HW#1

Due: September 8, 2009

Calculate the water fractional flow (f_w) as a function of water saturation (S_w) and plot f_w versus S_w for the following fluid system:

$k_{rw}^* = 0.1$
$k_{row}^* = 0.7$
$nw = 1.5$
$no = 2.5$
$S_{orw} = 0.30$
$S_{wr} = 0.25$
$\mu_w = 0.6\ cp$
$\mu_o = 2.4\ cp$