**Early Assessment** 

# of Environmental Interventions to Prevent Childhood Obesity

Meeting Summary, January 19–20, 2006



#### **Meeting Purpose**

On January 19 and 20, 2006, the Robert Wood Johnson Foundation (RWJF) convened a meeting of experts in the fields of prevention, epidemiology, nutrition, research and evaluation methodology to advise on the development of a program under consideration at the Foundation to promote an Early Assessment of Environmental Interventions to Prevent Childhood Obesity (Early Assessment). Appendix 1 contains a list of participants.

RWJF's intent is to use the Early Assessment to identify interventions currently underway to change the environments in which children play and learn that show particular promise for preventing obesity in children. Once identified, the Foundation plans to work with these interventions to prepare them for a rigorous evaluation, thereby "translating practice into research," as RWJF Senior Program Officer Laura Leviton describes it, and ultimately building the evidence base for the prevention of childhood obesity.

RWJF has initially designed a six-step methodology for Early Assessment, which is based on the concept of the "sequential purchase of information." The heart of the process is Step 4, which we are calling "brief assessment," but which uses the techniques of evaluability assessment, a technique described below. The six steps involve:

- 1. Choosing priorities for a scan of environmental interventions.
- 2. Carrying out the scan.
- 3. Reviewing the results and identifying interventions that warrant brief assessment.
- 4. Briefly assessing these interventions. Brief assessment (usually termed "evaluability assessment") is a pre-evaluation technique that examines the program on paper, assesses whether stakeholders all share the same goals for the program, develops a logic model, examines actual program operation, and determines what elements of the program can be evaluated.
- 5. Reviewing the results and rating the interventions.
- 6. Using the information to position the most-promising interventions for more rigorous study through the conduct of preliminary studies suitable for a National Institutes of Health proposal.

The Early Assessment approach is a novel departure from conventional evaluation. To understand the reason for the approach and the way in which it differs from conventional evaluation practice, see the Concept Paper in Appendix 2.

The brief assessment method RWJF plans to use is also more formally known as an evaluability assessment. This method gauges whether a program is "plausible" and "feasible." Plausible means that the program has set clear and shared goals and objectives, activities, and short- and long-term expected outcomes; and whether the linkages among goals, activities and outcomes make sense. Plausibility is gauged by asking:

- If we do "x," is it logical to assume "y" will be the result?
- And will achieving "y" further our overall goals?

<sup>1</sup> The \$3.46-million initiative, now called Early Assessment of Programs and Policies on Childhood Obesity was approved by the RWJF Board of Trustees in October 2006, with a grant to the National Foundation of the Centers for Disease Control and Prevention (CDC). It is choosing a Coordinating Center for the program's activities February 2007.

The method also gauges the feasibility, or degree of difficulty, of implementing the program either hypothetically (if the implementation has not begun yet or is in an early stage) or actually (if the program is further along). The core tool of brief assessment is the logic model, which provides a visual representation of the underlying logic or theory of a program. (For specifics, see the <u>Concept Paper in Appendix 2.</u>)

At the February meeting, RWJF sought the perspective of this group of practitioners, researchers and leaders of funding agencies on:

- The overall approach planned for Early Assessment.
- The optimal boundaries for Early Assessment's reach.
- Whether the approach might work with policies as well as programs.
- How best to carry out a "scan" of environmental interventions to identify an initial set of programs for further examination.
- How to organize a structure for conducting Step 4—the brief assessments (e.g., how to create a network of assessment teams).
- Optimal criteria for review, rating and selection.

# Participants' Reactions to the Overall Approach

In general, the meeting participants were enthusiastic about RWJF's plans for Early Assessment, while realistic about the challenges in carrying out such an initiative. In evening and morning plenary sessions, participants discussed a number of these challenges.

- The selection criteria to be used in the initial scan should be carefully designed. Some participants said that the initial scan should be able to identify programs that already have indicators of success and are monitoring results. Other factors the criteria should identify include:
  - o Programs that have a broad potential application.
  - o Ones whose activities are well integrated with other parts of the community.
  - o Programs that are trying especially innovative interventions.
- **Defining boundaries and types of interventions to be included is difficult.**Participants expressed concern that the Early Assessment approach might be biased toward the selection of single-component rather than multi-component, multi-level interventions (one suggestion was to give priority to multi-component interventions). Others questioned how to capture interventions that have a primary purpose other than preventing obesity.
- The Early Assessment initiative assesses promise, not effectiveness. Some participants noted that the field is desperate for guidance on effective actions and proposed models and that there are mechanisms in place already (e.g., the U.S. Department of Education's Education Innovation Dissemination Process) to distribute information on such models.

Others cautioned, however, that promise and proof of effectiveness are not synonymous. Proven effective interventions are the ones that should be disseminated. One potential compromise would be to share "what is known" about typical or common approaches.

- Some participants made the point that the initiative needs to adopt the best, state-of-the-art conceptual framework to guide the choice of intervention areas or types, as well as individual interventions. This would assure the selection of those that are likely to address important predictors of obesity prevention.
- Any initiative attempting to identify promise faces difficulty in defining appropriate measures. Some participants said precise measures of expected outcomes were necessary for Early Assessment, while others felt they were not.

One option suggested was focusing at this point on constructs and objectives rather than indicators. If and when the approaches being studied have data, it should be used. Promising approaches could be funded for "Preliminary Studies" as in NIH proposals, using the emerging best measures.

- The initiative should ensure that highly innovative programs—which may not lend themselves to a linear, logic-model type analysis—not be ignored, as they may, in fact, offer great potential.
- Some participants questioned whether an organizing principle other than intervention type should be used. These include geographic locale, or sectors (school, retail food organizations, health care system, etc.).
- An additional benefit of an Early Assessment initiative, many participants said, is its potential to lead to the development of synthetic, trend information on types of interventions, key "active ingredients," and measures and indicators. Leaders of funding agencies noted that a major value for their work might be information on trends in types of interventions, more attention to evaluability assessment, and the development of related tools and systems.

After general discussion, the participants formed three working groups to provide feedback on plans for:

- The initial scan.
- Conducting the brief assessment and forming a network of assessment teams.
- Criteria for review, rating and selection.

## Working Group 1: Ideas About the Initial Scan

The primary feedback from this workgroup was that the initial scan needed to help RWJF focus on a small number of types of interventions. One example of how to structure such a focus involved designating a certain number of innovations to be studied per topic—for example, 10 efforts to increase physical activity in schools.

Most participants in this workgroup saw potential value in a published report about the nature of these innovations, as it would provide information on trends in the field. The group placed less emphasis on the potential for "surfacing" suitable promising innovations.

Other participants, however, cautioned against constructing a narrow focus, warning that this could limit the discovery of new and interesting ideas. The Action for Healthy Kids Web site was mentioned as one source of ideas to populate the initial scan; the Centers for Disease Control and Prevention (CDC) is a second source.

#### Working Group 2: Ideas About Brief Assessment and the Network of Assessment Teams

Recalling that the heart of the process is Step 4, brief assessments of the programs in action, Working Group 2 focused on answering five questions:

#### How can we make the brief assessments attractive and collaborative for intervention developers?

Workgroup participants cited the benefits, first, of clearly telling the intervention developers how they can benefit from a brief assessment. Being identified as a promising intervention will provide real value to these programs, and the assessment team should emphasize this. The assessment team must also take care not to promise more than it can deliver, and should clearly explain the deliverables the intervention staff can expect.

Second, the brief assessment process must not place an undue burden on the intervention staff. Using the principles of community-based participation research, the assessment team should be sure to approach the intervention staff in a positive way, expressing gratitude for their willingness to participate and recognizing the expertise of the intervention staff. It is important to stress that both sides—the practitioners and the assessment team—will learn from the brief assessment.

Finally, some workgroup participants noted that small programs or interventions with few staff may require many visits from the assessment team, placing a burden on both the program and the team, and questioned whether the ability to provide staff to support the brief assessment be a criterion for participation in the Early Assessment initiative.

# ■ What about our products? How do we provide constructive feedback to intervention developers? How do we provide useful information for the expert panel, funders and the field?

The working group participants had four suggestions on how to provide a useful and useable product:

- Be clear to participants and end users about the purpose of the initiative; stress that this is an assessment, not an evaluation.
- Provide verbal and written feedback on the logic model tool; such feedback is valuable.
- Make clear that the results of the brief assessment process will provide information of value to initiatives that turn out to be less promising.
- Return to this group for more suggestions as RWJF's plans and goals are refined.

#### ■ What should be the "bedrock" qualifications for the assessment teams?

The assessment teams must first of all be made up of people who are trustworthy and reliable. They should be analytic, have good communications skills and be good at asking questions.

The working group members differed on whether assessment team members needed to be experts in the prevention of childhood obesity—but thought at the least such expertise should be available as a resource to each team.

Finally, the target populations for the initiatives being assessed may include ethnic and racial minorities, and an effort should be made to recruit assessment team members from minority populations.

## ■ What organizations and organizational structures can help identify potential brief assessment team members?

Participants strongly recommended working in partnership with academic institutions (in particular schools of public health), and with the Prevention Research Centers, funded by the CDC. The CDC may be able to help develop such partnerships.

#### What mechanisms and structures are needed to keep the entire set of teams coordinated and well calibrated?

Workgroup participants stressed the need for regular, organized and well-coordinated communication methods. Web sites, listserves and conference calls were all mentioned as possible communications vehicles.

#### Working Group 3: Ideas About Criteria for Review, Rating and Selection

This workgroup was most engaged by the discussion of criteria that could be used in rating the interventions at two points in the Early Assessment initiative:

- Choosing those that will receive brief assessment.
- Selecting those that will be prepared for formal evaluation.

The group also strongly supported developing a separate set of eligibility criteria for the initial scan of environmental interventions, but did not discuss in detail what this set of criteria should contain.

The group then reviewed and discussed four key proposed categories of selection criteria for interventions:

- Potential for impact.
- Level of innovation.
- Acceptability to stakeholders.
- Potential readiness for evaluation.

The main change the group recommended was to refine this set of selection criteria to devote specialized attention to the first three categories as evidence of promise, while considering "readiness for evaluation" separately in light of indications of promise.

In general, the group agreed with the four proposed categories, comparing them to the RE-AIM framework (a systematic way for researchers, practitioners and policymakers to evaluate health behavior interventions) and finding the two consistent.

Some participants, however, believed that cost merited a separate category. In the Concept Paper (see <u>Appendix 2</u>) it is included under the criterion of feasibility, a category not addressed directly by this working group. The key points raised in the discussion of each category were:

■ **Potential for Impact.** First, the workgroup members agreed that the criterion should be potential for *effectiveness*, rather than impact (which has a different, broader meaning). The group then discussed the elements that will likely determine the effectiveness of these initiatives—not only the capacity to increase availability of healthy food and opportunities for physical activity, but also the intervention's success at affecting social norms so these services/opportunities

are, in fact, used. Assessing the potential effectiveness of the interventions is also highly related to assessment of the intervention's reach to the target population, and of its likelihood to be influential.

The group also questioned whether an intervention must include multiple components, work on multiple levels and affect multiple outcomes in order to be judged sufficiently likely to be effective.

After much discussion, the group concluded that it was important to select interventions that in some way addressed one of the large set of causes of childhood obesity, but that it also needed to be very clear how this cause fit into the larger progression towards the outcome of childhood obesity prevention.

If the intervention addresses only a single component, its effectiveness cannot be assessed in the absence of information on the existence, or efficacy, of other components that must complement it. This discussion led the work group to recommend the development of an overall, guiding logic model for the Early Assessment initiative.

Other issues around potential effectiveness discussed by the group included how to assess whether gains are likely to be maintained, and the trade-off between a small effect on a large population vs. a greater effect on a smaller population.

- Level of Innovation. While believing that not all the selected interventions need to be innovative, the group strongly recommended that a portion of the selected interventions be set aside specifically for highly innovative programs—ones that present a high risk as well as a high gain. The participants described this set-aside as akin to a venture-capital fund.
- Acceptability to Stakeholders. The group discussed the concept of acceptability to stakeholders, with some proposing that acceptability is too mild, that what should instead be sought is a project about which stakeholders feel passionate.

Others cautioned that expecting a highly innovative intervention to be acceptable is unrealistic, that some ideas need to make people uncomfortable at first, in order to lead to real change.

A third element of acceptability to be considered is whether the project is built into the fabric of its community in a way that will support its survival, growth and potential for replication.

- **Potential Readiness for Evaluation.** This readiness, the group believed, is integrally linked to, and should be rated by, the following criteria:
  - o The intervention's potential for collection of baseline, pre-intervention data.
  - o Monitoring of ongoing implementation.
  - o Measurement of outcomes.

#### **Conclusions and Next Steps**

From this meeting, RWJF staff concluded:

- There is value in moving forward with the Early Assessment initiative. The meeting itself helped to establish credibility for the concept and methods of brief assessment, and helped clarify the method's track record.
- The meeting participants overall were positive about the Early Assessment initiative. While noting the complexities and challenges facing RWJF in carrying out the initiative, they offered ways to address them and stated the value of doing so.
- It is worth exploring and capitalizing on the potential the initiative offers to develop a body of knowledge—synthesized from the experience of scanning and assessing such a large number of projects—on key success factors for environmental interventions to address childhood obesity as well as key success factors in measuring and assessing these initiatives.

Although building such a body of knowledge is not the primary goal of the Early Assessment initiative, meeting participants stressed the value of such work.

The next steps after the meeting have included and will include:

- Synthesizing and documenting the meeting's results.
- Conducting conference calls with key players who could not participate in the meeting, to ensure their ideas are captured.
- Revising the current Early Assessment initiative plans based on the results of this
  meeting and taking the Early Assessment initiative concept paper to the RWJF
  Childhood Obesity Team for discussion.
- Working to revise the selection criteria that will drive the Early Assessment process.
- Conducting simulations that apply these selection criteria, first to the scanning and, second, to expert review conducted by RWJF staff and consultants, to further refine the effectiveness and efficiency of the Early Assessment process.

Finally, as they refined the plans for this initiative,<sup>2</sup> RWJF staff continued to be aware of the challenges involved in:

- Communicating to practitioners that "promise" and "effectiveness" are two entirely different things—and clarifying that this initiative seeks promise, as an evaluation of effectiveness is premature for the interventions involved.
- Defining the types of interventions that will be included in the Early Assessment initiative, especially accounting for the inclusion of at least a few highly innovative interventions, and finding the right balance between multiple-component and single-component interventions, and between policy and programmatic interventions.
- Integrating into the selection criteria (and into the initiative) the concepts of the community focus and attractiveness to the target population.

<sup>2</sup> The \$3.46-million program, now called Early Assessment of Programs and Policies on Childhood Obesity was approved by the RWJF Board of Trustees in October 2006.

#### Appendix 1:

#### **Participant List**

#### Positions as of the Meeting

#### David Altman, Ph.D.

Vice President, Research and Innovation Center for Creative Leadership Greensboro, N.C.

#### Richard Catalano, Ph.D.

Director and Professor Social Development Research Group School of Social Work, University of Washington Seattle, Wash.

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#### David Cotton, Ph.D., M.P.H.

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#### William Dietz, M.D.

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#### Linda Jo Doctor, M.P.H.

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#### Paul Estabrooks, Ph.D.

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#### Terry Huang, Ph.D., M.P.H.

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#### Donna Johnson, Ph.D., R.D.

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#### Lloyd Kolbe, Ph.D.

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#### Shiriki Kumanyika, Ph.D.

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#### Alicia Moag-Stahlberg, M.S., R.D., L.D.

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#### Linda Nebeling, Ph.D., M.P.H, R.D., F.A.D.A.

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#### Prabhu Ponkshe, M.A., L.L.B.

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#### Scott Rhodes, Ph.D., M.P.H.

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#### Debra Rog, Ph.D.

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#### James Sallis, Ph.D.

Professor

Department of Psychology San Diego State University San Diego, Calif.

#### Amy Yaroch, Ph.D.

Program Director Health Promotion Research Branch National Cancer Institute Bethesda, Md.

#### **RWJF Participants**

#### **Edith Burbank-Schmitt**

Research Assistant

#### Vanessa Farrell

Program Associate, Health Group

#### Marjorie Gutman, Ph.D. (Consultant to RWJF)

Consultant and Senior Researcher Treatment Research Institute Philadelphia, Pa.

#### James R. Knickman, Ph.D.

Vice President

Research and Evaluation

#### Laura Leviton, Ph.D.

Senior Program Officer

#### James S. Marks, M.D., M.P.H.

Senior Vice President; Director, Health Group

#### Jan Mihalow

Grants Administrator, Health Group

#### Robin E. Mockenhaupt, Ph.D.

Deputy Director, Health Group

#### C. Tracy Orleans, Ph.D.

Senior Scientist/Senior Program Officer, Distinguished Fellow

#### Keshia M. Pollack, M.P.H., Ph.D.

Post Doctoral Fellow, Research and Evaluation

#### Dwayne Proctor, Ph.D.

Senior Communications Officer

#### **Jeanne Stives**

Grants Administrator, Health Group

#### Appendix 2:

# Concept Paper: Early Assessment of Environmental Interventions to Prevent Childhood Obesity

**Revised Draft: January 9, 2006** 

A. Strategic Focus of the Robert Wood Johnson Foundation in Childhood Obesity The Robert Wood Johnson Foundation is committed to halting the growth in the epidemic of childhood obesity through prevention. The Foundation has chosen as its special emphasis, interventions that focus on children's environments. Interventions may focus on environments to increase physical activity. Some possibilities include: walkable neighborhoods, safe parks and daily physical education in schools.

They also may focus on environments to increase access to, and palatability of, less calorie-dense foods. Possibilities include changing the offerings in school cafeterias and increasing access to fresh fruits and vegetables in low-income neighborhoods.

Interventions may focus on policy or nonpolicy levers for change at any level whether federal, state, local or organizational. These can be implemented in any setting whether business, community, school or family—all of which are environments that influence children's healthy eating and physical activity. We call these *environmental interventions* to distinguish them from didactic programs that focus strictly on trying to change individual children's knowledge, attitudes and behavior, acknowledging that many programs focus on both.<sup>3,4</sup>

This focus poses a challenge, however: the evidence base for environmental interventions is very limited at this early stage in development. Moreover, communities and schools are implementing a wide variety of environmental interventions without much guidance about effective practices.<sup>5</sup>

A cornerstone of the Foundation's strategy, therefore, is to build the knowledge base about what works to halt the epidemic. Early Assessment of Environmental Interventions is a part of that strategy. Many elements of this initiative have been used before, with some success. These are identified and further described in the footnotes.

# **B.** An Initiative to Capitalize on Rich Natural Variation

#### **The Challenge of Variation**

Things are changing rapidly in the field of childhood obesity prevention, and literally hundreds of environmental interventions are being proposed and implemented across the country. This is seen in scans performed by the National Council of State Legislatures, the W.K. Kellogg and Dell Foundations, the numerous activities of state health departments, state and local school policies, and various activities funded by Centers for Disease Control and Prevention (CDC), National Institutes of Health (NIH) and the U.S. Department of Agriculture.

<sup>3</sup> Dietz WH and Gortmaker SL. "Preventing Obesity in Children and Adolescents." *Annual Review of Public Health*, 22: 337–353, 2001.

<sup>4</sup> French SA, Story M and Jeffery RW. "Environmental Influences on Eating and Physical Activity." Annual Review of Public Health, 22: 309–335, 2001.

<sup>5</sup> For example, the CDC Guide to Community Preventive Services rates only one policy at this time, as having sufficient evidence for effectiveness: daily physical education.

<sup>6</sup> Now called Early Assessment of Programs and Policies on Childhood Obesity.

These scans are extremely useful for providing a broad brushstroke picture regarding trends and interventions but do not tend to apply a discriminating lens to the "nuggets" uncovered. A method is needed to produce the next level of timely useful information.

The proposed initiative coordinates two existing methods to capitalize on natural variation:

- Monitoring for new developments in environmental interventions.
- Brief assessment (usually called evaluability assessment) of exemplary or innovative environmental interventions.

These two methods are embedded within a process to screen the new environmental interventions for those with the most promise for effectiveness in preventing childhood obesity. These most-promising projects could be evaluated later more rigorously for effectiveness. In the past, the cornerstone of the Early Assessment initiative—brief assessment—has been employed to good effect for decision-makers in government who need to take a middle course between surveys and detailed evaluations.<sup>7</sup>

#### Screening for "Diamonds in the Rough"

Out of all the variety in school, community and state-level actions, at least some environmental interventions may have powerful effects. However, *the variety itself poses a challenge*, because both time and resources are limited to properly evaluate effectiveness.

It is feasible, however, to separate the wheat from the chaff, and do so at reasonable cost, *before* the Foundation or other funders commit to costly evaluation. We propose a staged process for screening projects to increase the chances that effective strategies are the ones that receive a rigorous test, thereby assisting with strategic or "smart" growth of this important field.

The methods being employed in this Early Assessment initiative have all been tested before; in combination, they are intended to stretch our resources to be successful with the Foundation's strategy.

Several key examples are listed in the footnotes; three of these are currently funded by the CDC.<sup>8</sup>

<sup>7</sup> For example, Michael Hendricks has described a rapid assessment method that was highly utilized in the Department of Health and Human Services, see: Barkdoll GL and Bell JB (eds). Evaluation and the Federal Decision Maker: New Directions for Program Evaluation #41. San Francisco: Jossey-Bass, 1989.

<sup>8</sup> Three examples of this activity are currently known to be under way; others may be available as well:

The CDC's National Center for Chronic Disease Prevention and Health Promotion (NCCDPHP) has
implemented the SWAT program, a rapid assessment of worksite health promotion programs around the
nation to find "diamonds in the rough" for further study of effectiveness. To date, about 50 percent of worksite
programs contacted have welcomed the effort and participated in a constructive fashion.

The Division of Adolescent and School Health of the NCCDPHP has implemented a similar effort to identify
and further evaluate promising adolescent and school health programs; this effort is at a slightly earlier stage of
implementation.

The National Center for HIV, STD and TB Prevention is identifying promising programs and studying them
more rigorously through its activities to increase the capacity of state health departments to evaluate HIVprevention efforts funded by the CDC. Most noteworthy is that promising programs are identified in part,
through evaluability assessment. About five such programs per year receive an evaluation of effectiveness.

By combining these monitoring and assessment activities in a seamless screening process, we can potentially:

- Avoid wasting precious resources on a "no effect" conclusion.
- Prevent the chilling effect that a premature negative evaluation can have on innovations to combat childhood obesity.¹¹0
- Provide useful formative feedback to projects for a low cost and low-response burden, optimizing their further development.<sup>11</sup>
- Help to prepare and position the interventions that are deemed most promising for more rigorous evaluation of effectiveness. 12
- Provide timely insights to the field and funding organizations on the range of interventions, their strengths and limitations.<sup>13</sup>

Once the Early Assessment initiative has identified the interventions that are most promising and ready for evaluation, a logical next step is to evaluate their effectiveness more rigorously. However, the next step of rigorous study is outside the scope of this initiative.

Projects and models deemed most promising could be presented within the Foundation for possible evaluation funding, and compete for other funding on the basis of preliminary evidence that is offered. Effectiveness studies could also be funded by the NIH, CDC or other foundations, under the right circumstances. We are actively pursuing mechanisms whereby such studies could be supported.

Under the Early Assessment initiative, however, there will be no commitment for further study of any given intervention. It is a structure to identify those with most promise, not to test them.

# C. Overview of the Early Assessment Strategy and Process

To identify the most powerful change strategies to address childhood obesity, we will use what in evaluation is termed *the sequential purchase of information*.<sup>14</sup> That is, where initial phases indicate the promise of a program, *only* then are we justified in collecting additional information.

Further, to ensure an objective process, we have designed a systematic, transparent process driven by peer review that makes maximum use of expertise in the pertinent areas of prevention of childhood obesity, including:

- Healthy eating and physical activity.
- Policy and nonpolicy prevention interventions.
- Evaluation methodology including brief assessment (or evaluability assessment).

<sup>9</sup> Wholey JP. "Evaluability Assessment." In *Handbook of Practical Program Evaluation*, Revised ed, Wholey J, Hatry H and Newcomer K (eds). San Francisco: Jossey-Bass, 2004.

<sup>10</sup> Shadish WR, Cook TD and Leviton LC. Foundations of Program Evaluation: Theories of Practice. Thousand Oaks, CA: Sage, 1990.

<sup>11</sup> McLaughlin JA and Jordan GB. "Using Logic Models." In Handbook of Practical Program Evaluation, Revised ed, Wholey J, Hatry H and Newcomer K (eds). San Francisco: Jossey-Bass, 2004.

<sup>12</sup> Cook TD, Leviton LC and Shadish WR. "Evaluation Research." In *The Handbook of Social Psychology*, 3rd ed, Lindzey G and Aronson E (eds). New York: Random House, 1985.

<sup>13</sup> Hendricks, op. cit.

<sup>14</sup> This method has been used extensively in various policy sectors dating from the mid-1970s when first employed by Joseph Wholey in the office of the Assistant Secretary for Planning and Evaluation of the Department of Health, Education and Welfare, the precursor of the Department of Health and Human Services.

Last, we have tried to ensure that the Early Assessment process will be agile and relatively rapid compared to full-scale evaluation studies. Therefore, we have designed a cyclical process that is meant to unfold in approximately 1 to 1 1/2 years per cycle.

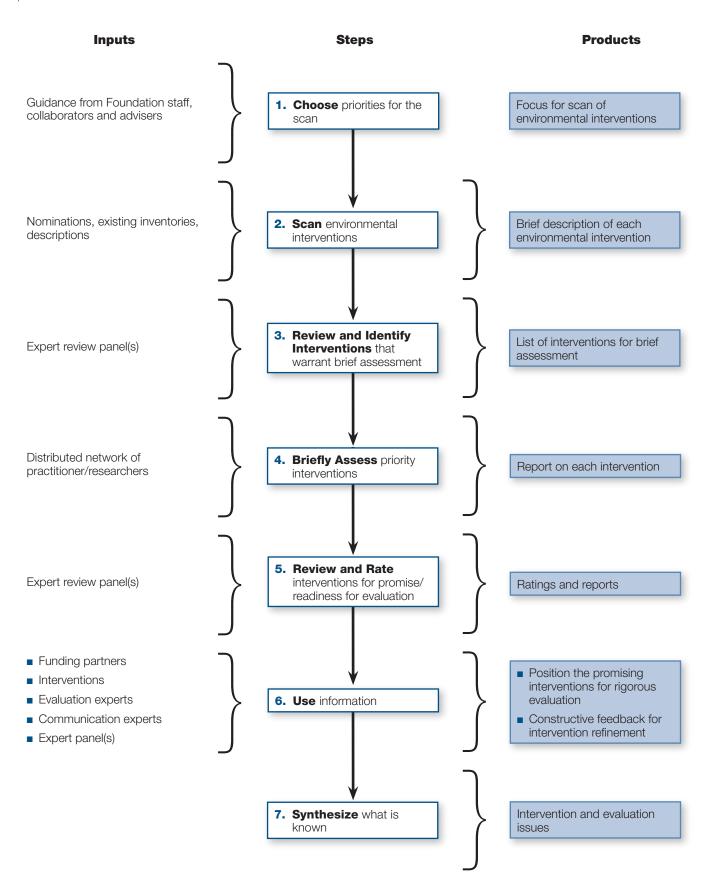
A preliminary description of the six-step process, including inputs, activities and potential products, is seen in Figure 1. In general outline these steps are:

- 1. **Selection of priority areas for assessment** to focus the scan of environmental interventions (up to three priority areas, or open-ended; once per year).
- 2. **Scan of environmental interventions** in those priority areas. Scan results in selection of some subset of interventions to present for initial review by expert panel (ongoing).
- 3. **Initial review of interventions by an expert panel;** identification of interventions that merit further study (review up to 100 interventions per year; select up to 30–40 interventions; up to two reviews per intervention per year).
- 4. **Brief assessment** of selected interventions; individual assessment reports (two to three months per assessment; up to 30–40 assessments per year).
- 5. **Second review and rating of interventions:** ratings of promise and readiness for more rigorous evaluation (ongoing; up to 30–40 assessments per year).

#### 6. Use information:

- a. Position the most-promising interventions for rigorous evaluation (ongoing, unknown number per year).
- b. Provide constructive feedback to interventions for further refinement (ongoing, up to 30 per year).
- 7. **Synthesize** what is known about these interventions and evaluation issues that surface (up to two syntheses per year).

**Figure 1: The Early Assessment Process** 



#### **D.** The Process in Detail

#### **Step 1: Selection of Priority Areas for Assessment**

This step will be conducted once per year, in consultation with Foundation staff, and perhaps expert advisers, potential users, and collaborating institutions and organizations.

The topics will reflect a variety of priorities, such as:

- A need to assess lesser-known areas for potential investment.
- Particular information needs of collaborating organizations and potential users.
- Need to reduce uncertainty about a policy recommendation.

Examples of priority areas might be:

- Interventions to bring retail healthy food back to low-income neighborhoods.
- Ways to engage food service workers in providing healthier foods.
- Ways to provide a safe environment for apartment-dwelling children to play.
- Novel ways to engage parents in providing healthier foods to their children.

A *central challenge* is to determine the mix between a highly topical set of scans, and a more broad-ranging scan of innovations. The issue is whether the more topical scans will in fact reveal enough interventions that might merit further assessment.

The experience of the RWJF Substance Abuse Policy Research Program is helpful in this regard: over time, staff have struck a balance between focused and broad solicitations of ideas.

#### **Step 2: Scan of Environmental Interventions**

This step will be undertaken by Early Assessment initiative staff, based on the priority areas. The scan could be based on a combination of methods, including:

- Nominations by advisers.
- A call for nominations.
- Factiva<sup>©</sup> searches.
- Existing inventories of environmental interventions maintained by government and foundations.

Staff will compile brief descriptions of interventions in the targeted areas for use by the expert panel. The brief descriptions should provide enough detail concerning the interventions that the expert panel could make choices based on the selection criteria presented below.

#### Step 3: Initial Review of Interventions by an Expert Panel

An expert panel will review brief descriptions of interventions and then identify which of them warrant further study. Since each priority area for assessment may require different kinds of expertise, the Early Assessment initiative may engage diverse panel members over time.

Because the brief assessments that follow in Step 3 will be relatively labor intensive, the expert panel(s) will serve as gatekeepers to determine the optimal use of these brief assessments for the highest priority interventions.

A tentative list of criteria for the selection of interventions includes the following:

- **Potential Impact**—The intervention appears to have potential for impact on the social or physical environment pertinent to healthy eating and active living—and ultimately on the target individual behaviors. Potential impact is assessed based on the intervention's conceptual logic and other pertinent characteristics such as intensity and duration. Estimate of impact is based on "face value," program documents, and brief expert input from funding organization staff and contractors, and other experts who know the intervention but are independent from it.<sup>15</sup>
- Innovativeness—Intervention is new or different or a significant variation on an existing promising intervention. Emphasis on innovativeness may be mitigated if the intervention represents a type or category of intervention that is prevalent in the field and/or of particular interest to the Foundation and collaborating organizations.
- **Reach to Target Population**—The likelihood or actual evidence that the intervention will achieve participation (and even retention and completion) by the target population (i.e., approximately what percentage of the target population is likely to or actually does participate in or is "reached" in some other way by the intervention).
- Acceptability to Stakeholders—The potential or actual evidence that the intervention is acceptable and even attractive to pertinent collaborators, gatekeepers, and other necessary groups such as schools, businesses, government agencies, grassroots groups, etc.
- **Feasibility of Implementation**—The likelihood that the intervention as designed can be implemented fully given the clarity of its goals, objectives and strategies; complexity and leadership requirements; financial and other costs; and training and supervision requirements. If evidence exists regarding program implementation, then the extent to which the intervention "on paper" has been fully and faithfully implemented and the degree of difficulty in achieving implementation.
- **Feasibility of Adoption**—The potential for similar sites/entities to adopt the intervention.
- **Intervention Sustainability**—The likelihood that the intervention can continue over time without special resources or extraordinary leadership.
- **Generalizability**—The degree to which the intervention demonstrates or has potential to be adapted for other populations and settings.

<sup>15</sup> McLaughlin and Jordan, op. cit.

■ **Staff/Organizational Capacity**—Sponsoring organization and staff have the capacity to participate fully in a brief assessment, learn from it, and further develop the intervention.

#### **Step 4: Brief Assessment**

The method we propose for brief assessment is outlined in Figure 2. It is adapted from the evaluation technique called evaluability assessment.<sup>16</sup>

We renamed this step "brief assessment," because otherwise, program developers and implementers have expectations that the process involves evaluation. It does not—instead, it is a *pre-evaluation* activity, designed to maximize the chances that any subsequent evaluation will result in useful information.

This technique has been employed extensively by the Department of Health and Human Service, by the Urban Institute for other policy sectors, and most recently, in the evaluation of state-level HIV-prevention activities funded by the CDC.

While the information from evaluability assessments generally has been found to be useful, often such an assessment may not result in further evaluation.<sup>17</sup> At least one reason is that these assessments regularly find that program logic models are not consistent with resources and activities, or that the logic models themselves are not plausible to achieve program outcomes.

For the Early Assessment of Environmental Interventions initiative, it is to be expected that only a modest number of interventions would receive subsequent evaluation. In fact, the approach takes advantage of this tendency.

The Early Assessment initiative depends on the brief assessments to winnow through interventions that may have such problems, identifying those "diamonds in the rough" that merit further evaluation. Moreover, a major secondary benefit of brief assessment is that feedback to all interventions can result in improvements in those that are not yet ready for rigorous study.

As seen in Figure 2, the process depends on documenting the intervention's design, developing a logic model of the intervention being assessed, consulting stakeholders who have an interest in the intervention, and documenting, often in briefest outline, the implementation of the intervention.

At each step in the process, the logic model is revised to reflect the reality of the intervention. A report will be produced on each intervention that assesses:

- The *plausibility* that the intervention will produce the outcomes envisioned, leading to prevention of childhood obesity.
- The *feasibility* of implementing the intervention.
- The *options* for further evaluation; and critique of data that the intervention's management may have collected (if any).

<sup>16</sup> Wholey, op. cit.

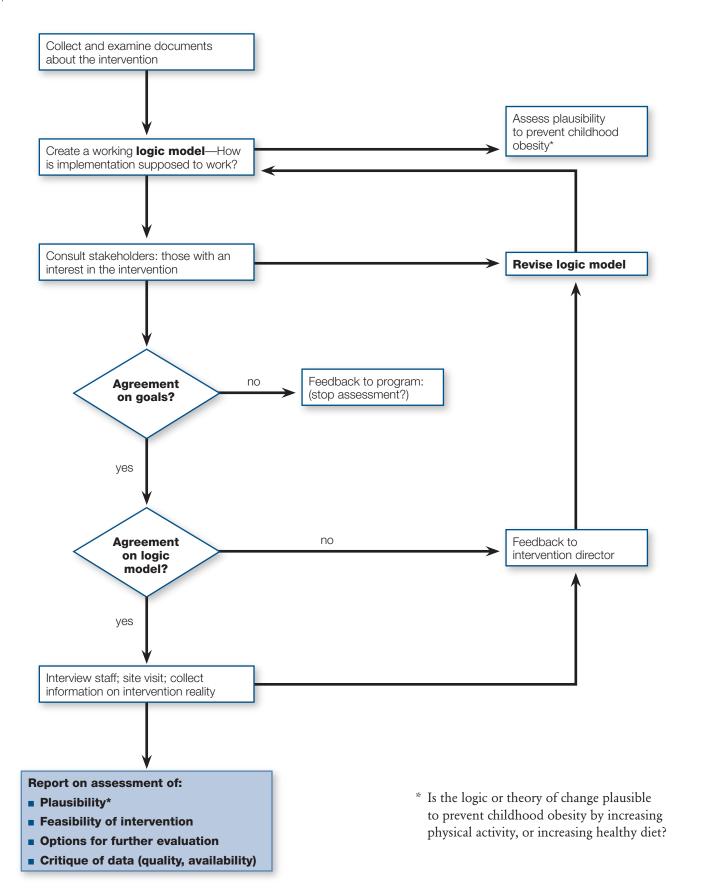
<sup>17</sup> Shadish, Cook and Leviton, op. cit.; Rog DJ "Evaluability Assessment: Then and Now," at the annual meeting of the American Evaluation Association, October 29, 2005, Toronto, Canada.

In certain cases, the intervention may be very plausible and feasible, yet no data are easily available for further assessment of promise. In these cases, a modest amount of money may be applied to data collection (as in pre and post testing) or to obtain and analyze archival data sets (such as school records).

As seen in <u>Section E</u>, we anticipate that these brief assessments can be implemented by a distributed network of professionals in the fields of public health, nutrition, physical activity and health promotion. Experience to date is that the brief assessments can be done with fairly minimal training, but with supervision in order to keep the process on track.

In preparation is a common template whose aim is to calibrate these brief assessments and make the reports uniform.

**Figure 2: Brief Assessment Process** 



#### **Step 5: Second Review and Rating of Interventions**

The expert panel(s) will reconvene to review the reports from the brief assessments that have been conducted and to rate each intervention, both for its promise to prevent childhood obesity and its readiness for evaluation.

Again, the expert panels will serve as gatekeepers, but this time, to assure that the nine criteria listed in <u>Step 3</u> (potential effectiveness, innovativeness, reach, etc.) are applied in these ratings. It is possible that there may be outside pressure to pronounce certain interventions as most promising, without regard to these criteria. Expert panels such as the ones we are proposing have been effective at ruling in the most-promising programs, and ruling out the less promising.<sup>18</sup>

Ratings will focus on the degree of promise and readiness, not on a "yes" or "no" decision on promise, in order to provide a nuanced picture of each intervention, and encourage further development, improvements, and constructive feedback to the developers and managers of the interventions.

#### **Step 6: Use of Information**

We envision three distinct uses of the information from the brief assessments and the second expert panel review.

■ Ways to further position the promising interventions for rigorous evaluation. We anticipate working further with the developers and stakeholders of those interventions that have been rated as most promising and ready for evaluation. The goal will be to assist them with grant submissions, either to foundations or to the federal government.

For a federal grant application, we recognize that a good deal of preparatory work may be required, for example linking the developers with appropriate research expertise; conducting preliminary data collection and analysis; designing a plan to expand sites for intervention, and so on. This will not be a trivial undertaking and will require staff time from the proposed coordinating center (see The Coordinating Center).

- Constructive feedback to all intervention developers so that they can improve their efforts. The brief assessments and the second expert review offer excellent vehicles for program development. Indeed, we have observed that this is a key advantage of the evaluability assessment process and something that intervention developers and managers genuinely appreciate. Of course, the feedback must be provided in a confidential and diplomatic form. It is likely that brief assessment teams will need to work with a staff member of a coordinating center in providing such feedback, since diplomacy and facilitation of such feedback are special skill sets that a given brief assessment team may not always possess.
- Synthesis of findings for those interventions that are exemplars of a priority topic or area. We will convene a meeting of the professionals that conducted the brief assessments and review panel members, under the direction of a

<sup>18</sup> For example, the Department of Education long had such a panel to rule on effectiveness of education programs. This function has now been delegated to the "What Works Network." See <a href="http://www.ed.gov/offices/OERI/ORAD/KAD/expert\_panel/bistoric.btml">https://www.ed.gov/offices/OERI/ORAD/KAD/expert\_panel/bistoric.btml</a> for a history of this function.

<sup>19</sup> Leviton LC, Collins CB, Laird BL and Kratt PP. "Teaching Evaluation Using Evaluability Assessment." Evaluation, 4: 389-409, 1998.

lead expert or staff member. For the meeting, we will ask them to identify key themes, challenges and opportunities reflected in the 10 or more brief assessments conducted on this topic or priority area.

Issues generated at the review meeting also will be integrated. For example, the Foundation and collaborators may determine that a priority area for the Early Assessment initiative is to better understand how to engage food service workers in providing palatable, less calorie-dense foods. The brief assessments would result in a synthesis of findings about this topic. This strategy has been used extensively in policy analysis, with highly informative results.<sup>20</sup>

## E. Structure and Resources for the Early Assessment Initiative

To accomplish these steps, the Early Assessment initiative will have four structural components: a coordinating center, one or more review panels of researchers and content experts, a distributed network of teams to conduct brief assessments, and an advisory committee. The Early Assessment initiative would cost approximately \$1 million per year for three years.

#### **The Coordinating Center**

This center will identify interventions across the country, maintain an inventory of interventions and findings, provide training and quality control for brief assessment, and coordinate the steps and entities involved in the screening process. Staff of the coordinating center should possess these characteristics:

- Content expertise in evaluation and in obesity prevention, and ability to collaborate with others for this purpose.
- No personal stake in determining which of the strategies and projects are promising, to assure an objective process.
- Ability to train a diverse set of collaborators in the use of brief assessment and oversee both content and delivery of reports.

The center should be able to work flexibly and at reasonable cost.

**A note on dissemination and use of products:** The coordinating center will work with the Foundation's communication professionals to create a strategic plan for use and dissemination (where appropriate) of Early Assessment products.

#### The Expert Review Panel(s)

These panels will conduct an initial screen to determine which interventions merit further investigation. Later, based on brief assessment reports, the panel(s) will determine the likely promise of the selected interventions. The panel(s) should reflect the following kinds of expertise:

- Nutrition.
- Physical activity.

<sup>20</sup> For example, Richard Nathan has used this method for reports to federal policy-makers on a variety of health programs and other policies whose implementation occurs at state and local levels. See, for example, *Making Health Reform Work: The View from the States*, John J. DiJulio Jr. and Richard P. Nathan (eds), Washington: The Brookings Institution, 1994.

- Prevention of childhood obesity with emphasis on environmental/policy approaches.
- Pertinent environments, e.g., school, community, family, and local and state policy.
- Theory of prevention and conceptual frameworks.
- Evaluation methodology and brief assessment.

Ex officio members will include representatives of the Foundation, of collaborating organizations, and the leaders of the Foundation's *Healthy Eating Research* (Mary Story) and *Active Living Research* programs (Jim Sallis).

#### **Distributed Network of Teams to Conduct Brief Assessments**

The brief assessments represent the variable costs in the Early Assessment initiative. We anticipate that up to 30 such assessments can be conducted per year, for between \$15,000 and \$30,000 each. The reasons for the range in cost are that:

- The logic models of some interventions will be seen early in the process to have important flaws, so that further study will not be necessary.
- Some of the interventions will require or merit a modest amount of primary data collection or analysis, thus adding to cost.
- Where there are important areas for feedback and intervention improvement, the teams conducting the brief assessments will be an important part of the process.

The network of teams may consist of applied researchers, public health professionals with evaluation expertise, and others. We plan to begin with a small number of organizations for the initial work, but hope to expand so that promising interventions can have evaluation capacity close at hand.

Teams may come from the university or contract research worlds, but also from state health departments' divisions of chronic disease and health promotion and education, from the staff of public health institutes, or from the CDC Prevention Research Centers. At this initial stage, teams should possess certain qualities:

- Experience with, or willingness to be trained in, the conduct of evaluability assessment (i.e., the brief assessment process outlined above) and evaluation methods more broadly.
- Expertise on childhood obesity and its prevention, and/or expertise in prevention of other harmful health behaviors.
- Expertise on environmental interventions.
- Ideally, geographic distribution (e.g., one or two teams per DHHS region).
- Capacity, that is, the ability to take on at least a few brief assessments at a time.
- Reliability, that is, track record in meeting timelines and quality standards in each phase of the assessment process (preparation, implementation and products).

■ Collaborative capacity, that is, the ability to work well with others, including the staffs of the projects to be evaluated, Foundation staff and other funders, and the expert panel.

#### **Advisory Committee**

An advisory committee will include representatives of collaborating funding organizations and other interested parties that can provide the needed surveillance of innovations, help to insure that Early Assessment products are useful and appropriately distributed, and act as champions of subsequent, more rigorous evaluation.