Solution with $N = 1430$

Ψ at $t = 0.000$

C at $t = 0.000$

Ψ at $t = 0.015$

C at $t = 0.015$

Ψ at $t = 0.050$

C at $t = 0.050$

Ψ at $t = 0.100$

C at $t = 0.100$

Ψ at $t = 1.239$

C at $t = 1.239$