Notation	Default value (unit)	Definition
a	$0.5\,\text{m}^{-1}$	Unsaturated exponent in Gardner's model for soil characteristics
(b, B)	$(10\,\text{m}, 20\,\text{m})$	Initial thicknesses of unsaturated and saturated zones, respectively
C	None	Specific moisture capacity
d	$50\,\text{m}$	Shortest distance between the edge of recharge area and observation point
h	None	Hydraulic head in saturated zone
I	$0.1\,\text{m}\,\text{d}^{-1}$	Recharge rate
k_r	None	Relative hydraulic conductivity
(K_x, K_y, K_z)	$(10\,\text{m}\,\text{d}^{-1}, 10\,\text{m}\,\text{d}^{-1}, 1\,\text{m}\,\text{d}^{-1})$	Saturated hydraulic conductivity in x, y, and z directions, respectively
(l, w)	$50\,\text{m}$	Half of width of recharge area in x and y directions, respectively
(S_s, S_y)	$(10^{-5}\,\text{m}^{-1}, 0.2)$	Specific storage and specific yield, respectively
t	None	Time
(x, y, z)	None	Cartesian coordinates
ϕ	None	Hydraulic head in unsaturated zone
$(\bar{b}, \bar{l}, \overline{w})$	$(0.5, 1, 1)$	$(b/B, l/d, w/d)$
$(\bar{h}, \bar{\phi}, \bar{t})$	None	$(h/B, \phi/B, K_x t/(S_\text{s} d^2))$
$(\bar{x}, \bar{y}, \bar{z})$	None	$(x/d, y/d, z/B)$
$(\alpha, \kappa_y, \kappa_z)$	$(10, 1, 0.625)$	$(aB, K_y/K_x, K_z d^2/(K_x B^2))$
(ξ, σ)	$(0.1, 1000)$	$(I/K_z, S_y/(S_\text{s} B))$