

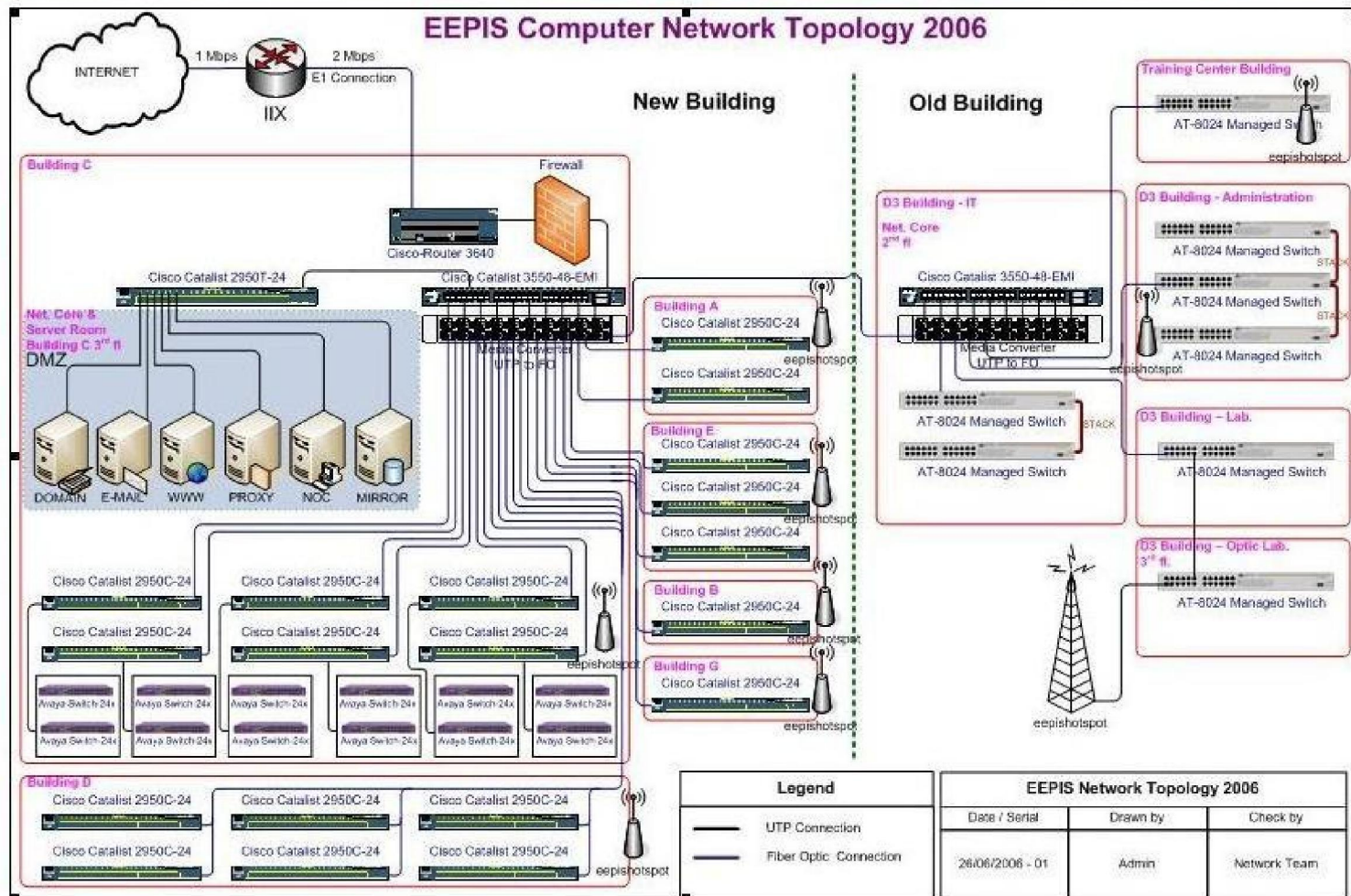


# Komunikasi Data

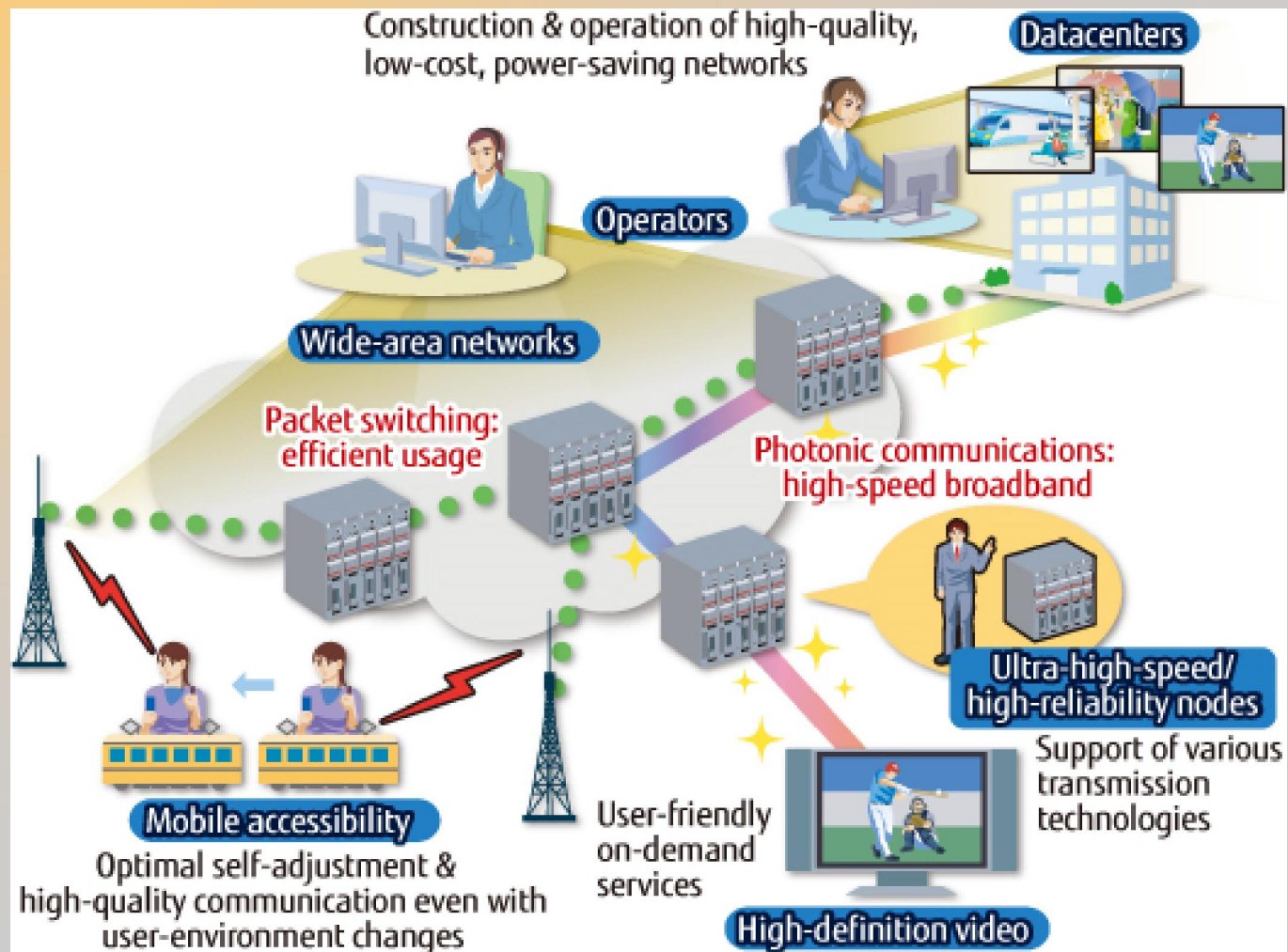
## 3 Jam / Minggu

Muhammad Zen Samsono Hadi, ST. MSc.  
Lab. Telefoni Gedung D4 Lt. 1

# Komunikasi Data

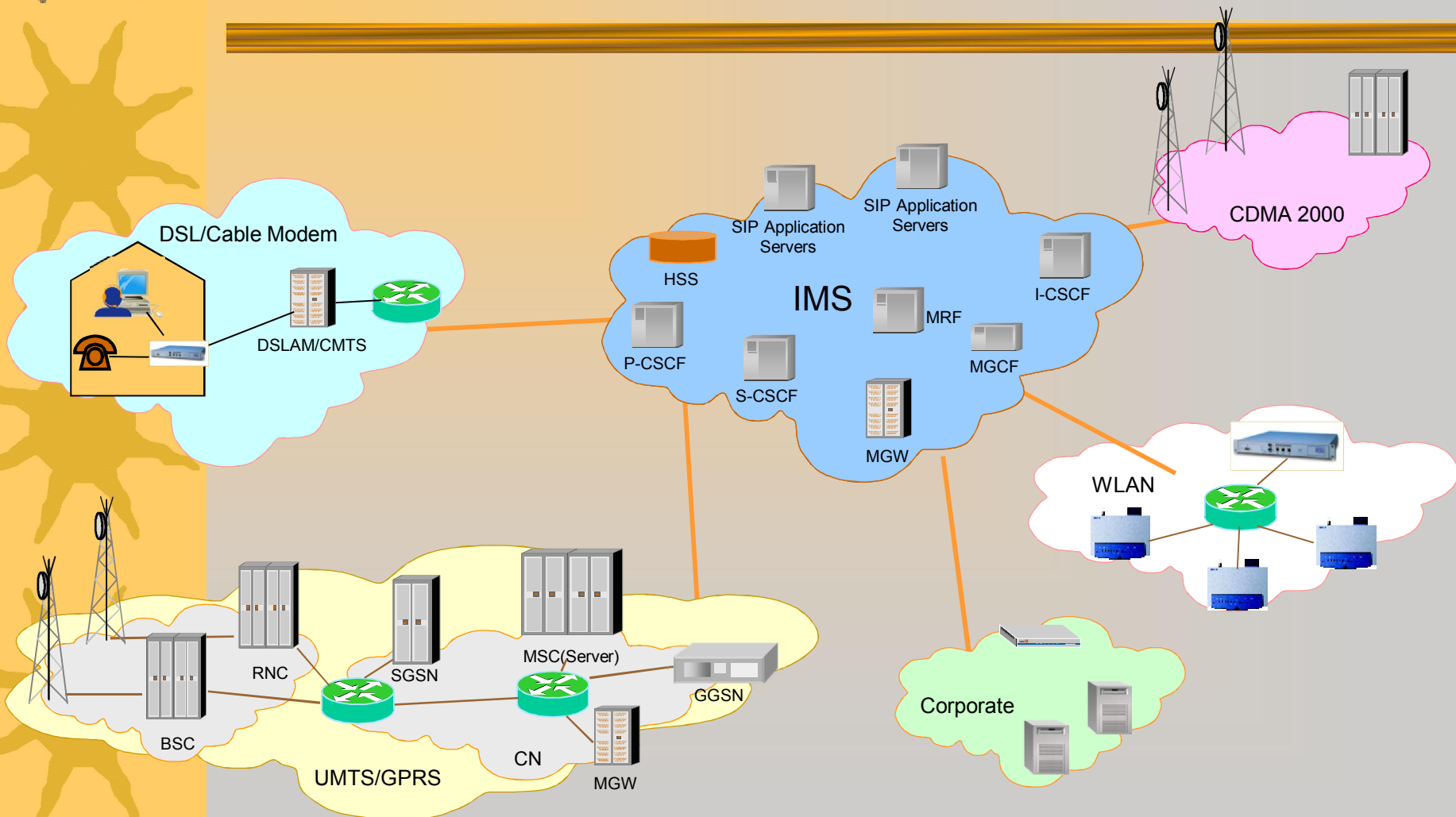


# Komunikasi Data





# Komunikasi Data





# Silabus Komunikasi Data

## 1. PENGANTAR KOMUNIKASI DATA

Transmisi serial dan Paralel

Transmisi Data Sinkron & Asinkron

Data Coding

Full-Duplex & Half-Duplex

Standarisasi

## 2. TEKNIK KOMUNIKASI

Jalur Transmisi

Rangkaian Two-wire dan Four-wire

Sinyal data Digital

Modulasi Digital

# Silabus Komunikasi Data

## 3. MEDIA TRANSMISI

Media Transmisi Guided  
Media Twisted Pair  
Media Koaksial  
Media Fiber Optik  
Media Transmisi Unguided  
Media Transmisi Terrestrial  
Media Transmisi Radio melalui Satelit

## 4. TEKNIK INTERFACING

Interface Paralel Centronics  
Interface V24 dan EIA232  
Null Modem  
Interface EIA422  
Modem

- Prinsip Kerja Modem
- Jenis Modem
- Komunikasi Data Jarak Pendek



# Silabus Komunikasi Data

## 5. MULTIPLEXING

Time Division Multiplexing  
Character Interleaving  
Multiplexer Switching  
Kompresi Data

## 6. DATA LINK CONTROL

Flow Control  
Pendeteksi Kesalahan  
Pengontrolan Kesalahan  
High-Level Data Link Control

## 7. TEKNIK SWITCHING

Konsep Switching  
Jenis switching : Jaringan Circuit-Switching dan Packet Switching  
Routing pada Packet Switching

# Silabus Komunikasi Data

## 8. PROTOCOL

Pengertian Dasar Protocol  
Protocol Bisynch  
Protocol HDLC

## 9. OSI REFERENCE MODEL

Physical Layer  
Data Link Layer  
Network Layer  
Transport Layer  
Session Layer  
Presentation Layer  
Application Layer





# Silabus Komunikasi Data

## 10. LOCAL AREA NETWORK

- Topologi
- LAN Token\_Passing
- LAN Ethernet
- FDDI
- Server
- Peer-to-peer Network
- Inter-networking
- LAN Broadband



# Penilaian

## ★ Penilaian

– Tugas/quiz	30%
– UAS	40%
– UTS	30%

★ Max terlambat 15 menit dari pelajaran dimulai



# Silabus Komunikasi Data

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3. Andrew S. Tanenbaum, *"Computer Networks"*, Prentice Hall, 1989
4. M. Zen Samsono Hadi, Modul Kuliah Komunikasi Data,  
<http://lecturer.eepis-its.edu/~zenhadi>