Tentative schedule for Ankara course on analysis of phylogenies (June 9, 2018)

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| Topic | Host | Time allocated |
| **Introduction**:  What can phylogeny teach us about gypsophily?  –includes lots of specific, entertaining/useful examples | Mike | 1:00 |
| **Part 1: Phylogenetic study design**  –the relationship between goals (questions to be addressed) and sampling strategies  –considerations for sampling at different taxonomic levels (individuals, populations, species, and supra-specific taxa)  –character sampling (morphology and DNA) | Helga | 2:00 |
| **Part 2: Acquiring and storing material**  –recommendations for field sampling (including for molecular, anatomical, physiology, etc. work)  –making voucher specimens, including duplicate specimens and good labeling practices  –recommendations for herbarium specimens sampling  –the importance of expert identification  –best practices for storing and shipping material | Hilda | 2:00 |
| **Part 3: Collecting DNA sequence data**  –basic overview of collecting targeted sequence data (specific loci/markers, genomes, transcriptomes)  –storage considerations  –cost considerations | Mike | 1:00 |
| **Part 4: DNA sequence alignment and Dating**  **To be added…** | Maria | 1:00 |
| **Part 5: Reconstructing phylogenies**  -overview of tree reconstruction (parsimony, ML, Bayesian) – if this wasn’t covered earlier.  –overview of some of the practical considerations/problems encountered in phylogenetic analyses (homology assessment, gene trees vs. species trees, long branch attraction.)  -provide handouts listing some relevant literature and software?  -this late in the day, it would seem best to spend most of the time on example exercises for participants to be keep them engaged (to include, monophyly, dating, character reconstruction, biogeography, fossil placement, examples of incongruence and their interpretation, etc) | Donovan | 1:00 |
| **Final considerations and conclusions** |  |  |