**Domestic and International Trends in Rehabilitation Research:**

**A Comparative Analysis**

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Title Slide- Domestic and International Trends in Rehabilitation Research: A Comparative Analysis. A webcast sponsored by SEDL’s Center on Knowledge Translation for Disability and Rehabilitation Research (KTDRR). Funded by NIDRR, US Department of Education, PR# H133A120012. © 2014 by SEDL

Slide 1- Domestic and International Trends in Rehabilitation Research: A Comparative Analysis. Dan Conley, MLS, John Stone, PhD, Icons of the University at Buffalo, The State University of New York, CIRRIE- Center for International Rehabilitation Research Information and Exchange, and NIDRR

Slide 2- Purpose

Identify similarities and differences between rehabilitation research in the U.S. and outside the U.S.

Slide 3- Approach

* Used the **CIRRIE** database of international research and **Rehabdata** database of research mainly in the U.S.
* Common thesaurus used to generate a comprehensive list of topics
* Compared publication trends since 1997
* CIRRIE-NARIC collaboration

Slide 4- The CIRRIE Database

* Over 150,000 citations
* Non-U.S. articles only
* From 1990-Present
* Journal articles only
* Screened/imported by CIRRIE staff

Slide 5- The Rehabdata Database

* Over 96,000 citations (68,000 journal articles)
* U.S., with some international
* From 1956-present
* Journal articles, books
* Citations sent to NARIC staff

Slide 6- Scope of the Study

* 1997-2011
* CIRRIE: 132,536 citations
* Rehabdata: 17,581 citations (U.S. articles only)
* Includes only 96 disabilities/conditions

Slide 7- Method

* Generate list of research topics based on common thesaurus.
* To minimize the overlap of topics, focus was on 96 specific disabilities or conditions.
* Health and function focus.
* Assign rank to topics in each database.
* Based on frequency of publications.

Slide 8- Method (cont.)

* Correlation between the two ranked lists  
  was computed.
* The top 10 topics in CIRRIE were compared with their ranking in Rehabdata.
* The top 10 topics in Rehabdata were compared with their ranking in CIRRIE.
* The comparison was done for the entire period and for each 5 year period.

Slide 9- Results

Slide 10- Rank Order Correlation of Published Topics between CIRRIE and Rehabdata

Table with two columns labeled Period and Spearman rho.

Row 1: Column 1- Total period (1997 to 2011) Column 2- 0.52

Row 2: Column 1- 1997-2001 Column 2- 0.75

Row 3: Column 1- 2002-2006 Column 2- 0.53

Row 4: Column 1- 2007-2011 Column 2- 0.41

Slide 11- Most Published Research Topics in the Two Databases

Table with 5 columns- Rank, CIRRIE, Percentage CIRRIE based on a total of 132,536 articles, Rehab Data, Percentage Rehabdata based on 17,581 articles

Row 1- Rank 1, CIRRIE- Psychiatric Disabilities, Percentage CIRRIE- 10.24, Rehabdata- Stroke, Percentage Rehabdata- 14.00

Row 2- Rank 2, CIRRIE- Stroke, Percentage CIRRIE- 5.53, Rehabdata- Spinal cord injuries, Percentage Rehabdata- 13.06

Row 3- Rank 3, CIRRIE- Cardiac disorders, Percentage CIRRIE- 4.62, Rehabdata- Brain injuries, Percentage Rehabdata- 12.43

Row 4- Rank 4, CIRRIE- diabetes, Percentage CIRRIE- 4.48, Rehabdata- psychiatric disabilities, Percentage Rehabdata- 7.20

Row 5- Rank 5, CIRRIE- Dementia, Percentage CIRRIE- 3.37, Rehabdata- Developmental disabilities, Percentage Rehabdata- 7.11

Row 6- Rank 6, CIRRIE- Obesity, Percentage CIRRIE- 3.26, Rehabdata- Intellectual disabilities, Percentage Rehabdata- 6.26

Row 7- Rank 7, CIRRIE- Arthritis, Percentage CIRRIE- 3.07, Rehabdata- Visual impairments, Percentage Rehabdata- 5.36

Row 8- Rank 8, CIRRIE- anxiety disorders, Percentage CIRRIE- 2.57, Rehabdata- deafness, Percentage Rehabdata- 2.99

Row 9- Rank 9, CIRRIE- sleep disorders, Percentage CIRRIE- 2.51, Rehabdata- autism, Percentage Rehabdata- 2.78

Row 10- Rank 10, CIRRIE- cancer, Percentage CIRRIE- 2.39, Rehabdata- multiple sclerosis, Percentage Rehabdata- 2.69

Slide 12- Rank Order in CIRRIE for the Top 10 in Rehabdata (1997-2011)

Table with 3 columns CIRRIE Rank, CIRRIE Term, Rehabdata Rank

Row 1- CIRRIE Rank 1, CIRRIE Term psychiatric disabilies, Rehabdata Rank 4

Row 2- CIRRIE Rank 2, CIRRIE Term Stroke, Rehabdata Rank 1

Row 3- CIRRIE Rank 3, CIRRIE Term cardiac disorders, Rehabdata Rank 18

Row 4- CIRRIE Rank 4, CIRRIE Term diabetes, Rehabdata Rank 20

Row 5- CIRRIE Rank 5, CIRRIE Term dementia, Rehabdata Rank 34

Row 6- CIRRIE Rank 6, CIRRIE Term obesity, Rehabdata Rank 37

Row 7- CIRRIE Rank 7, CIRRIE Term arthritis, Rehabdata Rank 13

Row 8- CIRRIE Rank 8, CIRRIE Term anxiety disorders, Rehabdata Rank 45

Row 9- CIRRIE Rank 9, CIRRIE Term sleep disorders, Rehabdata Rank 52

Row 10- CIRRIE Rank 10, CIRRIE Term cancer, Rehabdata Rank 33

Slide 13- Rank Order in CIRRIE for the Top 10 in Rehabdata (1997-2011)

Table with 3 columns REHABDATA Rank, REHABDATA Term, CIRRIE Rank

Row 1- REHABDATA Rank 1, REHABDATA Stroke, CIRRIE Rank 2

Row 2- REHABDATA Rank 2, REHABDATA Term Spinal cord injuries, CIRRIE Rank 20

Row 3- REHABDATA Rank 3, REHABDATA Term brain injuries, CIRRIE Rank 14

Row 4- REHABDATA Rank 4, REHABDATA Term psychiatric disabilities, CIRRIE Rank 1

Row 5- REHABDATA Rank 5, REHABDATA Term developmental disabilities, CIRRIE Rank 35

Row 6- REHABDATA Rank 6, REHABDATA Term intellectual disabilities, CIRRIE Rank 19

Row 7- REHABDATA Rank 7, REHABDATA Term visual impairments, CIRRIE Rank 23

Row 8- REHABDATA Rank 8, REHABDATA Term deafness, CIRRIE Rank 48

Row 9- REHABDATA Rank 9, REHABDATA Term autism, CIRRIE Rank 33

Row 10- REHABDATA Rank 10, REHABDATA Term multiple sclerosis, CIRRIE Rank 30

Slide 14- Limitations

* Not all areas of rehabilitation research included (e.g., employment, assistive technology)
* Even among “conditions” may be some overlap
* Different levels of specificity
* Based on *frequency* of publication (rather than quality, investment, importance)

Slide 15- Implications & Future Analyses

* Identifies relative emphases in research in the U.S. and elsewhere. *May* reflect policy and funding priorities.
* Other comparative analyses are possible. E.g.:
  + Different regions (e.g., North America and Europe, North America and Asia
  + Specific countries (e.g., U.S. and Brazil)
  + Suggestions for analyses of interest to NIDRR grantees

Slide 16- Thank you!

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