

## Exercício 3 de Compiladores

**Nome:** Samuel Evangelista de Aquino Junior

**Matricula:** 397618

1.

a) Tabela Canônica:

$Cc0 = [\text{Inicio} \rightarrow \bullet S, \text{EOF}], [S \rightarrow \bullet Aa, \text{EOF}], [A \rightarrow \bullet BC, a], [A \rightarrow \bullet BCf, a], [B \rightarrow \bullet b, c]$

$Cc1(Cc0, S) = [\text{Inicio} \rightarrow S\bullet, \text{EOF}]$

$Cc2(Cc0, A) = [S \rightarrow A\bullet a, \text{EOF}]$

$Cc3(Cc0, B) = [A \rightarrow B\bullet C, a], [C \rightarrow \bullet c, a], [A \rightarrow B\bullet Cf, a], [C \rightarrow \bullet c, f]$

$Cc4(Cc0, b) = [B \rightarrow b\bullet, c]$

$Cc5(Cc2, a) = [S \rightarrow Aa\bullet, \text{EOF}]$

$Cc6(Cc3, C) = [A \rightarrow BC\bullet, a], [A \rightarrow BC\bullet f, a]$

$Cc7(Cc3, c) = [C \rightarrow c\bullet, a], [C \rightarrow c\bullet, f]$

$Cc8(Cc6, f) = [A \rightarrow BCf\bullet, a]$

b) Tabelas Action e Goto:

ACTION						GOTO			
Estados	EOF	a	b	c	f	S	A	B	C
s0			s4			1	2	3	
s1	ACC								
s2		s5							
s3				s7					6
s4				r5					
s5	r2								
s6		r3			s8				
s7		r6			r6				
s8		r4							

c) Derivação de bca, e bcfa

<b>bca</b>		<b>bcfa</b>	
\$0	bca	\$0	bcfa
\$0b4	ca	\$0b4	cfa
\$0B3	ca	\$0B3	cfa
\$0B3c7	a	\$0B3c7	fa
\$0B3C6	a	\$0B3C6	fa
\$0A2	a	\$0B3C6f8	a
\$0A2a5	EOF	\$0A2a5	EOF
\$0S1	EOF	\$0S1	EOF
ACC		ACC	