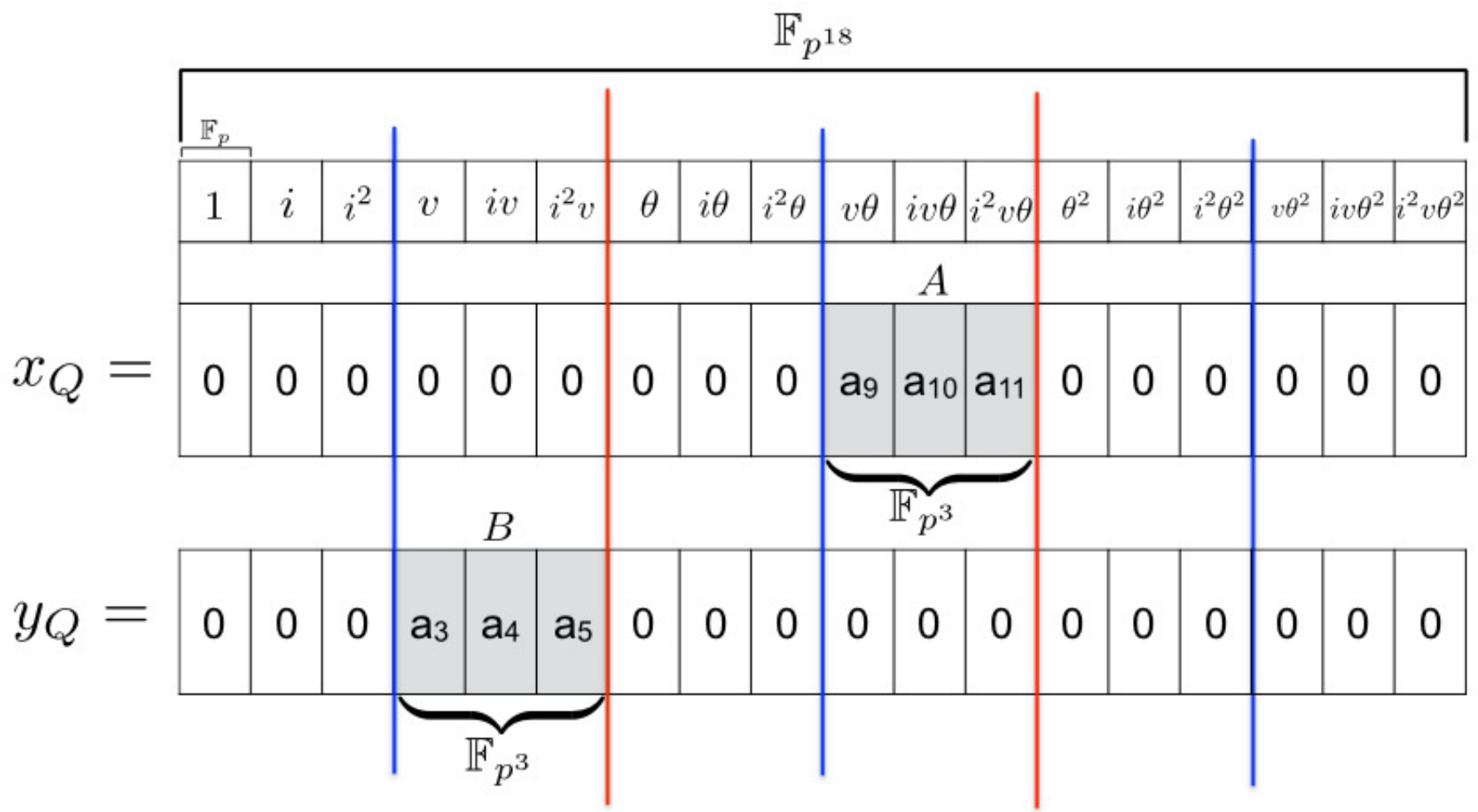

$$a_j \in \mathbb{F}_p, \quad \text{where} \quad a_j = (0, 1, \cdots, 17)$$

$$Q = (x_Q, y_Q) = (Av\theta, Bv) \in \mathbb{F}_{p^{18}}$$

$$Q' = (x'_Q, y'_Q) = (Ai, Bi) \in \mathbb{F}_{p^3}$$