Measuring Trauma-Informed Care
Using the Attitudes Related to Trauma-Informed Care (ARTIC) Scale

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Developers of the ARTIC

Steve Brown, Psy.D., Patricia Wilcox, LICSW; Traumatic Stress Institute of Klingberg Family Center

Traumatic Stress Institute Services:

– **Whole-system training and consultation** to organizations in the US, Canada, and beyond about transforming their cultures to TIC

– Pillars of system implementation process
  • Risking Connection trauma training model
  • Restorative Approach
Developers of the ARTIC

Courtney N. Baker, Ph.D.; Tulane University

• Faculty in the Department of Psychology
• Study what makes interventions successful, or not successful, in the community, with the goal of improving mental health care for vulnerable populations
• Dissemination and implementation scientist; research, practice, and training missions
Polls
What is trauma-informed care?

Term coined in the 1990s to describe service delivery that integrates an understanding of the pervasive biological, psychological, and social sequelae of trauma with the ultimate aim of ameliorating, rather than exacerbating, their effects.

Trauma-informed care vs. trauma-specific treatments

(Harris & Fallot, 2001; SAMHSA, 2014)
Trauma-Informed System

- Realizes the widespread impact of trauma and understands potential paths for recovery
- Recognizes the signs and symptoms of trauma in clients/students, families, and staff
- Responds by fully integrating knowledge about trauma into policies, procedures, and practices to resist re-traumatization

(SAMHSA, 2014)
Why the need for the ARTIC?

- Trauma-informed care movement rapidly expanding
- TIC has become a buzzword; operationalization of TIC vague and varied
- Literature on TIC is rich with theories, principles, and implementation ideas; BUT there is currently very little empirical evidence for TIC
- Practice is far ahead of science - field primed for more data-driven analysis
- Lack of objective tools to measure TIC
- Research tools and designs expensive and impractical for practice settings
How does the ARTIC fill the gap?

- Reflects and synthesizes the current theoretical and empirical knowledge of TIC
- Psychometrically validated
- Spur TIC field to “drill down” to what is, and is not, trauma-informed
- Push TIC field to more data-driven decision making
- Easy and inexpensive to administer
One other measure with psychometric properties

**TICOMETER** (Bassuk, Unick, Paquette, & Richard, 2016)

- Measures perception of staff about trauma-informed care at an organization level in five domains
- [https://www.ticometer.com/](https://www.ticometer.com/)
Current literature on TIC outcome research

- Student/client outcomes
  - Improved client mental health outcomes (Morrissey et al., 2005)
  - Reductions in suspensions, expulsions, and written referrals for students (Stevens, 2012)
Current literature on TIC outcome research

• Staff outcomes
  – Build knowledge, change attitudes, and develop practices favorable to TIC (Brown, Baker, & Wilcox, 2012)
Current literature on TIC outcome research

• System outcomes
  – Residential treatment environments rated higher on central TIC domains (Rivard, Bloom, McCorkle, & Abramovitz, 2005)
  – Increase in trauma-informed care at the organizational level (TICOMETER) (Bassuk, Unick, Paquette, & Richard, 2016)
Current literature on TIC outcome research

- Cost savings
  - Reductions in staff turnover, staff use of sick time, client-related workman’s compensation claim costs, and liability insurance costs (Lebel, 2011)
Future outcomes research needed in the empirical literature

- **Student/client outcomes** – linking TIC implementation to the outcomes we care about most – treatment adherence and effectiveness.
- **Staff outcomes** – observed TI behavior, improved professional quality of life, etc.
- **System outcomes** – reduced staff turnover, increased collaboration among providers, reduced number of serious incident reports/ER visits/AWOLS, etc.
- **Cost savings** – reduced staff medical costs, reduced call outs, less turnover, reduced insurance premiums, etc.
Why measure staff attitudes?

- Staff attitudes
  - Moment-to-moment staff behavior with clients/students
  - Positive outcomes for clients/students, staff, system

In overarching system that fosters and supports TIC
Overview of ARTIC research method and results
ARTIC Scale Development

• Grew out of a measure we had previously used in Risking Connection program evaluation (Brown et al., 2012)

• Significantly revised in partnership with content experts using
  – A community-based participatory research (CBPR) approach (Hausman, Baker, et al., 2013)
  – A mixed methods process integrating diverse quantitative and qualitative data streams
  – A fully updated review of the theoretical, empirical, and measurement literatures relevant to TIC
Scale Development

• Tested 75 possible items
• Written to capture a TIC-favorable attitude paired with the opposite attitude
• Uses a seven-point bipolar Likert scale
• Item wording modified between two versions so face valid for both schools and health care/human services
### Bipolar Likert Scale

<table>
<thead>
<tr>
<th>I believe that...</th>
<th>1</th>
<th>2</th>
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</thead>
<tbody>
<tr>
<td>Students’ learning and behavior problems are rooted in their behavioral or mental health condition.</td>
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<tr>
<td>Students’ learning and behavior problems are rooted in their history of difficult life events.</td>
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<tr>
<td>Focusing on developing healthy, healing relationships is the best approach when working with people with trauma histories.</td>
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<tr>
<td>Rules and consequences are the best approach when working with people with trauma histories.</td>
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<tr>
<td>Being very upset is normal for many of the students I serve.</td>
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<tr>
<td>It reflects badly on me if my students are very upset.</td>
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</tbody>
</table>
Participants

• 760 adults from human services, health care, education, or related fields

– National sample, recruited through listservs and websites
– 78% mental health/human services; 22% education
– 83% women
– 92% white, 5% African American; 5% Hispanic
– 96% completed college, completed some graduate school, or completed graduate school
Results: ARTIC Subscales

Approach: Item analyses and confirmatory factor analysis (CFA)

5 Main Subscales
Attitudes about:
• The underlying cause of problem behavior/symptoms (Subscale 1)
• Staff responses to problem behavior (Subscale 2)
• Staff on-the-job behavior (Subscale 3)
• Staff feeling of self-efficacy at work (Subscale 4)
• Staff reactions to the work (Subscale 5)

2 Supplementary Subscales
Attitudes about:
• Staff members personal support of TIC (Subscale 6)
• System-wide support for TIC (Subscale 7)
### Results: Reliability

<table>
<thead>
<tr>
<th>Scale</th>
<th>M</th>
<th>SD</th>
<th>Test-retest</th>
<th>1</th>
<th>2</th>
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<tbody>
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<td></td>
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<td>≤120 days</td>
<td>121–150 days</td>
<td>151–180 days</td>
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<tr>
<td>Underlying causes</td>
<td>39.44</td>
<td>5.49</td>
<td>.73</td>
<td>.67</td>
<td>.72</td>
<td>(.78)</td>
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<td></td>
<td></td>
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<tr>
<td>Responses to problem behavior</td>
<td>42.22</td>
<td>5.12</td>
<td>.87</td>
<td>.74</td>
<td>.79</td>
<td>.69</td>
<td>(.76)</td>
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<tr>
<td>On-the-job behavior</td>
<td>43.03</td>
<td>4.24</td>
<td>.59</td>
<td>.59</td>
<td>.66</td>
<td>.68</td>
<td>.63</td>
<td>(.72)</td>
<td></td>
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</tr>
<tr>
<td>Self-efficacy at work</td>
<td>42.11</td>
<td>5.21</td>
<td>.66</td>
<td>.70</td>
<td>.75</td>
<td>.41</td>
<td>.36</td>
<td>.47</td>
<td>(.79)</td>
<td></td>
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<tr>
<td>Reactions to the work</td>
<td>41.51</td>
<td>4.86</td>
<td>.68</td>
<td>.62</td>
<td>.49</td>
<td>.57</td>
<td>.52</td>
<td>.56</td>
<td>.49</td>
<td>(.71)</td>
<td></td>
<td></td>
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<tr>
<td>Personal support of TIC</td>
<td>30.16</td>
<td>4.34</td>
<td>.81</td>
<td>.75</td>
<td>.63</td>
<td>.58</td>
<td>.58</td>
<td>.57</td>
<td>.50</td>
<td>.51</td>
<td>(.80)</td>
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<td></td>
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<tr>
<td>System-wide support for TIC</td>
<td>26.91</td>
<td>6.00</td>
<td>.74</td>
<td>.74</td>
<td>.51</td>
<td>.27</td>
<td>.25</td>
<td>.30</td>
<td>.54</td>
<td>.32</td>
<td>.45</td>
<td>(.81)</td>
<td></td>
</tr>
<tr>
<td>ARTIC-45</td>
<td>265.38</td>
<td>26.21</td>
<td>.84</td>
<td>.80</td>
<td>.76</td>
<td>.80</td>
<td>.76</td>
<td>.79</td>
<td>.73</td>
<td>.75</td>
<td>.79</td>
<td>.63</td>
<td>(.93)</td>
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<tr>
<td>ARTIC-35</td>
<td>208.31</td>
<td>19.75</td>
<td>.84</td>
<td>.75</td>
<td>.77</td>
<td>.85</td>
<td>.81</td>
<td>.83</td>
<td>.69</td>
<td>.80</td>
<td>.69</td>
<td>.43</td>
<td>.97</td>
</tr>
<tr>
<td>ARTIC-10</td>
<td>60.70</td>
<td>44.40</td>
<td>.82</td>
<td>.73</td>
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<td>.64</td>
<td>.74</td>
<td>.64</td>
<td>.40</td>
<td>.90</td>
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</tbody>
</table>

* N = 760 for all information presented except TRT, for which n_{TRT 0–120 days} = 33; n_{TRT 121–150 days} = 46; n_{TRT 151–180 days} = 62. Coefficient alphas are indicated in parentheses

* Indicates supplementary scale
Results: Preliminary Validity -- Familiarity with TIC

<table>
<thead>
<tr>
<th>Measure</th>
<th>Underlying Cause</th>
<th>Treatment Approach</th>
<th>Own Behavior</th>
<th>Self-Efficacy</th>
<th>Own Reactions</th>
<th>Personal Support</th>
<th>System Support</th>
<th>ARTIC-45</th>
<th>ARTIC-10</th>
</tr>
</thead>
<tbody>
<tr>
<td>How familiar?</td>
<td>.42</td>
<td>.36</td>
<td>.39</td>
<td>.21</td>
<td>.29</td>
<td>.50</td>
<td>.23</td>
<td>.45</td>
<td>.38</td>
</tr>
<tr>
<td>Own research?</td>
<td>.37</td>
<td>.35</td>
<td>.27</td>
<td>.14</td>
<td>.18</td>
<td>.39</td>
<td>.10</td>
<td>.34</td>
<td>.30</td>
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<tr>
<td>Formal training?</td>
<td>.24</td>
<td>.20</td>
<td>.27</td>
<td>.15</td>
<td>.16</td>
<td>.26</td>
<td>.18</td>
<td>.28</td>
<td>.23</td>
</tr>
<tr>
<td>TIC implementation at current job?</td>
<td>.17</td>
<td>.16</td>
<td>.23</td>
<td>.14</td>
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</tr>
</tbody>
</table>
## Results: Preliminary Validity - Staff-Level Indicators of TIC Implementation

<table>
<thead>
<tr>
<th>Measure</th>
<th>Underlying Cause</th>
<th>Treatment Approach</th>
<th>Own Behavior</th>
<th>Self-Efficacy</th>
<th>Own Reactions</th>
<th>Personal Support</th>
<th>System Support</th>
<th>ARTIC-45</th>
<th>ARTIC-10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Staff-Level Indicators of TIC</td>
<td>.50</td>
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<td>.45</td>
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<td>.40</td>
<td>.66</td>
<td>.31</td>
<td>.59</td>
<td>.51</td>
</tr>
<tr>
<td>Have a positive attitude about TIC?</td>
<td>.40</td>
<td>.40</td>
<td>.43</td>
<td>.39</td>
<td>.33</td>
<td>.58</td>
<td>.32</td>
<td>.54</td>
<td>.45</td>
</tr>
<tr>
<td>Have the skills to practice TIC?</td>
<td>.51</td>
<td>.53</td>
<td>.48</td>
<td>.33</td>
<td>.38</td>
<td>.62</td>
<td>.28</td>
<td>.59</td>
<td>.51</td>
</tr>
<tr>
<td>Feel motivated to change practice?</td>
<td>.42</td>
<td>.39</td>
<td>.43</td>
<td>.26</td>
<td>.31</td>
<td>.57</td>
<td>.31</td>
<td>.51</td>
<td>.42</td>
</tr>
<tr>
<td>Engage in behavior with students that reflects TIC</td>
<td>.26</td>
<td>.26</td>
<td>.36</td>
<td>.20</td>
<td>.23</td>
<td>.28</td>
<td>.19</td>
<td>.33</td>
<td>.30</td>
</tr>
<tr>
<td>Ask students about their trauma histories?</td>
<td>.19</td>
<td>.19</td>
<td>.28</td>
<td>.32</td>
<td>.20</td>
<td>.31</td>
<td>.23</td>
<td>.32</td>
<td>.27</td>
</tr>
<tr>
<td>Provide culturally competent care?</td>
<td>.34</td>
<td>.36</td>
<td>.37</td>
<td>.34</td>
<td>.28</td>
<td>.42</td>
<td>.27</td>
<td>.45</td>
<td>.41</td>
</tr>
<tr>
<td>Use a strengths-based perspective?</td>
<td>.22</td>
<td>.27</td>
<td>.26</td>
<td>.12</td>
<td>.19</td>
<td>.26</td>
<td>.03</td>
<td>.25</td>
<td>.27</td>
</tr>
<tr>
<td>Believe restraint/seclusion is traumatic?</td>
<td>.40</td>
<td>.39</td>
<td>.42</td>
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<td>.43</td>
<td>.26</td>
<td>.51</td>
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<tr>
<td>Feel connected to students?</td>
<td>.51</td>
<td>.45</td>
<td>.52</td>
<td>.31</td>
<td>.40</td>
<td>.50</td>
<td>.23</td>
<td>.55</td>
<td>.52</td>
</tr>
<tr>
<td>Willing to be flexible and individualize?</td>
<td>.37</td>
<td>.38</td>
<td>.44</td>
<td>.37</td>
<td>.33</td>
<td>.41</td>
<td>.25</td>
<td>.48</td>
<td>.44</td>
</tr>
<tr>
<td>Think about students doing the best they can at the time</td>
<td>.54</td>
<td>.48</td>
<td>.48</td>
<td>.39</td>
<td>.42</td>
<td>.47</td>
<td>.30</td>
<td>.58</td>
<td>.58</td>
</tr>
<tr>
<td>Believe students do things to hurt you personally?*</td>
<td>.35</td>
<td>.29</td>
<td>.33</td>
<td>.30</td>
<td>.30</td>
<td>.33</td>
<td>.14</td>
<td>.38</td>
<td>.42</td>
</tr>
<tr>
<td>Feel burned out?*</td>
<td>.14</td>
<td>.10</td>
<td>.15</td>
<td>.45</td>
<td>.21</td>
<td>.20</td>
<td>.38</td>
<td>.32</td>
<td>.26</td>
</tr>
<tr>
<td>Experience secondary traumatic stress?*</td>
<td>.06</td>
<td>.01</td>
<td>.06</td>
<td>.27</td>
<td>.11</td>
<td>.24</td>
<td>.17</td>
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<td>.11</td>
</tr>
<tr>
<td>Get compassion satisfaction from your work?</td>
<td>.26</td>
<td>.27</td>
<td>.28</td>
<td>.56</td>
<td>.37</td>
<td>.31</td>
<td>.29</td>
<td>.45</td>
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</tr>
<tr>
<td>Feel satisfied with your job?</td>
<td>.23</td>
<td>.24</td>
<td>.25</td>
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<td>.33</td>
<td>.31</td>
<td>.51</td>
<td>.49</td>
<td>.41</td>
</tr>
<tr>
<td>Feel committed to your job?</td>
<td>.16</td>
<td>.21</td>
<td>.21</td>
<td>.52</td>
<td>.24</td>
<td>.24</td>
<td>.43</td>
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<tr>
<td>Have used EAP?**</td>
<td>-.07</td>
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<td>-.04</td>
<td>.05</td>
<td>-.04</td>
<td>-.05</td>
<td>.03</td>
<td>-.04</td>
<td>-.04</td>
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<tr>
<td>Feel able to complete your tasks and reach goals at work?</td>
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<td>.09</td>
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<td>.43</td>
<td>.18</td>
<td>.22</td>
<td>.34</td>
<td>.30</td>
<td>.24</td>
</tr>
<tr>
<td>Feel supported by your colleagues?</td>
<td>.12</td>
<td>.13</td>
<td>.22</td>
<td>.45</td>
<td>.24</td>
<td>.23</td>
<td>.58</td>
<td>.39</td>
<td>.28</td>
</tr>
<tr>
<td>Feel supported by your direct supervisor(s)?</td>
<td>.15</td>
<td>.12</td>
<td>.19</td>
<td>.42</td>
<td>.21</td>
<td>.23</td>
<td>.66</td>
<td>.40</td>
<td>.26</td>
</tr>
<tr>
<td>Feel supported by your administrator(s)?</td>
<td>.14</td>
<td>.13</td>
<td>.19</td>
<td>.42</td>
<td>.20</td>
<td>.20</td>
<td>.64</td>
<td>.38</td>
<td>.26</td>
</tr>
<tr>
<td>Feel rewarded at work for using TIC?</td>
<td>.27</td>
<td>.26</td>
<td>.25</td>
<td>.35</td>
<td>.25</td>
<td>.40</td>
<td>.54</td>
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</tr>
</tbody>
</table>
Versions of the ARTIC

Human Services
- ARTIC-45 (Orgs that have begun TIC implementation)
- ARTIC-35 (Orgs that have not implemented TIC)
- ARTIC-10 (Short form; fine for orgs that have or have not implemented TIC)

Education
- ARTIC-45 (Schools that have begun TIC implementation)
- ARTIC-35 (Schools that have not implemented TIC)
- ARTIC-10 (Short form; fine for orgs that have or have not implemented TIC)
Attitudes Related to Trauma-Informed Care Scale

People who work in human services, health care, education, and related fields have a wide variety of beliefs about their clients, their jobs, and themselves. The term “client” is interchangeable with “student,” “person,” “resident,” “patient,” or other terms to describe the person being served in a particular setting.

**Trauma-informed care** is an approach to engaging people with trauma histories in human services, education, and related fields that recognizes and acknowledges the impact of trauma on their lives.

**Sample**

<table>
<thead>
<tr>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ice cream is delicious</td>
<td>○</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>○</td>
</tr>
</tbody>
</table>

**Note:** In this SAMPLEITEM, the respondent is reporting that he/she believes that ice cream is much more delicious than disgusting.

**I believe that...**

<table>
<thead>
<tr>
<th>1</th>
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<th>4</th>
<th>5</th>
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<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clients’ learning and behavior problems are rooted in their behavioral or mental health condition.</td>
<td>○</td>
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<td>○</td>
<td>○</td>
<td>○</td>
<td>○</td>
</tr>
<tr>
<td>Focusing on developing healthy, healing relationships is the best approach when working with people with trauma histories.</td>
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<td>Being very upset is normal for many of the clients I</td>
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Limitations of the ARTIC

• Move beyond preliminary validation
• Replication needed to confirm the 7 subscale structure
• Not yet norms about how an organization’s scores compare to other organization’s scores
• Linking ARTIC scores with other favorable staff and system-level outcomes
What questions could the ARTIC answer?

• Did our interventions to implement TIC lead to change?
• Has the change been sustained over time or has there been backslide?
• What domains with respect to attitudes (sub-scales) are strongest and weakest?
• Which staff may need additional training or supervision related to TIC?
Questions to consider when using the ARTIC?

• What do you want to learn?
• Who do you want to learn about? (all staff? staff in a particular program? certain job roles? etc.)
• At what time points do you want to collect ARTIC data?
• Who will administer the ARTIC? (in-house person? outside person?)
• How will you ensure staff feel safe to answer honestly?
• How will the data get entered and analyzed (in-house? hire a program evaluator/researcher? find grad student?)
• How will you give feedback to participants?
• How will you use it in future decision making?
How to obtain the ARTIC?

- **Cost**: $450 one-time fee per organization (introductory offer). Can use as much as like, now and in future, within the organization.

- **Includes**:
  - All versions of ARTIC
  - Information about how to use and score
  - ARTIC Scoring Spreadsheet (calculates subscale and total scores for you)

- See [Traumatic Stress Institute website](mailto:artic@klingberg.com) for details about purchasing. Email: artic@klingberg.com

Fees from the ARTIC fund further research on TIC and other TSI educational projects.
Questions?
Tell Your Friends

Same FREE Webinar on May 2\textsuperscript{nd}, 4-5 EST

Click here to register
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