

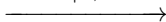
Initiator

 psk_{IR}

Responder

 psk_{IR}

$$m_1 = (\vec{SA}, g^x, n_I, ID_I)$$

 $cki_I | 0, m_1$ 

$$k \leftarrow \text{PRF}_{psk_{IR}}(n_I, n_R)$$

derive k_0, k_1, k_2 $prf_R \leftarrow$

$$\text{PRF}_k(g^y, g^x, cki_R, cki_I, SA, ID_I)$$

 $m_2 =$

$$(SA, g^y, n_R, ID_R, prf_R)$$

 $cki_I | cki_R, m_2$ 

$$k \leftarrow \text{PRF}_{psk_{IR}}(n_I, n_R)$$

derive k_0, k_1, k_2 $prf_I \leftarrow$

$$\text{PRF}_k(g^x, g^y, cki_I, cki_R, SA, ID_I)$$

 $m_3 = (prf_I)$ $cki_I | cki_R, m_3$ 