Standards education in Korea
- From Kids to CEOs -

3rd ICES Workshop
2008. 2. 21
Gaithersburg, NIST
Standards Education System in Korea

- Elementary
- Middle School
- High School
- University
- UEPS
- Business

- Standards Olympiad
- Sub chapter for school textbook
- Training
Standards Education System in Korea

UEPS
- Textbook revision
  - Student participation
- E-learning
  - Textbook
  - Camping

Primary & Middle & High school

OJT Training

Training
- Professional training
  - Technology-oriented seminar
- E-learning

Camping
4. Enhancing Private Sector standards activities

4-3 Develop human resource for standards activities

▷ Educating university students the significance and value of standards

▷ Training company staffs for standards activities
Objectives

To Improve the ability for developing and facilitating standards
To Establish strong basis for international standardization activities

Audience

Anyone in Business, Research Institutes, Public Organizations related to Standards
Professional Training

Contents

① Strategic Application of Standards
- importance of standardization, current int’l standards activities

② Improving Standards Writing Skill
- measurement methods, SI units, standard-making practice

③ Global Standardization Leader
- Int’l standardization procedure, developing standards template

④ Practical English in int’l standardization meetings
- Int’l etiquette, role playing for Int’l standardization meeting, P/T
Professional Training

Teaching Method

2 day course
University (UEPS)

University Education Program on Standardization

Objectives

- To expose students to standards
- To Build up ground for developing potential capability of private sector standards

Audience

- University Undergraduates
  - UEPS is operated voluntarily by individual universities
Contents

Ch1. Standardization Overview
Ch2. International Standardization
Ch3. Standardization in Korea
Ch4. Company & Standards
Ch5. Measurement standards
Ch6. Conformity assessment
Ch7. Standards & IPR
Ch8. Standardization in future society
University (UEPS)

Teaching Method

- Team-teaching
- 2~3 units
- Major/ liberal arts
- Junior/Senior Students (but not limited to)
- Field trip
- Seminar
- Paper contest
- Term project (PT)
- Essays
- Class discussion
- e-learning
University (UEPS)
Student’s comments after completing UEPS

I never knew that standards can be found everywhere.

Standards experts are the real contributors to a brighter future.

Would you let me know how to become a standard expert?

Now I can see that standards are what really make the world go around.

Boring !!!
Too many things to memorize.
Team-teaching is quite good but sometimes get confused.
UEPS Step by step

- **2004**
  - UEPS Program
  - Government Support
  - KSA Support
- **2008**
  - Aware
  - Promote
  - Develop
  - Complete
- **Future**
  - ABEEK or Mandatory course
  - Own Program
  - 1~2 professor
  - University Support

Time

University Participation
Objectives
To make students recognize the importance of standardization starting from secondary education

Contents
Substances related to standardization are carried into the regular curriculum in the secondary education

Teaching Method
High school – Engineering & Technology, 2012)
Middle school – Technology & Housework, 2011)
Middle & Elementary school (Summer camps)

Objectives
To make students recognize the importance of standardization, science& technology

Audience
From 5, 6th graders in elementary school to 1st, 2nd graders in middle school

Contents
Substances related to standardization are carried into the regular curriculum in the secondary education

Teaching Method
Special lectures, Team assignment activities regarding standards
Elementary & Middle school (Summer camps) - Character design (Pictogram)
SI Unit Poster Design
/Design a National Flag

STANDARDS

m, A, s, cd, kg, mol, Km

17 21
18 22
19 23
20 24
Standards in Train railway
/Balls in different sizes/
## KSA-MOCIE Standards Education

( Unit : persons )

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- Technology-oriented standards education is not included
- Pilot program for Department of Standards is not included
Customer Satisfaction
- RATER Analysis -

**Reliability**
Operator = KSA, Gov.

**Assurance**
Team-teaching = Field specialist

**Responsiveness**
Network/secretariat = seminar/KSA

**Tangibles**
Textbook, Education materials = Future society & PPT material Website

**Empathy**
Easy/sexy = examples/Fieldtrip
Future Action

1. Department of standards at University

2. Standards Society

3. Standards professional Accreditation system
Just as “Education is a 100-year plan for a nation”, We hope this ICES workshop will be a 100-year plan for the future of standards education
Thank you for your attention

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Korean Standards Association