

International Journal of Advances in Intelligent Informatics (Scopus)

Vol 4, No 2 Juli 2018, pp. 87-94

ISSN: 2442-6571 (p), 2548-3161 (o)

DOI: 10.26555/ijain.v4i2.173

Suparman, Mohd Saifullah Rusiman

Bootstrap-based Model Selection in Subset Polynomial Regression

ijain International Journal of Advances in Intelligent Informatics
 ISSN 2442-6571 (print) 2548-3161 (online) | available at <http://ijain.org/index.php/IJAIN>

Member of **Crossref** **1st GRADE ACCREDITED** Accredited "1st grade (SINTA 1) by Ministry of Research, Technology and Higher Education (RistekDikti) of the Republic of Indonesia, Decree No. 30/E/KPT/2018, October 24, 2018

Indexed in **Scopus** **Sinta** **EBSCOhost** **ProQuest** **Academic Search** **7960**

HOME ABOUT USER HOME SEARCH CURRENT ARCHIVES ANNOUNCEMENTS EDITORIAL BOARD INDEXING EVENTS CONTACT

Home > User > Author > Submissions > #173 > Summary

#173 Summary

SUMMARY REVIEW EDITING

Submission

Authors	Suparman Suparman, Mohd Saifullah Rusiman
Title	Bootstrap-based model selection in subset polynomial regression
Original file	173-606-1-SM.DOC 2018-04-06
Supp. files	None
Submitter	Suparman Suparman
Date submitted	April 6, 2018 - 07:47 PM
Section	Articles
Editor	Milad Yousefi
Author comments	None
Abstract Views	897

Author Fees

Article Submission	0.00 USD	PAY NOW
Article processing charges (APCs) / Article Publication Fee	Paid August 1, 2018 - 06:11 AM	

Status

Status	Published Vol 4, No 2 (2018): July 2018
Initiated	2018-08-01
Last modified	2018-12-06

Submission Metadata

Authors

Name	Suparman Suparman
Affiliation	Universitas Ahmad Dahlan
Country	Indonesia
Competing interests <small>CI POLICY</small>	—
Bio Statement	—
Principal contact for editorial correspondence.	
Name	Mohd Saifullah Rusiman
Affiliation	Universiti Tun Hussein Onn Malaysia
Country	Malaysia
Competing interests <small>CI POLICY</small>	—
Bio Statement	—

Title and Abstract

Title	Bootstrap-based model selection in subset polynomial regression
Abstract	The subset polynomial regression model is wider than the polynomial regression model. This study proposes an estimate of the parameters of the subset polynomial regression model with unknown error and distribution. The Bootstrap method is used to estimate the parameters of the subset polynomial regression model. Simulated data is used to test the performance of the Bootstrap method. The test results show that the bootstrap method can estimate well the parameters of the subset polynomial regression model.

Indexing

Keywords	Bootstrap algorithm; Subset polynomial; Regression; Model selection
Language	en

Supporting Agencies

Agencies	—
----------	---

References

References

[1] G. Jekabsons and J. Lavendels, "A Comparison of Subset Selection and Adaptive Basis Function Construction for Polynomial Regression Model Building," *Computer Sciences*, vol. 38, no. 38, pp. 187-197, 2009, doi: <https://doi.org/10.2478/v10143-009-0017-7>.

[2] T. O'Neill, J. Penm and J.S. Penm, "A Subset Polynomial Neural Networks Approach for Breast Cancer Diagnosis," *International Journal of Electronic Healthcare*, vol. 3, no. 3, pp. 293-302. 2007, doi: <https://doi.org/10.1504/IJEH.2007.014549>.

[3] C.H. Xie, Y.J. Liu and J.Y. Chang, "Medical Image Segmentation Using Rough Set and Local Polynomial Regression," *Multimedia Tools and Applications*, vol. 74, no. 6, pp. 1885-1914, 2015, doi: <https://doi.org/10.1007/s11042-013-1723-2>.

[4] Suparman, "Selection in Subset Polynomial Regression by Using Reversible Jump MCMC," *Journal of Environmental Science, Computer Science and Engineering & Technology*, vol. 5, no. 3, pp. 214-219, 2016, available at: <http://eprints.uad.ac.id/3374/1/JecetVol5No3Thn2016.pdf>.

[5] B. Efron and R. Tibshirani, *An Introduction to the Bootstrap*. Chapman & Hall : New York, 1993, doi: <https://doi.org/10.1007/978-1-4899-4511-9>.



QUICK MENU

Editorial Team

Reviewer

Focus and Scope

Author Guidelines

Publication Ethics

Open Access Policy

Peer Review Process

Online Submission

Author(s) Fee

Hardcopy Order

Contact

USER

You are logged in as... **suparman**

- ▶ My Profile
- ▶ Log Out

TEMPLATE



JOURNAL CONTENT

Search

Search Scope All

Browse

- ▶ By Issue
- ▶ By Author
- ▶ By Title

TOOLS

MENDELEY

SCREENED BY iThenticate

grammarly

CURRENT INDEXING

Scopus

DOAJ

<https://doi.org/10.1007/s10237-017-0173-7>

- [6] D. Warton, L. Thibaut and Y.A. Wang, "The PIT-trap-A "model-tree" Bootstrap Procedure for Inference about Regression Models with Discrete," Multivariate Responses, *PLoS ONE*, vol. 12, no. 7, pp. 1-18, 2017, doi: <https://doi.org/10.1371/journal.pone.0181790>.
- [7] P. Garcia-Soidan, R. Menezes and O. Rubinos, "Bootstrap Approaches for Spatial Data," *Stochastic Environmental Research & Risk Assessment*, vol. 28, no. 5, pp. 1207-1219, 2014, doi: <https://doi.org/10.1007/s00477-013-0808-9>.
- [8] C. Yazici, I. Batnaz and F. Yerlikaya-Ozkurt, "A Computational Approach to Nonparametric Regression : Bootstrapping CMARS Method," *Machine Learning*, vol. 101, no. 1, pp. 211-230, 2015, doi: <https://doi.org/10.1007/s10994-015-5502-3>.
- [9] A. Beda, D.M. Simpson and L. Faes, "Estimation of Confidence Limits for Descriptive Indexes Derived from Autoregressive Analysis of Time Series : Methods and Application to Heart Rate Variability," *PLoS ONE*, vol. 12, no. 10, pp. 1-22, 2017, doi: <https://doi.org/10.1371/journal.pone.0183230>.
- [10] P. Hall and T. Maiti, "On Parametric Bootstrap Methods for Small Area Prediction," *Journal of the Royal Statistical Society : Series B*, vol. 68, no. 2, pp. 221-238, 2006, doi: <https://doi.org/10.1111/j.1467-9868.2006.00541.x>.
- [11] F.A.B Colugnati, F. Louzada-Neto and J.A. Taddei, "An Application of Bootstrap Resampling Method to Obtain Confidence Interval for Percentile Fatness Cutoff Points in Childhood and Adolescence Overweight Diagnoses," *International Journal of Obesity*, vol. 29, no. 3, pp. 340-347, 2005, doi: <https://doi.org/10.1038/sj.ijo.0802866>.
- [12] A. Kant, P.K. Suman, B.K. Giri, M.K. Tiwari, C. Chatterjee, P.C. Nayak and S. Kumar, "Comparison of Multi-Objective Evolutionary Neural Network, Adaptive Neuro-Fuzzy Inference System and Bootstrap-Based Neural Network for Flood Forecasting," *Neural Comput & Applic*, vol. 23, no. 1, pp. 231-246, 2013, doi: <https://doi.org/10.1007/s00521-013-1344-8>.
- [13] Y. Ren, N. Yu, X. Wang, L. Li and J. Wan, "Nonparametric Bootstrap-Based Multihop Localization Algorithm for Large-Scale Wireless Sensor Networks in Complex Environments," *International Journal of Distributed Sensor Networks*, pp. 1-9, 2013, doi: <https://doi.org/10.1155/2013/923426>.
- [14] A. Kleiner, A. Talwalkar, P. Sarkar and M.I. Jordan, "A Scalable Bootstrap for Massive Data," *J.R. Statist. Soc. B*, vol. 76, no. 4, pp. 795-816, 2014, doi: <https://doi.org/10.1111/rssb.12050>.
- [15] P. Jacek, R. Norbert, S. Malgorzata, G. Andrii and K. Maciej, "Bootstrap Identification of Confidence Intervals for the Non-Linear DoE Model," *Applied Mechanics and Materials*, vol. 712, pp. 11-16, 2015, doi: <https://doi.org/10.4028/www.scientific.net/AMM.712.11>.
- [16] M. Chen, C. Liao, S. Chen, Q. Ding, D. Zhu, H. Liu X. Yan and J. Zhong, "Uncertainty Assessment of Gamma-Aminobutyric Acid Concentration of Different Brain Regions in Individual and Group Using Residual Bootstrap Analysis," *Med Biol Eng Comput*, vol. 55, pp. 1051-1059, 2017, doi: <https://doi.org/10.1007/s11517-016-1579-5>.
- [17] L. Dongping, "Failure Prognosis with Uncertain Estimation Based on Recursive Models Re-Sampling Bootstrap and ANFIS," *IAENG International Journal of Computer Science*, vol. 43, no. 2, pp. 253-262, 2016, available at: http://www.iaeng.org/IJCS/issues_v43/issue_2/IJCS_43_2_15.pdf.
- [18] F. Liang, J. Kim and Q. Song, "A Bootstrap Metropolis-Hastings Algorithm for Bayesian Analysis of Big Data," *Technometrics*, vol. 58, no. 3, pp. 304-318, 2016, doi: <https://doi.org/10.1080/00401706.2016.1142905>.
- [19] C-L Mei, M. Xu and N. Wang, "A Bootstrap Test for Constant Coefficients in Geographically Weighted Regression Models," *International Journal of Geographical Information Science*, vol. 30, no. 8, pp. 1622-1643, 2016, doi: <https://doi.org/10.1080/13658816.2016.1149181>.
- [20] A.A. Mikshovsky, D. Gianola and K.A. Weigel, "Improving Reliability of Genomic Predictions for Jersey Sires Using Bootstrap Aggregation Sampling," *J. Dairy Sci.*, vol. 99, pp. 3632-3645, 2016, doi: <https://doi.org/10.3168/jds.2015-10715>.
- [21] O.R. Olaniran, S.F. Olaniran, W.B. Yahya, A.W. Banjoko, M.K. Garba, L.B. Amusa and N.F. Gatta, "Improved Bayesian Feature Selection and Classification Methods Using Bootstrap Prior Techniques," *Anale. Seria Informatica*, vol. 14, no. 2, pp. 46-52, 2016, available at: <http://anale-informatica.tibiscus.ro/download/lucrari/14-2-07-Olaniran.pdf>.
- [22] J. Zhen, "Detection of Wideband Signal Number Based on Bootstrap Resampling," *International Journal of Antennas and Propagation*, pp. 1-8, 2016, doi: <https://doi.org/10.1155/2016/3856727>.
- [23] T. Boukaba, M.N.E. Korso, A.M. Zoubir and D. Berkani, "Bootstrap Based Sequential Detection in Non-Gaussian Correlated Clutter," *Progress in Electromagnetics Research*, vol. 81, pp. 125-140, 2018, doi: <https://doi.org/10.2528/PIERC17111608>.



International Journal of Advances in Intelligent Informatics

ISSN 2442-6571 (print) | 2548-3161 (online)

Organized by Informatics Department - Universitas Ahmad Dahlan , UTM Big Data Centre - Universiti Teknologi Malaysia, and ACSEE Computer Society

Published by Universitas Ahmad Dahlan

W : <http://ijain.org>

E : info@ijain.org, andri.pranolo@tif.uad.ac.id (paper handling issues)

ijain@uad.ac.id, andri.pranolo.id@ieee.org (publication issues)

00356875 View IJAIN Stats



This work is licensed under a Creative Commons Attribution-ShareAlike 4.0



More Abstracting & Indexing...

REQUEST INDEXING

► SCOPUS (ACCEPTED)

► Submission Received : **July 26, 2017**

► Submission Accepted : **June 5, 2018**

► SCOPUS Citation Analysis

► Web of Science

► Latest submission : June 11, 2018

► Web of Science Citation Analysis

► IET INSPEC

► Added to review : **June 5, 2018**

► COMPENDEX

► Submission Received : **October 15, 2017**

CROSSREF



INFORMATION

- For Readers
- For Authors
- For Librarians

AUTHOR

Submissions

- Active (0)
- Archive (3)
- New Submission

ISSN BARCODE



ISSN Online





ISSN Print

CURRENT ISSUE

ATOM	1.0
RSS	2.0
RSS	1.0

KEYWORDS

CNN Classification **Deep learning** EEG GPU Genetic algorithm Green turtle Hierarchical multi-label classification Iris recognition MSE Multi-label classification NLM **Neural network** oLS **Ontology** Optimization RBFNN Reduced difference expansion Scheduling Support Vector Machines (SVM) feature selection

Home > User > Author > Submissions > #173 > Review

#173 Review

SUMMARY REVIEW EDITING

Submission

Authors Suparman Suparman, Mohd Saifullah Rusiman

Title Bootstrap-based model selection in subset polynomial regression

Section Articles

Editor Milad Yousefi

Peer Review

Round 1

Review Version 173-607-1-RV.DOC 2018-04-06

Initiated 2018-05-06

Last modified 2018-06-12

Uploaded file Reviewer A 173-660-1-RV.PDF 2018-05-26

Editor Decision

Decision Accept Submission 2018-06-28

Notify Editor Editor/Author Email Record 2018-06-28

Editor Version None

Author Version 173-692-3-ED.DOC 2018-06-25 DELETE

Upload Author Version No file chosen



International Journal of Advances in Intelligent Informatics
 ISSN 2442-6571 (print) | 2548-3161 (online)
 Organized by Informatics Department - Universitas Ahmad Dahlan , UTM Big Data Centre - Universiti Teknologi Malaysia, and ASCEE Computer Society
 Published by Universitas Ahmad Dahlan
 W : <http://ijain.org>
 E : info@ijain.org, andri.pranolo@tif.uad.ac.id (paper handling issues)
ijain@uad.ac.id, andri.pranolo.id@ieee.org (publication issues)

00356876 View IJAIN Stats

This work is licensed under a Creative Commons Attribution-ShareAlike 4.0



QUICK MENU

[Editorial Team](#)

[Reviewer](#)

[Focus and Scope](#)

[Author Guidelines](#)

[Publication Ethics](#)

[Open Access Policy](#)

[Peer Review Process](#)

[Online Submission](#)

[Author\(s\) Fee](#)

[Hardcopy Order](#)

[Contact](#)

USER

You are logged in as...

suparman

- [▶ My Profile](#)
- [▶ Log Out](#)

TEMPLATE



JOURNAL CONTENT

Search

Search Scope
 All

Browse

- [▶ By Issue](#)
- [▶ By Author](#)
- [▶ By Title](#)

TOOLS



CURRENT INDEXING



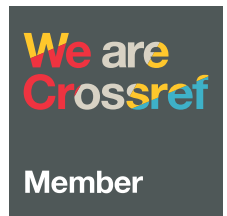


More Abstracting & Indexing...

REQUEST INDEXING

- ▶ **SCOPUS (ACCEPTED)**
 - ▶ Submission Received : **July 26, 2017**
 - ▶ Submission Accepted : **June 5, 2018**
 - ▶ **SCOPUS** Citation Analysis
- ▶ **Web of Science**
 - ▶ Latest submission : June 11, 2018
 - ▶ **Web of Science** Citation Analysis
- ▶ **IET INSPEC**
 - ▶ Added to review : **June 5, 2018**
- ▶ **COMPENDEX**
 - ▶ Submission Received : **October 15, 2017**

CROSSREF



INFORMATION

- ▶ For Readers
- ▶ For Authors
- ▶ For Librarians

AUTHOR

Submissions

- ▶ Active (0)
- ▶ Archive (3)
- ▶ New Submission

ISSN BARCODE



ISSN Online





ISSN Print

CURRENT ISSUE

ATOM	1.0
RSS	2.0
RSS	1.0

KEYWORDS

CNN Classification **Deep learning** EEG GPU Genetic algorithm Green turtle Hierarchical multi-label classification Iris recognition MSE Multi-label classification NLM **Neural network** oLS **Ontology** Optimization RBFNN Reduced difference expansion Scheduling Support Vector Machines (SVM) feature selection

Home > User > Author > Submissions > #173 > **Editing**

#173 Editing

SUMMARY REVIEW **EDITING**

Submission

Authors Suparman Suparman, Mohd Saifullah Rusiman
 Title Bootstrap-based model selection in subset polynomial regression
 Section Articles
 Editor Milad Yousefi

Copyediting

COPYEDIT INSTRUCTIONS

Copyeditor Dr. Aji Prasetya Wibawa

REVIEW METADATA	REQUEST	UNDERWAY	COMPLETE
1. Initial Copyedit File: 173-728-2-CE.DOC 2018-07-17	2018-07-03	2018-07-16	2018-07-17
2. Author Copyedit File: 173-746-1-CE.DOC 2018-07-19 <input type="button" value="Choose File"/> No file chosen <input type="button" value="Upload"/>	2018-07-17	2018-07-18	<input type="button" value=""/> 2018-07-19
3. Final Copyedit File: None	2018-07-19	—	—

Copyedit Comments No Comments

Layout

Layout Editor None

REVIEW METADATA	REQUEST	UNDERWAY	COMPLETE	VIEWS
173-776-1-LE.PDF 2018-08-09	—	—	—	
Galley Format	FILE			
1. PDF VIEW PROOF	173-777-2-PB.PDF 2018-08-11			248
Supplementary Files	FILE			

None

Layout Comments No Comments

Proofreading

Proofreader None


REVIEW METADATA	REQUEST	UNDERWAY	COMPLETE
1. Author	2018-08-09	2020-08-02	<input type="button" value=""/>
2. Proofreader	—	—	—
3. Layout Editor	—	—	—

Proofreading Corrections No Comments [PROOFING INSTRUCTIONS](#)



International Journal of Advances in Intelligent Informatics
 ISSN 2442-6571 (print) | 2548-3161 (online)
 Organized by Informatics Department - Universitas Ahmad Dahlan , UTM Big Data Centre - Universiti Teknologi Malaysia, and ASCEE Computer Society
 Published by Universitas Ahmad Dahlan
 W : <http://ijain.org>
 E : info@ijain.org, andri.pranolo@tif.uad.ac.id (paper handling issues)
ijain@uad.ac.id, andri.pranolo.id@ieee.org (publication issues)

00356877 View IJAIN Stats

 This work is licensed under a Creative Commons Attribution-ShareAlike 4.0



QUICK MENU

Editorial Team

Reviewer

Focus and Scope

Author Guidelines

Publication Ethics

Open Access Policy

Peer Review Process

Online Submission

Author(s) Fee

Hardcopy Order

Contact

USER

You are logged in as...
suparman

- [▶ My Profile](#)
- [▶ Log Out](#)

TEMPLATE



JOURNAL CONTENT


Search

Search Scope
All

Browse

- [▶ By Issue](#)
- [▶ By Author](#)
- [▶ By Title](#)

TOOLS


CURRENT INDEXING



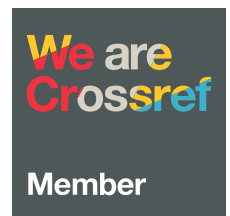



More Abstracting & Indexing...

REQUEST INDEXING

- ▶ **SCOPUS (ACCEPTED)**
 - ▶ Submission Received : **July 26, 2017**
 - ▶ Submission Accepted : **June 5, 2018**
 - ▶ **SCOPUS** Citation Analysis
- ▶ **Web of Science**
 - ▶ Latest submission : June 11, 2018
 - ▶ **Web of Science** Citation Analysis
- ▶ **IET INSPEC**
 - ▶ Added to review : **June 5, 2018**
- ▶ **COMPENDEX**
 - ▶ Submission Received : **October 15, 2017**

CROSSREF



INFORMATION

- ▶ For Readers
- ▶ For Authors
- ▶ For Librarians

AUTHOR

Submissions

- ▶ Active (0)
- ▶ Archive (3)
- ▶ New Submission

ISSN BARCODE



ISSN Online





ISSN Print

CURRENT ISSUE

ATOM	1.0
RSS	2.0
RSS	1.0

KEYWORDS

CNN Classification **Deep learning** EEG GPU Genetic algorithm Green turtle Hierarchical multi-label classification Iris recognition MSE Multi-label classification NLM **Neural network** oLS **Ontology** Optimization RBFNN Reduced difference expansion Scheduling Support Vector Machines (SVM) feature selection

[IJAIN] Editor Decision

Dr. Milad Yousefi <yousefi.milad@gmail.com>
To: Suparman Suparman <suparmancict@yahoo.co.id>
Cc: Suparman Suparman <suparman@pmat.uad.ac.id>, ijain@uad.ac.id

Sun, May 27, 2018 at 5:33 PM

Suparman Suparman:

We have reached a decision regarding your submission to International Journal of Advances in Intelligent Informatics, "Model Selection in Subset Polynomial Regression by Using Bootstrap Algorithm".

Our decision is: Revisions Required

Please kindly submit the revision before June 15th, 2018, and follow the IJAIN Author guidelines at <http://ijain.org/index.php/IJAIN/about/submissions#authorGuidelines>.

Regards,

Dr. Milad Yousefi
(Section Editor)

Reviewer A:

Significance:

- How important is the work reported? Does it attack an important/difficult problem (as opposed to a peripheral/simple one)?
- Does the approach offered advance the state of the art?
- Does it involve or synthesize ideas, methods, approaches from multiple disciplines?
- Does it have interesting implications for multiple disciplines?:
Fair

Originality: - Is this a new issue? Is this a novel approach to an issue? - Is this a novel combination of familiar ideas/techniques/methods/approaches? - Does the paper point out differences from related research? - Does the paper properly situate itself with respect to previous work?:
Fair

Quality: - Is the paper technically sound? How are its claims backed up? - Does it carefully evaluate the strengths and limitations of its contribution?:
Good

Clarity: - Is the paper clearly written? Does it motivate the research? Does it describe clearly the methods employed (e.g., experimental procedures, algorithms, analytical tools), if any? - Are the results, if any, described and evaluated thoroughly? - Is the paper organized in a sensible and logical fashion?:
Good

Relevance:

- Is the paper closely related to the theme of the journal (broadly conceived)?
- Is the content interesting enough to a broad audience?
- Is the paper readable in a multi-disciplinary context?:
Fair

Technical (1): Structure of the paper:
Good

Technical (2): Standard of English:

Good

Technical (3): Appropriateness of abstract as a description of the paper:

Good

Technical (4): Use and number of keywords/key phrases:

Fair

Technical (5): Relevance and clarity of drawings, graphs and tables:

Fair

Technical (6): Discussion and conclusions:

Good

Technical (7): Reference list, adequate and correctly cited:

Good

Explanations for the above ratings and other general comments on major issues:

The paper is well written but could be improved by adding a table of prediction and interval both from synthetic data and real data. Also could include some plots.

Comments on the minor details of the article:

Check for some minor errors.

Reviewer D:

Significance:

- How important is the work reported? Does it attack an important/difficult problem (as opposed to a peripheral/simple one)?
- Does the approach offered advance the state of the art?
- Does it involve or synthesize ideas, methods, approaches from multiple disciplines?
- Does it have interesting implications for multiple disciplines?:

Good

Originality: - Is this a new issue? Is this a novel approach to an issue? - Is this a novel combination of familiar ideas/techniques/methods/approaches? - Does the paper point out differences from related research? - Does the paper properly situate itself with respect to previous work?:

Good

Quality: - Is the paper technically sound? How are its claims backed up? - Does it carefully evaluate the strengths and limitations of its contribution?:

Fair

Clarity: - Is the paper clearly written? Does it motivate the research? Does it describe clearly the methods employed (e.g., experimental procedures, algorithms, analytical tools), if any? - Are the results, if any, described and evaluated thoroughly? - Is the paper organized in a sensible and logical fashion?:

Good

Relevance:

- Is the paper closely related to the theme of the journal (broadly conceived)?
- Is the content interesting enough to a broad audience?
- Is the paper readable in a multi-disciplinary context?:

Good

Technical (1): Structure of the paper:

Good

Technical (2): Standard of English:
Good

Technical (3): Appropriateness of abstract as a description of the paper:
Fair

Technical (4): Use and number of keywords/key phrases:
Good

Technical (5): Relevance and clarity of drawings, graphs and tables:
Fair

Technical (6): Discussion and conclusions:
Poor

Technical (7): Reference list, adequate and correctly cited:
Good

Explanations for the above ratings and other general comments on major issues:

In this paper, the author proposes to use Bootstrap algorithm to estimate the parameters of subset polynomial regression models. I recommend accepting this paper after major rewriting for the following considerations:

1. The paper is too dense, with little and sparse explanation. The author does not provide adequate information on many parts of the paper. For instance: in Section II.C it is not clear (a) how to do the resampling, (b) how to compute β_{boot} , σ^2_{boot} and y_{boot} , and (c) what is B and how does one determine it.
2. The reviewer thinks there are quite some inconsistency between the abstract and the content. The author claims in the abstract that the proposed method allows for estimation when the order of the polynomial is unknown. The reviewer does not see where this is substantiated and proved. In the case studies provided, the order of polynomials used is pre-determined, namely 2 and 3.
3. The author does not provide adequate explanation on the accompanying statistical criteria. Is this the reason why the proposed method does not have to assume that the errors are normally distributed? Nowhere in the paper that the author shows that the proposed method does not have to assume normal distributed error.
4. The reviewer does not see how the proposed method improves the estimation of the parameter compared to by simply using the least-square method, aside from the fact that in bootstrap algorithm an iterative operations are performed—in which the least-square method is being used—to obtain the best solution among several estimates.
5. The reviewer thinks that the case studies provided are too simple and does not show the strength of the method. Polynomial regressions of order 2 and 3 are simply too small that user can actually perform trial and method to obtain an optimal solution.
6. The reviewer thinks the author also should provide discussion on the merit and advantage of the proposed method. Is the method actually better than previous methods? How much better?

Comments on the minor details of the article:

1. Data in Table 2 is supposed to be motivated and elaborated. It is not actually clear to the reader what is being shown in the paper.
2. Equation (4) is supposed to be very similar to Equation (1) except for all betas becoming $\hat{\beta}$.
3. Right after Equation (6): "This is achieved by differentiating (6) partially to" → "This is achieved by partially differentiating (6) to".
4. Table 3 contains model of order 3, not 2.

International Journal of Advances in Intelligent Informatics (IJAIN)
ISSN 2442-6571 (print) | 2548-3161 (online)
<http://ijain.org/index.php/IJAIN>
Email: ijain@uad.ac.id, andri.pranolo@tif.uad.ac.id

7/28/2020

Universitas Ahmad Dahlan Yogyakarta Mail - [IJAIN] Editor Decision



173-660-1-RV.pdf
298K

[IJAIN] Your paper #173 entitled Model Selection in Subset Polynomial Regression by Using

Andri Pranolo <andri.pranolo@tif.uad.ac.id>
To: Suparman Suparman <suparman@pmat.uad.ac.id>
Cc: ijain@uad.ac.id, yousefi.milad@gmail.com

Wed, Jun 13, 2018 at 8:52 AM

Dear Authors

We would like to acknowledge you that we have received your final manuscript which was submitted on June 12, 2018. However, we still find the issues which should improve by your side.

Reviewer Notes:

1. Data in Table 2 is supposed to be motivated and elaborated. It is not actually clear to the reader what is being shown in the paper.
2. Equation (4) is supposed to be very similar to Equation (1) except for all betas becoming beta hat.
3. The paper is too dense, with little and sparse explanation. The author does not provide adequate information on many parts of the paper. For instance: in Section II.C it is not clear (a) how to do the resampling, (b) how to compute β_{boot} , σ^2_{boot} and y_{boot} , and (c) what is B and how does one determine it.
4. The reviewer thinks there are quite some inconsistency between the abstract and the content. The author claims in the abstract that the proposed method allows for estimation when the order of the polynomial is unknown. The reviewer does not see where this is substantiated and proved. In the case studies provided, the order of polynomials used is pre-determined, namely 2 and 3.
3. The author does not provide adequate explanation on the accompanying statistical criteria. Is this the reason why the proposed method does not have to assume that the errors are normally distributed? Nowhere in the paper that the author shows that the proposed method does not have to assume normal distributed error.
4. The reviewer does not see how the proposed method improves the estimation of the parameter compared to by simply using the least-square method, aside from the fact that in bootstrap algorithm an iterative operations are performed—in which the least-square method is being used—to obtain the best solution among several estimates.
5. The reviewer thinks that the case studies provided are too simple and does not show the strength of the method. Polynomial regressions of order 2 and 3 are simply too small that user can actually perform trial and method to obtain an optimal solution.
6. The reviewer thinks the author also should provide discussion on the merit and advantage of the proposed method. Is the method actually better than previous methods? How much better?
7. The paper is well written but could be improved by adding a table of prediction and interval both from synthetic data and real data. Also could include some plots.

Editor Notes

References. Expect a minimum of 20 references primarily with minimum 60% to journal papers.

We will really appreciate if you can finish them by June 27, 2018. If in any case you do not wish to do the recommended improvement from the editors and/or reviewers, please inform us the background reason.

Warmest regards

Milad Yousefi
(Section Editor)

Andri Pranolo
(Managing Editor)

International Journal of Advances in Intelligent Informatics (IJAIN)

ISSN 2442-6571 (print) | 2548-3161 (online)

<http://ijain.org/index.php/IJAIN>

Email: ijain@uad.ac.id, andri.pranolo@tif.uad.ac.id

[IJAIN] Editor Final Decision

Dr. Milad Yousefi <yousefi.milad@gmail.com>
To: Suparman Suparman <suparman@pmat.uad.ac.id>

Thu, Jun 28, 2018 at 8:26 AM

Suparman Suparman:

We have reached a decision regarding your submission to International Journal of Advances in Intelligent Informatics, "Model Selection in Subset Polynomial Regression by Using Bootstrap Algorithm".

Our decision is to: Accept Submission

Please keep attention for the copy editing and proofreading process which are final publicity process on IJAIN Journal. Your paper is scheduled to be published in the upcoming Vol. 4, No. 2, July 2018 issue after we finished those process.

Regards

Milad Yousefi
(Section Editor)

Andri Pranolo
(Managing Editor)

Prof. Dr. Siti Mariyam Shamsuddin
(Editor-in-Chief)

International Journal of Advances in Intelligent Informatics (IJAIN)
ISSN 2442-6571 (print) | 2548-3161 (online)
<http://ijain.org/index.php/IJAIN>
Email: ijain@uad.ac.id, andri.pranolo@tif.uad.ac.id

[IJAIN] Publication fee invoice for paper #173 Model Selection in Subset Polynomial Regression ..

Andri Pranolo <andri.pranolo@tif.uad.ac.id>
To: Suparman Suparman <suparman@pmat.uad.ac.id>
Cc: ijain@uad.ac.id

Tue, Jul 3, 2018 at 6:55 PM

Dear Authors,

With this letter, it is our pleasure to inform you that your paper ID #173 entitled "Model Selection in Subset Polynomial Regression by Using Bootstrap Algorithm" for International Journal of Advances in Intelligent Informatics has been accepted for schedule publication in Vol 4 No 2 July 2018.

In order to proceed the publication fee, please fulfill the steps:

1. The authors can make Publication fee payment through PayPal by log in to your account, and find PAY TO PUBLISH under STATUS Column or directly access the URL <http://ijain.org/index.php/IJAIN/author/payPublicationFee/173>.

2. Please do not hesitate to contact ijain@uad.ac.id if you have any queries or problem.

Thank you for interesting to our Journal.

Sincerely,

Andri Pranolo
Managing Editor

International Journal of Advances in Intelligent Informatics (IJAIN)
ISSN 2442-6571 (print) | 2548-3161 (online)
<http://ijain.org/index.php/IJAIN>
Email: ijain@uad.ac.id, andri.pranolo@tif.uad.ac.id

[IJAIN] Proofreading Request (Author)

Andri Pranolo <andri.pranolo@tif.uad.ac.id>
To: Suparman Suparman <suparman@pmat.uad.ac.id>
Cc: Milad Yousefi <yousefi.milad@gmail.com>

Thu, Aug 9, 2018 at 9:32 PM

Suparman Suparman:

Your submission "Bootstrap-based model selection in subset polynomial regression" to International Journal of Advances in Intelligent Informatics now needs to be proofread by following these steps.

1. Click on the Submission URL below.
2. Log into the journal and view **PROOFING INSTRUCTIONS**
3. Click on **VIEW PROOF** in Layout and proof the galley in the one or more formats used.
4. Enter corrections (typographical and format) in Proofreading Corrections.
5. Save and email corrections to Layout Editor and Proofreader.
6. Send the **COMPLETE** email to the editor.

Submission URL:

<http://ijain.org/index.php/IJAIN/author/submissionEditing/173>

Username: suparman

Andri Pranolo

International Journal of Advances in Intelligent Informatics (IJAIN)

ISSN 2442-6571 (print) | 2548-3161 (online)

<http://ijain.org/index.php/IJAIN>Email: ijain@uad.ac.id, andri.pranolo@tif.uad.ac.id