

1. The universe (space-time, matter, energy) had a beginning and will have an end.
2. The laws of physics, the fundamental constants, and the initial conditions of the universe are fine-tuned to allow for the possibility of life.
3. Protein sequence space is far too large to be searched and highly functional sequences (i.e. enzymes) are incredibly rare (~ 1 in 10^{65}).
4. The number of genes in the simplest free-living organism is about 450.
5. Life is based on a digital information processing system.
6. Molecular machines and sophisticated software algorithms are essential to all life-forms.

7. Random mutation + natural selection has severe limitations as a creative mechanism that are now well understood.
8. So many highly improbable factors make earth habitable that it is VERY unlikely that another truly “earth-like” planet exists in our galaxy.
9. The “junk DNA” paradigm has been shown to be false. Most, if not all, noncoding DNA has function.
10. The Cambrian (and other) explosions in the fossil record are not consistent with the Darwinian model of gradual evolution.
11. Extensive post-translational processing (editing) of genes occurs in eukaryotes: the spliceosome and the splicing code
12. Genes that extensively overlap in the same or opposite directions within a stretch of DNA (overlapping codes)