Lecture on July 24th, 2019
Alternative Way to define Poisson Process

1 Alternative Way to Define a Poisson Process (See 5.2)

- 4 postulates to define $N((a, b])$ and a theorem to claim that $N((0, t])$ defined in this way is a poisson process as defined in previous lecture.

- When parameter t refers to "time", usually it's called "Poisson Process". When t refers to "space", usually it's called "Poisson Point Process".

2 Distributions Associated with Poisson Process (See Chap 5.3)

- Waiting time $W_n \sim \text{Gamma}(n, \lambda)$

- Sojourn time S_n's are independent and follows $\text{Exp}(\lambda)$.