DeVellis spends a great deal of time discussing parallel items. Explain briefly (a) how a parallel items model is different from the other types of models DeVellis discusses and (b) what advantages, if any, a parallel items model has over other types. Should we be striving for parallel items? Why or why not?

The parallel items model is different than the other models DeVellis mentions because of a few stringent assumptions that is placed on the parallel items model. That it, the parallel models assumes the construct affects the items equally. When standardized, the degree to which the construct is influencing the items and the errors is completely equal. Furthermore, it is also assumed using these models that the items are completely independent of each other. Whereas in other models, such as Item response theory, and Structural Equation modeling, a factor loading is present to understand how each item is influenced by the construct. Furthermore, it works to understand that some items might have a different amount of error contributed to them.

In my opinion, the advantage that parallel item models have over these other models is that they are simple. Additionally, this model seems (at least according to DeVellis) to get pretty close to measuring the ideal construct through the measured items. Because of this, it appears social science research has taken kindly to this method in the past.

However, just because something is simple does not necessarily mean it should be used. This is why I don’t think that we should exactly be striving towards these types of models. As discussed in this course, some items are closer to a latent variable than others. These variables are, in my opinion, more likely to be more indicative of the construct. Therefore, understanding how each item relates to each other and is affected by the latent variable can be much more informative than the classical theory.