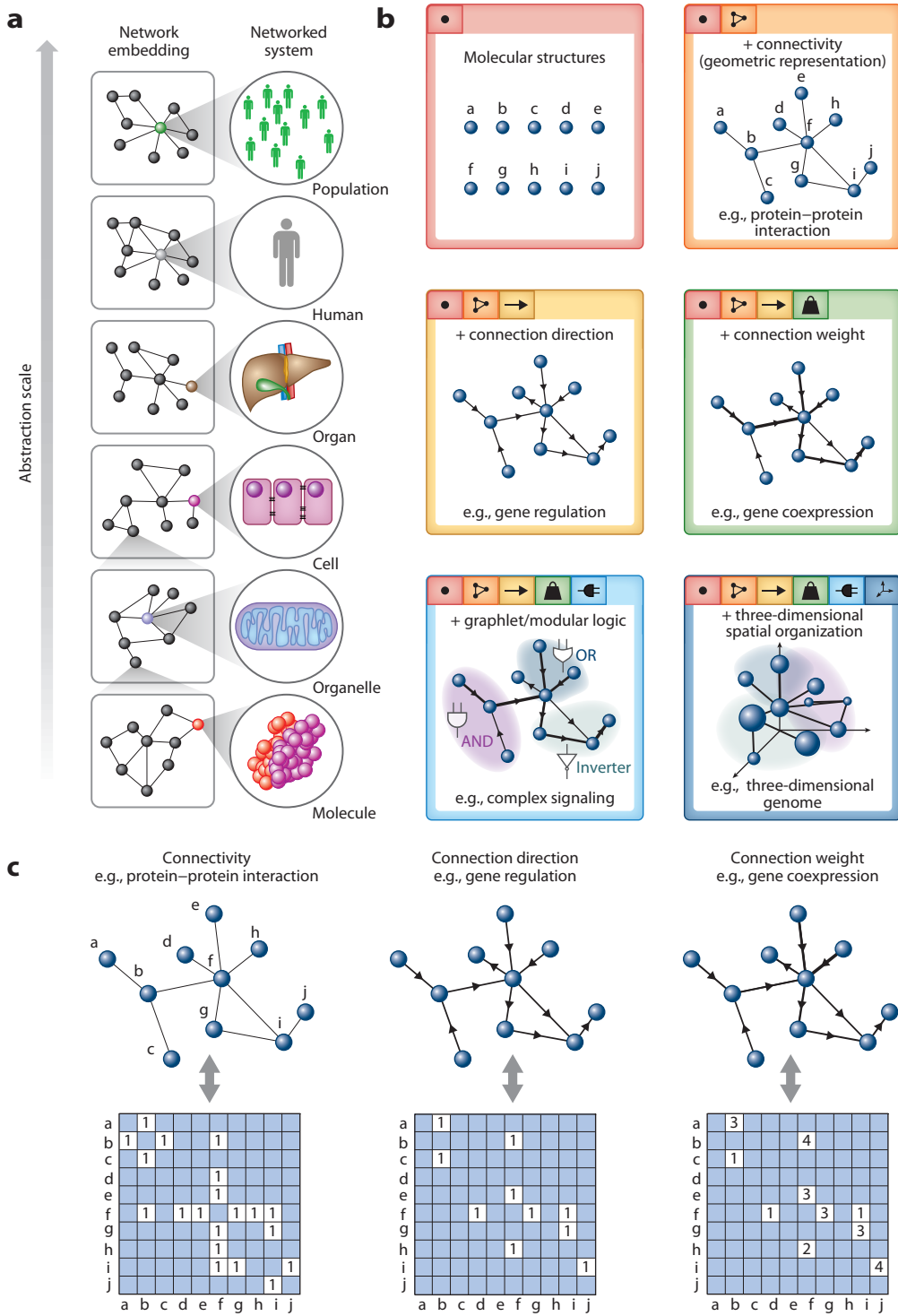
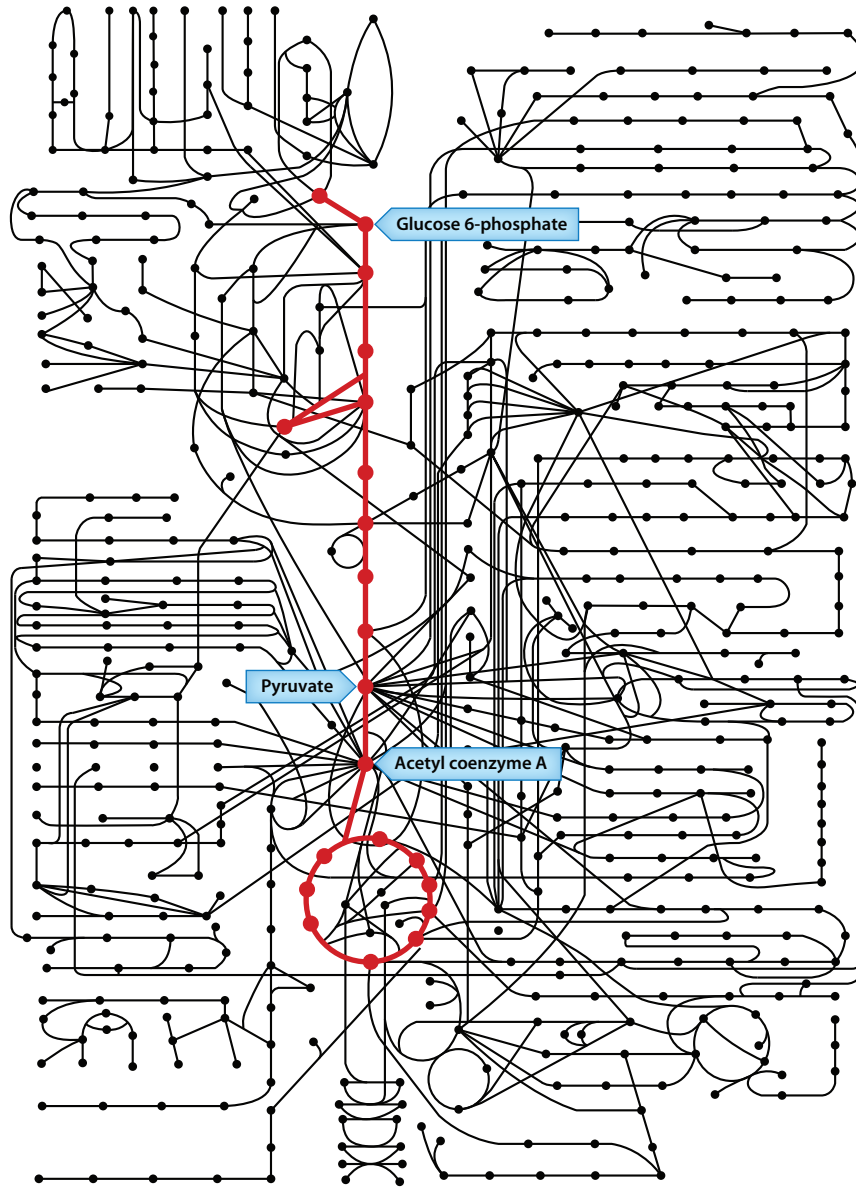


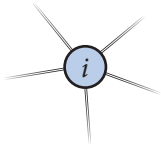
FOR ALL FIGURES  
 \*\*Please confirm that all necessary permissions have been obtained for copyrighted or previously published figures, and that all citations/credit lines in captions are complete.\*\*



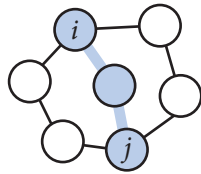
PLEASE NOTE:  
 Due to this is a full-page figure, the caption will be placed in the following page.



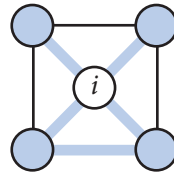
**Degree**  
 $d_i$   
 Number of nodes bound to node  $i$



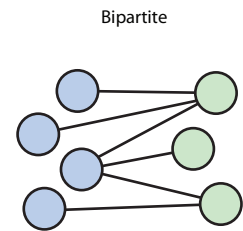
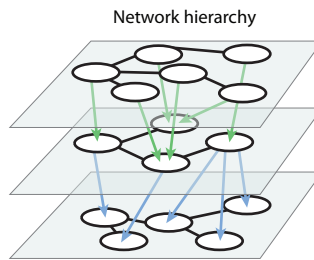
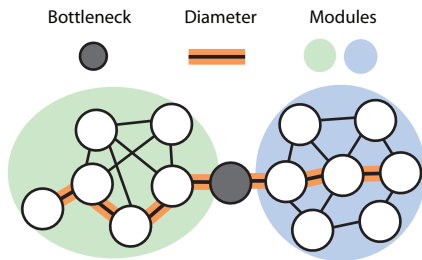
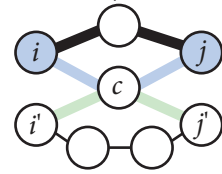
**Shortest path distance**  
 $d_{ij} = \min\{|e_p| \mid e_p \subseteq E_{ij}\}$   
 $E_{ij}$ : all edge sets connecting nodes  $i$  and  $j$

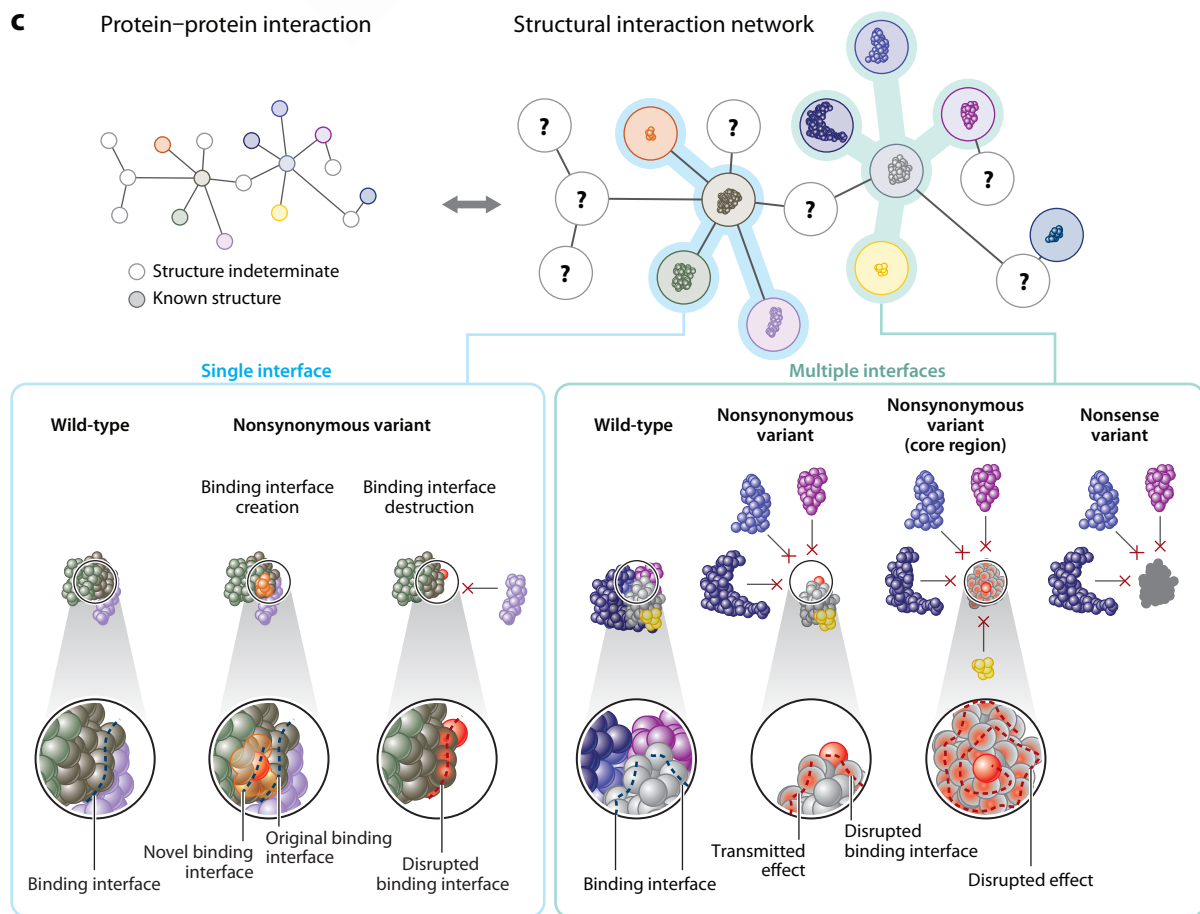
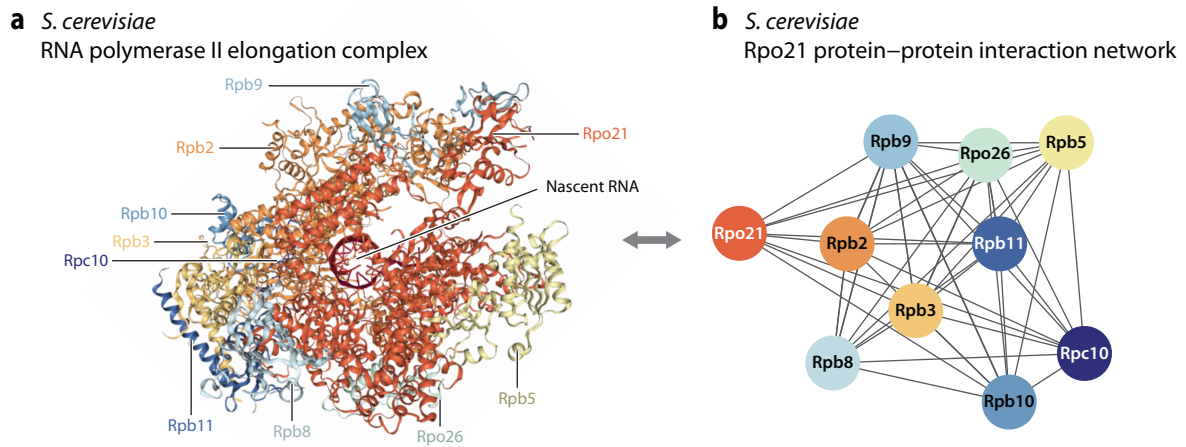


**Clustering coefficient**  
 $c_i / \binom{n_i}{2}$   
 $c_i$ : edges connecting all  $n_i$  nodes bound to  $i$



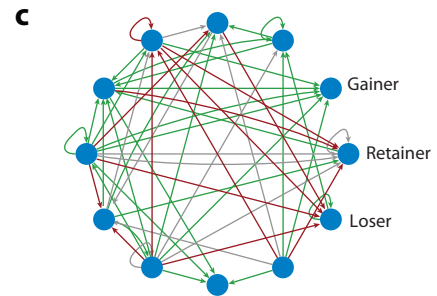
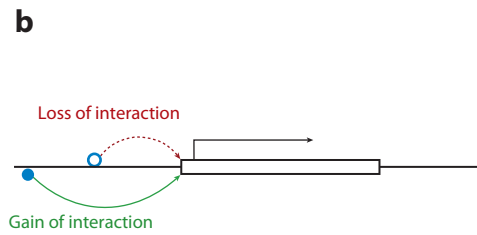
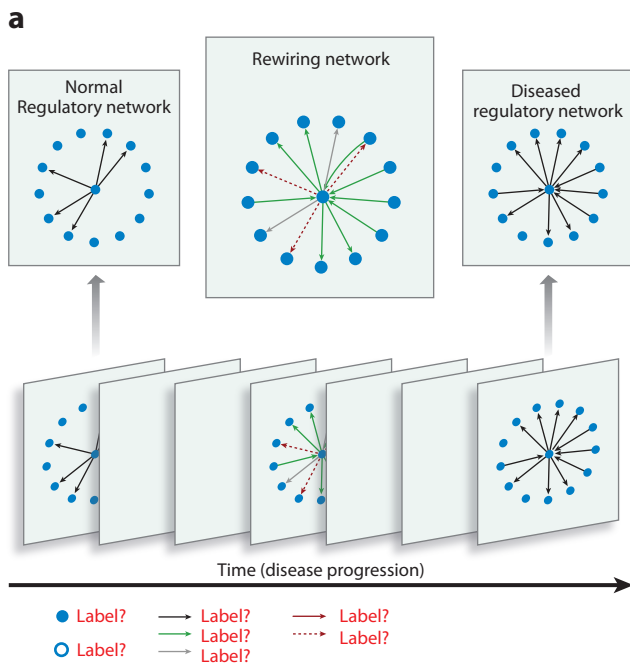
**Betweenness centrality**  
 $b_c = \sum_i \sum_j I_{ij} / s_{ij}$   
 $s_{ij}$ : total number of shortest paths between  $i$  and  $j$   
 $I_{ij}$ : 1 if  $c$  is within path; 0 otherwise





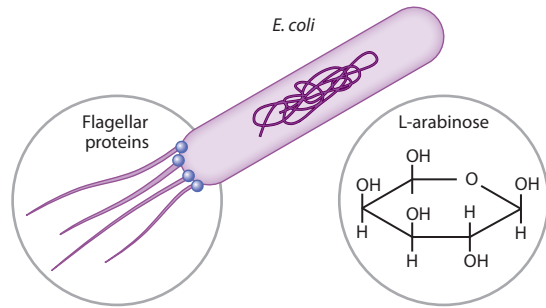
PLEASE NOTE:  
Due to this is a full-page figure, the caption will be placed in the following page.

Please confirm if the changes I made for panel C are acceptable.

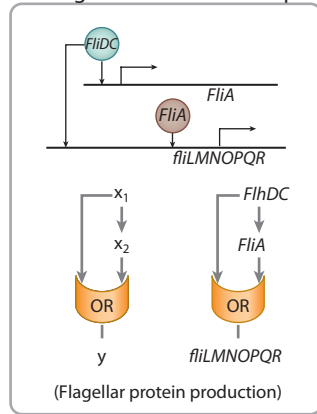


NOTE TO AUTHOR:

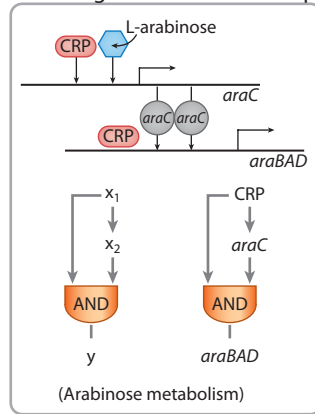
Would it be helpful to add a key to describe different components illustrated in this figure, as shown?  
 If so, please provide labels for different structures.

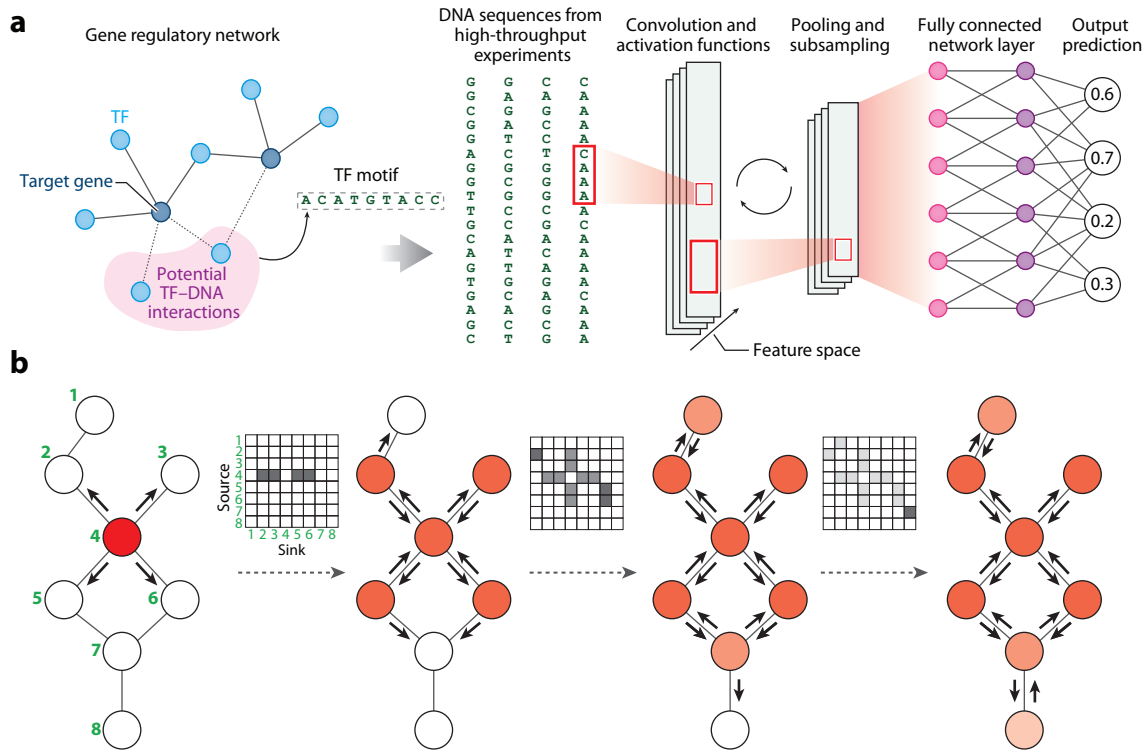


**a** OR gate feedforward loop

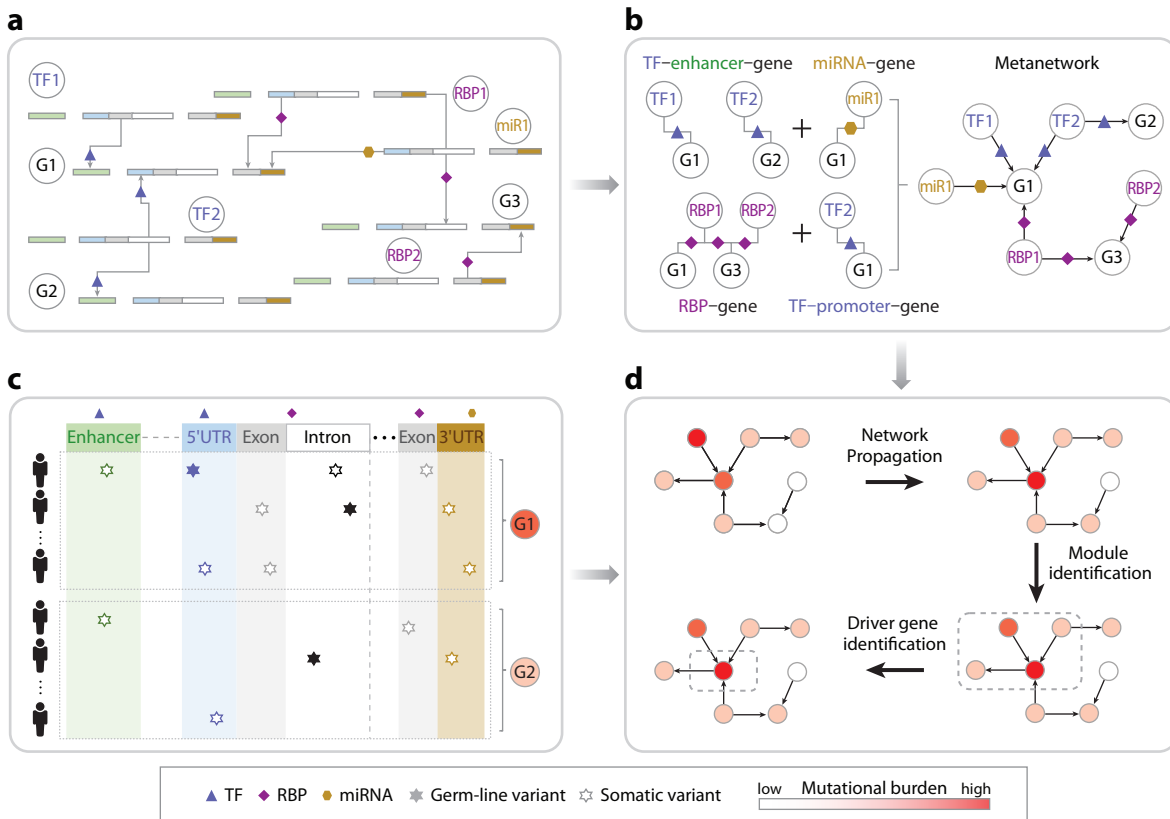


**b** AND gate feedforward loop







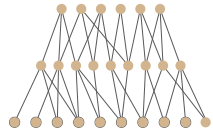

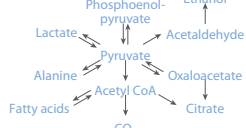
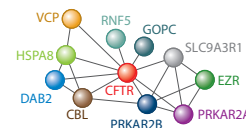
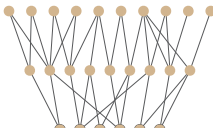


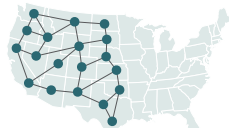


Would it be useful to provide descriptions/explanations for different shades of nodes and matrices in caption or legend as you have it in Figure 8?



Please confirm if the changes I made for panel C are acceptable.



	 <b>Hierarchical</b>	 <b>Small world</b>	 <b>Scale-free</b>	 <b>Geometric random</b>
<b>Biological network</b>	Transcription factor regulation 	Immune regulation 	Metabolic network 	Protein-protein interaction 
<b>Comparison network</b>	Linux call graph 	Social interaction 	Airline network 	Electrical distribution 
<b>Comparative insights</b>	"robustness (biological) vs. efficiency and reuse (software)" (131)	"Well connected despite low relatedness" "Unexpectedly close relationships between cell types." (8, 133)	"rich get richer" "oligarchy of hubs" "rich club" (136, 137)	"proteins function in 3-dimensional space and time" "designed and optimized communication networks" (139)

Query from Production Editor:

Is it possible to turn these insights into short phrases with subjects and verbs and removing the quotation marks, as they are not direct quotes from the papers cited? He thinks readers need a little more help understanding what these pithy phrases mean. e.g., "E. coli GRN has a robust architecture, unlike software designed for efficient reuse of functions."