

The Postsecondary Education Network-International (PEN-International) is a program housed at the National Technical Institute for the Deaf at Rochester Institute of Technology in the USA. Since 2001, NTID has received more than \$5 million in grants from The Nippon Foundation of Japan to support PEN-International.

Introduce PEN team and recognize those in attendance.

### Topics for Today's Presentation

- RIT/NTID, Home of PEN-International
- PEN-International
- Areas of Collaboration
- Future Directions



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Today, we will present on these four topic areas.

### RIT Information

- Founded in 1829
- Students
  - o ~13,000 Undergrad
  - o ~2,400 Graduate
- 1,500 Acre Campus
- Home of PEN-International





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RIT houses NTID—one of the eight colleges of the university. RIT was founded in 1829 and has evolved into a major international technological university.

There are approx. 15,000 students enrolled at RIT, including 1,250 deaf students.

### NTID Students, Faculty & Staff

#### 1250 Students

700 Sub-baccalaureate Programs, 475
 Baccalaureate Program at RIT, 75 Graduate
 Students

#### 475 Faculty & Staff

o 200 Faculty, 165 Staff, 110 Interpreters

#### Support During a Year

 80,000 Interpreter Hours, 40,000 Note Taker Hours, 20,000 Tutoring Hours



NTID is one of the eight colleges of RIT and enrolls 1,250 deaf students. About 43% (number is growing) are mainstreamed in other colleges of RIT with support services provided by NTID. The remaining 57% students are in subbaccalaureate degree programs at NTID.

NTID is home of PEN-International.

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#### Nippon Foundation of Japan

- Improve Education in Participant Countries
- Establish International Network
- Provides Funds for PEN-International

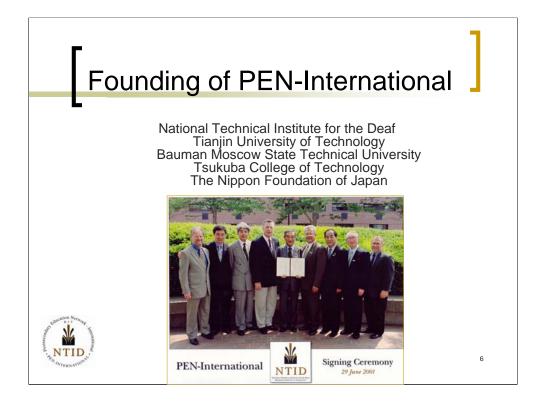




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The Nippon Foundation is a grant-making organization based in Japan that provides financial assistance for activities to improve the quality of living of people around the world. Their assistance is in such fields as healthcare, agriculture, education and disability. The Nippon Foundation provides the funding to NTID for PEN-International.

As a result, The Foundation supported NTID's proposal to develop an international network to improve postsecondary education for deaf student.



June 29, 2001, Rochester, NY

Key delegates from universities in Russia, Japan, China, and NTID/RIT signed a resolution committing to excellence, integrity and innovation to begin a unique, collaborative network to improve high-tech education and career options for their deaf residents. The signing of the resolution on 29 June 2001 marked the official start of PEN-International.

### PEN-International Goals

- Improve Teaching, Learning and Curriculum Development
- Increase the Application of Technology to Teaching and Learning
- Expand Career Education Opportunities for Deaf and Hard-Of-Hearing People Around the World



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Internationally, there are a limited number of postsecondary education programs for people who are deaf/ hh (Brelie, 1999) but more countries are developing programs and services.

Generally, these institutions have worked in isolation.

This led NTID to seek ways where it could serve as a facilitator to improve the postsecondary education of deaf people around the world—particularly in developing countries.

This is one of the main reasons for the creation of PEN.



The vision for PEN-International: develop an international network to enhance and maintain local capability and global networking at each participant postsecondary institution.

Institutions will be moved from **importers** of 'know how' to **self-sufficiency**. As the project progresses, each institution will develop the capability to **export** what has been learned to other postsecondary institutions in their own countries serving deaf/ hh students.

This project is intended to move institutions from **importer** to **self-sufficiency** to **exporter**.

This model applies to all participants in the network. An institution with a particular expertise might serve an exporter of 'know how' to other institutions, while at the same time importing 'know how' in which it is lagging. Eventually, each participant will become the major exporter of 'know how' in its home country.

NTID serves as the facilitator for the international network. Each of the other participant institution are **nodes** on the international network. The network serves as an innovation-dissemination vehicle for improving the postsecondary education of people who are deaf/ hh.

The network fosters an educational ripple effect.

PEN works to address locally defined needs and strives not to impose solutions on institutions. An operating principle has been as follows: "All participants will work in partnership to determine solutions that meet the needs defined in each participant country."

### Implementation Strategy

- Training & Faculty Development
- MultimediaComputer Centers
- Online and WWW Resources
- Evaluation & Research





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There are four strategies that are fundamental components of the PEN-International implementation strategy.

We will cover each in this presentation.

# **PEN-International Partners**

- NTID (USA)
- Tsukuba College of Technology (Japan)
- Tianjin University of Technology (China)
- Beijing Union University (China)
- Changchun University (China)
- Zhongzhou University (China)
- College of St. Benilde (Philippines)
- Bauman Moscow State Tech University (Russia)
- Institute of Social Rehabilitation at Novosibirsk State Technical University (Russia)
- Vladimir State University Center for the Deaf (Russia)
- Academy of Management "TISBI" at Kazan (Russia)
- Charles University (Czech Republic)
- Ratchasuda College (Thailand)



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Internationally, there are a limited number of postsecondary education programs for people who are deaf or hard of hearing (Brelie, 1999) but more countries are developing programs and services.

These are the PEN-International Partner Institutions. We will provide a brief introduction to each institution.

# National Technical Institute for the Deaf (USA)

- Established in 1968 on the campus of RIT
- Approx. 1250Students
- 475 Faculty/Staff





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NTID at RIT is the home of the international headquarters of PEN-International.

### Tsukuba College of Technology

- Established in 1990
- Technical College for Deaf Students
- Approx. 200 Students





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The Government of Japan chartered Tsukuba College of Technology in October 1987 by amending the Japan Law for Establishing National Schools. In April 1990, the first class of deaf students entered the Division for the Hearing Impaired at the college. One year later, the first class of blind students entered the Division for the Vision Impaired.

The Division for Hearing Impaired provides state-of-the-art curriculum in design, mechanical engineering, architectural engineering, electronics and information science.

Currently approx. 200 deaf students enrolled.

### Tianjin University of Technology

- Established in 1991
- First Technical College in China
- Approx. 125 Students





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Tianjin Technical College for the Deaf of Tianjin University of Technology (TUT) is the first technical college for the higher education of people who are deaf in China.

Established in 1991, the college enrolls students from throughout China.

125+ deaf students study technical disciplines such as information technology, graphic design, and fashion design.

#### Beijing Union University (China)

- University Established in 1985
  - Program for Deaf StudentsEstablished in 1999
- Approx. 125 Deaf Students





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China's <u>Beijing Union University</u> (BUU), founded in 1985, is a multidisciplinary institution offering humanities, science, social science, natural science, technological science, and management science programs to 12,000 students.

The University's Special Education College was created in 1999 and serves more than 125 deaf students who study art design, decorating and advertisement, gardening, and office automation.

### Changchun University (China)

- Established in 1987
- Approx. 200 deaf students





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China's <u>Changchun University's Special Education College</u> was established in 1987. It is the oldest and largest postsecondary program for disabled students in China.

More than 200 deaf/hh who study in the college's fine arts and graphic design programs.

On 9 January 2004, the PEN Multimedia Facilities were officially dedicated at the Special Education College of Changchun University. The university houses the oldest postsecondary education program for people who are deaf in China.

### Zhongzhou University (China)

- Founded in 1980
- Approx 10,000 students, 200 deaf students
- Special Education
   Institute established in 2002, only Higher Special Education Institute in China's
   Midwest region.





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A MOU was signed with Zhongzhou University in Zhengzhou, China, in March 2005.

Nine colleges in the university, including an institute for special education.

Approx. 200 Deaf/ hh students study CAD, information technology, fashion design, and ceramics.

7 sign language interpretation students.

# De La Salle College of Saint Benilde (Philippines)

- School of Deaf Education and Applied Studies of DLS
- -College of Saint Benilde
- Serves approx.150 deaf students





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Vision is to be a leader in deaf education by offering programs that are responsive to students' needs, conducting research on innovative strategies for holistic development, establishing international linkages, and empowering students by preserving deaf heritage and nurturing Filipino deaf culture.

Offers self-contained classes taught by signing instructors.

Three departments: Office for Partnership and Development/ PEN; Office for Academic Programs; and Office for Deaf Esteem and Formation.

## Bauman Moscow State Technical University (Russia)

- Deafness Center Started in 1990
- StudentsMainstreamed
- Approx. 250 deaf students





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A very high ranked university in Russia, like MIT is to the USA.

BMSTU has been educating deaf students since 1934. In the early 1990's, university administration, to expand programs and services for deaf students, established the Center on Deafness.

Approx. 250 students study in various programs in the university as well as in compensatory programs at the Center on Deafness.

# Institute of Social Rehabilitation at Novosibirsk State Technical University (Russia)

- Founded in 1950
- 18,000 students
- Institute est. in 1993 to provide high tech education to individuals with disabilities





Approx. 296 deaf students

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University has 3 institutions: social rehabilitation, remote education & additional professional education.

## Vladimir State University Center for the Deaf (Russia)

- Center of Professional Rehabilitation of the Deaf est. in 1994
- In 2002, became experimental platform for education and social support to deaf children
- Approx. 60 deaf students





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University is a leader in deaf education.

In 2003, the university program "The Development of Professional Education", was adopted by the Legislative Assembly of Vladimir region, and interregional Center of Professional Education and Social Rehabilitation of the deaf was founded.

In 2004, Ministry of Education established an educational and methodic center at VSU that serves people with disabilities.

Deaf/hh students enrolled in computer systems of management in industry and business higher education programs.

# Academy of Management "TISBI" at Kazan (Russia)

 Has provided secondary & higher professional training to individuals with disabilities via the internet, since 2001



Approx. 24 deafstudents



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TISBI developed a customized software program that provides students with 'virtual environment of social communication, partnership and cooperation' from the comforts of their own home.

Students being trained in industries and professions in most current demand

82 students with disabilities in the distance learning programs, 24 of which are deaf/ hh

#### Charles University (Czech Republic)

- StudentsMainstreamed
- Serves
   Approximately 120
   Special Needs
   Students; Approx.
   24 deaf students





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The Czech Republic's <u>Charles University</u> in Prague is the oldest university in central Europe.

Founded in 1348 by King Charles IV, the University enrolls 41,000 students at the bachelor's, master's, and doctoral levels. Among the University's population are 120 students with special needs, including 24 deaf students. They provide English instruction.

# Ratchasuda College Mahidol University (Thailand)

- Founded in 1991
- Approx. 89 deaf
- students





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Thailand's Ratchasuda College of Mahidol University the first and only education institution in southeast Asia dedicated to providing tertiary education for deaf students. The college consulted with worldwide leaders in education of the deaf in formulating its curriculum.

Majors include deaf education (emphasis on bi-bi), ceramics, sign language interpreting, computers & fashion design.



There are PEN-International sites around the world—most are in the Asia-Pacific Basin.

### Implementation Strategy

- Training & Faculty Development
- Multimedia Computer Centers
- Online and WWW Resources
- Evaluation & Research



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We will now discuss each of the four implementation strategies.

### Training & Faculty Development

- Needs Assessment
- Objective-based Workshops
- Teachers Sharing with Teachers
- Formative & Summative Evaluation





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#### 1. Training and faculty development

PEN-International is a faculty development program that is based on needs at each partner institution. Objective-based workshops are designed to meet those needs. Some are developed in the USA and some are developed at partner sites. All are funded and supported by PEN-International.

Skilled and knowledgeable faculty members share what they have learned with their colleagues. These experienced faculty members are the experts used for PEN-International training.

## PEN Activities— Recent Accomplishments

- February 2005- Trip to Thailand by NTID faculty Rico Peterson and Patrick Graybill, Instruction of sign language
- March 2005- Trip to China by PEN faculty Jim DeCaro and Bill Clymer, signing with Zhongzhou University in Zhengzhou
- Haiku competition with students at NTID and Tsukuba College of Technology, Japan
- March 2005- two delegations of students and faculty groups from Japan visit NTID
- May 2005- NTID student delegation visit Japan.
- May 2005- visits to postsecondary institutions in Russia by Jim DeCaro and NTID VP/Dean Alan Hurwitz.



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A selection of our most recent activities.

## Current & Upcoming PEN Activities

- June 2005- International Instructional Technology symposium at NTID with 45+ international reps.
- July 2005- PEN representation at International Congress on Education of the Deaf (ICED), Maastricht, Holland.
- November 2005- Visit by CSB- Philippine faculty to NTID.
- July 2006- First-ever Leadership Institute for Deaf/hh postsecondary students, England.



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Share statistics on inst. Technology symposium, e.g. number of participants, workshops, post-workshops, etc.

November 2005 counselor skills development training for CSB delegates

Leadership institute to take place for 20 students total (4 from each institution) from NTID, Tianjin University of Technology, Tsukuba College of Technology, BMSTU, and CSB at Herstmonceux Castle in East Sussex, England.

#### Multimedia Computer Centers

- Support Student Learning
- Support Faculty Development of Materials





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PEN set up the infrastructure for an international collaborative and cooperative postsecondary educational network. These labs are locate at each of the major PEN-International sites around the world. These serve as the primary **design**, **development**, **teaching**, **learning**, **instructional and outreach centers** for PEN.

### Lab Specifications

- Smart Classroom Technology
- Display Computer, Video, Objects
- Local Area Network
- 12 -18 Student Computer Stations





Videoconferencing

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For example, a technology-based multi-media learning laboratory was established at CSB. The lab/classroom serves the needs of the school and expanded their instructional technology capabilities.

It includes: the WWW portal, videoconferencing network technology, local area computer network connected to the WWW, smart-classroom technology (e.g., smart blackboards), and instructional technology (e.g., multi-media technology). The lab is where students learn and where faculty develop and use innovative technology for the teaching of deaf students.

This is the CSB lab in the Philippines.

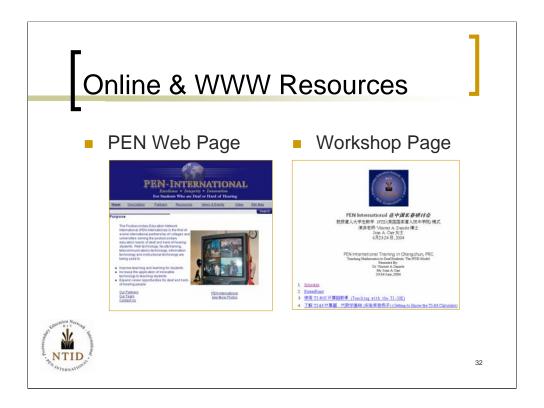
## Recent Accomplishments – PEN Multimedia Labs

- New Laboratories Opened in Beijing Union University & Changchun University, 2003 - 2004
- Tianjin University lab enhanced, 2004
- Changchun University lab enhanced, 2005
- Labs are used an average of 32 Hours per Week for Course Work



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This slide presents only three examples of what has occurred in PEN's labs. Considerably more has been accomplished.



All PEN-International training materials and resources are available for anyone who wish to access them via the WWW site. PEN has attempted to be as paperless as is possible.

### Redesign of PEN Web Pages

- Goals
  - To Improve Dissemination of Resources
  - To Improve Usability
- Strategies
  - Web Site Architecture
  - Content Organization & Delivery
  - Accessibility



Search Engine

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We currently have a contract with a company to improve PEN website and user interface.



Evaluation of workshops, seminars, materials and presentations is a fundamental component of the PEN approach to teaching, learning and instructional development. All evaluation reports, research papers and presentations at conferences are posted on the PEN WWW site, available to the public.

We often hire outside experts for evaluations.



In addition, PEN prepares reports that are presented to all partner institutions and to our sponsor, The Nippon Foundation of Japan. These documents are also available on the WWW.

4th annual report

#### Evaluation & Research: Workshops

- Training in USA
- Follow-up Training in Country
- Training of Others in Country
- Regional Training





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There are 4 levels of training conducted by PEN-International.

#### Generally:

- 1. A team from a partner institution is brought to the USA for training designed to meet their needs. For example, we are designing training on counselor skills development for CSB in November 2005, upon their request.
- 2. Follow-up training is conducted in the home country either by teleconference, by a live presenter or by a combination of both.
- 3. Faculty members trained are then expected to train colleagues at their home institution. This is usually done with some level of support from experienced trainers.
- 4. Once this happens, the partner institution initiates training of those who educate deaf people at the postsecondary level in other institutions in their country.

In effect, there is a training ripple effect.

# Evaluation & Research: Cultural Exchanges

- Student Trips
- Haiku Competition
- WWW Design Competition
- Faculty Exchanges







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International cultural exchanges are fostered. They expose participants to the culture of other countries and introduces them to technologies used in other countries.

The underlying philosophy of these exchanges is as follows: to strengthen each participant's cultural and personal identity while simultaneously helping each develop an understanding of diverse cultures.

Student trips- a way for institutions to expose their students to the realities of the world they will face after graduation.

Haiku competition - took place this spring. Between Tsukuba College of Technology in Japan and NTID. 4 students were here in March, and 4 students went to Japan in May.

WWW competition- approx. 4 institutions participated. Students had to design websites for their own programs. The winners received Kodak cameras.

Faculty exchange- faculty from Thailand were at NTID in November 2004, and 2 NTID faculty went to Thailand in March 2004. Can be as long as 3 weeks.

The pictures are the CSB delegation that visited NTID and the NTID delegation that visited Bauman.



Before we end, we would like to mention four areas to which we will be turning our attention over the next few years.

Institutions are encouraged to accept the responsibility to become leaders in their country for promoting the postsecondary education of deaf students.