

## **Hazard Model**

$$\lambda(t) = \exp(\theta_0 + \mathbf{v}^\top \mathbf{s}(t) + \mathbf{a}^\top \mathbf{h}(t))$$

## **Dual Objective**

$$\max_{\theta} \mathcal{L}(\theta) = l(\mathbf{s}; \mathbf{r}) - \beta_E E - \beta_C C(\theta)$$

$$C(\theta) = \|\theta\|_1 + \|\theta_{quad}\|_1$$