

제 16강 1/6 (木) ~~useful~~ useful.

Chap 9.

Properties of Context-Free Languages.

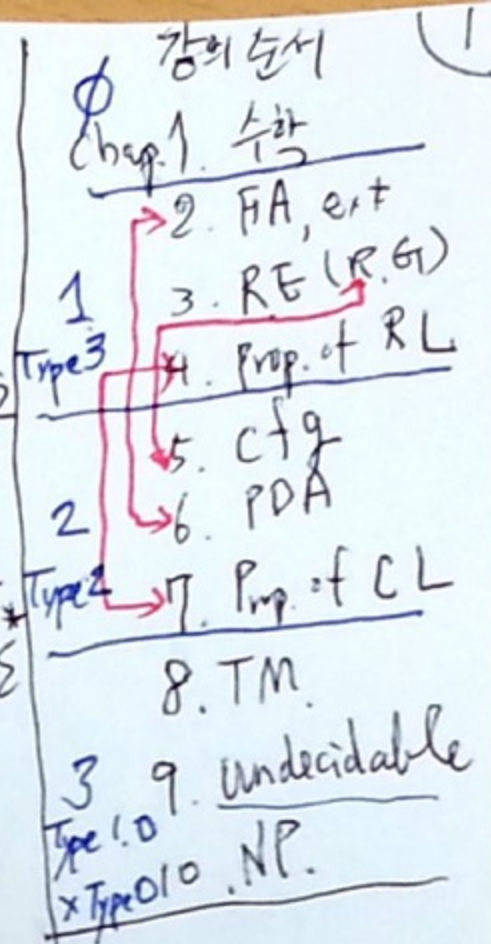
7.1 Normal Form of CFG.

CFG. $A \rightarrow \alpha, A \in N, \alpha \in (N \cup \Sigma)^*$

Chomsky Normal Form $\epsilon \in L(G)$

$A \rightarrow BC$ or $A \rightarrow a$ except $S \rightarrow \epsilon$
 where $A, B, C \in N, a \in \Sigma$.

R.G.
 Normal form $a, b \in \Sigma$
 i) $A \rightarrow aB$ or bA
 ii) $A \rightarrow Ba$ or bA
 General Form $x, y \in \Sigma^*$
 $A \rightarrow xB$ or y
 $A \rightarrow Bx$ or y



7.1.1 Eliminating useless symbols.

$X \in N \cup \Sigma$ is useful $S \Rightarrow^* \alpha X \beta \Rightarrow^* w$

$w \in \Sigma^*$
 $\alpha, \beta \in (N \cup \Sigma)^*$

- i) terminating
- ii) generating.