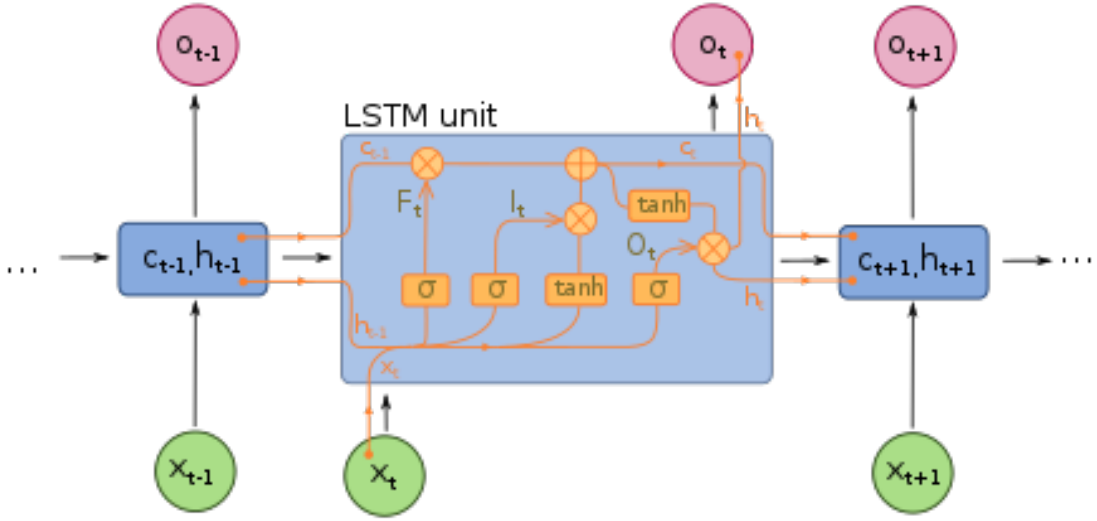
Deep Learning par la Pratique

Long-Short Term Memory

Long-Short Term Memory



- $F_t = \sigma(W_F * x_t + U_F * h_{t-1} + b_F)$ (forget gate)
- $I_t = \sigma(W_I * x_t + U_I * h_{t-1} + b_I)$ (input gate)
- $O_t = \sigma(W_O * x_t + U_O * h_{t-1} + b_O)$ (output gate)
- $c_t = F_t \circ c_{t-1} + I_t \circ \tanh(W_c * x_t + U_c * h_{t-1} + b_c)$
- $h_t = O_t \circ \tanh(c_t)$
- $o_t = f(W_o * h_t + b_o)$

Long-Short Term Memory

vanishing gradient “résolu” (ou presque)