

Solution of the Wave Equation

$$u_{tt} = c^2 u_{xx} \text{ with } c = 1$$

$u(x, t)$

$$u(0, t) = u(10, t) = 0$$

$$u(x, 0) = x(10 - x)e^{-8(x-6)^2}/40$$

$$u_t(x, 0) = 0$$

