

Input Parameter	Source
Soil Layer	Calibrative
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Depth	Calibrative
Thickness	Calibrative; ERS Lysimeter
Bulk Density	Hynicka et al., 2016
Solid Density	N/A
Stoniness	Hynicka et al., 2016
Root Fraction	Harrington et al., 2017
pKGibb	Calibrative; Anderson et al., 2002
pkAl precip	Al precipitation constant (unused in current version)
pCO2	Original
Area	Calibrative; Sverdrup and Warfvinge 1993
Wilting Point	NCSS: Enter Site Details?
Field Capacity	NCSS
Saturation	Assumed
CEC	Hynicka et al., 2016
KH Cation	Calculated using ERS Lysimeter and Hynicka et al., 2016: Partial Calibration
Percent Mineral Area	Calibrative: Anderson et al., 2002, NCSS, Franklin and Williams 1971
Uptake Fraction Per Layer (all nutrients)	Poszwa et al., 2002
Nitrification (ks, knit)	Perakis and Sinkhorn, 2011; Calibrative
Microbial Turnover	Original
Organic Matter Parameters	Perakis and Sinkhorn, 2011
Soil Solution Initial (Multiple Species)	ERS Lysimeter
Soil Adsorbed Anions Initial	Needs to be checked; Harward et al., 1962 for Adsorption Dynamics; Chappell and Miller, 1988; Johnson and Lindburg 1992
CEC Initial	Hynicka et al., 2016