

1 **Graphic Design; Visual Interfaces**

2 Graphical user interfaces are the most common way for interacting with the applications. The
3 advances in technology and emergence of new applications require new methods for interaction
4 with the applications. In this essay I provide examples of how new applications can benefit from
5 changes in the visualization based on some simple concepts.

6 Social networks are playing an important role in societies with access to internet. Their growth in
7 past decay has shown that modern societies are relying more and more on social networks for
8 maintaining and expanding relations between members of the community. People now spent a lot
9 of time on these websites and interact with each other. As these networks grow and expand they
10 capture more information about different aspect of their members' life. This information could
11 be about friendship, relationships, education, work, and places they have lived. The main
12 relationship on these sites is the friendship relation and despite all of this valuable information
13 the visualization of this relation is quite simple. It is usually just a list or a grid of images.
14 Gestalt laws can be applied to this form of visualization to provide a more fascinating and
15 informative visualization about relationships on a social network web site instead of just a grid of
16 images. It could be grouping friends' image based on the city they live or the university they've
17 graduated. It can also show information about the strength of the relationship between friends,
18 the more you interact with a friend the closer their image is to your image.

19 Collaboration is also one of the hot topics in modern applications. With the wide spread of
20 internet all over the globe, people can collaborate and work on projects from different parts of
21 the world. One application of Gestalt proximity law is to group collaborators in different time
22 zones together. It also can group collaborators based on the type of the task they are performing.
23 It can be used to depict different information about relation between collaborators in a project.
24 Another application of perceptual organization to collaboration task is transport views. Imagine
25 several people have to work on a collaborative map editing task. Transparent view enables the
26 users not to clutter the view of the other people while their working on the map. Transparency
27 provides user with the ability to work together on the same spot of the map simultaneously.

28 Smart phones are another example of changes in people life. New smart phones with a lot of
29 computational power and small high resolution displays are used by most people in modern
30 societies. These devices act like an information hub for the user. They access the device mostly
31 for getting updates about different tasks, like navigation, messaging, weather and so on. Since all
32 of these devices have small screens a good use of this limited area would be of great value.
33 Animation could facilitate such an opportunity. An animated icon can provide more information
34 using the same space as static icons. An animated icon could display the weather forecast for the
35 full day in a very small space. It also can also provide guidance for a navigation task by just
36 changing its shape into different type of arrows at appropriate times. Animated icons enables
37 user to get a lot of information without launching the application.

38 With the emergence of new technologies and applications there is a need for refining current
39 graphical user interfaces. This essay provided three examples of refining or expanding current
40 user interfaces to address this need.

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