AAC and Communication in the Workplace

David McNaughton

Department of Educational Psychology, Counseling, and Special Education Department of Communication Sciences and Disorders, The Pennsylvania State University

David Chapple

The Prentke-Romich Company

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Abstract

Communication in the workplace holds many challenges for persons with complex communication needs. A better understanding of workplace communication, and the use of evidence-based strategies for supporting workplace communication by persons who use AAC, can result in improved employment outcomes.

Employment is a goal of many individuals who use AAC (Bryen, Potts, & Carey, 2007; McNaughton, Arnold, Sennott, & Serpentine, 2010; Pugh & Capilouto, 2009). To support positive employment outcomes for individuals who use AAC, we need a better understanding of the communication demands of the workplace, and transition strategies to prepare individuals who use AAC for employment (McNaughton, Bryen, Blackstone, Williams, & Kennedy, 2012). In an effort to provide a variety of perspectives on AAC and communication in the workplace, this paper is co-written by David McNaughton, a university-based researcher on the topic of employment and AAC, and David Chapple, an expert user of AAC technologies and the editor for AAC ConsumerNet. David Chapple currently uses an Eco 2 to communicate, and controls his device using a tracker dot attached to his glasses. He has published extensively on his educational and employment activities (Chapple, 2000, 2011; Chapple & Moats, 2001; McNaughton & Chapple, 2012), and his personal insights will be used to illustrate the major themes of this text.

In this paper, we address five key aspects features of communication in the workplace: the content "rich" nature of workplace communication, the speed of interaction at the worksite, the use of a variety of communication modes in employment settings, the mixture of formal and informal communication that takes place with co-workers, and the range of familiar and unfamiliar communication partners that will be encountered by workers who use AAC. We also will provide suggestions regarding educational experiences and communication supports that can enhance the employment experiences of individuals who use AAC.

Content Rich Vocabulary

Individuals who use AAC are employed in a wide range of jobs (McNaughton & Bryen, 2007). Although there is some vocabulary that is generic across a variety of communication domains (Collier, 2000), specific jobs also have accompanying vocabulary that will be critical to the individual's ability to effectively function and be viewed as a co-worker in a specific setting (Creech, 1993).

The ability to demonstrate proficient use of needed vocabulary is important not only in the workplace, but during the job search process as well. In searching for a job, David Chapple sent out letters of application with detailed information about his education and work experiences along with a resume. Once he had scheduled an interview, he then shared information on his use of assistive technology and AAC and described the workplace modifications that he used to complete work activities. As David describes below, during the interview it was his ability to use the language of the workplace to keep the focus of the interview on his skills, rather than on the physical challenges he might experience in the workplace, that earned him his job.

One day in September I received an e-mail from Wayne Largent from a company named CyberAccess asking me if I wanted an interview. Thinking I wouldn't get the job anyways, I wrote him back a description detailing my disability and the AAC device I used at that time, a Liberator; I even sent him my web site that has my picture on it. After all this I really didn't expect an interview, but in a couple of days I received a call to set up an interview [...] The person that finally hired me saw my skills instead of my disability. He also said he liked how I made him feel comfortable with my disability by just being myself and not letting it be the focus of the interview or any conversation. If anybody asks about my disability, as it was the case during the interview, I answer them and move on.

Success in the workplace will depend not only on participation in work-related discussions, but also the ability to participate in social interactions. Coworkers frequently interact about non-work related topics, such as sports, current events, and leisure activities (Mautz, Storey, & Certo, 2001), and between 35% and 90% of time in the workplace is spent in interaction with others (Henderson & Argyle, 1985).

Balandin and Iacono (1999) examined meal-break conversations for 34 individuals without disabilities, and found that a core of 347 words accounted for 78% of the conversation. At the same time, a large fringe vocabulary, containing many unique words, served to communicate the key ideas in the conversation and to express individuality. Access to these vocabulary items, including "slang" terms, is key to establishing membership in the workplace. As Rick Creech, an individual who uses AAC and who was a long-term employee in the Pennsylvania Department of Education noted, "the workplace requires an expanded vocabulary because in the workplace employees use words that they do not use anywhere else" (Creech, 1993, p. 105).

Literacy also often plays a key role in supporting the ability of the individual to communicate in the workplace. Literacy is not a requirement for the employment of individuals who use AAC, as Light, Stoltz, and McNaughton (1996) reported that roughly half of the individuals using AAC who participated in their employment survey had reading skills below a Grade 3 level. However, many of these individuals were involved in manual labor jobs that may not be an option for persons with more severe disabilities. Also, those individuals with the lowest levels of literacy skills were the individuals who expressed the lowest levels of satisfaction with their jobs, perhaps because they also reported the lowest chances of promotion in their job settings.

Communication Speed

In the workplace, as in many communication environments, there are times when speed of communication is critical (McNaughton, Light, & Gulla, 2003). As Wisenburn and Higginbotham (2009) noted, "By increasing the expressive communication rate of AAC, people who use these systems may produce more relevant and timely statements, provide a more positive impression to their communication partners, and increase opportunities for engaging interactions," (p. 78).

Researchers have suggested a variety of approaches to increase the speed of communication for persons who use AAC (Higginbotham, Lesher, Moulton, & Roark, 2012). One common approach is to anticipate some of the more commonly used vocabulary items and to preprogram them into the device. As David Chapple explains below, this can be a very effective technique in occupations such as computer programming in which some of the vocabulary can be anticipated. The true expertise of the position lies in knowing which vocabulary to use when!

When I got the job there was little question that I was qualified, but there was an issue about my speed. [...] I had previously had some experience with programming for a very small computer company on a very part-time basis, but I just got two assignments in a year. During that time I stored a lot of the most common programming commands under icon sequences, which makes me a relatively fast programmer, so I did get something out of that job experience. However, some of the programming commands are a part of everyday language and therefore are already stored in my AAC device. Some examples are the "if-then-else" statement, the "do-while" statement and the "fornext" statements. Wayne, my boss at CyberTech, was very impressed with how much I could do in a week. When I first started he thought my speed would be a problem, but he took a chance on me anyway. His worries quickly diminished. He discovered my work output equaled that of a programmer without disabilities!

Although there clearly are times when speed is a critical issue, at present we have a limited understanding of the relative importance of different interaction characteristics in a conversation (Beukelman & Mirenda, 2013; Light, 1988), and how listeners conceptualize trade-offs between rate and relevance (i.e., quality of information) during an interaction (Wisenburn & Higginbotham, 2009). For example, although communication partners can become frustrated with slow rates of conversation in some situations (McNaughton & Bryen, 2007), there is informal evidence that callers to a help line for assistive technology accept a slightly lower rate of communication in other situations in which a variety of goals are relevant, for example, in order to obtain technical support for an AAC device from a person who is himself or herself a user of AAC (McNaughton & Arnold, 2010, 2011).

Critical to the successful use of the AAC device to support communication in the workplace is the provision of appropriate education supports prior to transition to the workplace. As Randy Horton, himself a user of AAC technology, observed, basic training in the use of the AAC device rarely is provided to the user prior to expected use (Horton, Horton, & Meyers, 2001). In fact, in a survey of individuals who use AAC and were seeking employment, Pugh and Capilouto (2009) noted that 80% of the respondents indicated that they were not even introduced to the use of AAC until after the age of 12.

Although researchers have demonstrated that introducing supports for communication and literacy at an early age has a strong positive impact for individuals with complex communication needs (Light & McNaughton, 2012), there also have been promising results for programs that intervene with adolescents and young adults as they transition to the adult world. The Augmentative Communication and Empowerment Supports program (Bryen, Slesaransky, & Baker, 1995) provided adults with significant physical and speech disabilities with training in the use of their AAC devices. Seventeen adults with significant physical and

speech disabilities participated in the 2-week immersion program and 1 year of follow-up training and support. Most participants reported that the instruction in their use of an AAC device had substantially helped them in a variety of major life activities, including communicating with unfamiliar people and maintaining a source of income. The Augmentative Communication Employment Training and Supports program focused on strategies for obtaining employment (Bryen, Cohen, & Carey, 2004). The 5-day training (and 1 year of on-line coaching) resulted in participant reports of improved job-hunting skills, communication skills, and information technology skills.

Multi-modal Communication

Full participation in 21st-century life requires access to a variety of communication technologies (Rideout, Foehr, & Roberts, 2010). Individuals who use AAC always have faced the challenge of how to integrate the effective use of a variety of modes of communication, of making decisions about when and how to use different AAC devices, speech, gestures, and signs as a method of communication (Williams, Krezman, & McNaughton, 2008). Into this mix now comes the many different types of distance communication technologies, for example texting, e-mail, blogging, and video that are common in our everyday world (Sellwood, Wood, & Raghavendra, 2012).

In many ways, these new technologies bring new opportunities, as some of the technologies that have now become an accepted part of the workplace (e.g., email, cloud-based document management) may offer advantages over face-to-face communication for individuals with complex communication needs. David Chapple describes how he uses e-mail and instant messaging to communicate in the workplace.

With every job I ever had I have had to write daily reports on what work I have done and write detailed descriptions of bugs I found during beta testing. With my device I can type those reports quickly and I am able to use the appropriate words without spelling too much. In addition to the reports, I communicate with the people in the office primarily by e-mail and instant messages. This is true because I mostly work from my house and go to the office for meetings and special events. I can type long and detailed e-mails to my boss or another engineer with whom I may be working on a project.

For some individuals who use AAC, the availability of distance communication technologies makes telework an attractive option. By working from home, these individuals can make use of both adapted technologies and personal supports that may be difficult to arrange in the workplace. McNaughton, Rackensperger, Dorn, and Wilson (2013) describe the work experiences of nine individuals who use AAC to participate in telework activities. Telework was a valued employment strategy for persons who had experienced difficulty in arranging transportation to the workplace and were frustrated with the challenges of arranging transportation and obtaining support for activities of daily living (e.g., assistance at mealtimes) in the workplace. Participants expressed some concerns, including the potential dangers of social isolation and the need for the employer to facilitate the integration of the person who uses AAC into the work and social networks of the organization. An employer should take care to ensure that telework is a choice from a variety of options, not a fallback measure because of inadequate societal support for onsite workplace participation (Baker, Moon, & Ward, 2006).

Mixture of Formal and Informal Communication

Success in the workplace depends not only on the ability to complete the required job duties, but also to participate in the wide range of communication and social activities that are seen in the workplace (Storey, 2007). David Chapple describes the unpredictability of some of these communication events and the importance of being able to communicate in flexible and creative ways.

One of the most important things at CyberAccess is whether or not a potential employee will fit in with the workplace personality. With my VOCA, I can contribute in meetings as well as make an occasional joke with my co-workers. An example of this was at the Christmas party when the company usually provides a movie. One year the VCR was broken and nobody knew what to do. I suggested that I could sing Christmas carols. Everybody thought that was very funny and they still talk about it to this day. Another example is when groups of employees had to do skits during a training exercise about a certain situation that happened in the daily operations of the company. This turned into a big satire of those situations and that was the purpose I believe. I was able to take part in my group's skit because I was able to save my lines and recite them on cue. This was very fun for me and I think my co-workers enjoyed my participation.

Developing opportunities to participate in part-time and summer employment activities helps individual who use AAC develop needed communication skills, and can alert parents and teachers to needed areas of development for the student's academic curriculum (Carter, Austin, & Trainor, 2012). These early experiences also provide an important time to learn the "soft skills" of time-management, problem-solving, and fitting in with work-place culture that will be critical to successful employment (Bryen et al., 2007).

Communicating with familiar and unfamiliar partners

Successful communication requires skills from both sides of the conversation; sometimes, however, individuals who use AAC will need to take the lead in introducing their method of communication to persons who have previously had limited experience with persons who use AAC. In many cases, there are both knowledge and social barriers that must be overcome. Jim Prentice (2000), an individual who used AAC and worked at a large corporation for a number of years, describes the tactics he used to introduce himself to his coworkers during his first days at the new job.

When I started to work, I'm sure that all the employees surrounding my workstation probably thought I was someone from Mars. I rode in on my motorized wheelchair and had some sort of device attached to my chair. I rode past them, and they really didn't know whether I was able to talk. If they did talk to me, they weren't sure I was able to answer them. They never saw someone coming to their work with a communicator.

I stopped them in their tracks, before they were frozen on the spot, and said, "Good morning, my name is Jim. How are all of you doing today?" Big smiles came on their faces, and they seemed to answer in unison, "We are fine, and it's nice to have you working with us." That sure broke the ice, I felt like one of the team then. I made sure I programmed a few jokes into my communicator so that it would make my conversations more friendly and comfortable for them. It worked! (Prentice, 2000, pp. 209-210)

There are a variety of strategies individuals or companies can use to support individuals who use AAC in learning the skills needed to successfully engage in communicative interaction with familiar and unfamiliar partners. For example, Light, Binger, Agate, and Ramsey (1999) described strategies for teaching partner-focused questions to individuals who use AAC and the positive impact of the use of these strategies on the perceptions of communication partners.

Summary

Obtaining and maintaining employment provides many challenges both for the individual who uses AAC and for the individuals who support them. At the same time, there now is growing evidence that employment is a viable goal for persons with complex communication needs (McNaughton et al., 2010, 2012). When employers and individuals pay careful attention to addressing the challenges of workplace communication and the provision of

a variety of key education and employment transition activities, they help to promote success for persons who use AAC in the workplace.

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