

 $\mathtt{P} = \left[ \begin{array}{cccc} - & \mathbf{h}_1 & - \\ - & \mathbf{h}_2 & - \\ - & \mathbf{h}_3 & - \\ - & \mathbf{h}_4 & - \\ - & \mathbf{h}_5 & - \\ - & \mathbf{h}_6 & - \end{array} \right]$ 

 $\mathbf{v}_2 = \mathbf{\sigma}\left(\mathsf{P}\mathbf{v}_1\right)$ 

Generic non-linearity

Algebraically

The bias is incorporated within the Homogeneous notation for simplicity