



**UTM**  
UNIVERSITI TEKNOLOGI MALAYSIA

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SECP1513 - SECTION 04

**DISCUSSION 01**

**ASSIGNMENT: VIDEO DISCUSSION OF CHAPTER 5 THE SYSTEM UNIT**

**Lecturer:** Mr. Hairudin Bin Abdul Majid

**Due Date:** 12/11/2021

**Group Leaders Contact Number:** 0195525988

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# INTERNET OF THINGS (IOT)

**The Internet of Things (IoT) is talk about to all physical devices that gathered all over the the world and now being connected to the internet for the collecting & sharing data process.**

## TECHNOLOGY DESCRIPTION

network of interconnected things which are embedded with sensors, software, network connectivity and necessary electronics that enables them to collect and exchange data making them responsive. Copyrights 2020, P4 Group of Companies.

Connecting up the electronic devices and apply some sensors that will help in improving the digital intelligence performance likes enable them to communicate real-time data without involving a human being. (Vasu Sharma, Aug 14, 2020)



Deon Hattingh April 21, 2020  
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Ettore Murabito, Sep 11, 2019

## EXAMPLE

### 1) SMART CITY

=> Iot help to solve many problems faced by the people living in cities like pollution and traffic control.

=> Example; All car will connected with traffic light control system so that the timing will change base on real-time traffic (Thales)

### 2) SMART HOME

=> Help us to do things in our house by only controlling one devices.

=> Example of Smart Home device is Alexa that can control several devices in a smart home system. (Written by Caroline Forsey @cforsey1)

## Reflection

=> Iot is a technology that very close to our expectation of modern world.

=> With this technology, human task will be even more easier because we do not need to depends 100% from others helps.

=> Iot technology also is a perfect example to represent the successful of the Fourth Industrial Revolution (IR4.0)

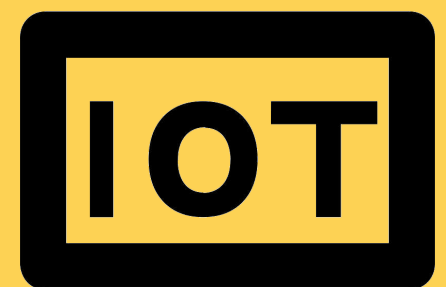


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# TM INDUSTRY TALK



Telekom Malaysia Berhad is a company that is focused on the process of developing the infrastructure to support the evolution of the 4th Industrial Revolution in our country. Network Operating Centre is one of the ways for TM to support the evolution of 4IR. TM NOC gives visibility of network incidents and security threats. TM has developed many things to maintain the stability of modernization and civilization in Malaysia. For example, "Smart Security and Safety" was developed for maintaining the level of security in our country in terms of the transmission of digital data.

## SMART CITY

- Adaptation and respond need of citizen
- Managing logistic performance and efficiency with smart fleet
- Have smart water (SWIMS) complete with censer, platform, and smart meter
- Multiple approach of smart devices leads to smart city
- Manufacturing performance with smart manufacturing solution.



### Existing service enhancement

- continue and extend existing service
- upgrade and refresh
- Major pain point and identify pilot projects

### Vertical services

- . collaboration of multiple party
- .eg: safety security, transportation

### Smart city

- .full commitment
- Local government and private enterprise in implementing smart city



## CLOUD DIGITAL

- Famous in the market such as
- Payment services
- Gaming services
- Education services
- Music services
- Taxi service
- Consumer apps



required strong digital infrastructure for customer

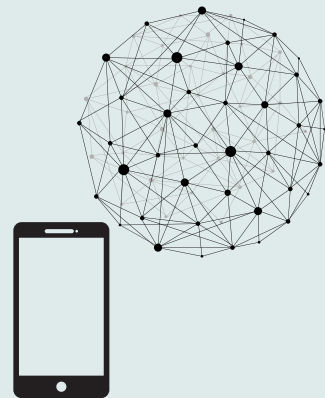
In terms of community, I believe it can improve quality of life by allowing society to embrace more benefits in their daily lives, as technology has greatly aided society. second, overcome societal challenges by allowing people to connect with one another more easily. next, healthy living, as technology allows us to get more new good sources. Finally, we may concentrate on the bliss that the 4IR can provide.

## REFLECTION (COMMUNITY)

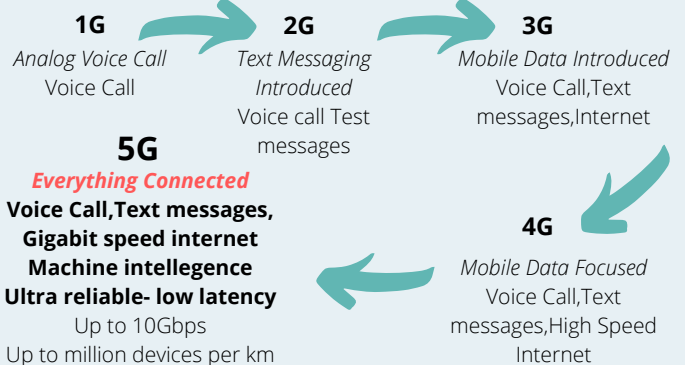


## 5G

- Have calls, high speed internet, machine intelligence,
- Evertime connected
- Enhanced mobile broadband(EMB)
- Massive machine type communication (MMTC)
- Ultra reliable and low latency communication (URLLC)



## GETTING TO 5G



## REFLECTION (STUDENT)

In my point of view, 4IR can help in terms of helping us to make our work easier. As for students, learning methods are quite new but adaptable with the use of technology that can make the transmission of digital data faster. We can access a lot of information by only using our fingertips



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# CYBERSECURITY INDUSTRY TALK



Cybersecurity Malaysia (CSM) is a company that provide us a lot of services regarding the cyber approach to control the power of information networks. Based on the talk given by one of the Cybersecurity Malaysia departments, they were focused on enlightening the community especially us, as computer science students towards the 4th Industrial Revolution in our country. It includes how our country is really prepared well for this evolution and what are the things that must be focused on to make it succeed. Thus, Cybersecurity Malaysia has analysed a lot of things regarding to the challenges and ways to overcome it. We can take action to develop and do as the framework given that guide us to make it easier.

## 1

### CSM



- People
  - knowledgeable workers
  - participated in programs
- Process
  - accepted by international standards
  - design SOP and guidelines
- Technology
  - create and test products in labs such as product development

## 2

### FRAMEWORK

- Vision
  - strategic partner across Asia Pacific
  - high tech industry's key destination
- National Goals
  - high-skilled jobs
  - labor productivity growth
- Shift Factors
  - People, Process, Technology
- Enablers
  - Funding, Infrastructure, Regulations, Talent, Technology

## 3

### ISSUES AND CHALLENGES

- Demand
  - Awareness
  - Innovation
  - High cost of Investment
  - Skill Enhancement
  - Best Practices
  - Digital Readiness & Connectivity
- Supply
  - Governance
  - Infrastructure
  - Ecosystem Support
  - Funding & Incentive
  - Training Providers
  - Standards & Digital Integration



## 4

### MALAYSIA'S FUTURE

Manufacturing factors in Malaysia are driven by three factors:

- Global value chains and production regions are still evolving.
- High labor quality and productivity, but not cheap labor
- New technologies are disrupting and fostering a manufacturing model centred on technology.



## 6

### REFLECTION (STUDENTS)

As students our overview towards IR 4.0 is an important things for us to focus on because we as computer science student are the future of this country to make sure we can adapt with IR 4.0. We must know all the technologies that related to this revolution as our readiness to adapt with it. So, we must take the action now because our country fate depend on our decision and action to develop our country. When we approach to success, it definitely will benefit us on a lot of things that will make our work look perfect and increase the efficiency when doing works.

### REFLECTION (COMMUNITY)

As community we feel that IR 4.0 is really good revolution for us to adapt with it because it is give us a lot of benefits especially in our daily life like we can upskilling in our work and bring our country ahead or in line with developed country. It means that our economy will become more stable and can avoid poverty in our country. This revolution also improve our technologies adaptation to ease our work and the efficiency regarding to the communication and the others.



## 5

### MALAYSIA MOVING FORWARD

- Retraining and developing skills
- SMEs inclusively involved
- Innovation must have grown substantially
- Dedicated financial assistance
- Good digital infrastructure



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