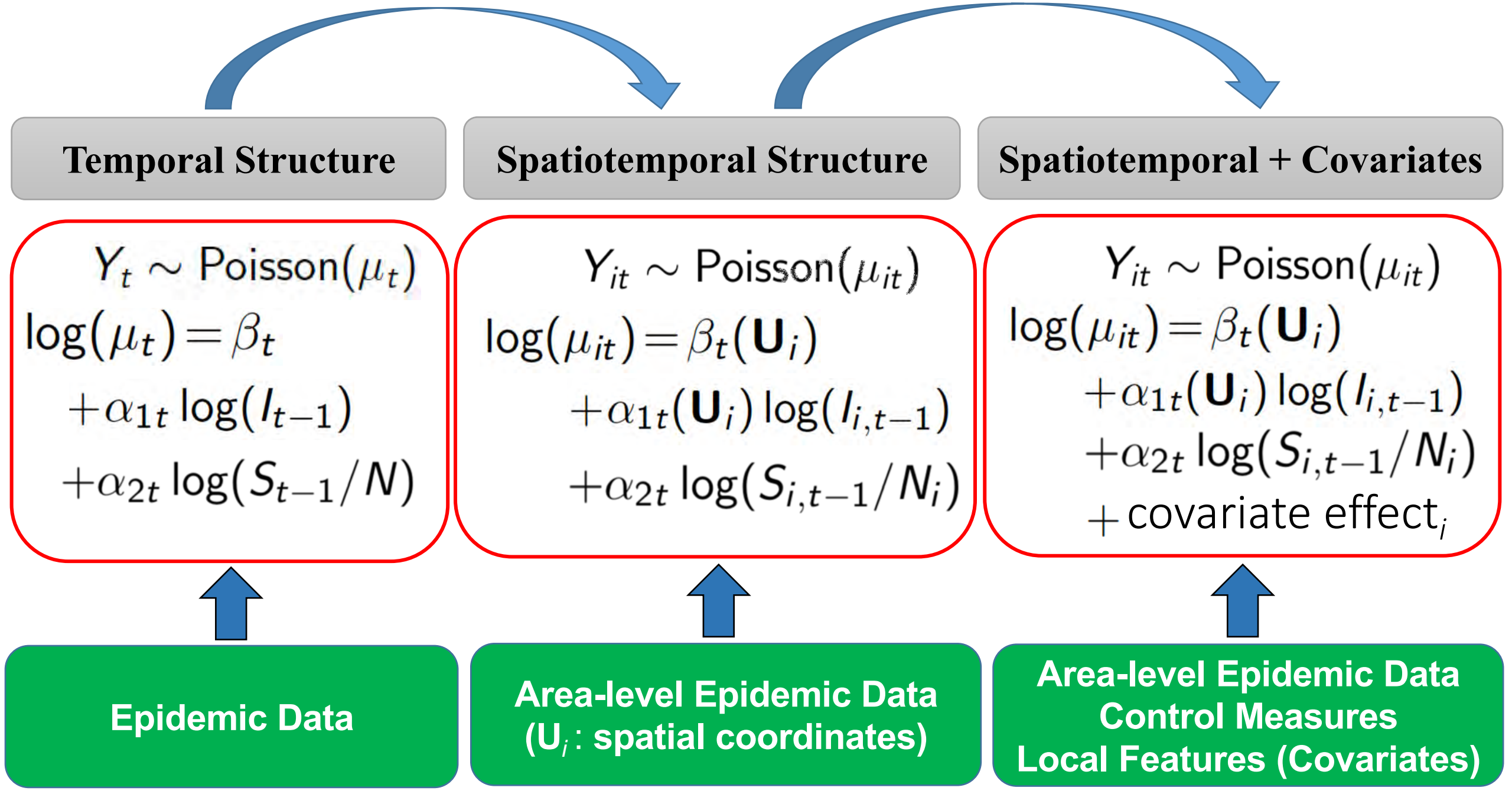
Temporal Structure
Spatiotemporal Structure
Spatiotemporal + Covariates
$Y_t \sim \text{Poisson}(\mu_t)$
$\log(\mu_t) = \beta_t + \alpha_{1t} \log(I_{t-1}) + \alpha_{2t} \log(S_{t-1}/N)$
$Y_{it} \sim \text{Poisson}(\mu_{it})$
$\log(\mu_{it}) = \beta_t(\mathbf{U}_i) + \alpha_{1t}(\mathbf{U}_i) \log(I_{i,t-1}) + \alpha_{2t} \log(S_{i,t-1}/N_i)$
$Y_{it} \sim \text{Poisson}(\mu_{it})$
$\log(\mu_{it}) = \beta_t(\mathbf{U}_i) + \alpha_{1t}(\mathbf{U}_i) \log(I_{i,t-1}) + \alpha_{2t} \log(S_{i,t-1}/N_i) + \text{covariate effect}_i$
Epidemic Data
Area-level Epidemic Data
(U_i : spatial coordinates)
Area-level Epidemic Data
Control Measures
Local Features (Covariates)