

LIST OF PROOFS YOU SHOULD LOOK AT

(This list is non exhaustive.)

- P. 16. Find the MLE.
- P. 18. Why $X^T X$ is invertible.
- P. 23. Compute ∇NLL , H .
- P. 24. Why H is definite positive.
- P. 25. What is line search.
- P. 27.
- P. 30-... . How you go from an optimization problem under constraint to a Lagrange multiplier problem.
- P. 36. Prove the formula in yellow.
- P. 50. Proof in the Remark.
- P. 51. Compute the derivatives.
- P. 57-... . Computation on the Gibbs sampling.
- P. 60. Why Gibbs sampling can be viewed as a Metropolis.
- P. 61. Proof of Theorem.
- P. 66. Learn of to do the proofs in two different ways (I did it on the blackboard).
- P. 69. Proof of the correctness of the algorithm.