

Cornell University Library

Search or Article

arXiv.org > math > arXiv:1303.5817

Mathematics > Statistics Theory

Assumptionless consistency of the Lasso

Sourav Chatterjee

(Submitted on 23 Mar 2013 (v1), last revised 18 Apr 2013 (this version, v3))

The Lasso is a popular statistical tool invented by Robert Tibshirani for linear regression when the number of covariates is greater than or comparable to the number of observations. The validity of the Lasso procedure has been theoretically established under a variety of complicated-looking assumptions by various authors. This article shows that for the loss function considered in Tibshirani's original paper, the Lasso is consistent under almost no assumptions at all.

Comments:11 pages. Minor revisions in this versionSubjects:Statistics Theory (math.ST); Probability (math.PR)Cite as:arXiv:1303.5817 [math.ST]
(or arXiv:1303.5817v3 [math.ST] for this version)

Submission history

From: Sourav Chatterjee [view email] [v1] Sat, 23 Mar 2013 04:28:38 GMT (10kb) [v2] Thu, 4 Apr 2013 02:21:43 GMT (11kb) [v3] Thu, 18 Apr 2013 23:41:07 GMT (11kb)

Which authors of this paper are endorsers?

Link back to: arXiv, form interface, contact.

d	(<u>Help</u> <u>Advanced search</u>
	All papers 🖵 Go!
	Download: • PDF • PostScript • Other formats
	Current browse context: math.ST < prev next > new recent 1303
	Change to browse by: math math.PR stat
	References & Citations NASA ADS
	Bookmark(what is this?)

Science WISE