Rural Research Report

Measuring the Impacts of Economic Development

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There is a growing interest in and need for measurement of community and economic development efforts as local governments invest in initiatives to improve jobs and quality of life in their areas. This *Rural Research Report* is about measuring economic development: reasons for measuring, measuring outputs vs. outcomes, measuring money vs. wealth, systems of measurement for multiple capitals, and examples from the field. The goal is to help practitioners and elected officials select measures and measurement practices that support their work and mission.

Why Measure?[1]

Outcome measurement provides information that can be useful in many ways. However, the fact that this type of accountability is required by funders—whether foundations or federal, state or local governments — may make it seem like a hoop to jump through. On the contrary, there are serious benefits to measuring the impact of such work such as:

- Measuring the effectiveness of an intervention;
- Identifying effective practices;
- Identifying practices that need improvement;
- Proving value to existing and potential funders; and
- Reaching clarity and consensus around the purpose of a program (Measuring Outcomes).

The process of measurement fosters continuous learning through reflection. It allows the time and space to think intelligently about the work underway and its impact. When undertaken on a regular basis, measurement can help to improve the efficiency and effectiveness of programs.

Measurement creates new information and new patterns of information flow. If needed measurement data does not exist or is not easily accessible, new ways of acquiring or developing that information must be found. Measurement can lead to new and unprecedented conversations, especially with information gatekeepers.

1 The measurement information in this section and discussion of measurement throughout the paper is drawn from Ratner, Shanna. 2012. You Get What You Measure: A Process to Determine and Measure Progress in Community Development. In CD Practice Spring 2012. Issue 18. **http://www.comm-dev.org/images/attachments/070_CDPractices.pdf**; You Get What You Measure® materials developed by Yellow Wood Associates.

The measurement process also captures the results of risk and experimentation. Organizations and communities are often interested in developing new programs. However, without measurement, there is no methodical way to determine if the new program was effective. The process allows people to think about what worked, what might need to be tweaked, and what did not work.

Before deciding what to measure or revisiting current measurement practices, it is important to answer questions about how that information will be used. Reflecting on reasons for measurement will help practitioners determine how and what to measure.

Ways to Use the Results of Measurement

There are at least three important ways to use the measurement results: 1) to educate others, 2) to influence decision-makers, and 3) to reflect on the effectiveness of actions taken.

Measuring to Educate Others. The first way to use measurement results is to educate others about the information being collected. This is especially important if the information contradicts one or more of the common assumptions about how to reach the desired goal. If the measurement results will be used to educate others, it helps to ask who will be educated, what information they need, and what communication process will be used to educate them.

Even a baseline measurement can provide significant information for decision-makers and the general public. A county in northeastern New York State wanted to know the impact of neighboring Canada, on its economy. The first measurement created a baseline. Though they could not tell how this impact had changed over time, simply knowing the overall impact was very important in attracting the attention of policymakers and the public. This county re-measured every two years and learned more each time about how their economy was doing. The measurement results can be publicized in many ways—press releases, articles in community papers and newsletters, radio spots, posters, meetings, theater, murals, and other venues (Yellow Wood Associate 2002).

Measuring to Influence Decision-Makers. A second use of measurement results is to influence decision-makers directly. When using measures to influence decision-makers, it helps to ask "What are the desired changes?" Is there a decision coming up that will influence the prospects of progress toward the goal? How can the information be used to improve the quality of decision-making? Who needs the information, when, and in what form? Who is the best person or group to deliver the information to assure its credibility?

As an example of using measures to influence decisions, the Mountain Association for Community Economic Development (MACED) in Appalachian Kentucky has been working on an energy efficiency retrofit value chain initiative, *How$martKY*, designed to help low income homeowners take advantage of energy efficiency retrofits by paying for them with the savings on their bills (on-bill financing). MACED's measures include: the number of new utilities participating in *How$martKY*; the kilowatt hours not used because of retrofits or renewable energy installations; the number of retrofits; the annual gross revenues saved annually due to electricity saved; and an estimate of jobs affected. These measures allowed them to influence decision-makers, such as the Kentucky Public Service Commission, and establish *How$martKY* as a permanent program. Their work and measures of progress have also supported the advancement of clean energy policy in the Kentucky state legislature (Yellow Wood Associates 2013).

Measuring to Reflect on the Effectiveness of Actions. Third, it might be fruitful to use the information to reflect on the effectiveness of past actions. When reflecting on effectiveness, it helps to ask: What will be done with the results and how will measures and actions be revised? Has tangible progress been made toward the goal(s)? If yes, spread the word and celebrate! If not, what is known now that was not known before and that will help make actions more effective? Were previous assumptions correct or incorrect? What information is really needed now?

Most measurement practices help to reflect on the effectiveness of actions. In the Ford Foundation's Wealth Creation in Rural Communities initiative, that focused on high poverty areas in Central Appalachia, the Deep South, and the Lower Rio Grande Valley in Texas, all grantees had to measure their impacts using multiple forms of wealth (Yellow Wood Associate 2011). The intent was to allow them to determine which interventions were working and producing the desired results and which were not. As a result, these grantees were able to make mid-course corrections and in some cases, adjust their interventions to have more impact.

Measuring Outputs vs. Measuring Outcomes

Foundations and government agencies regularly ask communities and organizations to measure the effectiveness of their programs. Measurement typically focuses on *outputs* and *outcomes*. *Outputs* are the things an organization or community does to create outcomes, such as conduct meetings, deliver services, develop products, provide training, facilitate sessions and similar efforts. *Outcomes* are the changes that an organization or community hopes to see as a result of their actions.

Economic development organizations or agencies typically prefer to measure outputs, because they are usually things that they can control. Outcomes, on the other hand, depend on the efforts of many different organizations and agencies, rather than only local efforts. Consequently, an organization or agency is often reluctant to claim outcomes for which they were not directly responsible. Nevertheless, since taxpayers, funders and others are seeking results, there does seem to be a shift toward measuring economic development outcomes. Although assigning responsibility for outcomes can be complex, a focus on outcomes encourages consumers of the information to evaluate what outputs contributed to the reported outcomes.

Practitioners can select an outcome measure(s) that reflects the aspects of their work most important to their mission from a wide range of possible measures. Measurement of outcomes can include (Ammons and Morgan 2011) those around investment and the outcomes of investment (e.g., investment created through economic development efforts), or jobs (e.g., number of new jobs created through economic development or living wage jobs). Alternatively, construction/real estate in a downtown (e.g., value of new construction downtown, growth in appraised value of downtown, percentage increase in assessed values of business properties, percentage increase in property tax valuation, downtown office or retail vacancy or occupancy rate, existing and available office or other space), or new businesses (e.g., the number of new business licenses or percentage increase in business or commercial tax base) can be components in a measurement process.

Other measures of economic development success can include downtown vitality measures, hotel occupancy rates, job retention and creation rates, job to resident ratios, fund leveraging, new businesses and business start-ups, recruitment, sales tax receipts, tourism and convention center occupancy, training and mentoring success and more.

Measuring Results Beyond Jobs and Income

Economic development measures traditionally include jobs and income. Funders want to know whether economic development efforts produce additional jobs or additional income. However, the data may not identify the kinds of jobs created. How much do the jobs pay and is the compensation a livable wage? Has the quality of life improved? And, why measure income, rather than assets? These questions are typically not answered by traditional economic development measures.

There is no widely recognized monetary measure of a community's natural, human and physical assets, for those communities that do want to go beyond jobs and income. Most monetary measures are imperfect. Wealth measures treat economic development as beyond jobs and income. By thinking about multiple forms of wealth and the impacts on those forms of wealth, communities and organizations can have a more comprehensive way to consider and measure progress.

Comparing Systems for Measuring Wealth

Systems for measuring wealth based on capitals have been in use for a while. Several approaches have been developed, with variations in the number of capitals measured and the definitions of each form of capital. Each system works for practitioners in a specific context, depending on their priorities.

- The Triple Bottom Line Framework measures impacts on three forms of capital. These are often called the 3Es of economy, equity and ecology (Coastal Enterprises) or the 3Ps of people, planet and profit.
- The five capitals approach, as set forth by The Forum for the Future, includes natural, human, manufactured, social, and financial capitals (The Five Capitals).
- Cornelia and Jan Flora presented seven forms of capital in their Community Capitals Framework (2008). natural, cultural, human, social, political, financial, and built.
- The Permaculture Movement identifies and measures eight forms of capital: social, material, financial, living, intellectual, experiential, spiritual, and cultural (Martenson and Roland 2014).
- The WealthWorks approach measures eight forms of wealth, including individual, intellectual, social, natural, built, political, and financial capitals (Wealth: The eight capitals).

Wealth can be measured in a variety of ways and there are similarities and differences between these various frameworks (Table 1). Financial/economic wealth is included in each of these frameworks, as well as social and natural. As these frameworks have evolved, wealth related to networks of people became more important. As an example of this evolution, the Wealth Creation in Rural Communities Initiative added political capital to its tracking in the second year of their work (Yellow Wood Associates 2010) and included a definition for cultural capital beginning in the third year of their work (Yellow Wood Associates and the Wealth Creation Management Team 2013).

Organizations and practitioners may modify a framework to match more closely with their needs and priorities. In considering how best to measure the impacts of community conservation, the Land Trust Alliance worked with Yellow Wood Associates to incorporate justice/equity/access into a modified version of WealthWorks' framework of eight types of impact, since community conservation focuses on assuring the inclusion of all walks of life in conservation outcomes (Yellow Wood Associates and the Land Trust Alliances 2015).

One way of thinking about how this comparison informs current work is to consider the goal or goals of the community or organization involved. Do the local goals lend themselves to one or more of these frameworks? That decision can help practitioners select or design an approach.

Table 1. Measurement Framework

	Triple Bottom Line	Five Capitals	Community Capitals	Permaculture Movement	WealthWorks
Capital Type	Economy	Financial	Financial	Financial	Financial
		Manufactured	Built	Material	Built
	Ecology	Natural	Natural	Living	Natural
	Equity	Social	Social	Social	Social
		Human	Human	Experiential	Individual
				Intellectual	Intellectual
			Political		Political
			Cultural	Cultural	Cultural
				Spiritual	

Practitioner Measurements Using WealthWorks

WealthWorks is an approach to economic development that connects a community's assets to market demand in ways that build lasting livelihoods while recognizing wealth building is the goal of economic development. And building wealth involves much more than increasing the amount of money in a region. Creating jobs and generating income are never enough to build lasting wealth.

In Yellow Wood's work with Ford Foundation grantees, the WealthWorks framework accounted for a variety of forms of wealth: grantees developed measures for the forms of wealth based on the actions and strategies they were pursuing through their work (WealthWorks a, b, c, d).

Measures of intellectual capital (creativity, imagination and knowledge) focused on behavioral changes and outcomes that result from new knowledge and understanding of new possibilities. The Central Appalachian Network (CAN), which focused on an agriculture and food systems initiative throughout Central Appalachia, measured intellectual capital by tracking the number of buyers engaged in the value chains and the value of their purchases of local and organic food. From 2009 to 2011, increasing the understanding of buyers of the value to them of purchasing local and organic products resulted in a 37 percent increase in number of buyers engaged in the value chains (from 51 to 70), and an increase of more than 160 percent in the value of their annual purchases (from $1,794,000 to $4,667,321) (Yellow Wood Associates and the Wealth Creation Team 2013).

Individual capital (an individual's skills and health) is measured by focusing on the behavioral changes and outcomes that can only occur when new skills have been mastered or human health has improved. The actions and strategies to improve individual capital are about building individual skills through training. The Federation of Appalachian Housing Enterprises, a nonprofit focused on providing energy efficient affordable housing construction, helped 16 individuals receive their Building Performance Institute (BPI) certification and training in Home Energy Rating System (HERS) rating (two skills critical to doing this work), which is a step toward providing access to energy efficiency assessment services for rural areas, while also allowing these individuals to expand their own business offerings (Yellow Wood Associates and the Wealth Creation Team 2013).

Natural capital is typically measured by quantifying a natural resource. For example, Rural Action, an organization focusing on building a certified wood products value chain, measured the number of acres of Forest Stewardship Council (FSC) certified forest land, in an effort to understand the status of access to certified wood products, which is key to the success of the value chain. CAN measured the number of acres of farmland contributing to CAN-supported value chains, in addition to quantifying the number that were certified organic as well as chemical-free but uncertified (Yellow Wood Associates and the Wealth Creation Team 2013).

Yellow Wood's work, with Walton Family Foundation grantees in the Lower Mississippi River Region, gathered state tourism data from across the region about consumer demand for different types of nature and cultural tourism. This information was gathered and analyzed in an effort to determine if and how the sub-regional grantees were meeting the consumer demand for nature and cultural tourism and how they could better meet that demand (Yellow Wood Associates 2013).

How Does Measurement Change Practice?

In the end, the most important reason to measure outcomes is to see if programs and projects are having the desired impact(s). If they are not, mid-course corrections may be needed. Without the pause necessary to measure, organizations and communities may continue their work without clarity about the effectiveness of the interventions.

A few parting tips can guide local efforts:

1. Measure "goods," not "bads." If residents are to be employed, measure employment, not unemployment.
2. Some aspects can be measured directly but others are measured only by proxy. Indirect measures are not as precise as direct measures, but the trade-off

between precision and ease of measuring may be worthwhile.

3. Measure only those things that will provide needed information. Rather than measuring anything and everything, choose measures that will actually be used. Measurement takes time; reserve that time for the most important information.

Practitioners working in fields as diverse as tourism, agriculture, housing, and land conservation can find and adapt measurement systems that meet their needs and support their missions. Measuring the outcomes and the forms of wealth that matter most allows these practitioners to evaluate their work, meet funder expectations, influence policy, and spread the word out about their successes.

References

Ammons, D. and Morgan, J. 2011. State-of-the-Art Measures in Economic Development. *PM Magazine*, June 2011. 93, no. 5. Accessed July 9, 2015. **webapps.icma.org/pm/9305/public/cover.cfm?author=David%20Ammons%20and%20Jonathan%20Morgan&title=State-of-the-Art%20Measures%20in%20Economic%20Development&subtitle**.

Coastal Enterprises, Inc. *Triple Bottom Line or "3E Investing" Profile*. Accessed July 8, 2015. **www.ceimaine.org/wp-content/uploads/2014/02/3einvesting7-091.pdf**.

Community Capitals. Department of Sociology at Iowa State University. Accessed July 9, 2015. **www.soc.iastate.edu/staff/cflora/ncrcrd/capitals.html**.

The Five Capitals. Forum for the Future. Accessed July 9,2015. **www.forumforthefuture.org/project/five-capitals/overview**.

Martenson, C. and Roland, E. 2014. Permaculture and the 8 Forms of Capital. Resilience. Post Carbon Institute. Accessed July 9, 2015. **www.resilience.org/stories/2014-05-30/permaculture-and-the-8-forms-of-capital**.

Measuring Outcomes. *Strengthening Nonprofits: A Capacity Builder's Resource Library. National Resource Center.* Accessed July 8, 2015. **strengtheningnonprofits.org/resources/guidebooks/MeasuringOutcomes.pdf**.

Wealth: The eight capitals. WealthWorks Community. 2015. Accessed July 9, 2015. **www.wealthworks.org/basics/explore-regional-wealth-building/wealth-eight-capitals**.

WealthWorks a. Economic Development Resources: Success stories. "Back to the future: Food, farms, and renewal." Aspen Institute Community Strategies Group. Accessed July 9, 2015. **www.wealthworks.org/economic-development-resources/success-stories/food-farms-and-renewal**.

WealthWorks b. Economic Development Resources: Success stories. "Wealth from forests: Doing wood right." Aspen Institute Community Strategies Group. Accessed July 9, 2015. **www.wealthworks.org/economic-development-resources/success-stories/wealth-forests-doing-wood-right**.

WealthWorks c. Economic Development Resources: Success stories. "Camelina: Biofuel for thought." Aspen Institute Community Strategies Group. Accessed July 9, 2015. **www.wealthworks.org/economic-development-resources/success-stories/camelina-biofuel-thought**.

WealthWorks d. Economic Development Resources: Success stories. "Clean and lean: Building wealth efficiently." Aspen Institute Community Strategies Group. Accessed July 9,2015. **www.wealthworks.org/economic-development-resources/success-stories/building-wealth-efficiently**.

Yellow Wood Associates. *The Economic Impact of Canada on Clinton County, New York*. Quebec-New York Corridor Coalition, 2002.

Yellow Wood Associates. *Formulating a Sustainable Economic Development Process for Rural America* (Second Interim Report), 2010. Accessed July 9, 2015. **www.yellowwood.org/formulating-a-sustainable-economic-development-process-for-rural-america-2nd-interim-report.html**.

Yellow Wood Associates. *Demand for Nature Based Tourism in the Lower Mississippi River Region*. 2013. Accessed July 9, 2015. **www.yellowwood.org/assets/resource_library/resource_docs/demandfornaturebasedtourisminthelowermsriverregion.pdf**.

Yellow Wood Associates and Land Trust Alliance. 2015. Community Conservation Impact Tool for Land Trusts. Unpublished work in progress.

Yellow Wood Associates and the Wealth Creation Management Team. *Formulating a Sustainable Economic Development Process for Rural America* (Fourth Interim Report), 2013. Accessed July 8, 2015. **www.yellowwood.org/formulating-a-sustainable-economic-development-process-for-rural-america-fourth-interim-report.htm**.

Yellow Wood Associates and the Wealth Creation Management Team. *Formulating a Sustainable Economic Development Process for Rural America* (Third Interim Report), 2011. Accessed July 8, 2015. **www.yellowwood.org/formulating-a-sustainable-economic-development-process-for-rural-america-3rd-interim-report.html**.

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