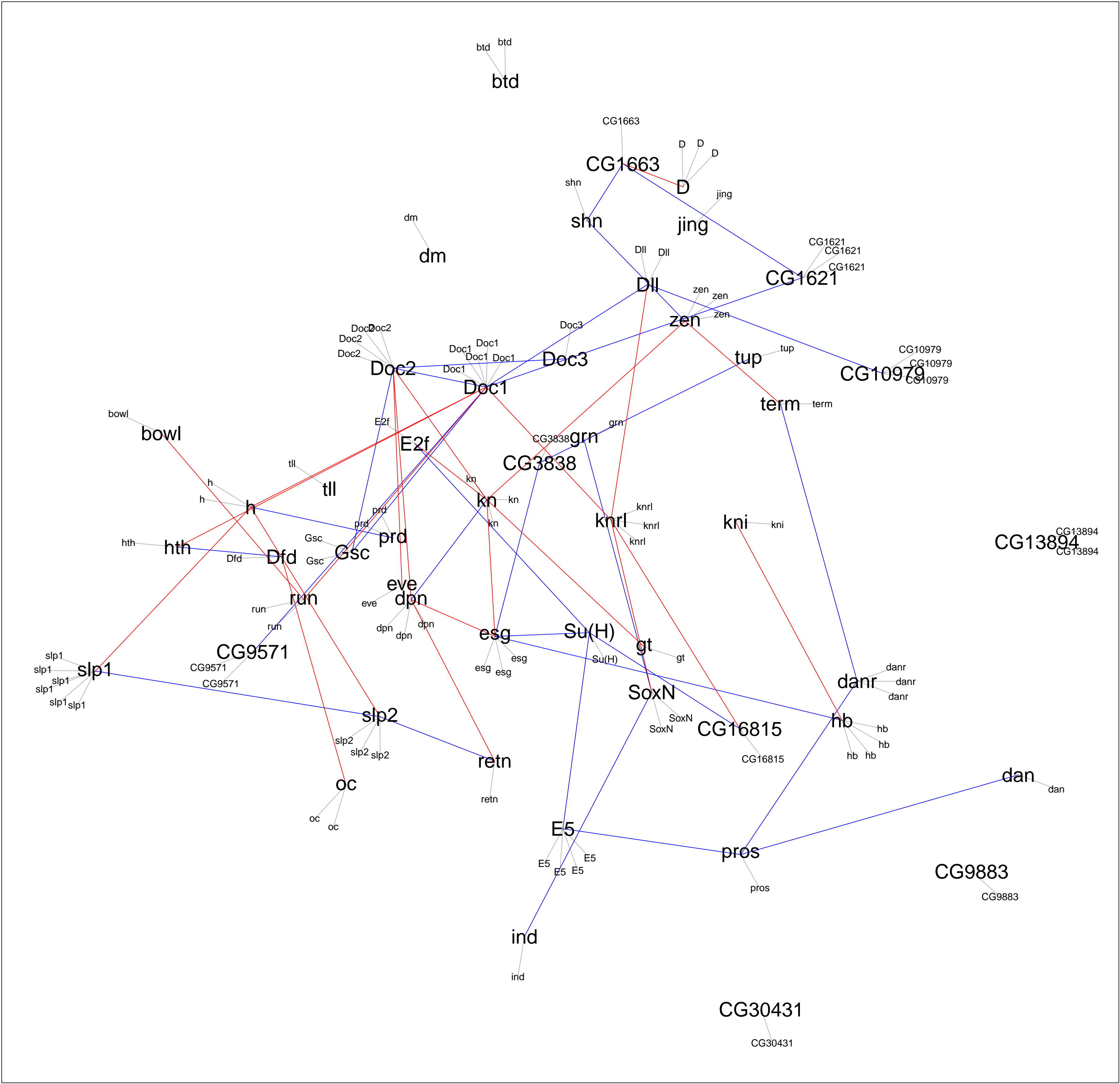




Lower [4%,4.5%] correlation = [-0.51,-0.49]; Upper [4.5%,4%] correlation = [0.69,0.71]

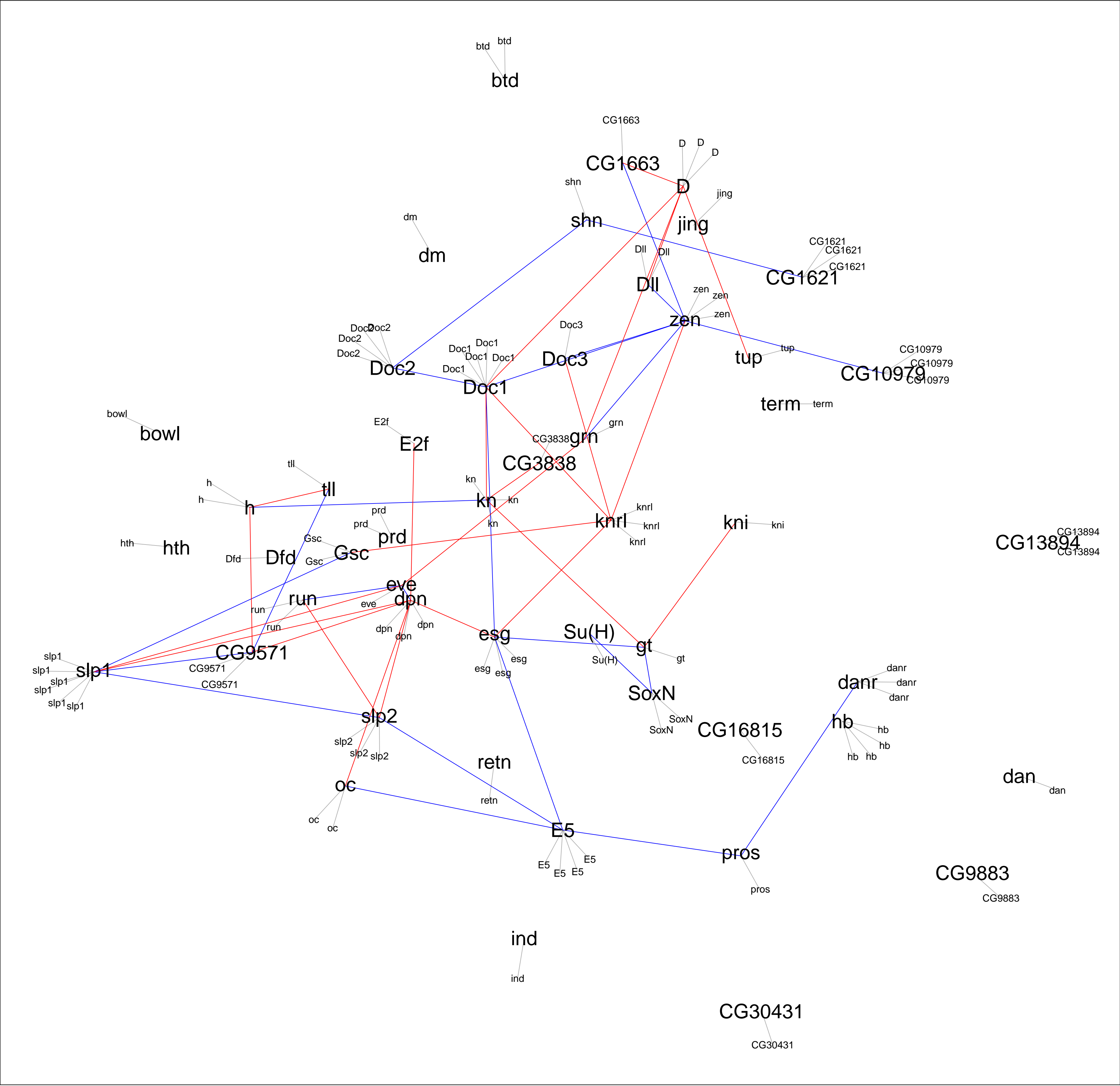




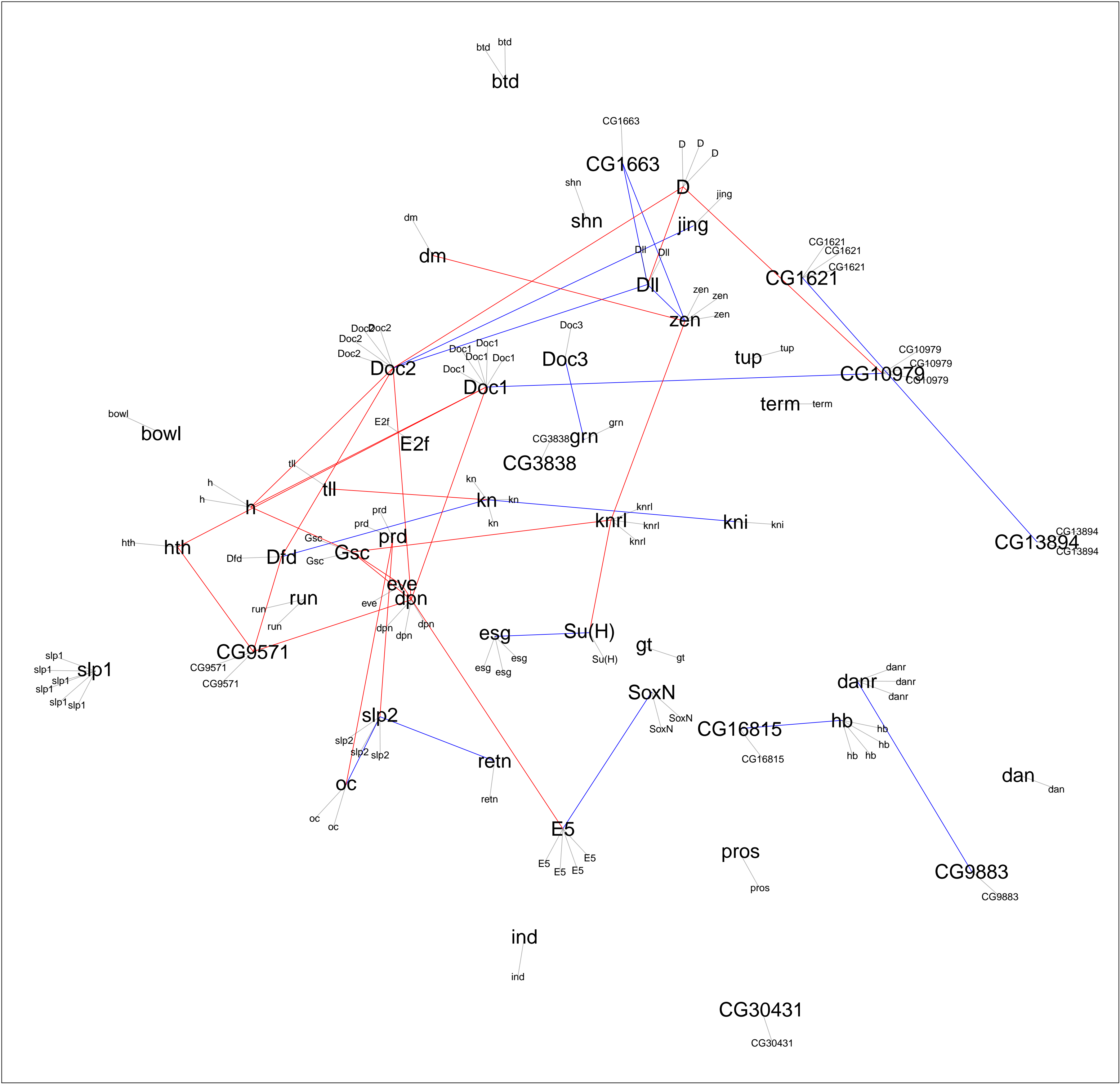




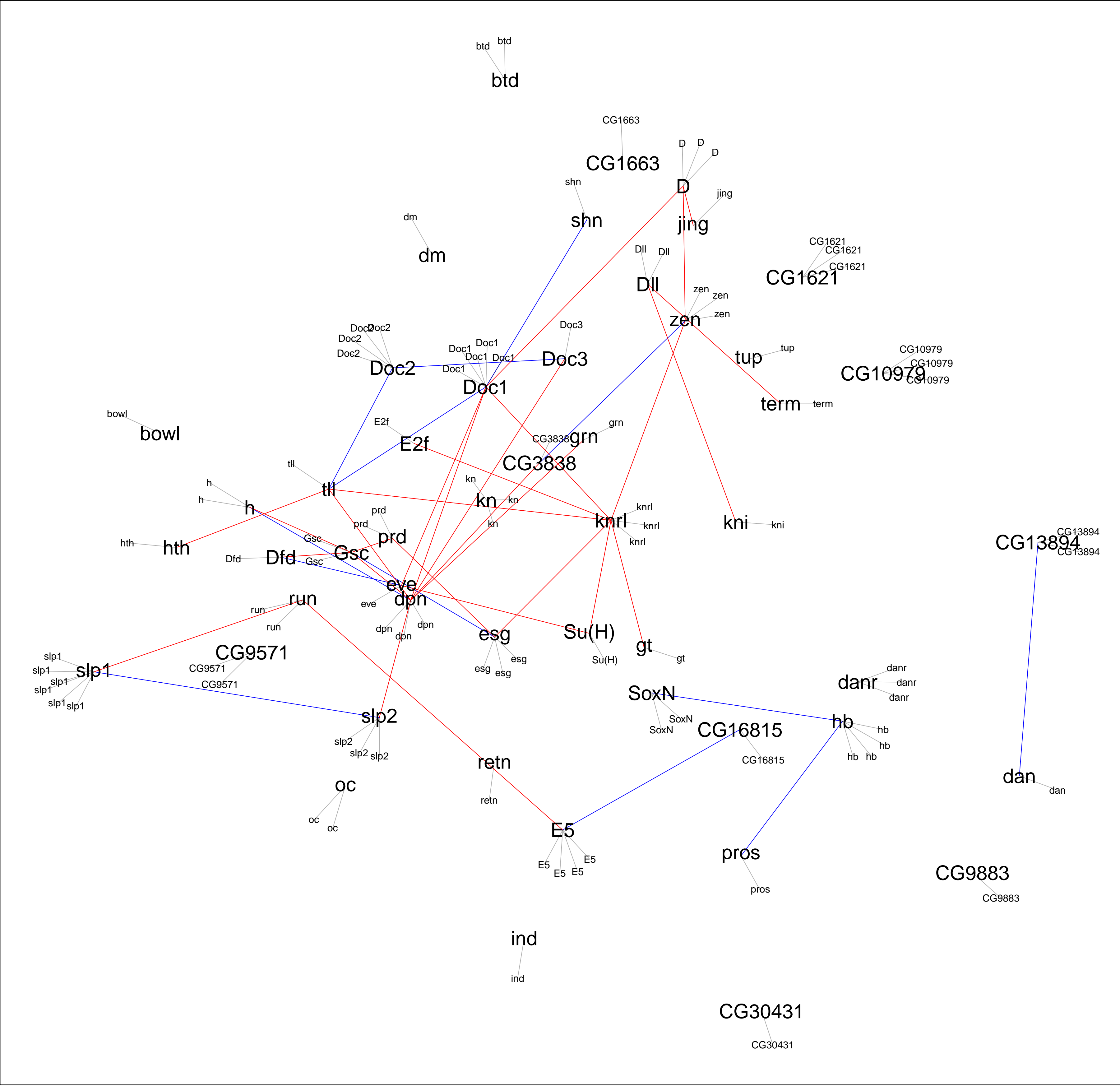
Lower [2.5%,3%] correlation = [-0.56,-0.54]; Upper [3%,2.5%] correlation = [0.74,0.75]



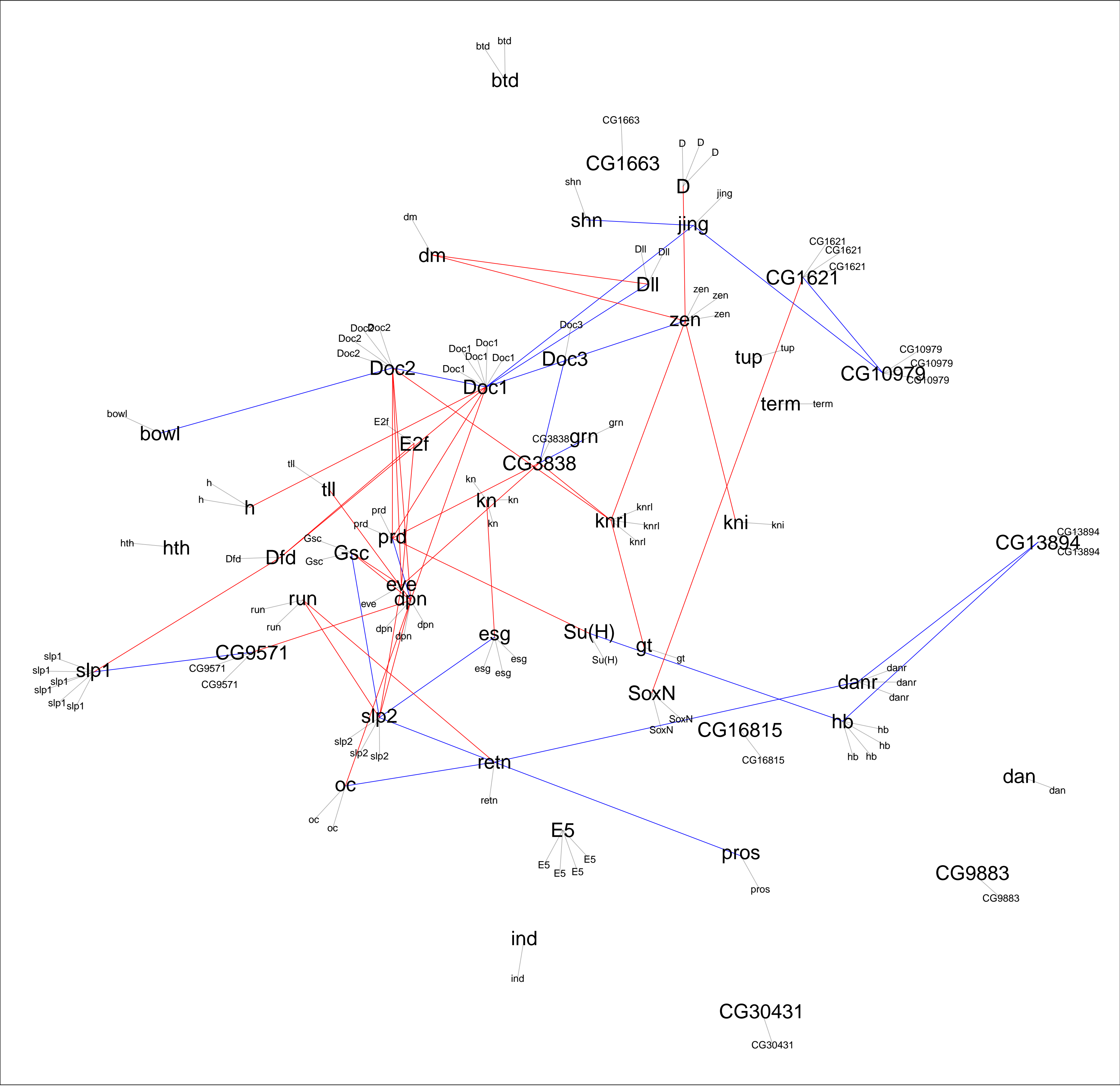
Lower [2%,2.5%] correlation = [-0.59,-0.56]; Upper [2.5%,2%] correlation = [0.75,0.77]



Lower [1.5%,2%] correlation = [-0.61,-0.59]; Upper [2%,1.5%] correlation = [0.77,0.79]



Lower [1%,1.5%] correlation = [-0.65,-0.61]; Upper [1.5%,1%] correlation = [0.79,0.82]





The diagram illustrates a complex gene regulatory network, likely in the context of Drosophila embryonic development. It features numerous genes and transcription factors, many of which are associated with specific chromosomal locations (CG numbers). The network is organized into two main clusters, each highlighted by a different color: red lines for the upper cluster and blue lines for the lower cluster.

**Key Genes and Transcription Factors:**

- Red Cluster (Top):** Includes genes like *btd*, *dm*, *shn*, *D*, *jing*, *Dll*, *zen*, *tup*, *term*, *CG1663*, *CG1621*, *CG10979*, and *CG13894*. These genes are interconnected by red lines, suggesting a regulatory network.
- Blue Cluster (Bottom):** Includes genes like *bowl*, *hth*, *h*, *hth*, *Dfd*, *Gsc*, *run*, *slp1*, *CG9571*, *slp2*, *oc*, *retn*, *E5*, *pros*, *danr*, *hb*, *dan*, *CG9883*, *CG30431*, and *CG16815*. These genes are interconnected by blue lines, suggesting a regulatory network.

**Regulatory Interactions:**

- Red Lines:** Represent regulatory interactions within the top cluster. For example, *shn* regulates *D*, *jing*, and *Dll*. *D* regulates *jing*, *Dll*, and *zen*. *Dll* regulates *zen*. *zen* regulates *tup* and *term*. *tup* regulates *term*. *CG1663* regulates *shn*. *CG1621* regulates *zen*. *CG10979* regulates *term*. *CG13894* regulates *kn*.
- Blue Lines:** Represent regulatory interactions within the bottom cluster. For example, *hth* regulates *h*. *h* regulates *hth*. *Dfd* regulates *Gsc*. *Gsc* regulates *run*. *run* regulates *slp1*. *slp1* regulates *CG9571*. *CG9571* regulates *slp2*. *slp2* regulates *oc*. *oc* regulates *retn*. *retn* regulates *E5*. *E5* regulates *pros*. *pros* regulates *danr*. *danr* regulates *hb*. *hb* regulates *dan*. *CG9883* regulates *CG30431*. *CG16815* regulates *SoxN*. *SoxN* regulates *gt*. *gt* regulates *kn*. *kn* regulates *knrl*. *knrl* regulates *kni*. *kni* regulates *kn*.

**Chromosomal Locations (CG numbers):**

- CG1663*: Located near *shn*.
- CG1621*: Located near *zen*.
- CG10979*: Located near *term*.
- CG13894*: Located near *kn*.
- CG9571*: Located near *slp1* and *slp2*.
- CG9883*: Located near *CG30431*.
- CG30431*: Located near *pros*.
- CG16815*: Located near *SoxN*.