

# Augmentative Communication News

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## INSIDE THIS ISSUE . . .

<b>Clinical News</b>	AAC outcomes: Definitions & the WHO
<b>For Consumers</b>	AAC Stakeholders: It's all relative
<b>University &amp; Research</b>	Measurement of Outcomes
<b>Governmental</b>	AAC model policy: Medicaid coverage
<b>Equipment</b>	Manufacturer perspectives

## UPFRONT

Limited funds, skyrocketing costs and an increasing demand for services have created a situation that begs for accountability. Concerns about quality, the consumer empowerment movement and cost containment factors have dramatically changed the day to day experiences of AAC stakeholders (*i.e.*, clinicians, administrators, third-party payers and consumers). Mandates (*e.g.*, laws and public policies) have challenged our educational systems, the telecommunications industry, most employers and a range of social-welfare and

community agencies. Access and opportunities are to be provided to people previously ignored, including persons with severe communication impairments.

Consumers, the general public, program administrators and funding agencies want assurance that what professionals and manufacturers do has "value," both to the individuals served and to society. In short, it's time to get serious about outcomes. Outcomes-based accountability means practitioners are held accountable both for what they do, but for the results of what they do.

This issue takes a first brush to a canvas we'll (*cont. on page 2*)



## Clinical News

### AAC outcomes: Definitions & the WHO

The term *outcome* means "the result or consequence of events, processes or experiences."<sup>1</sup> Variations on the definition are easy to find. For example, in the education area, *outcomes* are:<sup>2</sup>

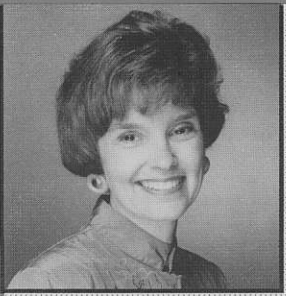
- the products of a curriculum, or
- acquired human capabilities that make possible a variety of performances including verbal and mathematical skills, cognitive strategies, attitudes and motor skills, or
- the results of interactions between individuals and their educational experiences.

In the rehabilitation and medical arenas, *outcomes* are "changes in status attributed to a specific intervention or treatment."<sup>3</sup>

### More definitions

*Outcomes* refer to both positive and negative results. The terms *efficacy* and *effectiveness*, on the other hand, target positive results. In the epidemiological literature, a distinction is made between the efficacy of an intervention and its effectiveness.<sup>4</sup> *Efficacy* studies measure the benefits derived under ideal conditions (usually a controlled research environment) while *effectiveness* measures are conducted under typical conditions in real life.

*Outcomes measurement* is defined as the science of systematically measuring and analyzing treatment outcomes and then using the results to change the way care is provided.<sup>5</sup> The (*cont. on pg.2*)



(UPFRONT cont. from page 1)  
be painting for years to come. To begin this work, 110 AAC leaders from 6 countries are gathering in February for our Alliance 95 – Outcomes in Augmentative and Alternative Communication conference in Monterey, California. We are very pleased to be able to provide a forum where consumers, clinicians, teachers, researchers, developers, manufacturers, policy makers, administrators, advocates and “payers”

can work collaboratively on important questions:

- What are the desired outcomes of AAC services and devices?
- What are we currently doing to measure AAC outcomes?
- Can we measure these outcomes in ways that are more meaningful? How?
- Do the benefits of devices and services justify their costs?
- From whose perspective?

We need to prepare by identifying desired outcomes, measuring them, and then sharing data produced in ways that are meaningful to payers, administrators and policy makers. In healthcare settings, outcomes programs are already used to determine cost benefit ratios, to set standards of care and to establish priorities. They are also used for quality control and improvement, and in the accreditation of facilities and programs.

Each of us, as individuals and as stakeholders in the field of AAC, has much to gain from taking the management of outcomes in AAC seriously. In this newsletter, each section addresses the issues in a different way. **Clinical News** provides basic definitions and a framework within which to consider AAC outcomes. **For Consumers** discusses various stakeholder perspectives. **University/Research** shares some preliminary information from a recent survey, and **Equipment** considers manufacturer perspectives. Finally, the **Governmental** section contains information about a model coverage policy for Medicaid coverage of AAC devices and services. Thanks to all who have helped (see **Resources and References** on page 8). I'm off to the **Outcomes in AAC** conference to learn more.

Sarah W. Blackstone, Ph.D. CCC-SP, Author

#### Clinical News (cont. from page 1)

key is that the results of measuring outcomes are supposed to influence the direction of change.

*Clinical indicators* are valid, reliable measures related to one or more dimensions of performance, such as effectiveness. Indicators measure cumulative effects and can be used in performance assessment and improvement activities. They are objective, verifiable and

conform with accepted professional practices.<sup>6,7</sup>

*Critical pathways* are created by stakeholders to identify the most efficient ways to reach a desired outcome. They are particularly useful in team-based situations and include components of coordinating, timing, sequencing and monitoring care.

*Outcomes management* refers to a program or system of data col-

lection that takes into account the interests of all stakeholders. Data can be *aggregated*, i.e., combined in ways that evaluate trends and allow comparisons among programs and facilities.

*Value* is a perception of the quality or benefit of an outcome over costs. For example, a 1993 study demonstrated that 70 percent of the U.S. public felt they received good value for the cost of a chicken dinner, but only 20 percent felt the same way about the cost of a hospital stay.<sup>8</sup>

#### The WHO framework

The World Health Organization's (WHO) International Classification of Impairments, Disabilities and Handicaps (ICIDH) (1980) is a useful framework.<sup>9</sup> It provides a continuum of levels against which to consider the consequences of AAC services and the impact of assistive technology on individuals.<sup>10</sup> Table I has examples of behaviors, interventions, desired outcomes and measurement approaches at each level.<sup>11</sup>

- **Impairment.** An abnormality of psychological, physiological or anatomical structure or function at the organ level of the individual.

Impairments, such as dysarthria, dyspraxia and/or severe language comprehension difficulties may interfere with the development of speech in people with autism, cerebral palsy and Down Syndrome. They may also result in a loss of speech following an accident, injury or disease process.

- **Disability.** Limitations (caused by an impairment) that impede the ability to perform daily tasks in a normal manner (e.g., eating, writing, talking).

Severe speech and/or language impairments result in communication disabilities. There is not, however, a one-to-one relationship be-



**TABLE I. The WHO model as applied to AAC for individual outcomes**

Relevant behaviors	Focus of intervention	Desired outcomes	Measurement approaches
<b>Impairment Level</b>			
Person has speech, language, cognitive, hearing, motor impairments that make their speech very difficult to understand	Reduce deficits through articulation drills, oral motor exercises, language training	Speech improves Language improves Oral motor skills improve	Articulation tests Language tests Speech intelligibility Rate of communication
<b>Disability Level</b>			
Person with speech problems is unable to communicate basic needs, converse and carry out some daily activities	Increase functional communication skills using AAC devices, techniques and strategies	Communicates basic needs Carries on conversations Talks on the phone Writes letters	Functional status measures Performance assessment Portfolio assessment Communicative interaction
<b>Handicap Level</b>			
Person experiences isolation, joblessness, dependency and role changes because of how he or she is perceived by others	Increase access, expand opportunities, educate others in community, change expectations and attitudes	Participates in a range of school/work and community activities Has job Lives independently Is happy with life Has supportive family and friends	Quality of life scales Educational & employment status Circle of partners Handicap inventories Technology abandonment studies

tween the severity of an impairment and its associated disability. Many people who use AAC manage quite well despite multiple impairments, because of the expertise they have achieved using AAC devices and strategies.

- **Handicap.** The social disadvantages that result from an individual's impairment or disability and limit fulfillment of roles typical of other persons of similar age, sex, social circumstances and cultural background.

Communication impairments and disabilities can be addressed at the level of the individual. However, people who are unable to speak, including those who can use AAC devices proficiently, continue to face attitudinal walls that crumble slowly and sometimes leave monsters in their closets.<sup>12</sup> Interventions that ignore these realities often fail.

Until people with disabilities have access to educational opportunities, are employed, can participate actively in their families and in community activities, and can live where they choose, the time and money spent learning to express basic needs, use an AAC

device, carry on a conversation or become literate may not seem to them, and others, to be worth it.

### Measuring outcomes

Outcomes in AAC can be measured at each ICIDH level. As summarized in Table I, types of measurement approaches differ substantially. For example, at the level of impairment, changes in an individual's clinical status are measured. At the level of disability, the functional status of the individual is tracked. At the handicap level, measurement focuses on quality of life issues. Consumer satisfaction and cost benefit measures are a concern across all levels, particularly to those paying the bills. However, they ultimately reflect society's willingness to support individuals with disabilities.

So, what are appropriate AAC outcome measures? Many individuals who benefit from AAC require assistance throughout their life span. Although speech and language skills, as well as motor and cognitive abilities, often change and may improve, most individuals who use AAC techniques continue to experience difficulty speaking, writing and/or

understanding language. By definition AAC intervention is focused at the level of impairment. Thus, impairment measuring is of limited use and limited validity.

Because the goals of AAC techniques, strategies and assistive technology are focused at the disability and handicap levels, meaningful outcomes measurement requires the documentation of changes in an individual's day to day ability to communicate and in his/her participation in educational, vocational, family and/or community activities.

Data that are carefully collected for individuals can also be combined to measure the outcomes of AAC programs. For example, consumer satisfaction with AAC services and devices is an important outcome for AAC programs and providers to measure. Perhaps AAC stakeholders can form collaborative relationships. Working together they may provide more meaningful information to the field. To do so, however, it will be necessary to share measurement strategies and establish the reliability and validity of measurement tools.



## For Consumers

### AAC Stakeholders: It's all relative

Batavia<sup>13</sup> identified five major stakeholder groups in the rehabilitation area:

- **Providers.** Professionals who provide services to persons with disabilities.
- **Payers.** Public and private sector funding agencies.
- **Policymakers.** Agencies and government entities that determine and carry out policies that affect the daily lives of individuals with disabilities.
- **Researchers.** Professionals trained to ask and answer questions that bring new knowledge to a field.
- **Consumers.** Persons with disabilities.

In *Alternatively Speaking*, Williams identified 13 groups of AAC stakeholders.<sup>14</sup> In this issue, I place 10 groups in the AAC stakeholder picture (see Table II on page 5.) Front and center are AAC consumers, *i.e.*, persons with severe communication impairments (our *raison d'être*). On both sides are their family members and caregivers, often referred to as secondary consumers. Also in the picture are providers (speech-language pathologists, occupational therapists, teachers and support staff), educators (people who teach AAC courses and write books), administrators of AAC programs, manufacturers of products and researchers. In the back row, watching carefully, are "payers" (public and private funding agencies) and policy makers. They are charged with looking out for the interests of the largest stakeholder group of all, the general public who, often unknowingly, underwrite much of the costs.

### Six areas in which to measure AAC outcomes.

Six outcomes measurement areas are listed in Table II. These areas represent typical components of outcomes management:

- **Clinical results.** Changes in the articulation, language, intelligibility of the individual.
- **Functional status.** Changes in the individual's ability to communicate during daily activities.
- **Consumer satisfaction.** How consumers judge services/devices they have received.
- **Cost benefit.** Perceived and real value as measured in relation to the expenditure of resources or costs.
- **Quality of life — Social impact.** Changes in the individual's participation in community and family, living arrangements, and preferred social activities.
- **Quality of life — Educational/vocational impact.** Changes in the individual's job situation, educational experience, independence.

Table II has a matrix with 60 cells (*i.e.*, ten stakeholder groups and six outcomes areas). Multiple stakeholders bring multiple perspectives to the discussion of outcomes. No wonder it is difficult to develop an outcomes management program.

### Filling in the Matrix

To explore how different stakeholder groups prioritize outcomes, I asked Alliance—95 presenters, facilitators and recorders (hereafter referred to as "experts") to predict, in advance, how each group might respond to the question "What does each stakeholder group consider most important (rank #1), second in importance (rank #2) and so on."

Note: A ranking of #6 implies less importance than a ranking of #5. It does not, however, mean the stakeholders consider the outcome of no importance. Rather, it means they consider it less important than the other areas.

As requested, each "expert" filled in each cell in the matrix, predicting how 10 stakeholder groups might respond. The overall rankings represent the relative importance of each area of outcomes measurement.

These data are interesting, but remember they do not represent the true feelings of any stakeholder group. One observation that can be made is that these experts do not concur on many of their predictions. This was particularly true for their ranking of manufacturers and administrators. The experts did, however, agree on some rankings, which are discussed below. Note: Comments refer to cells highlighted in Table II.

- **Clinical results.** Experts think researchers consider clinical data the most important outcome. They believe consumers and the general public would rank these data as comparatively unimportant.
- **Functional status.** Experts perceive that educators, family members, providers and researchers would rank this outcome area as more important than the others.
- **Consumer satisfaction.** Experts believe this area is *kind of* important to nearly all stakeholder groups and very important to none.
- **Cost benefit.** Experts predict that educators, family members, providers and researchers would rank this area as unimportant. They also indicated that payers, policy makers and the general public feel it is of major importance.
- **Quality of life—social impact.** Experts think consumers are most concerned about this outcome area. They think everyone else, however, would rank it as less important.
- **Quality of life—educational/employment impact.** Stakeholders are perceived as thinking this is neither the most, nor the least, important outcome area to measure.



**Table II. Outcome measurement areas and AAC stakeholders: The perception of experts**

TEN STAKEHOLDERS (alphabetical)	SIX MEASUREMENT AREAS					
	Clinical changes	Functional status of individual	Consumer satisfaction— services & technology	Cost benefit	Quality of life— Social impact	Quality of life— educational/ employment impact
Administrators/ Directors of AAC programs	2,6,3,1,3, 1,4,2,6,3	2,5,3,4,3, 3,4,3,4,4	4,1,5,2,1, 1,3,1,2,2	6,2,2,1,1, 2,5,6,1,1	3,6,6,5,5, 4,5,5,5,6	5,4,4,6,6, 6,2,4,3,5
AAC Consumers	5,5,6,6,6, 6,6,6,5,5	4,2,5,1,5, 2,2,5,4,4	3,3,2,4,4, 2,4,3,3,2	6,6,4,5,3, 5,5,4,6,6	1,1,1,2,1, 1,1,1,1,3	2,4,3,3,4, 2,3,2,2,1
AAC Educators	3,1,3,1,3, 5,2,4,5,1	2,4,1,2,2, 3,1,1,2,2	5,5,2,5,1, 4,5,5,3,4	6,6,5,6,6, 6,6,6,6,6	1,3,6,3,1, 4,3,2,4,5	3,2,4,4,2, 5,4,3,1,3
Family members/ caregivers of AAC users	5,3,2,6,5, 6,6,6,1,5	1,1,1,1,3, 1,3,1,3,2	3,5,3,3,6, 5,5,5,1,1	6,6,5,4,6, 5,5,2,6,6	2,2,5,2,2, 2,1,3,2,4	4,4,4,5,4, 4,2,4,4,3
General Public	6,6,6,6,5, 6,6,6,4,6	4,5,2,3,4, 1,5,4,2,3	5,2,4,5,1, 2,1,5,5,4	1,3,1,2,1, 2,1,1,3,1	3,4,5,1,3, 3,2,3,4,5	2,1,3,4,4, 6,3,2,1,2
Manufacturers and Reps of AAC devices/products	1,4,1,2,5, 3,1,6,4,3	3,1,2,6,4, 2,4,4,5,2	5,2,4,3,2, 4,2,1,2,1	6,5,5,1,2, 4,2,2,1,6	2,6,6,4,5, 3,6,5,3,5	3,3,3,5,6, 6,5,3,4,4
Payess (funding agencies)	5,3,2,3,5, 5,5,2,3,5	2,5,3,2,4, 2,2,3,3,4	6,2,5,6,2, 4,6,5,4,3	1,1,1,1,1, 1,1,1,1,1	4,6,6,5,6, 3,4,6,5,6	3,4,4,4,6, 3,3,4,2,2
Policy Makers	6,3,5,6,5, 5,6,6,4,6	1,4,4,2,4, 4,4,4,5,4	5,6,3,5,1, 3,3,2,4,2	2,1,1,1,1, 3,2,1,1,1	4,5,6,3,6, 2,5,5,3,5	3,2,2,4,6, 2,1,3,2,3
Providers (direct service clinicians, teachers, etc.)	4,2,2,1,4, 6,2,2,1,1	3,1,1,3,5, 1,1,1,2,2	5,5,4,5,3, 2,5,5,4,4	6,6,5,6,6, 5,6,5,5,5	1,4,6,2,3, 1,4,3,1,5	2,3,3,1,2, 4,3,4,3,3
AAC Researchers	1,1,2,1,1, 1,2,1,2,1	2,2,1,2,1, 2,4,2,2,2	6,6,4,5,3, 3,6,3,5,5	5,5,5,6,6, 6,5,6,6,6	3,4,6,3,4, 4,2,5,3,4	4,3,3,4,5, 5,3,4,4,3
Rank order of each expert for each column	2,4,2,4,5, 6,6,6,6,4	1,2,1,1,1, 2,4,5,3,2	5,6,5,2,5, 5,6,4,4,1	4,5,4,3,4, 4,5,3,5,5	6,1,6,2,3, 3,6,2,2,6	3,3,3,2,4, 5,6,1,1,3

Respondents were: Mary Hunt Berg, Susan Blockberger, Carol Cohen, Delva Culp, Frank DeRuyter, Lynn Fox, Carole Krezman, Maggie Sauer, Michael Williams, David Yoder

Note: Attendees at the Alliance—95 conference from each stakeholder group will complete a blank version of Table II. These results will be published in the Alliance-95 conference report, together with recommended measurement tools.

When considering the relative rankings (see last row of each column), functional status ranks as the most important AAC outcomes measurement area. Stakeholders are perceived as considering clinical changes the least important area to measure.

#### Why develop an outcomes program?

Why measure outcomes? First, to improve AAC services, devices and programs; second, to demonstrate to a third party the value of AAC services, devices and programs. In developing an

AAC outcomes management plan, you can use Table II as follows:

- 1) Remove existing numbers;
- 2) ask your stakeholders groups to rank priority areas; 3) decide where to begin, collaboratively.
- 4) Find valid, reliable measurement tools. Stay tuned. Few currently exist.

Given limited time and resources, it is impossible to begin by measuring all outcome areas. Priorities need to be set. In some programs/practices, AAC stakeholders might focus initial efforts on functional outcomes. Or, they

might begin with consumer satisfaction, because it is comparatively easy to measure.

What about the cost benefit factors that experts ranked as so important to third party payers? What if their perception is correct that providers, researchers, family members and educators consider cost benefit factors relatively unimportant? It begins to feel like a disaster waiting to happen. After all, "payers" are the gate keepers; and they determine who has access to services and devices, and under what circumstances.



## University & Research Measurement of Outcomes

I mailed an Outcomes Survey to registrants of our Alliance 95 conference. Questions were: 1) Do you measure outcomes and if so, how? 2) Are your measures adequate? If not, what elements are missing? 3) What questions do AAC outcomes programs need to address? Fifty-two (52) respondents from 7 stakeholder groups provided information. Some preliminary observations follow:

- Only half of those responding indicated they systematically and routinely measure the outcomes of AAC services. Almost no one aggregates data (i.e., uses individual data to look at group effects.)
- Data collected are often used to determine goals and then kept in their AAC user's file.
- People who work in health-care settings are much more likely to have information about outcomes management programs and measurement approaches than those working in other settings.
- Many found terms like clinical indicators and aggregating data unfamiliar.
- Consumers are largely uninvolved in the outcomes management process.
- Most clinicians continue to use traditional approaches to measure changes at the level of impairment (e.g., language tests).
- Functional status and consumer satisfaction are evaluated using tools for which validity and reliability information are not available.
- Very few respondents have any idea how to measure cost benefit ratios. Most recognize the importance of having access to these data.
- Very few respondents said they knew how to develop an outcomes measurement system.

### Critical questions

"What are the critical questions we should ask in developing and using outcomes management systems in AAC?" Respondents said:

**Table III. Key elements to an AAC outcomes management system**

Key Elements	YES/NO	Key Elements	YES/NO
Is it simple? User friendly (easy to use)?		Is it time effective?	
Does it yield useable information?		Does it address relevant/valid indicators?	
Does it define terms like use, competency?		Does it have consistent recording procedures?	
Does it provide consistent, sensitive base-line measures?		Does it have clearly stated goals and objectives?	
Does it allow for accurate interpretation of data?		Is it relevant to client and family?	
Does it identify specific outcomes?		Are data collected from AAC users/partners?	
Does it educate the individuals doing the measuring?		Is the client involved in the process?	
Does it include measures at the level of handicap (i.e., access to education, quality of life)?		Does it include measures of functional outcomes?	

### Cost benefit

(Note: This was the most frequent category mentioned)

- Are we providing appropriate technology. Are device prescriptions appropriate?
- Why is so much technology abandoned?
- Are we using program resources wisely?
- Is a clinician's time well spent?
- Are the costs benefiting the client?
- How can we get school districts to provide more services?
- When prioritizing rehabilitation and assistive technology services, how do the outcomes of AAC interventions and devices compare?
- Is this particular technique, staff member, program, institution worth supporting?
- Could resources be reorganized so more clients could be served?

### Clinical results

- What is the best way to teach people how to use an AAC device?
- What does clinical follow-up data show?
- What is the efficacy of various approaches routinely used in AAC?
- What does "mastery" as an augmented communicator mean?
- How long do recommendations last for people at different ages and with different diagnoses?
- What are the critical paths in AAC intervention?

### Functional communication

- Are consumers any better off after receiving AAC services and devices? How can we demonstrate this objectively?
- What are our desired functional outcomes?
- How do these relate to communication competency?

### Consumer satisfaction

- Are we meeting consumers' needs?
- What are we doing/not doing that clients are unhappy about?

### Quality of life?

- Are we meeting the consumers' perceptions of need?
- What are the impacts of AAC services and devices on an AAC user's activities, employment status, education and friendships?
- What impacts do AAC services and devices have on inclusion, productivity, participation and independence?

### Key Elements

"What are the key elements of effective AAC outcomes management systems?" Most said they didn't know. However, Table III lists some criteria respondents felt should be considered as we develop and plan ways to manage the measurement of AAC outcomes.





## Governmental AAC model policy: Medicaid coverage

The AAC Model Policy Work Group developed a document entitled *Medicaid coverage policy for augmentative and alternative communication devices and services*.<sup>15</sup> This accomplishes the first of three goals of a supplemental grant by NIDRR to a consortium of 16 state assistive technology (AT) projects and state Protection & Advocacy (P & A) programs. The second goal is to seek the endorsement of three professional organizations (USSAAC, ASHA and RESNA). With these endorsements, the model policy will be presented as a national model policy for Medicaid AAC devices and services funding. Each of the 16 states participating in the grant and approximately half a dozen others will be asked to adopt and implement the policy in their Medicaid programs. The model policy proposal will allow Medicaid programs to make AAC funding decisions in a professionally and fiscally sound manner and accomplish the following goals, often missing in current Medicaid decision making:

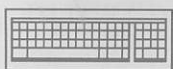
- provide speech-language pathologists and other professionals as needed, with a clear and straightforward procedure for submitting prior approval requests to Medicaid for funding AAC devices and services;
- require speech-language pathologists to engage in an information gathering process about the recipient that is consistent with ASHA's Preferred Practice Patterns for AAC Assessment and Systems Fitting/Orientation.

- outline a scope of practice that provides recipients with access to the full benefits of AAC devices and services, both at present and as AAC technology and recipient's needs change, consistent with ASHA's Position Statement on AAC Services and with the National Joint Commission on the Communicative Needs of Persons with Severe Disabilities, "Guidelines for meeting the communication needs of persons with severe disabilities."
- provide a decision making process that can be administered in a fair and consistent manner.

To date, efforts at Medicaid AAC funding reform have been slowed. The results of such efforts have been mixed and the policies that have emerged often are not professionally sound or fiscally wise. Those who participated in the model policy development and those in the AT projects and the P & A programs are awaiting the completion of the endorsement process (anticipated March 1, 1995). Then, the final process to have the model policy adopted and implemented throughout the country will commence.

Consultant to the group Lewis Golinker, Esq., Director of Assistive Technology Legal Services, National Association of Protection and Advocacy Systems (NAPAS), has spearheaded this effort. He says, "the day should soon arrive where no one will have to shout just to give others the chance to be heard."

Written with Lewis Golinker, Esq. For further information about the Model Policy, contact Lew Golinker, Attorney at Law, 202 The Commons, Suite 507, Ithaca, New York 14850. (607) 277-7286 EST. ➤



## Equipment Manufacturer perspectives

Manufacturers have to be concerned about profit margins. They can not survive unless they sell more units to cover the costs of developing, building, marketing and supporting AAC devices and the related products they produce. In my 20 years (Gasp!) of experience, I have become thoroughly convinced that while AAC manufacturers are responsible for their balance sheets, they are driven by their mission, rather than by the desire to make money. We are lucky.

Manufacturers also measure outcomes by tracking repairs and re-

quests for services. Examples of these are collecting data about 1) the reliability of equipment and 2) the percentage of systems returned within a specific time frame. Unfortunately, as with number of units sold, these data are for internal purposes only. They are not willingly shared with other stakeholders. These data are valuable; unreliable equipment can have a significantly negative impact on AAC outcomes. If data such as these were available, they would almost certainly improve outcomes in other areas (e.g., consumer satisfaction with equipment.)

Probably, the most desirable outcome for an AAC manufacturer is when an individual with a severe communication impairment

uses one of their AAC devices well-enough to be a full participating member of their community. Manufacturers need objective, demonstrable proof that AAC devices make a difference outside of clinical settings.

It is likely that manufacturers are interested in outcomes systems that measure at the disability and handicap levels. As the CEO of Prentke Romich, Barry Romich says, "the number of people served in the future is dependent on the quality of service that is happening today. If we don't demonstrate individual successes, expenditures are going to stop."<sup>16</sup> ➤

## RESOURCES

Thanks to all the participants in **Alliance 95— Outcomes in AAC** who provided information for this issue.

Special thanks to two individuals who helped to plan the conference and provided ideas and valuable feedback for this issue.

Frank DeRuyter, Rancho Los Amigos Medical Center, Communication Disorders Department, 7801 East Imperial Highway, Downey, CA 90242. (310) 940-6800.

Carol Frattali, American Speech Language Hearing Association, 10801 Rockville Pike, Rockville, MD 20852. (301) 897-0112.

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## ALLIANCE—95 Outcomes in AAC

The conference report will capture information shared at **Alliance 95— Outcomes in AAC**.

- Read about major issues discussed by participants in small and large groups.
- Learn from summaries of interviews with participants.
- Consider consensus statements arrived at during the conference.
- Hear about what people think we ought to be doing.
- Think about how the AAC field might address the identification and measurement of meaningful outcomes.
- See highlights of the conference.

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