Investigating Body Image & Health

Ginny Ramseyer Winter, PhD, MSW
Roadmap

• Background

• Study #1: 3D Body Appreciation Mapping (3D-BAM)

• Study #2: Fostering Well-Being

• Summary
Background: Body Image Development
Background: Body Image Development
Background: Body Image and Health

**Physical Health**
- Skin protection [1]
- Health related quality of life [2]
- Eating behaviors [3]
- Tobacco & alcohol use [4]

**Mental Health**
- Eating Disorders [5]
- Depression [6]
- Anxiety [6]

**Sexual Health**
- Contraceptive use (barrier & hormonal) [7]
- # of sexual partners [8]
- Substance use during sexual activity [8]
- Preventive sexual behaviors [9]
3-DIMENSIONAL BODY APPRECIATION MAPPING (3D-BAM) INTERVENTION STUDY
3D-BAM Pilot Intervention Study

Study Design

- **Aim**: Improve body appreciation, thereby improving depression and anxiety immediately and 3 months post-intervention.

- **Co-Investigators**: Drs. Antoinette Landor (HDFS), Kristen Morris (TAM), and Michelle Teti (Health Professions)

- **Funding**: HES SIRC Grant; MU PCOR Small Grant Program

**Study qualifiers:**
- 18-25 years old
- Cisgender women
- African American or White
- Not pregnant
- In US for at least 10 years
- No history of ED diagnosis

**Intervention study:**
- T1: Online survey
- T2: 3D Body Scanning & brief survey (Gwynn)
- T3: Intervention & brief survey (Gwynn)
- T4: Qualitative interviews ($n = 20$)
- T5: Online survey 3 months post intervention
RQ: Is body appreciation a mechanism of depression and anxiety among young women?

MEASURES (collected at T1 & T5)

- Health measures of interest
  - Depression (PHQ-9) [10]
  - Anxiety (GAD-7) [11]

- Other measures of interest
  - Body appreciation (BAS-2; also collected at T3) [12]
  - Weight and height (BMI)
3D-BAM Pilot Intervention Study
T2 (Scan & Survey)

1 (clothing & hair)
2 (scan)
2 (scan)
2 (output)
3 (skin tone selection)
4 (survey)
3D-BAM Pilot Intervention Study
T2 (Scan)
3D-BAM Intervention Study
T3 (Intervention & Survey)

The Intervention!
3D-BAM Pilot Intervention Study

Sample

Attrition:

- T1=158; T2=105; T3=99; T5=89

Sample Characteristics:

- 88.6% White/Caucasian
- 94.3% Heterosexual
- Mean age = 20.67 (SD = 1.70)
- Mean BMI = 23.67 (SD = 3.80, range = 16.64 – 36.90)
- 98.1% had never been scanned
3D-BAM Pilot Intervention Study

Published Findings

**Analysis:** Paired t-tests to assess changes in body appreciation, depression, and anxiety before and after the intervention; correlations between the three metrics, body appreciation, depression, and anxiety. For each metric we assessed whether the change in the response was significantly different for different values at T1.

<table>
<thead>
<tr>
<th>Characteristic/Study Indicator</th>
<th>M</th>
<th>SD</th>
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<tbody>
<tr>
<td>Body appreciation score (T1)</td>
<td>3.52</td>
<td>0.62</td>
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<tr>
<td>Body appreciation score (T4)</td>
<td>3.78</td>
<td>0.60</td>
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<tr>
<td>Depression score (T1)</td>
<td>5.27</td>
<td>5.37</td>
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<td>Depression score (T4)</td>
<td>4.83</td>
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<td>Anxiety score (T1)</td>
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<td>Anxiety score (T4)</td>
<td>11.79</td>
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</table>

- The increase in BAS-2 score from T1 to T4 was significantly greater for females with lower BAS-2 scores at T1 ($p < 0.001$).
- Individuals with larger GAD-7 scores at T1 saw greater decreases in GAD throughout the study ($p < 0.001$).
- The change in PHQ-9 score between T1 and T4 was negatively correlated, with both the change in BAS-2 ($p = 0.027$) and GAD-7 ($p < 0.001$).
3D-BAM Pilot Intervention Study

Current/Next Steps

• Publish findings

• Efficacy testing – NIMH
FOSTERING WELL-BEING PILOT INTERVENTION STUDY: AN RCT
Fostering Well-Being: A Pilot Study

Background

• Foster youth experience disproportionately high rates of teen pregnancy [14]

• Associations between:
  – childhood sexual abuse and body image [15]
  – BMI and body image [16]
  – Parent/guardian communication and lower level of risk in sexual decision-making among adolescents [17]
Fostering Well-Being: A Pilot Study

Methods

- **Aim:** To improve knowledge, attitudes, comfort communicating and frequency of communication regarding body image and sexual health among foster parents of 12-19-year-old foster youth.

- **Co-Investigators:** Drs. Sarah Pilgrim (UMKC-SSW) and Fang Wang (MU Engineering)

- **Funding:** MU Research Board
Fostering Well-Being: A Pilot Study

Methods

• RCT

• Online, quantitative surveys:
  – Baseline survey (both groups)
  – Intervention (takes approximately 3 weeks – 2 modules/week) (intervention group only)
  – T2 survey (immediately following intervention completion) (both groups)
  – T3 survey (1 month post-intervention completion) (both groups)
  – T4 survey (3 months post-intervention completion) (both groups)

• Sample recruited through Missouri Children’s Division and foster agencies in Missouri and Kansas

• Study qualifiers
  – Currently foster parent of 12-19-year old
  – 18 or older

• Participant compensation:
  – $10 gift card for T1, T2, and T3
  – $20 gift card for T4
Fostering Well-Being: A Pilot Study

Measures

• **Mathtech Questionnaires: Sexuality Questionnaires: Sexual Health Knowledge**
  - 20 items, summed scale, multiple choice

• **Sexual Health Inventory Talking About Sex Subscale, Modified**
  - 9 items
  - Sample item: “I usually feel comfortable discussing topics of a sexual nature with my teen foster child(ren).”
  - Higher score indicates higher level of comfort

• **Body Appreciation Scale-2 [12]**
  - 10 items
  - Sample item: “I am attentive to my body’s needs.”
  - Higher score indicates higher level of body appreciation
# Fostering Well-Being: A Pilot Study

## Sample

### Control Group (N=50)

- **Mean age** = 43.24 (SD = 11.18; range = 26-67)
- **Gender**: 20% men, 78% women, 2% other
- **Ethnicity**: 4% Hispanic, 96% non-Hispanic
- **Race**: 82% White, 12% Black, 2% Asian, 4% American Indian or Alaska Native
- **Sexual orientation**: 96% heterosexual
- **Years fostered mean**: 5.07 (SD = 5.82, range=1-25)

### Intervention Group (N=49)

- **Mean age** = 43.20 (SD = 11.31; range = 25-64)
- **Gender**: 14.3% men, 85.7% women
- **Ethnicity**: 6.1% Hispanic, 93.9% non-Hispanic
- **Race**: 85.7% White, 12.2% Black, 2% Asian, 8.2% American Indian or Alaska Native
- **Sexual orientation**: 85.7% heterosexual
- **Years fostered mean**: 5.02 (SD = 7.45, range=0-37)
Fostering Well-Being: A Pilot Study
Baseline findings

Control group:
- 14% report being hesitant to discuss sexual health with their teen foster child
- 8% report being hesitant to discuss body image with their teen foster child
- Mean sexual health knowledge score=16.75 (SD=2.24, range=10-20); p = .047
- Mean comfort communicating about sexual health score: 1.99 (SD=0.68)
- Mean body appreciation score: 3.74 (SD=0.73)

Intervention group:
- 12.2% report being hesitant to discuss sexual health with their teen foster child
- 8.2% report being hesitant to discuss body image with their teen foster child
- Mean sexual health knowledge score=17.78 (SD=1.39, range=14-20); p = .047
- Mean comfort communicating about sexual health score: 1.88 (SD=0.65)
- Mean body appreciation score: 3.64 (SD=0.92)
**Fostering Well-Being: A Pilot Study**

**Findings**: How often do you discuss sex / sexual health with your teen foster child(ren)?

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Fostering Well-Being: A Pilot Study
Findings: How often do you discuss body image with your teen foster child(ren)?

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Fostering Well-Being: A Pilot Study

Next Steps

• Finish collecting and analyze data
• Submit manuscripts
• Identify funding mechanism for efficacy testing
• Expand to other topics
Summary

- Media
- Peers
- Community
- Family

Next steps:

- Additional efficacy and effectiveness testing
- Intervention development at different points of intervention (influence and lifespan)
References


Questions?

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