack	InPut	Action: A
\$0	ababc \$	Shifta
\$ Dazat palacing	a babc \$ 10 (1)	& Shift by
\$ 00266 8107 80718	sabat sat	Shift a
0 - 1	misbes (NAIA)	by Seduce 83
\$ 002 b 6 A 11 - 11		Shiftb
\$ 00266A11615E	c\$	seduce 13
\$ 00266A11615A18	c \$ 30	Veduce 15
\$ 092 6 A11 B14	C\$	Shifte
\$ DazbGA11 B14 C17	\$	3 reduce 4
\$ 0 a2 b6 A11 B14 C16	\$	Veduce-
\$051		(3 Accept - (
		3 9 +

		Ь	C	d	e	()	\$	5	A	B	C	D	E
	a	ю		1		S ₅			1				3	
0	S			Sy		25		Accept						
1								Accept						7
2		S ₆			0			811						7
3					S ₈			011						
4		HE			88									9
5					Sio		811							
6	S12	84		100				,		11				
7								1/2						
810							810	810						
9							S13							
810							810	\$10						
11		Su	86								14			
1219		83	63											
13		4			89									
14			S17									16		
15	S19		84							18				
16								81						
17								87						
18			85					1						
219		82	63											-
		*5	3 1		,									
As						ıl		lata	Q	10 0	00	12	19	hav

> LALR(1) Parssing string ababe!

Stack	InP+	Action.
\$0	ababe \$	Shift a
\$002	babc\$	Shiftb
809266	abc\$	Shift a
\$0a2b6a12	be \$	reduce 83
\$0026A11	bc\$	Shift b
\$09266 A116158	c \$	* educe
\$ 09266A11 615 A18	c\$	reduce
\$00266A11814	c \$	Shiftc
\$002 66 A11 B14 C17	\$	reduce
\$ 00266 A11 B14 C16	\$	reduce
\$051		Accept.