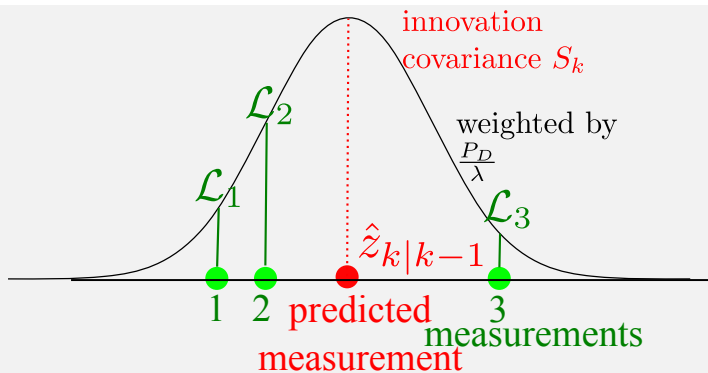


$$\beta_i(k) = p(A_i(k)|Z_k)$$

$$= \begin{cases} \frac{\mathcal{L}_i}{1 - P_D P_G + \sum_{j=1}^{M_k} \mathcal{L}_i} & j = 1 \dots M_k \\ \frac{1 - P_D P_G}{1 - P_D P_G + \sum_{j=1}^{M_k} \mathcal{L}_i} & j = 0 \end{cases}$$



$$\mathcal{L}_i = \frac{\mathcal{N}(z_{ik}; \hat{z}_{k|k-1}, S_k) P_D}{\lambda}$$

$$\nu_k = \sum_{i=1}^{M_k} \beta_i(k) \nu_i(k)$$