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FOREWORD FROM EDITOR-IN-CHIEF

Volume 11 Terbitan pertama Tahun ini semakin mengukuhkan JPPI dalam melakukan standarisasi kualitas menuju internasionalisasi Jurnal. Melanjukan empat kali terbitan yang sudah full berbahasa Inggris. Terbitan pertama tahun ini di warnai dengan dinamika akan berpindahnya pengelolaan Jurnal, Bulletin, dan Majalah Ilmiah di setiap Pusat dan Balai Riset dari Kementerian dan Lembaga yang selama ini mengelolanya menuju pengelolaan yang akan dilakukan oleh Badan Riset dan Inovasi Nasional (BRIN). Kepindahan ini tentunya akan mengikuti migrasi besar-besaran fungsional Peneliti dari Kementerian dan Lembaga menuju rumah barunya di BRIN. Walaupun dinamika tersebut sedikit membuat penerbitan edisi kali ini mengalami beberapa tantangan, akan tetapi redaktur, Alhamdulillah tetap bisa menerbitkan JPPI dengan tepat waktu dan berstandarkan kualitas tinggi.

Pada edisi ini JPPI kembali menurunkan 6 tulisan yang mempunyai kualitas tinggi, dimulai dengan tulisan *pertama*, berjudul Analysis Of The Application Of Information Technology In Supporting Local E-Government Development written by Hilda Yulia Novita, Yani Nurhadryani, Sri Wahjuni. Penulis memaparkan the results of this study are expected to be a recommendation for Diskominfostandi in the city of Bogor as a facilitator of the development of the implementation of the IT level local e-government in the sub-district. The second paper, written by the researcher from Puslitbang SDPPPI, Badan litbang SDM kementerian Kominfo with tittle Analysis Of Compliance Aspects Of Post Providers. This paper describe and showed the postal operator compliance index shows a sufficient value to meet compliance with a value of 0.78. Based on the compliance dimension that builds it, the principle dimension of postal administration is a dimension that has met the predicate of compliance (green zone). Meanwhile, the other two dimensions, namely regulations & policies, and the Commercial Post Service Standards get the title of sufficient compliance (yellow zone). The tittle of third paper is Pengembangan Talenta Nasional Bidang Riset Dan Inovasi Tik: Perencanaan Dan Penganggaran Berbasis Gender Untuk Asn Dan Masyarakat written by Hedi M. Idris**.** The results is indicate that the education for women sector is crucial in encouraging gender-based national digital transformation. Women's digital talent education is one of the keys to the development of a gender-based digital economy. The strategy for developing talent resources for women must continue to be coordinated with the state's priority areas and national development goals. So that, if a change happens in policy direction, the development of women's talent resources can immediately adjust

The fourth paper with tittle The Effect Of Information Literacy On The Use Of E-Resources Of Stmik Tasikmalaya Students Using Pls-Mga written by Awit Marwati Sakinah, Yuda Purnama Putra, Dani Rohpandi, Sarmidi. The purpose of this research is to determine the level of information literacy and the use of student e-resources and to create a simultaneous model between information literacy-the use of e-resources by taking into account student background factors at STMIK Tasikmalaya. The results of the research show that the lecture class background factor strengthens the effect of information literacy on the use of e-resources, where for the employee class this effect is much stronger than in the regular class. The fifth paper written by Fransiska Sisilia Mukti and R. Muhammad Sukmawan. The tittle is Integration Of Low Interaction Honeypot And Elk Stack As Attack Detection Systems On Servers. The result of research, it can be developed by placing a honeypot and ELK Stack on a real server that is accessed via a Public IP, to obtain test results against more real (not virtual) attacks. The last paper written by Cucu Ika Agustyaningrum, Muhammad Haris, Riska Aryanti, Titik Misriati with tittle Online Shopper Intention Analysis Using Conventional Machine Learning And Deep Neural Network Classification Algorithm. The

purpose of this study is The use of e-commerce throughout the world in recent years is very rapid. The continuous increase in sales shows that e-commerce has huge market potential. Store profits are derived from the process of assessing data to identify and classify online shopper intentions. The process of assessing the data uses conventional machine learning algorithms and deep neural networks.

Demikian artikel-artikel yang dapat kami persembahkan untuk edisi kali ini. Semoga jalan kami tetap mempertahankan pengelolaan JPPI di Kementerian Kominfo dapat terealisasi dengan baik. Kami persilahkan sidang pembaca untuk menikmati invensi dan inovasi pada terbitan ini.

Jakarta, September 2021

Editor-in-Chief

Lembar Abstrak

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Hilda Yulia Novita, Yani Nurhadryani, Sri Wahjuni

Analysis of The Application of Information Technology in Supporting Local E-Government Development

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 1-19

ABSTRACT

A Bogor City has a master plan for e-government of the Bogor City Government, in which it is more focused on explaining IT development within the Bogor City Government, but local level IT development planning such as those in offices, sub-districts and villages needs to be explained in more detail. The purpose of this study intends to plan the development of IT in Integrated District Administration Services in the City of Bogor, by analysing the application of local e-government IT. Research uses the TOGAF ADM framework (The Open Group Architecture Framewrok) to describe the application of good and detailed IT so that it can be used by sub-district organizations in achieving their vision, mission and strategic goals. This research was conducted by interview and observation to the sub-districts of North Bogor, South Bogor, West Bogor, East Bogor, Central Bogor and Tanah Sareal. The results of this study are expected to be a recommendation for Diskominfostandi in the city of Bogor as a facilitator of the development of the implementation of the IT level local e-government in the sub-district.

Keywords : Information, Technology, Master Plan, Paten, Sub-Discrict, Togaf

Agung Rahmat Dwiardi

Analysis of Compliance Aspects of Post Providers

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 21-40

ABSTRACT

This study was conducted to identify aspects of compliance that must be met by postal operators in running their business. So far, the compliance aspects of postal operators have been seen based on the fulfillment of the Post Implementation Report (LPP) submission to the Director General of Post and Information Technology (Dirjen PPI) as mandated in the Minister of Communication and Information Regulation No.7 of 2018. However, basically the compliance aspect needs to be identified what obligations or commitments must be fulfilled by the postal operator. Preparation of the postal operator compliance index standarcan be seen based on the rules / regulations that explain the obligations and commitments that the postal operator must fulfill. The classification of obligations and commitments can be divided into 3 dimensions: Principles of Postal Administration (Speed & Security, Confidentiality, Protection, Independence, and Partnership), Regulations & Policies (Post Licensing, Customs / Excise / Taxes, Quarantine, Consumer Protection) and Service Standards Commercial Post (Security and Confidentiality, Complaints, Suggestions and Information, Facilities, Infrastructure, and / Facilities, Compensation, Service Information). In general, the postal operator compliance index shows a sufficient value to meet compliance with a value of 0.78. Based on the compliance dimension that builds it, the principle dimension of postal administration is a dimension that has met the predicate of compliance (green zone). Meanwhile, the other two dimensions, namely regulations & policies, and the Commercial Post Service Standards get the title of sufficient compliance (yellow zone)..

Keywords: Obligations, Commitments, Compliance, Operators

Hedi M. Idris

Pengembangan Talenta Nasional Bidang Riset dan Inovasi TIK : Perencanaan dan Penganggaran Berbasis Gender untuk ASN dan Masyarakat

National Talent Development in ICT Research and Innovation: Gender- Based Planning and Budgeting for Civil Servants and Society

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 41-62

ABSTRACT

In Indonesia, gender mainstreaming in national development is regulated in Presidential Instruction No. 9 of

2000. However, the implementation of the regulation has not yet been fully implemented. This study was conducted to respond to these regulations. Meta SWOT method is used to obtain a strategic map and decision priorities regarding the National Talent Development in ICT Research and Innovation. The input variables consist of resources and competition/challenge, which are analyzed using internal analysis based on rarely, imitability, and organization (RIO). The external analysis is based on Politics, Economics, Socio-Culture, Technology, Ecology, and Legal/Legal (PESTEL). The results of discussions are the National Talent development strategy in ICT Research and Innovation includes two programs. The programs are (1) Assessment Center Program (ACP) and (2) Woman in Technology Development Program (WiTDev). The two programs are studied from three aspects, namely activity, productivity, and sustainability. This study concluded that the education for women sector is crucial in encouraging gender-based national digital transformation. Women's digital talent education is one of the keys to the development of a gender-based digital economy. The strategy for developing talent resources for women must continue to be coordinated with the state's priority areas and national development goals. So that, if a change happens in policy direction, the development of women's talent resources can immediately adjust.

Keyword: Digital Talent, Gender, ICT, National Talent, ICT Innovation

Awit Marwati Sakinah, Yuda Purnama putra, Dani Rohpandi, Sarmidi

The Effect of Information Literay on The Use of E-Resources of STMIK Tasikmalaya Students Using PLS-MGA

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 63-78

ABSTRACT

E-resources are now one of the most important components in the academic, especially during the COVID-19 pandemic, online learning. The findings in the field show that there are still many students who complete academic assignments by searching the internet, without reading, understanding, processing this information. Students who have good information literacy skills are able to take advantage of various e-resources for their academic activities. The ability to process this information is often influenced by background factors from students, such as age, education, experience and intelligence which often have an effect on the value of observations. In structural equation modeling, this condition can be accommodated by a multigroup modeling approach. The purpose of this study was to determine the level of information literacy and the use of student e-resources and to create a simultaneous model between information literacy-the use of e-resources by taking into account student background factors at STMIK Tasikmalaya. Sampling using stratified random sampling with class lectures and diploma programs as strata. The method used for this research is quantitative with Partial Least Square Multigroup Analysis (PLS-MGA) analysis. The results of the analysis show that the lecture class background factor strengthens the effect of information literacy on the use of e-resources, where for the employee class this effect is much stronger than in the regular class

Keyword: Information Literacy, E-Resources, PLS-MGA, Stratified Random Sampling

Fransiska Sisilia Mukti, R. Muhammad Sukmawan

Integration of Low Interaction Honeypot and Elk Stack as Attack Detection Systems on Servers

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 79-88

ABSTRACT

The high need for information technology that can be accessed anywhere and anytime indirectly opens a big opportunity for irresponsible parties to attack and destroy the system. The server farm is one of the targets most hunted by attackers, intending to damage, and even retrieving victim data. One of the efforts to deal with this problem is to add server security by using honeypot. The existence of a honeypot is one of the efforts to prevent system hacking by creating a fake server to divert attackers access. In its application, the logs generated from the honeypot are only letters and numbers, making it difficult to analyze the logs. It became a problem it will being a lot of log data being processed. To make it easier for administrators in analyzing logs, a visualization system using the ELK Stack is proposed. Honeypot and ELK Stack integration can be a security system solution in detecting attacks while providing visualization to administrators. Five testing schemes were carried out to provide a comparative study between the low interaction honeypot Cowrie and Dionaea. Cowrie delivers a better performance detection system (real-time) compared to the detection system offered by Dionaea, and the average delay time is 3.75 seconds, while ELK managed to provide better monitoring results to administrators through its visualization

Keywords : Server, Attack Detection, Honeypot, Cowrie, Dionaea, Elk Stack

Cucu Ika Agustyaningrum, Muhammad Haris, Riska Aryanti, Titik Misriati

Online Shopper Intention Analysis Using Conventional Machine Learning and Deep Neural Network Classification Algorithm

Jurnal Penelitian Pos dan Informatika Vol. 11 No. 1, Page 89-100

ABSTRACT

The use of e-commerce throughout the world in recent years is very rapid. The continuous increase in sales shows that e-commerce has huge market potential. Store profits are derived from the process of assessing data to identify and classify online shopper intentions. The process of assessing the data uses conventional machine learning algorithms and deep neural networks. Comparison of algorithms in this study using the python programming language by knowing the value of Accuracy, F1-Score, Precision, Recall, and ROC AUC. The test results show that the accuracy of the deep neural network algorithm is 98.48%, the F1 score is 95.06%, precision is 97.36%, recall is 96.81% and AUC is 96.81%. So, based on this research, deep neural network data mining techniques can be an effective algorithm for online shopper intention data sets with cross-validation folds of 10, six hidden layer decoder-encoder variations, relu-sigmoid activation function, adagrad optimizer, and learning rate of 0.01 and no dropout. The value of this deep neural network algorithm is quite dominant compared to conventional machine learning algorithms and related research.

Keywords: Algorithms, Conventional Machine Learning, Deep Neural Networks, E-Commerce, Shopping Intentions