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Asking what matters[1]: A first step towards improving return to work (RTW) outcome measurement

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Presentation Overview

- *Objective: present study that produced a stakeholder generated conceptualization of successful RTW*

- *Focus: Concept mapping method*

- *Future research directions*

Current RTW Outcome Measures

- no standard, universally accepted, valid RTW outcome[6,8,12]

- use administrative measures e.g. time on benefits, working/not working, total amount of benefits paid out etc. [11,12] of interest mostly to payers

- lack information about the health and well-being of the worker and the ***SUCCESS*** or quality of the RTW[2,3,8]

"health is created and lived by people within the settings of their everyday life: where they learn, work, play and love." (WHO, Ottawa Charter for Health Promotion, 1986)

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Mixed-methods Research

- **Worldview** – real and perceived lack of trust and respect among RTW stakeholders[3], need to instill trust and respect among participants and with overall results by allowing all parties to have an equal voice and to have evidence of transparency of the process

- **Supports pragmatic approach** – recognition of multiple realities and values[4] and biased and unbiased perspectives [7]

- **Rationale** – to understand more fully, generate deeper and broader insights that respect a wider range of interests and perspectives [9]

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Question

- What do key RTW stakeholders identify as being indicators of successful RTW?

- *(What should be measured? How is successful RTW defined? When is the RTW process successfully completed?)*

Objective

- Develop equitable, participatory, and credible multi-stakeholder driven definition and conceptualization of successful RTW

- *(determine **WHAT** RTW outcomes of are interest and importance to stakeholders)*

Method - Concept Mapping

- Integrated concept mapping definition "*Creates a stakeholder-authored visual geography of ideas from many communities of interest, combined with specific analysis and data interpretation methods, to produce maps that can be used to guide planning and evaluation of issues that matter to the group*"[10]

- technically used for program planning and evaluation

- recognizes participants have multiple realities and values, and biased and unbiased perspectives [6]

- uses a mixed-methods approach, meaning data is analyzed both quantitatively and qualitatively

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Concept Mapping Steps

1. Preparation/recruitment
2. Brainstorming/statement generation
3. Sorting and rating
4. Generation of maps (analysis)
5. Interpretation of maps
6. Utilization

Participants

- Recruited from London area via email using snowball technique to match two broad groups – RTW consumers and providers

- Had to have worked in ON at least 5 yrs with fluent English

- Screened to ensure no consumer and provider has past or current relationship or contact

- 24 participants, 12 consumers, 12 providers

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Statement Generation

- Used an Appreciative Inquiry approach[5] (focus on ideal situation not on their own negative experience)

- Focus prompt *"One thing that indicates a worker has successfully RTW is…"*

- 49 statements generated (all are accepted)

- Statements are a means of getting at concepts

- Statements DO NOT equal item generation

Sample Statements

One thing that indicates a worker has successfully RTW is…

- the ability to perform the same job the worker performed prior to the injury.

- colleagues are accepting and welcoming of the worker in the same way that they were prior to the injury.

- the ability to work an entire shift without causing interference with the worker's other life roles.

- the worker is able to maintain his/her recovery (mental health or physical injury).

- no co-workers are disadvantaged by the (temporary/ permanent modified or accommodated) work duties being completed by the worker.

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Sorting and Rating (& questionnaire)

- Each participant was mailed a package

- 4 demographic type questions: provider or consumer, specific category, years of experience in RTW and knowledge about RTW (poor, fair, good, expert)

- Each participant sorts each of the statements into groups that make sense and each group is given a name

- Each participant rates each of the 49 statements on scale of relative importance from 1-5; 1 = relatively unimportant and 5 = extremely important, (asked to rate how importance statement is to them as a consumer or as a provider)

- Then asked to rate how important they think the other group would think the statement was (i.e. if workers would rate how they thought providers would rate and vice versa)

Demographics of Sort/Rate Participants

- 15 returned pkgs

- 10 providers, 5 consumers (3 providers also fit consumer category)

- 3 DM/OHN, 3 OT, 3 PT,1 insurance adj

- 3 inj worker, 1 spouse inj worker, 1 legal rep (2 providers also inj workers and 1 spouse inj worker)

- RTW knowledge - 11 good/excellent, 1 poor

- Yrs of exp in RTW 4.5 to 20

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Map Generation (analysis)

- Data entered into software program (www.conceptsystems.com)

- Sorted data is analyzed by multidimensional scaling (MDS- basically equivalent to factor analysis)

- Sort data converted into association matrix representing possibilities of paired statements

- MDS yields x/y values for each statement that are used to plot the point map

Multidimensional Scaling Point Map
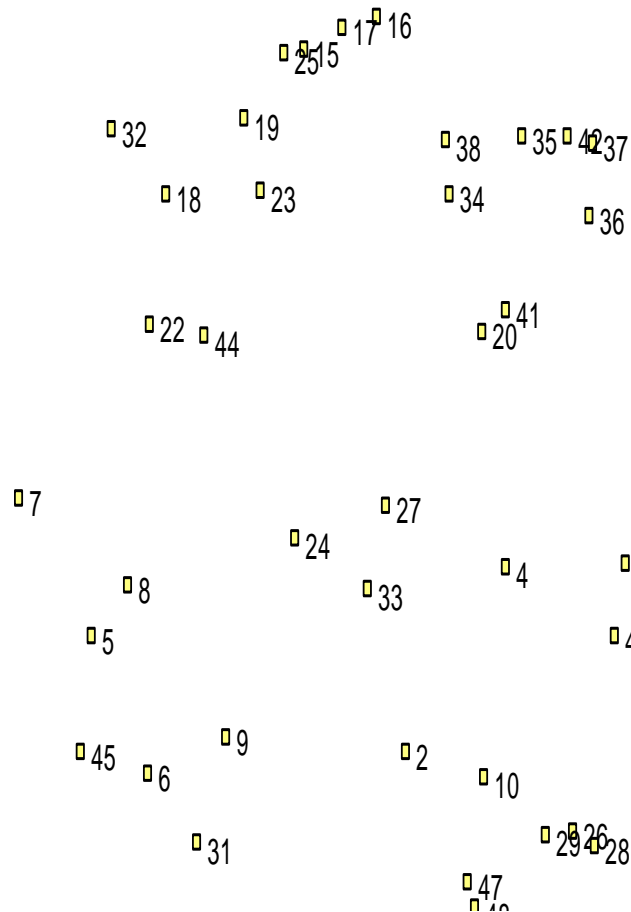
- 2-dimensional, relational graph (can be oriented in any way)

- Numbers represent the order statements were generated but no value to number

- The closer points are the more participants sorted together and more likely statement share a concept
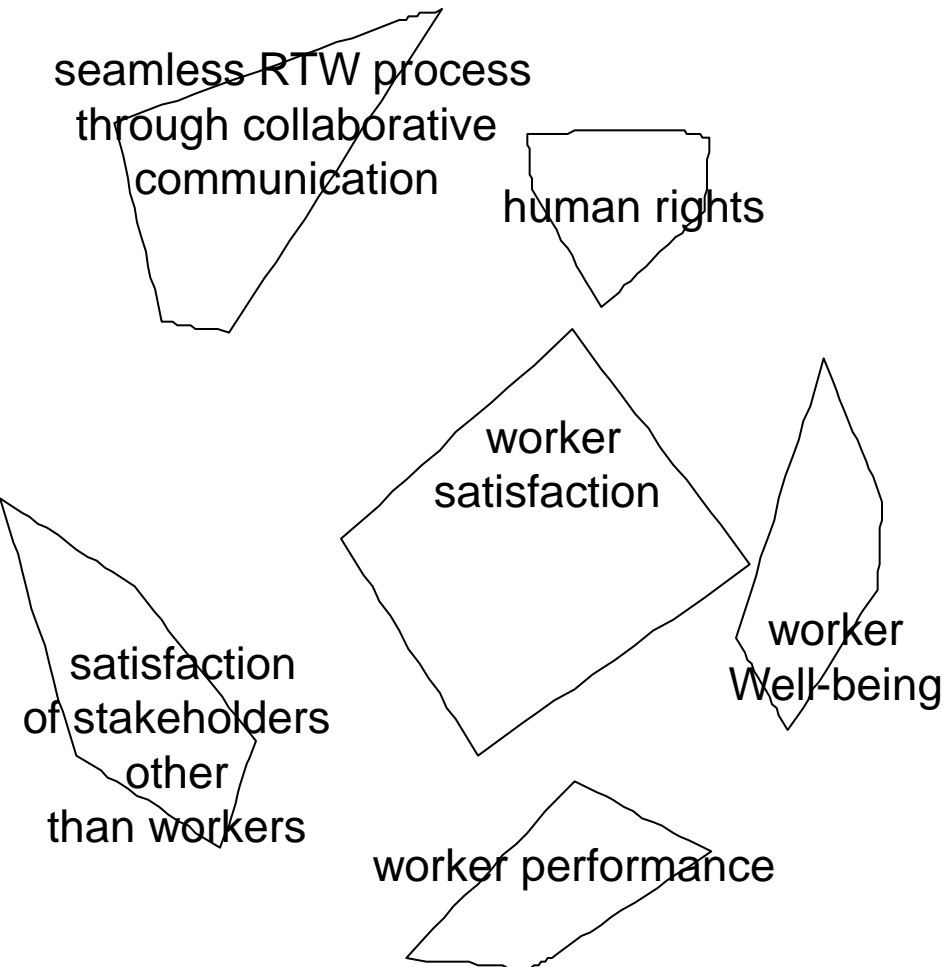
Map Generation (cont.)

- The point map is converted into a cluster map via hierarchical cluster analysis

- Analysis produces a bridging value for each statement

- Small bridging value = anchor statement, representative of that area of map

- Large bridging value = bridge statement, links different areas of the map

- Prior to group interpretation the investigators decided on a base number of clusters following a standard protocol

Interpretation Session

- All participants invited back for interpretation session but only 9 attended

- 6 providers (of which 2 were also consumers) and 3 consumers

- Presented with analysis of sort data (point map, cluster map, bridging values)

- Group first decided on names of clusters = concepts

- Presented with a 7 cluster map which they discussed and altered to a 6 cluster solution

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Cluster Map

seamless RTW process through collaborative communication

human rights

worker satisfaction

satisfaction of stakeholders other than workers

worker Well-being

worker performance

- Larger cluster = less cohesive concept

- Smaller cluster = cohesive concept not how many statements make up cluster

- Clusters close together likely have some similarity or relationship

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Examples of statements and bridging values

48. the number of hours being worked by the worker is comparable to pre-injury/illness (.00)

1. the worker is performing his/her pre-injury/illness job or occupation (.01)

11. the worker is able to work 85% or more of the pre-accident essential duties (.04)

47. the worker is performing permanent and sustainable work (.07)

3. the worker is performing his/her assigned work at a level that is equal to what any healthy employee would be expected to do (.07)

26. the worker's ability to perform the tasks or job he/she performed prior to the injury (.12)

10. the worker is earning a wage that is comparable to the pre-injury wage (.16)

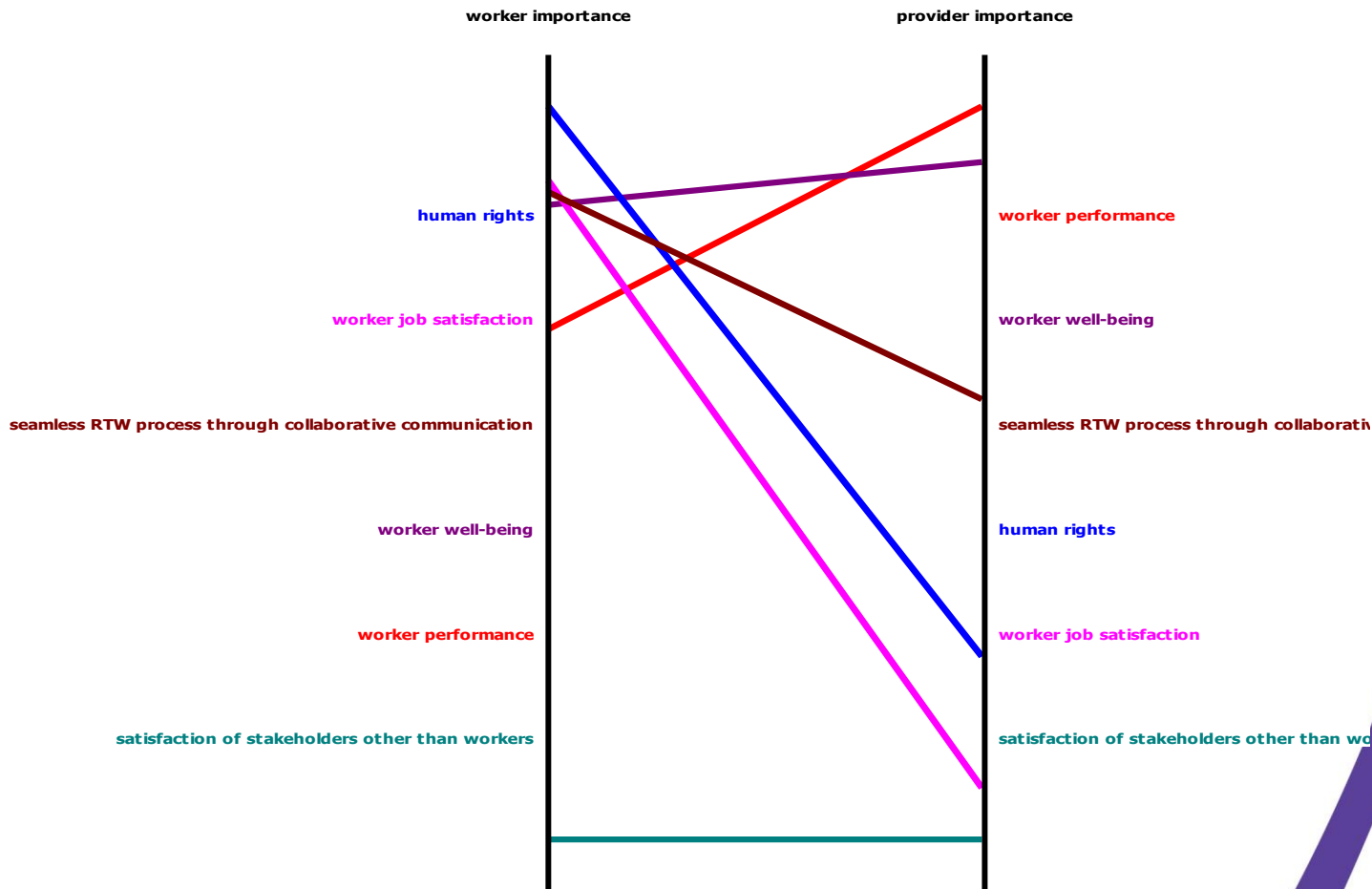29. the ability to work entire shift without causing interference into the worker's other life roles (.17)

Conceptualization of Successful RTW

1. worker performance
2. worker well-being
3. human rights
4. satisfaction of stakeholders other than workers
5. worker job satisfaction
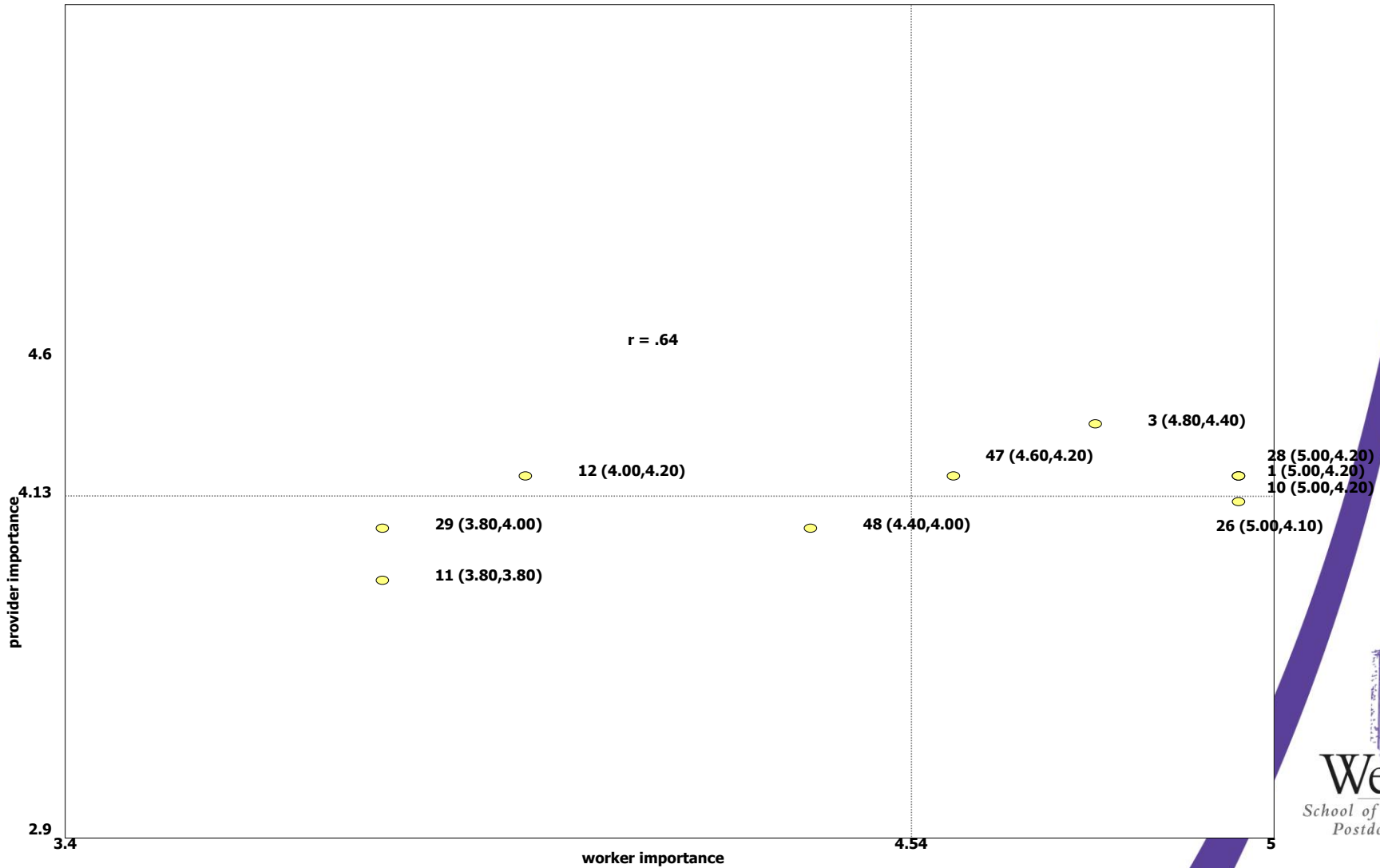6. seamless RTW process through collaborative communication

Rating Data

- Rated data is correlated between consumers and providers (Pearson correlation) and represented in ladder graphs and 2 dimensional 'go-zone' graphs

- Essentially showed that average ranking of clusters was not well correlated between providers and consumers, however, there were statements within clusters that both groups found more important as indicated by go-zones

- Rating data was presented to utilization group to assist with how the findings could be used

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Correlations between all concepts of worker and provider rated importance

Worker Performance Go-Zone

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r = .64

provider importance

worker importance

Label	Coordinates
3	(4.80,4.40)
47	(4.60,4.20)
28	(5.00,4.20)
1	(5.00,4.20)
10	(5.00,4.20)
12	(4.00,4.20)
29	(3.80,4.00)
48	(4.40,4.00)
26	(5.00,4.10)
11	(3.80,3.80)

Axis values: 4.6, 4.13, 2.9 (provider importance); 3.4, 4.54, 5 (worker importance)

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Utilization

- Recruited RTW researchers
- Presented concepts, statements, bridging values and rating data (particularly go-zones)
- Asked to
  1. Confirm/validate that names of concepts reflected meaning based on statements
  2. Offer suggestions on; how this conceptualization might be used to improve RTW outcome measurement, existing measures that might measure concept and/or alternate ways of measuring concepts

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Preliminary Utilization Findings

- 6 participants mostly from Toronto area
- General agreement that concepts covered factors normally encountered in research and literature
- Concern that employers were under-represented
- Ambivalence re: issues around RTW process and outcome, can you measure one without the other

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Suggestions for rewording of concepts

1. worker performance >**work function**
2. worker well-being >**worker recovery**
3. human rights >**human decency and respect, protection of human rights, expectation of human rights**
4. satisfaction of stakeholders other than workers> **satisfaction of work outcomes, stakeholder perspectives of work**
5. worker job satisfaction> **desirability of work outcome**
6. seamless RTW process thru collaborative communication>**supportive and collaborative RTW process**

Issues needed further clarification

- RTW as process and outcome -Can the 2 issues be separated?

- temporality of measuring outcomes -Can we really just measure RTW at one point or is measuring the outcome even a process?

- Who should be measured and do the measuring?

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Newest member

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