

<b>Symbol</b>	<b>Unit</b>	<b>Description</b>	<b>Collection</b>	<b>Source</b>
$T_{air}$	°C	Air temperature	Measured	AWS1
$K_{\downarrow}$	W m <sup>-2</sup>	Incoming shortwave radiation	Measured	AWS1
$RH$	%	Relative humidity	Measured	AWS1
$L_{ws}$	W m <sup>-2</sup>	Incoming longwave radiation	Measured	AWS1
$u$	m s <sup>-1</sup>	Wind speed	Measured	AWS1
$W$	m	Stream width	Measured	24 transects
$d_{ch}$	m	Stream depth	Measured	24 transects
$Q$	m <sup>3</sup> s <sup>-1</sup>	Stream discharge	Measured	GS1 – GS4
$T_i$	°C	Temperatures at the upstream boundary	Measured	T2
$T_{bed}$	°C	Streambed temperature	Measured	P1
$T_{L-w}$	°C	Western tributary temperature	Measured	T12
$y_p$	mm/15 min	Precipitation	Measured	AWS1
$\Delta t$	min	Time step	Chosen	1 minute
$\Delta d$	m	Distance step	Chosen	1 meter
$k_{sed}$	-	Thermal properties of the sediment	Chosen	Gravel
$SF$	-	Shading factor	Estimated	0.5 – 0.9
$VTS$	-	View to sky coefficient	Estimated	0.4 – 0.6
$T_{L-gw}$	°C	Groundwater temperature	Estimated	5°C