1 Ware describes bottom up and top down processing of visual information in the brain. Give a concrete and detailed example of how bottom up processing is influenced by top down processing, leading to a potentially wrong interpretation of "reality" by the viewer. Your example can include a screenshot, photo, or web site URL to refer to the scene that is being viewed.

Let's start by looking at the little bear on the next page:

Seen it? Well, you might or might not have noticed that this isn't actually a bear, but a dog. Multiple things have occured here. Perception (most definitely), creating a task, looking for information, gaining information, interpreting information.

Bottom-up processing means that we collect data with our eyes (light in the retina) and recognize patterns to interpret what we're seeing. So basically our perception directs our cognition.

But what about top-down processing? It sort of the other way around. Basically, our perception is constructed by our cognition. We create a task for ourselves and percieve only (or mostly) what is necessary. The moment I said "Little bear" one creates a task in the brain to "look for a bear and see a bear". But their perception was deceived by their cognition. And thus the top-down processing (task, what do I look for. what do I want to see?) has influenced our bottom-up processing.

2 In the Polaris paper, carefully read section 7.1 Scenario 1: Commercial Database Analysis on p. 62 again and examine Figure 6. Describe the visual mappings and visual queries, as mentioned earlier in the article, that Polaris enables in this series of screenshots.

I found this question to be very confusing so I'm not entirely sure about my answer. Mappings are based on Bertin's retinal variables: Shape, size, orientation, color and texture in context of the pictures in figure 6 this would mean:
Shape: bars
Size: the size (or rather length) is determined by the value of the bar.
Orientation: only matters in respect of the y-axis
Color: doesn't change the value, only makes it easier to distinguish the bars.

As for the queries, I honestly have no idea what I'm supposed to do. Sorry

3 Go to the Many Eyes website and browse around the visualizations. Click through a few and look at the comments.

a How successful do you think Many Eyes has been in achieving its original design purpose according to the paper?

The purpose was to create a community and share data/visualizations. In some respects I think this has been achieved: there are lots of visualizations made by users on the visualization page, hower after clicking on a dozen or so, I couldn't find a single visualization that had any comments (even on the "popular" page). It's not something the makers can do anything about, but the website lacks the "community" feeling because of the lack of interaction. Also, the fact that the site is shutting down, or "moving" tells me it isn't the success the makers hoped it would be.

"Many Eyes launched in 2007 to bring many perspectives to bear on data visualizations; IBM will close it on June 12. *IBM's Many Eyes collaborative data visualization project will shut down June 12, according to its web site."*

I do however like the idea of simply pasting, say, a csv text and having the ability to choose a chart and have the data represented on the spot!

b What do you think is the biggest issue/flaw with Many Eyes?

In my eyes the site misses guidance in the form of examples. Sure, there are the visualizations the other users made, but no visualizations that are top-notch and a great example. And of course the lack of community described in the answer to question 3a.

c What improvements might you suggest to Many Eyes to address these issues/flaws?

Add a page whith visualizations made by the makers with simple but clear examples. To get a more community feeling going and have more communication, a forum would be a great idea where people can discuss questions, news or datasets in a clearer manner.