CFG Key#1

- L1={$0^i\ 1^j\ 2^k$ | i=j or j=k, where i,j,k ≥0}
- G = ({S,A,B,C,D}, {0,1,2}, R, S), where R is
  S → AC | DB
  A → 0 A 1 | λ
  B → 1 B 2 | λ
  C → C2| λ
  D → 0D| λ

CFG Key#2

- L2={$0^i\ 1^j\ 2^k$ | i=j or i=k, where i,j,k ≥1}
- G = ({S,A,B,C,D}, {0,1,2}, R, S), where R is
  S → AC | DB
  A → 0 A 1 | 01
  B → 1 B 2 | 12
  C → C2| 2
  D → 0D| 0

CFG Key#3

- L3 = { w | w $\in$ {a,b}* and w is a palindrome }
- G = ({S}, {a,b}, R, S), where R is
  S $\rightarrow$ aSa | bSb | a | b | λ

CFG Key#4

- $L4 = \{a^n b^m c^i \mid 0 \leq n+m \leq i \}$
- $G = (\{S,T\}, \{a,b,c\}, R, S)$, where R is
  $S \rightarrow aSc \mid T$
  $T \rightarrow bTc \mid Tc \mid \lambda$

CFG Key#15

- L5 = { set of arithmetic expressions involving +, -, *, /, ^, (,), v }
- G = ({E,T,P,F}, {+, -, *, /, ^, (,), v}, R, S), where R is
  E → E+T | E-T | T
  T → T*P | T/P | T
  P → F^P | F
  F → (E) | v