Large-scale implementation of Screening, Brief Intervention and Referral to Treatment (SBIRT) in Kaiser Permanente Northern California: Lessons from the field

Stacy Sterling, DrPH, MSW

Kaiser Permanente Northern California Health System Context

Trials of Adolescent SBIRT in Pediatric Primary Care

Key Factors in Implementation of Alcohol SBIRT for Adults
KP Northern California

- 4 million members, 46% of commercial market share in region
- 500,000+ adolescent (11-18) members
- Diverse membership: race/ethnicity, cultural/linguistic, geographic, SES
- 21 hospitals, 233 medical office buildings
- 67,975 employees, 7,447 active physicians, 700 pediatricians
- Mature EHR
- Integrated system (medical, psychiatry, alcohol and drug treatment services)
- Capitated payment system
- Embedded research
Adolescent SBIRT Trial in Pediatric Primary Care (NIAAA)

Which SBIRT model produces:

- better **implementation outcomes** - screening, assessment, brief intervention and referral rates?
- better **patient outcomes** (AOD use and related-school, legal & family problems), by gender, age and ethnicity?

Which model results in better specialty behavioral treatment **initiation and engagement rates**?

What are the **barriers** to, or **facilitators** of, SBIRT implementation?

Which model of care is most **cost-effective**?

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Teen MPower (Conrad N. Hilton Foundation)

Adolescents at risk for substance use or other behavioral health problems

- Motivational Interviewing
- Decisional balance
- Risk-taking
- Stressors
- Coping
- Cognitive distortions
- Mindfulness
- Healthy choices/pro-social behaviors
- Navigating resources
- Adolescent brain development
- Healthy communication

Teen

Parent

Teen

Teen & Parent

Single-session Brief Intervention
ADVISE Alcohol SBIRT Trial (Mertens R01AA018660)

- Cluster-randomized implementation trial
- 54 Primary Care Clinics
- 11 Medical Centers
- 639,613 patients with visits
- 556 primary care providers

Alcohol as a Vital Sign (AVS) Alcohol SBIRT Initiative

- Region-wide implementation of alcohol SBIRT in Kaiser Permanente Northern California adult primary care
- 21 Medical Centers
- 4 million members
- ~7,500 active physicians

Blueprint for implementation for adolescent work
PCP Arm

PCP screens using NIAAA screener

Positive: PCP administers screeners for weekly limits and alcohol dependence

Positive for Dependence: PCP Refers to AOD Treatment + follow-up

Negative for Dependence: Brief Intervention + follow-up

NPP & MA Arm

MA screens using NIAAA screener

Positive: PCP sees screening results; hands off patient to see NPP

Negative: No further action.

NPP administers screeners for weekly limits and alcohol dependence

Positive for Dependence: NPP Refers to AOD Treatment + follow-up

Negative for Dependence: Brief Intervention + follow-up
Hybrid model adopted for region-wide implementation

Non-Physician Arm
Medical Assistants screen
Non-Physician Providers deliver BI/RT

Physician Arm
Physicians screen
Physicians deliver BI/RT

Medical Assistants Screen
Physicians deliver BI/RT

Consistent with system workflow for other screening initiatives
Took advantage of Medical Assistant Rooming Tool overhaul
Alcohol as a Vital Sign (AVS): June 2013 – March 2016, cumulative #s

**Unique patients**

<table>
<thead>
<tr>
<th>Description</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unique patients screened (with at least 1 office visit)</td>
<td>2,778,081</td>
</tr>
<tr>
<td>Unique patients screening positive</td>
<td>385,884 (14%)</td>
</tr>
<tr>
<td>Unique patients receiving BI</td>
<td>194,273 (52%)</td>
</tr>
</tbody>
</table>

**Total patients, including repeats**

<table>
<thead>
<tr>
<th>Description</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total # of screenings</td>
<td>4,502,309</td>
</tr>
<tr>
<td>Total patients screening positive</td>
<td>497,604 (11%)</td>
</tr>
<tr>
<td>Total # of BIs</td>
<td>248,311 (50%)</td>
</tr>
</tbody>
</table>

**Regional Targets:**

- Screening – 90%
- Brief Interventions – 80%
Brief Intervention Rates Among Those Screened Positive, over time

March 2016 = 62%
Key Factors in AVS Implementation

Leadership support

AVS Strategy Team: Multi-Disciplinary – Research, Primary Care, Substance Abuse & Mental Health - regular calls

Implementation Facilitator role

Technical Assistance: in-person visits, by phone and email

AVS Team - Alcohol Education Champions: (Primary Care) & Addiction Medicine Liaisons at each medical facility - Quarterly Collaborative calls

Electronic Health Record
Key Factors in AVS Implementation

**Training:** Evidence-based training protocol, adapted from the “Alcohol Clinical Training” for SBIRT from ADVISe (Saitz, Alford), Skills-based role-play, case study videos

Local Trainers ➔ 2-hours for PCPs, 1-hour for MAs

Onboarding new docs, MAs, new Champions

**Performance Feedback:** unblinded, to Chiefs, Leaders, by facility and provider

**Access to data**

**Marketing & Communications:** Wiki – repository, Training materials, Patient-facing materials
Electronic Health Record
## Full CRAFFT Questionnaire (+AOD questions) in EHR “CRAFFT+”

### Further Assessment

<table>
<thead>
<tr>
<th>Adv</th>
<th>Question</th>
<th>Answer</th>
<th>Comment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>In the past 30 days, how many days have you used any of those substances?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Have you ever ridden in a CAR driven by someone (including yourself) who was &quot;high&quot; or had been using alcohol or drugs?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Do you ever use alcohol or drugs to RELAX, feel better about yourself, or fit in?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Do you ever use alcohol or drugs while you are by yourself, ALONE?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Do you ever FORGET things you did while using alcohol or drugs?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Do your family or FRIENDS ever tell you that you should cut down on your drinking or drug use?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Have you gotten into TROUBLE while you were using alcohol or drugs?</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>If two or more YES answers to the CRAFFT questions above, please complete remaining questions.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Patients’ progress over time can be viewed in this CRAFFT flowsheet

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Days using substances in the past 30 days</td>
<td>6</td>
<td></td>
</tr>
<tr>
<td>2. Ridden in a CAR driven by someone &quot;high&quot; or using alcohol or drugs?</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>3. Using alcohol or drugs to RELAX, feel better about yourself, or fit in?</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>4. Using alcohol or drugs when ALONE</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>5. FORGET things you did while using alcohol or drugs?</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>6. Family or FRIENDS suggest cutting down on drinking or drug use?</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>7. Getting into TROUBLE while using alcohol or drugs?</td>
<td>No</td>
<td></td>
</tr>
<tr>
<td>8. Number of times using ALCOHOL in the past 6 mos</td>
<td>6</td>
<td></td>
</tr>
<tr>
<td>23. We have a lot of conflict in our family, related to my behavior</td>
<td>True</td>
<td></td>
</tr>
</tbody>
</table>
Patient had 4+ drinks/day 7 time in past 3 months, which exceeds the daily low-risk limit: no more than 3 drinks on any one day (women/older adults or men aged 18-65).

Patient typically has 20 drinks a week which exceeds weekly low-risk limits: no more than 7 per week.

Patient has screened positive for Unhealthy Alcohol Use. Provide Brief Advice to "Cut Back." and code "Counseling, Alcohol prevention".

Ask questions to screen for Alcohol Dependence (see more info below).

>> If positive to either question, refer to CD services if patient agrees and code “Monitoring, Alcohol Use and Abuse”; document if referral refused.

[Note: Alcohol Dependence screening indicates possible dependence but does not confer a diagnosis.]

Alcohol Dependence Screening Questions:

1. In the past year, have you sometimes been under the influence of alcohol in situations where you could have caused an accident or gotten hurt?
2. Have there often been times when you had a lot more to drink than you intended to have?
Performance Feedback
Monthly Reports with Brief Intervention rates sent to all Adult Medicine Chiefs, Chair of Chiefs, Leadership

July 2015 Brief Intervention Rate By Med Center

TARGET 80%
Provider-level Brief Intervention performance reports sent to Facility Chief each month

<table>
<thead>
<tr>
<th>Dept</th>
<th>Internal Medicine</th>
<th># of Patients identified with Unhealthy Alcohol Use</th>
<th># of Patients that received Brief Intervention* during a Primary Care DOV</th>
<th>Rate (%) (Patients that received Intervention / Patients identified with Unhealthy Alcohol Use)</th>
</tr>
</thead>
<tbody>
<tr>
<td>CurMth</td>
<td>&lt;&lt; click again for Trend</td>
<td>1</td>
<td>0</td>
<td>80%</td>
</tr>
<tr>
<td>CurMth</td>
<td>15</td>
<td>12</td>
<td>80%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>16</td>
<td>15</td>
<td>94%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>9</td>
<td>9</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>6</td>
<td>2</td>
<td>33%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>2</td>
<td>2</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>12</td>
<td>11</td>
<td>92%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>5</td>
<td>5</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>10</td>
<td>7</td>
<td>70%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>7</td>
<td>7</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>7</td>
<td>4</td>
<td>57%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>5</td>
<td>4</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>CurMth</td>
<td>16</td>
<td>16</td>
<td>80%</td>
<td></td>
</tr>
</tbody>
</table>

*V-code for Counseling, Alcohol Prevention

% of Patients that screened positive for Unhealthy Use out of all patients screened via the MA Rooming Tool.

*If no screening via the MA Rooming Tool, but "Brief Intervention" was coded, then patient is counted as having Screened Positive.
Marketing & Communications
Inter-regional
What is Brief Advice?

State Concern, Link to health, Recommend “Cut back.”

1. “I’m concerned that you are drinking more than safe low-risk limits.”

2. “This could affect your health [hypertension, depression, sleep, weight gain, diabetes, acid-related peptic disorder, erectile dysfunction, injury]

3. “I recommend you “cut back” to no more than 4 (3) drinks per day and no more than 14 (7) drinks per week”.

For Men <66:
No More than
4 drinks/day or
14 drinks/week

For Women & >65:
No More than
3 drinks/day or
7 drinks/week
### Limites Máximos Potable

Para hombres 65 y más jóvenes, no más de 4 bebidas por día y no más de 14 bebidas por semana.

Para mujeres, y para los hombres más de 65 años de edad, no más de 3 bebidas por día y no más de 7 bebidas por semana.

<table>
<thead>
<tr>
<th>Bebida</th>
<th>Cantidad</th>
<th>Equivalente en bebidas</th>
</tr>
</thead>
<tbody>
<tr>
<td>12 onza Cerveza</td>
<td>12 onzas</td>
<td>12 bebidas</td>
</tr>
<tr>
<td>6-9 onzas Licor de Malta</td>
<td>6.5 onzas</td>
<td>6.5 bebidas</td>
</tr>
<tr>
<td>5 onzas Vino de Mesa</td>
<td>5 onzas</td>
<td>5 bebidas</td>
</tr>
<tr>
<td>3-4 onzas Vino alcoholizado</td>
<td>3.5 onzas</td>
<td>3.5 bebidas</td>
</tr>
<tr>
<td>2-3 onzas Cardial, Licor, Licor Aparitivo</td>
<td>2.5 onzas</td>
<td>2.5 bebidas</td>
</tr>
<tr>
<td>1.5 onzas Brandy</td>
<td>1.5 onzas</td>
<td>1.5 bebidas</td>
</tr>
<tr>
<td>1.5 onzas Licor Fuerte (80-graduación alcoholica) tequila, vodka, whiskey, etc</td>
<td>1.5 onzas</td>
<td>1.5 bebidas</td>
</tr>
</tbody>
</table>

12 onzas Cerveza = una bebida, 16 onzas = 1.3 bebidas, 22 onzas = 2 bebidas, 40 onzas = 3.3 bebidas

12 onzas Licor de Malta = 1.5 bebidas, 16 onzas = 2 bebidas, 22 onzas = 2.5 bebidas, 40 onzas = 3 bebidas.

Licor Fuerte de 80 graduación: (16 onzas) = 11 bebidas, un quinto (25 onzas) = 17 bebidas, a 1.75.

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### Gói hạn tối đa để giữ an toàn khi uống rượu:

- Đối với đàn ông cho đến tuổi 65, không quá 4 ly một ngày và không quá 14 ly một tuần.
- Đối với đàn bà và đàn ông trên 65 tuổi, không quá 3 ly một ngày và không quá 7 ly một tuần.

<table>
<thead>
<tr>
<th>Bebida</th>
<th>Cantidad</th>
<th>Equivalente en bebidas</th>
</tr>
</thead>
<tbody>
<tr>
<td>12oz. bia hay cooler</td>
<td>12 oz.</td>
<td>12 bebidas</td>
</tr>
<tr>
<td>8-9oz. rượu mạch nha</td>
<td>8.5 oz.</td>
<td>8.5 bebidas</td>
</tr>
<tr>
<td>5oz. rượu vang</td>
<td>5 oz.</td>
<td>5 bebidas</td>
</tr>
<tr>
<td>3-4oz. rượu vang nồng độ cồn cao</td>
<td>3.5 oz.</td>
<td>3.5 bebidas</td>
</tr>
<tr>
<td>2-3oz. rượu chai, rượu mùi, rượu hương nước trái cây</td>
<td>2.5 oz.</td>
<td>2.5 bebidas</td>
</tr>
<tr>
<td>1.5oz. rượu brandy (như cognac)</td>
<td>1.5 oz.</td>
<td>1.5 bebidas</td>
</tr>
<tr>
<td>1.5oz. rượu mạnh (một chén rượu 45 oz—jigger—qua 40% cồn, gin, vodka, whiskey, v.v.) trong hình châu Âu</td>
<td>1.5 oz.</td>
<td>1.5 bebidas</td>
</tr>
</tbody>
</table>

Đối với bia: 12 oz = 1 ly, 16 oz = 1.3 ly, 22 oz = 2 ly, 40 oz = 3.3 ly
Đối với rượu mạch nha: 12 oz = 1.5 ly, 16 oz = 2 ly, 22 oz = 2.5 ly, 40 oz = 4.5 ly
Đối với rượu vang: 1 chai 750 ml (25 oz) = 5 ly
Đối với rượu mạnh 40%: 1 pint (16 oz) = 11 ly, 1 fifth (25 oz) = 17 ly, 1.75 L (59 oz) = 39 ly
Abuso del alcohol y las drogas en adolescentes

Generalidades del tema

¿Qué es el abuso de sustancias en la adolescencia?

Muchos adolescentes prueban el alcohol, el tabaco o las drogas. Algunos adolescentes prueban estas sustancias solo unas pocas veces y no vuelven a consumirlas. Otros no pueden controlar sus impulsos ni ansias por estas sustancias. Esto se llama abuso de sustancias.

Los adolescentes pueden probar una cantidad de sustancias, incluidos los cigarrillos, el alcohol, los productos químicos para el hogar (inhalantes), los medicamentos recetados y de venta libre, y las drogas ilegales. Los adolescentes usan alcohol más que cualquier otra sustancia. La marihuana es la droga ilegal que los adolescentes consumen más a menudo.