

# Some results on constrained Bayes estimators

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## **Abstract**

If posterior means are used to estimate nonlinear functionals of an ensemble of parameters, biased estimates for those functionals typically result. Posterior means are optimal under sum-of-squared-error loss (SSEL); introducing weighting and at the same time discarding SSEL optimality may lead to better estimates of these functionals. Constraining the first two sample moments (weighted and unweighted) of the estimates is an attractive approach that is explored in this paper.