



$$VIMON_INP = \left(1 \cdot 10^{-3} \frac{\text{A}}{\text{V}} \cdot R_{sense1} \cdot I_{in} + 20\mu\text{A} \right) \cdot RIMON_INP \quad \text{From datasheet}$$

Include injection current variable, I_{inject}

$$VIMON_INP = \left[\left(\frac{\text{A}}{1000\text{V}} \cdot R_{sense1} \cdot I_{in} + 20\mu\text{A} \right) + I_{inject} \right] \cdot RIMON_INP$$

Solve for I_{inject}

$$I_{inject} = \frac{VIMON_INP - RIMON_INP \left(20\mu\text{A} + I_{in} \cdot R_{sense1} \cdot \frac{\text{A}}{1000\text{V}} \right)}{RIMON_INP}$$

Example:

$$\text{VIMON_INP} := 1.209\text{V} \quad \text{RIMON_INP} := 12.4\text{k}\Omega \quad \text{Rsense1} := 4\text{m}\Omega$$

$$\text{Inject}(I_{in}) := \frac{\text{VIMON_INP} - \text{RIMON_INP} \cdot \left(20 \cdot \mu\text{A} + I_{in} \cdot \text{Rsense1} \cdot \frac{\text{A}}{1000\text{V}} \right)}{\text{RIMON_INP}}$$

