

# Summary of experiences 2019-2024

During the final presentations, a summary of experiences were:

- Start with a quick-and-dirty method and get it to work. Then refine it.
- Don't worry if your task isn't useful in real life - use it for training yourself.
- Computing power is important.
  - ✓ Parallel computing is good. GPUs are great. Memory and storage is good.
- Pre-processing is very important. So is data inspection - plot features!
  - ✓ Use e.g. quantile transformation to make distributions "nice".
  - ✓ Check if data is unbalanced, sparse, or otherwise needs re-weighting.
- HyperParameter (HP) optimisation is cumbersome.
  - ✓ Specifying HPs is nice: Both for reproducibility and as a help to others!
- Diversity in ML "phase space" is immense and overwhelming.
  - ✓ Adam, CNN, RNN, DNN, pDNN, GNN, ??NN, One-Hot encoding, etc.
  - ✓ Manage to navigate in this jungle and find "any" good solutions.

Generally, everybody felt, that they could actually get ML to work and solve problems with it. We hope that this will be your impression too.