



# Online Learning: Trends, Issues and Implementation

An E-Learning Workshop

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# Outline

## Session A

- Introduction
- E-Learning defined
- Overview of E-learning practices
- E-readiness among policy-makers, lecturers and students
- Traditional teaching vs E-learning
- E-resources

## Session B

- Collaborative Online Learning (COL)
- Learning Management System (LMS): Purpose, Use and How to Derive Benefits
- Building Online Learning Communities
- E-Learning Enculturation
- Issues and Implementation



ICT literacy level?  
E-readiness?



thumb  
drive

webinar

LMS

learning  
objects

cookie

asynchronous  
communication

SCORM

USB

virtual  
discussion

Mozilla  
Firefox

blogs

CMC

iPods

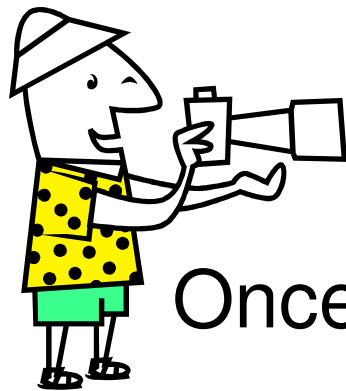
pfishing

m-learning

e-readiness



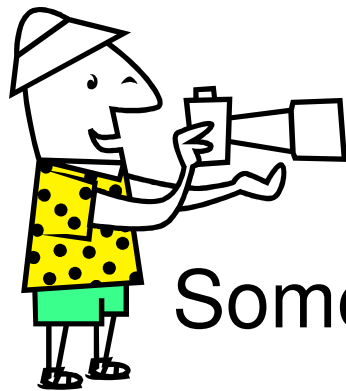
# Introduction



Once upon a time . . .



# Introduction



Sometime later . . .



# E-Learning – New Learning?

- What is it?
- Why?





*“E-Learning is about achieving  
what traditional pedagogies are not”*

*Zoraini Wati Abas  
ISEL Conference, K. Kinabalu, October 2003*





*“The biggest growth in the Internet,  
and the area that will prove to be  
one of the biggest agents of change,  
will be in e-learning.”*

*-John Chambers  
CEO, Cisco Systems*



*“It used to be that information supported  
the “real” business;  
now it is the real business.”*

*-Thomas Stewart*



*“In my lifetime, I’ve never seen hype  
and understatement walk hand in hand.  
But that’s what we’re seeing now.  
I’m convinced that our great-granchildren  
will look back and wonder why we didn’t get it.”*

*-Nicholas Negropone  
Director, MIT Media Lab*



*“The illiterate of the 21<sup>st</sup> century  
will not be those who cannot read and write,  
but those who cannot learn, unlearn and relearn.”*

*-Alvin Toffler*



*“What is emerging most clearly from the technological explosion is, ironically enough, a refocusing on people.”*

Winer, Rushby and Vazquez-Abad



*“The truth is that, properly used, technology can extend education beyond the four walls of a classroom and help students collaborate. But merely using [technology] to broadcast lectures is a bogus approach that lacks the social richness and interaction of the classroom experience and will never be a substitute for it”.*

Sawhney, Professor of e-Commerce,  
Northwestern University, Chicago



# Why?

- E-Learning is growth industry, playing an increasingly significant role in higher educational institutions.
- Positioning as a leading and quality institution supportive of more effective learning and developing life-long learning habits
- Preparation of tomorrow's citizens for a K-Based Economy



# Internet Users in Asia

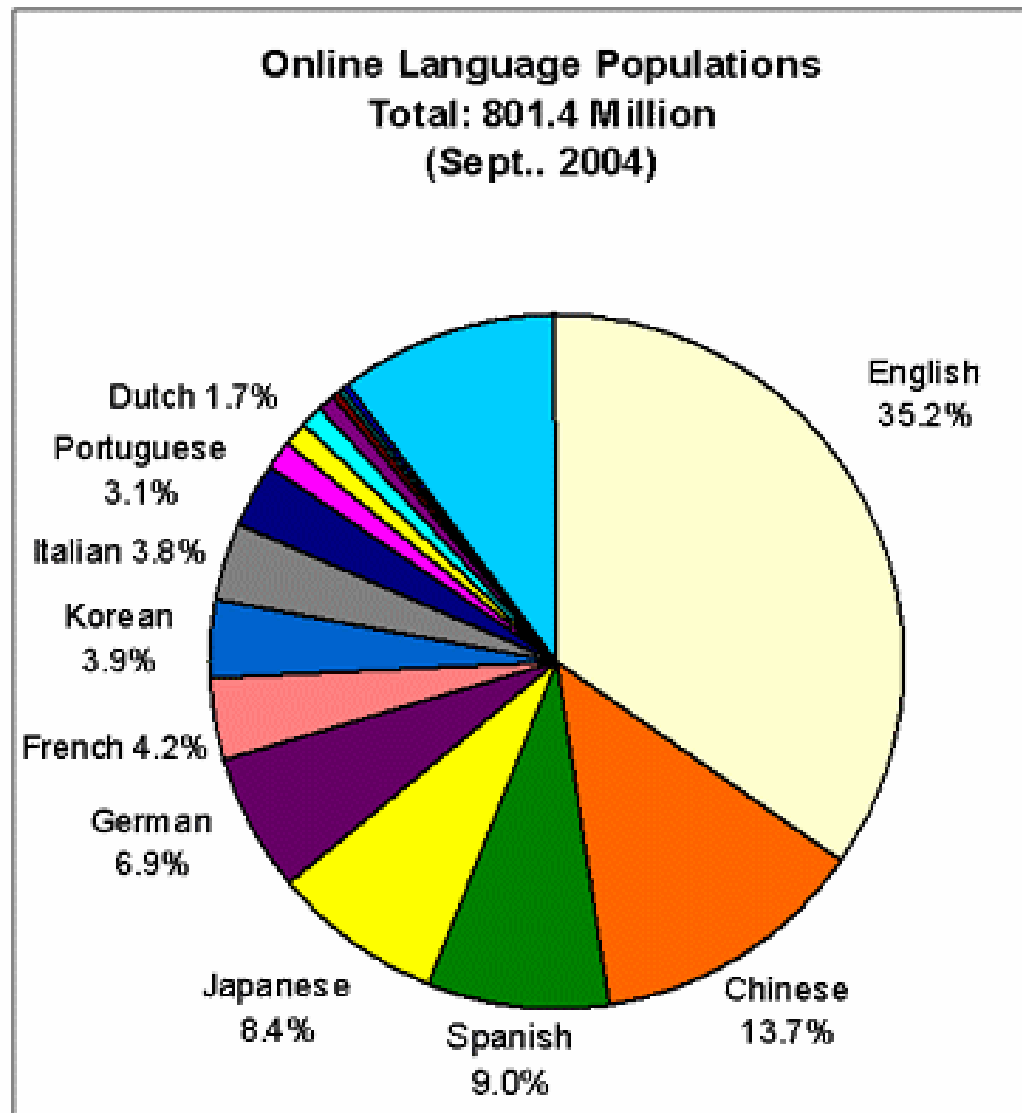
(percentage of the country's population)

1. Australia: 54.4%
2. Bangladesh: 0.11%
3. China: 3.58% (45.8 million)
4. Hong Kong: 59.6%
5. India: 0.7% (7 million)
6. Indonesia: 1.9% (4.4 million)
7. Japan: 44.1%
8. Malaysia: 25.2% (6.3 million)
9. Mongolia: 1.5%
10. Singapore: 51.8%
11. S. Korea: 53.8%
12. Taiwan: 51.8%





# Internet Statistics (Sept 2004)







# Internet Domain Survey, January 1995

## Number of Hosts and Domains

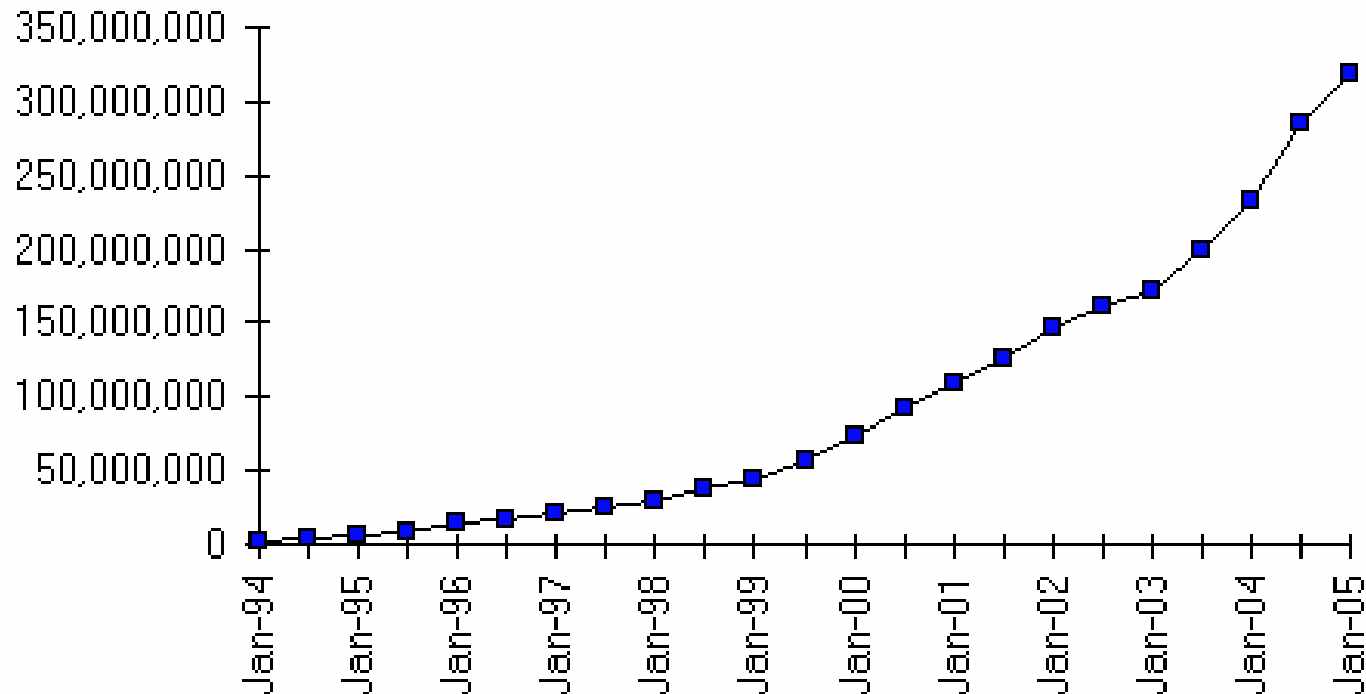
Date	Hosts	Domains
Jan 95	4,852,000	71,000
Oct 94	3,864,000	56,000
Jul 94	3,212,000	46,000
Apr 94	-N/A-	
Jan 94	2,217,000	30,000
Oct 93	2,056,000	28,000
Jul 93	1,776,000	26,000
Apr 93	1,486,000	22,000
Jan 93	1,313,000	21,000

[\* estimated by pinging 1% of all hosts]



# Internet Domain Survey, January 2005

Internet Domain Survey Host Count



Source: Internet Software Consortium ([www.isc.org](http://www.isc.org))



# E-Learning Defined



# What is E-Learning? What do you think it is?



# E-Learning: Definition

E-Learning refers to the use of Internet technologies to deliver a broad array of solutions that enhance knowledge and performance. It is based on three fundamental criteria:

1. E-learning is networked
2. It is delivered to the end-user via a computer using standard Internet technology
3. It focuses on the broadest view of all learning – learning solutions that go beyond the traditional paradigms of training

Source: Rosenberg (2001). E-Learning: Strategies for Delivering Knowledge in the Digital Age.  
New York: McGraw-Hill



## The proposed working definition . . .

*The use of network  
and multimedia technologies  
to improve the quality of learning  
by enabling access to knowledge  
and remote resources  
for the development of a K-society.*

- eLR Research WG (Feb 9, 2004)





# E-Learning (Web) Integration Continuum

Level 1: Course Marketing/Syllabi via the Web

Level 2: Provide web links for student exploration

Level 3: Publish student-generated Web resources

Level 4: Provide course resources/materials on the Web

Level 5: Repurpose Web resources for others

=====

Level 6: Web Component (e.g. online debates) is Substantive & Graded

Level 7: Graded Activities Extend Beyond Class

Level 8: Entire Web Course for Resident Students

Level 9: Entire Web Course for Offsite Students

Level 10: Course within University-level Initiative



# Overview of E- Learning Practices



# E-Learning in Malaysia

- Complement full-time on-campus education
- Deliver part of the distance learning curriculum - blended mode/hybrid mode



# ONLINE LEARNING INTERACTIVE SYSTEM

Fixed Learning Modules

Messaging System

Online Evaluation

Asynchronous Discussion



# Fixed Learning Modules



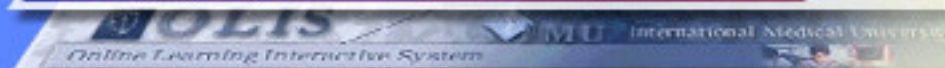
## **Respiratory System**

**Week 1**

**Station 1**

*Co-ordinators : Prof. Paul Chen & Dr. Chu Wan Loy*

*Resource Person : Dr. N.B. Reddy*



## **Respiratory System**

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## **Cardiovascular System**

**Week 1**

**Station 2**

*Co-ordinators : Dr. Jagmolini Kaur & Dr. Hla Yee Yee*

*Resource Person : Dr. Druba Chakraborty*

**The online content delivery**



# Asynchronous Discussion



The screenshot shows a web-based interface for an asynchronous discussion. At the top, it displays the path "ATLASAc/Medical MR 99/Discussion" and a folder icon next to "Discussion (1 folder, 72 messages) (System, 2/5/1999 16:09:15)". Below this is a header for "Discussion List" with the subtitle "online Learning Interactive System" and a small graphic of three people at computers. The main content is a list of messages, each with a document icon, a subject line, and a timestamp. The messages are:

- [hepatomegaly](#) (siewsan, 11/12/1999 9:01:33)
  - [RE: hepatomegaly](#) (draishah, 11/12/1999 16:46:07)
- [hypotension](#) (siewsan, 11/11/1999 15:42:07)
- [asd, vsd](#) (siewsan, 11/10/1999 12:15:15)
  - [RE: asd, vsd](#) (kuhan, 11/10/1999 15:40:06)
  - [RE: asd, vsd](#) (kuhan, 11/10/1999 15:40:04)
  - [RE: asd, vsd](#) (kuhan, 11/10/1999 15:39:54)
  - [RE: asd, vsd](#) (kuhan, 11/10/1999 15:39:43)
  - [RE: asd, vsd](#) (surayne, 11/10/1999 15:28:45)

The academic discussion channel

**Discussion List**  
Online Learning Interactive System

[/Classes/Medical M1 00/Discussion](#)

Discussion (0 folders, 72 messages) (System, 3/9/2000 11:3)

Access: v--amf v--amf v---m- SubAccess: v--amf v--amf v---m

- [intermediate metabolism \(yeewai, 3/22/2000 12:0\)](#)
- [RE: intermediate metabolism \(hweiyen, 3/22/2000 12:0\)](#)
- [RE: intermediate metabolism \(chonghin, 3/22/2000 12:0\)](#)
- [To the Class rep and all M1/2000 \(abdelaziz, 3/22/2000 12:0\)](#)
- [RE: OLIS on the Internet \(miny, 3/27/2000 12:37:42\)](#)
- [RE: intermediate metabolism \(kuanghorng, 3/27/2000 12:50:35\)](#)
- [Yes!Olis on the net... \(adeleenwei, 3/28/2000 15:01:02\)](#)
- [RE: intermediate metabolism \(chonghin, 3/28/2000 15:05:08\)](#)

**Message**

[/Classes/Medical M1 00/Discussion/RE: intermediate metabolism](#)

**From:** ChongHin Ng (chonghin)  
**To:** Medical M1 00 (M100)  
**Date:** 3/24/2000 9:51:48  
**Subject:** RE: intermediate metabolism  
**Access:** v--a v--a v---

---

Just to clarify things up on LIPID CATABOLISM,

which is first?

a. transport of FA into mito membrane by carnitine; or

b. the four reactions of Beta-oxidation [oxidation, hydration, oxidation, thiolytic cleavage] ?



# Class Announcements

## Message

[Classes/medical M2/00/Announcement/Lab Demonstrations](#)

From:  
To:  
Date:  
Subject:  
Access:



**Class Announcements**  
Online Learning Interactive System



Dear Class,

Please make sure that you have a lab-coat when you attend the lab demonstration sessions organised for your classes next week (2-6 Oct). Please make sure you attend the sessions designated for your group.

Those of you from M2/00 who have read this announcement, please publicise the matter to members of your class.

Thank you for your co-operation.

Dr. Ammu

## The online broadcasting

Welcome To TopClass - Microsoft Internet Explorer

File Edit View Favorites Tools Help

OLIS  
Online Learning Interactive System

Log In

OLIS Bulletin

Getting Started

May 2000

**What's New** (Updated 5 May 2000)

**Next change**

Batch	System Name
M2/98	Central Nervous System
M1/99	Respiratory
M2/99	Immunology
M1/00	Introduction

**Other Resources**

Recommended websites

If you have any OLIS related problems, please get in touch with Puan Rosnah at CMEM (ext. 2054) or send a message to admin using the OLIS messaging system.

For hardware and system related problems. Please contact the IT Department (ext. 2093/94)

**Softcopies** of the materials are available in

We've received some recommended websites from a student in the M199 batch. One of them is the [Integrated Medical Curriculum Homepage](#) which might be useful for reference. To access the materials, you need to register as a member. Its **free**.

Thanks to Lawrence who provided us with such an informative site

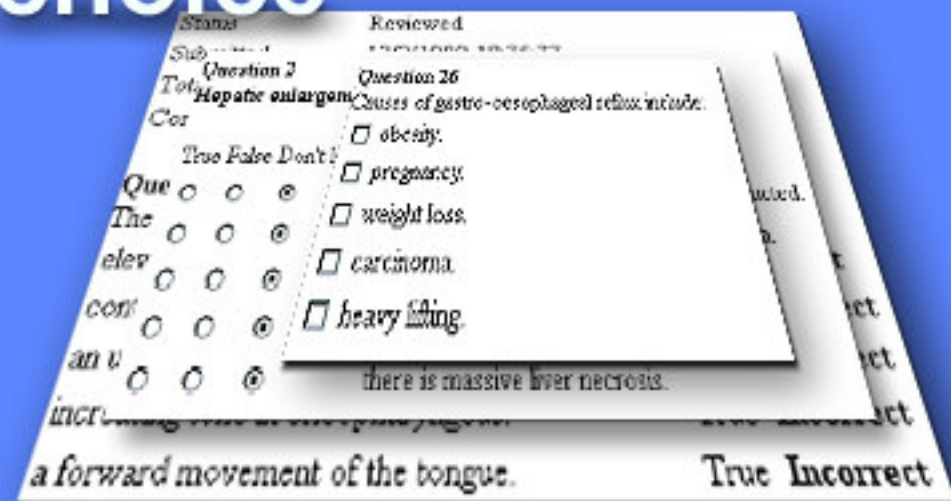
# Online Evaluation

multiple correct answer

multiple choice

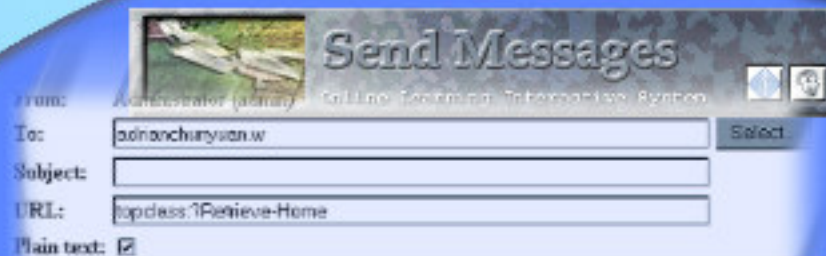
matching

true false



The opportunity to self-evaluate

# Messaging System



**Send Messages**

from: Administrator (admin) Call Line Control and Telemetry System

To:

Subject:

URL:

Plain text:

**Message**

[Malcom/Respiratory/Week2station5](#)

From: Polin Ng (poln)  
To: Administrator (admin)  
Date: 12/2/1998 14:43:54  
URL: [topclass?Retrieve=Home](#)  
Subject: RespiratoryWeek2station5

---

Dear admin,

i would just like to point out that FLM M298 Respiratory system Week 2 Station 5 =ILING TUMOTRS cannot be viewed yet!  
and it's already THURSDAY!  
next week ,another new set of week 3 stations will be out for us to read!  
please resolve this ASAP. so that we need not delay our own work.

thank you,  
poln

The e-mail facility



# E-Readiness among Policy Makers, Providers, Lecturers and Students

A national study by MEWC and OUM (2004)



# Objectives of the Research

- To find the current state of readiness for e-Learning
- To address the gaps via policies. Research WG to make recommendations for capacity-building:
  1. Human resource (ICT savvy, expert ICT personnel)
  2. R&D (content development, funding provision, research activities)
  3. Infra-structure (hardware, networking, physical facilities)
  4. Info-structure (content, software, applications, development tools)
  5. Institutional framework (management, specific centre, support)
  6. Policy initiatives (government, organization, institutional)
  7. Benchmarking (existence of local standards, comparison with other nations)



# Research Questions

(to measure and analyze the e-Learning Readiness in Malaysia)

1. To what extent are **providers** (MSC/e-learning companies, IPTAs, IPTSs, training departments) ready to embark/have embarked on e-Learning?
2. To what extent are **policy makers** (MSC/E-learning companies, IPTAs, IPTSs, training department) enabling or are ready to enable e-Learning within their respective areas of control?
3. To what extent are **enablers** (lecturers and trainers) equipped or competent, that is, ready in the delivery of e-Learning?
4. To what extent are **receivers** (IPTAs & IPTSs) of e-Learning keen or ready for e-Learning?

(p. 2 of Concept Paper, revised)



## Scope/Dimensions of Readiness

<i>Areas of Readiness</i>	<i>Policy Maker</i>	<i>Provider</i>	<i>Enabler</i>	<i>Receiver</i>
<b>Learner</b>			✓	✓
<b>Management</b>	✓		✓	
<b>Personnel</b>	✓	✓	✓	
<b>Content</b>		✓	✓	✓
<b>Technical</b>	✓	✓	✓	✓
<b>Environmental</b>	✓	✓	✓	✓
<b>Cultural</b>	✓		✓	✓
<b>Financial</b>	✓	✓	✓	✓





# Definitions

- Content Readiness

- Refers to the variety and availability of appropriate E-learning materials. Basically, it is how ready the institution/organization is perceived to be in terms of providing content for E-learning.

- Cultural Readiness

- The enculturation of E-learning in terms of using Internet and networked technologies to disseminate information, communication, interaction and teaching. How ready is the institution/organization is to enculturate E-learning as a mode for teaching and learning.



# Definitions

## ○ Environmental Readiness

- The readiness of the country as a whole in terms of the presence of government policy, the role of mass media, IP regulations and proficiency in the English language.

## ○ Financial Readiness

- The readiness of the learner/trainee and institution/organization to spend or allocate funds to develop and/or acquire E-learning.



# Definitions

- Learner Readiness
  - Readiness to commit time to E-learning, discipline and interest in E-learning as well as their anxiety in whether qualification obtained via E-learning will be recognized
- Management Readiness
  - Refers to whether the institution/organization has a vision/mission with formulated policies related to the provision of E-learning and the institution/organization recognition of qualifications obtained via E-learning



# Respondents

Four surveys/instruments (online and printed):

- Policy-makers 102
- Providers 75
- Enablers 977
- Receivers 4,625

Total = **5,779** respondents

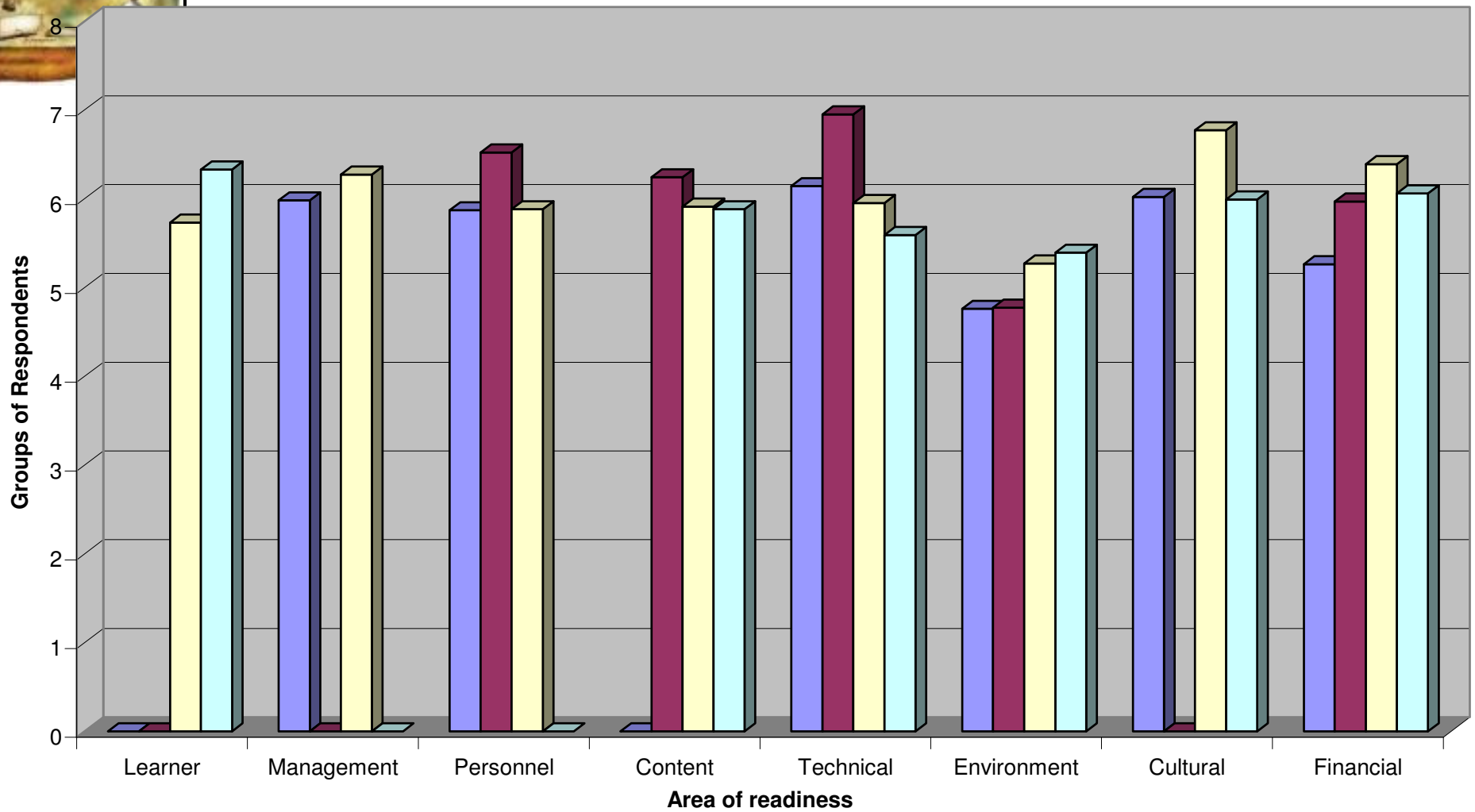


# Respondents: Where are they from?

- Informatics Smart-Tech Citicampus
- Institut Bahasa Melayu Malaysia
- Institut Jati (Legenda Group of Colleges)
- Institut Tadbiran Awam Negara (INTAN)
- INTI International College
- International Islamic University
- Kolej Uniti
- KUSTEM
- KUiTTHO
- MARA
- Maktab Perguruan Batu Lintang Sarawak
- Maktab Perguruan Gaya, Sabah
- Maktab Perguruan Ilmu Khas, Kuala Lumpur
- Maktab Perguruan Ipoh, Perak
- Maktab Perguruan Miri, Sarawak
- Maktab Perguruan Teknik, Kuala Lumpur
- Multimedia Malaysia University
- Nilai International College
- 45 ○ Open University Malaysia
- Politeknik Port Dickson, Negeri Sembilan
- Politeknik Sultan Haji Hamid (POLISAS), Kuantan
- Sunway College
- Swinburne University of Technology (Sarawak branch)
- Telekom Training College, Kota Kinabalu
- Universiti Institut Teknologi MARA
- Universiti Kebangsaan Malaysia
- Universiti Kuala Lumpur Malaysia
- Universiti Malaya
- Universiti Malaysia Sarawak
- Universiti Pendidikan Sultan Idris
- Universiti Putra Malaysia
- Universiti Sabah Malaysia
- Universiti Sains Malaysia
- Universiti Teknologi Malaysia
- Universiti Tenaga National
- Universiti Utara Malaysia
- University College Sedaya International, and
- others



## Overall Means for E-learning Readiness among Policy Makers, Providers, Enablers and Receivers





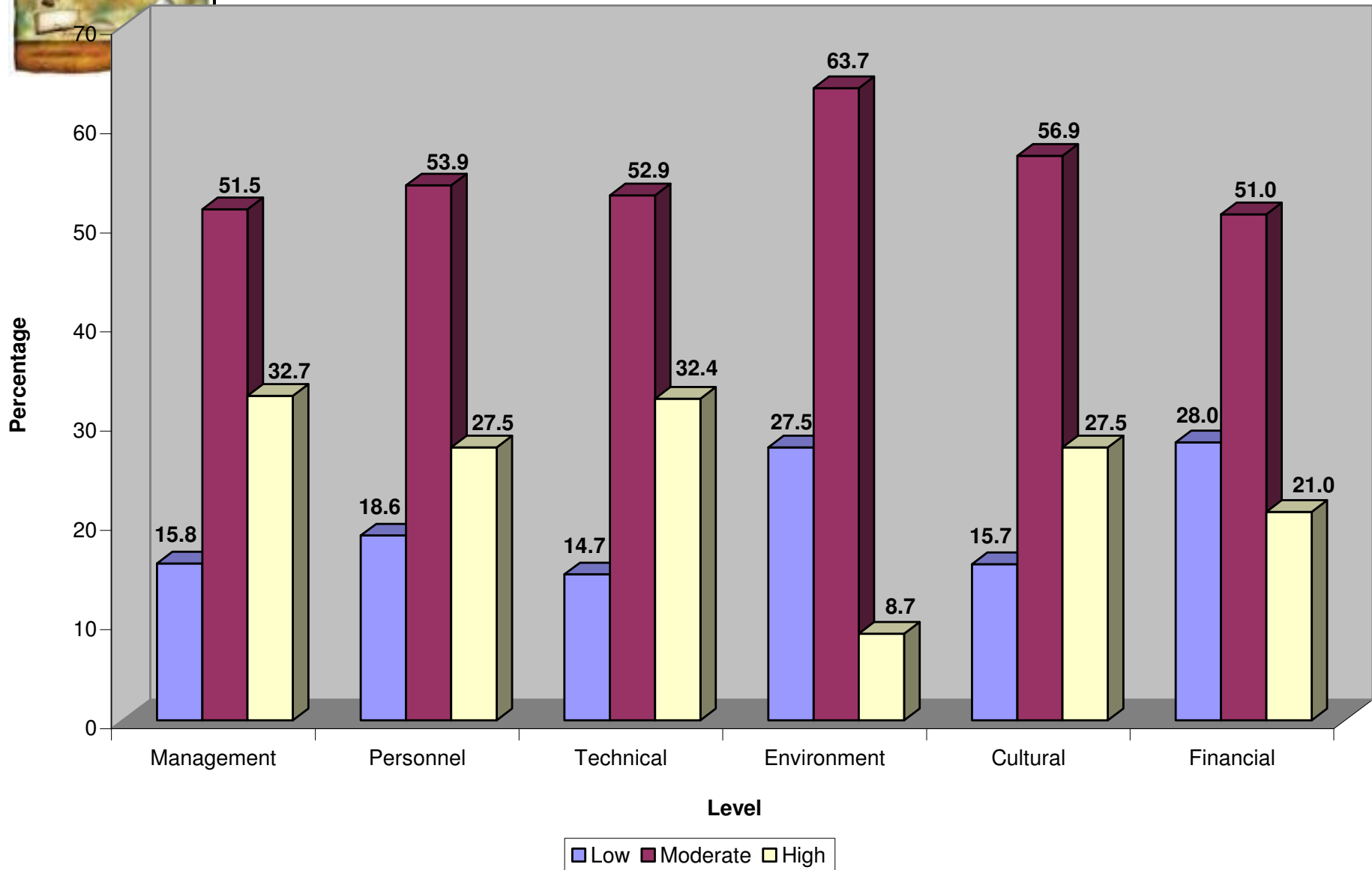
# Summary of Ratings

TABLE 70. Overall Means for E-learning Readiness among Policy Makers, Providers, Enablers and Receivers

Area of readiness	Policy Maker	Provider	Enabler	Receiver
Learner	-	-	5.73	6.33
Management	5.98	-	6.24	-
Personnel	5.87	6.52	5.88	-
Content	-	6.24	5.91	5.88
Technical	6.14	6.95	5.95	5.59
Environmental	4.76	4.77	5.27	5.39
Cultural	6.02	-	6.77	5.99
Financial	5.26	5.97	6.39	6.06



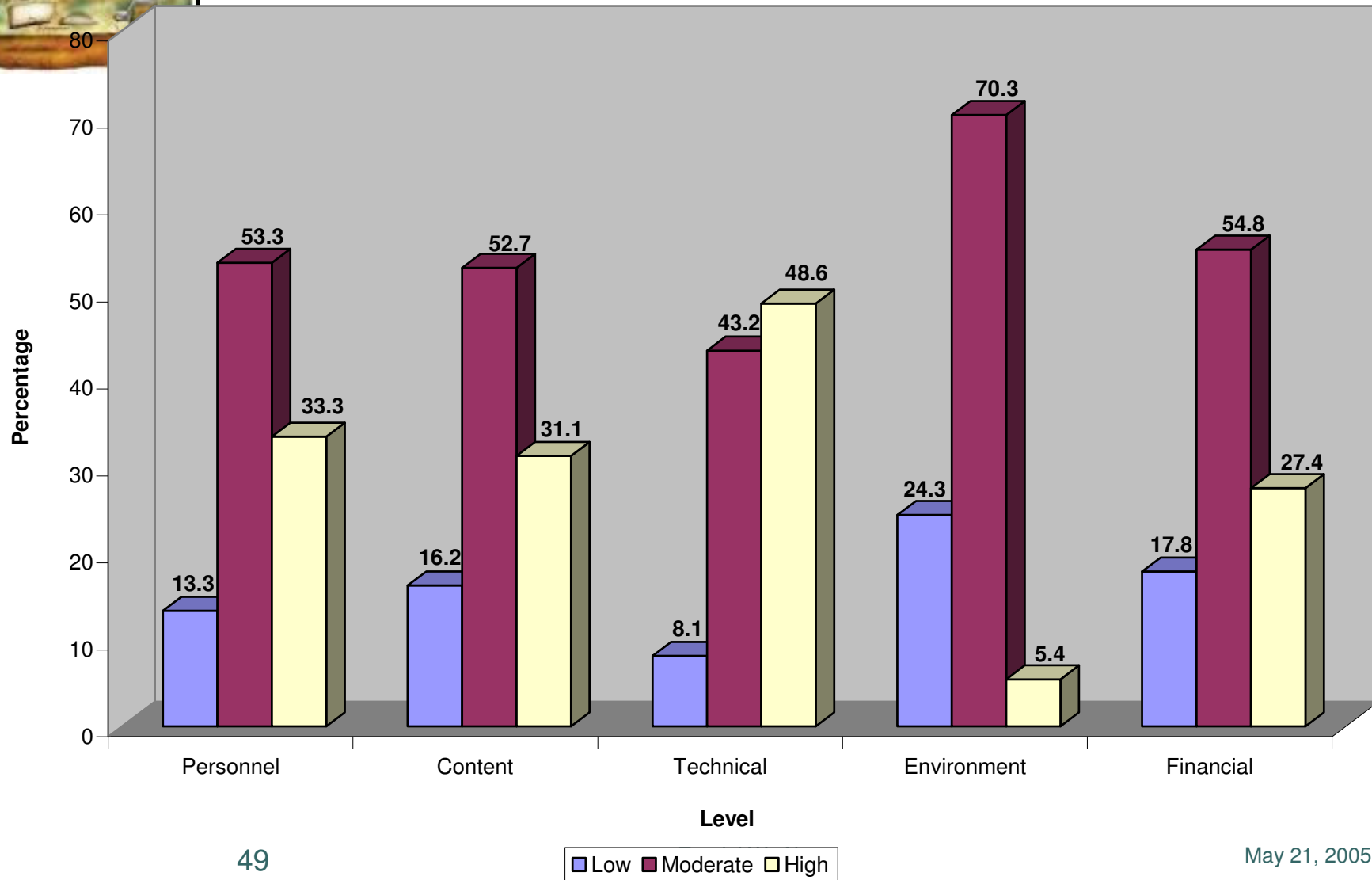
## Level of Overall Readiness among Policy Makers





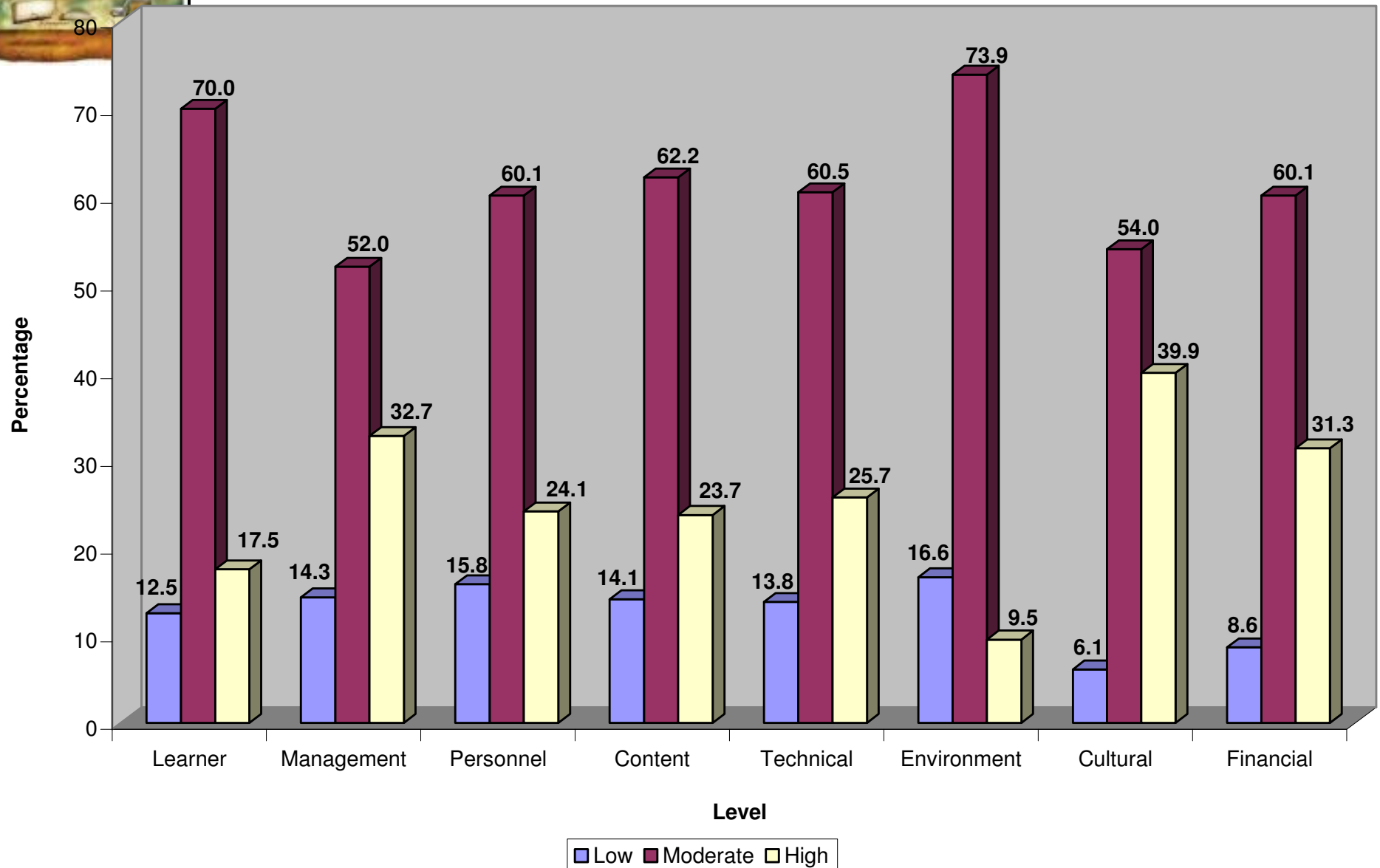


### Level of Overall Readiness among Providers



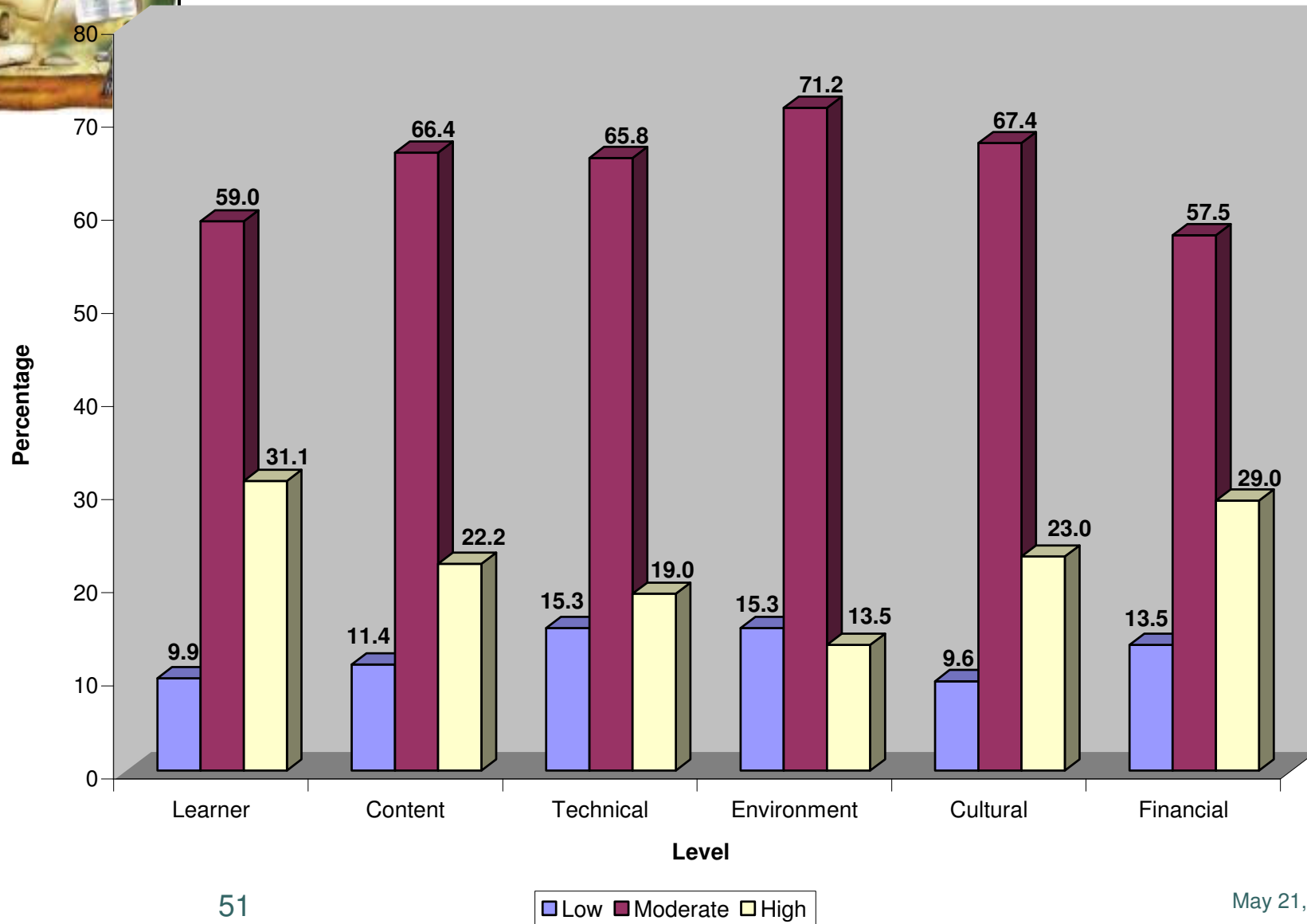


### Level of Overall Readiness among Enablers





## Level of Overall Readiness among Receivers

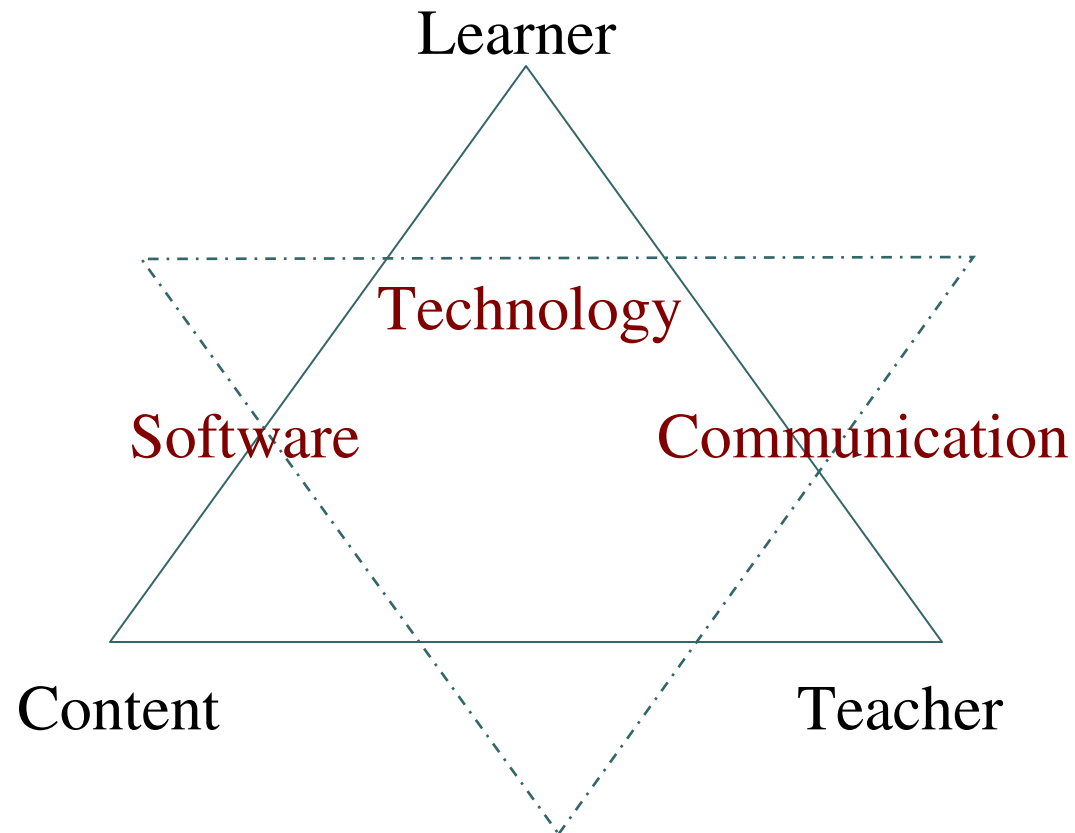




# Traditional Teaching vs E-Learning



# F2F vs Online Learning





# Teaching Styles

[web.indstate.edu/ctl/tstyle/  
tstyles3\\_instructions.html](http://web.indstate.edu/ctl/tstyle/tstyles3_instructions.html)

Evaluate your own preferred  
teaching style



# Study on Preferred Teaching Style (Anthony Grasha) in Malaysian Universities

	UNIMAS N (%)	USM N (%)	OUM N (%)	TOTAL N (%)
<b>Expert N (%)</b> 9	25 (57)	43 (57)	34 (30)	102 (43)
<b>Formal Authority N (%)</b> 4	6 (14)	10 (13)	3 (3)	19 (8)
<b>Personal Model N (%)</b> 1	5 (14)	11 (12)	14 (13)	30 (11)
<b>Facilitator N (%)</b> 13	7 (16)	12 (16)	58 (50)	77 (33)
<b>Delegator N (%)</b> 7	1 (2)	0 (0)	6 (5)	7 (3)
<b>Total N (%)</b> 34	44 (18.8)	76 (32.3)	115 (48.9)	235
<i>Chi square p value = 0.01</i>				



# Learning Styles

[www.engr.ncsu.edu/learningstyles/ilsweb.html](http://www.engr.ncsu.edu/learningstyles/ilsweb.html)

Evaluate your own preferred learning style

[www.ncsu.edu/felder-public/ILSdir/styles.htm](http://www.ncsu.edu/felder-public/ILSdir/styles.htm)





Is there something in  
between?

The middle road?

The best of both worlds?



*“The magic is in the mix!”*  
*“The beauty is in the blend!”*

<http://www.e-learningcentre.co.uk/eclipse/Resources/blended.htm>

# How to Select the Right Blend

## Audience

- What is the skill level?
- How much time to do they have?
- Are they motivated?

## Time

- Time to develop?
- Time to roll out?
- Time to complete?

## Scale

- What is the audience size?
- Will you update content frequently?

## Resources

- What is the budget?
- Can you use SMEs?
- Do you have media developers?

## Content

- Are SMEs available?
- What's the shelf-life of content?
- Are labs available?

## Business application

- What is the skill level?
- How much time to do they have?
- Are they motivated?



## The Right Mix

2 or 3 of these ingredients:

- classroom instruction
- Wb-based courseware
- CD-ROM-based courseware
- live virtual classes
- Webinars
- conference calls
- virtual labs
- simulations
- text-based job aids
- EPSS
- portals
- communities of practice
- mentors

<http://www.learningcircuits.org/2003/jul2003/bersin.htm>



# What's in a Blend?

<p><b>Live face-to-face (formal)</b></p> <ul style="list-style-type: none"> <li>• Instructor-led classroom</li> <li>• Workshops</li> <li>• Coaching/mentoring</li> <li>• On-the-job (OTJ) training</li> </ul>	<p><b>Live face-to-face (informal)</b></p> <ul style="list-style-type: none"> <li>• Collegial connections</li> <li>• Work teams</li> <li>• Role modeling</li> </ul>
<p><b>Virtual collaboration/synchronous</b></p> <ul style="list-style-type: none"> <li>• Live e-learning classes</li> <li>• E-mentoring</li> </ul>	<p><b>Virtual collaboration/asynchronous</b></p> <ul style="list-style-type: none"> <li>• Email</li> <li>• Online bulletin boards</li> <li>• Listservs</li> <li>• Online communities</li> </ul>
<p><b>Self-paced learning</b></p> <ul style="list-style-type: none"> <li>• Web learning modules</li> <li>• Online resource links</li> <li>• Simulations</li> <li>• Scenarios</li> <li>• Video and audio CD/DVDs</li> <li>• Online self-assessments</li> <li>• Workbooks</li> </ul>	<p><b>Performance support</b></p> <ul style="list-style-type: none"> <li>• Help systems</li> <li>• Print job aids</li> <li>• Knowledge databases</li> <li>• Documentation</li> <li>• Performance/decision support tools</li> </ul>

<http://www.learningcircuits.org/2003/jul2003/rossett.htm>



# Why blend in the “e”?

- Humanization of education
  - Variety of media and tools for a diversified learning
- Democratization of education
  - No learner will be shortchanged as a variety of media will be used
- Optimization of resources
  - Best use of the media based on its characteristics and potential effectiveness
- Efficiency (to “reduce” the distance and hasten the process)
  - Delivery of content
  - Last minute announcement
  - Administrative matters
  - Online socialization



## What is the best way to blend the “e” and the non-”e”?

- Meets learners’ needs with preferred learning styles
- Achieves learning objectives
- Makes it affordable
- Makes it flexible
- Makes it convenient
- Ensures learning is fun and enjoyable



# What combination of tools and media?

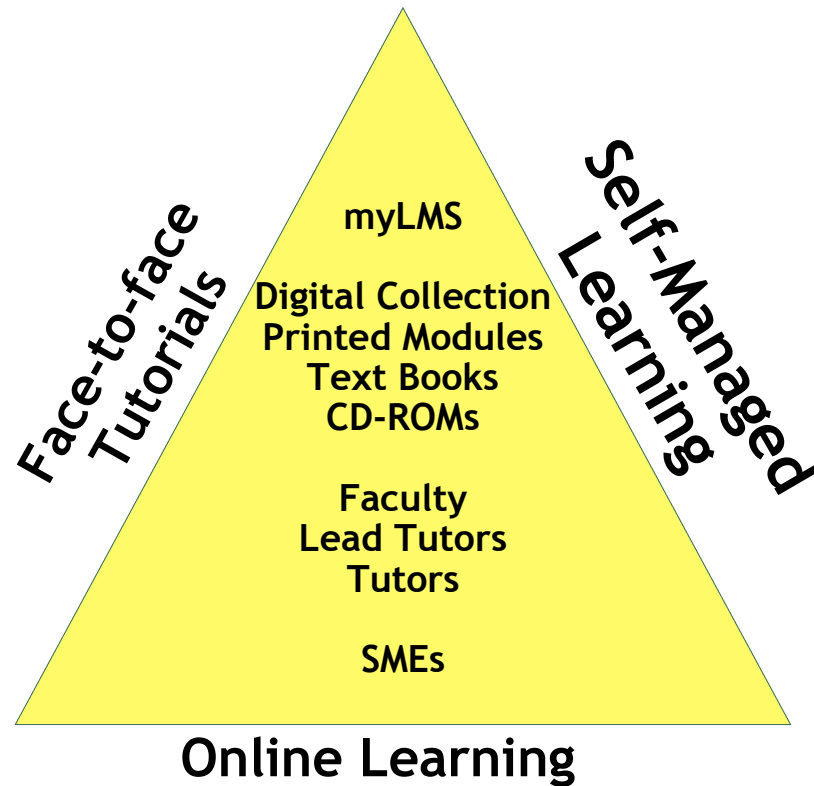
Source: <http://www.learningcircuits.org/2003/jul2003/bersin.htm>

## Media Selection Guide

Media Type	Instructional value	Scalability	Development Time	Development Costs	Deployment Costs	Assessment Capable	Trackable
CBT	High	Low	3-6 weeks	Medium	High	Medium	Low
WBT	High	High	4-20 weeks	High	Low	High	High
CD-ROM	High	High	6-20 weeks	High	Medium	High	Low
Conference calls	Low	Medium	0-2 weeks	Low	Low	No	No
Webinars	Medium	Medium	3-6 weeks	Low	Medium	Low	Low
Simulations	Very high	Medium	8-20 weeks	High	Medium	High	High
Lab simulations	Very high	Low	3-6 weeks	High	High	Medium	Medium
Job aids	Low	High	0-3 weeks	Low	Low	No	No
Webpages	Low	High	1-8 weeks	Low	Low	No	No
Websites	Low	High	1-8 weeks	Low	Low	No	No
Communities	Medium	Low	2-3 weeks	High	High	Low	Low
Mentors	Medium	Low/medium	4-6 weeks	Medium	Medium	No	Low
Video	High	Medium	6-20 weeks	High	High	No	Low
EPSS	Medium	Medium	8-20 weeks	Medium	Medium	No	Medium



# Blended Learning at OUM







# E-Resources



# Interesting Places to Visit

- E-Learning Guru
  - [www.e-learningguru.com](http://www.e-learningguru.com)
- E-Learning Centre
  - [www.e-learningcentre.co.uk](http://www.e-learningcentre.co.uk)
- E-Learningpost
  - [www.elearningpost.com](http://www.elearningpost.com)
- Intl Council for Open and Distance Learning
  - [www.icde.org](http://www.icde.org)
- AACE
  - [www.aace.org](http://www.aace.org)
- Puzzlemaker
  - <http://puzzlemaker.school.discovery.com/>
- eLearning Scotland
  - [www.elearningscotland.org](http://www.elearningscotland.org)
- Online Learning Europe
  - [oleurope.blogspot.com](http://oleurope.blogspot.com)
- The Commonwealth of Learning
  - [www.col.org](http://www.col.org)
- Elearnspace
  - [www.elearnspace.org](http://www.elearnspace.org)
- eCornell Research Blog
  - [researchblog.ecornell.com](http://researchblog.ecornell.com)
- CyberMusings
  - [zwa.blogspot.com](http://zwa.blogspot.com)



# Session B



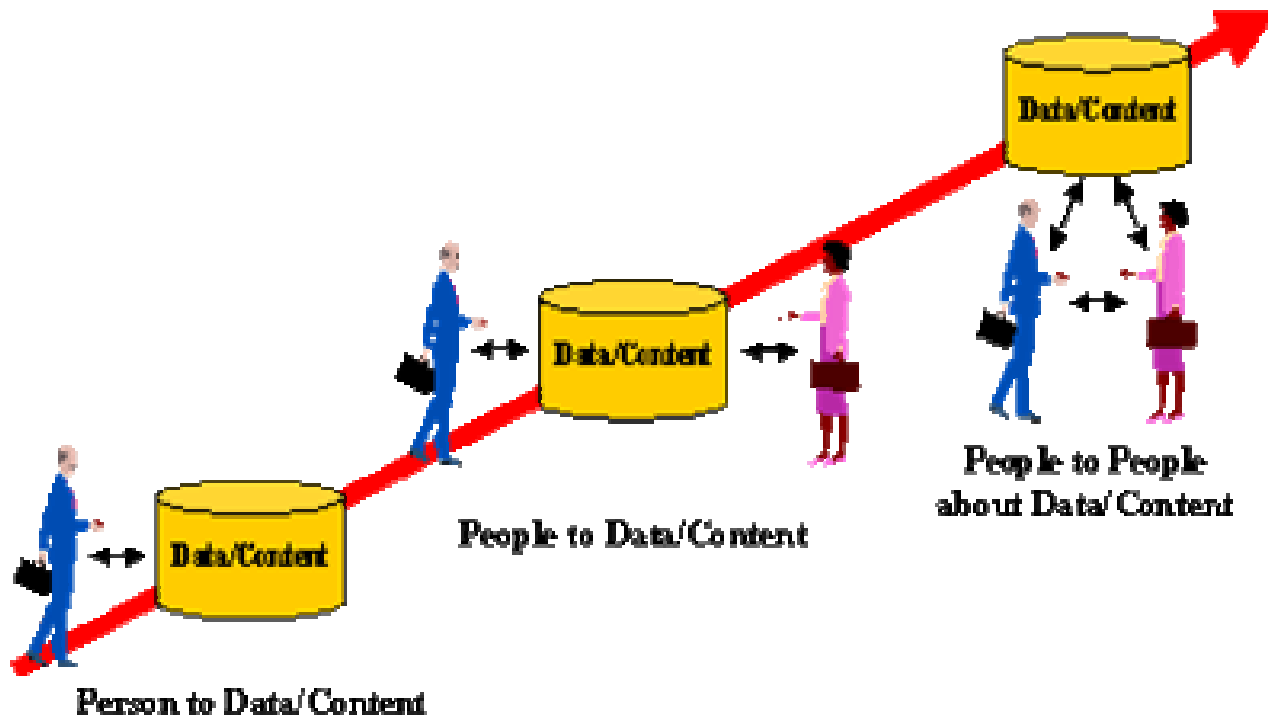
# Collaborative Online Learning (COL)

Example of a COL Discussion



# The Evolution of Interaction

Source: [http://www.collaborate.com/publication/newsletter/publications\\_newsletter](http://www.collaborate.com/publication/newsletter/publications_newsletter)



***OUMH1103***  
***Example***

***OUMH1103***  
***Assignment***



# Descriptive Definition of COL@OUM

The underlying **principles** of COL are interaction, collaboration and knowledge construction.

This **interactive and recursive process** encourages individuals to support each other in attaining learning goals.

Learners and facilitators **contribute** to the process of knowledge construction by providing ideas and opinions, sharing experiences and simultaneously engaging in deep learning activities.

Source: OUM COL Model, Aug 10, 2004



# Discussion Forums: The Philosophy

- **Interaction** as a bedrock to learning: social, intellectual and cognitive interaction
- Learning is a **social activity** based on the construction of knowledge through interactive means
- **Adult learners** benefit most from the constructivist approach to learning
- **Collaboration** as a foundation for more holistic learning experience, e.g. sharing, motivation, teamwork, development of critical thinking skills
- **Humanizing** education through e-means--social presence online

Source: OUM COL Model, Aug 10, 2004



# The OUM COL Model







# Components of the OUM Collaborative Online Learning

## Online Forum

### ○ COL Assignment

- Build analytical and critical thinking skills
- Learn together
- Share ideas, opinions, knowledge and resources
- Develop teamwork
- Encouraging, giving and receiving feedback

### ○ General

- Learning skills/  
Guidance on understanding content
- Help develop learning skills
- Support for social needs
- Support for technical issues



# Learning Activities for Discussion Forums

1. Free-flow discussion forum
2. Peer review discussion forum
3. Moderator-led discussion forum
4. Presentation discussion forum
5. Debate discussion forum
6. Learner-led discussion forum
7. Individual case study discussion forum
8. Team case study discussion forum
9. Individual journal discussion forum
10. Group project discussion forum
11. External discussion forum
12. Buzz group discussion forum
13. Brainstorming discussion forum
14. Role-play discussion
15. Seminar discussion
16. Simulation discussion forum

Source: Jolliffe, A.; Ritter, J. & Stevens, D. (2001).  
**The online learning handbook: Developing and using web-based learning.**  
London: Kogan Page, pp. 52-57.



# Some of the benefits

- Build analytical and critical thinking skills
- Learn together
- Share ideas, opinions, knowledge and resources
- Develop teamwork
- Encouraging, giving and receiving feedback

Source: OUM COL Model, Aug 10, 2004



# Learning Management System (LMS): Purpose, Use and How to Derive Benefits



# myLMS@OUM

myLMS v3 :: [Open University Malaysia] :: - Microsoft Internet Explorer

File Edit View Favorites Tools Help

Back Forward Stop Home Search Favorites Refresh Print Mail News RSS Feeds

Address <http://webmail.oum.edu.my/main/default-frame.php?> Go Links

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[myCourse](#) [myUniversity](#) [myCommunity](#) [myMail](#) [Help](#) [System Admin](#) [Change Password](#) [Signout](#)

**myCourse Search**

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**Search The Web**

Search

**Good Evening zoraini**

Name : Assoc Prof Dr Zoraini Wati bt M Abas  
Date Today : 18 May 2005  
Email Address : zoraini@oum.edu.my  
Last Login : Wednesday 18th May 2005 09:45:53 AM  
Theme : Ocean Blue

**myAnnouncement**

Learner Connexions for OUM Learners [Show](#)

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1 MYLMS TRAINING ( MLMS1001 ) [\[i\]](#)

**myCourse you are registered in :**

1 TUTOR TRAINING ( ODLPC1001 ) [\[i\]](#)

**myCourse Catalog**

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- 2 [Bachelor in Management](#)
- 3 [Bachelor in Information Technology](#)
- 4 [Diploma in Management](#)
- 5 [Diploma in Information Technology](#)
- 6 [Bachelor in Information Technology & Management](#)
- 7 [Bachelor in Multimedia Communication](#)
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- 9 [Bachelor of Education \(Mathematics\)](#)
- 10 [Bachelor of Education \(TESL\)](#)
- 11 [Bachelor of Education \(Civil Engineering\)](#)
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- 17 [Master of Information Technology \(ULR\)](#)
- 18 [Master of Competitive Intelligence](#)
- 19 [Bachelor in Management Technology](#)

[Browse myCourse Catalog](#)

ODLPC1001

start [Online Learning\\_ver2...](#) [Open University Mala...](#) [myLMS v3 :: \[Open U...](#) [Online Learning.ppt](#) [myLMS v3 :: \[Open U...](#) Internet 6:28 PM



# myLMS Demo and Hands-On

Used by > 30,000 learners and > 2,200 tutors



# Benefit for Teachers

- Interact with students in between classes
- Answer students' questions
- Efficiently disseminate useful information to students
- Communicate anytime systematically
- Build closer relationship with students
- Identify students' weaknesses and strengths
- Discuss other things not covered in class
- Can motivate students/help students/more guidance/provide advice
- Easy access, anywhere, anytime
- Provide notes – digital drop box
- Especially helpful for “quiet” students in class



# Benefit for Students

- Get extra “teaching”
- Get guidance, motivation
- Can ask questions they don’t understand
- Smooth learning: doing assignment + clarification
- Share knowledge
- Can air worries
- Faster communication
- Students gain Internet experience
- Learn “power of IT” and communication
- 3-way communication
- Source of information
- Mutual support (academically and socially)
- Learning from each other
- Critical thinking
- Better understanding
- Flexible way of communication
- More opportunities to communicate
- Create independent learning





*Online you get to know your students'  
minds not just their faces.*

*Harasim, L., Hiltz, S.R., Teles, L., and Turoff, M. in Learning Networks: A  
Field Guide to Teaching and Learning Online.*

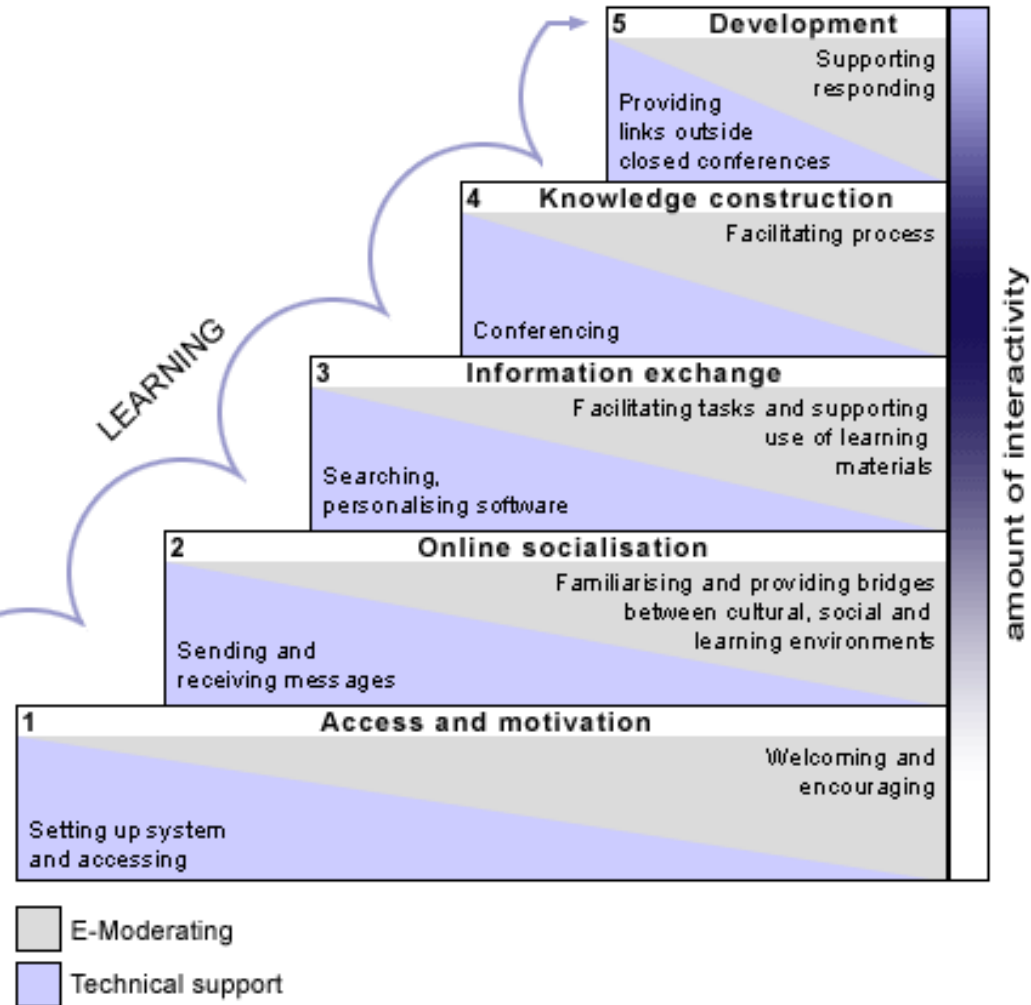


# Building the Online Learning Communities

Preparing them for constructivist learning.



# Salmon's Stages of Discussion Forums



<http://www.e-tivities.com/stage1.asp>



# Resources

- Gilly Salmon's
  - <http://www.e-tivities.com/home.asp>



# Online Assessment Rubrics

Category	Description	Marks
Frequency of Contributions	Contributions have been regular and varied without long lapses between postings	2
	Learner has been present online but postings have been few and far between; student has been a lurker more than an active contributor	1
	Learner is rarely or never present online	0
Quality of Contributions	High quality contributions focused on task; strong evidence of learner having generated discussion, analysed information, drawn conclusions and helped create a lively debate	3
	Contributions have been focused on the task; some evidence of analysis, sharing and teamwork	2
	Contributions have been minimal with little evidence of sharing and teamwork	1
	Few or no contributions have been made toward the discussion or task	0
TOTAL		



# E-Learning Enculturation

Everyone

Everywhere

All the time



# Early vs Late Adopters

The ASTD E-Learning Handbook, p. 265

	<b>Early Adopters</b>	<b>Late Adopters</b>
Response to change	Respond to change as it occurs. Perceive opportunities enthusiastically.	Initially, they wait
The learning task	Early adopters learn along the way, incrementally	For late adopters, the learning task is that of “catching up.”
Appreciation for technology	In keeping pace with change, early adopters experience the technology “in the trenches” as it evolves with plenty of war stories to tell. Thus, they appreciate the advantage of today’s technology versus that of days gone by. Furthermore, they share a common understanding and appreciation for technology with other early adopters. They value technology.	Coming into the game late, late adopters lack experience with older versions of the technology as it evolved and, therefore, have difficulty sharing the early adopters’ enthusiasm. With high expectations, and no historical perspective, they don’t value technology that much and are less willing to put up with the troublesome nature of getting up to speed on technology.



# What it takes to enculturate E-Learning

- Top-Down
  - Articulating the benefits
  - Provide strong leadership
  - Ensure management commitment and support
  - Ensure necessary skills and knowledge
  - Emphasize rewards and results
- Addressing the digital gaps, technology everywhere
- Everyone does it...it is normal!
- There's only one way about it
- Decision → habit → culture





# Hands-on Task

- Develop a learning activity for a Discussion Forum for a topic in a course of your choice.
  - Identify the type of learning activity (refer to Joliffe, Ritter & Stevens' list)
  - Define/spell out the learning activity
  - Indicate when and how the discussion forum will be implemented
  - Describe how the activity will be assessed
  - Present this to the group



# COL Success Factors

- Purposeful
  - Both tutors and students know what lies at the end
  - Constructive means to an end
- Meaningful/Practical
  - Discussions are related to course objectives and students can relate/apply
- Engaged/Involved
  - Students are drawn to the issues discussed
- Stimulating
  - Students want to go in often/be active/contributing/sharing
- Intellectually rewarding
  - Students go away with new knowledge/skills/attitude



# Sample Task 1

Faculty of Information Technology & Multimedia Communication

CBOP3203 Object-Oriented Programming

**Problem-based Task:** You are a ticketing agent in Malaysia Airlines and you have been given three applications for ticketing automation. Based on your knowledge of interface, usability and functionability, identify the strengths and weaknesses of each application.

**No. of students per group:** 3-4

**Online Forum requirements:** Discuss the task based on the following:

- (i) *Criteria for evaluating interface, usability and functionability*
- (ii) *How each application works according to the criteria you have identified*
- (iii) *How to ensure collaboration among group members*
- (iv) *The content of the report*

**Deliverables:** (i) A report on the criteria chosen and related evaluation, as well as the strengths and weaknesses of each application.

**Assessment:** (i) Content of report (ii) Format and presentation of report  
(iii) Individual contribution to the online forum



# Sample Task 2

Faculty of Science and Foundation Studies SBPH2103 Motion, Fluids and Waves

**Scenario:** A rocket is designed to place small payloads into orbit and is carried to an altitude of 12 km above sea level by a converted airliner. When the airliner is traveling in a straight line at a constant speed of 800 km/hr, the rocket is dropped. After the drop, the airliner maintains the same altitude and speed and continues to fly in a straight line. The rocket falls for a brief time, after which its rocket motor is activated. Once this happens, the combined effects of thrust and gravity give the rocket a constant acceleration of magnitude  $4.00g$  directed at an angle of  $30^\circ$  above the horizontal. For reasons of safety, the rocket should be at least 1.00km in front of the airliner when it climbs through the airliner's altitude.

**Task:** Your task is to determine the minimum time the rocket must fall before its engine starts. Ignore air resistance.

**No. of students per group:** 4-5

**Online Forum requirements:** Discuss the task based on the following:

- (i) *Motion in 2 or 3 dimensions*
- (ii) *Application of relevant Kinematics equations*
- (iii) *How to ensure collaboration among group members*
- (iv) *Presentation and interpretation of the diagram and graphs*

**Deliverables:** Your answer should include (i) A diagram and related description of the flight paths of both the rocket and the airliner, labeled at several points with vectors for their velocities and accelerations (ii) An  $x-t$  graph showing the motions of both the rocket and the airliner (iii) A  $y-t$  graph showing the motions of both the rocket and the airliner. On the diagram and the graphs indicate when the rocket is dropped. (iii) Physical reasoning depicted in online discussion forum

**Assessment:** (i) Correctness of graphical representation (ii) Indication of minimum time from visuals

Adapted from: Young, H. & Freedman, R. (2000) *University Physics* (p.91). SF: Addison –Wesley.



# Sample Task 3

Faculty of Business & Management

BDPP 3103 Pengantar Pengurusan

**Research-based Task:** In *Becoming a Manager: Master of a New Identity*, Linda Hill conducted interviews with 19 people in their first year as managers. To learn first hand what it's like to be a manager, interview two managers that you know, asking them the same questions that Hill asked her managers. Interview one person with at least five years' experience as a manager and then interview another person with less than two years' experience as a manager.

**Composition of group:** Whole class

**Online Forum requirements:** Discuss the task based on the following:

- (i) *Questions you should ask the managers*
- (ii) *Findings related to interviews*
- (iii) *How class members can share data and findings*
- (iv) *Structure and content of the report*

**Deliverables:** (i) A report based on procedures and findings (ii) Appendix of data from interviews, including questions, transcripts and/or photographs.

**Assessment:** (i) Content of report— comparison of experiences of two subjects and related conclusions (ii) Presentation of report— format and organization (iii) Individual contribution to the online forum



# What have we achieved so far?

- What did the COL students say?
- What did the tutors say?
- What do YOU say?



# What did COL students say?

*Memudahkan pelajar untuk  
berbincang dan bertukar pendapat  
serta pandangan dalam  
menyaipkan tugas dan  
mengulangkaji pelajaran*

*Because it help student for  
enhance their knowledge  
and critical learning process.*



# What did tutors say?

“Well I found this to be very much easier. In fact all the answers are provided by the students themselves. Tutors act as facilitators. Most of my responses are very short and what I do is I will try my level best to motivate each and every individual in the online discussion.”

“I found this to be the best approach. It has indirectly motivated the students to participate actively in the forums, unlike before, whereby students hardly communicated with their peers and tutors.”





*We need to bring learning to people  
instead of people to learning.*

*Elliott Masie, Masie Center*



# Issues and Implementation

What are some of the challenges?  
What are the solutions?  
List them on a piece of paper.



# Some of the issues?

- Changing the preferred teaching style of teachers
- Changing the preferred learning style of learners
- Building online learning communities
- Engaging the learners in deep learning
- “High-touch” in “high-tech”





# An Implementation Model for E-Learning

Enculturation





# ICT Infrastructure

- Bandwidth
- Affordability
- Accessibility
- Digital Divide



# LMS Platform

- Technology-driven or pedagogy-driven?
- Instructor/Learner-friendly
- Choice
- Buy or build?
- Outright purchase or licensing
- Standards compliant



## Online and Offline Pedagogies

- Appropriateness
- Effectiveness
- Efficiency
- Active/Engaged Learning



## Course Design and Development

- Be a team player:
  - Course facilitator
  - Program coordinator
  - Learner liaison/learning counselor
  - Instructional designer
  - Graphic designer
  - Technology personnel/Web master/help desk
  - Resource personnel/librarians/research assistants/guest appearances
  - Administrative personnel/marketing/





# Course Design and Development

- New Skills
  - Communicating with team members and learners
  - Understanding the virtual environment
  - Being comfortable with new online related pedagogies
  - Understanding the learners
  - Using multiple interaction channels (asynchronous/synchronous)
  - Forming personal relationship -- hi-touch
  - Planning/creating course materials ahead of time
  - Scheduling guest experts for special appearances
  - Searching/Identifying resources
  - Adhering to copyright laws/ethical procedures
  - Planning for shortfalls / technology failure



# Faculty Issues

- Ready to teach
  - Attitude
  - Trained - ICT literate and comfortable
  - ICT equipped
  - Effective communication/e-Moderating skills
  - Motivated (“carrot” or “stick”)
- Prepared and flexible (allow for learners’ input)
- Setting S.M.A.R.T. goals for students



# Student Issues

- Ready to learn
  - Attitude
  - Trained - ICT literate and comfortable
  - ICT equipped
  - Effective e-Moderating skills
  - Motivated (“carrot” or “stick”)
- Active participation online: creating, sharing, learning from each other
- Self-motivated & self-directed
- Time-management
- Respect and “listening” to course-mates
- Pro-active in overcoming challenges



# Policy Issues

- To support research, commitment, enculturation and standards



# Standards

- Quality Assurance Process
- Before
  - Potential quality of the learning materials/methods?
  - Is there a better alternative?
- During
  - Obstacles: What and How?
  - Maintaining learner motivation
  - How could the implementation/materials/pedagogy be improved?
- After Instruction
  - Future improvements?
  - Interesting, valuable and meaningful?
  - Effective?



# What do you say?



# Where do we go from here?

- Suggestions?



# Conclusion: Benefits of e-Learning

- E-Learning lowers costs
- E-learning enhances business responsiveness
- Messages are consistent or customized
- Content is more timely and dependable
- Learning is 24/7
- Universality
- Builds community
- Scalability
- Leverages the corporate investment in the Web
- Provides an increasingly valuable customer service

Source: Rosenberg (2001). E-Learning: Strategies for Delivering Knowledge in the Digital Age. New York: McGraw-Hill





*I am always ready to learn,  
but I do not always like being taught.*

--Sir Winston Churchill



*Moving from the one-room schoolhouse  
to the one-world schoolhouse is now a reality.*

*Cisco Systems*



Thank you!