Simulasi untuk suatu perusahaan menggunakan Hybrid Network

\*Note: Sub-titles are not captured in Xplore and should not be used

*Abstract*—Topologi,Jaringan,Hybrid,Simulasi,Cisco Packettracer,VLSM,Switch,Router,Routing Table,IPv4,Subnet Mask,Prefix,Static Routing,DNS,Server.

Keywords—component, formatting, style, styling, insert (key words)

# Introduction (*Heading 1*)

Hybrid network adalah jaringan berbasis client-server dimana di dalam jaringan tersebut selain server menyediakan kebanyakan sumber yang dibutuhkan oleh user, tetapi user juga masih dapat mengakses sumber-sumber yang disediakan oleh user lain (peer-to-peer) dalam satu workgroup.

# Ease of Use

● Topologi

Topologi jaringan adalah salah satu aturan bagaimana menghubungkan computer (node) satu sama lain secara fisik dan pola hubungan antara komponen-komponen yang berkomunikasi melalui media atau peralatan jaringan, seperti server,workstation, hub/switch, dan pemasangan kabel (media transmisi data)

● Topologi hybrid

Topologi Hybrid adalah adanya penggabungan dari dua maupun lebih jenis topologi jaringan yang tidak sama. Seperti pada suatu jaringan yang telah menggunakan topologi ring kemudian digabungkan pada jaringan yang lainnya dan menggunakan topologi star. Dengan hal ini maka untuk topologi yang baru telah terbentuk dari hubungan topologi jaringan tersebut.

● Cisco Packettracker

Packet Tracer adalah simulator alat-alat jaringan Cisco yang sering digunakan sebagai media pembelajaran dan pelatihan, dan juga dalam bidang penelitian simulasi jaringan komputer.

● VLSM

VLSM (Variable-Length Subnet Masks) adalah Teknik yang memungkinkan administrator jaringan untuk membagi ruang alamat IP ke subnet yang berbeda ukuran. Cara Kerja VLSM adalah memecah alamat IP ke subnet (beberapa tingkat) dan mengalokasikan sesuai dengan kebutuhan individu pada jaringan.

● Switch

Switch merupakan sebuah komponen jaringan komputer yang berfungsi menghubungkan beberapa perangkat komputer supaya bisa melakukan pertukaran paket baik itu menerima, memproses serta meneruskan data menuju perangkat lainnya.

●Router

Router adalah perangkat keras yang dipakai untuk menghubungkan beberapa jaringan, baik itu jaringan yang sama atau juga jaringan yang berbeda.

●Routing

Routing adalah proses pengiriman paket data dengan melalui jaringan dari satu perangkat ke perangkat lainnya.

●Table Routing

Table routing adalah table yang memuat seluruh informasi IP address dari interfaces router yang lain sehingga router yang satu dengan router lainnya bisa berkomunikasi. Routing table hanya memberikan informasi sedang routing algoritma yang menganalisa dan mengatur routing table.

●IPV4

IPV4 atau singkatan dari Internet Protocol Version 4 merupakan sebuah protokol untuk penggunaan paket penggantian Link Layer Networks seperti ethernet. IPv4 menawarkan alamat yang banyaknya diperkirakan hingga 4,3 milyar karena IPv4 hanya memiliki 32 bit.

●Subnet Mask

Subnet mask merupakan sebuah teknik khusus untuk memecah atau membagi jaringan komputer sehingga menjadi subnetwork-subnetwork dengan ukuran yang lebih kecil.

●Prefix

Prefix merupakan adalah huruf atau kelompok huruf yang ditempatkan di awal kata atau root (bentuk paling sederhana dari suatu kata dan tidak dapat diuraikan lagi) untuk memodifikasi makna dari kata tersebut.

●Static Routing

Static Routing adalah routing yang dilakukan secara manual. Setiap jaringan yang akan dirouting harus dikonfigurasi satu persatu oleh administrator jaringan. Kelebihan dari static routing adalah lebih aman serta tidak memutuhkan sumber daya yang besar.

●DNS

DNS adalah server yang bisa melayani permintaan untuk mengetahui sebuah IP address yang digunakan oleh suatu domain.

●Server

Server adalah sebuah perangkat komputer yang dibekali dengan software atau hardware khusus, sehingga dapat mengelola komputer lain (clients) yang berada dalam satu jaringan (network).

## Abbreviations and Acronyms

Define abbreviations and acronyms the first time they are used in the text, even after they have been defined in the abstract. Abbreviations such as IEEE, SI, MKS, CGS, sc, dc, and rms do not have to be defined. Do not use abbreviations in the title or heads unless they are unavoidable.

## Units

* Use either SI (MKS) or CGS as primary units. (SI units are encouraged.) English units may be used as secondary units (in parentheses). An exception would be the use of English units as identifiers in trade, such as “3.5-inch disk drive”.
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* Do not mix complete spellings and abbreviations of units: “Wb/m2” or “webers per square meter”, not “webers/m2”. Spell out units when they appear in text: “. . . a few henries”, not “. . . a few H”.

Identify applicable funding agency here. If none, delete this text box.

* Use a zero before decimal points: “0.25”, not “.25”. Use “cm3”, not “cc”. (*bullet list*)

## Equations

The equations are an exception to the prescribed specifications of this template. You will need to determine whether or not your equation should be typed using either the Times New Roman or the Symbol font (please no other font). To create multileveled equations, it may be necessary to treat the equation as a graphic and insert it into the text after your paper is styled.

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*a**b* 

Note that the equation is centered using a center tab stop. Be sure that the symbols in your equation have been defined before or immediately following the equation. Use “(1)”, not “Eq. (1)” or “equation (1)”, except at the beginning of a sentence: “Equation (1) is . . .”

## Some Common Mistakes

* The word “data” is plural, not singular.
* The subscript for the permeability of vacuum **0, and other common scientific constants, is zero with subscript formatting, not a lowercase letter “o”.
* In American English, commas, semicolons, periods, question and exclamation marks are located within quotation marks only when a complete thought or name is cited, such as a title or full quotation. When quotation marks are used, instead of a bold or italic typeface, to highlight a word or phrase, punctuation should appear outside of the quotation marks. A parenthetical phrase or statement at the end of a sentence is punctuated outside of the closing parenthesis (like this). (A parenthetical sentence is punctuated within the parentheses.)
* A graph within a graph is an “inset”, not an “insert”. The word alternatively is preferred to the word “alternately” (unless you really mean something that alternates).
* Do not use the word “essentially” to mean “approximately” or “effectively”.
* In your paper title, if the words “that uses” can accurately replace the word “using”, capitalize the “u”; if not, keep using lower-cased.
* Be aware of the different meanings of the homophones “affect” and “effect”, “complement” and “compliment”, “discreet” and “discrete”, “principal” and “principle”.
* Do not confuse “imply” and “infer”.
* The prefix “non” is not a word; it should be joined to the word it modifies, usually without a hyphen.
* There is no period after the “et” in the Latin abbreviation “et al.”.
* The abbreviation “i.e.” means “that is”, and the abbreviation “e.g.” means “for example”.

An excellent style manual for science writers is [7].

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1. Table Type Styles

| Table Head | Table Column Head | | |
| --- | --- | --- | --- |
| Table column subhead | Subhead | Subhead |
| copy | More table copya |  |  |

1. Sample of a Table footnote. (*Table footnote*)
2. Example of a figure caption. (*figure caption*)

Figure Labels: Use 8 point Times New Roman for Figure labels. Use words rather than symbols or abbreviations when writing Figure axis labels to avoid confusing the reader. As an example, write the quantity “Magnetization”, or “Magnetization, M”, not just “M”. If including units in the label, present them within parentheses. Do not label axes only with units. In the example, write “Magnetization (A/m)” or “Magnetization {A[m(1)]}”, not just “A/m”. Do not label axes with a ratio of quantities and units. For example, write “Temperature (K)”, not “Temperature/K”.

##### Acknowledgment *(Heading 5)*

The preferred spelling of the word “acknowledgment” in America is without an “e” after the “g”. Avoid the stilted expression “one of us (R. B. G.) thanks ...”. Instead, try “R. B. G. thanks...”. Put sponsor acknowledgments in the unnumbered footnote on the first page.

##### References

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