Empirical Evaluation of a Standardized, Evidence-based Care Plan for Public Health Nurse Family Home Visiting

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Presenter Disclosures
The following personal financial relationships with commercial interests relevant to this presentation existed during the past 12 months:
No relationships to disclose

Background
• Evidence-based guidelines for public health family home visiting were encoded using the Omaha System in 2008 and updated in 2013.
• Provide guidance for PHN interventions (N=101) for 10 Problems, including 3 Categories, and 35 Targets
• Care plan available on the Omaha System Guidelines website www.omahasystemguidelines.org
• How PHNs use the guideline in practice is not known

Purpose
• The purpose of this study was to empirically evaluate use of the family home visiting evidence-based care plan with electronic health record (EHR) data generated by PHNs providing evidence-based family home visiting services.

Methods
• Descriptive, comparative study
• Sample
  – 48,039 PHN family home visiting interventions
  – 22,357 before Care Plan Implementation (47%)
  – 25,682 after Care Plan Implementation (53%)
  – 1046 female clients
    – mean age 29.3 (all > 18 years)
    – 71.2% white
• Standard descriptive and inferential statistics were employed in the analysis using Excel and SPSS

Results-Problems

<table>
<thead>
<tr>
<th>Problem</th>
<th>Total Before</th>
<th>Total After</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pregnancy</td>
<td>3657</td>
<td>4089</td>
</tr>
<tr>
<td>Mental Health</td>
<td>1023</td>
<td>1255</td>
</tr>
<tr>
<td>Family Planning</td>
<td>854</td>
<td>1007</td>
</tr>
<tr>
<td>Substance Use</td>
<td>230</td>
<td>312</td>
</tr>
<tr>
<td>Abuse</td>
<td>105</td>
<td>127</td>
</tr>
<tr>
<td>Income</td>
<td>2558</td>
<td>3312</td>
</tr>
<tr>
<td>Interpersonal Relationship</td>
<td>388</td>
<td>429</td>
</tr>
</tbody>
</table>

0 1000 2000 3000 4000 5000 6000 7000 8000

Total Before Total After
Results - Categories

- Teaching, guidance, and counseling
- Surveillance
- Case Management

Total Categories: Before and After

Limitations

- As in any observational study, controls could not be imposed. Therefore, further research is needed to study reasons for variations found in intervention data.

Conclusions

- The evidence-based family home visiting care plan appears to have met the needs of PHNs for documenting home visiting practice
  - PHNs used all but one intervention from the care plan
  - PHNs added interventions as needed, but these were minimal
  - PHN documentation appeared to reflect both the care plan change and policy changes.
  - PHN documentation appeared to reflect tailoring to meet individual needs – a hallmark of evidence-based home visiting care.

Thank you! Questions?

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