

interRai suites: what is available and what is the difference?

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ICCER and interRAI share goals

- ICCER is a partnership of practitioners, researchers, educators and learners collaborating to provide the best care and quality of life for those served by the continuing care system.
- interRAI is an international collaborative aiming to improve the quality of life of vulnerable persons through a seamless comprehensive assessment system. We strive to promote evidence-informed clinical practice and policy decision making through the collection and interpretation of high-quality data about the characteristics and outcomes of persons served across a variety of health and social services settings.

Advancing practice

- Common language
- Common measures used by clinicians and researchers
- Evidenced informed policy decisions based on all persons
- Demonstrating value to clinicians, administrators and policy makers

interRAI “Technology” of Assessment

- Items in multiple domains with standardized response categories- accepted as standard by Infoway Canada
- Careful design and scientific testing
- Responses informed by clinical expertise and other information and observation
- **Signals need** for intervention in planning care and further assessment
- Common language – facilitates interprofessional communication
- Common elements across settings/instruments

interRAI “Technology” of Assessment- continued

- Computerized Clinical information on individual patients helps support other applications
- Quality indicators of an organization’s performance
- Research on prediction and outcomes to improve care
- Cross-sector and cross- national comparisons
- Evidence based decision support for clinicians, administrators and policy makers

“Generations” of assessment systems

Clinical domains First generation
(presence & risk) assessment

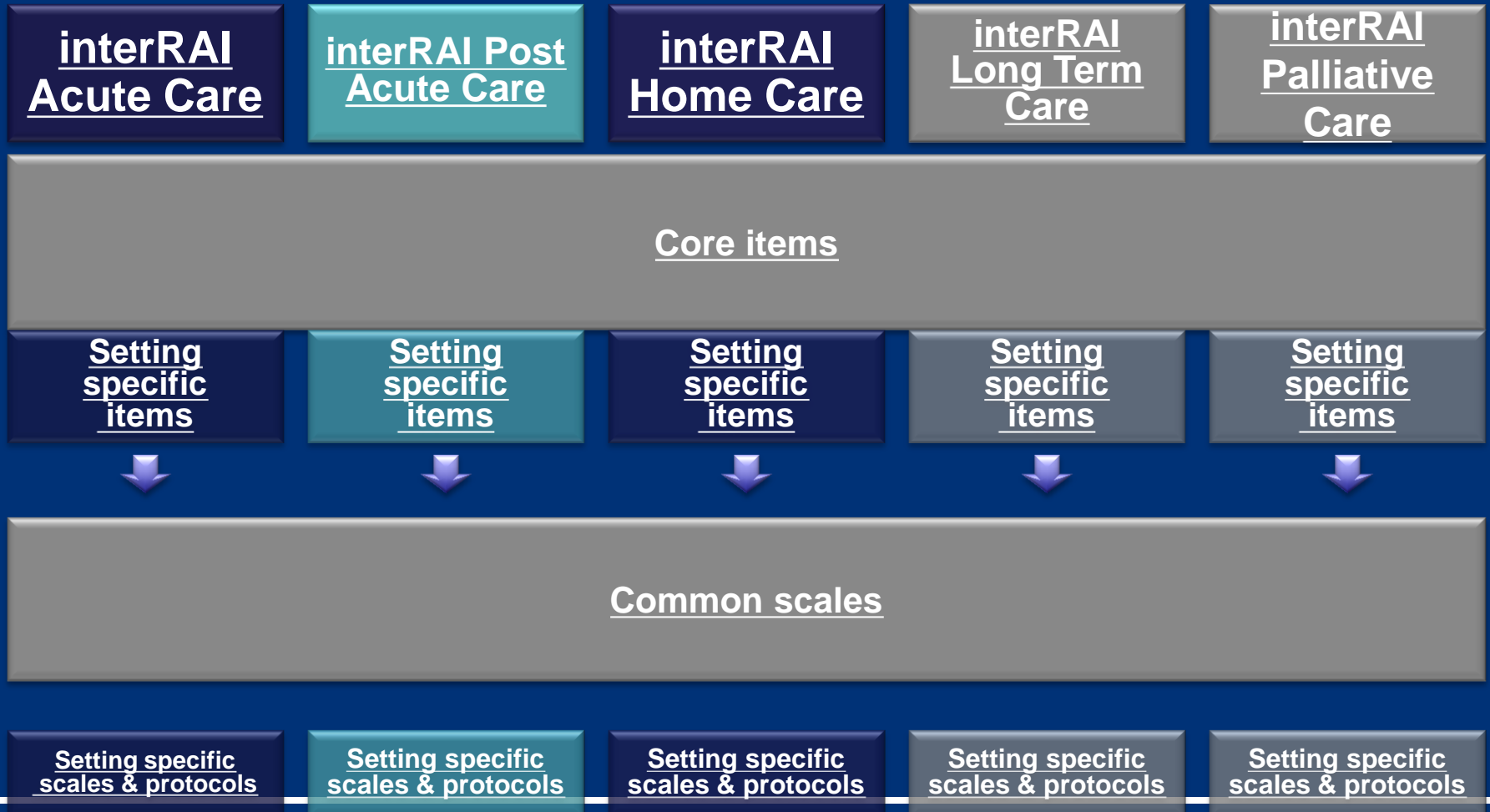
<u>Cognition</u>	<u>MMSE / CAM</u>
<u>Mood</u>	<u>GDS</u>
<u>Self care</u>	<u>Barthel</u>
<u>Mobility & falls</u>	<u>TUG / Berg</u>
<u>Continence</u>	<u>?</u>
<u>Nutrition</u>	<u>MNA</u>
<u>Pressure ulcer</u>	<u>Braden</u>

Second generation
assessment

<u>Cognition</u> <u>Mood</u> <u>Communication</u> <u>Mobility</u> <u>Self care</u> <u>IADL</u> <u>Continence</u> <u>Falls</u> <u>Pain</u> <u>Social support</u> <u>Formal services</u>	<u>Derivative scales</u> <u>Cognitive scale</u> <u>Delirium scale</u> <u>Depression scale</u> <u>Communication scale</u> <u>ADL scale</u> <u>IADL scale</u> <u>Pain scale</u>
	<u>Clinical action points</u> <u>Cognition , delirium, depression, falls, pain, ADL, nutrition, readmission, institutional risk</u>

Third generation assessment systems

The interRAI suite



InterRAI organization

- Board
- Committees

- Networks:
 - Acute/Post Acute
 - Aging and Integration
 - Mental Health

Acute Care/Post Acute network

- interRAI AC
- interRAI AC-PAC
- ED screener/ AUA- assessment urgency algorithm
- ***In progress***
- Hospital Admission Nursing Assessment (NZ initiative)
- Outpatient Rehab assessment
- Primary care

Features of AC-PAC

- Fewer items
- Time frame: 24 hrs vs 3 days in HC or LTC
- Specific assessment of pre-morbid items
- Columns: premorbid; admission; at discharge with potential for assessment interim if a longer stay patient

Newer examples

- Emergency screener: Similar to contact assessment
- AUA is initial screen: an app on a hand-held device signals need for more assessment
- Admission nursing assessment – has triage structure-

Aging and Integrated Care Network

- MDS 2.0/ interRAI- LTCF
- Contact assessment
- RAI-HC-/ interRAI HC
- interRAI CHA (community health) + supplements (functional, MH, deafblind, assisted living)
- Check UP (CCRC, [Khayelitsha](#), S. Africa)

Aging and Integrated care- cont'd

- InterRAI- PC palliative care
- Self reported quality of life for LTC, Home and community care, seniors' residences,
- In progress:
- Caregiver assessment (Ireland initiative)
 - Cancer supplement?- to guide treatment decisions
 - Mild cognitive impairment supplement for memory clinics

Comparisons

- interRAI LTCF is shorter than MDS 2.0
- interRAI HC is shorter than RAI-HC
- Both can trigger current CAPS and common scales
- interRAI CHA- adopted in Ontario for community support agencies
- interRAI CHA +functional supplement=interRAI HC

Response changes

- Adl example:
- Zero is only used if fully independent in last 3 days
- 6- fully dependent in last 3 days

2. SELF-REPORTED MOOD

- Ask: “In the last 3 days, how often have you felt”
-
- a. Little interest or pleasure in things you normally enjoy?
- b. Anxious, restless, or uneasy?
- c. Sad, depressed, or hopeless?

Common Features

- Focus on behavioral, observable
- Time frame eg last 3 days
- Interview: use clinical skills, all possible sources of information
- Responses are standardized
- Action triggers for care and service planning “second generation” and third generation assessments

SQOL

- Differ by setting
- Can be used stand alone or in combination with interRAI assessment

Mental Health

- Inpatient mental health
- Community mental health
- ESP- emergency screener
- Brief MH – Police, other agencies
- Prison- mental health
- Forensic
- Mental health - SQOL

Mental health

- interRAI ID- Intellectual Disability (Lynn Martin: Lakehead U)
- **Child Youth suite of instruments** (Shannon Stewart, Western U, Associate Professor, Faculty of Education, Clinical Training Director School Psychology and Applied Child, InterRAI International Child and Youth Mental Health Lead
 - InterRAI Fellow (www.interrai.org)
 - sstewa24@uwo.ca

How were the instruments developed?

Risk Factors

WITHIN CHILD

- Neurophysiology
- Temperament
- Learning problems
- Language difficulties
- Social skills
- Comorbid health issues

WITHIN COMMUNITY

- Unsafe neighbourhood
- Anti-social opportunities
- Lack of extra-familial support
- Lack of community involvement
- Poverty

WITHIN FAMILY

- Neglect/abuse
- Life events
- Parent profile/Family history
 - Mental health issues
 - Maternal age
 - Family size
 - Family conflict
 - Quality of parenting
 - Marital discord

Protective Factors

Positive Family Relationships

Social Skills

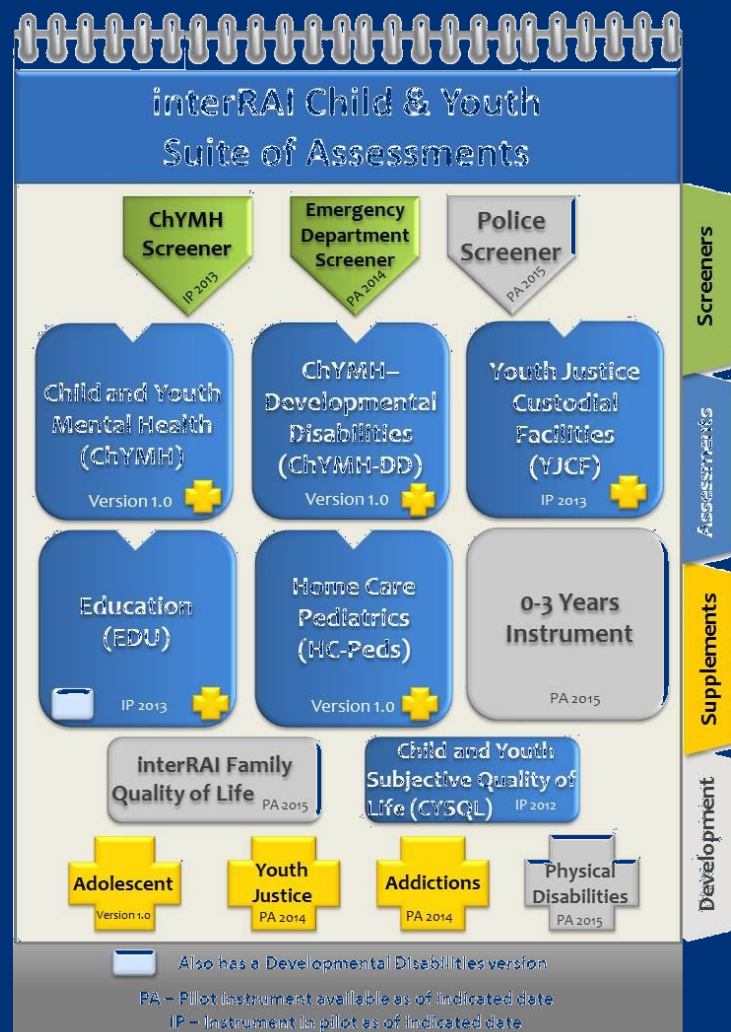
Social Support
(e.g., positive peer relationships)

Areas of Success

- Talent
- School

Child Psychopathology

- Child and youth interRAI instruments incorporate information that would typically require multiple assessment tools to enhance early identification, assessment and care planning.
- Over 100 clinical experts from 11 countries contributed to the development of the tools and the evidence-based care planning guidelines.
- Designed for integration with adult instruments allowing children/youth to be followed across sectors and systems as they age.



CAPs

- Collaborative Action Plans are documents containing current evidence-informed approaches to guide interventions in target areas.
- CAPs target to those who may benefit from an intervention
- Enable service providers to use time efficiently
- Decision-support tools to inform interactions between service providers and individuals with identified needs

Example

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CYMH-Communication CAP

The CYMH-Communication CAP offers guidelines to enhance communication for children and youth with considerable difficulties in this area. This CAP applies to young persons in community and inpatient mental health settings.

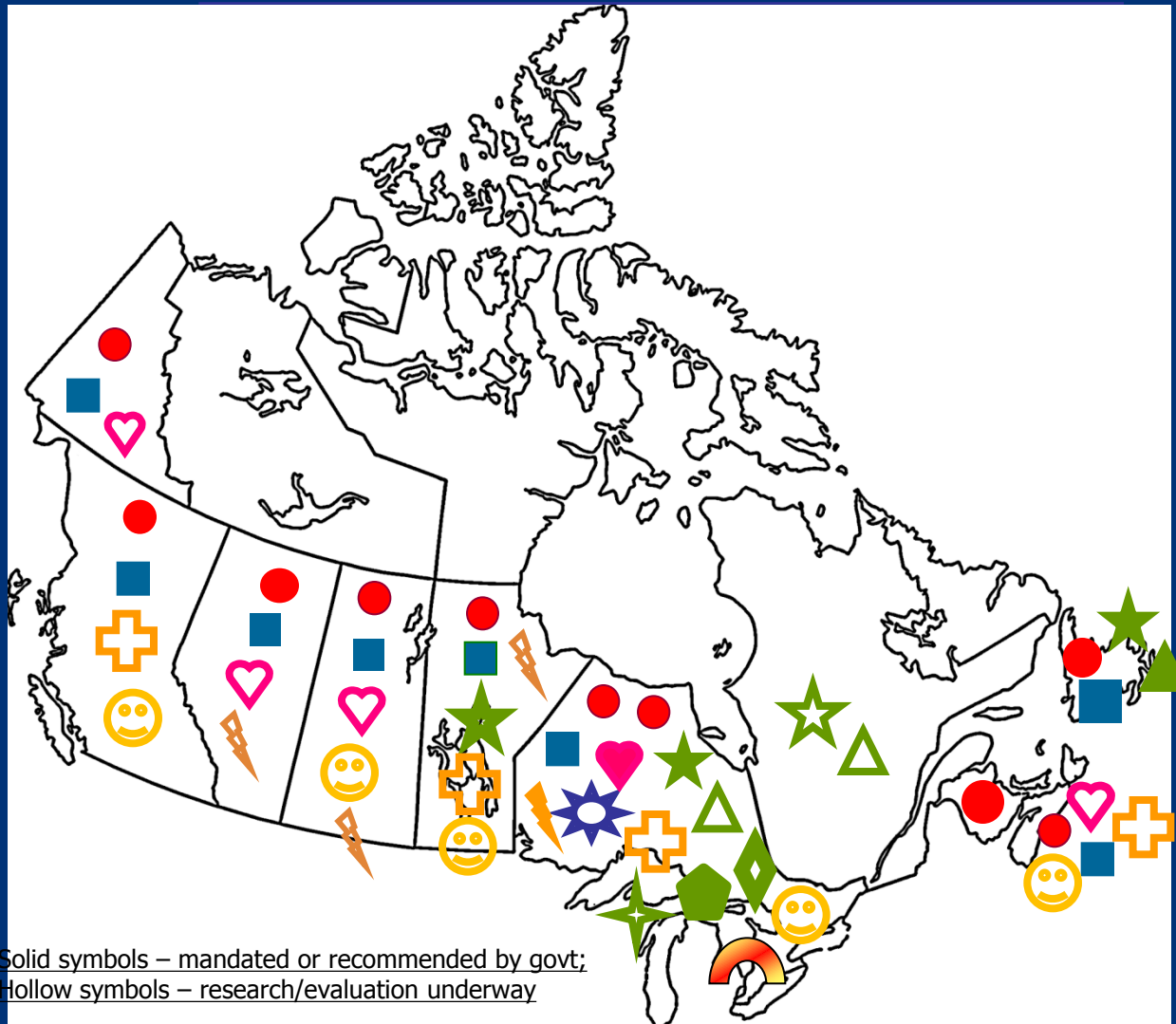
Issue

Communication includes understanding others (reception or comprehension) and sending messages (expression) with motor movements (speaking, gesturing, writing). Sometimes children and youth can have intact language ability (for example, knowing the meanings of words and phrases, understanding messages given by others), but the ability to produce speech may be impaired (for example, voice loss, trouble with making specific sounds, stuttering). Likewise, children and youth can have adequate speech sound production skills but struggle to














- A triggered CAP in that area.

ns in that

Use of interRAI Instruments in Canada



Solid symbols – mandated or recommended by govt;
Hollow symbols – research/evaluation underway

	RAI 2.0/ interRAI LTCF
	RAI-HC
	RAI-MH
	interRAI CMH
	interRAI ESP
	interRAI BMHS
	interRAI ChYMH
	interRAI ID
	interRAI PC
	interRAI ED/AC
	interRAI CA
	interRAI CHA
	interRAI SQoL

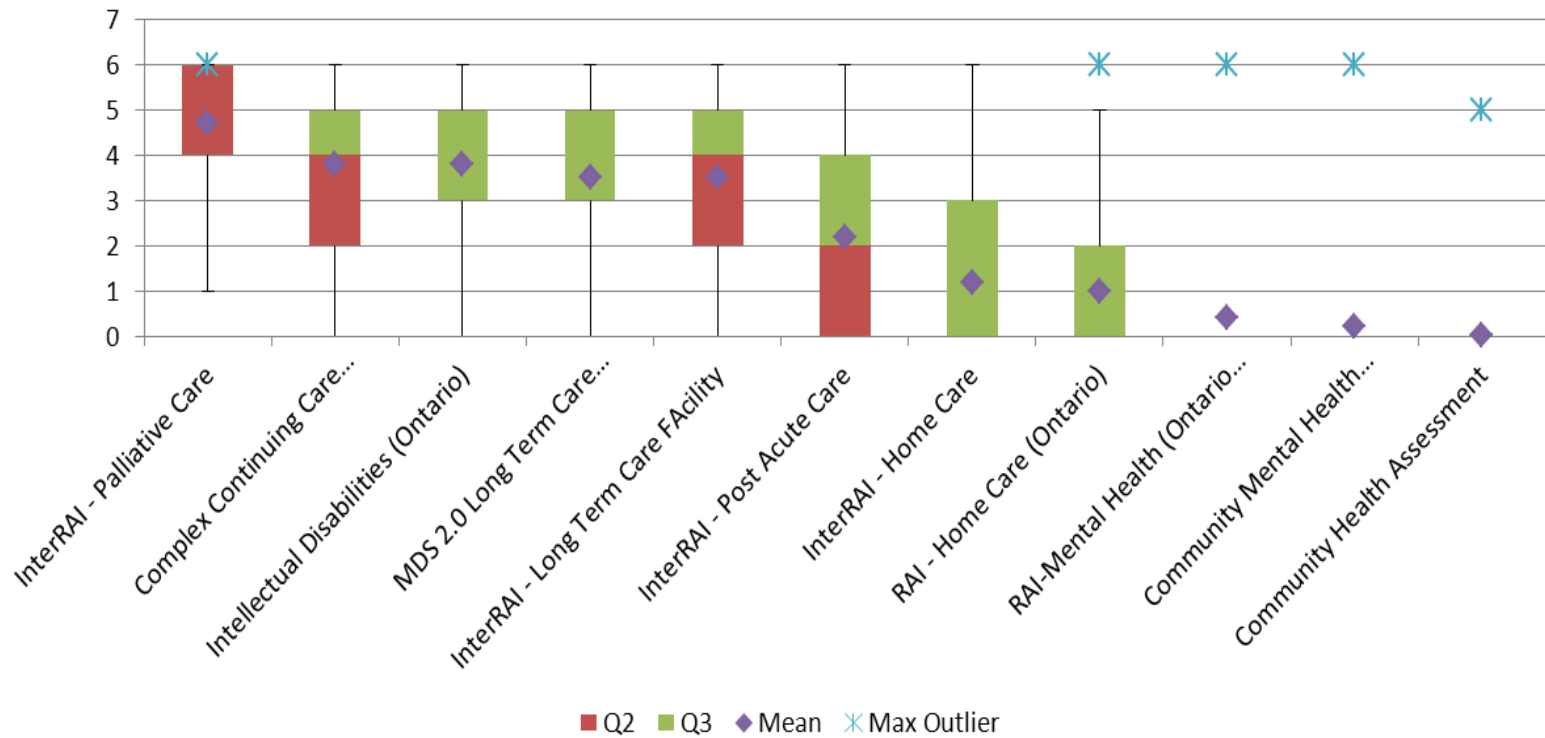
Opportunities in integrated system

- | Improved transitions
- | Outcomes across episode of care
- | Quality indicators across sectors
- | Longitudinal studies including rare groups
- | Health system and health policy evaluation

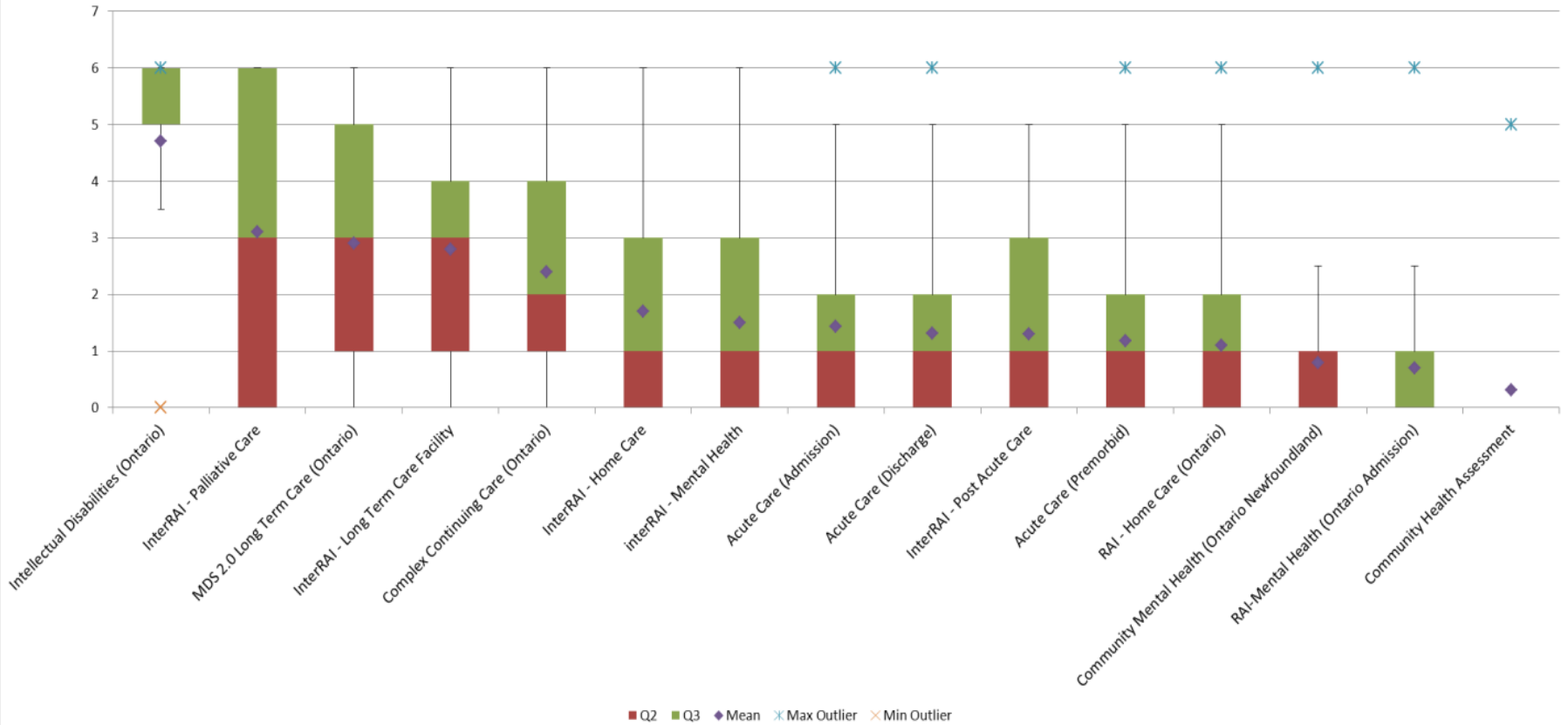
Scales

- | Activities of Daily living (IADL_ADL Hierarchy; ADL Long form, etc)
- | Cognitive performance (CPS)
- | Depression Rating Scale (DRS)
- | CHES (changes in Health, end-stage disease and signs and symptoms)
- | Pain scale
- | Pressure Ulcer Scale (PURS)

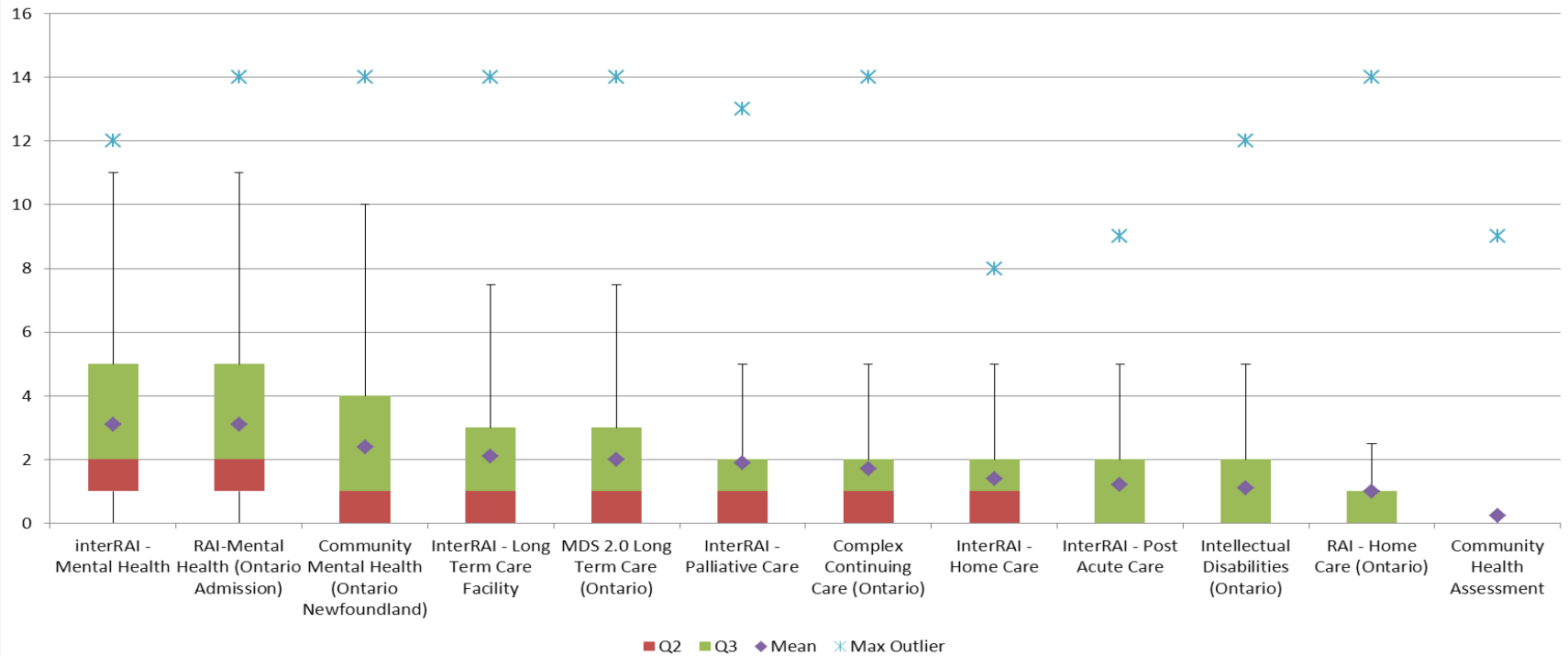
ADL Hierarchy Scale by Location



Cognitive Performance Scale (CPS) by Location



Depression Rating Scale (DRS) by Location



Use of scales

- Encourage more frequent use of interRAI scales in routine practice
- Helps make links between front line staff and clinicians with outcomes and quality indicators
- Better communication and greater efficiency
- Need software capability- include in contracts

Quality indicators

- Based on person level assessments
- Feedback to clinicians and administrators;
- Monitoring effect of changes in policy or practice
- Looking for best practices within an organization or within a group
- Comparisons across jurisdictions
- Public reporting

Continuous improvement

- Harmonization across scales
- Monitoring of errata- see website
- Evaluating item and scale performance- revising as needed
- Re-thinking CAPS- latest release a few years old- have created a group to review again- consider combination caps
- Would love to hear your suggestions

What are CAPs?

- Collaborative action plans; clinical action points or clinical assessment protocols
- “Triggered” by answers to certain items
- Issues that are common or pose severe risk
- Help focus on key issues for each person
- A guide NOT automated care planning!
- Can include patient preferences

27 CAP Areas for LTC and Home and community care

FUNCTIONAL PERFORMANCE

- Physical Activities Promotion
- Instrumental Activities of Daily Living
- Activities of Daily Living
- Home Environment Optimization
- Institutional Risk
- *Physical Restraints

COGNITION/MENTAL HEALTH

- Cognitive Loss
- Delirium
- Communication
- Mood
- Behavior
- Abusive Relationship

(LTCF* only)

SOCIAL LIFE

- Activities*
- Informal Support
- Social Relationships

CLINICAL ISSUES

- Falls
- Pain
- Pressure Ulcer
- Cardio-Respiratory Conditions
- Undernutrition
- Dehydration
- Feeding Tube
- Prevention
- Medications
- Tobacco and Alcohol Use
- Urinary Incontinence
- Bowel Conditions

Related CAPS -

- Eg Falls, ADL (improvement or prevention decline), Physical Activity, Incontinence
 - Share risk factors
 - May need greater depth of assessment in similar areas
 - Some common interventions suggested
 - How can we best consider the priorities in care planning?

Research opportunities

- Using existing data to answer clinical questions
- In contrast to RCTs, all patients with assessments are included in the database.
- Examine predictors and outcomes for small groups, rare conditions and persons in more chronic settings
- Examine temporal effects eg changes after a new policy or initiative is in place
- Identify outcomes within health system

- Cook RJ, **Berg K**, Lee KA, Poss JW, Hirdes JP, Stolee P. Rehabilitation in Home Care is Associated with Functional Improvement and Preferred Discharge. Archives of Physical Medicine and Rehabilitation. 2013 Jun;94(6):1038-1047.

**Innovations in Data, Evidence, and Applications for
Persons with Neurological Conditions**
(ideas PNC)

PI: Hirdes

Co-PIs: Maxwell & Jetté

**Co-Is: Berg, Bronskill, Clarke, Colantonio, Doran,
Heckman, Hogan, Kergoat, Marrie, Martin, Mitchell,
Postuma, Pringsheim, Zygun**

Prevalence	ON CCC	ON LTC	SK LTC	NS LTC	WRHA LTC	WRHA CCC	YT LTC	ON MH	ON HC	NS HC	WRHA HC	All Site
	1996-2010	2005-2010	2004-2010	2002-2010	2008-2010	2008-2010	2008-2010	2003-2009	2003-2010	2002-2010	2000-2009	
Group A												
Multiple Sclerosis (MS)	2,344	1,095	414	11	144	10	6	231	5,849	612	408	11,154
Epilepsy/seizure disorder	8,756	4,641	796	35	180	8	7	951	2,349	-*	-	17,782
Parkinsons Disease (PD)	7,543	6,957	1,193	64	316	6	8	469	16,685	1,412	855	35,568
Alzheimer's disease/ rel'd dementias	40,121	60,381	11,195	860	5,160	46	73	236	84,940	10,103	2,443	215,939
Traumatic Brain Injury (TBI)	2,770	777	348	9	34	11	3	241	5,919	637	345	11,099
Group B												
Huntington's Disease (HD)	122	297	-	4	26	1	1	113	408	-	-	974
Spinal Cord Injury (SCI)	18	13	-	-	-	-	-	43	1,697	-	-	1,799
Amyotrophic Lateral Sclerosis (ALS)	344	157	-	6	6	1	1	3	1,064	-	-	1,633
Group C												
Muscular Dystrophy (MD)	50	40	-	-	-	-	-	29	752	-	-	879
Cerebral Palsy (CP)	759	536	208	8	32	2	2	149	1,799	-	-	3,507
Any of the above 10 conditions	55,761	67,892	13,161	931	5,583	77	98	2,428	52,831	12,154	4,051	215,585
Group D												
Brain Tumours	135	78	-	-	-	-	-	18	1,303	-	-	2,143
Dystonia	10	29	-	-	-	-	-	79	-	-	-	119
Hydrocephalus	104	153	-	-	-	-	-	40	-	-	-	298
Spina Bifida	27	26	-	-	-	-	-	19	-	-	-	76
Tourette Syndrome	1	2	-	-	-	-	-	-	-	-	-	3

ON - Ontario; SK - Saskatchewan; NS - Nova Scotia; WRHA - Winnipeg Regional Health Authority; YT - Yukon Territory
 CCC - Complex Continuing Care Hospital/Unit; LTC - Long Term Care Home/nursing home; HC - Home Care; MH - Psychiatric
 Hospital/Unit

*- for WRHA and NS, several conditions are recorded in open-ended fields that were not compiled.

- For further information: search pubmed or other health database with key words MDS, RAI or interRAI and your area of interest
- AND visit – www.interrai.org
- **Searchable database- bibliography as well as access to manuals, scales and news**
- **Updates on errata and FAQs**